## Cayucos Sustainable Water Project

## Draft Environmental Impact Report SCH#2016041078 January 2017



Prepared By: Firma Consultants, Inc.



Prepared for: Cayucos Sanitary District 200 Ash Avenue Cayucos, CA 93430



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## Cayucos Sustainable Water Project

#### **Cayucos Sanitary District**

200 Ash Avenue Cayucos, California 93430

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Landscape Architecture Planning Environmental Studies Ecological Restoration

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I. Project Description

#### PURPOSE OF THE EIR AND DESCRIPTION OF REVIEW

#### **LEAD AGENCY**

The Proposed Project, the Cayucos Sustainable Water Project (CSWP), is construction of a Water Resource Recovery Facility (WRRF) and related conveyance infrastructure to serve the Cayucos community. The boundary of the Cayucos Sanitary District (CSD) service area and location of the Proposed Project Site and the Alternative Site is shown on Map I-1.

CSD is the Lead Agency under CEQA for preparation of this EIR. Lead Agency is defined as the agency that would carry out, or implement, the proposed project even if the project is in the jurisdiction of another public agency. In this case CSD will carry out the project. The County of San Luis Obispo (WRRF) and the City of Morro Bay (pipeline work in city limits) as the land use authorities are responsible for issuing Conditional Use Permit / Coastal Development Permits for the project.

#### **PROJECT HISTORY**

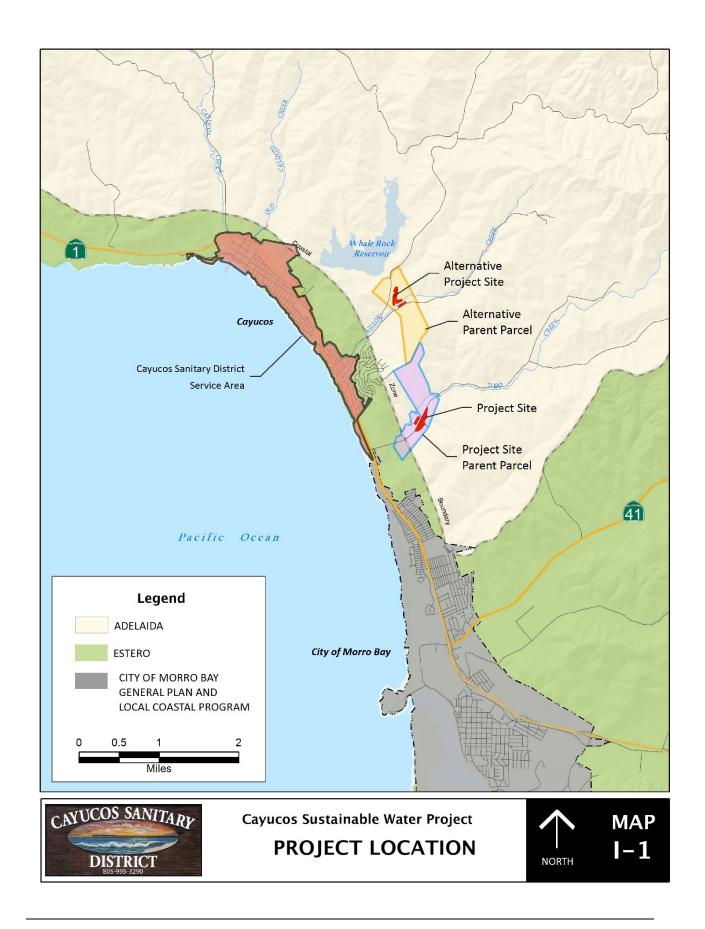
The CSD and the City of Morro Bay worked collaboratively to upgrade the treatment processes and improve the discharged water quality at the shared Morro Bay Cayucos Sanitary District Waste Water Treatment Plant (MBCSD WWTP) for nearly a decade. The purpose of the proposed upgrade to the MBCSD WWTP was to improve discharged water quality to at least full secondary treatment and eliminating the need for the Clean Water Act Section 301(h) modified discharge permit based on a Settlement Agreement with the Central Coast Regional Water Quality Control Board (RWQCB). The 2005 Settlement Agreement provided a nine and one half year timeline for the completion of the upgrades at the MBCSD WWTP. At their January 10, 2013 meeting, the California Coastal Commission (CCC) determined that upgrading and maintaining wastewater facilities at the location of the existing MBCSD WWTP would violate the Coastal Act, effectively mandating the abandonment of the CSD's historic wastewater treatment infrastructure.

Since upgrading the existing MBCSD WWTP was no longer a viable option, the CSD Board determined at its April 30, 2015 meeting that the best way to secure the community's water future was the pursuit of a stand-alone WRRF by developing this project, the CSWP. The mission of this project is to deliver a sustainable and cost effective water resource recovery system for the community of Cayucos within the streamlined schedule necessitated by the status of the current MBCSD WWTP National Pollutant Discharge Elimination System (NPDES) permit and the RWQCB Settlement Agreement.

The Project site was selected by the CSD Board of Directors from five candidate sites as superior in meeting the Project Objectives and for environmental suitability.

#### **EIR SCOPING AND NOTICE OF PREPARATION**

A Notice of Preparation (NOP) was distributed on April 21, 2016 to inform other public agencies, interest groups and the public in general of the Cayucos Sanitary District's intent to prepare an EIR for the CSWP. The NOP provided an opportunity for those interested in the Proposed Project to comment on the proposed EIR's contents. Additionally, the NOP was sent to the State Clearinghouse, which is responsible for forwarding it to State agencies that might be affected or have responsible agency status.



As required by CEQA Guidelines Section 15082(c)(1), a noticed public scoping hearing for the EIR was conducted on April 28, 2016.

Comments received in response to the NOP and at the scoping meeting were considered in the preparation of Draft EIR. Each EIR study topic in Section IV includes a section that describes NOP and scoping meeting comments.

#### **NATIVE AMERICAN CONSULTATION**

AB 52 establishes a consultation process with all California Native American Tribes on the Native American Heritage Commission (NAHC) list, including Federal and Non Federal Recognized Tribes. AB-52 defines Tribal Cultural Resources as a site feature, place, cultural landscape, sacred place or object, which is of cultural value to a tribe and is either eligible for the California Register of Historic Resources or a local historic register.

Early notification of the Proposed Project was provided to tribal representatives in the geographic area who are traditionally and culturally affiliated in San Luis Obispo County including AB 52 notification correspondence upon initiation of Phase 1 Archaeological Surface Surveys, the Notice of Preparation / Initial Study and the initiation of subsurface testing on the site and pipeline route. Requests for early consultation under AB52 were not received from designated tribal contacts, however, meetings have been initiated with tribal representatives including one site visit and ongoing dialog.

#### **EIR SCOPE**

Based on the Initial Study and NOP (refer to Appendix A) responses the following issues were identified for study in the EIR:

- Geology and Soils
- Agricultural Resources
- **Biological Resources**
- Drainage, Flooding and Water Quality
- **Cultural Resources**
- Traffic and Circulation (Construction Phase)
- **Growth-Inducing Effects**
- Visual Resources
- Noise (Operational and Construction Phase)
- Air Quality and Greenhouse Gases
- Hazards and Public Safety
- Land Use and Planning

#### CONTENT, ADEQUACY AND INTENDED USES OF THE EIR PURSUANT TO CEQA

This EIR was prepared in accordance with the requirements of the CEQA and the State CEQA Guidelines (14 California Code of Regulations, §15000 et seq.) as amended. Section 15151 of the State CEQA Guidelines provides the following standards for EIR adequacy:

An EIR should be prepared with a sufficient degree of analysis to provide decisionmakers with information which enables them to make a decision which intelligently takes account of environmental consequences. An evaluation of the environmental effects of a proposed project need not be exhaustive, but the sufficiency of an EIR is to be reviewed in light of what is reasonably feasible. Disagreement among experts does not make an EIR inadequate, but the EIR should summarize the main points of disagreement among the experts. The courts have looked not for perfection but for adequacy, completeness, and a good faith effort at full disclosure.

#### The purposes of this EIR are:

- To serve as an informational document which examines the likely environmental impacts of the proposed project,
- To identify those environmental impacts that could be potentially significant,
- To develop mitigation measures to reduce identified potentially significant impacts to the extent feasible,
- To identify potentially feasible alternatives that could avoid or reduce significant impacts,
- To provide a means for citizens to participate in the decision-making process.

A significant environmental effect is defined in CEQA as a substantial, or potentially substantial, adverse change in any of the physical conditions within the area affected by the proposed actions.

While the information in the EIR does not control the CSD's ultimate discretion on the proposed project, the CSD must respond to each significant effect identified in the EIR by making certain findings required under CEQA and, if necessary, by adopting a Statement of Overriding Considerations pursuant to Sections 21002.1 and 21081 of CEQA and Section 15093 of the CEQA Guidelines.

Specifically, prior to approving the proposed project, CSD is required to certify 1) that the EIR has been completed in compliance with CEQA, 2) that the CSD Board of Directors has reviewed and considered the information in the EIR, and 3) that the EIR reflects the independent judgment of the CSD. Moreover, CEQA specifies that no public agency shall approve or carry out a project for which an EIR has been certified which identifies one or more significant environmental effects of the project unless the public agency makes one or more written findings for each of those significant effects, accompanied by a brief explanation of the rationale for each in making the following findings:

- Changes have been made to avoid or substantially reduce the magnitude of the impacts;
- · Changes are within another agency's jurisdiction, and such changes have been, or should be, adopted; and/or
- Specific economic, social, or other considerations make infeasible mitigation measures or alternatives that would avoid or substantially reduce the impacts.

Should CSD determine that a significant impact is unavoidable and cannot be mitigated, a Statement of Overriding Considerations would be required in connection with the decision to adopt the project.

In order to provide information upon which the CSD Board of Directors will make the findings set forth above, this EIR categorizes each potential impact into one of three categories:

#### Significant and Unavoidable Impact (Class 1 Impact)

A significant and unavoidable impact is a significant adverse effect on the physical environment that cannot be avoided or reduced to a less than significant level even if reasonable mitigation measures are incorporated.

#### Significant Impact that Can Be Mitigated or Avoided (Class 2 Impact)

A significant impact is an impact that could potentially have a substantial adverse impact on the physical environment but can be avoided or reduced to less than a significant level by adopting either mitigation measures or a project alternative.

#### Less than Significant Impact (Class 3 Impact)

A less than significant impact is an effect that is determined not to have a substantial adverse impact on the physical environment and therefore no mitigation is required.

Impact evaluation criteria are presented for each issue examined in the EIR. The purpose of the criteria is to establish the thresholds required to make a determination if a significant impact will result. This enables those reviewing this document to understand how determinations about impacts were made. In establishing these criteria, the EIR relies to the greatest degree possible on local standards, existing laws, and government regulations.

In this report, information is organized into separate substantive topics to clearly address, analyze and disclose potentially significant impacts. Each topic includes a section in which the significance of the impacts and the probable effectiveness of proposed mitigation measures are discussed.

The purpose of the publication of the draft EIR is to allow the public and applicable agencies to review and comment on the findings of the report.

Section 15204(a) and (c) of the CEQA Guidelines indicates that:

- (a) In reviewing draft EIRs, persons and public agencies should focus on the sufficiency of the document in identifying and analyzing the possible impacts on the environment and ways in which the significant effects of the project might be avoided or mitigated. Comments are most helpful when they suggest additional specific alternatives or mitigation measures that would provide better ways to avoid or mitigate the significant environmental effects. At the same time, reviewers should be aware that the adequacy of an EIR is determined in terms of what is reasonably feasible, in light of factors such as the magnitude of the project at issue, the severity of its likely environmental impacts, and the geographic scope of the project. CEQA does not require a "lead agency" to conduct every test or perform all research, study, and experimentation recommended or demanded by commentors. When responding to comments, lead agencies need only respond to significant environmental issues and do not need to provide all information requested by reviewers, as long as a good faith effort at full disclosure is made in the EIR.
- (c) Reviewers should explain the basis for their comments, and, should submit data or references offering facts, reasonable assumptions based on facts, or expert opinion supported by facts in support of the comments. Pursuant to Section 15064, an effect shall not be considered significant in the absence of substantial evidence.

The draft EIR is circulated for agency and public review during a 45-day public review period. Comments received by CSD on the draft EIR within the review period will be reviewed, and responses to comments will be included in the Final EIR.

The Draft EIR is available for review and download from the CSD website:

#### www.cayucossd.org

Additional copies of the draft EIR and copies of documents incorporated by reference into this draft EIR are available at the office of the Lead Agency:

Cayucos Sanitary District Rick Koon, General Manager 200 Ash Ave. Cayucos CA 93430

Comments to the draft EIR should be submitted to the CSD's consultant:

Firma
David Foote ASLA
187 Tank Farm Road Suite 230
San Luis Obispo, CA 93401

The Final EIR will be prepared and forwarded to the CSD Board of Directors for consideration under the provisions of CEQA. If the EIR is certified and adopted by CSD, then they may proceed with applications for permits on the discretionary actions required for land use and other authorizations needed for the CSWP.

The mitigation measures identified in the EIR are recommended to be included as Conditions of Approval and implemented and monitored under a Mitigation Monitoring Program to also be adopted by the CSD.

It is not the purpose of the EIR to recommend any particular course of action be taken by the CSD. CEQA requires the decision-makers to make decisions with knowledge of the potential environmental impacts of the proposed actions, and to balance the potential benefits against the environmental impacts that are likely to result from those actions.

#### SUBEQUENT DISCRETIONARY ACTIONS BY THE COUNTY AND RESPONSIBLE AGENCIES

The Final EIR also will be reviewed and relied upon by other agencies to grant discretionary approvals required from those agencies to implement the project. The agencies that may utilize this EIR when acting in a "Responsible Agency" capacity in connection with discretionary authorizations needed to implement the project include:

• San Luis Obispo County for a Conditional Use Permit, and for infrastructure in the Coastal Zone, a Coastal Development Permit.

- County of San Luis Obispo Public Works Department for an encroachment permit for infrastructure in the public right of way.
- State Water Resources Control Board (SWRCB) As part of their responsibility to implement the Clean Water Act and the Porter-Cologne Water Quality Control Act, the SWRCB through its subsidiary the Central Coast RWQCB, must approve the CSWP treatment and disposal system and issue an NPDES and Waste Discharge Requirements (WDR) discharge permit prior to operations beginning and a Master Reclamation Permit prior to reuse of the reclaimed water.
- California Regional Water Quality Control Board for Construction General Permit and Clean Water Act Section 401 Water Quality Certification related to work at creek crossings.
- California Department of Transportation for encroachment permit for infrastructure in the state highway right of way.
- US Fish and Wildlife Service for Endangered Species Act section 7 consultation.
- US Army Corps of Engineers for Clean Water Act section 404 permit for creek crossing(s).
- California Department of Fish and Wildlife for a Section 1602 Lake and Streambed Alteration Agreement.
- City of Morro Bay for a Coastal Development Permit for pipeline conveyance and outfall lift station and tie-in construction.
- California Coastal Commission for a Coastal Development Permit for outfall tie-in construction.
- The County Department of Agriculture (Department) is responsible for protecting agricultural resources and operations from the negative effects of encroaching suburban and urban development. The Department acts in an advisory capacity to the County Planning and Building Department when reviewing land use projects.
- San Luis Obispo County Air Pollution Control District (APCD) Certain aspects of the construction and operation of a wastewater system may be subject to the permitting requirements of the Air Pollution Control District. Their authority has been delegated from the State and federal governments to implement the federal and State Clean Air Acts.

#### B. SITE LOCATION AND PROJECT SCOPE

The Proposed Project site is located in the Toro Creek Valley on Toro Creek Road approximately 0.75 miles inland from State Route 1 in Cayucos. The site consists of two lots: Lot 8 (APN 073-092-034) is 76 acres and Lot 10 (145 acres) is a portion of APN 073-092-050. Lot 10 is part of a Lot Line Adjustment that was recorded on in August 2016. Map I-1 shows the CSD service boundary and the locations of the Proposed Project site and the Alternative project site.

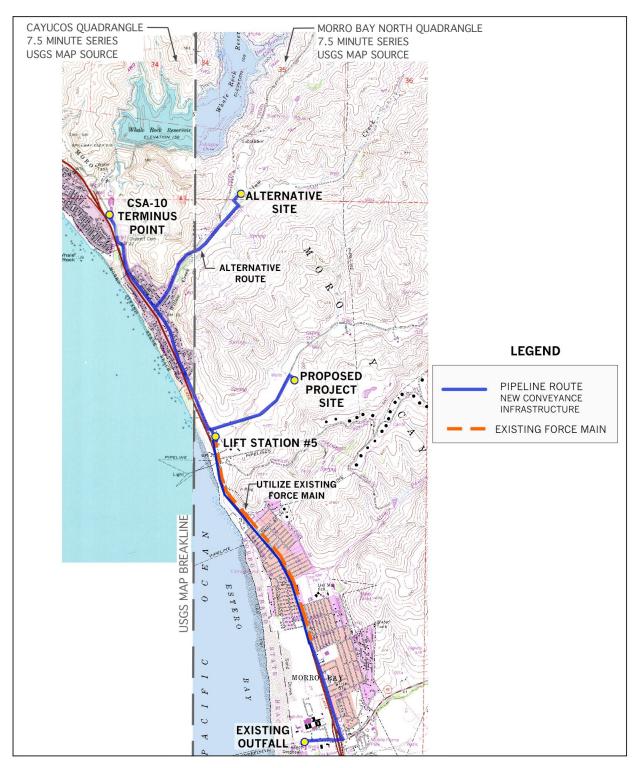
For both sites CSD would create a public lot within the parent parcels of approximately 8 acres for a WRRF and solar array as shown on Map I-1. The CSD will apply for a public lot pursuant to Section 21.02.010(a)(9) of the County of San Luis Obispo's Real Property Division Ordinance and Government Code Section 66428(a)(2). These sections exempt land conveyed to or from a public entity from the requirements of a parcel or tract map. The public lot would be sought as part of the Conditional Use Permit process. Public utility facilities are an allowable use in the agricultural zone. The CSD's intent is to create the smallest parcel necessary to allow construction of the WRRF and thereby preserve the maximum amount of land for agricultural uses.

The alternative Project site is located in the Willow Creek Valley accessed from Montecito Road approximately 1.25 miles inland from State Route 1 in Cayucos. The parent parcel is 215 acres (APN 073-093-011). Under this alternative, CSD would create a public lot within this parent parcel

of approximately 8 acres for the WRRF. The facility site is outside the Coastal Zone and is currently zoned for Agriculture (Map I-3).

The CSWP includes infrastructure, pipelines and appurtenances for influent, effluent, recycled water and processed discharge water within public rights of way including but not limited to Toro Creek Road, State Route 1, Ocean Blvd, Main Street in Morro Bay, and Atascadero Road / Highway 41 in Morro Bay (Map I-2), totaling 1.62 acres of disturbance over approximately 14,113 linear feet of pipeline.

CSWP Phase 2 is construction of a conveyance pipeline for advanced treated water to the County Service Area (CSA) 10 Water Treatment Facility located on Cabrillo Street. Phase 2 is limited to construction of the pipeline only. Then, at some point in the future when direct potable reuse regulations are established and an additional water source is determined by the community water purveyors as advantageous, such as for a drought buffer, advanced treated water will be conveyed the CSA 10 Water Treatment Facility (Map I-2).

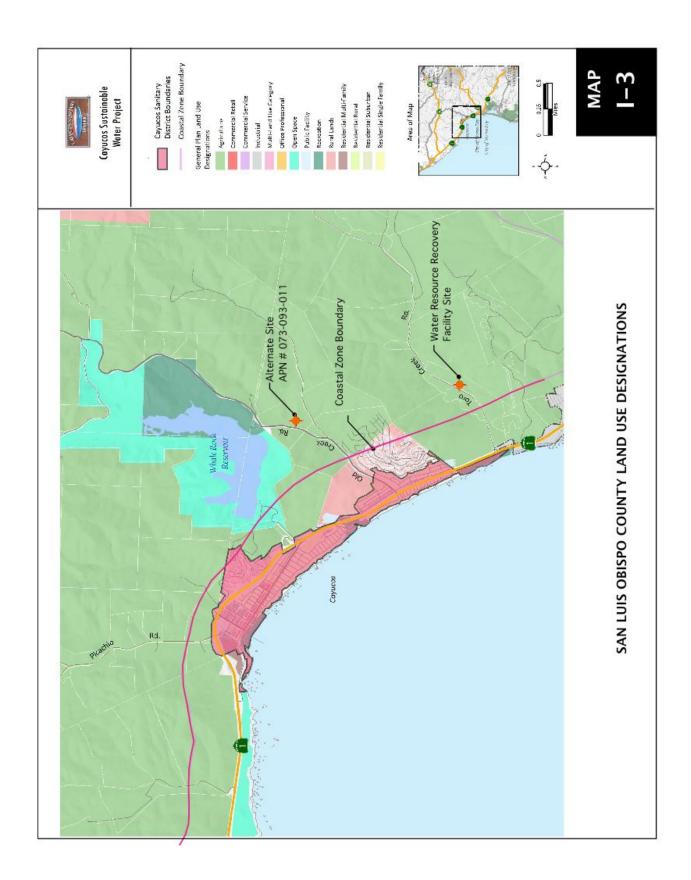




Cayucos Sustainable Water Project

#### PIPELINE INFRASTRUCTURE





#### C. PROJECT OBJECTIVES

The Project Vision, Mission, Objectives Performance Measures and Guiding Principles were adopted by the CSD Board of Directors in a Project Charter adopted on July 16, 2015 (refer to Appendix A) and are summarized for application in the EIR process as follows:

- Provide the community of Cayucos with efficient, reliable and adaptable wastewater treatment, while producing a high quality water supply to benefit the community.
- · Enable the community to put the wastewater that is currently discharged to the ocean to beneficial use.
- · Provide the community with sustainable water, ownership of facilities and local governance.
- Deliver a sustainable and cost effective water resource recovery system for the community of Cavucos within a streamlined schedule.
- · Optimize capital investment and life cycle cost.
- Maximize value for the ratepayers' investment.
- Develop a water resource recovery system that will benefit future generations.
- Obtain grants and low-interest loans to reduce the financial burden on the community.
- Identify a facility location that benefits the community of Cayucos.
- Enhance the community's long-term water supply.

#### D. CHARACTERISTICS OF THE PROJECT

#### Water Resource Recovery Facility

The facility will be accessed from Toro Creek Road, a public road and is shown on Maps I-4 and I-5.

The build-out average annual daily flow (AADF) capacity is expected to be in the range of 0.30 to 0.40 million gallons per day (MGD). Peak hour and maximum daily flows resulting from peak season dry weather events and wet weather events will be equalized in an off-line equalization basin to reduce the required size of equipment for downstream processes.

The project is designed to serve the existing and build-out population within the CSD service boundary. In the long term, expansion of capacity may be required to meet changing demographics. Due to the nature of the proposed processing technology, the footprint of the proposed WRRF would be likely to be able to accommodate as yet unforeseen increased flows without a dramatic spatial expansion of the facility.

#### Facility Processes and Technology

As a fundamental component of the project, influent will be treated to disinfected tertiary standards, with a portion available for recycled water irrigation, and remaining treated effluent discharged to the existing Morro Bay / Cayucos Outfall. Future phases will direct the tertiary treated effluent stream through advanced treatment processes for potable reuse through the basic components below:

#### **Process Control**

**Equalization Basin** 

#### **Preliminary treatment**

Coarse/Bar screens

#### Grit removal

#### **Secondary Treatment**

Fine screens Modified Ludzack-Ettinger (MLE) Activated Sludge Process with Membrane Bioreactor (MBR)

#### **Tertiary Treatment**

UV or chlorine disinfection

#### **Advanced Treatment**

Reverse Osmosis (RO) UV/Advanced Oxidation disinfection Treated water storage and pumping

#### **Solids Handling**

Stabilization/Digestion Thickening Dewatering Drying

#### **Recycled Water System**

On-site storage tank Pump station

In addition to treatment process infrastructure, the WRRF site will include supporting facilities necessary to operate, maintain, secure and preserve the site, as shown on Map I-4, including emergency back up power supply, security fence, domestic and non potable (recycled water storage tanks), office building, landscape screening, stormwater conveyances and a spill containment basin.





Cayucos Sustainable Water Project

**Proposed Project** 

## Legend:

– Limit of WRRF grading



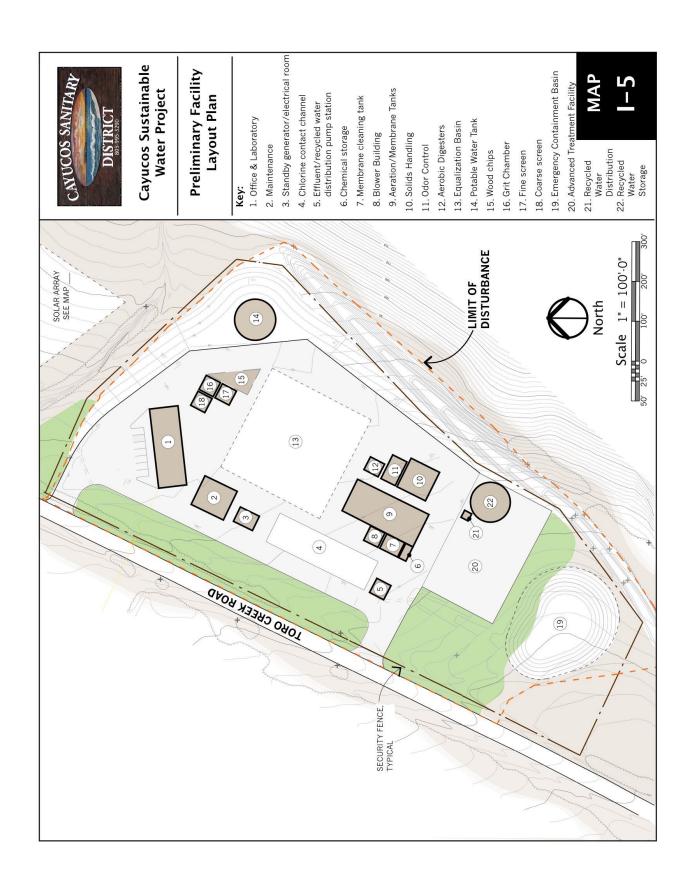
Solar Array

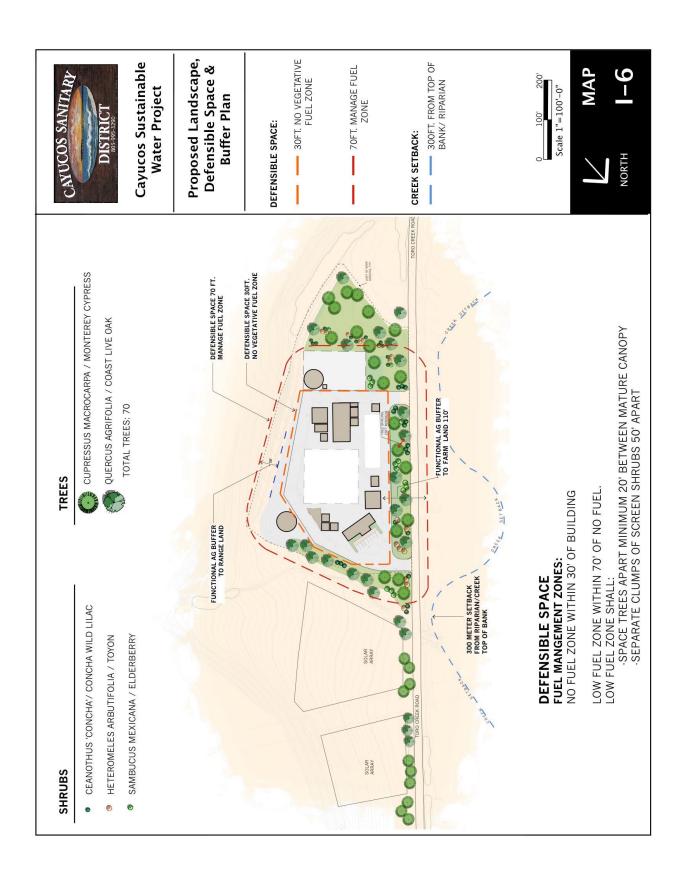


Landscape Screen









#### **COLLECTION AND CONVEYANCE INFRASTRUCTURE**

The overall alignment corridors for the CSWP conveyance pipelines are depicted on Map 1-2. Detailed maps of the routes on aerial imagery are shown in EIR Appendix A show the Project pipeline routes in Cayucos and Morro Bay in a zoomed in scale. The pipeline segments consist of: 1) Influent to the WRRF, 2) Treated wastewater to Lift station 5, 3) Effluent to existing outfall, and 4) the Phase 2 recycled water pipeline to the CSA 10 site.

Influent to Facility: Construction of force main from existing Lift Station 5 at Toro Creek Road and SR1 to the WRRF is approximately 4,200 LF of pipe along Toro Creek Road. Modifications to Lift Station 5 will be constructed. Net increase in energy demand from existing infrastructure is 9,000 kWh/year. The pipeline will cross Toro Creek at the existing bridge, but will not be attached to that bridge.

Treated wastewater to Lift Station 5: From a pump station at the WRRF, a pipeline will run back down Toro Creek Road will parallel the influent line and will similarly cross Toro Creek at the existing bridge, but will not be attached to it.

Treated wastewater to existing outfall: From Lift Station 5 treated wastewater will be conveyed by existing force main in Caltrans right of way and Main Street in Morro Bay to the intersection of Island Street and Main Street where a new force main or modifications to the existing gravity pipeline will be constructed from that point down Main Street to Highway 41 /Atascadero Road to the existing Morro Bay Cayucos WWTP. Because the final determination of the needed work on the segment of existing force main from Lift Station 5 to Island Street cannot be made at this time, Map I-2 shows this segment graphically as both existing and new. In any case, any new pipeline work would be in the existing previously disturbed trench. In addition, a terminal lift station and up to 500 feet of new force main will be constructed at the end of the existing Cayucos Interceptor to lift the treated effluent into the existing ocean outfall. The tie-in will occur within the existing facility property, or within the right of way of Atascadero Road. The exact location and configuration to be determined in conjunction with the City of Morro Bay. The CSD has a 35% interest in the outfall capacity that will accommodate this discharge.

Recycled Water to CSA 10 site: A pipeline will be constructed in Phase 2 to the CSA 10 Water Treatment Facility on Cabrillo in Cayucos. At some point in the future when direct potable reuse regulations are established and an additional water source is determined by the community water purveyors as advantageous, such as for a drought buffer, advanced treated water will be conveyed to the CSA 10 Water Treatment Facility on Cabrillo in Cayucos. The routes would run west on Toro Creek Road then north along SR 1 in the CSD easement in the right of way to Chaney Street. The pipeline will then run along Ocean Blvd, past the cemetery on Cabrillo Ave., crossing the existing footbridge over Old Creek to the CSA 10 site. The pipeline will be capped at that location.

#### TERTIARY TREATED WATER FOR AGRICULTURAL IRRIGATION

The WRRF will create disinfected tertiary recycled (non-potable) water for agricultural irrigation. It is anticipated that agricultural lands adjoining or nearby the WRRF could have access to this irrigation water. The project will implement an agreement with yet to be identified farmers/landowners to provide this water to agricultural land to create irrigated cropland that, at a minimum, helps mitigates the loss of prime agricultural land converted by the Proposed Project.

The WRRF is anticipated to initially allocate up to 80 acre-feet per year (AFY) of tertiary treated water to be made available for agriculture. The actual amount of tertiary treated water that will be used for agriculture is dependent upon future negotiations with farmers as lessees or landowners and cannot be quantified at this time because it is dependent on crop, location, infrastructure needs and cost.

#### Regulatory background

Disinfected tertiary recycled water is filtered and disinfected wastewater that meets the following criteria:

- (a) The filtered wastewater has been disinfected by either:
  - 1. A chlorine disinfection process following filtration that provides a CT (the product of total chlorine residual and modal contact time measured at the same point) value of not less than 450 milligram-minutes per liter at all times with a modal contact time of at least 90 minutes, based on peak dry weather design flow; or
  - 2. A disinfection process that, when combined with the filtration process, has been demonstrated to inactivate and/or remove 99.999 percent of the plaque forming units of F-specific bacteriophage MS2, or polio virus in the wastewater. A virus that is at least as resistant to disinfection as polio virus may be used for purposes of the demonstration.
- (b) The median concentration of total coliform bacteria measured in the disinfected effluent does not exceed an MPN of 2.2 per 100 milliliters utilizing the bacteriological results of the last seven days for which analyses have been completed and the number of total coliform bacteria does not exceed an MPN of 23 per 100 milliliters in more than one sample in any 30.
- (c) Tertiary treated water will comply with:
  - CFR Title 22 operational and on-site use requirements
  - Central Coast Basin Plan Water Quality Objectives
  - Central Coast Regional Water Quality Control Board Master Reclamation Permit

#### Infrastructure required

Recycled Water pump station at the treatment plant location requires 6,800 KWh/year for pumping.

Pipeline to irrigation customers within Toro Creek Valley is not known at this time. Therefore the pipeline infrastructure will extend only to the boundary of the facility until such time as the route for the conveyance pipeline is determined...

On-site storage facility for irrigation water storage will be a tank or pond at approximately 300,000 gallons.

#### WRRF OPERATIONS

#### Storage of Materials

Chemicals will be added throughout the wastewater treatment process to provide an alkalinity source, control odors, improve sludge conditioning, disinfect the water, and clean the MBR membranes.

The secondary treatment process will require chemicals to adjust the water chemistry and chemicals to clean the MBRs. Alkalinity chemicals such as sodium hydroxide or magnesium hydroxide will be used during daily operations to stabilize the pH in the aeration tanks of the secondary treatment process. The alkalinity chemical will be stored in two identical double-walled tanks and delivered to the aeration basins through a peristaltic pump system. Citric acid, Sodium hypochlorite, Sodium Hydroxide or similar cleaning chemicals will be used intermittently to perform

preventive maintenance cleanings on the MBR units by removing organic and inorganic matter. Similarly, these chemicals would be stored in a chemical drum or a double walled plastic tote when it is not in use.

The District currently adds calcium ammonium nitrate (CAN-17) to their terminal lift station to control odors from the raw influent wastewater and the use of CAN-17 at Lift Station 5 is expected to continue. CAN-17 is currently stored at the Lift Station 5 in a 55-gallon drum. With the Proposed Project the need for CAN-17 treatment will likely not be necessary, but if continued it would not be a change in the baseline condition.

The on-site solids handling processes will require a water-soluble polymer to be used as a flocculant for conditioning of the sludge stream. Polymers are delivered in double-walled plastic totes from the manufacturer and will be stored inside a building in close proximity to the sludge thickening and dewatering equipment. Polymers are introduced to the solids handling process through a metering pump.

The disinfection process associated with Phase 1 of project construction will include sodium hypochlorite for chlorine disinfection and sodium bisulfite for de-chlorination. Both of these chemicals will be stored outdoors under a shade structure in double-walled plastic tanks. These chemicals would be introduced to the disinfection process continuously through a peristaltic pump system. In Phase 2 of the CSWP, the disinfection processes will be upgraded to advanced oxidation and disinfection which requires hydrogen peroxide for oxidation of pathogens

Risks associated with handling these chemicals will be managed by using concrete secondary containment structures at chemical storage locations, providing adequate access and egress space for chemical delivery trucks, developing hazardous material business response plans, and installing eye-wash and shower stations at each chemical storage and feed location.

#### **Disposal of Biosolids**

The biosolids produced at the new treatment facility would be considered CFR 40 Part 503 Sub-Class B biosolids. The biosolids will be transported to private composting in Santa Barbara or Kern County for beneficial reuse. Alternatively, the biosolids will be transported to Kettleman Hills or McKittrick Landfill for disposal. The volume of biosolids exported from the WRRF would be less than two 10 cubic yard capacity trucks per week.

#### **Effluent to Existing Outfall**

Discharge Permit Status: The existing WWTF outfall operates under a NPDES permit originally issued for a five year term in 2009 (CRWQCB Central Coast Region order # R3-2008-0065, NPDES No. CA0047881). This permit expired in 2014 and the RWQCB has placed the renewal application for the permit on administrative hold while the City and CSD pursue plans for new facilities

Daily discharge Volume: During wet periods or when there is no demand for tertiary treated recycled water, the average annual daily flow (AADF) will be discharged to the outfall. This is anticipated to be approximately 350 AFY.

With production of recycled water for the tertiary irrigation, the estimated anticipated discharge to the outfall will be approximately 270 AFY.

At the time that community water purveyors determine recycled water is advantageous to be developed as a water source, the estimated anticipated discharge to the outfall will be reduced to approximately 75 AFY.

Water quality: Water will be treated to disinfected tertiary standards and will meet anticipated NPDES Permit discharge limitation listed in the table below.

**Table I-1 Water Quality Parameters** 

Parameter	BOD	TSS
Average Monthly (mg/L)	30	30
Average Weekly (mg/L)	45	45
30-Day Average Percent Removal (%)	> 85%	> 85%
Instantaneous Maximum (mg/L)	50	50
30-Day Average Percent Removal (%)	85	85

RO Discharge Disposal: Daily discharge of RO production water will be blended with tertiary treated effluent discharge. Anticipated discharge to the outfall will be 49 acre-feet per year. Discharge from the RO membrane is anticipated to meet future Ocean Plan amendment requirements and RQWCB discharge permit requirements. Increased Total Dissolved Solids (TDS)/salt concentrations in the brine stream would still be far below seawater concentrations.

#### **ALTERNATIVE SITE**

The Alternative Site (Map I-7) will be analyzed to a similar level of detail for key environmental topics in the EIR as the Proposed Project. The Project Objectives and Project characteristics of the treatment facility would be the same as the Proposed Project. The following topics describe the differences between the Proposed Project and Alternative Project Site.

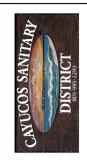
Access to the Site: Willow Creek will be crossed by a clear span bridge top of bank to top of bank) accessed from Montecito Road.

Conveyance Infrastructure crossings of streams and drainages: Conveyance pipelines will cross Willow Creek hung from the proposed access bridge. Pipelines to and from the WRRF site will cross Willow Creek and an ephemeral drainage on Old Creek Road.

Tertiary Treated Water for Agriculture: Tertiary treated water will be piped to a proposed agricultural storage pond constructed by the property owner to be used for irrigation water storage. The pond is anticipated to be located about 1,000 feet east of the planned access road from Montecito Rd to the treatment facility. The pond is planned to hold 5 acre-feet of water. Irrigation water would then be available for crop production on surrounding land.

#### PHASE 2 RECYCLED WATER PIPELINE

Included in Phase 2, is the installation of a pipeline that could be used to convey advanced treated water to the CSA 10 Water Treatment Facility for direct potable reuse. Phase 2 is anticipated to be initiated by the community water purveyor(s) at the point in time when direct potable reuse regulations are established and that additional water resources for the community are determined to be needed. The Proposed Project does not include addition of a potable water supply to the community because the CSD is not a water purveyor.



# Cayucos Sustainable Water Project

# ALTERNATIVE PROJECT

## Legend:

Solar Array

¬ Temporary

L \_ J Construction Staging

Asphalt / Paving

Landscape Screen





Water Resource Recovery Faciltiy OFD CBEEK BOVD

## Key:

- 1. Office & Laboratory
  - 2. Maintenance
- 3. Standby generator/electrical room
  - Effluent/recycled water distribution pump station Chlorine contact channel
- Chemical storage
- Membrane cleaning tank
- 8. Blower Building
- 9. Aeration/Membrane Tanks
- 10. Solids Handling
  - 11. Odor Control
- 12. Aerobic Digesters
- 14. Potable Water Tank 13. Equalization Basin
  - 15. Wood chips
- 16. Grit Chamber 17. Fine screen
- 18. Coarse screen
- 19. Advanced Treatment Facility 20. Recycled Water Distribution
- 22. Emergency Containment Basin 21. Recycled Water Storage

  - 23. Access Bridge

#### **DECOMMISSIONING OF WWTF IN MORRO BAY**

The CSD will participate in the decommissioning of the existing WWTF in Morro Bay at the time that both agencies have completed their respective wastewater projects. Due to the fact that the timing of the Morro Bay facility, along with further development of specific decommissioning plans are unknown, the Project Description can only identify the following basic aspects of decommissioning at this time:

- · Demolition and removal of structures and equipment from the existing site, except for the existing outfall structure and new or existing pipelines and pump stations that will remain in place or be modified to accommodate the new facilities.
- Disposal of hazardous waste and remediation of contaminated soils.
- Restoration of the site.

Although the decommissioning of the existing WWTF is related to the Proposed Project, it is not part of action under study in this EIR. The CSD is not seeking any permits for the decommissioning because this undertaking is one that must be done jointly with the City of Morro and such time that the City's own plans for a new treatment facility have been approved.

For this reason, because the decommissioning is foreseeable this action is discussed in this EIR as one of several foreseeable projects contributing to potential cumulative effects on the environment. Additional discussion

#### PROJECT FEATURES TO REDUCE ENVIRONMENTAL IMPACTS

Aspects of the Proposed Project intended to reduce or avoid environmental Impacts include:

- Reuse of existing pipelines and/or pipeline alignments from Lift Station 5 to the existing treatment plant to the extent feasible.
- Creation of disinfected tertiary recycled water available for agriculture irrigation.
- · Defensible space for fire safety and agricultural buffers
- Facility to creek setbacks of approximately 300 feet from top of bank /riparian canopy.
- Renewable energy solar array to meet or substantially offset WRRF energy demand.
- · Check valves on influent and treated water pipeline in Toro Creek road to reduce risk of spill into Toro Creek in the event of a pipeline break.
- · Placement of pumps and other noise generating equipment in buildings for noise attenuation.

#### E. **CONSTRUCTION ACTIVITIES**

Construction duration for WRRF and associated conveyance infrastructure is estimated at 18 months. The estimated earthwork volume at the WRRF is 12,000 cubic yards. The staging area will be fenced and suitable temporary surfacing and temporary erosion control measures put in place. After construction is complete the staging area will be completely removed and the topsoil cultivated and an erosion control seed crop planted.

All temporary construction staging Best Management Practices (BMPs) required by the County General Permit, the project Stormwater Pollution Prevention Plan (SWPPP) and grading codes will be employed. Long-term measures will be identified in the final grading and drainage plan / stormwater control plan for the project to fully comply with all applicable standards. These measures include revegetation, stormwater basins, bioswales and infiltration areas, as applicable.

Construction within public rights of way would be subject to encroachment permit requirements issued by the County of San Luis Obispo, Caltrans, and the City of Morro Bay.

#### F. LIST OF ABBREVIATED TERMS

Abbreviation	Term
AFY	Acre Feet Per Year
CCR	California Code of Regulations
CEQA	California Environmental Quality Act
CKH	Cortese, Knox, Hertzberg Act
CSD	Cayucos Sanitary District
CUP	Conditional Use Permit
EIR	Environmental Impact Report
FT	Feet
NAHC	Native American Heritage Commission
NOP	Notice of Preparation
NPDES	National Pollution Discharge Elimination System
RWQCB	Regional Water Quality Control Board
SF	Square Feet
SWRCB	State Water Resources Control Board
WDR	Waste Discharge Requirement
WRRF	Water Resource Recovery Facility
WWTF	Waste Water Treatment Facility
WWTP	Waste Water Treatment Plant

**II. Executive Summary** 

### A. SUMMARY OF IMPACTS AND MITIGATION MEASURES

The Cayucos Sanitary District (the CSD) determined that the Proposed Project could potentially result in significant environmental effects and required the preparation of this Environmental Impact Report (EIR). Pursuant to CEQA, this EIR focused on those subjects identified as potentially significant by the CSD during preparation of the Notice of Preparation on the Project. The study areas below comprise the topics analyzed in this EIR:

- o Geology and Soils
- o Agricultural Resources
- o Biological Resources
- Drainage, Flooding and Water Quality
- Cultural Resources
- o Agricultural Resources
- Traffic
- Growth Inducing Effects
- Visual Resources
- Noise
- o Air Quality and Greenhouse Gases
- Hazards and Hazardous Materials

A summary of the environmental impacts and mitigation measures are presented in Table II-1. This table is organized in terms of the level of impact after mitigation. A more detailed description of each impact and mitigation measure is located in the respective EIR section for each topic. This summary is provided for convenience only; the reader is advised to review the EIR main text itself for a more complete and accurate understanding of each impact and mitigation measure.

- Class I impacts are unavoidable adverse significant impacts. If the City certifies the EIR and proceeds with the Project, Section 15093(b) of the State CEQA Guidelines requires the City to make findings of overriding consideration when Class I impacts are present indicating that specific economic, legal, social, technological or other benefits of the Proposed Project outweigh the unavoidable adverse environmental effects.
- Class II impacts are significant impacts, which can be mitigated to a level of insignificance. Section 15091(a)(1) of the State CEQA Guidelines requires that findings be made indicating that changes or alterations have been required in the Project to avoid or substantially lessen Class II impacts.
- Class III impacts are adverse, but not significant impacts.
- Class IV impacts are beneficial impacts resulting from implementing the Project.

#### Significant and Unavoidable Impacts

The Project could have significant, unavoidable impacts resulting from construction noise (temporary), risk of infrastructure damage due to tsunami inundation, and loss of prime agricultural soils converted to other uses. The recommended mitigation measures reduce impacts to the

greatest feasible extent, but a statement of overriding considerations will be required for these impacts for the CSD to certify the EIR.

Other impacts are less than significant or potentially significant but can be mitigated to less than significant levels by implementing the mitigation measures presented on **Table II-1** at the end of this section, and discussed in the EIR.

If approved, the Proposed Project would go forward notwithstanding the impacts identified in this EIR because the Proposed Project is consistent with the General Plans of the County of San Luis Obispo and City of Morro Bay implements the Proposed Project objectives detailed in EIR section I-Project Description.

#### B. IRREVERSIBLE ENVIRONMENTAL CHANGES

Section 15126(f) of the State CEQA Guidelines states that for the preparation of EIRs, a discussion of any significant irreversible environmental changes which would be involved in the proposed action should be provided. For this project these irreversible environmental changes include: uses of non-renewable resources during the construction and operation phases of the Project, the commitment of future generations to the proposed uses, and any irreversible damage that would occur from development of the Project site.

In the short term, most changes that would occur on the site would be directly related to construction activities.

In the long term, the following effects would occur throughout the life of the Project:

- · Increased traffic, air pollutant emissions and noise.
- Permanent loss of area available to native plant communities and agriculture.
- Increased risk of upset and hazards.
- Permanent change in the visual character of Toro Creek Valley.

#### C. GROWTH INDUCING EFFECTS

The State CEQA Guidelines (Section 15126(g)) requires an EIR to discuss how a proposed project could directly or indirectly lead to economic, population, or housing growth. A project may be growth-inducing if it removes obstacles to growth, extends community service facilities or infrastructure, or encourages other activities or precedents that cause significant growth. The potential growth-inducing impacts of the proposed Project are discussed below in terms of these factors.

#### **Economic, Population or Housing Growth**

EIR section IV-K Growth Inducing Effects addresses the potential for growth inducement and resulting indirect impacts from growth. The source of potential growth inducing effects is the Phase 2 reclaimed water pipeline from the proposed WRRF to the County Service Area 10 water facility.

The Proposed Project Phase 2 pipeline component could result in a supply of water to the community that exceeds the demand projected for Cayucos associated with build-out of the Estero Area Plan. Some limitations on the use of the supplemental water will be determined by the participating agencies at such time as the water becomes available, and therefore cannot be determined at this time.

However, in summary, the Project could result in indirect impacts on the environment related to growth induced by the provision of an additional water supply. The indirect impacts include, but are not limited to, increased traffic, noise, vehicular emissions, loss of vegetation and wildlife forage area, loss of visual quality and watershed impacts. These impacts could be significant but are avoidable by implementation of the following measure:

**Mitigation Measure GRO-1:** To avoid potentially significant growth inducing effects, the CSD shall limit the sale of tertiary treated water for domestic use to water purveyors serving lots within the Urban Reserve Line for Cayucos as set by the County and LAFCO.

Limitations on the sale of recycled water for use only within the URL for Cayucos would reduce the potential growth inducing impacts of the CSWP to a less than significant level. As a result, the potential growth inducing effects of the CSWP are considered significant but mitigable (Class II).

This measure would be enforceable under the County issued Conditional Use Permit and Coastal Development Permit for the project.

# D. Summary of Cumulative Impacts and Approach to Cumulative Impacts Analysis

Cumulative impacts are two or more individual effects that, when considered together are considerable or compound to increase other environmental impacts. The individual effects may be changes resulting from a single project or several projects. Not all aspects of the Project would lead to cumulative effects. For example, most geologic impacts are site specific and not cumulative.

Section 15130(b) of the CEQA Guidelines indicates that the level of detail of the cumulative analysis need not be as great as for the project impact analyses, that it should reflect the severity of the impacts and their likelihood of occurrence, and that it should be focused, practical, and reasonable.

Each study topic in Section IV of the EIR includes discussion of cumulative impacts. The baseline assumptions used in this EIR were derived by using the land use and growth assumptions contained in the County General Plan / LCP along with the list of foreseeable development projects under consideration for approval by the County in the Cayucos area. The cumulative list was compiled from data supplied by the County of San Luis Obispo Department of Planning and Building at the time the notice of Preparation for the EIR was published based on active, recently completed, or reasonably foreseeable potential projects that could have an impact on the environment. This list of projects and summary of projections found in the San Luis Obispo Estero Area Plan satisfies the state CEQA Guidelines Section 15130 requirements for identifying a reasonable cumulative scenario.

The following **Table II-1** tabulates the types of cumulative impacts for each study topic in the EIR. The designation 'N/A' means not applicable because no cumulative impacts were identified.

**Table II-1. Summary of Cumulative Impacts** 

Topic	Significant Impact?	Impact after Mitigation
Geology and soils	no	N/A
Agricultural resources	yes	Significant
Biological resources	no	Less than significant
Drainage, flooding and water quality	no	Less than significant
Cultural Resources	yes	Less than significant
Traffic	no	Less than significant
Growth inducing effects	no	Less than significant
Visual resources	no	Less than significant
Noise (temporary construction)	yes	Significant
Air quality	no	Less than significant
Hazards & Hazardous Materials	no	Less than significant

### E. SUMMARY OF ALTERNATIVES TO THE PROPOSED PROJECT

The purpose of EIR section V-Alternatives to the Proposed Project is to describe a range of reasonable alternatives to the Proposed Project and evaluate the comparative environmental impacts of the alternatives (see **Table V-1**). Pursuant to CEQA, the discussion includes the specific alternative of "No Project" and identification of feasible alternatives capable of avoiding one or more significant adverse environmental effects or reducing them to a level of insignificance. This section also identifies the "environmentally superior project" as prescribed by CEQA.

According to the CEQA guidelines, the range of alternatives required is governed by the "rule of reason" that requires the EIR to set forth only those feasible alternatives necessary to permit an informed and reasoned choice by the decision-making body and informed public participation.

#### **ALTERNATIVES CONSIDERED AND REJECTED**

### **Alternative Sites for the Project**

Section V of the EIR discusses reasons why sites other than the identified Alternative Site are not evaluated as alternatives and concludes that other sites would not achieve the fundamental project objectives or have more serious environmental constraints.

### Reduced scale project

A reduced scale project is not feasible for the following reasons:

- 1. The facility must be sized to process the buildout of the General Plan land uses within the CSD service boundary. Phasing a project is not feasible nor does it ultimately reduce or avoid any impact.
- 2. The selected processing technology has the smallest physical footprint on the land of all the process options considered. A reduced scale project is not feasible for this reason.

### Alternative pipeline conveyance routes

Alternative locations for pipeline conveyance routes were rejected for the following reasons:

- 1. Locating pipelines in existing easements and rights of way reduces cost.
- 2. Locating pipelines in existing trenches avoids disturbance to adjacent potentially present cultural resources.
- 3. Locating pipeline in public rights of ways as opposed to across fields allows far better visual contact with the pipeline in case of a pipeline break.

#### Alternative methods of beneficial reuse of reclaimed water

The CSD considered injecting the tertiary treated water into the groundwater basin in the Toro Creek Valley for recovery and reuse. However, hydrogeologic study of the alluvial aquifer there determined the capacity for recharge was highly constrained and therefore not a feasible option. Aquifer recharge potential was evaluated below the Whale Rock dam. This area has potential to function as a viable recharge and recovery field, however this site is highly constrained by cultural resources and was determined not to be a feasible option. Last, surface water augmentation (discharging to Whale Rock reservoir) may be a feasible future use, however there are no regulations in place at this time that would allow for discharge of Title 22 treated water into a surface water reservoir, therefore this alternative was also rejected for consideration.

#### **SUMMARY OF ALTERNATIVES CARRIED FORWARD FOR ANALYSIS**

As a result of the site constraints analysis and site selection process undertaken by the CSD the following Alternatives have been brought forward for analysis in the EIR:

- No Project (Participation with the City of Morro Bay in construction of a new wastewater facility in Morro Bay or environs),
- Alternative Site.
- Alternative Outfall Location.

#### **NO PROJECT**

Under the No Project alternative, the Proposed Project would not occur on the proposed site or at the alternative site described in this EIR. In this instance, No Project would mean the CSD would return to cooperation with the City of Morro Bay in developing of a new facility in that jurisdiction.

At the time of this the Notice to Proceed of this DEIR, the City of Morro Bay has completed a comparative analysis of several candidate facility sites and having selected the Tri-W site has issued a Notice of Preparation for an Environmental Impact Report in August 2016. Therefore, what can be determined about the potential environmental impacts of the development of a new facility for the new Morro Bay facility must rely on preliminary environmental screening data on the proposed Tri-W site contained in the *New Water Reclamation Project Report on Reclamation and Council Recommended Site* ("Project Report") dated May 8, 2014 for various sites under consideration by the City, incorporated herein by reference.

As summarized on Table V-1 in EIR section V, the No Project alternative would result in similar impacts as the Proposed Project, largely because the project undertaking is in most respects similar and the Tri-W site has many characteristics in common with the Toro Creek Valley site.

The No Project alternative would not achieve the following CSD objectives for the Project:

- Provide the community with sustainable water, ownership of facilities and local governance.
- Deliver a sustainable and cost effective water resource recovery system for the community of Cayucos within a streamlined schedule.
- · Optimize capital investment and life cycle cost.
- Maximize value for the ratepayers' investment.
- Obtain grants and low-interest loans to reduce the financial burden on the community.

#### **ALTERNATIVE SITE**

Under this alternative, the WRRF would be developed at the Molnar site near Willow Creek as shown in the Project Description. This alternative requires longer pipeline construction to reach Lift Station 5 near Toro Creek Road and would result in more impacts on the environment during construction. Because the Alternative Site has many physical similarities to the Proposed Project

site, the impacts would be similar. The Alternative Site has the potential of less impact on cultural resources, but greater impacts on visual resources, noise and biological resources.

Due to higher cost to construct, the Alternative site does not meet the following Project objective as well as the Proposed Project site:

Maximize value for the ratepayers' investment.

#### **ALTERNATIVE OUTFALL LOCATION**

The alternative outfall location consists of reuse of a 3,180 foot long pipeline originally constructed in 1929 to transfer petroleum and petroleum products on and off-shore from anchored tankers as shown in map V-3. The pipeline was converted in 1980 to an ocean outfall for treated ballast water. The location of tie-in of the treated water disposal pipeline to the outfall pipe would occur just south of Toro creek in an existing paved area associated with the now closed Chevron Estero Marine Shore Terminal site.

Impacts related to the connection to the outfall are limited to the point of connection. These impacts would be similar to other pipeline related construction activities and could have short-term impacts on traffic and noise, but would offer the benefit of avoiding these effects within the City of Morro Bay.

On balance, the use of this outfall would reduce impacts on the environment as compared to use of the existing ocean outfall in Morro Bay by resulting in reduced energy requirements over the life of the project and reduced risk of infrastructure upset.

#### **ENVIRONMENTALLY SUPERIOR PROJECT**

The No Project alternative would be roughly similar in terms of environmental effects as the Proposed Project, the differences being the No Project Alternative would likely result in higher greenhouse gas emissions and the Proposed Project would result in greater impacts to agricultural resources. On balance, knowing what can be known about a project on the Tri-W site the two sites appear generally equal in impacts. Therefore, no significant distinction as to environmental superiority can be made.

Setting aside the No Project alternative, which has also been determined to be infeasible for reasons outlined above, the comparison of the Proposed Project to the Alternative Site on Table V-3 shows the Alternative Site as having similar environmental effects in all respects except for the potential for increased visual impact, noise impact and increased impact on biological resources. Therefore, on balance, the Proposed Project with mitigation measures incorporated is the environmentally superior project.

Impact Mitigation Measure Level of Impact After Mitigation

### CLASS I. SIGNIFICANT UNAVOIDABLE IMPACTS THAT CANNOT BE FULLY MITIGATED

Impact GEO-8. Due to the locations of critical infrastructure sites that will be connected via pipelines. certain pipeline sections will not be able to avoid portions of the tsunami inundation zone. Pipeline segments along SR1, the CSA 10 facility, and the outfall segment between SR1 and the coast, are located within the maximum tsunami inundation zone (i.e., less than 50 feet above mean sea level). Mitigation measures can be implemented to reduce the impact. However, the pipeline outfall will be vulnerable to damage from wave erosion if a significant tsunami occurs at that location. The potential impact of tsunami inundation on Project components near the coast is a significant and unavoidable impact

Mitigation Measure GEO-8. Mitigation strategies for infrastructure located within tsunami inundation zones shall be implemented and include, as determined applicable, measures such as flexible connections, double lined pipes, strengthened pipes, automatic shutoff valves and similar measures to prevent the release wastewater and treated water to the environment

Significant

Impact AG-1: Construction of the WRRF and solar array on the Project Site will result in the permanent conversion of Prime Farmland as defined by the San Luis Obispo County Conservation and Open Space Element. This impact considered significant and unavoidable

Mitigation Measure AG-1: Prior to the issuance of grading permits, the Cayucos Sanitary District shall provide evidence to the County Department of Planning and Building that a farmland conservation easement, a farmland deed restriction, or other farmland conservation mechanism has been granted in perpetuity to the County or a qualifying entity approved by the County Agricultural Commissioner (or designee). The easement shall provide conservation acreage at a ratio of 2:1 for direct project impacts. The area conserved shall be shall be of a quality that is reasonably similar to that of farmland within the project limits (as determined by the County Agricultural Commissioner designee).

Impact Mitigation Measure Level of Impact After Mitigation
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### CLASS I. SIGNIFICANT UNAVOIDABLE IMPACTS THAT CANNOT BE FULLY MITIGATED

Impact AG-6: Development of the WRRF on either the Project Site of the Alternative Site, together with regional development, will contribute to the cumulative loss of Prime Farmland as defined by the County Conservation and Open Space Element. This impact is considered cumulatively considerable and significant and unavoidable.

Impact N-2: Construction activities associated with the pipeline conveyances and outfall connection would result in short term 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. This impact is considered significant and unavoidable (Class I) after application of Mitigation Measure N-1.

Impact N-4: Construction related activities associated with the Project pipeline infrastructure, together with noise generated by the construction of other reasonably foreseeable related projects in the region, will temporarily increase noise levels

**Mitigation Measure N-1**: The CSD shall require construction contractors to adhere to the following noise attenuation requirements:

- Construction activities shall be limited to between the hours of 7 a.m. to 9 p.m. on any day except Saturday or Sunday or between the hours of 8 a.m. to 5 p.m. on Saturday or Sunday.
- All construction equipment shall use noise-reduction features (e.g., mufflers and engine shrouds) that are no less effective than those originally installed by the manufacturer.
- Construction staging and heavy equipment maintenance activities shall be performed a minimum distance of 300 feet from the nearest residence, unless safety or technical factors take precedence.
- Stationary combustion equipment such as pumps or generators operating within 100 feet of any residence shall be shielded with a noise protection barrier.

Impact	Mitigation Measure	Level of Impact After Mitigation

### CLASS I. SIGNIFICANT UNAVOIDABLE IMPACTS THAT CANNOT BE FULLY MITIGATED

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Impact	Mitigation Measure	Level of Impact After Mitigation

### CLASS II. SIGNIFICANT ENVIRONMENTAL IMPACTS THAT CAN BE MITIGATED TO LESS THAN SIGNIFICANT

Impact GEO-1. The geologic impact of site construction activities and operation is a significant impact that can be mitigated with appropriate mitigation measures

Mitigation Measure GEO-1. Design-Level Geotechnical Investigation and Report: a geotechnical design investigation should be performed to provide final recommendations and geotechnical design criteria for specific project components, such as structures, foundations, pipelines, pump stations, loading conditions, excavations, grading, dewatering, drainage and other site work. geotechnical design investigation should include additional field exploration for specific structures, and include testing and analyses as needed to provide a basis for design criteria and construction recommendations in accordance with local (County of San Luis Obispo) regulations and the applicable California Building Code (CBC).

As part of the geotechnical design investigation for the Project, creek crossings for pipelines should be investigated and evaluated with respect to the methods of crossings. If horizontal directional drilling methods (HDD) are proposed, then HDD feasibility investigations should be performed for each location where that method is being considered. The geotechnical design report shall include geotechnical design criteria for creek crossings, which may include recommendations for pipeline burial depths, methods of crossing, trench or trenchless design parameters, and lateral setbacks. Recommendations for specific crossings shall be incorporated into the Project plans and specifications prior to construction of the pipeline.

**Impact GEO-2.** The impact of surface fault rupture on certain pipeline segments is a significant impact that can be mitigated with appropriate mitigation measures.

Mitigation Measure GEO-2A. The geotechnical design investigation for the project (Mitigation Measure GEO-1) should include appropriate geologic fault evaluations of the Cambria fault to develop projectspecific design parameters for pipeline sections crossing the fault. The fault evaluations should be directed towards, but not necessarily be limited to, defining the location and width of the fault zone at the pipeline-fault crossings. Since the fault traces are concealed beneath young geologic deposits, the fault zones may be difficult to define with precision. Consequently, fault zone widths should incorporate conservative

Less than Significant

LESS THAN SIG	SNIFICANT	be williaried to
	assumptions for pipeline design. Pipeline crossings of fault traces shall be designed to accommodate potential flexure and horizontal and vertical offsets based on the results of the geologic fault evaluations (Mitigation Measure GEO-2A). Fault rupture mitigation strategies for pipelines may include measures such as flexible connections, gravel trench backfill, double lined pipes, strengthened pipes, automatic shutoff valves and similar measures to prevent the release of product to the environment.	Less than Significant
Impact GEO-3: The impact of strong seismic shaking on project structures is a significant impact that can be mitigated with appropriate mitigation measures.	Mitigation Measure GEO-3: Project structures should be designed to resist lateral forces generated by earthquake shaking in accordance with the current building code, State pipeline safety standards and applicable design practice. The design-level geotechnical report (Mitigation Measure GEO-1) should include recommendations for seismic data for design that may be updated for the new code requirements, additional subsurface information, or further site-specific analyses. Appropriate seismic ground motion parameters should be estimated and incorporated into project design by the project engineer.	
Impact GEO-4. The impact of seismically-induced ground failures, including liquefaction, lateral spreading and seismic densification, is a significant impact that can be mitigated with appropriate mitigation measures.	Mitigation Measure GEO-4. The design-level geotechnical report (Mitigation Measure GEO-1) should include evaluations of liquefaction potential and estimated liquefaction-induced settlement based on field exploration, testing and analysis of site conditions for final project components (WRRF and pipelines). The potential effects of other seismically induced ground failures should also be evaluated, including lateral spreading and seismic densification. Engineering design measures should be provided where estimated ground deformations exceed typical foundation and structural design parameters. seismic densification. Engineering design measures should be provided where estimated ground deformations exceed typical foundation and structural design parameters.  The liquefaction, lateral spreading and	

LESS THAN SIG	GNIFICANT	
	seismic settlement evaluations should be conducted in accordance with guidelines published by the California Geologic Survey (formerly the California Division of Mines and Geology) and relevant local and professional standards. At a minimum, the liquefaction hazard evaluation and mitigation study should be undertaken in a manner consistent with the Guidelines for Evaluation and Mitigation of Seismic Hazards in California, Chapter 6, Analysis of Liquefaction Hazards (CGS Special Publication 117A, 2008).	Less than Significant
Impact GEO-5. The impact of landsliding and slope instability is a significant impact that can be mitigated with appropriate mitigation measures.	Mitigation Measure GEO-5. The design-level geotechnical report (Mitigation Measure GEO-1) should include evaluations of landsliding, creek bank instability and other types of slope instability settlement based on field exploration, testing and analysis of site conditions for final project components (WRRF and pipelines). The potential impact of slope instability on the construction and operation of the WRRF should be evaluated as part of the geotechnical design investigation and report (Mitigation Measure GEO-1). Mitigation measures to reduce the potential for damage due to slope movement should be developed for the depths and types of slope movements that may impact the pipelines at the locations identified in the landslide evaluations.	
Impact GEO-6. The impact of soil erosion and loss of topsoil due to construction and operation of Project components is a significant impact that can be mitigated with appropriate mitigation measures.	Mitigation Measure GEO-6. An Erosion Control Plan (ECP), including elements of a Storm Water Pollution Prevention Plan (SWPPP), should be prepared by a geotechnical or civil engineer, consistent also with Mitigation Measure WQ-1. The ECP and SWPPP would describe measures intended to reduce erosion and deposition in to local creeks and the Pacific Ocean.	

Impact	Mitigation Measure	Level of Impact After Mitigation

### SIGNIFICANT ENVIRONMENTAL IMPACTS THAT CAN BE MITIGATED TO

CLASS II. **LESS THAN SIGNIFICANT** Impact GEO-7. The impact of Mitigation Measure GEO-7. Testing of expansive soils on Project samples in a geotechnical laboratory is the components is a significant standard method of quantifying the expansibility of materials, and should be impact that can be mitigated with appropriate mitigation measures. performed as part of design-level geotechnical studies for the selected WRRF site and pipeline routes (Mitigation Measure GEO-1). If expansive materials are identified, then appropriate design and construction measures should be provided to mitigate the adverse effects. The design-level geotechnical investigation should provide specific recommendations to address expansive soil conditions for the design of foundations, flatwork, pavement, pipelines and other site work. Impact WQ-3: The Proposed Mitigation Measure WQ-1: To mitigate Project could result in significant impacts identified in Impact WQ-3 related to construction-stage erosion and construction stage erosion and sedimentation, sedimentation impacts until site the Project will be required to comply with the grading and preparation reached General Permit including but not limited to compliance with 1) the State General the stage that the proposed spill containment basin is functioning Construction Activity Permit, as most recently modified by the State Water Resources to capture all site runoff This is a significant but mitigable impact. Control Board (SWRCB), and 2) County standards under the Stormwater Ordinance Title 19 chapter 19.09, ensuring that construction-related sediment or other contaminants that could adversely affect receiving water would be reduced to a lessthan-significant impact.

Impact CUL-2: Without special design considerations, installation of the new pipelines to and from the WRRF along Toro Creek Road would have the potential to significantly and adversely impact CA-SLO-879/H, a significant historical resource and a tribal However. cultural resource. implementation of Mitigation Measure CUL-2 would avoid and minimize these effects. With implementation of this measure. historical or tribal nο cultural resources would be disturbed by the project, and Mitigation Measure CUL-2: To avoid any adverse effect on CA-SLO-879/H, the proposed pipelines along Toro Creek Road shall be placed only on the north side of the road and shall be directionally drilled under the maximum depth of cultural deposits. Three bore pits shall be installed along the pipeline alignment in previously disturbed areas, where cultural materials are sparse and lack integrity. The exact location of the bore pits and segment to be directionally drilled shall be dictated in the Final Cultural Resources Impact Assessment Report prepared for the project by Applied Earthworks. All work related to pipeline installation along Toro Creek Road shall be Less than Significant

Impact	Mitigation Measure	Level of Impact After Mitigation

impacts would be reduced to less than significant levels.	monitored by an archaeologist and Native American representatives. If at any point, the pipeline design requirements specified in the Cultural Resources Impact Assessment Report cannot be met, the project shall be halted and San Luis Obispo County and other responsible agencies contacted to determine the next course of action to protect historical or tribal cultural resources in compliance with California and federal law.	Less than Significant
Impact CUL-3: The potential exists for inadvertent discovery of cultural resources during pipeline construction. This impact is potentially significant	Mitigation Measure CUL-3: To minimize potential impacts due to inadvertent discovery of cultural resources in site and pipeline areas with no evidence of resources, and consistent with LUO sections 22.05.140 and 23.10.040, the applicant shall prepare and implement a pre-construction Worker Education Program to train workers to recognize cultural resources and understand the procedures for stopping work and reporting the discovery.	
Impact VIS-3: The proposed project would result in a short term but significant impact on visual resources until the proposed screen planting grows to an extent to substantially screen the WRRF. This impact is significant can be mitigated to less than significant.	Mitigation Measure VIS-2: To mitigate short-term impacts on visual resources until planting matures, a final landscaping plan shall be prepared for the project site consistent with the preliminary landscape plan evaluated in the EIR and approved by the County prior to building permit issuance. The landscape plan shall emphasize native plant materials and shall include sufficient planting to screen views of the project from Toro Creek Road. The planting shall be designed to achieve substantial screening of the WRRF within 7 years.	
Impact VIS-4: The Project will add a new source of substantial light or glare which would adversely affect nighttime views in the area, a significant but mitigable impact.	Mitigation VIS-3: To mitigate potentially significant impacts from a new source of substantial light or glare which would adversely affect nighttime views in the area, a final lighting plan shall be prepared and implemented for the WRRF. The plan shall include proper shielding, proper orientation, and minimum height standards to achieve safe light levels on the ground. All lighting fixtures shall be shielded so that neither the lamp nor the related reflector interior surface is visible from adjacent properties. Light	

Impact	Mitigation Measure	Level of Impact After Mitigation

### CLASS II. SIGNIFICANT ENVIRONMENTAL IMPACTS THAT CAN BE MITIGATED TO LESS THAN SIGNIFICANT

Impact TR-2: Construction activities associated with the Project Site or Alternative Site, along with connection to the outfall at the existing WWTF, and construction of pipeline conveyances will result in temporary and short-term impacts related to the safe operation of streets and intersections due to the presence of workers, equipment, lane closures and open trenches. This impact is considered significant unless mitigated.

hoods shall be dark-colored.

Less than Significant

Mitigation Measure TR-1: Prior to building permit issuance a Traffic Management Plan shall be prepared for review and approval by the County of San Luis Obispo Public Works Department and the City of Morro Bay Public Works Department. The traffic management plan shall be based on the type of roadway, traffic conditions, duration of construction, physical constraints, nearness of the work zone to traffic and other facilities (bicycle, pedestrian, driveway access, etc.). The traffic management plan shall include:

- Advertisement. An advertisement campaign informing the public of the proposed construction activities should be developed. Advertisements should occur prior to beginning work and periodically during the course of project construction.
- Property Access. Access to parcels along the construction area shall be maintained to the greatest extent feasible. Affected property owners shall receive advance notice of work adjacent to their property access and when driveways would be potentially closed.
- Schools. Any construction adjacent to schools shall ensure that access is maintained for vehicles, pedestrians, and bicyclists, particularly at the beginning and end of the school day.
- Buses, Bicycles and Pedestrians.
   The work zone shall provide for passage by buses, bicyclists and pedestrians, particularly in the vicinity of schools.
- Intersections. Traffic control (i.e. use of flag men) shall be used at intersections that are determined to be unacceptably congested due to construction traffic.

Impact AQ-1 Construction	Mitigation Measure AQ-1: The following	Less than Significant
emissions are below the	standard SLOAPCD dust control measures	
SLOAPCD significance	shall be implemented:	
thresholds. Therefore,	a. The amount of the disturbed area shall be	
construction of the Proposed	minimized;	
Project would be consistent with	b. Water trucks or sprinkler systems shall be	
the Clean Air Plan. However,	used in sufficient quantities to prevent	
fugitive dust from construction has	airborne dust from leaving the site and from	
the potential to result in a violation	exceeding the APCD's limit of 20% opacity for	
of SLOAPCD Rule 401 (Visibility) and/or Rule 402 (Nuisance)	greater than 3 minutes in any 60-minute	
without mitigation. Impacts would	period. Increased watering frequency shall be required whenever wind speeds exceed 15	
	, · · · · · · · · · · · · · · · · · · ·	
be significant but reduced to less than significant levels with	mph. Reclaimed (non-potable) water or an	
_	APCD-approved dust suppressant should be	
implementation of mitigation measures.	used whenever possible; c. All dirt stock pile areas shall be sprayed	
measures.	daily and covered with tarps or other dust	
	barriers as needed;	
	d. Exposed ground areas that are planned to	
	be reworked at dates greater than one month	
	after initial grading shall be sown with a fast	
	germinating, non-invasive, grass seed and	
	watered until vegetation is established;	
	e. All disturbed soil areas not subject to	
	revegetation shall be stabilized using	
	approved chemical soil binders, jute netting,	
	or other methods approved in advance by the	
	APCD;	
	f. All roadways, driveways, sidewalks, etc. to	
	be paved shall be completed as soon as	
	possible. In addition, building pads shall be	
	laid as soon as possible after grading unless	
	seeding or soil binders are used;	
	g. Vehicle speed for all construction vehicles	
	shall not exceed 15 mph on any unpaved	
	surface at the construction site;	
	h. All trucks hauling dirt, sand, soil, or other	
	loose materials shall be covered or shall	
	maintain at least two feet of freeboard	
	(minimum vertical distance between top of	
	load and top of trailer) in accordance with	
	CVC Section 23114;	
	i. Wheel washers and/or rumble strips shall be	
	installed where vehicles enter and exit	
	unpaved roads onto streets; and	
	The contractor or builder shall designate a	
	person or persons to monitor the fugitive dust	
	emissions and enhance the implementation of	
	the measures as necessary to minimize dust	
	complaints, reduce visible emissions below	
	complaints, reduce visible emissions below	

After Mitigation
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LESS THAN SIGNIFICANT			
Impact AQ-3: construction of the	the APCD's limit of 20% opacity for greater than 3 minutes in any 60-minute period. The name and telephone number of such persons shall be provided to the APCD Engineering & Compliance Division prior to the start of any grading, earthwork or demolition.  Mitigation Measure AQ-2: Prior to starting	Less than Significant	
new pipelines associated with the Proposed Project could disturb rock formations containing NOA. Impacts would be significant without mitigation.	any ground-disturbing construction activities for the new influent, effluent, or RW pipelines to CSA-10, the applicant shall conduct a geologic evaluation for NOA along the pipeline routes following the Guidelines for Geologic Investigations of Naturally Occurring Asbestos in California (California Geologic Survey [CGS] Special Publication 124, 2002) to determine whether the construction of the pipelines has the potential to disturb NOA, and if so, how many acres. If no NOA is expected to be disturbed, the applicant shall submit a request for an exemption from CARB's Asbestos ATCM, along with the geologic evaluation report. If NOA is expected to be disturbed, the SLOAPCD must be notified and preparation and approval of an Asbestos Dust Mitigation Plan and Asbestos Health and Safety Program may be required.		
Impact AQ-4: Due to the proximity of Morro Bay High School and several residences to the installation routes for new pipelines, idling of construction equipment could pose a significant health risk to these sensitive receptors due to diesel particulate matter emissions.	Mitigation Measure AQ-3: The applicant shall implement the following idling control techniques:  California Diesel Idling Regulations a. On-road diesel vehicles shall comply with Section 2485 of Title 13 of the California Code of Regulations. This regulation limits idling from diesel-fueled commercial motor vehicles with gross vehicular weight ratings of more than 10,000 pounds and licensed for operation on highways. It applies to California and non-California based vehicles. In general, the regulation specifies that drivers of said vehicles:  Shall not idle the vehicle's primary diesel engine for greater than 5 minutes at any location, except as noted in Subsection (d) of the regulation; and  Shall not operate a diesel-fueled auxiliary power system (APS) to power a heater, air conditioner, or any ancillary equipment on that vehicle during sleeping or resting in a sleeper		

Impact	Mitigation Measure	Level of Impact After Mitigation

LESS THAN SIGNIFICANT			
	berth for greater than 5.0 minutes at any location when within 1,000 feet of a restricted area, except as noted in Subsection (d) of the regulation.  b. Off-road diesel equipment shall comply with the 5-minute idling restriction identified in Section 2449(d)(2) of the California Air Resources Board's In-Use Off-Road Diesel regulation.  c. Signs must be posted in the designated queuing areas and job sites to remind drivers and operators of the state's 5-minute idling limit.	Less than Significant	
	Diesel Idling Restrictions Near Sensitive Receptors (i.e., Morro Bay High School and Residential Dwellings along the Pipeline Routes)		
	In addition to the State required diesel idling requirements, the project applicant shall comply with these more restrictive requirements to minimize impacts to nearby sensitive receptors:		
	<ul> <li>a. Staging and queuing areas shall not be located within 1,000 feet of sensitive receptors;</li> <li>b. Diesel idling within 1,000 feet of sensitive receptors shall not be permitted;</li> <li>c. Use of alternative fueled equipment is recommended; and</li> <li>Signs that specify the no idling areas must be posted and enforced at the site.</li> </ul>		
Impact AQ-5: Potential odor nuisance impacts on nearby residents would be potentially significant without mitigation. However, implementation of mitigation would ensure that impacts are reduced to less than significant levels.	Mitigation Measure AQ-4: Prior to receipt of the Authority to Construct (ATC) from the SLOAPCD for the project, the applicant must submit an Odor Monitoring and Complaint Response Plan for review and approval by the SLOAPCD.		
Impact HZ-2: Operation of the WRRF on either the Project Site or Alternative Site will involve the transport, storage, usage, and disposal of hazardous materials associated with the wastewater treatment process. This impact is	Mitigation Measure HZ-1: Prior to final occupancy/operation of the project, a Hazardous Materials Business Plan in accordance with California Health and Safety Code Sections 25503 and 25505 shall be submitted to, and approved by, the San Luis Obispo County Department of Environmental		

considered significant unless mitigated.	Health.	Less than Significant
Impact HZ-4: Operation of the WRRF on either the Project Site or Alternative Site and conveyance pipelines may result in the accidental spill of untreated wastewater which could adverse impact surface water quality and other pose a threat to human health and biological resources. This impact is considered significant unless mitigated.	Mitigation Measure HZ-2: To mitigate impacts related to a untreated wastewater spill the CSD shall modify it's existing Sanitary Sewer Management Plan to include WRRF and pipeline operations.	
Impact HZ-6: Construction of the WRRF on either the Project Site or Alternative Site and associated solar array will expose people and structures to a significant risk of loss, injury or death associated with wildfires. This impact is considered significant unless mitigated.	Mitigation Measure HZ-3: The Applicant shall provide a written Fire Safety and Evacuation Plan whose contents shall be in accordance with sections California Fire Code Chapter 4 Emergency Planning and Preparedness. Employee training, record keeping, hazard communication and drills will also comply with this chapter. The written plan will include at a minimum the detail outlined in sections 404.3.1 (Evacuations Plans) and 404.3.2 (Fire Safety Plans).	
Impact HZ-7: Construction activities associated with the WRRF on either the Project Site or Alternative Site and pipeline conveyances has the potential to result in a hazard to the public or the environment by mobilizing disease vectors, such as the fungus that causes Valley Fever, that may be present in the soil. This impact is considered significant unless mitigated.	Mitigation Measure HZ-4: To minimize the risk of exposure to disease vectors, activities with the potential to mobilize spores associated with Valley Fever, the CSD shall implement the following measures, as applicable:  a. Implement all of the mitigation measures relating to the control of dust during construction activities; b. Prohibit eating and smoking at the project site and provide separate, clean eating areas with handwashing facilities; c. Avoid outdoor operations during unusually windy conditions; d. Limit ground disturbing activities during the fall to essential jobs only, as the risk of cocci infection is higher during this season.	

### CLASS II. SIGNIFICANT ENVIRONMENTAL IMPACTS THAT CAN BE MITIGATED TO

CLASS II. SIGNIFICANT E LESS THAN SIG	e. Thoroughly clean equipment, vehicles, and other items before they are moved off-site to other work locations; f. Train workers to recognize that cocci may be transported offsite on contaminated equipment, clothing, and shoes; alternatively, consider installing boot-washing stations; and g. Post warnings onsite and consider limiting access to visitors, especially	Less than Significant
Impact HZ-8: Construction activities associated with the WRRF on either the Project Site or Alternative Site has the potential to expose construction workers and CSD staff to potentially hazardous concentrations of environmentally-persistent pesticides, herbicides and fertilizers. This impact is considered significant unless mitigated.	Mitigation Measure HZ-5: Prior to construction activities that involve soil disturbance, the CSD shall develop and implement a Soil Sampling and Analysis Plan to determine the presence and extent of any residual herbicides, pesticides, and fumigants on historically-farmed land in agricultural areas that would be disturbed during ground-disturbing activities associated with the project. The Plan shall be prepared in consultation with the San Luis Obispo County Department of Environmental Health Services and the work shall be conducted by an appropriate California-licensed professional and samples sent to a California Certified laboratory. At a minimum, the Plan shall document the areas proposed for sampling, the procedures for sample collection, the laboratory analytical methods to be used, and the pertinent regulatory threshold levels for determining proper excavation, handling, and, if necessary, treatment or disposal of any contaminated soils. The Plan shall be submitted to the Department and the San Luis Obispo County Department of Environmental Health Services for review and approval at least 60 days before construction. Results of the laboratory testing and recommended	

Impact	Mitigation Measure	Level of Impact After Mitigation

	resolutions for excavation, handling, dust control, and treatment/disposal of material found to exceed regulatory Practices shall be submitted to the Department prior to construction.	Less than Significant
Impact GRO-1: The Project could result in indirect impacts on the environment related to growth induced by the provision of an additional water supply, including but not limited to, increased traffic, noise, vehicular emissions, loss of vegetation and wildlife forage area, loss of visual quality and watershed impacts. This impact is significant but mitigable.	Mitigation Measure GRO-1: To avoid potentially significant growth inducing effects, the CSD shall limit the sale of tertiary treated water for domestic use to water purveyors serving lots within the Urban Reserve Line for Cayucos as set by the County and LAFCO.	
Impact BIO-2: Impacts to nesting birds, including special status birds, may occur in ruderal areas with thick vegetation, eucalyptus trees and riparian trees within the Proposed Project construction area. Impacts to nesting birds are potentially significant, but mitigable.	Mitigation Measure BIO-1: Within one week of ground disturbance or vegetation removal activities, if work occurs between March 1 and August 31, nesting bird surveys shall be conducted. If surveys do not locate nesting birds, construction activities may be conducted. If nesting birds are located, no construction activities shall occur within 100 feet of nests until chicks are fledged. Occupied nests of special status bird species shall be mapped using GPS or survey equipment and submitted in monitoring reports. If nesting birds are located, no construction activities shall occur within 100 feet of nests (or other setback distance determined by a qualified ornithologist) until chicks are fledged. Construction activities shall observe a 300-foot buffer for active raptor nests. Occupied nests of special status bird species shall be monitored every two weeks to document nest success and check for compliance with buffer zones.	
Impact BIO-3: Potential habitat for the special status plant Club- haired mariposa lily occurs in a small patch of annual grassland at the southern end of the	Mitigation Measure BIO-2: Limits of grading shall be clearly delineated in the field prior to initiation of construction activities to demonstrate avoidance in impacting the area identified in the Biological Technical Report as habitat for club-haired mariposa lily.	

After Mitigation
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LESS THAN SIG	MILICANT	
Proposed Project Study Area. This habitat is outside the limits of grading, however potential adverse effects are possible therefore the impact is significant but mitigable.		Less than Significant
Impact BIO-4: Construction equipment and vehicle traffic, sedimentation due to earthmoving, or spills during construction or operation of the WRRF may impact special status reptiles and amphibians, a potentially significant but mitigable impact.	Mitigation Measure BIO-3: To mitigate adverse impacts to potentially present status reptiles and amphibians western pond turtle, foothill yellow-legged frog, coast range newt, and two-striped garter snake, in addition to Mitigation Measure BIO-4, the following shall be implemented:  Construction Plans shall show how construction at stream crossings will utilize low-flow periods, incorporate sediment retention devices and minimize time and area of disturbance.	
	• A pre-construction survey would be conducted within 48 hours prior to starting work in or within 50 feet of habitats likely to support sensitive reptiles and amphibians such as seasonal drainages and riparian. The survey would be conducted by a qualified biologist approved to relocate sensitive species should they occur. If sensitive reptile or amphibian species are located during the pre-construction survey, a biologist would monitor ground-breaking work conducted within 50 feet of habitat.	
	• Qualified biologists will brief all project personnel prior to participating in construction activities. At a minimum, the briefing will include a description of the project components and techniques, a description of the listed species occurring in the project area, and the general and specific measures and restrictions to protect the species during implementation of the project.	
	<ul> <li>Post construction re-vegetation plans for work areas disturbed within 100 feet of ESHA at Toro Creek Bridge shall be submitted for County approval and implemented upon completion of pipeline work in that area. The re-vegetation plan shall use only native plant</li> </ul>	

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	species pursuant to Coastal Policy 30. The species shall be selected to provide permanent erosion control and soil cover pursuant to Coastal Policy 21.	Less than Significant
Impact BIO-5: Construction equipment and vehicle traffic, sedimentation due to earthmoving, or spills during	Mitigation Measure BIO-4: To mitigate adverse impacts to potentially present California red-legged frog (CRLF), the following shall be implemented:	
construction or operation of the WRRF may impact California red-legged frog (CRLF), a potentially significant but mitigable impact.	Pre-construction Survey. Prior to commencement of grading activities, a USFWS-approved biologist will survey the project site 48 hours before the onset of work activities. If any life stage of the California Red-legged Frog (CRLF) is found and these individuals are likely to be killed or injured by work activities, the biologist will be allowed sufficient time to move them from the site before work activities begin. The biologist will relocate the CRLF the shortest distance possible to a location that contains suitable habitat and will not be affected by activities associated with the proposed project. The biologist will maintain detailed records of any individuals that are moved (e.g., size, coloration, distinguishing features, digital images, etc.) to assist in determining whether translocated animals are returning to the original point of capture.	
	Pre-construction Training. Prior to commencement of grading activities, a USFWS-approved biologist will conduct a training session for all construction personnel. At a minimum, the training will include a description of the CRLF and its habitat, the specific measures that are being implemented to conserve the CRLF for the current project, and the boundaries within which the project may be accomplished. Brochures, books, and briefings may be used in the training session, provided that a qualified person is on hand to answer any questions.	
	Biologist Present during Construction. A	

After Mitigation
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### CLASS II. SIGNIFICANT ENVIRONMENTAL IMPACTS THAT CAN BE MITIGATED TO LESS THAN SIGNIFICANT

USFWS-approved biologist will be present at the work site until all CRLF have been removed, workers have been instructed, and disturbance of habitat has been completed. After this time, the County will designate a person to monitor on-site compliance with all minimization measures. The biologist will ensure that this monitor receives the training outlined above and in the identification of CRLF. If the monitor/biologist determine CRLF impacts are greater than anticipated or approved, work shall stop until the issue is The monitor/biologist shall resolved. immediately contact the resident engineer (the engineer overseeing and in command of construction activities), where the resident engineer will either resolve the situation by eliminating the effect immediately, or require that all actions which are causing these effects be halted. If work is stopped, the County/ USFWS will be notified as soon as is reasonably possible.

**Trash Removal.** During construction/ground disturbing activities, all trash that may attract CRLF predators will be properly contained, removed from the work site, and disposed of regularly. Prior to occupancy or final inspection, whichever occurs first, all trash and construction debris will be removed from work areas.

Equipment Maintenance. Durina construction/ ground disturbing activities, all refueling, maintenance, and staging of equipment and vehicles will occur at least 100 feet from riparian habitat or water bodies and not in a location from where a spill would drain directly toward aquatic habitat. The monitor will ensure contamination of habitat does not occur during such operations. Prior to grading/construction commencement of activities, the monitor will ensure that a plan is in place for prompt and effective response to any accidental spills. All workers will be informed of the importance of preventing spills and of the appropriate measures to take should a spill occur.

Less than Significant

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			After Mitigation	
CLASS III. OTHER ENVIRONI	MENTAL IMPACTS WHICH ARE AD	OVERSE BU	IT NOT SIGNIFICANT	
Impact AG-3: The use of a 3-acre construction staging area sited on land to be converted by construction by the solar array area, will result in the temporary loss of agricultural productivity of Prime Farmland as defined by the County Conservation and Open Space Element. This is considered a less than significant impact				
Impact AG-4: Construction of the WRRF on the Project Site or Alternative Site is not expected to result in other changes to the existing environment, which due to their location or nature, could result in the conversion of Prime Farmland or Farmland of Statewide Importance (as defined by the Conservation and Open Space Element) to nonagricultural use, or conflicts with agricultural use or agricultural operations (e.g. placement of urban and other uses adjacent to agricultural uses resulting in potential conflicts). This impact is considered less than significant.				
Impact AG-5: Construction of the WRRF on either the Project Site or the Alternative Site is not expected to result in the indirect conversion of Prime Farmland or Farmland of Statewide Importance, resulting from a net decrease in the amount of designated agricultural land in the county, as represented by the Agriculture land use designation of the current San Luis Obispo County General Plan Land Use Map. This impact is considered Less Than Significant.				
Impact WQ-1: Construction of the Proposed Project in the Toro Creek Valley would not result in exposure of people or structures to flooding in a 100 year storm				

		Aiter Willigation
CLASS III. OTHER ENVIRON	  MENTAL IMPACTS WHICH ARE AL	DVERSE BUT NOT SIGNIFICANT
event or result in a substantial acrease in the flood level. This appact is less than significant.		
Impact WQ 2: The Proposed Project includes design features that would result in less than significant impacts on stormwater volumes, erosion and sedimentation hazard, and stormwater runoff quality.		
Impact WQ-4: Impacts for annual WRRF tank filling operations requiring 1.8 acre feet of		
groundwater would be less than significant based on a dry weather sub-basin storage of 90 acre feet that accounts for other pumping in the subbasin. This impact is less than significant.		
Impact CUL-1: The proposed project has the potential to adversely affect tribal cultural resources, however this effect is less than significant.	Mitigation Measure CUL-1: To mitigate potential effects to tribal cultural resources, the CSD shall place portions of parcels 8 and 10 owned by the CSD between Toro Creek Road and Toro Creek in a conservation easement in favor of an appropriate entity to protect and manage the land for the type of historic agriculture uses that have occurred on the property, and preclude deep ripping agricultural activities such as used for vineyard installation.  Additionally, the Cultural Resource Impact Assessment Report shall include a full technical analysis of all artifacts and other cultural remains collected during the Phase II study.	

#### CLASS III. OTHER ENVIRONMENTAL IMPACTS WHICH ARE ADVERSE BUT NOT SIGNIFICANT

Impact VIS 1: The construction of pipe bridge crossings at Toro Creek and Old Creek will result in impacts to visual resources that are less than significant.

Impact VIS 2: The construction of the pipelines in approximately a ½ mile segment from the Coastal Zone boundary at Toro Creek west to SR 1 and then north along SR1 will result in a disturbed ground surface that could be visually adverse.

Impact TR-1: Based on the acceptable status of the existing pavement on both roads, the addition of periodic trips by trucks with heavy loads for the duration of the 18-24 month construction period would not be considered a significant impact on pavement.

Impact TR-3: Operational activities associated with the WRRF will increase traffic levels on streets and intersections serving the project. This impact is considered less than significant.

Impact TR-4: Construction related activities associated with the CSWP, together with traffic generated by the construction of other reasonably foreseeable related projects in the region, will temporarily increase traffic levels on streets and intersections serving the region and result in temporary traffic safety and traffic management impacts. These impacts are considered less than cumulatively considerable.

Mitigation Measure VIS-1: To mitigate post-construction disturbed soil on the pipeline trenches in the Coastal Zone, the applicant shall prepare and implement an approved restoration plan that uses native seed species and is consistent with Coastal Plan policy 30.

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#### CLASS III. OTHER ENVIRONMENTAL IMPACTS WHICH ARE ADVERSE BUT NOT SIGNIFICANT

Impact TR-5:	Construction
related activities	associated with
the CSWP, toge	
generated by the	e construction of
other reasonab	ly foreseeable
related projects in	n the region, will
temporarily increa	ase traffic levels
on streets an	d intersections
serving the region	
temporary traffic	•
management ir	
impacts are cons	
cumulatively cons	siderable.

Impact N-1: Construction activities associated with the Project Site or Alternative Site will result in a temporary or periodic increase in ambient noise levels in the project vicinity above existing levels without the project. This impact is considered less than significant because it is below the County threshold of significance for stationary noise.

Impact N-3: Operational activities associated with the WRRF at the Project Site would not result in exposure of persons to or generation of noise levels in excess of standards established in the local general plan or noise applicable ordinance. or standards of other agencies or result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project. This impact is considered less than significant.

Impact N-5: Noise generated by the Project and related project traffic at either the Project Site or Alternative Site, together with noise generated by other reasonably foreseeable related projects in the region, are unlikely to result in exposure of persons to, or the generation of, noise levels in excess of

			After Mitigation	
CLASS III. OTHER ENVIRON	MENTAL IMPACTS WHICH ARE AD	VERSE BU	IT NOT SIGNIFICANT	
standards established in the local general plan or noise ordinance, or applicable standards of other agencies and result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project. These impacts are considered less than cumulatively considerable.				
Impact AQ-2 Foreseeable future projects near the Proposed Project aggregated together would be well below the size expected to have significant air quality impacts associated with construction or operation. Because construction of the Proposed Project would also result in emissions well below significance thresholds, and Mitigation Measure AQ-1 would be implemented, the Proposed Project would not have a significant contribution to cumulative air quality impacts in the area.				
Impact AQ-6: GHG emissions from the Proposed Project would be below the SLOAPCD threshold. Therefore, the project would not result in GHG emissions that would have a significant effect on the environment nor conflict with the SLOAPCD, SLOCOG, and County's GHG emissions reduction targets in compliance with AB 32, or SB 32, no mitigation is required.				
activities associated with the WRRF on either the Project Site or Alternative Site and pipeline conveyances may involve the limited transport, storage, usage, or disposal of hazardous materials, such petroleum products for fueling and servicing				

	Impact	Mitigation Measure	Level of Impact After Mitigation
CLASS III. OTHER ENVIRONMENTAL IMPACTS WHICH ARE ADVERSE BUT NOT SIGNIFICANT			

#### of construction equipment. The potential impact associated with the temporary use and storage of hazardous materials for construction is considered less than significant. Construction of Impact HZ-3: the WRRF on either the Project Site or Alternative Site. decommissioning of the existing WWTF and the construction of conveyance pipelines may create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions. This impact is considered less than significant. Impact HZ-5: Based on the project description, the project is not expected to **Impair** implementation of or physically with an adopted interfere emergency response plan or emergency evacuation plan. The project may conflict with other adopted goals, policies and standards associated with hazards and hazardous materials. This impact is considered less than significant. Impact HZ-9: The limited transport, storage, usage, or disposal of hazardous materials during construction activities associated with the WRRF on either the Project Site or Alternative Site, decommissioning of the existing WWTF and pipeline conveyances, together with other reasonably foreseeable projects in the area would contribute to the cumulative risk to the public. This impact is considered less than cumulatively considerable. Impact HZ-10: The transport,

Impact	Mitigation Measure	Level of Impact After Mitigation

#### CLASS III. OTHER ENVIRONMENTAL IMPACTS WHICH ARE ADVERSE BUT NOT SIGNIFICANT

storage, usage, and disposal of hazardous materials associated with the wastewater treatment process during operation of the WRRF on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area would contribute to the cumulative risk to the public. This impact is considered less than cumulatively considerable. Impact HZ-11: Construction of the WRRF on either the Project Alternative Site or Site.

Impact HZ-11: Construction of the WRRF on either the Project Site or Alternative Site, decommissioning of the existing WWTF and the construction of conveyance pipelines, together with other reasonably foreseeable projects in the area would contribute to the cumulative risk to the public. This impact is considered less than cumulatively considerable.

**Impact HZ-12:** Operation of the WRRF on either the Project Site Alternative Site conveyance pipelines, together with other reasonably foreseeable projects in the area, would contribute to the cumulative risk to the public associated with the accidental spill of untreated wastewater which could adverse impact surface water quality and other pose a threat to human health and biological resources. This impact is considered less than cumulatively considerable

Impact HZ-13: Based on the project description, the project, together with other reasonably foreseeable projects in the area, is not expected to impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan or to conflict with other adopted goals,

After Mitigation
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Impact	miligation measure	After Mitigation
CLASS III. OTHER ENVIRON	MENTAL IMPACTS WHICH ARE ADVER	RSE BUT NOT SIGNIFICANT
policies and standards associated with hazards and hazardous materials. This impact is considered less than cumulatively considerable.		
Impact HZ-14: Construction of the WRRF and associated solar array on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area, will increase the cumulative risk to people and structures to a significant risk of loss, injury or death associated with wildfires. This impact is considered less than cumulatively considerable.		
Impact HZ-15: Construction activities associated with the WRRF and pipeline conveyances on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area, has the potential to result in an increase to the cumulative hazard to the public or the environment associated with the mobilization of disease vectors, such as the fungus that causes Valley Fever, that may be present in the soil. This impact is considered less than cumulatively considerable.		
Impact HZ-16: Construction activities associated with the WRRF on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area, has the potential to increase the cumulative exposure of construction workers and CSD staff to potentially hazardous concentrations of environmentally-persistent pesticides, herbicides and fertilizers. This impact is considered significant less than cumulatively considerable.		

#### **SUMMARY OF ENVIRONMENTAL IMPACTS** Table II-1: AND MITIGATION MEASURES

Impact Mitigation Measure Level of Impa After Mitigation
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Impact	Mitigation Measure	Level of Impact After Mitigation
CLASS III. OTHER ENVIRONI	MENTAL IMPACTS WHICH ARE AD	OVERSE BUT NOT SIGNIFICANT
Impact LU-1: The project will not divide an existing community. This impact is considered less than significant.		
Impact LU-2: The project will not conflict with an applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect. This impact is considered less than significant.		
Impact LU-3: The project will not divide the existing community of Morro Bay. The project will not conflict with an applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect. This impact is considered less than significant.		
Impact LU-4: The project will not divide an existing community, conflict with applicable land use plan, policy, or regulation of an agency or be inconsistent with an adopted habitat conservation plan or other natural plan to a degree that would be cumulatively considerable. This impact is considered less than significant.		
Impact EJ-1: Construction and operation of the WRRF may disproportionately impact Low-Income Populations and Minority Populations. This impact is considered less than significant.  Impact EJ-2: Construction of the		

After Mitigation
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### CLASS IV. BENEFICIAL EFFECT TO THE ENVIRONMENT

CLASS IV. BENEFICIAL EFFECT	TO THE ENVIRONMENT	
Impact AG-2: The WRRF is		
expected to generate an average		
annual daily flow (AADF) of 0.33		
to 0.4 million gallons per day		
(MGD) of tertiary treated non-		
potable water. The project will		
make available 40 acre-feet per		
year to agricultural lands adjoining or near the WRRF. This is		
considered a beneficial impact.		
considered a beneficial impact.		
Impact AQ-7: The Proposed		
Project would involve the		
generation of reclaimed water,		
and potential potable water in the		
future, which would further		
reduce energy demand in the		
region through water		
conservation. Operation of the		
Proposed Project would also not		
involve the use of digester		
boilers that are currently used to		
treat wastewater from the		
Cayucos community at the Morro		
Bay WWTP. Therefore, these		
benefits would further offset		
GHG emissions generated by the		
Proposed Project.		



## A. PHYSICAL SETTING

The CSWP will serve the Cayucos Sanitary District service area which is located on the coastal strand within the unincorporated community of Cayucos north of the City of Morro Bay as shown on Map III-1. Outside the urban areas of Cayucos and Morro Bay, the coastal plain consists of larger (100 acres or more) ranch properties where cattle grazing is the most common use; a significant portion of the coast in this area is in public ownership. Inland, the foothills of the Santa Lucia Range have been incised by numerous blue-line and ephemeral creeks which have created sporadic areas of level bottom lands with fertile alluvial soils conducive for the farming of irrigated and dry crops.

The Project Site for the water recycling and reuse facility (WRRF) is located in a small coastal valley formed by Toro Creek, about 0.75 miles inland from State Route 1 and the Pacific Ocean, and about mid-way between the community of Cayucos and the City of Morro Bay as shown on Map III-2). Toro Creek drains a watershed of about 9,700 acres; the valley formed by the creek is framed by gently to steeply sloping hills covered with annual grasses and occasional coast live oak. The level bottom lands in the valley are cultivated with irrigated and non-irrigated crops.

The Project Site consists of two legal lots of record with a total of about 220 acres. The WRRF and solar array will be constructed in a roughly 12 acre level area on a level portion of Parcel 8 south of Toro Creek Road on land consisting of prime agricultural soils. Toro Creek crosses parcels 8 and 10 east-to-west on the north side of Toro Creek Road and supports dense riparian vegetation. The hillsides of surrounding properties are used primarily for cattle grazing.

The Alternative Site is located in the Willow Creek Valley southeast of Whale Rock Reservoir, about 400 feet east of the intersection of Old Creek Road and Montecito Road (Map II-3). The Willow Creek watershed consists of about 6,700 acres. The Alternative Site is just upstream from the confluence of Willow Creek and an unnamed ephemeral creek. The surrounding hills are gently to steeply sloping and covered with annual grasses. Agricultural activities have been conducted on the Alternative Site consisting of irrigated row crops and seasonal dry farming. On steeper slopes the land is used for cattle grazing.

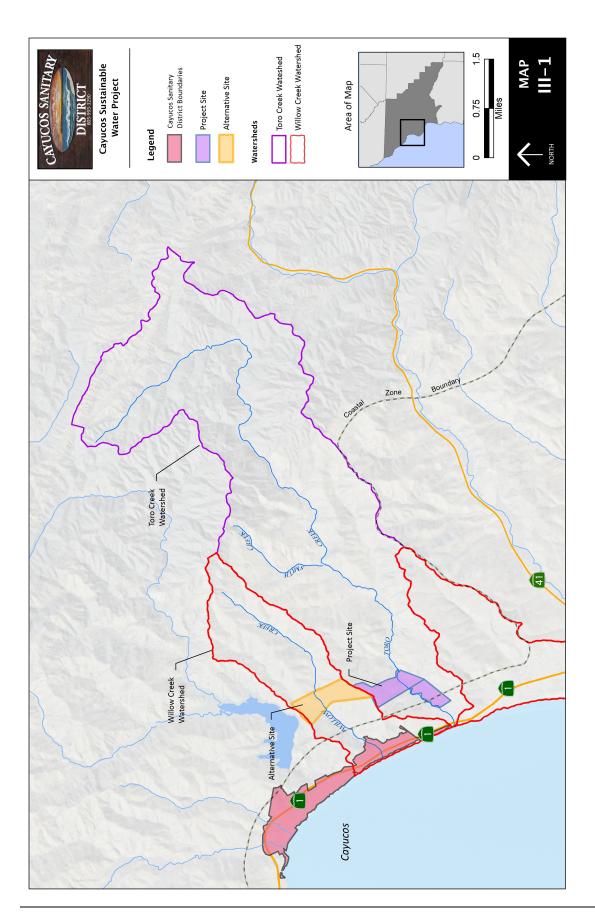
## B. GENERAL REGULATORY SETTING

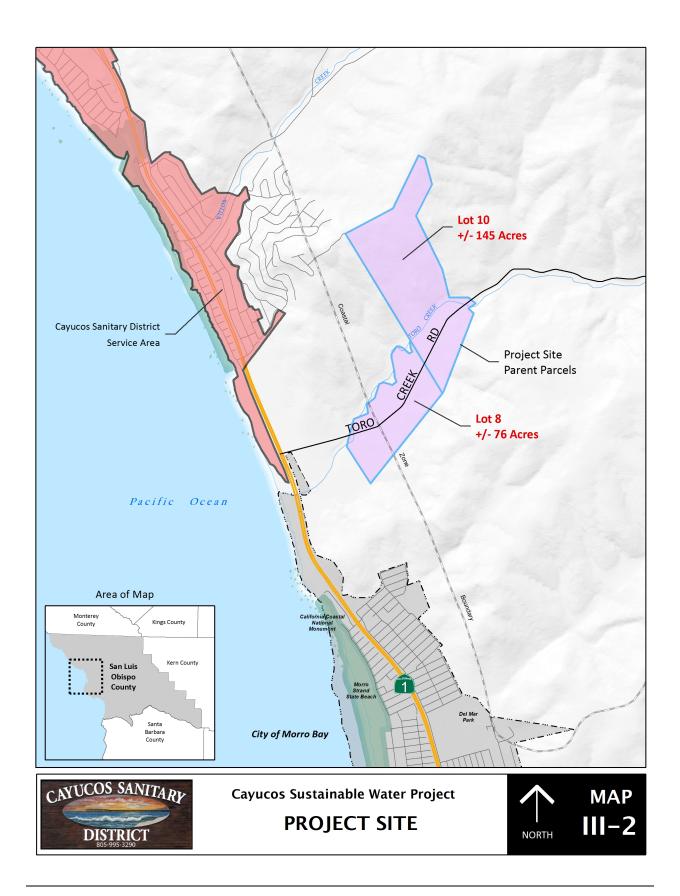
# San Luis Obispo County Area Plans

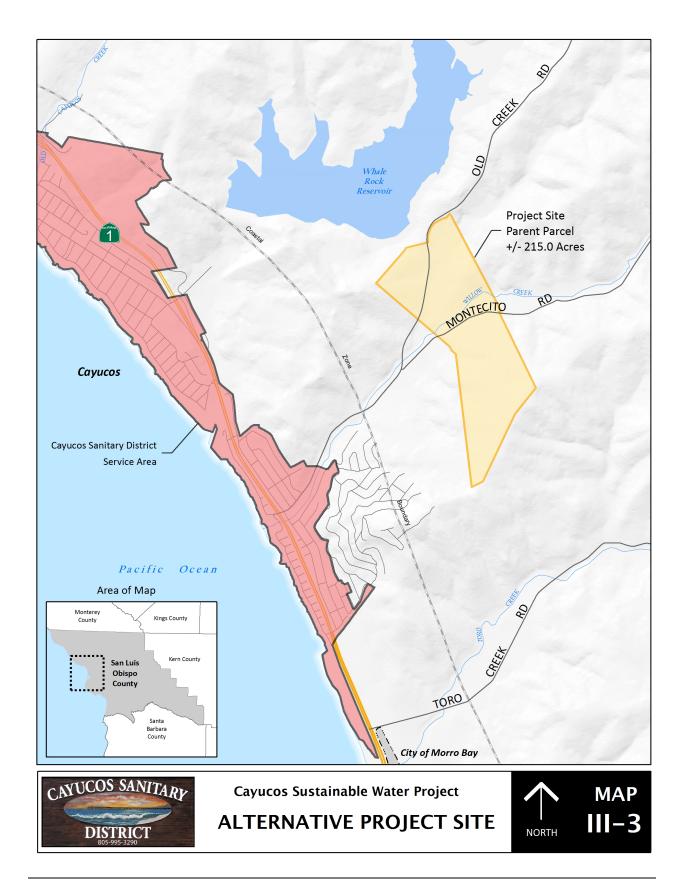
Owing to the diversity of environmental and regulatory issues facing San Luis Obispo County, the Land Use and Circulation Elements of the County General Plan are divided into Area Plans that provide policy guidance tailored to particular regions. Development in the community of Cayucos and surrounding properties within the Coastal Zone is subject to the *Estero Area Plan/Certified Local Coastal Program*. Development landward of the Coastal Zone, including the Project Site and Alternative Site, is governed by the *North County Area Plan – Adelaida Sub-Area* (Map III-4).

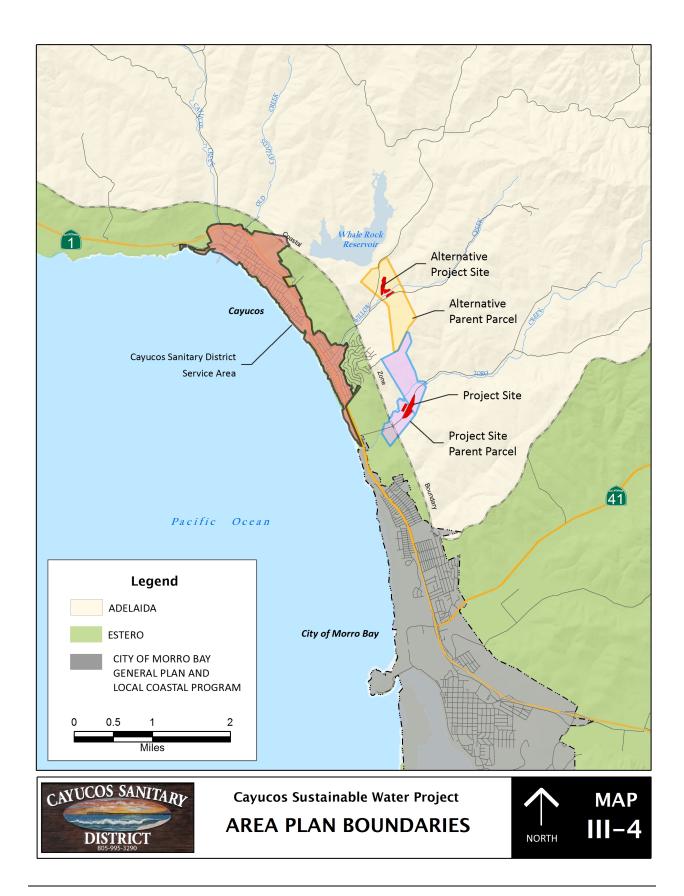
#### THE ESTERO AREA PLAN

The Estero Planning Area is shown in Map III-4 and encompasses the central coastal area of San Luis Obispo County from Point Estero on the north to Point Buchon on the south. The boundary of the Estero Planning Area corresponds to the coastal zone boundary established by the California Coastal Act.









The CSD service area and the community of Cayucos lie entirely within land governed by the Estero Area Plan. The Area Plan is intended to guide development for a 20 year period (until the year 2020). The Area Plan also serves as the certified Local Coastal Program in accordance with the California Coastal Act of 1976. The Estero Area Plan last underwent a comprehensive update and revision in 1988; the portions pertaining to Cayucos and the rural areas governed by the Area Plan were last updated in 2009.

The Area Plan discusses land use issues, sets land use policies, and recommends programs to implement those policies. Programs are recommended actions to consider for implementing policies. Programs relevant to the CSWP include the following:

## A. Water

- 4. Supplemental Water. CSA 10A and applicable water purveyors should continue to pursue obtaining supplemental source(s) of water to accommodate buildout.
- 5. Water Conservation. The Cayucos water purveyors should set a goal of reducing total residential water demand by at least 20% and should cooperatively implement conservation programs involving measures such as public education, leak detection, landscape conversion, and various retrofit programs. For example, the water purveyors should jointly develop a voluntary program for retrofitting existing dwellings and businesses in order to earn additional water units and enable additional development within applicable growth management limitations.
- 6. Consolidation of Water Purveyors. The county, water purveyors, community, and LAFCo should study the possibility of consolidating all the water purveyors in a way that would be cost-beneficial to the community as a whole.
- 7. Graywater Recycling. The county should work with the public to encourage development and use of large-scale graywater recycling projects for irrigation in new development.
- 8. Consolidation Cayucos. The county and the community should work with LAFCo to consolidate all urban services and facilities in Cayucos into a single comprehensive service district.

#### B. Wastewater

1. Wastewater Recycling. Sewage disposal agencies should work with the County Public Works and Health Departments and the Regional Water Quality Control Board to develop a program to find alternative uses for treated wastewater, such as irrigation (e.g. on agricultural lands and the Morro Bay Golf Course), groundwater recharge, and environmental enhancement.

Land use policies for the community of Cayucos are listed below.

- Provide for development that meets the needs of residents and visitors and that can be sustained by available public facilities and resources.
- Generally do not expand the urban reserve line (URL) shown in this plan.
- Support efforts to acquire and develop a new elementary school on an appropriate site as
  close as possible to the existing urban reserve line. In the event that an appropriate elementary
  school site is selected outside and in close proximity to the existing URL, the URL and urban
  services line should be extended to include that site, and the needed land use category change
  should be initiated.
- Encourage "in-fill" development within the existing URL that emphasizes mixed uses.

- Support creation of a greenbelt adjacent to the urban reserve line to clearly define the urban edge of Cayucos, prevent urban sprawl, maintain agricultural resources, protect critical habitat of sensitive plants and animals, and protect scenic qualities. Offer incentives for landowners to participate in a greenbelt program.
- Increase opportunities for affordable housing by allowing limited residential development in office and commercial areas.
- Retain properties acquired through tax defaults where the entire lot is located on slopes greater than 30 percent or within a Geologic Study Area combining designation in order to reduce potential impacts of development.
- Phase development in accordance with available water supplies.

The primary method of allocating land use within the planning area is through mapping of 13 land use categories Map III-5. The uses that are allowed within each category are shown in Table O in Framework For Planning - Coastal Zone. Further limitations on allowable uses may be set by planning area standards which are mandatory requirements applied to new development. Table III-1 provides a summary of land use by land use category within the Estero Area Plan.

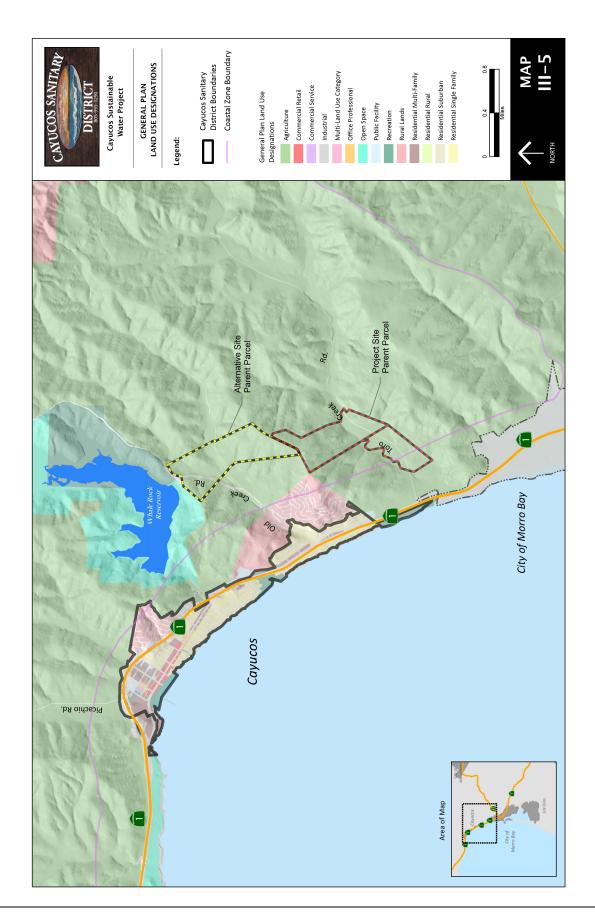
Table III-1. Land Use Category Acreage <sup>1</sup>
Estero Area Plan

Land Use Categories	Rural Area	Los Osos	Cayucos	Planning Area Total	Other Portions of the Morro Bay Watershed <sup>2</sup>
Agriculture	31,415	-		31,415	10,713
Rural Lands	731			731	752
Recreation	5,206	83	48	5,357	590
Open Space	1,553	147		1,060	2,059
Residential Rural	913	32		66	
Residential Suburban	34	919		1,010	
Residential Single Family	91	1,061	180	1,241	
Residential Multi-Family		115	70	185	
Office and Professional		30	6	36	
Commercial Retail		49	16	65	
Commercial Service		23	1	24	
Public Facilities	603	117	18	738	2,865
Commercial Retail, Public Facilities	8			8	
Office and Professional, Public Facilities	3			3	
Total Net Acres:	38,993	2,587	339	41,919	16,979
Total Gross Acres <sup>3</sup> :	39,474	3,091	551	43,116	17,023

Source: Estero Area Plan, Table 4.1, page 4-3.

#### Notes:

- 1. Figures do not include land within the city of Morro Bay.
- 2. The portion of the Morro Bay watershed that lies outside of the Estero Planning Area (see Fig. \_\_\_)
- 3. Gross acreage includes road rights-of-way.



#### NORTH COUNTY AREA PLAN - ADELAIDA SUB-AREA

The North Coast Area Plan (NCAP) consolidates and reorganizes the former Adelaida, El Pomar-Estrella, Las Pilitas, Nacimiento, and Salinas River planning areas, and the northern portions of the Los Padres and Shandon-Carrizo planning areas, into a single watershed-based planning area called the North County planning area (Figure III-4).

Encompassing 1,035,714 acres, the North County planning area is the largest of the County's four planning areas. It includes the unincorporated areas north of the Cuesta Ridge to Monterey County, and is bounded by the Coastal Zone to the west and Kern County to the east. It contains four unincorporated urban areas (San Miguel, Templeton, Santa Margarita, and Shandon), all located along Highway 101, and six village areas (Creston, Heritage Ranch, Oak Shores, Garden Farms, Whitley Gardens, and Pozo). The plan contains policies and programs for the rural portions of the North County planning area. It also contains regional policies and programs that affect both urban and rural areas.

The Project Site and Alternative site for the WRRF are located at the western boundary of the Adelaida Sub-Area of the NCAP. The primary land use in this area is agriculture on large lots. Accordingly, the planning goals for the area encourage the preservation of agriculture while focusing urban development within the incorporated cities and existing unincorporated urban areas.

## **Land Use Ordinances**

#### INLAND

All development in the unincorporated County landward of the Coastal Zone is subject to the Inland portion of the County Land Use ordinance (LUO, Title 22 of the County Code). Consistency with the Inland LUO and Coastal Zone LUO is discussed in EIR section IV-L Land Use Planning. The Project Site and Alternative Site are located on land within the *Agriculture* land use category. According to Table 2-2 of the LUO, *Public Utility Facilities* (which includes wastewater treatment facilities) is an allowed use in the Agriculture land use category subject to the approval of a Conditional Use Permit (CUP) by the County Planning Commission. Section 22.30.370 describes certain planning area standards applicable to the development of public utility facilities, including the contents of the required CUP application as well as development standards that will apply as conditions of approval. In addition to the provisions of Section 22.30.370, the development of land on property subject to a Williamson Act Contract must adhere to the *County's Rules of Procedure to Implement The California Land Conservation Act of 1965* (discussed below). Neither the Project Site nor the Alternative Site are subject to an active Williamson Act contract.

# **COASTAL ZONE**

Development within the Coastal Zone as defined by the Coastal Act of 1976 is subject to the Coastal Zone Land Use Ordinance (CZLUO). As set forth in Section 30106 of the Coastal Act, "development" in the Coastal Zone means:

"... construction, reconstruction, demolition, or alteration of size of any structure, including any facility of any private, public or municipal utility..." As used in the CZLUO, "structure includes, but is not limited to, any building, road, pipe, flume, conduit, siphon, aqueduct, telephone line, and electrical power transmission and distribution line."

Therefore, construction of pipelines and other facilities within the Coastal Zone in support of the CSWP will require the approval of a Coastal Development Permit by the County. Chapter 23.08.286 provides planning area standards for the construction of pipelines and transmission lines. The level of permit required depends on the area of site disturbance as follows:

# Permit Requirement Area of Site Disturbance

Plot Plan Less than 40,000 square feet Minor Use Permit 40,000 or more square feet

Development Plan approval is required for all surface facilities, pumping or booster stations for pipelines. A route-specific geologic investigation, design and mitigation program is required as part of the land use permit application for proposed pipelines. Other requirements for the permit application include:

- Information on how construction at stream crossings will utilize low-flow periods, incorporate sediment retention devices and minimize time and area of disturbance.
- A restoration, erosion control and revegetation plan shall be included in the grading permit application.
- Where a pipeline is to be placed through a Sensitive Resource Area, the Development Plan application shall include a field survey by a qualified biologist to assess impacts to the important coastal resources.

# Water Quality Control Plan for the Central Coastal Basin

In June, 2011, the Regional Water Quality Control Board (RWQCB) adopted the Water Quality Control Plan for the Central Coastal Basin. The objective of the Plan is to show how the quality of the surface and ground waters in the Central Coast Region should be managed to provide the highest water quality reasonably possible. The Basin Plan lists the various water uses (Beneficial Uses) and describes the water quality which must be maintained to allow those uses (Water Quality Objectives). Chapter Four, the Implementation Plan, then describes the programs, projects, and other actions which are necessary to achieve the standards established in the plan. Chapter Five, Plans and Policies, summarizes State Water Resources Control Board (State Board) and Regional Water Quality Control Board (Regional Board) plans and policies to protect water quality. Chapter Six describes statewide surveillance and monitoring programs as well as regional surveillance and monitoring programs.

The Regional Board implements the Basin Plan by issuing and enforcing waste discharge requirements to individuals, communities (including special districts such as the CSD), or businesses whose waste discharges can affect water quality. These requirements can be either State Waste Discharge Requirements for discharges to land, or federally delegated National Pollutant Discharge Elimination System (NPDES) permits for discharges to surface water. Methods of treatment are not specified. When such discharges are managed so that: 1) they meet these requirements; 2) water quality objectives are met; and, 3) beneficial uses are protected, water quality is controlled.

The CSWP will be required to satisfy the discharge requirements of a discharge permit issued by the RWQCB consistent with the Basin Plan. This topic is discussed in EIR section IV-D.

# **Consistency With Adopted Plans And Relevant Policies**

CEQA Guidelines §15125(d) states, "the EIR shall discuss any inconsistencies between the proposed project and applicable general plans and regional plans." While CEQA requires a discussion of consistency with public plans, inconsistency does not necessarily lead to a significant impact. Inconsistency with public plans creates significant impacts under CEQA only when an adverse physical effect would result from the inconsistency. Project consistency with relevant plans and policies is discussed in detail in Section IV-L Land Use Planning of this EIR. With respect to CEQA, it is the responsibility of the Lead Agency (the Cayucos Sanitary District), to make the final

decision regarding consistency issues. Subsequent to an action by the CSD on the EIR, San Luis Obispo County will also make consistency findings as a responsible agency. The following is a general list of plans and policies are applicable to the CSWP which are discussed in further detail in the following sections of this EIR:

- County Air Pollution Control District Clean Air Plan (IV-I Air Quality and Greenhouse Gases)
- Regional Water Quality Control Board, Central Coast Region, Water Quality Control Plan for the Central Coastal Basin June 2011, (IV-D Flooding, Drainage and Water Quality)
- San Luis Obispo County, Coastal Plan Policies, 1988 (IV-L Land Use Planning)
- San Luis Obispo County, Estero Area Plan, 2006
- San Luis Obispo County, North County Area Plan, 2014
- San Luis Obispo County General Plan, Agriculture Element (IV-B Agricultural Resources)
- San Luis Obispo County General Plan, Conservation and Open Space Elements
- San Luis Obispo County Department of Planning and Building, Coastal Zone Land Use Ordinance, Title 23 Of the County Code (IV-L Land Use Planning)
- San Luis Obispo County Department of Planning and Building, *Land Use Ordinance Inland*, Title 22 of the County Code (IV-L Land Use Planning)

# C. BASELINE CONDITIONS AND ASSUMPTIONS

# **Historic Population and Housing Growth**

Historic growth and housing for the County and communities within the Estero Area Plan planning area are provided in Table III-2. As shown in Table III-2 regional population and housing growth in the communities within the Estero Area Plan have experienced lower population and growth rates than the County as a whole.

				Owelling Ur Osos, 1980	nit Counts f - 2010	for
Area	1980	1990	2000	2010	2015	CAGR <sup>1</sup>
Cayucos		l .			<u>l</u>	
Population	2,301	2,960	2,943	2,592	2,558	0.30%
Housing	1,871	2,133	2,284	2,354		0.67%
Los Osos		•	•	•		
Population	10,933	14,377	14,351	14,276	13,988	0.71%
Housing	4,673	6,097	6,214	6,488		0.95%
Morro Bay						
Population	9,064	9,664	10,350	10,234	10,152	0.32%
Housing	5,293	5,694	6,251	6,320		0.56%
COUNTY TOTAL						
Population	155,435	217,162	246,681	269,637	273,664	1.63%
Housing	66,780	90,200	102,275	117,305		1.43%

Source: US Census and SLOCOG Notes: 1. Compounded annual growth rate.

#### THE COMMUNITY OF CAYUCOS

Cayucos is considered a "bedroom community" in that roughly 85 to 90 percent of their workers commute to jobs in other communities. Although the city of Morro Bay provides some employment for local residents (and contributes significantly to the area's economy), a large percentage of local workers find employment in the San Luis Obispo area.

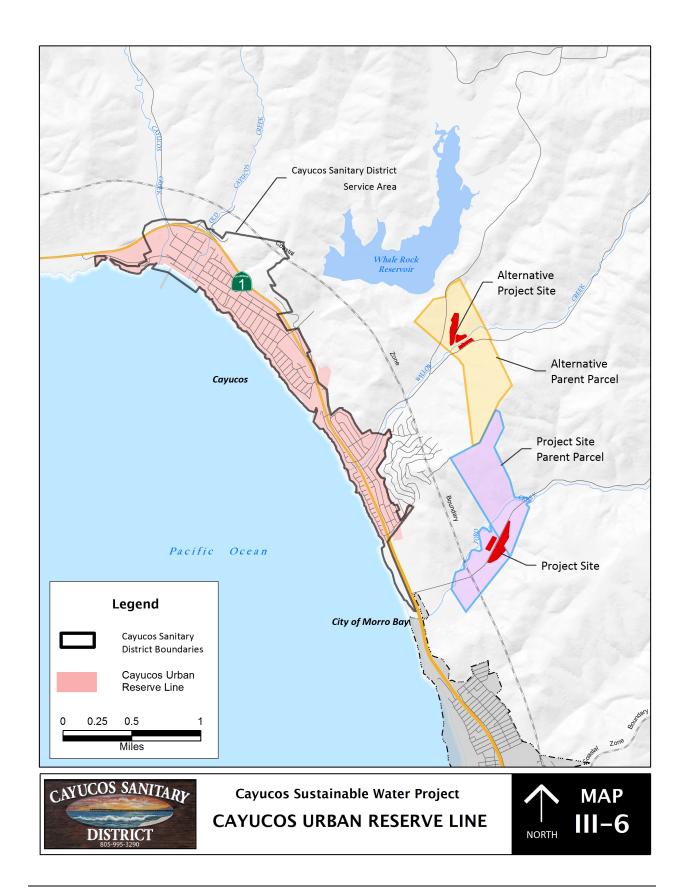
Cayucos has some businesses that provide retail and service uses to local residents, but it lacks major employers, large-scale manufacturing and industrial uses. Tourism and visitor-serving businesses are the most important sector of the local economy.

As shown in Table III-2 above, the San Luis Obispo Council of Governments estimates that the population within the Cayucos urban reserve line was 2,558 in 2015.

#### THE CAYUCOS SANITARY DISTRICT

The Cayucos Sanitary District (CSD) was formed in 1942 to provide sewer service to the unincorporated community of Cayucos. In 1954, the CSD constructed a sewer system and treatment plant under a joint powers agreement with the Morro Sanitary District (now City of Morro Bay). The plant ultimately was reconstructed in 1984 under a joint powers agreement. The CSD owns and holds capacity rights to 35% of the ocean outfall and sewage treatment plant and 40% of the land with the remainder being owned by the City of Morro Bay. The district collects wastewater from 2,592 service connections and transports it to the treatment plant in Morro Bay which has a peak dry-weather flow capacity of 2.36 million gallons. As of 2015 the district generates approximately 0.274 mgd of wastewater, or about 33.2 percent of its 0.826 mgd gallon entitlement. All of the treated effluent is discharged through the Morro Bay outfall.

As noted above, the service population for the CSD is estimated to be 2,558. It should be noted that the service area boundaries of the CSD cover an area that is slightly larger than the urban reserve line (URL) for the community of Cayucos (Map III-6). However, these areas consist primarily of antiquated subdivisions that are proposed for detachment from the District by the Local Agency Formation Commission (LAFCo). The CSD's *sphere of influence* (the area outside the current service boundary where the CSD will eventually extend services) includes areas along the coast, and north of State Route 1.



#### **CURRENT WATER SUPPLY AND DEMAND**

## **Urban Water Demand**

Water is supplied to the community of Cayucos by the Cayucos Area Water Organization (CAWO) whose members include Morro Rock Mutual Water Company (Morro Rock MWC), Paso Robles Beach Water Association (PRBWA), County Service Area 10A (CSA 10A), the Cayucos Cemetery District (CCD), and two landowners as shown on Map III-7. The combined groundwater and Whale Rock Reservoir surface water allocation for CAWO is 628 to 693 AFY, distributed as follows:

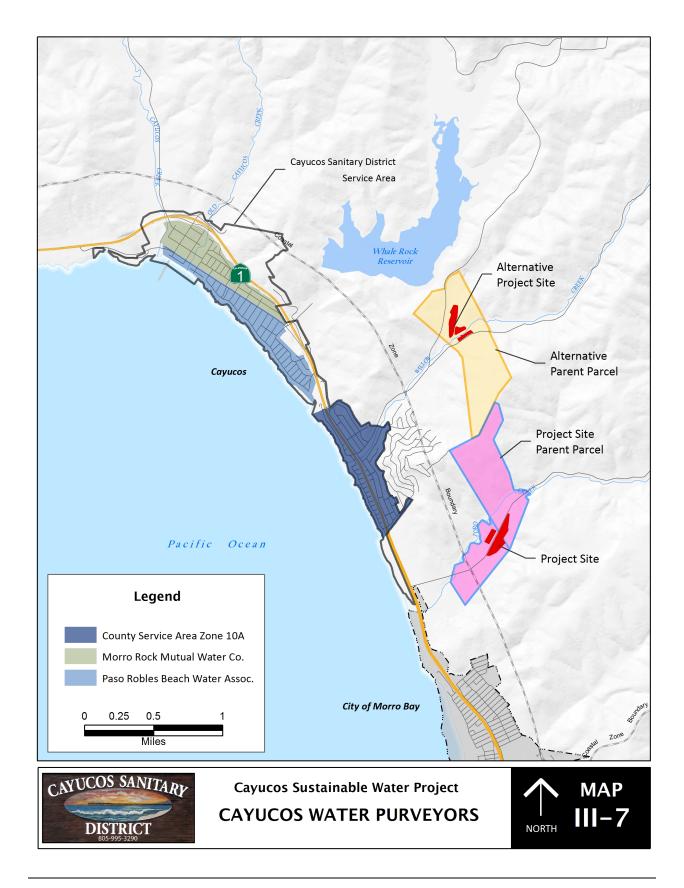
Table III-3 Cayucos Area Water Organization (CAWO) Water Supply and 2014 Deliveries (AFY)					
Member Agency Total Water Supply 2014 Deliveries					
Morro Rock Mutual Water Company	173 <sup>2</sup>	115			
Paso Robles Beach Water Association	222	150			
County Service Area 10A	215-280 <sup>3</sup>	112			
Cayucos Cemetery District 18 Unreported					
Total: 628 - 693 377					

# Notes:

- Source: Water System Usage forms: July 2012 June 2013; July 2013 June 2014, San Luis Obispo County Master Water Report, 2012, Table 4.56
- Includes 170 AFY from Whale Rock Reservoir, plus 3 AFY diverted for a school and park irrigation but up to 56
  AFY is the permitted diversion from Little Cayucos Creek underflow. 56 AFY is part of the 600 AFY safe basin
  yield for the Cayucos Valley Basin. Due to water quality, the remaining 53 AFY could be used for domestic supply
  following treatment.
- CSA 10A has procured 25 90 AFY of Nacimiento Water Project via exchange with City of San Luis Obispo for Whale Rock Reservoir water. Agreement provisions allow for up to 90 AFY of NWP if necessary. Nacimiento water could be delivered to Morro Rock MWC or Paso Robles Beach Water Association, as part of this arrangement.

For the area below the reservoir, dam underflow may provide a source of recharge. Water agreements limit the amount of groundwater available to the members of CAWO and downstream landowners in Old Valley to the available sources.

CSA 10A has procured an additional entitlement of 25 AFY of water from the Nacimiento Water Project. This water will be taken from Whale Rock Reservoir in an exchange agreement with the City of San Luis Obispo. The agreement allows up to 90 AFY to be exchanged. Nacimiento Water Project water could be delivered to Morro Rock MWC or Paso Robles Beach Water Association as part of this arrangement.



# **Agriculture and Agricultural Water Demand**

The level portion of the Project Site contains about 35 acres of prime agricultural soils that have been cultivated with irrigated and dry-farmed crops since the 1960s. According to the County's 2012 Master Water Report, groundwater use from the Toro Valley groundwater basin has been estimated at about 520 AFY.

There are prime agricultural soils on the Alternative Site that have been irrigated for decades. The remainder of the site has been used for cattle grazing. There is no current estimate of groundwater pumping for the Willow Creek Valley.

# **SUMMARY OF BASELINE CONDITIONS AND ASSUMPTIONS**

Table III-4 provides a quantitative summary of baseline conditions and assumptions.

Table III-4 Summary of Baseline Conditions and Assumptions				
Wastewater CSD Dry Weather Flow	0.274 mgd All treated effluent is discharged through the Morro Bay outfall.			
Urban Population				
Cayucos/CSD Service Area	2,558			
City of Morro Bay	10.152			
Total:	12,710			
Current Water Demand				
Urban – CAWO	376.9			
Agriculture – Toro Creek Valley	520 AFY			
Agriculture – Alternative Site	Unknown			
Irrigated Agriculture				
Project Site	+/- 12 acres			
Alternative Site	+/- 11 acres			

# D. CUMULATIVE ANALYSIS SCENARIO

The California Environmental Quality Act (CEQA) requires that an Environmental Impact Report (EIR) contain an assessment of the cumulative impacts that could be associated with the proposed project. According to State CEQA Guidelines Section 15130(a), "an EIR shall discuss cumulative impacts of a project when the project's incremental effect is cumulatively considerable." "Cumulatively considerable" means that the incremental effects of an individual project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects (as defined by Section 15130).

As defined in State CEQA Guidelines Section 15355, a cumulative impact consists of an impact that is created as a result of the combination of the project evaluated in the EIR together with other projects causing related impacts. A cumulative impact occurs from:

...the change in the environment which results from the incremental impact of the project when added to other closely related past, present, and reasonably foreseeable future projects. Cumulative impacts can result from individually minor but collectively significant projects taking place over a period of time.

In addition, Section 15130(b) sets forth the following elements for an adequate cumulative analysis:

- 1. Either:
- a. A list of past, present, and probable future projects producing related or cumulative impacts, including, if necessary, those projects outside the control of the agency; or,
- b. A summary of projections contained in an adopted general plan or related planning document, 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. Any such planning document shall be referenced and made available to the public at a location specified by the lead agency.
- 2. A definition of the geographic scope of the area affected by the cumulative effect and a reasonable explanation for the geographic limitation used;
- A summary of the expected environmental effects to be produced by those projects with specific reference to additional information stating where that information is available; and
- 4. 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.

Where a lead agency is examining a project with an incremental effect that is not "...cumulatively considerable...," a lead agency need not consider that effect significant, but shall briefly describe its basis for concluding that the incremental effect is not cumulatively considerable.

The analysis of cumulative impacts should highlight past actions that are closely related either in time or location to the project being considered, catalogue past projects and discuss how they have harmed the environment and discuss past actions even if they were undertaken by another agency or another person. Both the severity of impacts and the likelihood of their occurrence are to be reflected in the discussion.

"but the discussion need not provide as great detail as is provided for the effects attributable to the project alone. The discussion of cumulative impacts shall be guided by standards of practicality and reasonableness, and shall focus on the cumulative impact to which the identified other projects contribute rather than the attributes of other projects which do not contribute to the cumulative impact." 14 Cal Code Regs §15130(b).

The analysis of cumulative impacts must be of sufficient detail to be useful to the decision maker in deciding whether, or how, to alter the program to lessen cumulative impacts.

Cumulative impacts associated with the Project are discussed in each of the topical sections of this EIR along with the geographic scope of the analysis. This EIR employs both the "list of past, present, and probable future projects" approach as well as the "summary of projections" approach as summarized in Table III-5 and the List of Projects from the County of San Luis Obispo summarized on table III-6.

Table III-5 Approach To Cumulative Impact Assessment					
Impact Section	Approach Used to Assess Cumulative Impacts	Geographic Scope of Analysis			
Aesthetics and Visual Resources	Summary of Projections (land uses)	Toro Creek Valley Willow Creek Valley			
2. Agricultural Resources	Summary of Projections	County-wide			
3. Air Quality	Summary of Projections				
4. Biological Resources	List	Estero Area Plan area			
5. Cultural Resources	List	Estero Area Plan area			
6. Geology and Soils	List	Toro Creek Valley Willow Creek Valley			
7. Greenhouse Gas Emissions	List and Summary of Projections	County			
8. Hazards and Hazardous Materials	List	Toro Creek Valley Willow Creek Valley			
9. Hydrology and Water Quality	List	Watershed			
10. Land Use and Planning	List and Summary of Projections	Estero Area Plan North County Area Plan			
11. Noise	List and Summary of Projections	Toro Creek Valley Willow Creek Valley			
12. Transportation/Traffic	List and Summary of Projections	Cayucos and Morro Bay			

# **Definition of the Cumulative Setting**

A lead agency has a duty to use reasonable efforts to discover, disclose, and discuss related projects which are under the administrative jurisdiction of other city, state, and federal agencies. (See id. § 15130(b)(1)(A); San Franciscans for Reasonable Growth v. City & County of San Francisco (1984) 151 Cal.App.3d 61, 74, n.13.) With respect to cumulative impacts, a lead agency must evaluate related impacts from other "past, present, and reasonably-foreseeable probable future projects,

" and must identify feasible, enforceable, mitigation measures that could avoid or minimize the potentially significant impacts of a project, including cumulative impacts" (CEQA Guidelines, §§ 15126.4, 15355.).

In general, the cumulative setting considered in this EIR is based on:

- The Adopted General Plans of the County and the City of Morro Bay. The existing land use plans in the region.
- Development Projects. Consideration of proposed and approved development projects shown on Table III-6 is intended to describe projects from the recent past, present, and reasonably foreseeable future development activities in the region that, when considered with the CSWP, have the potential to have cumulatively considerable impacts. The list was distilled from the County of San Luis Obispo Department of Building tracking log for projects in Cayucos and vicinity at the date of the NOP. It is not intended to be an allinclusive list of projects in the region, for example small remodels and similar actions are not included.
- Background Growth. Consideration of background traffic volumes and patterns, background air quality conditions, and other associated environmental conditions that occur within the region, both within and outside the community of Cayucos, the Project Site and Alternative Site. Included in this category is the consideration of the effect of major land use activities in the region, ongoing agricultural activities, and the conversion of open space and agricultural lands resulting from existing development patterns.

Each topical section of this EIR includes a description of the geographic extent of the cumulative setting based on the characteristics of the environmental issue under consideration as set forth in Section 15130(b) of the State CEQA Guidelines. The area within which a cumulative effect can occur varies by resource. For example, air quality impacts tend to disperse over a large area, while traffic impacts are typically more localized. For this reason, the geographic scope for the analysis of cumulative impacts is identified for each resource area.

# Table III-6 Foreseeable Future Projects in Cayucos

Source: County of San Luis Obispo Department of Planning and Building

Land Use / Project type	Total units or Areas
Single family residences	83 new units
Multi-family residence	20 new units
Commercial uses	4,895 sf
Office uses	3,960 sf
Visitor Serving accommodations	New motel, 17 rooms
Recreational Use	Multi use path along SR1

# E. AREAS OF KNOWN CONTROVERSY

During the project initiation process discussed in the Project Description of this EIR, the CSD and consultants have met with a variety of interested or affected agencies to discuss constraints, policies and planning issues. The public hearings conducted on the initial project screening process, and comments received at the EIR scoping meeting, provided a forum for members of the public to comment on the process. The following issues of concern have been raised, however these concerns have not risen to the level of "controversy".

- · Noise and odor from the WRRF
- WRRF and pipeline impacts on cultural resources

# F. OTHER ENVIRONMENTAL DOCUMENTS/INCORPORATION BY REFERENCE

This EIR uses information and analyses derived from prior EIRs and adopted environmental compliance documents that are relevant to the consideration of environmental effects of the Project. The use of prior environmental documents is supported by Section 15148 of the State CEQA Guidelines regarding the use of citations and 15150 regarding incorporation by reference. In addition to materials cited, other environmental compliance documents have been used in this EIR and are incorporated herein by reference as if set forth in their entirety.

Final EIR for the Los Osos Wastewater Treatment Facility

# G. List of Abbreviated Terms

Abbreviation	Term
CEQA	California Environmental Quality Act
EIR	Environmental Impact Report
CSA 10	County Service Area 10
AFY	Acre feet per year
mgd	Million gallons per day
LUO	Land Use Ordinance
NOP	Notice of Preparation
CSD	Cayucos Sanitary District
WRRF	Water recovery and reuse facility

# H. References

California: 2010 Population and Housing Unit Counts 2010 Census of Population and Housing

Cayucos Sanitary District

Regional Water Quality Control Board, Central Coast Region, Water Quality Control Plan for the Central Coastal Basin June 2011

San Luis Obispo County Department of Planning and Building, Estero Area Plan, 2006

San Luis Obispo County Department of Planning and Building, North County Area Plan, 2014

San Luis Obispo County Department of Planning and Building, Coastal Zone Land Use Ordinance, Title 23 Of the County Code

San Luis Obispo County Department of Planning and Building, Land Use Ordinance – Inland, Title 22 of the County Code

San Luis Obispo County 2012 Master Water Report

San Luis Obispo County 2040 Population, Housing & Employment Forecast, 2014

San Luis Obispo Local Agency Formation Commission Sphere Of Influence Update & Municipal Service Review Cayucos Special Districts, January 2015

# A. GEOLOGY AND SOILS

# 1. Environmental Issue

This section describes the Geologic and Soil conditions present within the Project site and environs that have potential to adversely impact the Proposed Project.

# 2. Sources Used In This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications including:

San Luis Obispo County, 1999, Safety Element, San Luis Obispo County General Plan: Department of Planning and Building, San Luis Obispo County; December 1999.

San Luis Obispo County, 2016, *Tsunami Emergency Response Plan*: Office of Emergency Services, San Luis Obispo County; original date October 2005, latest revision April 2016 with inundation maps, 113p

California Geological Survey, 2002, *Guidelines for Geologic Investigations of Naturally Occurring Asbestos in California*: Special Publication 124, edited by Clinkenbeard, J.P., Churchill, R.K., and Lee, K., 85 p.

California Geological Survey, 2016a, *Preliminary geologic map of the Cayucos* 7.5' quadrangle, San Luis Obispo County, California: version 1.0 by M. Delattre, map scale 1:24,000.

California Geological Survey, 2016b, *Preliminary geologic map of the Morro Bay North 7.5'* quadrangle, San Luis Obispo County, California: version 1.0 by M.O. Wiegers, map scale 1:24,000.

A complete list of references is provided at the end of this section.

# 3. Scoping Issues for Geology and Soils

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. No issues related to Geology and Soils were raised.

# 4. Environmental and Regulatory Setting

# Regulatory Setting

# **California Building Code**

The current version of the California Building Code (CBC) is the 2013 edition. It is anticipated that the 2016 edition of the CBC will be adopted by local agencies, including the County of San Luis Obispo, in 2017. The CBC contains general building design and construction requirements relating to fire and life safety, structural safety, and access compliance. CBC provisions provide minimum standards to safeguard life or limb, health, property and public welfare by regulating and controlling design, construction, quality of materials, use and occupancy, location and maintenance of all buildings and structures and certain equipment. The CBC also includes definitions of seismic sources, site soil types and the procedure to calculate seismic forces on structures.

# Surface Fault Rupture and the Alguist-Priolo Earthquake Fault Zoning Act

Inspired by the damaging effects of the 1971 San Fernando Earthquake, the State of California promulgated the Alquist-Priolo Special Studies Zone Act in 1972 (currently the Alquist-Priolo Earthquake Fault Zoning Act of 1972). This Act regulates development of buildings for human occupancy near known active faults through the Alquist-Priolo Special

Studies Zone Act. "Fault-Rupture Hazard Zones" (formerly "Special Study Zones") have been established around known active faults by the California Division of Mines and Geology (Bryant and Hart, 2007). CEQA makes reference to the Act, and concludes that a project will have a significant impact on the environment if it will "Expose people or structures to potential substantial adverse effects, including the risk of loss, injury or death involving 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".

# **Seismic Hazards Mapping Act**

Prompted by damaging earthquakes in northern and southern California in the 1980s, the State adopted the Seismic Hazards Mapping Act in 1990. The purpose of the Act is to protect public safety from the effects of strong ground shaking, liquefaction, landslides, or other ground failure, and other hazards caused by earthquakes. The Act requires the State Geologist to delineate seismic hazard zones, which is currently an ongoing program. The Act does not apply directly to the Project because seismic hazard zones have not yet been delineated in the Project area. However, the Act led to establishment of guidelines for evaluating seismic hazards (other than surface fault rupture). The guidelines, originally summarized in CGS Special Publication 117 and later revised in Special Publication 117A (CGS, 2008), provide industry-standards for evaluating and mitigating seismic hazards. Further, the standards are generally incorporated into the County's guidelines (see Local Geology Guidelines below).

# **Surface Mining and Reclamation Act**

The Surface Mining and Reclamation Act of 1975 (SMARA) requires the State of California to prepare an inventory and classify selected mineral resources within the State. Areas are classified into Mineral Resource Zones (MRZ) based on the occurrence and availability of mineral resources. The information is intended to inform local agencies regarding the planning and development of lands that contain significant mineral resources.

# **Geology Guidelines, San Luis Obispo County**

The hillside areas east of Cayucos are subject to moderately to high landslide risk according to the County of San Luis Obispo Safety Element, and are designated a Geologic Study Area (GSA) by the County. Section 22.14.070 of the County Inland Land Use Ordinance and Section 23.07.080 of the Coastal Land Use Ordinance require land use permit applications within a GSA be accompanied by a geology and soils report prepared by a certified engineering geologist and/or registered geotechnical (soils) engineer. Guidelines for information necessary for approval of reports submitted to the County are provided in "San Luis Obispo County Guidelines for Engineering Geologic Reports" (originally prepared 2005, updated October 2013).

# Air Pollution Control District, San Luis Obispo County

California law places the primary responsibility of controlling air pollution at the local level. The County's Air Pollution Control District (APCD) is the local agency tasked with enforcing rules and regulations pertaining to air quality. The state Air Resources Board has identified asbestos as a toxic air contaminant, and serpentine rock is a known source of naturally occurring asbestos. Serpentine rock is located in many regions of San Luis Obispo County, including the Project area. Work in serpentine areas requires a District pre-approved dust control plan and may include asbestos air monitoring.

# **Environmental Setting**

Baseline geologic conditions were established for the Project through a review of documents, including published technical maps and reports, a screening-level engineering geologic investigation (Geoinsite, 2015); preliminary geotechnical assessment prepared for the Proposed Project (Toro Creek) site (Yeh, 2016), interpretation of stereoscopic aerial

photographs (1939, 1969, 1987, 1997) and online imagery; reconnaissance-level geologic mapping; and data evaluation.

The Project is located within the southwestern margin of the Santa Lucia Range in the California Coast Ranges. The Coast Ranges are characterized by northwest-trending, elongate mountain ranges separated by narrow valleys. Structurally, the Santa Lucia Range is cut by the Nacimiento fault, which separates the range into two different bedrock assemblages. To the northeast, the range is underlain by granitic and metamorphic basement rock of the Salinian block. To the southwest, including the Project area, the range is underlain by Franciscan Complex melange. Landslides also are present within the Franciscan Complex and serpentinite rocks in the area.

The distribution of geologic units in the Project vicinity is in their Technical Appendix based on review of published geologic maps and site reconnaissance. Geologic units present in the Project area are described below in order of ascending age (youngest unit listed first).

**Beach and Dune Sand Deposits (Qs) –** Coastal sand deposits are characterized as unconsolidated, beach and dune sand (Holocene). This unit is present along the beach from Estero Bay northward along the coastline. The existing Morro Bay-Cayucos WWTF outfall is located in the beach and sand dune deposits. These deposits are generally considered highly susceptible to liquefaction due to relatively low density, cohesion-less nature and association with shallow ground water conditions.

**Alluvium (Qal)** - Within the Project area, alluvium (Holocene) is generally present north of Morro Bay, between the coastal sand dunes and base of the west-facing hillsides, and in the stream valleys of Toro Creek, Willow Creek and Old Creek. The alluvium consists of stream deposits, and is characterized as unconsolidated accumulations of cobbles, pebbles, sand, and silt. Included with the Qal map unit are alluvial fan deposits, which generally consist clay, sand and gravel deposited at the mouths of hillside drainages. The Proposed Project and Alternative sites and the effluent-to-outfall pipeline are located within alluvium.

Landslide Deposits (QIs) - Landslide deposits (Pleistocene and Holocene) are present locally on hillslopes in the Project area. Landslide types identified in the Project area include, but are not limited to debris flows, rockslides, rock falls, rock and soil slumps and rock-block slides. Landslide deposits vary from unconsolidated mixtures of soil and rock debris to semi-coherent blocks of rock, depending on the style, velocity and age of slope movement. The most significant landslide deposits to the Project are located on the southeast slopes of Toro Creek Valley, on both sides of Willow Creek Valley east of SR1, and on the hillside east of Old Creek Valley, downstream from Whale Rock Reservoir Dam.

Marine Terrace Deposits (Qtm) - Marine terrace deposits (Pleistocene) are former beach deposits that now lie on elevated benches to the east of the modern beach level, and consist of loosely consolidated, locally cemented sand and gravel. Lift Station 5, and much of the Phase 2 recycled water pipeline to CSA 10, are located within mapped terrace deposits.

**Tertiary-Age Sedimentary Rock Units (Tps, Tpe, Tm, Trt, Tv) -** Tertiary-age sedimentary rock units in the region include the Pliocene to Miocene-age Edna and Squire Members of the Pismo Formation (Tps and Tpe), Miocene-age Monterey Formation (Tm), lower Miocene to Oligocene-age Rincon Formation tuff and sandstone (Trt), and Oligocene-age Vaqueros Sandstone (Tv).

**Unnamed Sandstone (Ks) -** This Cretaceous to Jurassic-age sedimentary rock unit is described as being a feldspathic graywacke or arkosic wacke sandstone and interbedded micaceous shale and siltstone. The unit is thick-bedded, and generally strong.

Franciscan Complex metavolcanics (KJfv) and mélange (KJfm) - Within the project vicinity, the local hillsides are composed of Cretaceous or Jurassic-age Franciscan Complex melange and metavolcanics. The Franciscan metavolcanics primarily consist of

metamorphosed basalt and diabase with localized, extensively sheared zones. The mélange is a pervasively sheared graywacke and claystone, with exotic clast inclusions, including graywacke (gw), shale (sh) and chert (ch). The mélange typically weathers to a highly expansive soil at the ground surface, and is prone to soil creep, slope instability, and landsliding.

**Toro Formation (KJt)** - The Toro Formation is a Lower Cretaceous to Upper Jurassic sedimentary rock unit consisting of thinly stratified, interbedded shale or claystone and sandstone.

**Serpentinite (Jsp)** - Serpentinite belonging to the Jurassic-age Coast Range Ophiolite is present as generally northwest-trending, elongated bodies of sheared serpentine and ultramafic rock which are present along fault zones in the region.

#### **FAULTS**

The California Central Coast region is characterized by transpressional deformation between the San Andreas fault zone (SAFZ) to the east and the San Gregorio–San Simeon–Hosgri system of offshore and near-coastal faults to the west. The Project is located in the "Los Osos Domain", which consists of northwest-striking reverse, oblique, and strike-slip faults that border uplifted blocks and subsiding basins within the domain (Geoinsite, 2015). The northwestern portion of the Los Osos Domain is bounded by the Hosgri-San Simeon-San Gregorio fault on the southwest and the Oceanic-Huasna fault zone on the northeast. Other significant faults in the vicinity of the sites include the Cambria and Los Osos faults. The Cayucos fault, which crosses the project area, is considered to be a pre-Quaternary fault and not a source of future earthquakes (Jennings and Bryant, 2010).

Major faults in the project vicinity are described in detail in the Technical Appndix..

# **SEISMIC (EARTHQUAKE) CONDITIONS**

Historically, large-magnitude (>6.0) earthquake activity in the project vicinity is generally sparse, as depicted on the Regional Seismicity Map (Figure 3). Micro-earthquake activity west of the San Andreas fault zone is concentrated in several areas: (1) within the Santa Lucia Range, (2) west of the San Simeon area (offshore); (3) along and east of the Hosgri fault zone within the western Los Osos Domain; and (4) in the southwestern offshore region, west of Pt. Arguello (Hardebeck 2010). A dense cluster of earthquakes along the Santa Lucia Range contains primarily aftershocks from the 2003 M<sub>W</sub> 6.5 San Simeon earthquake.

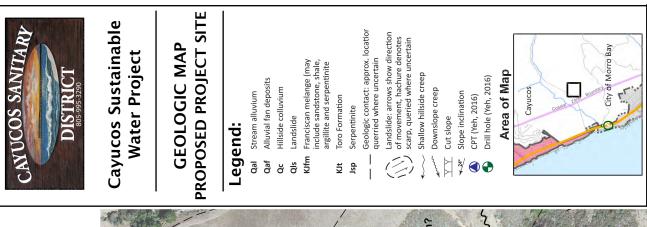
The San Simeon earthquake, centered approximately 34 km northeast of the study area, is the largest event recorded in the Central Coast region since the 1927  $M_W$  7.2 Lompoc earthquake, which was located further away, in the southern offshore region southwest of Point Conception.

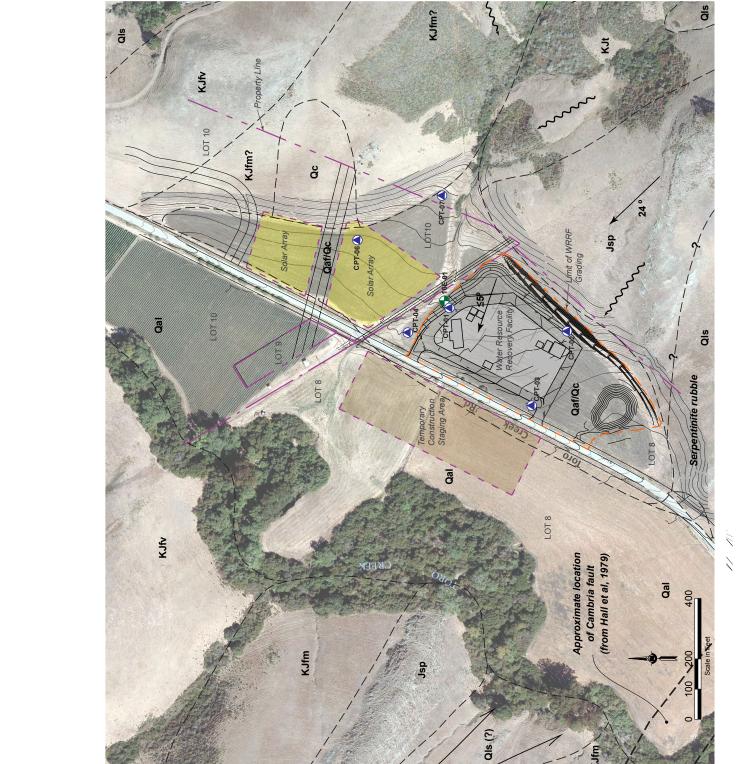
## **GEOLOGY AT PROJECT SITE AND ALTERNATIVE SITE**

The geologic conditions at the Proposed Project and Alternative sites are depicted on Maps IV-A1 and IV-A2. Yeh and Associates performed a preliminary geotechnical assessment of the Proposed Project site, and much of the following description is based on their report (Yeh, 2016). Additional site geology information is based on the screening-level evaluation by Geoinsite (2015) and reconnaissance-level observations conducted for this study.

## **Proposed Project Site**

The Proposed Project site is located in the Toro Creek drainage, at the base of a northwest-facing hillside and about 400 feet southeast of the Toro Creek channel The elevation of the site is approximately 80 to 120 feet above sea level.





NORTH



# Cayucos Sustainable Water Project

# **ALTERNATIVE PROJECT GEOLOGIC MAP**

# Legend:

Parcel Boundary

KJfm

KJfm

- QalStream alluviumQafAlluvial fan deposits
- Hillside colluvium ŏ
  - Landslide Sis Sis
- KJfm Franciscan melange (may include sandstone, shale, argillite and serpentinite

Creek

Shallow earth slumps and flows

Jsp

PIO

Serpentinite

Jsp

— Geologic contact: approx. location querried where uncertain

Landslide: arrows show direction of movement, hachure denotes scarp, queried where uncertain

Shallow hillside creep

Area of Map

KJfm









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The site is located on an alluvial fan emanating from a hillside drainage ravine at the base of a steep hillside. The drainage ravine transitions to a shallow gully across the property. The slope gradient on the hillside upslope of the site is approximately 20 to 30 degrees (about 35 to 60 percent inclination), and the slope gradient on the site is generally less than 5 degrees (less than about 9 percent inclination).

The site is underlain, at depth, by serpentinite and Franciscan melange bedrock. The bedrock is overlain by a thick sequence of surficial materials. Yeh and Associates performed field exploration consisting of seven (7) cone penetrometer (CPT) soundings and one boring at the Project Site in April 2016 (Yeh, 2016). The CPT soundings were advanced to depths of 30 to 73 feet below the ground surface. The boring was drilled to a depth of 50.5 feet below the ground surface. Interbedded alluvium and colluvium were encountered, which were not differentiated for the purpose of geotechnical characterization. The materials consisted of clay with varying amounts of sand and gravel. Geotechnical properties for the materials are presented in the Yeh (2016) report. Bedrock was not encountered in the subsurface exploration.

Ground water was encountered at a depth of 32 feet in the boring, and is estimated to vary from 22 to 32 feet in CPT soundings (Yeh, 2016). Ground water was not found in two of the CPT soundings. Ground water levels and soil moisture conditions will vary seasonally, and as a result of local runoff and streamflow, ground water pumping, irrigation and rainfall. A water well drilled in 2014 on Lot 8, approximately 750 feet southwest of the Project site and near the Toro Creek channel, encountered water at a depth of 18 feet (Cleath, 2015). The well was drilled to a depth of 80 feet and did not encounter bedrock.

The site is situated between two large landslide complexes. Surficial soils encountered at the site are considered expansive based on the general classification and one-dimensional swells tests (Yeh, 2016). Expansive soil conditions can cause differential movement and damage to foundations, slabs, flatwork and other improvements due to shrinking and swelling in response to moisture fluctuations. Various design provisions can be used to reduce the effect of expansive soil movement.

The central drainage channel conveys flow emanating from the upslope ravine and hillside. The drainage channel appears to have been modified in association with farming operations to reduce sheetflow and flooding of the adjacent fields (Yeh, 2016). The channel is about 4 to 6 feet in depth, and flows to a culvert beneath Toro Creek Road. The drainage channel should be considered in the design of the WRRF to prevent uncontrolled overflow, flooding and erosion impacts to the facility.

According to regional geology maps (Hall et al., 1979; CGS, 2016b), the site is located approximately 600 feet northeast of the potentially active Cambria fault. The Cambria fault zone is associated with serpentinite bodies located along an irregular linear trend. However, the precise locations of the fault traces in the immediate vicinity of the site are uncertain due to their concealment in Toro Creek Valley by overlying alluvium and landslide deposits. The site is located approximately 3,000 feet southwest of the inactive Cayucos fault, based on regional geologic mapping.

# **Alternative Site**

The Alternative site is located in Willow Creek Valley, and east of Whale Rock Reservoir. The elevation of the site is approximately 170 to 205 feet above sea level. The site is relatively level (graded terrace) and is used for grazing and farming.

The approximately 9-acre site is located about 400 feet upstream of the confluence of two stream channels, and is roughly V-shaped. A southwest-trending ridge separates the two

drainages until they merge at the site. The eastern limb of the site is within the Willow Creek drainage, and the western limb is within an unnamed tributary that roughly parallels Old Creek Road.

The Alternative site is situated on a fluvial terrace located between the two creeks and central ridge, and is underlain, at depth, by Franciscan Complex melange. Various rock types, including argillite, graywacke sandstone and serpentinite were observed on hillslopes in the vicinity of the property. The bedrock materials are overlain by up to at least 25 feet of alluvium deposited by the creeks, based on surface reconnaissance observations. The alluvium, which is crudely stratified with various amounts of clay, silt, sand and gravel, likely decreases in thickness in an upstream direction from the confluence.

Landslides are present locally in the Franciscan Complex rocks on nearby hillsides; however, none are mapped on the site or beyond the creeks bordering the site (Plate 6). Several landslide complexes, consisting of multiple, shallow, coalescing earth slumps and flows, are present on the east-facing hillside upslope (west) of Old Creek Road. In addition, two rock slumps are present on the flanks of the central ridge. All of the local landslides are within weak bedrock (melange or serpentinite).

The banks along the margins of both creeks are characterized by moderately steep to precipitous (near-vertical) slopes up to approximately 25 feet in vertical height. Local slope failures (creek bank slumps) were observed along both creeks in the vicinity of the site. Creek bank instability may have a potential for eroding or regressing into the site. However, no significant changes to the width of the creek channel are apparent on historical aerial photography, indicating generally long-term stability of the creek banks at that location.

Ground water conditions are unknown. No water was flowing in the drainages, and no seeps were observed from creek banks observed during our field reconnaissance. It should be anticipated that shallow, perched ground water conditions may develop seasonally in response to rainfall and flows in the creek channels.

Depending on the physical properties (e.g., density) of the alluvial materials, the site may be susceptible to liquefaction during times of shallow ground water and strong earthquake shaking. According to the County hazard map, the site is classified as having a Moderate potential for liquefaction.

No known active or potentially active faults underlie the site. The site is located approximately 3,000 feet north of the inactive Cayucos fault, based on regional geologic mapping (Hall et al., 1979; CGS, 2016b).

#### **Pipelines**

The project pipelines will cross a variety of geologic units. In addition, certain pipeline segments will cross potential geologic hazards, as described in the following sections.

The influent pipeline from Lift Station 5 to the Proposed Project site will involve construction of a force main pipe along Toro Creek Road. A second pipe conveying treated wastewater from the Proposed Project site to Lift Station 5 will parallel the influent pipeline. Both pipelines will cross Toro Creek at the existing bridge site, but will not be attached to the bridge, thus direct impacts to the bridge would not occur.

The pipeline section between Toro Creek and the WRRF is underlain by alluvium. Toro Creek Road along this section also closely follows the downslope edge of a massive landslide deposit that consists, in part, of displaced serpentinite rock. From Toro Creek westward to Lift Station 5, the pipelines mostly will be in Franciscan Complex melange. Serpentinite was observed immediately west of the Toro Creek crossing. Lift Station 5 appears to be underlain by Pleistocene marine terrace deposits.

The Lift Station 5 to Proposed Project site pipelines will cross the mapped (concealed) trace of the potentially active Cambria fault, roughly midway between Toro Creek and the WRRF. The precise location of the Cambria fault trace is uncertain due to concealment by overlying alluvium and landslide deposits in Toro Creek Valley.

The existing force main south of Lift Station 5 is underlain by Pleistocene marine terrace deposits, a short section of Cretaceous sandstone, and alluvium. The new force main route is primarily underlain by alluvium, and a possible section of Franciscan Complex melange just north of the Highway 41/Atascadero Road intersection. The existing outfall appears to extend into modern beach sands.

The SR1 to Lift Station 5 segment also crosses the mapped (concealed) trace of the potentially active Cambria fault, near the intersection of Willow Creek Road and SR1. The precise location of the Cambria fault trace is uncertain due to concealment by overlying marine terrace deposits.

A force main pipeline conveying recycled water will be constructed from either the Proposed Project or Alternative Site to the CSA 10 Water Treatment Facility in Cayucos, where the pipeline will be capped. The Proposed Project route would run west on Toro Creek Road then north along SR1 in the CSD easement in the right of way to Chaney Street, then run along Ocean Blvd. past the cemetery, crossing the existing footbridge over Old Creek to the CSA 10 site. The Alternative Project route would run southwest on Willow Creek Road, then follow the same route northward to the CSA 10 site.

The Phase 2 recycled water pipeline will run parallel to either the Proposed Project or Alternative pipelines in Toro Creek or Willow Creek valleys, respectively. The section along SR1, Chaney Street and Ocean Boulevard primarily is underlain by marine terrace deposits. The northern terminus and CSA 10 site are underlain by alluvium. Landslides are present locally along the hillsides upslope from the route.

The Phase 2 pipeline will cross the mapped (concealed) trace of the potentially active Cambria fault, near the intersection of Willow Creek Road and SR1. The precise location of the Cambria fault trace is uncertain due to concealment by overlying marine terrace deposits.

The Alternative site will be accessed by a clear span bridge across Willow Creek. Conveyance pipelines will be attached to the proposed access bridge across the creek. The influent and treated wastewater pipelines will also cross Willow Creek and an ephemeral drainage on Old Creek Road. The specific design and method of the bridge and creek crossings will be determined during the design phase of the project. For this alternative, a third pipeline will convey tertiary-treated water from the WRRF to a proposed agricultural storage pond on the property.

The proposed bridge and near-property pipelines will be underlain primarily by alluvium. Much of the pipeline route between the Alternative site and SR1 also are underlain by alluvium, but also intervals of Franciscan Complex rock (melange, metavolcanic) and serpentinite. The route also crosses a mapped landslide approximately midway between the site and SR1. From SR1 southward to Lift Station 5, the pipeline route is underlain by Pleistocene marine terrace deposits.

# 5. Standards of Significance

In accordance with the California Environmental Quality Act (CEQA), the effects of a project are evaluated to determine if they will result in significant adverse impact on the environment. The criteria used to determine the significance of an impact to geology are based on the initial study checklist in Appendix G of the CEQA Guidelines. Accordingly, geology impacts resulting from the proposed project are considered significant through application of the following thresholds of significance:

# Would the project:

- Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:
  - 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?
  - Strong seismic ground shaking?
  - Seismic-related ground failure, including liquefaction?
  - Landslides?
- Result in substantial soil erosion or the loss of topsoil?
- Be located on a geologic unit or soil that is unstable, or that would become unstable because of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?
- 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?
- 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?

# 6. Impacts Found to Be Less Than Significant

The following geologic conditions were evaluated in the Initial Study and determined to have a Less than Significant Impact on the Project. Consequently, no specific mitigation measures are required.

Soils Incapable of Adequately Supporting the Use of Septic Tanks or Alternative Waste Disposal Systems: The Project does not involve the installation of septic systems or leach fields. Therefore, there is no impact associated with waste disposal.

Loss of Mineral Resources: According to the State's Mineral Land Classification for the region, the Project area is classified as MRZ-3, which is defined as areas containing known or inferred aggregate resources of undetermined mineral resource significance (Miller et al., 1989; Busch and Miller, 2011). Sources of construction aggregate deposits may be potential mineral resources in the region. However, no specific locations have been identified as known mineral resources within the Project area according to the Mineral Land Classification for the region.

There are no known construction aggregate sites currently permitted or planned within the limits of the Project. There are no other known mineral resources or resource extraction sites that will impact or be impacted by the Project. Therefore, there is no impact associated with loss of mineral resources.

# 7. Project Impacts and Mitigation Measures

#### **CONSTRUCTION AND OPERATION OF PROJECT**

The analysis of impacts and mitigation measures following is applicable to the Proposed Project and generally to the Alternate Site. The Alternate site does not have the same proximity to landslides but it does have proximity to area of potential creek bank instability.

Construction of the WRRF and associated infrastructure will involve earthwork activities that will be further defined in construction documents according to geotechnical and civil

engineering standards and codes. The estimated earthwork volume at the Proposed Project site is 12,000 cubic yards; however, specific dimensions and depths of excavations and fills have not been provided. In addition, earthwork quantities for other project components have not been determined, but will likely include trenched excavations, drilling, and waterway crossings. Potential impacts from construction and operation of proposed WRRF sites and pipelines may result from the following geologic hazards: surface fault rupture; seismic ground shaking; seismic ground deformation, including liquefaction; landslides and slope instability; expansive soils; and naturally-occurring asbestos. It is anticipated that the potential impacts can be reduced to Less than Significant through appropriate geotechnical investigation and analysis of site conditions for specific structures. Individual geologic impacts are analyzed in the following sections of this report, with mitigation measures presented for specific locations and conditions. As detailed following impacts will be mitigated by following the design criteria and construction recommendations provided in a design-level geotechnical report for project components.

**Impact GEO-1.** The geologic impact of site construction activities and operation is a significant impact that can be mitigated with appropriate mitigation measures (Class II).

**Mitigation Measure GEO-1.** Design-Level Geotechnical Investigation and Report: a geotechnical design investigation should be performed to provide final recommendations and geotechnical design criteria for specific project components, such as structures, foundations, pipelines, pump stations, loading conditions, excavations, grading, dewatering, drainage and other site work. The geotechnical design investigation should include additional field exploration for specific structures, and include testing and analyses as needed to provide a basis for design criteria and construction recommendations in accordance with local (County of San Luis Obispo) regulations and the applicable California Building Code (CBC).

As part of the geotechnical design investigation for the Project, creek crossings for pipelines should be investigated and evaluated with respect to the methods of crossings. If horizontal directional drilling methods (HDD) are proposed, then HDD feasibility investigations should be performed for each location where that method is being considered. The geotechnical design report shall include geotechnical design criteria for creek crossings, which may include recommendations for pipeline burial depths, methods of crossing, trench or trenchless design parameters, and lateral setbacks. Recommendations for specific crossings shall be incorporated into the Project plans and specifications prior to construction of the pipeline.

# **Surface Fault Rupture**

Movement along an active tectonic fault that intersects the ground surface can result in permanent ground displacements which may severely damage built structures. Faults are considered to be "active" if they display evidence of movement within Holocene time (the last 11,000 years), and "potentially active" if they display evidence of movement within Quaternary time (i.e., within the last 2.6 million years). The State of California regulates development near known active faults through the Alquist-Priolo Special Studies Zone Act. Fault-Rupture Hazard Zones (formerly "Special Study Zones") have been established around known active faults by the California Division of Mines and Geology (Bryant and Hart, 2007). Construction of structures for human occupancy are not permitted within a Special Study Zone until a site-specific geologic study has been performed which concludes that a specific site does not lie on or across an active fault trace. The Project is not located within an Alquist-Priolo Fault-Rupture Hazard Zone.

Traces of the Cayucos and Cambria faults have been mapped in the Project area. The Cayucos fault is considered inactive, and the Cambria fault is considered potentially active. No fault traces have been mapped on the Proposed Project or Alternative sites.

Consequently, there is no impact for surface fault rupture associated with primary tectonic faulting for the Proposed Project and Alternative sites.

Proposed project pipelines cross the mapped trace of the Cambria fault at two locations: 1) Toro Creek Road roughly midway between Toro Creek and the Proposed Project Site, and 2) the intersection of SR1 and Willow Creek Road. The precise location of the Cambria fault trace is uncertain due to concealment by overlying alluvium and landslide deposits in Toro Creek Valley, and by marine terrace deposits along SR1.

Permanent ground displacements caused by surface fault rupture can pose a major hazard to the safety and operation of pipelines. When ground displacements associated with fault rupture occur along a fault that intersects a pipeline, they may break or severely damage the pipeline or associated. If fault rupture is distributed over a wider area, then the deformation may manifest as a zone of ground cracking with smaller amounts of offset on individual faults or fractures. There is no impact of surface fault rupture at the Proposed Project and Alternative sites.

The most common method of mitigating the hazard of primary surface fault rupture is to avoid active tectonic fault traces. However, due to the locations of critical infrastructure sites that will be connected via pipelines, certain pipeline sections will not be able to avoid crossing traces of the potentially active Cambria fault.

**Impact GEO-2.** The impact of surface fault rupture on certain pipeline segments is a significant impact that can be mitigated with appropriate mitigation measures (Class II).

**Mitigation Measure GEO-2A.** The geotechnical design investigation for the project (Mitigation Measure GEO-1) should include appropriate geologic fault evaluations of the Cambria fault to develop project-specific design parameters for pipeline sections crossing the fault. The fault evaluations should be directed towards, but not necessarily be limited to, defining the location and width of the fault zone at the pipeline-fault crossings. Since the fault traces are concealed beneath young geologic deposits, the fault zones may be difficult to define with precision. Consequently, fault zone widths should incorporate conservative assumptions for pipeline design.

Pipeline crossings of fault traces shall be designed to accommodate potential flexure and horizontal and vertical offsets based on the results of the geologic fault evaluations (Mitigation Measure GEO-2A). Fault rupture mitigation strategies for pipelines may include measures such as flexible connections, gravel trench backfill, double lined pipes, strengthened pipes, automatic shutoff valves and similar measures to prevent the release of product to the environment.

#### **Seismic Ground Shaking**

The project area is situated in an area of high seismic activity. It should be anticipated that the project structures will experience moderate and strong ground shaking that may be generated by earthquakes on any one of several major active and potentially active faults during the life of the project. The closest known major *active* fault to the Project sites is the Hosgri-San Simeon fault zone. Other nearby active or potentially active faults include the Cambria, Oceanic and Los Osos faults. In addition, the historically active San Andreas fault zone is located roughly 60 km from the project area.

Preliminary seismic data applicable to the new treatment plant at the Proposed Project site are provided in Yeh (2016). The Proposed Project site is classified as site class "D" based on penetration resistances recorded in the boring and CPT soundings (Yeh, 2016). This soil profile type corresponds to a stiff soil profile according to the California Building Code (CBC). Estimated ground motions at the Proposed Project site, corresponding to a 2 percent

probability of being exceeded in 50 years (statistical return period  $\approx$  2,475 Years), are tabulated below.

Table IVA-1: Estimated Seismic Ground Motions at Proposed Project Site (Yeh, 2016)

Hazard Level	Peak Horizontal	0.2 Second Period Horizontal Acceleration	1.0 Second Period Horizontal Acceleration
2% Probability of Exceedance in 50 years	0.48	1.183	0.658
Notes: All acceleration values in units of gra	avity(g) which is 32 ft	/sec <sup>2</sup> or 9.81 m/s <sup>2</sup>	

The seismic data provided by Yeh (2016) were estimated for use with the 2013 California Building Code (CBC). The 2016 CBC is expected to be adopted by local agencies, such as the County of San Luis Obispo, in 2017. Geoinsite (2015) performed a probabilistic assessment of earthquake shaking in the entire Project area for an earthquake event having a 2 percent chance of being exceeded in 50 years or a return period of 2,475 years. According to the U.S. Geological Survey's 2008 "Next Generation Attenuation" model (USGS, 2008), the anticipated peak ground acceleration in the Project area vary from 0.43g to 0.49g. The selected exceedance level is indicative of more critical facilities, and is a higher standard than the level typically used for less critical structures (e.g., residential structures).

**Impact GEO-3:** The impact of strong seismic shaking on project structures is a significant impact that can be mitigated with appropriate mitigation measures (Class II impact).

**Mitigation Measure GEO-3:** Project structures should be designed to resist lateral forces generated by earthquake shaking in accordance with the current building code, State pipeline safety standards and applicable design practice. The design-level geotechnical report (Mitigation Measure GEO-1) should include recommendations for seismic data for design that may be updated for the new code requirements, additional subsurface information, or further site-specific analyses. Appropriate seismic ground motion parameters should be estimated and incorporated into project design by the project engineer.

Compliance with applicable seismic design codes does not eliminate potential damage should a large earthquake occur during the operation of the Project. However, adherence to the appropriate seismic design and construction codes will mitigate the earthquake shaking effects to a less than significant level.

### **Liquefaction and Other Seismically Induced Ground Failures**

Liquefaction is a sudden loss of soil strength due to rapid increases in pore water pressures caused by seismic shaking. Liquefaction typically occurs during an earthquake in unconsolidated loose to medium dense sandy soils that are below the ground water table. The potential and severity of liquefaction will depend on the intensity and duration of the strong ground motion, the depth to ground water, the soil type, and terrain in the area where liquefaction occurs. Seismically induced settlement, collapse, or lateral spreads can occur in soils that are loose, soft, or that are moderately dense and weakly cemented, or in association with liquefaction.

Following the 2003 San Simeon earthquake, evidence of liquefaction was observed along the shorelines of Morro Bay and Cuesta Inlet. Liquefaction was manifested as sand that had ejected around the pilings that support the Baywood T-pier, numerous sand boils and mud volcanoes on the shore of Morro Bay mainly below the high-tide line, and lateral spreads, pipes, and fissures along the shoreline of Cuesta Inlet. The liquefaction appeared

to be constrained to near the shoreline, and did not appear to have seriously impacted the adjacent roadways or infrastructure such as may have been evidenced by cracks, fissures, or differential settlement. Evidence of liquefaction or differential seismic settlement at the higher elevations was not observed, as these areas were located away from the shoreline.

The Safety Element of the San Luis Obispo County General Plan (1999) identifies areas where the potential for liquefaction should be evaluated based on mapping of geologic formations that may contain soil types susceptible to liquefaction. Within the Project area, the Safety Element identifies geologic units such as beach sand, dune sand, and younger alluvial deposits as having a high potential to contain sediments that may be prone to liquefaction. Based on review of geologic maps, portions of the Project structures are underlain by geologic units that may contain sediments susceptible to moderate liquefaction potential. Liquefaction hazard zones in the Project area are depicted on Map IVA-3 Liquefaction Hazard Areas. The liquefaction potential categories are described below:

- Very High. Groundwater has been encountered within about 10 feet of the ground surface, soil units previously encountered are loose and vulnerable to liquefaction.
- High. Groundwater is present within about 50 feet of the ground surface and previous explorations suggest sediments are loose and prone to liquefaction. The depth of potentially liquefiable material may be limited or near the groundwater table.
- Moderate. Groundwater is present within about 50 feet of ground surface, and previous
  explorations suggest sediments are medium dense and prone to liquefaction, or
  geologic units may contain sediments susceptible to liquefaction.
- Low. Groundwater likely not present within 50 feet of ground surface or sediments in this vicinity were previously evaluated and found to be dense and have a low potential for liquefaction.
- Very Low. Bedrock or formation units that are not considered vulnerable to liquefaction.

In places where pipelines or other Project facilities are in part located on potentially liquefiable soils and in part on non-liquefiable soils, liquefaction may result in large vertical movements from differential settlement of the foundation soils. These large differential movements may cause breakage or leakage of the pipeline contents and/or damage to Project facilities.

In addition to liquefaction, seismic ground failure can include lateral spreading and seismic densification, which can result in the loss of foundation support for structures.

Lateral spreading is a phenomenon associated with strength loss following liquefaction and the presence of a free face, such as an unsupported creek bank. Lateral spreading involves the lateral movement of a liquefied soil layer (and overlying layers) toward the free face. Based on the presence of potentially liquefiable materials and incised stream channels, there is a potential for lateral spreading to occur on the Alternative site. Further investigation is needed to quantify the amount of liquefaction and lateral spreading at the Alternative site.

Seismic densification is caused by earthquake-shaking induced densification or compaction of loose to medium-dense granular soils. The densification can result in settlement of the ground surface and local differential settlement that may damage foundations and structures, and pipelines. The potential for seismically induced settlement to occur is controlled by the intensity and duration of ground shaking, and the relative density (the ratio between the in-place density and the maximum density) of the subsurface soils. In general, young alluvial sediments in the Project area are potentially subject to seismically-induced settlement. Where the pipeline or above-ground facilities straddle deposits of loose to



# Cayucos Sustainable Water Project

## LIQUEFACTION HAZARD AREAS

## Legend:

## Symbols

## Very Low























DPR connection point

Interceptor tie-in/pump station

- NOTES:
  Geologic units and hazard zones are from SLO County GIS website
  Locations of project components are from Firma Consultants (2016)



## IV. A Geology Page IV-A15

medium dense granular sediments and dense soils or bedrock large, potentially damaging differential settlements may occur and adversely impact the Project. Subsurface geotechnical investigations typically address the potential for seismically induced settlement on a site-specific basis.

The Proposed Project site is classified as Class D based on the subsurface conditions encountered and is not considered vulnerable to liquefaction or loss of strength in response to the design earthquake (Yeh, 2016). However, the Alternative site and sections of proposed pipelines are underlain by potentially liquefiable sediments with a Moderate susceptibility classification based on regional information.

**Impact GEO-4.** The impact of seismically-induced ground failures, including liquefaction, lateral spreading and seismic densification, is a significant impact that can be mitigated with appropriate mitigation measures (Class II).

**Mitigation Measure GEO-4.** The design-level geotechnical report (Mitigation Measure GEO-1) should include evaluations of liquefaction potential and estimated liquefaction-induced settlement based on field exploration, testing and analysis of site conditions for final project components (WRRF and pipelines). The potential effects of other seismically induced ground failures should also be evaluated, including lateral spreading and seismic densification. Engineering design measures should be provided where estimated ground deformations exceed typical foundation and structural design parameters.

The liquefaction, lateral spreading and seismic settlement evaluations should be conducted in accordance with guidelines published by the California Geologic Survey (formerly the California Division of Mines and Geology) and relevant local and professional standards. At a minimum, the liquefaction hazard evaluation and mitigation study should be undertaken in a manner consistent with the Guidelines for Evaluation and Mitigation of Seismic Hazards in California, Chapter 6, Analysis of Liquefaction Hazards (CGS Special Publication 117A, 2008).

#### Landslides and Slope Instability

Landslides are displaced blocks or masses of soil and rock that have separated from their original location on a hillside and been transported downslope by falling, sliding or flowing. Landslides can involve shallow movement of soil or colluvium, or deeper movement of the underlying bedrock. In addition to natural factors, human activities can initiate landsliding by improper grading, excessive watering, removal of natural vegetation, and disruption of natural drainage.

Landsliding in the Project area is a common occurrence on slopes underlain by serpentinite and Franciscan Complex melange. Numerous landslides were observed in the Project area. The Safety Element of the San Luis Obispo County General Plan (1999) identifies areas of relative landslide potential based on the distribution of geologic formations. Within the Project area, the geologic units considered to have the highest landslide hazard potential are existing landslides ("Very High" potential) and weak geologic units such as serpentinite and Franciscan Complex melange ("High" potential). Geologic units with the lowest hazard potential are young valley fill and coastal sediments, including alluvium, terrace deposits and beach sand.

Several very large, ancient landslide complexes are present on the hillsides in the Toro Creek drainage area. It can be expected that the landslide complex may experience renewed movement in the future. The Proposed Project site is not underlain by a known landslide, but it is situated between two identified landslide complexes.

Certain pipeline sections cross mapped landslides or are located near the downslope margins of mapped landslides, which have a "Very High" potential for slope movement according the County's landslide hazard potential map. Slope movements that affect pipelines could result in a pipeline leak or rupture.

**Impact GEO-5.** The impact of landsliding and slope instability is a significant impact that can be mitigated with appropriate mitigation measures (Class II).

**Mitigation Measure GEO-5.** The design-level geotechnical report (Mitigation Measure GEO-1) should include evaluations of landsliding, creek bank instability and other types of slope instability settlement based on field exploration, testing and analysis of site conditions for final project components (WRRF and pipelines). The potential impact of slope instability on the construction and operation of the WRRF should be evaluated as part of the geotechnical design investigation and report (Mitigation Measure GEO-1). Mitigation measures to reduce the potential for damage due to slope movement should be developed for the depths and types of slope movements that may impact the pipelines at the locations identified in the landslide evaluations.

#### **ALTERNATIVE SITE**

Creek bank instability potentially affects the Alternative site, which is situated adjacent to incised creek channels with high (locally up to 25 feet in height), steep to near-vertical creek bank slopes. Creek bank slumps were observed at several locations in the drainages, indicating past instability. Depending on further study, some form of mitigation may need to be incorporated into project design to reduce to the potential for bank instability from encroaching on the built facilities. Possible mitigation measures, if necessary, may include construction setbacks, slope stabilization, or protective measures to assure long-term stability of site structures. The future behavior of the creek banks should be assessed further in the design-level geotechnical study for the Alternative site, if it is selected for the WRRF.

#### **Soil Erosion**

Erosion and associated loss of topsoil is a natural process that can occur as a result of wind or water or both, and it can be affected by man's activities including construction activities. Active erosion has been observed in the Project area and for discussion purposes can be divided into hillside erosion and stream erosion, including scour. Hillside erosion typically occurs in steep hillside terrain and in areas disturbed by man's activities or other natural slope processes. Stream erosion and channel scour occur within existing drainage courses and can include vertical as well as lateral migration and scour.

Project construction and related activities during the construction phase can have a significant impact on erosion. Construction-related erosion can occur as surface erosion and also as trench erosion. Surface erosion occurs within and adjacent the disturbed area (construction right-of-way, temporary work areas, contractor and pipe laydown yards, access roadways, etc.). Trench erosion is a form of subsurface erosion that can occur within and along the trench excavation for the pipeline. In extreme cases, trench erosion and seepage along the pipeline trench can lead to "piping failures" or the progressive mobilization of finegrained soils in the trench producing voids, sinkholes and otherwise failure of the trench backfill. Surface and subsurface flow along the pipeline trench also can adversely affect local slope stability triggering reactivation of landslide deposits or causing new landslides. Also, if construction occurs during the rainy season, erosion can have a significant impact on the project construction activities.

Erosion processes common to the Project area prior to construction are likely to continue through the operation phase of the Project, and in some cases erosion associated both with streams and hillside areas have a high potential to impact the Project, primarily the pipelines. Construction activities can result in erosion during as well as after the construction phase,

extending into the operation phase of the Project. Additional discussion of impacts related to erosion is contained in section IV-D Drainage. Flooding and Water Quality.

**Impact GEO-6.** The impact of soil erosion and loss of topsoil due to construction and operation of Project components is a significant impact that can be mitigated with appropriate mitigation measures (Class II).

**Mitigation Measure GEO-6.** An Erosion Control Plan (ECP), including elements of a Storm Water Pollution Prevention Plan (SWPPP), should be prepared by a geotechnical or civil engineer, consistent also with Mitigation Measure WQ-3. The ECP and SWPPP would describe measures intended to reduce erosion and deposition in to local creeks and the Pacific Ocean.

#### **Expansive Soils**

Surficial soils encountered at the Proposed Project Site are considered expansive based on the general classification and one-dimensional swells tests (Yeh, 2016). In addition, portions of proposed pipeline routes are underlain by rock types known to generate expansive soils (serpentinite and melange). Consequently, there is a high potential for expansive materials to underlie a significant portion of project locations. Due to the mostly granular nature of the stream alluvium that appears to underlie the Alternative Site, there is a low potential for a significant amount of expansive materials at that site.

Expansive soil conditions can cause differential movement and damage to foundations, slabs, flatwork and other improvements due to shrinking and swelling in response to moisture fluctuations. Various design provisions can be used to reduce the effect of expansive soil movement. These include increasing the depth of shallow foundations into soil less prone to moisture fluctuations, placing a mat of non-expansive soil (typically sand) below slabs and flatwork, chemical treatment using lime or cement to reduce the expansion potential below pavement or slabs, providing positive drainage away from foundations and flatwork, providing liners and drainage provisions below planters, connecting roof gutters and downspouts that direct runoff away from buildings, and providing additional reinforcement within foundation and floor slabs to better accommodate movement associated with heaving and swelling movements of the soil.

**Impact GEO-7.** The impact of expansive soils on Project components is a significant impact that can be mitigated with appropriate mitigation measures (Class II).

**Mitigation Measure GEO-7.** Testing of samples in a geotechnical laboratory is the standard method of quantifying the expansibility of materials, and should be performed as part of design-level geotechnical studies for the selected WRRF site and pipeline routes (Mitigation Measure GEO-1). If expansive materials are identified, then appropriate design and construction measures should be provided to mitigate the adverse effects. The design-level geotechnical investigation should provide specific recommendations to address expansive soil conditions for the design of foundations, flatwork, pavement, pipelines and other site work.

### **Naturally Occurring Asbestos**

Naturally-occurring asbestos (NOA) is associated with ultramafic bedrock, including serpentinite, which is present in the Project area, both within the Franciscan Complex melange and along fault zones. Airborne asbestos, commonly associated with dust from disturbance of the naturally occurring asbestos minerals, is a health hazard. The state Air Resources Board has identified asbestos as a toxic air contaminant, and serpentine rock is a known source of naturally occurring asbestos.

Bedrock at the Proposed Project site was not encountered in the explorations (30 to 73 feet below the ground surface) performed by Yeh (2016). It is anticipated that bedrock will not

be encountered in excavations for the WRRF at the Proposed Project site. Consequently, there is a very low potential for naturally occurring asbestos to be exposed at the Proposed Project site.

Melange and serpentinite may underlie the Alternative site, but the depth to bedrock is not known. Geotechnical exploration will be required to determine the depth and type of bedrock at the Alternative site, before an assessment of naturally occurring asbestos at that site can be made.

Melange and serpentinite underlie portions of the proposed pipeline routes, thus it is anticipated that naturally occurring asbestos may be present at selected locations along those routes. The potential for naturally occurring asbestos should be evaluated as part of further environmental assessments of sites selected for further evaluation. Site development impacts for sites where NOA is suspected or known normally involve testing, monitoring and mitigation (dust control) during construction.

Refer to EIR section IV-I Air Quality and Greenhouse Gases for impact discussion and mitigation measures for NOA.

#### **Unstable Geologic Units**

Unstable and potentially unstable geologic units and soils in the Project area include, but are not limited to, areas of active faulting, landslides, steep slopes, areas of soil erosion and stream scour, potentially expansive soils, areas that may be prone to liquefaction and other seismically-induced ground failures. These potentially unstable conditions have been described and analyzed in the previous impact and mitigation statements in this section of the report.

Other potentially unstable geologic units and soils may be prone to subsidence, settlement, hydrocompaction and flooding, including both stream and alluvial fan flooding. Surficial geologic materials underlie the Proposed Project and Alternative sites, as well as significant portions of the proposed pipeline routes. Dewatering and excavations associated with construction of Project structures could potentially result in adverse impacts of ground subsidence. No Project structures are sited over known underground openings such as mine shafts or tunnels.

Potential impacts associated with those unstable geologic units and soils that are not previously assessed in this section of the EIR will be reduced to Less Than Significant with implementation of Mitigation Measure GEO-1 (Design-Level Geotechnical Investigation and Report).

#### **Tsunami Inundation**

A general analysis and projected tsunami inundation mapping of San Luis Obispo County was completed for the State Office of Emergency Services (San Luis Obispo County, 2016). The maps use the 50-foot elevation above mean seal level as a working maximum height potential for a tsunami event. The maps are intended as an emergency planning working tool, and do not necessarily reflect current tsunami prediction data. Nonetheless, the maps provide an indication of where tsunami may have a damaging affect (Map IVA-4 Tsunami Inundation Zone).

Generally, much of the Cayucos-Morro Bay coastline is protected from significant tsunami run-up by wide beaches, coastal dunes or bluffs. Inland effects are possible along the



# INUNDATION ZONES **TSUNAMI**

## Legend:

- Tsunami Inundation Zone
  - Effluent to LS5 pipeline Influent pipelineEffluent pipeline
    - RW pipeline
- Existing Force Main Creek crossing Staging area
- Outfall area
- Interceptor tie-in/pump station

- NOTES:

   Tsunami inundation zone from California Office of Emergency Services
   Locations of project components are from Firma Consultants (2016)





mouths of certain creeks, including Old Creek, Willow Creek, Toro Creek, and Moro Creek and the immediate shoreline zone at the ocean outfall, pipeline segments along SR1 and the CSA 10 pipeline area.

Therefore, The Proposed Project and Alternative sites are located inland from potential tsunami inundation zones, and are not impacted by the threat of tsunami damage.

**Impact GEO-8.** Due to the locations of critical infrastructure sites that will be connected via pipelines, certain pipeline sections will not be able to avoid portions of the tsunami inundation zone. Pipeline segments along SR1, the CSA 10 facility, and the outfall segment between SR1 and the coast, are located within the maximum tsunami inundation zone (i.e., less than 50 feet above mean sea level). Mitigation measures can be implemented to reduce the impact. However, the pipeline outfall will be vulnerable to damage from wave erosion if a significant tsunami occurs at that location. The potential impact of tsunami inundation on Project components near the coast is a significant and unavoidable impact (Class I).

**Mitigation Measure GEO-8.** Mitigation strategies for infrastructure located within tsunami inundation zones shall be implemented and include, as determined applicable, measures such as flexible connections, double lined pipes, strengthened pipes, automatic shutoff valves and similar measures to prevent the release of wastewater and treated water to the environment.

## 8. List of Abbreviated Terms

Abbreviation	Term
AG	Agriculture
CDC	California Department of Conservation
CEQA	California Environmental Quality Act
EIR	Environmental Impact Report
FMMP	Farmland Mapping and Monitoring Program
L	Local Importance Farmland
LCA	Land Contract Act
LESA	Land Evaluation and Site Assessment
LUO	Land Use Ordinance
NOP	Notice of Preparation
NRCS	National Resources Conservation Services
U	Unique Farmland
USDA	United States Department of Agriculture
S	Statewide Importance Farmland

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#### **Aerial Photographs**

Date	Type	Approximate Scale	Identification	Source
1939	b&w	1:20,000	AXH-1939-ARMY-102- 107, 108, 125, 126	U.C. Santa Barbara
2/13/1969	b&w	1:12,000	HB-OE-30, 31	U.C. Santa Barbara

8/21/1987	b&w	1:24,000	GS-VFLO-C-4-86, 87, 88	U.C. Santa Barbara
7/1/1999	color	1:12,000	GS-3913 1-1, 3-1	Golden State Aerial

### B. AGRICULTURAL RESOURCES

## 1. Environmental Issue

This section describes the existing agricultural resources, policies and regulations that pertain to the CSWP and provides an assessment of direct and indirect project impacts. Where appropriate, additional policies and implementation measures are recommended.

## 2. Sources Used In This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications including:

- US Department Agriculture, Natural Resource Conservation Service, Web Soil Survey (2016).
- Department of Land Resources Protection, (2016). 2008-2010 and 2010-2012 Farmland Conversion Reports.
- San Luis Obispo County General Plan Agriculture Element
- San Luis Obispo County 2012 Master Water Report

A complete list of references is provided at the end of this section.

## 3. Scoping Issues for Agricultural Resources

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issue relating to agricultural resources was raised during the scoping process and is addressed in this section:

- San Luis Obispo Location Agency Formation Commission (LAFCo), Consider annexing the treatment plant site into the CSD. Apply LAFCo Guidelines for regarding the protection of agricultural land.
- County Agriculture Department. Assess project consistency with Agriculture Element policies including land conversion, location of improvements, buffering, and agriculture land divisions.

## 4. Environmental and Regulatory Setting

## **Regulatory Setting**

Federal, state and local regulations pertaining the agriculture are discussed below. Consistency with relevant plans and policies relating to agriculture are discussed in Section IV-L Land Use and Planning under impact LU-2.

#### **FEDERAL REGULATIONS**

#### **Natural Resources Conservation Service (NRCS)**

The Natural Resources Conservation Service (NRCS), a federal agency within the U.S. Department of Agriculture, is the primary source of information concerning the suitability of soils for agricultural use. Prime farmland is defined in the United States Code as "land that has the best combination of physical and chemical characteristics for producing ... agricultural crops with minimum inputs of fuel, fertilizer, pesticides, and labor, and without intolerable soil erosion...." Prime farmland does not include land already in, or committed to, urban development.

The NRCS has developed a "Land Capability Classification System" that organizes soils into eight categories rated one through eight:

**Class I** soils have few limitations that restrict their use. These soils are typically used for vegetables, seedcrops, orchards, and other irrigated specialty crops and irrigated field crops.

**Class II** soils have minor to moderate limitations that reduce the choice of plants or that require moderate conservation practices. Uses are very similar to those found on Class I

Class III and IV soils have moderate to severe limitations that reduce the choice of plants, or that require special conservation practices, or both. In some situations, the Class III soils may be used for some of the crop types that are typically found on Class I and II soils, but are more typically used for specialty crops, forage lands, mixed croplands, and dryland field crops. Irrigated Class IV soils are commonly used for vineyards.

**Class V** soils are not likely to erode but have other limitations, impractical to remove, that limit their use.

**Class VI** soils have severe limitations that make them generally unsuitable for cultivation. These soils have commonly been used for rangeland and dryland grain production.

**Class VII** soils have very severe limitations that make them unsuitable for cultivation. These lands are primarily used as rangelands for grazing.

**Class VIII** soils and landforms have limitations that nearly preclude their use for commercial crop production. However, some grazing occurs on these lands.

Arable lands are organized into Classes 1 through 4. Non-arable lands are those unsuited for long-term cultivation. Classes 5 through 8 contain non-arable lands.

#### **Farmland Protection Policy Act**

The NRCS is the agency primarily responsible for implementation of the Farmland Protection Policy Act (FPPA). The purpose of the FPPA is to minimize federal programs' contribution to the conversion of farmland to nonagricultural uses by ensuring that federal programs are administered in a manner that is compatible with state, local, and private programs designed to protect farmland. NRCS provides technical assistance to federal agencies, state and local governments, tribes, or nonprofit organizations that desire to develop farmland protection programs and policies.

NRCS summarizes FPPA implementation in an annual report to Congress. The FPPA also established the Farmland Protection Program and the Land Evaluation and Site Assessment (LESA), which are discussed below.

#### **NRCS Farmland Protection Program**

The NRCS administers the Farmland Protection Program, a voluntary program aimed at keeping productive farmland in agricultural uses. Under the Farmland Protection Program, NRCS provides matching funds to state, local or tribal government entities and nonprofit organizations with existing farmland protection programs to purchase conservation easements. The goal of the program is to protect between 170,000 and 340,000 acres of farmland per year (Natural Resources Conservation Service, 2002). Participating landowners agree not to convert the land to nonagricultural use and retain all rights to use the property for agriculture. A minimum of 30 years is required for conservation easements and priority is given to applications with perpetual easements. NRCS provides up to 50 percent of the fair market value of the easement being conserved (Natural Resources Conservation Service, 2002).

To qualify for a conservation easement, farmland must meet several criteria. The land must be:

- Prime, Unique, or other productive soil, as defined by NRCS based on factors such
  as water moisture regimes, available water capacity, developed irrigation water
  supply, soil temperature range, acid-alkali balance, water table, soil sodium content,
  potential for flooding, erodibility, permeability rate, rock fragment content, and soil
  rooting depth;
- Included in a pending offer to be managed by a nonprofit organization, state, tribal, or local farmland protection program;
- Privately owned;
- Placed under a conservation plan;
- · Large enough to sustain agricultural production;
- Accessible to markets for the crop that the land produces; and
- Surrounded by parcels of land that can support long-term agricultural production.

#### STATE REGULATIONS

#### California Environmental Quality Act (CEQA) Definition of Agricultural Lands

Public Resources Code Section 21060.1 defines "agricultural land" as follows:

Agricultural land means prime farmland, farmland of statewide importance or unique farmland, as defined by the United States Department of Agriculture land inventory and monitoring criteria, as modified for California.

Under CEQA, the lead agency is required to evaluate agricultural resources in environmental assessments at least in part based on the FMMP (discussed below).

#### **Land Evaluation and Site Assessment**

The California LESA model was developed in 1997 based on the federal LESA system. It can be used to rank the relative importance of farmland and the potential significance of its conversion on a site-by-site basis. The California LESA model considers the following factors: land capability, Storie index, water availability (drought and non-drought conditions), land uses within one-quarter mile, and "protected resource lands" (e.g., Williamson Act lands) surrounding the property. A score can be derived and used to determine if the conversion of a property would be significant under CEQA. Lead agencies may refer to the LESA model in their environmental analysis but are not required to do so.

#### **California Department of Conservation**

The Department of Conservation administers and supports a number of programs, including the Williamson Act, the California Farmland Conservancy Program, the Williamson Act Easement Exchange Program, and the Farmland Mapping and Monitoring Program (FMMP). These programs are designed to preserve agricultural land and provide data on conversion of agricultural land to urban use. The Department of Conservation is responsible for approving Williamson Act Easement Exchange Program agreements.

## California Department of Conservation, Division of Land Resource Protection, Farmland Mapping and Monitoring Program

As discussed above, the Important Farmland Inventory System initiated in 1975 by the U.S. Soil Conservation Service (now NRCS) classifies land based on ten soil and climatic characteristics. The Department of Conservation started a similar system of mapping and monitoring for California in 1980, known as the FMMP. The state's system was designed to

document how much agricultural land in California was being converted to nonagricultural land or transferred into Williamson Act contracts.

The State's Important Farmland Inventory (IFI) is the source data for the FMMP. This program provides a source of information for state and local agencies concerned with agricultural land conversion. The IFI identifies five farmland categories: prime farmland, farmland of statewide importance, farmland of local importance, unique farmland, and grazing lands. The Prime Farmland designation is based on such factors as the availability of a reliable water supply, the area's temperature range, depth of the water table, soil permeability, and other considerations. Generally, soils receiving a Class 1 or 2 rating under the NRCS Land Capability Classification System (assuming that irrigation is feasible) are designated as IFI Prime Farmland.

Each of these farmland types is defined below.

- (1) **Prime Farmland** has the best combination of physical and chemical features able to sustain long-term agricultural production. This land has the soil quality, growing season, and moisture supply needed to produce sustained high yields. Land must have been used for irrigated agricultural production at some time during the four years prior to the mapping date.
- (2) **Farmland of Statewide Importance** is similar to Prime Farmland but with minor shortcomings, such as greater slopes or less ability to store soil moisture. Land must have been used for irrigated agricultural production at some time during the four years prior to the mapping date.
- (3) **Unique Farmland** consists of lesser quality soils used for the production of the state's leading agricultural crops. This land is usually irrigated, but may include nonirrigated orchards or vineyards as found in some climatic zones in California. Land must have been cropped at some time during the four years prior to the mapping date.
- (4) Farmland of Local Importance Farmland of Local Importance Farmland of Local Importance is either currently producing crops, has the capability of production, or is used for the production of confined livestock. In San Luis Obispo County this is further defined as:
- Local Importance (L): areas of soils that meet all the characteristics of Prime or Statewide, with the exception of irrigation. Additional farmlands include dryland field crops of wheat, barley, oats, and safflower.
- Local Potential (LP): lands having the potential for farmland, which have Prime or Statewide characteristics and are not cultivated.
- (5) **Grazing Land** is land on which the existing vegetation is suited to the grazing of livestock. This category was developed in cooperation with the California Cattlemen's Association, University of California Cooperative Extension, and other groups interested in the extent of grazing activities. The minimum mapping unit is 40 acres.

Three other non-agricultural categories are also included in the IFI, primarily to show where urban uses or other agriculturally non-productive uses are located.

#### California Revised Storie Index

The Storie Index evaluates the general suitability of soils for agriculture, based on four factors that represent the inherent characteristics and qualities of the soils. The California Revised Storie Index rates soil on a scale from 1 to 6, with 1 being the best. The Storie Index does not consider physical or economic factors, such as irrigation, that might

determine the desirability of growing certain plants in a given area. The California Revised Storie Index for soil types on the Project Site are shown in Table IV-B.3. Soils with the highest capability (Grade 3) comprise about 74 acres, or about 33% of the Project Site. Grade 3 soils are considered to possess fair qualities for agricultural production.

#### Cortese-Knox-Hertzberg Local Government Reorganization Act of 2000

The Cortese-Knox-Hertzberg Act provides the following definitions for agricultural land and prime agricultural lands:

56016. "Agricultural lands" means land currently used for the purpose of producing an agricultural commodity for commercial purposes, land left fallow under a crop rotational program, or land enrolled in an agricultural subsidy or set-aside program.

56064. "Prime agricultural land" means an area of land, whether a single parcel or contiguous parcels, that has not been developed for a use other than an agricultural use and that meets any of the following qualifications:

- (a) Land that qualifies, if irrigated, for rating as class 1 or class 2 in the USDA Natural Resources Conservation Service land capability classification, whether or not land is actually irrigated, provided that irrigation is feasible.
- (b) Land that qualifies for rating Grade One (excellent) California Revised Storie Index Rating.
- (c) Land that supports livestock used for the production of food and fiber and that has an annual carrying capacity equivalent to at least one animal unit per acre as defined by the United States Department of Agriculture in the National Handbook on Range and Related Grazing Lands, July 1967, developed pursuant to Public Law 46, December 1935.
- (d) Land planted with fruit or nut-bearing trees, vines, bushes, or crops that have a nonbearing period of less than five years and that will return during the commercial bearing period on an annual basis from the production of unprocessed agricultural plant production not less than four hundred dollars (\$400) per acre.
- (e) Land that has returned from the production of unprocessed agricultural plant products an annual gross value of not less than four hundred dollars (\$400) per acre for three of the previous five calendar years.

Local agency formation commissions (LAFCOs) have numerous powers under the CKH Act, but those of primary concern are the power to act on local agency boundary changes and to adopt spheres of influence for local agencies. Among the purposes of LAFCOs are the discouragement of urban sprawl and the encouragement of the orderly formation and development of local agencies.

The CKH Act reiterates a long-standing commitment to protecting the State's important agricultural resources. As explained in the San Luis Obispo Local Agency Formation Commission's policies:

"The Cortese-Knox-Hertzberg Act strongly encourages the preservation of prime agricultural land. LAFCO's mission is to discourage urban sprawl, preserve open space and prime agricultural lands, promote the efficient provision of government services and encourage the orderly formation of local agencies. In general terms, San Luis Obispo LAFCO's current policy base

discourages premature conversion of agricultural lands, guides development away from existing agricultural lands and encourages the development of existing vacant lands within city boundaries prior to conversion of additional agricultural lands."

The CKH Act provides the following guidance regarding the many factors that LAFCOs must consider in making decisions:

"The Legislature recognizes that the logical formation and determination of local agency boundaries is an important factor in promoting orderly development and in balancing that development with the sometimes competing state interests of discouraging urban sprawl, preserving open-space and prime agriculture lands, and efficiently extending government services."

The CKH Act further describes the intent of the legislation with regard to agricultural resources in Government Code section 56377, which states:

56377. In reviewing and approving or disapproving proposals which could reasonably be expected to induce, facilitate, or lead to the conversion of existing open-space lands to uses other than open-space uses, the commission shall consider all of the following policies and priorities:

- (a) Development or use of land for other than open-space uses shall be guided away from existing prime agricultural lands in open-space use toward areas containing nonprime agricultural lands, unless that action would not promote the planned, orderly, efficient development of an area.
- (b) Development of existing vacant or nonprime agricultural lands for urban uses within the existing jurisdiction of a local agency or within the Sphere of Influence of a local agency should be encouraged before any proposal is approved which would allow for or lead to the development of existing open-space lands for non-open-space uses which are outside of the existing jurisdiction of the local agency or outside of the existing Sphere of Influence of the local agency.

Government Code Section 56377 has been used by LAFCOs as the basis for developing more specific policies that address local circumstances and conditions.

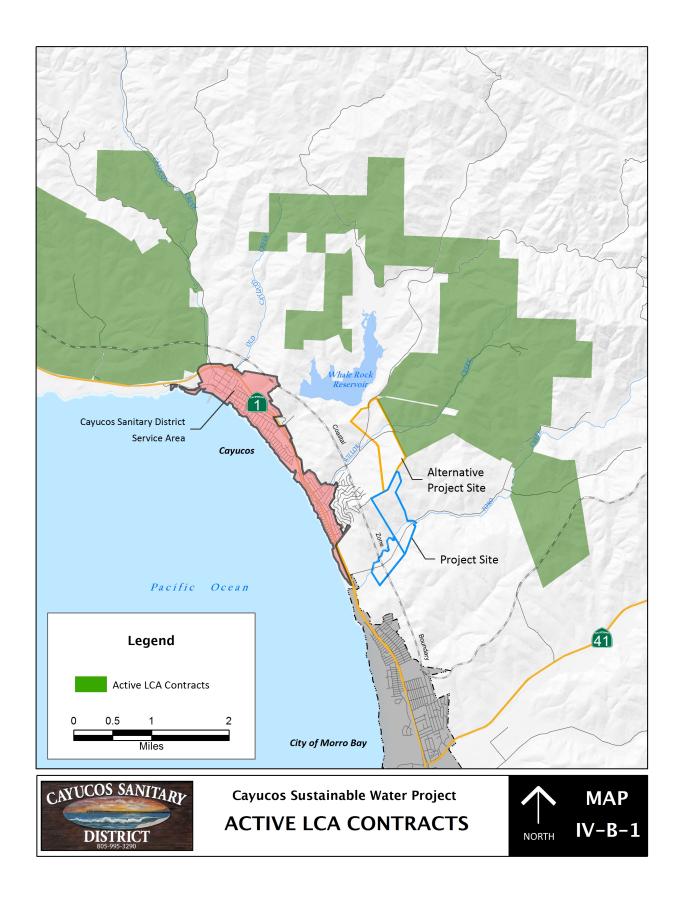
## The Williamson Act (Land Conservation Act)

The California Land Conservation Act of 1965 (Williamson Act, Government Code, Section 51200 et seq.) encourages the conservation of agricultural lands by providing a property tax incentive to owners who restrict land uses to agriculture and compatible uses. It is a voluntary program administered through local governments, which are responsible for contracting with landowners. Properties subject to Williamson Act contracts must remain in agricultural use for the duration of the contract, a minimum of 10 years. The contracts are self-renewing unless the property owner or a city or county has filed a Notice of Nonrenewal. Filing a Notice of Non-renewal initiates an approximately nine-year period, after which the contract expires.

A Williamson Act contract may also be terminated through contract cancellation. A local government may only approve a request for immediate cancellation of a contract by making specific findings under state law of either consistency with the purposes of the Williamson Act or as a cancellation in the public interest (Cal. Government Code, Section 51282(a)).

The California Department of Conservation must be notified of a petition for cancellation. The Department may submit comments advising the local government on the required findings regarding the proposed cancellation and the local government must consider these comments before acting on the proposed cancellation (Cal. Government Code, Section 51284.1). According to the State CEQA Guidelines, projects resulting in cancellation of a Williamson Act contract for any parcel of 100 acres or more should be considered as being of statewide, regional or area-wide significance.

Parcels in the Study Area under Williamson Act contract are shown in Map IV-B1. Neither the Project Site, nor the Alternative Site are subject to a Williamson Act Contract.



#### **Farmland Security Zones**

Farmland Security Zones (FSZs) were established by the legislature in 1998. FSZs are meant to protect participating Important Farmland from development pressure. An FSZ must be located within an agricultural preserve (area designated as eligible for a Williamson Act contract) and designated as Prime Farmland, Farmland of Statewide Importance, Unique Farmland, or Farmland of Local Importance. The agricultural and open space lands enrolled in the program are protected for a minimum of a 20-year term under an FSZ and are offered an even greater property tax reduction than land under a Williamson Act contract. Land protected in an FSZ cannot be annexed by a city or county government or school district, which would result in cancellation of a Williamson Act contract (California Department of Conservation, 2001). Non-renewal and cancellation procedures are similar to those for Williamson Act contracts.

#### **LOCAL REGULATIONS**

## San Luis Obispo Right to Farm Ordinance

Chapter 5.16 of the San Luis Obispo County Code is a "Right-to-Farm Ordinance", which supports, encourages, and protects agricultural operations and agricultural processing within the county and gives recognition to an operation's right to farm within the limits of the law. Paragraph 'b' of Section 5.16.020 (Findings and Policy) states:

Where non-agricultural land uses occur near agricultural areas, agricultural operations frequently become the subjects of nuisance complaints due to lack of information about such operations. As a result, agricultural operators may be forced to cease or curtail their operations. Such actions discourage investments in farm improvements to the detriment of agricultural uses and the viability of the County's agricultural industry as a whole.

The "Right-to-Farm" Ordinance advises purchasers of residential and other property types adjacent to existing agricultural operations of the inherent potential problems associated with the purchase of such property. Such concerns may include, but are not limited to, noise, odors, dust, chemicals, smoke, and hours of operation that may accompany agricultural operations.

## San Luis Obispo County Agricultural Preserve Program

San Luis Obispo County has established an Agricultural Preserve Program, consistent with the Williamson Act discussed above. The objectives of the program are to protect agricultural lands for continued production of food and fiber and limited types of land devoted to open-space and recreational uses.

An agricultural preserve is established by landowner request in an area devoted to an agricultural use, recreational use, and/or an open-space use as defined in and established in accordance with the Williamson Act. Establishment of an agricultural preserve is a prerequisite for landowners to enter into land conservation contracts with the County. A land conservation contract is a contract entered into by and between the property owner and lien holders (if any) and the County to restrict the use of the land for agricultural and compatible uses for a minimum term of 10 years or more.

## San Luis Obispo County Agricultural Buffer Policies and Procedures

The County has adopted agricultural buffer policies and procedures to promote and protect agriculture, to protect public health and safety and to provide decision makers with technical assistance to address land use compatibility issues affecting agriculture. Buffer determinations and other mitigation measures are made on a case-by-case basis considering established buffer distance ranges and all relevant factors.

Agricultural practices associated with the production of crops are the most important contributing factor to land use conflict when development occurs in close proximity to agricultural uses. Since production practices vary considerably by type of crop, buffer distances may vary accordingly as shown in the following table.

Table IVB-1 Agricultural Buffers

Type of Agricultural Use	Buffer Distance Range
Intensive Agricultural Uses	
Vineyards	200 – 600 feet
Irrigated Orchards	200 – 600 feet
Irrigated Vegetables and Berries	200 – 600 feet
Irrigated Forage and Field Crops	100 – 400 feet
Wholesale Nurseries Outdoors	100 – 500 feet
Greenhouses	100 – 300 feet
Non-Intensive Agricultural Uses	
Dry Farm Field Crops, Orchards and Vineyards	100 – 200 feet
Rangeland Pasture	50 – 200 feet

## San Luis Obispo County General Plan - Agriculture Element

The San Luis Obispo County Agriculture Element utilizes the Natural Resources Conservation Services (NRCS) soils classifications described above. Soils are classified into capability classes which range from Class I soils to Class VIII soils. Irrigation capability is required for a soil to be designated as Class I or II soil in the following descriptions. These irrigated soils are commonly referred to as "prime soils".

Policies of the Agriculture Element encourage the protection of agricultural resources:

- Encourage eligible property owners to participate in the county's agricultural preserve program.
- Locate new buildings, access roads, and structures so as to protect agricultural land.
- Where a land division is proposed, the proposed parcels should be designed to ensure the long term protection of agricultural resources.
- Minimum parcel sizes for the proposed division of land designated Agriculture shall be based upon the existing and potential use of the land for cropland and grazing. Minimum parcel size standards for the creation of new parcels are shown in Figure 2-2.
- Discourage the conversion of agricultural lands to non-agricultural uses through the following actions:
  - Work in cooperation with the incorporated cities, service districts, school districts, the County Department of Agriculture, the Agricultural Advisory Liaison Board, Farm Bureau, and affected community advisory groups to establish urban service and

- urban reserve lines and village reserve lines that will protect agricultural land and will stabilize agriculture at the urban fringe.
- Establish clear criteria in this plan and the Land Use Element for changing the designation of land from Agriculture to non-agricultural designations.
- Avoid land redesignation (rezoning) that would create new rural residential development outside the urban and village reserve lines.
- Avoid locating new public facilities outside urban and village reserve lines unless they serve a rural function or there is no feasible alternative location within the urban and village reserve lines.

As discussed above, the Proposed Project would be considered a conditionally allowable use in the *Agriculture* land use category and would not require a change to the land use designation.

## San Luis Obispo County General Plan - Conservation & Open Space Element

The San Luis Obispo County combined Conservation and Open Space Element (COSE) includes policies and implementation strategies to protect important agricultural soils. Policy SL 3.1 states the following:

Policy SL 3.1 Conserve Important Agricultural Soils

Conserve the Important Agricultural Soils mapped in Figure SL-1 and listed in Table SL-2. Proposed conversion of agricultural lands to non-agricultural uses shall be evaluated against the applicable policies in this COSE and in the Agriculture Element, including policies such as Policies AGP 18 and AGP 24.

Table SL-2 of the COSE lists important agricultural soils by their NRCS map symbol and soil name and classifies them as follows:

<u>Prime Farmland</u> is defined using both federal and state definitions of land that are considered "prime" lands for farming. The United States Department of Agriculture (USDA) Natural Resource Conservation Services (NRCS) has defined these lands as "prime farmland" in the Code of Federal Regulations for Agriculture. The State of California also defines lands that are "prime" for farming as "prime agricultural land" and the California Coastal Act of 1976. The State's definition of prime agricultural land is based on relevant land capability classifications and the California Revised Storie Index, whether or not land is actually irrigated. The "Prime Farmland" in this Element is based on both federal and state definitions. Table SL-2 lists soils (also known as map units) that meet the County's "Prime Farmland" definition in the COSE.

<u>Farmland of Statewide Importance</u> is defined by the USDA NRCS in the Code of Federal Regulations for Agriculture. Farmland of Statewide Importance designation is based on soil physical and chemical criteria, whether or not land is actually irrigated. Farmland of Statewide Importance is identified and mapped as per the Web Soil Survey.

<u>Other Productive Soils</u> meet the definition of Unique Farmland, as defined by the USDA NRCS in the Code of Federal Regulations for Agriculture, have a soil slope of 30% or less (except Paso Soil 198, 15-50% slope), and meets at least two of the following three criteria:

- 1. California Revised Storie Index is fair, good or excellent (Storie 1978, O'Green et al 2008):
- 2. Irrigated Capability Class is one through six;
- 3. More than 3% of the soil type is in irrigated/permanent crop use as of 2008.

Criteria 1 and 2 are based upon information from the Web Soil Survey. Criterion 3 is based upon GIS cropland mapping by the San Luis Obispo County Agriculture Department. Soil map units designated as Other Productive Soils may be found in Table SL-2 and Figure SL-1.

<u>Highly Productive Rangeland Soils</u> meet all of the following criteria as identified on the Web Soil Survey:

- 1. Produces forage that is equivalent to 60% or more of the maximum normal year forage production for that soil survey area;
- 2. Majority of the forage produced is herbaceous;
- 3. Slope is less than 30% (except soil types Coastal 133 and 168 and Carizzo 130, each 15-50% slope).

The COSE sets forth policies to protect the natural resources of the County, including agricultural soils, important viewsheds and biological resources.

- Policy SL 3.1 Conserve Important Agricultural Soils -- Conserve the Important Agricultural Soils mapped in Figure SL-1 and listed in Table SL-2. Proposed conversion of agricultural lands to non-agricultural uses shall be evaluated against the applicable policies in this COSE and in the Agriculture Element, including policies such as Policies AGP 18 and AGP 24.
- Policy VR 1.1 Adopt Scenic Protection Standards. Protect scenic views and landscapes, especially visual Sensitive Resource Areas (SRAs) from incompatible development and land uses.
- Policy VR 4.1 Designation of Scenic Corridors. Designate scenic corridors based on the recommendations for Scenic Corridor Studies, for the candidate roads and highways listed in Table VR-2.

The protection of agricultural land is discussed above under the Agriculture Element. With regard to view protection, land within the Coastal Zone between Morro Bay and Cayucos outside the city limits and the Cayucos Urban Reserve has been identified as the Highway 1 - Cayucos Critical Viewshed. New development in this area is subject to the view protection regulations of Chapter 23.04 of the Coastal Zone Land Use Ordinance. Neither the Project Site nor the Alternative Site are located within this viewshed protection area.

#### San Luis Obispo Local Agency Formation Commission

San Luis Obispo Local Agency Formation Commission (LAFCO) implements the Knox-Cortese-Hertzberg Act of 2000. More specifically LAFCO:

- Considers proposals for the formation of new local governmental agencies including Cities and Special Districts. LAFCO is also responsible for considering annexations and detachments for agencies. LAFCO also determines the Sphere of Influence, which is a plan for the probable physical boundary of a City or Special District.
- Reviews proposals based on a variety of factors including: a plan for services submitted by the agency, resource and infrastructure capacity, and the need for services.
- Considers the impact that a proposal may have on existing agricultural lands with focus on prime agricultural lands. San Luis Obispo LAFCO has adopted specific policies regarding the preservation of agricultural resources.
- Discourages urban sprawl. Urban sprawl can best be described as irregular and disorganized growth occurring without apparent design or plan. By discouraging

sprawl, LAFCO limits the misuse of land resources and promotes a more efficient system of services by local governmental agencies.

The CKH Act requires all LAFCOs to adopt policies and procedures to guide decision making. With regard to the protection of agricultural land, these policies require LAFCO to consider the effect that any proposal may produce on existing agricultural lands, especially prime farm lands. By guiding development toward vacant urban land and away from agricultural land, LAFCO assists with the preservation of valuable agricultural resources. The CKH Act strongly discourages the use of prime agriculture land for development. The definition of prime agriculture land is found in the CKH Act (discussed in the Environmental Setting, below) and is broadly defined in the Act. In 2008 San Luis Obispo LAFCO adopted Agricultural Goals-Policies-Guidelines developed to help preserve agricultural resources. A key policy for preserving agricultural land calls for any conversion of prime agricultural land associated with an annexation to be offset by preserving similar lands at a substitution ratio of 1:1 per acre. The following policies are used by when considering a proposal that would involve agricultural resources:

- 1. Vacant land within urban areas should be developed before agricultural land is annexed for non-agricultural purposes.
- Land substantially surrounded by existing jurisdictional boundaries should be annexed before other lands.
- 3. In general, urban development should be discouraged in agricultural areas. For example, agricultural land should not be annexed for nonagricultural purposes when feasible alternatives exist. Large lot rural development that places pressure on a jurisdiction to provide services and causes agricultural areas to be infeasible for farming should be discouraged.
- 4. The Memorandum of Agreement between a city and the County should be used and amended as needed to address the impacts on and conversion of Agricultural Lands on the fringe of a city.
- 5. The continued productivity and sustainability of agricultural land surrounding existing communities should be promoted by preventing the premature conversion of agricultural land to other uses and, to the extent feasible, minimizing conflicts between agricultural and other land uses. Buffers should be established to promote this policy.
- 6. Development near agricultural land should not adversely affect the sustainability or constrain the lawful, responsible practices of the agricultural operations.
- 7. In considering the completeness and appropriateness of any proposal, the Executive Officer and this Commission may require proponents and other interested parties to provide such information and analysis as, in their judgment, will assist in an informed and reasoned evaluation of the proposal in accordance with these policies.
- 8. No change of organization, as defined by Government Code 56021, shall be approved unless it is consistent with the Spheres of Influence of all affected agencies.

- 9. Where feasible, and consistent with LAFCO policies, non-prime land should be annexed before prime land.
- 10. The Commission will consider feasible mitigation (found in the following guidelines) if a proposal would result in the loss of agricultural land.
- 11. The Commission encourages local agencies to adopt policies that result in efficient, coterminous and logical growth patterns within their General Plan and Sphere of Influence areas and that encourage protection of prime agricultural land in a manner that is consistent with this Policy.
- 12. The Commission may approve annexations of prime agricultural land only if mitigation that equates to a substitution ratio of at least 1:1 for the prime land to be converted from agricultural use is agreed to by the applicant (landowner), the jurisdiction with land use authority. The 1:1 substitution ratio may be met by implementing various measures:
  - a. Acquisition and dedication of farmland, development rights, and/or agricultural conservation easements to permanently protect farmlands within the annexation area or lands with similar characteristics within the County Planning Area.
  - b. Payment of in-lieu fees to an established, qualified, mitigation/conservation program or organization sufficient to fully fund the acquisition and dedication activities stated above in 12a.
  - c. Other measures agreed to by the applicant and the land use jurisdiction that meet the intent of replacing prime agricultural land at a 1:1 ratio.
- 13. Property owners of agricultural lands adjacent to a LAFCO proposal shall be notified when an application is submitted to LAFCO.

#### **Environmental Setting**

## AGRICULTURAL CLIMATE CHARACTERISTICS

San Luis Obispo County covers a land area of approximately 3,316 square miles with a varied topography and climate. The Project is located in the Coastal Plateau region of the County which is about 5 to 10 miles wide and varies in elevation from sea level to about 500 feet to foothills of the Santa Lucia Mountains, which extend almost the entire length of the County.

The climate of the County can be generally characterized as Mediterranean, with warm, dry summers and cooler, relatively damp winters. Along the coast, mild temperatures are the rule throughout the year due to the moderating influence of the Pacific Ocean. This effect is diminished inland in proportion to distance from the ocean or by major intervening terrain features, such as the coastal mountain ranges.

The nearest National Weather Service Cooperative Observer Program (COOP) weather station to the project is the station at the Morro Bay Fire Department, located approximately 3 miles south of the project. At the Morro Station, average recorded rainfall between 1959 and 2008 measured 16.69 inches, with 90 percent of precipitation occurring between November and March.

The dry summers and light winter rains, in combination with generally warm, temperate weather, produce conditions suitable for growing crops like citrus, vegetables, wine grapes, and others.

#### **AGRICULTURAL PRODUCTS AND VALUES**

Agriculture continues to be the leading industry in San Luis Obispo County because of an abundance of land with good to excellent soil quality and a favorable climate. Approximately 1,115,074<sup>1</sup> acres were harvested in the county during 2014.<sup>2</sup> In 2014, every sector of the agricultural industry was affected, to some degree, by ongoing drought conditions. Overall crop values decreased to \$902,991,000, representing a 2% decline compared to the previous year, indicative of a third consecutive year of severe drought (Figure IV-B1).

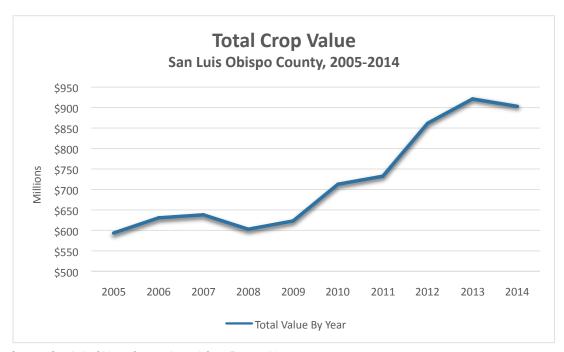


Figure IV-B1 Total Crop Value, San Luis Obispo County, 2005-2014

Source: San Luis Obispo County Annual Crop Report, 2014

Strawberries reported the highest crop value in 2014 with a value of \$205,756,000. An increase of 157 harvested acres, favorable growing conditions, and solid prices contributed to strawberries representing 22.7% of the overall agricultural value in San Luis Obispo County.

Wine grapes, the second ranked crop by value, ended the year with a 13% decline in production compared to 2013. Early spring bud break, leading to an unusually early harvest, contributed to lower yields. Drought conditions stressed vines resulting in smaller clusters. While fruit clusters were smaller in size, the quality of the fruit was exceptionally high. Overall, wine grapes culminated with a value of \$203,785,000 or 8% below that of 2013. Table IV-B.2 shows the top ten agricultural products in the County by value.

<sup>&</sup>lt;sup>1</sup> Includes irrigated pastures.

 $<sup>^{\</sup>rm 2}$  San Luis Obispo County Annual Crop Report, 2014

	32 Leading Agricultural F s in San Luis Obispo Cou	
Rank (2014)	Product	Value
1	Strawberries	\$205,765,000
2	Wine Grapes	\$203,785,000
3	Cattle and Calves	\$129,600,000
4	Broccoli	\$57,158,000
5	Vegetable Transplants	\$33,679,000
6	Cut Flowers	\$27,043,000
7	Avocados	\$22,714,000
8	Head Lettuce	\$20,480,000
9	Lemons	\$15,864,000
10	Napa Cabbage	\$14,007,000
TOTAL		\$730,095,000

Source: San Luis Obispo County Annual Crop Report, 2014

Table IV-B3 provides a summary of the value per acre of crops grown in San Luis Obispo County in 2014. Nursery products grown in greenhouses continues to generate the highest value per acre of production, followed by fruits and nuts (which includes wine grapes and strawberries) and vegetables.

Table I	V-B3 Value of Cr San Luis Obisp	ops Per Harvested o County, 2014	d Acre
Crop	2014 Harvested Acres	2014 Total Value	2014 Value Per Acre
Field Crops <sup>1</sup>	1,035,074	\$16,812,000	\$16
Fruits and Nuts	51,268	\$471,439,000	\$9,196
Vegetables	28,977	\$195,329,000	\$6,741
Nursery <sup>2</sup>	514	\$84,394,000	\$164,191
Total:	1,115,833	\$767,974,000	\$688

Source: San Luis Obispo County Annual Crop Report, 2014 Notes: 1.Field crop acreage includes irrigated pastures. 2.Nursery acreage includes floor area of greenhouses.

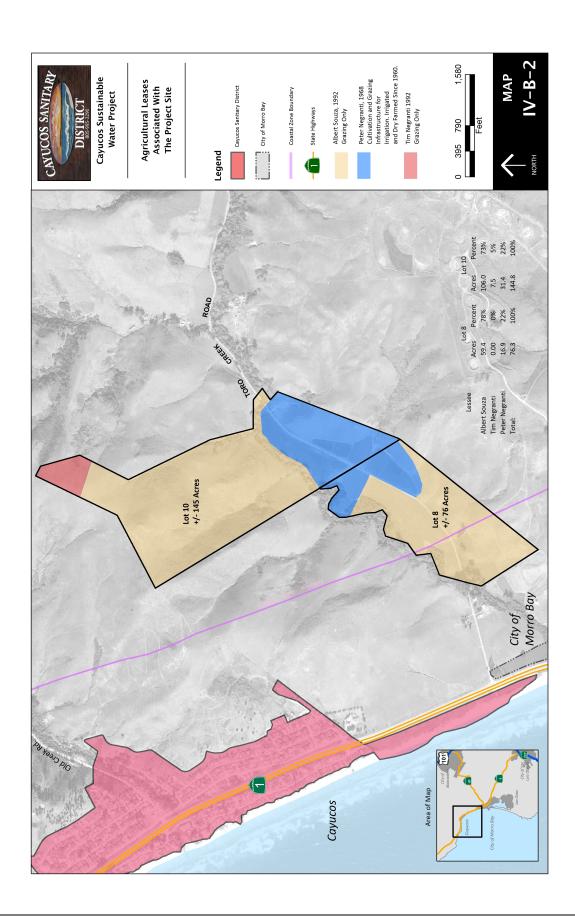
#### AGRICULTURAL RESOURCES OF THE PROJECT SITE AND ALTERNATIVE SITE

The project site consists of two parcels totaling about 221 acres (Map IV-B2) located on Toro Creek Road about 0.75 miles east of State Route 1 between the City of Morro Bay and the community of Cayucos. At the time of distribution of the Notice of Preparation, the site was fallow.

The Alternative Site consists of about 215 acres located on the north and south sides of Montecito Road and east of Old Creek Road along Willow Creek, about 1.2 miles east of the community of Cayucos. At the time of distribution of the Notice of Preparation, the site was under cultivation with lima beans and oat hay. Irrigation water is provided to the level portions of the site by a well.

A variety of agricultural operations have been conducted on the Project Site, including grazing, dry farming and irrigated cultivation. Portions of the project site have been leased to farmers since the 1960s as shown on Map IV-B2 and as summarized by lessee in Table IV-B4. The lease information suggests that the fertile alluvial soils adjacent to Toro Creek Road have been irrigated and cultivated since the 1960s .

Charman Ca	2016							
	Tab	le IV-B4 -	Project Site	Leasehol	d Interes	sts for Fari	ming	
		l	Lot 8				Lot 10	
Lessee	Acres	Percent	Farming Activity	Year of Lease	Acres	Percent	Farming Activity	Year of Lease
Albert Souza	59.4	78%	Grazing only	1992	106.0	73%	Grazing only	1992
Tim Negranti	0.00	0%			7.5	5%	Grazing only	1992
Peter Negranti	16.9	22%	Irrigated and dry crops and grazing; well drilling	1968	31.4	22%	Irrigated and dry crops and grazing; well drilling	1968
Total:	76.3	100%			144.8	100%		



## Soils of the Project Site and Alternative Site

The main soil classifications underlying the Project Site and Alternative Site are described below and summarized by acres on Table IV-B5 and Maps IVB-3 and IVB-4.

#### Cropley clay, 2 to 9 percent slopes

This soil component is found on alluvial fans, alluvial plains, and terraces on alluvial plains. The parent material consists of alluvium derived from calcareous shale. Depth to a root restrictive layer is greater than 60 inches. The natural drainage class is moderately well drained. Water movement in the most restrictive layer is moderately low. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 2 percent.

#### Diablo and Cibo clays, 15 to 30 percent slopes

#### Diablo Component

The Diablo component is found on slopes of 15 to 30 percent, primarily on hills. The parent material consists of residuum weathered from mudstone, sandstone and/or shale. Depth to a root restrictive layer, bedrock, paralithic, is 45 to 58 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 3 percent.

#### Cibo Component

The Cibo component is found on slopes of 15 to 30 percent primarily on hills. The parent material consists of residuum weathered from metasedimentary rock. Depth to a root restrictive layer, bedrock, lithic, is 20 to 40 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is moderate. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 2 percent.

## Diablo and Cibo clays, 30 to 50 percent slopes

#### Diablo Component

The Diablo component is found on slopes of 30 to 50 percent primarily on hills. The parent material consists of residuum weathered from mudstone, sandstone and/or shale. Depth to a root restrictive layer, bedrock, paralithic, is 45 to 58 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches.

#### Cibo Component

The Cibo component is found on slopes of 30 to 50 percent, primarily on hills. The parent material consists of residuum weathered from metasedimentary rock. Depth to a root restrictive layer, bedrock, lithic, is 20 to 40 inches. The natural drainage class is well

drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is moderate. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 2 percent.

## Diablo-Lodo complex, 15 to 50 percent slopes

#### Diablo Component

The Diablo component is found on slopes of 15 to 50 percent primarily on hills. The parent material consists of residuum weathered from mudstone, sandstone and/or shale. Depth to a root restrictive layer, bedrock, paralithic, is 45 to 58 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches.

#### Lodo Component

The Lodo component is found on slopes of 15 to 50 percent primarily on hills. The parent material consists of residuum weathered from sandstone and shale. Depth to a root restrictive layer, bedrock, lithic, is 4 to 20 inches. The natural drainage class is somewhat excessively drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is very low. Shrink-swell potential is moderate. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches.

#### Los Osos-Diablo complex, 15 to 30 percent slopes

## Los Osos Component

The Los Osos component is found on slopes of 15 to 30 percent primarily on hills. The parent material consists of residuum weathered from sandstone and shale. Depth to a root restrictive layer, bedrock, paralithic, is 20 to 40 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is low. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches.

#### Diablo Component

The Diablo component is found on slopes of 15 to 30 percent, primarily on hills. The parent material consists of residuum weathered from mudstone, sandstone and/or shale. Depth to a root restrictive layer, bedrock, paralithic, is 45 to 58 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is high. Shrink-swell potential is high. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches.

#### Los Osos Loam, 30 to 50 percent slopes

Moderately steep, well drained, steep soil on foothills and mountain ridgetops. Natural vegetation is mainly annual grasses and forbs with brush. Hardwoods are normally along drainages. Mostly used as rangeland.

#### Obispo-Rock outcrop complex, 15 to 75 percent slopes

#### Obispo Component

The Obispo component is found on slopes are 15 to 75 percent, primarily on mountain slopes. The parent material consists of residuum weathered from serpentinite. Depth to a root restrictive layer, bedrock, lithic, is 8 to 20 inches. The natural drainage class is well drained. Water movement in the most restrictive layer is very low. Available water to a depth of 60 inches (or restricted depth) is very low. Shrink-swell potential is moderate. This soil is not flooded. It is not ponded. There is no zone of water saturation within a depth of 72 inches. Organic matter content in the surface horizon is about 2 percent.

#### Rock Component

Generated brief soil descriptions are created for major soil components. The Rock outcrop is a miscellaneous area.

## Rock Outcrop - Lithic Haploxerolis complex, 30 to 50 percent slopes

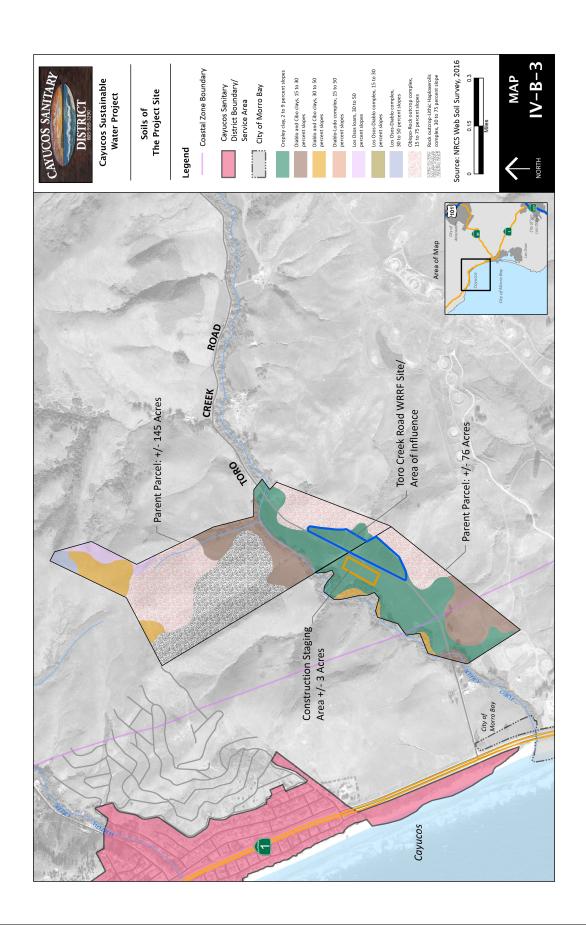
This steep and very steep complex occurs in mountains. Areas are irregular in shape or long and narrow. The natural vegetation is sparse annual grasses or brush.

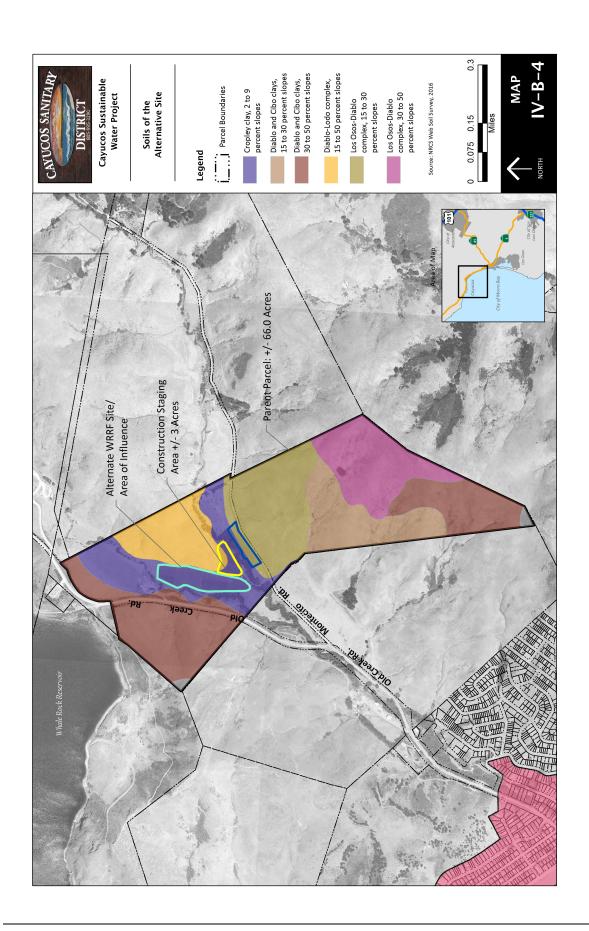
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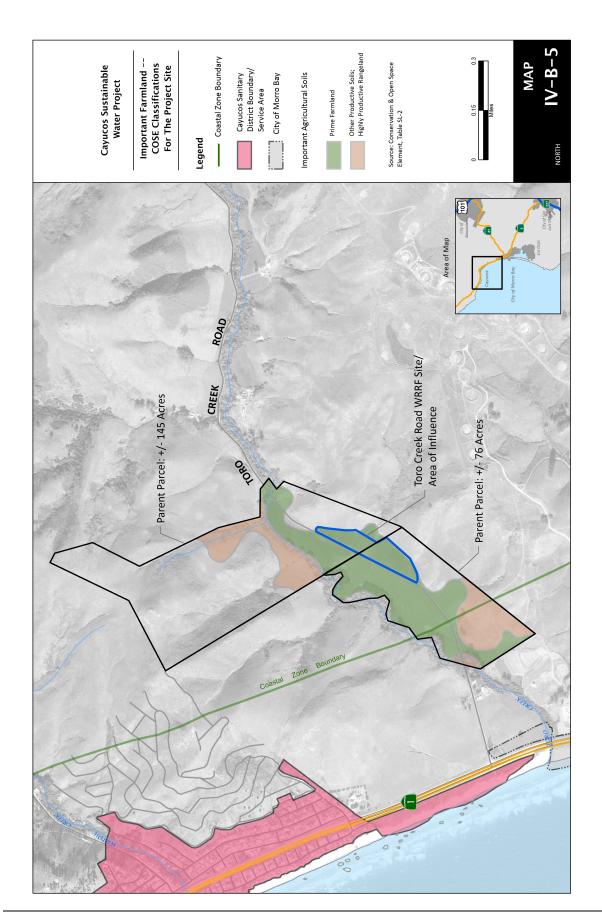
Project	i.	NRCS Map	SLO County COSE	NRCS Lan Classif	NRCS Land Capability Classification <sup>5</sup>	Revised California	•	Percent of
Component	Soli Type	Symbol <sup>1</sup>	Class <sup>4</sup>	Irrigated	Non- Irrigated	Storie Index Grade <sup>5</sup>	Acres	Site
	Cropley clay, 2 to 9 percent slopes	128	Prime Farmland	2 (Prime)	8	3 Fair	67.1	30%
	Obispo-Rock outcrop complex, 15 to 75 percent	183	1	7	2	5 Poor	52.7	24%
	Rock outcrop-Lithic Haploxerolls complex, 30 to 75 percent slope	195	ı	7	7	5 Poor	42.3	19%
Proposed Project (Lots 8 and 10	Diablo and Cibo clays, 15 to 30 percent slopes	131	Other Productive Soils; Highly Productive Rangeland	4	4	4 Poor	37.5	17%
combined)	Diablo and Cibo clays, 30 to 50 percent slopes	132	ı	9	9	4 Poor	14.4	%2
	Los Osos Loam, 30 to 50 percent slopes	161	1	7	2	3 Fair	4.8	2%
	Los Osos-Diablo complex, 30 to 50 percent slopes	165	ı	9	9	3 Fair	2.1	1%
Total:							221.1	100%
	Cropley clay, 2 to 9 percent slopes	128	Prime Farmland	2 (Prime)	ε	3 Fair	38.4	18%
	Diablo-Lodo Complex, 15 to 50 percent slopes	133	Highly Productive Rangeland	9	9	4 Poor	21.2	10%
	Diablo and Cibo clays, 30 to 50 percent slopes	132	-	9	9	4 Poor	67.3	31%
	Diablo and Cibo clays, 15 to 30 percent slopes	131	Other Productive Soils; Highly Productive Rangeland	4	4	4 Poor	25.5	12%
Alternate Site	Los Osos-Diablo complex, 15 to 30 percent slopes	164	Other Productive Soils; Highly Productive Rangeland	9	9	3 Fair	32.7	15%
	Los Osos-Diablo complex, 30 to 50 percent slopes	164	ı	9	9	3 Fair	29.3	14%
	Obispo Rock Outcrop complex	183		7	7	5 Poor	1.2	1%
Total:							215.0	100%

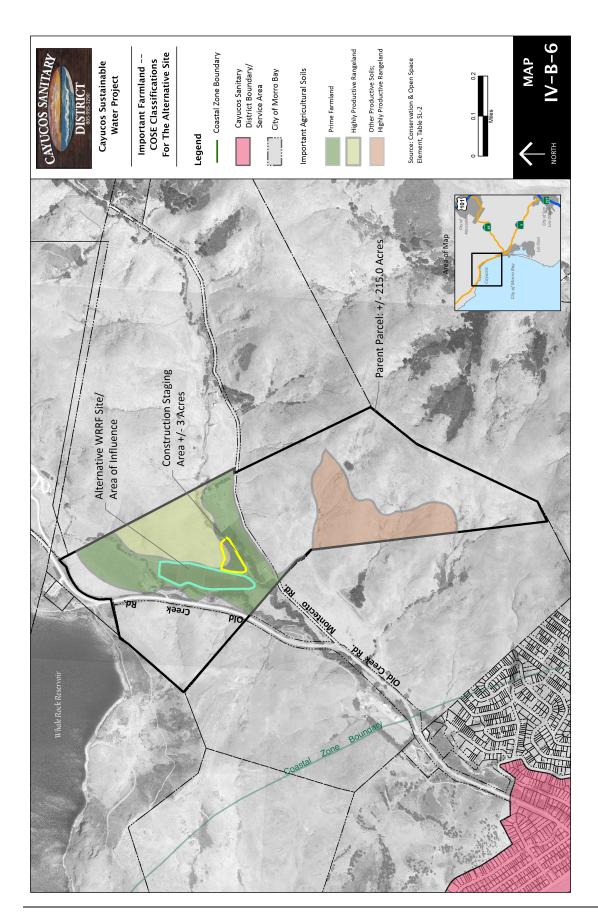
#### Notes for Table IV-B.4

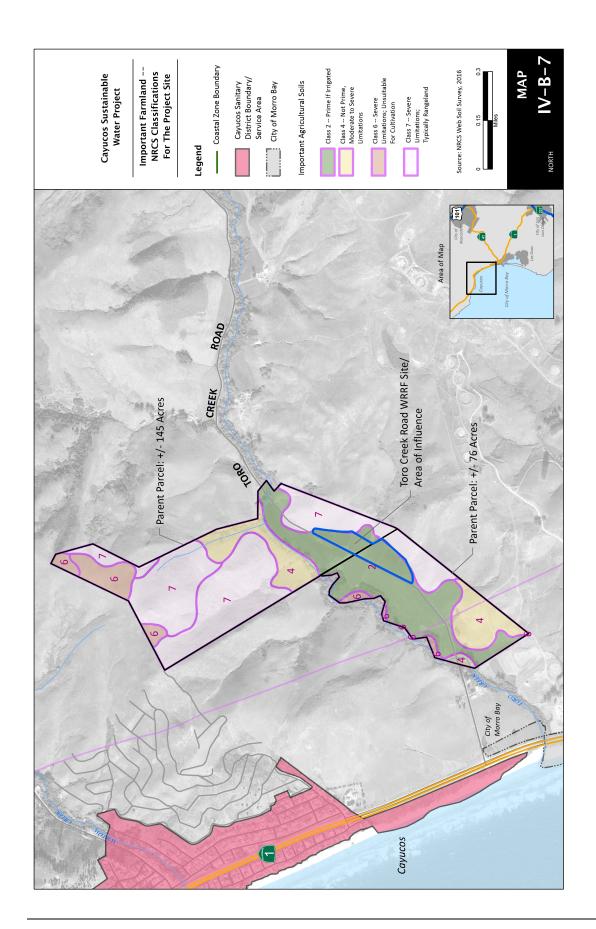
- 1. See Figure IV-B.3 for locations of soils.
- 2. "Land Capability Classification" is a system devised by the NRCS to indicate agricultural capabilities, on a scale of 1 to 8, with 1 being highest. Typically, Classes 1 and 2 are considered prime, because there are few limitations on the types of crops that can be grown. Note that under this system, many soils are only considered prime if irrigated.
- 3. Storie Index Grades (for EIR purposes, Grade 2 is considered prime-see Standards of Significance):
  - Grade 1: Well suited to intensively cultivated crops that are climatically adapted to the region.
  - Grade 2: Good agricultural soils, although they are not so desirable as soils in grade 1 because of a less permeable subsoil, deep cemented layers (e.g., duripans), a gravelly or moderately fine textured surface layer, moderate or strong slopes, restricted drainage, low available water capacity, lower soil fertility, or a slight or moderate hazard of flooding.
  - Grade 3: Only fairly well suited to agriculture because of moderate soil depth; moderate to steep slopes, restricted permeability in the subsoil; a clayey, sandy, or gravelly surface layer; somewhat restricted drainage; acidity; low fertility; or a hazard of flooding.
  - Grade 4: Poorly suited to agriculture. They are more limited in their agricultural potential than the soils in grade 3 because of restrictions, such as a shallower depth; steeper slopes; poorer drainage; a less permeable subsoil; a gravelly, sandy, or clayey surface layer; channeled or hummocky microrelief; acidity.
  - Grade 5: Very poorly suited to agriculture and are seldom cultivated. They are more commonly used as pasture, rangeland, or woodland.
  - Grade 6: Not suited to agriculture because of very severe or extreme limitations. They are better suited to limited use as rangeland, protective habitat, woodland, or watershed.
- 4. Farmland classification used by San Luis Obispo County derived from Table SL-2 of the Conservation and Open Space Element.
- 5. Farmland classifications used by the Local Agency Formation Commission in accordance with the Knox-Cortese-Hertzberg Act of 2000.

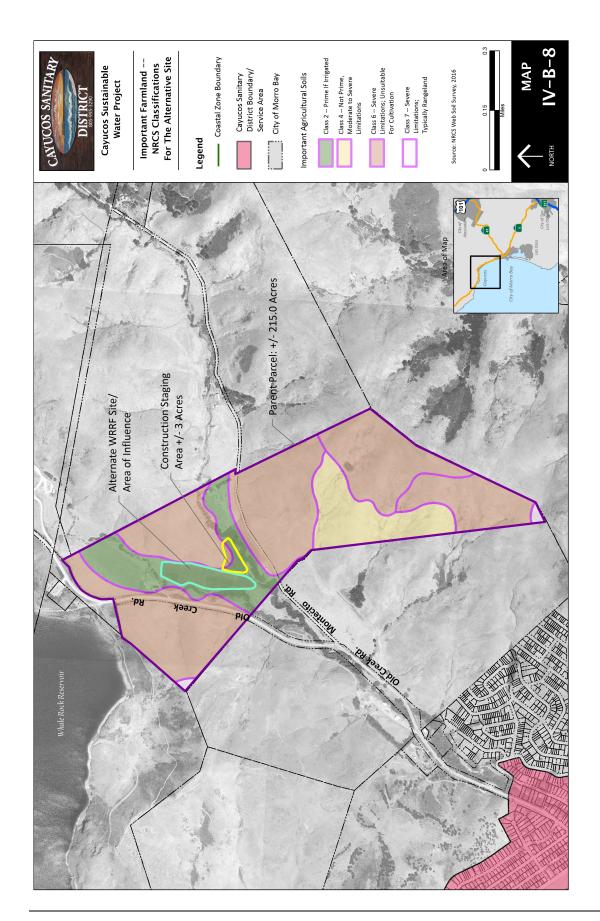






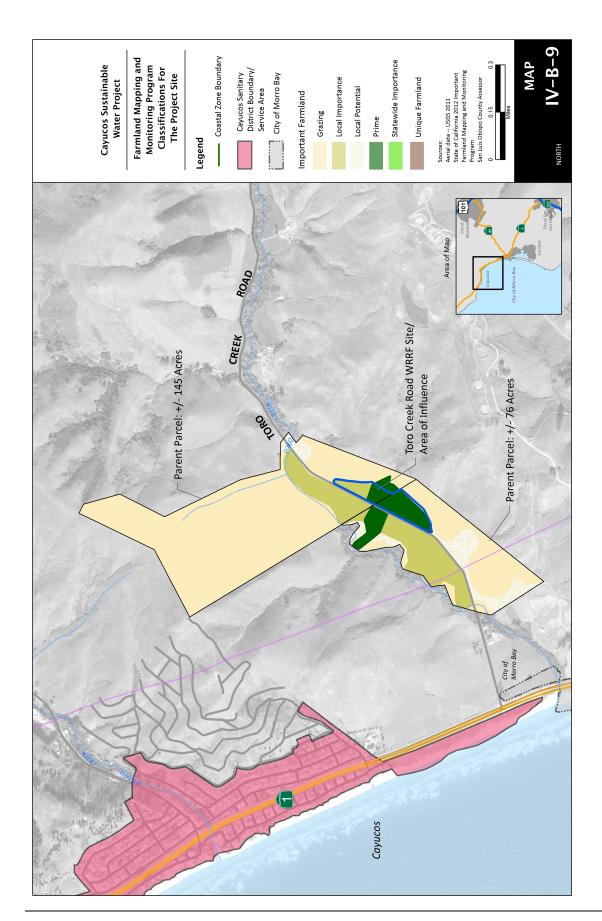


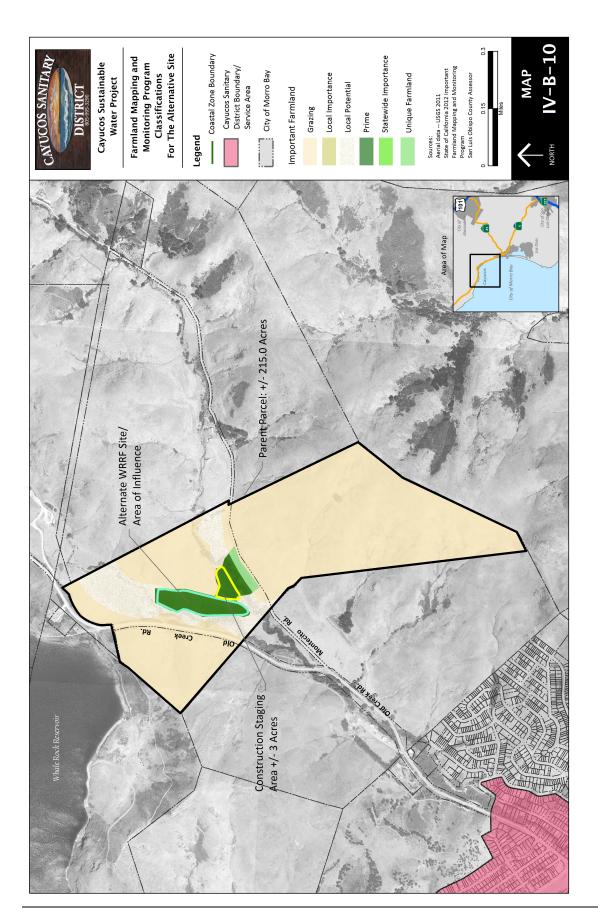




The Project Site and Alternative Site have also been mapped in accordance with the Farmland Mapping and Monitoring Program. According to the FMMP, the Project Site contains about 14.8 acres of Prime farmland and about 54.1 acres of Farmland of Local Importance. The Alternative Site contains about 12 acres of Prime farmland and about 24 acres of Farmland of Local Importance. Table IV-B6 provides a summary of Important Farmland of the Project Site and Alternative site which is shown on Maps IV-B5 through IV-B10.

Table IV-B.6 NRCS Important Farmland Classifications For the Project Site And Alternative Site				
S:	Project Site <sup>3</sup>		Alternative Site	
Important Farmlands Category <sup>1</sup>	Acres	Percent	Acres	Percent
Prime	14.8	7%	12.1	6%
Farmland of Statewide Importance	0	0	0	0%
Farmland of Local Importance <sup>2</sup>	54.1	25%	24.3	11%
Unique Farmland	0	0	1.5	1%
Grazing Land	152.2	68%	177.1	82%
Urban/Developed	0	0	0	0%
Rural Residential	0	0	0	0%
Other	0	0	0	0%
TOTAL	221.1	100%	215.0	100%





# 5. Standards of Significance

For purposes of this EIR, an agricultural resources impact is considered significant if implementation of the Project would result in any of the following:

- Direct conversion of Prime Farmland or Farmland of Statewide Importance, as defined by the San Luis Obispo County General Plan Conservation and Open Space Element, to non-agricultural use;
- Indirect conversion of Prime Farmland, Farmland of Statewide Importance, resulting from a net decrease in the amount of designated agricultural land in the county, as represented by the Agricultural Resource and Agriculture, Watershed, and Open Space designations on the current San Luis Obispo County General Plan Land Use Map:
- Conflict with existing zoning for agricultural use, or a Williamson Act contract; and/or
- Involve other changes in the existing environment, which due to their location or nature, could result in conversion of Prime Farmland or Farmland of Statewide Importance to non-agricultural use or conflicts with agricultural use or agricultural operations (e.g. placement of urban and other uses adjacent to agricultural uses resulting in potential conflicts).

# 6. Impacts Found to Be Less Than Significant

The following aspects of the project were determined to have no impact on agricultural resources:

Construction of conveyance infrastructure in Cayucos and Morro Bay. The general route corridor for conveyance infrastructure in Cayucos and Morro Bay will be constructed within public rights of way which do not possess agricultural lands.

**Discharge of processed water to the existing ocean outfall.** Processed wastewater will be conveyed to the ocean through an existing outfall which travels through public rights of way.

Participation in the de-commissioning of the Morro Bay/Cayucos Wastewater Treatment Plant. The existing treatment plant site is located within the corporate limits of Morro Bay and does not possess any agricultural resources.

**Phase 2 Pipeline conveyance for recycled water.** As with the other conveyance infrastructure associated with the project, the pipeline conveyance for recycled water will be constructed within existing rights of way that have no agricultural resources.

Potential conflicts with existing zoning for agricultural use or a Williamson Act contract was found to be less than significant because:

- The Project Site and Alternative Site are zoned *Agriculture* and a wastewater treatment plant is considered a conditionally allowable use in accordance with Section 22.30.370 of the County Land Use Ordinance.
- Neither the Project Site nor the Alternative Site are subject to a Williamson Act contract.

Construction of Pipelines in Public Rights of Way with underlying agricultural soils. The pipeline along Toro Creek Road (0.45 mile) traverses land with prime soils under the COSE and Class 2, if irrigated, soils under the NRCS. The disturbed soil would be

approximately 9,000 square feet. The pipeline traverses 0.78 mile of Toro Creek Road and Caltrans right of way with soils designated as highly productive rangeland under the COSE and Class 6 soil under the NRCS. The disturbed soil would be 16,500 square feet. Because this soil is in the public right of way in the road shoulder the soils are not feasibly farmed and the disturbance for trenching and replacement does not permanently convert the soil to urban use, no significant impact is identified.

# 7. Project Impacts and Mitigation Measures

#### **METHODOLOGY**

The agricultural analysis is based on information gathered from the San Luis Obispo County General Plan, the California Department of Conservation Farmland Conversion Report, the California Department of Conservation Important Farmlands Map, the Soil Survey of San Luis Obispo County, California, and the San Luis Obispo County Agricultural Commissioner's Report. This analysis addresses direct impacts and losses of farmland as well as indirect impacts on agricultural uses (e.g., growth pressure to convert farmlands, conflicts between agricultural operations and urban land uses) as a result of the SWP.

### PERMANENT CONVERSION OF PRIME FARMLAND

Construction of the WRRF and solar array will result in the permanent conversion of about 8 acres of land Prime Farmland as defined by the County COSE on the Project Site and about 9 acres of Prime Farmland on the Alternative Site (Table IV-B.6).

Table IV-B7 Important Farmland Permanently Converted to A Non-Agricultural Use				
Important Farmlands Category <sup>1</sup>	Project Site <sup>3</sup>	Alternative Site <sup>3</sup>		
Prime	8.0	9.0		
Statewide Importance	0.0	0.0		
Other Important Farmland	0.0	0.0		
Highly Productive Rangeland	0.0	2.0		
Total:	8.0	11.0		

Source: GIS analysis derived from NRCS data for, 2012.

Notes:

- Based on the definitions from the San Luis Obispo County Conservation and Open Space Element.
- Based on Table SL-2 from the San Luis Obispo County Conservation and Open Space Element.
- 3. Including required agricultural buffers.

As discussed in the Regulatory Setting, the County has adopted agricultural buffer requirements to protect non-agricultural land uses from the effects of farming. The project site plan (Figure IV-B-12) shows the WWTF and solar array located at the base of the slope on the south side of Toro Creek Road. To the south are grazing lands which will be separated from the developed area of the site by a fence and drainage swale; the solar array will be approximately 120 feet from the southern property boundary. There are about 67

acres of Prime agricultural soils on the north side of Toro Creek Road currently owned by the CSD which will be separated from the WWTF by the road right-of-way, a landscaped area and driveway. The closest WWTF facilities will be about 110 feet. The site plan was reviewed by the San Luis Obispo County Agricultural Commissioner's office and was determined to be consistent with San Luis Obispo County Agricultural Buffer Policies and Procedures.

Construction of the WWTF will require the excavation of about two feet of prime agricultural topsoil over an area of about 4 acres (about 12,900 cubic yards). These soils consist of Cropley clay, on 2% - 9% slopes. The CSD intends to combine this soil with other areas under their ownership that contain the same soil classification (see Figure IV-B.4). According to the NRCS Templeton Field Office<sup>3</sup>, combining the excavated soils with comparable soils on adjacent lands would be preferable to exporting the soils offsite for disposal.

The conversion of prime agricultural soils on the Project Site or on the Alternative Site will also result in the permanent loss of revenue to the agricultural economy of San Luis Obispo County. Table IV-B.7 provides a summary of lost revenue associated with the conversion of prime agricultural lands from the Project Site and Alternative Site.

With	Table IV-B8 Potential Lost Revenue : The Permanent Conversion of Prime and of Statewide Importance <sup>1</sup> to A No	e Farmland and	е
Location	Acres Converted By Important Farmland Category <sup>2</sup>	Revenue Per Acre of Comparable	Potential Lost Revenue

 Location
 Farmland Category<sup>2</sup>
 Acre of Comparable Land In 2014<sup>3</sup>
 Lost Revenue Per Year<sup>4</sup>

 Project Site
 8.0
 0.0
 \$6,741.00
 \$53,928.00

 Alternative Site
 9.0
 2.0
 \$6,741.00
 \$60,669.00

Source: GIS analysis derived from NRCS data for, 2012. Notes:

- 1. Based on the definitions from the San Luis Obispo County Conservation and Open Space Element.
- Based on Table SL-2 from the San Luis Obispo County Conservation and Open Space Element.
- 3. See Table IV-B.2. For purposes of this analysis, the revenue per acre for vegetable crops was applied to obtain a reasonable worse case,
- 4. In 2014 constant dollars.

As shown in Table IV-B8, the potential lost revenue to the agricultural economy would range from about \$54,000 per year on the Project Site to as much as \$66,000 on the Alternative Site, in 2014 dollars.

**Impact AG-1:** Construction of the WRRF and solar array on the Project Site will result in the permanent conversion of Prime Farmland as defined by the San Luis Obispo County Conservation and Open Space Element. This impact is considered significant and unavoidable (Class I).

<sup>&</sup>lt;sup>3</sup> Ken Oster, NRCS Soil Technician, personal communication September 13, 2016.

**Mitigation Measure AG-1:** Prior to the issuance of grading permits, the Cayucos Sanitary District shall provide evidence to the County Department of Planning and Building that a farmland conservation easement, a farmland deed restriction, or other farmland conservation mechanism has been granted in perpetuity to the County or a qualifying entity approved by the County Agricultural Commissioner (or designee). The easement shall provide conservation acreage at a ratio of 2:1 for direct project impacts. The area conserved shall be shall be of a quality that is reasonably similar to that of farmland within the project limits (as determined by the County Agricultural Commissioner or designee).

### Level of Impact Significance after Implementation of Mitigation Measure

Although implementation of recommended mitigation measures will result in the permanent protection of comparable farmland to the land permanently converted, the permanent loss of 8.0 acres of Prime Farmland for the Project Site and 9.0 acres for the Alternative Site is considered a significant and unavoidable impact (Class I).

## **Potential Irrigated Land**

The State Water Resources Control Board (SWRCB) encourages the reclamation and reuse of treated wastewater where feasible and beneficial. The Central Coast Basin Plan states:

"Where practicable, land disposal by spray irrigation shall be accomplished by proper reclamation techniques rather than by over-irrigation. This will aid water shortages and maximize nutrient removal. Treatment process selection for reclamation of wastewater is dependent upon the intended reuse. Where irrigation reuse or ground water recharge is intended, treatment requirements will depend on conditions described under land disposal. Clearly, the nature of the crop to be irrigated, soil percolation, and water characteristics are important considerations."

Factors that affect siting of land disposal areas for treated wastewater include soils, groundwater location, and the type of crops when irrigation is involved. The Basin Plan includes standards and thresholds for concentrations of salts, nitrates, boron, pathogenic organisms, and toxic chemicals in recycled water. Table IV-B9 provides a summary of the potential acreage that could be irrigated by tertiary treated water.

Table IV-B9 Potential Irrigated Land				
Tertiary Treated Water <sup>1</sup> (Acre-Feet/Year)	Water Demand Potential Irrigated Are (Acre-Feet/Year/Acre) (Acres)			•
(1313 1 333 1 331)	Low <sup>2</sup> High <sup>2</sup> Low Water Demand Crops		High Water Demand Crops	
40	0.7	1.42	57.0	9.0

Sources: 2012 San Luis Obispo Master Water Report

#### Notes:

- 1. One acre-foot is 325,851 gallons.
- Based on estimated water demand and acreage of irrigated crops grown in the Cayucos area as shown in Tables 4.14 and 4.16 of the 2012 San Luis Obispo County Master Water Report.

As shown in Table IV-B.9, the potential for additional irrigated acreage ranges from 9 acres about 57 acres. As discussed above, the Project Site and Alternative site are surrounded by soils, specifically Cropley clay, 2 to 9 percent slopes, which are classified by the County as Prime Farmland. These areas have been cultivated with irrigation since at least the 1960s with groundwater from the Toro Valley groundwater basin. According to the County's 2012 Master Water Report (MWR), the projected safe seasonal yield of the Toro Valley groundwater basin was historically estimated at 500 AFY (DWR 1958). Given the shallow nature of alluvial deposits and limited groundwater in storage, the safe yield estimate used by the MWR is limited to the documented historical production that has not resulted in water supply problems, which to date has been up to 532 AFY. Shallow alluvial deposits are typically more susceptible to drought impacts than deeper formation aquifers, having less groundwater in storage and consequently less capacity for resource utilization and banking. For the upper basin, water level and well capacity declines during drought will limit water availability, while in the lower valley area, sea water intrusion and petroleum hydrocarbon contamination are the primary constraints.

The Project Description identifies a planned capacity to produce up to 80 AFY of tertiary treated water. A more conservative number of a potential 40 AFY allocation of treated wastewater for crop irrigation would amount to about a 7.5% increase compared with historical groundwater use. This water could be used for direct application to fields or to improve irrigation reliability during a drought.

It should also be noted that there are limitations to the application of tertiary treated water on crops in accordance with Title 22 of the California Code of Regulations. Generally, disinfected tertiary treated water can be applied in a wide variety of agricultural uses. In addition, the demand for irrigation water is seasonal. During the winter, treated tertiary water would continue to be discharged through the existing outfall, and/or conveyed to the CSA10 water treatment plant for domestic use.

**Impact AG-2:** The WRRF is expected to generate an average annual daily flow (AADF) of 0.33 to 0.4 million gallons per day (MGD) of tertiary treated non-potable water. The project will make available 40 acre-feet per year to agricultural lands adjoining or near the WRRF. This is considered a beneficial impact (Class IV).

#### TEMPORARY LOSS OF PRODUCTIVTY OF PRIME FARMLAND

A temporary construction staging area will be established on land under the ownership of the CSD in proximity to the WRRF. The Proposed Project identifies this area to be sited on land to be converted by construction such as the solar array area, the staging area will not result in the temporary loss of agricultural productivity of about 3.0 acres of Prime Farmland on either the Project Site or the Alternative Site (Table IV-B10).

**Impact AG-3:** The use of a 3-acre construction staging area sited on land to be converted by construction by the solar array area, will result in the temporary loss of agricultural productivity of Prime Farmland as defined by the County Conservation and Open Space Element. This is considered a less than significant impact (Class III).

Table IV-B10 Farmland Temporarily Converted to A Non-Agricultural Use As A Result of the Construction Staging Areas

Important Farmlands Category <sup>1</sup>	Project Site	Alternative Site	
Prime	1.5	3.0	
Statewide Importance	0.0	0.0	
Other Productive Farmland	1.5	0.0	
Highly Productive Grazing Land	0.0	0.0	
Total:	3.0	3.0	

Source: GIS analysis derived from NRCS data for, 2012 and the San Luis Obispo County Conservation and Open Space Element.

#### Notes:

 Based on Table SL-2 and the definitions from the San Luis Obispo County Conservation and Open Space Element.

No mitigation measures are required. The temporary loss of productivity for up to 3 acres of prime farmland is considered a less than significant impact because:

- The loss of productivity will be temporary for the duration of construction activities, estimated to be about 2 years.
- Mitigation included in the project description will result in the permanent protection of at least 22.0 acres of Prime Farmland, as discussed above under impact AG-1.
- The temporary loss of revenue from a 3-acre portion of the 221 acre Project Site, or the 215.0 acre Alternative Site will be insignificant. Assuming 3 acres of vegetable crops at an average per-acre value of \$6,741 (see Table IV-B.2), the total lost crop value would be \$20,223 per year for two years, or 0.01% of the total value of vegetable crops generated in 2014 (\$195,329,000).

### CONFLICTS BETWEEN URBAN LAND USES AND ONGOING AGRICULTURAL OPERATIONS

The Project Site and the Alternative site are designated *Agriculture* by the County General Plan. According to Table 2-2 of the LUO, *Public Utility Facilities* (which includes wastewater treatment facilities) is an allowed use in the Agriculture land use category subject to the approval of a Conditional Use Permit (CUP) by the County Planning Commission.

Construction of the WRRF on the Project Site would place an industrial use of approximately 11.0 acres in close proximity to ongoing agricultural operations, potentially burdening local agricultural operations. The dust, noise, odors, chemicals, aircraft and other machinery, and hours of operation associated with agricultural operations may be perceived as a minor nuisance to employees at the WRRF.

## Mitigation Incorporated In The Project Description

Although the CSD intends to lease the productive farmland surrounding the WRRF for continued agricultural production, the possibility exists that this land may not be owned by the CSD at some time in the future. Accordingly, the project incorporates the required

agricultural buffers around the WRRF which would apply to both the Project Site and Alternative Site. The purpose of the buffer is to protect employees and visitors to the WRRF from the effects of ongoing agricultural activities and to help minimize the potential for complaints.

The placement of an industrial facility on a parcel used for cultivation also raises concerns regarding the viability of the remainder for continuing agricultural operations. In this case, the CSD has purchased the parent parcels of the 221.1 acre Project Site and to lease the remainder for farming. The size, shape and location of the WRRF and solar array will leave viable portions on each parent parcel that would be a pre-existing condition that a prospective farmer would be aware of prior to entering into a lease.

The potential for the WRRF to result in the conversion of Prime Farmland or Statewide Importance to a non-agricultural use, or for conflicts to arise with surrounding agricultural uses is considered less than significant because:

- A wastewater treatment plant is considered a conditionally allowed use on land zoned Agriculture.
- The Project Site and Alternative Site are located in a rural agricultural area which is sparsely populated.
- The area devoted to an industrial use will be limited to about 8 acres, leaving the remainder of the parcel owned by the CSD to continue to be farmed.
- A minimum of 16.0 acres of Prime Agricultural land will be placed in a permanent conservation easement.
- As discussed in the Regulatory Setting, San Luis Obispo County has adopted a right-to-farm ordinance. This ordinance establishes a policy that agricultural operations, conducted according to accepted customs and standards, are not nuisances. Under the ordinance, purchasers of property in the County must sign a disclosure statement notifying the purchaser of the potential inconvenience and discomfort associated with agricultural operations (specifically including aircraft) and of the County's policies supporting the right to farm. Under the County's "Right to Farm" policies, impacts from customary agricultural operations on adjacent land are considered normal and acceptable conditions of rural living.
- The project incorporates an agricultural buffer around the WRRF to minimize conflicts with ongoing agricultural operations, consistent with the County's Agricultural Buffer Policies and Procedures.

**Impact AG-4:** Construction of the WRRF on the Project Site or Alternative Site is not expected to result in other changes to the existing environment, which due to their location or nature, could result in the conversion of Prime Farmland or Farmland of Statewide Importance (as defined by the Conservation and Open Space Element) to non-agricultural use, or conflicts with agricultural use or agricultural operations (e.g. placement of urban and other uses adjacent to agricultural uses resulting in potential conflicts). This impact is considered less than significant (Class III).

The potential for the WRRF on either the Project Site or the Alternative Site to give rise to complaints and lead to an increase in public support for the conversion of surrounding agricultural lands is considered negligible. No mitigation measures are necessary.

#### **INDIRECT IMPACTS**

Indirect impacts to agriculture that may arise from an industrial use may include increased regulations and liability insurance to protect the farmer. These indirect impacts can result in

a greater expenditure of time and money which in turn can adversely impact the viability of agricultural operations. Some farmers sensitive to nearby public uses voluntarily limit their hours of operation and do not intensively use the portions of their property closest to urban uses, in effect establishing informal buffer zones on their own property. This has the effect of lowering the crop yield, and therefore the long-term economic viability, of the agricultural operation. Over time, this may provide an incentive for the property owners of adjacent lands under Williamson Act contract to file a Notice of Non-Renewal.

**Impact AG-5:** Construction of the WRRF on either the Project Site or the Alternative Site is not expected to result in the indirect conversion of Prime Farmland or Farmland of Statewide Importance, resulting from a net decrease in the amount of designated agricultural land in the county, as represented by the Agriculture land use designation of the current San Luis Obispo County General Plan Land Use Map. This impact is considered Less Than Significant (Class III).

The potential for the WRRF to result in the indirect conversion of Prime Farmland, Unique Farmland or Farmland of Statewide Importance, resulting from a net decrease in the amount of designated agricultural land in the county, as represented by Agriculture designation of the General Plan is considered less than significant because:

- A wastewater treatment plant is considered a conditionally allowed use on land zoned Agriculture.
- The Project Site and Alternative Site are located in a rural agricultural area which is sparsely populated.
- The area devoted to an industrial use will be limited to about 8.0 acres, leaving the remaining land, owned by the CSD, to continue to be farmed.
- The project incorporates an agricultural buffer around the WRRF to minimize conflicts with ongoing agricultural operations, consistent with the County's Agricultural Buffer Policies and Procedures.
- A minimum of 16.0 acres of Prime Agricultural land will be placed in a permanent conservation easement.

### **CUMULATIVE IMPACTS AND MITIGATION MEASURES**

## **Cumulative Setting**

According to the 2014 San Luis Obispo Agriculture Crop Report, there were about 1.1 million acres of harvested crops in the County in 2014. The total value of crops produced was lower than in previous years, primarily as a result of several years of drought. Urbanization has led to a net decrease of 4,411 acres of important farmland in the County from 2008 to 2012 (Table IV-B11). Thus, there has been a general decline in the acreage of productive farmland in the County, even though the total crop value has increased during the same period.

### **CUMULATIVE LOSS OF IMPORTANT FARMLAND**

As discussed under impact AG-1, development of the WRRF on either the Project Site or the Alternative Site would result in the permanent conversion of up to 8 acres of productive farmland on the Project Site and up to 9 acres on the Alternative Site.

Impact AG-6: Development of the WRRF on either the Project Site of the Alternative Site, together with regional development, will contribute to the cumulative loss of Prime Farmland as defined by the County Conservation and

Open Space Element. This impact is considered cumulatively considerable and significant and unavoidable (Class I).

## Level of impact after implementation of Mitigation Measures

Although implementation of mitigation measures AG-1 and AG-2 will result in the permanent conservation of Prime Farmland plus an increase in irrigation water available to prospective farmers, the permanent loss of important agricultural soils for farming on either site is considered cumulatively considerable and significant and unavoidable (Class I).

No additional mitigation measures are available.

Table IV-B11 Conversion of Productive Farmland To Non-Agricultural Use San Luis Obispo County 2008 - 2012

Land Use Category	Total Acreage Inventoried		2010-2012 Net	Total Acreage Inventoried		2008-2010 Net
Land Ose Gategory	2010	2012	Acreage Changed	2008	2010	Acreage Changed
Prime Farmland	41,317	40,860	-457	41,569	41,319	-250
Farmland of Statewide Importance	21,132	20,884	-248	21,109	21,132	23
Unique Farmland	39,950	39,979	29	38,777	39,950	1,173
Farmland of Local Importance	307,326	304,401	-2,925	309,081	307,325	-1,756
IMPORTANT FARMLAND SUBTOTAL	409,725	406,124	-3,601	410,536	409,726	-810
Grazing Land	1,181,015	1,183,035	2,020	1,183,042	1,181,015	-2,027
AGRICULTURAL LAND SUBTOTAL	1,590,740	1,589,159	-1,581	1,593,578	1,590,741	-2,837
Urban and Built-up Land	45,017	45,573	556	44,392	45,017	625
Other Land	242,999	244,024	1,025	239,045	242,998	3,953
Water Area	8,780	8,780	0	10,521	8,780	-1,741
TOTAL AREA INVENTORIED	1,887,536	1,887,536	0	1,887,536	1,887,536	0

Source: California Department of Conservation, Farmland Mapping and Monitoring Program,

http://www.conservation.ca.gov/dlrp/fmmp/Pages/SanLuisObispo.aspx

## 8. List of Abbreviated Terms

Abbreviation	Term	
AG	Agriculture	
CDC	California Department of Conservation	
CEQA	California Environmental Quality Act	
EIR	Environmental Impact Report	
FMMP	Farmland Mapping and Monitoring Program	
L	Local Importance Farmland	
LCA	Land Contract Act	
LESA	Land Evaluation and Site Assessment	
LUO	Land Use Ordinance	
NOP	Notice of Preparation	
NRCS	National Resources Conservation Services	
U	Unique Farmland	
USDA	United States Department of Agriculture	
S	Statewide Importance Farmland	

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## C. BIOLOGICAL RESOURCES

## 1. Environmental Issue

This section describes the existing biological resources, policies and regulations that pertain to the CSWP and provides an assessment of direct and indirect and cumulative project impacts.

# 2. Sources Used In This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications as listed in the Technical Appendix report prepared by Althouse and Meade, and including:

- California Natural Diversity Data Base.
- U.S. Fish and Wildlife Service Critical Habitat Map.
- California Native Plant Society On-line Inventory of Rare and Endangered Plants of California
- Morro Bay to Cayucos Connector EIR, County of San Luis Obispo

A complete list of references is provided in the Technical Appendix Biological Technical Report.

# 3. Scoping Issues for Biological Resources

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issue relating to biological resources was raised during the scoping process and is addressed in this section:

- The US Fish and Wildlife Services commented verbally via telephone regarding habitat for California Red-legged Frog and Steelhead trout.
- The California Coastal Commission response letter indicated the importance the identifying impacts and mitigation measures related to Environmentally Sensitive Habitat Areas.

## 4. Environmental and Regulatory Setting

## Regulatory Setting

Federal, state and local regulations pertaining the biological resources are discussed below.

#### **FEDERAL REGULATIONS**

Endangered Species Act – The federal Endangered Species Act (ESA) provides the legal framework for the listing and protection of species (and their habitats) identified as being endangered or threatened with extinction. Actions that jeopardize endangered or threatened species and the habitats upon which they rely are considered a 'take' under the Endangered Species Act. Take of a federally listed threatened or endangered species is prohibited without a special permit. The Endangered Species Act allows for take of a threatened or endangered species incidental to development activities once a habitat conservation plan has been prepared to the satisfaction of the US Fish and Wildlife Service (USFWS) and an incidental take permit has been issued. The Endangered Species Act also allows for the take of threatened or endangered species after consultation has deemed that development activities will not jeopardize the continued existence of the species. The federal Endangered Species Act also provides for a Section 7 Consultation when a federal permit is required, such as a Clean Water Act Section 404 permit.

"Critical Habitat" is a term within the federal Endangered Species Act designed to guide actions by federal agencies (as opposed to state, local, or other agency actions) and defined as "an area occupied by a species listed as threatened or endangered within which are found physical or geographical features essential to the conservation of the species, or an area not currently occupied by the species which is itself essential to the conservation of the species."

Section 404 Clean Water Act Regulations – The Clean Water Act provides wetland regulation at the federal level and is administered by the US Army Corps of Engineers (USACE). The purpose of the Clean Water Act is to restore and maintain the chemical, physical, and biological integrity of all waters of the U.S. Permitting is required for filling waters of the U.S. (including wetlands). Permits may be issued on an individual basis, or may be covered under approved nationwide permits.

Migratory Bird Treaty Act – All migratory bird species that are native to the U.S. or its territories are protected under the federal Migratory Bird Treaty Act, as amended under the Migratory Bird Treaty Reform Act of 2004. The Migratory Bird Treaty Act is generally protective of migratory birds.

#### STATE REGULATIONS

California Environmental Quality Act (CEQA) – CEQA requires that biological resources be considered when assessing the environmental impacts that are the result of proposed actions. The lead agencies determine the scope of what is considered an impact and what constitutes an "adverse effect" on a biological resource.

California Fish and Game Code – The California Fish and Game Code regulate the taking or possession of birds, mammals, fish, amphibians, and reptiles, as well as natural resources such as wetlands and waters of the state. It includes the California Endangered Species Act, Streambed Alteration Agreement regulations, and California Native Plant Protection Act. Fish and Game Code states that it is "unlawful to take, possess, or needlessly destroy the nest or eggs of any bird, except as otherwise provided by this code or any regulation made pursuant thereto," and "unlawful to take, possess, or destroy any birds of prey or to take, possess, or destroy the nest or eggs of any such bird" unless authorized.

California Endangered Species Act - The California Endangered Species Act (CESA), similar to the federal Endangered Species Act, contains a process for listing of species and regulating potential impacts to listed species. State threatened and endangered species include both plants and wildlife, but do not include invertebrates. The designation "rare species" applies only to California native plants. State threatened and endangered plant species are regulated largely under the Native Plant Preservation Act in conjunction with the California Endangered Species Act. State threatened and endangered animal species are legally protected against "take." The CESA authorizes the Caliifornia Department of Fish and Wildlife (CDFW) to enter into a memorandum of agreement for take of listed species to issue an incidental take permit for a state-listed threatened and endangered species only if specific criteria are met. Section 2080 of the CESA prohibits the take of species listed as threatened or endangered pursuant to the Act. Section 2081 allows CDFW to authorize take prohibited under Section 2080 provided that: 1) the taking is incidental to an otherwise lawful activity; 2) the taking will be minimized and fully mitigated; 3) the applicant ensures adequate funding for minimization and mitigation; and 4) the authorization will not jeopardize the continued existence of the listed species.

Streambed Alteration Agreement Regulations – Section 1602 of the Fish & Game Code requires any person, state, or local governmental agency to provide advance written notification to CDFW prior to initiating any activity that would: 1) divert or obstruct the natural

flow of, or substantially change or remove material from the bed, channel, or bank of any river, stream, or lake; or 2) result in the disposal or deposition of debris, waste, or other material into any river, stream, or lake. The state definition of "lakes, rivers, and streams" includes all rivers or streams that flow at least periodically or permanently through a well-defined bed or channel with banks that support fish or other aquatic life, and watercourses with surface or subsurface flows that support or have supported riparian vegetation.

California Native Plant Protection Act – Section 1900-1913 of the California Fish and Game Code contains the regulations of the Native Plant Protection Act of 1977. The intent of this act is to help conserve and protect rare and endangered plants in the state.

Regional Water Quality Control Board – The RWQCB not only regulates impacts to water quality in federal waters of the U.S. under Section 401 of the Clean Water Act, but they also regulate any isolated waters that are impacted under the state Porter Cologne Act utilizing a Waste Discharge Requirement. Discharge of fill material into waters of the State not subject to the jurisdiction of the USACE pursuant to Section 401 of the Clean Water Act may require authorization pursuant to the Porter Cologne Act through application for waste discharge requirements or through waiver of waste discharge requirements.

California Coastal Act - The California Coastal Act of 1976 established the Coastal Zone and appointed the California Coastal Commission to provide long-term protection of California's coastal resources. In partnership with coastal cities and counties, the Coastal Commission plans and regulates the use of land and water in the coastal zone. Development within the Coastal Zone typically requires a Coastal Development Permit from either the Coastal Commission or the local agency overseeing a Local Coastal Program.

Natural Community Conservation Planning (NCCP) Act of 1991 – The NCCP Act is designed to conserve natural communities at the ecosystem scale while accommodating compatible land use. CDFW is the primary state agency that implements the NCCP. The NCCP plan provides for the comprehensive management and conservation of multiple wildlife species. It identifies and provides for regional protection of natural wildlife diversity while allowing for compatible and appropriate development and growth.

California Oak Woodland Conservation Act – This act established the Oak Woodland Conservation Program, administered by the Wildlife Conservation Board, to help local jurisdictions protect and enhance their oak woodland resources. It offers landowners, conservation groups, and cities/counties and opportunity to obtain funding for projects designed to conserve and restore California's oak woodlands.

## **LOCAL REGULATIONS**

## County of San Luis Obispo General Plan and Local Coastal Plan

The Estero Area Plan was developed with input primarily from the community of Cayucos and is a part of the Land Use Element (LUE) and Local Coastal Plan (LCP) of the San Luis Obispo County General Plan. It is meant to guide development and protect resources within the plan area. The plan identifies Sensitive Resource Areas (SRA), which are also designated as Environmentally Sensitive Habitat Areas (ESHA) under the LCP. The following policies are applicable to the Proposed Project. Section IV-L Land Use and Planning contain a full tabulation of Coastal Plan policies.

#### Coastal Plan Policies

## **ENVIRONMENTALLY SENSITIVE HABITAT AREA**

## Policy 1: Land Uses Within or Adjacent to Environmentally Sensitive Habitats

New development within or adjacent to locations of environmentally sensitive habitats (within 100 feet unless sites further removed would significantly disrupt the habitat) shall not significantly disrupt the resource. Within an existing resource, only those uses dependent on such resources shall be allowed within the area.

**Policy 2: Permit Requirement.** As a condition of permit approval, the applicant is required to demonstrate that there will be no significant impact on sensitive habitats and that proposed development or activities will be consistent with the biological continuance of the habitat. This shall include an evaluation of the site prepared by a qualified professional which provides: a) the maximum feasible mitigation measures (where appropriate), and b) a program for monitoring and evaluating the effectiveness of mitigation measures where appropriate.

**Policy 3: Habitat Restoration.** The county or Coastal Commission should require the restoration of damaged habitats as a condition of approval when feasible.

#### **COASTAL STREAMS**

**Policy 20: Coastal Streams and Riparian Vegetation.** Coastal streams and adjoining riparian vegetation are environmentally sensitive habitat areas and the natural hydrological system and ecological function of coastal streams shall be protected and preserved.

Policy 21: Development in or Adjacent to a Coastal Stream. Development adjacent to or within the watershed (that portion within the coastal zone) shall be sited and designed to prevent impacts which would significantly degrade the coastal habitat and shall be compatible with the continuance of such habitat areas. This shall include evaluation of erosion and runoff concerns

**Policy 22: Fish and Game Review of Streambed Alterations.** Significant streambed alterations require the issuance of a California Department of Fish and Game 1601-1603 agreement. The Department should provide guidelines on what constitutes significant streambed alterations so that the county and applicants are aware of what is considered a "significant" streambed alteration. In addition, streambed alterations may also require a permit from the U.S. Army Corp of Engineers.

Policy 23: County and State Review of Coastal Stream Projects. The State Water Resources Control Board and the county shall ensure that the beneficial use of coastal stream waters is protected, for projects over which it has jurisdiction. For projects which do not fall under the review of the State Water Resources Control Board, the county (in its review of public works and stream alterations) shall ensure that the quantity and quality surface water discharge from streams and rivers shall be maintained at levels necessary to sustain the functional capacity of streams, wetland, estuaries and lakes.

**Policy 26: Riparian Vegetation.** Cutting or alteration of naturally occurring vegetation that protects riparian habitat is not permitted except for permitted streambed alterations

(defined in Policy 23) and where no feasible alternative exists or an issue of public safety exists.

### Policy 28: Buffer Zone for Riparian Habitats

In rural areas (outside the USL) a buffer setback zone of 100 feet shall be established between any new development (including new agricultural development) and the upland edge of riparian habitats.

#### TERRESTRIAL ENVIRONMENTS

**Policy 29: Protection of Terrestrial Habitats.** Designated plant and wildlife habitats are environmentally sensitive habitat areas and emphasis for protection should be placed on the entire ecological community. Only uses dependent on the resource shall be permitted within the identified sensitive habitat portion of the site.

**Policy 30: Protection of Native Vegetation.** Native trees and plant cover shall be protected wherever possible. Native plants shall be used where vegetation is removed.

**Policy 35: Protection of Vegetation.** Vegetation which is rare or endangered or serves as cover for endangered wildlife shall be protected against any significant disruption of habitat value. All development shall be designed to disturb the minimum amount possible of wildlife or plant habitat.

#### Title 23 Coastal Zone Land Use Ordinance

Title 23 Coastal Zone Land Use Ordinance (CZLUO) contains the following provisions related to the biological resources of the Proposed Project Proposed Project:

#### 23.07.170

- b. Required findings: Approval of a land use permit for a project within or adjacent to an Environmentally Sensitive Habitat shall not occur unless the applicable review body first finds that:
  - (1) There will be no significant negative impact on the identified sensitive habitat and the proposed use will be consistent with the biological continuance of the habitat.
  - (2) The proposed use will not significantly disrupt the habitat.
  - e. Development standards for environmentally sensitive habitats. All development and land divisions within or adjacent to an Environmentally Sensitive Habitat Area shall be designed and located in a manner which avoids any significant disruption or degradation of habitat values. This standard requires that any project which has the potential to cause significant adverse impacts to an ESHA be redesigned or relocated so as to avoid the impact, or reduce the impact to a less than significant level where complete avoidance is not possible.
  - (1) Development within an ESHA. In those cases where development within the ESHA cannot be avoided, the development shall be modified as necessary so that it is the least environmentally damaging feasible alternative. Development shall be consistent with the biological continuance of the habitat. Circumstances in which a development project would be allowable within an ESHA include:
    - iii. Incidental public services and utilities in wetlands. Essential incidental public services and utilities pursuant to ESHA Policy 13 and CZLUO Section 23.07.172(e).
  - (2) Development in ESHA to avoid a takings. If development in an ESHA must be allowed to avoid an unconstitutional taking, then all of the following standards shall apply with respect to such development:

- i. Avoidance of takings. The amount and type of development allowed shall be the least necessary to avoid a takings.
- ii. Impacts avoided/minimized. All development in and impacts to ESHA shall be avoided to the maximum extent feasible. Any unavoidable impacts shall be limited to the maximum extent feasible.
- iii. Mitigation required. All adverse impacts to the ESHA shall be fully mitigated.
- (3) Steelhead stream protection: net loss stream diversions prohibited. Diversions of surface and subsurface water will not be allowed where a significant adverse impact on the steelhead run, either individually or cumulatively, would result.
- (4) Other prohibited uses. Prohibited development activities include:
  - i. Placement of barriers to fish. In-stream barriers to sensitive freshwater species migration, including types of dams not covered above, weirs, and similar obstacles which would substantially interfere with normal migration patterns, except where barriers cannot be avoided and impacts are mitigated to less than significant levels (e.g., with fish ladders or other effective bypass systems).
  - ii. Destruction of rearing habitats. Development which would cause loss of spawning or rearing habitat through flooding, siltation or similar impacts.
  - iii. Disturbance or removal of native riparian vegetation on the banks of streams. Locations constituting an exception to this requirement are:
    - 1.In-between stream banks when essential for flood control purposes and no less environmentally damaging alternative is available to protect existing structures;
    - 2.On roads, trails, or public utility crossings where vegetation removal cannot be avoided, and where there is no feasible alternative and no significant disruption would result; and
    - 3. For native habitat restoration and protection projects.
  - i. Interference with fish migration. Any other development activity that would raise overall stream temperatures to unfavorable levels, or that would interfere with normal fish migration and movement within the stream.
- (5) Grading adjacent to Environmentally Sensitive Habitats shall conform to the provisions of Section 23.05.034c (Grading Standards).

### City of Morro Bay Local Coastal Plan

The City of Morro Bay established a Local Coastal Plan (LCP) to guide development in the coastal zone. The LCP conforms to California Coastal Act goals and policies, while reflecting the unique characteristics of the local Morro Bay coastal community. The Morro Bay LCP governs decisions the determine the conservation and use of coastal resources. The LCP designates local Environmentally Sensitive Habitat Areas (ESHA) as defined by the California Coastal Act. It specifies ESHA policies that are meant to avoid and minimize disturbances to ESHAs defined in the LCP.

## **Environmental Setting**

### PROPOSED WRRF SITE

The Proposed Project Study Area is approximately 0.6 miles east of State Route 1 along Toro Creek Road. The site is bordered on the west by Toro Creek Road. Approximately 300 feet west of Toro Creek Road lies Toro Creek, a perennial stream. The land east of Toro Creek Road is composed of active agricultural land bordered by ruderal vegetation, dominated by non-native annual grasses such as ripgut brome (*Bromus diandrus*) and non-native forbs. The field is surrounded by barbed wire fence. Rock outcroppings on the

adjacent hill indicate a serpentine influence in the soils in the site. At the southern tip of the field, on the toe of the slope, there is a small patch of transitional habitat that shows similarities to the uphill native grassland habitat. In this area, more native plant species were observed than the adjacent ruderal vegetation, and club- haired Mariposa lily (*Calochortus clavatus* var. *calavatus*), a species of concern, was detected.

Additionally, this agricultural field is bisected by an agricultural ditch which conveys storm flows from an existing natural drainage on the slope above the site in a northwest direction toward Toro Creek. There is no riparian habitat in the agricultural ditch, which likely only holds water during heavy rain events. Because the ditch is a historic modification of a natural drainage, it may be considered potential waters of the U.S. There is a small patch of riparian habitat at the eastern edge of the agricultural field where the natural drainage flows into the ditch. On the west side of Toro Creek Road, the land is split into two separate fields divided by a barbed wire fence. The field to the south shows signs of recent grazing and is made up entirely of annual grassland dominated by non-native grasses. The field to the north is an active agricultural field. Access to the Proposed Project Study Area is from Toro Creek Road, which crosses Toro Creek by bridge southwest of the site.

### PROPOSED PIPELINE ROUTES - COASTAL ZONE

Toro Creek, at the bridge location, is dominated by arroyo willow and Fremont's cottonwood (*Populus fremontii*). The understory is a dense mixture of poison oak, stinging nettle (*Urtica dioica* ssp. *holosericea*), and California mugwort (*Artemisia douglasiana*), along with other shrubs and forbs. The creek is flowing and has a mix of cobblestone and sandy bottom.

Along the Phase 2 conveyance pipeline route, willow riparian habitat is present where the pipeline crosses Old Creek via Cabrillo Street in Cayucos. Old Creek is dominated by a dense arroyo willow canopy and poison oak understory. Water is flowing in the creek along a sandy bottom.

Road bridges over Toro Creek, Willow Creek, Old Creek, and Alva Paul Creek box culvert may provide roosting habitat for bats, including pallid bats, or habitat for nesting birds.

Along the conveyance pipeline route, annual grassland habitat occurs along Toro Creek Road and State Route 1 and is dominated by weedy non-native grasses and forbs. Other pipeline routes are generally within paved areas. Along these conveyance pipeline routes, the habitat consists of weedy, non-native roadside vegetation and ornamental species in the residential areas.

## PROPOSED PIPELINE ROUTES - INLAND ZONE

Annual grassland habitat occurs along the conveyance pipeline route in the inland zone in the Toro Creek Road right of way.

### **ALTERNATIVE WRRF SITE**

The Alternative Project Study Area is situated in a valley along Willow Creek, approximately one mile northeast of State Route 1. The site consists of active cropland with a small shed, water tanks, and an operational well on the southern edge. Willow Creek, a seasonal stream, is adjacent to the site on the south side. An unnamed tributary, also seasonal, is adjacent to the site on the west side. The drainages vary in distance from the Study Area, from approximately 10 feet to 50 feet. There was no water in either drainage during any of our site visits. Riparian habitat in Willow Creek is composed of arroyo willow (*Salix lasiolepis*) and California sycamore (*Platanus racemosa*) canopy. Riparian habitat in the western drainage is degraded from cattle grazing. Access to the Alternative Project Study Area is currently off

Montecito Road, on a private gravel road over Willow Creek. Two culverts (2 and 6 foot diameters) convey Willow Creek beneath the bridge.

The Alternative Project Study Area is bordered on the south and west sides by willow riparian habitat. On the west side, the canopy is dominated by arroyo willow and the understory consists of patchy clusters of coyote bush (*Baccharis pilularis*). This drainage has been grazed by cattle (observed in October 2015), and the sparse understory is evidence of that. The drainage on the southern side has a dense arroyo willow canopy. The southern bank is dominated by a thick poison oak understory, while the northern bank understory is dominated by poison hemlock (*Conium maculatum*) and other non-natives. Neither drainage had water in it at the time of site visits. Conveyance pipelines within the Alternative Project Study Area will cross Willow Creek via a new access road from Montecito Road, and via a bridge adjacent to Old Creek Road.

#### **HABITAT TYPES**

There are no sensitive natural communities listed by the California Natural Diversity Database (CNDDB) within the vicinity of the Proposed or Alternative Project Sites.

Five habitat types are present in the Proposed Project Study Area: agriculture, California annual grassland, developed, ruderal vegetation, and willow riparian. Three habitat types are present in the Alternative Project Study Area: agriculture, developed, and willow riparian. Approximate acreages for each habitat type present during the 2016 surveys are provided (Table IV-C-1).

**TABLE IV-C1. HABITAT TYPES.** 

The approximate acreage is provided for all habitat types occurring in the Proposed Project site and Alternative Project site.

Habitat Type	<b>Proposed Site</b>	Alternative Site
Agriculture	10.82	7.17
California annual grassland	0.22	0.0
Developed	0.39	0.01
Ruderal vegetation	3.40	0.0
Willow Riparian	0.10	0.04

In addition to these five habitat types within the Proposed and Alternative Study Areas, the conveyance infrastructure passes through eucalyptus forest. Descriptions of all six habitat types are below.

### **Agriculture**

Agricultural land in the Proposed Project Study Area currently consists entirely of flat oat/barley hay fields. During the October 2015, the field on the southeast side of Toro Creek Road was being used to grow a variety of crops.

Agricultural land in the Alternative Project Study Area is divided into two separate fields. The larger field on the west side of the property is an oat/barley hay field. The smaller field to the east is being used to grow fava beans.

### California annual grassland

California annual grassland in the Proposed Project Study Area consists of a toe slope leading down to the southern end of the agricultural field on the southeast side of the road, as well as non-native grassland habitat next to Toro Creek Road along the conveyance route. On the toe slope, vegetation is dominated by non-native grasses, primarily ripgut brome, but

there is a stronger presence of native bunchgrass, Nevada bluegrass (*Poa secunda*), and native forbs, including club-haired Mariposa lily, a CRPR 4.3 species of concern. This habitat is a transitional zone between the ruderal, weedy habitat bordering the agricultural field and the native grassland upslope.

There is no California annual grassland in the Alternative Project Study Area. Along the conveyance pipeline route, all annual grassland habitat is along State Route 1 and dominated by weedy non-native grasses and forbs.

### Developed

Developed habitat in the Proposed Project Study Area includes Toro Creek Road, where the conveyance pipelines will be installed between the Water Resource Recovery Facility and State Route 1, and pipeline routes in Cayucos and Morro Bay streets. The location of the tie-in to the outfall at the Morro Bay WWTF is developed land within the Coastal Zone .

Developed habitat in the Alternative Project Study Area includes Montecito Road and Old Creek Road, where pipelines will be installed between the Water Resource Recovery Facility and State Route 1.

### **Eucalyptus**

A stand of blue gum eucalyptus (*Eucalyptus globulus*) is located in the riparian corridor where Toro Creek Road crosses Toro Creek, along the conveyance pipeline route between the Proposed Project Study Area and State Route 1. The stand is bisected by the road. There is little to no understory vegetation.

### **Ruderal Vegetation**

Ruderal Vegetation in the Proposed Project Study Area consists of weedy, non-native vegetation bordering the agricultural field on the southeast side of Toro Creek Road and along Toro Creek Road itself. This habitat is dominated by non-native grasses and forbs with scattered California coffeeberry (*Frangula californica*) shrubs. There is a man-made ditch that bisects the agricultural field which conveys storm water during large rain events from the historic drainage upslope to Toro Creek, across the road. This drainage displays the same ruderal vegetative characteristics as the bordering habitat.

There is no ruderal vegetation present in the Alternative Project Study Area. Along the conveyance pipeline route, this habitat consists of weedy, non-native roadside vegetation and ornamental species in the residential areas.

### Willow Riparian

Willow riparian habitat in the Proposed Project Study Area is found on the far eastern side of the CSD property. At this point, a historic drainage from the slope above the agricultural field enters the field. The canopy is dominated by arroyo willow with a sparse understory. A deep cut from past flows is visible underneath the canopy and dissipates at the point of transition from willow riparian to ruderal vegetation in the agricultural ditch.

Conyeyance pipelines will cross Toro Creek via a bridge adjacent to Toro Creek Road. Toro Creek, at the bridge location, is dominated by arroyo willow and Fremont's cottonwood (*Populus fremontii*). The understory is a dense mixture of poison oak, stinging nettle (*Urtica dioica* ssp. *holosericea*), and California mugwort (*Artemisia douglasiana*), along with other shrubs and forbs. The creek is flowing and has a mix of cobblestone and sandy bottom.

The Alternative Project Study Area is bordered on the south and west sides by willow riparian habitat. On the west side, the canopy is dominated by arroyo willow and the understory consists of patchy clusters of coyote bush (*Baccharis pilularis*). This drainage has been grazed by cattle (observed in October 2015), and the sparse understory is evidence of that. The drainage on the southern side has a dense arroyo willow canopy. The southern bank is

dominated by a thick poison oak understory, while the northern bank understory is dominated by poison hemlock (*Conium maculatum*) and other non-natives. Neither drainage had water in it at the time of site visits. Conveyance pipelines within the Alternative Project Study Area will cross Willow Creek via a new access road from Montecito Road, and via a bridge adjacent to Old Creek Road.

### **Summary of Habitat for Plants and Animals**

Botanical surveys conducted in April, May, and June 2016 identified 102 species, subspecies, and varieties of vascular plants at the project sites. Appropriate habitat and soil conditions are suitable for six special status plants in the Proposed Project Study Area. One special status plant species, club-haired mariposa lily (*Calochortus clavatus* ssp. *clavatus*), was observed in the Proposed Project Study Area. No special status plant species were observed in the Alternative Project Study Area.

Wildlife species detected at the Proposed and Alternative Project Study Areas include one fish, one amphibian, one reptile, 27 birds, and three mammals. Appropriate habitat is present at the project sites for 17 special status animals. One federally listed animal, steelhead (*Oncorhynchus mykiss irideus*), was detected in the Proposed Project Study Area. No state listed or federally species were detected at the Alternative Project Site.

# 5. Standards of Significance

For purposes of this EIR, an biological resources impact is considered significant if implementation of the Project would result in any of the following:

- 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?
- 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 US Fish and Wildlife Service?
- 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?
- 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, specifically Title 23 Coastal Zone Land Use Ordinance section 23.07.170 for Environmentally Sensitive Habitat.
- Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?

# 6. Impacts Found to Be Less Than Significant

The following aspects of the project were determined in the Initial Study, the Biological Technical Report and EIR section IV-L to have no impact or less than significant impact on Biological Resources:

The Proposed Project, with mitigation measures described below and including features incorporated into the project, would not conflict with any local policies or ordinances protecting biological resources.

The Proposed Project would not conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan.

## **Special Status Species Not Expected to Occur**

Table A-1 in Appendix A lists 95 special status plant species reported from the region which have no potential to occur within the Proposed or Alternative Project Study Areas and for which the project would have no effect. Table A-2 in Appendix A lists 24 special status animal species reported from the region which have no potential to occur within the Proposed or Alternative Project Study Areas and for which the project would have no effect.

## **Potential Sensitive Communities Not Occurring**

The CNDDB reports eight sensitive natural communities in the Atascadero, Cambria, Cayucos, Cypress Mountain, Morro Bay North, Morro Bay South, San Luis Obispo, Templeton, and York Mountain quadrangles. None of the sensitive natural communities listed in Table IV-C2 below are found in the Proposed or Alternative Project Sites.

**TABLE IV-C2 POTENTIAL SENSITIVE NATURAL COMMUNITIES** 

	Common Name	Potential Habitat?	Effect of Proposed Activity
1	Central Dune Scrub	No. Dune habitat is not found on either project site.	No Effect
2	Central Maritime Chaparral	No. Chaparral is not present on either project site.	No Effect
3	Coastal and Valley Freshwater Marsh	No. Wetland habitat is not present on either project site.	No Effect
4	Coastal Brackish Marsh	No. Wetland habitat is not found on either project site.	No Effect
5	Monterey Pine Forest	No. Monterey pine forest is not found on either project site	No Effect
6	Northern Coastal Salt Marsh	No. Wetland habitat is not found on either project site.	No Effect
7	Northern Interior Cypress Forest	No. Cypress forest is not found on either project site.	No Effect
8	Valley Oak Woodland	No. Oak woodland is not found on either project site.	No Effect

As noted in the table above, the Proposed Project would not 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.

# 7. Project Impacts and Mitigation Measures

### **Special Status Species**

The CNDDB and the CNPS On-line Inventory of Rare and Endangered Plants of California contain records for 142 special status species within the designated search area. The search area includes the following nine USGS 7.5-minute quadrangles surrounding the project sites: Atascadero, Cambria, Cayucos, Cypress Mountain, Morro Bay North, Morro Bay South, San Luis Obispo, Templeton, York Mountain. Appropriate habitat and soil conditions are present in the project sites for 6 special status plants and 17 special status animals. One special status plant species, club-haired mariposa lily, was detected in the Proposed Project Study Area. Biological Technical Report Appendix A Figures 6 and 7 depict the current GIS data for special status species and critical habitat mapped in the vicinity of the Study Areas by the CNDDB and the U.S. Fish and Wildlife Service (USFWS).

### INTRODUCTION TO CALIFORNIA RARE PLANT RANKS (FORMERLY CNPS LISTS)

Plant species are considered rare when their distribution is confined to localized areas, when there is a threat to their habitat, when they are declining in abundance, or are threatened in a portion of their range. The California Rare Plant Rank (CRPR) categories range from species with a low threat (CRPR 4) to species that are presumed extinct (CRPR 1A). The plants of CRPR 1B are rare throughout their range. All but a few species are endemic to California. All of them are judged to be vulnerable under present circumstances, or to have a high potential for becoming vulnerable.

### INTRODUCTION TO CNDDB DEFINITIONS

"Special Plants" is a broad term used to refer to all the plant taxa inventoried by the CNDDB, regardless of their legal or protection status (CDFW October 2016). Special Plants include vascular plants and high priority bryophytes (mosses, liverworts, and hornworts).

"Special Animals" (SA) is a general term that refers to all of the animal taxa inventoried by the CNDDB, regardless of their legal or protection status (CDFW October 2016). The Special Animals list is also referred to by the California Department of Fish and Wildlife (CDFW) as the list of "species at risk" or "special status species." These taxa may be listed or proposed for listing under the California and/or Federal Endangered Species Acts, but they may also be species deemed biologically rare, restricted in range, declining in abundance, or otherwise vulnerable by one or more resource agency.

Animals listed as California Species of Special Concern (CSSC) may or may not be listed under the Federal Endangered Species Act (FESA). They are considered rare or declining in abundance in California. The Special Concern designation is intended to provide regulatory agencies, biologists, land planners, and managers with lists of species that require special consideration during the planning process to avoid continued population declines and potentially costly listing under federal and state endangered species laws. For many species of birds, the primary emphasis is on the breeding population in California. For some species that do not breed in California, but winter here, emphasis is on wintering range. The CSSC designation thus may include a comment regarding the specific protection provided such as specific nesting or wintering habitats or areas.

Animals listed as "Watch List" (WL) species are either: 1) not on the current Special Concern list, but were on previous lists and they have not been state listed under the California Endangered Species Act (CESA); or 2) were previously state or federally listed and now are on neither list; or 3) are on the list of "Fully Protected" species.

The classification of "Fully Protected" Species was the State's initial effort in the 1960s to identify and provide additional protection to those animals that were rare or faced possible extinction. Lists were created for fish, mammals, amphibians and reptiles, birds and mammals. Most fully protected species have also been listed as threatened or endangered species under the more recent endangered species laws and regulations. Fully protected species may not be taken or possessed at any time and no provision of the Fish and Game Code authorizes the issuance of permits or licenses to take any Fully Protected species.

## **Potential Special Status Plants**

## SPECIAL STATUS PLANTS DISCUSSION

There are six special status plant species that could potentially occur at the Proposed Project Study Area based on an analysis of known ecological requirements of these species and the habitat conditions that were observed at the project sites. The following discusses each species and describe habitat, range restrictions, known occurrences, and survey results for the project sites.

Botanical surveys conducted in April, May, and June 2016 identified 102 species, subspecies, and varieties of vascular plant taxa within the Proposed and Alternative Project Study Areas. These consist of 40 native species and 62 introduced species. One special status plant species was identified in the Proposed Project Study Area, club-haired mariposa lily, a CRPR 4.3 subspecies. A complete list of all plant species found during botanical surveys can be found in Biological Technical Report Appendix B Table B-1.

Miles' Milkvetch (Astragalus didymocarpus var. milesianus) is a CRPR 1B.2 subspecies known from Ventura, Santa Barbara and San Luis Obispo Counties. It is an annual species that occurs in clay soils in coastal scrub communities, or in grassland habitat near serpentine outcrops. It blooms from March to June. Potentially suitable serpentine soils and grassland habitat are found at the Proposed Project Study Area at the southern tip of the agricultural field to the east of Toro Creek Road. Most of the CNDDB occurrences are from old collections with poor location and habitat information. CNDDB occurrence <sup>#</sup>9 is a collection by R. F. Hoover from San Bernardo Creek in the Morro Bay North quadrangle in 1969, located 5 miles from the Proposed Project Site. A 1936 collection from 1.3 miles northwest of Cayucos (CNDDB <sup>#</sup>11) represents the northernmost locality record, and closest to the Study Areas, at 2.6 miles from the Alternative Project Site and 3.5 miles from the Proposed Project Study Area. Miles' milkvetch was not found in the Proposed or Alternative Project Study Areas during appropriately timed surveys in spring 2016.

Round-leaved Erodium (California macrophyllum) is a CRPR 2.1 species known from sporadic occurrences throughout the interior region of California. It is found in clay soils in woodland and grassland habitats. Potentially suitable grassland habitat is found at the Proposed Project Site at the southern tip of the agricultural field to the east of Toro Creek Road. In San Luis Obispo County this species is found from Pozo and eastern Santa Margarita through Creston, Atascadero, Templeton, and eastern Paso Robles. The most recent record of this species in the vicinity was a specimen collected in 1952 by Hoover, east of Atascadero (CNDDB #17), over 14 miles from the Study Areas. This species was not found in the Proposed or Alternative Project Study Areas during appropriately timed surveys in spring 2016.

**Club-haired mariposa lily** (*Calochortus clavatus* ssp. *clavatus*) is a CRPR 4 subspecies that occurs mainly on serpentine soils. It is a perennial bulb-forming plant that grows primarily in the South Coast Range and South Coast regions of South and Central California. One individual was observed in the Proposed Project Study Area within a small patch of grassland habitat at the southern tip of the agricultural field to the east of Toro Creek Road.

La Panza mariposa lily (Calochortus simulans) is a CRPR 1B.3 species endemic to San Luis Obispo County. La Panza mariposa lily is a perennial bulb-forming plant that blooms in large numbers when conditions are right. Potentially suitable serpentine soils and grassland habitat are found at the Proposed Project Study Area at the southern tip of the agricultural field to the east of Toro Creek Road. It occurs in the City of San Luis Obispo and outlying areas southwest to See Canyon on soils derived from serpentinite. In the Santa Margarita, Creston, and Atascadero areas it occurs on various sandy or gravelly substrates in foothill woodlands, grasslands, and in chaparral. In years with above-average rainfall La Panza mariposa lily can be locally common, and in below- average rainfall years it may only bloom in small patches or not at all. The closest reported occurrence is from approximately 9 miles east of the Study Areas on the western outskirts of Atascadero (CNDDB 58). La Panza mariposa lily was not found in the Proposed or Alternative Project Study Areas during appropriately timed surveys in the spring of 2016.

Cambria morning glory (Calystegia subacaulis ssp. episcopalis) is a CRPR 1B.2 subspecies endemic to San Luis Obispo County. It occurs in coastal grassland, coastal prairie, and open scrub and woodland habitats, blooming from April to June. Its rarity status relates to the limited distribution of this subspecies, although it may be found commonly within its range and preferred habitat type. The plant forms a small rosette and a conspicuous cream colored flower. Potentially suitable grassland habitat is found at the Proposed Project Study Area at the southern tip of the agricultural field to the east of Toro Creek Road. The nearest CNDDB occurrence is located on the north side of State Route 1 just east of Morro Bay, approximately 0.6 miles south of the summit of Black Hill (CNDDB

#4), approximately 4 miles south of the Proposed Project Study Area and 5.7 miles south of the Alternative Project Study Area. This species was not found in the Proposed or Alternative Project Study Areas during appropriately timed surveys in spring 2016.

#### **Potential Special Status Animals**

Wildlife species detected at the Proposed and Alternative Project Study Areas include one fish, one amphibian, one reptile, 27 birds, and three mammals. Twenty-six species were observed in the Proposed Project Study Area at Toro Creek and 22 species were observed in the Alternative Project Study Area at Willow Creek. Three special status species were detected in the Proposed Project Study Area: Nuttall's woodpecker, monarch butterfly (aggregation site), and steelhead, a federally listed threatened species. Four special status species were detected in the Alternative Project Study Area: Cooper's hawk, lark sparrow, loggerhead shrike, and Nuttall's woodpecker (see Section 3.4). A complete list of all wildlife species seen during site visits, as well as wildlife species that have potential to occur at the Proposed and Alternative Project Study Areas, is found in the Biological Technical Report Appendix B, Table B-2.

There are 17 special status animal species that could potentially occur in the Study Areas based on an analysis of known ecological requirements of these species and the habitat conditions that were observed in the project sites. The discussion below addresses each species and describes habitat, range restrictions, known occurrences, and survey results for the Proposed and Alternative Project Study Areas.

Cooper's Hawk (Accipiter cooperii) is a Special Animal that occurs regularly in San Luis Obispo County during the winter months and during spring and fall migration. It is generally regarded as a regular but uncommon nesting species in San Luis Obispo County. Cooper's hawks frequent oak and riparian woodland habitats, and increasingly urban areas, where they prey primarily upon small birds. There is no appropriate oak tree nesting habitat present in the Proposed or Alternative Project Study Area, and there are no reports in the CNDDB of Cooper's Hawks nesting in the area. However, at both project sites there is foraging habitat and ample prey in the form of small birds. A Cooper's hawk was observed at the Alternative Project Study Area.

**Tricolored blackbird** (*Agelaius tricolor*) is a California Species of Special Concern (nesting) that requires open water, protected nesting substrate, and foraging area with insect prey near nesting colony. There are no reports of nesting tricolored blackbirds within 10 miles of the Proposed or Alternative Project Study Areas, and no tricolored blackbirds were observed at either project site during site visits. While moderately appropriate nesting substrate is present in riparian areas adjacent to the Proposed Project Study Area, open water is lacking. It is unlikely that any tricolored-blackbirds are nesting in the area, and therefore unlikely to be impacted. Nesting bird surveys conducted prior to construction would minimize any impacts to the species.

Pallid bat (Antrozous pallidus) is a California Special Concern species. This is a large, long-eared bat occurring throughout the state from deserts to moist forests. Pallid bat is primarily a crevice roosting species and selects roosts where they can retreat from view. They frequently occur in oak woodlands where they roost in tree cavities, and have been documented roosting under bridges. These roosts are generally day or night roosts for one or a few bats. Attics may be used as roosts and during hot days they may emerge from crevices and roost on open rafters. Communal wintering or maternity colonies are more common in rock crevices and caves. This species has been recorded at 22 localities in San Luis Obispo County (Pierson 2002). CNDDB occurrence #286 is from a house in the Morro Bay area, south of the existing Morro Bay wastewater treatment plant. The exact location of the house is unknown, and the occurrence is mapped as a 1-mile radius circle. The occurrence extends to within approximately 200 fe of the conveyance pipeline location at the

intersection of State Route 1 and Atascadero Road. Pallid bat could occur in tree cavities and under bridges along the pipeline route. Bat surveys conducted prior to construction would avoid impacts to roosting bats.

Lark Sparrow (Chondestes grammacus) is a Special Animal tracked by the CNDDB due to declining state-wide populations. It remains a fairly common breeder in San Luis Obispo County, nesting on the ground in grassland habitats with adjacent oaks. There is no appropriate nesting habitat present at the Proposed or Alternative Project Study Areas, but lark sparrows may move into the Study Areas to forage from adjacent grassland areas. Multiple lark sparrows were observed at the Proposed Project Study Area, perched at the edge of the Study Area on the fence along Toro Creek Road. Nesting bird surveys conducted prior to construction would minimize any impacts to the species.

Monarch butterfly (Danaus plexippus) is a Special Animal (CDFW 2015) that winters in the San Luis Obispo area at specific aggregation sites that provide amelioration from winter weather. The eucalyptus grove on Toro Creek Road, along the conveyance pipeline south of the Proposed Project Study Area, is a known aggregation site (CNDDB #118) for monarch butterflies. In November 2016, 110 monarchs were observed at the roost trees (on the south side of Toro Creek Road), while in 2015, 1700 monarchs were observed, and 3200 were documented in 2013. Butterflies are likely present at the site, in varying numbers, from year to year and could be impacted by pipeline construction along Toro Creek Road. A small stand of eucalyptus trees, on the southwest corner of the intersection of State Route 1 and San Jacinto Street, is another known aggregation site (CNDDB #254). This site is across State Route 1 from the conveyance pipeline. Monarchs were last noted at the site in 1991, and this site is no longer suitable for monarchs due to the gradual removal of eucalyptus trees. A survey of the Toro Creek Road grove prior to construction and avoidance of roost trees would minimize impacts to monarchs.

White-tailed kite (*Elanus leucurus*) is a Fully Protected species that nests primarily in evergreen trees, especially coast live oaks, near meadows, marshes, or grasslands. There are no reports of nesting white-tailed kites within five miles of the Proposed or Alternative Project Study Areas. Appropriate foraging habitat is present adjacent to the pipeline route north of Toro Creek Road and along Old Creek Road. Moderate to poor quality nesting habitat is present in cypress and eucalyptus trees in the vicinity. Kites were not observed on the project sites during our surveys in 2015 and 2016. It is unlikely that kites are present in the Proposed or Alternative Project Study Areas, but any work on our near trees in these areas could have impacts on nesting birds. Nesting bird surveys conducted prior to construction would minimize any impacts to the species.

Western Pond Turtle (Emys marmorata) is a California Species of Special Concern that inhabits ponds and slow moving streams with adequate pools. Pond turtles will move up seasonal streams during the winter months, and can over-summer in underground burrows during dry years when ponds are empty. Moderate to poor habitat is present in Toro Creek, adjacent to the Proposed Project Study Area. The last record from Toro Creek was in 1988 (CNDDB #1049), and no turtles were observed during surveys in 2015 and 2016. Willow Creek, from State Route 1 to approximately 3.5 miles upstream, is the closest known occurrence (CNDDB #1046) to the Alternative Project Study Area. The last record for Willow Creek was in 1989, and no turtles were observed there during our surveys. Another known occurrence (CNDDB #1020) is along Old Creek in the Whale Rock Reservoir spillway and a downstream portion of the creek, less than one mile west of the Alternative Project Study Area and approximately 2 miles northwest of the Proposed Project Study Area. Any work on creek crossings over Toro Creek or Willow Creek could impact turtles or potential habitat. Preconstruction surveys and relocation efforts would minimize impacts to the species. Protective measures and Best Management Practices (BMPs) would be implemented to avoid affects turtles and their habitat.

**Tidewater Goby** (*Eucyclogobius newberryi*) is a federally listed endangered species. It lives in brackish water estuaries, lagoons, and the lower reaches of streams before they enter the sea. Tidewater gobies are found in along the California coast from the Smith River near the Oregon border to Agua Hedionda Lagoon in San Diego County. Tidewater gobies have been observed in the lower sections of Old Creek (CNDDB #50), Willow Creek (CNDDB #118), and Toro Creek (CNDDB #95) along the proposed conveyance pipeline routes. The lower section of Toro Creek from the first road crossing south to the ocean is designated as critical habitat for tidewater gobies. No gobies were observed during our surveys, but more intensive surveys would need to be conducted to confirm their presence/absence. Any work on creek crossings in these locations could impact gobies or their habitat. Protective measures and BMPs would be implemented to avoid affects to tidewater goby and designated critical habitat.

Loggerhead shrike (Lanius Iudovicianus) is a California Species of Special Concern and resident in arid regions of San Luis Obispo County and elsewhere in California. It requires open areas with appropriate perches for hunting, and shrubby trees or bushes for nesting. Appropriate nesting habitat is present adjacent to the Proposed and Alternative Project Study Areas. There are no reports of nesting loggerhead shrikes within five miles of the Proposed or Alternative Project Study Areas, but one individual was observed on Montecito Drive immediately south of the Alternative Project Study Area. No nesting birds were observed during our 2016 surveys. Any work on or near trees in these habitats could have impacts on nesting birds. Nesting bird surveys, conducted prior to construction would minimize any impacts to the species.

**Steelhead - South/Central California Coast ESU** (*Oncorhynchus mykiss irideus*) is a federally listed threatened species known to occur in coastal streams and rivers in San Luis Obispo County, including Toro Creek. Both Toro Creek and Old Creek are designated as critical habitat for steelhead. Steelhead fry were observed in Toro Creek adjacent to the Proposed Project Study Area in our 2015 surveys. The Proposed Project would involve constructing pipeline across Toro Creek. Conveyance pipelines would cross Old Creek. Impacts to steelhead and designated critical habitat will be avoided by minimization measures and BMPs incorporated into the Project design.

**Nuttall's Woodpecker** (*Picoides nuttallii*) is a Special Animal tracked by the CDFW due to statewide reduction in preferred oak woodland habitats. Nuttall's woodpeckers remain fairly common residents in oak woodland habitats throughout San Luis Obispo County. There are no oak trees at the Proposed or Alternative Project Study Areas, and no nesting habitat for Nuttall's woodpecker, but they may venture into the Study Areas from adjacent areas to forage. Nuttall's woodpeckers were observed at both the Proposed and Alternative Project Study Areas, in trees in the riparian areas. Nesting bird surveys conducted prior to construction would minimize any impacts to the species.

**Purple martin** (*Progne subis*) is a California Special Concern species with a limited range and low abundance in California. Purple martins nest colonially in abandoned woodpecker and natural cavities in trees, especially Western sycamore (*Platanus racemosa*), and typically return to the same site year after year. There are no reported nesting localities in the Morro Bay region. No purple martins were observed at either Study Areas during site surveys. Appropriate nesting habitat is present in sycamore trees adjacent to the Proposed Project Study Area. Any work on or near trees in this habitat could have impacts on nesting birds. Nesting bird surveys conducted prior to construction would minimize any impacts to the species.

**Foothill Yellow-legged Frog** (*Rana boylii*) is a California species of Special Concern which ranges from western Oregon south to Los Angeles County in California and east to the foothills of the Sierra Nevada but is absent in the Central Valley. Breeding occurs March through May in streams that have slowed after the winter runoff. The Yellow- legged frog

prefers gravelly or sandy streams with sunny banks and open woodlands nearby in locations up to 6,000 feet. Toro Creek, adjacent to the Proposed Project Study Area, provides appropriate habitat for the species. No individuals were observed during our surveys, and there is no record of the species in the Morro Bay region. It is unlikely the species inhabits Toro Creek, but nighttime spotlight surveys would determine presence/absence. Protective measures and BMPs would be implemented to avoid affects to frogs and their habitat.

California red-legged frog (Rana draytonii) is a federally listed threatened species known from sporadic occurrences documented throughout San Luis Obispo County. It generally requires seasonal pools or streams that hold water until late summer for successful breeding. Bullfrogs and introduced fish are detrimental to its breeding success, and have severely reduced many populations in larger watercourses and perennial ponds. The riparian drainages adjacent to the Proposed and Alternative Project Study Areas provide appropriate habitat for the species and should be considered potential habitat. Red-legged frogs have been found in both Toro Creek and Willow Creek. Both the Proposed and Alternative Project Study Areas occur almost entirely in designated critical habitat. No individuals were observed during our surveys. Nighttime spotlight surveys would determine presence/absence. Impacts on frogs and designated critical habitat will be avoided by mitigation measures and BMPs incorporated into the Project design, such as the 300 foot creek setback shown on Map I-7.

Yellow Warbler (Setophaga petechia brewsteri) is a California Species of Special Concern with a restricted breeding range in Central and Southern California. The status of this subspecies of yellow warbler is described by the CNDDB as "restricted range, rare." They frequent riparian habitats, nesting in sycamores, cottonwoods, willows, and other riparian trees. There are no breeding records in the CNDDB for yellow warbler in San Luis Obispo County; however, yellow warbler is a regular spring and fall migrant that will breed in the County. The riparian habitat in Toro Creek and Willow Creek is low quality nesting habitat, but suitable for foraging. Yellow warblers are highly unlikely to breed at the Proposed or Alternative Project Study Areas, but may stop and forage during migration. Yellow warblers were not detected in either Study Area. Nesting bird surveys conducted prior to construction would minimize any impacts to the species.

**Coast Range Newt** (*Taricha torosa torosa*) is a California Special Concern (CSC) subspecies that prefers cool, clean coastal streams with access to adjacent upland oversummering habitat. Its range extends from Mendocino County to San Diego County. Toro Creek and Willow Creek, adjacent to both Study Areas, provide appropriate habitat for the species. No individuals were observed during our surveys, and there is no record of the species in the Morro Bay region. It is unlikely the species inhabits the creeks. Protective measures and BMPs would be implemented to avoid affects to aquatic habitat.

**Two-striped garter snake** (*Thamnophis hammondii*) is a California Species of Special Concern. They are highly aquatic, and prefer habitat adjacent to permanent or semi-permanent bodies of water. Moderately appropriate habitat is present in perennial creeks adjacent to both the Proposed and Alternative Project Study Areas. There are no records for this species in the Morro Bay area, and no individuals were observed during our surveys. It is unlikely this species inhabits the creeks. Protective measures and BMPs would be implemented to avoid affects to aquatic habitat.

#### INLAND ZONE BIOLOGICAL IMPACTS AND MITIGATION MEASURES

**Willow riparian-** At the Proposed Project Study Area, there will be a 300 foot setback from top of bank at Toro Creek to avoid impacts to riparian habitat.

At the Alternative Project Site, approximately 0.04 acres of riparian habitat may be permanently impacted where the access road bridge is installed across Willow Creek from

Montecito Road (outside the Coastal Zone). Non-significant impacts to riparian canopy may occur where landscape screening would be installed along the west edge of the WRRF footprint and solar arrays.

Agriculture- At the Proposed Project Study Area, approximately 7.4 acres of agricultural land would be permanently impacted. At the Alternative Project Site, approximately 6.23 acres would be permanently impacted and an additional 0.94 acres would be temporarily impacted. Agricultural land at the project sites is poor quality habitat to most plants and wildlife, however some organisms may utilize it. It may provide foraging opportunities for songbirds, small mammals and raptors including special status birds such as Cooper's hawk. However, regular tilling of the agricultural land in the Study Areas makes it an inconsistent resource for flora and fauna. Agriculture is not a sensitive habitat type and does not require mitigation.

**California annual grassland** -There will be no areas of annual grassland impacted. In the Proposed Project Study Area, there is a small area of transitional grassland habitat at the southern end of the field on the east side of Toro Creek Road which is more dominated by native species. This area provides potential habitat for special status plant species. This small transitional area would not be impacted by the project.

**Ruderal vegetation** - In the Proposed Project Study Area, approximately 0.57 acres of ruderal vegetation may be permanently impacted. The ruderal habitat is highly disturbed and dominated by non-native species, but may provide foraging habitat for songbirds and small mammals. This is not a sensitive habitat type and does not require mitigation.

**Willow riparian** - At the Proposed Project Study Area, there will be a 300 foot setback from top of bank at Toro Creek to avoid impacts to riparian habitat.

At the Alternative Project Site, approximately 0.04 acres of riparian habitat may be permanently impacted where the access road bridge is installed across Willow Creek from Montecito Road (outside the Coastal Zone). Non-significant impacts to riparian canopy may occur where landscape screening would be installed along the west edge of the WRRF footprint and solar arrays.

Impacts to Potential Wetlands and Jurisdictional Waters -There will be no impacts to wetlands, as there are no wetlands located within either Study Area. There will be no impacts to the potential waters of the U.S. located at the Proposed Project Study Area. The ditch crossing the project site will not be modified or filled, and no work will take place at or below top of bank.

At the Alternative Project Study Area, there may be impacts to Willow Creek and the unnamed drainage to the west (outside the Coastal Zone). The WRRF footprint is less than 100 feet from Willow Creek and the unnamed drainage. The construction laydown area is less than 100 feet from Willow Creek. Impacts to water quality may occur from sedimentation due to ground disturbance activities, or spills from refueling or maintaining equipment.

**Impact BIO-1:** At the Proposed WRRF, only agricultural land and ruderal vegetation would be permanently impacted. For the conveyance pipelines no permanent impacts would occur. No other habitats, or Environmentally Sensitive Habitat Areas, would be significantly or permanently impacted. Impacts to the seven identified biological habitats in the Project Area (including Willow Riparian ESHA) would be less than significant. (Class III)

#### **Potential Impacts to Nesting Birds**

Vegetation removal and construction activities associated with the proposed Project could result in adverse impacts to nesting birds if conducted during nesting season (March 15 through August 15). Take of nesting birds is prohibited by federal and state code. Migratory non-game native bird species are protected by international treaty under the Federal Migratory Bird Treaty Act (MBTA) of 1918 (50 C.F.R. Section 10.13). Sections 3503, 3503.5 and 3513 of the California Fish and Game Code prohibit take (as defined therein) of all native birds and their active nests, including raptors and other migratory non-game birds (as listed under the Federal MBTA).

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**Impact BIO-2:** Impacts to nesting birds, including special status birds, may occur in ruderal areas with thick vegetation, eucalyptus trees and riparian trees within the Proposed Project construction area. Impacts to nesting birds are potentially significant, but mitigable (Class II).

Mitigation Measure BIO-1: Within one week of ground disturbance or vegetation removal activities, if work occurs between March 1 and August 31, nesting bird surveys shall be conducted. If surveys do not locate nesting birds, construction activities may be conducted. If nesting birds are located, no construction activities shall occur within 100 feet of nests until chicks are fledged. Occupied nests of special status bird species shall be mapped using GPS or survey equipment and submitted in monitoring reports. If nesting birds are located, no construction activities shall occur within 100 feet of nests (or other setback distance determined by a qualified ornithologist) until chicks are fledged. Construction activities shall observe a 300-foot buffer for active raptor nests. Occupied nests of special status bird species shall be monitored every tow weeks to document nest success and check for compliance with buffer zones.

## **Potential Impacts to Special Status Species**

**Special Status Plants** - Habitat and soil types are suitable for six special status plant species within the Proposed Project Study Area. Appropriately timed floristic surveys were conducted to determine if any of these species occur in either Study Area. One special status plant species was observed in the Proposed Project Study Area, club-haired mariposa lily. One individual of this plant was growing at the southern end of the Study Area, outside the limits of grading.

**Impact BIO-3**: Potential habitat for the special status plant Club-haired mariposa lily occurs in a small patch of annual grassland at the southern end of the Proposed Project Study Area. This habitat is outside the limits of grading, however potential adverse effects are possible therefore the impact is significant but mitigable (Class II).

**Mitigation Measure BIO-2:** Limits of grading shall be clearly delineated in the field prior to initiation of construction activities to demonstrate avoidance in impacting the area identified in the Biological Technical Report as habitat for club-haired mariposa lily.

**Special Status Birds -** Several special status bird species were observed foraging in the Proposed and Alternative Project Study Areas, including Cooper's hawk, lark sparrow, loggerhead shrike, and Nuttall's woodpecker. Foraging habitat exists within the Study Areas for several other special status bird species including tricolored blackbird, white-tailed kite, purple martin, and yellow warbler. There is potential nesting habitat for special status

species in riparian and grassland areas adjacent to the Study Areas. Impacts to nesting special status birds would be mitigated by Mitigation Measure BIO-1, above.

**Special Status Reptiles and Amphibians** - Potential habitat occurs in or immediately adjacent to the Proposed and Alternative Project Study Areas for five special status reptiles and amphibians: western pond turtle, foothill yellow-legged frog, California red-legged frog, coast range newt, and two-striped garter snake. The majority of the Proposed and Alternative Study Areas occur in designated critical habitat for California red-legged frog. Toro Creek at the Proposed Project Study Area is a perennially flowing creek, and all five special status species could potentially occur there.

At the Alternative site, Willow Creek flows seasonally, and is less likely to provide habitat for special status species. Construction equipment and vehicle traffic, sedimentation due to earthmoving, or spills during construction or operation of the WRRF may impact special status reptiles and amphibians.

**Impact BIO-4:** Construction equipment and vehicle traffic, sedimentation due to earthmoving, or spills during construction or operation of the WRRF may impact special status reptiles and amphibians, a potentially significant but mitigable impact (Class II).

**Mitigation Measure BIO-3:** To mitigate adverse impacts to potentially present status reptiles and amphibians western pond turtle, foothill yellow-legged frog, coast range newt, and two-striped garter snake, in addition to Mitigation Measure BIO-4, the following shall be implemented:

- Construction Plans shall show how construction at stream crossings will utilize low-flow periods, incorporate sediment retention devices and minimize time and area of disturbance.
- A pre-construction survey would be conducted within 48 hours prior to starting work in or within 50 feet of habitats likely to support sensitive reptiles and amphibians such as seasonal drainages and riparian. The survey would be conducted by a qualified biologist approved to relocate sensitive species should they occur. If sensitive reptile or amphibian species are located during the preconstruction survey, a biologist would monitor ground-breaking work conducted within 50 feet of habitat.
- Qualified biologists will brief all project personnel prior to participating in construction activities. At a minimum, the briefing will include a description of the project components and techniques, a description of the listed species occurring in the project area, and the general and specific measures and restrictions to protect the species during implementation of the project.
- Post construction re-vegetation plans for work areas disturbed within 100 feet of ESHA at Toro Creek Bridge shall be submitted for County approval and implemented upon completion of pipeline work in that area. The re-vegetation plan shall use only native plant species pursuant to Coastal Policy 30. The species shall be selected to provide permanent erosion control and soil cover pursuant to Coastal Policy 21.

**Impact BIO-5:** Construction equipment and vehicle traffic, sedimentation due to earthmoving, or spills during construction or operation of the WRRF may impact California red-legged frog (CRLF), a potentially significant but mitigable impact (Class II).

**Mitigation Measure BIO-4:** To mitigate adverse impacts to potentially present California red-legged frog (CRLF), the following shall be implemented:

**Pre-construction Survey.** Prior to commencement of grading activities, a USFWS-approved biologist will survey the project site 48 hours before the onset of work activities. If any life stage of the California Red-legged Frog (CRLF) is found and these individuals are likely to be killed or injured by work activities, the biologist will be allowed sufficient time to move them from the site before work activities begin. The biologist will relocate the CRLF the shortest distance possible to a location that contains suitable habitat and will not be affected by activities associated with the proposed project. The biologist will maintain detailed records of any individuals that are moved (e.g., size, coloration, distinguishing features, digital images, etc.) to assist in determining whether translocated animals are returning to the original point of capture.

**Pre-construction Training.** Prior to commencement of grading activities, a USFWS-approved biologist will conduct a training session for all construction personnel. At a minimum, the training will include a description of the CRLF and its habitat, the specific measures that are being implemented to conserve the CRLF for the current project, and the boundaries within which the project may be accomplished. Brochures, books, and briefings may be used in the training session, provided that a qualified person is on hand to answer any questions.

Biologist Present during Construction. A USFWS-approved biologist will be present at the work site until all CRLF have been removed, workers have been instructed, and disturbance of habitat has been completed. After this time, the County will designate a person to monitor on-site compliance with all minimization measures. The biologist will ensure that this monitor receives the training outlined above and in the identification of CRLF. If the monitor/biologist determine CRLF impacts are greater than anticipated or approved, work shall stop until the issue is resolved. The monitor/biologist shall immediately contact the resident engineer (the engineer overseeing and in command of the construction activities), where the resident engineer will either resolve the situation by eliminating the effect immediately, or require that all actions which are causing these effects be halted. If work is stopped, the County/ USFWS will be notified as soon as is reasonably possible.

**Trash Removal.** During construction/ground disturbing activities, all trash that may attract CRLF predators will be properly contained, removed from the work site, and disposed of regularly. Prior to occupancy or final inspection, whichever occurs first, all trash and construction debris will be removed from work areas.

**Equipment Maintenance.** During construction/ ground disturbing activities, all refueling, maintenance, and staging of equipment and vehicles will occur at least 100 feet from riparian habitat or water bodies and not in a location from where a spill would drain directly toward aquatic habitat. The monitor will ensure contamination of habitat does not occur during such operations. Prior to commencement of grading/construction activities, the monitor will ensure that a plan is in place for prompt and effective response to any accidental spills. All workers will be informed of the importance of preventing spills and of the appropriate measures to take should a spill occur.

**Revegetation.** Prior to occupancy or final inspection, whichever occurs first, for disturbed areas within the project boundaries, they shall be revegetated with an assemblage of native riparian, wetland and upland vegetation suitable for the area. Locally collected plant materials will be used to the extent practical.

Invasive, exotic plants will be controlled to the maximum extent practical and not included in any landscaping efforts. This measure shall apply to all disturbed areas unless determined not practical or feasible by the County.

**Land Restoration.** Prior to occupancy or final inspection, whichever occurs first, to the extent practical, contours shall be returned to as close to original, unless it is determined by the biologist that the new contours provide greater benefit for the CRLF.

**Work Scheduling.** Prior to commencement of grading/construction activities, the applicant shall make all efforts to schedule work activities for times of the year when impacts to the CRLF would be minimal. As examples: a) work that would affect large pools that may support breeding would be avoided, to the maximum extent practical, during the breeding season (November through May); b) isolated pools that are important to maintain CRLF through the driest portions of the year (late summer, early fall) would be avoided to the maximum extent practical. When such conditions exist, the applicant will work with the biologist to coordinate the construction schedule to minimize impacts to the CRLF.

**Sedimentation and Erosion Control.** Prior to issuance of construction permit(s), sedimentation and erosion control plans shall be submitted using Best Management Practices (BMPs) to minimize sediment from entering nearby water bodies or prominent drainage courses, consistent with Mitigation Measure WQ-1. During or after construction/ ground disturbing activities, if these BMPs are ineffective, the applicant will work with the monitor/biologist and resident engineer, in consultation with USFWS, to install effective measures prior to the next rain event.

**Water impoundment.** Unless approved by the USFWS, water will not be impounded in a manner that may attract CRLF.

**Completion Report.** Prior to occupancy or final inspection, whichever occurs first, the applicant shall submit to the County and USFWS, a project completion report form, completed by the USFWS-approved biologist. The report form should identify any recommended modifications or protective measures, if additional stipulations to protect CRLF are warranted, or if alternative measures would facilitate compliance with the provisions of this consultation.

**Special Status Fish** - Two federally listed fish species may occur within the vicinity of the Proposed and Alternative Project Study Areas: tidewater goby and steelhead. Both species have been observed in Toro Creek, and gobies have been observed in Willow Creek. Steelhead fry were observed in Toro Creek during an October 2015 site visit to the Proposed Project Study Area. Steelhead and tidewater goby habitat may be affected by sedimentation due to earthmoving, or spills during construction or operation of the WRRF. As described in the Project Description, check valves in the wastewater conveyance pipes will be installed on both sides of creek crossings to reduce the risk of spill into the creeks. In addition, as described in the Project Description, during and after construction a 300 foot setback will be maintained between the WRRF and Toro Creek.

**Impact BIO-6**: Steelhead and tidewater goby habitat may be affected by sedimentation due to earthmoving, or spills during construction or operation of the WRRF and pipeline construction activities along, and crossing, Toro Creek (EHSA within the Coastal Zone). This is a significant but mitigable impact (Class II).

**Mitigation Measure BIO-5**: To mitigate potential adverse effects to water quality and special status species habitat in project area creeks, in addition to measures described in measure WQ-1 including appropriate best management practices (BMPs) utilized within the construction areas to prevent excess sediment from entering Toro Creek or Willow Creek, Storm Water Pollution Prevention Plan (SWPPP) implementation, and long-term measures identified in the SWPPP, the following additional measures are required:

- The applicant shall prepare a spill containment and spill clean-up plan that includes provisions for response to frack-out of pipeline bore spoils within 100 feet of ESHA. Directional drill activities within 100 feet of ESHA shall be specified in the plan to require on-site monitoring.
- During construction of the conveyance pipelines across all creeks, no ground disturbing activities will take place within the riparian corridor or within the top of bank channel.
- The edge of riparian vegetation will be shown on construction plans and boundaries of the work area will be shown on construction plans. Limits of grading will be clearly delineated in the field prior to initiation of construction activities.
- All hazardous materials required to operate and maintain equipment will be properly used in accordance with manufacturer's specifications.
- The contractor shall follow an approved spill prevention plan, including procedures to ensure that all equipment is properly maintained and free of leaks and all necessary repairs incorporate proper spill containment.
- Hazardous materials will be properly stored and managed in secured areas located outside riparian corridors.
- Mobile equipment will be staged, repaired, and maintained 300 ft from top of bank of Toro Creek, or on existing paved road surfaces. Fueling of equipment will be conducted in pre-designated areas at least 300 ft from the top of bank drainages, or on existing paved road surfaces. Spill containment materials will be placed around the equipment before refueling. Standing equipment will be outfitted with drip pans and hydrocarbon absorbent pads.

**Bats** - Pallid bat is a special status bat species that may occur along the conveyance pipeline route under road bridges across Toro Creek, Old Creek, Willow Creek, or Paul Alva Creek. Maternal bat colonies are protected by the California Department of Fish and Wildlife but are not expected to occur in the Proposed or Alternative Project Study Areas or along the conveyance pipeline route.

**Impact BIO-7:** Construction of pipeline conveyances at the bridges across Toro Creek, Old Creek, and Paul Alva Creek box culvert could impact Pallid Bats, a significant but mitigable impact (Class II).

**Mitigation Measure BIO-6**: Prior to installation of conveyance structures adjacent to road bridges over Toro Creek, Willow Creek, Old Creek, or Paul Alva Creek, a qualified biologist shall conduct a survey of the bridge to determine if roosting bats are present. If possible, the survey shall be conducted during the non-breeding season (November through March). If a colony of bats is found roosting in any structure, further surveys shall be conducted sufficient to determine the species present and the type of roost (day, night, maternity, etc.) If

the bats are not part of an active maternity colony, passive exclusion measures may be implemented with approval from CDFW. November is the best time of the year to exclude bats from a roost because it is after the breeding season and before winter hibernation (not all species hibernate).

**Monarch Butterflies** - There is a monarch butterfly overwintering site in a grove of eucalyptus along Toro Creek Road, adjacent to the bridge over Toro Creek, south of the Proposed Project Study Area. Monarch butterflies have been observed clustering in eucalyptus trees located in the grove approximately 80 to 100 feet south of Toro Creek Road. In November 2016, 110 monarchs were observed at the roost trees, while 1700 monarchs were observed in 2015, none were documented in 2014, and 3200 were documented in 2013. Butterflies are likely to be present at the site, in varying numbers, from year to year. If eucalyptus branches are trimmed for pipeline construction along Toro Creek Road, monarch butterfly aggregations may be impacted.

**Impact BIO-8:** Construction activities impacting the eucalyptus habitat for Monarch butterfly are a potentially significant, but mitigable, impact (Class II).

**Mitigation Measure BIO-7:** To avoid impacts to overwintering monarchs, tree trimming/removal and construction activities that affect eucalyptus trees near or within the overwintering grove shall not be conducted during the overwintering season from October 1 through March 31. If construction activities must be conducted during this period, overwintering monarch surveys shall take place within one week of habitat disturbance. If surveys do not locate clustering monarchs, construction activities may be conducted. If clustering monarchs are located, no construction activities shall occur within 100 feet of the edge of the overwintering grove.

#### COASTAL ZONE BIOLOGICAL IMPACTS AND MITIGATION MEASURES

## Impacts to Environmentally Sensitive Habitat Areas (ESHA)

ESHA's are defined by the California Coastal Act as "any area in which plant or animal life or their habitats are either rare or especially valuable because of their nature or role in an ecosystem and which could be easily disturbed or degraded by human activities and developments." Under this definition wetlands and jurisdictional waters, riparian habitat, designated critical habitat, and CNDDB special communities are ESHAs.

No significant impacts will occur to special status plant or wildlife species or any Environmentally Sensitive Habitat Areas (ESHA) with implementation of avoidance and minimization measures detailed following because no wetlands and jurisdictional waters, riparian habitat, designated critical habitat, and CNDDB special communities are significantly or permanently affected.

**Willow riparian** - The riparian area at the existing Toro Creek bridge is within the Coastal Zone (see Map IV-C1 for the Coastal Zone boundary relative to the Toro Creek Bridge) and this creek area is ESHA. Where conveyance structures will be installed adjacent to the Toro Creek Road bridge, there may be minimal trimming of riparian canopy above the banks of the stream to allow access for crane placement of the pipe conduit spanning the creek banks.

In addition, bore pits approximately 8 feet by 8 feet and 4 feet deep will be constructed on both sides of the creek approximately 50 feet from top of creek bank but with 100 feet of ESHA. The pipeline will be directionally bored within the 100 from ESHA except for the bore pits where the pipeline will surface to the pipe bridge. Where the pipe surfaces excavation

will occur for concrete foundation s to support the pipe bridge. Disturbance for these foundations is estimated at and excavation 6 feet by 6 feet and 8 feet deep.

The riparian area at the existing Old Creek foot-bridge is within the Coastal Zone and this creek area is ESHA. Where conveyance structures will be installed adjacent to the Old Creek foot-bridge, there would likely be no trimming of riparian canopy above the banks of the stream to allow access for crane placement of the pipe conduit spanning the creek banks. In addition, where the pipe surfaces, excavation will occur for concrete foundations to support the pipe bridge. Disturbance for these foundations is estimated at and excavation 6 feet by 6 feet and 8 feet deep. This disturbance will occur in or on the shoulder of the existing path and pavements in that location with no disturbance to adjacent vegetation.

#### **CZLUO and Coastal Plan Policy Consistency**

The bore pit excavation surface the directionally bored pipes, pipe bridge support foundation excavation and trimming activity to place the pipe bridge conduit appears consistent with findings required by the CZLUO:

- There will be no significant negative impact on the identified sensitive habitat and the proposed use will be consistent with the biological continuance of the habitat.
- The proposed use will not significantly disrupt the habitat.

The type of project activity meets the types of allowable development in ESHA:

• Incidental public services and utilities in wetlands. Essential incidental public services and utilities pursuant to ESHA Policy 13 and CZLUO Section 23.07.172(e).

Further, the trimming activity to place the pipe bridge conduit would not result in grading within in ESHA, takings, stream diversions, diversion of surface or subsurface water, placement of barriers to fish, destruction of fish rearing habitat, or disturbance of native riparian vegetation on the banks of the stream. These vegetation trimming impacts would not be significant.

The proposed actions within 100 feet of ESHA will not significantly disrupt the resources present and is consistent with Coastal Plan Policy 1.

Coastal Plan Policy 3 is implemented with the re-vegetation in mitigation measure BIO-3 below. Mitigation Measures BIO-3 and BIO-4 and WQ-1 ensure the creek hydrological and ecological functions are preserved and protected pursuant to Policies 20 and 21.

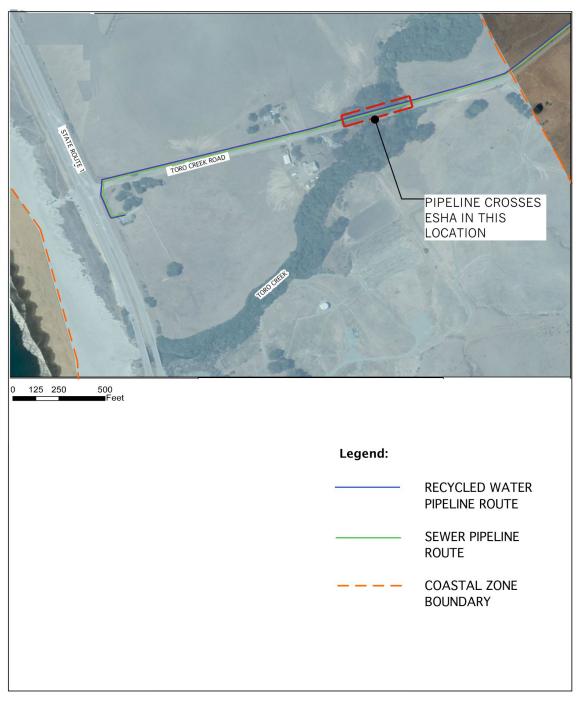
Because the proposed location of the pipe bridge is the least disruptive means to implement the required pipeline crossing of Toro Creek and no feasible alternative exists to crossing Toro Creek<sup>1</sup>, the proposed riparian trimming to implement the pipe bridge is consistent with Policy 26.

Terrestrial environments within 100 feet of ESHA are minimally impacted, preserved or restored consistent with Policies 29,30 and 31.

#### Coastal Zone ESHA Impacts after Mitigation Measure Implementation

The following describes the applicable mitigation measures that will reduce potential impacts to biological resources in the Coastal Zone to less than significant (Class III).

<sup>&</sup>lt;sup>1</sup> Directional boring under the creek is not feasible due to the likely presence of bedrock at or near the channel bottom.





Cayucos Sustainable Water Project

# PIPELINE ROUTE ON TORO CREEK **ROAD IN THE COASTAL ZONE**



The incorporation of mitigation measures to protect water quality during construction detailed in Mitigation Measures BIO-5 and WQ-1 would reduce potential adverse effects to stream water quality related to the bore pits and bridge supports adjoining ESHA and other pipeline routes to less than significant.

The incorporation of mitigation measures to protect special status fish, amphibians and reptiles during construction detailed in Mitigation Measures BIO-3 and BIO-4 below would reduce potential adverse effects to these species to less than significant. Measure BIO-3 includes permanent re-vegetation of the bore pit and foundation excavations within 100 feet of ESHA. Measure BIO-4 includes restrictions for equipment re-fueling outside the 100 foot ESHA setback.

The incorporation of mitigation measures to protect special status bats potentially roosting under the existing creek bridges during construction detailed in Mitigation Measures BIO-6 would reduce potential adverse effects to these species to less than significant.

#### OTHER COASTAL ZONE HABITATS and SPECIAL STATUS SPECIES

The proposed pipeline routes occur both within the Coastal Zone and the Inland area. Of the total 1.62 acres of temporary ground disturbance for the pipelines, approximately 1.14 acres occur within the Coastal Zone. Of this area, approximately 0.4 acres occur in ruderal grassland and 0.02 acres within 100 feet of ESHA at Toro Creek and 0.01 acres at Old Creek.

**California annual grassland** -There will be no areas of California annual grassland impacted within the Coastal Zone construction areas.

**Developed** - Road bridges within the Coastal Zone over Toro Creek, Willow Creek, Old Creek, and Alva Paul Creek box culvert may provide roosting habitat for bats, including pallid bats, or habitat for nesting birds. This is not a sensitive habitat type and does not require mitigation, but a survey for roosting bats and nesting birds is required before construction begins at road bridges. The existing WTTF facility in Morro Bay is a developed habitat.

Impact and Mitigation Measure: Refer to Impact BIO-2 and Measure BIO-1 under impacts to nesting birds.

**Eucalyptus** - Eucalyptus forest may be temporarily impacted at the Proposed Project Study Area when the conveyance pipeline is constructed across Toro Creek at the Toro Creek Road bridge. Impacts that may occur would be to eucalyptus canopy only, if trimming is required. No trees are proposed for removal. The trees provide habitat and potential habitat for a variety of common and sensitive bird species including raptors. The eucalyptus trees are also a known winter aggregation location for monarch butterflies. Eucalyptus forest is not a sensitive habitat and does not require mitigation, but a survey for nesting birds is required prior to any tree trimming. Monarch aggregations have been observed in the eucalyptus trees on the south side of Toro Creek Road, approximately 80 to 100 feet from the road.

Impact and Mitigation Measure: Refer to Impact BIO-2 and Measure BIO-1 below under impacts to nesting birds.

**Ruderal vegetation -** In the proposed pipeline route within the Coastal Zone, approximately 0.40 acres of ruderal vegetation would be temporarily impacted for construction. The ruderal habitat is highly disturbed and dominated by non-native species, but may provide foraging

habitat for songbirds and small mammals. This is not a sensitive habitat type and does not require mitigation. (See section IV-F mitigation measure for re-vegetation of these areas.)

**Special Status Birds** - There is potential nesting habitat for special status species in riparian and grassland areas adjacent to Toro and Old Creeks. Impacts to nesting special status birds would be mitigated by Mitigation Measure BIO-1, above.

**Special Status Reptiles and Amphibians -** Potential habitat occurs in or immediately adjacent to the pipe bridge crossings in the Coastal Zone for five special status reptiles and amphibians: western pond turtle, foothill yellow-legged frog, California red-legged frog, coast range newt, and two-striped garter snake. These areas are designated critical habitat for California red-legged frog.

Impact and Mitigation Measure: Refer to Impact BIO-4 and Measure BIO-3 under impacts to special status reptiles and amphibians. Implementation of Mitigation Measure BIO-3 would reduce impacts to sensitive amphibian and reptile species to less than significant. BIO -4 includes restrictions for equipment re-fueling outside the 100 foot ESHA setback.

Impact and Mitigation Measure: Refer to Impact BIO-5 and Measure BIO-4 under impacts to CRLF. Implementation of Mitigation Measure BIO-4 would reduce impacts to CRLF to less than significant.

**Special Status Fish** - Two federally listed fish species may occur within the vicinity of the Proposed and Alternative Project Study Areas: tidewater goby and steelhead. Both species have been observed in Toro Creek, and gobies have been observed in Willow Creek. Steelhead fry were observed in Toro Creek during an October 2015 site visit to the Proposed Project Study Area. Steelhead and tidewater goby habitat may be affected by sedimentation due to earthmoving, or spills during construction or operation of the WRRF. As described in the Project Description, check valves in the wastewater conveyance pipes will be installed on both sides of creek crossings to reduce the risk of spill into the creeks. In addition, as described in the Project Description, during and after construction a 300 foot setback will be maintained between the WRRF and Toro Creek.

Impact and Mitigation Measure: Refer to Impact BIO-6 and Measure BIO-5 under impacts to Steelhead and Tidewater Goby. Implementation of BIO-5 would reduce impacts to these species to less than significant.

**Bats** - Pallid bat is a special status bat species that may occur along the conveyance pipeline route under road bridges across Toro Creek, Old Creek, Willow Creek, or Paul Alva Creek. Maternal bat colonies are protected by the California Department of Fish and Wildlife but are not expected to occur in the Proposed or Alternative Project Study Areas or along the conveyance pipeline route.

Impact and Mitigation Measure: Refer to Impact BIO-7 and Measure BIO-6 under impacts to roosting bats. Implementation of Mitigation Measure BIO-6 would reduce impacts to this species to less than significant.

# **Cumulative Impacts**

**Impacts BIO-9:** The Proposed Project would not permanently remove or alter any sensitive habitat or plant community. With implementation of all mitigation measures the Project's contribution to cumulative impacts on biological resources is less than significant (Class III).

# 8. List of Abbreviated Terms

Abbreviation	Term
CSWP	Cayucos Sustainable Water Project
CRLF	California red-legged frog
CEQA	California Environmental Quality Act
CDFW	California Department of Fish and Wildlife
CNDDB	California Natural Diversity Data Base
CNPS	California Native Plant Society
EIR	Environmental Impact Report
ESA	Endangered Species Act
ESHA	Environmentally Sensitive Habitat Areas
LCP	Local Coastal Plan
NEPA	National Environmental Protection Act
NOP	Notice of Preparation
USACE	United States Army Corps of Engineers
USFWS	United States Fish and Wildlife Service

# 9. References

Refer to Technical Appendix Technical Biological Report.

# D. DRAINAGE, FLOODING AND WATER QUALITY

#### 1. Environmental Issue

Drainage, water quality and flood control are important concerns within the Toro Creek watershed due to the presence of sensitive species in the creek. Related analyses are contained in EIR section IV-A Geology and Soils. The following environmental issues are addressed:

- Potential for flooding of the proposed WRRF.
- Potential impacts to Toro Creek from post-construction stormwater volumes.
- Potential site erosion and sedimentation of surface waters affecting water quality.
- Increased pumping of the Toro Valley Groundwater Basin

# 2. Sources Used In This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications including:

- County of San Luis Obispo National Pollution Discharge Elimination System Phase II Stormwater Management Program, 2007.
- County Ordinance No. 3251 Amending Title 22 Land Use Ordinance concerning Stormwater Management.
- San Luis Obispo County Ordinance No. 3252 Amending Title 19 of the Building and Construction Ordinance adding Chapter 19.09 Stormwater Management.
- County of San Luis Obispo Post-Construction Requirements Handbook
- Technical Memorandum Preliminary Hydrogeologic Assessment for Ground Water Recharge with Recycled Water, November 17, 2015, Cleath Harris Geologists

A complete list of references is provided at the end of this section.

# 3. Scoping Issues for Flooding, Drainage and Water Quality

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issue relating to this topic was raised during the scoping process and is addressed in this section:

- The County of San Luis Obispo Department of Planning and Building requested investigation of flood hazard related to the General Plan Flood Hazard Combining Designation.
- The County of San Luis Obispo Department of Public Works requested the EIR cover applicability of post-construction stormwater requirements.

# 4. Environmental and Regulatory Setting

#### STATE REGULATIONS

# Regional Water Quality Control Board (RWQCB)

The Regional Water Quality Control Board is the local administrative unit of the State Water Resource Control Board. The Toro Creek Watershed is in Region 3, the Central Coast Region. The mission of the RWQCB is to develop and enforce water quality objectives and implementation plans that will best protect the beneficial uses of the State's waters. The RWQCB is responsible for developing "basin plans" for its hydrologic areas, governing requirements, issuance of waste discharge permits, enforcement actions against violators, and monitoring water quality.

The focus of the RWQCB is water quality. The federal Clean Water Act is the primary enforcement tool. The Regional Water Quality Control Board defines its jurisdiction as anything that may "adversely affect beneficial uses of waters of the state" where "beneficial uses" includes "all of the resources, services and qualities of aquatic ecosystem underground aquifers that benefit the state of California", including, "agricultural supply, wildlife habitat, recreation, groundwater recharge and municipal and domestic water supply".

The Central Coast Regional Water Quality Control Board recognizes that it is necessary to protect watershed processes so that beneficial uses of receiving waters are maintained and, were applicable, restored. Three types of post-construction requirements are identified: Performance, Alternative Compliance, Operation and Maintenance Plans, and Reporting Requirements.

The requirements are intended to support:

- 1. Utilization of Low Impact Development strategies to the extent feasible
- 2. Applicant-provided Stormwater Control Plans to demonstrate compliance
- 3. Implementation of retention and peak flow management techniques, where appropriate
- 4. Requirements commensurate with project size

#### NPDES Phase II Program and Adopted 2007 Stormwater Management Program

Stormwater runoff is regulated under the federal Clean Water Act via the National Pollution Discharge Elimination (NPDES) Program. The County of San Luis Obispo is subject to the Phase II General Permit for Municipal Stormwater (General Permit). The General Permit requires municipalities to prepare and submit Stormwater Management Programs (SWMPs) to the RWQCB.

#### State Water Resources Control Board

The State Water Resources Control Board, among other things, regulates ocean water quality. The 2015 *Water Quality Control Plan-Ocean Water Of California* (Ocean Plan) has the following legislative mandate:

"In furtherance of legislative policy set forth in section 13000 of Division 7 of the California Water Code (CWC) (Stats. 1969, Chap. 482) pursuant to the authority contained in section 13170 and 13170.2 (Stats. 1971, Chap. 1288) the State Water Resources Control Board (State Water Board) hereby finds and declares that protection of the quality of the ocean waters for use and enjoyment by the people of the State requires control of the discharge of waste to ocean waters and control of intake seawater in accordance with the provisions contained herein. The Board finds further that this plan shall be reviewed at least every three years to guarantee that the

current standards are adequate and are not allowing degradation to marine species or posing a threat to public health."

One purpose of the Ocean Plan is to ensure beneficial uses of the ocean waters of the State shall be protected, including industrial water supply; water contact and non-contact recreation, including aesthetic enjoyment; navigation; commercial and sport fishing; mariculture; preservation and enhancement of designated Areas\* of Special Biological Significance (ASBS); rare and endangered species; marine habitat; fish migration; fish spawning and shellfish\* harvesting.

As described above, the RWQCB is responsible for permitting and enforcement under the Clean Water Act National Pollution Discharge Elimination System (NPDES). As authorized by the Clean Water Act, the NPDES Permit Program controls water pollution by regulating point sources that discharge pollutants into waters of the United States including municipal waste discharged into waters of the United States.

#### **COUNTY REGULATIONS**

# Title 22 and 23 of the County Code (Land Use Ordinance and Coastal Zone LUO)

The Proposed Project is near the Flood Hazard (FH) Combining Designation as defined in Title 22 section 22.14.060. The Flood Hazard (FH) combining designation is applied to areas where terrain characteristics would present new developments and their users with potential hazards to life and property from potential inundation by a 100-year frequency flood or within coastal high hazard areas. These standards are also intended to minimize the effects of development on drainage ways and watercourses. Drainage Plan approval is required where any portion of the proposed site is located within a Flood Hazard combining designation. This section stipulates that no construction or grading shall limit the capacity of the floodway or increase flood heights on existing structures unless the adverse effect of the increase is rectified to the satisfaction of the Director of Public Works, and, in no case shall flood heights be increased above that allowed under the Federal Flood Insurance Program.

In addition, Section 22.52 Grading and Drainage states: "The purpose of this Chapter is to establish standards to safeguard the public health, safety and general welfare; minimize erosion and sedimentation; minimize fugitive dust emissions; prevent the loss of agricultural soils; reduce the harmful effects of stormwater runoff; encourage groundwater recharge; protect fish and wildlife; reduce hazards to life and property; reduce drainage problems from new development; enhance slope stability; protect natural, scenic, and cultural resources; prevent environmental damage to public and private property; and to otherwise protect the natural environment."

The Coastal Zone LUO contains the following standards applicable to project pipelines in the Coastal Zone:

**Section 23.08.286 – Pipelines and Transmission Lines.** This section provides planning area standards for the construction of pipelines and transmission lines. The level of permit required depends on the area of site disturbance as follows:

Permit RequirementArea of Site DisturbancePlot PlanLess than 40,000 square feetMinor Use Permit40,000 or more square feet

Development Plan approval is required for all surface facilities, pumping or booster stations for pipelines. A route-specific geologic investigation, design and mitigation program is required as part of the land use permit application for proposed pipelines. Other requirements for the permit application include:

- Information on how construction at stream crossings will utilize low-flow periods, incorporate sediment retention devices and minimize time and area of disturbance.
- A restoration, erosion control and revegetation plan shall be included in the grading permit application.
- Where a pipeline is to be placed through a Sensitive Resource Area, the Development Plan
  application shall include a field survey by a qualified biologist to assess impacts to the important
  coastal resources.

**Section 23.08.288: Public Utility Facilities.** This section describes certain planning area standards applicable to the development of public utility facilities, including the contents of the required CUP application as well as development standards that will apply as conditions of approval.

- 1. Environmental quality assurance. An environmental quality assurance program covering all aspects of construction and operation shall be submitted prior to construction of any project component. This program will include a schedule and plan for monitoring and demonstrating compliance with all conditions required by the Development Plan. Specific requirements of this environmental quality assurance program will be determined during the environmental review process and Development Plan review and approval process.
- 2. Clearing and revegetation. The land area exposed and the vegetation removed during construction shall be the minimum necessary to install and operate the facility. Topsoil will be stripped and stored separately. Disturbed areas no longer required for operation will be regraded, covered with topsoil and replanted during the next appropriate season.

# County Ordinance No. 3251 Amending Title 22 Land Use Ordinance concerning Stormwater Management.

Land Use Ordinance Section 22.52.110 and Coastal Zone Land Use Ordinance Section 23.05.040 et seq. require that the control of drainage and drainage facilities minimize harmful effects of stormwater runoff and resulting inundation and erosion on proposed projects, and protect neighboring and downstream properties from drainage problems resulting from new development.

To comply with Federal and State NPDES stormwater regulatory requirements, the County has integrated post-construction stormwater management into the development review process. The County's application process is designed to assure that post-construction stormwater controls are in place throughout the life of the project. The County requires additional documentation for erosion and sediment controls during construction.

The County must address storm water runoff from development and redevelopment projects through post-construction stormwater requirements based on a watershed-process approach developed and approved by the Central Coast Water Board, per Water Board Resolution R3-2013-0032.

The requirements of this section are applicable only where a project will drain to those areas designated by the State Water Resources Control Board (SWRCB) as traditional or non-traditional Municipal Separate Storm Sewer Systems (MS4s). MS4s consist of areas designated as "urbanized" in the most recent decennial US Census, as well as other outlying areas with a population of 10,000 or more or a population density greater than 1,000 people per square mile.

If a project is Project is located outside of County MS4 Permit Area it is exempt from Post-Construction requirements outlined in Resolution R3-2013-0032 but is subject to the Post-

Construction requirements of the Construction General Permit if the project disturbance area is greater than 1 acre.

Designated MS4 areas are limited to all areas within an Urban Reserve Line or specific Village Reserve line as designated in the County General Plan. Because the Proposed Project Site and the Alternative Site are both outside the Cayucos Urban Reserve Line, the project is required only to implement post construction measures required under the Construction General Permit.

# **Environmental Setting**

Toro Creek Valley is located within the Central California Coastal Watershed. Nine watersheds cross San Luis Obispo County. Annual average precipitation in the region is 17.62 inches, with average highs of 3.69 inches in February, and 0.03 inches in July. Creeks within and immediately surrounding the community of Cayucos either flow generally west from the Santa Lucia Mountains.

# **Regional and Local Stormwater Runoff**

The definition of stormwater runoff is the amount of surface water produced from precipitation, measured after evaporation, evapotranspiration, and percolation. Flow paths of stormwater within the region are identified with separate geographical Hydrologic Sub-units. Within the Estero Bay unit, stormwater runoff originates from the communities of Oceano (Arroyo Grande Creek and Meadow Creek), the urban fringe of San Luis Obispo (Perfumo Creek, Froom Creek, San Luis Obispo Creek), Cambria (Santa Rosa Creek, Monterey Bay National Marine Sanctuary), and the community of Los Osos (Los Osos Creek, Morro Bay) and Cayucos creek valleys.

#### Regional and Local Surface Water Quality

The 2006 Clean Water Act (CWA) Section 303(d) list of limited water quality segments indicates that thirteen of the 114 impaired water bodies in the Central Coastal Regional Water Quality Control Board (RWQCB) region are located within the Estero Bay Sub-Hydrologic Unit, ten of which are impaired due to pathogens. The source of pathogens within Toro Creek is identified as agriculture, natural sources and former petroleum activities. Although livestock can be a source of pathogens, the Central Coast RWQCB principally describes the sources as unidentified. Old Creek and Willow Creek adjoining the Alternative Site do not appear on this list of impaired waters.

#### Regional and Local Flooding

Areas subject to flooding during 100-year events are limited to areas immediately adjacent to creek channels. The Federal Emergency Management Agency (FEMA) Flood Insurance Rate Maps (FIRMs) identified regions that are inundated during a 100-year storm. According to County GIS data the Proposed Project site is near but not within the 100-year flood zone on Toro Creek. To confirm the local extents of the 100-year mapped flood zone adjacent to the project site, Water Systems Consulting (WSC) constructed a hydraulic model of the creek segment of interest as described below.

The flood extent and elevation is shown on Map IV D-2.

As discussed above, the Proposed Project and Alternative Site are adjacent to Toro Creek and Willow Creek, both of which are recognized by the Federal Emergency Management Agency (FEMA) in the Flood Insurance Study (FIS) for San Luis Obispo County. The San Luis Obispo (SLO) County FIS report identifies a 1% Annual Chance (100-year) Flood Hazard Zone within Toro Creek, extending from the mouth of the creek at the Pacific Ocean to just past Negranti Road, an

CAYUCOS SUSTAINABLE WATER PROJECT

<sup>&</sup>lt;sup>1</sup> RWQCB Draft 2010 Integrated Report (CWA Section 303(d) List / 305(b) Report) 2010 CALIFORNIA 303(d) LIST OF WATER QUALITY LIMITED SEGMENTS

approximate 3.5-mile span. Of the 3.5 miles mapped by FEMA, only 670 feet, located at State Highway 1, is based on a detailed study.

## **Toro Creek Valley Groundwater Basin**

The Proposed Project has a well in the lower sub-basin of the Toro Valley Groundwater Basin that exists roughly between the first and second creek bridges ion Toro Creek Road. The sub-basin is currently pumped for agriculture and Chevron operations. Hydro-geologic analysis<sup>2</sup> has estimated the groundwater basin storage at 220 acre feet (AF) with a dry weather average of 160 AF. Current pumping is estimated at 70 AFY resulting in a dry weather storage volume of at least 90 AF.

#### PROJECT SITE CONDITIONS

## Site Hydrology and Drainage

Stormwater runoff from the site generally sheet flows south and west into nearby Toro Creek. A managed drainage ditch exists that bisects the property that conveys upland watershed flows. This ditch will not be altered. Map IV D-1 shows the watershed of Toro Creek Valley.

#### Site Water Quality

The Proposed Project and Alternative sites historically have been used for agricultural activities. Because these activities typically rely heavily on chemical fertilizers, herbicides, and pesticides, it is reasonable to assume that these substances have been applied on portions of these properties for years. Refer to section IV-J Hazards and Hazardous Materials for discussion of residual pesticides. Cattle within a fenced region of the site have grazed the grasslands.

#### Site Flooding

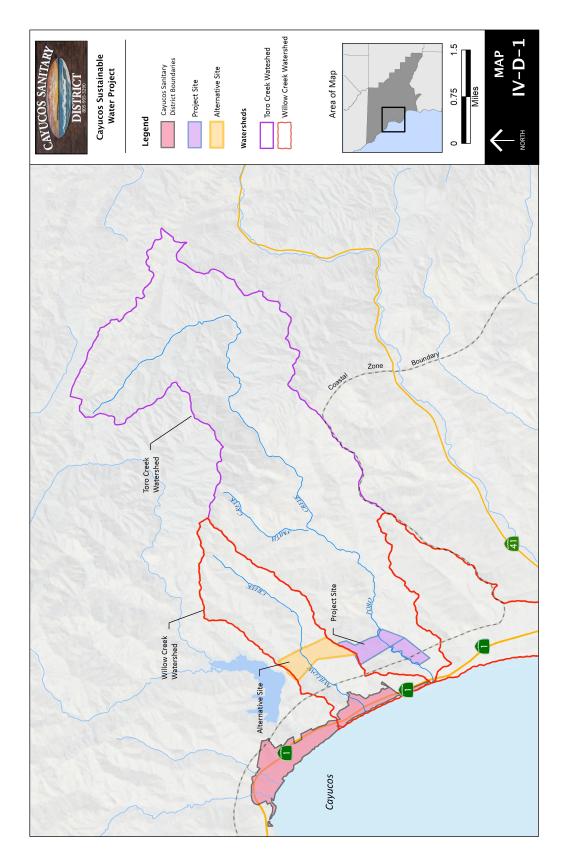
The main raw wastewater collection pipeline and treated effluent conveyance pipeline would cross Toro Creek, which is located within the 100-year flood hazard area. Additionally, for the Alternative site pipeline conveyance pipelines would cross Old Creek Creek, which is also located within the 100-year flood hazard area.

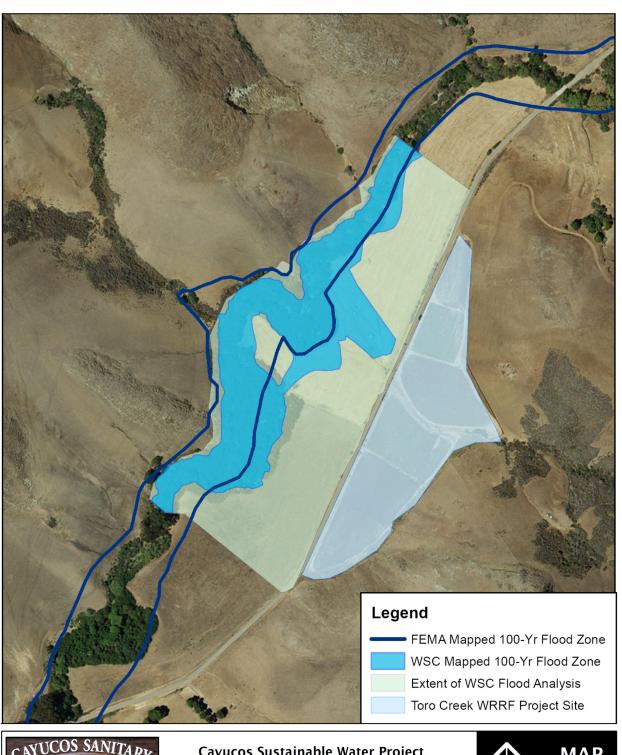
# 5. Standards of Significance

The CEQA Guidelines provide the basis for the following impact significance criteria. The following topics reflect the conclusions of the Initial Study issued with the NOP as potentially significant effects requiring further study. The Proposed Project would result in potentially significant impacts if:

- 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 which would result in substantial flooding, erosion or
  siltation on- or off-site.
- Structures are developed within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map, or placed within a 100-year flood hazard area structures which would impede or redirect flood flows.

<sup>&</sup>lt;sup>2</sup> Technical Memorandum Preliminary Hydrogeologic Assessment for Ground Water Recharge with Recycled Water, November 17, 2015, Cleath Harris Geologists







Cayucos Sustainable Water Project
WSC MAPPED 100-YEAR
FLOOD LEVEL



 Create or contribute runoff water which would provides a substantial additional sources of polluted runoff.

# 6. Impacts Found to be Less than Significant

The Initial Study determined that the proposed project would not be expected to deplete groundwater supplies or interfere with groundwater recharge due to the limited size of the project and the provision of a basin to capture, slow and percolate increased stormwater on the site. Domestic water use for the proposed project is limited to domestic use for toilets, shower and wash down functions. This use would not substantially affect groundwater.

The risk due to sieche or tsunami is less than significant because the proposed WRRF is outside the risk zone on the Tsunmai inundation Map for Emergency Planning, Moor Bay North Quadrangle / Morro Bay South Quadrangle, published by the California Emergency Management Agency.

The potential for mudflow and tsunami impacts for the portions of the Proposed Project along the coastline in the tsunami inundation area is addressed in section IV-A Geology and Soils.

The County of San Luis Obispo Safety Element does not identify a significant risk of seiche in San Luis Obispo county.

# 7. Project Impacts and Mitigation Measures

## **Inland Area Impacts and Mitigation Measures**

#### FLOOD HAZARD

The hydraulic model shows the 100-year (1% annual chance) water surface elevation is contained within the floodplain west of Toro Creek Road and ultimately remains outside of the project site (refer to the Technical Appendix for the complete Technical Memorandum by WSC). Map IV-D2 displays the FEMA mapping as depicted in the FIS report for SLO County. As shown, the two mapped flood zones vary horizontally, however, this is not uncommon given that the FEMA mapping for the Toro Creek segment of interest is not based on a detailed hydraulic study. Additionally, the level of effort and methodology used by FEMA to delineate the flood zone is not discussed in the FIS report. In any case, the FEMA map and the map resulting from this analysis depict the 1% Annual Chance Flood Hazard Zone entirely outside of the project area.

Based on this analysis the proposed project is neither exposed to risk of flooding in this storm event nor would the site involve earthwork fill that would raise the flood level.

**Impact WQ-1:** Construction of the Proposed Project in the Toro Creek Valley would not result in exposure of people or structures to flooding in a 100 year storm event or result in a substantial increase in the flood level. This impact is less than significant (Class III).

#### DRAINAGE PATTERNS AND STORMWATER VOLUME

The Proposed Project does not alter the basic direction of stormwater flow across the site from upland area across the site creek valley. Upslope tributary watershed runoff will be intercepted in a swale and conveyed south-west where it will then sheet flow in the historic runoff direction west to the existing swale along Toro Creek Road and eventually to Toro Creek. Stormwater runoff from the

developed site will be conveyed to a basin at the south end of the site (refer to Map I-4) via a vegetated swale. Upon filling, the basin stormwater would sheet flow in the same western direction as the upslope tributary watershed runoff, ultimately reaching Toro Creek.

The purpose of this basin is primarily for spill containment, however, as designed it will function as an effective stormwater treatment facility and also allow for some stormwater percolation in the groundwater. For this reason, the Proposed Project would have less than significant effect on drainage patterns.

Although the project is not required under County ordinance to reduce post-construction stormwater flows to pre-construction levels, the effect of the spill containment basin will be to retard and percolate a substantial portion of the post construction runoff volume. For this reason the Proposed Project would have a less than significant effect on stormwater volumes reaching Toro Creek.

#### **SURFACE WATER QUALITY**

#### Erosion and siltation risk

Grading and removal of native vegetation for development could temporarily contribute to surface runoff, soil erosion, siltation, and increased flooding hazards, during construction. Developed areas with significant change to preconstruction topology (slopes, bare or improperly stabilized topology, impervious areas) could significantly contribute to risks for erosion, siltation, and degradation of water quality.

All runoff generated from the Project impervious surfaces will be captured in a vegetated swale intended to function as a stormwater treatment measure. The vegetated swale will effectively trap particulate pollutants, promote infiltration, and reduce the flow velocity of stormwater runoff. In addition, the Proposed Project includes a substantial basin that will capture and retard the stormwater flow from the vegetated swales. Although not required by County ordinance, at post-construction this feature will function as a stormwater treatment facility to further remove sediments and other deleterious materials from the stormwater before it moves west across open land. For this reason the Proposed Project would have a less than significant impact on stormwater quality.

**Impact WQ-2:** The Proposed Project includes design features that would result in less than significant impacts on stormwater volumes, erosion and sedimentation hazard, and stormwater runoff quality (Class III).

## **Construction activities**

Construction of the Proposed Project would result in disturbed soils during earthwork activities leading up to surfacing the facility. The total ground disturbance within the project area is estimated at about 11 acres including the construction staging area. Using the Environmental Protection Agency NPDES risk assessment calculator<sup>3</sup> assuming a six-month construction timeframe for general site disturbance, the amount of sediment potentially produced that could flow to drainages and waterways is 0.243 tons per acre of disturbed site. Siltation of waterways and other surface waters would adversely impact the stream habitat for endangered species present in the creek.

**Impact WQ-3:** The Proposed Project could result in significant construction-stage erosion and sedimentation impacts until site grading and preparation reached the stage that the proposed spill containment basin is functioning to capture all site runoff. This is a significant but mitigable impact (Class II).

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<sup>&</sup>lt;sup>3</sup> Watershed Erosion Estimate = K(soil erodability) x R(rainfall intensity) x L(slope length) = 0.25 x 0.4 x 2.43= 0.243 tons per acre.

**Mitigation Measure WQ-1:** To mitigate impacts related to construction stage erosion and sedimentation for site and pipeline construction activities, the Project is required to comply with the General Permit including but not limited to compliance with 1) the State General Construction Activity Permit, as most recently modified by the State Water Resources Control Board (SWRCB), and 2) County standards under the Stormwater Ordinance Title 19 chapter 19.09, ensuring that construction-related sediment or other contaminants that could adversely affect receiving water would be reduced to a less-than-significant impact.

#### INDIRECT SECONDARY IMPACTS OF THE USE OF RECLAIMED WATER FOR IRRIGATION

The project proposes to utilize tertiary treated wastewater to provide agricultural irrigation in as yet undesignated farmlands in Toro Valley or other areas.

The constituent of tertiary treated wastewater of primary concern is elemental nitrogen. The nitrogen in wastewater is converted to nitrate  $(NO_3)$ , if not by aeration in the treatment process, then during the infiltration of the treated wastewater through the soils to the groundwater table. Therefore, the potential for accumulation of nitrogen in the groundwater is considered less than significant. Excessive reclaimed water application resulting in runoff to surface waters could result in increased nitrogen levels in surface waters, a potentially significant impact. However, because the location and crop to which the recycled water would be applied is not known at this time, conclusions about effects on surface waters are speculative.

Dissolved pharmaceuticals have also been found to be present in reclaimed water. According to the American Waterworks Association:<sup>4</sup>

"Pharmaceuticals and personal care products, known in the water industry as PPCPs, are a group of compounds consisting of human and veterinary drugs (prescription or over the counter) and consumer products, such as fragrance, lotions, sun-screens, house cleaning products, and others. These compounds have been detected in trace amounts in surface water, drinking water and wastewater effluent sampling conducted in both Europe and the U.S.

To date, research throughout the world has not demonstrated an impact on human health from the trace amounts of PPCPs found in drinking water.

While these trace substances may be detected at very low levels in source waters, people regularly consume or expose themselves to products containing these substances in much higher concentrations through medicines, food and beverage and other sources. The level in which they are found in source waters is very small in comparison.

Water professionals also are researching the effectiveness of current treatment techniques on removal of PPCPs and other organic compounds. Because of the wide array of chemical structures and properties associated with PPCPs, no one single treatment can remove them all. Technologies under investigation include membranes and GAC which physically remove compounds and ozone or UV which break them down."

The Tertiary treated water will comply with:

- CFR Title 22 operational and on-site use requirements
- Central Coast Basin Plan Water Quality Objectives
- Central Coast Regional Water Quality Control Board Master Reclamation Permit

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<sup>&</sup>lt;sup>4</sup> American Waterworks Association website http://www.drinktap.org/consumerdnn/Default.aspx?tabid=73

Based on the current science related to PPCPs, the State of California has deemed recycled wastewater conforming to current laws and regulations as safe application as irrigation water and would not pose a risk to water quality in the environment and no adverse impact is identified for PPCDs in the recycled water.

#### **EFFECTS ON GROUNDWATER**

The Proposed WRRF operations under certain conditions will require filling the reclaimed water tank up to two times a year resulting in total ground water pumping of 600,000 gallons or 1.8 AF. Based on the dry weather storage of the groundwater sub-basin of 90 AF this effect is not significant.

**Impact WQ-4**: Impacts for annual WRRF tank filling operations requiring 1.8 acre feet of groundwater would be less than significant based on a dry weather sub-basin storage of 90 acre feet that accounts for other pumping in the subbasin. This impact is less than significant (Class III).

## **Coastal Zone Impacts and Mitigation Measures**

#### PIPELINE CONSTRUCTION

Pipeline construction in the Coastal Zone will occur only in public rights of way. The segments form Chaney Street north up Ocean Avenue and to the CSA 10 facility will all be in existing paved or shoulder areas. Likewise, the pipeline south from Yerba Buena Street in Morro Bay will be constructed in existing pavement in or adjoining the existing sewer trench. The segment from Lift Station 5 south to Yerba Buena St. can be assumed to be new construction rather than potential modification to the existing line. This length is approximately 0.6 miles in length and the disturbance would be a trench corridor approximately four feet wide. The segment from the Coastal Zone boundary west for 800 feet will be directionally bored (Map IV-C1 in section IV-C depicts this area). The requirements and disturbance for bore pits is addressed in section IV-C Biological Resources. With implementation of measures WQ-1 and standard grading / trenching permit requirements for temporary sediment and erosion control, no impacts to coastal resources would result form the pipeline work in existing pavements.

From the end of the directional bore west and then along Highway 1 in the Caltrans right of way the trench will disturb approximately 1900 feet in a trench corridor approximately 4 feet wide (0.17 ac). Implementation of Mitigation Measure WQ-1 for SWPP construction and post construction measures and VIS-1 for restoration of disturbed ground with native species seed consistent with Coastal Policy 30 would mitigate potential impacts to Coastal Resources for this pipeline segment.

#### OCEAN OUTFALL DISCHARGE

As described in Section I Project Description, the existing ocean outfall in Morro Bay discharges secondary treated effluent into the Pacific Ocean. The Proposed Project would send tertiary treated or blended tertiary treated wastewater to the outfall.

The CSD will apply for a NPDES Individual Permit that will contain discharge limitations consistent with the requirements of the California Ocean Plan. Provided the WRRF produces effluent consistent the permitted discharge limitations, the State through the NPDES and Ocean Plan processes have determined that the discharge is not a threat to water quality.

The quality of this treated effluent is higher than the existing baseline condition. Therefore, the Proposed Project would have beneficial effect on the water quality discharged into the ocean compared to the existing condition.

# E. CULTURAL RESOURCES

## 1. Environmental Issue

This section describes the cultural resources, policies and regulations that pertain to the CSWP and provides an assessment of direct and indirect and cumulative project impacts. A literature and records search, an intensive archaeological survey of each of the proposed project work areas, and subsurface investigations were conducted to identify and evaluate any significant prehistoric or historic archaeological resources that might be impacted by the Proposed Project. The intent of the cultural resources investigation is to comply with Section 106 of the National Historic Preservation Act (NHPA) and with the requirements of the California Environmental Quality Act (CEQA) and the County of San Luis Obispo Planning and Building Department.

# 2. Sources Used In This Analysis

This section contains the research and findings for a Phase 1 Archaeological Investigation by Cultural Resource Management Services and Phase II Testing at CA-SLO-879/H performed by Applied Earthworks. Both reports are contained in the Technical Appendix, with sensitive maps and data withheld pursuant to State law. This analysis is based on a review of a wide range of resources and literature including a records and literature search at the Central Coast Information Center, University of California, Santa Barbara.

A complete list of references is provided in the Technical Appendix document.

# 3. Scoping Issues for Cultural Resources

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issue relating to cultural resources was raised during the scoping process and is addressed in this section:

- The Native American Heritage Commission provided guidance documents for Tribal Cultural Resources and Tribal notifications.
- The Northern Chumash Tribal Council sent an email expressing concern for the location of the proposed project on a archaeologically sensitive site.

# 4. Environmental and Regulatory Setting

## Regulatory Setting

Federal, state and local regulations pertaining to cultural resources are discussed below.

#### **FEDERAL REGULATIONS**

#### **National Historic Preservation Act**

Cultural resources are protected through the National Historic Preservation Act (NHPA) of 1966, as amended (16 United States Code [USC] 470f), and its implementing regulation, Protection of Historic Properties (36 Code of Federal Regulations [CFR] Part 800). The Archaeological and Historic Preservation Act of 1974; and the Archaeological Resources Protection Act of 1979 further address archaeological resources. Section 106 of the NHPA requires Federal agencies to consider the effects of an "undertaking" Prior to implementing an "undertaking" (e.g., issuing a Federal permit), requires Federal agencies to consider the effects of the undertaking on historic properties. The Advisory Council on Historic Preservation and the State Historic Preservation Officer must be afforded a reasonable opportunity to comment on any undertaking that would adversely affect properties eligible for listing in the National Registry of Historic Places. As indicated in Section 101(d)(6)(A) of the

NHPA, properties of traditional religious and cultural importance to a tribe are eligible for inclusion in the NRHP. Under the NHPA, a resource is considered significant if it meets the NRHP listing criteria at 36 CFR 60.4. Federal regulations only come into play in the private sector if a project requires a federal permit or if it uses federal funding.

## National Register of Historic Places (NRHP)

The NRHP was established by the NHPA of 1966 as "an authoritative guide to be used by Federal, State, and local governments; private groups; and citizens to identify the nation's historic resources and indicate what properties should be considered for protection from destruction or impairment" (36 CFR 60.2). The NRHP recognizes a range of historic and prehistoric archaeological properties as well as the built environment that are significant at the national, state, and local levels. To be eligible for listing in the NRHP, a resource must be significant in American history, architecture, archaeology, engineering, or culture. Districts, sites, buildings, structures, and objects of potential significance must meet one or more of the following four established criteria (U.S. Department of the Interior 1995):

- a. The resource is associated with events that have made a significant contribution to the broad patterns of our history;
- b. The resource is associated with the lives of persons significant in our past;
- c. The resource embodies the distinctive characteristics of a type, period, or method of construction or represents the work of a master or possesses high artistic values or represents a significant and distinguishable entity whose components may lack individual distinction; or
- d. The resource has yielded, or may be likely to yield, information important in prehistory or history.

Unless the property possesses exceptional significance, it must be at least 50 years old to be eligible for NRHP listing (U.S. Department of the Interior 1995). In addition to meeting the criteria of significance, a property must have integrity, defined as "the ability of a property to convey its significance" (U.S. Department of the Interior 1995). The NRHP recognizes seven qualities that, in various combinations, define integrity. The seven factors that define integrity are location, design, setting, materials, workmanship, feeling, and association. To retain historic integrity a property must possess several, and usually most, of these seven aspects. Thus, the retention of the specific aspects of integrity is paramount for a property to convey its significance.

#### **Executive Order 11593.**

Executive Order 11593, Protection of the Cultural Environment, (May 13, 1971), 36 Code of Federal Regulations, Section 8921 as incorporated into Title 7, United States Code orders the protection and enhancement of the cultural environment through providing leadership, establishing State offices of historic preservation, and developing criteria for assessing resource values.

#### **STATE REGULATIONS**

## California Environmental Quality Act (CEQA)

CEQA (PRC Section 21000 et seq.) requires lead agencies to determine if a project would have a significant effect on the environment, including significant effects on historical or archaeological resources. Under CEQA (Section 21084.1), a project that may cause a

substantial adverse change in the significance of a historical resource is a project that may have a significant effect on the environment. The State CEQA Guidelines (14 CCR 15064.5) recognize that historical resources include:

- A resource listed in, or determined to be eligible by the State Historical Resources Commission for listing in, the CRHR;
- 2. A resource included in a local register of historical resources, as defined in 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 that 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.

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 State CEQA Guidelines apply. If a project may cause a substantial adverse change (defined as physical demolition, destruction, relocation, or alteration of the resource or its immediate surroundings such that the significance of a historical resource would be materially impaired) in the significance of a historical resource, the lead agency must identify potentially feasible measures to mitigate these effects (14 California Code of Regulations (CCR) 15064.5(b)(1), 15064.5(b)(4)).

If an archaeological site does not meet the historical resource criteria contained in the State CEQA Guidelines, the site may be treated as a unique archaeological resource in accordance with the provisions of Section 21083. As defined in Section 21083.2 of CEQA, a unique archaeological resource is an archaeological artifact, object, or site for which it can be clearly demonstrated that, without merely adding to the current body of knowledge, there is a high probability that it meets the following criteria:

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

If an archaeological site meets the criteria for a unique archaeological resource, then it is to be treated in accordance with the provisions of Section 21083.2, which state that if the lead agency determines that a project would have a significant effect on unique archaeological resources, the lead agency may require reasonable efforts be made to permit any or all of these resources to be preserved in place (Section 21083.1(a)). If preservation in place is not feasible, mitigation measures shall be required.

# **California Register of Historical Resources**

The California Register of Historical Resources (CRHR) (1998) is "an authoritative guide in California to be used by State and local agencies, private groups, and citizens to identify the State's historical resources and indicate what properties are to be protected, to the extent prudent and feasible, from substantial adverse change." Properties listed in or formally determined eligible for listing in the NRHP and California Historical Landmarks (Nos. 770 and higher), are automatically included in the CRHR. Other properties recognized under the California Points of Historical Interest program that are identified as significant in historic

resources surveys or designated by local landmarks programs may be nominated for inclusion in the CRHR. A resource, either an individual property or a contributor to a historic district, may be listed in the CRHR if the State Historical Resources Commission determines that it meets one or more of the following criteria, which are modeled on NRHP criteria:

- 1. The resource is associated with events that have made a significant contribution to the broad patterns of California's history and cultural heritage;
- 2. The resource is associated with the lives of persons important in our past;
- 3. The resource 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. The resource has yielded, or may be likely to yield, information important in history or prehistory.

Under Public Resources Code (PRC) Section 4852), a cultural resource must retain integrity to be considered eligible for the CRHP. It must retain sufficient character to be recognizable as a cultural resource and convey reasons for determining its significance. Integrity is evaluated with regard to the retention of factors such as location, design, setting, materials, workmanship, feeling, and association. Typically, a prehistoric archaeological site in California is recommended eligible for listing in the CRHP according to its potential to yield important information regarding prehistory or history (Criterion 4). Such information may come from chronological markers, such as projectile point styles; bead styles; obsidian artifacts, which can be subjected to dating methods; or undisturbed deposits that retain their stratigraphic integrity and therefore have the ability to answer research questions.

## **Native American Heritage Commission**

Duties of the Native American Heritage Commission (NAHC), (PRC Section 5097.91) include inventorying places of religious or social significance to Native Americans and identifying known graves and cemeteries of Native Americans on private lands. Section 5097.98 of the PRC specifies the protocol to be followed when the NAHC receives notification of the discovery of Native American human remains from a county coroner.

## Assembly Bill 52 (AB 52)

As of July 1, 2015, California Assembly Bill 52 (AB 52) was enacted and expands the California Environmental Quality Act (CEQA) by establishing a formal consultation process for California tribes within the CEQA process. The bill specifies that any project that may affect or cause a substantial adverse change in the significance of a tribal cultural resource would require a lead agency to "begin consultation with a California Native American tribe that is traditionally and culturally affiliated with the geographic area of the proposed project." According to the legislative intent for AB 52, "tribes may have knowledge about land and cultural resources that should be included in the environmental analysis for projects that may have a significant impact on those resources." PRC Section 21074 also defines a new category of resources under CEQA called "tribal cultural resources." Tribal cultural resources are defined as "sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe" and is either listed on or eligible for the California Register of Historical Resources or a local historic register, or if the lead agency chooses to treat the resource as a tribal cultural resource.

#### California Public Records Act

Sections 6254 and 6254.10 of the California Public Records Act were enacted to protect archaeological sites from unauthorized excavation, looting, or vandalism. Section 6254(r) authorizes public agencies to withhold information from the public relating to "Native American graves, cemeteries, and sacred places maintained by the Native American Heritage Commission." Section 6254.10 specifically exempts from disclosure requests for "records that relate to archaeological site information and reports maintained by, or in the possession of, the Department of Parks and Recreation, the State Historical Resources Commission, the State Lands Commission, the NAHC, another State agency, or a local agency, including records that the agency obtains through a consultation process between a Native American tribe and a State or local agency."

## Health and Safety Code, Sections 7050.5 and 7052

Health and Safety Code Section 7050.5 declares that in the event of the discovery of human remains outside of a dedicated cemetery, all ground disturbance must cease and the county coroner must be notified. Section 7052 establishes a felony penalty for mutilating, disinterring, or otherwise disturbing human remains, except by relatives.

#### **COUNTY OF SAN LUIS OBISPO REGULATIONS**

#### Land Use Ordinance-Inland Area

The County of San Luis Obispo Land Use Ordinance (LUO) includes requirements for the protection of known cultural resources and for the implementation of mitigation measures to minimize potential impacts to known and unknown resources. However since the investigation described below found not cultural resources outside the Coastal Zone, no further discussion of the LUO is warranted.

# **Coastal Zone Land Use Ordinance**

The County of San Luis Obispo Coastal Zone Land Use Ordinance (CZLUO) includes requirements for the protection of known cultural resources and for the implementation of mitigation measures to minimize potential impacts to known and unknown resources. In addition to General Plan and ordinance requirements, Coastal Plan Policies include policies for the protection of cultural resources consistent with the requirements of the California Coastal Act (PRC Section 30000, et seq.)

The Coastal Zone Land Use Ordinance sections 23.04.200 and 23.04.07 establish standards for review and design for development applications related to archaeologically sensitive areas.

# 23.04.200 - Protection of Archaeological Resources Not Within the Archaeologically Sensitive Areas Combining Designation:

All development applications that propose development that is not located within the Archaeologically Sensitive Areas combining designation and that meets the following location criteria shall be subject to the standards for the Archaeologically Sensitive Areas Combining Designation in Chapter 23.07: development that is either within 100 feet of the bank of a coastal stream (as defined in the Coastal Zone Land Use Ordinance), or development that is within 300 feet of such stream where the slope of the site is less than 10 percent.

## 23.07.104 - Archaeologically Sensitive Areas:

To protect and preserve archaeological resources, the following procedures and requirements apply to development within areas of the coastal zone identified as archaeologically sensitive.

- a. **Archaeologically sensitive areas**. The following areas are defined as archaeologically sensitive:
  - (1) Any parcel within a rural area which is identified on the rural parcel number list prepared by the California Archaeological Site Survey Office on file with the county Planning Department.
  - (2) Any parcel within an urban or village area which is located within an archaeologically sensitive area as delineated by the official maps (Part III) of the Land Use Element.
  - (3) Any other parcel containing a known archaeological site recorded by the California Archaeological Site Survey Office.
- b. **Preliminary site survey required**. Before issuance of a land use or construction permit for development within an archaeologically sensitive area, a preliminary site survey shall be required. The survey shall be conducted by a qualified archaeologist knowledgeable in local Native American culture and approved by the Environmental Coordinator. The County will provide pertinent project information to the Native American tribe(s).
  - c. When a mitigation plan is required. If the preliminary site survey determines that proposed development may have significant effects on existing, known or suspected archaeological resources, a plan for mitigation shall be prepared by a qualified archaeologist. The County will provide pertinent project information to the Native American tribe(s) as appropriate. The purpose of the plan is to protect the resource. The plan may recommend the need for further study, subsurface testing, monitoring during construction activities, project redesign, or other actions to mitigate the impacts on the resource. Highest priority shall be given to avoiding disturbance of sensitive resources. Lower priority mitigation measures may include use of fill to cap the sensitive resources. As a last resort, the review authority may permit excavation and recovery of those resources. The mitigation plan shall be submitted to and approved by the Environmental Coordinator, and considered in the evaluation of the development request by the Review Authority.
  - **d.** Archeological resources discovery. In the event archeological resources are unearthed or discovered during any construction activities, the standards of Section 23.05.140 of this title shall apply. Construction activities shall not commence until a mitigation plan, prepared by a qualified professional archaeologist reviewed and approved by the Environmental Coordinator, is completed and implemented. The County will provide pertinent project information to the affected Native American tribe(s) and consider comments prior to approval of the mitigation plan. The mitigation plan shall include measures to avoid the resources to the maximum degree feasible and shall provide mitigation for unavoidable impacts. A report verifying that the approved mitigation plan has been completed shall be submitted to the Environmental Coordinator prior to occupancy or final inspection, whichever occurs first.

[Amended 1995, Ord. 2715; Amended 2004, Ord. 3048]

# **Environmental Setting**

Archaeological investigations completed along the central California coast have supported the creation of a general culture historical sequence. Time periods include the Paleoindian Period (ca. 11000 BP to 8500 BP), the Millingstone Period (ca. 8500 BP to 5500 BP), the Early Period (ca. 5500 BP to 3000 BP), the Middle Period (ca. 3000 BP to 1000 BP), the

Middle/Late Transition Period (ca. 1000 BP to 700 BP), and the Late Period (ca. 700 BP to Spanish contact), based primarily on archaeological investigations around the Santa Barbara Channel., Early archaeological work has concluded that a significant continuity of material culture existed in both northern and southern Chumash territories, sufficient to consider this broad region generally as a unified culture area (both north and south of Point Conception). However, more recent information has shown observable differences between northern and southern Chumash material records.

The northern Chumash material record is more similar to Salinan than to southern Chumash material. Whereas southern Chumash sites are noted for large villages with high population densities and intensified utilization of marine resources and terrestrial animal hunting, these same components are absent in both northern Chumash and Salinan sites. As a result of these important differences, the characterization of a time period in the project area (in northern Chumash territory) may not follow exactly the expectations of the temporal sequence that is modeled after information from southern Chumash sites, described in detail in the Technical Appendix.

A search of maps and records was undertaken at the Central Coastal Information Center, UCSB, which provides archaeological site data for San Luis Obispo County under agreement with the California Office of Historic Preservation. The search parameters included all known archaeological sites and previous archaeological studies within a one-half mile radius of each of the candidate site areas and pipeline route. A total of 168 previous cultural resource studies have been conducted within the one-half mile radius of the proposed WRRF, proposed pipelines and alternative site. Thirty-two archaeological sites have been recorded within 1/2 mile of the Proposed Project components.

A search of the inventories for the State Historic Property Files, National Register of Historic Places, National Register of Determined Eligible Properties, California Historical Landmarks, and California Points of Historic Interest was also performed. One Historic Property (P40-41172), a small early 20th century residence has been recorded on 16<sup>th</sup> Street in Cayucos. This residence would not be affected by the Project.

# 5. Standards of Significance

For purposes of this EIR, a cultural resource impact is considered significant if implementation of the Project would result in any of the following.

An adverse effect is found when an undertaking may alter, directly or indirectly, any of the characteristics of a historic property that qualify the property for inclusion in the National Register in a manner that would diminish the integrity of the property's location, design, setting, materials, workmanship, feeling, or association (800.5(a)(1)). The agency official, in consultation with the SHPO/THPO, may propose a finding of no adverse effect when the undertaking's effects do not meet the criteria of paragraph (a)(1) or the undertaking is modified or conditions are imposed.

According to the San Luis Obispo Environmental Checklist and the State CEQA Guidelines, impacts related to the Proposed Project would be considered significant and would require mitigation if they would:

- 1) Cause a substantial adverse change in the significance of a historical resource as defined in §15064.5 of the CEQA Guidelines;
- 2) Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5 of the CEQA Guidelines;

3) Disturb any human remains, including those interred outside of formal cemeteries.

# 6. Impacts Found to Be Less Than Significant

As described following, these aspects of the Proposed Project were determined to have no impact on Cultural Resources:

- Development on the Proposed Project Site
- Development on the Alternative Project Site

# 7. Project Impacts and Mitigation Measures

#### TRIBAL CULTURAL RESOURCES

The consultants contacted the California Native American Heritage Commission (NAHC) by letter on April 11, 2016 requesting a review of the Sacred Lands File (SLF). The NAHC responded on April 20, 2016, indicating that the search of the SLF did not indicate the presence of Native American cultural resources in the project area or anywhere in the vicinity. The NAHC provided a list of Native American contacts that may have additional information about the project area identified as the NAHC Tribal Consultation List, County of San Luis Obispo, dated April 20, 2016.

The Lead Agency's consultant mailed letter a notifying the Tribes on the NAHC Tribal Consultation List of the Project and requesting information concerning cultural resources in the project area on April 28, 2016. This letter was identified as notification of the project pursuant to AB 52.

Two email responses from tribal representatives were received. The yak tiyu tityu Northern Chumash Tribe responded on June 11, 2016, identifying the likelihood of sensitive cultural resources in the area. The Salinan Tribe of Monterey County responded on June 16, 2016 indicating a preference for the proposed alternative site on Old Creek Road.

Last, in response to the NOP issued April 22, 2016, the Northern Chumash Tribal Council responded by email on May 2, 2016 indicating strong concern for development on land termed a sacred site.

Although the tribal contacts did not request AB 52 consultation, and two tribes responded with comments after the 30 day response period stipulated under AB 52, the CSD contacted the Tribal representatives to meet at the Proposed Project site to discuss the project listen to tribal concerns. A site meeting was conducted for consultation with the Northern Chumash Tribal Council and the yak tityu tityu Northern Chumash Tribe representatives on June 29, 2016. At the meeting, ways to avoid and reduce potential impacts of the proposed project were discussed. Further consultation has been on-going through the subsequent subsurface investigations and will extend to review of data and findings. The Tribes have never formalized a statement that the project site and pipeline route is a Tribal Cultural Resource, however this conclusion can be inferred and will be treated as such in this document.

According to the legislative intent for AB 52, "tribes may have knowledge about land and cultural resources that should be included in the environmental analysis for projects that may have a significant impact on those resources." PRC Section 21074 also defines a new category of resources under CEQA called "tribal cultural resources." Tribal cultural resources are defined as "sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe" and is either listed on or

eligible for the California Register of Historical Resources or a local historic register, or if the lead agency chooses to treat the resource as a tribal cultural resource.

As discussed below, the Proposed Project pipeline route passes through CA-SLO-879/H, a site that is eligible for the California Register of Historic Resources. The impact and mitigation measure discussion following for CA-SLO-879/H reflects the consultation process with interested tribes. The tribal representatives expressed concern that all the portions of the lands owned by the CSD that contain recorded archaeological sites be protected whether affected by the Porposed Porject or not.

**Impact CUL-1:** The proposed project has the potential to adversely affect tribal cultural resources, however this effect is less than significant. (Class III)

**Mitigation Measure CUL-1:** To mitigate potential effects to tribal cultural resources, the CSD shall place portions of parcels 8 and 10 owned by the CSD between Toro Creek Road and Toro Creek in a conservation easement in favor of an appropriate entity to protect and manage the land for the type of historic agriculture uses that have occurred on the property, and preclude deep ripping agricultural activities such as used for vineyard installation. Additionally, the Cultural Resource Impact Assessment Report shall include a full technical analysis of all artifacts and other cultural remains collected during the Phase II study.

Another aspect of the Proposed Project that is designed to avoid or minimize impacts to tribal cultural resources is to include pipeline check valves on both sides of Toro Creek to avoid spills into the creek.

#### PHASE II INVESTIGATION RESEARCH METHODS

The field crew for the surface survey for the Project site and the pipeline routes performed survey transects approximately 2-3 meters apart at the site. Overall visibility of the ground surface was good, averaging about 85%. All exposed areas of soil were inspected for the presence of artifacts, features, or other indications of significant cultural deposits. The spoils of burrowing rodents and other areas of disturbance were also thoroughly examined for evidence of subsurface archaeological deposits.

For surface survey of the proposed pipeline alignments, each side of the roadside was examined along the entire route. Previously recorded archaeological sites in or adjacent to the proposed alignments were visited in order to assess the current condition.

Phase II archaeological testing to document the nature and integrity of cultural deposits in the pipeline alignments and to collect data to assess potential project effects on those deposits. The WRRF site itself is not located inside the currently defined site boundary, and surface inspection of the parcel found no evidence of cultural materials; however, the location and topography indicate that this parcel has a high sensitivity for buried archaeological deposits. Therefore, buried site testing was conducted on the plant site to determine whether buried cultural deposits are present. The archaeological fieldwork was completed between August 15 and September 6, 2016.

Applied Earthworks conducted buried site testing within the proposed treatment plant location and Phase II testing along the proposed pipeline corridor within San Luis Obispo County's right of way along Toro Creek Road. The objective of testing was to determine where intact subsurface cultural deposits exist within the Proposed Project area, and to investigate the integrity of those deposits. Special focus was given to interpreting soil disturbances resulting from previous construction along Toro Creek Road.

#### **Inland Area Impacts and Mitigation Measures**

#### PROPOSED PROJECT SITE

No previously unknown sites or historic properties were found during the inventory survey. Additionally, subsequent excavation of 22 backhoe trenches within the WRRF parcel revealed that no subsurface cultural deposits are present.

#### **ALTERNATIVE PROJECT SITE**

There are no existing records of cultural resources within the project area and the field survey (2015) did not identify any prehistoric cultural resources. No impacts to prehistoric cultural resources would result from any component of the proposed project.

#### **INLAND AREA PIPELINE ROUTES**

No previously unknown sites or historic properties were found during the inventory survey of the proposed pipeline. Subsequent to the surface survey, excavations were undertaken between the WRRF site and Highway 1. The portion of this investigation area outside the Coastal Zone had no significant resources.

# **Coastal Zone Impacts and Mitigation Measures**

#### COASTAL ZONE PIPELINE ROUTES

The pipelines from and to the WRRF will pass through the recorded boundaries of archaeological site CA-SLO-879/H. Testing along the proposed pipeline corridor on Toro Creek Road within the Coastal Zone provided information regarding the distribution, density, content, and integrity of archaeological remains in that corridor. The findings discussed below are preliminary; laboratory processing and analysis of the materials recovered from CA-SLO-879/H must be completed to properly address questions of significance and integrity.

Fieldwork along the proposed pipeline corridor revealed a detailed picture of the nature, extent, and integrity of archaeological deposits in this area. Preliminary data suggests that most of the pipeline corridor either lacks cultural materials or contains intact cultural material buried under deep layers of fill deposited during road construction. The pipeline corridor can be divided into three zones. Two zones comprising most of the pipeline route, the segment from the WRRF to the Coastal Zone Boundary and a segment within the Coastal Zone, lack significant cultural materials.

A third zone of about 800 feet in length contains the highest density of cultural materials in the study area. Although the density is high, many of the test pits revealed a mix of road fill and disturbed sediments. Intact deposits were revealed in six test pits. A detailed analysis of the test excavation unit materials will be necessary to evaluate the nature and integrity of the archaeological deposit within this zone. Results of artifact analysis and radiocarbon dating will allow for a formal determination of significance and assessment of site integrity within this zone.

**Impact CUL-2:** Without special design considerations, installation of the new pipelines to and from the WRRF along Toro Creek Road would have the potential to significantly and adversely impact CA-SLO-879/H, a significant historical resource and a tribal cultural resource. However, implementation of Mitigation Measure CUL-2 would avoid and minimize these effects. With implementation of this measure, no historical or tribal cultural resources would be disturbed by the project, and impacts would be reduced to less than significant levels.

Mitigation Measure CUL-2: To avoid any adverse effect on CA-SLO-879/H, the proposed pipelines along Toro Creek Road shall be placed only on the north side of the road and shall be directionally drilled under the maximum depth of cultural deposits. Three bore pits shall be installed along the pipeline alignment in previously disturbed areas, where cultural materials are sparse and lack integrity. The exact location of the bore pits and segment to be directionally drilled shall be dictated in the Final Cultural Resources Impact Assessment Report prepared for the project by Applied Earthworks. All work related to pipeline installation along Toro Creek Road shall be monitored by an archaeologist and Native American representatives. If at any point, the pipeline design requirements specified in the Cultural Resources Impact Assessment Report cannot be met, the project shall be halted and San Luis Obispo County and other responsible agencies contacted to determine the next course of action to protect historical or tribal cultural resources in compliance with California and federal law.

Implementation of this measure would result in less than significant effects to CA-SLO-879/H.

The remaining pipeline routes in the Coastal Zone do not pass through or near other recorded sites, except the pipeline will pass with the recorded boundaries of archaeological site CA-SLO-165 in the vicinity of Main Street, SR41 and SR1. Because the existing pipeline route is disturbed and backfilled with sand and the location is established by survey, and the new pipeline shall be placed in exactly the same location with no disturbance deeper than the existing pipeline, there will be no adverse effect to cultural resources in this location.

**Impact CUL-3:** The potential exists for inadvertent discovery of cultural resources during pipeline construction. This impact is potentially significant (Class II).

**Mitigation Measure CUL-3:** To minimize potential impacts due to inadvertent discovery of cultural resources in site and pipeline areas with no evidence of resources, and consistent with LUO sections 22.05.140 and 23.10.040, the applicant shall prepare and implement a pre-construction Worker Education Program to train workers to recognize cultural resources and understand the procedures for stopping work and reporting the discovery.

### **Cumulative Impacts**

The cumulative project list includes development primarily within the urban area of Cayucos. Construction activities related to the development of residences and small commercial projects have the potential to encounter cultural resources in these areas. The nature and significance of any encountered resources is speculative because the area is disturbed urban land. Potential land development in the rural area adjoining the Cayucos Sanitary District parcels would be limited to residential dwellings on large parcels. Though it is speculative to say where the development sites would be, it is probable that these would be on higher elevation areas to have views to the ocean. These higher elevations are not near any recorded archaeological sites. For these reasons, no significant cumulative impact on cultural resources is identified.

# 8. List of Abbreviated Terms

Abbreviation	Term
AB 52	Assembly Bill 52
NRHP	National Register of Historic Places
CEQA	California Environmental Quality Act
EIR	Environmental Impact Report
NHPA	National Historic Preservation Act
WRRF	Water Resource Recovery Facility
NEPA	National Environmental Protection Act
NOP	Notice of Preparation
SR1 / SR 41	State Route 1 / State Route 41
SHPO	State Historic Preservation Office

# 9. References

Refer to the Technical Appendix for a detailed list of references in the Cultural Resource reports.

#### F. VISUAL RESOURCES

# 1. Environmental Issue

This section provides an analysis of visual resources based on current policies related to visual character and scenic qualities from the County of San Luis Obispo General Plan. The proposed WRRF development has been simulated in context to address potential visual impacts based on the regulatory framework and viewer sensitivity.

# 2. Sources used in this Analysis

The following sources were used in the analysis:

- County of San Luis Obispo Estero Area Plan and Local Coastal Plan
- County of San Luis Obispo Title 23 Coastal Zone Land Use Ordinance
- City of Morro Bay Local Coastal Plan -Visual Resources and Scenic Highway Element

# 3. Scoping Issues

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. No issues were raised by the public other than a favorable response to conceptual simulations of the facility. One agency comment was received:

• The California Coastal Commission indicated that the pipe crossings at existing bridges over the creek in the Coastal Zone should be evaluated in light of applicable Coastal policies and Coastal Zone LUO section 23.04.210.

# 4. Environmental & Regulatory Setting

# Regulatory Setting

The Proposed Project is subject to San Luis Obispo County policy, as well as the City of Morro Bay for project infrastructure within Morro Bay City Limits.

San Luis Obispo County General Plan Conservation and Open Space Element (COSE) sets forth policies related to the preserving the visual quality of natural and agricultural landscape in rural parts of the county, including protection policies for areas designated as Coastal Visual Resources, Sensitive Resource Areas and Scenic Highways. The following Policies set forth in the COSE aim to protect important viewsheds:

- Policy VR 1.1 Adopt Scenic Protection Standards. Protect scenic views and landscapes, especially visual Sensitive Resource Areas (SRAs) from incompatible development and land uses.
- Policy VR 7.1 Protect the clarity and visibility of the night sky within communities and rural areas, by ensuring that exterior lighting including streetlight projects, is designed to minimize nighttime light pollution.

**State Designations-** Highway 1 is designated within the County of San Luis Obispo's Local Coastal Plan as a visually scenic corridor to be protected and is designated a State Scenic Highway by the Department of Transportation (CalTrans).

**Local Coastal Plan-** The LCP includes the following relevant policies for Visual Resources:

**Policy 1: Protection of Visual and Scenic Resources.** Unique and attractive features of the landscape, including but not limited to unusual landforms, scenic vistas and sensitive habitats are to be preserved protected, and in visually degraded areas restored where feasible.

**Policy 2: Site Selection for New Development.** Permitted development shall be sited so as to protect views to and along the ocean and scenic coastal areas. Wherever possible, site selection for new development is to emphasize locations not visible from major public view corridors. In particular, new development should utilize slope created "pockets" to shield development and minimize visual intrusion.

**Policy 4: New Development in Rural Areas.** New development shall be sited to minimize its visibility from public view corridors. Structures shall be designed (height, bulk, style) to be subordinate to, and blend with, the rural character of the area. New development which cannot be sited outside of public view corridors is to be screened utilizing native vegetation; however, such vegetation, when mature, must also be selected and sited in such a manner as to not obstruct major public views. New land divisions whose only building site would be on a highly visible slope or ridgetop shall be prohibited.

**The Estero Area Plan** contains policies applicable to the inland portions of the project related to lighting and glare (AES 5), construction (AES 1) and revegetation (AES 4).

The Coastal Zone Land Use Ordinance Section 23.04.210: Visual Resources. This section describes standards to protect Critical Viewsheds, Scenic Corridors and Sensitive Resource Areas that are intended to protect visual resources. Sections relevant to this Project are excerpted below.

The following standards apply within Critical Viewsheds, Scenic Corridors and Sensitive Resource Area (SRA) Combining Designations that are intended to protect visual resources, as identified in this title, the Official Maps, Part III of the Land Use Element, or the area plans of the Local Coastal Plan.

- **a. Applicability of standards.** The following standards apply to new development required by the Coastal Zone Land Use Ordinance to have a land use permit, except that the following are exempt from some or all of the standards (a)-(d):
- **2) Project not visible.** An exemption from the standards in the following subsections c(1), (2), (4), and (5) may be granted if documentation is provided demonstrating that the development will not be visible from the shoreline, public beaches, the Morro Bay estuary, any of the roads specified in the applicable area plan planning area standards for Critical Viewsheds, Scenic Corridors or SRA's that are intended to protect visual resources. Such documentation shall be prepared by a qualified professional acceptable to the Planning Director and at a minimum shall provide scaled topographic and building elevations with preliminary grading, drainage, and building plans. An exemption from the standard in subsection c(6) may be granted if the preceding documentation is provided, and if it is determined by the Planning Director that open space preservation within the Critical Viewshed or SRA is not otherwise needed to protect the scenic and visual resource, sensitive habitat or watershed, as identified in the area plans.

- **c.** Standards for Critical Viewsheds and SRAs for protection of visual resources. The following standards apply within areas identified as Critical Viewsheds or SRAs in the area plans for protection of visual resources.
- (1) Location of development. Locate development, including, but not limited to primary and secondary structures, accessory structures, fences, utilities, water tanks, and access roads, in the least visible portion of the site, consistent with protection of other resources. Emphasis shall be given to locations not visible from major public view corridors. Visible or partially visible development locations shall only be considered if no feasible non-visible development locations are identified, or if such locations would be more environmentally damaging. New development shall be designed (e.g., height, bulk, style, materials, color) to be subordinate to, and blend with, the character of the area. Use naturally occurring topographic features and slope-created "pockets" first and native vegetation and berming second, to screen development from public view and minimize visual intrusion.
- **(2) Structure visibility.** Minimize structural height and mass by using low-profile design where feasible, including sinking structures below grade. Minimize the visibility of structures by using design techniques to harmonize with the surrounding environment.
- (6) Open space preservation. Pursuant to the purpose of the Critical Viewshed or SRA to protect significant visual resources, sensitive habitat or watershed, open space preservation is a compatible measure. Approval of an application for new development in these scenic coastal areas is contingent upon the applicant executing an agreement with the county to maintain in open space use appropriate portions of the site within the Critical Viewshed or SRA (for visual protection). Guarantee of open space preservation may be in the form of public purchase, agreements, easement controls or other appropriate instrument approved by the Planning Director, provided that such guarantee agreements are not to provide for public access unless acceptable to the property owner or unless required to provide public access in accordance with the LCP.

**General Visual Standards for Coastal Development.** Notwithstanding subsections (a)-(d) above, all development requiring a coastal development permit must be consistent with the requirements of Coastal Plan Visual and Scenic Resource Policies 1-11 as applicable.

#### City of Morro Bay Local Coastal Plan- Visual Resources and Scenic Highway Element

The City of Morro Bay Visual Resources and Scenic Highway Element of the LCP has policies to achieve and maintain the Scenic Highway designation for Highway 1. Highway is designated as a scenic highway with identified scenic views to the ocean. Policy VR-2 requires that permitted development is sited and designed to protect views to and along the ocean, minimize changes to landform be visually compatible with the setting.

# **Environmental Setting**

### **Pipeline Corridors in the Coastal Zone**

#### STATE SCENIC HIGHWAY CORRIDOR

A segment of the proposed pipeline routes will run within Highway 1 right of way (Map I-2). This visual quality of this segment is high with the ocean on the west and mostly open lands of the former Chevron facility to the east. These open lands are rural but have developed features

such as fences, gates, landscape trees and shrubs, paved areas and buildings. The proposed pipelines along Highway 1 are located within a Coastal Visual Resource area in the County's Local Coastal Program and within Sensitive Resource Area for scenic corridor.

#### OTHER COASTAL ZONE AREAS

Ocean Avenue in Cayucos and Main Street / Highway 41 west will have pipeline corridors. These segments are urbanized and the visual setting does not include a strong ocean view connection. The proposed pipelines along Main Street and Atascadero Road in Morro Bay and Ocean Avenue in Cayucos are located within a Coastal Visual Resource area in the County's Local Coastal Program and the City's LCP.

# **Project Site and Inland Area Pipeline Corridor**

Figure IV-F1 shows the existing visual setting at the proposed WRRF site from the viewpoint along Toro Creek Road. Marker poles were erected to provide a vertical and horizontal reference scale. The viewpoint locations are shown on Map IV F1.



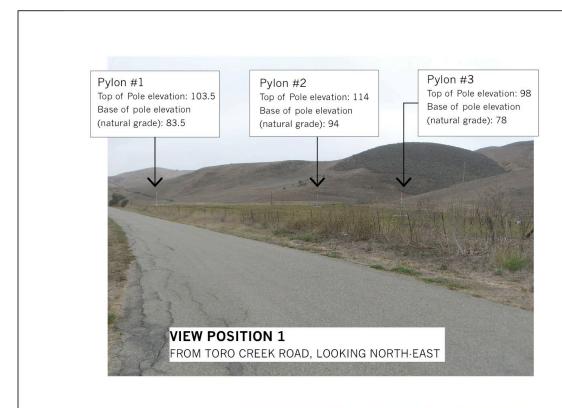
MAP SOURCE: GOOGLE EARTH NOT TO SCALE



Cayucos Sustainable Water Project

# **VIEW POSITION MAP**









Cayucos Sustainable Water Project

# **EXISTING VIEW CHARACTER**

FIG IV-2 The Toro Valley is not identified as a SRA or Critical Viewshed in the General Plan. **Table IV-F1** provides criteria for assigning value to the visual "condition" of the area. Visual condition measures how harmonious the various landforms and elements appear together. In particular, it distinguishes between areas that are more natural and areas that have some degree of encroachment by built features such as highways, urban buildings, utility facilities and so forth. Based on the relatively low level of development in the corridor, the area would be considered Class 1: "all features within the field of view appear characteristic of the region." Uncharacteristic features such as the road itself, and the various structures are not particularly incongruous are visually subordinate to the natural features.

**Table IV-F2** shows criteria for rating viewer sensitivity levels looking at the viewshed from Toro Creek Road. Toro Creek Road would not be considered a primary travel route because it is not a through connection linking population centers, but serves only the several residences and ranches east up the valley.

Viewer sensitivity level is considered level 3 because In accordance with the U.S. Forest Service methodology, a greater sensitivity is assumed by those driving, walking, and bicycling for pleasure than those commuting for work-related purposes and this road is primarily used by local residents, not recreational users.

	Table VI-F1 Visual Condition Rating Guides			
	Source: modified USFS,1974			
Visual	Guidelines			
Condition				
Class				
VC-1	a) All feature within the field of view appear to be characteristic of the region;			
	b) Or, features appearing incongruous are evident but would be usually overlooked by the casual viewer			
VC-2	Uncharacteristic features appear incongruous, are not easily overlooked and may attract attention, but are visually subordinate to inherent features.			
	b) Or, uncharacteristic features are subordinate to the predominant characteristics of the area, but are similar enough to the inherent features of the area to be regarded as at least moderately compatible.			
VC-3	Uncharacteristic features appear incongruous and compete for attention with those that are inherent to the area.			
	b) Or, uncharacteristic features demand attention but are moderately compatible with natural features inherent to the area.			
VC-4	a) Uncharacteristic features appear incongruous and dominate the field of view. The primary natural character of the area may be subdued by comparison and difficult to recognize.			

Table VI-F2 Criteria for Rating Viewer Sensitivity Levels					
Travel Route or	Viewer Sensitivity Level				
Use Area	1	2	3		
Primary Travel Route and Use Area	At least 1/4 of users have major concern for visual quality.	Fewer than 1/4 users have major concern for visual quality.	N/A		
Secondary Travel Route and Use Area	At least 3/4 of users have major concern for visual quality.	Between 1/4 and 3/4 of users have major concern for visual quality.	Fewer than 1/4 of users have major concern for visual quality.		

### Table VI-A.3 Notes:

The proportions of users indicated (1/4, 3/4) are approximate. These user ratios indicate a relationship between the number of travelers and their appreciation for aesthetics while en route to a destination. In accordance with the U.S. Forest Service methodology, a greater sensitivity is assumed by those driving, walking, and bicycling for pleasure than those commuting for work-related purposes.

Sensitivity: Level 1 - highly sensitive

Level 2 - moderately sensitive Level 3 - low sensitivity In summary, the Toro Creek Valley:

- has **distinctive visual qualities** that are uniquely <u>tied to the varied landforms and</u> mosaic of natural vegetation ,
- has **high scenic quality** because <u>man-made features are subordinate to the natural features</u>,
- would be **viewed with low sensitivity** to visual condition by most travelers because the route is more of a local service route than pleasure driving route.

#### ALTERNATE SITE

The Alternate Site has many of the same rural and scenic qualities as the Toro Road site, however, this valley has more development in the form of residences and ranches along the route. The visual quality is also is affected by power lines and the Negranti Quarry, both of which are visible to travelers moving by the Alternative Site on Old Creek Road.

In summary, the Willow Creek Valley:

- has **distinctive visual qualities** that are uniquely <u>tied to the landforms and mosaic of</u> natural vegetation ,
- has **moderate to high scenic quality** because <u>man-made features are subordinate to</u> the natural features.
- would be **viewed with moderate sensitivity** to visual condition by most travelers because the route is as much of a local service route as a pleasure driving or riding route.

# 5. Impacts and Mitigation Measures

# **Environmental Impact Significance Criteria**

According to the CEQA Guidelines' Appendix G Environmental Checklist, to determine whether impacts to visual resources are significant environmental effects, the following questions are analyzed and evaluated. Thresholds of significance determinations are as follows.

Would the project:

- 1) Have a substantial adverse effect on a scenic vista?
- 2) Substantially damage scenic resources, including but not limited to, trees, rock outcroppings, and historic buildings within a State scenic highway?
- 3) Substantially degrade the existing visual character or quality of the site and its surroundings?
- 4) Create a new source of substantial light or glare which would adversely affect day or

# nighttime views in the area?

The change from a primarily natural landscape to a wastewater facility may be generally considered a substantial negative effect on visual quality. However, "any" or "some" change in a natural visual setting is not necessarily automatically considered substantial or adverse.

In practice under CEQA, the determination of significance is derived from community values. This means the degree of change to the visual setting is measured for consistency with the adopted plans and policies the local jurisdiction in Section 4 Regulatory Setting to judge the significance of the visual change.

# **Impact Analysis**

# Impacts and Mitigation Measures in the Coastal Zone

#### **COUNTY COASTAL ZONE**

The proposed recycled water return pipelines along Highway 1, Main Street in Morro Bay and Ocean Avenue in Cayucos are located within a Coastal Visual Resource area in the County's Local Coastal Program and within Sensitive Resource Area for scenic corridor. The pipeline route down Main Street in Morro Bay is in close proximity to the Highway 1 Scenic Route. Because the pipeline routes are subsurface no adverse effects to visual resources would occur along these scenic routes.

The proposed pipeline would cross Old Creek near the CAS 10 facility attached to an existing pedestrian bridge. The pipe crossing would be a pipe conduit for three pipes set on concrete abutments roughly at or below the height of the bridge guardrail. The pipeline in this location is not visible from Highway or any nearby public street, being at a low elevation and screened by existing riparian vegetation. For this reason the pipe crossing will be subordinate to, and blend with, the character of the area. This area is not visible from the shoreline, public beaches, the Scenic Highway 1 corridor or SRA. As such, the action may be exempt from section CZLUO 23.04.210. This impact is less than significant.

The proposed pipelines would cross Toro Creek on a pipe bridge located immediately adjacent to the existing vehicular bridge. The existing character of this bridge is rural, not urban, and it is in character with its larger surroundings. The pipe crossing would be a pipe conduit (approximately 16 inches in diameter) set on concrete abutments roughly at the height of the bridge guardrail. The pipe bridge would be marginally visible to a passing vehicle, but not out of scale with the bridge itself and is subordinate to the setting of riparian vegetation. For this reason, the pipe crossing will be subordinate to, and blend with, the character of the area and is therefore not considered an adverse impact on visual resources. The pipeline in this location is not visible from the shoreline, public beach, or scenic highway and is substantially obscured by surrounding intact riparian vegetation and the bridge itself. As such, the action may be exempt from the requirements of section CZLUO 23.04.210. This impact is less than significant.

The proposed WRRF is located about 0.75 mile of Highway 1 and is not visible to viewers traveling on Highway 1 due to intervening topography. Therefore, construction of pipelines and related infrastructure and the WRRF would not substantially damage scenic resources within the Highway 1 State Scenic Highway.

**Impact VIS 1:** The construction of pipe bridge crossings at Toro Creek and Old Creek will result in impacts to visual resources that are less than significant. (Class III)

**Impact VIS 2:** The construction of the pipelines in approximately a ½ mile segment from the Coastal Zone boundary at Toro Creek west to SR 1 and then north along SR1 will result in a disturbed ground surface that could be visually adverse. (Class III)

**Mitigation Measure VIS-1**: To mitigate post-construction disturbed soil on the pipeline trenches in the Coastal Zone, the applicant shall prepare and implement an approved restoration plan that uses native seed species and is consistent with Coastal Plan policy 30.

Modifications to Lift Station 5 adjacent to Highway 1 will consist of only subsurface infrastructure occurring behind existing shrub screening within the existing fence enclosure and would not result in a change to the visual setting. Lighting is not proposed at this location.

The connection to the existing outfall will be subsurface and will therefore not adversely affect the visual quality of that developed area.

Aesthetic Policy AES 1 (construction staging area) in the Estero Area Plan would apply to construction activities and staging. This policy would require construction staging areas to be located away from sensitive viewing areas to the extent feasible. Temporary visual impacts could occur during construction if staging and equipment areas are stationary for extended periods along the scenic corridor. However, because the Proposed Project includes a construction staging area where materials and vehicles are placed that is outside the Coastal Zone, no adverse construction phase impact to visual resources in the Coastal Zone would result.

#### MORRO BAY COASTAL ZONE

Consistent with LCP policy VR-2 the subsurface pipeline is sited and designed to not alter, and thus protect, views to and along the ocean, and minimizes changes to landform to be visually compatible with the setting. No adverse impact is identified.

#### Impacts and Mitigation Measures in the Inland Area

### **TORO CREEK VALLEY- INLAND AREA**

Figure IV-F1 shows the site as viewed from Toro Creek Road looking east. Pylons were erected at three points to known heights at known grade elevations. The digital model of the proposed WWRF was inserted into the photograph to scale using the reference pylons for horizontal and vertical control and the digital model inserted to scale (Figure IV-F2). The full visual simulation methodology and interim steps are contained in the EIR Technical Appendix.

The proposed office building and maintenance building are proposed to be constructed with conventional masonry and wood composite siding with composition shingle roofs. The architectural forms are agrarian and not industrial. The remaining structures are proposed as metal shell buildings with composition shingle roofs. The color scheme is proposed as neutral tan and sage tones that are consistent with the colors present seasonally in the Toro Valley. Due to inherent challenges of accurate digital color rendition, the digital model may not represent the colors perfectly. The proposed colors are intended to be low reflectivity tones as shown on Figure IV-F4 Proposed Architecture.

Figure IV-F3 shows the facility and the proposed landscape planting at approximately ten years growth. As described in the Project Description, the landscape is comprised of native plants

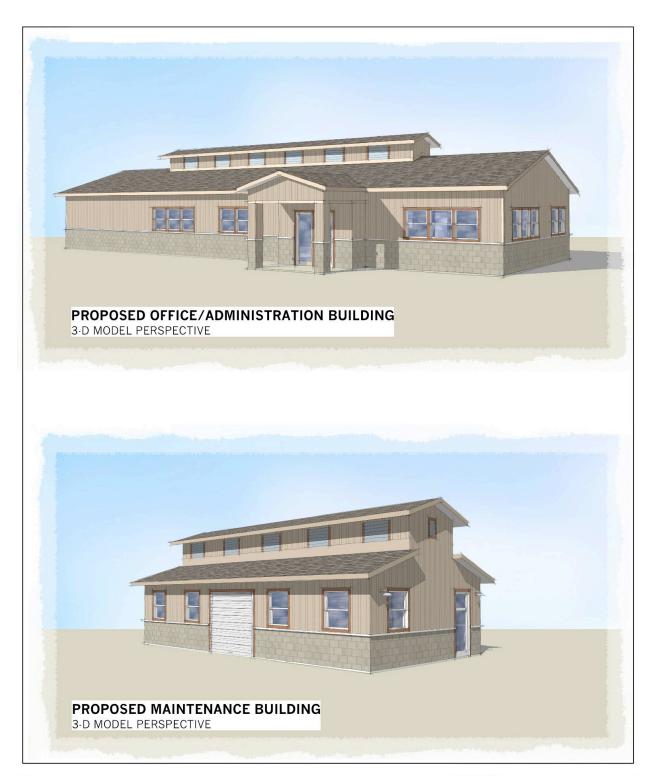


# Cayucos Sustainable Water Project

# water Froject

**VISUAL SIMULATION** 

**Note:** View Position 1, proposed facility with 10 year landscape





Cayucos Sustainable Water Project

PROPOSED ARCHITECTURE

FIG IV-5 common to the coast and is set in a pattern to achieve a defensible space for fire safety. This means there are gaps and staggered clumps of vegetation and not dense rows. This results in a more natural effect. Because the character and arrangement of the proposed screen planting is consistent with the larger visual setting the viewer would not experience a stark incongruity resulting from Project implementation.

The scale and character of the proposed buildings are agrarian in style. The WWRF will be substantially screened by the proposed landscape screen planting (refer to Map I- 6 Proposed Landscape, Defensible Space and Buffer Plan). The scale and character of the native plants in the proposed landscape is in character with the larger rural landscape. Based on the viewer sensitivity criteria discussed above, the Proposed Project will not substantially degrade the existing visual character or quality of the site and its surroundings because the scale of the project is subordinate to the larger rural landscape and the viewer sensitivity to a change in a limited area is not high. At the point proposed screening begins to mature, the Project would not have a substantial adverse effect on a scenic vista for the same reasons described above. The Project is subordinate to the larger rural landscape and does not obscure views to the primary scenic features of the valley: ridgelines, riparian vegetation along the creek and open farm / rangeland.

**Impact VIS-3:** The proposed project would result in a short term but significant impact on visual resources until the proposed screen planting grows to an extent to substantially screen the WRRF. This impact is significant can be mitigated to less than significant (Class II).

**Mitigation Measure VIS-2:** To mitigate short-term impacts on visual resources until planting matures, a final landscaping plan shall be prepared for the project site consistent with the preliminary landscape plan evaluated in the EIR and approved by the County prior to building permit issuance. The landscape plan shall emphasize native plant materials and shall include sufficient planting to screen views of the project from Toro Creek Road. The planting shall be designed to achieve substantial screening of the WRRF within 7 years.

#### PIPELINE ROUTES OUTSIDE THE COASTAL ZONE

Pipelines outside the Coastal Zone occur within existing rights of way and are all subsurface pipes, therefore no visual impact will result.

#### LIGHTING AND GLARE

The existing nighttime ambient light level in the Toro Creek Valley is very low. The nearest residences in the valley do not have line of sight view to the proposed facility but could see night sky illumination. The WRRF has the potential to impact nighttime views in the project area with the addition of exterior lighting. The facility will not be staffed at night however security lighting is proposed. A lighting plan has not been prepared however, typically a combination of building wall mounted and pole mounted lights would be employed to illuminate the spaces adequately for security.

**Impact VIS-4**: The Project will add a new source of substantial light or glare which would adversely affect nighttime views in the area, a significant but mitigable impact (Class III).

Mitigation VIS-3: To mitigate potentially significant impacts from a new source of substantial light or glare which would adversely affect nighttime views in the area, a final

lighting plan shall be prepared and implemented for the WRRF. The plan shall include proper shielding, proper orientation, and minimum height standards to achieve safe light levels on the ground. All lighting fixtures shall be shielded so that neither the lamp nor the related reflector interior surface is visible from adjacent properties. Light hoods shall be dark-colored.

#### **WILLOW CREEK VALLEY**

As shown in Figure IV F-6, the site as viewed from Old Creek Road is situated below the road and therefore more visible to viewers along Old Creek Road as it rises in elevation. As a result, all of the site is visible from Old Creek Road over a length of approximately 1 mile. Figure IV-F6 shows the Proposed Project with planting around the facility to screen the Project. Because the site is substantially visible and due to the higher viewer sensitivity along Old Creek Road the impact on Visual Resources for the Alternative site is significant and unavoidable.

Views from Montecito Road were not simulated because it was determined the views from Old Creek Road were representative worst-case impacts of the Project at the Alternative Site.

# **Cumulative Impacts**

Due to the fact that parcels sizes are large in the agricultural land use category and are likely to remain so, there is limited potential for additional development in the Toro Creek Valley. Chevron owns the lands east and west of the CSD parcels and will potentially be seeking to develop home sites in the valley and on hillsides and ridges. The location of these home sites is speculative at this time and it is not certain the low density development allowed in the Agricultural land use category would result in cumulative effects on visual resources that are significant. To the extent that there is potential for cumulative loss of visual quality due to this development, it would likely be minimized by the environmental review process for those home sites.

Current nighttime illumination levels are extremely low in the Project Area due to the rural nature of the properties. Because the parcels sizes are large in the agricultural land use category, there is limited potential for additional night illumination in the Toro Creek Valley, therefore the no cumulative effects due to nighttime lighting are identified.

#### 6. List of Abbreviated Terms

#### LIST OF ABBREVIATED TERMS

Abbreviation	Term
CEQA	California Environmental Quality Act
EIR	Environmental Impact Report
USFS	United States Forest Service

#### 7. References

County of San Luis Obispo, Estero Area Plan and Local Coastal Plan County of San Luis Obispo, Title 23 Coastal Zone Land Use Ordinance City of Morro Bay, Local Coastal Plan Visual Resources and Scenic Highway Element







**Cayucos Sustainable Water Project** 

ALTERNATIVE SITE-VISUAL SIMULATION FIGURE IV-6

#### G. TRAFFIC

#### 1. Environmental Issue

This section describes the existing roadways and traffic conditions in the project area along with relevant policies and regulations, followed by an assessment of direct and indirect project impacts. Where appropriate, additional policies and implementation measures are recommended.

# 2. Sources Used in This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications including:

- Information regarding levels of service and average daily traffic (ADT) volumes provided by the County, Caltrans and the City of Morro Bay;
- Policies and standards related to transportation from the Estero Area Plan, the Regional Transportation Plan, and the City of Morro Bay General Plan;
- The City of Morro Bay State Route 1/State Route 41 Intersection Control Evaluation (ICE) Step I Report (December 2014).
- 2015 Pavement Management Report, County of San Luis Obispo
- 2014 Bridge Maintenance Report, County of San Luis Obispo

A complete list of references is provided at the end of this section.

# 3. Scoping Issues

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issues relating to traffic and circulation was raised during the scoping process and is addressed in this section:

- The County of San Luis Obispo requested that the EIR discuss the status of roadway pavement on Toro Creek Road and Old Creek Road and evaluate construction traffic vehicle impacts to the surface.
- The County of San Luis Obispo requested that the EIR discuss the status of bridges over Toro Creek Road and Old Creek Road and evaluate construction traffic vehicle impacts to the bridges.
- The California Coastal Commission requested that the EIR address public access to coastal areas during construction.

# 4. Environmental & Regulatory Setting

# Regulatory Setting

STATE REGULATIONS

**California Department of Transportation (Caltrans)** 

Caltrans maintains the state highway system, including U.S. Highway 101, and State Route 1. Caltrans generally regulates maximum load limits for trucks and safety requirements for oversized vehicles for operation on highways.

#### **LOCAL REGULATIONS**

#### San Luis Obispo County General Plan

The County has established the acceptable Level of Service (LOS) on roads serving urban areas of the unincorporated county as LOS "D" and LOS "C" in urban areas (discussed further below under Thresholds of Significance). The Circulation Element of the Estero Area Plan does not identify any policies or standards that are specific to wastewater collection, treatment or disposal.

# San Luis Obispo Council of Governments (SLOCOG)

SLOCOG is a joint powers authority with a goal of facilitating cooperative regional and sub-regional planning, coordination, and technical assistance on issues of mutual concern. SLOCOG is the County's designated Regional Transportation Planning Agency and thereby responsible for all regional transportation planning and programming activities, including developing a Regional Transportation Plan (RTP) to guide transportation policy which is updated every 5 years. Starting with the 2014 RTP, SLOCOG has developed a sustainable communities strategy (SCS) that identifies land use patterns expected to reduce vehicle miles traveled (SLOCOG 2010).

# City of Morro Bay General Plan Circulation Element

The City's General Plan Circulation Element sets forth goals, policies and implementation programs to provide for the transportation needs of the City. The Circulation Element does not identify any policies or standards that are specific to wastewater collection, treatment or disposal. The City determines level of service using the methods documented in the *Highway Capacity Manual 2000 (HCM 2000)*.

# **Environmental Setting**

#### ROADWAYS AND INTERSECTIONS SERVING THE PROJECT SITE AND ALTERNATIVE SITE

Roadways and intersections serving the Project Site and Alternative Site are shown on Figure IV-G1. Current traffic volumes are summarized on Table IV-G1. SLOCOG has indicated that the level of service of SR-1 in the vicinity of the proposed project is "A" and will continue to be "A" at least until the year 2035. The other streets in the project area operate at acceptable levels. The Morro Bay Circulation Element reports that "traffic volumes on most streets in Morro Bay are well within their design capacities." Intersection traffic controls in Morro Bay are also satisfactory for present volume levels, except for a few locations that include the SR-1/SR-41 interchange and intersections.

# Table IV-G1 -- Existing Traffic Volumes and Levels of Service on Streets Serving the Project Site and Alternative Site

Roadway /Intersection	Roadway/ Intersection Type	Level of Service		
Roadways				
SR-1	Four-lane highway	A/B		
Toro Creek Road	Two lane rural road	А		
Old Creek Road	Two lane rural collector	А		
Cabrillo Street	Local street	А		
Ocean Avenue	Local street	А		
Main Street	Two lane arterial	А		
Atascadero Road	Two lane collector	А		
Intersections				
Main Street/ SR-41	4-way signalized intersection	C <sup>4</sup>		
SR-1 Northbound Ramps and SR-41	Stop controlled ramps	$B^4$		
SR-1/Toro Creek Road	Stop controlled intersection	А		
SR-1/Old Creek Road	Four way signalized intersection	А		

#### Sources:

- 1. Caltrans 2014
- 2. Caltrans 2006
- 3. San Luis Obispo County Department of Public Works
- 4. City of Morro Bay State Route 1/State Route 41 Intersection Control Evaluation (ICE) Step I Report, December 2014, PM Peak hour in 2014.

**State Route 1**. State Highway 1 (SR-1) in the Cayucos area is a four-lane highway. According to the Regional Transportation Plan (2014):

"Highway 1 is the primary north/south arterial through the North Coast. The highway is specifically restricted to be maintained as a two-lane highway north of Cayucos by the California Coastal Act."

[T]raffic volumes in the corridor between San Luis Obispo and Morro Bay are projected to increase very modestly as development is expected to be minimal on the North Coast."

There are five grade-separated interchanges along the freeway segments of the corridor, three in Morro Bay and two in Cayucos along the freeway segments of the corridor

Based on traffic counts taken at Old Creek Road by Caltrans in 2014, SR-1 carries 12,500 average daily trips and 1,100 trips during the peak hour and is expected to exceed 14,800 in 2035 (LOS A/B). No capacity improvements are outlined in the RTP for this highway segment. SR-1 at the intersection of Toro Creek Road provides a 450 foot long southbound left turn lane and a 250 foot long northbound left turn lane which provide adequate deceleration and storage for left turns in either direction, assuming traffic speeds of 65 miles per hour. The intersection LOS is not identified in the RTP as substandard and there appears to be adequate sight distance in all directions.

The San Luis Obispo County Circulation Element estimates a marginal level of service along Highway 1 in the future; however, no serious capacity deficiencies are predicted for the portion between Morro Bay and Cayucos.

**Toro Creek Road**. Toro Creek Road is a two-lane County maintained local roadway and provides the primary local access to the Project Site. Traffic counts taken in 2012 by the County indicate 168 average daily trips and an afternoon peak hour volume of 19.

**Old Creek Road**. Old Creek Road in Cayucos would provide the primary access to the Alternative Site at the intersection with Montecito Road. Old Creek Road is a two lane local street with a nominal design capacity of 2000 ADT. Montecito Road is an unpaved County Road and is designated a local street. Traffic counts taken by the Department of Public Works in 2011 indicate that Old Creek Road had an ADT of 1,542 east of Richard Ave. (July 10, 2011 counts). Traffic counts indicate the street is operating well below capacity.

**Local Streets In Cayucos**. According to Chapter 5 of the Estero Area Plan (Circulation), all Cayucos streets operate at an acceptable level of service (LOS "D" or above in urban areas). However, according to the Area Plan residents perceive problems with existing street function related to narrow pavement widths and lack of on street parking. No capacity improvements are identified as needed in the Area Plan for Cayucos streets of Highway 1.

**Ocean Boulevard and Cabrillo Street**. Ocean Blvd. in Cayucos will have pipeline conveyances constructed along it's full length and onto Cabrillo Drive near the cemetery. Ocean Blvd is a two lane street designated as a local street with a nominal design capacity of 2000 ADT. Traffic counts taken by the Department of Public Works indicate that Ocean Blvd south of Old Creek Road has an ADT of 765 (February 23, 2014 counts) and an ADT of 1,100 north of Old Creek Road (July 10, 2011 counts). The traffic counts indicate the street is operating well below capacity.

Streets and Intersections Within the City of Morro Bay. The Morro Bay Circulation Element reports that "traffic volumes on most streets in Morro Bay are well within their design capacities." Intersection traffic controls in Morro Bay and Cayucos are also satisfactory for present volume levels.

Main Street in Morro Bay from Island Street to Highway 41 will have pipeline conveyances constructed in the street and down Atascadero Road to the ocean outfall at the existing

WWTF. The SR-41/Atascadero Road and SR-1 northbound ramps intersection is stop controlled on the northbound ramps approach and the SR-41/Atascadero Road and Main Street intersection is stop controlled on all four approaches. Due to the close intersection spacing and the existing controls, the two intersections operate as one intersection with five approaches and exits, including SR-41 (also known as Atascadero Rd.) extending to the east and the west, Main Street which extends to the north and south, and the SR-1 northbound on and off-ramps extending to the north and south respectively. The intersection currently experiences congested conditions. Due to the close proximity of the SR-41/Atascadero Road and Main Street intersection, the City of Morro Bay has planned improvements focusing on reducing congestion and improving safety conditions. Current (2014) intersection operation is LOS C/B expected to deteriorate to LOS E of the SR-1 northbound ramps in the AM peak hour by 2020.



#### **HIGHWAY SAFETY**

The California Highway Patrol (CHP) provides safety and law enforcement patrol for SR-1 in cooperation with the San Luis Obispo County Sheriff's Department which provides law enforcement for the Cayucos area outside the City of Morro Bay.

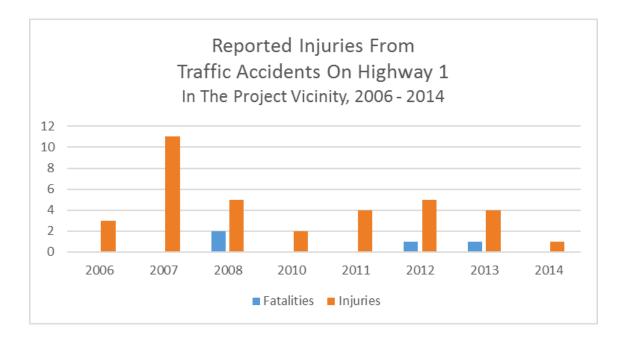
The area around the Project Site and Alternative Site experiences few traffic accidents on streets and intersections, based on data compiled by Safe Transportation Research and Education Center at the University of California, Berkeley. As shown in Table IV-G2 and Map IV-G2, between January, 2006 and December, 2015, there were 27 collisions reported along the portion of Highway 1 between the Morro Bay city limits and Old Creek Road in Cayucos (Figure IV-G1), an average number of reported collisions of 3 per year. There were 34 reported injuries associated with these accidents and a total of four fatalities. There were two reported accidents within one quarter mile of the Highway 1/Toro Creek Road intersection between 2006 and 2015. Neither were associated with the intersection itself; one involved a rear-end collision in the southbound lane adjacent to a beach access parking area, and the other a vehicle struck a fixed object in the center divider.

Table IV-G2 Reported Traffic Accidents On State Route1 In The Project Vicinity, 2006 - 2015							
Type Of Collision	Type Of Collision Number Percent						
Head-On	Head-On 0 0%						
Sideswipe	ideswipe 4 15%						
Rear End	6	22%					
Broadside	6	22%					
Hit Object	2	7%					
Overturned	4	15%					
Vehicle/Pedestrian	3	11%					
Other	0	0%					
Not Stated	2	7%					
Total:	27	100%					
Injuries	34						
Fatalities 4							

Source: Safe Transportation Research and Education Center at the University of California, Berkeley, October 2016

http://tims.berkeley.edu/tools/query/summary.php#

Figure IV-G2 -- Reported Injuries From Traffic Accidents in the Project Vicinity





# 5. Standards of Significance

According to the CEQA Guidelines' Appendix G Environmental Checklist, to determine whether transportation and traffic impacts are significant environmental effects, the following questions are analyzed and evaluated. Would the Proposed Project:

- Cause an increase in traffic, which is substantial in relation to the existing traffic load and capacity of the street system, either individually or cumulatively, exceed a level of service standard established by the county congestion management agency for designated roads or highways?
- 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?
- Substantially increase hazards due to a design feature (e.g. sharp curve or dangerous intersections) or incompatible uses (e.g., farm equipment)?
- · Result in inadequate emergency access?
- Result in inadequate parking capacity?
- Conflict with adopted policies, plans, or programs supporting alternative transportation (e.g. bus turnouts, bicycle racks).

For purposes of this analysis, the following threshold has been added to evaluate the Proposed Project's consistency with applicable goals, policies, and regulations related to traffic and circulation:

• Would the Proposed Project conflict with local goals and policies related to traffic and transportation?

A *level of service* (LOS) designation is the generally accepted measure utilized for determining the quality of operation of either a roadway segment or intersection. There are six LOS categories ranging from LOS A, free flowing traffic to LOS F, bumper-to-bumper traffic. The volume to capacity ratio (V/C) measures the percentage of actual traffic volume on a roadway compared to the total traffic capacity of that roadway and also corresponds with LOS designations. Both the County of San Luis Obispo and the City of Morro Bay use the LOS standard for transportation.

The design capacity of a roadway or intersection is defined as the maximum rate of vehicle travel (e.g., vehicles per hour) that can reasonably be expected along a section of roadway or through an intersection. Capacity depends on several variables, including road classification and number of lanes, location and presence of turning lanes, signal timing, road condition, terrain, weather, and driver characteristics.

The County considers any adverse transportation and circulation impacts to be significant if they result in an inconsistency with the thresholds identified in the County of San Luis Obispo General Plan:

Roadway Segments. Evaluation of roadway segments reflects planning-level conditions along a street. Typically, poor operating conditions on a roadway are due to constraints at the intersections, and can be mitigated at the intersection. Therefore, if a roadway

segment analysis shows poor operating conditions, but individual intersections operate within acceptable standards, the mitigation measures defer to the intersection. For County roadway segments, degradation in the level of service from an acceptable level (LOS "C" or better in rural areas) to an unacceptable level (LOS D, E, or F) is a significant impact. For segments already operating at LOS D, E, or F without the project, the addition of any project traffic to that location is a significant impact.

*Unsignalized Intersections.* A significant impact at an unsignalized intersection is defined to occur when the addition of project traffic:

- Causes intersection operations to deteriorate from an acceptable level (LOS C or better) to an unacceptable level (LOS D, E, or F) and satisfies the peak-hour signal warrant from the Manual on Uniform Traffic Control Devices (MUTCD).
- Exacerbates unacceptable operations (LOS D, E, or F) and satisfies the peakhour signal warrant from the Manual on Uniform Traffic Control Devices (MUTCD).

According to Caltrans' *Guide for the Preparation of Traffic Impact Studies* (December 2002), for Caltrans' facilities (intersections, roadway segment, freeway segments, and freeway ramp junctions), a degradation in the level of service from an acceptable level (LOS C/D threshold or better) to an unacceptable level (LOS D, E, or F) is a significant impact. For Caltrans facilities already operating at unacceptable levels (LOS D, E, or F) without the project, the addition of any project traffic to that location is a significant impact. Although Caltrans endeavors to maintain a target LOS at the transition between "C" and "D", they acknowledge that this may not always be feasible and recommends that the lead agency consult with Caltrans to determine the appropriate target LOS.

# 6. Impacts Found to Be Less Than Significant

Based on the Initial Study published with the Notice of Preparation, Less Than Significant or No Impacts were found related to the project causing impacts related to air traffic, resulting in inadequate emergency access (see section IV-J Hazards and Public Safety), and inadequate parking capacity. The Proposed Project would not create any horizontal or vertical changes to public streets resulting in hazards. Last, no County transportation policy or goal is identified that would be affected by this project. Therefore these topics will not be discussed further.

# 7. Impacts and Mitigation Measures

#### **CONSTRUCTION ACTIVITIES**

Trips generated by construction activities include employees traveling to and from the construction sites and material/equipment deliveries. As noted in the Project Description, major materials deliveries would occur at the WRRF construction stockpile /staging yard on Toro Creek Road. Materials for each days work would be transported to the street work site and trucks would direct-deliver trench backfill and paving materials.

Construction of the collection system, and facilities at either treatment plant sites and ocean outfall, would generate additional traffic on certain roadways and intersections within the community. Motor vehicle trips associated with construction (including decommissioning the existing WWTF) and operation of the WRRF are summarized in Table IV-G3.

Table IV-G3 Construction/ Decommissioning Trip Generation						
Source Average PM Peak Daily Trips Hour Trips Duration						
Workers	20-40	20-40				
Equipment and Materials	6	0	18 – 24 months			
Total: 26 10						

Source: Cayucos Sanitary District, 2016

#### **Construction Traffic**

#### **PROJECT SITE**

It is anticipated that staging and storage of construction materials would occur on a temporary storage yard across Toro Creek Road from the proposed WRRF. Trucks and equipment both for plant construction as well as pipeline construction would use Toro Creek Road and the Toro Creek Road / SR-1 intersection to travel to work areas. The number fo workers on the site during construction will fluctuate form 20 to 40 persons. Worker trips would typically occur during the A.M. and P.M. peak hour periods and generate approximately 20 average daily trips (ADT), while equipment and material deliveries would occur throughout the entire day with a total of approximately 6 ADT. A portion of these trips would be diverted to the pipeline work via a shuttle rather than individual worker vehicles.

According to the County's 2015 Pavement Management Report, both Toro Creek Road and Old Creek Road are classified as in "good" condition (Tier 1) with Pavement Condition Indexes of 72 (>70 is good) and 66 (<60 is fair). Toro Creek Road is identified in that document as manageable with chip seal and micro-sealing, and is noted as having chip seal applied in 2010.

**Impact TR-1:** Based on the acceptable status of the existing pavement on both roads, the addition of periodic trips by trucks with heavy loads for the duration of the 18-24 month construction period would not be considered a significant impact on pavement (Class III).

According to the County's 2014 Bridge Maintenance Program, Toro Creek Bridge (No.49C0087 0.3 mi west SR1) has a "health rating" of 95.34 out of 100. The bridge was built in 1951 of wood piles and structure with a reinforced concrete deck and last inspected in 2012. The width is 20 feet. The functional class is "local rural". The bridge is not on the County's weight restricted bridge list. Based on this information, no adverse impact due to construction traffic is identified.

#### **ALTERNATIVE SITE**

It is anticipated that staging and storage of construction material would occur on a temporary storage yard adjacent to the proposed WRRF. Trucks and equipment both for plant construction, bridge construction and pipeline construction would use Old Creek Road and the Old Creek Road / SR-1 intersection to travel to work areas. Access to the site would be from Montecitio Road.

Construction related vehicles would use the signalized intersection at SR-1 and Old Creek Road in turning movements to access the WRRF site as well as Ocean Blvd and Main Street in Morro Bay. As with the Proposed site, the number of added construction related vehicle trips can be accommodated on the roadways and intersections without a change in the Level of Service because the roadways and intersections currently well below capacity.

#### PIPELINE CONVEYANCES & OUTFALL CONNECTION AT THE WWTF

The construction of pipeline conveyances would be located primarily on Ocean Blvd and Cabrillo Drive in Cayucos, Main Street and Atascadero Road in Morro Bay, as well within the SR-1 right of way outside the northbound travel lanes (Figure IV-X-1). Construction activities would be temporary, lasting 16-24 months but construction activities at any specific location along the collection system may be a few days to a few weeks.

Equipment present during pipeline construction in rights of way would generally consist of two backhoes, two 10-wheel dump truck, one front loader, one compactor, a water truck and a pavement saw-cutter. During re-paving, an asphalt spreader and roller, plus delivery trucks would be present. The number of workers would range form 8 to 10 depending on the activity on a given day.

Outfall connection at the existing WWTF will result in increased vehicle trips to and from the facility. It can be assumed that decommissioning activities would occur during normal working hours over a period of several weeks. Due to the proximity of access to the WTTF to the Morro Bay High School and the SR-1 Atascadero Road interchange, traffic conflicts could occur at peak hours when school begins and ends.

These construction activities would result in temporary lane closures and limited access and delay to residences and businesses that may cause short-term significant impacts on the operation of the roadways and potentially impair the efficient movement of emergency vehicles.

**Impact TR-2:** Construction activities associated with the Project Site or Alternative Site, along with connection to the outfall at the existing WWTF, and construction of pipeline conveyances will result in temporary and short-term impacts related to the safe operation of streets and intersections due to the presence of workers, equipment, lane closures and open trenches. This impact is considered significant unless mitigated (Class II).

**Mitigation Measure TR-1:** Prior to building permit issuance a Traffic Management Plan shall be prepared for review and approval by the County of San Luis Obispo Public Works Department and the City of Morro Bay Public Works Department. The traffic management plan shall be based on the type of roadway, traffic conditions, duration of construction, physical constraints, nearness of the work zone to traffic and other facilities (bicycle, pedestrian, driveway access, etc.). The traffic management plan shall include:

- Advertisement. An advertisement campaign informing the public of the proposed construction activities should be developed. Advertisements should occur prior to beginning work and periodically during the course of project construction.
- Property Access. Access to parcels along the construction area shall be maintained to the greatest extent feasible. Affected property owners shall

receive advance notice of work adjacent to their property access and when driveways would be potentially closed.

- Schools. Any construction adjacent to schools shall ensure that access is maintained for vehicles, pedestrians, and bicyclists, particularly at the beginning and end of the school day.
- Buses, Bicycles and Pedestrians. The work zone shall provide for passage by buses, bicyclists and pedestrians, particularly in the vicinity of schools.
- Intersections. Traffic control (i.e. use of flag men) shall be used at intersections that are determined to be unacceptably congested due to construction traffic.

#### **COASTAL ACCESS DURING CONSTRUCTION**

During construction of project pipeline infrastructure within the Coastal Zone, activities would be limited to the localized staging of equipment within public rights of way for segments of pipeline work that progresses along the route. Work in the Highway 1 right of way will be in the wide shoulder area outside the paved travel lane and no highway closures that would affect coastal access are foreseen. Ocean Avenue will experience possible short-term single lane closure, however, because Ocean Avenue is a through Street closure would not preclude a coastal user from accessing the coastal area from an alternate route. The same holds true of both Main Street and Atascadero Avenue in Morro Bay: single lane closures would not impede through traffic in reaching the coast. Likewise, pedestrians and cyclists would not be impeded by construction activities from accessing the coast. The maintenance of a safe environment for persons desiring\ coastal access would be ensured by Mitigation Measure TR-1, above.

#### **OPERATIONAL TRAFFIC**

Trip generation associated with operation of the WRRF is summarized in Table IV-G4. During operation, the proposed facility would generate about 10 daily trips per day from employees (approximately four persons). The delivery of materials to the WRRF site would occur approximately once per week, and the hauling of bio-solids to an off-site, out of county disposal site would occur approximately two times per week.

Table IV-G4 Operational Trip Generation					
Source Average Daily PM Peak Trips Duration					
Employees/Maintenance	10.0	1.0			
Deliveries	0.13 <sup>1</sup>	0.013	2018 and Ongoing		
Biosolids Hauling 0.25 <sup>2</sup> 0.025					
Total:	10.38	1.038			

Source: Cayucos Sanitary District, 2016 Notes:

- 1. Four trips per month / 31 days per month.
- 2. Eight trips per month / 31 days per month.

**Operational Impacts** All operational trips are expected to impact Toro Creek Road, Highway 1 and/or Old Creek Road. Table IV-G5 compares the expected average daily

operational trips with traffic volumes on affected roadways serving the Project Site and Alternative Site. As shown in Table IV-X-5, traffic generated by the project would have a negligible affect on traffic volumes.

Table IV-	Table IV-G5 Existing Plus Project Traffic Volumes on Streets Serving the Project Site and Alternative Site						e Project
Roadway	Existing LOS	Existing Average Daily Traffic	Design Capacity	Existing Plus Project Average Daily Traffic	Percent Increase	Existing Plus Project Plus Growth In Background ADT	Significant?
SR-1	Α	12,500 <sup>1</sup>	77,000 <sup>2</sup>	12,510	< 1%	A/B <sup>4</sup>	No
Toro Creek Road	А	168³	2,000 <sup>3</sup>	178	5.7%	А	No
Old Creek Road	Α	1,542 <sup>3</sup>	2,000 <sup>3</sup>	1,552	<1%	А	No

Sources:

- 1. Caltrans 2014
- 2. Caltrans 2006
- 3. San Luis Obispo County Department of Public Works
- 4. SLOCOG 2014 Regional Transportation Plan

Table IV-G5 suggests that the increase in traffic volumes on surrounding streets would be negligible and compatible with existing rural traffic and agricultural equipment that may be present. According to the 2014 Regional Transportation Plan, SR-1 at Old Creek Road is expected to carry 14,800 ADT by the year 2035. Operational trips associated with the project will have a negligible effect on the level of service of the highway.

**Impact TR-3:** Operational activities associated with the WRRF will increase traffic levels on streets and intersections serving the project. This impact is considered less than significant (Class III).

### **CUMULATIVE IMPACTS**

**Impact TR-4:** Construction related activities associated with the CSWP, together with traffic generated by the construction of other reasonably foreseeable related projects in the region, will temporarily increase traffic levels on streets and intersections serving the region and result in temporary traffic safety and traffic management impacts. These impacts are considered less than cumulatively considerable (Class III).

As discussed under impact TR-1, construction related traffic will be temporary for the duration of the project (16 – 24 months) and could have a localized adverse impact on the safe operation of local roadways. The short-term cumulative project list presented in Section III shows a range of small construction projects spread around the community of Cayucos as possibly concurrent with the construction of the CSWP pipeline work in public streets. In addition it is possible the decommissioning of the Morro Bay WWTF could overlap with CSQP construction activities. However, with implementation of Mitigation Measure TR-1,

construction related impacts will be less than significant. Therefore, the CSWP's contribution to a cumulative adverse impact on the safe operation of local roadways during construction is considered less than cumulatively considerable (Class III).

**Impact TR-5:** Traffic generated by the CSWP at either the Project Site or Alternative Site, together with traffic generated by other reasonably foreseeable related projects in the region, together with the growth in background traffic, will increase traffic levels on streets and intersections serving the region. These impacts are considered less than cumulatively considerable (Class III).

As discussed under impact TR-2, the contribution of traffic associated with the WRRF will have a negligible impact on the level of service of roadways and intersections serving the region. Therefore, the CSWP's contribution to a cumulative adverse impact on the level of service of local roadways is considered less than cumulatively considerable (Class III).

#### 8. List of Abbreviated Terms

Abbreviation	Term
ADT	Average Daily Trips
AVE	Avenue
BLVD	Boulevard
EIR	Environmental Impact Report
НСМ	Highway Capacity Manual
HWY	Highway
ITE	Institute of Transportation Engineers
LOS	Level of Service
NB	Northbound
NOP	Notice of Preparation
RD	Road
SB	Southbound
S/O	South on-ramp
SR	State Route
ST	Street
US	United States

# 9. References

Caltrans Traffic Counts, 2014

Caltrans 2006

Caltrans' Guide for the Preparation of Traffic Impact Studies, December 2002

Cayucos Sanitary District, 2016

City of Morro Bay Circulation Element

City of Morro Bay State Route 1/State Route 41 Intersection Control Evaluation (ICE) Step - I Report (December 2014)

Safe Transportation Research and Education Center at the University of California, Berkeley, October 2016

San Luis Obispo County Department of Public Works Traffic County

San Luis Obispo County, Estero Area Plan, 2009

San Luis Obispo Council of Governments, Regional Transportation Plan, 2014

### H. NOISE

### 1. Environmental Issue

This section describes the existing noise environment in the area affected by the CSWP followed by an assessment of potential noise impacts associated with WRRF and pipeline construction, connection to the ocean outfall and operational activities.

# 2. Sources Used in This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications including:

- · San Luis Obispo County General Plan Noise Element;
- City of Morro Bay General Plan Noise Element;
- San Luis Obispo County Land Use Ordinance (Title 22 of the County Code);
- The Los Osos Wastewater Project Final Environmental Impact Report

A complete list of references is provided at the end of this section.

# 3. Scoping Issues

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issues relating to noise and circulation was raised during the scoping process and is addressed in this section:

 At the public EIR scoping meeting a member of the public that is a resident of Toro Creek Valley stated concerns about WRRF noise

# 4. Environmental & Regulatory Setting

### Introduction

Noise is defined as unwanted sound. Sound becomes unwanted when it interferes with normal activities, when it causes actual physical harm, or when it has adverse effects on health. Sound is produced by the vibration of sound pressure waves in the air. Sound pressure levels are used to measure the intensity of sound and are described in terms of decibels. The decibel (dB) is a logarithmic unit that expresses the ratio of the sound pressure level being measured to a standard reference level. A-weighted decibels (dBA) approximate the subjective response of the human ear to a broad frequency noise source by discriminating against very low and very high frequencies of the audible spectrum. They are adjusted to reflect only those frequencies that are audible to the human ear.

The manner in which noise reduces with distance depends on whether the source is a point or line source, ground absorption, atmospheric effects and refraction, and shielding by natural and man-made features. Sound from point sources such as air conditioning condensers radiate uniformly outward as it travels away from the source in a spherical pattern. The noise drop-off rate associated with this geometric spreading is 6 dBA per each doubling of the distance (dBA/DD). For example, a point noise source generating 60 dBA measured at 50 feet would generally be measured at 54 dBA at 100 feet and 48 dBA at 200 feet.

The duration of noise and the time at which it occurs are important factors in determining the impact of noise on sensitive land uses. Such factors are accounted for by the Community Noise Equivalent Level (CNEL) and the Day Night Average Level (DNL or Ldn), indices used to measure average daily noise levels. They are time weighted average values based on the equivalent sound level (Leq), which is a constant sound level that equals the same amount of acoustic energy as actual time varying sound over a particular time period. While the methods employed in determining a CNEL and Ldn reading differ slightly, the results of the two are generally equivalent. CNEL penalizes evening (seven to 10:00 p.m.) noise levels by 5 dBA and Ldn penalizes nighttime (10:00 p.m. to 7:00 a.m.) noise levels by 10 dBA.

Groundborne vibrations consist of rapidly fluctuating motions within the ground that have an average motion of zero. The effects of groundborne vibrations typically only cause a nuisance to people, but at extreme vibration levels, damage to buildings may occur. Although groundborne vibration can be felt outdoors, it is typically only an annoyance to people indoors where the associated effects of the shaking of a building can be notable. Groundborne noise is an effect of groundborne vibration and only exists indoors, since it is produced from noise radiated from the motion of the walls and floors of a room and may consist of the rattling of windows or dishes on shelves.

# Regulatory Setting

### **FEDERAL REGULATIONS**

#### **Noise Control Act of 1972**

The adverse impact of noise was officially recognized by the federal government in the Noise Control Act of 1972, which serves three purposes:

- Promulgating noise emission standards for interstate commerce;
- Assisting state and local abatement efforts; and
- Promoting noise education and research.

The Federal Office of Noise Abatement and Control (ONAC) was initially tasked with implementing the Noise Control Act. However, the ONAC has since been eliminated, leaving the development of federal noise policies and programs to other federal agencies and interagency committees. For example, the Occupational Safety and Health Administration (OSHA) agency prohibits exposure of workers to excessive sound levels. The Department of Transportation (DOT) assumed a significant role in noise control through its various operating agencies. The Federal Aviation Administration (FAA) regulates noise of aircraft and airports. Surface transportation system noise is regulated by a host of agencies, including the Federal Transit Administration (FTA). Transit noise is regulated by the federal Urban Mass Transit Administration (UMTA), while freeways that are part of the interstate highway system are regulated by the Federal Highway Administration (FHWA). Finally, the federal government actively advocates that local jurisdictions use their land use regulatory authority to arrange new development in such a way that "noise sensitive" uses are either prohibited from being sited adjacent to a highway or, alternately, that the developments are planned and constructed in such a manner that potential noise impacts are minimized.

Since the federal government has preempted the setting of standards for noise levels that can be emitted by the transportation sources, the County is restricted to regulating the noise

generated by the transportation system through nuisance abatement ordinances and land use planning.

### **STATE REGULATIONS**

## **California Department of Health Services Office of Noise Control**

Established in 1973, the California Department of Health Services Office of Noise Control (ONC) was instrumental in developing regularity tools to control and abate noise for use by local agencies. One significant model is the "Land Use Compatibility for Community Noise Environments Matrix," which allows the local jurisdiction to clearly delineate compatibility of sensitive uses with various incremental levels of noise.

#### **California Administrative Code**

Article 4 of the California Administrative Code (California Noise Insulation Standards, Title 25, Chapter 1) requires noise insulation in new hotels, motels, apartment houses, and dwellings (other than single-family detached housing) that provides an annual average noise level of no more than 45 dBA CNEL. When such structures are located within a 60-dBA CNEL (or greater) noise contour, an acoustical analysis is required to ensure that interior levels do not exceed the 45-dBA CNEL annual threshold.

#### California Government Code

Government Code Section 65302 mandates that the legislative body of each county and city in California adopt a noise element as part of its comprehensive general plan. The local noise element must recognize the land use compatibility guidelines published by the State Department of Health Services. The guidelines rank noise land use compatibility in terms of normally acceptable, conditionally acceptable, normally unacceptable, and clearly unacceptable.

#### **LOCAL REGULATIONS**

### San Luis Obispo County General Plan and Land Use Ordinance

The General Plan and Land Use Ordinance establish policies and standards associated with noise that are applicable to the CSWP. These standards are discussed in detail below under Thresholds of Significance. The General Plan Noise Element provides a list of *noise sensitive land uses* as follows:

- Residential uses listed in Table O, Framework for Planning of the Land Use Element, except temporary dwellings and residential accessory uses
- Schools-preschool to secondary, college and university; specialized education and training
- Health care services (hospitals)
- Nursing and personal care
- Churches
- Public assembly and entertainment
- Libraries and museums
- · Hotels and motels
- · Bed and breakfast facilities
- Outdoor sports and recreation

Offices

# **Environmental Setting**

#### **EXISTING NOISE ENVIRONMENT**

The Noise Element includes projections for future noise levels from known stationary and vehicle-generated noise sources. According to the Noise Element, the Project Site and Alternative Site lie within an area where future noise levels are expected to remain within an acceptable threshold. The Noise Element establishes a threshold for acceptable exterior noise levels for sensitive uses (such as residences) of 60 decibels<sup>1</sup> along transportation noise sources and provides an estimate of the distance from certain roadways where noise levels will exceed those levels. For Toro Creek Road, Old Creek Road and local streets within the Cayucos area, these distances have not been modeled. However, existing and future noise contours have been modeled for SR-1 as shown in Table IV-H1 and Maps IV-H1 through H3.

Table IV-H1 Distance From Center of Roadway to Ldn Contours							
Roadway	Canting	Existing		Future			
Roadway	Section	60dB	65dB	70dB	60dB	65dB	70dB
SR-1	Jct of Route 41 to Old Creek Road	379	172	80	463	215	100

As shown in Table IV-H1, future noise exposure along SR-1 are expected to increase somewhat compared to existing conditions, primarily due to an increase in traffic volumes.

### **Noise Environment of the Project Site**

As discussed in the Project Description, the Project Site is located on Toro Creek Road about 2 miles east of Highway 1 and about mid-way between the City of Morro Bay and the community of Cayucos. The project site consists of two parcels totaling about 221 acres located in a narrow valley framed by the rolling foothills of the Santa Lucia Range to the east. The area is rural and consists of ranches and farming operations on parcels ranging in size from 50 acres to over 150 acres. Existing noise sources in the area include farming operations and roadway noise on Toro Creek Road. Existing noise levels are very low, and typical of the rural agricultural setting.

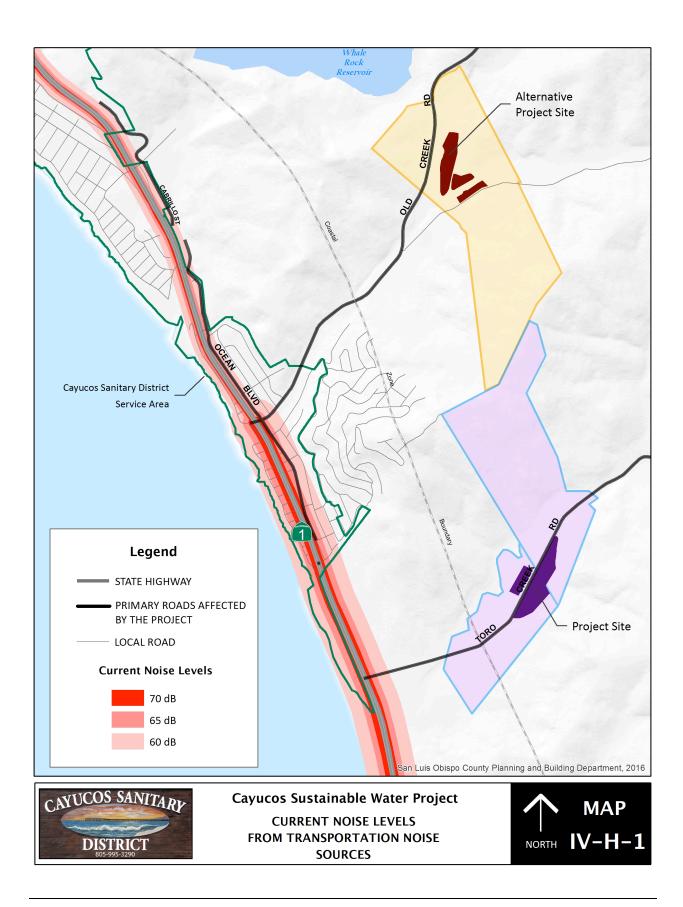
<sup>&</sup>lt;sup>1</sup> The sound level obtained by using the A-weighting filter of a sound level meter, expressed in decibels (dB). All sound levels referred to in this policy document are in A-weighted decibels. A-weighting de-emphasizes the very low and very high frequencies of sound in a manner similar to the human ear. Most community noise standards utilize A-weighting, as it provides a high degree of correlation which human annoyance and health effects.

The nearest noise sensitive land uses to the Project Site are dwellings on large ranch parcels. As shown on Map IV-H4, the nearest noise sensitive land uses are about 3,300 feet from the WRRF site.

### **Noise Environment of the Alternative Site**

The Alternative Site consists of about 215 acres located on the north and south sides of Montecito Road and east of Old Creek Road along Willow Creek, about 1.2 miles east of the community of Cayucos. As with the Project Site, the Alternative Site is located in a rural area where ranches and farming operations are the predominant land uses. Existing noise sources in the area include farming operations and roadway noise on Old Creek Road. Existing noise levels are very low.

The nearest noise sensitive land are dwellings on large ranch parcels. As shown on Figure IV-H5, the nearest noise sensitive land uses are about 2,300 feet from the Alternative WRRF site.









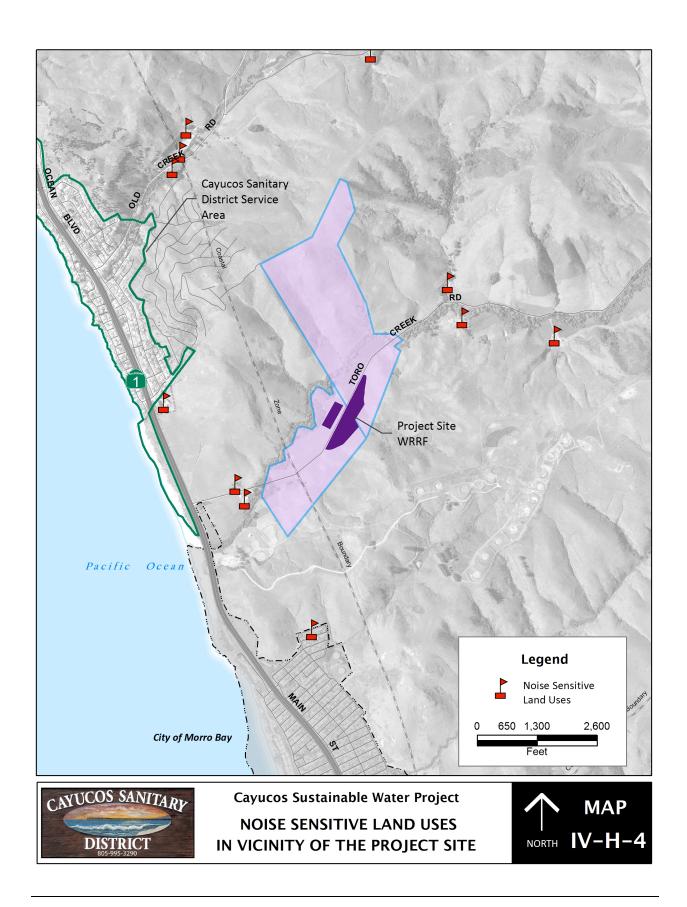
Cayucos Sustainable Water Project

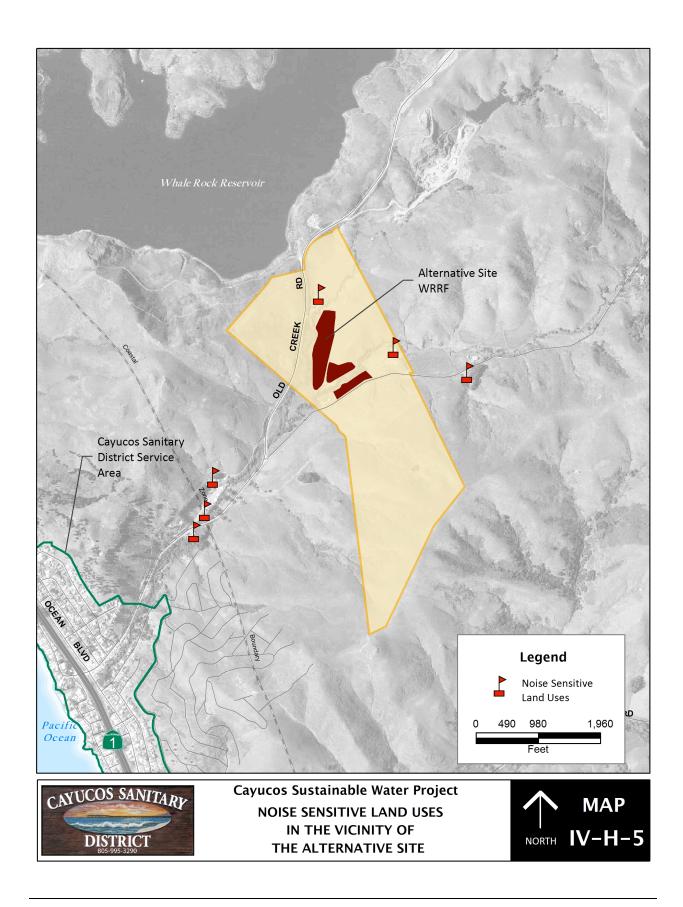
CURRENT NOISE LEVELS

FROM TRANSPORTATION NOISE

SOURCES







# 5. Standards of Significance

According to the CEQA Guidelines' Appendix G Environmental Checklist, to determine whether noise impacts are significant environmental effects, the following questions are analyzed and evaluated. Would the Proposed Project 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 and result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?
- Exposure of persons to or generation of excessive groundborne vibration or groundborne noise levels?
- 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 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 expose people residing or working in the project area to excessive noise levels?
- For a project within the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels?

For purposes of this analysis, the standards provided in the Noise Element of the County General Plan and in the County Land Use Ordinance (Title 22 of the County Code) will be applied as significance thresholds:

"Noise Element Standards for Stationary Sources – The Noise Element contains the following policy which sets forth the applicable standards for stationary noise sources:

Policy 3.3.5 - Noise created by new proposed stationary noise sources or existing stationary noise sources which undergo modifications that may increase noise levels shall be mitigated as follows and shall be the responsibility of the developer of the stationary noise source.

- a. Noise from agricultural operations conducted in accordance with accepted standards and practices is not required to be mitigated.
- b. Noise levels shall be reduced to or below the noise level standards in Table 3-2 [
  of the Noise Element, see below] where the stationary noise source will expose
  an existing noise-sensitive land use (which is listed in the Land Use Element as
  an allowable use within its existing land use category) to noise levels which
  exceed the standards in Table 3-2 [provided below]. When the affected noisesensitive land use is Outdoor Sports and Recreation, the noise level standards in
  Table 3-2 shall be increased by 10 dB. Where the noise source is one of the
  following electrical substations which is not modified so as to increase noise
  levels, the noise standards shall instead be fifty dB between 10 p.m. and 7 a.m.
  and fifty-five dB between 7 a.m. and 10 p.m., determined at the property line of
  the receiving land use: [includes the Cayucos, Baywood, and the portion of
  Highway 1 between the Men's Colony and Morro Bay electrical substations].

c. Noise levels shall be reduced to or below [a daytime Leq of 50 dBA and nighttime Leq of 45 dBA] where the stationary noise source will expose vacant land in the Agriculture, Rural Lands, Residential Rural, Residential Suburban, Residential Single Family, Residential Multi Family, Recreation, Office and Professional and Commercial Retail land use categories to noise levels in excess of [these standards]. This policy may be waived when the Director of Planning and Building determines that such vacant land is not likely to be developed with a noise sensitive land use.

Table 3-2 Maximum Allowable Noise Exposure – Stationary Noise Sources <sup>1</sup>					
Standard	Daytime (7AM to 10PM)	Nighttime <sup>2</sup> (10PM to 7AM)			
Hourly Leq, dB	50	45			
Maximum Level, dB	70	65			
Maximum Level, dB-Impulsive Noise	65	60			

Source: San Luis Obispo County General Plan Noise Element, Table 3-2.

- 1. As determined at the property line of the receiving land use. When determining the effectiveness of noise mitigation measures, the standards may be applied on the receptor side of noise barriers or other property line noise mitigation measures.
- 2. Applies only where the receiving land use operates or is occupied during nighttime hours.

In the event the measured ambient noise level exceeds the applicable exterior noise level standard in Noise Element Table 3-2, the applicable standard shall be adjusted so as to equal the ambient noise level plus one dB.

As described in part c., of policy 3.3.5, above, the Noise Element sets forth specific standards for community noise exposure by land use category. For development of a site where exterior noise level is less than 65 dBA CNEL, residential development is considered normally acceptable, and typically no noise analysis or mitigation is required. For development of a site where the exterior noise level is 60- to 70-dBA CNEL, residential development is considered conditionally acceptable upon further analysis through a noise impact analysis and possible mitigation. For development of a site where the exterior noise level is the 70- to 75-dBA CNEL, residential development is normally unacceptable unless a detailed analysis shows that noise reduction features are included in the design. Where exterior noise levels are in excess of 75 dBA CNEL, residential development is clearly unacceptable.

Noise Element Standards for Transportation Noise Sources – The Noise Element contains the following policies which sets forth the applicable standards for noise from transportation sources:

Policy 3.3.2 New development of noise-sensitive land uses (see Section 1.5 – Definitions) shall not be permitted in areas exposed to existing or projected future levels of noise from transportation noise sources which exceed 60 dB LDN or CNEL (70 LDN or CNEL for outdoor sports and recreation) unless the project design includes effective mitigation measures to reduce noise in outdoor activity areas and interior spaced to or below the levels specified for the given land use in Table 3-1.

Policy 3.3.3 Noise created by new transportation noise sources, including roadway improvement projects, shall be mitigated so as not to exceed the levels specified in Table 3-1 within the outdoor activity areas are interior spaces of existing noise sensitive land uses.

Table 3-1 Maximum Allowable Noise Exposure From Transportation Noise Sources					
Landillan	Outdoor Activity	Interior Spaces			
Land Use	Areas <sup>1</sup> LDN/CNEL, dB	LDN/CNEL, dB	Leq, dB <sup>2</sup>		
Residential (except temporary dwellings and res accessory uses)	60 <sup>3</sup>	45			
Bed and Breakfast Facilities, Hotels and Motels	60 <sup>3</sup>	45			
Hospitals, Nursing and Personal Care	60 <sup>3</sup>	45			
Public Assembly and Entertainment (except Meeting Halls)			35		
Offices	60 <sup>3</sup>		45		
Churches, Meeting Halls			45		
Schools-Preschool to Secondary, College and University, Specialized Education and Training Libraries and Museums			45		
Outdoor Sports and Recreation	70				

Source: San Luis Obispo County Noise Element, Table 3-1

- 1. Where the location of outdoor activity areas is unknown, the exterior noise level standard shall be applied to the property line of the receiving land use.
- 2. As determined for a typical worst-case hour during periods of use.
- 3. For other than residential uses, where an outdoor activity area is not proposed, the standard shall not apply. Where it is not possible to reduce noise in outdoor activity areas to 60 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.

For residential areas near transportation noise sources, Policy 3.3.3 provides an interior noise level standard of 45 dBA CNEL or less and an exterior noise standard of 60 dBA CNEL. In the context of this noise impact analysis, the noise impacts from transportation-related noise associated with the proposed project are controlled by the County Noise Element.

**Standards for Construction Noise.** Section 22.10.120 of the County's Land Use Ordinance (Title 22 of the County Code) provides standards for acceptable interior and exterior noise levels and describes how noise shall be measured. The standards apply throughout the unincorporated County. Construction noise and noise associated with emergencies are excepted from the County's Noise Standards by Section 22.10.120(A):

- A. Exceptions to noise standards. The standards of this Section are not applicable to noise from the following sources.
  - 4. Noise sources associated with construction, provided such activities do not take place before 7 a.m. or after 9 p.m. on any day except Saturday or Sunday, or before 8 a.m. or after 5 p.m. on Saturday or Sunday;
  - 2. The use of any mechanical device, apparatus or equipment related to or connected with emergency activities or emergency work to protect life or property;"

However, since neither the General Plan nor the Land Use Ordinance provide quantitative standards for construction noise, construction noise impacts will be analyzed according to the same standards as those stated above for stationary noise.

# **City of Morro Bay General Plan Noise Element**

The City of Morro Bay General Plan Noise Element contains noise thresholds for land use compatibility near transportation noise sources. According to the Noise Element, the maximum acceptable noise exposure from transportation noise sources is 60 dB at most uses, and 70 dB at playgrounds and parks. In addition, the City of Morro Bay's Zoning Ordinance contains noise requirements with general noise limitations in Chapter 17.52, Performance Standards. The noise ordinance also covers operational hours, criteria for review of development projects, noise mitigation, and requirements for noise reduction measures and acoustical analyses. For purposes of this EIR, the County noise standards will be applied.

### Other Thresholds

For the purpose of the proposed project, the following threshold has been added. To evaluate the project's consistency with applicable goals, policies, and regulations related to noise impacts:

• Would the project conflict with policies in the General Plan?

# 6. Impacts Found to Be Less Than Significant

Based on the Initial Study published with the Notice of Preparation, Less Than Significant or No Impacts were found related to the project causing impacts related to noise sources at airports and ground borne vibration. Therefore these topics will not be discussed further.

# 7. Impacts and Mitigation Measures

### **CONSTRUCTION ACTIVITIES**

### Construction Noise at the Water Resource Recovery Facility

It is anticipated that staging and storage of construction materials would occur on a temporary storage yard adjoining the proposed WRRF and that construction activities would take place within the footprint of the WRRF site. Worker trips would typically occur during the A.M. and P.M. peak hour periods and generate approximately 20 to 40 average daily trips (ADT), while equipment and material deliveries would occur throughout the entire day with a total of approximately 6 ADT.

Approximately eight acres would be disturbed during construction of the treatment plant and solar array. The greatest construction noise impacts are anticipated to occur during the grading operations when the simultaneous operation of two tracked earthmovers, three wheeled earthmovers, two graders, one compaction roller, three backhoes, two excavators, two mobile cranes, 10 pickup trucks (two onsite), three small dump trucks, one water truck, and one asphalt compactor may operate simultaneously. Construction activities that result in groundborne vibrations such as driving piles are not part of this project.

As shown in Map IV-H4, the nearest noise sensitive land uses to the Project Site are single family residences (ranch houses) that are between 3,300 - 4,700 feet away. Three of the seven dwellings have a generally straight line of sight to the Project Site and sound will not be attenuated by the intervening terrain. The other four closest noise-sensitive land uses are shielded from the Project Site by the intervening topography.

Noise modeling for construction of a larger wastewater treatment plant (32 acres) found that construction activities would result in typical temporary noise levels of 70 dBA Leq a distance of 200 feet from the construction noise source. Because noise attenuates at a rate of 6 dBA for each doubling of distance, the nearest sensitive noise receptors with an unobstructed line of sight to the Project Site would experience noise levels of about 46 dBA which is below the 50 dBA Leq County threshold of significance for construction noise. Noise impacts to sensitive receptors associated with construction of the WRRF on the Project Site are considered less than significant (Class III).

**Impact N-1:** Construction activities associated with the Project Site or Alternative Site will result in a temporary or periodic increase in ambient noise levels in the project vicinity above existing levels without the project. This impact is considered less than significant (Class III) because it is below the County threshold of significance for stationary noise.

### **Construction Noise at the Alternative Site**

As shown in Map IV-H5, the nearest off-site noise sensitive land uses are single family residences (ranch houses) that are between 550 to 800 feet away. Both residences have a generally unobstructed line of sight to the Alternative Site. Assuming noise attenuation of 6 dBA for each doubling of distance, the nearest sensitive noise receptors with an unobstructed line of sight to the Project Site would experience noise levels of about 66 dBA which is above the 50 dBA Leq County threshold of significance for construction noise. Noise impacts to sensitive receptors associated with construction of the WRRF on the Alternative Site are considered significant but possibly able to be mitigated with acoustical shielding during construction.

# **Construction Noise at Pipeline Conveyances**

The construction of pipeline conveyances would be located primarily on Ocean Blvd and Cabrillo Drive in Cayucos, Main Street and Atascadero Road in Morro Bay, as well within the SR-1 right of way outside the northbound travel lanes. Construction activities would be temporary, lasting 16-24 months but construction activities at any specific location along the collection system may be a few days to a few weeks.

<sup>&</sup>lt;sup>2</sup> Michael Brandman Associates, 2008, Final EIR for the Los Osos Wastewater Treatment Project

Noise impacts from construction activities associated with the proposed project would be a function of the noise generated by construction equipment, equipment location, sensitivity of nearby land uses, and the timing and duration of the construction activities.

Equipment present during pipeline construction in rights of way would generally consist of two backhoes, two 10-wheel dump truck, one front loader, one compactor, a water truck and a pavement saw-cutter. During re-paving, an asphalt spreader and roller, plus delivery trucks would be present. The number of workers would range from 8 to 10 depending on the activity on a given day.

Construction activities associated with a comparable gravity collection system concluded that construction of the pipeline conveyances would create an average noise level of 85.5 Leg and a peak noise level of 87.0 dBA Lmax<sup>3</sup> at a distance of 25 feet from the source.

This would exceed the County stationary noise standards of 50 dBA Leq and 70 dBA for noise sensitive land uses along Ocean Boulevard, Cabrillo Drive, Main Street and Atascadero Road (Maps IV-H1 and IV-H2).

As discussed in the setting, above, residences along portions of Ocean Avenue and Main Street are currently exposed to noise levels that exceed 60 dBA from traffic noise on SR-1. The County of San Luis Obispo's threshold of significance is 60 dBA CNEL or a 3 dBA CNEL increase for roadways when the existing noise level is greater than 60 dBA CNEL.

Shielding of construction equipment along a pipeline construction route that is moving daily is not feasible. Likewise, noise attenuating shields on engines are not feasible because the equipment is not stationary. Therefore, temporary construction noise impacts to sensitive receptors along pipeline routes would be significant and unavoidable (Class I), see Impact N-2 below.

<sup>&</sup>lt;sup>3</sup> Ibid.

# Construction Noise at the Outfall connection at Existing WWTF

For purposes of this EIR, it can be assumed that outfall connection at the existing WWFT in Morro Bay would involve construction activities would occur during normal working hours over a period of several weeks. Due to the proximity of the WTTF outfall connection location to the Morro Dunes RV Park, a motel and Morro Bay High School (Map IV-H3), construction activities could temporarily adversely impact noise sensitive land uses. Construction noise impacts associated with outfall connection at the existing WWTF are considered significant and unavoidable after application of mitigation.

**Impact N-2:** Construction activities associated with the pipeline conveyances and outfall connection would result in short term 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. This impact is considered significant and unavoidable (Class I) after application of Mitigation Measure N-1.

**Mitigation Measure N-1**: The CSD shall require construction contractors to adhere to the following noise attenuation requirements:

- Construction activities shall be limited to between the hours of 7 a.m. to 9 p.m. on any day except Saturday or Sunday or between the hours of 8 a.m. to 5 p.m. on Saturday or Sunday.
- All construction equipment shall use noise-reduction features (e.g., mufflers and engine shrouds) that are no less effective than those originally installed by the manufacturer.
- Construction staging and heavy equipment maintenance activities shall be performed a minimum distance of 300 feet from the nearest residence, unless safety or technical factors take precedence.
- Stationary combustion equipment such as pumps or generators operating within
   100 feet of any residence shall be shielded with a noise protection barrier.

#### **OPERATIONAL NOISE**

## **Stationary Noise**

The collection system and treatment plant sites will generate stationary noise impacts from the ongoing operation of the CSWP. The back up generator discussed below is the loudest noise source on the WRRF site. The generator is not an ongoing source of noise, but is only used in an emergency power outage. All other equipment on the WRRF site produce noise levels that in the range of 65-70 dB at a distance of 50 feet.

A treatment plant that utilizes conventional activated sludge (CAS) or oxidation ditch processes has an array of pumps and blowers that produce noise. These include the influent pump station, biological treatment process blower or mechanical brush aerator, and permeate pump for advanced filtration. Other technologies for processing wastewater generally have similar but fewer pumps and blowers, such as the Membrane Bioreactor (MBR) system proposed for the Cayucos WRRF. Therefore, noise generation associated with a CAS or oxidation ditch process system represents a worst-case noise generation scenario. Based on noise measurements taken from wastewater treatment plants employing

comparable treatment technologies<sup>4</sup>, the MBR system at the WRRF is expected to produce a noise level of 65-70 dBA at a distance of 50 feet.

## Stationary Noise at the Project Site

The WWRF noise producing features would be located from 446 to 1,720 feet from the property line. As shown in Map IV-H4, the nearest noise sensitive land uses to the Project Site are single family residences (ranch houses) that are between 3,300 – 4,700 feet away. Three of the seven dwellings within a one-half mile radius of the Project Site have a generally straight line of sight to the Project Site. The other four closest noise sensitive land uses are shielded from the Project Site by the intervening topography. Based on geometric spreading of noise (6 dBA decrease for each doubling of distance), the WRRF processes could produce a noise level of 46.0 dBA at the property line, which is below the County standard of 50 dBA for stationary noise sources (Map IV-H6). This estimate has not been corrected for intervening topography which would lessen the noise level.

The analysis of compliance with County noise standards is based on the resulting noise at the nearest property line of the parent parcels. However, the CSD intends to create a public lot within the parent parcels generally as shown on Map IV-H4. The resulting public lot would be much smaller than the parent parcels and the distance from noise generating sources on the WRRF to the property line would be greatly reduced. At such time as the public lot is created, the noise level expected at the new property line would likely exceed County standards. However, the creation of a public lot would have no effect on the noise exposure to surrounding sensitive land uses and the purpose and intent of the County's noise standards would continue to be satisfied.

A diesel-powered backup generator will be located inside a structure and would only be operated during an emergency. The backup generator would be located at least 446 feet from the nearest property line and no closer than 3,300 from the nearest noise sensitive land use (a residence). A diesel generator enclosed by a concrete masonry enclosure produces a noise level of 80 dBA at 50 feet, therefore emergency generator noise at the property line would be about 62 dBA, which exceeds the County standard of 50 dBA. However, noise associated with mechanical devices used during an emergency (such as a backup power generator) is exempt from the County Noise Standards in accordance with Section 22.10.120 (A)(2).

**Impact N-3:** Operational activities associated with the WRRF at the Project Site would not 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 or result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project. This impact is considered less than significant (Class III).

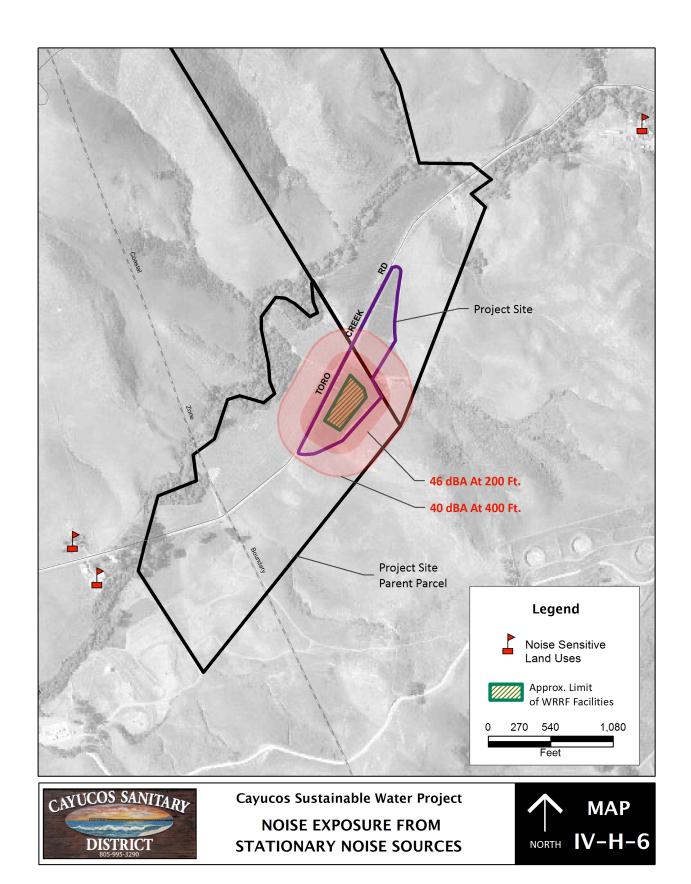
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<sup>&</sup>lt;sup>4</sup> Michael Brandman Associates, 2008, Final EIR for the Los Osos Wastewater Project

# Stationary Noise at the Alternative Site

Assuming similar noise generating characteristics, stationary noise impacts associated with the Alternative Site would not adversely impact noise sensitive land uses on surrounding properties (Map IV-H6), which are 400 to 800 feet away. Based on geometric spreading of noise (6 dBA decrease for each doubling of distance), the WRRF processes on the Alternative Site could produce a noise level of 52.0 dBA at 400 feet from the source, slightly above the 50dBA threshold.

Noise impacts associated with the diesel generator would be comparable to the Project Site and would be less than the County standard. However, noise associated with mechanical devices used during an emergency (such as a backup power generator) is exempt from the County Noise Standards in accordance with Section 22.10.120 (A)(2).



# **Roadway Noise**

The on-going operation of the collection system and treatment plant would all generate additional vehicular trips on roadways in the project vicinity. As discussed in Section IV-G Traffic, trip generation associated with operation of the WRRF is expected to generate a negligible increase in traffic on local roadways serving the community.

For these reasons, operational noise impacts associated with increased roadway noise are considered less than significant (Class III).

### **CUMULATIVE IMPACTS**

Construction activities will be temporary for the duration of the project (16 - 24 months) and could have a localized adverse impact on noise levels throughout along certain public streets, especially if construction activities overlap. The short-term cumulative project list presented in EIR Section III shows a range of small construction projects spread around the community of Cayucos as possibly concurrent with the construction of the CSWP pipeline work in public streets. In addition, it is possible that decommissioning of the Morro Bay WWTF may overlap with WRRF construction activities

Even with implementation of Mitigation Measure N-1, construction related noise impacts will still be significant and unavoidable. Therefore, the CSWP's contribution to a cumulative adverse impact on noise during construction is considered cumulatively considerable and unavoidable (Class I).

**Impact N-4:** Construction related activities associated with the Project pipeline infrastructure, together with noise generated by the construction of other reasonably foreseeable related projects in the region, will temporarily increase noise levels in the region and result in temporary noise impacts. These impacts are considered cumulatively considerable and unavoidable (Class I) after application of Mitigation Measure N-1.

As discussed under impact N-2, the contribution of stationary and roadway noise associated with the WRRF at either the Project Site or the Alternative Site will have a negligible impact on noise levels in the area. Therefore, the CSWP's contribution to a cumulative adverse impact on noise levels is considered less than cumulatively considerable (Class III).

**Impact N-5:** Noise generated by the Project and related project traffic at either the Project Site or Alternative Site, together with noise generated by other reasonably foreseeable related projects in the region, are unlikely to result in exposure of persons to, or the generation of, noise levels in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies and result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project. These impacts are considered less than cumulatively considerable (Class III).

### 8. List of Abbreviated Terms

Abbreviation	Term
ADT	Average Daily Trips

AVE	Avenue	
BLVD	Boulevard	
CEQA	California Environmental Quality Act	
CNEL	Community Noise Equivalent Level	
DB	Decibel	
DBA	Decibels	
EIR	Environmental Impact Report	
EPA	United States Environmental Protection Agency	
LDN	Day-Night Level	
LEQ	Equivalent Continuous Noise Level	
NOP	Notice of Preparation	
SR	State Route	
ST	Street	
US	United States	

# 9. References

Caltrans Traffic Counts, 2014

Cayucos Sanitary District, 2016

City of Morro Bay General Plan Noise and Circulation Elements

San Luis Obispo County Department of Public Works Traffic County

San Luis Obispo County, Estero Area Plan, 2009

San Luis Obispo Council of Governments, Regional Transportation Plan, 2014

California Department of Transportation. 1998 Technical Noise Supplement.

California Department of Transportation. 2004. Transportation- and Construction-Induced Vibration Guidance Manual.

County of San Luis Obispo. 1992. County of San Luis Obispo General Plan Noise Element, Part I Policy Document.

Federal Transit Administration. 2006. Transit Noise and Vibration Impact Assessment

Michael Brandman Associates, 2008, Final EIR for the Los Osos Wastewater Project

U.S. Department of Transportation. 2006. FHWA Roadway Construction Noise Model User's Guide

### I. AIR QUALITY AND GREENHOUSE GASES

## 1. Environmental Issue

This section describes the existing air quality in the area affected by the CSWP followed by an assessment of potential air quality impacts and greenhouse gas emissions associated with WRRF and pipeline construction, connection to the ocean outfall and operational activities.

# 2. Sources Used in This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications including:

- San Luis Obispo County Air Pollution Control District (SLOAPCD) CEQA Air Quality Handbook (SLOAPCD 2012);
- SLOAPCD 2001 Clean Air Plan;
- SLOAPCD 2015 Annual Air Quality Report:
- California Emissions Estimator Model (CalEEMod) User's Guide, Version 2016.3.1 (California Air Pollution Control Officers Association [CAPCOA] 2016);
- First Update to the Climate Change Scoping Plan, Building on the Framework Pursuant to AB 32 The California Global Warming Solutions Act of 2006 (California Air Resources Board [CARB] 2014); and
- County of San Luis Obispo EnergyWise Plan (County of San Luis Obispo Department of Planning and Building 2011).

A complete list of references is provided at the end of this section.

# 3. Scoping Issues

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issues relating to air quality and greenhouse gas emissions were raised during the scoping process and are addressed in this section:

- After receiving more project details and a process flow diagram for the WRRF, the SLOAPCD did not require preparation of a Health Risk Assessment, however, was concerned about diesel particulate matter emissions during construction of new pipelines near the Morro Bay High School;
- The SLOAPCD notified the applicant that an Authority of Construct (ATC) and Permit
  to Operate (PTO) would be required to be obtained from the SLOAPCD prior to
  construction and operation of the project; and
- The SLOAPCD would require submittal of an Odor Monitoring and Complaint Response Plan as part of the application for the ATC.

# 4. Environmental & Regulatory Setting

### Introduction

The project is within part of the South Central Coast Air Basin, which includes San Luis Obispo County and portions of Santa Barbara and Ventura counties. Air quality is highly influenced by the Pacific Ocean where the speed and direction of winds are controlled by the Pacific high-pressure systems.

The project site is in a rural area of the Coastal Plateau in the County of San Luis Obispo, a geographic region located immediately inland from the ocean from 0 feet above mean sea level (amsl) to approximately 500 feet amsl and bounded by the Santa Lucia Mountains to the northeast. The project site is located within California Energy Commission (CEC) Forecasting Climate Zone 4, where wind speeds are estimated at 3.2 meters per second and precipitation is estimated at 44 days per year with precipitation greater than 0.1 inches in one day (California Emissions Estimator Model [CalEEMoD] Version 2016.3.1).

# Regulatory Setting

### **FEDERAL REGULATIONS**

### Federal Clean Air Act

The federal Clean Air Act of 1978, as amended via the Clean Air Act Amendments in 1990, requires attainment and maintenance of National Ambient Air Quality Standards (NAAQS) for certain air pollutants of concern, called criteria pollutants, shown in Table I-1. The criteria pollutants of local concern in the County are discussed in more detail below, and include ozone (O3), particulate matter (PM10 and PM2.5), carbon monoxide (CO), nitrogen dioxide (NO2), and sulfur dioxide (SO2) (SLOAPCD 2015). Under the Clean Air Act, the U.S. Environmental Protection Agency (U.S. EPA) requires each State that is not in attainment with the NAAQS to prepare a State Implementation Plan (SIP) comprising Air Quality Management Plans from individual local air districts, with a detailed strategy on how to meet federal standards. The attainment status within the San Luis Obispo County Air Pollution Control District is also shown in Table I.1 (see Environmental Setting below for more details).

Table IV-I1 - National and State Ambient Air Quality Standards and Attainment Status

Criteria Pollutant	California State Standard	Attainment Status	Federal Standard	Attainment Status
Ozone (O3)	0.09 ppm (1-hour average); 0.070 ppm (8-hour average)	Non-attainment	0.070 ppm (8-hour average)	Attainment (except Eastern SLO County, outside project area)
Respirable Particulate Matter (PM10)	20 µg/m³ (annual arithmetic mean); 50 µg/m³ (24-hour average)	Non-attainment	150 μg/m <sup>3</sup> (24-hour average)	Attainment
Fine Particulate Matter (PM2.5)	12 μg/m³ (annual arithmetic mean)	Attainment	12 μg/m <sup>3</sup> (annual arithmetic mean); 35 μg/m <sup>3</sup> (24-hour average)	Attainment

		A 11 ' '	1 0 /0	11 1 26 1
Carbon	9 ppm (8-hour	Attainment	9 ppm (8-	Unclassified
Monoxide	average);		hour	
(CO)	20 ppm (1-hour		average);	
	average)		35 ppm	
			(1-hour	
			average)	
Nitrogen	0.18 ppm (1-hour	Attainment	0.053	Unclassified
Dioxide	average);		ppm;	
(NO2)	0.03 ppm (annual		0.10 ppm	
	average)		(98 <sup>th</sup>	
			percentile,	
			3-year	
			average)	
Sulfur Dioxide	0.04 ppm (24-hour	Attainment	0.075 ppm	Unclassified
(SO2)	average);		(1-hour,	
, ,	0.25 ppm (1-hour		99 <sup>th</sup>	
	average)		percentile,	
	3 /		3-year	
			average);	
			0.14 ppm	
			(24-hour);	
			0.03 ppm	
			(annual	
			arithmetic	
			mean)	
Lead	1.5 µg/m³ (30-day	Attainment	0.15	No Attainment
	average)	,	μg/m³ (roll	Information
			3-month	
			average);	
			1.5 µg/m <sup>3</sup>	
			(calendar	
			quarter)	
Visibility	In sufficient amount	Attainment	No federal	Attainment
Reducing	to give an extinction	/ ttallillont	standard	7 tttaiiiii ont
Particles	coefficient of 0.23 per		Staridard	
1 ditioles	kilometers (visual			
	range of 10 miles or			
	more) with relative			
	humidity less than			
	70%, 8-hour average			
	(10 a.m. to 6 p.m.			
	Pacific Standard			
	Time)			
Sulfates	25 μg/m <sup>3</sup> (24-hour	Attainment	No federal	Attainment
Sullates		Allamment		Attairiiriciit
Lludrosss	average)	Attainment	standard No federal	Attainment
Hydrogen	0.03 ppm (1-hour	Attainment		Attainment
Sulfide	average)	No Attainment	standard No federal	Attainment
Vinyl Chloride	0.01 ppm (24-hour average)	No Attainment	No federal	Attainment
	i average)	Information	standard	

### Notes:

Attainment means that the area meets the primary or secondary standard, and for the State standard, was not exceeded for a 3-year period.

Non-attainment means that the area does not meet, or contributes to an area that does not meet, the national standard, and for the State standard, was not exceeded once over a 3-year period.

Unclassified attainment status means that the area cannot be classified on the basis of available information.

Ozone (O3). Ozone is the principle component of photochemical smog, and comprised of two main precursors: reactive organic gases (ROGs) (or compounds) and oxides of nitrogen oxides (NOx). Ozone is a strong oxidant gas that attacks plant and animal tissues. It causes impaired breathing and reduced lung capacity, especially in children and persons with compromised respiratory systems. It can also cause crop damage.

Particulate Matter (PM10 and PM2.5). Respirable particulate matter less than 10 microns in diameter (PM10) and fine particulate matter 2.5 microns or less in diameter (PM2.5) are generated from diesel exhaust (i.e., DPM), smoke from open burning, and wind-blown dust and dust from paved and unpaved roads, among other sources. Particulate matter can be lodged deep in the lungs resulting in short- and long-term damage. Particulate matter can also reduce visibility in an area.

Nitrogen Dioxide (NO2), Sulfur Dioxide (SO2), and Carbon Monoxide (CO). Nitrogen dioxide (NO2) is the brownish-colored component of smog and can irritate the eyes, nose, and throat. Sulfur dioxide (SO2) is a colorless gas with health effects similar to NO2. Both pollutants are generated by fossil fuel combustion from mobile sources (e.g., vehicles) and stationary sources. Carbon monoxide (CO) is generated from fuel combustion of all types, but the largest contributor of CO emissions is motor vehicles. CO interferes with the ability of red blood cells to transport oxygen and can cause headaches and fatigue.

# **Federal Air Conformity Requirements**

Under Section 176(c)(4) of the Clean Air Act, the General Conformity Rule requires that federal agencies work with State governments in an air quality non-attainment area with NAAQS to ensure that federal actions conform to the initiatives established in the applicable SIP. This is typically performed via a formal Federal Conformity Determination process for projects that exceed certain emission thresholds for criteria pollutants (i.e., ozone precursor emissions between 10 to 50 tons/year). Because western San Luis Obispo County is in attainment with all NAAQS, this rule does not apply to the Proposed Project or Alternatives.

## STATE REGULATIONS

### California Clean Air Act

The California Clean Air Act of 1989, as amended in 1992, mandates California air districts to attain California Ambient Air Quality Standards (CAAQS), listed in Table IV-I1 above.

In compliance with the California Clean Air Act, the SLOAPCD is required to develop a plan to achieve and maintain the CAAQS for ozone by the earliest practicable date. Therefore, the Clean Air Plan (CAP) was adopted by the SLOAPCD (2001) which outlines the District's strategies to reduce ozone precursor emissions from a wide variety of stationary and mobile sources.

#### **Toxic Air Contaminants**

Approximately 200 compounds were identified by CARB as Toxic Air Contaminants that pose a high health risk to humans, aside from criteria pollutants, as a result of the Toxic Air Contaminant Identification and Control Act (AB 1807) of 1983. This law required CARB to identify TACs and develop control strategies for them. The Air Toxic "Hot Spots" Information and Assessment Act of 1987 (AB 2588) further required a statewide air toxics inventory and included a requirement to notify residents of significant risks from toxic air contaminants

emitted from nearby sources. Finally, Senate Bill 1731, amended this law in 1992 to require that health risks from these sources be reduced.

Pursuant to California Health and Safety Code Section 42301.6 (AB 3205) and Public Resources Code Section 21151.8, any new school, or proposed industrial or commercial project site located within 1,000 feet of a school, must be reviewed by the SLOAPCD to determine whether the project has the potential to emit TACs and would pose a health risk to sensitive receptors.

Diesel particulate matter, asbestos, and lead are toxic air contaminants of concern in San Luis Obispo County. Under the CARB Air Toxics Control Measure (ATCM) for Construction, Grading, Quarrying, and Surface Mining Operations, a geologic analysis is required prior to any grading activities proposed in serpentine rock, to test for naturally occurring asbestos (NOA). Further compliance with the requirements of the ATCM may be required depending on whether there is the potential to disturb NOA, and how many acres.

In 2000, CARB adopted the Diesel Risk Reduction Plan that calls for a 90% reduction in DPM emissions by 2020 from diesel-fueled engines and vehicles by requiring new regulatory standards for new on-road, off-road, and stationary diesel-fueled engines and vehicles; retrofits for existing vehicle and stationary engines to reduce DPM; and a required reduction in the the allowable sulfur content in diesel fuel sold in California.

# Assembly Bill (AB 32), Senate Bill 32 (SB 32), and AB 197

Assembly Bill 32 (AB 32) (the Global Warming Solutions Act of 2006) required that California's greenhouse gas (GHG) emissions be reduced to 1990 levels by 2020. AB 32 directed CARB to develop a Scoping Plan that must be updated every 5 years that describes the strategy to meet these targets. CARB prepared the original Scoping Plan in 2008, which contained measures to reduce GHG emissions, including a cap-and-trade program whereby large emitters can offset their GHG emissions through investment in clean technology for example. In addition, CARB requires mandatory reporting of GHG emissions for sources generating greater than 25,000 metric tons (MT) per year, and AB 1493 established GHG standards for passenger vehicles.

GHGs are gases that absorb infrared radiation in the atmosphere, and include carbon dioxide (CO2), methane (CH4), nitrous oxide (N2O), and fluorocarbons. The global warming potential is the potential for a GHG to trap heat in the atmosphere. The common reference gas for global warming potential is CO2. Therefore, GHG emissions are measured in "CO2 equivalents (CO2e)" which is the sum of each GHG's emissions multiplied by its respective global warming potential. The global warming potential of CO2 is one; the global warming potential of CH4 and N2O is 25 and 298, respectively, based upon values currently used in CalEEMod Version 2016.3.1.

SB 32 would extend The Global Warming Solutions Act by requiring California to meet a 40% reduction in GHG emissions from 1990 levels by 2030, consistent with an existing Executive Order passed in 2015 requiring the same (Executive Order B-30-15). The companion regulation for SB 32 is AB 197 which would extend the cap-and-trade emission reductions beyond the existing 2020 targets as well. Both pieces of legislation are expected to be signed and go into effect January 1, 2017.

#### **SB 375**

In 2014, the San Luis Obispo Council of Governments (SLOCOG) developed the Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS) which establishes a regional GHG emissions reduction target and plan to accomplish, as required by SB 375. SB 375 was passed in 2008 and requires cities and counties to develop a regional plan for meeting CARB's GHG reduction targets. The SCS must account for regional growth, while still meeting the State's GHG reduction targets.

#### LOCAL REGULATIONS

#### 2001 Clean Air Plan

To ensure continued progress toward clean air and compliance with State and federal requirements, the SLOAPCD prepared the 2001 Clean Air Plan (CAP), which proposes new control measures to bring the District in compliance with the State ozone standard. This includes implementation of transportation control measures; prohibiting new sources or modified sources that would emit, or have the potential to emit, over 25 tons per year from resulting in a net increase in emissions of ozone precursors; and implementation of Best Available Retrofit Control Technology (BACT) or Reasonably Available Control Technology for existing sources with emissions above certain thresholds.

# **SLOAPCD Rules and Regulations**

The new WRRF will be required to obtain an ATC and PTO from the SLOAPCD prior to construction and operation of the project pursuant to Rule 204 (Requirements) (i.e., New Source Review) and Rule 601 (New Source Performance Standards).

Several SLOAPCD Rules apply to the proposed project as well, including:

- Rule 401 (Visible Emissions)
- Rule 402 (Nuisance)
- Rule 431 (Stationary Internal Combustion Engines); and
- Rule 433 (Architectural Coatings)

Any potential odor from the WRRF would be regulated under Rule 402 (Nuisance).

The new WRRF would not involve the incineration of sewage sludge. Therefore, compliance with the Standards of Performance for Sewage Treatment Plants contained in 40 Code of Federal Regulations (CFR) Part 60 Subpart O, required in SLOAPCD Rule 601, would not apply to the Proposed Project or Alternatives.

### San Luis Obispo County's EnergyWise Plan

The County of San Luis Obispo developed an EnergyWise Plan, a Climate Action Plan for the County. The Plan recommends a variety of measures to reduce GHG emissions Countywide, including water conservation, use of reclaimed water, and preservation of agricultural land uses within the County.

# **Environmental Setting**

# **EXISTING AIR QUALITY AND ATTAINMENT STATUS**

Air quality is measured at 11 air quality monitoring stations across the County (SLOAPCD 2015); 9 stations are owned by the SLOAPCD and two are owned by private parties but operated by the SLOAPCD. Motor vehicles are the largest contributor to air pollution in the District. In addition, wildfires can, and have recently, adversely affected air quality in the area. Stationary sources within the District include power plants, other wastewater treatment plants, auto body shops, and landfills. Area sources include residential water heating, crop tilling, and unpaved roads. SLOAPCD maintains an emissions inventory within the District using monitoring data and data provided by CARB (SLOAPCD 2012).

The San Luis Obispo Air Pollution Control District is in non-attainment with the CAAQS for ozone and PM10, and with the NAAQS for ozone, but only in the eastern portion of the County, far from the project location (Table IV-I1).

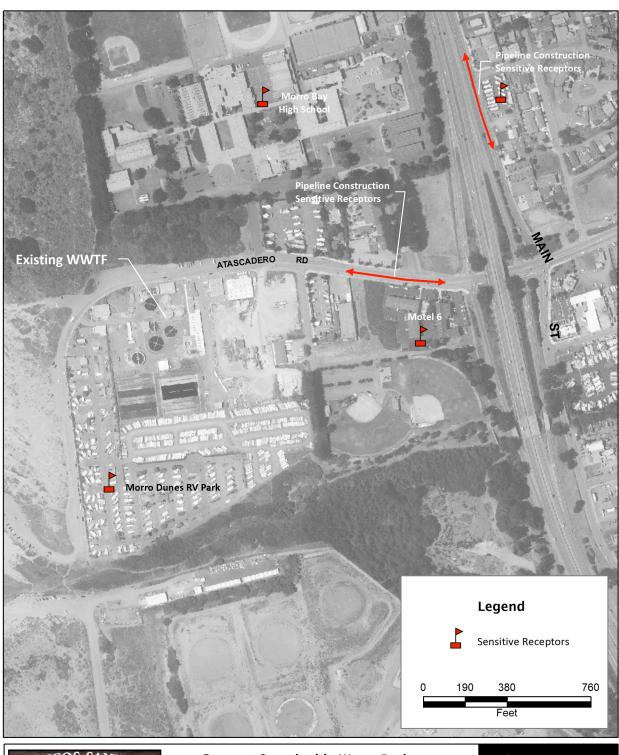
### **SENSITIVE RECEPTORS**

Sensitive receptors are people that have an increased sensitivity to air pollution or environmental contaminants. Sensitive receptor locations include schools, parks and playgrounds, day care centers, nursing homes, hospitals, and residential dwelling units (SLOAPCD 2012).

As discussed in the Project Description, the WRRF for the Proposed Project is located on Toro Creek Road about 2 miles east of Highway 1 and about mid-way between the City of Morro Bay and the community of Cayucos. The WRRF site consists of two parcels totaling about 221 acres located in a narrow valley framed by the rolling foothills of the Santa Lucia Range to the east. The area is rural and consists of ranches and farming operations on parcels ranging in size from 50 acres to over 150 acres. The nearest sensitive receptors to the WRRF for the Proposed Project are dwellings on large ranch parcels. As shown on Map IV-I2, the nearest sensitive receptors are about 3,300 feet from the WRRF site.

The WRRF location for the Alternative Site consists of about 215 acres located on the north and south sides of Montecito Road and east of Old Creek Road along Willow Creek, about 1.2 miles east of the community of Cayucos. The nearest sensitive receptors to the WRRF location for the Alternative Site are dwellings on large ranch parcels. The nearest sensitive receptors are about 2,300 feet from the Alternative WRRF site.

In addition, residences in Morro Bay and the Morro Bay High School are located immediately adjacent to the proposed new pipeline to the effluent outfall for the Proposed Project and Alternative Site. Residences in Cayucos are located immediately adjacent to the new RW pipeline to CSA-10 as shown on Map IV-I1.

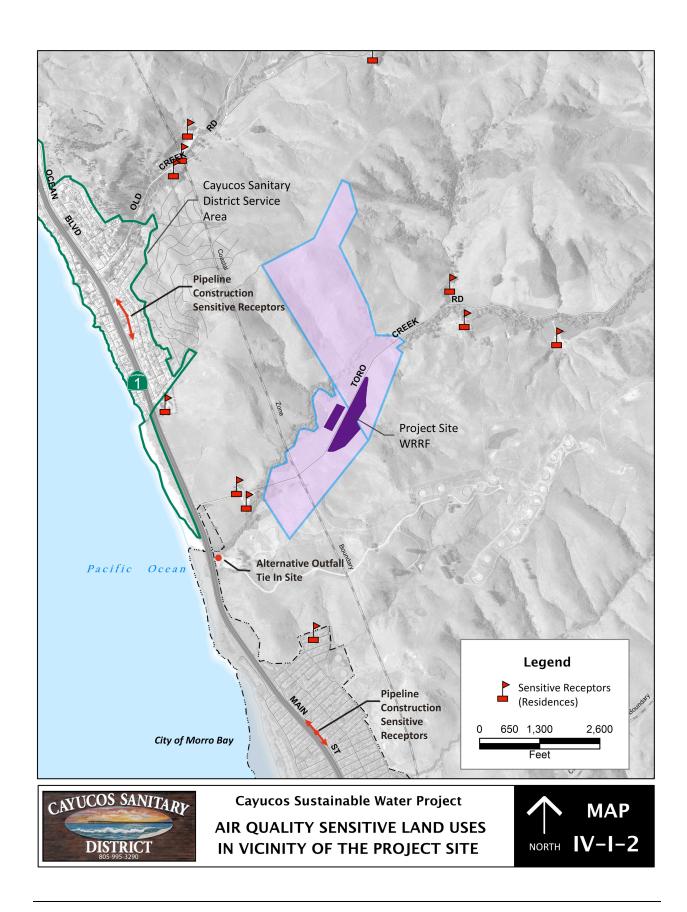




Cayucos Sustainable Water Project

AIR POLLUTION SENSITIVE
LAND USES NEAR THE EXISTING OUTFALL





# 5. Standards of Significance

According to the CEQA Guidelines' Appendix G Environmental Checklist, to determine whether air quality and greenhouse gas impacts are significant, the following questions are analyzed and evaluated. Would the Proposed Project:

- 1. Conflict with or obstruct implementation of the applicable air quality plan?
- 2. Violate any air quality standard of contribute substantially to an existing or project air quality violation?
- 3. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment or under an applicable federal or state ambient air quality standard including releasing emissions which exceed quantitative thresholds for ozone precursors?
- 4. Expose sensitive receptors to substantial pollution concentrations?
- 5. Create objectionable odors affecting a substantial number of people?
- 6. Create greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?
- 7. Conflict with an applicable plan, policy or regulation adopted for the purposes of reducing the emissions of greenhouse gases?

# 6. Impacts and Mitigation Measures

### Criteria Pollutants

#### PROPOSED PROJECT CONSTRUCTION IMPACTS

Construction emissions from the Proposed Project were calculated using CalEEMod 2016.3.1 (CalEEMod output files are provided in the EIR Technical Appendix). Construction emissions for the Proposed Project would be generated from site preparation and grading of the new 8 acre WRRF (including for the new solar array) and trenching for approximately 1.62 acres of disturbance associated with installation of a new influent pipeline from LF5 to the WRRF, new effluent pipeline to the effluent outfall, and the new RW pipeline from the WRRF to CSA-10. The 1.62 acres of disturbance would include modifications to LF5 and installation of the new effluent pump station as well.

Grading volumes would be balanced onsite for approximately 17,857 cy of cut and 17,857 cy of fill (12,000 cy for the WRRF and 7,857 cy for the trenching). Graded areas would be watered three times a day and the maximum speed in unpaved areas would be kept to 15 mph per the CalEEMod default assumptions.

Approximately 78 tons of vegetation waste are estimated to be disposed of during site preparation activities. No demolition activities would take place during construction activities, although 300 feet of existing plastic pipe from LF5 to the outfall, would need to be replaced.

Following grading and trenching, approximately 5.07 acres of new paving would be installed at the WRRF followed by facility construction and architectural coatings. Approximately 23,095 sf of structures would be constructed for the Proposed Project. Overall, construction is estimated to take 18 months to complete. Operation of the project is planned to begin in 2018.

CalEEMod default equipment and specifications were used to calculate construction emissions, with the exception of the addition of a boring/drill rig required for pipeline installation under existing road crossings. It is assumed that the boring/drill rig equipment would be required for approximately 5 days total. Tier 3 diesel particulate filters will be used on excavators, graders, dozers, and tractors/loaders/backhoes.

Workers and vendors are expected to travel to and from San Luis Obispo, approximately 13 miles one way to the project site. Construction debris would be recycled to the extent practicable or disposed of at the Paso Robles Landfill approximately 38 miles one way from the project site.

Construction emissions calculations for the Proposed Project are shown in Table IV-I2 below.

Table IV-I2. Construction Criteria Pollutant Emissions from the Proposed Project

Criteria Pollutant	SLOAPCD Thresholds <sup>1</sup>			Daily Project	Quarterly Project
	Daily	Quarterly	Quarterly	Emissions	Emissions
		Tier 1	Tier 2	(pounds per day) <sup>2</sup>	(tons per quarter) <sup>2</sup>
ROG + NOx	137 pounds	2.5 tons	6.3 tons		
				85.53	1.37
Diesel Particulate Matter (Exhaust	7 pounds	0.13 tons	0.32 tons		
PM10 + Exhaust PM2.5)				5.56	0.08
Fugitive Dust Particulate Matter	-	2.5 tons	-		
(Fugitive PM10)				7.27	0.04

#### Notes:

2Emissions were calculated using CalEEMod 2016.3.1. Worst-case Winter daily and quarterly emissions are shown.

**Impact AQ-1** Construction emissions are below the SLOAPCD significance thresholds. Therefore, construction of the Proposed Project would be consistent with the Clean Air Plan. However, fugitive dust from construction has the potential to result in a violation of SLOAPCD Rule 401 (Visibility) and/or Rule 402 (Nuisance) without mitigation. Impacts would be significant but reduced to less than significant levels with implementation of mitigation measures (Class II).

<sup>1</sup>Thresholds are from the SLOAPCD 2012 CEQA Handbook

**Mitigation Measure AQ-1:** The following standard SLOAPCD dust control measures shall be implemented:

- a. The amount of the disturbed area shall be minimized;
- b. Water trucks or sprinkler systems shall be used in sufficient quantities to prevent airborne dust from leaving the site and from exceeding the APCD's limit of 20% opacity for greater than 3 minutes in any 60-minute period. Increased watering frequency shall be required whenever wind speeds exceed 15 mph. Reclaimed (non-potable) water or an APCD-approved dust suppressant should be used whenever possible;
- c. All dirt stock pile areas shall be sprayed daily and covered with tarps or other dust barriers as needed:
- d. Exposed ground areas that are planned to be reworked at dates greater than one month after initial grading shall be sown with a fast germinating, non-invasive, grass seed and watered until vegetation is established;
- e. All disturbed soil areas not subject to revegetation shall be stabilized using approved chemical soil binders, jute netting, or other methods approved in advance by the APCD:
- f. All roadways, driveways, sidewalks, etc. to be paved shall be completed as soon as possible. In addition, building pads shall be laid as soon as possible after grading unless seeding or soil binders are used;
- g. Vehicle speed for all construction vehicles shall not exceed 15 mph on any unpaved surface at the construction site:
- h. All trucks hauling dirt, sand, soil, or other loose materials shall be covered or shall maintain at least two feet of freeboard (minimum vertical distance between top of load and top of trailer) in accordance with CVC Section 23114;
- i. Wheel washers and/or rumble strips shall be installed where vehicles enter and exit unpaved roads onto streets; and
- j. The contractor or builder shall designate a person or persons to monitor the fugitive dust emissions and enhance the implementation of the measures as necessary to minimize dust complaints, reduce visible emissions below the APCD's limit of 20% opacity for greater than 3 minutes in any 60-minute period. The name and telephone number of such persons shall be provided to the APCD Engineering & Compliance Division prior to the start of any grading, earthwork or demolition.

### **OPERATIONAL IMPACTS**

A process flow diagram for the proposed WRRF is included in The EIR Technical Appendix. All stationary equipment associated with LF5, the effluent pump station, and the WRRF, including the potable water pump at the WRRF, would operate on electricity. Two standby generators at 850 horsepower (hp) and 1 hp that would each operate no more than 20 hours per year under non-emergency conditions.

Sewage sludge would not be incinerated onsite, but would be dried inside of a building, and then immediately disposed of offsite. The wastewater treatment processes at the WRRF would not involve anaerobic processes. The use of boilers or flares is not proposed.

Other sources of criteria pollutant emissions associated with the Proposed Project include area sources, such as architectural coatings. Small volumes of a few solvents would be utilized in the laboratory. The laboratory would have a fume hood with a fume hood scrubber.

A maximum of six employees would be stationed at the WRRF. A total of three truck trips per week would be required during operation of the facility, including: one trip for sludge disposal, one trip for materials deliveries, and one trip for disposal of waste from the advanced treatment filters.

Approximately 18,200 tons of biosolids would be disposed of per year from the WRRF (approximately 10 cy per week at 35 tons per cy).

Operational emissions were calculated in CalEEMod using the General Light Industry land use category, and are presented in Table IV-I3.

Table IV-I3. Operational Criteria Pollutant Emissions from the Proposed Project

Criteria Pollutant	SLOAPCD Thresholds <sup>1</sup>		Daily Project Emissions (pounds per day) <sup>2</sup>	Annual Project Emissions (tons per year) <sup>2</sup>
	Daily	Annual		
ROG + NOx	25 pounds	25 tons	4.05	0.67
Diesel Particulate Matter (Exhaust PM10 + Exhaust PM2.5)	1.25 pounds	ı	0.08	0.02
Fugitive Dust Particulate Matter (Fugitive PM10)	25 pounds	25 tons	1.51	0.20
Carbon Monoxide (CO)	550 pounds	-	7.4	1.0

Notes:

Operational emissions of criteria pollutants for operation of the new wastewater treatment facility under full capacity would be below the SLOAPCD significance thresholds. In addition, wastewater from the Cayucos community is currently treated at the Morro Bay Wastewater Treatment Plant (WWTP) where digester boilers are used and permitted by the SLOAPCD. Therefore, operational emissions to treat current wastewater volumes from the Cayucos community at the Morro Bay WWTP are currently likely higher than operational emissions that would be generated from the new facility. Finally, an ATC and PTO must be issued for the Proposed Project which would help ensure that emissions are below SLOAPCD thresholds. Therefore, operation of the Proposed Project would be consistent with the Clean Air Plan and would not result in a violation of air quality standards. Impacts would be less than significant (Class III).

### **CUMULATIVE IMPACT ANALYSIS**

Construction activities would be temporary but could have a localized adverse impact on sensitive receptors along certain public streets, especially if construction activities overlap. The foreseeable future projects list presented in Section III shows future construction of a range of small projects spread around the community of Cayucos as possibly concurrent with the construction of the CSWP pipeline work in public streets.

Table IV-I4 below compares the size of the future projects with the SLOAPCD's screening criteria for projects having the potential to trigger significance thresholds for ozone precursors, and therefore, warrant an air quality impact analysis. Projects that are under

<sup>1</sup>Thresholds are from the SLOAPCD 2012 CEQA Handbook

 $<sup>{\</sup>tt 2Emissions\ were\ calculated\ using\ CalEEMod\ 2016.3.1.}$ 

these thresholds are not required to prepare an air quality impact analysis as their construction and operational emissions are expected to be well under significance thresholds.

Table IV-I4. Foreseeable Future Projects and Triggers for Significant Air Quality Impacts

Project Type	Description	Size of Project Expected to Trigger Significance Thresholds for Ozone Precursors <sup>1</sup>
Single family residences	83 new units	91 new units
Multi-family residence	20 new units	135 new units (using Condo/Townhouse General category)
Commercial building	New 4,895 sf building	16,000 sf (Bank) <sup>2</sup>
Office building	New 3,960 sf building	104,000 sf (General Office Building)
Motel	New motel, 17 beds	150 rooms
Morro Bay to Cayucos Connector Recreational Trail	One mile recreational trail from Morro Bay to Cayucos	No threshold for projects only involving construction emissions

## Notes:

- 1. From SLOAPCD's Screening Criteria for Project Air Quality Impact Analysis
- 2. The most conservative commercial use was used.

According to Table IV-I4, the foreseeable future projects near the Proposed Project aggregated together would be well below the size expected to have significant air quality impacts associated with construction or operation. In addition, because construction of the Proposed Project would also result in emissions well below significance thresholds and Mitigation Measure AQ-1 would be implemented, the Proposed Project would not have a significant contribution to cumulative air quality impacts in the area (Class III).

In addition, development associated with the short-term cumulative projects list presented in Table IV-I4 does not involve any rezones or General Plan Amendments. Therefore, area source and stationary source emissions from these projects were already contemplated in, and consistent with, the Clean Air Plan.

Based upon the physical existing setting, operational emissions under the Proposed Project or Alternative Site would likely be lower than the existing baseline for operation of the Morro Bay WWTF, where wastewater from the Cayucos community is treated at the Morro Bay WWTP where digester boilers are used. Therefore, initially, the Proposed Project and Alternatives would have a net benefit on cumulative air quality impacts in the region. Over the long term, operational emissions of criteria pollutants would only be from two standby generators operated less than 20 hours per year, trips from 6 employees, and 3 truck trips per week. Therefore, the Proposed Project and Alternatives would have a negligible contribution to cumulative operational air quality impacts (Class III).

**Impact AQ-2** Foreseeable future projects near the Proposed Project aggregated together would be well below the size expected to have significant air quality impacts associated with construction or operation. Because construction of the Proposed Project would also result in emissions well below significance thresholds, and Mitigation Measure AQ-1 would be implemented, the Proposed Project would not have a significant contribution to cumulative air quality impacts in the area (Class III).

#### **Toxic Air Contaminants**

#### PROPOSED PROJECT - NATURALLY OCCURRING ASBESTOS

The proposed WRRF and new pipeline locations are located in areas where naturally occurring asbestos (NOA) may occur. NOA is associated with serpentine rock. An Engineering Geologic Hazards Evaluation was prepared for the Proposed Project by Geoinsite (2016), where a geologic explorations were conducted at the location of the WRRF. Bedrock was not encountered during this investigation; therefore, EIR section IV-A concluded that there is a very low potential to expose NOA at the location of the WRRF.

However Section IV-A concluded that it is possible that construction of the new pipelines associated with the Proposed Project could disturb rock formations containing NOA. Impacts would be significant without mitigation. Therefore, Mitigation Measure AQ-2 is required to ensure compliance with SLOAPCD and CARB regulations and to ensure that impacts are reduced to less than significant levels (Class II).

**Impact AQ-3**: construction of the new pipelines associated with the Proposed Project could disturb rock formations containing NOA. Impacts would be significant without mitigation (Class II).

**Mitigation Measure AQ-2:** Prior to starting any ground-disturbing construction activities for the new influent, effluent, or RW pipelines to CSA-10, the applicant shall conduct a geologic evaluation for NOA along the pipeline routes following the *Guidelines for Geologic Investigations of Naturally Occurring Asbestos in California* (California Geologic Survey [CGS] Special Publication 124, 2002) to determine whether the construction of the pipelines has the potential to disturb NOA, and if so, how many acres. If no NOA is expected to be disturbed, the applicant shall submit a request for an exemption from CARB's Asbestos ATCM, along with the geologic evaluation report. If NOA is expected to be disturbed, the SLOAPCD must be notified and preparation and approval of an Asbestos Dust Mitigation Plan and Asbestos Health and Safety Program may be required.

#### **DIESEL PARTICULATE MATTER**

Diesel particulate matter has been identified as a toxic air contaminant. Although diesel particulate matter emissions are below SLOAPCD thresholds, the proximity of sensitive receptors to a construction site constitutes a special condition whereby potential public health risk must be minimized. Due to the proximity of Morro Bay High School and several residences to the installation routes for new pipelines, idling of construction equipment could pose a significant health risk to these sensitive receptors due to diesel particulate matter emissions. Therefore, implementation of idling restrictions listed in Mitigation Measure AQ-3 is required to ensure that impacts would remain at less than significant levels.

**Impact AQ-4:** Due to the proximity of Morro Bay High School and several residences to the installation routes for new pipelines, idling of construction equipment could pose a significant health risk to these sensitive receptors due to diesel particulate matter emissions (Class II).

**Mitigation Measure AQ-3:** The applicant shall implement the following idling control techniques:

# California Diesel Idling Regulations

- a. On-road diesel vehicles shall comply with Section 2485 of Title 13 of the California Code of Regulations. This regulation limits idling from diesel-fueled commercial motor vehicles with gross vehicular weight ratings of more than 10,000 pounds and licensed for operation on highways. It applies to California and non-California based vehicles. In general, the regulation specifies that drivers of said vehicles:
  - Shall not idle the vehicle's primary diesel engine for greater than 5 minutes at any location, except as noted in Subsection (d) of the regulation; and
  - Shall not operate a diesel-fueled auxiliary power system (APS) to power a heater, air conditioner, or any ancillary equipment on that vehicle during sleeping or resting in a sleeper berth for greater than 5.0 minutes at any location when within 1,000 feet of a restricted area, except as noted in Subsection (d) of the regulation.
- b. Off-road diesel equipment shall comply with the 5-minute idling restriction identified in Section 2449(d)(2) of the California Air Resources Board's In-Use Off-Road Diesel regulation.
- c. Signs must be posted in the designated queuing areas and job sites to remind drivers and operators of the state's 5-minute idling limit.

<u>Diesel Idling Restrictions Near Sensitive Receptors (i.e., Morro Bay High School and Residential Dwellings along the Pipeline Routes)</u>

In addition to the State required diesel idling requirements, the project applicant shall comply with these more restrictive requirements to minimize impacts to nearby sensitive receptors:

- a. Staging and queuing areas shall not be located within 1,000 feet of sensitive receptors;
- b. Diesel idling within 1,000 feet of sensitive receptors shall not be permitted;
- c. Use of alternative fueled equipment is recommended; and
- d. Signs that specify the no idling areas must be posted and enforced at the site.

#### TOXIC AIR CONTAMINANTS CUMULATIVE IMPACT ANALYSIS

Construction of the reasonably foreseeable future projects in Table IV-I4 could occur simultaneously with the Proposed Project, thereby exacerbating the potential for diesel particulate matter and NOA emissions. However, each project would be required to comply with SLOAPCD regulations which would ensure that construction diesel particulate matter emissions and NOA emissions would be negligible (NOA) or reduced significantly (diesel

particulate matter). Therefore, the Proposed Project would have a less than considerable contribution to short-term cumulative impacts associated with toxic air contaminants emissions.

## **Odors**

## PROPOSED PROJECT

Wastewater treatment processes at the WRRF could generate objectionable odors. Therefore, the facility would have an odor control system that would be enclosed in a building that would collect and treat foul air from the treatment process. Nevertheless, because the nearest sensitive receptors occur less than one mile from the WRRF (a few residences at approximately 3,300 feet from the WRRF), potential odor nuisance impacts on nearby residents would be potentially significant without mitigation. However, implementation of Mitigation Measure AQ-5 would ensure that impacts are reduced to less than significant levels (Class II).

**Impact AQ-5:** Potential odor nuisance impacts on nearby residents would be potentially significant without mitigation. However, implementation of mitigation would ensure that impacts are reduced to less than significant levels (Class II).

**Mitigation Measure AQ-4:** Prior to receipt of the Authority to Construct (ATC) from the SLOAPCD for the project, the applicant must submit an Odor Monitoring and Complaint Response Plan for review and approval by the SLOAPCD.

#### **CUMULATIVE IMPACT ANALYSIS**

There are no other sources of odor in the project area. Therefore, there would be no cumulative impacts associated with nuisance odor emissions.

#### **Greenhouse Gases**

# PROPOSED PROJECT

Under the Proposed Project, GHG emissions would occur from the following:

- Construction activities, amortized over 25 years in accordance with the SLOAPCD's CEQA Air Quality Handbook (SLOAPCD 2012);
- Electricity demand for the new structures and stationary equipment;
- GHG emissions from operation of the 850 hp and 1 hp standby generators;
- N2O emissions at the effluent outfall from the wastewater treatment processes;
- Architectural coatings, landscaping equipment, and use of consumer products at the WRRF:
- Digestion of biosolids after disposal from the facility;
- · Vegetation removal; and
- Motor vehicle trips associated with operation of the facility.

Electricity demand from the stationary equipment for the facility, including all engines for the wastewater treatment processes, pumps at LF5 and the effluent pump station, and the potable water pump, would be 1,560,067 kilowatt-hours per year (kWh/yr). Electricity demand would be offset by electricity generated by the proposed onsite solar array that would have an output of 0.825 kWh, or 7,227 kWh/yr.

No anaerobic digestion nor incineration of bio-solids would occur under the Proposed Project. Therefore, under a worst-case scenario, anaerobic digestion of all bio-solids within a landfill was assumed in CalEEMod to calculate GHG emissions associated with this part of the process. Approximately 18,200 tons of dry bio-solids would be disposed of per year from the facility.

 $N_2O$  emissions from the effluent outfall were calculated using the equation and default values provided in the CalEEMod User's Guide (CAPCOA 2016).

N2O emissions were then converted to CO2e using the global warming potential of 298 for N2O.

The proposed wastewater treatment processes would not involve anaerobic processes. The equalization basin will be aerated, and aerobic digestion would be utilized to process biosolids within a building. Therefore, methane emissions were assumed to be negligible from the wastewater facility.

Finally, removal of a total of 9.62 acres of cropland was assumed, but would be offset by the planting of approximately 70 trees at the new WRRF. Use of reclaimed water outdoors and use of low flow faucets and toilets for the facility were assumed to further reduce GHG emissions as well.

GHG emissions from the Proposed Project are shown in Table IV-15.

<sup>1</sup> Specifically, the following equation was used to calculate N2O emissions from the effluent outfall:

 $N_2O$  emissions (metric tons [MT]/yr) = Wastewater x  $10^{-6}$  x N Load x 44/28 x EF effluent x  $10^{-3}$ 

Where:

Wastewater = volume of wastewater (in liters [L]/yr) (0.4 MGD for a total of 552,669,860 L/yr was used)

10<sup>-6</sup> = conversion factor (kilograms [kg]/milligram [mg])

N Load = mass of nitrogen discharged per volume of wastewater (CalEEMod's default value of 26 mg/L was used which represents a Statewide average)

44/28 = ratio of molecular weights for N₂O and nitrogen (N2)

EF effluent = N₂O effluent emission factor (CalEEMod's default value of 0.005 kg N2O/kg N was used)

 $10^{-3}$  = conversion factor (MT/kg)

Table IV I5. Greenhouse Gas Emissions from the Proposed Project

Project Activity <sup>1</sup>	SLOAPCD Threshold	GHG Emissions
1 Toject Activity	OLOAI OD TIIIESIIOIU	
		(MT CO2e/yr)
Construction <sup>2</sup>		15.57
Operation		
Area		0.0010
Energy		486.3
Mobile		222.22
Stationary		6.5
Waste <sup>3</sup>		894.4
Water <sup>4</sup>		0
Effluent Outfall <sup>5</sup>		33.67
Total	10,000 MT CO2e/yr	1,698.7

#### Notes:

**Impact AQ-6**: GHG emissions from the Proposed Project would be below the SLOAPCD threshold. Therefore, the project would not result in GHG emissions that would have a significant effect on the environment nor conflict with the SLOAPCD, SLOCOG, and County's GHG emissions reduction targets in compliance with AB 32, or SB 32, no mitigation is required (Class III).

# **BENEFICIAL EFFECTS**

**Impact AQ-7:** The Proposed Project would involve the generation of reclaimed water, and potential potable water in the future, which would further reduce energy demand in the region through water conservation. Operation of the Proposed Project would also not involve the use of digester boilers that are currently used to treat wastewater from the Cayucos community at the Morro Bay WWTP. Therefore, these benefits would further offset GHG emissions generated by the Proposed Project.

#### **CUMULATIVE IMPACT ANALYSIS**

GHG emissions associated with the future foreseeable projects listed in Table IV-I4 are expected to be well below their respective SLOAPCD GHG thresholds for significant impacts, and GHG emissions from the Proposed Project are an order of magnitude below the threshold. In addition, the Proposed Project would involve the generation of reclaimed water, and potential potable water in the future, which would further reduce energy demand in the region through water conservation. Operation of the Proposed Project would also not involve the use of digester boilers that are currently used to treat wastewater from the Cayucos community at the Morro Bay WWTP. Therefore, these benefits would further offset GHG emissions generated by the Proposed Project. As a result, the Proposed Project would have a less than considerable contribution to cumulative impacts associated with GHG emissions.

<sup>1</sup>CalEEMod's "mitigated" emissions were used.

<sup>2</sup>Construction GHG emissions of 302.11 MT CO2e/yr were amortized over 25 years per SLOAPCD's CEQA Air Quality Handbook (SLOAPCD 2012).

<sup>3</sup>GHG emissions associated with landfill disposal of biosolids.

<sup>4</sup>Emissions captured under Energy (electricity demand) as potable water is generated onsite.

<sup>5</sup>N2O emissions at the effluent outfall were calculated by hand, not in CalEEMod, but using the equation and values from CalEEMod.

# 7. List of Abbreviated Terms

Abbreviation	Term	
μg/m <sup>3</sup>	micrograms per cubic meter	
AB	Assembly Bill	
amsl	above mean sea level	
ATC	Authority to Construct	
ATCM	Air Toxics Control Measure	
CAAQS	California Ambient Air Quality Standards	
CalEEMod	California Emissions Estimator Model	
CAP	Clean Air Plan	
CAPCOA	California Air Pollution Control Officers	
CARB	California Air Resources Board	
CEC	California Energy Commission	
CEQA	California Environmental Quality Act	
CFR	Code of Federal Regulations	
CGS	California Geologic Survey	
CO	carbon monoxide	
CO2	Carbon dioxide	
CO2e	CO2 equivalents	
CVC	California Vehicle Code	
су	cubic yards	
DPM	diesel particulate matter	
EF	Effluent factor	
GHG	greenhouse gas	
hp	horsepower	
kg	kilogram	
kWh/yr	kilowatt-hour per year	
LF5	Lift Station 5	
mg	milligrams	
MT	metric tons	
N	nitrogen	
NAAQS	National Ambient Air Quality Standards	
N Load	mass of nitrogen discharged per volume of wastewater	
N2O	nitrous oxide	
NO2	nitrogen dioxide	
NOA	naturally occurring asbestos	
NOx	oxides of nitrogen	
O3	ozone	
PM2.5	Fine diameter particulate matter less than 2.5 microns or less in diameter	
PM10	Respirable particulate matter less than 10 microns in diameter	

ppm	parts per million		
PTO	Permit to Operate		
ROGs	reactive organic gases		
RTP/SCS	Regional Transportation Plan/Sustainable Communities Strategy		
SB	Senate Bill		
sf	square feet		
SIP	State Implementation Plan		
SLO	San Luis Obispo		
SLOAPCD	San Luis Obispo County Air Pollution Control District		
SLOCOG	San Luis Obispo Council of Governments		
SO2	sulfur dioxide		
SR	State Route		
TACs	toxic air contaminants		
US	United States		
U.S. EPA	United States Environmental Protection Agency		
WWTP	wastewater treatment plant		

# 8. References

California Air Pollution Control Officers Association (CAPCOA), California Emissions Estimator Model (CalEEMod) User's Guide, Version 2016.3.1, 2016.

California Air Resources Board (CARB), First Update to the Climate Change Scoping Plan, Building on the Framework Pursuant to AB 32 The California Global Warming Solutions Act of 2006, 2014.

County of San Luis Obispo, EnergyWise Plan, Department of Planning and Building, 2011.

California Geologic Survey (CGS), Guidelines for Geologic Investigations of Naturally Occurring Asbestos in California, Special Publication 124, 2002.

Geoinsite, Engineering Geologic Hazards Evaluation for Environmental Impact Report, Cayucos Sustainable Water Project, San Luis Obispo County, CA, October 2016.

San Luis Obispo County Air Pollution Control District (SLOAPCD), CEQA Air Quality Handbook, 2012

SLOAPCD, 2001 Clean Air Plan, 2001

SLOAPCD, 2015 Annual Air Quality Report, 2015.

SLOAPCD, 2012 Emissions Inventory. http://www.slocleanair.org/library/emissions-inventory.php

#### J. HAZARDS AND HAZARDOUS MATERIALS

#### 1. **Environmental Issue**

This section considers project impacts relating to wildfires, the use, storage, transportation and potential release of hazardous materials, disease vectors, and hazards relating to the use of environmentally persistent chemicals and pesticides.

As defined in Chapter 6.95 of Division 20 of the California Health and Safety Code, Section 25501(k), a hazardous material is "...any material that, because of its quantity, concentration, or physical or chemical characteristics, poses a significant present or potential hazard to human health and safety or to the environment if released into the workplace or the environment. Hazardous materials include, but are not limited to, hazardous substances, hazardous waste, and any material which a handler or the administering agency has a reasonable basis for believing that it would be injurious to the health and safety of persons or harmful to the environment if released into the workplace or the environment "

Hazards associated with flooding are discussed in Section IV-D and traffic hazards are discussed in Section IV-G.

#### **Sources Used In This Analysis** 2.

This analysis is based on a review of applicable law, local planning documents, and publications including:

- San Luis Obispo County Emergency Operations Plan (SLO OEM 2005).
- San Luis Obispo County Fire Management Plan (SLO Fire 2009).
- San Luis Obispo County Local Hazard Mitigation Plan (SLO OEM 2011).
- Information on disease provided by the Centers for Disease Control and Prevention (CDC).
- San Luis Obispo General Plan Safety Element
- Interview with Tony Gomes and Mike Salas, Fire Marshal, Cal Fire

A complete list of references is provided at the end of this section.

#### 3. **Scoping Issues for Hazards and Hazardous Materials**

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. No issues were raised during the scoping process.

#### 4. **Environmental and Regulatory Setting**

# Regulatory Setting

Federal, state and local regulations pertaining hazards and hazardous materials are discussed below.

#### **FEDERAL REGULATIONS**

# **National Weather Service (NWS)**

Under extreme fire weather conditions, the NWS issues Red Flag Warnings for all affected areas. A Red Flag Warning means that any ignition could result in a large-scale damaging wildfire. Red Flag Warning criteria include dry fuels plus any one of the following: (1) relative humidity 15 percent or less with sustained winds of 25 mph or greater or frequent gusts of 35 mph or greater (for a duration of 6 hours or more), (2) relative humidity 10 percent or less with sustained winds 15 mph or greater or frequent gusts 25 mph or greater (for a duration of 6 hours or more, (3) widespread and/or significant dry lightning, (4) other unusual but significant meteorological and/or fuel conditions. The average number of days for which the San Luis Obispo Interior Valleys zone has been under a Red Flag Warning is two days per year, with a minimum of zero days and a maximum of six days over a six-year period (National Weather Service 2010).

# Occupational Safety and Health Administration (OSHA)

The national OSHA's mission is to ensure the safety and health of America's workers by setting and enforcing standards, providing training, outreach, and education, establishing partnerships, and encouraging continual improvement in workplace safety and health. The OSHA staff establishes and enforces protective standards and reaches out to employers and employees through technical assistance and consultation programs. OSHA standards are listed in Title 29 CFR Part 1910.

# U.S. Environmental Protection Agency (EPA)

The U.S. Environmental Protection Agency, Region IX, has developed Risk-Based Screening Levels (RBSLs) for toxic compounds in soil. The RBSLs are health risk standards that have been developed for a wide range of toxic compounds, including volatile organic compounds, metals, semi-volatile organic compounds, and pesticides. Achieving RSBLs is typically accomplished by following the remediation recommendations of a Soil Sampling and Analysis Plan to determine the presence and extent of any residual herbicides, pesticides, and fumigants.

#### **Hazardous Material Transportation**

While the EPA regulates overall use and cleanup of hazardous materials, the U.S. Department of Transportation (DOT) is the federal administering agency responsible for hazardous materials transportation regulations. The DOT Office of Hazardous Materials Safety oversees a national safety program to minimize the risks related to commercial transportation of hazardous materials. The federal hazardous materials transportation law is the basic statute regulating hazardous materials transportation in the U.S. Federal hazardous materials transportation regulations are contained in 49 CFR Parts 171-180. In California, the California Department of Transportation (Caltrans) is the implementing agency for DOT laws and regulations.

#### **STATE REGULATIONS**

# **Fire Hazard Severity**

California has enacted statewide laws aimed at reducing wildfire hazards in wildland-urban interface areas. These regulations cover topics such as fire prevention, vegetation management, notification and penalties, fire hazard severity zones, defensible space, setbacks, and exemptions. For the complete text of the Fire Hazard Zoning Field Guide, the reader is referred to the Office of the State Fire Marshal's fire safety planning website (http://osfm.fire.ca.gov/zoning.html).

# California Public Resources Code/Vegetation Management Program

CalFire has a fuel reduction program called the Vegetation Management Program. Limited funding is available to conduct fuel management activities primarily by burning on parcels or aggregates of parcels of 100 acres or more. The objective of the Vegetation Management Program is to prevent high-intensity wildfire through fuel modification. If brush can be kept at the medium fuel load level, then the intensity of fire can be reduced substantially.

#### **Hazardous Materials**

In California, the EPA has granted most enforcement authority over federal hazardous materials regulations to the California Environmental Protection Agency (Cal/EPA). The mission of Cal/EPA is to restore, protect, and enhance the environment to ensure public health, environmental quality, and economic vitality. Under the authority of Cal/EPA, the Department of Toxic Substances Control (DTSC) and the San Francisco Bay Regional Water Quality Control Board (RWQCB) are responsible for overseeing the cleanup of contaminated soil and groundwater sites in the plan area. RWQCB regulations applicable to hazardous materials are contained in Title 27 of the California Code of Regulations (CCR). Additional state regulations applicable to hazardous materials are contained in CCR Title 22. CCR Title 26 is a compilation of those sections or titles of the CCR that are applicable to hazardous materials.

# **Hazardous Materials Business Plan (HMBP)**

The California Hazardous Materials Release Response Plans and Inventory Law (Business Plan Act) requires preparation of hazardous materials business plans and disclosure of hazardous materials inventories. A business plan includes an inventory of hazardous materials handled, facility floor plans showing where hazardous materials are stored, an emergency response plan, and provisions for employee training in safety and emergency response procedures (California Health and Safety Code, Division 20, Chapter 6.95, Article 1). Statewide, the DTSC has primary regulatory responsibility for management of hazardous materials, with delegation of authority to local jurisdictions that enter into agreements with the State.

Cal-EPA certified local agencies to implement and regulate the state environmental programs within the local agency's jurisdictions, called the Certified Unified Program Agency (CUPA). San Luis Obispo County is a CUPA and has a Hazardous Materials Business Plan Program Eligibility Flowchart used to identify whether a plan is required. The threshold for submitting a hazardous materials business plan is storing, using, or handling hazardous materials at any one time during a calendar year in quantities equal to or greater than 55 gallons of a liquid, 500 pounds of a solid, or 200 cubic feet of a compressed gas at standard temperature and pressure.

# California Accidental Release Prevention Program

Under the California Accidental Release Prevention Program, facilities that handle more than a threshold quantity of a regulated hazardous substance (listed in Tables 1-3, 19 CCR 2770.5), such as federally listed extremely hazardous toxic and flammable substances and state listed acutely hazardous materials, must prepare a risk management plan. The plan must analyze the potential for an accidental release and provide measures that can be implemented to reduce this potential. Facilities that are required to prepare a risk management plan must obtain and keep current a CalARP Program Facility Permit.

# **Worker Health and Safety**

The California Department of Industrial Relations, Division of Occupational Safety and Health, enforces State worker health and safety regulations related to construction activities. Regulations include exposure limits, protective clothing, and training requirements to prevent exposure to hazardous materials. Division of Occupational Safety and Health also enforces occupational health and safety regulations specific to lead and asbestos investigations and abatement, which equal or exceed their federal counterparts.

### **LOCAL REGULATIONS**

## 2009 San Luis Obispo County Fire Management Plan

The 2009 Fire Management Plan is a planning document of Cal Fire/San Luis Obispo County Fire Department that aims to increase the safety of residents and firefighters during wildland fires and to reduce the costs and losses associated with wildland fires. The document includes a risk assessment and an action plan for education, inspection, and fuel treatment.

# 2013 Community Wildfire Protection Plan

The Community Wildfire Protection Plan (CWPP) is an update of the 2009 Fire Management Plan. Accordingly, the CWPP is being developed to address fire protection planning efforts occurring in the County to minimize wildfire risk to communities, assets, firefighters, and the public. The CWPP process is intended to provide a forum for identifying values at risk from wildfire, which may include people, property, natural resources, cultural values, economic interests, and infrastructure. Development of the CWPP implements the goals and objectives of the California Fire Plan at the local level.

# **Defensible Space**

Public Resources Code 4291 & Government Code 51182 require a Defensible Space of 100 feet around a structure. The goal is to protect a structure, such as a residence or other occupied structure, while providing a safe area for firefighters. The law stipulates that a person who owns, leases, controls, operates, or maintains a building or structure in, upon, or adjoining a mountainous area, forest-covered lands, brush-covered lands, grass-covered lands, or land that is covered with flammable material, shall at all times maintain a defensible space no greater than 100 feet from each side of the structure, but not beyond the property line unless allowed by state law, local ordinance, or regulation. The amount of fuel modification necessary shall take into account the flammability of the structure as affected by building material, building standards, location, and type of vegetation. The County of San Luis Obispo adopted the 2013 California Fire Code with Municipal Code amendments to Section 8.04 Fire Control Regulations for implementing the 100-foot Defensible Space requirements. The Fire Code update for 2016 will come into effect January 1, 2017.

# San Luis Obispo County Emergency Operations Plan (EOP)

The EOP provides guidance, procedures, and County policies pertaining to emergency planning and response within the unincorporated County. It is not the intent of the EOP to supersede the response procedures or emergency response plans that have been prepared by other agencies, such as Cal Fire or city fire departments. Rather, the EOP provides support for the agencies that have the primary responsibility for responding to an emergency incident. The EOP is comprised of five emergency plans: 1) Earthquake Response Plan; 2) Hazardous Materials Emergency Response Plan; 3) Dam Failure Evacuation Plan; 4) Nuclear Power Plant Emergency Response Plan; and 5) Storm Emergency Plan.

# San Luis Obispo County Hazardous Waste Management Plan

The San Luis Obispo County Hazardous Materials Emergency Response Plan covers hazardous material emergencies associated with the transportation, storage, manufacture and processing, use, and disposal of hazardous materials, with the exception of nuclear emergencies occurring from operation of the Diablo Canyon Power Plant (see San Luis Obispo County/Cities Nuclear Power Emergency Response Plan, below). The plan defines the jurisdiction and responsibilities of local, state, and federal agencies in a hazardous waste emergency and the process for responding to a hazardous waste emergency.

# San Luis Obispo County Local Hazard Mitigation Plan (LHMP)

The Disaster Mitigation Act (DMA) of 2000, also commonly known as "The 2000 Stafford Act Amendments" (the Act), constitutes an effort by the Federal government to reduce the rising cost of disasters. The Act stresses the importance of mitigation planning and disaster preparedness prior to an event. Mitigation Planning Section 322 of the Act requires local governments to develop and submit mitigation plans in order to qualify for the Hazard Mitigation Grant Program (HMGP) project funds. It also increases the amount of HMGP funds available to states meeting the enhanced planning criteria, and enables these funds to be used for planning activities.

In July, 2011, San Luis Obispo County adopted an update to the county's Local Hazard Mitigation Plan (LHMP) consistent with the requirements of the Disaster Mitigation Act. The LHMP addresses risks associated with the following hazards:

- Earthquakes/Liquefaction
- Floods
- Landslides
- Tsunami and Seiche
- Wildfire
- Extreme Weather
- · Coastal Storm / Coastal Erosion
- Biological Agents
- · Pest Infestation and Disease.

# San Luis Obispo County General Plan and Land Use Ordinance

The Safety Element of the San Luis Obispo County General Plan has two main principles: to be ready for disaster, and to manage development to reduce risk. The Safety Element covers hazards related to flooding, geology, fire, hazardous materials, and other causes. All of the land in San Luis Obispo County outside an incorporated city and not owned by the federal or State governments is subject to the policies and programs of the Safety Element.

The Conservation and Open Space Element (COSE) (adopted in 2010) includes policies to address the risk posed by hazardous materials associated with energy generation, transportation, and storage. It requires that facilities associated with energy or fossil fuel activities be located, constructed, and operated in a manner that does not create a public hazard. The specific actions contained in the COSE include cleanup and restoration protocols for hydrocarbon spills, planning and permitting requirements for some types of energy and fossil fuel facilities, and siting standards for distribution and transmission infrastructure (including pipelines and electricity transmission lines). The COSE also contains policies to reduce the risk of wildfires and to reduce potential conflicts between fire protection needs and sensitive biological resources.

The Land Use Ordinance (LUO) (Title 22 of the County Code) contains standards and policies addressing the threat posed by hazards and hazardous materials. These items include reducing the risk posed by geologic hazards, detailing the standards for safe storage and transportation of hazardous materials, and minimizing land use conflicts that may result in hazardous situations.

# **Environmental Setting**

#### **EXISTING WASTEWATER TREATMENT FACILITY**

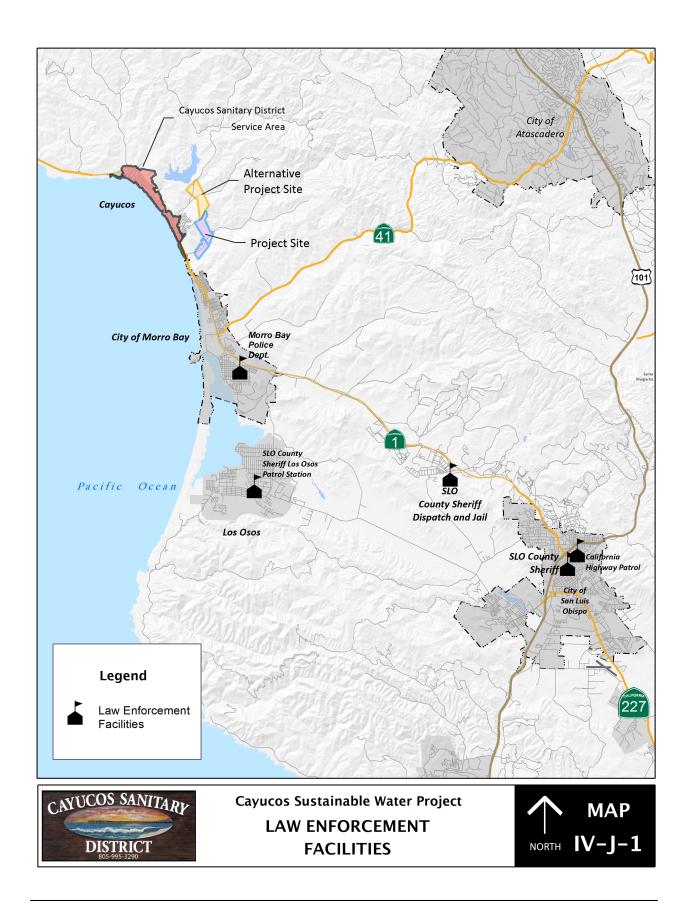
The existing WWTF serving the CSD is located in Morro Bay. The WWTF poses an existing public health and safety risk due to proximity to the ocean and the potential effect of rising ocean levels and storms that could compromise the facility. Operations of the existing facility also have similar risks and handling of hazardous materials as the Proposed Project. Therefore the baseline condition has inherent risks and hazards.

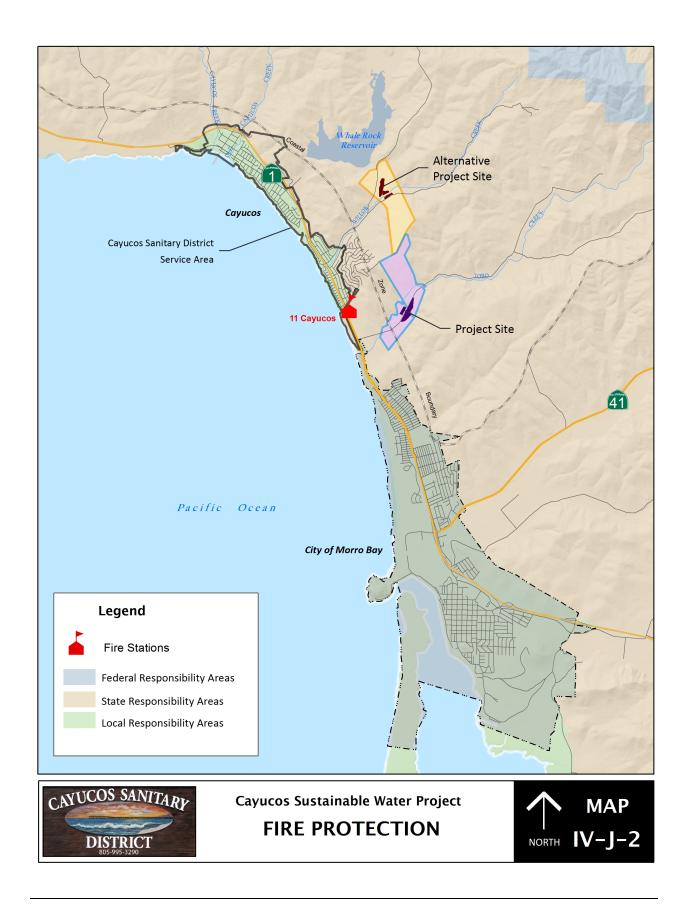
# **EMERGENCY RESPONSE**

The County Sheriff operates a service patrol station in Los Osos at 2099 10th Street, which is about 10 miles from the WRRF site (Map IV-J1). Calls for service, crime trends, and population figures are used to measure the adequacy of the Department's response in the area.

The Project Site and Alternative Site are located in a State fire protection responsibility area. Fire protection is provided by San Luis Obispo County Fire-CALFire from Station No. 11 located at 108 Chaney Avenue in Cayucos (Map IV-J2) on non-24 hour staffed basis and the CALFire station in Los Osos on a 24 hour basis. Station 11 is not staffed 24 hours a day. During peak fire season staffing, Cayucos Station is staffed by a crew of four. During the "non" fire-season months, usually mid-October to mid-May, the Cayucos Fire Protection District pays for staffing at the Cayucos Fire Station, ensuring staffed fire protection yearround to the citizens of Cayucos.

Fire protection for the area within the Cayucos URL is also provided by the Cayucos Fire Protection District (CFPD). The CFPD provides fire protection and emergency first aid to area residents by way of an all-volunteer company. The District has 14 active firefighters who are paid hourly rates for calls and drills and a Fire Chief, and two Assistant Fire Chief who are salaried. The staff also includes two (of possible four) Captain and a Secretary. The district responded to approximately 300 to 325 calls each year. Due in part to the low availability of paid firefighters, the loss of firefighters, and a lack of funding, the Cayucos Fire Department announced in October, 2016 that it will disband and turn over its responsibilities to the County by January 2017.





Emergency response times to the Project Site and Alternative Site would vary from 5 – 15 minutes, depending on the emergency. The Estero Area Plan, which governs land use where the Project Site and Alternative Site are located, provides fire suppression objectives as follows:

Table IV-J1 Fire Suppression Objectives				
Activity	IV: Outlying Areas Low density areas outside any URL or VRL	III: Rural Areas RS densities; may be within a URL or VRL	II: Urban Areas RSF densities, 2 to 8 du/ac; within URL of VRL	I: Heavy Urban RMF densities, 8 to 20 du/ac; within a URL or VRL
Maximum elapsed time from dispatch to first application of extinguishing agents	15 min	12 min	10 min	6 min
Maximum elapsed time from dispatch to full assignment of personnel and equipment	25 min	20 min	15 min	10 min
Maximum elapsed time from receipt of alarm to initiation of suppression action for 90% of all fires	10 min	10 min	8 min	8 min

Source: Estero Area Plan, Table 3-6

### **FIRE HAZARD**

#### **Climate and Weather Factors**

The Cayucos area features a Mediterranean climate characterized foggy, dry summers and cool, relatively wet winters. Precipitation occurs primarily between November and April, mainly in the form of rain. Because summers are generally warm and dry, the risk of wildfires is highest in late summer and early fall. Fog and cool weather that are common in the coastal regions help to maintain moisture levels in vegetation along the coast, which helps to minimize fire risk.

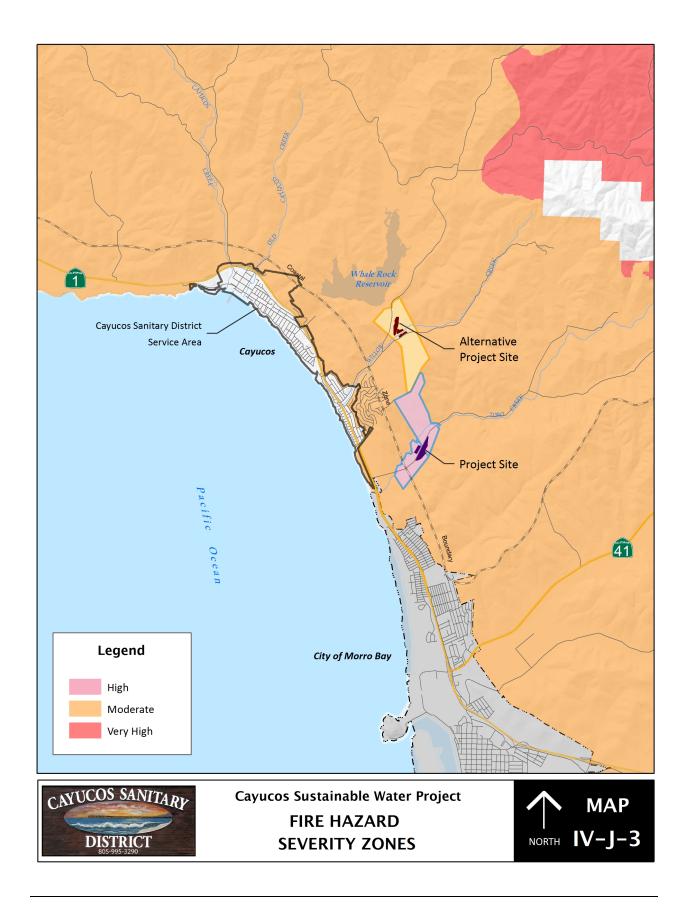
Other weather-related elements can have complex and important effects on wildfire intensity and behavior. Wind is of prime importance because as wind velocity increases, the rate of fire spread also increases. Gusty and erratic wind conditions can cause a fire to spread irregularly, making it difficult to predict its path and effectively deploy fire suppression forces. Relative humidity is also an important fire-related weather factor. As humidity levels drop, the dry air causes vegetation moisture levels to decrease, thereby increasing the likelihood that plant material will ignite and burn.

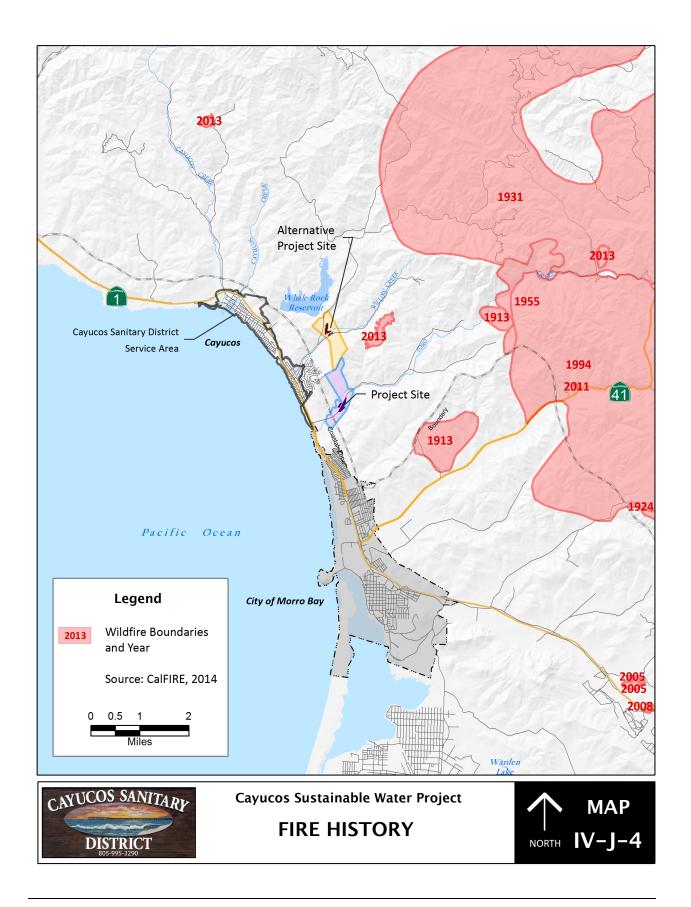
# **Potential Fire Severity**

The Project site and surrounding land experiences recurring wildfire, which is a natural component of the ecosystems in the region. The Project site is in an area with a moderate fire severity risk, as mapped by Cal Fire (Cal Fire 2006) on Map IV-J3. The likely fire hazard severity can be influenced by a number of factors, including the age of vegetation, accumulation of dead plant material, vegetation management programs that may have been implemented, period of time since a stand of vegetation was last burned, historic climate, and topography of the region. However, ranked against other rural terrain and vegetation, the Project Site is considered a lower risk due to flat terrain and lack of dense vegetative cover in the valley, according to CALFire staff (Tony Gomes, Fire Captain CALFire, personal communication).

## **Fire History**

Fire history in the Cayucos area has been variable and reflects the natural disturbance regime of the various vegetation types within the region and influences from human inhabitants. The recent history of fire in the region has been catalogued by the California Department of Fire Protection and Forestry (CalFire). Though not complete, the database generally includes fires of at least 300 acres; fires on US Forest Service land that are least 10 acres are also included (Map IV-J4).





#### **DISEASE VECTORS**

A disease vector is any organism capable of transmitting the causative agent of human disease or capable of producing human discomfort or injury, including mosquitoes, flies, fleas, cockroaches, mites, rats, or fungi. The accumulation of organic waste acts as an attractor for flies, fleas, cockroaches, and rodents and other mammals, which can be carriers of various human diseases. In addition, any depressed areas, ponds, or drainage channels provide areas for the breeding of mosquitoes, which can be carriers of the West Nile Virus, a potentially-fatal disease in humans.

# Valley Fever

The Project Site and Alternative Site are located in areas that may harbor the fungus found in the soil of dry, low rainfall areas, which causes coccidioidomycosis, commonly known as Valley Fever. According to the Centers for Disease Control and Prevention (CDC 2013), Valley Fever can infect the respiratory system and may, in rare instances, spread from the lungs to the rest of the body and cause more severe conditions such a meningitis or even death. Valley Fever cannot spread from person to person; in most people the infection will go away on its own, but for people who develop severe infections or chronic pneumonia, medical treatment is necessary. The spores that cause Valley Fever live in the soils of the southwestern United States in areas of low rainfall and may become airborne when the soil is disturbed by such things as farming and construction activities and wind. Infection rates are highest in California from June to November when soils are driest.

There is currently no vaccine for Valley Fever, and the only prevention is to avoid inhaling dust or dirt. The risk of infection can be lessened by staying indoors on very windy days when dust or dirt are visible in the air. Anyone who lives in or visits an endemic area is at risk for contracting Valley Fever. There is no evidence that suggests any particular group of people is more or less at risk for disease.

The valley fever fungus is typically found at the base of hillsides in undisturbed soil, especially around rodent burrows, Native American ruins, and burial grounds. It usually grows in the top few inches of soil, but can grow down to 12 inches. The fungus does not survive well in highly populated areas because there is usually not enough undisturbed soil for the fungus to grow. In addition, the fungus is not likely to be found in soil that has been or is being cultivated and fertilized because human-made fertilizers, such as ammonium sulfate, enhance the growth of the natural microbial competitors of the valley fever fungus.

According to the San Luis Obispo County Public Health Department, since 2005, an average of 128 cases have been reported each year to County residents. It is estimated that between 30-60% of all residents in an endemic area are exposed to the Coccidioidomycosis fungus. thus potentially exposing between 81,000 and 162,000 residents of San Luis Obispo County to the disease. Coastal areas of the County have the lowest rate of infection compared with the eastern valleys. In the Project Site area, the age-adjusted rate of reported valley fever cases from 2009-2012 was between 15.5 and 38.44 per 1,000 residents, compared to 151 -365 per 1,000 in the eastern valley portions of the County.

# 5. Standards of Significance

For purposes of this EIR, an impact related to hazards or hazardous materials is considered significant if implementation of the Project would result in 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 hazardous materials into the environment.
- Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school.
- 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.?
- 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?
- 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?
- 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 where residences are intermixed with wildlands?
- Expose people to a significant public health hazard?

Neither the San Luis Obispo County APCD nor the County Public Health Department have specific formal thresholds of significance for valley fever. However, the following factors may indicate a project's potential to create valley fever effects, which may create a significant hazard to the public:

- Where the top 12 inches of soil would be disturbed;
- In areas with dry, alkaline, sandy soils;
- In virgin, undisturbed, non-urban areas;
- In windy areas;
- Where archaeological resources probably or known to exist in the area (Native
- American midden sites);
- When special events (i.e., fairs or concerts) and motorized activities (motocross track,
- All Terrain Vehicle activities) occur on unvegetated soil;

Non-native populations are working (i.e., out-of-area construction workers).

The likelihood that the valley fever fungus may be present increases with the number of the above factors applicable to the project or project site.

The project would also have a significant adverse impact if it would conflict with one or more applicable County policies, implementation measures and/or codes relating to hazards and hazardous materials.

# 6. Impacts Found to Be Less Than Significant

The following aspects of the project were determined to have no impact on the environment:

The site is not within the vicinity of a private airstrip, an airport land use plan within two miles of a public airport or public use airport, or school. Project construction activities within public roads are not within one quarter mile of an existing school. The Proposed Project is not on a site identified as a hazardous materials site based these lists:

- List of Hazardous Waste and Substances sites from Department of Toxic Substances Control (DTSC) EnviroStor database (<a href="http://www.envirostor.dtsc.ca.gov/public/">http://www.envirostor.dtsc.ca.gov/public/</a>)
- List of Leaking Underground Storage Tank Sites by County and Fiscal Year from Water Board GeoTracker database (<a href="http://geotracker.waterboards.ca.gov/">http://geotracker.waterboards.ca.gov/</a>)
- List of solid waste disposal sites identified by Water Board with waste constituents above hazardous waste levels outside the waste management unit (PDF). (<a href="http://www.calepa.ca.gov/SiteCleanup/CorteseList/CurrentList.pdf">http://www.calepa.ca.gov/SiteCleanup/CorteseList/CurrentList.pdf</a>)
- List of "active" CDO and CAO from Water Board PLEASE NOTE: This list contains
  many Cease and Desist Orders and Cleanup and Abatement Orders that do NOT
  concern the discharge of wastes that are hazardous materials.
   (http://www.calepa.ca.gov/SiteCleanup/CorteseList/default.htm)
- List of hazardous waste facilities subject to corrective action pursuant to Section 25187.5 of the Health and Safety Code, identified by DTSC (<a href="http://www.calepa.ca.gov/SiteCleanup/CorteseList/SectionA.htm">http://www.calepa.ca.gov/SiteCleanup/CorteseList/SectionA.htm</a>)

Therefore these topics will not be discussed further.

# 7. Project Impacts and Mitigation Measures

#### **METHODOLOGY**

Assessment of impacts is based on: 1) review of site information and conditions; 2) review of technical studies prepared for the project site; and 3) review of the County of San Luis Obispo Safety Element, and other County information regarding safety issues, including information from the Centers for Disease Control and Prevention (CDC).

Because the Alternative Site has the same setting and issues, the impacts and mitigation measures for that site would be the same as the Proposed Project.

#### HAZARDOUS MATERIALS USE DURING CONSTRUCTION

This short-term activity would be subject to federal, state, and local health and safety requirements for the proper handling and use of fueling and other petroleum and automotive products. This impact is considered less than significant (Class III) because:

- The limited transport, storage, usage, and disposal of hazardous materials would be temporary for the during of construction of the facilities associated with the WRRF and pipeline conveyances.
- The fueling and servicing of construction equipment would cease upon project completion;
- The use, storage, and transport of hazardous materials is regulated by the Department
  of Toxic Substances Control (DTSC) (22 Cal. Code of Regulations Section 66001, et
  seq.). Mitigation for the potential release of hazardous materials associated with the use
  of hazardous materials on the project site will be provided by compliance with local,
  state, and federal regulations.
- The project is required to comply with the California Building Code and Fire Code.

**Impact HZ-1:** Construction activities associated with the WRRF on either the Project Site or Alternative Site and pipeline conveyances may involve the limited transport, storage, usage, or disposal of hazardous materials, such petroleum products for fueling and servicing of construction equipment. The potential impact associated with the temporary use and storage of hazardous materials for construction is considered less than significant (Class III).

No mitigation measures are required.

### HAZARDOUS MATERIALS USE DURING OPERATION OF THE WRRF

As discussed in the Project Description, chemicals will be added throughout the wastewater treatment process to provide an alkalinity source, control odors, improve sludge conditioning, disinfect the water, and clean the Membrane Bioreactor (MBR) membranes.

The secondary treatment process will require chemicals to adjust the water chemistry and chemicals to clean the MBRs. Alkalinity chemicals such as sodium hydroxide or magnesium hydroxide will be used during daily operations to stabilize the pH in the aeration tanks of the secondary treatment process. The alkalinity chemical will be stored in two identical double-walled tanks and delivered to the aeration basins through a peristaltic pump system. Citric acid, Sodium hypochlorite, Sodium Hydroxide or similar cleaning chemicals will be used intermittently to perform preventive maintenance cleanings on the MBR units by removing organic and inorganic matter. Similarly, these chemicals would be stored in a chemical drum or a double walled plastic tote when it is not in use.

The District currently adds calcium ammonium nitrate (CAN-17) to their terminal lift station to control odors from the raw influent wastewater and the use of CAN-17 at Lift Station 5 is

expected to continue. CAN-17 is currently stored at the Lift Station 5 in a 55-gallon drum. With the Proposed Project the need for CAN-17 treatment will likely not be necessary.

The on-site solids handling processes will require a water soluble polymer to be used as a flocculant for conditioning of the sludge stream. Polymers are delivered in double-walled plastic totes from the manufacturer and will be stored inside a building in close proximity to the sludge thickening and dewatering equipment. Polymers are introduced to the solids handling process through a metering pump.

The disinfection process associated with Phase 1 of project construction will include sodium hypochlorite for chlorine disinfection and sodium bisulfite for de-chlorination. Both of these chemicals will be stored outdoors under a shade structure in double-walled plastic tanks. These chemicals would be introduced to the disinfection process continuously through a peristaltic pump system. In Phase 2 of the CSWP, the disinfection processes will be upgraded to advanced oxidation and disinfection which requires hydrogen peroxide for oxidation of pathogens

The transport, use, storage and disposal of potentially hazardous materials during operation of the project is considered a less than significant impact with mitigation (Class II).

The design of the project (WRRF and conveyances) incorporates concrete secondary containment structures at chemical storage locations and providing access and egress space for chemical delivery trucks in accordance with State and federal standards. The use, storage, and transport of hazardous materials is regulated by the Department of Toxic Substances Control (DTSC) (22 Cal. Code of Regulations Section 66001, et seq.). Mitigation for the potential release of hazardous materials associated with the use of hazardous materials on the project site will be provided by compliance with local, state, and federal regulations.

The project is required to comply with the California Building Code and Fire Code. Based on the volume and type of chemicals to be used, the project will be required to complete a Hazardous Materials Business Plan (HMBP). In the event of an accidental release of hazardous materials, the project will be required to implement those aspects of the HMBP to protect life and property on the project site and surrounding properties.

**Impact HZ-2:** Operation of the WRRF on either the Project Site or Alternative Site will involve the transport, storage, usage, and disposal of hazardous materials associated with the wastewater treatment process. This impact is considered significant unless mitigated (Class II).

**Mitigation Measure HZ-1**: Prior to final occupancy/operation of the project, a Hazardous Materials Business Plan in accordance with California Health and Safety Code Sections 25503 and 25505 shall be submitted to, and approved by, the San Luis Obispo County Department of Environmental Health.

## **RISK OF UPSET DURING CONSTRUCTION**

Construction activities could result in an accidental break in a water main serving the communities of Cayucos or Morro Bay, which in turn could result in a localized loss of water for firefighting purposes. However because in both Cayucos and Morro Bay water mains are looped, the risk of loss of fire flows due to break is minimal.

**Impact HZ-3:** Construction of the WRRF on either the Project Site or Alternative Site, decommissioning of the existing WWTF and the construction of conveyance pipelines may create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions. This impact is considered less than significant (Class III).

#### RISK OF UPSET DURING OPERATION

Although unlikely, there is a potential for the conveyance systems associated with the project to experience a break resulting the accidental release of raw wastewater within streets or at creek crossings. In addition, an accident at the WRRF could result in the spill or release of untreated wastewater beyond the project site. Untreated wastewater is considered hazardous; therefore, if there is a break or spill, it is considered a potentially significant impact (Class II). The impact would be less than significant with implementation of Mitigation Measure HZ-1.

**Impact HZ-4:** Operation of the WRRF on either the Project Site or Alternative Site and conveyance pipelines may result in the accidental spill of untreated wastewater which could adverse impact surface water quality and other pose a threat to human health and biological resources. This impact is considered significant unless mitigated (Class II)

**Mitigation Measure HZ-2:** To mitigate impacts related to a untreated wastewater spill the CSD shall modify it's existing Sanitary Sewer Management Plan to include WRRF and pipeline operations.

### CONSISTENCY WITH EMERGENCY RESPONSE PLANS AND OTHER COUNTY PLANS

The Project Site and Alternative Site is located about mid-way between Cayucos and the City of Morro Bay. Regional access is provided by State Route 1 which could be used as an emergency evacuation route. However, the WRRF will be staffed by five or fewer persons at any given time and the potential for traffic or other activities associated with operation of the WRRF to impair emergency evacuation or response is considered less than significant.

**Impact HZ-5:** Based on the project description, the project is not expected to Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan. The project may conflict with other adopted goals, policies and standards associated with hazards and hazardous materials. This impact is considered less than significant (Class III).

Consistency with other relevant County policies and standards relating to hazards and hazardous materials is summarized in Table IV-J2.

Table IV-J2 Summary of County Plans and Ordinances Relating to Hazards and Hazardous Materials			
Applicable Plan or Code Section	Summary	Discussion of Consistency	
Conservation and Open Space Element, Policy BR 7.1	Site land uses so as to minimize conflicts between activities to reduce fire risk and sensitive biological resources.	The Project Site was chosen, in part, to minimize impacts to sensitive biological resources. It is, however, located in a high severity fire risk area. Incorporation of site design features and compliance with relevant fire and building codes will ensure consistency with this policy.	
Safety Element, Policy S- 1 Response	Support the response programs that provide emergency and other services to the public when a disaster occurs. The focus of response activities is saving lives and preventing injury, and reducing immediate property damage.	The project will be required to pay applicable public services impact fees to help support programs relating to emergency services.	
Safety Element Policy S- 2 Emergency Preparedness	Continue to improve preparedness programs that educate and organize people to respond appropriately to disasters. They include education and awareness programs for individuals, families, institutions, businesses, government agencies and other organizations.		
Safety Element Policy S- 13 Pre-Fire Management	New development should be carefully located, with special attention given to fuel management in higher fire risk areas. Large, undeveloped areas should be preserved so they can be fuelmanaged. New development in fire hazard areas should be configured to minimize the potential for added danger.	The Project Site incorporates site design features and compliance with relevant fire and building codes, consistent with this policy.	
Safety Element Policy S- 14 Facilities, Equipment and Personnel	Ensure that adequate facilities, equipment and personnel are available to meet the demands of fire fighting in San Luis Obispo County based on the level of service set forth in the fire agency's master plan.		
Safety Element Program S-34	The CDF/County Fire Department and County Planning shall evaluate population and settlement patterns, incident trends and values at risk every five years to determine where new fire stations and staff are needed and where existing facilities need augmentation so that the agency's master plan can be updated as needed.	The project will be required to pay applicable public services impact fees to help support programs relating to emergency services.	
Safety Element Policy S- 15 Readiness and	The CDF/County Fire Department will maintain and improve its ability to respond and suppress		

#### Table IV-J2 -- Summary of County Plans and Ordinances **Relating to Hazards and Hazardous Materials** Applicable Plan or Summary **Discussion of Consistency Code Section** Response fires throughout the County. Safety Element Policy S-Improve structures and other values at risk to reduce the impact of fire. Regulations should be 16 Loss Prevention developed to improve the defensible area surrounding habitation. The Project Site incorporates site Require a "defensible space" around structures design features and compliance with and values at risk. The area need not be cleared relevant fire and building codes, of all vegetation, but be able to provide fire Safety Element Standard consistent with this policy. fighters with enough room to defend structures S-43 and maneuver. Each situation will differ, so the The project will be required to permit granting authority will need flexibility in prepare a fire safety and evacuation reviewing fire safety plans. plan. Review development plans by fire safety Safety Element Standard personnel to assure adequacy of access for S-44 equipment, water supplies, construction standards, and vegetation clearance. Safety Element Policy S-Reduce the potential for exposure to humans and 26 Hazardous Materials The project will be required to the environment by hazardous substances. prepare a Hazardous Materials Business Plan to ensure proper Review commercial projects which use, store, or Safety Element, nandling of hazardous materials Implementation transport hazardous materials to ensure consistent with this policy. necessary measures are taken to protect public Measure S-68 health and safety. All developments shall comply with the 2010 The Project Site incorporates site California Fire Code and with County design features and compliance with Title 16, Chapter 16.10 amendments pertaining to fire access roads and relevant fire and building codes, fire detection/suppression systems. consistent with this policy. All fire safety plans must describe the nearest fire The project will be required to Title 22, Section hydrant or source of water, storage of potentially prepare a fire safety and evacuation 22.50.030.B explosive or flammable material, and access or plan. vegetation fuel (depending on project location).

Overall, the project is consistent with applicable County policies and ordinances relating to hazards and hazardous materials.

#### **EXPOSURE TO WILDFIRES**

As discussed in the setting, the Project Site and Alternative Site are located in a moderate wildfire severity zone with a history of wildfires. Therefore the project will result in an increased risk to people and property from wildfires.

The project will be designed to comply with relevant provisions of the California Building Code and California Fire Code. Emergency response time for a fire or related emergency would be less than five minutes from Station 11 located at 108 Chaney Avenue in Cayucos (Map IV-J-2), less than two miles from the Project Site and about four miles from the Alternative Site.

As described in the Project Description, the Project will include a domestic water storage tank for fire suppression and/or a similar storage tank of treated water for this purpose. The final capacity will be determined in consultation with CalFIRE prior to building permit issuance. For the purposes of this analysis, it is assumed a storage capacity of 40,000 gallons will be provided as shown on Map I-5.

**Impact HZ-6:** Construction of the WRRF on either the Project Site or Alternative Site and associated solar array will expose people and structures to a significant risk of loss, injury or death associated with wildfires. This impact is considered significant unless mitigated (Class II).

**Mitigation Measure HZ-3:** Fire Safety and Evacuation Plan. Applicant shall provide a written Fire Safety plan whose contents shall be in accordance with sections California Fire Code Chapter 4 Emergency Planning and Preparedness. Employee training, record keeping, hazard communication and drills will also comply with this chapter. The written plan will include at a minimum the detail outlined in sections 404.3.1 (Evacuations Plans) and 404.3.2 (Fire Safety Plans).

#### **PUBLIC HEALTH -- EXPOSURE TO DISEASE VECTORS**

Construction activities, on either potential the WRRF site, could mobilize the fungus that causes Valley Fever, thus exposing construction workers and others. Risk factors associated with the Project Site include the following:

- The top 12 inches of soil would be disturbed;
- The Project Site and Alternative Site are exposed to daily prevailing winds off the ocean;
- The area along Toro Creek across the street from the Project Site contains a known archaeological site;
- Non-native populations of workers (i.e., out-of-area construction workers) may be used.

However, the Project Site and Alternative Site have been continuously farmed since the mid 1960's and it has likely been treated with fertilizers which suppress the growth of the fungus. Nonetheless, the potential exists for workers and others to be exposed to Valley Fever fungus.

**Impact HZ-7:** Construction activities associated with the WRRF on either the Project Site or Alternative Site and pipeline conveyances has the potential to result in a hazard to the public or the environment by mobilizing disease vectors, such as the

fungus that causes Valley Fever, that may be present in the soil. This impact is considered significant unless mitigated (Class II).

**Mitigation Measure HZ-4**: To minimize the risk of exposure to disease vectors, activities with the potential to mobilize spores associated with Valley Fever, the CSD shall implement the following, as applicable:

- a. Implement all of the mitigation measures relating to the control of dust during construction activities:
- b. Prohibit eating and smoking at the project site and provide separate, clean eating areas with hand-washing facilities;
- c. Avoid outdoor operations during unusually windy conditions;
- d. Limit ground disturbing activities during the fall to essential jobs only, as the risk of cocci infection is higher during this season.
- e. Thoroughly clean equipment, vehicles, and other items before they are moved off-site to other work locations;
- f. Train workers to recognize that cocci may be transported offsite on contaminated equipment, clothing, and shoes; alternatively, consider installing boot-washing stations; and
- g. Post warnings onsite and consider limiting access to visitors, especially those without adequate training and respiratory protection.

#### PUBLIC HEALTH -- EXPOSURE TO ENVIRONMENTALLY PERSISTENT CHEMICALS

A variety of agricultural operations have been conducted on the Project Site and Alternative Site, including grazing, dry farming and irrigated cultivation. Although the amount and type of pesticides, herbicides and fertilizers that may have been used is unknown, portions of the Project Site and Alternative Site have been farmed at least since the 1960s and the potential exists for these materials to be present in the soils. Therefore, the potential exposure of environmentally persistent chemicals to construction workers is considered a significant adverse impact unless mitigated (Class II).

**Impact HZ-8:** Construction activities associated with the WRRF on either the Project Site or Alternative Site has the potential to expose construction workers and CSD staff to potentially hazardous concentrations of environmentally-persistent pesticides, herbicides and fertilizers. This impact is considered significant unless mitigated (Class II).

**Mitigation Measure HZ-5**: Prior to construction activities that involve soil disturbance, the CSD shall develop and implement a Soil Sampling and Analysis Plan to determine the presence and extent of any residual herbicides, pesticides, and fumigants on historically-farmed land in agricultural areas that would be disturbed during ground-disturbing activities associated with the project. The Plan shall be prepared in consultation with the San Luis Obispo County Department of Environmental Health Services and the work shall be conducted by an appropriate California-licensed professional and samples sent to a California Certified laboratory. At a minimum, the Plan shall document the areas proposed for sampling, the procedures for sample collection, the laboratory analytical methods to be used, and the pertinent regulatory threshold levels for determining proper excavation, handling, and, if necessary, treatment or disposal of any contaminated soils. The Plan shall be submitted to the Department and the San Luis Obispo

County Department of Environmental Health Services for review and approval at least 60 days before construction. Results of the laboratory testing and recommended resolutions for excavation, handling, dust control, and treatment/disposal of material found to exceed regulatory Practices shall be submitted to the Department prior to construction.

#### **CUMULATIVE IMPACTS AND MITIGATION MEASURES**

# **Cumulative Setting**

Related projects within the greater cumulative project area are detailed in Section III. Of these, only the Morro Bay Wastewater Treatment Plant project is a related project and would contribute to cumulative impacts to hazards and hazardous materials.

# CUMULATIVE IMPACT - USE AND STORAGE OF HAZARDOUS MATERIALS DURING CONSTRUCTION

**Impact HZ-9:** The limited transport, storage, usage, or disposal of hazardous materials during construction activities associated with the WRRF on either the Project Site or Alternative Site, decommissioning of the existing WWTF and pipeline conveyances, together with other reasonably foreseeable projects in the area would contribute to the cumulative risk to the public. This impact is considered less than cumulatively considerable (Class III).

The project would contribute to the cumulative risk associated with the use, transport and storage of hazardous materials. However, this impact is considered less than cumulatively considerable (Class III) because:

- The limited transport, storage, usage, and disposal of hazardous materials would be temporary for the during of construction of the facilities associated with the WRRF and pipeline conveyances.
- The fueling and servicing of construction equipment would cease upon project completion;
- The use, storage, and transport of hazardous materials is regulated by the Department
  of Toxic Substances Control (DTSC) (22 Cal. Code of Regulations Section 66001, et
  seq.). Mitigation for the potential release of hazardous materials associated with the use
  of hazardous materials on the project site will be provided by compliance with local,
  state, and federal regulations.
- The project is required to comply with the California Building Code and Fire Code.

#### **CUMULATIVE IMPACT -- HAZARDOUS MATERIALS USE DURING OPERATION OF THE WRRF**

**Impact HZ-10:** The transport, storage, usage, and disposal of hazardous materials associated with the wastewater treatment process during operation of the WRRF on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area would contribute to the cumulative risk to the public. This impact is considered less than cumulatively considerable (Class III).

As discussed in the Project Description, chemicals will be added throughout the wastewater treatment process to provide an alkalinity source, control odors, improve sludge conditioning, disinfect the water, and clean the Membrane Bioreactor (MBR) membranes. Accordingly, the project would contribute to the cumulative risk associated with the use, transport and storage of hazardous materials. However, this impact is considered less than cumulatively considerable (Class III) because:

- The use, storage, and transport of hazardous materials is regulated by the Department
  of Toxic Substances Control (DTSC) (22 Cal. Code of Regulations Section 66001, et
  seq.). Mitigation for the potential release of hazardous materials associated with the use
  of hazardous materials on the project site will be provided by compliance with local,
  state, and federal regulations.
- The project is required to comply with the California Building Code and Fire Code.
- Implementation of Mitigation Measure HZ-1 will reduce project specific impacts to a less than significant level.

#### **CUMULATIVE IMPACT -- RISK OF UPSET DURING CONSTRUCTION**

**Impact HZ-11:** Construction of the WRRF on either the Project Site or Alternative Site, decommissioning of the existing WWTF and the construction of conveyance pipelines, together with other reasonably foreseeable projects in the area would contribute to the cumulative risk to the public. This impact is considered less than cumulatively considerable (Class III).

Construction activities associated with the project, together with construction activities associated with other reasonably foreseeable projects in the area, could result in an accidental break in a water main serving the communities of Cayucos or Morro Bay, which in turn could result in a localized loss of water for firefighting purposes. In addition, construction activities, However, this impact is considered less than cumulatively considerable (Class III) because:

- The timing and duration of construction activities is not expected to overlap with other reasonably foreseeable projects.
- use, storage, and transport of hazardous materials is regulated by the Department of Toxic Substances Control (DTSC) (22 Cal. Code of Regulations Section 66001, et seq.).
   Mitigation for the potential release of hazardous materials associated with the use of hazardous materials on the project site will be provided by compliance with local, state, and federal regulations.
- The project is required to comply with the California Building Code and Fire Code.
- Implementation of Mitigation Measure HZ-2 will reduce project specific impacts to a less than significant level.

#### **CUMULATIVE IMPACT -- RISK OF UPSET DURING OPERATION**

**Impact HZ-12:** Operation of the WRRF on either the Project Site or Alternative Site and conveyance pipelines, together with other reasonably

foreseeable projects in the area, would contribute to the cumulative risk to the public associated with the accidental spill of untreated wastewater which could adverse impact surface water quality and other pose a threat to human health and biological resources. This impact is considered less than cumulatively considerable (Class III).

Construction of the WRRF, together with other wastewater treatment plants in the region (City of Morro Bay, the community of Los Osos and the California Men's Colony) would increase the cumulative risk of upset and accidental spill of untreated wastewater in the area. This impact is considered less than cumulatively considerable because (Class III):

- The project design incorporates active measures (such as emergency shutoff systems and backup generator) and passive measures. (such as overflow basins) to ensure that an accident would be contained at the WRRF site.
- Implementation of Mitigation Measure HZ-2 will reduce project specific impacts to a less than significant level.

# CUMULATIVE IMPACT -- CONSISTENCY WITH EMERGENCY RESPONSE PLANS AND OTHER COUNTY PLANS

**Impact HZ-13:** Based on the project description, the project, together with other reasonably foreseeable projects in the area, is not expected to impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan or to conflict with other adopted goals, policies and standards associated with hazards and hazardous materials. This impact is considered less than cumulatively considerable (Class III).

The assessment of consistency with regional emergency response and other plans related to hazards and hazardous materials considers the cumulative impact. Therefore, this impact is considered less than cumulatively considerable (Class III).

#### **CUMULATIVE EXPOSURE TO WILDFIRES**

**Impact HZ-14:** Construction of the WRRF and associated solar array on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area, will increase the cumulative risk to people and structures to a significant risk of loss, injury or death associated with wildfires. This impact is considered less than cumulatively considerable (Class III).

As discussed in the setting, the Project Site and Alternative Site are located in a high wildfire severity zone with a history of wildfires. Therefore the project will result in an increased risk to people and property from wildfires and will contribute to a cumulative increase in the risk of people and property to wildfire risk in the region. However, this impact is considered less than cumulatively considerable (Class III) because:

 The project and all other cumulative projects are required to comply with the California Building Code and Fire Code.

- The project design incorporates active measures (such as fire sprinklers and water storage) and passive measures. (such as buffers surrounding the WRRF) to help protect people and facilities from wildfires.
- Mitigation Measures HZ-3 requires preparation and implementation of a Fire Protection Management Plan to ensure fire protection measures are implemented.

#### **CUMULATIVE IMPACT -- EXPOSURE TO DISEASE VECTORS**

**Impact HZ-15:** Construction activities associated with the WRRF and pipeline conveyances on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area, has the potential to result in an increase to the cumulative hazard to the public or the environment associated with the mobilization of disease vectors, such as the fungus that causes Valley Fever, that may be present in the soil. This impact is considered less than cumulatively considerable (Class III).

Construction activities associated with project and other reasonably foreseeable projects in the area could mobilize the fungus that causes Valley Fever, thus exposing construction workers and others. Implementation of Mitigation Measures HZ-4 will reduce the cumulative risk to less than cumulatively considerable (Class III) by:

- · Minimizing the generation of dust from construction activities;
- Ensuring that all construction personnel and CSD staff are trained regarding the risk of naturally occurring disease vectors and the procedures to be followed in the event of potential exposure;
- Protecting construction workers and CSD staff from the disease vectors and avoiding circumstances which increase the risk of exposure.

# PUBLIC HEALTH -- EXPOSURE TO ENVIRONMENTALLY PERSISTENT CHEMICALS

**Impact HZ-16:** Construction activities associated with the WRRF on either the Project Site or Alternative Site, together with other reasonably foreseeable projects in the area, has the potential to increase the cumulative exposure of construction workers and CSD staff to potentially hazardous concentrations of environmentally-persistent pesticides, herbicides and fertilizers. This impact is considered significant less than cumulatively considerable (Class III).

Construction of the WRRF will be limited to the project site and staging area. Implementation of Mitigation Measure HZ-5 will reduce the cumulative risk to less than cumulatively considerable (Class III) by:

- Determining the type and concentration of hazardous chemicals that may be present;
   And,
- Setting forth procedures to protect public health and the environment from the release of such chemicals in accordance with federal and State laws.

#### **List of Abbreviated Terms** 8.

Abbreviation	Term
CDC	Centers for Disease Control and Prevention
CEQA	California Environmental Quality Act
CFPD	Cayucos Fire Protection District
CSD	Cayucos Sanitary District
EIR	Environmental Impact Report
WRRF	Water Resource Recycling Facility
WWTF	Wastewater Treatment Facility

#### 9. References

Department of Toxic Substances Control "Cortese" list, 2016

National Weather Service 2010

Occupational Safety and Health Administration (OSHA), Title 29 CFR Part 1910

Office of the State Fire Marshal's fire safety planning website (<a href="http://osfm.fire.ca.gov/zoning.html">http://osfm.fire.ca.gov/zoning.html</a>).

Public Resources Code 4291 & Government Code 51182

San Luis Obispo County Public Health Department, 2012, Epidemiologic Profile of Coccidiodomycosis in San Luis Obispo County, CA 1996-2012

San Luis Obispo County Emergency Operations Plan (SLO OEM 2005).

San Luis Obispo County Fire Management Plan (SLO Fire 2009).

2013 Community Wildfire Protection Plan

San Luis Obispo County Local Hazard Mitigation Plan (SLO OEM 2011).

Centers for Disease Control and Prevention (CDC).

San Luis Obispo General Plan Safety Element

Tony Gomes, Fire Captain CALFire, personal communication

### K. GROWTH INDUCING EFFECTS

#### 1. Introduction

The California Environmental Quality Act (CEQA) Guidelines Section 15126.2(d) requires that an Environmental Impact Report (EIR) evaluate the growth-inducing impacts of a proposed action. A growth-inducing impact is defined by the State CEQA Guidelines as:

The way in which a 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 is not assumed that growth in an 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, for example, involved construction of new housing. A project would have indirect growth inducement potential if it established substantial new permanent employment opportunities (e.g., commercial, industrial, or governmental enterprises) or if it would involve a construction effort with substantial short-term employment opportunities that would indirectly stimulate the need for additional housing and services to support the new employment demand (Napa Citizens for Honest Government v. Napa County Board of Supervisors). Similarly, a project would indirectly induce growth if it would remove an obstacle to additional growth and development, such as removing a constraint on a required public service. A project providing an increased water supply in an area where water service historically limited growth could be considered growthinducing. Removing what was previously a constraint to development, by supplying supplemental water, could also affect the expected rate of growth in a community unless adopted growth management policies exist to regulate the rate of development.

The State CEQA Guidelines further explain that the environmental effects of induced growth are considered indirect impacts of the proposed action. These indirect impacts or secondary effects of growth may result in significant, adverse environmental impacts. Potential secondary effects of growth include increased demand on other community and public services and infrastructure, increased traffic and noise, and adverse environmental impacts such as degradation of air and water quality, degradation or loss of plant and animal habitat, and conversion of agricultural and open space land to developed uses.

Growth inducement may constitute an adverse impact if the growth is not consistent with or accommodated by the land use plans and growth management plans and policies for the area affected. Local land use 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, roadway infrastructure, sewer service, and solid waste service.

The analysis in this section recognizes the following facts:

- Water supplies available to the Cayucos Area Water Organization are sufficient to accommodate build-out of the currently adopted Urban Reserve Line / CSD service area. However, development beyond the URL is constrained by the availability of water.
- Development within the CSD service area is also constrained by other factors, such as road and school capacity and other physical constraints.
- The County has adopted a Growth Management Ordinance as well as development impact fees to help ensure that the pace of development is consistent with the availability of services and facilities to serve such development.

The analysis in this section makes the following assumptions:

- The CSWP, by supplying supplemental water, would remove an obstacle to growth, which in turn could lead to increased growth wherever the supplemental water may be ultimately directed;
- · Growth in any area cannot be assumed to be beneficial, detrimental, or of little significance to the environment [CEQA Guidelines Sec. 15126.2(d)].
- It is recognized that roads, schools, air quality, water, sewer systems, and other resources have, or may become, overtaxed. These resources could be affected by growth resulting from the proposed project and would be considered secondary impacts.
- · Communities sometimes tend to grow even when resources are highly constrained and that growth is a function of each jurisdiction's General Plan. This analysis makes the assumption that, as a rule, if a project results in a community having a surplus of water at build-out, that surplus water could be growth-inducing with secondary significant impacts, as surplus water generally allows for accelerated growth under a community's General Plan.
- As water supplies in the County become further constrained, growth will tend to occur first in those areas with immediate access to water, and second in those areas with both adequate infrastructure and the potential for accessing additional sources
- · Growth-inducing impacts of a project are assumed to be potentially significant as long as the water surplus exists. After the water surplus is used, the growth-inducing impact would become insignificant.

#### 2. **Components of Growth**

The timing, magnitude, and location of land development and population growth in a community are based on various interrelated land use and economic variables. Key variables include regional economic trends, market demand for residential and non-residential uses, land availability and cost, the availability and quality of transportation facilities and public services, proximity to employment centers, the supply and cost of housing, and regulatory policies or conditions.

### **COUNTY GROWTH MANAGEMENT ORDINANCE**

The County has adopted a growth management ordinance (Title 26 of the County Code) with the following objectives:

- To implement the County General Plan by establishing an annual rate of growth that will give further guidance to the future growth of the county in accordance with that plan; and
- To establish an annual rate of growth that is consistent with the ability of community resources to support the growth, as established by the Resource Management System (RMS) of the County General Plan: and
- To establish a system for allocating the number of residential construction permits to be allowed each year by the annual growth rate set by the county Board of Supervisors; and
- To minimize adverse effects resulting from a rate of growth which will affect the resources necessary to support existing and proposed new development as envisioned by the County General Plan: and
- To assist the public in understanding the growth management system affecting the development and use of land in San Luis Obispo County.

The Growth Management Ordinance applies to the issuance of building permits for residential development within the unincorporated County. Under the Ordinance, building permits for residential development are allocated to a maximum quantity each year as determined by the

Board of Supervisors but in no case may the allocation exceed an increase of 2.3% per fiscal year. Building permits are distributed Countywide based on the availability of resources needed to support the new development as defined by the Resource Management System. Applicants interested in building new dwelling units must file a Request for Allocation with the Department of Planning and Building.

#### **POPULATION GROWTH**

Since the general plan of a community defines the location, type, and intensity of growth, it is the primary means of regulating development and growth in California. Development in the community of Cayucos and surrounding properties within the Coastal Zone is subject to the Estero Area Plan/Certified Local Coastal Program. As described in the Estero Area Plan, Cayucos is considered a "bedroom community" in that roughly 85 to 90 percent of their workers commute to jobs in other communities. Although the city of Morro Bay provides some employment for local residents (and contributes significantly to the area's economy), a large percentage of local workers find employment in the San Luis Obispo area. Cayucos has some businesses that provide retail and service uses to local residents, but it lacks major employers, large-scale manufacturing and industrial uses. Tourism and visitor-serving businesses are the most important sector of the local economy.

In 2011, the San Luis Obispo Council of Governments (SLOCOG) published the SLO County 2040 Regional Growth Forecast which is based, in part, on the development potential of land within Estero Area Plan for the Community of Cayucos and surrounding areas. As shown in Table IV-K1, SLOCOG estimates that the population of Cayucos within the urban reserve line (URL) is expected to experience minimal population increase over the next 25 years, an average of 18 persons per year. It should be noted that the service area boundaries of the CSD cover an area that is slightly larger than the URL (Figure IV-K1). However, these areas consist primarily of antiquated residential subdivisions. For purposes of this analysis, the population of the CSD service area is assumed to be the same as that of the population within the Cayucos urban reserve line.

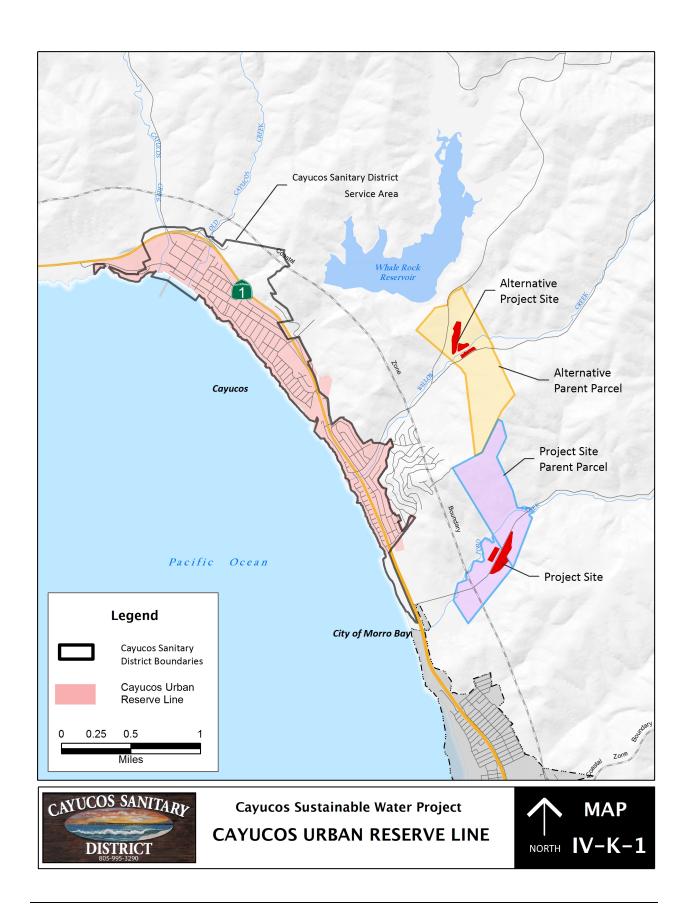


Table IV-K1 SLOCOG Population Projections for Cayucos, Morro Bay and Los Osos and the County, 2010-2040								
Community	2010	2015	2020	2025	2030	2035	2040	CAGR <sup>1</sup>
Cayucos	2,541	2,558	2,581	2,604	2,637	2,800	3,005	0.56%
Los Osos	13,908	13,988	14,502	16,472	17,593	18,607	19,716	1.17%
Morro Bay	10,073	10,152	10,244	10,450	10,708	10,969	11,237	0.37%
COUNTY TOTAL	269,637	273,664	280,522	289,119	299,898	310,779	321,953	0.68%

Source: SLOCOG Notes: Compounded annual growth rate.

#### **GROWTH IN NON-RESIDENTIAL DEVELOPMENT AND EMPLOYMENT**

## **Non-Residential Development**

The Estero Area Plan provides an estimate for total non-residential development in Cayucos expected at build-out as shown in Table IV-K2 that suggests modest non-residential development likely aimed at additional tourist serving retail and accommodations with a corresponding modest increase in local jobs.

Table IV-K2 – Year 2000 and Buildout Year Non-Residential Development In Cayucos						
Land Use Category	Floor Area In 2000 (Square Feet)	Additional Development (Square Feet)	Floor Area At Buildout (Square Feet)			
Commercial Service	5,300	5,400	11,300			
Commercial Retail	116,800	40,000	156,800			
Office	12,900	46,500	53,400			
Total:	135,000	91,900	221,500			

Source: Estero Area Plan

### **Employment**

As discussed above, a project could be growth inducing if it established substantial new permanent employment opportunities. One measure of the change in employment over time is the ratio of jobs in the community to each employed resident (J/ER), which is calculated by dividing the number of jobs by the number of workers living in the community. In general, a J/ER ratio of 1.0 is considered ideal, while a ratio below 1.0 may indicate that a disproportionate number of residents commute to work in other areas. According to the US Census, the 1999/2000 J/ER ratio was 0.23 in Cayucos. According to the Estero Area Plan, development of the non-residential land uses in the community would improve the J/ER somewhat to 0.31.

#### **Growth Effects of the CSWP** 3.

The CSWP will result in the construction of a wastewater treatment and conveyance system with an average annual daily flow (AADF) of 0.33 to 0.4 million gallons per day (MGD). In addition, the WRRF is designed to treat wastewater that meets safe drinking water standards. Accordingly, the second phase of the project includes a pipeline to be used to convey treated water that meets safe drinking water standards from the WRRF to the CSA 10A water treatment plant where it would be treated to augment the existing water supply by about 370 - 560 acre-feet per year (AFY) at such time as the water purveyors deem the supplemental water to be beneficial and implement the necessary improvements to receive and process the supplemental water from the WRRF.

#### TREATMENT PLANT CAPACITY AND BUILDOUT WASTEWATER FLOWS

If it is assumed that the amount of wastewater flow has a fairly constant relationship to water demand, future flows can be estimated using estimates of water demand. Using this methodology, Cayucos' average dry-weather wastewater flow at build-out of the Cayucos URL would range from about 0.318 mgd (assuming 61.5% occupancy for existing development and 95% occupancy for new development) to about 0.401 mgd (assuming 80% and 95% occupancy for existing and new development, respectively). Accordingly, the WRRF will be sized to serve only the service area of the CSD with an average annual daily flow (AADF) of 0.33 to 0.5 million gallons per day (MGD). Thus, the CSWP will not be sized to accommodate development in excess of that projected by the Estero Area Plan.

Although the infrastructure improvements associated with the CSWP have been sized to serve growth anticipated by the Estero Area Plan for the community of Cayucos, the provision of new infrastructure today to serve development anticipated for the next 20 - 30 years is by definition considered growth-inducing to the extent that it would "...remove obstacles to population growth..." as described above in Guidelines Section 15126.2 and could hasten the development of vacant and unutilized parcels. However, the growth inducing effects of a new wastewater treatment and conveyance system in and of itself would be limited compared to the current baseline condition because:

Wastewater collection and treatment capacity is not currently a constraint to development in Cayucos.

According to the 2012-2014 Resource Summary Report, the joint Morro Bay-Cayucos wastewater treatment plan current serving the community of Cayucos was operating at 41% in 2014 (combined flows from Morro Bay and Cayucos) and no Level of Severity was recommended. Therefore, the growth-inducing effects of the treatment and collection components of the CSWP are not expected to be greater than baseline conditions.

New development in Cayucos will continue to be subject to the limitations prescribed by the Estero Area Plan and the County's Growth Management Ordinance.

As discussed above, SLOCOG projects a very small amount of population growth in Cayucos over the next 25 or more years (about 18 new residents per year) in accordance with the Estero Area Plan. Accordingly, there is a low potential for the accelerated pace of development to overwhelm community wastewater treatment resources.

In addition, the County's Growth Management Ordinance limits the number of residential building permits issues during a fiscal year to maximum increase of 2.3 percent countywide. The Cayucos Citizens Advisory Council has recommended establishing a comparable annual growth limitation for residential development within the Cayucos URL. The purposes of such a

limitation would be to allow public services to keep pace with a moderate rate of new development and to reduce possible stresses on the economy caused by a "boom-and-bust" cycle that may occur with uncontrolled growth. Program A. 1. Growth Management of the Estero Area Plan states:

1. Growth Management. The county should amend Title 26, the Growth Management Ordinance, by limiting the annual rate of growth of dwelling units that can be built within the Cayucos urban reserve line to 2.3 percent (about 50 units in the first year).

### **GROWTH INDUCING EFFECTS OF A SUPPLEMENTAL WATER SUPPLY**

## **Current and Future Water Supply**

Water is supplied to the community of Cayucos by the Cayucos Area Water Organization (CAWO) whose members include Morro Rock Mutual Water Company (Morro Rock MWC), Paso Robles Beach Water Association (PRBWA), County Service Area 10 and 10A (CSA 10 consists of the water treatment plant, while CSA 10A is the water distribution system serving the southern portion of the community), the Cayucos Cemetery District (CCD), and two landowners. Morro Rock Mutual Water Company and Paso Robles Beach Water Association distribute water from the treatment plant to their service areas (Figure IV-K2). The combined groundwater and Whale Rock Reservoir surface water allocation for CAWO is distributed as follows:

Table IV-K3 - Cayucos Area Water Organization (CAWO) Membership, 2014 Deliveries and Projected Build-out Demand (AFY)						
Member Agency	Total Water Supply <sup>1</sup>	2014 Deliveries	Projected Build- out Demand (30 Years)	Water Supply Remaining	Remaining Water Supply At Build-out	
Morro Rock Mutual Water Company	173 <sup>2</sup>	115	164 - 173	49 – 58	0 – 9	
Paso Robles Beach Water Association	222	150	207- 218	57 – 68	4 – 15	
County Service Area 10A	215-280 <sup>3</sup>	112	220 – 232	108 – 120	27 – 60	
Cayucos Cemetery District	18	Unreported	17 - 18	0 - 1	0 -1	
Total:	628 - 693	377	608 - 641	214 - 247	31 - 85	

Source: 2012-2014 Resource Summary Report

#### Notes:

- 1. Source: Water System Usage forms: July 2012 June 2013; July 2013 June 2014, San Luis Obispo County Master Water Report, 2012, Table 4.56
- Includes 170 AFY from Whale Rock Reservoir, plus 3 AFY diverted for a school and park irrigation but up to 56 AFY is the permitted diversion from Little Cayucos Creek underflow. 56 AFY is part of the 600 AFY safe basin yield for the Cayucos Valley Basin. Due to water quality, the remaining 53 AFY could be used for domestic supply following treatment.
- CSA 10A has procured 25 90 AFY of Nacimiento Water Project via exchange with City of San Luis Obispo for Whale Rock Reservoir water. Agreement provisions allow for up to 90 AFY of NWP if necessary. Nacimiento water could be delivered to Morro Rock MWC or Paso Robles Beach Water Association, as part of this arrangement.

The forecast water demand summarized in Table IV-K3 was derived from the County's 2012 Master Water Report which in turn used data from the California Department of Finance adjusted for local conditions by the Department of Planning and Building.

The CSWP could result in as much as 370 – 500 AFY of additional potable water being available to the water purveyors serving Cayucos. At present all of the wastewater generated within the CSD service area is conveyed to the ocean by way of an outfall in the City of Morro Bay. Moreover, irrigation water applied to landscaping does not contribute appreciably to the recharge of the Cayucos groundwater basin because of the proximity of the ocean and the resulting seawater that extends inland under the community. As a result, water consumed by residents and businesses is not recycled and is currently 'lost' to the water supply.

The CSWP proposes to return as much as 500 AFY of tertiary treated water to the community which in turn could reduce the amount of water needed from surface and groundwater sources by as much as 78% per year. The 500 AFY of unused water supplies could be used in a number of different ways to augment the community's water supplies as determined by the respective water purveyors. For example, it could be used as a drought buffer, it could be used to hasten the development of vacant and underutilized lots within the Cayucos Urban Reserve Line (URL)1, or it could be sold to other agencies/water purveyors outside the current service area of the CAWO water purveyors.

## **Growth Inducing Effects of Supplemental Water Supplies**

Providing ongoing annual supplemental water supplies could induce additional growth, depending on how those supplies are used. That is, the degree to which the additional water is used to off-set groundwater pumping and/or surface water use from Whale Rock Reservoir, either to reduce overdraft or improve water quality, will determine how much additional growth is generated. Potential growth-inducing effects could occur in at least three ways detailed following.

#### **DROUGHT RELIEF**

By relieving stress on the water supply during critical droughts, the supplemental water produced by the CSWP may result in the use of drought buffer water to serve new development. However, the use of a formal drought buffer for uses other than drought relief would likely be limited by stipulations that preclude the use of the supplemental water other than in a specified drought severity level. However, absent these limitations the potential exists for using the supplemental water in the drought buffer to be used for new development.

#### **NEW INFRASTRUCTURE**

A second potential path to additional growth is the existence of the new infrastructure. Under this growth scenario, the existence of the pipeline becomes the foundation of efforts to amend or expand water supply contracts (see below), alter the general plan, and remove other obstacles to growth. This scenario gains validity when it is recognized that these various actions take place over time and in an incremental manner. Also important is the understanding that as water supplies in the County become further constrained, growth will tend to occur first in those areas with immediate access to water, and second in those areas with both adequate infrastructure and the potential for accessing additional sources.

such services are expected to be extended to in the next 5 to 10 years. In the coastal zone, the USL is the Urban-Rural boundary.

<sup>&</sup>lt;sup>1</sup> Urban reserve line (URL). The boundary around an urban area that separates urban land uses from the adjacent rural area, defining land that is planned for urban growth within the next 20 years. Urban service line (USL). A line within a urban reserve line encompassing areas where urban services are now provided, or where

#### **EXPANSION OF WATER SERVICE AREAS.**

A third potential effect of providing supplemental water could result from pressure to extend water service to existing antiquated residential subdivisions. The CSD service area contains 464 single family residential lots in an antiquated<sup>2</sup> subdivision on the north side of State Route 1 which lies outside the URL and outside a water service area (Map IV-K2). Another area of about 1,080 residential lots is located on the south side of Old Creek Road at the south end of the community which lies outside the CSD service area and outside the URL (Map IV-K3). Together, the two areas could consume about 566 AFY if completely built out with single family residences (Table IV-K4).

Table IV-K4- Summary of Potential Population and Water Demand Associated With Antiquated Subdivisions					
Growth Area	Potential Dwelling Units	Potential Population	Potential Water Demand		
North Subdivision	464	1,160	170 AFY		
South Subdivision	1,080	2,700	397 AFY		
Total:	1,544	3,860	567 AFY		

#### Notes:

- 1. Assumes 2.5 persons per dwelling unit.
- 2. Assumes 0.147 Acre Feet Per Year Per capita.

Although the availability of water could remove a barrier to the development of some or all of these lots, a number of significant environmental and regulatory constraints would remain that could limit the actual amount of growth:

- 1.The WRRF is sized to serve the build-out population within the Cayucos Urban Reserve line, only, and would not accommodate wastewater from either of these areas.
- 2. The antiquated lots are outside the URL for Cayucos and are not served by water infrastructure or other necessary public services such as fire protection, solid waste collection and street lighting. The extension of water and other services to these areas would require an amendment of the spheres of influence for the various service providers by the Local Agency Formation Commission. The current (January, 2015) Sphere of Influence Update for CSD shows the northern antiquated subdivision proposed for detachment from the Sanitary District.
- 3. County policies prohibit land divisions requiring urban service extensions beyond the USL/URL. Since these lots were created before the policy, they are considered legal but not conforming (ie, antiquated). However, the current policy would prohibit the extension of public services to this area.
- 4. This area is within the Critical Viewshed for Cayucos established by the Estero Area Plan and would likely have development limitations related to preserving visual quality.

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<sup>&</sup>lt;sup>2</sup> Antiquated in the sense that the creation of the parcels predates the current regulatory framework for land divisions.

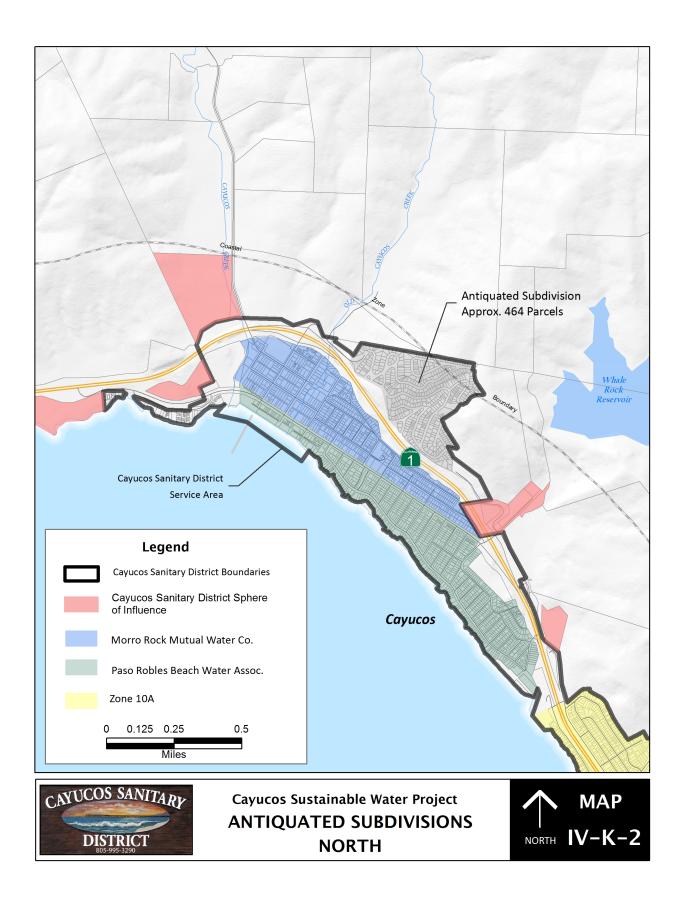
5. Development of these parcels with residences would adversely impact sensitive biological resources, as well as roads, schools and parks.

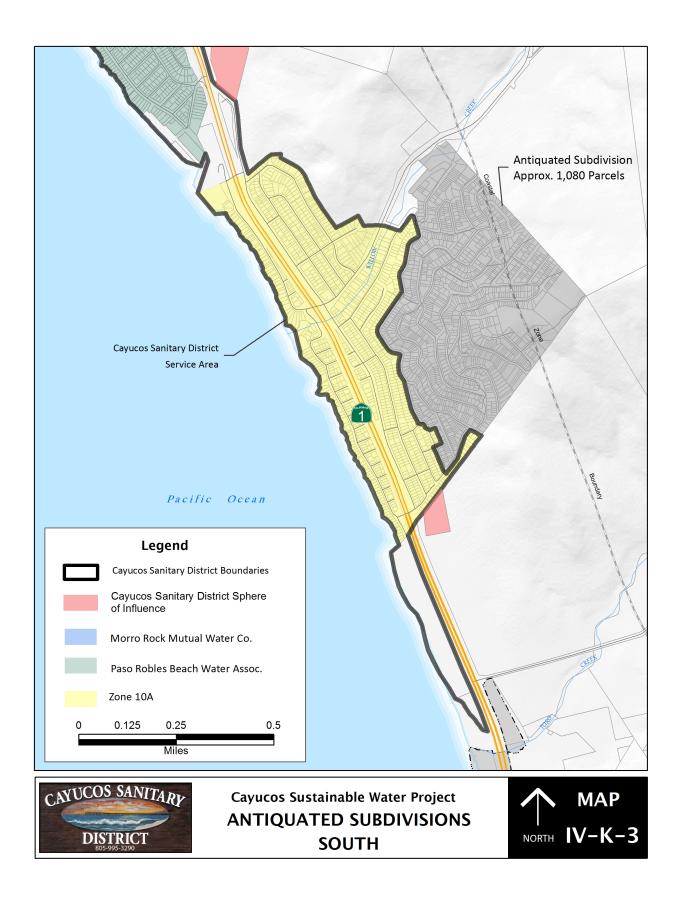
**Impact GRO-1:** The Project could result in indirect impacts on the environment related to growth induced by the provision of an additional water supply, including but not limited to, increased traffic, noise, vehicular emissions, loss of vegetation and wildlife forage area, loss of visual quality and watershed impacts. This impact is significant but mitigable (Class II).

**Mitigation Measure GRO-1:** To avoid potentially significant growth inducing effects, the CSD shall limit the sale of tertiary treated water for domestic use to water purveyors serving lots within the Urban Reserve Line for Cayucos as set by the County and LAFCO.

### LEVEL OF SIGNIFICANCE AFTER MITIGATION

The Proposed Project Phase 2 component could result in a supply of water to the community that exceeds the demand projected for Cayucos associated with build-out of the Estero Area Plan. Some limitations on the use of the supplemental water will be determined by the participating agencies at such time as the water becomes available, and therefore cannot be determined at this time. In any case, limitations on the sale of recycled water for use only within the URL for Cayucos would reduce the potential growth inducing impacts of the CSWP to a less than significant level. As a result, the potential growth inducing impacts of the CSWP are considered significant but mitigable (Class II).





## 4. List of Abbreviated Terms

Abbreviation	Term
AFY	Acre feet per year
CEQA	California Environmental Quality Act
CSD	Cayucos Sanitary District
CSWP	Cayucos Sustainable Water Project
EIR	Environmental Impact Report
LAFCO	Local Agency Formation Commission
LUO	Land Use Ordinance
CZLUO	Coastal Zone Land Use Ordinance
MGD	Million gallons per day
NOP	Notice of Preparation
WRRF	Water Resource Recycling Facility

## 5. References

Cayucos Sanitary District

Regional Water Quality Control Board, Central Coast Region, Water Quality Control Plan for the Central Coastal Basin June 2011

San Luis Obispo County Department of Planning and Building, Estero Area Plan, 2006

San Luis Obispo County Department of Planning and Building, North County Area Plan, 2014

San Luis Obispo County Department of Planning and Building, Coastal Zone Land Use Ordinance, Title 23 Of the County Code

San Luis Obispo County Department of Planning and Building, Land Use Ordinance – Inland, Title 22 of the County Code

San Luis Obispo County 2012 Master Water Report

San Luis Obispo County 2040 Population, Housing & Employment Forecast, 2014

San Luis Obispo Local Agency Formation Commission Sphere Of Influence Update & Municipal Service Review Cayucos Special Districts, January 2015

## L. LAND USE AND PLANNING

## 1. Environmental Issue

The CSWP must be found to be consistent with the relevant goals, policies and programs governing the development of public facilities in the unincorporated County. The following discussion focuses on consistency with the San Luis Obispo County General Plan/Local Coastal Program, the County's Land Use Ordinances and the relevant provisions of the Coastal Act.

# 2. Sources Used In This Analysis

This analysis is based on a review of applicable law, local planning documents, and publications including:

- San Luis Obispo County General Plan and Local Coastal Program
- The County's Coastal Plan Policies
- County Land Use Ordinances (Title 22 and 23 of the County Code)
- The 2016 Policies and Procedures of the Local Agency Formation Commission.

A complete list of references is provided at the end of this section.

# 3. Scoping Issues for Land Use and Planning

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. The following issues relating to general plan consistency was raised during the scoping process and is addressed in this section:

- County Department of Planning and Building. Consider relevant sections of the Land Use Ordinance and provide a complete general plan consistency analysis.
- San Luis Obispo Location Agency Formation Commission (LAFCo), Consider annexing the treatment plant site into the CSD. Apply LAFCo Guidelines for regarding the protection of agricultural land.
- County Agriculture Department. Assess project consistency with Agriculture Element policies including land conversion, location of improvements, buffering, and agriculture land divisions.
- Californai Coastal Commission. Proved a clear description of where all the Project components are located relative to permit jurisdictional boundaries. (This subject is addressed in Section I-Project Description and this section.)

## 4. Environmental and Regulatory Setting

## **Regulatory Setting**

## SAN LUIS OBISPO COUNTY GENERAL PLAN

Every city and county in California is required by the Government Code to adopt a general plan to govern land use decisions within its jurisdiction. State law prescribes seven mandatory elements for every general plan. They are:

Land Use Circulation
Housing Conservation

Open Space Safety

Noise

In addition, the Government Code provides for the adoption of additional elements to address specific topics of concern to a particular jurisdiction. For example, the County has adopted an optional Agriculture element, in recognition of the important roll agriculture plays in the County's economy.

The CSWP components will be located entirely within the unincorporated county and subject to the land use regulations of the San Luis Obispo County General Plan and Land Use Ordinances.

#### **Land Use Element**

The Land Use Element of the County General Plan has been organized into four sub-components to address the combined requirements of the Coastal Act (for areas within the coastal zone) and the State Planning and Zoning Law (Government Code Section 65000 et seq.).

**Framework for Planning**. The Framework for Planning describes the overall structure for land use management within the unincorporated County. The Framework describes the relationships among land use, circulation, and public services, as well as programs for implementing and administering relevant land use policies. The Framework for Planning also defines the various land use categories applied to the unincorporated areas of the County, and provides a table (Table "O") which describes the range of allowable land uses for each land use category.

The Area Plans. Owing to the diversity of environmental and regulatory issues facing San Luis Obispo County, the Land Use and Circulation Elements are divided into Area Plans that provide policy guidance tailored to particular regions. Development in the community of Cayucos and surrounding properties within the Coastal Zone is subject to the *Estero Area Plan/Certified Local Coastal Program*. Development landward of the Coastal Zone, including the Project Site and Alternative Site, is governed by the *North County Area Plan*. (Map I-1, in section I Project Description). Because the conveyance portions of the CSWP will cross the boundaries governed by each Plan, this assessment necessarily considers both.

**Official Maps**. The official maps illustrate the boundaries of the various land use categories as they are applied to the unincorporated areas of the County.

Local Coastal Program Policy Document. In addition to the mandatory elements prescribed by State law, city's and counties must prepare a *Local Coastal Program* to govern land use decisions for all portions of their jurisdiction located within the coastal zone as defined by Public Resources Code section 30000 et seq. (the Coastal Act). The *Coastal Act Policy Document* describes specific policies and programs to implement the Coastal Act in San Luis Obispo County and covers such diverse topics as shoreline access; energy and industrial development; commercial fishing and recreational boating; environmental resources and sensitive habitats; agriculture; public works; coastal watersheds; visual resources; coastal hazards; archeological resources and air quality. The *Coastal Act Policy Document*, together with the Coastal Zone Land Use Ordinance (CZLUO) contain the land use development standards and policy guidance for land use decisions within the coastal zone.

#### **Agriculture Element**

The Agriculture Element focuses on the wise management and protection of agricultural resources in San Luis Obispo County. In accordance with the County's mission statement, the Agriculture Element "...seeks to enhance the economic, environmental and social quality of life in San Luis Obispo County...,". The mission of the Agriculture element is to Identify those areas of the county with productive farms, ranches and soils, and establish goals, policies and implementation measures that will enable their long-term stability and productivity. Accordingly, the goals of the Agriculture Element are:

- AG 1: Support county agricultural production.
- AG 2: Conserve agricultural resources.
- AG 3: Protect agricultural lands.
- AG 4: Encourage public education and participation.

## **Conservation/Open Space Element**

The Conservation and Open Space Element (COSE) of the County General Plan sets forth policies to protect the natural resources of the County, including air quality, agricultural soils, important viewsheds and biological resources, among others. The main objectives of the COSE are to:

- Promote efforts that will prevent or eliminate damage to the environment;
- Support environmental restoration;
- Protect the health and welfare of the community;
- Preserve ecological systems; and
- Ensure long-term economic, social and environmental vitality.

## **Combining Designations**

Combining designations are special overlay categories applied in areas with hazardous conditions or special resources, where more detailed project review is needed. Table IV-L1 provides an overview of various regulatory attributes of the Project Site and Alternative Site.

As shown on Table IV-L1, neither the Project Site nor the Alternative Site are subject to the combining designations of the North County Area Plan.

Table IV-L1 Selected Attributes of th	e Project Site and	Alternative Site
Attributes	Project Site	Alternative Site
APN	073-077-034	073-093-011
Approx. Acreage Of Parent Parcel	221.1	215.0
General Plan Land Use Designation	Agriculture	Agriculture
Combining Designations*:		
Geologic Study Area	No	No
Flood Hazard	No	No
Sensitive Resource Area	No	No
Archaeological Sensitive Area	No	No
Energy Extraction Area	No	No
Farmland Mapping and Monitoring Program Classification*	Prime	Prime
LCA Contract*	No	No

<sup>\*</sup> Applicable to area of influence..

Sources: San Luis Obispo County General Plan and Land Use Ordinances (Title 22 and 23 of the County Code), Department of Conservation Farmland Mapping and Monitoring Program, County Assessor

#### **Strategic Growth Principles**

In 2011, the County adopted a set of Strategic Growth Principles. The purpose of these principles and policies is to better define and focus the county's proactive planning approach and balance environmental, economic and social equity concerns. This approach includes strategic planning, which considers constraints and opportunities and identifies realistic, short-term strategies that will achieve longer-term goals. Accordingly, the combination of smart growth and strategic planning is considered "strategic growth," which seeks cooperation among communities to resolve concerns, respect resource limitations and enhance economic prosperity. In sum, the Strategic Growth Principles are intended to:

- 1. Preserve open space, scenic natural beauty and sensitive environmental areas. Conserve energy resources. Conserve agricultural resources and protect agricultural land.
- 2. Strengthen and direct development towards existing and strategically planned communities.
- 3. Foster distinctive, attractive communities with a strong sense of place.
- 4. Create walkable neighborhoods and towns.
- 5. Provide a variety of transportation choices.
- 6. Create a range of housing opportunities and choices.
- 7. Encourage mixed land uses.
- 8. Take advantage of compact building design.
- 9. Make development decisions predictable, fair and cost-effective.
- 10. Encourage community and stakeholder collaboration.
- 11. Strengthen regional cooperation.

#### Land Use Ordinance -- Inland

All development in the unincorporated County landward of the Coastal Zone is subject to the Inland portion of the County Land Use ordinance (LUO, Title 22 of the County Code). The Project Site and Alternative Site are located on land within the *Agriculture* land use category.

#### **Coastal Zone Land Use Ordinance**

Development within the Coastal Zone as defined by the Coastal Act of 1976 is subject to the Coastal Zone Land Use Ordinance (CZLUO). As set forth in Section 30106 of the Coastal Act, "development" in the Coastal Zone means:

"... construction, reconstruction, demolition, or alteration of size of any structure, including any facility of any private, public or municipal utility..."

As used in the CZLUO, "structure includes, but is not limited to, any building, road, pipe, flume, conduit, siphon, aqueduct, telephone line, and electrical power transmission and distribution line."

Construction of pipelines and other facilities within the Coastal Zone in support of the CSWP will require the approval of a Coastal Development Permit by the County.

Policies for Participation In the Nacimiento Water Project for County Service Area 10A The Board of Supervisors, on behalf of County Service Area 10A, voted to join the Nacimiento Water Project in October, 2004. As part of that action, the Board adopted Supplemental Water Policies for CSA10A as follows:

- The capital costs incurred by CSA 10A as a result of participating in the Nacimiento Water Project shall be included in the connection fees charged to new development, in accordance with applicable law. Connection costs allocated to new development shall also include an annual adjustment to cover the cost of borrowing.
- Reserves that have been established for Nacimiento as a result of prior connection
  fees will be utilized for "rate stabilization" purposes. The Nacimiento reserves and
  connection fee revenues shall be separately accounted for so that the capital and
  debt costs for Nacimiento are paid from these sources before utilizing any other CSA
  10A source of funding.
- 3. As of April 27, 2004, the CSA 10A participation in the Nacimiento Water Project is "tentative". Final approval shall be executed by contract; a) after an equitable water exchange for Whale Rock water has been secured or; b) subject to an equitable water exchange for Whale Rock water.

In addition, on December 8, 2015 the Board voted to direct Public Works staff to initiate the process of acquiring an additional allocation of Nacimiento Project Water on behalf of CSA 10A and to develop policies designed to match available water supply with existing General Plan/Local Coastal Plan policies. These policies are intended to ensure that any growth which occurs as a result of the additional water allocation is within the bounds of the approved General Plan.

## San Luis Obispo Local Agency Formation Commission (LAFCo)

San Luis Obispo Local Agency Formation Commission (LAFCO) implements the Knox-Cortese-Hertzberg Act of 2000. More specifically LAFCO:

- Considers proposals for the formation of new local governmental agencies including Cities and Special Districts. LAFCO is also responsible for considering annexations and detachments for agencies. LAFCO also determines the Sphere of Influence, which is a plan for the probable physical boundary of a City or Special District.
- Reviews proposals based on a variety of factors including: a plan for services submitted by the agency, resource and infrastructure capacity, and the need for services.
- Considers the impact that a proposal may have on existing agricultural lands with focus on prime agricultural lands. San Luis Obispo LAFCO has adopted specific policies regarding the preservation of agricultural resources.
- Discourages urban sprawl. Urban sprawl can best be described as irregular and disorganized growth occurring without apparent design or plan. By discouraging sprawl, LAFCO limits the misuse of land resources and promotes a more efficient system of services by local governmental agencies.

#### CITY OF MORRO BAY LOCAL COASTAL PLAN

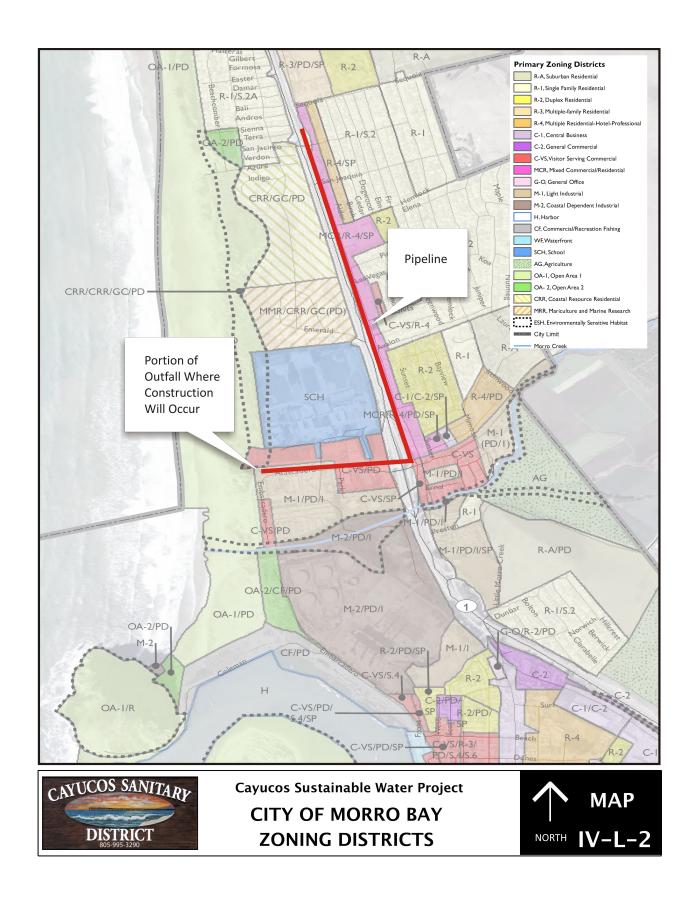
The City of Morro Bay Local Coastal Plan (LCP) was adopted in xxx. According to the City Website, "The City of Morro Bay is currently undertaking a two-year process to update the City's General Plan and Local Coastal Plan, as required by California state law. The documents will look toward the future of our community and address issues such as transportation, housing, open space, conservation, safety, and more. The final documents, the "blueprint" and the "greenprint," will present the City's intended long-term development and conservation policies. A program environmental impact report (EIR) will be prepared to address the potential impacts of these plans, and comprehensive updates to the Zoning Ordinance and Local Implementation Plan will follow to ensure they are aligned with the General Plan and Local Coastal Program."

The Draft Community Baseline Assessment prepared as part of the LCP update indicates:

"Utilities are the facilities necessary to run the City effectively and efficiently since loss of water, sewer, or power would significantly disrupt quality of life for residents. Critical infrastructure facilities in the city include the PG&E substation, City desalination facility and the Morro Bay Wastewater Treatment Plant. Components of these facilities, such as sewer pump stations and electrical transformers, are also vulnerable in that flood damages could result in utility service disruptions.

Currently, there are no major utility systems or components identified as vulnerable to coastal hazards. However, important facilities such as the PG&E substation and wastewater treatment plant are located within the FEMA 100-year floodplain of Morro Creek."

Both Morro Bay and the CSD are undertaking projects to relocate the existing WWTF out of the Coastal hazard area. The existing outfall to the ocean will be retained for use by both the City and the CSD. As an existing permitted use the CSD action to continue wastewater flows to the outfall is consistent with the adopted LCP and would likewise be consistent with the LCP Update. Likewise construction of pipelines in the City rights of way is consistent with LCP policy and Zoning Code. Map IV-L-2 shows the relationship of the pipelines to land uses.



## **Environmental Setting**

#### PROJECT SITE

The project site consists of about 221 acres located on Toro Creek Road about 0.75 miles east of State Route 1 between the City of Morro Bay and the community of Cayucos. The project site occupies a portion of an alluvial plain formed along the southern side of Toro Creek, an ephemeral creek that flows to the ocean from the foothills of the Santa Lucia Range. Surrounding land uses include grazing and dry farming on agricultural properties of 80 or more acres. To the west is a tank farm associated with petroleum operations. There are no structures or other improvements on the project site except for a shed housing an existing well; the nearest dwellings are located approximately 0.5 miles to the west along Toro Creek Road and another farmhouse located approximately 0.7 miles to the east. A portion of the Project Site has been cultivated as recently as 2015. At the time of distribution of the Notice of Preparation, the site was fallow.

## **ALTERNATIVE PROJECT SITE**

The Alternative Site consists of about 215 acres located on the north side of Montecito Road and east of Old Creek Road along Willow Creek, about 1.2 miles east of the community of Cayucos. The project site contains two dwellings and agricultural accessory structures. At the time of distribution of the Notice of Preparation, the site was under cultivation with lima beans.

# 5. Standards of Significance

In accordance with Appendix G of the State CEQA Guidelines, the Proposed Project could have a significant adverse impact on the environment if it would:

- Physically divide an established community.
- Conflict with 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.
- Conflict with any applicable habitat conservation plan or natural community conservation plan.

# 6. Project Impacts and Mitigation Measures

## **METHODOLOGY**

The various components of the project were compared with relevant policies and standards for consistency.

### CONSISTENCY WITH THE SAN LUIS OBISPO COUNTY GENERAL PLAN

**Impact LU-1:** The project will not divide an existing community. This impact is considered less than significant (Class III).

Analysis of Consistency. The project involves construction of a WRRF and conveyance facilities for the area served by the Cayucos Sanitary District. As described in the Project Description, the WRRF will be located on one of two site located outside of the community and will occupy about 7 acres of a larger agricultural parcel. All of the conveyance infrastructure will be constructed in trenches within existing rights-of-way and will not result in a physical barrier.

**Impact LU-2:** The project will not conflict with an applicable County land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, local coastal plan and policies, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect. This impact is considered less than significant (Class III).

### Land Use Element

The Land Use Element of the County General Plan contains the Framework for Planning which provides an overview of land use management strategies and broad policies and implementation programs that apply countywide.

Goal, Policy or Ordin	ance Analysis of Consistency
General Goals, Objectives and Implement Goal 2: Strengthen and direct developed existing and strategically planned com	ment toward
3. Public Services and Facilities - Avoir resources, services, and facilities beyo capacities.  a. Planning for and monitoring new of the Resource Management Systemanagement strategies, to ensure demands will not exceed existing capacities, or service levels.  b. Sharing the cost of additional service fairly among those who most immethe entire community.  c. Locating new public service facility possible to the users. If facilities a areas, allow for sufficient buffers the environmentally sensitive, and agoing the environmentally sensitive, and agoing the providing adequate community are natural areas and trails in support which will support a high quality of form of community development.	development through m and growth e that resource and planned vices and facilities ediately benefit and ies as close as ire necessary in rural to protect ricultural areas. If overburdening facilities, menities, parks, of new development,
Public Services  The Land Use Element provides the follow the provision of public services, such as well as the provision of public services, such as well as the Land Use Element within the sust resources, public services and facilities as Avoid the use of public resources facilities beyond their renewable monitor new development to ensure demands will not exceed existing capacities or service levels.  b. Share the cost of additional services among those who most immediate entire community.  c. Locate new public service facilities possible to users, allowing for supprotect adjacent rural and agriculation of urban services and restrict urban services outside urban or village areas.	restewater treatment:  If growth allowed by tainable capacity of es.  If so, services and capacities, and the capacities, and the capacities and planned  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.  If was a close as estifficient buffers to litural areas.
Phase urban development in a compusing vacant or underutilized "infill" pato or near existing development, so the transportation and services are development.	can occur with or without a the CSWP project.

Goal, Policy or Ordinance	Analysis of Consistency
efficient pattern.	
<ul> <li>a. Give high priority and support for urban expansion that will result in compact neighborhoods with diverse yet related land uses for housing, school, recreation, work and shopping rather than low density suburban residential development.</li> <li>b. Give high priority and support for urban expansion that proposes attractive transitions from existing development, connections to existing streets and prominent pedestrian and public transit connections to destinations.</li> <li>Discourage low-density suburban or rural residential proposals for urban expansion or services.</li> </ul>	
<ul> <li>3. Provide additional public resources, services and facilities in sufficient time to avoid overburdening existing resources, services and facilities while sustaining their availability for future generations.</li> <li>a. Conduct long-term planning (20+ years) to fund and provide additional, sustainable public resources, services and facilities in sufficient time to avoid overburdening existing resources, services and facilities.</li> <li>b. Schedule development to occur when needed services are available or can be supplied concurrently.</li> </ul>	The CSWP is being pursued to comply with a Coastal Commission directive to relocate the CSD's current wastewater treatment facilities in Morro Bay in advance of the rise in sea level expected to occur over the next 50 years.  The WRRF is sized for buildout of the CSD service area under the General Plan.
Other policies of the Land Use Element are aimed at protecting the County's agricultural resources:  • Encourage the protection and use of agricultural land for the production of food, fiber and other agricultural commodities, and support the rural economy and locally-based commercial agriculture.  • Maintain rural areas in agriculture, low intensity recreation, very low-density residential uses, and open space uses that preserve and enhance a well-defined rural character.	As discussed in the Regulatory Setting, the WRRF would be considered a conditionally allowable use within the Agriculture land use category. Approval of the CSWP on the Project Site or Alternative site would require a finding of consistency with these polices.
Strategic Growth Principles Principle 1: Preserve open space, scenic natural beauty and natural resources. Conserve energy resources. Protect agricultural land and resources. Principle 2: Strengthen and direct development toward existing and strategically planned communities. Principle 3: Foster distinctive, attractive communities with a strong sense of place. Principle 4: Create walkable neighborhoods and towns. Principle 5: Provide a variety of transportation choices. Principle 6: Create a range of housing opportunities and choices. Principle 7: Encourage mixed land uses. Principle 8: Take advantage of compact building design. Principle 9: Make development decisions predictable, fair and cost-effective. Principle 10: Encourage community and stakeholder collaboration. Principle 11: Strengthen regional cooperation.	The project consists of construction of a WRRF and conveyance infrastructure to serve the Cayucos Sanitary District. The project will result in the permanent conversion of Prime agricultural land as defined by the County. The project will help partially mitigate for the conversion of this land by:  Dedicating a conservation easement over portions of the CSD property. Establishing buffers around the treatment plant to protect ongoing agricultural operations. 40AFY of tertiary treated

Goal, Policy or Ordinance	Analysis of Consistency
	<ul> <li>water</li> <li>Sizing the treatment plant to serve the buildout population of the CSD.</li> </ul>
	Principles 2, 3, 4, 5, 6, 7, 8, 9 are not applicable. In determining the preferred location for the WRRF, the CSD conducted extensive public outreach and stakeholder meetings.

## **Agriculture Element**

Policies of the Agriculture Element encourage the protection of agricultural resources:

• Encourage eligible property owners to participate in the county's agricultural preserve program.

*Analysis of Consistency.* Neither the Project Site nor the Alternative Site are subject to active Williamson Act Contracts. However, construction of the WRRF would not preclude entering into a contract on the remaining eligible portions.

 Locate new buildings, access roads, and structures so as to protect agricultural land.

*Analysis of Consistency.* Construction of the WRRF on either the Project Site or the Alternative Site would result in the permanent loss of prime agricultural land.

- Where a land division is proposed, the proposed parcels should be designed to ensure the long term protection of agricultural resources.
- Minimum parcel sizes for the proposed division of land designated Agriculture shall be based upon the existing and potential use of the land for cropland and grazing. Minimum parcel size standards for the creation of new parcels are shown in Figure 2-2.

Analysis of Consistency. The project will involve the creation of a seven-acre public lot where the WRRF will be constructed. Figure 2-2 of the Agriculture Element provides standards for the minimum parcel size to be maintained in the Agriculture land use category to ensure the viability of ongoing agricultural operations, based on the Natural Resources Conservation Service farmland land capability classifications<sup>1</sup>. Table IV-J.2 compares the acreage of the parcel size for each Candidate Site with these minimum parcel requirements following the removal of seven acres for the CSWP.

CAYUCOS SUSTAINABLE WATER PROJECT

<sup>&</sup>lt;sup>1</sup> The NRCS farmland capability classification system ranges from Class I (highest, or "prime") to Class VIII which are soils that have limitations that preclude their use for commercial plant production.

Table IV-L2 Minimum Parcel Size Requirements						
Site	Acres of Parent Parcel Classification (Acres)  NRCS Land Capability Parcel Size (Acres)					el Size
	Parcel	Minus 7 Acres for WRRF	Non- Irrigated		Non-Irrigated	Irrigated
Alternative Site	215.0	208.0	3	2	160.0	40
Project Site	221.1	214.1	3	2	160.0	40

As shown in Table IV-L2, the both sites would continue to meet the minimum parcel size for irrigated and non-irrigated parcels following a seven-acre reduction for the CSWP. The project includes the production of tertiary water for agriculture use which would be applied to the remaining area of the parent parcels of the either the Project Site or the Alternative Site.

- Discourage the conversion of agricultural lands to non-agricultural uses through the following actions:
  - 1. Work in cooperation with the incorporated cities, service districts, school districts, the County Department of Agriculture, the Agricultural Advisory Liaison Board, Farm Bureau, and affected community advisory groups to establish urban service and urban reserve lines and village reserve lines that will protect agricultural land and will stabilize agriculture at the urban fringe.
  - 2. Establish clear criteria in this plan and the Land Use Element for changing the designation of land from Agriculture to non-agricultural designations.
  - 3. Avoid land redesignation (rezoning) that would create new rural residential development outside the urban and village reserve lines.
  - 4. Avoid locating new public facilities outside urban and village reserve lines unless they serve a rural function or there is no feasible alternative location within the urban and village reserve lines.

Analysis of Consistency. Construction of the CSWP will result in the permanent conversion of land designated Agriculture to a non-agricultural use. The Project Site and Alternative site both contain Prime agricultural soils, based on the definition used by the County. As discussed above, the CSWP would be considered a conditionally allowable use in the Agriculture land use category and would not require a change to the land use designation for any of the Candidate Sites. There are no feasible alternative locations within the Cayucos Urban Reserve Line to accommodate a wastewater treatment plant.

Land surrounding the Project Site and Alternative Site is used for crop production or grazing. The CSWP does not introduce new residents or additional population to the area that would be affected by noise, chemical and fertilizer use associated with ongoing agricultural operations. In addition, operation of the CSWP does not require a significant number of employees, generate traffic or other activities that would be incompatible with agriculture.

Based on the extensive screening analysis performed by the CSD, a suitable location for the WRRF does not exist within the boundaries of the Cayucos Sanitary District.

## San Luis Obispo County Agricultural Buffer Policies and Procedures

The County has adopted agricultural buffer policies and procedures to promote and protect agriculture, to protect public health and safety and to provide decision makers with technical assistance to address land use compatibility issues affecting agriculture. Buffer determinations and other mitigation measures are made on a case-by-case basis considering established buffer distance ranges and all relevant factors.

Agricultural practices associated with the production of crops are the most important contributing factor to land use conflict when development occurs in close proximity to agricultural uses. Since production practices vary considerably by type of crop, buffer distances may vary accordingly as shown in the following table

Analysis of Consistency. The project proposes to create a seven-acre public lot which will be occupied by the WRRF. Minimum agricultural buffer areas consistent with the above table will be provided around the WRRF to protect occupants of the WRRF and to protect ongoing agricultural operations (Map I-6 Landscape, Defensible Space and Buffer Plan)

## **Open Space and Conservation Element**

The Conservation and Open Space Element of the County General Plan sets forth policies to protect the natural resources of the County, including agricultural soils, important viewsheds and biological resources.

Policy	Analysis of Consistency
Policy SL 3.1 Conserve Important Agricultural Soils Conserve the Important Agricultural Soils mapped in Figure SL-1 and listed in Table SL-2. Proposed conversion of agricultural lands to nonagricultural uses shall be evaluated against the applicable policies in this COSE and in the Agriculture Element, including policies such as Policies AGP 18 and AGP 24.	The protection of agricultural land is discussed above under the Agriculture Element. The project will result in the permanent conversion of Prime Farmland as defined by the Conservation and Open Space Element. Accordingly, the project is not consistent with policy SL3.1.
Policy VR 1.1 Adopt Scenic Protection Standards. Protect scenic views and landscapes, especially visual Sensitive Resource Areas (SRAs) from incompatible development and land uses	With regard to view protection, land within the Coastal Zone between Morro Bay and Cayucos outside the city limits and the Cayucos Urban Reserve has been identified as the Highway 1 - Cayucos Critical
Policy VR 4.1 Designation of Scenic Corridors. Designate scenic corridors based on the recommendations for Scenic Corridor Studies, for the candidate roads and highways listed in Table VR-2.	Viewshed. New development in this area is subject to the view protection regulations of Chapter 23.04 of the Coastal Zone Land Use Ordinance. Neither the Project Site nor the Alternative Site are located within the Critical Viewshed Area.

## Estero Area Plan

Policy or Program	Analysis of Consistency
Public Facilities, Services and Resources	
2. Cayucos Water Supply.  Policy: Facilitate provision of supplemental water to accommodate future development.  Program. CSA 10A and applicable water purveyors should continue to pursue obtaining supplemental source(s) of water to accommodate buildout.	The CSWP proposes to construct a pipeline to convey between 330 – 520 acre-feet of tertiary treated water from the WRRF to the CSA 10 water treatment plant which could be used to augment water supplies for the community.
Program A. Water Supply  7. Graywater Recycling. The county should work with the public to encourage development and use of large-scale graywater recycling projects for irrigation in new development.	The CSWP proposes to provide up to 40 acre-feet of tertiary treated water for agriculture irrigation.
Program B. Wastewater  1. Wastewater Recycling. Sewage disposal agencies should work with the County Public Works and Health Departments and the Regional Water Quality Control Board to develop a program to find alternative uses for treated wastewater, such as irrigation (e.g. on agricultural lands and the Morro Bay Golf Course), groundwater recharge, and environmental enhancement.	The CSWP proposes to construct a pipeline to convey between 330 – 520 acre-feet of tertiary treated water from the WRRF to the CSA 10 water treatment plant which could be used to augment water supplies for the community.  The CSWP proposes to provide up to 40 acre-feet of tertiary treated water for agriculture irrigation.

## **County Land Use Ordinance - Inland**

According to Table 2-2 of the LUO, *Public Utility Facilities* (which includes wastewater treatment facilities) is an allowed use in the *Agriculture* land use category subject to the approval of a Conditional Use Permit (CUP) by the County Planning Commission.

Ordinance Section	Analysis of Consistency
Section 22.06.030: Allowable Land Uses and Permit Requirements. Table 2-2 identifies the uses of land allowed by the Land Use Ordinance in each land use category, and the land use permit required to establish each use, in compliance with Section 22.04.030 (General Requirements for Development and New Land Uses).	According to Table 2-2 of the LUO, <i>Public Utility Facilities</i> (which includes wastewater treatment facilities) is an allowed use in the <i>Agriculture</i> land use category subject to the approval of a Conditional Use Permit (CUP) by the County Planning Commission.
<b>22.10.030: Air Quality.</b> This Subsection establishes a procedure for the notification of the County APCD when a new land use is proposed to include equipment or activities that involve combustion, or the storage or use of hydrocarbons or other air contaminants.	The project was referred to the San Luis Obispo Air Pollution Control District in accordance with the requirements of this section. Project impacts to air quality are discussed in Section IV-I of this DEIR.
22.10.040: Archaeological Resources. This section establishes standards that apply in the event archaeological resources are unearthed or discovered during any construction activities.	Project impacts to archaeological resources are discussed in Section IV-E of this DEIR. Construction of the project on either the Project Site or Alternative site, and the installation of underground conveyances have the potential to unearth previously undiscovered archaeological resources. Accordingly, mitigation measure is

Ordinance Section	Analysis of Consistency
Oranianoe deciron	recommended which incorporates the standards set forth in Section 22.10.040. [This needs to go in the regulatory setting of Cultural Resources]
22.10.060: Exterior Lighting. The standards of this Section are applicable to all outdoor night-lighting sources installed after the effective date of this Title, except for street lights located within public rights-of-way and all uses established in the Agriculture land use category.	The WRRF will incorporate security lighting on the exterior of buildings. The lights will be designed and located to minimize off-site illumination and glare. However, the lighting standards of this section do not apply to the Project Site or Alternative Site because both are located in the Agriculture land use category. Refer to section IV-F for measures to limit impacts form night lighting.
	Project use and storage of hazardous materials is discussed in Section IV-J of this DEIR. Construction activities associated with the WRRF on either the Project Site or Alternative Site, decommissioning of the existing WWTF and pipeline conveyances may involve the limited transport, storage, usage, or disposal of hazardous materials, such petroleum products for fueling and servicing of construction equipment. This short-term activity would be subject to federal, state, and local health and safety requirements for the proper handling and use of fueling and other petroleum and automotive products.
	In addition, operation of the WRRF on either the Project Site or Alternative Site will involve the transport, storage, usage, and disposal of hazardous materials associated with the wastewater treatment process. Chemicals will be added throughout the wastewater treatment process to provide an alkalinity source, control odors, improve sludge conditioning, disinfect the water, and clean the Membrane Bioreactor (MBR) membranes.
22.10.070: Flammable and Combustible Liquids Storage. The storage of flammable or combustible liquids (those with flash points below 140F) is subject to the standards of this section.	The use, storage, and transport of hazardous materials is regulated by the Department of Toxic Substances Control (DTSC) (22 Cal. Code of Regulations Section 66001, et seq.). Mitigation for the potential release of hazardous materials associated with the use of hazardous materials on the project site will be provided by compliance with local, state, and federal regulations. The project will comply with the permitting, uses and limitations on quantities set forth in this section. There will be no above-ground storage of combustible liquids except for the fuel tank for the backup generator which will be set back from the property lines in accordance with applicable provisions of the Uniform Fire Code or Uniform Building Code. In addition, recommended mitigation measures require preparation of a Hazardous Materials Business Plan in accordance with California Health and Safety Code Sections 25503 and 25505 to be submitted to, and approved by, the San Luis Obispo County Department of Environmental

Ordinance Section	Analysis of Consistency
	Health.
22.10.080: Fencing and Screening. Standards for fencing and screening are established by this Section to protect certain uses from intrusion, to protect the public from uses that may be hazardous, and to increase compatibility between different land uses by visual screening.	The WRRF site will be fenced and screened by perimeter landscaping. However, the standards of this section do not apply outside urban or village reserve lines, nor within the Agriculture land use category. Section 22.30.370 sets forth special use standards for public utility facilities such as a wastewater treatment plant. Section 22.30.070 D. requires a public utility facility to be screened on all sides.
22.10.090: Height Measurement and Height Limit Exceptions. This Section limits the height of structures as needed to: support public safety; protect access to natural light, ventilation, and direct sunlight; support the preservation of neighborhood character; and to preserve viewsheds and scenic vistas.  22.10.110: Minimum Site Area. Minimum	The height limit within the Agriculture land use category is 35 feet measured from the average natural grade. The WRRF will be no more than 35 feet above the average natural grade in compliance with this section.
site area is the smallest existing lot size for which a building permit will be issued.	There is no minimum site area required for the Agriculture land use category.
Section 22.10.120: Noise Standards. This Section establishes standards for acceptable exterior and interior noise levels and describe how noise shall be measured. Maximum allowed interior and exterior noise levels are established.	The Project Site and Alternative Site are located in a rural part of the County with no sensitive noise receptors within one mile. Noise will be generated during construction activities and during operation of the CSWP. Potential noise impacts associated with construction and operation of the CSWP are discussed in Section IV-H of this DEIR. The CSWP is designed to comply with these standards. The noise standards do not apply to noise sources associated with construction, provided such activities do not take place before 7 a.m. or after 9 p.m. on any day except Saturday or Sunday, or before 8 a.m. or after 5 p.m. on Saturday or Sunday. In addition, the standards do not apply to noise sources associated with agricultural land uses.
Section 22.10.140: Setbacks. This Section determines the minimum size and allowable uses of setbacks for buildings.	The required setbacks for the Agriculture land use category are as follows:  Front: 25 feet Side: 10% of the lot width to a maximum of 25 feet. Rear: 30 feet  As shown in the project description, the WRRF
Section 22.10.155: Stormwater Management. The requirements in this Section are intended to reduce pollutant discharges to the Maximum Extent Practicable and to prevent stormwater discharges from causing or contributing to a violation of receiving water quality standards, also known as post-construction stormwater management.	meets or exceeds these required setbacks.  The requirements of this section are applicable only where a project will drain to those areas designated by the State Water Resources Control Board (SWRCB) as traditional or non-traditional Municipal Separate Storm Sewer Systems (MS4s). Neither the Project Site, Alternative Site nor the conveyance areas are within an MS4 area, refer to section IV-D.
Section 22.10.160: Underground Utilities. Utilities serving new structures shall be installed underground rather than by the use of poles and overhead lines, and where applicable shall be installed in accordance with California Public Utilities Commission	This requirement does not apply to new structures on parcels of five acres or larger, or requiring uninterrupted utility runs of five hundred feet or more. The Project Site and Alternative Site are well over five acres.

Ordinance Section	Analysis of Consistency
rules and regulations.	
Section 22.10.170 Vibration. Any land use conducted in or within one-half mile of an urban or village reserve line shall be operated to not produce detrimental earth-borne vibrations as determined by this section.	These standards do not apply to the Agriculture land use category.
Section 22.10.180: Water Quality. This Section establishes a procedure for the notification of the California Central Coast Regional Water Quality Control Board (RWQCB) when a new land use or modification to an existing use may affect groundwater quality because of proposed methods of disposal, or large volumes of wastewater, or because of the disturbance of natural soil contours.	The project has been referred to the RWQCB in accordance with this section. The project is designed to comply with the discharge requirements of the RWQCB.
Section 22.14.060: Flood Hazard Area. The Flood Hazard (FH) combining designation is applied to areas where terrain characteristics would present new developments and their users with potential hazards to life and property from potential inundation by a 100-year frequency flood or within coastal high hazard areas. These standards are also intended to minimize the effects of development on drainage ways and watercourses.	Neither the Project Site nor Alternative site are located within a 100 year flood plain. Potential impacts associated with flooding and erosion are discussed in Section IV-D of this EIR. A preliminary geotechnical analysis of the Project Site was conducted in 2015, refer to EIR section IV-A.
Section 22.14.070: Geologic Study Area. The Geologic Study Area (GSA) combining designation is applied to areas where geologic and soil conditions could present new developments and their users with potential hazards to life and property.	The Project Site and Alternative site are located within the Geologic Study Area combining designation. Potential impacts associated with geologic and seismic hazards are discussed in Section IV-A of this DEIR. A preliminary geotechnical analysis of the Project Site was conducted in 2015 and was used to inform the design of the WRRF.
<b>22.14.100:</b> Sensitive Resource Area. The Sensitive Resource Area (SRA) combining designation is applied to areas of the county with special environmental qualities, or areas containing unique or endangered vegetation or habitat resources.	The Project Site, Alternative Site and conveyances are not located within the Sensitive Resource Area combining designation.
Section 22.16: Landscaping Standards. The standards of this Chapter are intended to: provide areas that can absorb rainfall to assist in reducing storm water runoff and controlling erosion; preserve natural resources; promote, preserve and enhance native plant species; reduce glare and noise; enhance the appearance of structures and property; and to provide privacy; while recognizing the need to use water resources as efficiently as possible.	The standards of this section do not apply to the Agriculture land use category. However, Section 22.30.370 sets forth special use standards for public utility facilities such as a wastewater treatment plant. Section 22.30.070 D. requires a public utility facility to be screened on all sides which may be accomplished by landscaping. Accordingly, the perimeter of the WRRF will be fenced and landscaped, see EIR section I map I-6.
Section 22.18: Parking and Loading Standards. The parking and loading standards provided by this Chapter are intended to: minimize street congestion and traffic hazards; provide safe and convenient access to businesses, public services, and places of public assembly; and to make the appearance of parking areas more	The parking requirement for a Public Utility Center is none, provided sufficient usable area is available to accommodate all employee and visitor vehicles entirely on-site. As shown in the project description, the WRRF is designed to provide required parking and loading area for employees and deliveries.

Ordinance Section	Analysis of Consistency
compatible with surrounding land uses.	
Section 22.30.360 and 22.30.370 describe certain planning area standards applicable to the development of pipelines and public utility facilities, including the contents of the required CUP application as well as development standards that will apply as conditions of approval.	The CSWP is being designed consistent with the requirements of Sections 22.30.360 and 370. In addition to the provisions of Section 22.30.360 and 370, the development of land on property subject to a Williamson Act Contract must adhere to the County's Rules of Procedure to Implement The California Land Conservation Act of 1965 (discussed below). Neither the Project Site nor the Alternative Site are subject to an active Williamson Act contract.
Section 22.50: Fire Safety. The standards of this Chapter provide for precautions to minimize hazards to life and property in the event of fire.	The project was referred to the County Fire Chief as required by this section. Fire safety impacts are discussed in Section IV-J of this DEIR. Mitigation measures require preparation of a Fire Safety Plan in accordance with the California Fire Code Chapter 4 Emergency Planning and Preparedness.
Section 22.52: Grading and Drainage. The purpose of this Chapter is to establish standards to safeguard the public health, safety and general welfare; minimize erosion and sedimentation; minimize fugitive dust emissions; prevent the loss of agricultural soils; reduce the harmful effects of stormwater runoff; encourage groundwater recharge; protect fish and wildlife; reduce hazards to life and property; reduce drainage problems from new development; enhance slope stability; protect natural, scenic, and cultural resources; prevent environmental damage to public and private property; and to otherwise protect the natural environment.	Project impacts relating to grading and drainage are discussed in chapters IV-D of this DEIR. The project description incorporates a preliminary grading and drainage plan for the WRRF. The grading and drainage plan incorporates Low Impact Development features and is designed to protect surface water quality and prevent on-site and off-site erosion. All of the areas to be graded are on slopes less than 30 percent.  Construction of the conveyances will involve excavation within public rights of way. Cut and fill materials are expected to balance. Mitigation measures are recommended to require construction methods to protect surface and groundwater quality and to minimize the area of disturbance.

# County Land Use Ordinance - Coastal Zone

Ordinance Section	Analysis of Consistency
Section 23.08.286 – Pipelines and Transmission Lines. This section provides planning area standards for the construction of pipelines and transmission lines. The level of permit required depends on the area of site disturbance as follows:	Analysis of Consistency
Permit Requirement Plot Plan Less than 40,000 square feet Minor Use Permit  Development Plan approval is required for all surface facilities, pumping or booster stations for pipelines. A route-specific geologic investigation, design and mitigation program is required as part of the land use permit application for proposed pipelines. Other requirements for the permit application include:  Information on how construction at stream crossings will utilize low-flow periods, incorporate sediment retention devices and minimize time and area of disturbance.  A restoration, erosion control and revegetation plan shall be included in the grading permit application.  Where a pipeline is to be placed through a Sensitive Resource Area, the Development Plan application shall include a field survey by a qualified biologist to assess impacts to the important coastal resources.	The CSD is applying for a Coastal Development Permit for the CSWP which will address the items listed in Section 23.08.286.
Section 23.08.288: Public Utility Facilities. This section describes certain planning area standards applicable to the development of public utility facilities, including the contents of the required CUP application as well as development standards that will apply as conditions of approval.  1. Environmental quality assurance. An environmental quality assurance program covering all aspects of construction and operation shall be submitted prior to construction of any project component. This program will include a schedule and plan for monitoring and demonstrating compliance with all conditions	An environmental quality assurance program covering the items listed above will be prepared as required by the conditions of approval for portions of the project within the Coastal Zone.
required by the Development Plan. Specific requirements of this environmental quality assurance program will be determined during the environmental review process and Development Plan review and approval process.	
2. Clearing and revegetation. The land area exposed and the vegetation removed during construction shall be the minimum necessary to install and operate the facility. Topsoil will be stripped and stored separately. Disturbed areas	Construction of the pipeline conveyances within the Coastal Zone will occur within public rights-of-way and primarily along paved streets. However, exposed land will be revegetated where necessary, see section IV-F mitigation measure VIS-1.

#### **Ordinance Section Analysis of Consistency** no longer required for operation will be regraded, The Project Site and Alternative site are covered with topsoil and replanted during the located outside the Coastal Zone and are next appropriate season. not subject to this standard. 3. Fencing and screening. Public Utility Facilities The Project Site and Alternative site are shall be screened on all sides. An effective visual located outside the Coastal Zone and are barrier will be established through the use of a not subject to this standard. However, the solid wall, fencing and/or landscaping. The WWRF will be completely fenced and adequacy of the proposed screening will be screened by landscaping. determined during the land use permitting process. d. Limitation on use, sensitive environmental areas. Uses shall not be allowed in sensitive areas The Project Site and Alternative site are such as on prime agricultural soils, Sensitive Resource located outside the Coastal Zone and are Areas, Environmentally Sensitive Habitats, or Hazard not subject to this standard. However, the Areas, unless a finding is made by the applicable conveyance pipelines will cross two approval body that there is no other feasible location coastal creeks that contain on or off-site the property. Applications for Public Utility Environmentally Sensitive Habitat. The Facilities in the above sensitive areas shall include a CSWP is being designed to protect feasibility study, prepared by a qualified professional sensitive habitats. Potential impacts to approved by the Environmental Coordinator. The ESHA is discussed in Section IV-C of this feasibility study shall include a constraints analysis, DEIR. and analyze alternative locations. Section 23.08.286: Pipelines and Transmission Lines. This section provides standards for pipeline and communications transmission lines and related facilities within the coastal zone, including permit requirements and permit application contents: i. A route-specific geologic investigation, design and mitigation program will be submitted as part of the land use permit application for proposed pipelines. At minimum, this program shall contain: a. A detailed geologic hazard investigation defining specific hazards; b. An engineering design component showing plans for each hazard identified: The CDP application will include a routegeohazards c. A mitigation component specific geologic investigation demonstrating how and to what extent each pipelines. hazard is reduced; and Final Plans detailing construction methods d. A program of trench inspection to identify any used on stream crossings, restoration and potential geologic hazard not previously noted erosion control will implement mitigation with a mitigation measures program to be measures WQ-1, BIO-3 and BIO-4. instigated prior to pipeline installation. Included in the land use permit application will be information on how construction at stream crossings will utilize low-flow periods, incorporate sediment retention devices and minimize time and area of disturbance. iii. A restoration, erosion control and revegetation plan shall be included in the grading permit application. Where a pipeline is to be placed through a Sensitive Resource Area, the Development Plan

application shall include a field survey by a

#### **Ordinance Section Analysis of Consistency** qualified biologist to assess impacts to the important coastal resources identified in Energy and Industrial Development Policy 7 of the Local Coastal Program Policies Document. Section 23.04.200: Protection of Archaeological Resources. development that is either within 100 feet Portions of the conveyance infrastructure of the bank of a coastal stream (as defined in the will be constructed within 100 feet of a Coastal Zone Land Use Ordinance), or development coastal stream. Potential impacts to archaeological resources are discussed in that is within 300 feet of such stream where the slope of the site is less than 10 percent shall be subject to Section IV-E of this DEIR which includes the standards for the Archaeologically Sensitive Areas measures to protect such resources. Combining Designation in Chapter 23.07. Portions of the conveyance infrastructure will be constructed within 100 feet of a coastal stream that is considered ESHA. Section 23.07.170: Environmentally Sensitive The pipeline routes have been surveyed Habitats. A land use permit application for a project on for biological resources by a qualified a site located within or adjacent to an Environmentally biologist. Potential impacts to biological Sensitive Habitat shall also include a report by a resources, including ESHA, are discussed biologist approved by the Environmental Coordinator. in Section IV-C of this DEIR which includes measures to protect such e. Development standards for environmentally resources. ensure the biological sensitive habitats. All development and land continuance of the ESHA and discussion divisions within or adjacent to an Environmentally of the infeasibility or greater impact of Sensitive Habitat Area shall be designed and alternatives. The project does not include located in a manner which avoids any significant the following: disruption or degradation of habitat values. This standard requires that any project which has the New bridges; potential to cause significant adverse impacts to A land division: an ESHA be redesigned or relocated so as to Development within ESHA to avoid a avoid the impact, or reduce the impact to a less constitutional taking: than significant level where complete avoidance is Diversions of surface and subsurface water within steelhead habitat: not possible. The placement of fish barriers or harm to fish spawning areas; Breaching of the beach berm. Potential impacts to biological resources, 1. Development within an ESHA. In those cases including ESHA, are discussed in Section where development within the ESHA cannot be IV-C of this DEIR which includes avoided, the development shall be modified as measures to protect such resources. necessary so that it is the least environmentally Where necessary, damaged habitats will damaging feasible alternative. Development shall be restored and enhanced. be consistent with the biological continuance of the habitat. Circumstances in The chosen conveyance routes represent which the least environmentally damaging development project would be allowable within an ESHA include: feasible alternative because: i. Resource dependent uses. New development Potential pipeline alignments were within the habitat shall be limited to those uses extensively surveyed for the that are dependent upon the resource. of ESHA/biological presence resources. Areas with ESHA were ii. Coastal Public avoided where feasible. accessways. access easements and interpretive facilities such as Pipelines are located within public

the resource.

nature trails which will improve public

understanding of and support for protection of

iii. Incidental public services and utilities in

ESHA is limited.

rights-of-way which have been previously disturbed and where

Pipeline conveyances utilize existing

infrastructure where feasible to

#### **Ordinance Section**

wetlands. Essential incidental public services and utilities pursuant to ESHA Policy 13 and CZLUO Section 23.07.172(e).

- iv. Habitat creation and enhancement. Where the project results in an unavoidable loss (i.e., temporary or permanent conversion) of habitat area, replacement habitat and/or habitat enhancements shall be provided maintained by the project applicant. Plans for the creation of new habitat, or the enhancement of existing habitat, shall consider the recommendations of the California Coastal Commission, the California Department of Fish and Game and/or U.S. Fish and Wildlife Service. Generally, replacement habitat must be provided at recognized ratios to successfully reestablish the habitat at its previous size, or as is deemed appropriate in the particular biologic impacted for the assessment(s) site. and/or enhanced Replacement habitat. whenever feasible, shall be of the same type as is lost ("same-kind") and within the same biome ("same-system"), and shall be permanently protected by a deed restriction or conservation easement.
- v. **Restoration of damaged habitats.** Restoration or management measure required to protect the resource. Projects located within or adjacent to environmentally sensitive habitat areas that have been damaged shall be conditioned to require the restoration, monitoring, and longterm protection of such habitat areas through a restoration plan and a accompanying deed restriction or conservation easement. Where previously disturbed but restorable habitat for rare and sensitive plant and animal species exists on a site that is surrounded by other environmentally sensitive habitat areas, these areas shall be delineated and considered for restoration as recommended by a restoration plan.

Section 23.04.210: Visual Resources. This section describes standards to protect Critical Viewsheds, Scenic Corridors and Sensitive Resource Areas that are intended to protect visual resources.

Section 23.05.140: Archeological Resources Discovery. This section establishes standards that apply in the event archaeological resources are unearthed or discovered during any construction activities.

#### **Analysis of Consistency**

minimize impacts to ESHA. For example, portions of the conveyance infrastructure will be constructed on existing bridges over coastal streams which are considered ESHA.

Refer to section IV-C for further discussion.

Portions of the conveyance infrastructure will be constructed within the right-of-way for State Route 1 which is a designated scenic corridor. However, the pipelines will not be visible. The Project Site and Alternative Site are not located within the Coastal Zone.

This section establishes standards that apply in the event archaeological resources are unearthed or discovered during any construction activities. [This needs to be referenced in the Cultural Resources section.]

# **Coastal Plan Policies**

Policy	Analysis of Consistency
Public Works Facilities	
Policy 2: New or Expanded Public Works Facilities. New or expanded public works facilities shall be designed to accommodate but not exceed the needs generated by projected development within the designated urban reserve lines. Other special contractual agreements to serve public facilities and public recreation areas beyond the urban reserve line may be found appropriate.	The project components within the Coastal Zone consist of pipeline conveyances which have been sized to accommodate wastewater flows from buildout of the service area of the CSD, only. The Project Site and Alternative Site are not located within the Coastal Zone.
Policy 3: Special Districts The formation or expansions of special districts shall not be permitted where they would encourage new development that is inconsistent with the Local Coastal Program. In participation on LAFCo actions, the county should encourage sphere-of-influence and annexation policies which reflect the Local Coastal Program.  Policy 4: Urban Service Line Amendments Amendments to an urban service line must be found consistent with the Coastal Act and the Local Coastal Program. Approval of LCP amendment by the Coastal Commission or its successor in interest is required.	The project does not require formation of a special district or an amendment of the Urban Services Line for Cayucos.
Policy 7: Permit Requirements The county shall require a permit for all public works projects located within the coastal zone.	The CSD has applied for a Coastal Development Permit as required by this policy.
Policy 9: Review of Treatment Works. For any development that constitutes a treatment works (PRC 30120), issuance of a permit shall be consistent with the certified LCP and PRC 30412 and shall address the following aspects of such development:	
<ul> <li>a. The siting and visual appearance of treatment works within the coastal zone.</li> <li>b. The geographic limits of the service area within the coastal zone which is to be served by the treatment works and the timing of the extension of services to allow for phasing of development consistent with the certified LCP.</li> <li>c. Projected growth rates used to determine the sizing of treatment works.</li> </ul>	The Project Site and Alternative Site for the treatment works are not located within the Coastal Zone and are therefore not subject to this policy.
Protection of Agricultural Resources	
Policy 1: Maintaining Agricultural Lands. Prime agricultural land shall be maintained, in or available for, agricultural production unless: 1)	The pipeline conveyances within the Coastal Zone will be located within public rights-of-way that do not contain prime agricultural land. The Project Site and Alternative Site for

agricultural use is already severely limited by conflicts with urban uses; or 2) adequate public services are available to serve the expanded urban uses, and the conversion would preserve prime agricultural land or would complete a logical and viable neighborhood, thus contributing to the establishment of a stable urban/rural boundary; and 3) development on converted agricultural land will not diminish the productivity of adjacent prime agricultural land.

the treatment works are not located within the Coastal Zone and are therefore not subject to this policy. Project impacts to agriculture are discussed in Section IV-B of this DEIR.

Other lands (non-prime) suitable for agriculture shall be maintained in or available for agricultural production unless: 1) continued or renewed agricultural use is not feasible; or 2) conversion would preserve prime agricultural land or concentrate urban development within or contiguous to existing urban areas which have adequate public services to serve additional development; and 3) the permitted conversion will not adversely affect surrounding agricultural uses.

All prime agricultural lands and other (non-prime) lands suitable for agriculture are designated in the land use element as Agriculture unless agricultural use is already limited by conflicts with urban uses.

The pipeline conveyances within the Coastal Zone will be located within public rights-of-way that do not contain prime agricultural land. The Project Site and Alternative Site for the treatment works are not located within the Coastal Zone and are therefore not subject to this policy. Project impacts to agriculture are discussed in Section IV-B of this DEIR.

Policy 3: Non-Agricultural Uses. In agriculturally designated areas, all non-agricultural development which is proposed to supplement the agricultural use permitted in areas designated as agriculture shall be compatible with preserving a maximum amount of agricultural use. When continued agricultural use is not feasible without some supplemental use, priority shall be given to commercial recreation and low intensity visitor-serving uses allowed in Policy 1.

The project does not include any agricultural accessory buildings within the Coastal Zone.

Policy 4: Siting of Structures. A single-family residence and any accessory agricultural buildings necessary to agricultural use shall, where possible, be located on other than prime agricultural soils and shall incorporate whatever mitigation measures are necessary to reduce negative impacts on adjacent agricultural uses.

#### **Protection of Archaeological Resources**

**Policy 1:** Protection of Archaeological Resources. The county shall provide for the protection of both known and potential archaeological resources. All available measures, including purchase, tax relief,

A preliminary archaeological investigation was prepared for the proposed pipeline routes that are within the Coastal Zone. Potential impacts to archaeological resources are discussed in Section IV-E of this DEIR. Monitoring and mitigation measures are recommended to address the potential for impacts to archaeological resources. The Project Site and Alternative Site for the treatment works are not located within the Coastal Zone and are therefore not subject to this policy.

resources, adequate mitigation shall be required.

#### Policy 4: Preliminary Site Survey for Development within Archaeologically Sensitive Areas

Development shall require a preliminary site survey by a qualified archaeologist knowledgeable in Chumash culture prior to a determination of the potential environmental impacts of the project.

Policy 5: Mitigation Techniques for Preliminary Site Survey before Construction. Where substantial archaeological resources are found as a result of a preliminary site survey before construction, the county shall require a mitigation plan to protect the site. Some examples of specific mitigation techniques include:

- Project redesign could reduce adverse impacts of the project through relocation of open space, landscaping or parking facilities.
- b. Preservation of an archaeological site can sometimes be accomplished by covering the site with a layer of fill sufficiently thick to insulate it from impact. This surface can then be used for building that does not require extensive foundations or removal of all topsoil.
- c. When a project impact cannot be avoided, it may be necessary to conduct a salvage operation. This is usually a last resort alternative because excavation, even under the best conditions, is limited by time, costs and technology. Where the chosen mitigation measure necessitates removal of archaeological resources, the county shall require the evaluation and proper deposition of the findings based on consultation with a qualified archaeologist knowledgeable in the Chumash culture.
- d. A qualified archaeologist knowledgeable in the Chumash culture may need to be on-site during initial grading and utility trenching for projects within sensitive areas.

#### Visual Resources

CAYUCOS SUSTAINABLE WATER PROJECT

Policy 1: Protection of Visual and Scenic Resources. Unique and attractive features of the landscape, including but not limited to unusual landforms, scenic vistas and sensitive habitats are to be preserved protected, and in visually degraded areas restored where feasible.

will have no effect on the unique or attractive visual features of the landscape as they will be located underground. Refer to EIR section IV-F for analysis of consistency with these policies for construction of the proposed pipe bridges over Tor Creek and Old Creek.

The pipelines located within the Coastal Zone

**Policy 2: Site Selection for New Development.**Permitted development shall be sited so as to protect views to and along the ocean and scenic

particular, new development should utilize slope created "pockets" to shield development and minimize visual intrusion.

Policy 4: New Development in Rural Areas. New development shall be sited to minimize its visibility from public view corridors. Structures shall be designed (height, bulk, style) to be subordinate to, and blend with, the rural character of the area. New development which cannot be sited outside of public view corridors is to be screened utilizing native vegetation; however, such vegetation, when mature, must also be selected and sited in such a manner as to not obstruct major public views. New land divisions whose only building site would be on a highly visible slope or ridgetop shall be prohibited.

#### Environmentally Sensitive Habitats [These policies should be included in the Bio section.]

# Policy 1: Land Uses Within or Adjacent to Environmentally Sensitive Habitats

New development within or adjacent to locations of environmentally sensitive habitats (within 100 feet unless sites further removed would significantly disrupt the habitat) shall not significantly disrupt the resource. Within an existing resource, only those uses dependent on such resources shall be allowed within the area.

Policy 2: Permit Requirement. As a condition of permit approval, the applicant is required to demonstrate that there will be no significant impact on sensitive habitats and that proposed development or activities will be consistent with the biological continuance of the habitat. This shall include an evaluation of the site prepared by a qualified professional which provides: a) the maximum feasible mitigation measures (where appropriate), and b) a program for monitoring and evaluating the effectiveness of mitigation measures where appropriate.

**Policy 3: Habitat Restoration.** The county or Coastal Commission should require the restoration of damaged habitats as a condition of approval when feasible.

Portions of the conveyance infrastructure will be constructed on existing bridges over two coastal streams which are considered ESHA. The pipeline routes have been extensively surveyed for biological resources by qualified professionals. Potential impacts to biological resources, including ESHA, are discussed in Section IV-C of this DEIR which includes measures to protect such resources. Where necessary, damaged habitats will be restored and enhanced.

#### **Coastal Wetlands**

Policy 7: Protection of Environmentally Sensitive Habitats. Coastal wetlands are recognized as environmentally sensitive habitat areas. The natural ecological functioning and productivity of wetlands and estuaries shall be protected, preserved and where feasible, restored.

Policy 12: State Department of Fish and Game Review. The State Department of Fish and Game shall review all applications for development in or adjacent to coastal wetlands and recommend appropriate mitigation measures where needed which should be incorporated in

As discussed in Section IV-C of this DEIR, the project does not impact any coastal wetlands. The project was referred to the Department of Fish and Game for review and comment.

Portions of the conveyance infrastructure will be constructed within 100 feet of a coastal stream. However, a minimum 100 foot buffer will be maintained.

the project design.

Policy 16: Adjacent Development. Development adjacent to coastal wetlands shall be sited and designed to prevent significant impacts to wetlands through noise, sediment or other disturbances. Development shall be located as far away from the wetland as feasible, consistent with other habitat values on the site.

Policy 17: Wetland Buffer. In new development, a buffer strip shall be required and maintained in natural condition along the periphery of all wetlands. This shall be a minimum of 100 feet in width measured from the upland extent of the wetland unless a more detailed requirement for a greater or lesser amount is included in the LUE or the LUO would allow for adjustment to recognize the constraints which the minimum buffer would impose upon existing subdivided lots.

#### **Coastal Streams**

Policy 20: Coastal Streams and Riparian Vegetation. Coastal streams and adjoining riparian vegetation are environmentally sensitive habitat areas and the natural hydrological system and ecological function of coastal streams shall be protected and preserved.

Policy 21: Development in or Adjacent to a Coastal Stream. Development adjacent to or within the watershed (that portion within the coastal zone) shall be sited and designed to prevent impacts which would significantly degrade the coastal habitat and shall be compatible with the continuance of such habitat areas. This shall include evaluation of erosion and runoff concerns.

#### Policy 22: Fish and Game Review of Streambed Alterations

Significant streambed alterations require the issuance of a California Department of Fish and Game 1601-1603 agreement. The Department should provide guidelines on what constitutes significant streambed alterations so that the county and applicants are aware of what is considered a "significant" streambed alteration. In addition, streambed alterations may also require a permit from the U.S. Army Corp of Engineers.

# Policy 23: County and State Review of Coastal Stream Projects

The State Water Resources Control Board and the county shall ensure that the beneficial use of coastal stream waters is protected, for projects over which it has jurisdiction. For projects which do not fall under the review of the State Water Resources Control Board, the county (in its review of public works and stream alterations) shall ensure that the quantity and quality surface

Portions of the conveyance infrastructure will be constructed on existing bridges over three coastal streams. In addition, portions of the conveyance infrastructure will be constructed within 100 feet of a coastal stream. However, a minimum 100 foot buffer will be maintained.

The pipeline conveyance routes have been extensively surveyed for biological resources by qualified professionals. The use of existing infrastructure, along with implementation of recommended mitigation measures in Section IV-C of this DEIR will ensure consistency with these policies.

The project has been referred to the Department of Fish and Wildlife for the issuance of a streambed alteration permit. No substantial streambed alterations are required.

No stream alterations are porposed as part of the Project. Minor cutting of riparian vegetation will be required for construction at the Toro Creek pipe bridge. Refer to EIR section IV-B for analysis of consistency. **Policy 20: Coastal Streams and Riparian Vegetation.** Coastal streams and adjoining riparian vegetation are environmentally sensitive habitat areas and the natural hydrological system and ecological function of coastal streams shall be protected and preserved.

Policy 21: Development in or Adjacent to a Coastal Stream. Development adjacent to or within the watershed (that portion within the coastal zone) shall be sited and designed to prevent impacts which would significantly degrade the coastal habitat and shall be compatible with the continuance of such habitat areas. This shall include evaluation of erosion and runoff concerns.

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Significant streambed alterations require the issuance of a California Department of Fish and Game 1601-1603 agreement. The Department should provide guidelines on what constitutes significant streambed alterations so that the county and applicants are aware of what is considered a "significant" streambed alteration. In addition, streambed alterations may also require a permit from the U.S. Army Corp of Engineers.

# Policy 23: County and State Review of Coastal Stream Projects

The State Water Resources Control Board and the county shall ensure that the beneficial use of coastal stream waters is protected, for projects over which it has jurisdiction. For projects which do not fall under the review of the State Water Resources Control Board, the county (in its review of public works and stream alterations) shall ensure that the quantity and quality surface water discharge from streams and rivers shall be maintained at levels necessary to sustain the functional capacity of streams, wetland, estuaries and lakes.

#### Policy 25: Streambed Alterations

Channelizations, dams or other substantial alterations of rivers and streams shall be limited to: a) necessary water supply projects, b) flood control projects when there are no other feasible methods for protecting existing structures in the flood plain and where such protection is necessary for public safety or to protect existing development, and c) development where the purpose is to improve fish and wildlife habitat. All projects must employ the best feasible mitigation

Portions of the conveyance infrastructure will be constructed on existing bridges over three coastal streams. In addition, portions of the conveyance infrastructure will be constructed within 100 feet of a coastal stream. However, a minimum 100 foot buffer will be maintained.

The pipeline conveyance routes have been extensively surveyed for biological resources by qualified professionals. The use of existing infrastructure, along with implementation of recommended mitigation measures in Section IV-C of this DEIR will ensure consistency with these policies.

The project has been referred to the Department of Fish and Wildlife for the issuance of a streambed alteration permit. No substantial streambed alterations are required.

No stream alterations are porposed as part of the Project. Minor cutting of riparian vegetation will be required for construction at the Toro Creek pipe bridge. Refer to EIR section IV-B for analysis of consistency.

## **Local Agency Formation Commission Policies and Jurisdiction**

The CSWP proposes to create a public lot within the parent parcels of approximately 7 acres for the WRFF. The Cortese-Knox-Herzberg Act allows for noncontiguous parcels owned by the CSD (public lots) to be annexed into the District. The public lot will be sized to accommodate the WRFF and will be owned by the CSD. The process involves approval by the County. The CSD has chosen not to annex the public lot into the District at this time. Therefore, no approvals from LAFCo are required for the project. In the event the CSD determines that annexation of the public lot to the District is appropriate, a separate application to LAFCo with separate environmental review will be required.

## City of Morro Bay

**Impact LU-3**: The project will not divide the existing community of Morro Bay. The project will not conflict with an applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, local coastal program, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect. This impact is considered less than significant (Class III).

#### Conclusion

The project is generally consistent with relevant plans, policies and standards. The project is not consistent with policies of the Conservation and Open Space Element that encourage the protection of Prime Farmland. However, the project will partially mitigate the loss of prime farm land by:

- Dedicating a conservation easement over 16 acres of prime agricultural soils.
- Establishing buffers around the treatment plant to protect ongoing agricultural operations.
- Sizing the treatment plant to serve the buildout population of the CSD.

#### **Cumulative Impacts**

#### **CUMULATIVE SETTING**

The cumulative setting is the area governed by the Estero Area Plan and North County Area Plan, Adelaida Sub-Area and the City of Morro Bay LCP. The analyses of land use impacts discussed un impacts LU-1, LU-2 and LU-3 address project-specific and cumulative impacts which were found to be less than significant.

**Impact LU-4:** The project will not divide an existing community, conflict with applicable land use plan, policy, or regulation of an agency or be inconsistent with an adopted habitat conservation plan or other natural plan to a degree that would be cumulatively considerable. This impact is considered less than significant. (Class III)

# 8. List of Abbreviated Terms

Abbreviation	Term
CEQA	California Environmental Quality Act
CSD	Cayucos Sanitary District
CSWP	Cayucos Sustainable Water Project
EIR	Environmental Impact Report
LAFCO	Local Agency Formation Commission
LUO	Land Use Ordinance
CZLUO	Coastal Zone Land Use Ordinance
NOP	Notice of Preparation
WRRF	Water Resource Recycling Facility

#### 9. References

Estero Area Plan;

http://www.slocounty.ca.gov/planning/General\_Plan\_Ordinances\_and\_Elements/Area\_Plans.htm North County Area Plan, Adelaida Sub-Area;

http://www.slocounty.ca.gov/planning/General\_Plan\_\_Ordinances\_and\_Elements/Area\_Plans.htm

San Luis Obispo County General Plan and Local Coastal Program;

http://www.slocounty.ca.gov/planning/General Plan Ordinances and Elements.htm

San Luis Obispo County Coastal Program Policy Document;

http://www.slocounty.ca.gov/planning/General Plan Ordinances and Elements/Elements.htm

San Luis Obispo County Land Use Ordinances (Title 22 and 23 of the County Code);

http://www.slocounty.ca.gov/planning/General Plan Ordinances and Elements/Land Use Ordinances .htm

San Luis Obispo Local Agency Formation Commission Policies and Procedures

#### M. ENVIRONMENTAL JUSTICE

#### 1. Environmental Issue

Environmental justice refers to the extent to which the project could result in an inequitable environmental burden borne by groups such as low income and minority populations.

# 2. Sources Referenced in This Analysis

This analysis is based on a review of applicable law, local planning documents, census data and other publications, including:

- California Environmental Protection Agency 2004 Environmental Justice Action Plan.
- California Office of Planning and Research 2003 Environmental Justice in California State Government.
- United States Environmental Protection Agency Final Guidance for Incorporating Environmental Justice Concerns in the EPA's NEPA Compliance Analyses, 1998.
- 2010 US Census of Housing and Population.
- 2014 American Community Survey

A complete list of references is provided at the end of this section.

## 3. Scoping Issues

During the 30-day public review period for the Notice of Preparation, written and oral comments were received from agencies and the public. No issues relating to environmental justice were raised during the scoping process.

# 4. Environmental & Regulatory Setting

#### **Regulatory Setting**

#### **FEDERAL REGULATIONS**

United States Environmental Protection Agency Final Guidance for Incorporating Environmental Justice Concerns in the EPA's NEPA Compliance Analyses, 1998

According to the U.S. Environmental Protection Agency a condition of environmental justice exists when:

"Environmental risks and hazards and investments and benefits are equally distributed with a lack of discrimination, whether direct or indirect, at any jurisdictional level; and when access to environmental investments, benefits, and natural resources are equally distributed; and when access to information, participation in decision making, are equally distributed; and when access to information, participation in decision making, and access to justice in environment-related matters are enjoyed by all."

Meaningful involvement means that:

- Potentially affected community residents have an appropriate opportunity to participate in decisions about a proposed activity that will affect their environment and/or health;
- The public's contribution can influence the regulatory agency's decision;
- The concerns of all participants involved will be considered in the decision-making process; and
- The decision-makers seek out and facilitate the involvement of those potentially affected."

#### **National Environmental Policy Act (NEPA)**

The National Environmental Policy Act (NEPA) (42 U.S.C. § 4321) requires federal agencies to assess the environmental effects of their proposed actions prior to making decisions. The range of actions covered by NEPA is broad and includes:

- making decisions on permit applications,
- · adopting federal land management actions, and
- · constructing highways and other publicly-owned facilities.

Using the NEPA process, agencies evaluate the environmental and related social and economic effects of their proposed actions. Agencies also provide opportunities for public review and comment on those evaluations. Section 102 in Title I of the Act requires federal agencies to incorporate environmental considerations in their planning and decision-making through a systematic interdisciplinary approach. Specifically, all federal agencies are to prepare detailed statements assessing the environmental impact of and alternatives to major federal actions significantly affecting the environment. These statements are commonly referred to as Environmental Impact Statements (EIS) and Environmental Assessments (EA).

#### **Executive Order 12898**

On February 11, 1994, President Clinton issued Executive Order 12898, "Federal Actions to Address Environmental Justice in Minority Populations and Low income Populations," which requires that each federal agency to the greatest extent practical and permitted by law, shall:

"make achieving environmental justice part of its mission by identifying and addressing, as appropriate, disproportionately high and adverse human health or environmental effects of its programs, policies, and activities, on minority possessions..."

Agencies are required to identify and address any disproportionately high and adverse human health or environmental effects of their programs, policies, and activities on minority and/or low income populations.

In the memorandum to heads of departments and agencies that accompanied Executive Order 12898, the President specifically recognized the importance of procedures under NEPA for identifying and addressing environmental justice concerns. The memorandum states that:

"each Federal agency shall analyze the environmental effects, including human health, economic and social effects, of Federal actions, including effects on minority communities and low-income communities, when such analysis is required by [NEPA]."

In accordance with Executive Order 12898, the White House Council on Environmental Quality (CEQ) issued Environmental Justice: Guidance Under the National Environmental Policy Act (December, 1997). This guidance includes six principles for environmental justice analyses to determine any disproportionately high and adverse human health or environmental effects to low-income, minority, and tribal populations. The six principles are:

- Consider the composition of the affected area to determine whether low-income, minority or tribal populations are present and whether there may be disproportionately high and adverse human health or environmental effects on these populations
- Consider relevant public health and industry data concerning the potential for multiple exposures or cumulative exposure to human health or environmental hazards in the affected population, as well as historical patterns of exposure to environmental hazards
- 3. Recognize the interrelated cultural, social, occupational, historical, or economic factors that may amplify the natural and physical environmental effects of the proposed action
- 4. Develop effective public participation strategies
- 5. Assure meaningful community representation in the process, beginning at the earliest possible time
- 6. Seek tribal representation in the process

#### STATE REGULATIONS

#### California Government Code

California Government Code, Section 65040.12(e), defines environmental justice as:

"the fair treatment of people of all races, cultures, and incomes with respect to the development, adoption, implementation and enforcement of environmental laws, regulations, and policies."

Fair treatment means that:

"...no group of people, including racial, ethnic, or socioeconomic groups should bear a disproportionate share of the negative environmental consequences resulting from industrial, municipal, and commercial operations or the execution of federal, state, local, and tribal environmental programs and policies".

California Government Code Section 65040.12(a), designates the Governor's Office of Planning and Research (OPR) as the coordinating agency in state government for environmental justice programs and requires OPR to develop guidelines for incorporating environmental justice into general plans.

Government Code section 11135, subdivision (a) provides in relevant part:

"No person in the State of California shall, on the basis of race, national origin, ethnic group identification, religion, age, sex, sexual orientation, color, or disability, be unlawfully denied full and equal access to the benefits of, or be unlawfully subjected to discrimination under, any program or activity that is conducted, operated, or administered by the state or by any state agency, is funded directly by the state, or receives any financial assistance from the state..."

#### State CEQA Guidelines

The State CEQA Guidelines (Title 14, CCR Section 15131) provides that economic or social information may be included in an EIR, but those economic or social effects shall not be considered significant effects on the environment. In an EIR, the lead agency is responsible for researching economic or social changes resulting from a Project, which may eventually lead to physical changes in the environment. These economic or social changes can be used to determine the significance of physical changes on the environment.

# **Environmental Setting**

#### **DEFINITIONS**

Low Income Population - The US Census of Population and Housing defines poverty thresholds based on the number of persons in a household as follows:

Table IV-M1 Poverty Thresholds By Size of Family and Number of Related Children Under 18 Years of Age

Size of Family Unit	Weighted Average	Related Children Under 18 Years				
Size of Family Office	Poverty Threshold	None	One	Two	Three	Four
One Person	\$12,071					
Under 65	\$12,316	\$12,316				
65 Years and Over	\$11,354	\$11,354				
Two People	\$15,379					
Householder Under 65 Years	\$15,934	\$15,853	\$16,317			
Householder 65 Years and Over	\$14,326	\$14,309	\$16,256			
·						
Three People	\$18,850	\$18,518	\$19,055	\$19,073		
Four People	\$24,230	\$24,418	\$24,817	\$24,008	\$24,091	
Five People	\$28,695	\$29,447	\$29,875	\$28,960	\$28,252	\$27,820
Six People	\$32,473	\$33,869	\$34,004	\$33,303	\$32,631	\$31,633
Seven People	\$36,927	\$38,971	\$39,214	\$38,375	\$37,791	\$36,701
Eight People	\$40,968	\$43,586	\$43,970	\$43,179	\$42,485	\$41,501
Nine People Or More	\$49,021	\$52,430	\$52,685	\$51,984	\$51,396	\$50,430

Source: US Census

For purposes of this analysis, *Low Income Population* refers to a household of four persons with a household income of \$24,230 or less.

*Minority* – For purposes of this analysis a minority consists of individuals who identify their race as one of the following:

- Black and African American
- American Indian and Alaska Native
- Asian
- Native Hawaiian and Other Pacific Islander
- Other races

Minority Population - Based on the Final Guidance For Incorporating Environmental Justice Concerns in the EPA's NEPA Compliance Analysis, a Minority Population is a group of people who identify as non-white who exceed 50 percent of the population of an affected area or, a minority population percentage of the affected area that is meaningfully greater than the minority population percentage in the general population. For the purpose of this analysis, meaningfully greater is defined as at least 10 percent greater.

Race and poverty data from the 2010 US Census and the 2014 American Community Survey for the community of Cayucos are compared with data for San Luis Obispo County in Table IV-M2. As shown in Table IV-M2, the percentage of non-white residents and those living below the poverty threshold in Cayucos are less than for the County as a whole.

Table IV-M2 – 2014 Estimates of Race and Poverty Data
for Cayucos and San Luis Obispo County

	T			1		
	Cayucos Co	ensus Design	ated Place	San Luis Obispo County		
Population By Race	Total	Below Poverty Threshold	Percent	Total	Below Poverty Threshold	Percent
Total	2,552	326	12.7%	263,065	38,967	14.8%
White	2,378	306	12.8%	233,268	33,777	14.5%
Black or African American	0	0	0%	N	N	N
American Indian and Alaska Native	6	0	0%	N	N	N
Asian	161	20	12.4%	9,370	2,379	25.4%%
Native Hawaiian and Other Pacific Islander	0	0	0%	N	N	N
Hispanic or Latino	310	54	17%	58,967	11,297	19,2%
Other	0	0	0%	8,018	1,609	20.1%

Source: 2014 American Community Survey

Notes:

1. N = entry in the estimate and margin of error columns indicates that data for this geographic area cannot be displayed because the number of sample cases is too small.

Affected Area. For purposes of this analysis, the Affected Area includes land within a 3.5 mile radius of the Cayucos Sanitary District boundaries. This area was chosen because:

- It includes the entire service area of the project and where construction activities will take place;
- It includes the Project Site and Alternative Site;
- · It includes the existing wastewater treatment facility in Morro Bay;

# 5. Standards of Significance

The project would have a significant adverse environmental justice impact if it would result in adverse effects or impacts that are substantially more severe in magnitude, or are predominately borne by, a *minority population* or a *low income population*, as defined above.

# 6. Impacts Found to Be Less Than Significant

As shown in Table IV-M2, there were estimated to be about 326 (12.7%) persons in Cayucos that meet the definition of a Low-Income Population. The percentage of Low Income Persons is less than the percentage estimated for the County as a whole (14.8%). There are also Minorities within the community of Cayucos which comprise a smaller percentage of the overall population than estimated for the County as a whole. The financial investment required by the various residents within the CSD service boundary will have different economic effects because there will be a greater effect on low-income families compared with moderate- and high-income families.

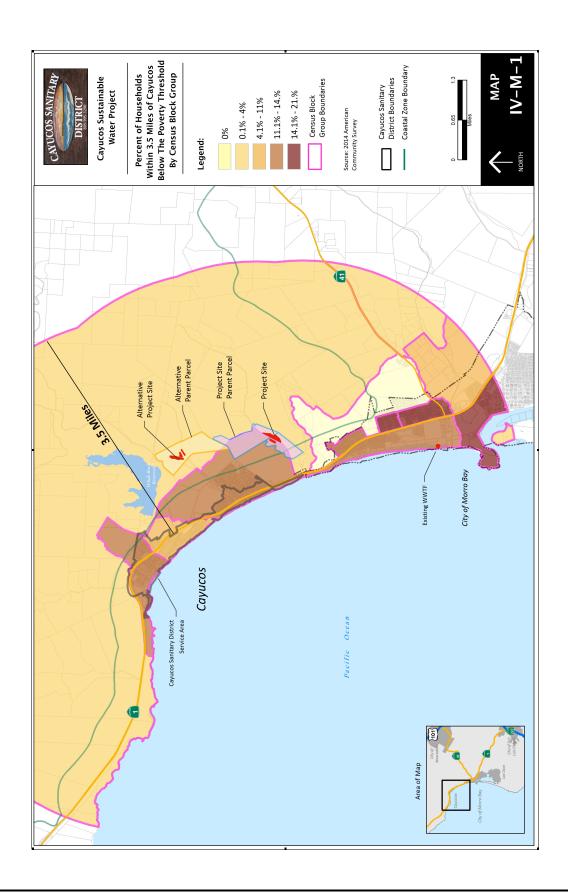
Although there may be a disproportional financial effect on low-income families, this financial effect is not considered an environmental effect and, thus, is not considered an environmental justice issue. Therefore, the following analysis focuses on the potential inequitable environmental burden borne by groups such as low income and minority populations.

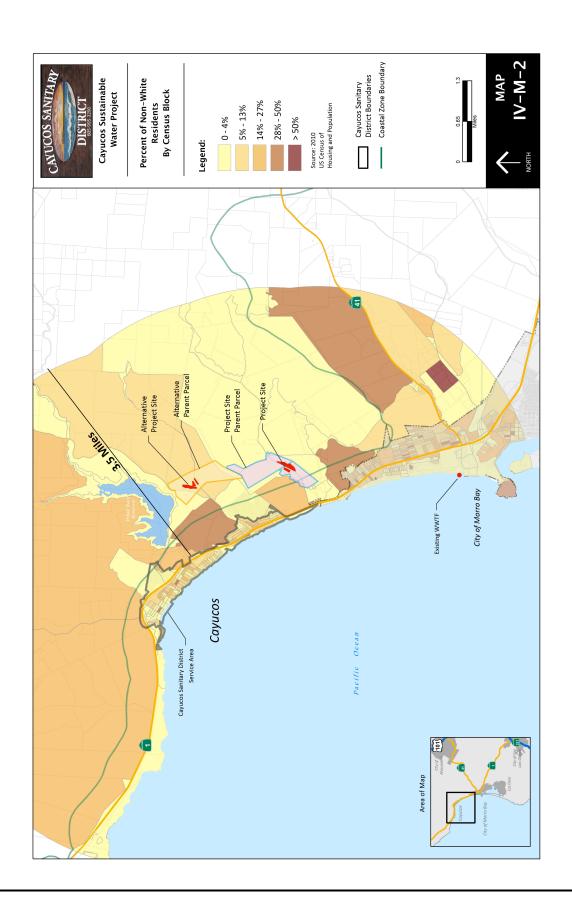
# 7. Impacts and Mitigation Measures

#### **METHODOLOGY**

The 2010 US Census of Population and Housing and the 2014 American Community Survey were used to obtain the occurrence of minority populations and household poverty information for the Cayucos census designated place and a 3.5 mile radius around the boundaries of the Cayucos Sanitary District<sup>1</sup> (Maps IV-M1 and IV-M2). The selected analysis area was then overlain on applicable census blocks and census block groups to derive race and poverty characteristics which are summarized In Table IV-M3. Where the selected analysis area overlays a portion of a census block or census block group, the data within the affected census block or block group were weighted by the proportion falling within the selected analysis area.

<sup>&</sup>lt;sup>1</sup> The boundaries of the census designated place and the CSD boundaries are identical except that the CSD boundary includes a small area north of Highway 1 with no population.





# Table IV-M3 – Minorities and Low Income Households for The Affected Area Compared With Cayucos, the City of Morro Bay and San Luis Obispo County

Population By	Affected Area		1	Cayucos Census Designated Place		City of Morro Bay		San Luis Obispo County	
Race	Total	Percent	Total	Percent	Total	Percent	Total	Percent	
Total Population	8,164	100%	2,552	12.7%	10,224	100%	263,065	100%	
Minorities	490	6%	471	18%	2,422	24%	84,099	32%	
Households									
Below The	600	110/	226	420/	1 262	120/	20.067	150/	
Poverty	682 11%	326	13%	1,263	12% 38,967	30,967	15%		
Threshold									

Source: 2014 American Community Survey

#### **CONSTRUCTION AND OPERATION**

#### **Water Resource Recovery Facility**

**Impact EJ-1:** Construction and operation of the WRRF may disproportionately impact Low-Income Populations and Minority Populations. This impact is considered less than significant (Class III).

The WWRF is the one aspect of the proposed project that will result in permanent, long term environmental impacts identified in this EIR that could affect minority or low income populations. The WWRF site is located in a rural area with low population. Table IV-X-4 present a summary of data for minorities and low income households for the portions of the Census Blocks and Census Block Groups within the Affected Area that include the Project Site and immediate vicinity. As shown in Map IV-H1, the affected Census Block Groups include most of the south half of the community of Cayucos. Nonetheless, the percentage of Low Income Households and Minorities in proximity to the Project Site is less than the percentages for Cayucos and for the County. The percentage of Minorities does not meet the definition of a Minority Population as defined above. Therefore, construction and operation of the WRRF at the Project Site will not disproportionately impact Low Income populations or a Minority Population.

# Table IV-M4 – Minorities and Low Income Households for The Immediate Vicinity of the Project Site

Banadatian Ba Baaa	Data Summary			
Population By Race	Total	Percent		
Total Population	40	100%		
Minorities	3	8%		
Households Below The Poverty	00	8%		
Threshold	99			

Source: 2014 American Community Survey

## **Pipeline Conveyances**

**Impact EJ-2:** Construction of the pipeline conveyances will not disproportionately impact Low-Income Populations and Minority Populations. This impact is considered less than significant (Class III).

As discussed in the Project Description, pipeline conveyances will be constructed along Toro Creek Road and in other portions of the Affected Area. The race and poverty data provided in Tables IV-M1 and IV-M3 show that the percentage of Low Income Households and Minorities in proximity to the Project Site and in areas where pipeline conveyances will be constructed is less than the percentages for the community of Cayucos and for the County as a whole. Therefore, the percentage of Minorities affected by the construction of pipeline conveyances does not meet the definition of a Minority Population as defined above and will not disproportionately impact Low Income populations or a Minority Population.

#### **DECOMMISSIONING OF THE EXISTING WWTF**

**Impact EJ-3:** Decommissioning the existing WWTF will not disproportionately impact Low-Income Populations and Minority Populations. This impact is considered less than significant (Class III).

The existing WWTF is located in the City of Morro Bay across the street from the beach in an area with mixed land uses that include a community park, high school, a concrete operation and a mobile home park. Table IV-M5 present a summary of data for minorities and low income households for the portions of the Census Blocks and Block Groups within the Affected Area that include the existing WWTF and immediate vicinity. As shown in Table IV-M3, the percentage of Low Income Households in proximity to the existing WWTF is comparable to the percentages for the City of Morro Bay as a whole and less than for the County. The percentage of Minorities does not meet the definition of a Minority Population as defined above. Therefore, decommissioning of the existing WWTF will not disproportionately impact Low Income populations or a Minority Population. Decommissioning may have a beneficial impact on residents in proximity to the existing WWTF by removing a potential source of odor nuisances.

# Table IV-M5 – Minorities and Low Income Households for The Immediate Vicinity of the Existing WWTF

Barraletian Ba Barra	Data Summary		
Population By Race	Total	Percent	
Total Population	35	100%	
Minorities	0	0%	
Households Below The Poverty Threshold	186	13%	

Source: 2014 American Community Survey

#### **CUMULATIVE IMPACTS**

The Proposed Project would not have adverse environmental impacts that are appreciably more severe in magnitude or predominately borne by households with low income or minority populations; and would not conflict with any applicable environmental justice goals and policies of an agency with jurisdiction over the project.

Since the Proposed Project is not contributing towards a disproportionate effect on low-income and minority population and does not conflict with any applicable environmental justice goals and policies, the Project would not contribute to cumulative impacts on environmental justice.

#### **ALTERNATIVE SITE**

As with the Project Site, the WWRF Alternate site is located in a rural area with low population. Table IV-M6 present a summary of data for minorities and low income households for the Census Blocks and Census Block Groups that include the Alternative Site and immediate vicinity (Map IV-M3). As shown, the affected Census Block Groups include most of the south half of the community of Cayucos. As with the Project Site, the percentage of Low Income Households and Minorities in proximity to the Alternative Site is less than the percentages for Cayucos and for the County. The percentage of Minorities does not meet the definition of a Minority Population as defined above. Therefore, construction and operation of the WRRF at the Alternative Site would not disproportionately impact Low Income populations or a Minority Population.

Table IV-M6 – Minorities and Low Income Households for The Immediate Vicinity of the Alternative Site					
Data Summary					
Population By Race	Total	Percent			
Total Population	63	100%			
Minorities	4	6%			
Households Below The Poverty Threshold	99	8%			

Source: 2014 American Community Survey

## 8. List of Abbreviated Terms

#### LIST OF ABBREVIATED TERMS

Abbreviation	Term
NEPA	National Environmental Policy Act
CEQA	California Environmental Quality Act
CSD	Cayucos Sanitary District
EIR	Environmental Impact Report
EPA	Environmental Protection Agency
GC	Government Code
GIS	Geographic Information System
OPR	Governor's Office of Planning and Research
CCR	California Code of Regulations
WRRF	Water Recycling and Reuse Facility

# 9. References

California Department of Justice, Environmental Justice at the Local and Regional Level Legal Background, July 10, 2012

California Government Code, Section 65040.12(e)

California Environmental Protection Agency 2004 Environmental Justice Action Plan.

California Office of Planning and Research 2003 Environmental Justice in California State Government.

United States Environmental Protection Agency Final Guidance for Incorporating Environmental Justice Concerns in the EPA's NEPA Compliance Analyses, 1998.2014 American Community Survey

2010 US Census of Housing and Population

National Environmental Policy Act (NEPA) (42 U.S.C. § 4321)

State CEQA Guidelines (Title 14, CCR Section 15131)



#### A. INTRODUCTION

The purpose of this EIR section is to describe a reasonable range of alternatives to the Proposed Project and evaluate the comparative environmental impacts of the alternatives (see **Table V-1** at the end of this section). Pursuant to CEQA, the discussion includes the specific alternative of "No Project" and identification of potentially feasible alternatives capable of avoiding or substantially reducing one or more of the Proposed Project's significant adverse environmental effects. This section also identifies the "environmentally superior alternative" as prescribed by CEQA.

According to the CEQA Guidelines and court decisions interpreting CEQA, the range of alternatives required is governed by the "rule of reason" that requires the EIR to set forth only those potentially feasible alternatives necessary to permit an informed and reasoned choice by the decision-making body and informed public participation.

The EIR is required to discuss only "potentially feasible" alternatives that may be able to attain most of the Project's basic objectives. Statutes and regulations governing CEQA generally define "feasible" to mean an alternative which is capable of being accomplished in a successful manner within a reasonable period of time, taking into account economic, environmental, social, technological and legal factors. The CSD as the Lead Agency under CEQA, after considering the entire record before it, makes the ultimate decision regarding the feasibility of alternatives, and the ability of the alternatives to meet project objectives and reduce environmental impacts.

#### B. ALTERNATIVES CONSIDERED AND REJECTED

In selecting a range of reasonable alternatives, Section 15126.6. of the State CEQA Guidelines calls requires that an EIR identify any alternatives that were considered by the lead agency but were rejected as infeasible during the scoping process, with a brief explanation of the reasons underlying the lead agency's determination. Among the factors that may be used to eliminate alternatives from detailed consideration in an EIR are failure to meet most of the basic project objectives, infeasibility, or inability to avoid significant environmental impacts.

The following discusses concepts that were either raised through the scoping process, or in the preliminary Site Analysis Report (incorporated by reference) conducted by the CSD in advance of the preparation of this EIR, and determined to be infeasible for reasons described below.

#### **ALTERNATIVE SITES**

The CSD undertook a site selection process culminating in a Site Analysis Report followed by a series of public meetings to review the findings of the analysis. Using this analysis of potential sites for the project, on February 18, 2016 at public Townhall session the CSD Board of Directors selected the Proposed Project site and the Alternative Project site. The Site Analysis Report was used to ensure that a reasonable range of sites have been considered and to identify fatal flaws or characteristics of any sites that would render them infeasible or add substantial cost or time to the final completion of the facility.

Twelve sites were selected for rough screening evaluation (Map V-1). All of the sites are outside the Coastal Zone boundary and are in the three creek valleys: Toro Creek, Willow Creek and Cayucos Creek. These creek valley sites were selected because they offered potential for beneficial reuse of treated wastewater, either by surface agricultural irrigation, groundwater recharge and recovery or surface water augmentation.

The twelve sites were screened using four questions to narrow the field to the sites with the best potential to meet the project objectives:

- Is the property owner a cooperative partner?
- Does the property lend itself to creation of a site of suitable proportions and slope?
- Does the site offer a unique opportunity to fulfill the project objectives?
- Compared to other candidate sites in the same creek canyon, is the site a reasonable distance from existing infrastructure?

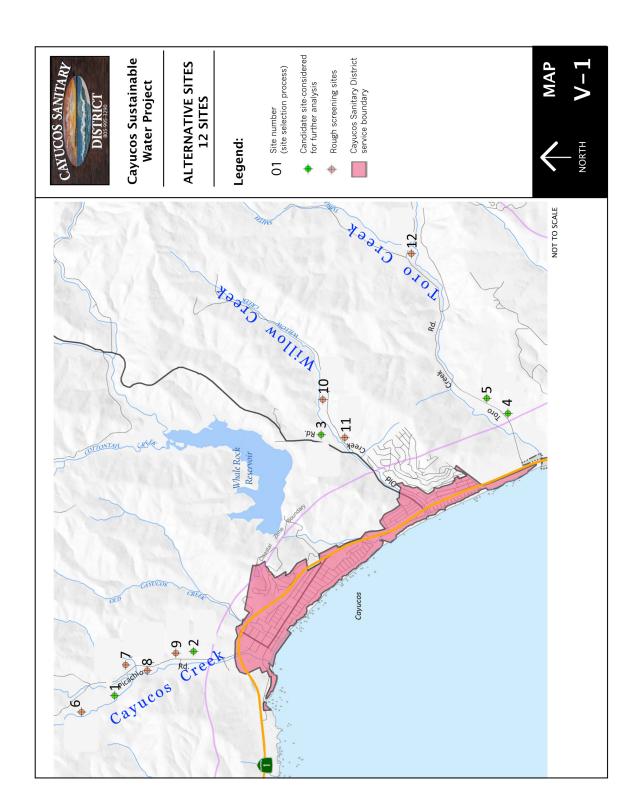
The primary requirement for the candidate sites is that they be in one of the three main creek canyons in rural Cayucos. These locations would allow for the objective of beneficial reuse of processed wastewater by agricultural irrigation, groundwater recharge and recovery, or surface water augmentation to be met.

A second requirement for site selection is that the parcel be outside of the Coastal Zone. The California Coastal Commission has indicated a strong preference for locating new facilities outside the Coastal Zone boundary. As a result, the candidate sites are all in agricultural lands east of the community of Cayucos.

A third basic parameter was that the site be outside the FEMA 100 year flood zone. A fourth basic parameter is that the site not visible from State Route 1, a scenic highway. All of the rough screening candidate sites meet these four criteria.

The District then identified five other criteria to identify the best sites in each creek canyon. These include:

- Is the landowner a cooperative partner? A cooperative partner means that the District can reasonably expect to enter into negotiations for purchase or lease of a suitable portion of a larger existing parcel.
- Does the land lend itself to a generally rectangular parcel configuration that meets a basic 5 acre size on slopes less than 10-15%? A rectangular site is most efficient for design, construction and operation though other shapes are feasible. Slopes under 10% reduce earthwork costs and ground disturbance.
- Does the site present any unique opportunities to fulfill Project objectives more fully, such as reduced cost or a better range of beneficial use options? For example a property that adjoins Whale Rock reservoir could facilitate surface water augmentation readily. Another example is the ability to maintain the use of gravity sewer mains versus pumping



in force mains to a facility location upstream, e.g. Toro Creek versus Old Creek and Cayucos Creek Canyons.

• Relative to sites in the same creek canyon, is the site a reasonable distance from the existing sewer infrastructure in the community? Distance from the community affects construction costs, operation costs and carbon footprint (energy use).

**Table V-1 Rough Screening of Candidate Sites** 

Candidate site	Landowner Cooperative partner	Parcel configuration/ slope	Unique opportunity	Relative Distance from core infrastructure
1 Cayucos Creek	yes	optimal	Existing agricultural infrastructure	ok
2 Cayucos Creek	yes	optimal	Whale Rock adjacency *	ok
3 Willow Creek	yes	optimal	Whale Rock adjacency and Existing Ag. infrastructure *	ok
4 Toro Creek	yes	optimal	Gravity infrastructure	good
5 Toro Creek	yes	optimal	Gravity infrastructure	good
6 Cayucos Creek	yes	optimal	Existing agricultural infrastructure	far
7 Cayucos Creek	no	slope	-	ok
8 Cayucos Creek	no	slope	-	ok
9 Cayucos Creek	no	optimal	-	ok
10 Willow Creek	no	optimal	-	ok
11 Willow Creek	no	optimal	-	ok
12 Toro Creek	yes	Less than optimal	-	far

Based on the rough screening, five final sites were brought forward for further investigation of key environmental factors for fatal flaws and specific suitability. The sites not brought forward either did not have a willing landowner or were excessively far from existing infrastructure resulting in increased cost to construct.

The five candidate sites are shown on Map V-2. Technical investigation and research was conducted for the following environmental factors summarized on Table V-2 below:

Table V-2 Comparison of Final Candidate Sites

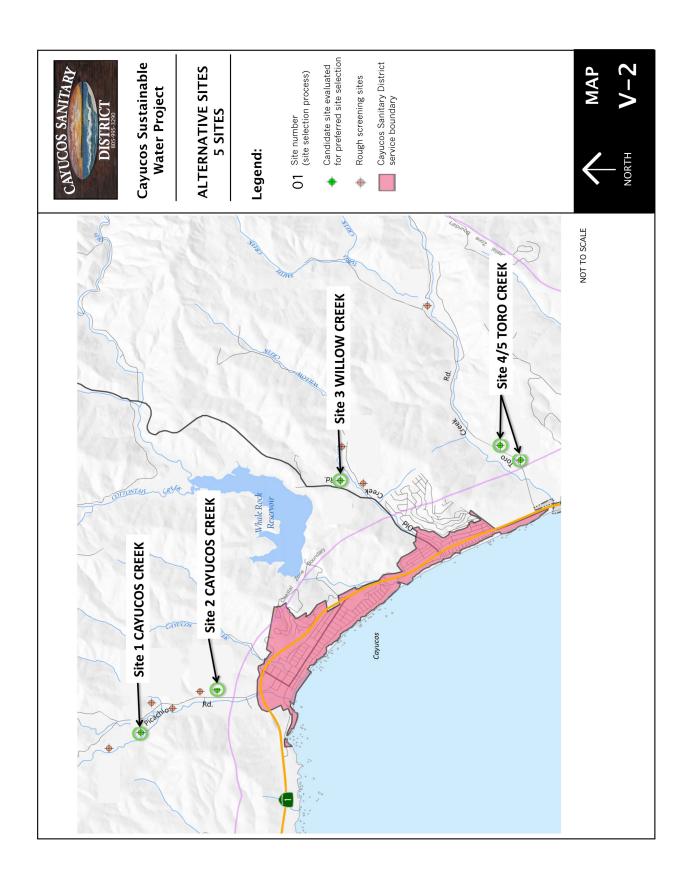
Site	Geologic Hazard	Biological Resources	Cultural Resources	Agricultural Resources
1 Cayucos Creek	Minor	Proximity to creek habitat, Access	Monitor construction	Prime soil
2 Cayucos Creek	Minor	Proximity to creek habitat, Native Grassland	None	Grazing
3 Willow Creek	Minor	Proximity to creek habitat, Access	None	Prime soil
4 Toro Creek	Significant due to landslide, fault	Proximity to creek habitat	Monitor construction	Grazing
5 Toro Creek	Minor	Proximity to creek habitat	Monitor construction	Prime soil

In reviewing this synthesis of site environmental factors, the CSD Board of Directors also considered the findings of the *Beneficial Reuse Analysis Technical Memorandum* prepared by WSC (incorporated herein by reference). Among other things, this document compared the relative costs of development for each site and related conveyances.

All of the sites had similar constraints and costs related to biological resources. No cultural resources were detected on any site in a surface survey.

Three sites, Site 1, the Proposed Project site and the Alternative Project site have prime agricultural soils. Site 1 was rejected because the property is under a LCA contract and findings to remove a portion of that land from contract for the proposed facility cannot be feasibly made because there are other sites available to develop that are not under contract. For the other non-contract lands the conversion of these requires mitigation, however the cost and feasibility were deemed reasonable.

The presence of the geological constraints on Site 4 in the Toro Creek Valley was considered a costly constraint to address in design and construction.



Site 5 (Proposed Project Toro Creek Valley site) ranked highest because with all other factors considered roughly equal environmentally, the cost to construct the facility in this location is the lowest. This is primarily due to the fact that it is at the downstream end of existing sewer infrastructure. Site 3 is the Molnar Site on Montecito Road, selected as the Alternative site. This site is more costly to construct due to conveyance pipeline costs, however it is less costly than the other remaining candidate sites on Table V-2.

Sites 1,2 and 4 are more costly to construct. Because maximizing value for ratepayer's investment is a key objective of the project these sites are not deemed as superior or feasible.

For these reasons candidate sites 1, 2 and 4 on Table V-2 are rejected as alternatives to the Proposed Project.

#### ALTERNATIVE OF A REDUCED SCALE PROJECT

A reduced scale project is not feasible for the following reasons:

- The facility must be sized to process the buildout of the General Plan land uses within the CSD service boundary. Phasing a project is not feasible nor does it ultimately reduce or avoid any impact.
- 2. The selected processing technology has the smallest physical footprint on the land of all the process options considered. A reduced scale project is not feasible for this reason.

#### **ALTERNATIVE CONVEYANCE PIPELINE ROUTES**

Alternative locations for pipeline conveyance routes were rejected for the following reasons:

- 1. Locating pipelines in existing easements and rights of way reduces cost.
- 2. Locating pipelines in existing trenches avoids disturbance to adjacent potentially present cultural resources.
- 3. Locating pipeline in public rights of ways as opposed to across fields allows far better visual contact with the pipeline in case of a pipeline break.

#### ALTERNATIVE METHODS OF BENEFICIAL REUSE OF RECLAIMED WATER

The CSD considered a range of methods and means to put the tertiary treatment water to beneficial reuse. Phase 2 of the Proposed Project is to construct a pipeline to CSA 10 to be used by the water purveyors as a domestic water supply. At some point in the future when direct potable reuse regulations are established and an additional water source is determined by the community water purveyors as advantageous, such as for a drought buffer, advanced treated water will be conveyed the CSA 10 Water Treatment Facility.

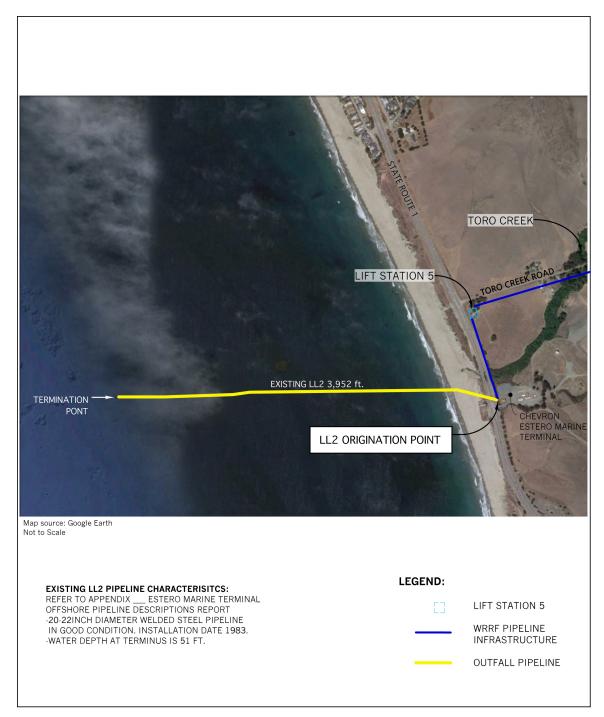
The CSD considered injecting the tertiary treated water into the groundwater basin in the Toro Creek Valley for recovery and reuse. However, hydrogeologic study of the alluvial aquifer determined the capacity for recharge was highly constrained and therefore not a feasible option. Likewise, aquifer recharge potential was evaluated below the Whale Rock dam. This area has potential to function as a viable recharge and recovery field, however this site is highly constrained by cultural resources and was determined not to be a feasible option. Last, surface water augmentation (discharging to Whale Rock reservoir) may be a feasible future use, however there are no regulations in place at this time that would allow for discharge of Title 22 treated water into a surface water reservoir, therefore this alternative was also rejected.

#### ALTERNATIVE OCEAN OUTFALL PIPE

The Proposed Project would continue to use the existing, permitted ocean outfall at the current WWTF in Morro Bay. The existing outfall is 2,700 ft in length. There has been a regulatory trend to require longer outfall pipe lengths to protect ocean resources. Although whatever effects this current length outfall pipe has on ocean resources is a baseline environmental condition and not an impact of the Proposed Project, a longer outfall pipe would be environmentally superior.

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<sup>&</sup>lt;sup>1</sup> Technical Memorandum Preliminary Hydrogeologic Assessment for Ground Water Recharge with Recycled Water, November 17, 2015, Cleath Harris Geologists





Cayucos Sustainable Water Project

ALTERNATIVE OUTFALL



An alternative to continued use of the existing outfall pipe is to use an existing pipeline owned by Chevron shown on Map V-3. This pipeline is 3,180 ft in length, about 480 feet longer than the line at the Morro Bay WWTF outfall.

The environmental advantages of using this outfall compared to the existing outfall have been determined to make this a reasonable alternative to this aspect of the Proposed Project.

#### **ALTERNATIVES CARRIED FORWARD FOR ANALYSIS**

The alternatives to be examined were determined to be:

- No Project
- Alternative Site
- Alternative Ocean Outfall Pipe

#### C. NO PROJECT

Under the No Project alternative, the Proposed Project would not occur on the proposed site or at the alternative site described in this EIR. In this instance, No Project would mean the CSD would return to cooperation with the City of Morro Bay in developing of a new facility in that jurisdiction.

Simply not constructing a new wastewater treatment facility is not an option because 1) upgrade to the MBCSD WWTP is mandated to improve discharged water quality to at least full secondary eliminating the need for the Clean Water Act Section 301(h) modified discharge permit based on a Settlement Agreement with the Central Coast Regional Water Quality Control Board (RWQCB) and 2) the California Coastal Commission (CCC) determined that upgrading and maintaining wastewater facilities at the location of the existing MBCSD WWTP would violate the Coastal Act, effectively mandating the abandonment of the CSD's historic wastewater treatment infrastructure.

Therefore, No Project means the CSD would pursue jointly developing a new facility at a site yet to be finally determined. At the time of this DEIR publication, the City of Morro Bay has completed a comparative analysis of several candidate facility sites and having selected the Tri-W site has issued a Notice of Preparation for an Environmental Impact Report in August 2016.

Therefore, what can be determined about the potential environmental impacts of the development of a new facility for the new Morro Bay facility must rely on preliminary environmental screening data on the proposed Tri-W site contained in the *New Water Reclamation Project Report on Reclamation and Council Recommended Site* ("Project

Report") dated May 8, 2014 for various sites under consideration by the City, incorporated herein by reference.

## Morro Bay Tri-W Site Location and Project Characteristics

According to the City NOP, the proposed site is located on an approximately 10 acre site within a 396 acre parcel (APN 073-101-017) in the unincorporated area adjacent to the city boundary, north of State Highway 1. The project would be done in two phases, the first to construct a 1.2 MGD MMF tertiary level treatment facility to allow decommissioning of the existing WWTP utilizing the existing ocean outfall. Phase 2 would a component for yet to be determined beneficial use of recycled water.

Phase 1 would include a new force main from the existing WWTF to the new facility, associated lift stations improvements and a recycled water pipeline to the existing ocean outfall.

According to the Project Report, "the most developable 10 to 15-acre portion of the site is relatively level and located about 100 to 120 feet above sea level. This is well below the 250-foot contour, above which a new facility would likely require several lift stations and/or high pressure mains to convey untreated wastewater. There is no existing development on the site."

The site is not encumbered with regulatory issues such as Land Conservation Act contracts, Habitat Conservation Plan restrictions, conservation easements, or Alquist-Priolo Fault Zones.

The Project Report concludes: "While there would need to be investigations of the site with respect to biological resources, cultural resources, and geologic hazards, preliminary indications appear to be that the site does not face unusual or unique challenges with respect to these issues that may result in substantial restrictions on the design and resulting permitting time frame for the project."

The Project Report notes: "the site is adjacent to Caltrans right-of-way (Highway 1), but development of the new WRF would not affect nor encroach upon Caltrans property. It may be necessary build pipelines within or across Caltrans rights-of-way either to bring wastewater to the site, or to distribute reclaimed water to potential users."

The site is about 1.7 miles from the Morro Bay estuary and 2.3 miles from the ocean, separated from each by intervening topography. It is not subject to coastal hazards such as tsunami and possible sea-level rise. A project at this location would not impede coastal access, or otherwise affect future development along the coastline.

## POTENTIAL ENVIRONMENTAL EFFECTS OF NO PROJECT ALTERNATIVE COMPARED TO PROPOSED PROJECT

## Geology and Soils:

The Project Report indicates "the relatively level developable portion of the site is considered to have low landslide potential, but the potential increases on steeper slopes. Liquefaction potential is considered low on the steeper portions of the site. The more level portions of the site below the confluence of the two drainage features not subject to

high landslide potential are considered to have high liquefaction potential. The area is subject to seismic hazards, but no known active faults directly traverse the area."

From this information it can be inferred that impacts related to geology and soils would be mitigable to less than significant levels.

The Proposed CSWP Project has impacts that can be mitigated to less than significant levels for construction activities, pipelines crossing faults, seismic shaking of WRRF structures, liquefaction and slope stability. Therefore, on balance impacts for soils and geology compared to the Tri-W site are roughly similar.

## **Agricultural Resources:**

The Tri-W site is currently in rangeland. There are no prime soils on or near the most developable portions of the site.

The most developable portion of the site (where a ranch complex is located) is underlain by Cropley clay soils, which consist of clay overlying silty clay loam, which is typically found at a depth of 36 to 60 inches (NRCS Soil Survey). This soil is considered prime farmland if irrigated, though it is not currently nor has it historically been irrigated on this property. Therefore, this property does not support prime farmland. The soil has a land classification of 2s (if irrigated), and 3s (if nonirrigated). These soils are moderately well-drained, and not prone to flooding or ponding. The depth to the water table is typically greater than 80 inches. The potential development of a new WRF would not preclude continued agricultural use of the property, which consists of grazing.

From this information it can be inferred that impacts to agricultural resources would be less than significant and less than the Cayucos WRRF because that project results in conversion of prime agricultural soils, a class 1 impact.

## **Biological Resources:**

The site does not contain any designated Environmentally Sensitive Habitat Area (ESHA) per the County's LCP. The nearest ESHA is along the riparian margins of Chorro Creek on the south side of Highway 1, but that is outside of the potential WRF development area.

Based on a search of the California Natural Diversity Data base (CNDDB), no special status species were identified on the site, though the following species are identified as having the potential to occur on the site (list status shown in parentheses): Plants

- Arroyo de la cruz manzanita (1B.2)
- Miles' milk vetch (1B.2)
- San Joaquin spearscale (1B.2)
- LaPanza mariposa lily (1B.2)
- Cambria morning glory (4.2) (CNDDB onsite occurrence recorded)
- San Luis Obispo sedge (1B.2)
- San Luis Obispo owl's clover (1B.2)
- Congdon's tarplant (1B.2)
- Betty's dudleya (1B.2)
- Mouse-gray dudleya (1B.2)
- Blochman's dudleya (1B.2)
- Blochman's leafy daisy (1B.2)
- Jones' layia (1B.2)

- San Luis Obispo modarella (1B.2)
- Adobe sanicle (1B.1)
- Most beautiful jewel flower (1B.2) •
   Invertebrates (none)
   Fish (none)
   Amphibians (none)
   Reptiles
- Silvery legless lizard (CSC)
- Blainville's horned lizard (CSC)
   Birds (none) Mammals (none)

The Tri-W site has not been surveyed for biological resources in detail, so if this site were selected, surveys to determine the presence or absence of the potentially occurring special status species would be required.

From this information it can be inferred that significant, but likely mitigable, impacts to biological resource could occur at the Tri-W site.

The Proposed Project would result in significant but mitigable impacts on biologic resources. The Cayucos WRRF site differs form the Tri-W site in that it is within several hundred feet of Toro Creek. Impacts related to sensitive species in Toro Creek can be mitigated by implementation of a suitable setback from the creek. On balance, the No Project Morro Bay site is similar but somewhat less impacting upon biological resources than the Proposed Project.

## **Drainage, Flooding and Water Quality:**

The Tri-W site is not within a 100-year floodplain. There are two ephemeral drainages trending north-south that comes from the higher elevations on the site, which join in a low-lying area on a relatively flat portion of the site. Because this drainage is in the center of the most potentially developable area, it may be difficult to avoid this typically dry drainage feature.

Based on this information it can be inferred that potential water quality impacts would be significant but mitigable.

The Proposed Project has potentially significant but mitigable impacts to drainage, flooding and water quality. Therefore on balance it is likely that impacts to Drainage, Water Quality and Flooding would be similar at both sites.

### **Cultural Resources:**

The Tri-W site has potentially significant impacts on isolated pre-historical resources because many areas of range land in rural coastal San Luis Obispo County have never had archaeological surface surveys to establish any pattern or distribution on which to base any presumption of presence or absence. A record search for the area around the Tri-W site was not conducted, however based in the location in the Chorro Valley near drainages, the Tri-W site has potential for significant impacts on isolated pre-historical resources.

The Proposed Project would have significant impacts on a recorded archaeological site that can be reduced to less than significant levels with mitigation. The No Project site would likely have less impacts to cultural resources than the Proposed Project.

#### Traffic:

The Proposed Project has significant but mitigable impacts on area streets. All traffic impacts and mitigation measures would remain similar for the Tri-W site.

#### **Visual Resources:**

There are no visual impacts relative to the coast for the Tri-W site, since the site cannot be seen from the ocean or estuary, nor would development on the site block views of these features. The property is not visible from any existing neighborhood. It is within 2,000 feet of Highway 1, but can only briefly be seen from the highway at the relatively long distance. Development at this location would not be visible to any nearby residents, and there are no homes on the site itself. The nearest residents live within Casa de Flores, a senior complex roughly 1,600 feet to the south, and visually blocked by intervening topography. Thus, impacts to visual resources are likely less than significant.

The Proposed Project site would have less than significant impacts on visual resources for generally the same reasons the Tri-W site would not.

## Air Quality and Greenhouse Gases:

At the Tri-W site, energy (electricity) use during operation of the new facility, and lift stations and pumps used convey effluent from the facility, would generate GHG emissions. Although the pumps would not directly result in GHG emissions, use of pumps would indirectly release GHG emissions through the purchase/use of electricity. The site is located about 2.4 miles from the existing ocean outfall, and it is expected that the new WRF would need to tie into the existing infrastructure network at this location, with lift stations needed to pump wastewater uphill to the new site, which is at an elevation of about 100 to 120 feet.

The Proposed Project would have similar lengths of conveyance pipelines and pumping energy demands. The City of Morro Bay NOP did not identify a wastewater treatment technology. The Cayucos WWRF project will use a MBR process that is somewhat more energy intensive than other conventional process, however this demand is greatly offset by the solar arrays that are part of the project. Therefore on balance it appears the Proposed Project would have less net impact on air emissions and greenhouse gas generation.

#### Noise

The City NOP did not identify a treatment technology for the Tri-W site, however it is likely the noise generated by operations would be similar to the Proposed Project. In the case of both the Tri-W site and the Proposed Project, noise receptors are far enough away from the facility noise sources that impacts would be less than significant.

## Hazards:

The Proposed Project has significant but mitigable impacts related to fire safety and hazardous material. Because of the similarities in the rural setting (fire risk) and the nature of hazardous materials for both Projects, impacts mitigable to less than significant levels would be roughly the same for both.

## **Growth Inducing Effects**

The Proposed Project has a significant but mitigable impact from the potential of the Phase 2 recycled water line to induce growth by providing a new water supply. While the Morro Bay NOP describing the new facility at the Tri-W site does not specify conveyance pipelines to distribute recycled water, the NOP describes the project able to "produce reclaimed wastewater for potential users, which include public and private landscape areas, agriculture and groundwater recharge". The provision of groundwater recharge may or may not result in a water supply becoming available for domestic use and thus resulting in growth inducing effects, provided the City adopts similar mitigation to limit the sale or use of water for domestic use to within it's current boundary. Therefore, the growth inducing effects of the Tri-W project and the Proposed Project are similar, or they could be greater depending on the ultimate use of tertiary treated water from that project.

## Effects related to the joint decommissioning of the existing WWTF

In the event the No Project alternative is undertaken and the CSD jointly pursues a WWTF with the City of Morro Bay, the effects of decommissioning described in the EIR analysis as cumulative would become impacts of the joint project.

Impacts would arise from the demolition and transport of demolished materials form the site, including any required remediation of hazardous materials. Impacts would result from construction noise, dust, vehicular and equipment emissions, and temporary traffic closures. These impacts may involve temporary impacts that are significant and unavoidable, such as construction noise.

The decommissioning of the existing WWTF would have beneficial effects by removing the facility from a coastal zone with potential ocean impacts, altering the visual setting positively be removing an industrial facility form a scenic coastal area and other effects.

## NO PROJECT ALTERNATIVE WOULD NOT ATTAIN THE OBJECTIVES OF THE PROPOSED PROJECT

The No Project alternative would not achieve the following CSD objectives for the Project:

- Provide the community with sustainable water, ownership of facilities and local governance.
- Deliver a sustainable and cost effective water resource recovery system for the community of Cayucos within a streamlined schedule.
- Optimize capital investment and life cycle cost.
- Maximize value for the ratepayers' investment.
- Obtain grants and low-interest loans to reduce the financial burden on the community.
- Identify a facility location that benefits the community of Cayucos.

• Enhance the community's long-term water supply.

For these reasons, the No Project Alternative is determined to be infeasible.

## D. ALTERNATIVE SITE

The Alternative Site, the Molnar property, has been discussed in greater detail in each impact analysis section. The discussion below summarizes the chief similarities and differences between the Alternative Site Project and the Proposed Project.

## **IMPACT ANALYSIS SUMMARY**

## Geology and Soils:

The Proposed Project and the Alternative site have very similar characteristics in terms of geology and soils, thus the impacts and mitigation measures at each site are essentially the same with minor variation.

## **Agricultural Resources:**

The Proposed Project would result in significant unavoidable impacts on agricultural resources by the conversion of prime agricultural soils to another use. The Alternative site would have the same impact.

## **Biological Resources:**

The Proposed Project would result in significant but mitigable impacts on biologic resources. The Alternative site has similar issues with respect to these resources with the addition of a creek bridge that would be potentially more impact cumulatively on the riparian resources in the valley. In addition the configuration of the land for this site makes achieving adequate riparian setbacks infeasible without a less optimal facility design. On balance, the Alternative site would have somewhat greater impacts on biological resources

#### **Drainage, Flooding and Water Quality:**

The Proposed Project has potentially significant but mitigable impacts to drainage, flooding and water quality. The Alternative site has similar issues with respect to these resources with the addition of a creek bridge that would be potentially more impact cumulatively on the riparian resources in the valley.

#### **Cultural Resources:**

The Proposed Project has significant but mitigable impacts on pre-historical resources. The alternative site could potentially provide greater avoidance of cultural resource areas, however the lack of proximity to recorded cultural resources may be due to the lack of surface investigations in the Willow Creek Valley and not absence. The Alternative Site may be considered as less likely to impact cultural resources than the Proposed Project.

#### Traffic:

The Proposed Project has significant but mitigable short-term impacts on area streets. All traffic impacts and mitigation measures would remain the same for the Alternative Site.

#### Visual Resources:

The Proposed Project has potentially significant visual resource impacts that can be reduced to a level of insignificance. The alternative would not require additional mitigation measures related to this resource, however the alternative site would result in greater residual impacts on visual resources because it is viewed from Old Creek Road at an elevation above the site and would be more visible.

## Air Quality and Greenhouse Gases:

Because the Alternative site also includes a solar array to offset greenhouse gas emissions, development at either of the two sites would result in similar impacts on GHG. Air quality impacts during construction and operations would be nearly the same due to similarities in setting, and distances of travel.

Similar to the Proposed Project, the WRRF at the Alternative Site has the potential to emit odor that could impact nearby sensitive receptors that are located less than one mile from the facility (a few residences at 2,300 feet from the Alternative WRRF site). Potential odor nuisance impacts on nearby residents would be potentially significant without mitigation. However, implementation of Mitigation Measure AIR-5 would ensure that impacts are reduced to less than significant levels (Class II).

GHG emissions associated with the Alternative Site would be below the SLOAPCD threshold. Therefore, this alternative would not result in GHG emissions that would have a significant effect on the environment nor conflict with the SLOAPCD, SLOCOG, and County's GHG emissions reduction targets in compliance with AB 32, or SB 32. In addition, this alternative would involve the generation of reclaimed water, and potential potable water in the future, which would further reduce energy demand in the region through water conservation. Operation of this alternative would also not involve the use of digester boilers that are currently used to treat wastewater from the Cayucos community at the Morro Bay WWTP. Therefore, these benefits would further offset GHG emissions generated by this alternative. Impacts from GHG emissions from the Proposed Project would be less than significant (Class III).

### **Noise**

The Proposed Project has significant but mitigable impacts related to stationary noise generation. The alternative site is similar in terms of rural setting, however, it is closer to residential noise receptors. The level of impact would be somewhat greater and potentially significant and unavoidable (Class I).

#### Hazards:

The Proposed Project has significant but mitigable impacts related to fire safety. The alternative is similar in terms of fire risk setting and proximity to fire stations. The level of impact would be similar and would not require additional mitigation measures related to this topic.

## ATTAINMENT OF PROJECT OBJECTIVES

Due to higher cost to construct, the Alternative site does not meet the following Project objective as well as the Proposed Project site:

• Maximize value for the ratepayers' investment.

#### E. ALTERNATIVE OUTFALL LOCATION

The alternative outfall location consists of reuse of a 3,180 foot long pipeline originally constructed in 1929 to transfer petroleum and petroleum products on and off-shore from anchored tankers as shown in Map V-1. The pipeline was converted in 1980 to an ocean outfall for treated ballast water. The location of tie-in of the treated water disposal pipeline to the outfall pipe would occur just south of Toro Creek in an existing paved area associated with the now closed Chevron Estero Marine Shore Terminal site. Refer to The Technical Appendix for details presented in the *Estero Marine Terminal Offshore Pipeline Descriptions* prepared by Padre Associates dated October 2016.

#### **IMPACT ANALYSIS**

The Alternative outfall pipe would avoid all of the ground-disturbing activities for pipeline construction to Morro Bay, including temporary traffic and noise, and eliminate the need for pumping effluent thus reducing energy consumption and GHG generation over the life of the project. The tie-in would occur in an area of known archaeological deposits along Highway 1 on Chevron and Caltrans land, however, this deposit has been studied in detail, including data recovery, and determined to be highly disturbed and therefore lacking the characteristics of a significant archaeological resource<sup>2</sup>. Last, due to shorter pipeline lengths to convey the processed water, the risk of hazardous spill due to pipe breakage is reduced accordingly.

GHG emissions associated with the alternative ocean outfall pipe would be below the SLOAPCD threshold. Therefore, this alternative would not result in GHG emissions that would have a significant effect on the environment nor conflict with the SLOAPCD, SLOCOG, and county's GHG emissions reduction targets in compliance with AB 32, or SB 32.

An environmental benefit of this alternative is the alternate outfall pipeline is both longer and terminates in deeper ocean water than the existing outfall in Morro Bay.

Impacts related to the connection to the outfall are limited to the point of connection. These impacts would be similar to other pipeline related construction activities and could have short-term impacts on traffic and noise.

On balance, the use of this outfall would reduce impacts on the environment as compared to use of the existing ocean outfall in Morro Bay.

<sup>&</sup>lt;sup>2</sup> Personal Communication, Barry Price, Archaeologist, Applied Earthworks

## **ATTAINMENT OF PROJECT OBJECTIVES**

This alternative would be consistent with the objective to maximize value for the ratepayers' investment because of long-term energy cost savings. The alternative attains all other project objectives.

## F. ENVIRONMENTALLY SUPERIOR PROJECT

The CEQA Guidelines require the EIR to identify the environmentally superior alternative. The guidelines specify that an alternative may impede to some degree the attainment of project objectives, or be more costly, without it being disqualified from consideration. The purpose of the CEQA mandate for the EIR to include a discussion of alternatives is twofold: 1) to permit a reasoned choice by decision makers, and 2) to seek to reduce or eliminate impacts.

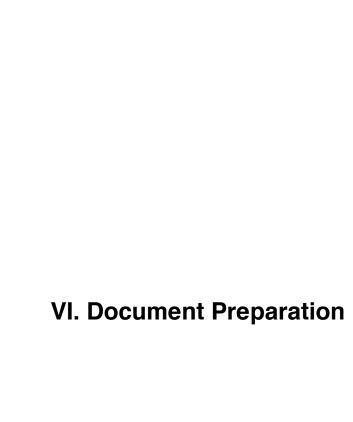
On **Table V-3**, the Proposed Project (impacts after mitigation measures are applied) is compared to the alternatives (impacts after assumed mitigation) that are discussed above. Reading left to right, other alternatives are compared to the Proposed Project, therefore:

- "Similar Impacts" means the alternative is expected to have the same general level of impact as those form the Proposed Project, and the same kinds of necessary mitigations.
- "No impact "or "Less impacts" means the alternative reduced the level of, or avoids, the impact resulting from the Proposed Project.
- "Greater Impact" means the alternative could have impacts of greater magnitude than the Proposed Project and may result in higher levels of impact after mitigation measures are implemented.

The No Project alternative would be roughly similar in terms of environmental effects as the Proposed Project, the differences being the No Project Alternative would likely result in higher greenhouse gas emissions and the Proposed Project would result in greater impacts to agricultural resources. On balance, knowing what can be known about a project on the Tri-W site the two sites appear generally equal in impacts. Therefore, no significant distinction as to environmental superiority can be made.

Setting aside the No Project alternative, which has also been determined to be infeasible for reasons outlined above, the comparison of the Proposed Project to the Alternative Site on Table V-3 shows the Alternative Site as having similar environmental effects in all respects except for the potential for increased visual impact, noise impact and increased impact on biological resources. Therefore, on balance, the Proposed Project with mitigation measures incorporated is the environmentally superior project.

	Table V-3: Com	parison of Project A	Alternatives – With Mitigatio	n
Issue	Proposed Project, with Mitigation Measures	No Project *	Alternative Site	Existing Outfall vs Chevron Outfall
Slope/Geology	Less than significant	Similar impact	Similar impact	Less ground disturbance
Agricultural Resources	Significant and avoidable	Less impact	Similar impact	Similar impact
Biological Resources	Less than significant	Similar impact	Greater impact	Similar impact
Water Quality & Drainage	Less than significant	Similar impact	Similar impact	Less impact
Cultural Resources	Less than significant	Less impact	Less impact	Similar impact
Traffic	Less than significant	Similar impact	Similar impact	Less impact
Greenhouse Gases	Less than significant	Greater impact	Similar impact	Less Impact
Growth inducing effects	Less than significant	Similar or greater impact	Similar Impact	NA
Visual Quality	Less than significant	Similar impact	Greater impact (Class I)	Similar
Noise	Less than significant	Similar impact	Similar or greater impact (Class I)	Similar impact.
Air Quality & GHG	Less than significant	Similar impact	Similar impact	Less impact
Hazards	Less than significant	Similar impact	Similar impact	Less impact
* No Project is develo	ppment of a wastewater facil	ity in conjunction with the 0	City of Morro Bay at the Tri-W site.	



## **DOCUMENT PREPARATION**

## A. REPORT PREPARERS

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- · Virginia Brown, Environmental Planner, Firma
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- · Barry Price and Erin Enright, RPA, Applied Earthworks

## **B.** CAYUCOS SANITARY DISTRICT STAFF & CONSULTANTS

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## C. PERSONAL COMMUNICATIONS

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Linda Achinachie, San Luis Obispo County Department of Agriculture



# Notice of Preparation and Notice of EIR Scoping Meeting

TO:

FROM: Cayucos Sanitary District

SUBJECT: Notice Of Preparation of a Draft Environmental Impact Report pursuant to section

15082 of the CEQA Guidelines

PROJECT TITLE: Cayucos Sustainable Water Project

## **STATE CLEARINGHOUSE NUMBER (not issued)**

The District will be the lead agency for an environmental impact report (EIR) for the project identified above. We need to know the views of your agency as to the scope and content of the environmental information that is germane to your agency's statutory responsibilities in connection with the proposed project.

The project description, location and probable environmental effects are contained in the attached Initial Study

Due to time limits mandated by State law, your response must be sent at the earliest possible date, but not later than 30 days after receipt of this notice.

Please send your response to: Firma, Attn: David Foote, 187 Tank Farm Road, San Luis Obispo CA 93401. email: david@firmaconsultants.com

We will also need the name of a contact person in your agency.

An EIR scoping meeting will be held on April 28, 2016 at 6 PM at the Cayucos Vet's Hall located at 10 Cayucos Drive in Cayucos.

Date: April 21, 2016

Phone: 805 781-9800

Signature:

Title: EIR Consultant for the CSD

## **Initial Study of Environmental Impact**

## I. ENVIRONMENTAL DETERMINATION FORM

## 1. Project Title:

Cayucos Sustainable Water Project

## 2. Lead Agency Name and Address:

Cayucos Sanitary District 200 Ash Avenue / PO Box 333 Cayucos CA 93430

#### 3. Contact Person and Phone Number:

David Foote, c/o *firma*, (805) 781-9800

#### 4. Project Location:

Refer to Figure 1 for the locations of the components of the proposed project and the alternative Project site.

The Proposed Project site is located in the Toro Creek Valley on Toro Creek Road approximately 0.75 miles inland from State Route 1 in Cayucos. The site consists of two lots: Lot 8 (APN 073-092-034) is 76 acres and Lot 10 (145 acres) is a portion of APN 073-092-050. Lot 10 is part of a Lot Line Adjustment that will be recorded in the near future.

The alternative Project site is located in the Willow Creek Valley accessed from Montecito Road approximately 1.25 miles inland from State Route 1 in Cayucos. The parent parcel is 215.0 acres (APN 073-093-011).

For both sites the CSD would create a public lot within the parent parcels of approximately 5 acres for a Water Resource Recovery Facility as shown on Figure 2.

The Proposed Project Phase 2 is construction of a conveyance pipeline for recycled water to the County Service Area (CSA) 10 Surface Water Treatment Facility located on Cabrillo Street.

The Proposed Project includes infrastructure pipelines and appurtenances for influent, effluent, recycled water and processed discharge water within public rights of way including but not limited to Toro Creek Road, State Route 1, Ocean Blvd, Main Street, and Atascadero Road / Highway 41 in Morro Bay.

## 5. Project Sponsor's Name and Address:

Cayucos Sanitary District 200 Ash Avenue / PO Box 333 Cayucos CA 93430

## 6. General Plan Designation:

The Proposed and Alternative sites are designated Agriculture. The pipeline conveyances are within public rights of way. The County land use designations are shown on Figure 3.

## 7. Zoning:

Agriculture

#### 8. Description of the Project:

The Proposed Project is construction of a Water Resource Recovery Facility to serve the Cayucos community. The boundary of the Cayucos Sanitary District (CSD) service area is shown on Figure 3.

The Project site was selected by the CSD Board of Directors from among five candidate sites as superior in meeting the Project Objectives and for environmental suitability. The Project Vision, Mission, Objectives Performance Measures and Guiding Principles were adopted by the CSD Board of Directors in a Project Charter and are summarized for application in the EIR process as follows:

- Provide the community of Cayucos with efficient, reliable and adaptable wastewater treatment, while producing a high quality water supply to benefit the community.
- Enable the community to put the wastewater that is currently discharged to the ocean to beneficial use.
- Provide the community with sustainable water, ownership of facilities and local governance.
- Deliver a sustainable and cost effective water resource recovery system for the community of Cayucos within a streamlined schedule.
- Optimize capital investment and life cycle cost.
- · Maximize value for the ratepayers' investment.
- Develop a water resource recovery system that will benefit future generations.
- · Obtain grants and low-interest loans to reduce the financial burden on the community.
- Identify a facility location that benefits the community of Cayucos.
- Enhance the community's long-term water supply.

The District has identified a suitable alternative site located in the Willow Creek Canyon that will be analyzed in the EIR to the same level of detail as the Proposed Project.

The following briefly summarizes the five major aspects of the Proposed Project. Refer to the Project Description attached to this Initial Study for more detailed information and maps. The Project consists of two phases. Phase 1 includes construction of a new Water Resource Recovery Facility, related conveyance pipelines, production of tertiary treated water for agricultural irrigation, and discharge of process water to the existing ocean outfall. This phase would also include participation and coordination in the decommissioning of the existing Morro Bay / Cayucos Wastewater Treatment Plant in Morro Bay. Phase 2 is the construction of a conveyance pipeline for recycled water to the CSA 10 Surface Water Treatment Facility.

Figure 1 shows the Proposed Project site, the Alternative site and the pipeline conveyance routes for the project.

#### PHASE 1

## Construction of a new Water Resource Recovery Facility (WRRF)

A WRRF will be constructed on a portion of the project site. The WRRF will be sized to serve only the service area of the CSD with an average annual daily flow (AADF) of 0.33 to 0.5 million gallons per day (MGD).

To construct the WRRF, the District will apply for a public lot pursuant to Section 21.02.010(a)(9) of the County of San Luis Obispo's Real Property Division Ordinance and Government Code Section 66428(a)(2). These sections exempt land conveyed to or from a

public entity from the requirements of a parcel or tract map. The public lot would be sought as part of the Conditional Use Permit process. Public utility facilities are an approved use in the agricultural zone. The District's intent is to create the smallest parcel necessary to allow construction of the CSWP and thereby preserve the maximum amount of land for agricultural uses.

The Facility Plan that identifies the size, arrangement and various technical components of for the WRRF is being developed concurrently with the EIR. However, all of the various WRRF components are expected to be contained in an area of approximately five to seven acres. Accordingly, although the study area/potential area of influence (Figure 2) identified for EIR analyses is approximately 12 acres in size, it is anticipated that the WRRF will require only a portion of this area.

It is anticipated that the Project Description will be expanded and specific systems options, technology, site layout and other aspects of the facility will be more detailed in the EIR. The expanded Project Description attached to this IS provides additional detail.

The WRRF is programmed to include solar arrays to offset energy demands. It is anticipated that the array will be up to two acres and would be contained in an area adjoining to the WRRF, screened from Toro Creek Road.

#### Conveyance infrastructure in Cayucos and Morro Bay

The general route corridor for conveyance infrastructure in Cayucos and Morro Bay is shown on Figure 1. More detailed alignment maps are shown in the expanded Project Description attached to this IS. The pipelines will occur in trenches in public rights of way. Pipeline routes will cross Toro Creek, Old Creek and Willow Creek. Construction will also occur at the CSD lift station 5 site located at Toro Creek Road and SR 1.

## Tertiary treated non-potable reuse for Agriculture

The WRRF will create tertiary treated non-potable water for agricultural irrigation. It is anticipated that agricultural lands adjoining or nearby the WRRF could have access to this irrigation water. The project will implement an agreement with a yet to be identified farmer / landowner to provide this water to agricultural land to create irrigated cropland that mitigates the loss of prime agricultural land converted by the Proposed Project.

#### Discharge of processed water to the existing ocean outfall

The processed discharge water from the WRRF will be conveyed to the existing ocean outfall in Morro Bay located at the existing Morro Bay / Cayucos wastewater treatment plant. The CSD owns a 35% interest in the outfall capacity that will accommodate this discharge. The existing outfall is fully permitted.

## Participation in de-commissioning of the existing Morro Bay / Cayucos Waste Water Treatment Plant (WWTP) in Morro Bay

The CSD will participate in the decommissioning of the existing WWTP in Morro Bay at the time that both agencies have completed their respective water reclamation projects. Due to the fact that the timing of the Morro Bay facility and further development of specific decommissioning plans are unknown, the Project Description can only identify the following basic aspects of decommissioning at this time:

- Demolition and removal of structures and equipment from the existing site, except for the existing outfall structure that will remain in place for use in conjunction with the new facilities.
- Disposal of hazardous waste and remediation of contaminated soils.

· Restoration of the site.

#### PHASE 2

#### Pipeline conveyance for recycled water

Phase 2 is the construction of a conveyance pipeline for the recycled water to the CSA 10 Surface Water Treatment Facility. The corridor for the conveyance pipeline that would take recycled water from the WRRF to the area of County Service Area 10 Water Treatment Facility is shown on Figure 1. The pipeline runs west on Toro Creek Road, north in the CSD easement in Caltrans ROW to Ocean Blvd near Chaney Street, then north on Ocean Blvd to the facility crossing Old Creek at the existing footbridge.

The direct or indirect potable reuse of this recycled water that will be conveyed to this location is anticipated to be initiated in conjunction with the water purveyor(s) at the point in time that additional water resources for the community are determined to be advantageous.

## 9. Surrounding Land Uses and Setting:

The facility sites are outside the Coastal Zone boundary in rural agricultural land. Adjoining parcels are also in agriculture zoning and use. Both sites have been used in the past for irrigated agriculture. Lands around both sites are grazing land.

Project infrastructure improvements for conveyance of influent and of effluent and recycled water will occur in public rights of way in urban and rural settings.

## 10. Other Public Agencies whose approval is potentially required:

San Luis Obispo County for a Conditional Use Permit, and for infrastructure in the Coastal zone, a Coastal Development Permit.

County of San Luis Obispo Public Works Department for an encroachment permit for infrastructure in the public right of way.

California Regional Water Quality Control Board for facility National Pollution Discharge Elimination System Permit, Construction General Permit and Clean Water Act section 401 Water Quality Certification related to work at creek crossings.

California Department of Transportation for encroachment permit for infrastructure in the public right of way.

US Fish and Wildlife Service for Endangered Species Act section 7 consultation.

US Army Corps of Engineers for Clean Water Act section 404 permit for creek crossing(s).

California Department of Fish and Wildlife for a Section 1602 Lake and Streambed Alteration Agreement.

Air Pollution Control District for operational permits

City of Morro Bay for Coastal Development Permit for pipeline conveyance and outfall tie-in construction.

### 11. Environmental Factors Potentially Affected:

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a Potentially Significant Impact as indicated by the checklist on the following pages.

Aesthetics	$\boxtimes$	Hazards and Hazardous Materials		Public Services
Agriculture Resources	$\boxtimes$	Hydrology and Water Quality		Recreation
Air Quality & Greenhouse gases		Land Use and Planning		Transportation and Traffic
Biological Resources		Mineral Resources		Utilities and Service Systems
Cultural Resources		Noise	$\boxtimes$	Mandatory Findings of Significance
Geology and Soils	$\boxtimes$	Population and Housing		

There is no evidence before the Department that the project will have any potential adverse effects on fish
and wildlife resources or the habitat upon which the wildlife depends. As such, the project qualifies for a
de minimis waiver with regards to the filing of Fish and Game Fees.

The project has potential to impact fish and wildlife resources and shall be subject to the payment of Fish and Game fees pursuant to Section 711.4 of the California Fish and Game Code.

## 12. Topics determined not to have a potential significant effect and topics to be brought forward for EIR analysis:

A. On the basis of this Initial Study, the following topics have been determined to not have the potential to result in a significant environmental impact and <u>will not be</u> analyzed further in the EIR:

- Public Utilities and Services
- Recreation and Public Services
- Mineral Resources
- Population and housing related to direct effects of the project
- Noise related to increased transportation-based sources.
- Transportation related to long-term operations.
- B. On the basis of this Initial Study, the following topics have been determined to have the potential to result in a significant environmental impact and will be analyzed further in the EIR:
- Aesthetics including views from sensitive viewing areas on public roadways, and potential for night lighting and glare.
- Agricultural Resources
- · Air Quality
- Biological Resources
- Cultural Resources

- Greenhouse Gas Emissions
- Hazards and Hazardous Materials including wildland fire risk and the storage and disposal of hazardous materials.
- Hydrology and Water Quality
- Consistency with adopted plans and land use policy
- Noise related to short-term construction effects and long term operations.
- Transportation related to short-term effects during construction.

## 13. Determination:

On the basis of this initial evaluation:

	I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared.
	I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project applicant in the form of a MITIGATED NEGATIVE DECLARATION.
$\boxtimes$	I find that the proposed project MAY have a significant effect on the environment, and an ENVIRONMENTAL IMPACT REPORT is required.
	I find that the proposed project MAY have a potentially significant impact or potentially significant unless mitigated impact on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and has been addressed by mitigation measures based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.
	I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed project, nothing further is required.

Signature

Date: April 20, 2016

David Foote, Firma Consultants Consultant for Cayucos Sanitary District

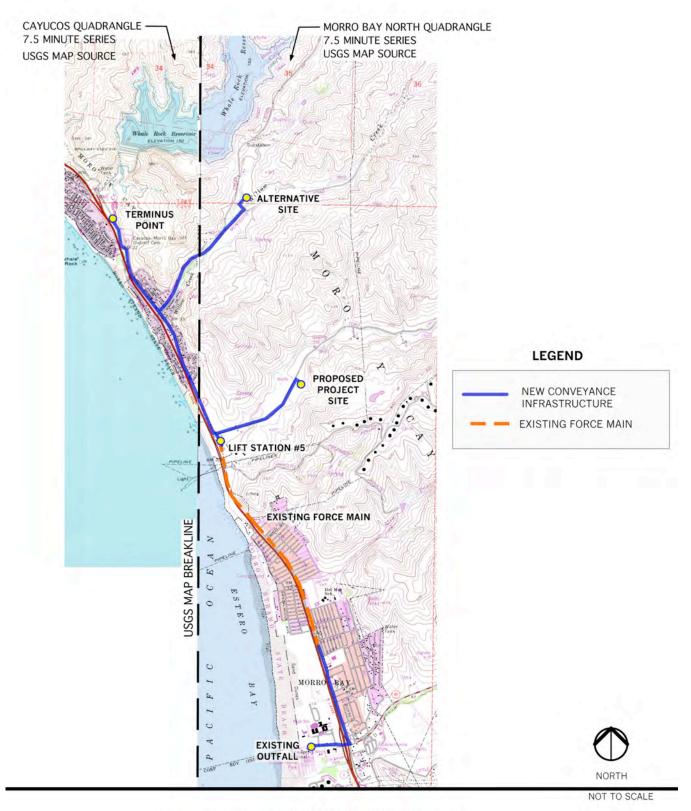


Figure 1 - Cayucos Sustainable Water Project

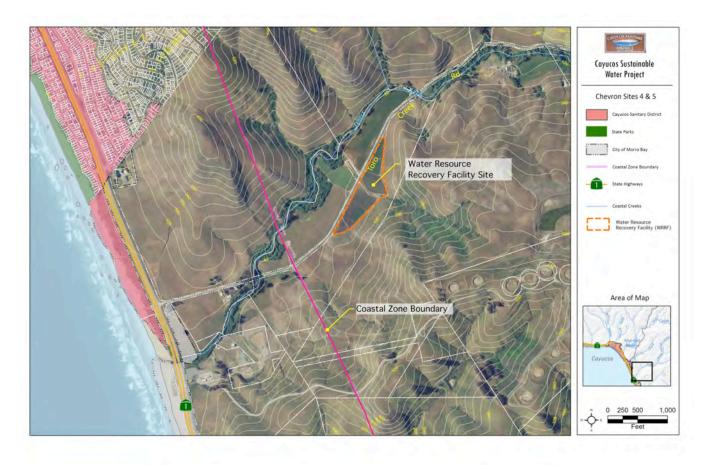


Figure 2 - Site Location - Water Resource Recovery Facility



Figure 3 - San Luis Obispo County General Plan Land Use Map

## II. ENVIRONMENTAL CHECKLIST

#### **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?
- 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 day or nighttime views in the area?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
6	X			
6			х	
6,16	Х			
6	X			

## **Impact Discussion:**

1a.·d. Environmental and Regulatory Setting: The visual setting in Cayucos is characterized by scenic views of the Pacific Ocean and community beaches to the west, and hillsides of Santa Lucia Mountains creating a scenic backdrop to the east. The project site is located on rural agricultural land which provides value to the visual environment and viewing experience for viewers on Toro Creek Road. The regulatory setting is subject to San Luis Obispo County Policy as well as the City of Morro Bay for project infrastructure within Morro Bay City Limits.

Threshold of Significance: San Luis Obispo County General Plan Conservation and Open Space Element (COSE) and sets forth specific policies related to the preserving the visual quality of natural and agricultural landscape in rural parts of the county; this includes protection policies for areas designated as Coastal Visual Resources, Sensitive Resource Areas and Scenic Highways. The following Policies set forth in the COSE aim to protect important viewsheds:

- Policy VR 1.1 Adopt Scenic Protection Standards. Protect scenic views and landscapes, especially visual Sensitive Resource Areas (SRAs) from incompatible development and land uses.
- Policy VR 4.1 Designation of Scenic Corridors. Designate scenic corridors based on the recommendations for Scenic Corridor Studies, for the candidate roads and highways listed in Table VR-2.
- Policy VR 7.1 Protect the clarity and visibility of the night sky within communities and rural areas, by ensuring that exterior lighting including streetlight projects, is designed to minimize nighttime light pollution.

The countywide Design Guidelines are intended to protect the attractive rural character of San Luis Obispo County and address visual impacts of rural building construction related to site layout and building features.

Impact Analysis: The rolling grassland and Toro Creek riparian area are important visual features of the proposed WRRF vicinity that will be preserved. The proposed WRRF, excluding underground conveyance pipeline, is not located within a Coastal Visual Resource area in the County's Local Coastal Program or within Sensitive Resource Area for scenic corridor. Highway 1 is designated within the County of San Luis Obispo's Local Coastal Plan as a

visually scenic corridor to be protected and is designated a State Scenic Highway by the Department of Transportation (CalTrans). The proposed WRRF is located about 0.75 mile of Highway 1 and would not be visible to viewers traveling on Highway 1 due to intervening topography.

Proposed underground pipeline conveyance along Highway 1 corridor would not be considered a visual impact. Visible pipe crossing (hanging pipe) will be located at locations near Toro Creek, Willow Creek and Old Creek. The pipe crossing would be of limited size and be placed in location with existing utility crossings, therefore no significant impact is anticipated because utility crossings are part of the existing visual setting.

The view of rural land and open space from Toro Creek Road could potentially be impacted by the proposed project although prominent ridgelines would be preserved and scenic backdrop would be maintained. The WRRF has the potential to impact nighttime views in the project area with the addition of exterior lighting. The EIR will evaluate exterior lighting scheme and include measures to minimize impacts to the night sky from glare and the amount of light.

The decommissioning of existing facility in Morro Bay may be considered a benefit to visual resources because industrial-scale built environment would be removed.

To evaluate these potentially significant effects, the EIR should establish visual sensitivity criteria related to travelers from public roads, and simulate the potential visual change that might occur for the development of WRRF on Toro Creek Road using photographic techniques with digital overlay. The visual analysis in EIR will consider the proposed changes in visual quality and evaluate consistency with respect to the County General Plan, Design Standards and Local Coastal Program.

- 2. AGRICULTURE 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 Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. Would the project:
- a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), 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) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to nonagricultural use?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
6,1	X			
6,7				x
6	X			

## Impact Discussion:

2a.The project contains land that is zoned for Agriculture in the County's Estero Planning and Cayucos Fringe Secondary / Adelaide Sub-Planning Areas. A portion of the project land has been used for row crop farming and grazing historically. The proposed construction staging area and WRRF site are designated as Prime Farmland under State (Farmland Mapping and Monitoring Program) and County (County Agriculture and Open Space Element) definitions.

The County's Conservation and Open Space Element (COSE) of the County General Plan sets forth policies to protect natural resources including agricultural soils. Specifically, *Policy SL 3.1 Conserve Important Agricultural Soils* requires that proposed conversion of agricultural lands to non-agricultural uses be consistent with policies in the COSE and in the Agricultural Element, such as *Policies AGP 18 and AGP 24*.

The EIR should discuss the regulatory and physical setting of the project and determine the significance of the project's impact and identify appropriate mitigation measures.

- 2b. None of the project areas are currently in a Williamson Act agricultural preserve contract.
- 2c. The proposed conveyance infrastructure will travel through the existing ROW adjacent to prime agricultural lands. Although no land along the conveyance route is proposed for conversion to non-agricultural uses, the EIR should evaluate consistency with County's County Conservation and Open Space Element (COSE) policies.
- **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?
- c) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is nonattainment 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?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
5			x	
5,17	x			
5,17	x			
3,17	^			
5,17			х	
5,17	Х			

### **Impact Discussion:**

3a-d. Environmental and Regulatory Setting: Air pollutants are regulated at the Federal, State and Air Basin level. The Environmental Protection Agency (EPA) regulates at the Federal level, California Air Resource Board (CARB) regulates at the State level and the San Luis Obispo County Air Pollution Control District (APCD) regulates at the County level. The County of San Luis Obispo also regulates air quality through regulation of design, operation and land uses that impact air quality.

The project area is located in the South Central Coast Air Basin (SCCAB). The SCCAB consists of San Luis Obispo County and a portion of Santa Barbara County. Atmospheric pollutant concentrations in the SCCAB are generally moderate, due to persistent west-to northwesterly winds that blow off the Pacific Ocean.

The Clean Air Plan (CAP) for San Luis Obispo County is a planning document developed and adopted by the Air Pollution Control District (APCD) to meet State requirement for reduction of non-attainment pollutions within the SCCAB. San Luis Obispo County exceeds the state standard for PM10 and the state 8-hour ozone standard.

Threshold of Significance: The CAP establishes impact significance thresholds and recommended mitigation strategies for both construction activities and ongoing activities that can generate air quality impacts. The APCD has established the threshold of significance as a project construction activities lasting more than one quarter. Thresholds of Significance for Construction Operations are presented in the table below.

## Thresholds of Significance for Construction Operations

Source	Threshold <sup>(1)</sup>			
Pollutant	Daily	Quarterly Tier 1	Quarterly Tier 2	
ROG + NO <sub>x</sub> (combined)	137 lbs	2.5 tons	6.3 tons	
Diesel Particulate Matter (DPM)	7 lbs	0.13 tons	0.32 tons	
Fugitive Particulate Matter (PM <sub>10</sub> ), Dust <sup>(2)</sup>		2.5 tons		
Greenhouse Gases (CO <sub>2</sub> , CH <sub>4</sub> , N20, HFC, CFC, F6S)	Amortized and Combined with Operati Emissions (See Below)			

<sup>1.</sup> Daily and quarterly emission thresholds are based on the California Health & Safety Code and the CARB Carl Moyer Guidelines.

Source: APCD CEQA Handbook\_2012\_v2(Updated Sept 2015) Table

<sup>2.</sup> Any project with a grading area greater than 4.0 acres of worked area can exceed the 2.5 ton PM<sub>10</sub> quarterly threshold.

The threshold criteria established by SLO County APCD to determine the significance for long term operational emissions form a project are presented in the table below.

## Thresholds of Significance for Operational Emissions Impacts

Pollutant	Threshold <sup>(1)</sup>	
Pollutant	Daily	Annual
Ozone Precursors (ROG + NO <sub>x</sub> ) <sup>(2)</sup>	25 lbs/day	25 tons/year
Diesel Particulate Matter (DPM)(2)	1.25 lbs/day	
Fugitive Particulate Matter (PM <sub>10</sub> ), Dust	25 lbs/day	25 tons/year
СО	550 lbs/day	
Greenhouse Gases (CO <sub>2</sub> , CH <sub>4</sub> , N20, HFC, CFC, F6S)	Consistency with a Quarter Reduction O 1,150 MT O 4.9 CO <sub>2</sub> e/SP/year (re	on Plan R CO₂e/year R

Daily and annual emission thresholds are based on the California Health & Safety Code Division 26, Part 3, Chapter 10, Section 40918 and the CARB Carl Moyer Guidelines for DPM.

Source: APCD CEQA Handbook\_2012\_v2(Updated Sept 2015) Table 2-1

The proposed project area is located in candidate area for Naturally Occurring Asbestos (NOA), which has been identified as a toxic air contaminant by CARB. Serpentine is a very common rock and has been identified by CARB as having potential to contain NOA. Requirements relating to NOA are outlined in the Asbestos Airborne Toxics Control Measure (ATCM).

The EPA has delegated authority to the APCD to implement the Federal Asbestos National Emission Standards for Hazardous Air Pollutants (NESHAP) regulations specified in 40 CFR 61, Subpart M.

3a-c Impact Analysis: According to the APCD "CEQA Air Quality Handbook" (2015), both construction activities and ongoing activities of land uses can generate air quality impacts. The EIR Air Quality Analysis will evaluate temporary construction impacts and long term operational emissions as categorized below:

#### Proposed Construction:

- WRRF
- Infrastructure Pipeline
- Decommission Morro Bay Facility

### Proposed Operations:

WRRF

Construction and operational emissions that would result from the proposed project should be calculated in the EIR using CalEEMod, pursuant to the APCD CEQA Handbook. The EIR should review the CAP and evaluate potential impacts and develop mitigation measures for all categories of the proposed project. Operation of the proposed WRRF would be considered a new stationary emission source in SLO County.

Serpentine is present in the hills around Toro Creek, therefore the EIR will include discussion of applicability of Asbestos Dust Mitigation Plan and/or an Asbestos Health and Safety Program related to NOA.

The EIR will address demolition of the existing Morro Bay Wastewater Treatment Facility in relation to requirements of the Federal Asbestos NESHAP including but not limited to thorough inspection for the presence of asbestos by a Certified Asbestos Consultants (CAC) and proper notifications to the APCD prior to construction.

There are no significant air pollution impacts anticipated related to transportation patterns or traffic because the proposed project would not add substantial vehicle trips (see Section 16 Transportation).

<sup>2.</sup> CalEEmod - use winter operational emission data to compare to operational thresholds.

- 3d. Sensitive receptors typically include residential uses, schools and hospitals. The project is surrounded by open rural land with no existing or planned sensitive receptors within ½ mile of the proposed WRRF. No potential impact to sensitive receptors is identified for long-term operation of the WRRF. Construction of pipeline infrastructure may require mitigation to reduce the exposure of sensitive receptors to Diesel Particulate Matter (DPM). The EIR will analyze proposed project proximity to sensitive receptors.
- 3e. The EIR should evaluate the potential for the Proposed WRRF to create objectionable odors that may impact potential land uses in the study area. Project construction activity or operations which may have the potential to create odor should be addressed in the 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?
- 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 US 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?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
4	X			
4	X			
4	X			
4	X			
4	X			

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?

4		Х

#### Impact Discussion:

4a. Project' components are adjacent to, or traverse over, riparian habitat that could be indirectly impacted by construction activities or unintended wastewater overflows. During the site selection proccess, a preliminary biological resource constraints report for Cayucos Sustainable Water Project was prepared by Althouse and Meade Inc; including field surveys for biological resources within proposed project area. A biological assessment is necessary to evaluate the potential impacts to sensitive habitats.

The proposed construction staging area used for temporary storage of materials and equipment is located about 100 feet from Toro Creek. The proposed WRRF is sited approximately 500 feet from Toro Creek. Both project areas are composed of active cropland, and surrounded by annual grassland. Special status plants are unlikely to occur in at these areas due to the disturbed nature of the site.

The project includes routing pipelines across three different creeks. All pipelines will cross Toro Creek approximately 1/2 mile from the WRRF site and continue to the existing Lift Station #5 at Hwy 1. The recycled water pipeline continues north approximately 1 mile and crosses Willow Creek, just south of Old Creek Road. The pipeline will then travel another 2.5 miles before traversing Old Creek at the end of Ocean Boulevard. The pipe route continues 500 feet to the proposed terminus point located near the existing Cayucos treatment plant on Cabrillo Street. All pipe suspension across creeks will be accomplished using existing bridge infrastructure and no dewatering of the creek is to be expected. The EIR may compare of trenching technologies such as microtunneling and horizontal directional drilling to pipelines mounted on bridges along the proposed conveyance route, if determined feasible based on geology and other factors.

From Lift Station #5, an effluent pipeline will be integrated into the existing conveyance system that travels for 1.5 miles south along Highway 1 and Main Street. Just south of Island Street, a new conveyance pipeline will be constructed in the existing ROW. The new pipeline will pass over the culvert at Alva Paul Creek, travel for approximately 1.25 miles and pass under Highway 1 at Atascadero Road. No impacts are to be expected by placing the new pipeline along the existing infrastructure/box culvert at Alva Paul Creek. The new pipeline will run approximately 1600 feet to the existing Wastewater Treatment Facility.

Due to the project's proximity to Toro Creek and the conveyance system's three creek crossings, the EIR should identify the potential impacts to include (but not be limited to) the following sensitive/special status animal and plant species:

Tidewater goby (Eucyclogobius newberryi) (Federally endangered; not observed but suitable habitat is present), California red-legged frog (Rana aurora draytoni) (Federal Threatened; not observed but suitable habitat is present), California Coast steelhead trout (Oncorhynchus mykiss irideus) (Federal Threatened; Steelhead fry were documented in Torro Creek), (Morro shoulderband snail (Helmonthoglypta walkeriana) (Federally endangered; not observed but suitable habitat), Morro Bay kangaroo rat (Dipodomys heermanni morroensis), (Federally Endangered; potential habitat), Southwestern Pond Turtle (Clemmys marmorata pallida) (California Species of Special Concern; not observed on site but suitable habitat is present), Burrowing owl (Athene cunicularia) (California Species of Special Concern; potential habitat) and Pallid Bat (Antrozous pallidus) (California Species of Special Concern; not observed but suitable habitat at bridges)

Morro manzanita (Arctostaphylos morroensis) (Federally Threatened; potential habitat), San Luis Obispo fountain thistle (Cirsium fontinale var. obispoense) (Federally Endangered; potential habitat), Indian Knob mountainbalm (Eriodictyon altissimum) (Federally Endangered; potential habitat) Blochman's leaf daisy (Erigeron blochmaniae) (Rare; potential habitat), and Curly leafed monardella (Monarella undulata), (Rare; potential habitat).

4b. No riparian vegetation is proposed for removal and no significant changes to the riparian habitat are to be

expected. However, due to project's proximity to Toro Creek and three proposed creek crossings, the EIR should identify the range, types and potential for impacting various types of special animal and plant species associated within the riparian environment. Including (but not limited to) potential disturbance to occupied American badger dens, to nesting birds and roosting bats that may be present in a variety of riparian woodland trees in the Spring and Summer.

- 4c. The preliminary biological study identified no potential impacts to wetlands as defined by the Clean Water Act. The EIR should offer a thorough discussion of wetlands and provide confirmation of all initial analyses.
- 4d. No habitat modification is to be expected as a result of the proposed project. However, the project could have indirect impacts that cause fragmentation of habitat for three sensitive species: Tidewater goby (Eucyclogobius newberryi)) California red-legged frog (Rana aurora draytoni) and the California Coast steelhead trout (Oncorhynchus mykiss irideus).
- 4e. A portion of the project pipeline conveyances are within the Coastal Zone and must be developed in accordance with Coastal Zone Land Use Element (CZLUE). The Coastal Zone Land Use Ordinance provides policies protecting sensitive biological resources that include SRA (Sensitive Resource Areas) and ESHA. (Environmentally Sensitive Habitat Areas). These are high priority areas for preservation and the EIR should discuss the delineation of ESHA boundaries in accordance with the CZLUO implemented by the County. The EIR should identify potential impacts and develop mitigation consistent with California Coastal Commission policy.
- 4f. The proposed project does not conflict with any adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan.
- **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 an 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?

	Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
	3		X		
	3		X		
	3			х	
•	3			Х	

## **Impact Discussion:**

5a.-d. No cultural resources were observed during a surface investigation or examination of burrow spoils at the proposed WRRF site. However, a previously identified site, CA-SLO-879, a major village site lies immediately across Toro Creek Road. Due to site's close proximity to CA-SLO-879, a Phase 1 Archeological Survey should be conducted.

In addition, a Phase 1 Archeological Survey should be completed for Toro Creek Road, new conveyance routes, and other areas of proposed infrastructure. The EIR should discuss cultural resources of the project area and determine the significance of the project's impact and identify appropriate mitigation measures.

		Sources	Potentially Significant Impact	Less Than Significant With Mitigation	Less Than Significant Impact	No Impact
6.	<b>GEOLOGY AND SOILS.</b> Would the project:			Incorporation		
a)	Expose people or structures to potential substantial adverse effects, including the risk of loss, injury, or death involving:	2	х			
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.	2				Х
ii)	Strong seismic ground shaking?	2	X			
iii)	Seismic-related ground failure, including liquefaction?	2	Х			
iv)	Landslides?	2	X			
b)	Result in substantial soil erosion or the loss of topsoil?	2	х			
c)	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 landslide, lateral spreading, subsidence, liquefaction or collapse?	2	х			
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?	2	X			
e)	Have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water?	2				х

## **Impact Discussion:**

6a.i. The project site in not located within the Alquist-Priolo Special Study Zone established by the California Division of Mines and Geology.

ii. The proposed WRRF site is located approximately 600 feet northeast of the potentially active Cambria fault. Overlying alluvium and landslide deposits conceal the precise locations of the fault traces in the vicinity of the project site. The inactive Cayucos fault is located approximately 3,000 feet northeast of the site. There are five other significant faults (active, potentially active, and historically active) in the region with respect to the project site.

Based on the preliminary seismic study, the site area is characterized to be an area of high seismic activity. It should be anticipated the site would experience moderate to strong ground shaking that may be generated by earthquakes on any one of the several major active and potentially active faults. Consequently, further analysis is required to determine the appropriate seismic ground motion parameters that can be estimated and incorporated into the project design.

In addition, a route specific geological investigation should be conducted to further evaluate possible impacts along the new conveyance system route to the northern and southern terminus points. The EIR should discuss the nature and extent of the basic geologic risks present throughout the entire project area.

- iii. The liquidation potential at the proposed WRRF site is judged to be low. However, some cohesionless soils that are susceptible to liquefaction may be underlying the proposed WRRF site. Further geotechnical investigation is needed to determine the distribution, depth, and density of the alluvial material, so the estimated amount of potential ground settlement can be calculated.
- iv. The potential for landsliding to affect the WRRF site was determined to be moderate. The bedrock of the WRRF project area appears to be underlain, at depth, by serpentinite and Franciscan mélange. No underlying landslide deposits were observed at the site but the site is situated between two landslide complexes. Consequently, The EIR should include a more in-depth landslide assessment and the slope stability of the hillside should be further evaluated prior to decisions regarding potential site development.
- 6b. The project site for WRRF is located on an alluvial fan radiating from a hillside drainage ravine at the base of a steep hillside. The proposed project has potential to increase soil erosion. The EIR should have a site-specific, as well as, a route-specific soil and slope study to determine soil composition, depth, and severity of potential soil erosion.
- 6c. See above 6a iv.
- 6d. The project site for WRRF is composed of soils that are considered to be highly expansive and warrant more analysis. The EIR should include a site-specific geotechnical evaluation, as well as, a geotechnical evaluation of the sections of proposed conveyance routes.
- 6e. The WRRF site will direct site produced wastewater from toilets and pluming fixtures to the influent line therefore no impact relating to septic tank and waste water disposal is identified.

7.	GREENHOUSE GAS EMISSIONS. Would the project:	Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
a)	Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?	17, 18	X			
b)	Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	5, 17, 18	x			

7a-b. Environmental Setting: GHGs are global pollutants which are a regional and local concern. Global climate change is a cumulative impact. A project participates in this potential impact through its incremental contribution combined with the cumulative increase of all other sources of greenhouse gases.

Regulatory setting and Impact thresholds: The San Luis Obispo Air Pollution Control District (APCD) has established stationary source thresholds based upon combustion-related CO2e emissions. The APCD CEQA Handbook identifies for stationary source projects, the threshold is 10,000 metric tons per year (MT/yr) of CO2e. Furthermore to ensure new development provides fair share of GHG reductions needed to address cumulative environmental impacts from those emissions, it is recommended that a new stationary source capture at least 90% of the GHG emissions (SLO County APCD, GHG Thresholds and Supporting Evidence, 2012).

Impact and Mitigation analysis: As noted in Air Quality Section, the proposed project would be considered a new stationary emission source in SLO County.

The EIR should evaluate potential short term construction emissions and long term operational emissions which have the potential to contribute to global climate change or cumulatively contribute to global emissions of GHGs. CO2E emissions may be calculated in the EIR using CalEEMod, pursuant to the APCD CEQA Handbook. The EIR will recommend mitigation strategies for both construction activities and ongoing operation to reduce GHG impact and generation of CO2E emissions.

## 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?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
			x	
	X			
	^			
				х
13				х

- 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?

		x
		X
	x	
	<u> </u>	
X		

- 8a.·d Secondary treatment processes will likely include magnesium hydroxide or caustic soda. Disinfection processes will likely include chlorine and hydrogen peroxide. Typically hazards related to these chemicals are addressed by the use of concrete secondary containment structures, double walled chemical totes, adequate turning space for delivery trucks and eye wash/shower stations near each chemical feed station. The Proposed Project is not on a site identified as a hazardous materials site based on the Department of Toxic Substances Control "Cortese" list. The Proposed Project is not within ¼ mile of a school.
- 8e.-f. The site is not in proximity to an airport.
- 8.g.-h. The Project does not have the potential to impair implementation of or physically interfere with any adopted emergency response plan because there is not applicable plan for this site or use. The project is located in rural land designated as high fire hazard by virtue of remoteness and slope. The EIR should evaluate risks to life and property at the WRRF and identify appropriate design features in coordination with the fire agency (CALFire /Cayucos Fire Dept.)

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 the site or area, including through the alteration of the course of a stream or river, in a manner which would result in substantial erosion or siltation on- or off-site?
- d) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner which 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 flood hazard delineation map?
- h) Place within a 100-year flood hazard area structures which would impede or redirect flood flows?
- 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?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
19			x	
1			x	
1, 14, 15	Х			
1, 14, 15			x	
1			x	
			^	
1				Х
1, 14, 15				Х
1, 14, 15	Х			
1, 14, 15			х	

j) Inundation by seiche, tsunami, or **1, 2** mudflow?

1, 2		x

### **Impact Discussion:**

9a. Environmental and Regulatory Setting: The watershed for Cayucos is within the Central Coastal Watershed bounded to the west by Pacific Ocean and the east by the Santa Lucia Mountain Range. Most of Cayucos is generally located within storm water basins that drain directly to the Pacific Ocean. Three creeks within Cayucos convey flow originating from the Santa Lucia Mountains to the Pacific Ocean: Cayucos Creek, Old Creek, and Toro Creek; Morro Creek borders and shares some attributes with the Morro Bay watershed. Whale Rock Reservoir is located in the watershed approximately ½ mile east of the community of Cayucos

The Federal Emergency Management Agency (FEMA) is the official public source for flood hazard information. San Luis Obispo County Flood Control and Water Conservation District prepared a *Cayucos Drainage and Flood Control Study Report* in January 2004. The aforementioned report identified drainage problems in the community of Cayucos including localized drainage problems and major creek flooding problems in the floodplain of Cayucos Creek west of Highway 1.

The Clean Water Act (CWA) is the primary federal law governing water pollution. The CWA is administered by the U.S. Environmental Protection Agency (EPA) in coordination with the State Water Resources Control Board (Water Board). The CWA introduced the National Pollutant Discharge Elimination System (NPDES) which is a permit system for regulating point sources of pollution, including industrial facilities. NPDES Permits are non-stormwater permits, and typically include numeric effluent limitations for specific pollutants.

The existing Wastewater Treatment Plant in Morro Bay discharges secondary treated effluent via an outfall to the Pacific Ocean. The Proposed Project will no longer send secondary treatment level water to the outfall, but will blend daily discharge of reverse osmosis production water with tertiary treated effluent at about 49 acre feet per year. Discharge from the RO process is anticipated to meet future regulatory standards.

Impact Discussion a-f: The proposed WRRF will discharge produced water constituents, otherwise known as brine, into the Pacific Ocean through use of the existing outfall. The EIR should address the discharge quantities compared to existing, and also include analysis of applicable standards.

The proposed project would not be expected to deplete groundwater supplies or interfere with groundwater recharge. Domestic water use for the proposed project is limited to domestic use for toilets, shower and wash down functions. Refer to the project objectives for potential benefits of the project related to water quality.

The WRRF is in undeveloped rural land. The construction phase and long term operational activities could adversely affect runoff quality and add pollutant load from pavement. The EIR should address the impact to natural drainage patterns and water quality including drainage to Toro Creek. The EIR should discuss the water quality regulatory setting under the federal Clean Water Act and the County General Permit and identify the range of storm water pollutant control practices available for implementation during construction and long term operations.

g.-j The WRRF is located outside the FEMA 100 year floodzone in Toro Creek. No development is proposed which would expose people of structures to a significant risk of loss, injury or death involving flooding. Potential adverse impacts for inundation by sieche, tsunami or mudflow appear limited and will be addressed in the EIR. The EIR should include a flood study to validate the FEMA 100 year floodway boundary in relation to the WRRF site.

- **10. LAND USE AND 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?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
6	x			
				х

- 10a. The small size and remote location of the site would not result in dividing the community.
- 10b. The key issues related to the land use policy and regulatory setting are summarized following:
  - All of the Candidate Sites are within the Agriculture Land Use Category.
  - The WRRF is considered a Public Utility Facility, which is an allowable use in the Agriculture land use category subject to the approval of a Conditional Use Permit (CUP) and subject to the requirements of Land Use Ordinance Chapter 22.30.370.
  - Approval of the CUP would require a finding of consistency with policies of the Estero Area Plan as well as the Land Use, Agriculture, Conservation and Open Space Elements.
  - None of the Candidate Sites are subject to the combining designations of the Estero Area Plan.
  - The construction of pipelines and other facilities in support of the WRRF within the Coastal Zone will require the issuance of a Coastal Development Permit (CDP) by the County consistent with the standards contained in CZLUO Chapter 23.08.286. Approval of the CDP would require a finding of consistency with policies of the Estero Area Plan.

All development in the unincorporated County landward of the Coastal Zone is subject to the Inland portion of the County Land Use ordinance (LUO, Title 22 of the County Code). The proposed project sites is located on land within the *Agriculture* land use category. According to Table 2-2 of the LUO, *Public Utility Facilities* (which includes wastewater treatment facilities) is an allowed use in the Agriculture land use category subject to the approval of a Conditional Use Permit (CUP) by the County Planning Commission. Section 22.30.370 describes certain planning area standards applicable to the development of public utility facilities, including the contents of the required CUP application as well as development standards that will apply as conditions of approval.

Section 22.30.370 describes certain planning area standards applicable to the development of public utility facilities, including the contents of the required CUP application as well as development standards that will apply as conditions of approval.

Development within the Coastal Zone as defined by the Coastal Act of 1976 is subject to the Coastal Zone Land Use Ordinance (CZLUO). As set forth in Section 30106 of the Coastal Act, "development" in the Coastal Zone means:

"... construction, reconstruction, demolition, or alteration of size of any structure, including any facility of any private, public or municipal utility..." As used in the CZLUO, "structure includes, but is not limited to, any building, road, pipe, flume, conduit, siphon, aqueduct, telephone line, and electrical power transmission and distribution line."

Therefore, construction of pipelines and other facilities within the Coastal Zone in support of the CSWP will require the approval of a Coastal Development Permit by the County. Chapter 23.08.286 provides planning area standards for the construction of pipelines and transmission lines.

The EIR should describe all applicable County and State plans, policies and regulations including, but not limited to, the Estero Planning Area / Certified Local Coastal Program, the Open Space and Conservation Element, the Agricultural Element, and Land Use Ordinance, and discuss consistency of the Proposed Project with these and all applicable documents.

10c. The project area is not subject to any habitat conservation plan or natural community conservation plan.

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?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
1				х
1				Х

#### **Impact Discussion:**

11a.-b. There are no mineral resources identified in the County General Plan on the project site and conveyance routes, therefore no impact to Mineral Resources is identified.

#### **12. NOISE.** Would the project result in:

- a) 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

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
6,8	X			
6,8	Х			

groundborne noise levels?

- c) A substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?
- d) 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 or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?
- f) For a project within the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels?

	_			
	6	Х		
	6	Х		
			-1	
	6			X
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Χ

#### **Impact Discussion:**

12a-c Environmental and Regulatory Setting: The San Luis Obispo County Noise Element of the General Plan provides a policy framework for addressing potential noise impacts. The County's Noise Exposure Maps include information concerning the effects of noise and various techniques for noise control. The Noise Element identifies the major sources of noise in the County as roads, railways, airports and stationary sources. The ambient noise on the proposed project Site (Toro Creek road) is influenced by traffic from Highway 1 corridor. The County's Noise Contour Maps indicate that noise level is 60dBa at 300feet from the center line from Highway 1 therefore it is likely that ambient noise level on the project site is in the range of 40-50dBa.

6

Noise Element Policy 3.3.5 regulates noise created by new proposed stationary noise sources. Policy 3.3.5(c) indicates that where the stationary noise source will expose vacant land in the Agriculture or Rural Lands Use category to noise levels which exceed the Maximum Allowable Noise Exposure-Stationary Noise Sources noise levels shall be reduced to or below the Maximum Allowable Noise Exposure.

County Land Use Ordinance (LUO) establishes acceptable exterior and interior noise levels at different times of the day. The LUO also establishes noise and vibration standards.

Impact Discussion 12a-d: Implementation of the proposed project, including operation of WRRF and ancillary equipment such as pumps would be a new stationary noise source. The EIR shall address the proposed noise levels of WRRF operation and compare to the numerical noise standard in the Noise Element and performance standards for new industrial uses. The proposed project would not be expected to generate noise impacts related to transportation noise.

Short term temporary noise impacts due to construction will be evaluated in the EIR. The noise level is expected to be consistent with noise generated by roadway construction projects which sometimes exceed Noise Ordinance limits and require mitigation. Site development including pipeline infrastructure and site grading will result in short-term increases in ambient noise levels related to the use of construction equipment including trucks, graders, bulldozers, and backhoes. The potential noise level is dependent on the location of the equipment on the site as well as the actual number and types of equipment used during construction. Construction activities may also result in temporary ground borne vibration. The EIR will analyze construction

impacts on noise and vibration and provide performance standards and mitigation measures as it relates to noise levels.

Impact Discussion 12e-f The proposed project is not located within an airport land use plan, or private airstrip.

## 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, necessitating the construction of replacement housing elsewhere?
- c) Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
6,11	x			
				x x

#### **Impact Discussion:**

13a. Environmental Setting: The community of Cayucos is part of the Estero Area Plan / Certified Local Coastal Program within the County. The County General Plan identifies a projected population for the area of the Urban Reserve Line that coincides with the CSD service area as 4,765 in the year 2022. The 2007 Water Master Plan Update for the Cayucos Area Water Organization (CAWO) concluded "41 AFY would be required to support new growth....without procuring additional water sources the water deficit at [General Plan] buildout is estimated between 15 AFY and 41 AFY".

Impact Threshold: When water supply is the impediment to growth, the criteria for determining if a project would result in a removal of an impediment to growth that could result in direct or indirect impacts on the environment is: Would the availability of additional water supply be greater or less than the water supply projected to be required for build out of General Plan land uses?

Impact Analysis: The Proposed Project is intended to accommodate the projected sewer flow for build-out of land uses under the General Plan within the existing CSD service area. There is no plan or proposal to expand the CSD service area. Phase 2 of the project would create a recycled water pipeline extending to the CSA 10 Water Treatment Facility site. The Proposed Project does not include the use of recycled water by connection to water purveyor facilities to make additional water supplies available for use. These future actions would be undertaken by the water purveyor(s). The provision of the recycled water conveyance from the WRRF to the water treatment facility would provide a potential water buffer against long-term future demand. Therefore, the Proposed Project in itself would not be considered growth inducing. To the extent that it might be considered growth inducing, the effect would be indirect because the CSD does not have authority to provide potable water or to approve additional growth.

These facts notwithstanding, the EIR should provide a basic documentation of population, water demand and growth projections, tabulation of long term water supply for Cayucos and confirm that the Proposed Project phase

2 would not result in a removal of an impediment to growth leading to significant indirect effects.

13b-c. No existing housing units or people would be displaced.

#### 14. PUBLIC SERVICES.

a) Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, 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 public services:

Fire	protection?
------	-------------

Police protection?

Schools?

Parks?

Other public facilities?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
				x
				X
				Х
				X
				X
				X

#### **Impact Discussion:**

14a. Sheriff facilities are located at 2099 10<sup>th</sup> Street in Los Osos approximately 10 miles from the proposed WWTF site. Fire protection / first response service is provided by San Luis Obispo County Fire-CALFire from the station at 108 Chaney about 2 miles from the Proposed Project. With a WWTF staff of about four people (not 24 hour), the potential increase in life safety emergency response is low and would not adversely impact service capability or require new facilities to be constructed for fire/life safety functions. The potential for hazardous material response will exist with the use and storage of chemicals on the site, refer to section 8.

The Proposed Project would not add population that would effect schools, parks or other public facilities.

#### 15. RECREATION:

- a) Would the project 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?
- b) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
				х
				Х

#### **Impact Discussion:**

- 15a. The project would not add population that would impact recreational facilities.
- 15b. The project contains no recreational facilities and would require no facilities to be built.

## **16. TRANSPORTATION/TRAFFIC:** Would the project:

- a) Cause an increase in traffic which is substantial in relation to the existing traffic load and capacity of the street system (i.e., result in a substantial increase in either the number of vehicle trips, the volume to capacity ratio on roads, or congestion at intersections)?
- b) Exceed, either individually or cumulatively, a level of service standard 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)?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
10	х			
10			Х	
				x
			X	

- e) Result in inadequate emergency access?
- f) Result in inadequate parking capacity?
- g) Conflict with adopted policies, plans, or programs supporting alternative transportation (e.g., bus turnouts, bicycle racks)?

		Х	
		Х	
10		X	

Access to the site by construction and operations traffic is by Toro Creek Road via State Route 1 (Highway 1). Highway 1 in south Cayucos is a four-lane highway. According to the Regional Transportation Plan (2014) "Highway 1 is the primary north/south arterial through the North Coast. The highway is specifically restricted to be maintained as a two-lane highway north of Cayucos by the California Coastal Act (limited distance passing lanes and channelization are allowable). There are five grade-separated interchanges along the freeway segments of the corridor, three in Morro Bay and two in Cayucos along the freeway segments of the corridor.... [T]raffic volumes in the corridor between San Luis Obispo and Morro Bay are projected to increase very modestly as development is expected to be minimal on the North Coast". For the segment between Yerba Buena Street in Morro Bay and Cayucos Street in Cayucos, the Average Annual Daily Trips (AADT) in 2010 was about 11,000 (Level of Service A/B) and is expected to exceed 14,800 in 2035 (LOS A/B). The level of impact significance threshold under the County Land Use and Circulation Element is LOS C. No capacity improvements are outlined in the RTP for this highway segment.

Impact Analysis: The Proposed Project will generate approximately 10 trips a day by four operations staff. This traffic increase would not be significant relative to the capacity of either SR 1 or Toro Creek Road. At current and projected LOS A/B no significant impacts to capacity would result from the added project trips.

Construction traffic would be present on these roadways in varying intensities over a 2-year construction period. The two-year period includes the pipeline construction work on public streets in Cayucos and Morro Bay. It is anticipated that staging and storage of construction material would occur on a temporary storage yard across Toro Creek Road from the proposed WRRF. Trucks and equipment both for plant construction as well as pipeline construction would use Toro Creek Road and the Toro Creek Road / SR 1 intersection to travel to work areas. This temporary condition could result in significant impacts, requiring a construction transportation management plan to be developed and approved by the County, the City of Morro Bay and Caltrans. The EIR should evaluate the severity of potential impact and identify appropriate mitigation in coordination with agencies.

- 16b. Access to the site by construction and operations traffic is by Toro Creek Road via State Route 1. State Route 1 in south Cayucos is not identified in the RTP as congested. Toro Creek Road is a rural road that does serve any significant population areas to the east and has very low traffic levels.
- 16c. The project is not near any airport.
- 16d. The Proposed Project would not create any horizontal or vertical changes to public streets. The facility is a low-intensity use in terms of vehicular traffic. Daily trips by operations staff (approximately four persons) would not be incompatible with existing rural traffic and agricultural equipment that may be present on Toro Creek Road. The periodic removal of sludge from the site by truck would consist of 2 trips at weekly intervals. This type and intensity of traffic is not incompatible with the current vehicular use that includes periodic large agricultural trucks and would not result in a significant effect.
- 16e. The Project site is accessed via Toro Creek Road via State Route 1. Toro Creek Road is a public street with a paved width of approximately 16-18 feet, typical of rural roads in the vicinity. Ingress and egress to the site as well as emergency vehicle turning movements will conform to CALFire standards. With compliance with this requirement at the building permit stage no adverse impact would result or mitigation be required.
- 16f. The Proposed Project site can accommodate the minimal number of vehicles required for operations, i.e. about five spaces.

16g. The Proposed Project does not create the number of jobs, travel demands, or is in land use location, that would be subject to, or meaningfully contribute to, implementation of any regional transportation plan.

#### Less Than No Impact Less Than Sources Potentially Significant Significant Significant **17**. **UTILITIES AND SERVICE SYSTEMS.** With Impact Impact Would the project: Mitigation Incorporation Exceed wastewater treatment requirements of the applicable Regional Water Χ Quality Control Board? Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which Χ could cause significant environmental effects? Require or result in the construction of new storm water drainage facilities or expansion of existing facilities, the construction of which could cause Χ significant environmental effects? Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new Χ or expanded entitlements needed? Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition Χ to the provider's existing commitments? Be served by a landfill with sufficient f) permitted capacity to accommodate the Χ project's solid waste disposal needs?

#### **Impact Discussion:**

waste?

- 17a. The Proposed Project is intended to meet all regulatory requirements.
- 17b. The Project Phase 2 component will create a conveyance pipeline for recycled water from the WRRF to the CSA 10 Water Treatment Plant. The water is intended to meet regulatory requirements for either Direct or Indirect Potable Reuse at a future time when the water purveyors determine an additional community water source is advantageous. Refer to item 13 Population and Housing above for discussion of the potential for growth inducing

Comply with federal, state, and local statutes and regulations related to solid

Χ

effects.

- 17c. Construction of the WRRF and conveyances is not anticipated to require construction of, or modification to, any storm drainage systems other than that which may be incidental to pipeline work at bridge and culvert crossings. These effects would not be substantial for stormwater conveyances or capacity; other potential effects are addressed under Biological Resources.
- 17d. The Proposed Project domestic water requirements will be served by an existing water well and infrastructure. Water demand is limited to domestic use for toilets, shower and wash down functions and do not constitute a substantial water demand.
- 17e. The Proposed Project sewer requirements will be served by the proposed plant. Sewer flow is limited to domestic use for toilets, shower and wash down functions and do not constitute a substantial sewer flow.
- 17f. The proposed Project waste stream is limited to office and landscape trimming waste typical of residential and commercial development. The project is served by the Cold Canyon landfill. With approval of expansion by the County in 2012 he landfill has capacity for 30 years at a daily rate 25% increased over existing in 2012. Cayucos currently does not have green waste pick up and recycling. Should that become available the project's landscape trimming waste would be directed to recycling. The Proposed Project would not have a significant impact on solid waste disposal capacity.
- 17g. The disposal of the biosolid (sludge) by-product of wastewater processing is discussed in item 8 above.

## 18. MANDATORY FINDINGS OF SIGNIFICANCE.

- 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, 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 considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?
- c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?

Sources	Potentially Significant Impact	Less Than Significant With Mitigation Incorporation	Less Than Significant Impact	No Impact
	V			
	X			
	X			
	Х			

- 18a. The Proposed Project has the potential to cumulatively impact wildlife movement and sensitive species habitat.
- 18b. Potential for cumulative impacts that should be evaluated in the EIR are identified for agricultural resources, visual resources, biological resources and stormwater quality and quantity.
- 18c. Potential adverse effects on people that should be addressed in the EIR are identified for noise, wildland fire risk and hazardous materials.

#### 19. EARLIER ANALYSES.

Earlier analysis may be used where, pursuant to the tiering, program EIR, or other CEQA process, one of more effects have been adequately analyzed in an earlier EIR or Negative Declaration. Section 15063 (c) (3) (D0). In this case a discussion should identify the following items:

- a) Earlier analysis used. NONE
- **b) Impacts adequately addressed.** (Identify which effects from the above checklist were within the scope of and adequately analyzed in an earlier document pursuant to applicable legal standards, and state whether such effects were addressed by mitigation measures based on the earlier analysis.) **NONE**
- c) Mitigation measures. (For effects that are "Less than Significant with Mitigation Incorporated," describe the mitigation measures which were incorporated or refined from the earlier document and the extent to which they address site-specific conditions of the project.) NONE

20.	SOURCE REFERENCES.
1.	Firma, Cayucos Sustainable Water Project Site Analysis Report, March 2016
2.	Geoinsite, Screening-Level Engineering Geologic Investigation- Five Candidate Site, Cayucos Sustainable Water Project, September 2015
3.	Cultural Resource Management Services, Phase 1 Archaeological Investigation of Five Candidate Locations for the Cayucos Community Services District, November 2015
4.	Althouse and Meade, Biological Resource Constraints for Cayucos Sustainable Water Project, November 2015
5.	San Luis Obispo County Air Pollution Control District, Clean Air Plan, 2003
6.	San Luis Obispo County General Plan: Estero Area Plan 2009, Noise Element, Open Space and Conservation Element
7.	Rules of Procedure to Implement the California Land Conservation Act of 1966
8.	San Luis Obispo County Land Use Ordinance – Inland (Title 22 of the County Code)
9.	San Luis Obispo County Coastal Zone Land Use Ordinance (Title 23 of the County Code)
10.	San Luis Obispo Council of Governments, Regional Transportation Plan, 2014
11.	Boyle Engineering, 2007 Water Management Plan Update for the Cayucos Area Water Organization
12.	Black and Veitch, Draft Technical Memorandum 3: Morro Bay-Cayucos WWTP Decommissioning, August 2015
13.	California Department of Toxic Substances Control http://www.dtsc.ca.gov/SiteCleanup/Cortese_List.cfm
14.	SLO County Flood Control and Water Conservation District http://slocountywater.org
15	RMC Consulting, Cayucos Drainage and Flood Control Study Report, January 2014
16.	San Luis Obispo County Design Guidelines, November 1998
17.	San Luis Obispo County Air Pollution Control District, CEQA Air Quality Handbook, 2012
18.	San Luis Obispo County Air Pollution Control District, Greenhouse Gas Thresholds and Supporting Evidence, 2012
19.	State Water Resources Control Board http://www.swrcb.ca.gov

## **Project Description**

**ATTACHMENT A** 

# Cayucos Sustainable Water Project PROJECT DESCRIPTION

#### LOCATION AND PROJECT SCOPE

The Project consists of two phases. Phase 1 includes construction of a new Water Resource Recovery Facility, related conveyance pipelines, production of tertiary treated water for agricultural irrigation, and discharge of process water to the existing ocean outfall. This phase would also include participation in the decommissioning of the existing Wastewater Treatment Facility in Morro Bay. Phase 2 is the construction of a conveyance pipeline for recycled water to the CSA 10 Surface Water Treatment Facility.

The Proposed Project site is located in the Toro Creek Valley approximately 0.75 miles inland from State Route 1 in Cayucos. The zoning is Agriculture. The facility site is outside the Coastal Zone. The CSD would create a public lot within this parent parcel of approximately 5 acres for the wastewater treatment facility.

The District will apply for a public lot pursuant to Section 21.02.010(a)(9) of the County of San Luis Obispo's Real Property Division Ordinance and Government Code Section 66428(a)(2). These sections exempt land conveyed to or from a public entity from the requirements of a parcel or tract map. The public lot would be sought as part of the Conditional Use Permit process. Public utility facilities are an approved use in the agricultural zone. The District's intent is to create the smallest parcel necessary to allow construction of the CSWP and thereby preserve the maximum amount of land for agricultural uses.

The Facility Plan for the WRRF is being developed concurrently with the EIR. The study area identified for EIR analyses is approximately 12 acres in size. It is anticipated that the WRRF will require only a portion of this area.

The Alternative Project site is located in the Willow Creek Valley approximately 1.25 miles inland from State Route 1 in Cayucos. The parent parcel is 215.0 acres owned by the Molnar Family (APN 073-093-011). Under this alternative, the CSD would create a public lot within this parent parcel of approximately 5 acres for the wastewater treatment facility. The zoning is Agriculture. The facility site is outside the Coastal Zone.

#### HISTORY AND NEED

The Cayucos Sanitary District (CSD) and the City of Morro Bay worked collaboratively on upgrading the discharged water quality of the shared Morro Bay Cayucos Sanitary District Waste Water Treatment Plant (MBCSD WWTP) for nearly a decade. The purpose of the proposed upgrade to the MBCSD WWTP was to improve discharged water quality to at least full secondary eliminating the need for the Clean Water Act Section 301(h) modified discharge permit based on a Settlement Agreement with the Central Coast Regional Water Quality Control Board (RWQCB). The 2005 Settlement Agreement provided a nine and one half year timeline for the completion of the upgrades at the MBCSD WWTP. At their January 10, 2013 meeting, the California Coastal Commission

(CCC) determined that upgrading and maintaining wastewater facilities at the location of the existing MBCSD WWTP would violate the Coastal Act, effectively mandating the abandonment of the CSD's historic wastewater treatment infrastructure.

Since upgrading the existing MBCSD WWTP was no longer a viable option, the CSD Board determined at it's April 30, 2015 meeting that the best way to secure the community's water future was the pursuit of a standalone Water Reclamation and Recovery Facility (WRRF) by developing this project, the Cayucos Sustainable Water Project (CSWP). The mission of this project is to deliver a sustainable and cost effective water resource recovery system for the community of Cayucos within the streamlined schedule necessitated by the status of the current MBCSD NPDES permit and the RWQCB Settlement Agreement.

#### **PROJECT OBJECTIVES**

The Project site was selected by the CSD Board of Directors from among five candidate sites as superior in meeting the Project Objectives and for environmental suitability. The Project Vision, Mission, Objectives, Performance Measures and Guiding Principles were adopted by the CSD Board of Directors in a Project Charter and are summarized for application in the EIR process as follows:

- Provide the community of Cayucos with efficient, reliable and adaptable wastewater treatment, while producing a high quality water supply to benefit the community.
- Enable the community to put the wastewater that is currently discharged to the ocean to beneficial use.
- Provide the community with sustainable water, ownership of facilities and local governance.
- Deliver a sustainable and cost effective water resource recovery system for the community of Cayucos within a streamlined schedule.
- Optimize capital investment and life cycle cost.
- Maximize value for the ratepayers' investment.
- Develop a water resource recovery system that will benefit future generations.
- Obtain grants and low-interest loans to reduce the financial burden on the community.
- Identify a facility location that benefits the community of Cayucos.
- Enhance the community's long-term water supply.

#### CHARACTERISTICS OF THE PROJECT

### **Water Resource Recovery Facility**

The facility will be accessed from Toro Creek Road, a public road.

The build-out average annual daily flow (AADF) capacity is expected to be in the range of 0.33 to 0.50 million gallons per day (MGD). Peak hour and maximum daily flows resulting form wet weather events are expected to be equalized at the beginning of the treatment process to reduce the required size of equipment for all processes.

In addition to processing infrastructure, facility components will also include: Office building

Laboratory building
Stand by power generator and enclosure
Maintenance Facilities and Materials Storage Building
Security fence
Solar array
Native Landscape screening
Stormwater management features
Safety and Spill prevention features and plan
Agricultural Buffers

## **Facility Processes and Technology**

The Facilities Plan currently being developed will identify a range of options for technology and processes to determine the best system to meet the overall project objectives. The description below outlines the range of potential options.

As a fundamental component of the project, influent will be treated to disinfected tertiary standards, with a portion available for recycled water irrigation, and remaining treated effluent treated to disinfected tertiary standards and discharged to the existing Morro Bay / Cayucos Outfall. Future phases will direct the tertiary treated effluent stream through advanced treatment processes for reuse.

The Facilities Plan currently being developed will identify a range of options for technology and processes to determine the best system to meet the overall project objectives. The description below outlines the range of technology options.

**Equalization Basin** 

Primary treatment:

Bar screens

Grit removal

Primary clarifier

Chemical injection

Secondary Treatment

Suspended Growth Treatment Process

Attached Growth Treatment Process

Clarification

Chemical Injection

Membrane Bioreactor

**Tertiary Treatment:** 

Membrane Bioreactor

Chlorine disinfection

Solids handling

Clarification

Filtration

Disinfection

Advanced Treatment:

Reverse Osmosis (RO)

UV/Advanced Oxidation disinfection

Treated water storage and pumping

Solids Handling

Dewatering

#### Drying

Energy Demand comparisons will be developed as part of the Facilities Plan.

#### COLLECTION AND CONVEYANCE INFRASTRUCTURE

Maps 1-21 attached show the Project pipeline routes in Cayucos and Morro Bay. The pipeline segments consist of: 1) influent to WRRF, 2) Treated wastewater to Lift station 5, 3) Effluent to outfall, and 4) recycled water pipeline to CSA 10 site.

Influent to Facility: Construction of force main from existing Lift Station 5 at Toro Creek Road and SR1 to the WRRF is approximately 4,200 LF of pipe along Toro Creek Road. Modifications to Lift Station 5 will be constructed. Net increase in energy demand from existing infrastructure is 9,000 kWh/year. The pipeline will cross Toro Creek at the existing bridge.

<u>Treated wastewater to Lift Station 5</u>: The pipeline back down Toro Creek Road will parallel the influent line.

Treated wastewater to existing outfall: From Lift Station 5 treated wastewater will be conveyed by existing force main in Caltrans right of Way and Main Street in Morro Bay to the intersection of Island Street and Main Street where a new force main will be constructed form that point down Main Street to Highway 41 /Atascadero Road to the existing Morro Bay-Cayucos WWTF outfall. The tie-in will occur within the existing facility property. The CSD has a 35% interest in the outfall capacity that will accommodate this discharge.

Recycled Water to CSA 10 site: A pipeline will be constructed in Phase 2 to the CSA 10 Water Treatment Facility on Cabrillo in Cayucos. At some point in the future when an additional water source is determined by the community water purveyors as advantageous, such as for a drought buffer, recycled water will be conveyed by force main to the CSA 10 Water Treatment Facility on Cabrillo in Cayucos. The routes would run west on Toro Creek Road then north along SR 1 in the CSD easement in the right of way to Chaney Street. The force main will then run along Ocean Blvd. past the cemetery, crossing the existing footbridge over Old Creek to the CSA 10 site. The recycled water pipeline will be capped at that location.

#### TERTIARY TREATED WATER FOR AG

The WRRF will create tertiary treated non-potable water for agricultural irrigation. It is anticipated that agricultural lands adjoining or nearby the WRRF could have access to this irrigation water. The project will implement an agreement with a yet to be identified farmer / landowner to provide this water to agricultural land to create irrigated cropland that, at a minimum, mitigates the loss of prime agricultural land converted by the Proposed Project.

The WRRF is anticipated to produce up to 80 acre-feet per year of tertiary treated water.

### Regulatory background

Disinfected tertiary recycled water is filtered and disinfected wastewater that meets the following criteria:

- (a) The filtered wastewater has been disinfected by either:
  - A chlorine disinfection process following filtration that provides a CT (the product of total chlorine residual and modal contact time measured at the same point) value of not less than 450 milligram-minutes per liter at all times with a modal contact time of at least 90 minutes, based on peak dry weather design flow; or
  - 2. A disinfection process that, when combined with the filtration process, has been demonstrated to inactivate and/or remove 99.999 percent of the plaque forming units of F-specific bacteriophage MS2, or polio virus in the wastewater. A virus that is at least as resistant to disinfection as polio virus may be used for purposes of the demonstration.
- (b) The median concentration of total coliform bacteria measured in the disinfected effluent does not exceed an MPN of 2.2 per 100 milliliters utilizing the bacteriological results of the last seven days for which analyses have been completed and the number of total coliform bacteria does not exceed an MPN of 23 per 100 milliliters in more than one sample in any 30.
- (c) Tertiary treated water will meet:
  - CFR Title 22 operational and on-site use requirements
  - Central Coast Basin Plan irrigation water quality parameters
  - Central Coast Regional Water Quality Control Board

### Infrastructure required

Recycled Water pump station at the treatment plant location requires 6,800 KWh/year for pumping.

Pipeline to irrigation customers is estimated at 600 LF to the irrigation site

On-site storage facility for irrigation water storage will be a tank or pond.

#### **CONSTRUCTION ACTIVITIES**

Construction duration for WRRF and associated conveyance infrastructure is estimated at two years. The Facility Plan will estimate total earthwork volume and describe other key activities.

#### WRRF OPERATIONS

#### **Storage of Materials**

Secondary treatment- process will likely include an alkalinity source (magenisum hydroxide or caustic soda). Disinfection processes will likely include chlorine and hydrogen peroxide. Chlorine will be stored in an enclosed room/tank. Hydrogen peroxide is stable when stored properly in secure tanks or drums.

Hazards will be mitigated through the use of concrete secondary containment structures, double walled chemical totes, adequate mobile space for delivery trucks, and eye-wash/shower stations near each chemical feed station.

### **Disposal of Biosolids**

The biosolids produced at the new treatment facility would be considered USEPA sub-Class B biosolids. The biosolids will be transported to Engle Grey composting in Santa Maria or the Kettleman Disposal Site for disposal or composting and reuse. The volume of biosolids exported from the WRRF would be approximately two 10 cubic yard capacity trucks per week.

## **Effluent to Existing Outfall**

<u>Daily discharge Volume</u>: For the disposal only alternative and no irrigation, the average annual daily flow (AADF) will be discharged to the outfall. This is anticipated to be approximately 324 acre-feet per year.

For the tertiary irrigation alternative, the estimated anticipated discharge to the outfall will be approximately 244 acre-feet per year.

For the Phase 2 direct potable reuse scenario, the estimated anticipated discharge to the outfall will be approximately 49 acre-feet per year.

<u>Water quality</u>: Water will be treated to disinfected tertiary standards and will meet anticipated NPDES Permit discharge limitation listed in the table below:

Parameter	BOD	TSS
Average Monthly (mg/L)	30	30
Average Weekly (mg/L)	45	45
30-Day Average Percent Removal (%)	> 85%	> 85%
Instantaneous Maximum (mg/L)	50	50
30-Day Average Percent Removal (%)	85	85

RO Discharge Disposal: Daily discharge of RO production water will be blended with tertiary treated effluent discharge. Anticipated discharge to the outfall will be 49 acrefeet per year. Discharge from the RO membrane is anticipated to meet future Ocean Plan amendment requirements. Increased Total Dissolved Solids (TDS)/salt concentrations in the brine stream would still be far below seawater concentrations.

#### **ALTERNATIVE SITE**

The Alternative Site will be analyzed to the same level of detail in the EIR as the Proposed Project. The Project Objectives and Project characteristics of the treatment facility would be the same as the Proposed Project. The following topics describe the differences between the Proposed Project and Alternative Project Site.

Access to the Site: Willow Creek will be crossed by a clear span bridge top of bank to top of bank) accessed from Montecito Road.

<u>Conveyance Infrastructure crossings of streams and drainages:</u> Conveyance pipelines will cross Willow Creek hung from the proposed access bridge. Pipelines to and form the WRRF site will cross Willow Creek and an ephemeral drainage on Old Creek Road.

<u>Tertiary Treated Water for Agriculture</u>: Tertiary treated water will be piped to a proposed storage pond constructed by the Molnars to be used for irrigation water storage. The pond is located about 1,000 feet east of the planned access road from Montecito Rd to the treatment facility. The pond is planned to hold 5 acre-feet of water. Irrigation water would then be available for crop production on surrounding land.

#### PHASE 2 RECYCLED WATER PIPELINE

The direct or indirect potable reuse of the recycled water that will be conveyed by this Project to the CSA 10 site as Phase 2 is anticipated to be initiated by the community water purveyor(s) at the point in time that additional water resources for the community are determined to be needed. The Proposed Project does not include addition of a potable water supply to the community because the CSD is not a water purveyor.

#### **DECOMMISSIONING OF WWTF IN MORRO BAY**

The CSD will participate in the decommissioning of the existing WWTF in Morro Bay at the time that both agencies have completed their respective wastewater projects. Due to the fact that the timing of the Morro Bay facility along with further development of specific decommissioning plans are unknown, the Project Description can only identify the following basic aspects of de-commissioning at this time:

- Demolition and removal of structures and equipment form the existing site, except for the existing outfall structure that will remain in place for the new facilities.
- Disposal of hazardous waste and remediation of contaminated soils.
- Restoration of the site.

#### PROJECT FEATURES TO REDUCE ENVIRONMENTAL IMPACTS

Aspects of the Proposed Project intended to reduce or avoid environmental Impacts include:

- Reuse of existing pipelines and/or pipeline alignments from Lift Station 5 to the existing outfall
- Creation of tertiary treated irrigation water for agriculture
- Agricultural buffers of 200 feet from facility
- Facility to creek setbacks of 50 feet from top of bank /riparian canopy
- Renewable Energy solar array to meet or substantially offset WRRF energy demand































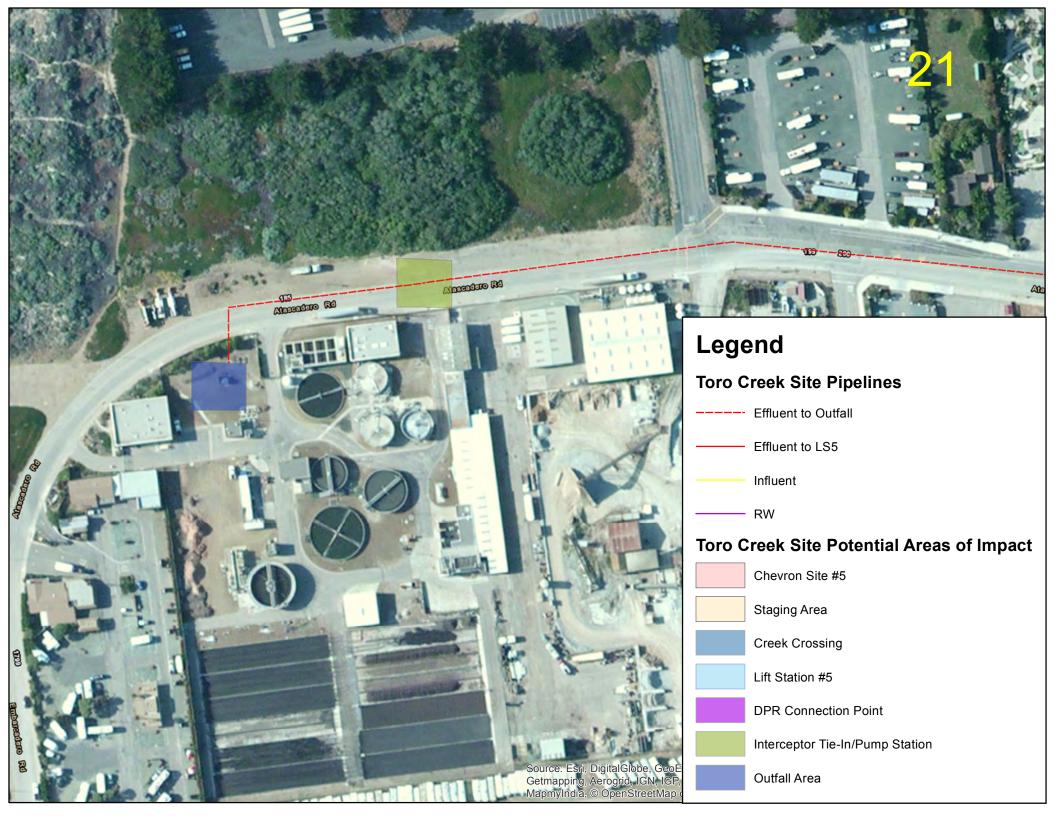








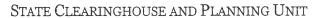




### RECEIVED MAY 3 1 2016



# STATE OF CALIFORNIA GOVERNOR'S OFFICE of PLANNING AND RESEARCH





### Memorandum

Date:

May 26, 2016

To:

All Reviewing Agencies

From:

Scott Morgan, Director

Re:

SCH # 2016041078

Cayucos Sustainable Water Project

The Lead Agency has <u>corrected</u> some information regarding the above-mentioned project. Please see the attached materials for more specific information and note that a new *document details report* was re-printed to view the corrections. All other project information remains the same.

cc:

Rick Koon Cyucos Sanitary District

200 Ash Avenue Cayucos, CA 93430

### Document Details Report State Clearinghouse Data Base

SCH# 2016041078

Project Title Cayucos Sustainable Water Project

Lead Agency Cayucos Sanitary District

Type NOP Notice of Preparation

Description The project consists of two phases. Phase 1 includes construction of a new Water Resource Recovery

Facility, related conveyance pipelines, production of tertiary treated water for agricultural irrigation, and discharge of process water to the existing ocean outfall. This phase would also include participation and coordination in the decommissioning of the existing Morro Bay / Cayucos Wastewater Treatment Plant in Morro Bay. Phase 2 is the construction of a conveyance pipeline for recycled water to the CSA

10 Surface Water Treatment Facility.

A WRRF will be constructed on a portion of the project site on Toro Creek Road in Cayucos. The WRRF will be sized to serve only the service area of the CSD with an average annual daily flow

(AADF) of 0.33 to 0.5 million gallons per day.

**Lead Agency Contact** 

Name Rick Koon

Agency Cayucos Sanitary District

Phone (805) 995-3290

email

Address 200 Ash Avenue

City Cayucos

State CA Zip 93430

Base

Fax

**Project Location** 

County San Luis Obispo

City

Region

Cross Streets SR 1 / Toro Creek Rd

Lat / Long

Parcel No. 073-092-034, -093-011

Township Range

Proximity to:

Highways SR 1

Airports

Railways

Waterways Pacific Ocean, Toro Creek, Willow Creek, Old Creek

Schools

Land Use Agriculture

Project Issues Aesthetic/Visual; Agricultural Land; Air Quality; Archaeologic-Historic; Biological Resources; Coastal

Zone; Drainage/Absorption; Flood Plain/Flooding; Geologic/Seismic; Noise; Soil

Erosion/Compaction/Grading; Toxic/Hazardous; Traffic/Circulation; Vegetation; Water Quality; Water

Section

Supply; Growth Inducing; Landuse; Other Issues

**Reviewing** Resources Agency; California Coastal Commission; Department of Parks and Recreation; Department of Water Resources: Department of Fish and Wildlife. Region 5: Native American Heritage

of Water Resources; Department of Fish and Wildlife, Region 5; Native American Heritage Commission; California Highway Patrol; Caltrans, District 5; State Water Resources Control Board, Divison of Financial Assistance; State Water Resources Control Board, Division of Drinking Water;

State Water Resources Control Board, Division of Water Quality; State Water Resources Control Board, Division of Water Rights; Regional Water Quality Control Board, Region 3; Other Agency(ies)

Date Received 04/26/2016 Start of Review 04/26/2016

End of Review 05/25/2016

Note: Blanks in data fields result from insufficient information provided by lead agency.

### CAYUCOS SANITARY DISTRICT

200 Ash Avenue
P.O. Box 333, Cayucos, California 93430-0333

<u>www.cayucossd.org</u>
805-995-3290

GOVERNING BOARD

R. Enns, President

D. Chivens, Vice-President

C. Maffioli, Director

S. Lyon, Director

D. Lloyd, Director

Governor's Office of Planning & Research

MAY 26 2016

STATE CLEARINGHOUSE

May 2, 2016

State Clearinghouse Sent via email: state.clearinghouse@opr.ca.gov

RE: Cayucos Sustainable Water Project SCH# 2016041078 Revisions to Project Location

To Whom It May Concern,

The Cayucos Sanitary District (CSD) has received a copy of Agency Review letter dated April 26, 2016 for the above referenced project. The CSD is the lead agency for the project and has noticed errors in the *Notice of Completion Form and Environmental Document Transmittal* & Document Details Report that we are requesting to be revised:

The Project Location is San Luis Obispo County and within 2 miles of SR 1. Waste treatment type is a Wastewater Treatment Plant.

The original transmittal form incorrectly indicated Santa Barbara County and Proximity to SR 246. An updated transmittal form is attached, highlighting the revisions.

The project description and other information contained in the document details report is correct and no further revisions are requested. After reviewing the NOP Distribution list, it appears most resource Agencies will be the same, with the exception of Fish & Wildlife Region 5.

Sincerely,

Rick Koon

District Manager, Cayucos Sanitary District

### Notice of Completion & Environmental Document Transmittal

Mail to: State Clearinghouse, P.O. Box 3044, Sacramento, CA 95812-3044 (916) 445-0613

Lead Agency: Cayucos Sanitary District		Contac	r Person: Rick	Koon	
Mailing Address: 200 Ash Avenue		Phone:			
City: Cayucos	Zip: <u>93430</u>		: San Luis C		
Project Location: County: San Luis Obispo	City/Neares	Community:	Cavucos		
Cross Streets: SR 1 / Toro Creek Road	- Orty/( tour ou		04,4000	Zip	Code: 93430
Longitude/Latitude (degrees, minutes and seconds):°	' "N/	0 /	" W Tota		
Assessor's Parcel No.: APN 073-092-034 and 073-093-011					
Within 2 Miles: State Hwy # SR 1 Water	wavs:	Pacific Ocean	Toro Creek	Willow Cre	ek Old Creek
Airports:					
, mpore.					
Document Type:					
CEQA: NOP Draft EIR Early Cons Supplement/Subsequent E. Neg Dec (Prior SCH No.) Mit Neg Dec Other: Initial Study		FONSI	acOffice of Plan		Occument
Local Action Type:			### (#U)	7916 -	
☐ General Plan Update ☐ Specific Plan ☐ General Plan Amendment ☐ Master Plan ☐ General Plan Element ☐ Planned Unit Developm ☐ Community Plan ☐ Site Plan	ent <b>Z</b> Use	one Permit	ECLEARI	☐ Red	evelopment stal Permit
Development Type:					
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Project Issues Discussed in Document:					
Aesthetic/Visual Fiscal	Recrea	ion/Parks		<b>₽</b> Vegeta	tion
Agricultural Land Flood Plain/Flooding	-	/Universities		Water	
Air Quality Forest Land/Fire Hazard		Systems			Supply/Groundwate
Archeological Historical Geologic Seismic		Capacity			id/Riparian
☑ Biological Resources ☐ Minerals ☐ Coastal Zone ☐ Noise	Soli Er	osion/Compac	tion/Grading	Land U	Inducement
Coastal Zone    Noise   Noise     Drainage/Absorption   Population/Housing Bala				Comment of the Commen	ative Effects
☐ Economic/Jobs ☐ Public Services/Facilitie		Circulation			Cultural Res.
Present Land Use/Zoning/General Plan Designation: Agriculture Project Description: (please use a separate page if ne	ecessary)				

Reviewing Agencies Checklist	
Lead Agencies may recommend State Clearinghouse distr If you have already sent your document to the agency plea	
S Air Resources Board	Office of Emergency Services
Boating & Waterways, Department of	Office of Historic Preservation
California Highway Patrol	Office of Public School Construction
S Caltrans District #5	Parks & Recreation, Department of
Caltrans Division of Aeronautics	Pesticide Regulation, Department of
Caltrans Planning	Public Utilities Commission
Central Valley Flood Protection Board	S Regional WQCB # 3
Coachella Valley Mtns. Conservancy	Resources Agency
S Coastal Commission	S.F. Bay Conservation & Development Comm.
Colorado River Board	San Gabriel & Lower L.A. Rivers & Mtns. Conservancy
Conservation, Department of	San Joaquin River Conservancy
Corrections, Department of	Santa Monica Mtns. Conservancy
Delta Protection Commission	State Lands Commission
Education, Department of	SWRCB: Clean Water Grants
Energy Commission	S SWRCB: Water Quality
S Fish & Game Region # 3	SWRCB: Water Rights
Food & Agriculture, Department of	Tahoe Regional Planning Agency
Forestry and Fire Protection, Department of	S Toxic Substances Control, Department of
General Services, Department of	Water Resources, Department of
Health Services, Department of	water resources, Department of
Housing & Community Development	Other
Integrated Waste Management Board	Other:
S Native American Heritage Commission	Other.
Native American Heritage Commission	
Local Public Review Period (to be filled in by lead age	ency)
Starting Date April 25, 2016	Ending Date May 23, 2016
Date ing Date 14-11-15	Disting District The Control of the
Lead Agency (Complete if applicable):	
Consulting Firm: Firma Consultants Inc.	Applicant: N/A
Address: 187 Tank Farm Road Suite 230	Address:
City/State/Zip: San San Luis Obispo CA 93401	City/State/Zip:
Contact: David Foote	Phone:
Phone: 805 781 9800	see about
	7-7-
Signature of Lead Agency Representative:	Date: 04/21/16
	revised cs/oz
Authority cited: Section 21083, Public Resources Code. R	Reference: Section-21161, Public Resources Code.

### CAYUCOS SUSTAINABLE WATER PROJECT PROJECT DESCRIPTION:

The Project consists of two phases. Phase 1 includes construction of a new Water Resource Recovery Facility, related conveyance pipelines, production of tertiary treated water for agricultural irrigation, and discharge of process water to the existing ocean outfall. This phase would also include participation and coordination in the decommissioning of the existing Morro Bay / Cayucos Wastewater Treatment Plant in Morro Bay. Phase 2 is the construction of a conveyance pipeline for recycled water to the CSA 10 Surface Water Treatment Facility.

A WRRF will be constructed on a portion of the project site on Toro Creek Road in Cayucos. The WRRF will be sized to serve only the service area of the CSD with an average annual daily flow (AADF) of 0.33 to 0.5 million gallons per day (MGD).

The pipelines will occur in trenches in public rights of way. Pipeline routes will cross Toro Creek, Old Creek and Willow Creek. The WRRF will create tertiary treated non-potable water for agricultural irrigation. The processed discharge water from the WRRF will be conveyed to the existing ocean outfall in Morro Bay located at the existing Morro Bay / Cayucos wastewater treatment plant.

The CSD will also participate in the decommissioning of the existing WWTP in Morro Bay at the time that both agencies have completed their respective water reclamation projects.

# **NOP Distribution List**

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Caltrans, District 10

Tom Dumas

Gayle Rosander

Caltrans, District 11

Jacob Armstrong

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Caltrans, District 12
Maureen El Harake

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State Water Resources Control

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Division of Financial Assistance

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Department of Pesticide

Regulation CEQA Coordinator

CEQA Tracking Center

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Contro	
Quality	<u></u>
al Water	RWQCE
Regiona	Board (

RWQCB 1	Cathleen Hudson	North Coast Region (1)	RWQCB 2	<b>Environmental Document</b>	Coordinator

San Francisco Bay Region (2)

RWQCB 3
Central Coast Region (3) os Angeles Region (4) **Teresa Rodgers** RWQCB 4

RWQCB 5S Central Valley Region (5) RWQCB 5F

Central Valley Region (5) Fresno Branch Office

RWQCB 5R Central Valley Region (5) Redding Branch Office

State Water Resources Control

W

Industrial/Energy Projects Mike Tollstrup

Transportation Projects

Cathi Slaminski

Air Resources Board Airport & Freight

Cal EPA

Nesamani Kalandiyur

RWQCB 6
Lahontan Region (6)

Lahontan Region (6) Victorville Branch Office RWQCB 6V

Colorado River Basin Region (7) RWQCB 8 RWQCB 7

State Water Resources Control

Cindy Forbes – Asst Deputy Division of Drinking Water

RWQCB 9
San Diego Region (9)

Student Intern, 401 Water Quality

State Water Resources Control

M

Div. Drinking Water #\_

Santa Ana Region (8)

Other

State Water Resouces Control

W

Division of Water Quality

Certification Unit

Dept. of Toxic Substances

Division of Water Rights

Phil Crader

Board

Conservancy

STATE OF CALIFORNIA
NATIVE AMERICAN HERITAGE COMMISSION

1550 Harbor Blvd., Suite 100 West Sacramento, CA 95691 Phone (916) 373-3710 Fax (916) 373-5471

Email: nahc@nahc.ca.gov Website: http://www.nahc.ca.gov Twitter: @CA\_NAHC

Edmund G. Brown Jr., Governor

May 2, 2016

Rick Koon Cayucos Sanitary District 200 Ash Avenue Cayucos, CA 93430

RE: SCH# 2016041078 Cayucos Sustainable Water Project, Draft Environmental Impact Report, City of Cayucos, San Luis

Obispo County, California

Dear Mr. Koon:

The Native American Heritage Commission has received the Notice of Preparation (NOP) for the project referenced above. The California Environmental Quality Act (CEQA) (Pub. Resources Code § 21000 et seq.), specifically Public Resources Code section 21084.1, states that a project that may cause a substantial adverse change in the significance of an historical resource is a project that may have a significant effect on the environment. (Pub. Resources Code § 21084.1; Cal. Code Regs., tit.14, § 15064.5 (b) (CEQA Guidelines Section 15064.5 (b)). If there is substantial evidence, in light of the whole record before a lead agency, that a project may have a significant effect on the environment, an environmental impact report (EIR) shall be prepared. (Pub. Resources Code § 21080 (d); Cal. Code Regs., tit. 14, § 15064 subd.(a)(1) (CEQA Guidelines § 15064 (a)(1)). In order to determine whether a project will cause a substantial adverse change in the significance of a historical resource, a lead agency will need to determine whether there are historical resources with the area of project effect (APE).

CEQA was amended significantly in 2014. Assembly Bill 52 (Gatto, Chapter 532, Statutes of 2014) (AB 52) amended CEQA to create a separate category of cultural resources, "tribal cultural resources" (Pub. Resources Code § 21074) and provides that a project with an effect that may cause a substantial adverse change in the significance of a tribal cultural resource is a project that may have a significant effect on the environment. (Pub. Resources Code § 21084.2). Public agencies shall, when feasible, avoid damaging effects to any tribal cultural resource. (Pub. Resources Code § 21084.3 (a)). AB 52 applies to any project for which a notice of preparation or a notice of negative declaration or mitigated negative declaration is filed on or after July 1, 2015. If your project involves the adoption of or amendant to a general plan or a specific plan, or the designation of the desi proposed designation of open space, on or after March 1, 2005, it may also be subject to Senate Bill 18 (Burton, Chapter 905, Statutes of 2004) (SB 18). Both SB 18 and AB 52 have tribal consultation requirements. If your project is also subject to the federal National Environmental Policy Act (42 U.S.C. § 4321 et seq.) (NEPA), the tribal consultation requirements of Section 106 of the National Historic Preservation Act of 1966 (154 U.S.C. 300101, 36 C.F.R. § 800 et seq.) may also apply.

The NAHC recommends consultation with California Native American tribes that are traditionally and culturally affiliated with the geographic area of your proposed project as early as possible in order to avoid inadvertent discoveries of Native American human remains and best protect tribal cultural resources. Below is a brief summary of <u>portions</u> of AB 52 and SB 18 as well as the NAHC's recommendations for conducting cultural resources assessments. **Consult your legal counsel about compliance** with AB 52 and SB 18 as well as compliance with any other applicable laws.

**AB 52** 

AB 52 has added to CEQA the additional requirements listed below, along with many other requirements:

- Fourteen Day Period to Provide Notice of Completion of an Application/Decision to Undertake a Project: Within fourteen (14) days of determining that an application for a project is complete or of a decision by a public agency to undertake a project, a lead agency shall provide formal notification to a designated contact of, or tribal representative of, traditionally and culturally affiliated California Native American tribes that have requested notice, to be accomplished by at least one written notice that includes:
  - a. A brief description of the project.

The lead agency contact information.

Notification that the California Native American tribe has 30 days to request consultation. (Pub. Resources Code § 21080.3.1 (d)).

- A "California Native American tribe" is defined as a Native American tribe located in California that is on the contact list maintained by the NAHC for the purposes of Chapter 905 of Statutes of 2004 (SB 18). (Pub. Resources Code
- Begin Consultation Within 30 Days of Receiving a Tribe's Request for Consultation and Before Releasing a Negative Declaration, Mitigated Negative Declaration, or Environmental Impact Report: A lead agency shall begin the consultation process within 30 days of receiving a request for consultation from a California Native American tribe that is traditionally and culturally affiliated with the geographic area of the proposed project. (Pub. Resources Code § 21080.3.1, subds. (d) and (e)) and prior to the release of a negative declaration, mitigated negative declaration or environmental impact report. (Pub. Resources Code § 21080.3.1(b)).

  a. For purposes of AB 52, "consultation shall have the same meaning as provided in Gov. Code § 65352.4 (SB 18).

(Pub. Resources Code § 21080.3.1 (b)).

Mandatory Topics of Consultation If Requested by a Tribe: The following topics of consultation, if a tribe requests to discuss them, are mandatory topics of consultation:

Alternatives to the project. a.

Recommended mitigation measures.

- c. Significant effects. (Pub. Resources Code § 21080.3.2 (a)).
- <u>Discretionary Topics of Consultation</u>: The following topics are discretionary topics of consultation:

  - Type of environmental review necessary. Significance of the tribal cultural resources. b.
  - Significance of the project's impacts on tribal cultural resources. C.
  - If necessary, project alternatives or appropriate measures for preservation or mitigation that the tribe may d. recommend to the lead agency. (Pub. Resources Code § 21080.3.2 (a)).
- Confidentiality of Information Submitted by a Tribe During the Environmental Review Process: With some exceptions, any information, including but not limited to, the location, description, and use of tribal cultural resources submitted by a California Native American tribe during the environmental review process shall not be included in the environmental document or otherwise disclosed by the lead agency or any other public agency to the public, consistent with Government Code sections 6254 (r) and 6254.10. Any information submitted by a California Native American tribe during the consultation or environmental review process shall be published in a confidential appendix to the environmental document unless the tribe that provided the information consents, in writing, to the disclosure of some or all of the information to the public. (Pub. Resources Code § 21082.3 (c)(1)).
- Discussion of Impacts to Tribal Cultural Resources in the Environmental Document: If a project may have a significant impact on a tribal cultural resource, the lead agency's environmental document shall discuss both of the following:
  - Whether the proposed project has a significant impact on an identified tribal cultural resource.
  - Whether feasible alternatives or mitigation measures, including those measures that may be agreed to pursuant to Public Resources Code section 21082.3, subdivision (a), avoid or substantially lessen the impact on the identified tribal cultural resource. (Pub. Resources Code § 21082.3 (b)).
- 7. Conclusion of Consultation: Consultation with a tribe shall be considered concluded when either of the following occurs:
  - The parties agree to measures to mitigate or avoid a significant effect, if a significant effect exists, on a tribal cultural resource; or
  - A party, acting in good faith and after reasonable effort, concludes that mutual agreement cannot be reached. (Pub. Resources Code § 21080.3.2 (b)). b.
- Recommending Mitigation Measures Agreed Upon in Consultation in the Environmental Document: Any mitigation measures agreed upon in the consultation conducted pursuant to Public Resources Code section 21080.3.2 shall be recommended for inclusion in the environmental document and in an adopted mitigation monitoring and reporting program, if determined to avoid or lessen the impact pursuant to Public Resources Code section 21082.3, subdivision (b), paragraph 2, and shall be fully enforceable. (Pub. Resources Code § 21082.3 (a)).
- Required Consideration of Feasible Mitigation: If mitigation measures recommended by the staff of the lead agency as a result of the consultation process are not included in the environmental document or if there are no agreed upon mitigation measures at the conclusion of consultation, or if consultation does not occur, and if substantial evidence demonstrates that a project will cause a significant effect to a tribal cultural resource, the lead agency shall consider feasible mitigation pursuant to Public Resources Code section 21084.3 (b). (Pub. Resources Code § 21082.3 (e)).
- 10. Examples of Mitigation Measures That, If Feasible, May Be Considered to Avoid or Minimize Significant Adverse Impacts to Tribal Cultural Resources:
  - Avoidance and preservation of the resources in place, including, but not limited to:
    - Planning and construction to avoid the resources and protect the cultural and natural context.
    - ii. Planning greenspace, parks, or other open space, to incorporate the resources with culturally appropriate protection and management criteria.
  - Treating the resource with culturally appropriate dignity, taking into account the tribal cultural values and meaning of the resource, including, but not limited to, the following:
    - Protecting the cultural character and integrity of the resource.
    - Protecting the traditional use of the resource.
    - Protecting the confidentiality of the resource.
  - Permanent conservation easements or other interests in real property, with culturally appropriate management criteria for the purposes of preserving or utilizing the resources or places. Protecting the resource. (Pub. Resource Code § 21084.3 (b)).

  - Please note that a federally recognized California Native American tribe or a nonfederally recognized California Native American tribe that is on the contact list maintained by the NAHC to protect a California prehistoric, archaeological, cultural, spiritual, or ceremonial place may acquire and hold conservation easements if the conservation easement is voluntarily conveyed. (Civ. Code § 815.3 (c)).
  - Please note that it is the policy of the state that Native American remains and associated grave artifacts shall be repatriated. (Pub. Resources Code § 5097.991).
- 11. Prerequisites for Certifying an Environmental Impact Report or Adopting a Mitigated Negative Declaration or Negative Declaration with a Significant Impact on an Identified Tribal Cultural Resource: An environmental impact report may not be certified, nor may a mitigated negative declaration or a negative declaration be adopted unless one of the following occurs:
  - The consultation process between the tribes and the lead agency has occurred as provided in Public Resources Code sections 21080.3.1 and 21080.3.2 and concluded pursuant to Public Resources Code section 21080.3.2.
  - The tribe that requested consultation failed to provide comments to the lead agency or otherwise failed to engage in the consultation process.
  - The lead agency provided notice of the project to the tribe in compliance with Public Resources Code section 21080.3.1 (d) and the tribe failed to request consultation within 30 days. (Pub. Resources Code § 21082.3 (d)). This process should be documented in the Cultural Resources section of your environmental document.

The NAHC's PowerPoint presentation titled, "Tribal Consultation Under AB 52: Requirements and Best Practices" may be found online at: http://nahc.ca.gov/wp-content/uploads/2015/10/AB52TribalConsultation\_CalEPAPDF.pdf

SB 18 applies to local governments and requires local governments to contact, provide notice to, refer plans to, and consult with tribes prior to the adoption or amendment of a general plan or a specific plan, or the designation of open space. (Gov. Code § 65352.3). Local governments should consult the Governor's Office of Planning and Research's "Tribal Consultation Guidelines," which can be found online at: https://www.opr.ca.gov/docs/09\_14\_05\_Updated\_Guidelines\_922.pdf

Some of SB 18's provisions include:

Tribal Consultation: If a local government considers a proposal to adopt or amend a general plan or a specific plan, or to designate open space it is required to contact the appropriate tribes identified by the NAHC by requesting a "Tribal Consultation List." If a tribe, once contacted, requests consultation the local government must consult with the tribe on the plan proposal. A tribe has 90 days from the date of receipt of notification to request consultation unless a shorter timeframe has been agreed to by the tribe. (Gov. Code § 65352.3 (a)(2)).

No Statutory Time Limit on SB 18 Tribal Consultation. There is no statutory time limit on SB 18 tribal consultation.

Confidentiality: Consistent with the guidelines developed and adopted by the Office of Planning and Research pursuant to Gov. Code section 65040.2, the city or county shall protect the confidentiality of the information concerning the specific identity, location, character, and use of places, features and objects described in Public Resources Code sections 5097.9 and 5097.993 that are within the city's or county's jurisdiction. (Gov. Code § 65352.3 (b)).

Conclusion of SB 18 Tribal Consultation: Consultation should be concluded at the point in which:

The parties to the consultation come to a mutual agreement concerning the appropriate measures for preservation or mitigation; or

Either the local government or the tribe, acting in good faith and after reasonable effort, concludes that mutual agreement cannot be reached concerning the appropriate measures of preservation or mitigation. (Tribal Consultation Guidelines, Governor's Office of Planning and Research (2005) at p. 18).

Agencies should be aware that neither AB 52 nor SB 18 precludes agencies from initiating tribal consultation with tribes that are traditionally and culturally affiliated with their jurisdictions before the timeframes provided in AB 52 and SB 18. For that reason, we urge you to continue to request Native American Tribal Contact Lists and "Sacred Lands File" searches from the NAHC. The request forms can be found online at: http://nahc.ca.gov/resources/forms/

### NAHC Recommendations for Cultural Resources Assessments

To adequately assess the existence and significance of tribal cultural resources and plan for avoidance, preservation in place, or barring both, mitigation of project-related impacts to tribal cultural resources, the NAHC recommends the following actions:

Contact the appropriate regional California Historical Research Information System (CHRIS) Center (http://ohp.parks.ca.gov/?page\_id=1068) for an archaeological records search. The records search will determine:

If part or all of the APE has been previously surveyed for cultural resources.

b. If any known cultural resources have been already been recorded on or adjacent to the APE.

If the probability is low, moderate, or high that cultural resources are located in the APE. C.

- If a survey is required to determine whether previously unrecorded cultural resources are present.
- If an archaeological inventory survey is required, the final stage is the preparation of a professional report detailing the findings and recommendations of the records search and field survey.
  - The final report containing site forms, site significance, and mitigation measures should be submitted immediately to the planning department. All information regarding site locations, Native American human remains, and associated funerary objects should be in a separate confidential addendum and not be made available for public disclosure.
  - The final written report should be submitted within 3 months after work has been completed to the appropriate regional CHRIS center.
- 3. Contact the NAHC for:
  - A Sacred Lands File search. Remember that tribes do not always record their sacred sites in the Sacred Lands File, nor are they required to do so. A Sacred Lands File search is not a substitute for consultation with tribes that are traditionally and culturally affiliated with the geographic area of the project's APE.
  - A Native American Tribal Consultation List of appropriate tribes for consultation concerning the project site and to assist in planning for avoidance, preservation in place, or, failing both, mitigation measures.
- Remember that the lack of surface evidence of archaeological resources (including tribal cultural resources) does not preclude their subsurface existence.
  - Lead agencies should include in their mitigation and monitoring reporting program plan provisions for the identification and evaluation of inadvertently discovered archaeological resources per Cal. Code Regs., tit. 14, section 15064.5(f) (CEQA Guidelines section 15064.5(f)). In areas of identified archaeological sensitivity, a certified archaeologist and a culturally affiliated Native American with knowledge of cultural resources should monitor all ground-disturbing activities.
  - Lead agencies should include in their mitigation and monitoring reporting program plans provisions for the disposition of recovered cultural items that are not burial associated in consultation with culturally affiliated Native
  - Lead agencies should include in their mitigation and monitoring reporting program plans provisions for the treatment and disposition of inadvertently discovered Native American human remains. Health and Safety Code section 7050.5, Public Resources Code section 5097.98, and Cal. Code Regs., tit. 14, section 15064.5,

subdivisions (d) and (e) (CEQA Guidelines section 15064.5, subds. (d) and (e)) address the processes to be followed in the event of an inadvertent discovery of any Native American human remains and associated grave goods in a location other than a dedicated cemetery.

Please contact me if you need any additional information at gayle.totton@nahc.ca.gov.

Sincerely,

Gayle Totton, M.A., PhD. Aesociate Governmental Program Analyst

cc: State Clearinghouse

### RECEIVED MAY 1 1 2016



# TORRES MARTINEZ DESERT CAHUILLA INDIANS P.O. Box 1160 Thermal, CA 92274 (760) 397-0300 – FAX (760) 397-8146

May 9, 2016

### To whom it may concern:

Re: California Environmental Quality Act Public Resources Code section 21080.3, subd. (b); California Assembly Bill 52, Request for Formal Notification of Proposed Projects within your jurisdiction that is traditionally and culturally affiliated with the Torres Martinez Desert Cahuilla Indians.

The purpose of this letter is to request formal notification of proposed projects within your jurisdiction that is traditionally and culturally affiliated with the Torres Martinez Desert Cahuilla Indians, in accordance with Public Resources Code Section 21080.3.1, subd. (b). As of the date of this letter, you have been formally notified that the boundaries of your local government's jurisdiction fall within the area that is traditionally and culturally affiliated with the Torres Martinez Desert Cahuilla Indians. Additionally, Torres Martinez Desert Cahuilla Indians has created specific requests and formal procedures in accordance with California Assembly Bill 52:

- Formal notice of and information on proposed projects for which your agency will serve as a lead agency under the California Environmental Quality Act (CEQA), Public Resources Code section 21000 et seq. Pursuant to Public Resources Code section 21080.3.1, subd. (b) shall be sent to Torres Martinez Desert Cahuilla Indians
- Within 14 days of determining that an application for a project is complete or of a decision by your agency to undertake a project, a lead agency must provide formal notification to Cultural Monitoring Coordinator, Michael Mirelez, who is the designated contact and tribal representative for the traditionally and culturally affiliated Torres Martinez Desert Cahuilla Indians regarding notifications pertaining to California Assembly Bill 52

Contact Information:
Michael Mirelez
Cultural Resource Coordinator
Torres Martinez Desert Cahuilla Indians

Address: P.O. Box 1160 Thermal, CA 92274

Office: 760-397-0300 ext:1213

Cell: 760-399-0022

Email: mmirelez@tmdci.org

This notice shall consist of a formal written letter that includes:

- A description of the proposed project
- The project's location
- The lead agency contact information
- A clear and definitive statement that the tribe has 30 day to request consultation
- An Aerial Photo of the project Area
- Copies of the CHRIS Archaeological Record Search
- Once the Torres Martinez Desert Cahuilla Indians has received the notification, we will respond within 30 days as to whether we wish to initiate consultation as prescribed by Public Resources Code section 21080.3.1, subd. (d), the Torres Martinez Desert Cahuilla Indians, may request consultation, as defined by Public Resources Code section 21080.3.1, subd. (b), pursuant to Public Resources Code section 21080.3.2 to mitigate any project impacts a specific project may cause to tribal cultural resources.
- The lead agency shall begin the consultation process within 30 days of receiving the Torres Martinez Desert Cahuilla Indians request for consultation and prior to the release of a negative declaration, mitigated negative declaration, or environmental impact statement.
- Once a review of inadvertent discoveries has been completed by the Cultural Resource Director, all information will then be transferred to the Torres Martinez Desert Cahuilla Indians Tribal Council for a final decision and directive.

Sincerely,

Michael Mirelez Cultural Resource Coordinator Torres Martinez Desert Cahuilla Indians



### **COUNTY OF SAN LUIS OBISPO**

### **Department of Agriculture/Weights and Measures**

2156 SIERRA WAY, SUITE A • SAN LUIS OBISPO, CALIFORNIA 93401 - 4556 MARTIN SETTEVENDEMIE

(805) 781-5910

AGRICULTURAL COMMISSIONER/SEALER www.slocounty.ca.gov/agcomm

FAX: (805) 781-1035 AgCommSLO@co.slo.ca.us

DATE: May 25, 2016

TO: David Foote, Project Manager

FROM: Lynda L. Auchinachie, Agriculture Department

SUBJECT: Cayucos Sustainable Water Project DEIR Notice of Preparation (1881)

Name of Contact Person: Lynda Auchinachie

2156 Sierra Way, Suite A San Luis Obispo, CA 93401

781.5914 lauchinachie@co.slo.ca.us

Approval Authority: San Luis County Agriculture Element and the Conservation and Open

Space Element

Environmental Information: The Initial Study identifies potential impacts associated with conversion

of agricultural soils. In addition to soil conversion impacts, land use incompatibilities associated with introducing nonagricultural development in an agricultural area should be addressed.

Permit Conditions: The proposed project should avoid/minimize impacts to agricultural

resources. If avoidance is not possible, conservation/open space easements

should be considered for mitigation at an appropriate ratio. Land use

incompatibilities should be minimized through site design and incorporation

of agricultural buffers consistent with Agriculture Element policy.

Relevant Information: Assess project for consistency with Agriculture Element policies

including land conversion, location of improvements, agricultural buffering, and agricultural land division. Conservation and Open Space Important Agricultural Soils policies should be considered as well.

### CALIFORNIA COASTAL COMMISSION

CENTRAL COAST DISTRICT OFFICE 725 FRONT STREET, SUITE 300 SANTA CRUZ, CA 95060 PHONE: (831) 427-4863 FAX: (831) 427-4877 WEB: WWW.COASTAL.CA.GOV



June 10, 2016

Rick Koon Cayucos Sanitary District 200 Ash Avenue Cayucos, CA 93430

David Foote (Via Email)
David @Firmaconsultants.com

Re: Notice of Preparation: Water Resource Recovery Facility (Cayucos Sustainable Water Project) SCH #2016041078

Dear Mr. Koon and Mr. Foote:

Thank you for the opportunity to comment on the Notice of Preparation (NOP) of a Draft Environmental Impact Report (DEIR) for the Cayucos Sanitary District's (CSD's) Water Resource Recovery Facility (WRRF) through the Cayucos Sustainable Water Project, located in the Toro Creek Valley on Toro Creek Road, approximately 0.75 miles inland from Highway 1 in Cayucos.

As the NOP describes (via the Initial Study's (IS's) project description) the project includes two phases. Phase 1 includes construction of a new WRRF, including production of tertiary treated water for agricultural irrigation, discharge of processed water to the existing ocean outfall, and all related conveyance pipelines. This phase would also include participation and coordination in the decommissioning of the existing Morro Bay/Cayucos Wastewater Treatment Plant in Morro Bay. Phase 2 includes the construction of a conveyance pipeline for recycled water to the County Service Area 10 ("CSA 10") Surface Water Treatment Facility.

Based on the IS, Coastal Commission staff would like to provide the following comments on the scope and content of the environmental information in preparation for the DEIR:

• Permitting Jurisdiction: Based on the IS, the WRRF will be located both within and outside of the Coastal Zone. For the portion of the project located outside the Coastal Zone, the CSD will be responsible for securing a land use permit from San Luis Obispo County (County). For the portion of the project within the Coastal Zone, the CSD will be required to secure a Coastal Development Permit (CDP) from the County. This County CDP will be appealable to the Coastal Commission because this project constitutes a major public works facility (Coastal Act Section 30603(a)(5)). In addition, the CSD may have to apply for a separate CDP to the Coastal Commission if there are components of the project that are located in the Coastal Commission's original/retained permit

Rick Koon/David Foote WRRF NOP June 10, 2016 Page 2

jurisdiction (e.g., if the project includes modifications to the outfall). If the project includes components within both the County's CDP jurisdiction and the Coastal Commission's original/retained jurisdiction, please note that the CSD may request that the Commission process a consolidated CDP for the entire project (Coastal Act Section 30601.3). Finally, for portions of the project located outside the Coastal Zone, the CSD may have to submit a consistency certification under the Coastal Zone Management Act. This requirement would be triggered if any federal funding or federal permits would be needed.

Because of the multitude of differing permitting jurisdictions, the DEIR should include a clear and detailed account of where all components of the projects (including both Phase 1 and Phase 2 components) are located in relation to jurisdictional boundaries, and as a result, what permits and what authorizations are needed for each component of the project.

• Impacts to Creeks and Other ESHA. The IS identifies that pipeline routes will cross Toro Creek, Old Creek and Willow Creek. The LCP requires protection of wetlands and riparian areas and allows only very limited uses within wetlands. The EIR should analyze the proposed project's consistency with the LCP's wetland and riparian protection policies.

The LCP requires Environmentally Sensitive Habitat Area (ESHA) to be protected against any significant disruption of habitat values, and also states that only uses dependent on such resources (such as trails or restoration) shall be allowed within ESHA. In addition, development in areas adjacent to ESHA must be sited and designed to prevent impacts that would significantly degrade ESHA, and must be compatible with the continuance of such habitat. The EIR, therefore, should include an analysis to determine if other ESHA (e.g., terrestrial habitat), in addition to the known creek areas, is located in the project site areas. The analysis should include a review of the applicable LCP ESHA policies as regulatory standards, e.g., necessary and specific development buffers and other resource protection requirements, to ensure that allowed development adequately protects and enhances wetlands, riparian habitat, and other ESHA that may be located in the vicinity of the project sites.

Lastly, the IS identifies that the pipe crossings ("hanging pipe") will be visible and be placed in locations with existing utility crossings, and "therefore no significant impact is anticipated because utility crossings are part of the existing visual setting." Please be aware that additional visual impacts can occur where existing visual impacts exist. The LCP's Visual Resource policies protect views of development located from public roads, including Highway 1. Any visual impacts to public views from the pipelines, including at the creek crossings, should be identified and evaluated and properly mitigated as part of the project.

- Outfall: The IS identifies that processed discharge water from the WRRF will be conveyed to the existing ocean outfall in Morro Bay located at the existing Morro Bay/Cayucos wastewater treatment plant. Further, the IS states that the CSD owns a 35% interest in the outfall capacity that will accommodate this discharge and that this existing outfall is "fully permitted." Please ensure the EIR provides a detailed discussion of the permit status of this outfall and provides evidence of these permits, as well as the outfall's permitted capacity limits. In addition, the EIR should discuss the future use of this outfall as it relates to the relocation of the existing Morro Bay/Cayucos wastewater treatment plant.
- **Public Access Impacts.** Please ensure the EIR fully evaluates the project's public access impacts, which can be permanent or temporary (e.g., during construction of the pipelines). Once identified, mitigation for public access impacts should be identified.

Again, thank you for the opportunity to comment on the NOP and we look forward to working with you on this project. Please feel free to contact me at the above address and phone number, or via email: <a href="mailto:daniel.robinson@coastal.ca.gov">daniel.robinson@coastal.ca.gov</a>.

For any questions or assistance needed regarding the federal consistency procedures, feel free to contact Larry Simon, Federal Consistency Coordinator, at (415) 904-5288 (or via email at <a href="mailto:larry.simon@coastal.ca.gov">larry.simon@coastal.ca.gov</a>).

Sincerely,

Daniel Robinson, Planner

California Coastal Commission

Central Coast District

C: State Clearinghouse



### DEPARTMENT OF PLANNING AND BUILDING

Promoting the wise use of land - Helping to build great communities

May 24, 2016

Firma Consultants Attn: David Foote 187 Tank Farm Road San Luis Obispo, CA 93401

Subject:

Department of Planning and Building Comments on the Cayucos Sustainable Water

Project Notice of Preparation of a Draft Environmental Impact Report

Dear Mr. Foote,

Thank you for this opportunity to comment on the Notice of Preparation (NOP) for the Cayucos Sustainable Water Project Environmental Impact Report (EIR). The County of San Luis Obispo Department of Planning and Building understand that the project includes two phases:

<u>Phase 1</u> includes construction of a new Water Resource Recovery Facility (WRRF), a two-acre solar array, related conveyance pipelines, production of tertiary treated water for agricultural irrigation, and discharge of process water to the existing ocean outfall. This phase would also include participation and coordination in the decommissioning of the existing Morro Bay / Cayucos Wastewater Treatment Plant in Morro Bay.

<u>Phase 2</u> is the construction of a conveyance pipeline for recycled water to the CSA 10 Surface Water Treatment Facility.

The Department of Planning and Building has reviewed the NOP and offer the following comments:

- 1. The proposed WRRF is classified in Title 22 of the County Code as a Public Utility Facility, which is allowable in the Agriculture land use category subject to conditional use permit approval. A conditional use permit is a discretionary permit which may be approved or denied by the Planning Commission based on findings of neighborhood compatibility, health and safety, and compliance with the County land use ordinance and general plan. The following sections of Title 22 are particularly relevant:
  - Section 22.30.370: Public Utility Facilities describes permit and application content requirements for new public utility facilities and includes standards for an environmental quality assurance program, clearing and revegetation, and fencing and screening.
  - Section 22.10.120: Noise Standards establishes standards for acceptable exterior and interior noise levels and describes how noise shall be measured.
  - Section 22.16.020: Landscaping requires a landscape plan for all public projects requiring a land use permit.
  - Section 22.14.070: Geologic Study Area (GSA) the APNs for the project site and the alternative site fall within the GSA combining designation and are subject to this

- section, which requires applications for new development to include a geologic hazards investigation.
- Section 22.14.060: Flood Hazard Area (FH) the proposed Toro Creek Road site appears to fall within the FH combining designation and is subject to the standards described in this section.
- 2. Components of the project located within the Coastal Zone, such as the proposed pipelines and conveyances, will be subject to coastal development permit approval and compliance with the County's Local Coastal Plan (LCP), including Title 23 of the County Code and the Coastal Plan Policies document. The EIR should include a full policy consistency analysis. Based on the project description, the following LCP provisions are particularly relevant:
  - Section 23.08.288: Public Utility Facilities
  - Section 23.08.286: Pipelines and Transmission Lines
  - Section 23.04.200: Protection of Archaeological Resources
  - Section 23.07.170: Environmentally Sensitive Habitats
  - Section 23.04.210: Visual Resources
  - Public Works Policy 2: New or Expanded Public Works Facilities
  - Public Works Policy 9: Review of Treatments Works
  - Agriculture Policy 1: Maintaining Agricultural Lands
  - Agriculture Policy 3: Non-agricultural Uses
  - Agriculture Policy 4: Siting of Structures
  - Archaeological Resources Policy 1: Protection of Archaeological Resources
  - Archaeological Resources Policy 4: Preliminary Site Survey for Development within Archaeologically Sensitive Areas
  - Archaeology Policy 5: Mitigation Techniques for Preliminary Site Survey before Construction
  - Visual and Scenic Resources Policy 1: Protection of Visual and Scenic Resources
  - Visual and Scenic Resources Policy 2: Site Selection for New Development
  - Visual and Scenic Resources Policy 4: New Development in Rural Areas
  - Environmentally Sensitive Habitat Areas Policy 1: Land Uses within or Adjacent to Environmentally Sensitive Habitats
  - Environmentally Sensitive Habitat Areas Policy 2: Permit Requirement
- Any component of the project within the City of Morro Bay or Coastal Commission's retained jurisdiction (Coastal Original Jurisdiction) will require separate coastal development permit approval from the City of Morro Bay or Coastal Commission, in addition to the County's permit requirements.
- 4. By extending water and wastewater infrastructures into undeveloped areas of Cayucos, the project could remove development obstacles and increase interest in developing antiquated hillside lots. The EIR should evaluate the potential growth-inducing effects that may result from installing supplemental water and wastewater infrastructure in Cayucos.
- 5. The proposed project located in an area with known archaeological resources. For the portions of the project in the Coastal Zone, the EIR's Cultural Resources section should evaluate impacts and develop mitigation measures consistent with the County's LCP policies for archaeological resources.
- 6. The Aesthetics section of the EIR should evaluate the project's visibility from Highway 1, a nationally designated scenic byway. The analysis should consider the project's consistency with the Visual Resources policies in the Conservation and Open Space Element (COSE)

of the County General Plan. Any aboveground components of the project in the Coastal Zone, such as pump houses, should be evaluated for compliance with the Visual and Scenic Resources LCP policies and Section 23.04.210.

- 7. The Agriculture and/or Land Use section of the EIR should evaluate the project's compliance with the applicable policies of the Agriculture Element of the County General Plan. This section should consider previous comments from the Agricultural Commissioner's office.
- 8. The proposed WRRF site and the alternative site are both located within the Adelaida subarea of the North County planning area. The Land Use section of the EIR should consider relevant land use and circulation policies in the North County Area Plan (Adelaida sub-area) and Section 22.94.030 Adelaida Sub-area Standards. The proposed conveyance pipelines and infrastructure in the Coastal Zone are located within the Estero Planning Area and should be evaluated for consistency with the policies and standards of the Estero Area Plan.
- 9. It is anticipated that the District will need to process a public lot application to separate the site the larger parent parcel. Government Code Section 66428 provides that this process may be defined in local ordinance. Section 21.02.010(a)(9) of the Real Property Division ordinance states that land conveyed to or from a public agency does not need a (final) parcel map unless the Planning Director determines that public policy necessitates a map. The EIR should discuss the review process for a public lot application and the requirements for both the public lot and the remaining (parent) parcel. The remaining parcels are generally required to be within the range of parcel sizes allowed in the land use category.

We look forward to review of the Draft EIR when it is available. During the preparation of the Draft, if you need clarification or additional information regarding any of the information provided above, please do not hesitate to contact me at <a href="mailto:asingewald@co.slo.ca.us">asingewald@co.slo.ca.us</a> or at (805) 781-5198.

Sincerely,

Airlin M. Singewald Senior Planner



## SAN LUIS OBISPO COUNTY DEPARTMENT OF PUBLIC WORKS

Wade Horton, Director

County Government Center, Room 206 • San Luis Obispo CA 93408 • (805) 781-5252

Fax (805) 781-1229

email address: pwd@co.slo.ca.us



May 24, 2016

Firma Consultants Attn: David Foote 187 Tank Farm Road San Luis Obispo, CA 93401

Subject:

Public Works Comments on the Cayucos Sustainable Water Project Notice of

Preparation of a Draft Environmental Impact Report

Dear Mr. Foote,

Thank you for the opportunity to comment on the Notice of Preparation (NOP) for the Cayucos Sanitary District Sustainable Water Project (project) Environmental Impact Report (EIR). The County of San Luis Obispo Department of Public Works understands that the project includes two phases:

<u>Phase 1</u> includes construction of a new Water Resource Recovery Facility (WRRF), a two-acre solar array, related conveyance pipelines, production of tertiary treated water for agricultural irrigation, and discharge of process water to the existing ocean outfall. This phase would also include participation and coordination in the decommissioning of the existing Morro Bay / Cayucos Wastewater Treatment Plant in Morro Bay.

<u>Phase 2</u> is the construction of a conveyance pipeline for recycled water to the CSA 10 Surface Water Treatment Facility.

Our Utilities, Development Services, and Environmental Divisions have reviewed the NOP and offer the following comments:

- County Public Works is responsible for reviewing public improvements including streets and utilities, as well as drainage and flood hazard, under the provisions of the Real Property Division Ordinance and the Land Use Ordinance, and Encroachment within the public right-of-way under County Municipal Codes (Title 13) and the Streets and Highway Code.
- For our use, the EIR must address project anticipated impacts to encroachment of facilities in the County right-of-way, traffic, circulation, drainage, post-construction stormwater, utility services, and flood hazard. Based on our review of the NOP, the following items may need additional discussion:
  - a. The Old Creek Road has a Pavement Condition Index (PCI) of 66 and is a Tier 1 road; Toro Creek Road has a PCI of 72 and is a Tier 1 road. See link 6.f below. Discuss construction vehicle impacts to County roads and proposed mitigations during and upon completion of construction.
  - b. The proposed alignment affects numerous County roads and bridges. Discuss

- encroachment impacts to roads and bridge and propose mitigations. Discuss construction related delay to the public and mitigations (traffic control, hours of operation, etc.).
- c. Project appears to be in an MS-4 area. The document must address post construction stormwater requirements. See link 5.h below, refer to Chapter 3.
- 3. A list of "Standard Conditions" is available from our office and available upon request. Minimum conditions would address the following improvements: access (roads and circulation), drainage (including flooding), post-construction stormwater, utilities, and the maintenance responsibilities associated with those improvements.
- 4. Reasonably foreseeable Department projects, programs or plans in the area of this proposed development may include:
  - a. Ongoing scheduled infrastructure maintenance operations of roads, bridges, and drainage facilities within the public right of way.
  - b. We are also aware of the proposed Morro Bay to Cayucos Connector Project, which is located along Highway 1 between Morro Bay and Cayucos. Elizabeth Kavanaugh of the County Parks and Recreation Department can provide more information on that project; <a href="mailto:ekavanaugh@co.slo.ca.us">ekavanaugh@co.slo.ca.us</a> or (805) 781-4089.
- 5. The following information may be relevant for consideration in the EIR analysis:
  - a. Public Improvement Standards, (<a href="http://www.slocounty.ca.gov/PW/DevServ/PublicImprovementStandards.htm">http://www.slocounty.ca.gov/PW/DevServ/PublicImprovementStandards.htm</a>)
  - b. County Traffic Impact Study Policy, contact Department
  - c. Traffic Circulation Studies, (<a href="http://www.slocounty.ca.gov/PW/Traffic/Traffic Studies.htm">http://www.slocounty.ca.gov/PW/Traffic/Traffic Studies.htm</a>)
  - d. Bikeways Plan (http://www.slocounty.ca.gov/PW/Bicycles/Bike Plan.htm)
  - e. Pavement Management Report, (<a href="http://www.slocounty.ca.gov/PW/Traffic/Road">http://www.slocounty.ca.gov/PW/Traffic/Road</a> Pavement Condition Report.htm
  - f. Pavement Management Report, <a href="http://www.slocounty.ca.gov/PW/Traffic/Road Pavement Condition Report.htm">http://www.slocounty.ca.gov/PW/Traffic/Road Pavement Condition Report.htm</a>
  - g. Bridge Maintenance Program (<a href="http://www.slocounty.ca.gov/Assets/PW/Traffic/Bridge+Maintenance+Program+Report.pdf">http://www.slocounty.ca.gov/Assets/PW/Traffic/Bridge+Maintenance+Program+Report.pdf</a>)
  - h. Post construction stormwater requirements, (<a href="http://www.slocounty.ca.gov/planning/drainage/stormwater2014.htm">http://www.slocounty.ca.gov/planning/drainage/stormwater2014.htm</a>)
  - i. National Pollutant Discharge Elimination System Phase II, Stormwater Management Program, County Code Section 8.68, (<a href="http://www.slocounty.ca.gov/PW/Flood\_Control-Stormwater/Stormwater.htm">http://www.slocounty.ca.gov/PW/Flood\_Control-Stormwater/Stormwater.htm</a>)
  - j. County Code Title 21, Real Property Division Ordinance (design, improvements, map processing),
     (http://www.slocounty.ca.gov/planning/General Plan Ordinances and Elements/Land Use Ordinances.htm)

- k. County Codes Title 23.05 Grading & Drainage; and Title 22.14.060 Flood Hazard
   (http://www.slocounty.ca.gov/planning/General Plan Ordinances and Elements/Land Use Ordinances.htm)
- Flood Insurance Rate Maps
   (<a href="https://msc.fema.gov/portal/search?AddressQuery=san%20luis%20obispo%20county">https://msc.fema.gov/portal/search?AddressQuery=san%20luis%20obispo%20county</a>)
- m. County Code (Title 22) Sections 22.52-Grading & Drainage, and 22.14.060-Flood Hazard Area
- 6. The NOP suggests that Phase 2 of the project would include conveying tertiary treated water to the CSA 10 water treatment plant. This facility is not currently able to treat such water and is not permitted by the State to do so. The EIR should describe the process by which the conveyed water could be accommodated, and if there are secondary impacts associated with this process.
- 7. Because the CSA 10 water treatment plant cannot currently treat the proposed water, alternative projects may need to be considered. Alternatives could include injecting the treated water into the groundwater basin via injection wells, or discharging the treated water into a constructed wetland upstream of Whale Rock Reservoir. If these alternatives are considered, the EIR should evaluate them to the extent required by CEQA.
- 8. We also suggest that the EIR consider alternative treatment options such as ultraviolet (UV) treatment. UV disinfection minimizes the use of chlorine, which may aid in subsequent discharge and re-use of the water.
- We are in possession of a number of technical reports that describe sensitive resources in the vicinity of the project and would be happy to provide those to qualified consultants upon request.

We look forward to review of the Draft EIR when it is available. During preparation of the Draft, if you need clarification or additional information regarding any of the information provided above, please do not hesitate to contact me at <a href="mailto:kballantyne@co.slo.ca.us">kballantyne@co.slo.ca.us</a> or at (805) 788-2765.

Sincerely.

KATE BALLANTYNE

**Environmental Division Manager** 

File: Environmental Impact Reports- General 450.20.03

L:\Environmental\2016\May\Cayucos SD NOP Comments combined.docxKB.mj

Subject: RE: Notice Of Preparation of a Draft Environmental Impact Report

Date: Monday, May 2, 2016 7:25 AM

From: Fred Collins <fcollins@northernchumash.org>
To: Lindsay Corica lindsay@firmaconsultants.com

Cc: bgibson@co.slo.ca.us, Brian Pedrotti bpedrotti@co.slo.ca.us

### Dear Lindsay,

The Cultural Recourse in this area are extremely high and the Chumash Nation will not allow a sewer plant on our Sacred Sites, we will fight this one with every breath we take, no one came to us for one on one consultation, this is not good, we could have told you that we will not allow a sewer plant on a Sacred Site.

Fred Collins NCTC

**From:** Lindsay Corica [mailto:lindsay@firmaconsultants.com]

**Sent:** Friday, April 22, 2016 2:18 PM

To: fcollins@northernchumash.org; salinantribe@aol.com; blukat41@yahoo.com; cbcn.nahc.sb@gmail.com

Cc: David Foote

Subject: Notice Of Preparation of a Draft Environmental Impact Report

Good Afternoon,

Pursuant to Section 15082 of the CEQA Guidelines, please follow the link below to download the Cayucos Sustainable Water Project NOP and Initial Study.

https://spaces.hightail.com/receive/0M77Y

Should you have further questions or comments, please contact Firma Consultants, Inc.

### Thank you, Lindsay Corica

### firma

Landscape Architects | Planning | Environmental Studies 187 Tank Farm Rd., Ste 230 | San Luis Obispo, CA 93401 office: 805.781.9800 | http://www.firmaconsultants.com