

**CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD  
CENTRAL COAST REGION**

895 Aerovista Place, Suite 101, San Luis Obispo, California 93401  
(805) 549-3147 Fax (805) 543-0397  
<http://www.waterboards.ca.gov/centralcoast/>

**DRAFT ORDER NO. R3-2020-0005  
NPDES NO. CA0047856**

**WASTE DISCHARGE REQUIREMENTS  
FOR THE CALIFORNIA DEPARTMENT OF CORRECTIONS AND REHABILITATION  
CALIFORNIA MEN'S COLONY WASTEWATER TREATMENT PLANT**

The following Discharger is subject to waste discharge requirements (WDRs) as set forth in this Order:

**Table 1. Discharger Information**

<b>Discharger</b>	California Department of Corrections and Rehabilitation
<b>Indirect Dischargers</b>	California Army National Guard, Camp San Luis Obispo Cuesta College San Luis Obispo County Education Center San Luis Obispo County El Chorro Regional Park and Dairy Creek Golf Course San Luis Obispo County Operational Facility
<b>Name of Facility</b>	California Men's Colony Wastewater Treatment Plant
<b>Facility Address</b>	Hwy 1, North of San Luis Obispo, behind Cuesta College San Luis Obispo, CA 93401 San Luis Obispo County

**Table 2. Discharge Location**

<b>Discharge Point</b>	<b>Effluent Description</b>	<b>Discharge Point Latitude</b>	<b>Discharge Point Longitude</b>	<b>Receiving Water</b>
001	Tertiary Treated Domestic Wastewater	35.325° N	120.7525° W	Chorro Creek

**Table 3. Administrative Information**

This Order was adopted on:	<b>May 28, 2020</b>
This Order shall become effective on:	<b>August 1, 2020</b>
This Order shall expire on:	<b>July 31, 2025</b>
The Discharger shall file a Report of Waste Discharge as an application for reissuance of WDRs in accordance with title 23, California Code of Regulations, and an application for reissuance of a National Pollutant Discharge Elimination System (NPDES) permit no later than:	<b>February 1, 2025</b>
The U.S. Environmental Protection Agency (U.S. EPA) and the Central Coast Water Board have classified this discharge as follows:	<b>Major</b>

I, Matthew T. Keeling, Executive Officer, do hereby certify that this order with all attachments is a full, true, and correct copy of an order adopted by the California Regional Water Quality Control Board, Central Coast Region on the date indicated above.

DRAFT ONLY  
\_\_\_\_\_  
Matthew T. Keeling, Executive Officer

**CONTENTS**

I. Facility Information ..... 3

II. Findings ..... 3

III. Discharge Prohibitions ..... 4

IV. Effluent Limitations and Discharge Specifications ..... 5

    A. Effluent Limitations – Discharge Point No. 001 ..... 5

    B. Land Discharge Specifications – Not Applicable ..... 6

    C. Recycling Specifications ..... 6

V. Receiving Water Limitations ..... 8

    A. Surface Water Limitations ..... 8

    B. Groundwater Limitations ..... 11

VI. Provisions ..... 12

    A. Standard Provisions ..... 12

    B. Monitoring and Reporting Program (MRP) Requirements ..... 12

    C. Special Provisions ..... 12

        1. Reopener Provisions ..... 12

        2. Special Studies, Technical Reports and Additional Monitoring Requirements ..... 12

        3. Best Management Practices and Pollution Prevention ..... 14

            a. Pollutant Minimization Plan ..... 14

        4. Construction, Operation, and Maintenance Specifications ..... 14

        5. Special Provisions for Publicly Owned Treatment Works ..... 14

        6. Other Special Provisions ..... 15

        7. Compliance Schedules – Not Applicable ..... 16

        8. Salt and Nutrient Management Programs ..... 16

VII. Compliance Determination ..... 17

    A. General ..... 17

    B. Multiple Sample Data ..... 17

    C. Average Monthly Effluent Limitation (AMEL) ..... 17

    D. Average Weekly Effluent Limitation (AWEL) ..... 18

    E. Maximum Daily Effluent Limitation (MDEL) ..... 18

**TABLES**

Table 1. Discharger Information ..... 1

Table 2. Discharge Location ..... 1

Table 3. Administrative Information ..... 1

Table 4. Effluent Limitations ..... 5

Table 5. Organic Substances Water Quality Objectives ..... 10

Table 6. Hardness Dependent Metal Criteria ..... 10

Table 7. Salinity Water Quality Objectives ..... 11

Table 8. Groundwater Objectives ..... 11

Table 9. Toxicity Reduction Evaluation Schedule ..... 13

**ATTACHMENTS**

Attachment A – Definitions ..... A-1

Attachment B – Map ..... B-1

Attachment C – Flow Schematic ..... C-1

Attachment D – Standard Provisions ..... D-1

Attachment E – Monitoring and Reporting Program ..... E-1

Attachment F – Fact Sheet ..... F-1

## I. FACILITY INFORMATION

Information describing the California Men's Colony Wastewater Treatment Plant (Facility) is summarized in Table 1 (see page 1) and in sections I and II of the Fact Sheet (Attachment F). Section I of the Fact Sheet also includes information regarding the Facility's permit application.

## II. FINDINGS

The California Regional Water Quality Control Board, Central Coast Region (Central Coast Water Board) finds:

- A. Legal Authorities.** This Order serves as waste discharge requirements (WDRs) pursuant to article 4, chapter 4, division 7 of the California Water Code (commencing with section 13260). This Order is also issued pursuant to section 402 of the federal Clean Water Act (CWA) and implementing regulations adopted by the U.S. EPA and chapter 5.5, division 7 of the Water Code (commencing with section 13370). It shall serve as a National Pollutant Discharge Elimination System (NPDES) permit authorizing the Discharger to discharge into waters of the United States at the discharge location described in Table 2 subject to the WDRs in this Order.
- B. Background and Rationale for Requirements.** The Central Coast Water Board developed the requirements in this Order based on information submitted as part of the application, through monitoring and reporting programs, and other available information. The Fact Sheet (Attachment F), which contains background information and rationale for the requirements in this Order, is hereby incorporated into and constitutes findings for this Order. Attachments A through E are also incorporated into this Order.
- C. Provisions and Requirements Implementing State Law.** The provisions/requirements in subsections IV.B, IV.C, and V.B are included to implement state law only. These provisions/requirements are not required or authorized under the federal CWA; consequently, violations of these provisions/requirements are not subject to the enforcement remedies that are available for NPDES violations. For the Recycling Specifications & Effluent Limitations in subsection IV.C and the Groundwater Limitations in subsection V.B, the Central Coast Water Board has considered the factors in Water Code section 13241. Subsection IV.B is not applicable to this Order.
- D. Notification of Interested Parties.** The Central Coast Water Board has notified the Discharger and interested agencies and persons of its intent to prescribe WDRs for the discharge and has provided them with an opportunity to submit their written comments and recommendations. Details of the notification are provided in the Fact Sheet.
- E. Consideration of Public Comment.** The Central Coast Water Board, in a public meeting, heard and considered all comments pertaining to the discharge. Details of the public hearing are provided in the Fact Sheet.
- F. Water Reclamation Requirements for Recycled Water Use.** The distribution and reuse of recycled water at the Facility is subject to the State Water Resources Control Board (State Water Board) General Water Reclamation Requirements (WRRs) for Recycled Water Use, Order WQ 2016-0068-DDW.
- G. Long-Term Planning and Implementation.** Federal regulations require NPDES permits to expire five years after their effective dates, after which the permit may be administratively extended prior to renewal. Planning and instituting measures to support long-term beneficial reuse of the Facility's treated effluent may span multiple permit terms. As a result, this Order includes requirements the Central Coast Water Board plans to carry over into future permit terms.

- H. Response to Climate Change.** Climate change refers to observed changes in regional weather patterns such as temperature, precipitation, and storm frequency and size. At the local scale, within urbanized areas, climate change may directly impact groundwater and surface water supply; drainage, flooding, and erosion patterns; and ecosystems and habitat. This shift in climate, combined with California's growing population, has increased reliance on pumping, conveying, treating, and heating water, increasing the water sector's greenhouse gas emissions. The State Water Board's Resolution No. 2017-0012, "Comprehensive Response to Climate Change," requires a proactive response to climate change in all California Water Board actions, with the intent to embed climate change consideration into all programs and activities. Aligning with Resolution No. 2017-0012, this Order supports beneficial reuse of the Facility's treated effluent to offset potable water supplies for irrigation and dedication of in-stream flows to creek habitat. This permit increases water supply reliability as a climate adaptation strategy, in addition to maintaining minimum instream discharges to provide water quality benefits and enhanced aquatic habitats.
- I. Human Right to Water.** Consistent with the human right to water law and Resolution No. R3-2017-0004, this Order promotes actions that advance the human right to water and discourages actions that delay or impede opportunities for communities to secure safe, clean, affordable, and accessible water adequate for human consumption, cooking, and sanitary purposes. This Order incorporates requirements for the Facility to beneficially reuse treated effluent to diversify the State's water supply portfolio to prepare for uncertainties in water resources due to the changing climate.
- J. Disadvantaged Community Status.** On January 26, 2017, the Central Coast Water Board adopted Environmental Justice and the Human Right to Water Resolution No. R3-2017-0004, which adopts the human right to water as a core value and affirms the realization of the human right to water and protecting human health as the Central Coast Water Board's top priorities. In meeting the objectives of the Resolution, staff has evaluated the disadvantaged community status for the Discharger. The State of California's Department of Corrections and Rehabilitation is the Discharger for this permit and is not considered a disadvantaged community.

**THEREFORE, IT IS HEREBY ORDERED** that this Order supersedes Order No. R3-2012-0027 except for enforcement purposes, and, in order to meet the provisions contained in division 7 of the Water Code (commencing with section 13000) and regulations adopted thereunder and the provisions of the CWA and regulations and guidelines adopted thereunder, the Discharger shall comply with the requirements in this Order. This action in no way prevents the Central Coast Water Board from taking enforcement action for past violations of the previous Order.

### **III. DISCHARGE PROHIBITIONS**

- A.** Discharge of treated wastewater at a location or in a manner other than as described by this Order is prohibited.
- B.** The discharge of any waste not specifically regulated by this Order, excluding storm water regulated by General Permit No. CAS000001 (Waste Discharge Requirements for Discharges of Storm Water Associated with Industrial Activities), is prohibited.
- C.** The overflow or bypass of wastewater from the Discharger's collection, treatment, or disposal facilities and the subsequent discharge of untreated or partially treated wastewater, except as provided for in Attachment D, Standard Provision I.G (Bypass), is prohibited.
- D.** Creation of a condition of pollution, contamination, or nuisance, as defined by section 13050 of the Water Code, is prohibited.

- E. The discharge shall not cause or contribute to adverse impacts to beneficial uses of water or to threatened or endangered species and their habitat.

**IV. EFFLUENT LIMITATIONS AND DISCHARGE SPECIFICATIONS**

**A. Effluent Limitations – Discharge Point No. 001**

**1. Final Effluent Limitations – Discharge Point No. 001**

- a. The Discharger shall maintain compliance with the following effluent limitations at Discharge Point No. 001, with compliance measured at Monitoring Location M-001 as described in the Monitoring and Reporting Program, Attachment E

**Table 4. Effluent Limitations**

Parameter	Units	Effluent Limitations		
		Average Monthly	Average Weekly	Maximum Daily
Biochemical Oxygen Demand 5-day @ 20°C (BOD <sub>5</sub> )	mg/L	10	30	50
	lbs/day <sup>[1]</sup>	100	300	500
Total Suspended Solids (TSS)	mg/L	10	30	50
	lbs/day <sup>[1]</sup>	100	300	500
pH	standard units	7.0 – 8.3 <sup>[2]</sup>		
Oil and Grease	mg/L	5.0	---	10
	lbs/day <sup>[1]</sup>	50	---	100
Settleable Solids	mL/L	0.1	---	0.3
Turbidity	Nephelometric Turbidity Unit (NTU)	10	---	20
Dissolved Oxygen	mg/L	>2.0 mg/L at all times		
Phthalate Esters	µg/L	0.002	---	0.006
Sulfate	mg/L	---	---	125
	lbs/day <sup>[1]</sup>	---	---	1,251
Nitrogen, Total as N	mg/L	---	---	10
	lbs/day <sup>[1]</sup>	---	---	100
Copper, Total Recoverable	µg/L	7.5	---	17
Chlorodibromomethane	µg/L	0.40	---	0.80
Dichlorobromomethane	µg/L	0.56	---	0.88
Bis(2-ethylhexyl) Phthalate	µg/L	1.8	---	3.6
Acute Toxicity	% survival	[3]		

[1] Mass loading limits were calculated using the following formula:

$$\text{lbs/day} = \text{pollutant concentration (mg/L)} * \text{permitted flow (1.2 MGD)} * \text{conversion factor (8.34)}$$

[2] When the Discharger continuously monitors effluent pH, levels shall be maintained within specified ranges 99 percent of the time. To determine 99 percent compliance, the following conditions shall be met:

- The total time during which pH is outside the range of 7.0 – 8.3 shall not exceed 7 hours and 26 minutes in any calendar month;
- No single excursion from the range of 7.0 – 8.3 shall exceed 30 minutes;
- No single excursion shall fall outside the range of 6.0 – 9.0; and
- When continuous monitoring is not being performed, standard compliance guidelines shall be followed (i.e., between 7.0 – 8.3 at all times, measured daily).

[3] As specified in section V of the Monitoring and Reporting Program (Attachment E).

- b. **Percent Removal.** The average monthly percent removal of BOD<sub>5</sub> and total suspended solids shall not be less than 85 percent.

- c. **Dry Weather Flow.** Effluent average dry weather flow shall not exceed a monthly average of 1.2 MGD.
- d. **Floating Material.** Discharge of treated wastewater through Discharge Point No. 001 shall not contain floating material, including solids, liquids, foams and scum, in concentrations that cause nuisance or adversely affect beneficial uses.
- e. **Total Coliform Bacteria**
  - i. Total coliform concentrations shall not exceed a median of 2.2 MPN/100 mL as determined from the last 7 days of sampling results for which analyses have been completed;
  - ii. No more than one sample shall exceed 23 MPN/100 mL in any 30-day period; and
  - iii. No sample shall exceed 240 MPN/100 mL.
- f. **Chronic Toxicity.** There shall be no chronic toxicity in the effluent discharge.
- g. **Orthophosphorus.** Median dissolved orthophosphorus concentrations of effluent from May through September shall not exceed current levels, as measured by a comparison to effluent concentrations from 2004 and 2005.

**B. Land Discharge Specifications – Not Applicable**

**C. Recycling Specifications**

This permit conditionally authorizes the Discharger to act as the producer of recycled (or reclaimed) water as specified below. The Discharger is responsible for compliance with all applicable requirements associated with the production of recycled water as specified within this permit. The Discharger and other entities, as may be required, are responsible for enrolling in General Water Reclamation Requirements (WRRs) for Recycled Water Use, Order WQ 2016-0068-DDW, for distribution and use of recycled water.

- 1. Production of reclaimed water shall comply with all applicable requirements of California Code of Regulations (CCR), title 22, division 4, chapter 3 for recycled water.
- 2. Reclamation use of tertiary treated wastewater shall comply with applicable state and local requirements regarding the production of reclaimed wastewater, including requirements of California Water Code (CWC) sections 13500-13577 (Water Reclamation) and Department of Health Services (DHS) regulations at title 22, sections 60301-60357 of the CCR (Water Recycling Criteria).
- 3. Wastewater shall be disinfected by the Trojan UV3000plus system as described in the Carollo Engineers December 20, 2013 submittal to the California Department of Public Health (CDPH, now known as Division of Drinking Water).
  - a. Since a media filter is used upstream, the ultraviolet (UV) system must be operated to deliver a minimum UV dose of 100 mJ/cm<sup>2</sup> at all times.
  - b. The equations from the CDPH July 23, 2009 acceptance letter must be used as part of the automatic UV disinfection control system for calculating UV dose. Specifically:

$$\text{Dose} = (\text{CF})(\text{FF})(\text{EOLL})(10^{(-4.63 - 0.7 \cdot \log \text{Flow} + 2.91 \cdot \log \text{UVT} + 1.09 \cdot \log \text{P})})$$

$$\text{and CF} = -0.003 \times \text{UVT} + 1.075$$

Where:

Dose = Delivered UV dose per bank (mJ/cm<sup>2</sup>)

FF = 0.95 Fouling Factor based on a cleaning frequency of once per day

UVT = % UV transmittance at 254 nm (%)

Flow = Flow rate per lamp (gallons per minute/lamp), with gpm/lamp calculated as gpm divided by the number of lamps in one bank

EOLL = End of Lamp Life factor = 0.98 at 9,000 hours for the Heraeus lamp

P = percent power

- c.** The UV disinfection system reactor is limited to the following operational parameter ranges:
  - i. Permit total plant flow up to 5.2 MGD
  - ii. Maximum flow per channel shall be 4.07 MGD
  - iii. UVTs at or above 57 percent
  - iv. The UV lamps are maintained below the maximum value of 9,000 hours of operation.
- d.** To maintain a fouling factor of 0.95, clean/wipe the quartz sleeves a minimum of once per day.
- e.** Flow meters and UVT monitors must be properly calibrated to ensure proper disinfection
- f.** UVT meter must be inspected and checked against a reference bench-top unit weekly to document accuracy.
- g.** If the on-line analyzer UVT reading varies from the bench-top spectrophotometer UVT reading by 2% or more, the on-line UVT analyzer must be recalibrated by a procedure recommended by the manufacturer.
- h.** Flow meters measuring the flow through a UV reactor must be verified to determine accuracy at least monthly via checking the flow reading against other flow determination methods.
- i.** The Facility shall be operated in accordance with an approved operations plan, which specifies clearly the operational limits and responses required for critical alarms. The operations plan shall be submitted to and approved by the Division of Drinking Water prior to issuance of the operating permit for the UV disinfection system. A copy of the approved operations plan shall be maintained at the treatment plant and be readily available to operations personnel and regulatory agencies. A quick reference plant operations data sheet shall be posted at the Facility and include the following information:
  - i. The alarm set points for secondary and tertiary turbidity, high and low flow, UV dose and transmittance, UV lamp operation hours, and power.
  - ii. The values of secondary and tertiary turbidity, high and low flow, UV dose and transmittance, UV lamp operation hours, and power when flow must be diverted to waste.
  - iii. The values of high daily and weekly median total coliform when flow must be diverted to waste.
  - iv. The required frequency of calibration for all meters measuring turbidity, flow, UV transmittance, and power.

- v. The required frequency of mechanical cleaning/wiping and equipment inspection.
  - vi. The UV lamp age tracking procedures and replacement intervals.
  - j. The UV system must be operated with a built-in automatic reliability feature that must be triggered when the system is below the target UV dose. If the measured UV dose goes below the minimum UV dose, the UV reactor in question must alarm and startup the next available UV lamp bank or reactor.
  - k. Conditions that should shut a reactor down and divert flow include inability to meet the target dose, high flow, low UVT, or reactor failure.
  - l. Equivalent or substitutions of equipment are not acceptable without an adequate demonstration of equivalent disinfection performance.
4. Wastewater to be reclaimed/recycled shall be filtered to meet the criteria of a or b:
- a. Wastewater shall be coagulated and passed through natural undisturbed soils or a bed of filter media:
    - i. At a rate that does not exceed 5 gpm per square foot of surface area in mono, dual, or mixed media gravity, upflow, or pressure filtration systems, or does not exceed 2 gpm per square foot of surface area in traveling bridge automatic backwash filters; and
    - ii. Turbidity of the filtered wastewater shall not exceed any of the following:
      - 1) An average of 2 NTU within a 24-hour period;
      - 2) 5 NTU more than 5 percent of the time within a 24-hour period; and
      - 3) 10 NTU at any time.
  - b. Wastewater to be reclaimed/recycled shall be passed through a microfiltration, ultrafiltration, nanofiltration, or reverse osmosis membrane so that turbidity of the filtered wastewater does not exceed any of the following:
    - i. 0.2 NTU more than 5 percent of the time within a 24-hour period; and
    - ii. 0.5 NTU at any time.

## **V. RECEIVING WATER LIMITATIONS**

### **A. Surface Water Limitations**

Receiving water limitations are based on water quality objectives contained in the Basin Plan and are a required part of this Order. The discharge from the Facility shall not cause the following in the receiving waters:

1. Waters shall be free of coloration that causes nuisance or adversely affects beneficial uses. Coloration attributable to materials of waste origin shall not be greater than 15 units or 10 percent above natural background color, whichever is greater.
2. Waters shall not contain taste- or odor-producing substances in concentrations that impart undesirable tastes or odors to fish flesh or other edible products of aquatic origin, that cause nuisance, or that adversely affect beneficial uses.
3. Waters shall not contain floating material, including solids, liquids, foams, and scum, in concentrations that cause nuisance or adversely affect beneficial uses.
4. Waters shall not contain suspended material in concentrations that cause nuisance or adversely affect beneficial uses.



5. Waters shall not contain settleable material in concentrations that result in deposition of material that causes nuisance or adversely affects beneficial uses.
6. Waters shall not contain oils, greases, waxes, or other similar materials in concentrations that result in a visible film or coating on the surface of the water or on objects in the water, that cause nuisance, or that otherwise adversely affect beneficial uses.
7. Waters shall not contain biostimulatory substances in concentrations that promote aquatic growths to the extent that such growths cause nuisance or adversely affect beneficial uses.
8. The suspended sediment load and suspended sediment discharge rate to surface waters shall not be altered in such a manner as to cause nuisance or adversely affect beneficial uses.
9. Concentrations of toxic metals and inorganic chemicals in waters shall not be increased in such a manner that may adversely affect beneficial uses.
10. Waters shall be free of changes in turbidity that cause nuisance or adversely affect beneficial uses. Increase in turbidity attributable to controllable water quality factors shall not exceed the following limits.
  - a. Where natural turbidity is between 0 and 50 nephelometric turbidity units (NTU), increases shall not exceed 20 percent.
  - b. Where natural turbidity is between 50 and 100 NTU, increases shall not exceed 10 NTU.
  - c. Where natural turbidity is greater than 100 NTU, increases shall not exceed 10 percent.
11. The pH value shall not be depressed below 7.0 nor raised above 8.3. The change in normal ambient pH levels shall not exceed 0.5 in fresh water.
12. Dissolved oxygen concentrations in receiving waters shall not be reduced below 7.0 mg/L at any time.
13. Effluent discharged shall not cause receiving water temperature to be increased by more than 5° F.
14. All waters shall be maintained free of toxic substances in concentrations that are toxic to or that produce detrimental physiological responses in human, plant, animal, or aquatic life. Survival of aquatic life in surface waters subjected to a waste discharge or other controllable water quality conditions shall not be less than that for the same water body in areas unaffected by the waste discharge.
15. The discharge of wastes shall not cause concentrations of unionized ammonia (NH<sub>3</sub>) to exceed 0.025 mg/L (as N) in the receiving water.
16. No individual pesticide or combination of pesticides shall reach concentrations that adversely affect the beneficial uses of the receiving water. There shall be no increase in pesticide concentrations found in bottom sediments or aquatic life. For waters where existing concentrations are presently nondetectable or where beneficial uses would be impaired by concentrations in excess of nondetectable levels, total identifiable chlorinated hydrocarbon pesticides shall not be present at concentrations detectable within the accuracy of analytical methods as prescribed in *Standard Methods for the Examination of Water and Wastewater*, latest edition, or other equivalent methods approved by the Executive Officer.
17. Waters shall not contain organic substances in concentrations greater than the following:

**Table 5. Organic Substances Water Quality Objectives**

Parameter	Water Quality Objective
Methylene Blue Activated Substances	0.2 mg/L
Total Phenols	0.1 mg/L
Polychlorinated Biphenyls (PCBs)	0.3 µg/L
Phthalate Esters	0.002 µg/L

18. Radionuclides shall not be present in concentrations that are deleterious to human, plant, animal, or aquatic life or result in the accumulation of radionuclides in the food web to an extent that presents a hazard to human, plant, animal, or aquatic life. In no circumstance shall receiving waters contain concentrations of radionuclides in excess of the maximum contaminant levels (MCLs) for radioactivity presented in table 4 of title 22 CCR, division 4, chapter 15, article 5, sections 64442 and 64443.
19. Receiving waters shall not contain concentrations of chemical constituents in excess of the primary maximum contaminant levels (MCLs) specified for drinking water in table 64431-A (Primary MCLs for Inorganic Chemicals) and table 64444-A (Primary MCLs for Organic Chemicals) of title 22 CCR, division 4, chapter 15.
20. The following concentrations of metals shall not be exceeded for the protection of aquatic life.

**Table 6. Hardness Dependent Metal Criteria**

Parameter	Receiving Water Hardness (mg/L)	
	> 100 mg/L CaCO <sub>3</sub>	< 100 mg/L CaCO <sub>3</sub>
Cadmium	0.003	0.004
Chromium	0.05	0.05
Copper	0.03	0.01
Lead	0.03	0.03
Mercury	0.0002	0.0002
Nickel	0.4	0.1
Zinc	0.2	0.004

21. Receiving waters shall not contain concentrations of chemical constituents known to be deleterious to fish or wildlife in excess of the levels presented in chapter 3, table 3-3 of the Basin Plan.
22. Cadmium shall not exceed 0.003 mg/L when hardness in receiving waters is greater than 100 mg/L as CaCO<sub>3</sub>, nor shall cadmium exceed 0.004 mg/L when hardness in receiving waters is equal to or less than 100 mg/L as CaCO<sub>3</sub>.
23. Fecal coliform concentrations, based on a minimum of not fewer than five samples for any 30-day period, shall not exceed a log mean of 200 organisms/100 mL, nor shall more than 10 percent of samples collected during any 30-day period exceed 400 organisms/100 mL.
24. Discharges shall not cause receiving water to exceed the following water quality objectives specifically identified for the Chorro Creek sub-area (Estero Bay sub-basin) by table 3-5 of the Basin Plan, shown below. Additionally, for total dissolved solids (TDS) and sodium, effluent discharged shall not exceed the concentrations shown below, measured as a monthly maximum determined from monitoring stations not more than 200 feet upstream and downstream of the discharge.

**Table 7. Salinity Water Quality Objectives**

Parameter	Units	Annual Mean
TDS	mg/L	500
Chloride	mg/L	50
Sulfate	mg/L	50
Boron	mg/L	0.2
Sodium	mg/L	50

**B. Groundwater Limitations**

Activities at the Facility shall not cause exceedances or deviations from the following water quality objectives for groundwater established by the Basin Plan. Pursuant to Water Code section 13267, the Central Coast Water Board may require the Discharger to investigate if it is a cause of groundwater limitation(s) exceedances.

1. Groundwater shall not contain taste- or odor-producing substances in concentrations that adversely affect beneficial uses.
2. Radionuclides shall not be present in concentrations that are deleterious to human, plant, animal, or aquatic life or result in the accumulation of radionuclides in the food web to an extent which presents a hazard to human, plant, animal, or aquatic life. In no circumstances shall groundwater contain concentrations of radionuclides in excess of the MCLs for radioactivity presented in table 4 of title 22 California Code of Regulations, division 4, chapter 15, article 5, section 64443.
3. The median concentration of coliform organisms in groundwater, over any seven-day period, shall be less than 2.2 organisms/100 mL.
4. Groundwater shall not contain concentrations of chemical constituents in excess of the primary MCLs specified for drinking water in table 64431-A (Primary MCLs for Inorganic Chemicals) and table 64444-A (Primary MCLs for Organic Chemicals) of title 22 California Code of Regulations, division 4, chapter 15.
5. Groundwater shall not contain concentrations of chemical constituents in amounts that adversely affect the agricultural supply beneficial use. Interpretation of adverse effects shall be as described in University of California Agricultural Extension Service guidelines provided in table 3-1 of the Basin Plan.
6. Groundwater used for irrigation and livestock watering shall not exceed concentrations of chemical constituents in excess of those levels specified for irrigation and livestock watering in chapter 3, table 3-2 of the Basin Plan.
7. Groundwater shall not contain constituents greater than the following concentrations established in table 3-6 of the Basin Plan for groundwaters within the Chorro Creek sub-area (Estero Bay sub-basin).

**Table 8. Groundwater Objectives**

Parameter	Units	Annual Median
TDS	mg/L	1,000
Chloride	mg/L	250
Sulfate	mg/L	100
Boron	mg/L	0.2
Sodium	mg/L	50
Nitrogen	mg/L	5

## VI. PROVISIONS

### A. Standard Provisions

1. **Federal Standard Provisions.** The Discharger shall comply with all Standard Provisions included in Attachment D.
2. **Central Coast Water Board Standard Provisions.** The Discharger shall comply with the Central Coast Water Board Standard Provisions included in Attachment D of this Order.

### B. Monitoring and Reporting Program (MRP) Requirements

Pursuant to Water Code sections 13267 and 13383, the Discharger shall comply with the MRP, and future revisions thereto, in Attachment E of this Order and all notification and general reporting requirements throughout this Order and Attachment D. Where notification or general reporting requirements conflict with those stated in the MRP (e.g., annual report due date), the Discharger shall comply with the MRP requirements. All monitoring shall be conducted according to 40 Code of Federal Regulations (CFR) part 136, Guidelines Establishing Test Procedures for Analysis of Pollutants.

The Discharger is required to provide technical or monitoring reports because it is the owner and operator responsible for the waste discharge and compliance with this Order. The Central Coast Water Board needs this information to determine the Discharger's compliance with this Order, assess the need for further investigation or enforcement action, and to protect public health and safety and the environment.

### C. Special Provisions

#### 1. Reopener Provisions

- a. This Order may be reopened and modified in accordance with NPDES regulations at 40 CFR parts 122 and 124, as necessary, to include additional conditions or limitations based on newly available information or to implement any U.S. EPA approved, new, State water quality objective.
- b. This Order may be reopened for modification to include an effluent limitation if monitoring establishes that the discharge causes, has the reasonable potential to cause, or contributes to an excursion above a State Implementation Policy (SIP) water quality objective.

#### 2. Special Studies, Technical Reports and Additional Monitoring Requirements

##### a. Toxicity Reduction Requirements

If the discharge consistently exceeds an effluent limitation for toxicity specified by section IV.A of this Order, the Discharger shall conduct a Toxicity Reduction Evaluation (TRE) defined in Attachment A in accordance with the Discharger's TRE Workplan.

A TRE is a study conducted in a stepwise process designed to identify the causative agents of effluent or ambient toxicity, isolate the sources of toxicity, evaluate the effectiveness of toxicity control options, and then confirm the reduction in toxicity. The first steps of the TRE consist of the collection of data relevant to the toxicity, including additional toxicity testing, and an evaluation of facility operations and maintenance practices, and best management practices. A Toxicity Identification Evaluation (TIE) may be required as part of the TRE, if appropriate. A TIE is a set of procedures to identify the specific chemical(s) responsible for toxicity. These procedures are performed in three phases: characterization; identification; and

confirmation using aquatic organism toxicity tests. The TRE shall include all reasonable steps to identify the source of toxicity. The Discharger shall take all reasonable steps to reduce toxicity to the required level once the source of toxicity is identified.

The Discharger shall develop and maintain a TRE Workplan, which describes steps that the Discharger intends to follow in the event that a toxicity trigger established by this Order is exceeded in the discharge. The workplan shall be prepared in accordance with current technical guidance and reference material, including:

- i. *Toxicity Reduction Evaluation Guidance for Municipal Wastewater Treatment Plants* (EPA/833/B-99-022).
- ii. *Toxicity Identification Evaluation, Phase I* (EPA/600/6-91/005F).
- iii. *Methods for Aquatic Toxicity Identification Evaluations, Phase II* (EPA/600/R-92/080).
- iv. *Methods for Aquatic Toxicity Identification Evaluations, Phase III* (EPA/600/R-92/081).

At a minimum, the TRE Workplan shall include:

- i. Actions that will be taken to investigate/identify the causes/sources of toxicity,
- ii. Actions that will be evaluated to mitigate the impact of the discharge, to correct the non-compliance, and/or to prevent the recurrence of acute or chronic toxicity (this list of action steps may be expanded, if a TRE is undertaken), and
- iii. A schedule under which these actions will be implemented.

When monitoring detects effluent toxicity greater than a limitation in this Order, the Discharger shall resample immediately, if the discharge is continuing, and retest for whole effluent toxicity. Results of an initial failed test and results of subsequent monitoring shall be reported to the Executive Officer (EO) as soon as possible after receiving monitoring results. The EO will determine whether to initiate enforcement action, whether to require the Discharger to implement a TRE, or to implement other measures. The Discharger shall conduct a TRE considering guidance provided by the U.S. EPA's *Toxicity Reduction Evaluation Procedures, Phases 1, 2, and 3* (EPA document Nos. EPA 600/3-88/034, 600/3-88/035, and 600/3-88/036, respectively). A TRE, if necessary, shall be conducted in accordance with the following schedule.

**Table 9. Toxicity Reduction Evaluation Schedule**

Action Step	When Required
Take all reasonable measures necessary to immediately reduce toxicity, where the source is known.	Within 24 hours of identification of noncompliance.
Initiate the TRE in accordance to the Workplan.	Within 7 days of notification by the EO.
Conduct the TRE following the procedures in the Workplan.	Within the period specified in the Workplan (not to exceed one year without an approved Workplan)
Submit the results of the TRE, including summary of findings, required corrective action, and all results and data.	Within 60 days of completion of the TRE.

Action Step	When Required
Implement corrective actions to meet Permit limits and conditions.	To be determined by the EO.

**3. Best Management Practices and Pollution Prevention**

**a. Pollutant Minimization Plan**

The Discharger shall develop and conduct a Pollutant Minimization Program (PMP) as further described below when there is evidence (e.g., sample results reported as “detected but did not qualify” (DNQ) when the effluent limitation is less than the method detection limit (MDL), sample results from analytical methods more sensitive than those methods required by this Order, presence of whole effluent toxicity, health advisories for fish consumption, results of benthic or aquatic organism tissue sampling) that a priority pollutant is present in the effluent above an effluent limitation and either:

- i. A sample result is reported as DNQ and the effluent limitation is less than the reported minimum level; or
- ii. A sample result is reported as non-detect (ND) and the effluent limitation is less than the MDL, using definitions described in Attachment A and reporting protocols described in MRP section X.B.4.

The PMP shall include, but not be limited to, the following actions and submittals acceptable to the Central Coast Water Board:

- i. An annual review and semiannual monitoring of potential sources of the reportable priority pollutant(s), which may include fish tissue monitoring and other bio-uptake sampling;
- ii. Quarterly monitoring for the reportable priority pollutant(s) in the influent to the wastewater treatment system;
- iii. Submittal of a control strategy designed to proceed toward the goal of maintaining concentrations of the reportable priority pollutant(s) in the effluent at or below the effluent limitation;
- iv. Implementation of appropriate cost-effective control measures for the reportable priority pollutant(s), consistent with the control strategy; and
- v. An annual status report that shall be sent to the Central Coast Water Board including:
  - (a) All PMP monitoring results for the previous year;
  - (b) A list of potential sources of the reportable priority pollutant(s);
  - (c) A summary of all actions undertaken pursuant to the control strategy; and
  - (d) A description of actions to be taken in the following year.

**4. Construction, Operation, and Maintenance Specifications**

The Facility shall be operated as specified under Standard Provision D of Attachment D.

**5. Special Provisions for Publicly Owned Treatment Works**

- a. Biosolids Management.** Provisions regarding sludge handling and disposal ensure that such activity will comply with all applicable regulations.

40 CFR part 503 sets forth U.S. EPA's final rule for the use and disposal of biosolids, or sewage sludge, and governs the final use or disposal of biosolids. The intent of this federal program is to ensure that sewage sludge is used or disposed of in a way that protects both human health and the environment.

U.S. EPA's regulations require that producers of sewage sludge meet certain reporting, handling, and disposal requirements. As the U.S. EPA has not delegated the authority to implement the sludge program to the State of California, the enforcement of sludge requirements that apply to the Discharger remains under U.S. EPA's jurisdiction at this time. U.S. EPA, not the Central Water Coast Board, will oversee compliance with 40 CFR part 503.

- b. **Collection System.** The Discharger is subject to the requirements of and must comply with State Water Board Order 2006-0003-DWQ, Statewide General Waste Discharge Requirements for Sanitary Sewer Systems, including monitoring and reporting requirements as amended by State Water Board Order WQ 2013-0058-EXEC and any subsequent order.

## 6. Other Special Provisions

- a. **Discharges of Storm Water.** For the control of storm water discharged from the site of the wastewater treatment and disposal facilities, if applicable, the Discharger shall seek authorization to discharge under and meet the requirements of the State Water Resources Control Board's Water Quality Order 2014-0057-DWQ, NPDES General Permit No. CAS000001, *Waste Discharge Requirements for Discharges of Storm Water Associated with Industrial Activities Excluding Construction Activities*.
- b. **Recycled Water Policy.** The Recycled Water Policy was first adopted in 2009, amended in 2013, and again amended by the State Water Board on December 11, 2018. Those last amendments became effective on April 8, 2019. The purpose of the Recycled Water Policy is to encourage the safe use of recycled water in a manner that is protective of public health and the environment. Dischargers covered by NPDES permits, waste discharge requirements (WDRs), master recycling permits, and water reclamation requirements (WRRs) are subject to the provisions in the Recycled Water Policy. All Dischargers are required to annually report volumetric data on wastewater and, if applicable, recycled water consistent with requirements in section 3 of the Recycled Water Policy. The Recycled Water Policy requires wastewater and recycled water dischargers to annually report monthly volumes of influent, wastewater produced, and effluent, including treatment level and discharge type. As applicable, dischargers are additionally required to annually report recycled water use by volume and category of reuse.
- c. **Climate Change Response Plan.** With the Report of Waste Discharge submitted for reissuance of this permit, the Discharger shall submit a Climate Change Response Plan. The plan shall provide a clear, long-term plan for addressing climate change hazards at the facility. The Climate Change Response Plan shall, at minimum:
  - i. Identify and prioritize climate change hazards at the facility and assess facility vulnerability to climate change hazards. Analyze a range of potential flooding scenarios applicable to the anticipated life of the facility.
  - ii. Identify climate change hazard triggers that will initiate responses at the facility.
  - iii. Identify and prioritize potential responses to climate change hazard triggers. A full suite of potential adaptation responses must be considered. Options that

achieve long-term facility safety and operation and minimize resource impacts shall be prioritized.

- iv. Identify next steps the Discharger will implement for ensuring that the facility is safe from and resilient to climate change hazards.

**7. Compliance Schedules – Not Applicable**

**8. Salt and Nutrient Management Programs**

- a. The Discharger shall continue to update and implement an ongoing Salt Management Program, with the intent of reducing mass loading of salts in treated effluent and attainment of applicable water quality objectives (WQOs) for salts in the Chorro Creek Sub-Basin of the Estero Bay Drainage Basin. Additionally, the Discharger shall develop and implement a Nutrient Management Program, with the intent of reducing mass loading of nutrients in treated effluent and attainment of applicable WQOs for nutrients in the same basin.
- b. Salt reduction measures shall focus on all potential salt contributors to the collection system, including water supply, commercial, industrial, and residential dischargers.
- c. Nutrient reduction measures shall focus on optimizing wastewater treatment processes for nitrification and denitrification, or other means of nitrogen removal. Reduction measures may also include source control (non-human waste from commercial and industrial sources) as appropriate.
- d. As part of the Salt and Nutrient Management Programs, the Discharger shall submit an annual report of salt and nutrient reduction efforts. This Salt and Nutrient Management Report shall be included as part of the annual report described in the MRP (Attachment E). The report shall be submitted by January 30th, and shall include (at a minimum):
  - i. Salt Component
    - (a) Calculations of annual salt mass discharged to (influent) and from (effluent) the wastewater treatment or recycling facility with a description of contributing sources;
    - (b) Analysis of wastewater evaporation/salt concentration effects;
    - (c) Analysis of groundwater monitoring results for salts constituents and associated trends;
    - (d) Analysis of potential impacts of salt loading on the groundwater basin (focusing on the relationship between salt concentration in the discharge and the Basin Plan water quality objectives);
    - (e) A summary of existing salt reduction measures;
    - (f) Recommendations and time schedules for implementation of any additional salt reduction measures; and
    - (g) Status of the implementation of the Salt Management items detailed in section 4.3 of the Discharger's May 2009 Salt Management Study.
  - ii. Nutrient Component
    - (a) Calculations of annual nitrogen mass (for all identified species) discharged to (influent) and from (effluent) the wastewater treatment or recycling facility with a description of contributing sources;



- (b) Analysis of wastewater treatment facility ability to facilitate nitrification and denitrification, or other means of nitrogen removal;
  - (c) Analysis of groundwater monitoring results for nitrogen constituents and trends;
  - (d) Analysis of potential impacts of nitrogen loading on the groundwater basin (focusing on the relationship between salt concentration in the discharge and the Basin Plan water quality objectives);
  - (e) A summary of existing nitrogen loading reduction measures; and
  - (f) Recommendations and time schedules for implementation of any additional nitrogen loading reduction measures.
- e. As an alternative to the Salt and Nutrient Management Program requirements described above, upon Executive Officer approval, the Discharger may submit documentation and summary of participation in a regional salt/nutrient management plan implemented under the provisions of State Water Board Recycled Water Policy.

## VII. COMPLIANCE DETERMINATION

Compliance with the effluent limitations contained in section IV of this Order will be determined as specified below.

### A. General

Compliance with effluent limitations for reportable pollutants shall be determined using sample reporting protocols defined in the MRP and Attachment A of this Order. For purposes of reporting and administrative enforcement by the Central Coast and State Water Boards, the Discharger shall be deemed out of compliance with effluent limitations if the concentration of the reportable pollutant in the monitoring sample is greater than the effluent limitation and greater than or equal to the reported Minimum Level (ML).

### B. Multiple Sample Data

When determining compliance with a measure of central tendency (arithmetic mean, geometric mean, median, etc.) of multiple samples analyses and the data set contains one or more reported determinations of DNQ or ND, the Discharger shall compute the median in place of the arithmetic mean in accordance with the following procedure:

1. The data set shall be ranked from low to high, ranking the reported ND determinations lowest, DNQ determinations next, followed by quantified values (if any). The order of the individual ND or DNQ determinations is unimportant.
2. The median value of the data set shall be determined. If the data set has an odd number of data points, then the median is the middle value. If the data set has an even number of data points, then the median is the average of the two values around the middle unless one or both of the points are ND or DNQ, in which case the median value shall be the lower of the two data points where DNQ is lower than a value and ND is lower than DNQ.

### C. Average Monthly Effluent Limitation (AMEL)

If the average of daily discharges over a calendar month exceeds the AMEL for a given parameter, an alleged violation will be flagged and the Discharger will be considered out of compliance for each day of that month for that parameter (e.g., resulting in 31 days of non-compliance in a 31-day month). The average of daily discharges over the calendar month that exceeds the AMEL for a parameter will be considered out of compliance for that month only. If only a single sample is taken during the calendar month and the analytical result for that

sample exceeds the AMEL, the Discharger will be considered out of compliance for that calendar month. For any one calendar month during which no sample (daily discharge) is taken, no compliance determination can be made for that calendar month.

**D. Average Weekly Effluent Limitation (AWEL)**

If the average of daily discharges over a calendar week exceeds the AWEL for a given parameter, an alleged violation will be flagged and the Discharger will be considered out of compliance for each day of that week for that parameter, resulting in 7 days of non-compliance. The average of daily discharges over the calendar week that exceeds the AWEL for a parameter will be considered out of compliance for that week only. If only a single sample is taken during the calendar week and the analytical result for that sample exceeds the AWEL, the Discharger will be considered out of compliance for that calendar week. For any one calendar week during which no sample (daily discharge) is taken, no compliance determination can be made for that calendar week.

**E. Maximum Daily Effluent Limitation (MDEL)**

If a daily discharge exceeds the MDEL for a given parameter, an alleged violation will be flagged and the Discharger will be considered out of compliance for that parameter for that 1 day only within the reporting period. For any 1 day during which no sample is taken, no compliance determination can be made for that day.

## ATTACHMENT A – DEFINITIONS

### **Arithmetic Mean ( $\mu$ )**

Also called the average, is the sum of measured values divided by the number of samples. For ambient water concentrations, the arithmetic mean is calculated as follows:

Arithmetic mean =  $\mu = \Sigma x / n$                       where:  $\Sigma x$  is the sum of the measured ambient water concentrations, and  $n$  is the number of samples.

### **Average Monthly Effluent Limitation (AMEL)**

The highest allowable average of daily discharges over a calendar month, calculated as the sum of all daily discharges measured during a calendar month divided by the number of daily discharges measured during that month.

### **Average Weekly Effluent Limitation (AWEL)**

The highest allowable average of daily discharges over a calendar week (Sunday through Saturday), calculated as the sum of all daily discharges measured during a calendar week divided by the number of daily discharges measured during that week.

### **Bioaccumulative**

Those substances taken up by an organism from its surrounding medium through gill membranes, epithelial tissue, or from food and subsequently concentrated and retained in the body of the organism.

### **Carcinogenic**

Pollutants are substances that are known to cause cancer in living organisms.

### **Coefficient of Variation (CV)**

CV is a measure of the data variability and is calculated as the estimated standard deviation divided by the arithmetic mean of the observed values.

### **Daily Discharge**

Daily Discharge is defined as either: (1) the total mass of the constituent discharged over the calendar day (12:00 am through 11:59 pm) or any 24-hour period that reasonably represents a calendar day for purposes of sampling (as specified in the permit), for a constituent with limitations expressed in units of mass or; (2) the unweighted arithmetic mean measurement of the constituent over the day for a constituent with limitations expressed in other units of measurement (e.g., concentration).

The daily discharge may be determined by the analytical results of a composite sample taken over the course of one day (a calendar day or other 24-hour period defined as a day) or by the arithmetic mean of analytical results from one or more grab samples taken over the course of the day.

For composite sampling, if 1 day is defined as a 24-hour period other than a calendar day, the analytical result for the 24-hour period will be considered as the result for the calendar day in which the 24-hour period ends.

### **Detected, but Not Quantified (DNQ)**

DNQ are those sample results less than the reporting limit (RL), but greater than or equal to the laboratory's MDL. Sample results reported as DNQ are estimated concentrations.

### **Dilution Credit**

Dilution Credit is the amount of dilution granted to a discharge in the calculation of a water quality-based effluent limitation, based on the allowance of a specified mixing zone. It is calculated from the

dilution ratio or determined through conducting a mixing zone study or modeling of the discharge and receiving water.

**Effluent Concentration Allowance (ECA)**

ECA is a value derived from the water quality criterion/objective, dilution credit, and ambient background concentration that is used, in conjunction with the coefficient of variation for the effluent monitoring data, to calculate a long-term average (LTA) discharge concentration. The ECA has the same meaning as wasteload allocation (WLA) as used in U.S. EPA guidance (Technical Support Document For Water Quality-based Toxics Control, March 1991, second printing, EPA/505/2-90-001).

**Enclosed Bays**

Enclosed Bays means indentations along the coast that enclose an area of oceanic water within distinct headlands or harbor works. Enclosed bays include all bays where the narrowest distance between the headlands or outermost harbor works is less than 75 percent of the greatest dimension of the enclosed portion of the bay. Enclosed bays include, but are not limited to, Humboldt Bay, Bodega Harbor, Tomales Bay, Drake's Estero, San Francisco Bay, Morro Bay, Los Angeles-Long Beach Harbor, Upper and Lower Newport Bay, Mission Bay, and San Diego Bay. Enclosed bays do not include inland surface waters or ocean waters.

**Estimated Chemical Concentration**

The estimated chemical concentration that results from the confirmed detection of the substance by the analytical method below the ML value.

**Estuaries**

Estuaries means waters, including coastal lagoons, located at the mouths of streams that serve as areas of mixing for fresh and ocean waters. Coastal lagoons and mouths of streams that are temporarily separated from the ocean by sandbars shall be considered estuaries. Estuarine waters shall be considered to extend from a bay or the open ocean to a point upstream where there is no significant mixing of fresh water and seawater. Estuarine waters included, but are not limited to, the Sacramento-San Joaquin Delta, as defined in Water Code section 12220, Suisun Bay, Carquinez Strait downstream to the Carquinez Bridge, and appropriate areas of the Smith, Mad, Eel, Noyo, Russian, Klamath, San Diego, and Otay rivers. Estuaries do not include inland surface waters or ocean waters.

**Inland Surface Waters**

All surface waters of the state that do not include the ocean, enclosed bays, or estuaries.

**Instantaneous Maximum Effluent Limitation**

The highest allowable value for any single grab sample or aliquot (i.e., each grab sample or aliquot is independently compared to the instantaneous maximum limitation).

**Instantaneous Minimum Effluent Limitation**

The lowest allowable value for any single grab sample or aliquot (i.e., each grab sample or aliquot is independently compared to the instantaneous minimum limitation).

**Maximum Daily Effluent Limitation (MDEL)**

The highest allowable daily discharge of a pollutant, over a calendar day (or 24-hour period). For pollutants with limitations expressed in units of mass, the daily discharge is calculated as the total mass of the pollutant discharged over the day. For pollutants with limitations expressed in other units of measurement, the daily discharge is calculated as the arithmetic mean measurement of the pollutant over the day.

**Median**

The middle measurement in a set of data. The median of a set of data is found by first arranging the measurements in order of magnitude (either increasing or decreasing order). If the number of measurements (n) is odd, then the median =  $X_{(n+1)/2}$ . If n is even, then the median =  $(X_{n/2} + X_{(n/2)+1})/2$  (i.e., the midpoint between the n/2 and n/2+1).

**Method Detection Limit (MDL)**

MDL is the minimum concentration of a substance that can be measured and reported with 99 percent confidence that the analyte concentration is greater than zero, as defined in 40 CFR part 136, Attachment B, revised as of July 3, 1999.

**Minimum Level (ML)**

ML is the concentration at which the entire analytical system must give a recognizable signal and acceptable calibration point. The ML is the concentration in a sample that is equivalent to the concentration of the lowest calibration standard analyzed by a specific analytical procedure, assuming that all the method specified sample weights, volumes, and processing steps have been followed.

**Mixing Zone**

Mixing Zone is a limited volume of receiving water that is allocated for mixing with a wastewater discharge where water quality criteria can be exceeded without causing adverse effects to the overall water body.

**Not Detected (ND)**

Sample results which are less than the laboratory's MDL.

**Ocean Waters**

Ocean waters are the territorial marine waters of the State as defined by California law to the extent these waters are outside of enclosed bays, estuaries, and coastal lagoons. Discharges to ocean waters are regulated in accordance with the State Water Board's California Ocean Plan.

**Persistent Pollutants**

Persistent pollutants are substances for which degradation or decomposition in the environment is nonexistent or very slow.

**Pollutant Minimization Program (PMP)**

PMP means waste minimization and pollution prevention actions that include, but are not limited to, product substitution, waste stream recycling, alternative waste management methods, and education of the public and businesses. The goal of the PMP shall be to reduce all potential sources of a priority pollutant(s) through pollutant minimization (control) strategies, including pollution prevention measures as appropriate, to maintain the effluent concentration at or below the water quality-based effluent limitation. Pollution prevention measures may be particularly appropriate for persistent bioaccumulative priority pollutants where there is evidence that beneficial uses are being impacted. The Central Coast Water Board may consider cost effectiveness when establishing the requirements of a PMP. The completion and implementation of a Pollution Prevention Plan, if required pursuant to Water Code section 13263.3(d), shall be considered to fulfill the PMP requirements.

**Pollution Prevention**

Pollution Prevention means any action that causes a net reduction in the use or generation of a hazardous substance or other pollutant that is discharged into water and includes, but is not limited to, input change, operational improvement, production process change, and product reformulation (as defined in Water Code section 13263.3). Pollution prevention does not include actions that merely shift a pollutant in wastewater from one environmental medium to another environmental medium, unless

clear environmental benefits of such an approach are identified to the satisfaction of the State Water Resources Control Board (State Water Board) or Central Coast Water Board.

**Reporting Level (RL)**

The RL is the ML (and its associated analytical method) chosen by the Discharger for reporting and compliance determination from the MLs included in this Order, including an additional factor if applicable as discussed herein. The MLs included in this Order correspond to approved analytical methods for reporting a sample result that are selected by the Central Coast Water Board either from Appendix 4 of the SIP in accordance with section 2.4.2 of the SIP or established in accordance with section 2.4.3 of the SIP. The ML is based on the proper application of method-based analytical procedures for sample preparation and the absence of any matrix interferences. Other factors may be applied to the ML depending on the specific sample preparation steps employed. For example, the treatment typically applied in cases where there are matrix-effects is to dilute the sample or sample aliquot by a factor of ten. In such cases, this additional factor must be applied to the ML in the computation of the RL.

**Sanitary Sewer Overflow**

Sanitary sewer overflow is any overflow, spill, release, discharge, or diversion of untreated or partially treated wastewater from a sanitary sewer system. Sanitary sewer overflows include: (1) overflows or releases of untreated or partially treated wastewater that reach waters of the United States; (2) overflows or releases of untreated or partially treated wastewater that do not reach waters of the United States; and (3) wastewater backups into buildings and on private property that are caused by blockages or flow conditions within the publicly owned portion of a sanitary sewer system.

**Satellite Collection System**

Satellite collection system is the portion, if any, of a sanitary sewer system owned or operated by a different public agency than the agency that owns and operates the wastewater treatment facility that a sanitary sewer system is tributary to.

**Source of Drinking Water**

Any water designated as municipal or domestic supply (MUN) in a Central Coast Water Board Basin Plan.

**Standard Deviation**

Standard Deviation is a measure of variability that is calculated as follows:

$$\text{Standard Deviation} = (\sum[(x - \mu)^2]/(n - 1))^{0.5}$$

where:

x is the observed value;

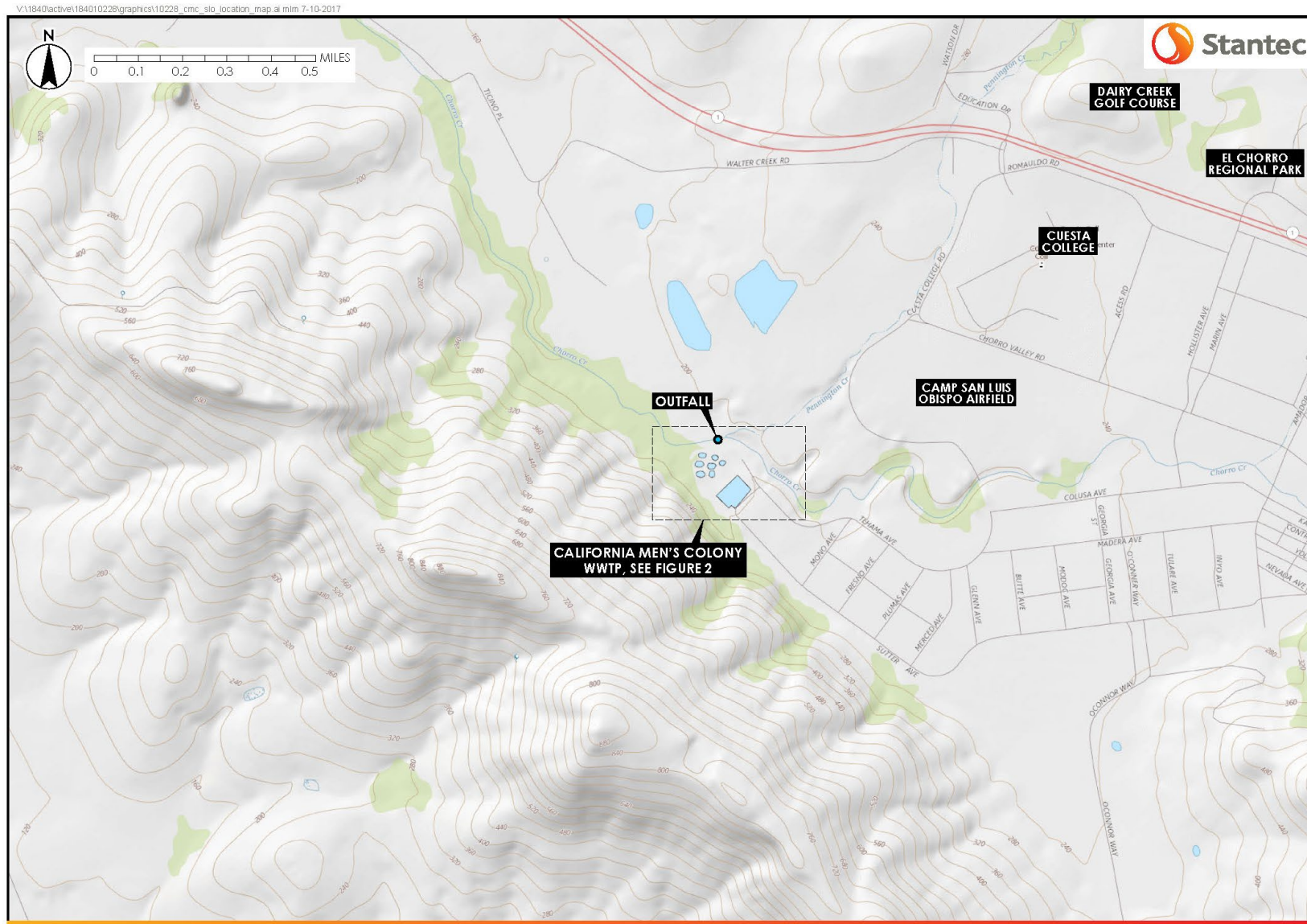
μ is the arithmetic mean of the observed values; and

n is the number of samples.

**Toxicity Reduction Evaluation (TRE)**

TRE is a study conducted in a step-wise process designed to identify the causative agents of effluent or ambient toxicity, isolate the sources of toxicity, evaluate the effectiveness of toxicity control options, and then confirm the reduction in toxicity. The first steps of the TRE consist of the collection of data relevant to the toxicity, including additional toxicity testing, and an evaluation of facility operations and maintenance practices, and best management practices. A Toxicity Identification Evaluation (TIE) may be required as part of the TRE, if appropriate. (A TIE is a set of procedures to identify the specific chemical(s) responsible for toxicity. These procedures are performed in three phases (characterization, identification, and confirmation) using aquatic organism toxicity tests.)

### ATTACHMENT B – MAP Map 1: Topographic Map





Map 2: Facility Layout







## ATTACHMENT D – STANDARD PROVISIONS

### I. STANDARD PROVISIONS – PERMIT COMPLIANCE

#### A. Duty to Comply

1. The Discharger must comply with all of the terms, requirements, and conditions of this Order. Any noncompliance constitutes a violation of the Clean Water Act (CWA) and the California Water Code and is grounds for enforcement action; permit termination, revocation and reissuance, or modification; denial of a permit renewal application; or a combination thereof. (40 CFR part 122.41(a); Wat. Code, section 13261, 13263, 13265, 13268, 13000, 13001, 13304, 13350, 13385.)
2. The Discharger shall comply with effluent standards or prohibitions established under section 307(a) of the CWA for toxic pollutants and with standards for sewage sludge use or disposal established under section 405(d) of the CWA within the time provided in the regulations that establish these standards or prohibitions, even if this Order has not yet been modified to incorporate the requirement. (40 CFR part 122.41(a)(1).)

#### B. Need to Halt or Reduce Activity Not a Defense

It shall not be a defense for a Discharger in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this Order. (40 CFR part 122.41(c).)

#### C. Duty to Mitigate

The Discharger shall take all reasonable steps to minimize or prevent any discharge in violation of this Order that has a reasonable likelihood of adversely affecting human health or the environment. (40 CFR part 122.41(d).)

#### D. Proper Operation and Maintenance

The Discharger shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the Discharger to achieve compliance with the conditions of this Order. Proper operation and maintenance also includes adequate laboratory controls and appropriate quality assurance procedures. This provision requires the operation of backup or auxiliary facilities or similar systems that are installed by a Discharger only when necessary to achieve compliance with the conditions of this Order. (40 CFR part 122.41(e).)

#### E. Property Rights

1. This Order does not convey any property rights of any sort or any exclusive privileges. (40 CFR part 122.41(g).)
2. The issuance of this Order does not authorize any injury to persons or property or invasion of other private rights, or any infringement of state or local law or regulations. (40 CFR part 122.5(c).)

#### F. Inspection and Entry

The Discharger shall allow the Central Coast Water Board, State Water Board, U.S. EPA, and/or their authorized representatives (including an authorized contractor acting as their representative), upon the presentation of credentials and other documents, as may be

required by law, to (33 U.S.C. part 1318(a)(4)(B); 40 CFR part 122.41(i); Wat. Code, section 13267, 13383):

1. Enter upon the Discharger's premises where a regulated facility or activity is located or conducted, or where records are kept under the conditions of this Order (33 U.S.C. part 1318(a)(4)(B)(i); 40 CFR part 122.41(i)(1); Wat. Code, section 13267, 13383);
2. Have access to and copy, at reasonable times, any records that must be kept under the conditions of this Order (33 U.S.C. part 1318(a)(4)(B)(ii); 40 CFR part 122.41(i)(2); Wat. Code, section 13267, 13383);
3. Inspect and photograph, at reasonable times, any facilities, equipment (including monitoring and control equipment), practices, or operations regulated or required under this Order (33 U.S.C. part 1318(a)(4)(B)(ii); 40 CFR part 122.41(i)(3); Wat. Code, section 13267, 13383); and
4. Sample or monitor, at reasonable times, for the purposes of assuring Order compliance or as otherwise authorized by the CWA or the Water Code, any substances or parameters at any location. (33 U.S.C. part 1318(a)(4)(B); 40 CFR part 122.41(i)(4); Wat. Code, section 13267, 13383.)

## **G. Bypass**

1. Definitions
  - a. "Bypass" means the intentional diversion of waste streams from any portion of a treatment facility. (40 CFR part 122.41(m)(1)(i).)
  - b. "Severe property damage" means substantial physical damage to property, damage to the treatment facilities, which causes them to become inoperable, or substantial and permanent loss of natural resources that can reasonably be expected to occur in the absence of a bypass. Severe property damage does not mean economic loss caused by delays in production. (40 CFR part 122.41(m)(1)(ii).)
2. Bypass not exceeding limitations. The Discharger may allow any bypass to occur which does not cause exceedances of effluent limitations, but only if it is for essential maintenance to assure efficient operation. These bypasses are not subject to the provisions listed in Standard Provisions – Permit Compliance I.G.3, I.G.4, and I.G.5 below. (40 CFR part 122.41(m)(2).)
3. Prohibition of bypass. Bypass is prohibited, and the Central Coast Water Board may take enforcement action against a Discharger for bypass, unless (40 CFR part 122.41(m)(4)(i)):
  - a. Bypass was unavoidable to prevent loss of life, personal injury, or severe property damage (40 CFR part 122.41(m)(4)(i)(A));
  - b. There were no feasible alternatives to the bypass, such as the use of auxiliary treatment facilities, retention of untreated wastes, or maintenance during normal periods of equipment downtime. This condition is not satisfied if adequate back-up equipment should have been installed in the exercise of reasonable engineering judgment to prevent a bypass that occurred during normal periods of equipment downtime or preventive maintenance (40 CFR part 122.41(m)(4)(i)(B)); and
  - c. The Discharger submitted notice to the Central Coast Water Boards required under Standard Provisions – Permit Compliance I.G.5 below. (40 CFR part 122.41(m)(4)(i)(C).)

4. The Central Coast Water Board may approve an anticipated bypass, after considering its adverse effects, if the Central Coast Water Board determines that it will meet the three conditions listed in Standard Provisions – Permit Compliance I.G.3 above. (40 CFR part 122.41(m)(4)(ii).)
5. Notice
  - a. Anticipated bypass. If the Discharger knows in advance of the need for a bypass, it shall submit prior notice, if possible at least 10 days before the date of the bypass. The notice shall be sent to the Central Coast Water Board. As of December 21, 2020, all notices must be submitted electronically to the initial recipient defined in Standard Provisions – Reporting V.J below. Notices shall comply with 40 CFR part 3, 40 CFR section 122.22, and 40 CFR part 127. (40 CFR part 122.41(m)(3)(i).)
  - b. Unanticipated bypass. The Discharger shall submit a notice of an unanticipated bypass as required in Standard Provisions - Reporting V.E below (24-hour notice). The notice shall be sent to the Central Coast Water Board. As of December 21, 2020, all notices must be submitted electronically to the initial recipient defined in Standard Provisions – Reporting V.J below. Notices shall comply with 40 CFR part 3, 40 CFR section 122.22, and 40 CFR part 127. (40 CFR part 122.41(m)(3)(ii).)

#### H. Upset

Upset means an exceptional incident in which there is unintentional and temporary noncompliance with technology based permit effluent limitations because of factors beyond the reasonable control of the Discharger. An upset does not include noncompliance to the extent caused by operational error, improperly designed treatment facilities, inadequate treatment facilities, lack of preventive maintenance, or careless or improper operation. (40 CFR part 122.41(n)(1).)

1. Effect of an upset. An upset constitutes an affirmative defense to an action brought for noncompliance with such technology based permit effluent limitations if the requirements of Standard Provisions – Permit Compliance I.H.2 below are met. No determination made during administrative review of claims that noncompliance was caused by upset, and before an action for noncompliance, is final administrative action subject to judicial review. (40 CFR part 122.41(n)(2).)
2. Conditions necessary for a demonstration of upset. A Discharger who wishes to establish the affirmative defense of upset shall demonstrate, through properly signed, contemporaneous operating logs or other relevant evidence that (40 CFR part 122.41(n)(3)):
  - a. An upset occurred and that the Discharger can identify the cause(s) of the upset (40 CFR part 122.41(n)(3)(i));
  - b. The permitted facility was, at the time, being properly operated (40 CFR part 122.41(n)(3)(ii));
  - c. The Discharger submitted notice of the upset as required in Standard Provisions – Reporting V.E.2.b below (24-hour notice) (40 CFR part 122.41(n)(3)(iii)); and
  - d. The Discharger complied with any remedial measures required under Standard Provisions – Permit Compliance I.C above. (40 CFR part 122.41(n)(3)(iv).)
3. Burden of proof. In any enforcement proceeding, the Discharger seeking to establish the occurrence of an upset has the burden of proof. (40 CFR part 122.41(n)(4).)

## II. STANDARD PROVISIONS – PERMIT ACTION

### A. General

This Order may be modified, revoked and reissued, or terminated for cause. The filing of a request by the Discharger for modification, revocation and reissuance, or termination, or a notification of planned changes or anticipated noncompliance does not stay any Order condition. (40 CFR part 122.41(f).)

### B. Duty to Reapply

If the Discharger wishes to continue an activity regulated by this Order after the expiration date of this Order, the Discharger must apply for and obtain a new permit. (40 CFR part 122.41(b).)

### C. Transfers

This Order is not transferable to any person except after notice to the Central Coast Water Board. The Central Coast Water Board may require modification or revocation and reissuance of the Order to change the name of the Discharger and incorporate such other requirements as may be necessary under the CWA and the Water Code. (40 CFR section 122.41(l)(3), 122.61.)

## III. STANDARD PROVISIONS – MONITORING

A. Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity. (40 CFR part 122.41(j)(1).)

B. Monitoring must be conducted according to test procedures approved under 40 CFR part 136 for the analyses of pollutants unless another method is required under 40 CFR chapter 1, subchapters N. Monitoring must be conducted according to sufficiently sensitive test methods approved under 40 CFR part 136 for the analysis of pollutants or pollutant parameters or as required under 40 CFR chapter 1, subchapter N. For the purposes of this paragraph, a method is sufficiently sensitive when:

1. The method minimum level (ML) is at or below the level of the most stringent effluent limitation established in the permit for the measured pollutant or pollutant parameter, and either the method ML is at or below the level of the most stringent applicable water quality criterion for the measured pollutant or pollutant parameter or the method ML is above the applicable water quality criterion but the amount of the pollutant or pollutant parameter in the facility's discharge is high enough that the method detects and quantifies the level of the pollutant or pollutant parameter in the discharge; or
2. The method has the lowest ML of the analytical methods approved under 40 CFR part 136 or required under 40 CFR chapter 1, subchapter N for the measured pollutant or pollutant parameter.

In the case of pollutants or pollutant parameters for which there are no approved methods under 40 CFR part 136 or otherwise required under 40 CFR chapter 1, subchapters N, monitoring must be conducted according to a test procedure specified in this Order for such pollutants or pollutant parameters. (40 CFR section 122.21(e)(3), 122.41(j)(4), 122.44(i)(1)(iv).)

## IV. STANDARD PROVISIONS – RECORDS

A. The Discharger shall retain records of all monitoring information, including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation, copies of all reports required by this Order, and records of all data used to complete the application for this Order, for a period of at least three (3) years from the date of

the sample, measurement, report or application. This period may be extended by request of the Central Coast Water Board Executive Officer at any time. (40 CFR part 122.41(j)(2).)

**B. Records of monitoring information shall include:**

1. The date, exact place, and time of sampling or measurements (40 CFR part 122.41(j)(3)(i));
2. The individual(s) who performed the sampling or measurements (40 CFR part 122.41(j)(3)(ii));
3. The date(s) analyses were performed (40 CFR part 122.41(j)(3)(iii));
4. The individual(s) who performed the analyses (40 CFR part 122.41(j)(3)(iv));
5. The analytical techniques or methods used (40 CFR part 122.41(j)(3)(v)); and
6. The results of such analyses. (40 CFR part 122.41(j)(3)(vi).)

**C. Claims of confidentiality for the following information will be denied (40 CFR part 122.7(b)):**

1. The name and address of any permit applicant or Discharger (40 CFR part 122.7(b)(1)); and
2. Permit applications and attachments, permits and effluent data. (40 CFR part 122.7(b)(2).)

**V. STANDARD PROVISIONS – REPORTING**

**A. Duty to Provide Information**

The Discharger shall furnish to the Central Coast Water Board, State Water Board, or U.S. EPA within a reasonable time, any information which the Central Coast Water Board, State Water Board, or U.S. EPA may request to determine whether cause exists for modifying, revoking and reissuing, or terminating this Order or to determine compliance with this Order. Upon request, the Discharger shall also furnish to the Central Coast Water Board, State Water Board, or U.S. EPA copies of records required to be kept by this Order. (40 CFR part 122.41(h); Wat. Code, section 13267, 13383.)

**B. Signatory and Certification Requirements**

1. All applications, reports, or information submitted to the Central Coast Water Board, State Water Board, and/or U.S. EPA shall be signed and certified in accordance with Standard Provisions – Reporting V.B.2, V.B.3, V.B.4, V.B.5, and V.B.6 below. (40 CFR part 122.41(k).)
2. All permit applications shall be signed by either a principal executive officer or ranking elected official. For purposes of this provision, a principal executive officer of a federal agency includes: (i) the chief executive officer of the agency, or (ii) a senior executive officer having responsibility for the overall operations of a principal geographic unit of the agency (e.g., Regional Administrators of U.S. EPA). (40 CFR part 122.22(a)(3).)
3. All reports required by this Order and other information requested by the Central Coast Water Board, State Water Board, or U.S. EPA shall be signed by a person described in Standard Provisions – Reporting V.B.2 above, or by a duly authorized representative of that person. A person is a duly authorized representative only if:
  - a. The authorization is made in writing by a person described in Standard Provisions – Reporting V.B.2 above (40 CFR part 122.22(b)(1));
  - b. The authorization specifies either an individual or a position having responsibility for the overall operation of the regulated facility or activity such as the position of plant

manager, operator of a well or a well field, superintendent, position of equivalent responsibility, or an individual or position having overall responsibility for environmental matters for the company. (A duly authorized representative may thus be either a named individual or any individual occupying a named position.) (40 CFR part 122.22(b)(2)); and

- c. The written authorization is submitted to the Central Coast Water Board and State Water Board. (40 CFR part 122.22(b)(3).)
4. If an authorization under Standard Provisions – Reporting V.B.3 above is no longer accurate because a different individual or position has responsibility for the overall operation of the facility, a new authorization satisfying the requirements of Standard Provisions – Reporting V.B.3 above must be submitted to the Central Coast Water Board and State Water Board prior to or together with any reports, information, or applications, to be signed by an authorized representative. (40 CFR part 122.22(c).)
5. Any person signing a document under Standard Provisions – Reporting V.B.2 or V.B.3 above shall make the following certification:

“I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.” (40 CFR part 122.22(d).)

6. Any person providing the electronic signature for documents described in Standard Provisions – V.B.1, V.B.2, or V.B.3 that are submitted electronically shall meet all relevant requirements of Standard Provisions – Reporting V.B, and shall ensure that all relevant requirements of 40 CFR part 3 (Cross-Media Electronic Reporting) and 40 CFR part 127 (NPDES Electronic Reporting Requirements) are met for that submission. (40 C.F.R part 122.22(e).)

### **C. Monitoring Reports**

1. Monitoring results shall be reported at the intervals specified in the Monitoring and Reporting Program (Attachment E) in this Order. (40 CFR part 122.41(l)(4).)
2. Monitoring results must be reported on a Discharge Monitoring Report (DMR) form or forms provided or specified by the Central Coast Water Board or State Water Board for reporting the results of monitoring, sludge use, or disposal practices. As of December 21, 2016, all reports and forms must be submitted electronically to the initial recipient defined in Standard Provisions – Reporting V.J and comply with 40 CFR part 3, 40 CFR section 122.22, and 40 CFR part 127. (40 CFR part 122.41(l)(4)(i).)
3. If the Discharger monitors any pollutant more frequently than required by this Order using test procedures approved under 40 CFR part 136, or another method required for an industry-specific waste stream under 40 CFR chapter 1, subchapters N or O, the results of such monitoring shall be included in the calculation and reporting of the data submitted in the DMR or sludge reporting form specified by the Central Coast Water Board. (40 CFR part 122.41(l)(4)(ii).)
4. Calculations for all limitations, which require averaging of measurements, shall utilize an arithmetic mean unless otherwise specified in this Order. (40 CFR part 122.41(l)(4)(iii).)

#### **D. Compliance Schedules**

Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule of this Order, shall be submitted no later than 14 days following each schedule date. (40 CFR part 122.41(l)(5).)

#### **E. Twenty-Four Hour Reporting**

1. The Discharger shall report any noncompliance which may endanger health or the environment. Any information shall be provided orally within 24 hours from the time the Discharger becomes aware of the circumstances. A report shall also be provided within five (5) days of the time the Discharger becomes aware of the circumstances. The report shall contain a description of the noncompliance and its cause; the period of noncompliance, including exact dates and times, and if the noncompliance has not been corrected, the anticipated time it is expected to continue; and steps taken or planned to reduce, eliminate, and prevent reoccurrence of the noncompliance.

For noncompliance events related to combined sewer overflows, sanitary sewer overflows, or bypass events, these reports must include the data described above (with the exception of time of discovery) as well as the type of event (i.e., combined sewer overflow, sanitary sewer overflow, or bypass event), type of overflow structure (e.g., manhole, combined sewer overflow outfall), discharge volume untreated by the treatment works treating domestic sewage, types of human health and environmental impacts of the event, and whether the noncompliance was related to wet weather.

As of December 21, 2020, all reports related to combined sewer overflows, sanitary sewer overflows, or bypass events must be submitted to the Central Coast Water Board and must be submitted electronically to the initial recipient defined in Standard Provisions – Reporting V.J. The reports shall comply with 40 CFR part 3, 40 CFR section 122.22, and 40 CFR part 127. The Central Coast Water Board may also require the Discharger to electronically submit reports not related to combined sewer overflows, sanitary sewer overflows, or bypass events under this section. (40 CFR part 122.41(l)(6)(i).)

2. The following shall be included as information that must be reported within 24 hours:
  - a. Any unanticipated bypass that exceeds any effluent limitation in this Order. (40 CFR part 122.41(l)(6)(ii)(A).)
  - a. Any upset that exceeds any effluent limitation in this Order. (40 CFR part 122.41(l)(6)(ii)(B).)
3. The Central Coast Water Board may waive the above required written report on a case-by-case basis if an oral report has been received within 24 hours. (40 CFR part 122.41(l)(6)(ii)(B).)

#### **F. Planned Changes**

The Discharger shall give notice to the Central Coast Water Board as soon as possible of any planned physical alterations or additions to the permitted facility. Notice is required under this provision only when (40 CFR part 122.41(l)(1)):

1. The alteration or addition to a permitted facility may meet one of the criteria for determining whether a facility is a new source in section 122.29(b) (40 CFR part 122.41(l)(1)(i)); or



2. The alteration or addition could significantly change the nature or increase the quantity of pollutants discharged. This notification applies to pollutants that are subject neither to effluent limitations in this Order. (40 CFR part 122.41(l)(1)(ii).)

**G. Anticipated Noncompliance**

The Discharger shall give advance notice to the Central Coast Water Board of any planned changes in the permitted facility or activity that may result in noncompliance with this Order's requirements. (40 CFR part 122.41(l)(2).)

**H. Other Noncompliance**

The Discharger shall report all instances of noncompliance not reported under Standard Provisions – Reporting V.C, V.D, and V.E above at the time monitoring reports are submitted. The reports shall contain the information listed in Standard Provision – Reporting V.E above. For noncompliance events related to combined sewer overflows, sanitary sewer overflows, or bypass events, these reports shall contain the information described in Standard Provision – Reporting V.E and the applicable required data in appendix A to 40 CFR part 127. The Central Coast Water Board may also require the Discharger to electronically submit reports not related to combined sewer overflows, sanitary sewer overflows, or bypass events under this section. (40 CFR part 122.41(l)(7).)

**I. Other Information**

When the Discharger becomes aware that it failed to submit any relevant facts in a permit application, or submitted incorrect information in a permit application or in any report to the Central Coast Water Board, State Water Board, or U.S. EPA, the Discharger shall promptly submit such facts or information. (40 CFR part 122.41(l)(8).)

**J. Initial Recipient for Electronic Reporting Data**

The owner, operator, or the duly authorized representative is required to electronically submit NPDES information specified in appendix A to 40 CFR part 127 to the initial recipient defined in 40 CFR section 127.2(b). U.S. EPA will identify and publish the list of initial recipients on its website and in the Federal Register, by state and by NPDES data group [see 40 CFR section 127.2(c)]. U.S. EPA will update and maintain this listing. (40 CFR part 122.41(l)(9).)

**VI. STANDARD PROVISIONS – ENFORCEMENT**

- A. The Central Coast Water Board is authorized to enforce the terms of this permit under several provisions of the Water Code, including, but not limited to, sections 13268, 13385, 13386, and 13387.

**VII. ADDITIONAL PROVISIONS – NOTIFICATION LEVELS**

**A. Publicly Owned Treatment Works (POTWs)**

All POTWs shall provide adequate notice to the Central Coast Water Board of the following (40 CFR part 122.42(b)):

1. Any new introduction of pollutants into the POTW from an indirect discharger that would be subject to sections 301 or 306 of the CWA if it were directly discharging those pollutants (40 CFR part 122.42(b)(1)); and
2. Any substantial change in the volume or character of pollutants being introduced into that POTW by a source introducing pollutants into the POTW at the time of adoption of the Order. (40 CFR part 122.42(b)(2).)

3. Adequate notice shall include information on the quality and quantity of effluent introduced into the POTW as well as any anticipated impact of the change on the quantity or quality of effluent to be discharged from the POTW. (40 CFR part 122.42(b)(3).)

## **VIII. CENTRAL COAST WATER BOARD STANDARD PROVISIONS**

### **A. Central Coast Standard Provision – Prohibitions**

1. Introduction of “incompatible wastes” to the treatment system is prohibited.
2. Discharge of high-level radiological waste and of radiological, chemical, and biological warfare agents is prohibited.
3. Discharge of “toxic pollutants” in violation of effluent standards and prohibitions established under section 307(a) of the Clean Water Act (CWA) is prohibited.
4. Discharge of sludge, sludge digester or thickener supernatant, and sludge drying bed leachate to drainageways, surface waters, or the ocean is prohibited.
5. Introduction of pollutants into the collection, treatment, or disposal system by and “indirect discharger” that:
  - a. Inhibit or disrupt the treatment process, system operation, or the eventual use or disposal of sludge; or,
  - b. Flow through the system to the receiving water untreated; and,
  - c. Cause or “significantly contribute” to a violation of any requirement of this Order, is prohibited.
6. Introduction of “pollutant free” wastewater to the collection, treatment, and disposal system in amounts that threaten compliance with this order is prohibited.

### **B. Central Coast Standard Provision – Provisions**

1. Collection, treatment, and discharge of waste shall not create a nuisance or pollution, as defined by California Water Code (CWC) 13050.
2. All facilities used for transport or treatment of wastes shall be adequately protected from inundation and washout as the result of a 100-year frequency flood.
3. Operation of collection, treatment, and disposal systems shall be in a manner that precludes public contact with wastewater.
4. Collected screenings, sludges, and other solids removed from liquid wastes shall be disposed in a manner approved by the Executive Officer.
5. Publicly owned wastewater treatment plans shall be supervised and operated by persons possessing certificates of appropriate grade pursuant to Title 23 of the California Administrative Code.
6. After notice and opportunity for a hearing, this order may be terminated for cause, including, but not limited to:

- a. Violation of any term or condition contained in this order;
  - b. Obtaining this order by misrepresentation, or by failure to disclose fully all relevant facts;
  - c. A change in any condition or endangerment to human health or environment that requires a temporary or permanent reduction or elimination of the authorized discharge; and,
  - d. A substantial change in character, location, or volume of the discharge.
7. Provisions of this permit are severable. If any provision of the permit is found invalid, the remainder of the permit shall not be affected.
8. After notice and opportunity for hearing, this order may be modified or revoked and reissued for cause, including:
  - a. Promulgation of a new or revised effluent standard or limitation;
  - b. A material change in character, location, or volume of the discharge;
  - c. Access to new information that affects the germs of the permit, including applicable schedules;
  - d. Correction of technical mistakes or mistaken interpretations of law; and,
  - e. Other causes set forth under Sub-part D of 40 CFR part 122.
9. Safeguards shall be provided to ensure maximal compliance with all terms and conditions of this permit. Safeguards shall include preventative and contingency plans and may also include alternative power sources, stand-by generators, retention capacity, operative procedures, or other precautions. Preventative and contingency plans for controlling and minimizing the effect of accidental discharges shall:
  - a. Identify possible situations that could cause "upset," "overflow," or "bypass," or other noncompliance. (Loading and storage areas, power outage, waste treatment unit outage, and failure of process equipment, tanks and pipes should be considered).
  - b. Evaluate the effectiveness of present facilities and procedures and describe procedures and steps to minimize or correct any adverse environmental impact resulting from noncompliance with the permit.
10. Physical Facilities shall be designed and constructed according to accepted engineering practice and shall be capable of full compliance with this order when properly operated and maintained. Proper operation and maintenance shall be described in an Operation and Maintenance Manual. Facilities shall be accessible during the wet-weather season.
11. The discharger shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) that are installed or used by the discharger to achieve compliance with the conditions of this order. Electrical and mechanical equipment shall be maintained in accordance with appropriate practices and standards, such as NFPA 70B, Recommended Practice for Electrical Equipment Maintenance; NFPA 70E, Standard for Electrical Safety in the Workplace; ANSI/NETA MTS Standard for Maintenance: Testing Specifications for Electrical Power Equipment and Systems, or procedures established by insurance companies or industry resources.

12. If the discharger's facilities are equipped with SCADA or other systems that implement wireless, remote operation, the discharger should implement appropriate safeguards against unauthorized access to the wireless systems. Standards such as NIST SP 800-53, *Recommended Security Controls for Federal Information Systems*, can provide guidance.
13. Production and use of reclaimed water is subject to the approval of the Central Coast Board. Production and use of reclaimed water shall be in conformance with recycling criteria established in chapter 3, Title 22, of the California Administrative Code and chapter 7, division 7, of the CWC. An engineering report pursuant to section 60323, Title 22, of the California Administrative Code is required and a waiver or water recycling requirements from the Central Coast Board is required before reclaimed water is supplied for any use, or to any user, not specifically identified and approved either in this Order or another order issued by this Board.

**C. Central Coast Standard Provisions – General Monitoring Requirements**

1. If results of monitoring a pollutant appear to violate effluent limitations based on a weekly, monthly, 30-day, or six-month period, but compliance or non-compliance cannot be validated because sampling is too infrequent, the frequency of sampling shall be increased to validate the test within the next monitoring period. The increased frequency shall be maintained until the Executive Officer agrees the original monitoring frequency may be resumed.

For example, if copper is monitored annually and results exceed the six-month median numerical effluent limitation in the permit, monitoring of copper must be increased to a frequency of at least once every two months (Central Coast Standard Provisions – Definitions I.G.13.). If suspended solids are monitored weekly and results exceed the weekly average numerical limit in the permit, monitoring of suspended solids must be increased to at least four (4) samples every week (Central Coast Standard Provisions – Definitions I.G.14.).

2. Water quality analyses performed in order to monitor compliance with this permit shall be by a laboratory certified by the State Water Board Division of Drinking Water (DDW) for the constituent(s) being analyzed. Bioassay(s) performed in order to monitor compliance with this permit shall be in accord with guidelines approved by the State Water Resources Control Board (State Water Board) and the California Department of Fish and Wildlife (DFW). If the laboratory used or proposed for use by the discharger is not certified by DDW or, where appropriate DFW, due to restrictions in the State's laboratory certification program, the discharger shall be considered in compliance with this provision provided:
  - a. Data results remain consistent with results of samples analyzed by the Central Coast Water Board;
  - b. A quality assurance program is used at the laboratory, including a manual containing steps followed in this program that is available for inspections by the staff of the Central Coast Water Board; and,
  - c. Certification is pursued in good faith and obtained as soon as possible after the program is reinstated.
3. Samples and measurements taken for the purpose of monitoring shall be representative of the monitored activity. Samples shall be taken during periods of peak loading

conditions. Influent samples shall be samples collected from the combined flows of all incoming wastes, excluding recycled wastes. Effluent samples shall be samples collected downstream of the last treatment unit and tributary flow and upstream of any mixing with receiving waters.

4. All monitoring instruments and devices used by the discharger to fulfill the prescribed monitoring program shall be properly maintained and calibrated as necessary to ensure their continued accuracy.

**D. Central Coast Standard Provisions – General Reporting Requirements**

1. Reports of marine monitoring surveys conducted to meet receiving water monitoring requirements of the Monitoring and Reporting Program shall include at least the following information:
  - a. A description of climatic and receiving water characteristics at the time of sampling (weather observations, floating debris, discoloration, wind speed and direction, swell or wave action, time of sampling, tide height, etc.).
  - b. A description of sampling stations, including differences unique to each station (e.g., station location, grain size, rocks, shell litter, calcareous worm tubes, evident life, etc.).
  - c. A description of the sampling procedures and preservation sequence used in the survey.
  - d. A description of the exact method used for laboratory analysis. In general, analysis shall be conducted according to Central Coast Standard Provisions – C.1 above, and Federal Standard Provision – Monitoring III.B. However, variations in procedure are acceptable to accommodate the special requirements of sediment analysis. All such variations must be reported with the test results.
  - e. A brief discussion of the results of the survey. The discussion shall compare data from the control station with data from the outfall stations. All tabulations and computations shall be explained.
2. Reports of compliance or noncompliance with, or any progress reports on, interim and final requirements contained in any compliance schedule shall be submitted within 14 days following each scheduled date unless otherwise specified within the permit. If reporting noncompliance, the report shall include a description of the reason, a description and schedule of tasks necessary to achieve compliance, and an estimated date for achieving full compliance. A second report shall be submitted within 14 days of full compliance.
3. The “Discharger” shall file a report of waste discharge or secure a waiver from the Executive Officer at least 180 days before making any material change or proposed change in the character, location, or plume of the discharge.
4. Within 120 days after the discharger discovers, or is notified by the Central Coast Water Board, that monthly average daily flow will or may reach design capacity of waste treatment and/or disposal facilities within four (4) years, the discharger shall file a written report with the Central Coast Water Board. The report shall include:
  - a. the best estimate of when the monthly average daily dry weather flow rate will equal or exceed design capacity; and,

- b.** a schedule for studies, design, and other steps needed to provide additional capacity for waste treatment and/or disposal facilities before the waste flow rate equals the capacity of present units.

In addition to complying with Federal Standard Provision – Reporting V.B., the required technical report shall be prepared with public participation and reviewed, approved and jointly submitted by all planning and building departments having jurisdiction in the area served by the waste collection, treatment, or disposal facilities.

- 5.** All “Dischargers” shall submit reports electronically to the:

California Regional Water Quality Control Board  
Central Coast Region  
centralcoast@waterboards.ca.gov  
895 Aerovista Place, Suite 101  
San Luis Obispo, CA 93401-7906

In addition, "Dischargers" with designated major discharges shall submit a copy of each document to:

Regional Administrator  
U.S. EPA, Region 9  
Attention: CWA Standards and Permits Office (WTR-5)  
75 Hawthorne Street  
San Francisco, California 94105

- 6.** Transfer of control or ownership of a waste discharge facility must be preceded by a notice to the Central Coast Water Board at least 30 days in advance of the proposed transfer date. The notice must include a written agreement between the existing “Discharger” and proposed “Discharger” containing specific date for transfer of responsibility, coverage, and liability between them. Whether a permit may be transferred without modification or revocation and reissuance is at the discretion of the Board. If permit modification or revocation and reissuance is necessary, transfer may be delayed 180 days after the Central Coast Water Board's receipt of a complete permit application. Please also see Federal Standard Provision – Permit Action II.C.
- 7.** Except for data determined to be confidential under CWA part308 (excludes effluent data and permit applications), all reports prepared in accordance with this permit shall be available for public inspection at the office of the Central Coast Water Board or Regional Administrator of U.S. EPA. Please also see Federal Standard Provision – Records IV.C.
- 8.** By January 30 of each year, the discharger shall submit an annual report to the Central Coast Water Board. The report shall contain the following:
  - a.** Both tabular and graphical summaries of the monitoring data obtained during the previous year.
  - b.** A discussion of the previous year’s compliance record and corrective actions taken, or which may be needed, to bring the discharger into full compliance.
  - c.** An evaluation of wastewater flows with projected flow rate increases over time and the estimated date when flows will reach facility capacity.
  - d.** A discussion of operator certification and a list of current operating personnel and their grades of certification.

- e. The date of the facility's Operation and Maintenance Manual (including contingency plans as described in Provision B.9), the date the manual was last reviewed, and whether the manual is complete and valid for the current facility.
- f. A discussion of the laboratories used by the discharger to monitor compliance with effluent limits and a summary of performance relative to Section C, General Monitoring Requirements.
- g. If the facility treats industrial or domestic wastewater and there is no provision for periodic sludge monitoring in the Monitoring and Reporting Program, the report shall include a summary of sludge quantities, analyses of its chemical and moisture content, and its ultimate destination.
- h. If appropriate, the report shall also evaluate the effectiveness of the local source control or pretreatment program using the State Water Resources Control Board's "Guidelines for Determining the Effectiveness of Local Pretreatment Program."

**E. Central Coast Standard Provisions – General Pretreatment Provisions**

- 1. Discharge of pollutants by "indirect dischargers" in specific industrial sub-categories (appendix C, 40 CFR part 403), where categorical pretreatment standards have been established, or are to be established, (according to 40 CFR chapter 1, subchapter N), shall comply with the appropriate pretreatment standards:
  - a. By the date specified therein;
  - b. Within three (3) years of the effective date specified therein, but in no case later than July 1, 1984; or,
  - c. If a new indirect discharger, upon commencement of discharge.

**F. Central Coast Standard Provision – Enforcement**

- 1. Any person failing to file a report of waste discharge or other report as required by this permit shall be subject to a civil penalty not to exceed \$5,000 per day.
- 2. Upon reduction, loss, or failure of the treatment facility, the "Discharger" shall, to the extent necessary to maintain compliance with this permit, control production or all discharges, or both, until the facility is restored or an alternative method of treatment is provided.

**G. Central Coast Standard Provisions – Definitions (Not otherwise included in Attachment A to this Order)**

- 1. A "composite sample" is a combination of no fewer than eight (8) individual samples obtained at equal time intervals (usually hourly) over the specified sampling (composite) period. The volume of each individual sample is proportional to the flow rate at the time of sampling. The period shall be specified in the Monitoring and Reporting Program ordered by the Executive Officer.
- 2. "Daily Maximum" limit means the maximum acceptable concentration or mass emission rate of a pollutant measured during a calendar day or during any 24-hour period reasonably representative of the calendar day for purposes of sampling. It is normally compared with results based on "composite samples" except for ammonia, total chlorine, phenolic compounds, and toxicity concentration. For all exceptions, comparisons will be made with results from a "grab sample".

3. "Discharger", as used herein, means, as appropriate: (1) the Discharger, (2) the local sewerage entity (when the collection system is not owned and operated by the Discharger), or (3) "indirect discharger" (where "Discharger" appears in the same paragraph as "indirect discharger", it refers to the discharger.)
4. "Duly Authorized Representative" is one where:
  - a. the authorization is made in writing by a person described in the signatory paragraph of Federal Standard Provision V.B.;
  - b. the authorization specifies either an individual or the occupant of a position having either responsibility for the overall operation of the regulated facility, such as the plant manager, or overall responsibility for environmental matters of the company; and,
  - c. the written authorization was submitted to the Central Coast Water Board.
5. A "grab sample" is defined as any individual sample collected in less than 15 minutes. "Grab samples" shall be collected during peak loading conditions, which may or may not be during hydraulic peaks. It is used primarily in determining compliance with the daily maximum limits identified in Central Coast Standard Provision – Provision G.2. and instantaneous maximum limits.
6. "Hazardous substance" means any substance designated under 40 CFR part 116 pursuant to Section 311 of the Clean Water Act.
7. "Incompatible wastes" are:
  - a. Wastes which create a fire or explosion hazard in the treatment works;
  - b. Wastes which will cause corrosive structural damage to treatment works, but in no case wastes with a pH lower than 5.0 unless the works is specifically designed to accommodate such wastes;
  - c. Solid or viscous wastes in amounts which cause obstruction to flow in sewers, or which cause other interference with proper operation of treatment works;
  - d. Any waste, including oxygen demanding pollutants (BOD, etc), released in such volume or strength as to cause inhibition or disruption in the treatment works and subsequent treatment process upset and loss of treatment efficiency; and,
  - e. Heat in amounts that inhibit or disrupt biological activity in the treatment works or that raise influent temperatures above 40°C (104°F) unless the treatment works is designed to accommodate such heat.
8. "Indirect Discharger" means a non-domestic discharger introducing pollutants into a publicly owned treatment and disposal system.
9. "Log Mean" is the geometric mean. Used for determining compliance of fecal or total coliform populations, it is calculated with the following equation:

$$\text{Log Mean} = (C_1 \times C_2 \times \dots \times C_n)^{1/n},$$



in which "n" is the number of days samples were analyzed during the period and any "C" is the concentration of bacteria (MPN/100 mL) found on each day of sampling. "n" should be five or more.

10. "Mass emission rate" is a daily rate defined by the following equations:

mass emission rate (lbs/day) = 8.34 x Q x C; and,

mass emission rate (kg/day) = 3.79 x Q x C,

where "C" (in mg/L) is the measured daily constituent concentration or the average of measured daily constituent concentrations and "Q" (in MGD) is the measured daily flowrate or the average of measured daily flow rates over the period of interest.

11. The "Maximum Allowable Mass Emission Rate," whether for a month, week, day, or six-month period, is a daily rate determined with the formulas in paragraph G.10, above, using the effluent concentration limit specified in the permit for the period and the average of measured daily flows (up to the allowable flow) over the period.
12. "Maximum Allowable Six-Month Median Mass Emission Rate" is a daily rate determined with the formulas in Central Coast Standard Provision – Provision G.10, above, using the "six-month Median" effluent limit specified in the permit, and the average of measured daily flows (up to the allowable flow) over a 180-day period.
13. "Median" is the value below which half the samples (ranked progressively by increasing value) fall. It may be considered the middle value, or the average of two middle values.
14. "Monthly Average" (or "Weekly Average", as the case may be) is the arithmetic mean of daily concentrations or of daily mass emission rates over the specified 30-day (or 7-day) period.

$$\text{Average} = (X1 + X2 + \dots + Xn) / n$$

in which "n" is the number of days samples were analyzed during the period and "X" is either the constituent concentration (mg/l) or mass emission rate (kg/day or lbs/day) for each sampled day. "n" should be four or greater.

15. "Municipality" means a city, town, borough, county, district, association, or other public body created by or under State law and having jurisdiction over disposal of sewage, industrial waste, or other waste.
16. "Overflow" means the intentional or unintentional diversion of flow from the collection and transport systems, including pumping facilities.
17. "Pollutant-free wastewater" means inflow and infiltration, stormwaters, and cooling waters and condensates which are essentially free of pollutants.
18. "Primary Industry Category" means any industry category listed in 40 CFR part 122, Appendix A.
19. "Removal Efficiency" is the ratio of pollutants removed by the treatment unit to pollutants entering the treatment unit. Removal efficiencies of a treatment plant shall be determined using "Monthly averages" of pollutant concentrations (C, in mg/l) of influent and effluent samples collected about the same time and the following equation (or its equivalent):

$$C_{\text{Effluent}} \text{ Removal Efficiency (\%)} = 100 \times (1 - C_{\text{effluent}} / C_{\text{influent}})$$

- 20.** "Severe property damage" means substantial physical damage to property, damage to treatment facilities which causes them to become inoperable, or substantial and permanent loss to natural resources which can reasonably be expected to occur in the absence of a "bypass". It does not mean economic loss caused by delays in production.
- 21.** "Sludge" means the solids, residues, and precipitates separated from, or created in, wastewater by the unit processes of a treatment system.
- 22.** To "significantly contribute" to a permit violation means an "indirect discharger" must:

  - a.** Discharge a daily pollutant loading in excess of that allowed by contract with the "Discharger" or by Federal, State, or Local law;
  - b.** Discharge wastewater which substantially differs in nature or constituents from its average discharge;
  - c.** Discharge pollutants, either alone or in conjunction with discharges from other sources, which results in a permit violation or prevents sewage sludge use or disposal; or
  - d.** Discharge pollutants, either alone or in conjunction with pollutants from other sources that increase the magnitude or duration of permit violations.
- 23.** "Toxic Pollutant" means any pollutant listed as toxic under Section 307 (a) (1) of the Clean Water Act or under 40 CFR part 122, Appendix D. Violation of maximum daily discharge limitations are subject to 24-hour reporting (Federal Standard Provisions V.E.).
- 24.** "Zone of Initial Dilution" means the region surrounding or adjacent to the end of an outfall pipe or diffuser ports whose boundaries are defined through calculation of a plume model verified by the State Water Board.

**ATTACHMENT E – MONITORING AND REPORTING PROGRAM**

**CONTENTS**

I. General Monitoring Provisions ..... E-2  
 II. Monitoring Locations ..... E-3  
 III. Influent Monitoring Requirements ..... E-4  
     A. Monitoring Location INF-001 ..... E-4  
 IV. Effluent Monitoring Requirements ..... E-4  
     A. Monitoring Location M-001 ..... E-4  
 V. Whole Effluent Toxicity Testing Requirements ..... E-7  
 VI. Land Discharge Monitoring Requirements – Not Applicable..... E-10  
 VII. Recycling Monitoring Requirements – Monitoring Location RCL-001 ..... E-10  
 VIII. Receiving Water Monitoring Requirements..... E-12  
     A. Receiving Water Monitoring - Monitoring Locations R-001, R-002, R-003 and R-004 ..... E-12  
 IX. Other Monitoring Requirements ..... E-14  
     A. Biosolids Monitoring, Reporting, and Notification – BIO-001 ..... E-14  
     B. Pretreatment Monitoring – Not Applicable ..... E-16  
 X. Reporting Requirements ..... E-16  
     A. General Monitoring and Reporting Requirements ..... E-16  
     B. Self-Monitoring Reports (SMRs)..... E-16

**TABLES**

Table E-1. Monitoring Station Locations ..... E-3  
 Table E-2. Influent Monitoring ..... E-4  
 Table E-3. Effluent Monitoring ..... E-5  
 Table E-4 Short-Term Methods for Estimating Chronic Toxicity – Fresh Water ..... E-8  
 Table E-5 Receiving Water Monitoring Requirements – R-001 and R-004 ..... E-12  
 Table E-6 Receiving Water Monitoring Requirements - R-002 and R-003 ..... E-13  
 Table E-7 Receiving Water Monitoring Requirements- R-005 ..... E-14  
 Table E.8 Groundwater Monitoring Requirements..... E-14  
 Table E-9. Biosolids Monitoring Requirements..... E-14  
 Table E-10. Reporting Schedule..... E-16

## ATTACHMENT E – MONITORING AND REPORTING PROGRAM (MRP)

Section 308 of the federal Clean Water Act (CWA) and sections 122.41(h), (j)-(l), 122.44(i), and 122.48 of title 40 CFR require that all NPDES permits specify monitoring and reporting requirements. Water Code sections 13267 and 13383 also authorize the Central Coast Region Water Board to establish monitoring, inspection, entry, reporting, and recordkeeping requirements. This MRP establishes monitoring, reporting, and recordkeeping requirements that implement the federal and California laws and/or regulations.

### I. GENERAL MONITORING PROVISIONS

- A. Laboratory Certification. Laboratories analyzing monitoring samples shall be certified by the State Water Board Division of Drinking Water Environmental Laboratory Accreditation Program, in accordance with the provision of Water Code section 13176 and must include quality assurance/quality control data with their reports.
- B. Samples and measurements taken as required herein shall be representative of the volume and nature of the monitored discharge. All samples shall be taken at the monitoring locations specified below and, unless otherwise specified, before the monitored flow joins or is diluted by any other waste stream, body of water, or substance. Monitoring locations shall not be changed without notification to and approval of the Central Coast Water Board.
- C. Appropriate flow measurement devices and methods consistent with accepted scientific practices shall be selected and used to ensure the accuracy and reliability of measurements of the volume of monitored discharges. The devices shall be installed, calibrated, and maintained to ensure that the accuracy of the measurements is consistent with the accepted capability of that type of device. Devices selected shall be capable of measuring flows with a maximum deviation of less than  $\pm 10$  percent from true discharge rates throughout the range of expected discharge volumes. Guidance in selection, installation, calibration, and operation of acceptable flow measurement devices can be obtained from the following references.
  - 1. *A Guide to Methods and Standards for the Measurement of Water Flow*, U.S. Department of Commerce, National Bureau of Standards, NBS Special Publication 421, May 1975, 96 pp. (Available from the U.S. Government Printing Office, Washington, D.C. 20402. Order by SD Catalog No. C13.10:421.)
  - 2. *Water Measurement Manual*, U.S. Department of Interior, Bureau of Reclamation, Second Edition, Revised Reprint, 1974, 327 pp. (Available from the U.S. Government Printing Office, Washington D.C. 20402. Order by Catalog No. 172.19/2:W29/2, Stock No. S/N 24003-0027.)
  - 3. *Flow Measurement in Open Channels and Closed Conduits*, U.S. Department of Commerce, National Bureau of Standards, NBS Special Publication 484, October 1977, 982 pp. (Available in paper copy or microfiche from National Technical Information Services (NTIS) Springfield, VA 22050. Order by NTIS No. PB-273 535/5ST.)
  - 4. *NPDES Compliance Sampling Manual*, U.S. Environmental Protection Agency, Office of Water Enforcement, Publication MCD-51, 1977, 140 pp. (Available from the General Services Administration (8FFS), Centralized Mailing Lists Services, Building 41, Denver Federal Center, CO 80225.)
- D. All monitoring instruments and devices used by the Discharger to fulfill the prescribed monitoring program shall be properly maintained and calibrated as necessary to ensure their continued accuracy. All flow measurement devices shall be calibrated at least once per year to ensure continued accuracy of the devices.

- E. Monitoring results, including noncompliance, shall be reported at intervals and in a manner specified in this MRP.
- F. Unless otherwise specified by this MRP, all monitoring shall be conducted according to test procedures established at 40 CFR part 136, *Guidelines Establishing Test Procedures for Analysis of Pollutants*. All analyses shall be conducted using the lowest practical quantitation limit achievable using the specified methodology. Where effluent limitations are set below the lowest achievable quantitation limits, pollutants not detected at the lowest practical quantitation limits will be considered in compliance with effluent limitations. Analysis for toxic pollutants listed by the California Toxics Rule shall also adhere to guidance and requirements contained in the *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California (2005) (SIP)*.
- G. The Discharger shall ensure that the results of the Discharge Monitoring Report-Quality Assurance (DMR-QA) Study or the most recent Water Pollution Performance Evaluation Study are submitted annually to the State Water Board at the following address:

State Water Resources Control Board  
 Quality Assurance Program Officer  
 Office of Information Management and Analysis  
 1001 I Street, Sacramento, CA 95814

**II. MONITORING LOCATIONS**

The Discharger shall establish the following monitoring locations to demonstrate compliance with the effluent limitations, discharge specifications, and other requirements in this Order:

**Table E-1. Monitoring Station Locations**

Discharge Point Name	Monitoring Location Name	Monitoring Location Description
---	M-INF	Influent wastewater at the plant headworks, prior to discharge to the oxidation ditches, and following all significant inputs to the collection system of untreated wastewater inflow and infiltration.
001	M-001	Tertiary treated wastewater at a point located to the unnamed drainage way and prior to contact with receiving water flow. Latitude: 35.325° N Longitude: 120.7525° W
---	RCL-001	A location representative of disinfected recycled water prior to distribution.
---	R-001	At the discharge from Chorro Reservoir, immediately below the dam. <sup>[1]</sup>
---	R-002	Upstream and within 100 feet of Discharge Point No. 001 where stream flow is representative of background conditions in Chorro Creek.
---	R-003	Downstream and within 100 feet of Discharge Point No. 001 where stream flow is representative of conditions within Chorro Creek after contact and mixing with the discharge.
---	R-004	Approximately 0.6 miles downstream of the point of discharge, at the site of a washed out concrete diversion dam.
---	R-005	Twin-Bridges at the bridge crossing with Chorro Creek and South Bay Boulevard.
---	GW-001	Upgradient of the WWTP, as approved by the Central Coast Water Board.
---	GW-002	Downgradient of the WWTP, as approved by the Central Coast Water Board.

Discharge Point Name	Monitoring Location Name	Monitoring Location Description
---	BIO-001	A location where a representative sample of biosolids may be obtained, after handling, and prior to disposal.

<sup>[1]</sup> If conditions are determined to be unsafe for sample collection, the Discharger may monitor directly from Chorro Reservoir at a location that provides a representative sample of upstream water quality. The Discharger shall provide a description of unsafe conditions and alternative monitoring location.

The north latitude and west longitude information in Table E-1 are approximate for administrative purposes.

### III. INFLUENT MONITORING REQUIREMENTS

#### A. Monitoring Location INF-001

- The Discharger shall monitor influent to the Facility at Monitoring Location M-INF as follows:

**Table E-2. Influent Monitoring**

Parameter	Units	Sample Type	Minimum Sampling Frequency
Flow	MGD	Continuous	Continuous <sup>[1][3]</sup>
Biochemical Oxygen Demand 5-day @ 20°C (BOD <sub>5</sub> ) <sup>[2]</sup>	mg/L	24-hr Composite	2/Month
Total Suspended Solids (TSS) <sup>[2]</sup>	mg/L	24-hr Composite	2/Month
Total Dissolved Solids (TDS)	mg/L	Grab	1/Year
Calcium (Ca)	mg/L	Grab	1/Year
Magnesium (Mg)	mg/L	Grab	1/Year
Sodium (Na)	mg/L	Grab	1/Year
Potassium (K)	mg/L	Grab	1/Year
Chloride (Cl)	mg/L	Grab	1/Year
Sulfate (SO <sub>4</sub> )	mg/L	Grab	1/Year
Bicarbonate (HCO <sub>3</sub> )	mg/L	Grab	1/Year
Carbonate (CO <sub>3</sub> )	mg/L	Grab	1/Year
Nitrate (NO <sub>3</sub> as N)	mg/L	Grab	1/Year
Boron (B)	mg/L	Grab	1/Year
Fluoride (F)	mg/L	Grab	1/Year

<sup>[1]</sup> The Discharger shall report the average and maximum daily flow.

<sup>[2]</sup> Collection of BOD<sub>5</sub> and TSS influent samples shall occur on days that effluent samples are collected.

<sup>[3]</sup> The State Water Board Recycled Water Policy section 3.2.1 requires wastewater and recycled water dischargers to annually report monthly volumes of influent. Annual reports are due by April 30 of each year and must include data for the previous calendar year, beginning with calendar year 2019. For calendar year 2019, data is required to be reported for months January through December 2019. Dischargers are required to submit the volumetric data to GeoTracker at <http://geotracker.waterboards.ca.gov>.

### IV. EFFLUENT MONITORING REQUIREMENTS

#### A. Monitoring Location M-001

- The Discharger shall monitor effluent discharged to Monitoring Location M-001 (Discharge Point No. 001) as follows. If more than one analytical test method is listed for a given parameter, the Discharger must select from the listed methods and corresponding Minimum Level.

**Table E-3. Effluent Monitoring**

Parameter	Units	Sample Type	Minimum Sampling Frequency
pH <sup>[1]</sup>	standard units	Grab	1/Day
Settleable Solids	mL/L	Grab	1/Day
Turbidity	NTU	Grab	1/Day
Chlorine, Total Residual <sup>[2]</sup>	mg/L	Grab	1/Day
Chlorine Used	lbs/day	Grab	1/Day
Total Coliform Bacteria	MPN/100 mL	Grab	5/Week <sup>[3]</sup>
Dissolved Oxygen	mg/L	Grab	5/Week
BOD <sub>5</sub>	mg/L	24-hr Composite	1/Week
	% removal	Calculated	1/Week
TSS	mg/L	24-hr Composite	1/Week
	% removal	Calculated	1/Week
Nitrate (as N)	mg/L	Grab	1/Week
Nitrite (as N)	mg/L	Grab	1/Week
Temperature <sup>[1]</sup>	°F	Instantaneous	1/Week
Ammonia, Total (as N)	mg/L	Grab	1/Week
Total Kjeldahl Nitrogen (as N)	mg/L	Grab	1/Week
Total Nitrogen (as N)	mg/L	Calculated <sup>[4]</sup>	1/Week
Chloride	mg/L	Grab	1/Week
Dissolved Orthophosphate	mg/L	Grab	1/Month
Hardness, as CaCO <sub>3</sub>	mg/L	Grab	1/Month
Oil and Grease	mg/L	Grab	1/Month
Sodium	mg/L	Grab	1/Month
TDS	mg/L	Grab	1/Month
Total Phosphate (as P)	mg/L	Grab	1/Month
Bis(2-ethylhexyl) Phthalate	µg/L	Grab	1/Quarter <sup>[5]</sup>
Chlorodibromomethane	µg/L	Grab	1/Month
Copper, Total Recoverable	µg/L	Grab	1/Month
Dichlorobromomethane	µg/L	Grab	1/Month
Phthalate Esters	µg/L	Grab	1/Quarter
Boron	mg/L	Grab	1/Quarter
Sulfate	mg/L	Grab	1/Quarter
Cobalt	mg/L	Grab	1/Year
Iron	mg/L	Grab	1/Year
Lithium	mg/L	Grab	1/Year
Manganese	mg/L	Grab	1/Year
Methylene Blue Activated Substances	mg/L	Grab	1/Year
Molybdenum	mg/L	Grab	1/Year
Vanadium	mg/L	Grab	1/Year
Calcium (Ca)	mg/L	Grab	1/Year
Magnesium (Mg)	mg/L	Grab	1/Year
Potassium (K)	mg/L	Grab	1/Year

Parameter	Units	Sample Type	Minimum Sampling Frequency
Bicarbonate (HCO <sub>3</sub> )	mg/L	Grab	1/Year
Carbonate (CO <sub>3</sub> )	mg/L	Grab	1/Year
Fluoride (F)	mg/L	Grab	1/Year
Acute Toxicity <sup>[6]</sup>	% survival	Grab	1/Quarter
Chronic Toxicity <sup>[6]</sup>	TUc	Grab	1/Year
CTR Pollutants <sup>[7] [8]</sup>	µg/L	Grab	1/Year
Title 22 Pollutants <sup>[9] [10]</sup>	µg/L	Grab	1/Year

- [1] Temperature and pH are to be measured at the same time the total ammonia sample is collected. Results shall be used to calculate and report un-ionized ammonia concentrations.
- [2] Monitoring required only on days when sodium hypochlorite or other chlorinating agents are used. Compliance determinations for total residual chlorine (TRC) shall be based on 99 percent compliance. To determine 99 percent compliance with the effluent limitation for TRC, the following conditions shall be met: (1) the total time during which TRC exceeds 0.1 mg/L (instantaneous maximum value) shall not exceed 7 hours and 26 minutes in any calendar month; (2) no excursion above 0.1 mg/L shall exceed 30 minutes; and (3) no excursion shall exceed 2.0 mg/L. Verification of excursion length shall be submitted with monthly monitoring report.
- [3] Total coliform bacteria should be analyzed daily when wastewater is being reclaimed/recycled for irrigation.
- [4] Total nitrogen shall be equal to the sum of total Kjeldahl nitrogen, nitrite, and nitrate.
- [5] If bis (2-ethylhexyl) phthalate is found to be non-detect for 2 consecutive quarters, monitoring may be reduced to semiannual. If bis (2-ethylhexyl) phthalate is found to be non-detect for 2 years, monitoring may be reduced to annually as part of the annual CTR monitoring. If bis (2-ethylhexyl) phthalate is detected at any time, monthly monitoring shall be resumed for a minimum of 6 consecutive months until a non-detect is achieved, at which time quarterly monitoring shall resume.
- [6] Whole effluent toxicity monitoring shall be conducted according to the requirements established in section V of this MRP.
- [7] The CTR priority pollutants are those listed by the California Toxics Rule at 40 CFR 131.38 (b) (1). These pollutants shall be monitored one time per year. Analyses, compliance determination, and reporting for these pollutants shall adhere to applicable provisions of the Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California (SIP). The Discharger shall instruct its analytical laboratory to establish calibration standards so that the Minimum Levels (MLs) presented in Appendix 4 of the SIP are the lowest calibration standards. The Discharger and its analytical laboratory shall select MLs which are below applicable water quality criteria of the CTR; and when applicable water quality criteria are below all MLs, the Discharger and its analytical laboratory shall select the lowest ML. Monitoring for the CTR pollutants in effluent shall occur simultaneously with monitoring required for the CTR pollutants in receiving water.
- [8] Those 126 pollutants with applicable water quality objectives established by the California Toxics Rule (CTR) at 40 CFR 131.38.
- [9] The title 22 pollutants are those pollutants for which the DDW has established Maximum Contaminant Levels (MCLs) at title 22, division 4, chapter 15, sections 64431 (inorganic chemicals) and 64444 (organic chemicals) of the California Code of Regulations. Where these pollutants are included in other groups of pollutants (CTR Priority Pollutants), monitoring does not need to be duplicated. Analytical methods shall adhere to the Detection Limits for Purposes of Reporting (DLRs) established by title 22 of the California Code of Regulations, division 4, chapter 15, section 64432 and 64445.1. Monitoring for the title 22 pollutants in effluent shall occur simultaneously with monitoring required for the title 22 pollutants in receiving water.
- [10] Analytical methods shall adhere to the Detection Limits for Purposes of Reporting (DLRs) established by title 22 of the CCR, division 4, chapter 15, section 64432 (inorganics) and section 64445.1 (organics).



## V. WHOLE EFFLUENT TOXICITY TESTING REQUIREMENTS

### A. Acute Toxicity

#### 1. Acute Toxicity Monitoring Requirements – Monitoring Location M-001

- a. Compliance with the acute toxicity effluent limitations of this Order shall be evaluated by measuring survival of test organisms exposed to 96-hour continuous flow-through bioassays.
- b. Test organisms shall be fathead minnow unless the Executive Officer specifies in writing otherwise.
- c. All bioassays shall be performed using the most sensitive species based on the most recent screening test results and in accordance with the most up-to-date protocols in 40 CFR 136, currently in *Methods for Measuring the Acute Toxicity of Effluents and Receiving Water to Freshwater and Marine Organisms*, 5th Edition.
- d. If the Discharger can demonstrate that specific identifiable substances in the discharge are rapidly rendered harmless upon discharge to the receiving water, compliance with the acute toxicity limitation may be determined after the test samples are adjusted to remove the influence of those substances. The Discharger must obtain written approval from the Executive Officer to authorize such an adjustment.
- e. The sample shall be taken from treated effluent after disinfection. Monitoring of the bioassay water shall include, on a daily basis, the following parameters: pH, dissolved oxygen, ammonia (if toxicity is observed), temperature, hardness, and alkalinity. These results shall be reported in the monthly SMRs or as specified by the Central Coast Water Board.
- f. The presence of acute toxicity shall be determined as significantly reduced survival of test organisms at 100 percent effluent compared to a control using a statistical t-test. The Discharger shall include with the SMR the percent survival of the organisms for both the effluent and control, and the results of the t-test (“statistically different” or “not statistically different”).

If the control fish survival rate is less than 90 percent, the bioassay test shall be restarted with new fish and shall continue as soon as practical until an acceptable test is completed (i.e., control fish survival rate is 90 percent or greater).

### B. Chronic Toxicity

#### 1. Chronic Toxicity Monitoring Requirements – Monitoring Location M-001

- a. **Toxicity Trigger.** A toxicity trigger of 1 toxicity unit chronic (TUc) is retained from the previous order for the discharge of effluent through Discharge Point No. 001.
- b. **Sampling.** The Discharger shall collect grab samples of the effluent at M-001, as specified in Table E-3 above, for critical life stage toxicity testing as indicated below.
- c. **Test Species.** The test species shall include a vertebrate, an invertebrate, and an aquatic plant. After a three-month screening period, monitoring may be reduced to the most sensitive species. Screening phase chronic toxicity monitoring shall be conducted with the following three species with approved test protocols. The Executive Officer may change the test species if data suggest that another test species is more sensitive to the discharge.

**Table E-4 Short-Term Methods for Estimating Chronic Toxicity – Fresh Water**

Species	Scientific Name	Effect	Test Duration (days)
Fathead Minnow	<i>Pimephales promelas</i>	Larval Survival and Growth	7
Water Flea	<i>Ceriodaphnia dubia</i>	Survival; number of young	6 to 8 days
Green Alga	<i>Selenastrum capricornutum</i>	Growth Rate	4 days

**d. Methods.** Sample collection, handling, and preservation shall be in accordance with U.S. EPA protocols. In addition, bioassays shall be conducted in compliance with the most recently promulgated test methods, as shown in Appendix E-1 and *Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Marine and Estuarine Organisms*, currently third edition (EPA-821-R-02-014) and *Short-Term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms*, currently fourth Edition (EPA-821-R-02-013), with exceptions granted the Discharger by the Executive Officer and the Environmental Laboratory Accreditation Program (ELAP).

**Dilution Series.** The Discharger shall conduct tests at 100%, 85%, 70%, 50%, and 25%. The “%” represents percent effluent as discharged. The Discharger may use the biological buffer MOPS (3-(N-Morpholino) propanesulfonic Acid) to control pH drift and ammonia toxicity caused by increasing pH during the test.

**2. Chronic Toxicity Reporting program**

**a. Routine Reporting.** Toxicity test results for the current reporting period shall include, at a minimum, for each test:

- Sample dates
- Test initiation date
- Test species
- End point values for each dilution (e.g. number of young, growth rate, percent survival)
- No observed effect concentration (NOEC) values in percent effluent
- Inhibitory concentrations at various percent thresholds (IC<sub>15</sub>, IC<sub>25</sub>, IC<sub>40</sub>, and IC<sub>50</sub>) values or effective concentration thresholds (EC<sub>15</sub>, EC<sub>25</sub> ... etc.) in percent effluent
- TUC values (100/NOEC, 100/IC<sub>25</sub>, or 100/EC<sub>25</sub>)
- Mean percent mortality (±s.d.) after 96 hours in 100% effluent (if applicable)
- NOEC and lowest observed effect concentration (LOEC) values for reference toxicant tests
- IC<sub>50</sub> or EC<sub>50</sub> values for reference toxicant tests
- Available water quality measurements for each test (pH, dissolved oxygen, temperature, conductivity, hardness, salinity, ammonia)

**b. Compliance Summary.** The results of the chronic toxicity testing shall be provided in the next Self-Monitoring Report and shall include a summary table of chronic toxicity data from at least eleven of the most recent samples. The information in the table shall include the items listed above under 2.a.

**C. Quality Assurance**

1. For the acute toxicity testing using a t-test, two dilutions shall be used, i.e., 100 percent effluent and a control (when a t-test is used instead of an LC<sub>50</sub>).
2. If organisms are not cultured in-house, concurrent testing with a referenced toxicant shall be conducted. Where organisms are cultured in-house, monthly reference toxicant testing is sufficient. Reference toxicant tests also shall be conducted using the same test conditions as the effluent toxicity tests (e.g., same test duration, etc.).
3. If either the reference toxicant test or effluent test does not meet all test acceptability criteria (TAC) as specified in the toxicity test references, then the permittee must resample and retest within 15 working days or as soon as possible. The retesting period begins when the Discharger collects the first sample required to complete the retest.
4. The reference toxicant and effluent tests must meet the upper and lower bounds on test sensitivity as determined by calculating the percent minimum significant difference (PMSD) for each test result. The test sensitivity bound is specified for each test method in the respective methods manuals.

**D. Accelerated Monitoring Requirements**

1. When acute toxicity is detected in the effluent above the effluent limitation established by this Order or when the chronic toxicity trigger of 1 TUc is exceeded during regular toxicity monitoring, and the testing meets all test acceptability criteria, the Discharger shall initiate accelerated monitoring to confirm the effluent toxicity.
2. The Discharger shall implement an accelerated monitoring frequency consisting of performing three toxicity tests in a six-week period following the first failed test results.
3. If implementation of the generic Toxicity Reduction Evaluation (TRE) work plan indicates the source of the exceedance of the effluent limitation or toxicity trigger (for instance, a temporary plant upset), then only one additional test is necessary. If exceedance of the effluent limitation or toxicity trigger is detected in this test, the Discharger will continue with accelerated monitoring requirements or implement the Toxicity Identification and Toxicity Reduction Evaluations.
4. If none of the three tests indicated exceedance of the effluent limitation or toxicity trigger, then the Discharger may return to the normal bioassay testing frequency.

**E. Toxicity Identification Evaluations (TIE) and Toxicity Reduction Evaluation (TRE) Process**

1. A Toxicity Identification Evaluation (TIE) shall be triggered if testing from the accelerated monitoring frequency indicates any of the following:
  - a. Two of the three accelerated toxicity tests are reported as failed tests meeting any of the conditions specified in section V.C.
  - b. The TIE shall be initiated within 15 days following failure of the second accelerated monitoring test.
  - c. If a TIE is triggered prior to the completion of the accelerated testing, the accelerated testing schedule may be terminated, or used as necessary in performing the TIE.
2. The TIE shall be conducted to identify and evaluate toxicity in accordance with procedures recommended by the U.S. EPA which include the following:
  - a. *Toxicity Identification Evaluation: Characterization of Chronically Toxic Effluents, Phase I*, (U.S. EPA, 1992a);

- b. *Methods for Aquatic Toxicity Identification Evaluations: Phase I Toxicity Characterization Procedures, Second Edition* (U.S. EPA, 1991a);
  - c. *Methods for Aquatic Toxicity Identification Evaluations: Phase II Toxicity Identification Procedures for Sampling Exhibiting Acute and Chronic Toxicity* (U.S. EPA, 1993a); and
  - d. *Methods for Aquatic Toxicity Identification Evaluations: Phase III Toxicity Confirmation Procedures for Samples Exhibiting Acute and Chronic Toxicity* (U.S. EPA, 1993b).
3. As part of the TIE investigation, the Discharger shall be required to implement its TRE work plan. The Discharger shall take all reasonable steps to control toxicity once the source of the toxicity is identified. A failure to conduct required toxicity tests or a TRE within a designated period shall result in the establishment of numerical effluent limitations for chronic toxicity in a permit or appropriate enforcement action. Recommended guidance in conducting a TRE includes the following:
- a. *Toxicity Reduction Evaluation Guidance for Municipal Wastewater Treatment Plants*, August 1999, EPA/833B-99/002; and
  - b. Clarifications Regarding Toxicity Reduction and Identification Evaluations in the National Pollutant Discharge Elimination System Program dated March 27, 2001, U.S. EPA Office of Wastewater Management, Office of Regulatory Enforcement.

#### VI. LAND DISCHARGE MONITORING REQUIREMENTS – NOT APPLICABLE

#### VII. RECYCLING MONITORING REQUIREMENTS – MONITORING LOCATION RCL-001

The Discharger shall comply with applicable State and local monitoring requirements regarding the production and use of reclaimed wastewater, including requirements established by the DDW at title 22, sections 60301 - 60357 of the CCR, Water Recycling Criteria.

Reclaimed water shall be monitored for turbidity, total coliform bacteria, and total residual chlorine at the appropriate frequency to demonstrate compliance with section IV.C of the Order.

Dischargers shall submit an annual report to the State Water Board by April 30 of each calendar year. The data shall be reported for the months of January through December. The Discharger must submit this annual report containing monthly data in electronic format via the State Water Board's Internet GeoTracker system at <http://geotracker.waterboards.ca.gov/>. Required data shall be submitted to the GeoTracker database under a site-specific global identification number. Any data will be made publicly accessible as machine readable datasets, similar to California Integrated Water Quality System (CIWQS) data uploads.

The annual reports shall include:

1. **Influent.** Monthly volume of wastewater collected and treated by the wastewater treatment plant.
2. **Production.** Monthly volume of wastewater treated, specifying level of treatment.
3. **Discharge.** Monthly volume of treated wastewater discharged to each of the following, specifying level of treatment:
  - a. Inland surface waters, specifying volume required to maintain minimum instream flow.
  - b. Enclosed bays, estuaries and coastal lagoons, and ocean waters.

- c. Natural systems, such as wetlands, wildlife habitats, and duck clubs, where augmentation or restoration has occurred, and that are not part of a wastewater treatment plant or water recycling treatment plant.
  - d. Underground injection wells, such as those classified by U.S. EPA's Underground Injection Control Program, excluding groundwater recharge via subsurface application intended to reduce seawater intrusion into a coastal aquifer with a seawater interface.
  - e. Land, where beneficial use is not taking place, including evaporation or percolation ponds, overland flow, or spray irrigation disposal, excluding pasture or fields with harvested crops.
4. **Reuse.** Monthly volume of recycled water distributed.
5. **Reuse Categories.** Annual volume of treated wastewater distributed for beneficial use in compliance with California Code of Regulations, title 22 in each of the use categories listed below:
- a. Agricultural irrigation: pasture or crop irrigation.
  - b. Landscape irrigation: irrigation of parks, greenbelts, and playgrounds; school yards; athletic fields; cemeteries; residential landscaping, common areas; commercial landscaping; industrial landscaping; and freeway, highway, and street landscaping.
  - c. Golf course irrigation: irrigation of golf courses, including water used to maintain aesthetic impoundments within golf courses.
  - d. Commercial application: commercial facilities, business use (such as laundries and office buildings), car washes, retail nurseries, and appurtenant landscaping that is not separately metered.
  - e. Industrial application: manufacturing facilities, cooling towers, process water, and appurtenant landscaping that is not separately metered.
  - f. Geothermal energy production: augmentation of geothermal fields.
  - g. Other non-potable uses: including but not limited to dust control, flushing sewers, fire protection, fill stations, snow making, and recreational impoundments.
  - h. Groundwater recharge: the planned use of recycled water for replenishment of a groundwater basin or an aquifer that has been designated as a source of water supply for a public water system. Includes surface or subsurface application, except for seawater intrusion barrier use.
  - i. Seawater intrusion barrier: groundwater recharge via subsurface application intended to reduce seawater intrusion into a coastal aquifer with a seawater interface.
  - j. Reservoir water augmentation: the planned placement of recycled water into a raw surface water reservoir used as a source of domestic drinking water supply for a public water system, as defined in section 116275 of the Health and Safety Code, or into a constructed system conveying water to such a reservoir (Water Code section 13561).
  - k. Raw water augmentation: the planned placement of recycled water into a system of pipelines or aqueducts that deliver raw water to a drinking water treatment plant that provides water to a public water system as defined in section 116275 of the Health and Safety Code (Water Code section 13561).
  - l. Other potable uses: both indirect and direct potable reuse other than for groundwater recharge, seawater intrusion barrier, reservoir water augmentation, or raw water augmentation.

**VIII. RECEIVING WATER MONITORING REQUIREMENTS**

**A. Receiving Water Monitoring - Monitoring Locations R-001, R-002, R-003 and R-004**

1. The Discharger shall monitor the receiving water at Monitoring Locations R-001 and R-004 as follows: Receiving water at Monitoring Location R-001 shall be monitored only when stream flow is subsurface upstream of the point of discharge (between Chorro Reservoir and the point of discharge).

**Table E-5 Receiving Water Monitoring Requirements – R-001 and R-004**

Parameter	Units	Sample Type	Minimum Sampling Frequency <sup>[1]</sup>
Ammonia (as N)	mg/L	Grab	1/Month
Chloride	mg/L	Grab	1/Month
Chlorophyll a	mg/m <sup>3</sup>	Grab	1/Month
Color	color units	Grab	1/Month
Dissolved Oxygen	mg/L	Grab	1/Month
Dissolved Oxygen Saturation	percent	Grab	1/Month
Hardness (as CaCO <sub>3</sub> )	mg/L	Grab	1/Month
Nitrate (as N)	mg/L	Grab	1/Month
Orthophosphate (as P)	mg/L	Grab	1/Month
pH <sup>[2]</sup>	standard units	Grab	1/Month
Sodium	mg/L	Grab	1/Month
Temperature <sup>[2]</sup>	°F	Instantaneous	1/Month
TDS	mg/L	Grab	1/Month
Total Nitrogen (as N)	mg/L	Calculated <sup>[3]</sup>	1/Month
Total Phosphate (as P)	mg/L	Grab	1/Month
Turbidity	NTU	Grab	1/Month
Unionized Ammonia (as N)	mg/L	Calculated <sup>[4]</sup>	1/Month

<sup>[1]</sup> Monitoring Location R-001 shall be monitored only when stream flow is subsurface upstream of the point of discharge. When there is no surface flow below the dam, upstream data shall be calculated from an average of the last three samples.

<sup>[2]</sup> pH and temperature shall be measured simultaneously with total ammonia. Results shall be used to calculate unionized ammonia concentration.

<sup>[3]</sup> Total nitrogen shall be equal to the sum of total Kjeldahl nitrogen, nitrite, and nitrate.

<sup>[4]</sup> Unionized ammonia shall be calculated based on the following formula, or as otherwise approved by the Central Coast Water Board:

$$NH_3 = \frac{1}{1 + 10^{(pK - pH)}}$$

Where:

$$pK = 0.09018 + 2,729.92/T$$

T = Temperature in degrees Kelvin

2. The Discharger shall monitor receiving water at Monitoring Locations R-002 and R-003 as follows. Receiving water at Monitoring Location R-002 shall be monitored only when stream flow is subsurface upstream of the point of discharge (between Chorro Reservoir and the point of discharge).

**Table E-6 Receiving Water Monitoring Requirements - R-002 and R-003**

Parameter	Units	Sample Type	Minimum Sampling Frequency <sup>[1]</sup>
Ammonia (as N)	mg/L	Grab	1/Month
Un-ionized Ammonia (as N)	mg/L	Calculated <sup>[2]</sup>	1/Month
Chloride	mg/L	Grab	1/Month
Chlorophyll a	mg/m <sup>3</sup>	Grab	1/Month
Color	color units	Grab	1/Month
Dissolved Oxygen	mg/L	Grab	1/Month
Dissolved Oxygen Saturation	percent	Grab	1/Month
Hardness	mg/L	Grab	1/Month
Nitrate (as N)	mg/L	Grab	1/Month
Total Nitrogen (as N)	mg/L	Grab	1/Month
Orthophosphate (as P)	mg/L	Grab	1/Month
Total Phosphate (as P)	mg/L	Grab	1/Month
pH <sup>[3]</sup>	standard units	Grab	1/Month
Sodium	mg/L	Grab	1/Month
Temperature <sup>[3]</sup>	°F	Instantaneous	1/Month
TDS	mg/L	Grab	1/Month
Turbidity	NTU	Grab	1/Month
Boron	mg/L	Grab	1/Year
Cobalt	mg/L	Grab	1/Year
Iron	mg/L	Grab	1/Year
Lithium	mg/L	Grab	1/Year
Manganese	mg/L	Grab	1/Year
Methylene Blue Activated Substances (MBAS)	mg/L	Grab	1/Year
Molybdenum	mg/L	Grab	1/Year
Phthalate Esters	µg/L	Grab	1/Year
Sulfate	mg/L	Grab	1/Year
Vanadium	mg/L	Grab	1/Year
CTR Pollutants <sup>[4]</sup>	µg/L	Grab	1/Year
Title 22 Pollutants <sup>[5]</sup>	µg/L	Grab	1/Year

[1] Monitoring Location R-002 shall be monitored only when surface flow exists between Chorro Reservoir and the point of discharge.

[2] Unionized ammonia shall be calculated based on the following formula, or as otherwise approved by the Central Coast Water Board:

$$NH_3 = \frac{1}{1 + 10^{(pK - pH)}}$$

Where:

$$pK = 0.09018 + 2,729.92/T$$

T = Temperature in degrees Kelvin

[3] pH and temperature shall be measured simultaneously with total ammonia. Results shall be used to calculate unionized ammonia concentration.

[4] The CTR priority pollutants are those listed by the California Toxics Rule at 40 CFR 131.38 (b) (1). These pollutants shall be monitored one time per year. Analyses, compliance determination, and reporting for these pollutants shall adhere to applicable provisions of the Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California (SIP). Monitoring of receiving water for the CTR pollutants shall occur simultaneously with effluent monitoring for the CTR pollutants.

[5] The title 22 pollutants are those for which primary MCLs have been established by the DDW and which are listed in sections 64431-A and 64444-A of the CCR, title 22, division 4, chapter 15. Where

these pollutants are also identified as CTR Priority Pollutants, monitoring does not need to be duplicated. Monitoring of receiving water for the Title 22 Pollutants shall occur simultaneously with effluent monitoring for Title 22 pollutants.

3. The Discharger shall monitor receiving water at Monitoring Location R-005 as follows.

**Table E-7 Receiving Water Monitoring Requirements- R-005**

Parameter	Units	Sample Type	Minimum Sampling Frequency <sup>[1]</sup>
Dissolved Oxygen	mg/L	Grab	1/Month
Dissolved Oxygen Saturation	percent	Grab	1/Month
Nitrate (as N)	mg/L	Grab	1/Month
Orthophosphate (as P)	mg/L	Grab	1/Month

<sup>[1]</sup> Sampling shall take place once per month between May and September.

**B. Groundwater Monitoring – Monitoring Locations GW-001 and GW-002**

1. The Discharger shall monitor groundwater at Monitoring Locations GW-001 and GW-002 as follows. After depth to groundwater has been measured, wells shall be purged before samples are collected for analysis.

**Table E.8 Groundwater Monitoring Requirements**

Parameter	Units	Sample Type	Minimum Sampling Frequency <sup>[1]</sup>
Depth to Groundwater	Feet	Grab	1/Quarter
Nitrate Nitrogen (as N)	mg/L	Grab	1/Quarter
TDS	mg/L	Grab	1/Quarter
Specific Conductance	µhoms/cm	Grab	1/Quarter
Sodium	mg/L	Grab	1/Quarter
Chloride	mg/L	Grab	1/Quarter
Sulfate	mg/L	Grab	1/Quarter
Boron	mg/L	Grab	1/Quarter
Chemical Oxygen Demand	mg/L	Grab	1/Quarter

**IX. OTHER MONITORING REQUIREMENTS**

**A. Biosolids Monitoring, Reporting, and Notification – BIO-001**

1. The Discharger shall collect a representative sample of residual solids (biosolids) from the last point in the handling process and perform the following analyses:

**Table E-9. Biosolids Monitoring Requirements**

Parameter	Units	Sample Type	Minimum Sampling Frequency
Quantity Removed	tons or yds <sup>3</sup>	Measured	During Removal
Location of Reuse/Disposal	General Public or Specific Site	Grab	1/Year
Moisture Content	Percent	Grab	1/Year
Ammonia (as N)	mg/kg <sup>[1]</sup>	Grab	1/Year
Antimony	mg/kg <sup>[1]</sup>	Grab	1/Year
Arsenic	mg/kg <sup>[1]</sup>	Grab	1/Year
Barium	mg/kg <sup>[1]</sup>	Grab	1/Year
Beryllium	mg/kg <sup>[1]</sup>	Grab	1/Year
Boron	mg/kg <sup>[1]</sup>	Grab	1/Year



Parameter	Units	Sample Type	Minimum Sampling Frequency
Cadmium	mg/kg <sup>[1]</sup>	Grab	1/Year
Chromium (IV)	mg/kg <sup>[1]</sup>	Grab	1/Year
Cobalt	mg/kg <sup>[1]</sup>	Grab	1/Year
Copper	mg/kg <sup>[1]</sup>	Grab	1/Year
Fluoride	mg/kg <sup>[1]</sup>	Grab	1/Year
Lead	mg/kg <sup>[1]</sup>	Grab	1/Year
Mercury	mg/kg <sup>[1]</sup>	Grab	1/Year
Nickel	mg/kg <sup>[1]</sup>	Grab	1/Year
Nitrate (as N)	mg/kg <sup>[1]</sup>	Grab	1/Year
Oil and Grease	mg/kg <sup>[1]</sup>	Grab	1/Year
Organic Lead	mg/kg <sup>[1]</sup>	Grab	1/Year
PCBs	mg/kg <sup>[1]</sup>	Grab	1/Year
Pesticides	mg/kg <sup>[1]</sup>	Grab	1/Year
pH	s.u.	Grab	1/Year
Selenium	mg/kg <sup>[1]</sup>	Grab	1/Year
Silver	mg/kg <sup>[1]</sup>	Grab	1/Year
Thallium	mg/kg <sup>[1]</sup>	Grab	1/Year
Tin	mg/kg <sup>[1]</sup>	Grab	1/Year
Total Chromium	mg/kg <sup>[1]</sup>	Grab	1/Year
Total Nitrogen (as N)	mg/kg <sup>[1]</sup>	Grab	1/Year
Total Phosphorus (as P)	mg/kg <sup>[1]</sup>	Grab	1/Year
Trichloroethylene	mg/kg <sup>[1]</sup>	Grab	1/Year
Vanadium	mg/kg <sup>[1]</sup>	Grab	1/Year
Vinyl Chloride	mg/kg <sup>[1]</sup>	Grab	1/Year
Zinc	mg/kg <sup>[1]</sup>	Grab	1/Year

<sup>[1]</sup> Results shall be reported on a dry weight basis.

The following information shall be submitted with the annual biosolids report. Adequate detail shall be included to characterize biosolids in accordance with 40 CFR 503.

1. Annual biosolids production in dry tons.
2. Percent solids content of biosolids which leave the site.
3. A schematic drawing showing handling facilities, including temporary and final storage areas. Include a narrative description of solids treatment and performance.
4. A description of disposal methods, including the following information as applicable related to the disposal methods used at the Facility.
  - a. For landfill disposal include tons placed in the landfill; the Regional Water Board WDR numbers that regulate the landfills used; the present classification of the landfill; and the names and locations of the landfills which receive biosolids.
  - b. For land application include tons applied to the land; the location of the land applications sites; the Regional Water Board's WDR numbers that regulate the land application sites; the application rates in lbs/acre/year (specify the weight basis, e.g., dry weight or percent solids); and the subsequent uses of the land.

**B. Pretreatment Monitoring – Not Applicable**

**X. REPORTING REQUIREMENTS**

**A. General Monitoring and Reporting Requirements**

The Discharger shall comply with all Standard Provisions (Attachment D) related to monitoring, reporting, and recordkeeping.

**B. Self-Monitoring Reports (SMRs)**

1. The Discharger shall electronically submit SMRs using the State Water Board’s CIWQS Program website <[http://www.waterboards.ca.gov/water\\_issues/programs/ciwqs/](http://www.waterboards.ca.gov/water_issues/programs/ciwqs/)>. The CIWQS website will provide additional information for SMR submittal in the event there will be a planned service interruption for electronic submittal.
2. The Discharger shall report in the SMR the results for all monitoring specified in this MRP under sections III through IX. The Discharger shall submit SMRs including the results of all required monitoring using U.S. EPA-approved test methods or other test methods specified in this Order. SMRs are to include all new monitoring results obtained since the last SMR was submitted. If the Discharger monitors any pollutant more frequently than required by this Order, the results of this monitoring shall be included in the calculations and reporting of the data submitted in the SMR.
3. Monitoring periods and reporting for all required monitoring shall be completed according to the following schedule:

**Table E-10. Reporting Schedule**

<b>SMR Name</b>	<b>Permit Section for Monitoring and Sampling Data Included in Report</b>	<b>SMR Submittal Frequencies</b>	<b>SMR Due Date</b>
NPDES Monitoring Report - Monthly	MRP Sections III (Influent), IV (Effluent), VII (Recycled Water) and VIII.A (Receiving Water)	Monthly	First day of second calendar month following period of sampling (first report due October 1, 2020)
NPDES Monitoring Report - Quarterly	MRP Sections IV (Effluent) and VIII.B (Groundwater)	Quarterly	May 1st August 1st November 1st February 1st
NPDES Monitoring Report - Annual	MRP Sections IV (Effluent) and IX.A (Biosolids)	Annually	January 30 <sup>th</sup> following calendar year of sampling
Facility Summary Report	Attachment D, Standard Provision, VIII.D.8	Annually	January 30 <sup>th</sup> following calendar year of sampling
Recycled Water Summary Report	MRP Section VII (Recycled Water)	Annually	April 30 <sup>th</sup> following calendar year  Note: This report is submitted using the GeoTracker system, not CIWQS.
Climate Change Response Plan	Section VI C.6.c	Once per permit	<b>February 1, 2025</b>
ROWD Application	Permit renewal application	Once per permit	<b>February 1, 2025</b>

- 4. Reporting Protocols.** The Discharger shall report with each sample result the applicable RL and the current MDL, as determined by the procedure in 40 CFR part 136. The Discharger shall report the results of analytical determinations for the presence of chemical constituents in a sample using the following reporting protocols:

  - a. Sample results greater than or equal to the RL shall be reported as measured by the laboratory (i.e., the measured chemical concentration in the sample).
  - b. Sample results less than the RL, but greater than or equal to the laboratory's MDL, shall be reported as DNQ. The estimated chemical concentration of the sample shall also be reported.

For the purposes of data collection, the laboratory shall write the estimated chemical concentration next to DNQ. The laboratory may, if such information is available, include numerical estimates of the data quality for the reported result. Numerical estimates of data quality may be percent accuracy ( $\pm$  a percentage of the reported value), numerical ranges (low to high), or any other means considered appropriate by the laboratory.
  - c. Sample results less than the laboratory's MDL shall be reported as "ND."
  - d. Dischargers are to instruct laboratories to establish calibration standards so that the ML value (or its equivalent if there is differential treatment of samples relative to calibration standards) is the lowest calibration standard. At no time is the Discharger to use analytical data derived from extrapolation beyond the lowest point of the calibration curve.
- 5. Compliance Determination.** Compliance with effluent limitations for priority pollutants shall be determined using sample reporting protocols defined above and in Attachment A. For purposes of reporting and administrative enforcement by the Central Coast Water Board and State Water Board, the Discharger shall be deemed out of compliance with effluent limitations if the concentration of the priority pollutant in the monitoring sample is greater than the effluent limitation and greater than or equal to the reporting level (RL).
- 6. Multiple Sample Data.** When determining compliance with an average monthly effluent limitation (AMEL), average weekly effluent limitation (AWEL), or maximum daily effluent limitation (MDEL) for priority pollutants and more than one sample result is available, the Discharger shall compute the arithmetic mean unless the data set contains one or more reported determinations of DNQ or ND. In those cases, the Discharger shall compute the median in place of the arithmetic mean in accordance with the following procedure:

  - a. The data set shall be ranked from low to high, ranking the reported ND determinations lowest, DNQ determinations next, followed by quantified values (if any). The order of the individual ND or DNQ determinations is unimportant.
  - b. The median value of the data set shall be determined. If the data set has an odd number of data points, then the median is the middle value. If the data set has an even number of data points, then the median is the average of the two values around the middle unless one or both of the points are ND or DNQ, in which case the median value shall be the lower of the two data points where DNQ is lower than a value and ND is lower than DNQ.
- 7. The Discharger shall submit SMRs in accordance with the following requirements:**

  - a. The Discharger shall arrange all reported data in a tabular format. The data shall be summarized to clearly illustrate whether the facility is operating in compliance with interim and/or final effluent limitations. The Discharger is not required to duplicate

the submittal of data that is entered in a tabular format within CIWQS. When electronic submittal of data is required and CIWQS does not provide for entry into a tabular format within the system, the Discharger shall electronically submit the data in a tabular format as an attachment.

- b. The Discharger shall attach a cover letter to the SMR. The information contained in the cover letter shall clearly identify violations of the waste discharge requirements; discuss corrective actions taken or planned; and the proposed time schedule for corrective actions. Identified violations must include a description of the requirement that was violated and a description of the violation.

### **C. Discharge Monitoring Reports (DMRs)**

DMRs are U.S. EPA reporting requirements. The Discharger shall electronically certify and submit DMRs together with SMRs using Electronic Self-Monitoring Reports module eSMR 2.5 or any upgraded version. Electronic DMR submittal shall be in addition to electronic SMR submittal. Information about electronic DMR submittal is available at the DMR website at: [http://www.waterboards.ca.gov/water\\_issues/programs/discharge\\_monitoring](http://www.waterboards.ca.gov/water_issues/programs/discharge_monitoring).

### **D. Other Reports**

The Discharger shall report the results of any special monitoring, TREs, or other data or information that results from the Special Provisions, section VI.C, of the Order. The Discharger shall submit such report with the first monthly SMR scheduled to be submitted on or immediately following the report due date.

In addition, the Discharger shall comply with the reporting requirements below.

#### **1. Sewage Spill Reporting and Notifications**

- a. Sanitary sewer overflows associated with the Discharger's collection system are subject to the online reporting and notification requirements set forth in the Statewide General Waste Discharge Requirements for Sanitary Sewer Systems Order No. 2006-0003-DWQ. The Discharger has enrolled under the statewide waste discharge requirements for sanitary sewer systems. Therefore, all prohibitions, provisions, and monitoring and reporting requirements of that order apply to the Discharger. For any unauthorized discharges of sewage to a drainage channel or surface water, the Discharger must notify the State Office of Emergency Services, the local health officer or director of environmental health with jurisdiction over affected water bodies, and the Central Coast Water Board, within two hours after becoming aware of the discharge. Additionally, within 24 hours the Discharger shall submit to the Central Coast Water Board certification that the appropriate agencies (i.e., Office of Emergency Services and local Environmental Health Department) have been notified of the sewage discharge to surface water bodies.
- b. In accordance with the requirements of Health and Safety Code Section 5411.5, the Discharger shall provide notification to the local health officer or the director of environmental health with jurisdiction over the affected water body of any spills that cause, or probably will cause, a discharge to any waters of the state.

In accordance with the requirements of Water Code section 13271, the Discharger shall provide notification to the State Office of Emergency Services of reportable amounts of hazardous substance spills or sewage spills that cause, or probably will cause, a discharge to any waters of the state. The CCR, title 23, section 2250, defines a

reportable amount of a sewage spill as being 1,000 gallons. The phone number for reporting these releases to the **State Office of Emergency Services is (800) 852-7550.**

The Discharger shall notify the Central Coast Water Board of any spill from its wastewater treatment plant that causes, or probably will cause, a discharge to a water of the state as soon as possible, but not later than **two hours** after becoming aware of the release. This notification does not need to be made if the Discharger has notified the State Office of Emergency Services first. The phone number for reporting these sewage spills to the Central Coast Water Board is **(805) 549-3147**. At a minimum, the following information shall be provided:

- i. The location, date, and time of the spill.
  - ii. The water body that received or will receive the spill.
  - iii. An estimate of the amount of sewage or other waste spilled and the amount that reached a surface water at the time of notification.
  - iv. If ongoing, the estimated flow rate of the spill at the time of the notification.
  - v. The name of the organization, phone number, and email address of the reporting representative.
- c. As soon as possible, but not later than 24 hours after becoming aware of a spill from its wastewater treatment plant to a water of the state, the Discharger shall submit a statement to the Central Coast Water Board by email at [centralcoast@waterboards.ca.gov](mailto:centralcoast@waterboards.ca.gov). If the spill is 1,000 gallons or more, this statement shall certify that the State Office of Emergency Services has been notified of the spill in accordance with California Water Code Section 13271. The statement shall also certify that the local health officer or director of environmental health with jurisdiction over the affected water bodies has been notified of the spill in accordance with Health and Safety Code Section 5411.5. The statement shall also include at a minimum the following information:
- i. Agency, NPDES No., Order No., and MRP No., if applicable.
  - ii. The location, date, and time of the spill.
  - iii. The water body that received the spill.
  - iv. A description of the level of treatment of the sewage spill or other waste spilled.
  - v. An initial estimate of the amount of sewage spilled or other waste spilled and the amount that reached a surface water.
  - vi. The State Office of Emergency Services control number and the date and time that notification of the incident was provided to the State Office of Emergency Services.
  - vii. The name of the local health officer or director of environmental health representative notified (if contacted directly); the date and time of notification; and the method of notification (e.g., phone, fax, email).

**2. Total Chlorine Residual Release Notification**

- a. The Discharger shall notify the following agencies **within two hours** if an individual total chlorine residual release to surface water is detected at 0.1 mg/L for more than 30 minutes and/or individual total chlorine residual exceeds 2.0 mg/L, which violate the effluent limitations as defined in section IV.A.1 of this Order:

Central Coast Water Board	805-542-4638
Office of Emergency Services	800-852-7550
California Department of Fish and Wildlife Dispatch <sup>[1]</sup>	831-649-2801
San Luis Obispo County Environmental Health Agency	805-781-5544

<sup>[1]</sup> Prompt dispatch to notify marine protected area warden, enforcement warden, and biologist.

- b. Within 24 hours of the release, the Discharger shall certify to the Central Coast Water Board that notifications have been made to appropriate agencies (above). Certification of such notifications shall be conducted through email notifications or by facsimile at 805-543-0397.

**3. Reporting of Non-Compliance**

The Discharger shall comply with section V.E. of Standard Provisions (Attachment D), following procedures described in a February 17, 1981, tri-agency memo from the Department of Health Services and any amendments thereto, and shall notify the following parties of non-compliance as specified in the February 17, 1981 memo:

Department of Public Health	510-412-4633
Office of Emergency Services	800-852-7550
Department of Fish and Wildlife Dispatch	831-649-2819
County Board of Supervisors	805-781-5450
County Ag Commission	805-781-5910
Tomales Bay Shellfish Farms Inc Drew Aldeen	415-250-9905
Morro Bay Oyster Company Neal Maloney	805-234-7102
Grassy Bar Oyster Company George Trevelyan	805-471-9683
Morro Bay National Estuary Program	805-772-3834
Y. Hayashi & Sons	805-489-2595

## ATTACHMENT F – FACT SHEET

### CONTENTS

I.	Permit Information.....	F-3
II.	Facility Description.....	F-4
	A. Description of Wastewater and Biosolids Treatment and Controls.....	F-4
	B. Discharge Points and Receiving Waters.....	F-5
	C. Summary of Existing Requirements and Self-Monitoring Report (SMR) Data.....	F-5
	D. Compliance Summary.....	F-6
	E. Planned Changes.....	F-7
III.	Applicable Plans, Policies, and Regulations.....	F-7
	A. Legal Authorities.....	F-7
	B. California Environmental Quality Act (CEQA).....	F-7
	C. State and Federal Laws, Regulations, Policies, and Plans.....	F-7
	D. Impaired Water Bodies on the CWA section 303(d) List.....	F-10
	E. Other Plans, Policies, and Regulations.....	F-12
IV.	Rationale For Effluent Limitations and Discharge Specifications.....	F-13
	A. Discharge Prohibitions.....	F-13
	B. Technology-Based Effluent Limitations.....	F-13
	1. Scope and Authority.....	F-13
	2. Applicable Technology-Based Effluent Limitations.....	F-14
	C. Water Quality-Based Effluent Limitations (WQBELs).....	F-15
	1. Scope and Authority.....	F-15
	2. Applicable Beneficial Uses and Water Quality Criteria and Objectives.....	F-16
	3. Determining the Need for WQBELs.....	F-16
	4. WQBEL Calculations.....	F-21
	5. Whole Effluent Toxicity (WET).....	F-23
	6. Basin Plan.....	F-25
	D. Final Effluent Limitation Considerations.....	F-30
	1. Anti-backsliding Requirements.....	F-30
	2. Antidegradation Policies.....	F-31
	3. Stringency of Requirements for Individual Pollutants.....	F-31
	4. Summary of Final Effluent Limitations.....	F-31
	E. Interim Effluent Limitations – Not Applicable.....	F-32
	F. Land Discharge Specifications – Not Applicable.....	F-32
	G. Recycling Specifications.....	F-32
	H. Salt and Nutrient Management Program.....	F-33
V.	Rationale for Receiving Water Limitations.....	F-33
	A. Surface Water.....	F-33
	B. Groundwater.....	F-33
VI.	Rationale for Provisions.....	F-33
	A. Standard Provisions.....	F-33
	B. Special Provisions.....	F-33
	1. Reopener Provisions.....	F-33
	2. Special Studies and Additional Monitoring Requirements.....	F-34
	3. Best Management Practices and Pollution Prevention.....	F-34
	4. Construction, Operation, and Maintenance Specifications.....	F-34
	5. Special Provisions for Publicly Owned Treatment Works.....	F-34

- 6. Other Special Provisions ..... F-34
- 7. Compliance Schedules – Not Applicable ..... F-35
- 8. Salt and Nutrient Management Program..... F-35
- VII. Rationale for Monitoring and Reporting Requirements ..... F-35
  - A. Influent Monitoring ..... F-36
  - B. Effluent Monitoring..... F-36
  - C. Whole Effluent Toxicity Testing Requirements ..... F-36
  - D. Recycled Water Monitoring..... F-36
  - E. Receiving Water Monitoring..... F-37
    - 1. Surface Water ..... F-37
    - 2. Groundwater ..... F-37
  - F. Other Monitoring Requirements..... F-37
    - 1. Discharge Monitoring Report-Quality Assurance (DMR-QA) Study Program ..... F-37
- VIII. Public Participation ..... F-37
  - A. Notification of Interested Parties ..... F-37
  - B. Written Comments ..... F-37
  - C. Public Hearing ..... F-42
  - D. Waste Discharge Requirements Petitions ..... F-42
  - E. Information and Copying..... F-42
  - F. Register of Interested Persons ..... F-42
  - G. Additional Information ..... F-42

**TABLES**

- Table F-1. Facility Information ..... F-3
- Table F-2. Historic Effluent Limitations and Monitoring Data..... F-5
- Table F-3. Compliance Summary ..... F-6
- Table F-4. Basin Plan Beneficial Uses..... F-8
- Table F-5. Phosphate and Orthophosphate Effluent Data Summary ..... F-11
- Table F-6. Secondary Treatment Requirements..... F-14
- Table F-7. Technology-Based Effluent Limitations ..... F-14
- Table F-8. Summary of RPA Results..... F-17
- Table F-9. Receiving Water ..... F-27
- Table F-10. Groundwater..... F-28
- Table F-11. Municipal Supply Water..... F-28
- Table F-12. Table Collection System Data for Salts ..... F-29
- Table F-13. Influent Data for Salts ..... F-29
- Table F-14. Final Effluent Limitations ..... F-31



**ATTACHMENT F – FACT SHEET**

As described in section II of this Order, the Central Coast Water Board incorporates this Fact Sheet as findings of the Central Coast Water Board supporting the issuance of this Order. This Fact Sheet includes the legal requirements and technical rationale that serve as the basis for the requirements of this Order.

This Order has been prepared under a standardized format to accommodate a broad range of discharge requirements for Dischargers in California. Only those sections or subsections of this Order that are specifically identified as “not applicable” have been determined not to apply to this Discharger. Sections or subsections of this Order not specifically identified as “not applicable” are fully applicable to this Discharger.

**I. PERMIT INFORMATION**

The following table summarizes administrative information related to the Facility.

**Table F-1. Facility Information**

<b>WDID</b>	3 400108001
<b>Discharger</b>	California Department of Corrections and Rehabilitation
<b>Indirect Dischargers</b>	California Army National Guard, Camp San Luis Obispo Cuesta College San Luis Obispo County Education Center San Luis Obispo County El Chorro Regional Park and Dairy Creek Golf Course San Luis Obispo County Operational Facility
<b>Name of Facility</b>	California Men’s Colony Wastewater Treatment Plant
<b>Facility Address</b>	Hwy 1, North of San Luis Obispo, behind Cuesta College San Luis Obispo, CA 93401 San Luis Obispo County
<b>Facility Contact, Title and Phone</b>	Scott Buffaloe, Correctional Plant Manager II, (805) 547-7926
<b>Authorized Person to Sign and Submit Reports</b>	Scott Buffaloe, Correctional Plant Manager II, (805) 547-7926
<b>Mailing Address</b>	P.O. Box 8101, San Luis Obispo, CA 93401
<b>Billing Address</b>	Same as Mailing Address
<b>Type of Facility</b>	POTW
<b>Major or Minor Facility</b>	Major
<b>Threat to Water Quality</b>	1
<b>Complexity</b>	A
<b>Pretreatment Program</b>	No
<b>Recycling Requirements</b>	Yes, DDW regulations title 22 of the CCR chapter 3 (Water Recycling Criteria).
<b>Facility Permitted Flow</b>	1.2 million gallons per day (MGD) (monthly average dry weather flow)
<b>Facility Design Flow</b>	1.2 MGD
<b>Watershed</b>	Estero Bay Hydrologic Unit
<b>Receiving Water</b>	Chorro Creek
<b>Receiving Water Type</b>	Inland Surface Water

A. California Department of Corrections and Rehabilitation (hereinafter Discharger) is the owner and operator of the California Men’s Colony Wastewater Treatment Plant (hereinafter

Facility), a publicly owned treatment works (POTW).

For the purposes of this Order, references to the “discharger” or “permittee” in applicable federal and state laws, regulations, plans, or policy are held to be equivalent to references to the Discharger herein.

- B.** The Facility discharges treated wastewater to Chorro Creek, a water of the United States. The Discharger was previously regulated by Order R3-2012-0027 and National Pollutant Discharge Elimination System (NPDES) Permit No. CA0047856 adopted on December 6, 2012, which expired on January 25, 2018. Attachment B provides a map of the area around the Facility. Attachment C provides a flow schematic of the Facility.
- C.** When applicable, state law requires dischargers to file a petition with the State Water Board, Division of Water Rights and receive approval for any change in the point of discharge, place of use, or purpose of use of treated wastewater that decreases the flow in any portion of a watercourse. The State Water Board retains separate jurisdictional authority to enforce any applicable requirements under Water Code section 1211. This is not an NPDES permit requirement.
- D.** The Discharger filed a report of waste discharge and submitted an application for reissuance of its waste discharge requirements (WDRs) and NPDES permit on July 27, 2017.
- E.** Regulations at 40 CFR section 122.46 limit the duration of NPDES permits to a fixed term not to exceed five years. Accordingly, Table 3 of this Order limits the duration of the discharge authorization. However, pursuant to California Code of Regulations (CCR), title 23, section 2235.4, the terms and conditions of an expired permit are automatically continued pending reissuance of the permit if the Discharger complies with all federal NPDES requirements for continuation of expired permits.

## **II. FACILITY DESCRIPTION**

### **A. Description of Wastewater and Biosolids Treatment and Controls**

The Discharger owns and operates the California Men's Colony wastewater treatment plant. In addition to treating domestic wastewater from the East and West Facilities of the California Men's Colony, the Facility provides wastewater treatment for the California Army National Guard's Camp San Luis Obispo, Cuesta College, and several county facilities, including the county jail, education center, and operations facility. The entire service area includes approximately 13,000 acres with an estimated population of 16,000. Approximately 11,700 acres of the service area are public lands. The Facility has a design flow of 1.2 MGD. Actual flows from December 2015 to December 2017 ranged from 0.41 to 4.99 MGD

The headworks of the Facility include a Parshall flume with a capacity of 5.73 MGD, bar screens, and an aerated chamber. Additional treatment is provided by two oxidation ditches and two secondary clarifiers. Tertiary treatment is accomplished by sand filtration, using eight filter cells with surface areas of 50 square feet each. The Facility disinfects treated effluent with a UV disinfection system before discharging to Chorro Creek. Two centrifuges are used to dewater sludge, generating up to 2.2 dry tons of solids per day. Wastewater solids are hauled from the site for disposal. Treated wastewater is either used by the County to irrigate approximately 140 acres of the Dairy Creek Golf Course or discharged to Chorro Creek. The annual average daily volume used for irrigation during the previous order term was 0.112 MGD.

**B. Discharge Points and Receiving Waters**

Tertiary-treated effluent is discharged to Chorro Creek at Discharge Point No. 001 (35.325° N; 120.7525° W). Chorro Creek is a drinking water source for the City of Morro Bay, as well as a fresh water source for the Morro Bay Estuary.

**C. Summary of Existing Requirements and Self-Monitoring Report (SMR) Data**

Effluent limitations contained in Order No. R3-2012-0027 for discharges from Discharge Point No. 001 (Monitoring Location M-001) and representative monitoring data from the term of the Order are as follows:

**Table F-2. Historic Effluent Limitations and Monitoring Data**

Parameter	Units	Effluent Limitation			Monitoring Data (From January 2013 to August 2018)		
		Average Monthly	Average Weekly	Maximum Daily	Highest Average Monthly Discharge	Highest Average Weekly Discharge	Highest Daily Discharge
Flow Rate	MGD	1.2	---	---	1.06	---	4.99
Biochemical Oxygen Demand 5-day @ 20°C (BOD <sub>5</sub> )	mg/L	10	30	50	5.65	7.33	11.2
	lbs/day	100	300	500	30.2	64.1	64.1
	% removal	≥85	---	---	96.4 <sup>[1]</sup>	---	---
Total Suspended Solids (TSS)	mg/L	10	30	50	3.9	8.9	41.1
	lbs/day	100	300	500	33.1	93	93
	% removal	≥85	---	---	98.3 <sup>[1]</sup>	---	---
pH	standard units	7.0 – 8.3 at all times <sup>[2]</sup>			6.1 – 8.3 <sup>[3]</sup>		
Oil and Grease	mg/L	5.0	---	10	7.4	---	7.4
	lbs/day	50	---	100	32.5	---	32.5
Settleable Solids	mL/L	0.1	---	0.3	0.1	---	0.3
Dissolved Oxygen	mg/L	> 2.0 mg/L at all times			---	---	9.8 <sup>[4]</sup>
Chlorine Residual	mg/L	---	---	ND <sup>[5]</sup>	---	---	2.8
Sulfate	mg/L	---	---	125	---	---	144
	lbs/day	---	---	1,251	---	---	427
Orthophosphorus	mg/L	<sup>[6]</sup>			---	---	5.5 <sup>[7]</sup>
Total Nitrogen (as N)	mg/L	---	---	10	---	---	24
	lbs/day	---	---	100	---	---	150
Nitrite (as N)	mg/L	---	---	1.0	---	---	0.97
Turbidity	NTU	10 <sup>[8]</sup>	---	20 <sup>[9]</sup>	3.2	---	20
Total Coliform Bacteria	MPN/100 mL	23 <sup>[10]</sup>	2.2 <sup>[11]</sup>	240 <sup>[12]</sup>	130 <sup>[13]</sup>	11 <sup>[14]</sup>	1,600 <sup>[15]</sup>
Copper, Total Recoverable	µg/L	7.5	---	17	9.3	---	60.4
Chlorodibromomethane	µg/L	0.40	---	0.80	0.4	---	10.9
Dichlorobromomethane	µg/L	0.56	---	0.88	0.3	---	31.4
Bis(2-Ethylhexyl) Phthalate	µg/L	1.8	---	3.6	13.1	---	13.1
Acute Toxicity	% survival	---	---	<sup>[16]</sup>	---	---	98 <sup>[17]</sup>
Chronic Toxicity	% survival	---	---	<sup>[18]</sup>	---	---	100 <sup>[17]</sup>

ND = Not Detected

- [1] Lowest average monthly percent removal.
- [2] When the Discharger continuously monitors effluent pH, levels shall be maintained within specified ranges 99 percent of the time. To determine 99 percent compliance, the following conditions shall be met:
  - The total time during which pH is outside the range of 7.0 – 8.3 shall not exceed 7 hours and 26 minutes in any calendar month;
  - No single excursion from the range of 7.0 – 8.3 shall exceed 30 minutes;
  - No single excursion shall fall outside the range of 6.0 – 9.0; and
  - When continuous monitoring is not being performed, standard compliance guidelines shall be followed (i.e., between 7.0 – 8.3 at all times, measured daily).
- [3] Minimum and maximum reported values.
- [4] Minimum reported value.
- [5] ND = less than 0.1 mg/L. Compliance determination for total chlorine residual shall be based on 99% compliance. To determine 99% compliance with the effluent limitation specified above for total chlorine residual, the following conditions shall be satisfied: (1) the total time during which the total chlorine residual values are above 0.1 mg/L (instantaneous maximum value) shall not exceed 7 hours and 26 minutes in any calendar month; (2) no individual excursion from 0.1 mg/L shall exceed 30 minutes; and (3) no individual excursion shall exceed 2 mg/L.
- [6] Median orthophosphorus concentrations of effluent from May through September shall not exceed current levels, as measured by a comparison to effluent concentrations from 2004 and 2005.
- [7] Highest reported maximum daily concentration.
- [8] Turbidity shall not exceed an average of 10 NTU over a 30-day period.
- [9] Turbidity shall not exceed 20 NTU at any time.
- [10] Concentration shall not exceed 23 MPN/100 mL in more than one sample in any thirty-day period.
- [11] The 7-day median concentration shall not exceed 2.2 MPN/100 mL.
- [12] No sample shall exceed 240 MPN/100 mL.
- [13] Highest reported exceedance of effluent limitation.
- [14] Highest reported 7-day median.
- [15] Highest reported single sample.
- [16] Survival of test organisms exposed to 100 percent effluent shall not be significantly reduced when compared, using a t-test (or another test consistent with the procedures described by Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters to Freshwater and Marine Organisms, Fifth Edition, U.S. EPA Office of Water, EPA-821-R-02-012 (2002) or the latest edition), to the survival of control organisms, as defined in section V of Attachment E to this Order.
- [17] Minimum reported percent survival.
- [18] There shall be no chronic toxicity in the effluent discharge.

**D. Compliance Summary**

The Discharger violated numeric effluent limitations 265 times during the term of Order No. R3-2012-0027. In addition to the numeric effluent limitation violations, there were violations of receiving water limitations, deficient monitoring, deficient reporting, and standard provisions. A summary of the effluent limitation violations during the term of the previous order are listed in the table below.

**Table F-3. Compliance Summary**

Parameter	Violation Type	Number of Violations	Reported Value Range	Permit Limitation	Units
Bis(2-ethylhexyl)phthalate	Monthly Average	7	2.0 – 13.1	1.8	µg/L
Bis(2-ethylhexyl)phthalate	Maximum Daily	5	4.7 – 13.1	3.0	µg/L
Chlorine, Total Residual	Maximum Daily	1	2.8	2.0	mg/L
Copper, Total Recoverable	Monthly Average	5	7.8 – 60.4	7.5	µg/L
Copper, Total Recoverable	Maximum Daily	1	60.4	17	µg/L
Chlorodibromomethane	Monthly Average	13	0.5 – 10.9	0.4	µg/L
Chlorodibromomethane	Maximum Daily	10	0.871 – 10.9	0.8	µg/L
Dichlorobromomethane	Monthly Average	13	1.44 – 31.4	0.56	µg/L

Parameter	Violation Type	Number of Violations	Reported Value Range	Permit Limitation	Units
Dichlorobromomethane	Maximum Daily	13	1.44 – 31.4	0.88	µg/L
Dissolved Oxygen	Instantaneous Minimum	3	0.11 – 0.17	2.0	mg/L
Total Nitrogen (as N)	Maximum Daily	67	10.6 – 24	10	mg/L
Total Nitrogen (as N)	Maximum Daily	3	113.4 – 150.3	100	lbs/day
Oil and Grease	Monthly Average	1	7.4	5.0	mg/L
pH	Instantaneous Minimum	110	6.14 – 6.95	7.0	standard units
Sulfate	Maximum Daily	2	129 – 144	125	mg/L
Total Coliform Bacteria	Maximum Daily	3	430 – 1,600	240	MPN/100 mL
Total Coliform Bacteria	30-Day Median	1	130	23 <sup>[1]</sup>	MPN/100 mL
Total Coliform Bacteria	7-Day Median	4	4.5	2.2	MPN/100 mL
TSS	Monthly Average	1	15.6	10	mg/L
TSS	Weekly Average	2	33.5 – 41.1	30	mg/L

<sup>[1]</sup> Not to be exceeded more than once in a 30-day period.

The Discharger has taken several corrective actions to address the compliance issues, including facility upgrades and adjustments to facility processes and procedures. During the term of the previous order, the Discharger upgraded to UV disinfection and discontinued the use of chlorine, addressing compliance issues related to chlorination and dechlorination processes.

**E. Planned Changes**

The Discharger has not indicated that any changes to the Facility are anticipated during the term of this Order.

**III. APPLICABLE PLANS, POLICIES, AND REGULATIONS**

The requirements contained in this Order are based on the requirements and authorities described in this section.

**A. Legal Authorities**

This Order serves as WDRs pursuant to article 4, chapter 4, division 7 of the California Water Code (commencing with section 13260). This Order is also issued pursuant to section 402 of the federal Clean Water Act (CWA) and implementing regulations adopted by the U.S. EPA and chapter 5.5, division 7 of the Water Code (commencing with section 13370). It shall serve as an NPDES permit authorizing the Discharger to discharge into waters of the United States at the discharge location described in table 2 subject to the WDRs in this Order.

**B. California Environmental Quality Act (CEQA)**

A portion of this action to adopt an NPDES permit is exempt from the provisions of chapter 3 of CEQA, (commencing with section 21100) of division 13 of the Public Resources Code. This Order carries over from the prior permit, the Recycling Specifications & Effluent Limitations in subsection IV.C and the Groundwater Limitations in subsection V.B. In accordance with title 14 of the Code of California Regulations section 15301, the action to adopt subsections IV.C and V.B for this existing facility is categorically exempt from CEQA, chapter 3.

**C. State and Federal Laws, Regulations, Policies, and Plans**

**1. Water Quality Control Plans.** The Central Coast Region Water Board adopted the *Water Quality Control Plan for the Central Coastal Basin* (hereinafter Basin Plan), the

most recent version released in June 2019, that designates beneficial uses, establishes water quality objectives, and contains implementation programs and policies to achieve those objectives for all waters addressed through the plan. In addition, the Basin Plan implements State Water Board Resolution No. 88-63, which established state policy that all waters, with certain exceptions, should be considered suitable or potentially suitable for municipal and domestic supply.

Beneficial uses applicable to Chorro Creek are as follows:

**Table F-4. Basin Plan Beneficial Uses**

Discharge Point	Receiving Water Name	Beneficial Use(s)
001	Chorro Creek	Municipal and Domestic Supply (MUN) Agricultural Supply (AGR) Ground Water Recharge (GWR) Water Contact Recreation (REC-1) Non-Contact Water Recreation (REC-2) Wildlife Habitat (WILD) Cold Freshwater Habitat (COLD) Warm Fresh Water Habitat (WARM) Migration of Aquatic Organisms (MIGR) Spawning, Reproduction, and/or Early Development (SPWN) Preservation of Biological Habitats of Special Significance (BIOL) Rare, Threatened, or Endangered Species (RARE) Freshwater Replenishment (FRSH) Commercial and Sport Fishing (COMM)

Groundwater throughout the Central Coast Region is suitable for agricultural water supply, municipal and domestic water supply, and industrial use. Requirements of this Order implement the Basin Plan.

2. **Thermal Plan.** The State Water Board adopted the *Water Quality Control Plan for Control Temperature in the Coastal and Interstate Water and Enclosed Bays and Estuaries of California* (Thermal Plan) on May 18, 1972, and amended this plan on September 18, 1975. This plan contains temperature objectives for inland surface waters. Requirements of this Order implement the Thermal Plan.
3. **National Toxics Rule (NTR) and California Toxics Rule (CTR).** U.S. EPA adopted the NTR on December 22, 1992, and later amended it on May 4, 1995, and November 9, 1999. About 40 criteria in the NTR applied in California. On May 18, 2000, U.S. EPA adopted the CTR. The CTR promulgated new toxics criteria for California and, in addition, incorporated the previously adopted NTR criteria that were applicable in the state. The CTR was amended on February 13, 2001. These rules contain federal water quality criteria for priority pollutants.
4. **State Implementation Policy.** On March 2, 2000, the State Water Board adopted the *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California* (State Implementation Policy or SIP). The SIP became effective on April 28, 2000, with respect to the priority pollutant criteria promulgated for California by the U.S. EPA through the NTR and to the priority pollutant objectives established by the Central Coast Water Board in the Basin Plan. The SIP became effective on May 18, 2000, with respect to the priority pollutant criteria promulgated by the U.S. EPA through the CTR. The State Water Board adopted amendments to the SIP on February 24, 2005, that became effective on July 13, 2005. The SIP establishes

implementation provisions for priority pollutant criteria and objectives and provisions for chronic toxicity control. Requirements of this Order implement the SIP.

5. **Antidegradation Policy.** Federal regulation 40 CFR section 131.12 requires that state water quality standards include an antidegradation policy consistent with the federal policy. The State Water Board established California's antidegradation policy in State Water Board Resolution No. 68-16, *Statement of Policy with Respect to Maintaining High Quality of Waters in California*. Resolution No. 68-16 is deemed to incorporate the federal antidegradation policy where the federal policy applies under federal law. Resolution No. 68-16 requires that existing water quality be maintained unless degradation is justified based on specific findings. The Central Coast Water Board's Basin Plan implements, and incorporates by reference, both the State and federal antidegradation policies. The permitted discharge must be consistent with the antidegradation provision of 40 CFR section 131.12 and State Water Board Resolution 68-16.
6. **Anti-Backsliding Requirements.** Sections 402(o) and 303(d)(4) of the CWA and federal regulations at 40 CFR section 122.44(l) restrict backsliding in NPDES permits. These anti-backsliding provisions require that effluent limitations in a reissued permit must be as stringent as those in the previous permit, with some exceptions in which limitations may be relaxed.
7. **Endangered Species Act Requirements.** This Order does not authorize any act that results in the taking of a threatened or endangered species or any act that is now prohibited, or becomes prohibited in the future, under either the California Endangered Species Act (Fish and Game Code, section 2050 to 2097) or the Federal Endangered Species Act (16 U.S.C.A. section 1531 to 1544). This Order requires compliance with effluent limits, receiving water limits, and other requirements to protect the beneficial uses of waters of the state. The Discharger is responsible for meeting all requirements of the applicable Endangered Species Act.
8. **State Water Board Recycled Water Policy and State Board Order WQ 2019-0037-EXEC.** The Recycled Water Policy was approved by the State Water Board on December 11, 2018, and became effective on April 8, 2019. The purpose of the Recycled Water Policy is to encourage the safe use of recycled water in a manner that is protective of public health and the environment. State Board Order WQ 2019-0037-EXEC implements the Recycled Water Policy by amending the monitoring and reporting programs for dischargers subject to National Pollutant Discharge Elimination System permits, waste discharge requirements, master recycling permits, and water reclamation requirements to require annual reporting of volumetric data on wastewater and, if applicable, recycled water use by volume and category of reuse. Under State Board Order WQ-2019-0037-EXEC, the regional boards are expected to reissue or otherwise amend monitoring requirements to incorporate the requirements of State Board Order WQ 2019-0037-EXEC.
9. **Water Code section 13267 Requirements.** The technical and monitoring reports for recycled water in this Order are required in accordance with Water Code section 13267, which states the following in subsection (b)(1), "In conducting an investigation specified in subdivision (a), the regional board may require that any person who has discharged, discharges, or is suspected of having discharged discharging, or who proposes to discharge waste within its region, or any citizen or domiciliary, or political agency or entity of this state who has discharged, discharges, or is suspected of having discharged or discharging, or who proposes to discharge, waste outside of its region could affect the quality of waters within its region shall furnish, under penalty of perjury, technical or

monitoring program reports which the regional board requires. The burden, including costs, of these reports shall bear a reasonable relationship to the need for the report and the benefits to be obtained from the reports. In requiring those reports, the regional board shall provide the person with a written explanation with regard to the need for the reports and shall identify the evidence that supports requiring that person to provide the reports.”

The Discharger owns the Facility subject to this Order. The recycled water monitoring and reporting requirements are necessary to determine compliance with this Order. The burden and cost of preparing the reports is reasonable and consistent with the interest of the state in maintaining water quality and developing alternative water supplies to increase water resiliency.

#### **D. Impaired Water Bodies on the CWA section 303(d) List**

CWA section 303(d) requires states to identify specific water bodies where water quality standards are not expected to be met after implementation of technology-based effluent limitations on point sources. For all 303(d) listed water bodies and pollutants, the Central Coast Water Board must develop and implement Total Maximum Daily Loads (TMDLs) that will specify waste load allocations (WLAs) for point sources and load allocations (LAs) for non-point sources.

The U.S. EPA approved the State's 2014-2016 303(d) list of impaired water bodies on April 6, 2018. The 2014-2016 303(d) list identifies Chorro Creek as being impaired for E. coli, fecal coliform, nutrients, sediment/siltation, sodium, chloride, total dissolved solids (TDS), toxicity, and benthic community effects.

TMDLs establish WLAs for point source and LAs for non-point sources and are intended to achieve the water quality standards for the impaired waterbodies.

##### **1. Nutrients and Dissolved Oxygen in Chorro Creek**

The Central Coast Water Board adopted, and the U.S. EPA approved, a TMDL for nutrients and dissolved oxygen in Chorro Creek on July 7, 2006, and July 19, 2007, respectively. The TMDL establishes WLAs for the Discharger to achieve water quality objectives for dissolved oxygen and biostimulatory substances. WLAs applicable to the Discharger as specified by the Nutrients and Dissolved Oxygen TMDL are summarized below.

- a. Effluent discharged shall not cause sodium concentration to exceed 50 mg/L in receiving waters, measured as a monthly maximum determined from monitoring stations not more than 200 feet upstream and downstream of the discharge.
- b. Effluent discharged shall not cause total dissolved solids to exceed 500 mg/L in receiving waters, measured as a monthly maximum determined from monitoring stations not more than 200 feet upstream and downstream of the discharge.
- c. Effluent discharged shall not cause receiving water temperature to be increased by more than 5 °F, measured as a monthly maximum determined from monitoring stations not more than 200 feet upstream and downstream of the discharge.
- d. The monthly nitrate concentration of effluent shall not exceed 10 mg/L-N.
- e. Median orthophosphorus concentrations of effluent from May through September shall not exceed current levels, as measured by a comparison to effluent concentrations from 2004 and 2005.

Section 7.1.1, *Implementation to Achieve TMDLs for Nitrate-N, Sodium, Total Dissolved Solids, and Temperature*, states that the Central Coast Water Board will incorporate effluent and receiving water limitations consistent with the allocations assigned to the



Discharger. This Order implements the nutrients and dissolved oxygen TMDL through receiving water limitations and effluent limitations. Receiving water limitations equal to the applicable WLAs are established for ammonia (unionized, as N), dissolved oxygen, sodium, total dissolved solids, and temperature. An effluent limitation of 10 mg/L is established for total nitrogen, which is more conservative than the 10 mg/L for nitrate-N established in the TMDL.

Section 7.1.2, *Implementation to Achieve the Orthophosphorus-P TMDL*, states, "To date, CMC's orthophosphorus-P levels have not caused receiving water increases above the acceptable range of orthophosphorus-P necessary to control nuisance levels of algae in the impaired lower reaches. Therefore, Central Coast Water Board expects these levels to be maintained with the upgraded treatment operations. To insure that the levels don't cause increases in the acceptable range of orthophosphorus-P, Central Coast Water Board staff will review monitoring data for orthophosphorus-P in monitoring reports submitted by CMC."

The TMDL does not require the implementation of an effluent limitation for orthophosphorus but does require the Central Coast Water Board to monitor and compare the effluent to 2004 and 2005 levels. Within the TMDL, because orthophosphorus data is not available, phosphorus data was used to determine the May through September median for 2004 and 2005. Central Coast Water Board staff assumes that the orthophosphorus concentrations will be less than phosphorus. The resulting median for phosphorus in 2004 and 2005 within the effluent is 2.4 mg/L. Relevant data for phosphorus compounds in the effluent collected over the current permit term are limited to phosphate and orthophosphate. The annual median effluent concentration based on available data for phosphate and orthophosphate are summarized below.

**Table F-5. Phosphate and Orthophosphate Effluent Data Summary**

Year (May through September)	Annual Median (mg/L)	
	Phosphate	Orthophosphate
2012	3.20	3.35
2013	2.00	2.30
2014	3.79	3.59
2015	3.76	3.16
2016	4.00	3.83
2017	4.10	3.30
2018	2.90	2.80

The available data indicate that phosphate concentrations have increased in the Discharger's effluent. Consistent with the requirements of the TMDL, continued monitoring for phosphate and orthophosphate have been retained from the previous order and will continue to be evaluated by the Central Coast Water Board.

**2. Sediment Loading to Morro Bay, Los Osos Creek, and Chorro Creek**

The Central Coast Water Board, State Water Board, California Office of Administrative Law, and U.S. EPA approved Resolution No. R3-2002-0051 on May 16, 2003, September 16, 2003, December 3, 2003, and January 20, 2004, respectively. In Morro Bay, erosion and sedimentation have been accelerated due to anthropogenic watershed disturbances, resulting in impairment of beneficial uses for biological resources and recreational uses. Resolution No. R3-2002-0051 implements the TMDL through the Morro Bay National Estuary Program, Coastal San Luis Resources Conservation District, and other public and private groups, through self-determined activities and trackable

implementation actions focusing on non-point sources. Trackable implementation actions or WLAs are not specified for the Discharger and have not been established in this Order.

### 3. Pathogens for Morro Bay and Chorro and Los Osos Creeks

The Central Coast Water Board, State Water Board, California Office of Administrative Law, and U.S. EPA approved Resolution No. R3-2002-0117 on May 16, 2003, September 16, 2003, November 19, 2003, and January 20, 2004, respectively. Elevated levels of fecal coliform in Morro Bay and Chorro and Los Osos Creeks indicate that pathogens are impairing water contact recreation and shellfish harvesting in these water bodies. High levels of pathogens may cause disease in humans and may also adversely affect marine animals. Resolution No. R3-2002-0117 establishes WLAs and LAs for point sources and non-point sources that are equal to the numeric targets. For Chorro Creek, the geometric mean shall not exceed 200 MPN/100 mL over a 30-day period nor shall 10 percent of the samples exceed 400 MPN/100 mL over any 30-day period for fecal coliform.

However, the Central Coast Water Board established the following effluent limitations for total coliform in R3-2012-0027.

“The median concentration to total coliform bacteria measured in treatment effluent at Discharge Point [No.] 001 shall not exceed a most probably number (MPN) of 2.2 organisms per 100 milliliters (mL), as determined from the last seven days for which analyses have been completed. The number of total coliform bacteria shall not exceed a MPN of 23 per 100 mL in more than one sample in any 30-day period. No sample shall exceed an MPN of 240 total coliform bacteria per 100 mL.”

The effluent limitations for total coliform bacteria have been retained from the previous order and are considered more protective of water quality than the WLAs established for fecal coliform. The implementation of total coliform limitations meets the requirements of the TMDL.

## E. Other Plans, Policies, and Regulations

1. **Storm Water Management.** For the control of storm water discharged from the site of the wastewater treatment facilities, the Order requires the Discharger to seek authorization to discharge under and meet the requirements of the State Water Resource Control Board's Water Quality Order No. 2014-0057-DWQ, NPDES General Permit No. CAS000001, *Waste Discharge Requirements for Discharges of Storm Water Associated with Industrial Activities Excluding Construction Activities*. At this time, the Facility is not required to enroll in the General Permit. If the Facility conditions change, the Central Coast Water Board may require the Discharger to seek coverage under the General Permit.
2. **Statewide General Waste Discharge Requirements for Sanitary Sewer Systems (State Water Board Order No. 2006-0003-DWQ).** The General Permit, adopted on May 2, 2006, is applicable to all “federal and state agencies, municipalities, counties, districts, and other public entities that own or operate sanitary sewer systems greater than one mile in length that collect or convey untreated or partially treated wastewater to a publicly owned treatment facility in the State of California.” The purpose of Water Quality Order 2006-0003-DWQ is to promote the proper and efficient management, operation, and maintenance of sanitary sewer systems and to minimize the occurrences and impacts of sanitary sewer overflows. The Discharger has obtained coverage under the General Permit.

#### IV. RATIONALE FOR EFFLUENT LIMITATIONS AND DISCHARGE SPECIFICATIONS

The CWA requires point source dischargers to control the amount of conventional, non-conventional, and toxic pollutants that are discharged into the waters of the United States. The control of pollutants discharged is established through effluent limitations and other requirements in NPDES permits. There are two principal bases for effluent limitations in the Code of Federal Regulations: 40 CFR section 122.44(a) requires that permits include applicable technology-based limitations and standards; and 40 CFR section 122.44(d) requires that permits include water quality-based effluent limitations to attain and maintain applicable numeric and narrative water quality criteria to protect the beneficial uses of the receiving water.

##### A. Discharge Prohibitions

- 1. Discharge Prohibition III.A. (No discharge at a location or in a manner except as described by the Order).** The limitations and conditions established by the Order are based on specific information provided by the Discharger and gained by the Central Coast Water Board through site visits, review of monitoring reports, and other information. Discharges to surface waters at locations not contemplated by this Order or discharges of a character not contemplated by this Order are therefore viewed as inconsistent with CWA section 402's prohibition against discharges of pollutants except in compliance with the Act's permit requirements, effluent limitations, and other enumerated provisions. This prohibition is retained from the previous permit.
- 2. Discharge Prohibition III.B. (The discharge of any waste not specifically regulated by this Permit is prohibited).** Because limitations and conditions of the Order have been prepared based on specific information provided by the Discharger and specific wastes described by the Discharger, the limitations and conditions of the Order do not adequately address waste streams not contemplated during drafting of the Order. To prevent the discharge of such waste streams that may be inadequately regulated, the Order prohibits the discharge of any waste that was not described by to the Central Coast Water Board during the process of permit reissuance.
- 3. Discharge Prohibition III.C (The overflow, bypass, or overspray of wastewater from the Discharger's facilities and the subsequent discharge of untreated or partially treated wastewater, except as provided for in Attachment D, Standard Provision I.G (Bypass), is prohibited).** The discharge of untreated or partially treated wastewater from the Discharger's collection, treatment, or disposal facilities represents an unauthorized bypass pursuant to 40 CFR 122.41(m) or an unauthorized discharge, which poses a threat to human health and/or aquatic life, and therefore, is explicitly prohibited by this Order.
- 4. Discharge Prohibition III.D (Creation of a condition of pollution, contamination, or nuisance, as defined by Section 13050 of the California Water Code (CWC), is prohibited).** The Basin Plan requires that the disposal of wastewater in ephemeral streams be accomplished in a manner that safeguards public health and prevents nuisance conditions. This prohibition has been retained from Order R3-2012-0027.
- 5. Discharge Prohibition III.E (The discharge shall not cause or contribute to adverse impacts to beneficial uses of water or to threatened or endangered species and their habitat).** This prohibition has been retained from the Order R3-2012-0027.

##### B. Technology-Based Effluent Limitations

###### 1. Scope and Authority

Section 301(b) of the CWA and implementing U.S. EPA permit regulations at 40 CFR section 122.44 require that permits include conditions meeting applicable technology-

based requirements at a minimum, and any more stringent effluent limitations necessary to meet applicable water quality standards. The discharge authorized by this Order must meet minimum federal technology-based requirements based on Secondary Treatment Standards at 40 CFR part 133 as summarized below:

**Table F-6. Secondary Treatment Requirements**

Parameter	Units	30-Day Average	7-Day Average
BOD <sub>5</sub> <sup>[1]</sup>	mg/L	30	45
TSS <sup>[1]</sup>	mg/L	30	45
pH	standard units	6.0 – 9.0 at all times	

<sup>[1]</sup> The 30-day average percent removal for BOD<sub>5</sub> and TSS shall not be less than 85 percent.

**2. Applicable Technology-Based Effluent Limitations**

Title 40 CFR 122.45(f)(1) requires effluent limitations be expressed in terms of mass, with some exceptions, and 40 CFR 122.45(f)(2) allows pollutants that are limited in terms of mass to additionally be limited in terms of other units of measurement. This Order includes effluent limitations expressed in terms of mass and concentration. In addition, pursuant to the exceptions to mass limitations provided in 40 CFR 122.45(f)(1), some effluent limitations are not expressed in terms of mass, such as pH and temperature, and when the applicable standards are expressed in terms of concentration and mass limitations are not necessary to protect the beneficial uses of the receiving waters.

The following table summarizes technology-based effluent limitations established by this Order at Discharge Point No. 001.

**Table F-7. Technology-Based Effluent Limitations**

Parameter	Units	Effluent Limitations		
		Average Monthly	Average Weekly	Maximum Daily
BOD <sub>5</sub> <sup>[1]</sup>	mg/L	10	30	50
	lbs/day <sup>[2]</sup>	100	300	500
TSS <sup>[1]</sup>	mg/L	10	30	50
	lbs/day <sup>[2]</sup>	100	300	500
Settleable Solids	mL/L	0.1	---	0.3
Flow	MGD	1.2	---	---

<sup>[1]</sup> The 30-day average percent removal for BOD<sub>5</sub> and TSS shall not be less than 85 percent.

<sup>[2]</sup> Mass-based effluent limitations were calculated using a design flow of 1.2 MGD.

- a. **BOD<sub>5</sub> and TSS.** Federal regulations at 40 CFR 133 establish the minimum weekly and monthly average level of effluent quality attainable by secondary treatment for BOD<sub>5</sub> and TSS. However, effluent limitations contained in Order No. R3-2012-0027 for BOD<sub>5</sub> and TSS are based on a tertiary level of treatment provided by the Facility. The application of tertiary treatment processes results in the ability to achieve lower levels for BOD<sub>5</sub> and TSS than the secondary standards currently prescribed. Effluent limitations for BOD<sub>5</sub> and TSS have been retained from Order No. R3-2012-0027 and represent the degree of treatment capable of the Facility.

In addition to the average weekly and average monthly effluent limitations, a daily maximum effluent limitation for BOD<sub>5</sub> and TSS is included in this Order to ensure that the treatment works are not organically overloaded and operate in accordance with design capabilities. These effluent limitations have been adopted for similar facilities in the Central Coast region that provide this level of treatment.

Additionally, 40 CFR 133.012, in describing the minimum level of effluent quality attainable by secondary treatment, states that the 30-day average percent removal shall not be less than 85 percent. If 85 percent removal of BOD<sub>5</sub> and TSS must be achieved by a secondary treatment, it must also be achieved by a tertiary (i.e., treatment beyond secondary level) treatment plant. This Order contains a limitation requiring an average of 85 percent removal of BOD<sub>5</sub> and TSS over each calendar month.

- b. Settleable Solids.** The Basin Plan establishes a narrative effluent limitation for settleable solids, which states, "Waters shall not contain settleable material in concentrations that result in deposition of material that causes nuisance or adversely affects beneficial uses." The previous order established an average monthly effluent limitation (AMEL) and a maximum daily effluent limitation (MDEL) of 0.1 mL/L and 0.3 mL/L, respectively.

The effluent limitation for settleable solids is retained from the previous order. The limitation reflects the level of effluent quality achievable through secondary treatment and is protective of the narrative criteria. The limitation is also retained to ensure that the current level of treatment is maintained.

- c. pH.** Federal regulations at 40 CFR part 133 establish technology-based effluent limitations for pH. The secondary treatment standards require the pH of the effluent to be no lower than 6.0 and no greater than 9.0 standard units. This technology-based effluent limitation is not as stringent as the WQBELs for pH as discussed in section IV.C.6 of this Fact Sheet, established by Order No. R3-2012-0027, which have been retained in this Order.
- d. Flow.** The Facility was designed to provide a tertiary level of treatment for up to an average dry weather design flow of 1.2 MGD. Therefore, this Order contains an average monthly discharge flow effluent limit of 1.2 MGD.

## **C. Water Quality-Based Effluent Limitations (WQBELs)**

### **1. Scope and Authority**

CWA Section 301(b) and 40 CFR section 122.44(d) require that permits include limitations more stringent than applicable federal technology-based requirements where necessary to achieve applicable water quality standards.

Section 122.44(d)(1)(i) of 40 CFR requires that permits include effluent limitations for all pollutants that are or may be discharged at levels that have the reasonable potential to cause or contribute to an exceedance of a water quality standard, including numeric and narrative objectives within a standard. Where reasonable potential has been established for a pollutant, but there is no numeric criterion or objective for the pollutant, WQBELs must be established using: (1) U.S. EPA criteria guidance under CWA section 304(a), supplemented where necessary by other relevant information; (2) an indicator parameter for the pollutant of concern; or (3) a calculated numeric water quality criterion, such as a proposed state criterion or policy interpreting the state's narrative criterion, supplemented with other relevant information, as provided in section 122.44(d)(1)(vi).

The process for determining reasonable potential and calculating WQBELs when necessary is intended to protect the designated uses of the receiving water as specified in the Basin Plan, and achieve applicable water quality objectives and criteria that are contained in other state plans and policies, or any applicable water quality criteria contained in the CTR and NTR.

## 2. Applicable Beneficial Uses and Water Quality Criteria and Objectives

Beneficial uses described by the Basin Plan for Chorro Creek are presented in section III.C.1 of this Fact Sheet. Water quality criteria applicable to this receiving water are established by the CTR, the NTR, and by the Basin Plan.

## 3. Determining the Need for WQBELs

NPDES regulations at 40 CFR 122.44(d) require effluent limitations to control all pollutants which are or may be discharged at a level which will cause, have the reasonable potential to cause, or contribute to an excursion above any State water quality standard.

The SIP, statewide policy that became effective on May 22, 2000, establishes procedures to implement water quality criteria from the NTR and CTR and for priority, toxic pollutant objectives established in the Basin Plan. The implementation procedures of the SIP include methods to determine reasonable potential (for pollutants to cause or contribute to excursions above State water quality standards) and to establish numeric effluent limitations, if necessary, for those pollutants that show reasonable potential.

The SIP Section 1.3 requires the Central Coast Water Board to use all available valid, relevant, and representative receiving water and effluent data and information to conduct a reasonable potential analysis. The Central Coast Water Board analyzed the Discharger's data for priority pollutants and the nature of the discharge to determine if the discharge has Reasonable Potential. The RPA is based on effluent monitoring data collected by the Discharger from January 2013 through August 2018.

Some freshwater water quality criteria for metals are hardness dependent; i.e., as hardness decreases, the toxicity of certain metals increases and the applicable water quality criteria become correspondingly more stringent. Central Coast Water Board staff used a hardness value of 192 mg/L as a lowest and conservative estimate of the receiving water hardness to determine hardness-based criteria. The minimum hardness value was determined from receiving water monitoring data collected by the Discharger at Monitoring Location R-002 between January 2013 through August 2018.

To conduct the reasonable potential analysis, the Central Coast Water Board identified the maximum observed effluent (MEC) and background (B) concentrations for each priority, toxic pollutant from receiving water and effluent data provided by the Discharger and compared this data to the most stringent applicable water quality criterion (C) for each pollutant from the NTR, CTR, and the Basin Plan. Section 1.3 of the SIP establishes three triggers for a finding of reasonable potential.

- a. **Trigger 1.** If the MEC is greater than C, there is reasonable potential, and an effluent limitation is required.
- b. **Trigger 2.** If B is greater than C, and the pollutant is detected in effluent (MEC > ND), there is reasonable potential, and an effluent limitation is required.
- c. **Trigger 3.** After reviewing other available and relevant information, a permit writer may decide that a WQBEL is required. Such additional information may include, but is not limited to: the facility type, the discharge type, solids loading analyses, lack of dilution, history of compliance problems, potential toxic impact of the discharge, fish tissue residue data, water quality and beneficial uses of the receiving water, CWA 303(d) listing for the pollutant, and the presence of endangered or threatened species or their critical habitat.

Based on analysis of effluent data, the Central Coast Water Board, using methods presented in the SIP, finds that the discharge does not have reasonable potential to cause or contribute to in-stream excursions above applicable water quality criteria for the priority toxic pollutants with the exception of copper, chlorodibromomethane, dichlorobromomethane, and bis(2-ethylhexyl) phthalate.

The following table summarizes the RPA for each priority, toxic, or title 22 pollutant for which data was available from January 2013 to August 2018.

**Table F-8. Summary of RPA Results**

Parameter	Units	N <sup>[1]</sup>	MEC <sup>[2]</sup>	Most Stringent Criteria	Background	RPA Result <sup>[3]</sup>
Antimony	µg/L	4	4.0	6.0	1.3	No
Arsenic	µg/L	4	0.75	10	1.6	No
Beryllium	µg/L	4	<0.043	4.0	<0.09	No
Cadmium	µg/L	4	0.03	4.11	<0.1	No
Chromium (III)	µg/L	4	2.37	50	<300	No
Chromium (VI) <sup>[4]</sup>	µg/L	4	<0.012	10	1.5	No
<b>Copper</b>	<b>µg/L</b>	<b>64</b>	<b>60.4</b>	<b>16.3</b>	<b>1.0</b>	<b>Yes</b>
Lead	µg/L	4	0.40	7.3	<900	No
Mercury	µg/L	4	0.01	0.012	<46	No
Nickel	µg/L	4	2.23	90.6	9.2	No
Selenium	µg/L	4	1.20	20	2.4	No
Silver	µg/L	4	<0.012	12.5	<0.4	No
Thallium	µg/L	4	0.07	1.7	<2.2	No
Zinc	µg/L	4	27.5	200	2.9	No
Cyanide	µg/L	4	<0.9	5.2	<0.9	No
Asbestos	µg/L	4	<0.0001	7,000,000	<0.001	No
2,3,7,8 TCDD	µg/L	4	<1.36E-06	1.3E-08	<3.4E-06	No
Acrolein	µg/L	4	<0.4	320	<0.4	No
Acrylonitrile	µg/L	4	<0.8	0.059	<0.8	No
Benzene	µg/L	4	<0.03	1.0	<0.03	No
Bromoform	µg/L	4	<0.03	4.3	<0.03	No
Carbon Tetrachloride	µg/L	4	<0.02	0.25	<0.02	No
Chlorobenzene	µg/L	4	<0.03	70	<0.03	No
<b>Chlorodibromomethane</b>	<b>µg/L</b>	<b>71</b>	<b>10.9</b>	<b>0.40</b>	<b>&lt;0.07</b>	<b>Yes</b>
Chloroethane	µg/L	4	<0.08	No Criteria	<0.08	Uc
2-Chloroethylvinyl Ether	µg/L	4	<0.08	No Criteria	<0.8	Uc
Chloroform	µg/L	4	0.18	No Criteria	<0.05	Uc
<b>Dichlorobromomethane</b>	<b>µg/L</b>	<b>71</b>	<b>31.4</b>	<b>0.56</b>	<b>&lt;0.07</b>	<b>Yes</b>
1,1-Dichloroethane	µg/L	4	<0.036	5.0	<0.004	No
1,2-Dichloroethane	µg/L	4	<0.036	0.38	<0.04	No
1,1-Dichloroethylene	µg/L	4	<0.036	0.057	<0.05	No
1,2-Dichloropropane	µg/L	4	<0.037	0.52	<0.06	No
1,3-Dichloropropylene	µg/L	4	<0.04	0.50	<0.06	No
Ethylbenzene	µg/L	4	<0.03	300	<0.03	No
Methyl Bromide	µg/L	4	<0.05	48	<0.05	No
Methyl Chloride	µg/L	4	0.31	No Criteria	<6.0E-08	Uc
Methylene Chloride	µg/L	4	<0.052	4.7	<8.0E-08	No

Parameter	Units	N <sup>[1]</sup>	MEC <sup>[2]</sup>	Most Stringent Criteria	Background	RPA Result <sup>[3]</sup>
1,1,2,2-Tetrachloroethane	µg/L	4	<0.095	0.17	<0.08	No
Tetrachloroethylene	µg/L	4	<0.08	0.8	<0.08	No
Toluene	µg/L	4	<0.04	150	<0.04	No
1,2-Trans-Dichloroethylene	µg/L	4	<0.036	10	<0.04	No
1,1,1-Trichloroethane	µg/L	4	<0.05	200	<0.05	No
1,1,2-Trichloroethane	µg/L	4	<0.01	0.6	<0.1	No
Trichloroethylene	µg/L	4	<0.06	2.7	<0.06	No
Vinyl Chloride	µg/L	4	<0.06	0.50	<0.06	No
2-Chlorophenol	µg/L	4	<0.8	120	<0.08	No
2,4-Dichlorophenol	µg/L	4	<0.79	93	<0.8	No
2,4-Dimethylphenol	µg/L	4	<0.76	540	<0.8	No
4,6-dinitro-o-cresol (2-methyl-4,6-Dinitrophenol)	µg/L	4	<0.43	13.4	<2.2	No
2,4-Dinitrophenol	µg/L	4	<0.22	70	<0.3	No
2-Nitrophenol	µg/L	4	<1.1	No Criteria	<1.2	Uc
4-Nitrophenol	µg/L	4	<0.1	No Criteria	<0.1	Uc
3-Methyl-4-Chlorophenol (P-chloro-m-cresol)	µg/L	4	<0.6	No Criteria	<0.6	Uc
Pentachlorophenol	µg/L	4	<0.053	0.28	<0.053	No
Phenol	µg/L	4	<0.3	21,000	<0.3	No
2,4,6-Trichlorophenol	µg/L	4	<0.9	2.1	<1.6	No
Acenaphthene	µg/L	4	<0.5	1,200	<0.6	No
Acenaphthylene	µg/L	4	<0.39	No Criteria	<1.0	Uc
Anthracene	µg/L	4	<0.3	9,600	<0.3	No
Benzidine	µg/L	4	<0.2	0.00012	<0.2	No
Benzo(a)Anthracene	µg/L	4	<0.43	0.0044	<0.4	No
Benzo(a)Pyrene	µg/L	4	<0.4	0.0044	<1.2	No
Benzo(b)Fluoranthene	µg/L	4	<0.37	0.0044	<0.8	No
Benzo(ghi)Perylene	µg/L	4	<0.4	No Criteria	<1.3	Uc
Benzo(k)Fluoranthene	µg/L	4	<0.5	0.0044	<1.0	No
Bis(2-Chloroethoxy) Methane	µg/L	4	<0.4	No Criteria	<0.4	Uc
Bis(2-Chloroethyl) Ether	µg/L	4	<0.52	0.031	<0.6	No
Bis(2-Chloroisopropyl) Ether	µg/L	4	<0.4	1,400	<0.4	No
<b>Bis(2-Ethylhexyl) Phthalate</b>	<b>µg/L</b>	<b>56</b>	<b>13.1</b>	<b>1.8</b>	<b>&lt;0.7</b>	<b>Yes</b>
4-Bromophenyl Phenyl Ether	µg/L	4	<0.46	No Criteria	<0.8	Uc
Butylbenzyl Phthalate	µg/L	4	<0.29	3,000	<1	No
2-Chloro Naphthalene	µg/L	4	<0.2	1,700	<0.2	No
4-Chlorophenyl Phenyl Ether	µg/L	4	<0.5	No Criteria	<0.5	Uc
Chrysene	µg/L	4	<0.5	0.0044	<0.5	No
Dibenzo(a,h)Anthracene	µg/L	4	<0.37	0.0044	<1.6	No
1,2-Dichlorobenzene	µg/L	4	<0.47	600	<0.06	No
1,3-Dichlorobenzene	µg/L	4	<0.3	400	<0.03	No
1,4-Dichlorobenzene	µg/L	4	<0.47	5.0	<0.05	No
3,3 Dichlorobenzidine	µg/L	4	<0.43	0.040	<0.8	No
Diethyl Phthalate	µg/L	4	<0.34	23,000	<0.6	No
Dimethyl Phthalate	µg/L	4	<0.31	313,000	<0.8	No



Parameter	Units	N <sup>[1]</sup>	MEC <sup>[2]</sup>	Most Stringent Criteria	Background	RPA Result <sup>[3]</sup>
Di-n-Butyl Phthalate	µg/L	4	2.90	2,700	<0.04	No
2,4-Dinitrotoluene	µg/L	4	<0.49	0.11	<0.8	No
2,6-Dinitrotoluene	µg/L	4	<0.55	No Criteria	<0.8	Uc
Di-n-Octyl Phthalate	µg/L	4	<0.31	No Criteria	<0.7	Uc
1,2-Diphenylhydrazine	µg/L	1	<0.47	0.04	N/A	No
Fluoranthene	µg/L	4	<0.44	300	<0.6	No
Fluorene	µg/L	4	<0.5	1,300	<0.5	No
Hexachlorobenzene	µg/L	4	<0.47	0.00075	<0.6	No
Hexachlorobutadiene	µg/L	4	<0.45	0.44	<7.0E-08	No
Hexachlorocyclopentadiene	µg/L	4	<0.24	50	<0.06	No
Hexachloroethane	µg/L	4	<0.43	1.9	<0.5	No
Indeno(1,2,3-cd) Pyrene	µg/L	4	<0.38	0.0044	<1.6	No
Isophorone	µg/L	4	<0.3	8.4	<0.3	No
Naphthalene	µg/L	4	<0.5	No Criteria	<0.5	Uc
Nitrobenzene	µg/L	4	<0.47	17	<0.7	No
N-Nitrosodimethylamine	µg/L	4	<0.4	0.00069	<0.4	No
N-Nitrosodi-n-Propylamine	µg/L	4	<0.3	0.0050	<0.3	No
N-Nitrosodiphenylamine	µg/L	4	<0.6	5.0	<0.6	No
Phenanthrene	µg/L	4	<0.4	No Criteria	<0.4	Uc
Pyrene	µg/L	4	<0.46	960	<1.0	No
1,2,4-Trichlorobenzene	µg/L	4	<0.068	5.0	<0.02	No
Aldrin	µg/L	4	<0.00091	0.00013	<0.01	No
alpha-BHC	µg/L	4	<0.0013	0.0039	<0.011	No
beta-BHC	µg/L	4	<0.0015	0.014	<0.011	No
gamma-BHC	µg/L	4	<0.0013	0.019	<0.013	No
delta-BHC	µg/L	4	<0.0018	No Criteria	<0.021	Uc
Chlordane	µg/L	4	<0.000011	0.00057	N/A	No
4,4'-DDT	µg/L	4	<0.00095	0.00059	<0.004	No
4,4'-DDE	µg/L	4	<0.00035	0.00059	<0.005	No
4,4'-DDD	µg/L	4	<0.00054	0.00083	<0.006	No
Dieldrin	µg/L	4	<0.0000028	0.00014	<0.006	No
alpha-Endosulfan	µg/L	4	<0.0021	0.056	<0.007	No
beta-Endosulfan	µg/L	4	<0.0021	0.056	<0.021	No
Endosulfan Sulfate	µg/L	4	<0.0012	110	<0.005	No
Endrin	µg/L	4	<0.0013	0.04	<0.005	No
Endrin Aldehyde	µg/L	4	<0.0019	0.76	<0.006	No
Heptachlor	µg/L	4	<0.016	0.00021	<0.016	No
Heptachlor Epoxide	µg/L	4	<0.02	0.00010	<0.02	No
PCBs sum	µg/L	4	<0.06	0.00017	<0.06	No
Toxaphene	µg/L	4	<0.073	0.00020	N/A	No
<b>Drinking Water Quality Objectives</b>						
Aluminum	µg/L	4	97.6	1,000	<24.5	No
Barium	µg/L	4	31.6	1,000	81	No
Fluoride	µg/L	4	230	1,000	230	No
cis-1,2-Dichloroethylene	µg/L	4	<0.03	6.0	<0.06	No

Parameter	Units	N <sup>[1]</sup>	MEC <sup>[2]</sup>	Most Stringent Criteria	Background	RPA Result <sup>[3]</sup>
Methyl-tert-butyl ether	µg/L	4	<0.042	13	<0.05	No
Styrene	µg/L	4	<0.061	100	<0.09	No
Trichlorofluoromethane	µg/L	4	<0.05	150	<0.05	No
1,1,2-Trichloro-1,2,2-Trifluoroethane	µg/L	4	<0.05	1,200	<0.05	No
Xylenes	µg/L	4	<0.1	1,750	<0.05	No
Alachlor	µg/L	4	<0.1	2.0	<0.13	No
Atrazine	µg/L	1	<0.14	1.0	N/A	No
Bentazon	µg/L	4	<0.11	18	N/A	No
Carbofuran	µg/L	4	<0.49	18	<0.11	No
2,4-D	µg/L	4	<0.086	70	<0.086	No
Dalapon	µg/L	4	<0.115	200	<0.115	No
Dibromochloropropane (1,2-Dibromo-3-chloropropane)	µg/L	4	<0.04	0.20	<0.07	No
Di(2-ethylhexyl) Adipate	µg/L	1	<5.0	400	N/A	No
Dinoseb	µg/L	4	<0.083	7.0	<0.083	No
Diquat	µg/L	4	<0.000002	20	<0.00002	No
Endothall	µg/L	4	<0.000005	100	<5.0	No
Ethylene Dibromide	µg/L	4	<0.036	0.05	N/A	No
Glyphosate	µg/L	4	<0.000025	700	<0.000025	No
Methoxychlor	µg/L	4	<0.013	30	N/A	No
Molinate	µg/L	1	<0.13	20	N/A	No
Oxamyl	µg/L	4	<0.001	50	<1.0	No
Picloram	µg/L	4	<0.02	500	<0.02	No
Simazine	µg/L	1	<0.16	4.0	N/A	No
Thiobencarb	µg/L	4	<0.15	70	<0.4	No
2,4,5-TP(Silvex)	µg/L	4	<0.095	10	<0.095	No
<b>Nitrate, (as N)</b>	<b>mg/L</b>	<b>293</b>	<b>22.4</b>	<b>10</b>	<b>2.5</b>	<b>Yes<sup>[5]</sup></b>
Nitrate Plus Nitrite (as N)	mg/L	4	N/A	10	N/A	Ud
Nitrite (as N)	mg/L	290	0.97	1.0	<0.1	No
Perchlorate	µg/L	4	<0.09	6.0	N/A	No
<b>R3 Basin Plan Water Quality Objectives</b>						
Cobalt	µg/L	4	0.396	50	<0.2	No
Iron	µg/L	4	92.8	5,000	31	No
Lithium	µg/L	4	9.06	2,500	<4,390	No
Manganese	µg/L	4	1.02	200	<600	No
Molybdenum	µg/L	4	5.1	10	2.7	No
Vanadium	µg/L	4	3.27	100	4.5	No
Methylene Blue Activated Substances	µg/L	4	53.6	200	<60	No
<b>Phthalate Esters</b>	<b>µg/L</b>	<b>4</b>	<b>2.9</b>	<b>0.002</b>	<b>&lt;40</b>	<b>Yes</b>
Un-ionized Ammonia as N	mg/L	4	0.023	0.025	0.013	No
Boron	mg/L	21	0.367	0.4	0.071	No
<b>Chloride</b>	<b>mg/L</b>	<b>4</b>	<b>202</b>	<b>100</b>	<b>110</b>	<b>Yes<sup>[6]</sup></b>
<b>Sodium</b>	<b>mg/L</b>	<b>67</b>	<b>152</b>	<b>100</b>	<b>60.2</b>	<b>Yes<sup>[6]</sup></b>
Sulfate	mg/L	4	144	350	29	No

Parameter	Units	N <sup>[1]</sup>	MEC <sup>[2]</sup>	Most Stringent Criteria	Background	RPA Result <sup>[3]</sup>
TDS	mg/L	67	669	1,000	734	No

N/A = Data was not available.

<sup>[1]</sup> Number of data points available for the RPA.

<sup>[2]</sup> If there is a detected value, the highest reported value is summarized in the table. If there are no detected values, if available, the lowest MDL is summarized in the table.

<sup>[3]</sup> RPA Results:

= Yes, if MEC > WQO/WQC, or B > WQO/WQC and MEC is detected;

= No, if MEC and B are < WQO/WQC or all effluent data are undetected;

= Undetermined, if no criteria have been promulgated (Uc), or for lack of data (Ud).

<sup>[4]</sup> Reported as Total Chromium.

<sup>[5]</sup> The reasonable potential for nitrate (as NO<sub>3</sub>) to exceed the water quality objective is addressed by the TMDL for nutrients and dissolved oxygen in Chorro Creek.

<sup>[6]</sup> The reasonable potential for chloride and sodium to exceed the water quality objective is addressed in the Discharger's Salt and Nutrient Management Plan.

#### 4. WQBEL Calculations

The following example demonstrates how WQBELs were established for this Order for copper.

Final WQBELs for copper have been determined using the methods described in Section 1.4 of the SIP.

**Step 1:** For each water quality criterion/objective, an effluent concentration allowance (ECA) is calculated from the following equation to account for dilution and background levels of each pollutant.

$$ECA = C + D(C - B), \quad \text{when } C > B, \text{ and}$$

$$ECA = C \quad \text{when } C \leq B,$$

Where,

C = the applicable water quality criterion (adjusted for receiving water hardness and expressed as total recoverable metal, if applicable).

D = the dilution credit (here D = 0, as the Central Coast Water Board has no information with which to justify credit for dilution).

B = the background concentration

As discussed above, for this Order, dilution was not allowed; therefore:

$$ECA = C$$

For copper the applicable water quality criteria are:

$$ECA_{\text{acute}} = 25.88 \mu\text{g/L}$$

$$ECA_{\text{chronic}} = 16.29 \mu\text{g/L}$$

**Step 2:** For each ECA based on an aquatic life criterion, the long-term average discharge condition (LTA) is determined by multiplying the ECA times a factor (multiplier), which adjusts the ECA to account for effluent variability. The multiplier varies depending on the coefficient of variation (CV) of the data set and whether it is an acute or chronic criterion/objective. Table 1 of the SIP provides pre-calculated values for the multipliers based on the value of the CV. When the data set contains less than 10

sample results, or 80 percent or more of the data are reported as nondetect (ND), the CV is set equal to 0.6. Derivation of the multipliers is presented in Section 1.4 of the SIP.

$$LTA_{acute} = ECA_{acute} \times Multiplier_{acute\ 99}$$

$$LTA_{chronic} = ECA_{chronic} \times Multiplier_{chronic\ 99}$$

For copper, the following data was used to develop the acute and chronic LTA using equations provided in Section 1.4, Step 3 of the SIP (Table 1 of the SIP also provides this data up to three decimals):

No. of Samples	CV	ECA Multiplier <sub>acute 99</sub>	ECA Multiplier <sub>chronic 99</sub>
69	1.64	0.13	0.24

$$LTA_{acute} = 25.88 \mu\text{g/L} \times 0.13 = 3.48 \mu\text{g/L}$$

$$LTA_{chronic} = 16.29 \mu\text{g/L} \times 0.24 = 3.96 \mu\text{g/L}$$

**Step 3:** WQBELs, including an average monthly effluent limitation (AMEL) and a maximum daily effluent limitation (MDEL) are calculated using the most limiting (the lowest) LTA. The LTA is multiplied times a factor that accounts for averaging periods and exceedance frequencies of the effluent limitations, and for the AMEL, the effluent monitoring frequency. Here, the sampling frequency is set equal to 4 (n = 4). The 99th percentile occurrence probability was used to determine the MDEL multiplier and a 95th percentile occurrence probability was used to determine the AMEL multiplier. Table 2 of the SIP presents the MDEL and AMEL multipliers as a function of the CV. When the data set contains less than 10 sample results, or when 80 percent or more of the data set is reported as non-detect (ND), the CV is set equal to 0.6. Otherwise, the CV is calculated as the standard deviation divided by the mean.

For copper, the most limiting LTA was the  $LTA_{acute}$ .

$$LTA_{copper} = LTA_{acute} = 3.48 \mu\text{g/L}$$

**Step 4:** Calculate the WQBELs by multiplying the LTA by a factor (multiplier). WQBELs are expressed as AMEL and MDEL. The multiplier is a statistically based factor that adjusts the LTA for the averaging periods and exceedance frequencies of the criteria/objectives and the effluent limitations. The value of the multiplier varies depending on the probability basis, the coefficient of variation (CV) of the data set, the number of samples (for AMEL) and whether it is a monthly or daily limit. Table 2 of the SIP provides pre-calculated values for the multipliers based on the value of the CV and the number of samples. Equations to develop the multipliers in place of using values in the tables are provided in Section 1.4, Step 5 of the SIP and will not be repeated here.

$$AMEL_{aquatic\ life} = LTA \times AMEL_{multiplier\ 95}$$

$$MDEL_{aquatic\ life} = LTA \times MDEL_{multiplier\ 99}$$

AMEL multipliers are based on a 95th percentile occurrence probability, and the MDEL multipliers are based on the 99th percentile occurrence probability. If the number of samples is less than four (4), the default number of samples to be used is four (4).

For copper, the following data was used to develop the AMEL and MDEL for aquatic life using equations provided in Section 1.4, Step 5 of the SIP (Table 2 of the SIP also provides this data up to two decimals):

No. of Samples Per Month	CV	Multiplier <sub>MDEL 99</sub>	Multiplier <sub>AMEL 95</sub>
69	1.64	7.44	2.52

$$AMEL_{\text{aquatic life}} = 3.48 \mu\text{g/L} \times 2.52 = 8.76 \mu\text{g/L}$$

$$MDEL_{\text{aquatic life}} = 3.48 \mu\text{g/L} \times 7.44 = 25.88 \mu\text{g/L}$$

*Calculation of human health AMEL and MDEL:*

**Step 5:** For the ECA based on human health, set the AMEL equal to the ECA<sub>human health</sub>

$$AMEL_{\text{human health}} = ECA_{\text{human health}}$$

For copper:

$$AMEL_{\text{human health}} = 200 \mu\text{g/L}$$

**Step 6:** Calculate the MDEL for human health by multiplying the AMEL by the ratio of the Multiplier<sub>MDEL</sub> to the Multiplier<sub>AMEL</sub>. Table 2 of the SIP provides pre-calculated ratios to be used in this calculation based on the CV and the number of samples.

$$MDEL_{\text{human health}} = AMEL_{\text{human health}} \times (\text{Multiplier}_{\text{MDEL}} / \text{Multiplier}_{\text{AMEL}})$$

For copper, the following data were used to develop the MDEL<sub>human health</sub>:

No. of Samples Per Month	CV	Multiplier <sub>MDEL 99</sub>	Multiplier <sub>AMEL 95</sub>	Ratio
69	1.64	7.44	2.52	2.95

$$MDEL_{\text{human health}} = 200 \mu\text{g/L} \times 2.95 = 590 \mu\text{g/L}$$

**Step 7:** Select the lower of the AMEL and MDEL based on aquatic life and human health as the water-quality based effluent limit for the Order.

For copper the AMEL<sub>human health</sub> and MDEL<sub>human health</sub> were 200 μg/L and 590 μg/L. Thus, the aquatic life criteria-based effluent limitations were more stringent and were considered in the Order. The newly calculated aquatic life criteria-based effluent limitations were compared to the effluent limitations established for copper in Order R3-2012-0027 (average monthly effluent limitation of 7.5 μg/L; maximum daily effluent limitation of 17 μg/L). The effluent limitations in Order R3-2012-0027 were more stringent than the newly calculated effluent limitations. Thus, the effluent limitations for copper from the previous permit term are retained.

**5. Whole Effluent Toxicity (WET)**

WET limitations protect receiving water from the aggregated toxic effect of a mixture of pollutants in effluent. WET tests measure the degree of response of exposed aquatic test organisms to an effluent. The WET approach allows for protection of the narrative “no toxics in toxic amounts” criterion while implementing numeric criteria for toxicity. There are two types of WET tests – acute and chronic. An acute test is conducted over a short time period and measures mortality. An acute toxicity test is conducted over a short time

period and measures mortality. A chronic toxicity test is conducted over a longer period of time and may measure mortality, reproduction, and growth.

The Basin Plan requires that all waters shall be maintained free of toxic substances in concentrations which are toxic to, or which produce detrimental physiological responses in, human, plant, animal, or aquatic life. Survival of aquatic organisms in surface waters subjected to a waste discharge or other controllable water quality conditions shall not be less than that for the same waterbody in areas unaffected by the waste discharge or for another control water.

The previous order established narrative effluent limitations for acute toxicity and chronic toxicity, and a chronic toxicity trigger to ensure compliance with Basin Plan narrative objective. The acute and chronic toxicity effluent limitations have been retained from the previous order.

Numeric chronic WET effluent limitations have not been included in this Order. The SIP contains implementation gaps regarding the appropriate form and implementation of chronic toxicity limits. This has resulted in the petitioning of a NPDES permit in the Los Angeles Region<sup>1</sup> that contained numeric chronic toxicity effluent limitations. To address the petition, the State Water Board adopted WQO 2003-012 directing its staff to revise the toxicity control provisions in the SIP. The State Water Board states the following in WQO 2003-012, "In reviewing this petition and receiving comments from numerous interested persons on the propriety of including numeric effluent limitations for chronic toxicity in NPDES permits for publicly-owned treatment works that discharge to inland waters, we have determined that this issue should be considered in a regulatory setting, in order to allow for full public discussion and deliberation. We intend to modify the SIP to specifically address the issue. We anticipate that review will occur within the next year. We therefore decline to make a determination here regarding the propriety of the final numeric effluent limitations for chronic toxicity contained in these permits." The process to revise the SIP is currently underway. Proposed changes include clarifying the appropriate form of effluent toxicity limits in NPDES permits and general expansion and standardization of toxicity control implementation related to the NPDES permitting process. Since the toxicity control provisions in the SIP are currently under revision, it is inappropriate to carry over numeric effluent limitations for chronic toxicity. Therefore, this Order retains the narrative chronic toxicity effluent limitation and numeric chronic toxicity trigger, consistent with the previous chronic toxicity effluent limitation, which will require that the Discharger meet best management practices for compliance with the Basin Plan's narrative toxicity objective, as allowed under 40 CFR 122.44(k).

To ensure compliance with the Basin Plan's narrative toxicity objective, the Discharger is required to conduct acute and chronic WET testing, as specified in the Monitoring and Reporting Program (Attachment E, section V). Furthermore, the Special Provision contained at VI.C.2.a of this Order requires the Discharger to investigate the causes of and identify and implement corrective actions to reduce or eliminate effluent toxicity. If the discharge demonstrates toxicity exceeding the acute toxicity effluent limitation or numeric chronic toxicity monitoring trigger, the Discharger is required to initiate a Toxicity Reduction Evaluation (TRE) in accordance with an approved TRE workplan. The numeric chronic toxicity monitoring trigger is not an effluent limitation; it is the toxicity

---

<sup>1</sup> In the Matter of the Review of Own Motion of Waste Discharge Requirements Order Nos. R4-2002-0121 [NPDES No. CA0054011] and R4-2002-0123 [NPDES NO. CA0055119] and Time Schedule Order Nos. R4-2002-0122 and R4-2002-0124 for Los Coyotes and Long Beach Wastewater Reclamation Plants Issued by the California Regional Water Quality Control Board, Los Angeles Region SWRCB/OCC FILES A-1496 and 1496(a).

threshold at which the Discharger is required to perform accelerated chronic toxicity monitoring, as well as, the threshold to initiate a TRE if effluent toxicity has been demonstrated.

## 6. Basin Plan

**a. Total Coliform Bacteria.** As discussed in section III.D of this Fact Sheet, a TMDL for pathogens is applicable to Chorro Creek. The TMDL for pathogens establishes the following WLAs for fecal coliform:

- i. The geometric mean shall not exceed 200 MPN/100mL over a 30-day period; and
- ii. No more than 10 percent of the samples shall exceed 400 MPN/100 mL over any 30-day period.

These WLAs were consistent with the bacteria objectives for the REC-1 beneficial use, which is applicable to the receiving water. However, on August 7, 2018, the State Water Board adopted Part 3 of the *Water Quality Control Plan for Inland Surface Waters, Enclosed Bays, and Estuaries of California – Bacteria Provisions and a Water Quality Standards Variance Policy*, which establishes water quality objectives for reasonable protection of people that recreate within all surface waters, enclosed bays, and estuaries of the state that have the water contact recreation beneficial use (REC 1). In accordance with the water quality objectives outlined in the statewide bacteria provisions for the protection of waters used for water contact recreation, disinfected effluent shall not contain E. coli bacteria exceeding the following limitations:

In waters where the salinity is greater than 1 part per thousand (ppt) 5 percent or more of the time:

- i. The concentration of enterococci shall not exceed 30 colony forming units (cfu) per 100 milliliters (mL) as a six-week rolling geometric mean, calculated weekly.
- ii. A statistical threshold value (STV) of 110 cfu/100 mL for enterococci shall not be exceeded by more than 10 percent of the samples collected in a calendar month and calculated in a static manner.

Order No. R3-2012-0027 established the following effluent limitations for total coliform bacteria, consistent with reclamation criteria established at CCR, division 4, chapter 3 (title 22), which are protective of water quality and meet the requirements of the WLAs. Title 22 requires that for spray irrigation of food crops, parks, playgrounds, schoolyards, and other areas of similar public access, wastewater be adequately disinfected, oxidized, coagulated, clarified, and filtered, and that the effluent total coliform levels not exceed the following:

- i. The median concentration shall not exceed 2.2 MPN/100mL from the last 7 days for which analyses have been completed;
- ii. No more than one sample in any 30-day period shall exceed 23 MPN/100mL; and
- iii. No sample shall exceed 240 MPN/100mL.

The enterococci limitations established in the statewide bacteria provisions are not as stringent as the title 22 total coliform standards implemented in Order No. R3-

2012-0027. POTWs utilizing more stringent effluent limitations based on title 22 are not required to comply with the less stringent bacteria water quality objectives for protection of water contact recreation, so the effluent limitations from the statewide bacteria provisions have not been included in this Order<sup>2</sup>.

The effluent limitations for total coliform bacteria established in the previous order are protective of water quality and meet the requirements of the WLAs and the state-wide bacteria water quality objectives for protection of water contact recreation. Therefore, the effluent limitations for total coliform bacteria are retained from the previous order.

- b. **pH.** The Basin Plan establishes a WQO for pH of between 6.5 to 8.3 standard units for the protection of receiving waters with the beneficial use of Municipal and Domestic Supply (MUN), Agricultural Supply (AGR), and Water Recreation (REC1 and REC2). The Basin Plan also establishes a WQO for pH between 7.0 to 8.5 standard units for the beneficial use of Freshwater Habitat (COLD and WARM) and Fish Spawning (SPWN). This Order retains a pH effluent limitation of 7.0 to 8.3 to protect all beneficial uses.
- c. **Oil and Grease.** The Basin Plan establishes a narrative effluent limitation for oil and grease, which states, "Waters shall not contain oils, greases, waxes, or other similar materials in concentrations that result in a visible film or coating on the surface of the water or on objects in the water, that cause nuisance, or that otherwise adversely affect beneficial uses."

The previous Order contained an AMEL and MDEL of 5.0 mg/L and 10 mg/L, respectively. These effluent limitations are typical of similar facilities that discharge secondary treated wastewater and are necessary to protect the narrative water quality objective. This Order retains the effluent limitations from the previous order to ensure that the level of effluent quality at the Facility is maintained.

- d. **Nitrogen.** As discussed in section III.D.1 of this Fact Sheet, a TMDL has been established for nitrate in Chorro Creek. Order No. R3-2006-0032 determined that total nitrogen is the most appropriate method of limiting all forms of nitrogen and established a maximum daily effluent limitation of 10 mg/L (as N) for total nitrogen. This effluent limitation was retained in the previous order and is retained in this Order.

Effluent data indicates that the Discharger's effluent does not have reasonable potential to exceed the water quality criteria. Therefore, the effluent limitation for nitrite has been removed from this Order based on new information. Removal of this effluent limitation meets anti-backsliding and antidegradation requirements as detailed in sections IV.D.1 and IV.D.2 of this Fact Sheet.

- e. **Dissolved Oxygen.** As discussed in section III.D.1 of this Fact Sheet, a TMDL has been established for dissolved oxygen in Chorro Creek. The TMDL does not specify a WLA for dissolved oxygen; however, Order No. R3-2012-0027 established an effluent limitation for dissolved oxygen of >2.0 mg/L at all times. The Central Coast Water Board determined that these limitations, when combined with an effluent limitation for total nitrogen, and receiving water limitations for un-ionized ammonia, sodium, total dissolved solids, and temperature, satisfy the requirements of the

---

<sup>2</sup> See Staff Report Including Substitute Environmental Documentation for Part 3 of the Water Quality Control Plan for Inland Surface Waters, Enclosed Bays, and Estuaries of California – Bacteria Provisions and a Water Quality Standards Variance. Section 3.6. August 7, 2018.



Chorro Creek Nutrient and Dissolved Oxygen TMDL. As such, this Order retains the effluent limitation for dissolved oxygen from the previous order.

- f. **Salinity (TDS, Sulfate, Chloride, Boron, and Sodium).** The previous order established an effluent limitation for sulfate of 125 mg/L. This Order carries over the effluent limitation for maximum daily effluent limitation for sulfate of 125 mg/L and the mass-based effluent limitation of 1,251 lbs/day.

As described in the following discussion, the current discharge is not causing Chorro Creek to exceed WQOs since background concentrations of the pollutants naturally exceed WQOs in table 3-5 in the Basin Plan. Implementation of the maximum daily effluent limitation for sulfate, along with the implementation of a salt management plan and discontinued use of sodium bisulfite for dechlorination, as described in section VI.C.3.a of this Fact Sheet, will prevent further degradation and protect beneficial uses of Chorro Creek.

Basin Plan Water Quality Objectives

The Basin Plan contains specific numeric surface WQOs within table 3-5, presented as median values for the Chorro Creek Sub-Area of the Estero Bay Sub-Basin. According to the Basin Plan, “these objectives are intended to serve as a water quality baseline for evaluating water quality management in the basin.” Chapter 3, section 3.3.3 of the Basin Plan also states:

“It must be recognized that the mean values indicated in Table 3-5 are values representing gross areas of a water body. Specific water quality objectives for a particular area may not be directly related to the objectives indicated. Therefore, application of these objectives must be based upon consideration of the surface and groundwater quality naturally present...”

The language preceding table 3-5 also indicates, “the issuance of requirements must be tempered by consideration of beneficial uses within the immediate influence of the discharge.”

Site-Specific Water Quality

The Discharger monitors both the upstream receiving water to the discharge point to Chorro Creek at Monitoring Location R-002, and the upgradient groundwater to the Facility at Monitoring Location GW-001. Based on available data for TDS, sodium, and chloride, upstream receiving water data exceeds the surface WQOs, indicating background levels for salts are elevated prior to contributions from Facility effluent. Additionally, groundwater recharge is a specified beneficial use for the receiving water; thus, surface water discharge may impact groundwater quality. Average running 12-month mean concentrations for TDS, chloride, and sodium at Monitoring Locations R-002 and GW-001 are shown in Table F-9 and Table F-10, respectively.

**Table F-9. Receiving Water**

Site	TDS (mg/L)	Chloride (mg/L)	Sulfate (mg/L)	Boron (mg/L)	Sodium (mg/L)
R-002 (upstream)	533	54	29	0.07	36.1
R-003 (downstream)	542	93.5	83.2	0.16	71.4
Basin Plan Table 3-5 WQO	500	50	50	0.2	50

**Table F-10. Groundwater**

Site	TDS (mg/L)	Chloride (mg/L)	Sulfate (mg/L)	Boron (mg/L)	Sodium (mg/L)
GW-001 (upgradient)	644	57.1	68.7	0.96	82.7
Basin Plan Table 3-8 WQO	1,000	250	100	0.2	50

The data in table F-9 demonstrates that the long-term background salinity concentrations exceed WQOs for surface waters listed in table 3-5 of the Basin Plan for TDS chloride, and sulfate. Further, between January 2013 and May 2018, daily maximum concentrations up stream of the Facility's discharge indicate that levels of boron (up to 0.367 mg/L), sodium (up to 152 mg/L), chloride (up to 202 mg/L), sulfate (up to 144 mg/L) and TDS (up to 669 mg/L) have exceeded the WQOs contained in table 3-5 of the Basin Plan.

The data in table F-10 demonstrates that the long-term background salinity concentrations for boron and sodium in the groundwater are greater than WQOs listed in table 3-6 of the Basin Plan. Daily maximum concentrations of TDS (up to 1,200 mg/L), sulfate (up to 160 mg/L), boron (up to 1.32 mg/L) and sodium (up to 100 mg/L) in the upgradient groundwater have been detected.

Sources

Salts originate from both natural and unnatural sources. The Discharger does not control all of the source water. More than half of the overall drinking water for the service area comes from Central Coast Water Authority (CCWA). In 2007 and 2008, 64 percent of the drinking water came from CCWA. The CCWA utilizes State Water Project water as its primary water source. The remaining drinking water is from the Discharger's wastewater treatment facility, which utilizes surface water from Chorro Reservoir near San Luis Obispo and Whale Rock Reservoir near Cayucos. Source water data (annual averages) for 2007 are summarized below.

**Table F-11. Municipal Supply Water**

Source	TDS (mg/L)	Chloride (mg/L)	Sulfate (mg/L)	Boron (mg/L)	Sodium (mg/L)
State Water Project	0.142	87	48	35	266
CCWA Water	0.098	90	45	39	273
CMC Water	0.089	45	27	39	338

<sup>[1]</sup> Data for Boron is from 2005.

**Table F-12. Table Collection System Data for Salts**

Site	Percent Contribution	Chloride (mg/L)	Sodium (mg/L)	TDS (mg/L)
Cuesta College (Manhole 21B)	9	650	69	60
Cuesta College (Manhole 1A)		1,000	120	120
National Guard Camp (Manhole 31A)	8	750	93	74
National Guard Camp (Manhole 52A)		640	62	60
County Facilities	18	730	130	83
East Catch CMC	65	520	100	110
West Catch CMC		650	67	75
Flow Weighted Influent	100	89	92	642
Facility Influent	100	99	95	610

<sup>[1]</sup> Based on a single influent sample taken concurrent with the collection system data.

Average influent data to the Facility for salts from December 2007 through April 2009, provided in the Discharger's May 2009 Salt Management Study, are summarized below.

**Table F-13. Influent Data for Salts**

Boron (mg/L)	Chloride (mg/L)	Sodium (mg/L)	Sulfate (mg/L)	TDS (mg/L)
0.23	107	96	73	650

Data summarized in table F-12 and table F-13 indicate salinity within the influent to the Facility exceeds applicable WQOs for surface water for boron, chloride, sodium, sulfate, and TDS.

Control of Salts

The Discharger has made significant efforts to minimize the salt loading at the prison and related facilities. Reduced water softening is now possible with the conversion to State Water Project water. Water softeners for the central steam plant now discharge to a double wall storage container for periodic removal from the site. The Facility no longer discharges any water from the brine ponds into the wastewater system.

The Discharger has multiple Prison Industry Authority programs that occur on-site, including a laundry program and a textile program. The textile program no longer washes and bleaches textiles prior to use and has switched to purchasing pre-bleached materials, which have reduced loading of salts from the bleaching process. In addition, the Discharger has replaced kitchen equipment that utilizes water softeners that do not use salts to soften the water.

At the Facility, other than evaporation, the only known salts increase previously was due to chemical addition for chlorine disinfection and dechlorination (sodium hypochlorite and sodium bisulfate). In January 2014, the Discharger upgraded to the facility to include UV disinfection. The Discharger has since discontinued the use of chlorine for disinfection purposes.

There are no water softeners used at the State Military Department facility and Cuesta College has one residential water softener, which is considered to have an insignificant impact on salt loading to the Facility. The Discharger has no control over the operation of these facilities.

#### Proposed Salt Limits

Typically, waste discharge requirements incorporate the Basin Plan's specific, numeric WQOs as effluent limitations. Although convention generally sets effluent limitations at the Basin Plan's WQOs, the previous order does not use table 3-7 Basin Plan numeric WQOs as effluent limitations. Instead, the existing effluent limitation (for sulfate) is greater than WQOs in Basin Plan table 3-5 to account for high background salt concentrations and uncontrollable salt loading from the water supply in Facility influent. Consistent with the previous order, this Order shall establish a limitation for sulfate that is characteristic of the natural receiving water. Effluent limitations for the Facility should be related to water quality naturally present in the vicinity of the discharge while also protecting beneficial uses within the immediate influence of the discharge. Effluent limitations for sulfate from the previous Order were more closely related to the background water quality and were protective of beneficial uses.

#### Conclusion

Consistent with the Basin Plan, the proposed effluent limitations for salinity are based on a regional assessment of water quality conditions, are within reasonable control of the Discharger to meet, and are protective of downstream beneficial uses. Because of elevated levels of salinity in the source water and naturally present in the receiving water, this Order requires the Discharger to continue to implement and update the Salt Management Study and Plan as described in section VI.C.3.a of this Fact Sheet. This Special Provision is retained from the previous order.

- g. Turbidity.** The Basin Plan establishes a narrative effluent limitation for turbidity that states, "Waters shall be free of changes in turbidity that cause nuisance or adversely affect beneficial uses." The Basin Plan further establishes allowable numeric increases to the receiving water.

The previous order established an AMEL and MDEL of 10 NTU and 20 NTU, respectively. These effluent limitations are typical of similar facilities that discharge secondary treated wastewater and are necessary to protect the narrative water quality objective. This Order retains the effluent limitations from the previous order and reflects title 22 recycled water requirements for disinfected tertiary recycled water production.

### **D. Final Effluent Limitation Considerations**

#### **1. Anti-backsliding Requirements**

Sections 402(o) and 303(d)(4) of the CWA and federal regulations at 40 CFR section 122.44(l) prohibit backsliding in NPDES permits. These anti-backsliding provisions require effluent limitations in a reissued permit to be as stringent as those in the previous permit, with some exceptions where limitations may be relaxed. All effluent limitations in this Order are at least as stringent as the effluent limitations in the previous Order, with the exception of nitrite and total residual chlorine.

The effluent limitations for nitrite and total residual chlorine at Discharge Point No. 001 have not been retained in this Order. Effluent data over the previous permit term indicate

that discharges from Discharge Point No. 001 no longer have a reasonable potential to cause or contribute to an exceedance of water quality criteria for nitrite. January 2014, the Facility was upgraded to include UV disinfection and the use of chlorine was discontinued. Based on this new information, effluent limitations for nitrite and total residual chlorine have not been established in this Order, consistent with State and federal anti-backsliding requirements, including CWA section 402(o)(2)(B)(i).

**2. Antidegradation Policies**

Provisions of the Order are consistent with applicable antidegradation policy expressed by NPDES regulations at 40 CFR section 131.12, by State Water Board Resolution No. 68-16. Limitations and conditions of the Order ensure maintenance of the existing quality of receiving waters and do not authorize increased rates of discharge or increased pollutant loadings that are anticipated to result in the degradation of the receiving water.

**3. Stringency of Requirements for Individual Pollutants**

This Order contains both technology-based and water quality-based effluent limitations for individual pollutants. The technology-based effluent limitations consist of restrictions on BOD<sub>5</sub>, TSS, and flow. Restrictions on these pollutants are discussed in section IV.B of the Fact Sheet. This Order's technology-based pollutant restrictions implement the minimum, applicable federal technology-based requirements. In addition, this Order contains effluent limitations more stringent than the minimum, federal technology-based requirements that are necessary to meet water quality standards. For pH, both technology-based effluent limitations and water quality-based effluent limitations are applicable. The more stringent of these effluent limitations are implemented by this Order. These limitations are not more stringent than required by the CWA.

**4. Summary of Final Effluent Limitations**

- a. The following effluent limitations are applicable to the discharge of disinfected tertiary treated wastewater from the Facility at Discharge Point No. 001.

**Table F-14. Final Effluent Limitations**

Parameter	Units	Effluent Limitations		
		Average Monthly	Average Weekly	Maximum Daily
BOD <sub>5</sub>	mg/L	10	30	50
	lbs/day <sup>[1]</sup>	100	300	500
TSS	mg/L	10	30	50
	lbs/day <sup>[1]</sup>	100	300	500
pH	standard units	7.0 – 8.3 <sup>[2]</sup>		
Oil and Grease	mg/L	5.0	---	10
	lbs/day <sup>[1]</sup>	50	---	100
Settleable Solids	mL/L	0.1	---	0.3
Turbidity	NTU	10	---	20
Dissolved Oxygen	mg/L	>2.0 mg/L at all times		
Phthalate Esters	µg/L	0.002	---	0.006
Sulfate	mg/L	---	---	125
	lbs/day <sup>[1]</sup>	---	---	1,251
Nitrogen, Total as N	mg/L	---	---	10
	lbs/day <sup>[1]</sup>	---	---	100
Copper, Total Recoverable	µg/L	7.5	---	17
Chlorodibromomethane	µg/L	0.40	---	0.80

Parameter	Units	Effluent Limitations		
		Average Monthly	Average Weekly	Maximum Daily
Dichlorobromomethane	µg/L	0.56	---	0.88
Bis(2-ethylhexyl) Phthalate	µg/L	1.8	---	3.6
Acute Toxicity	% survival	[3]		

- [1] Mass loading limits were calculated using the following formula:  
 lbs/day = pollutant concentration (mg/L) \* permitted flow (1.2 MGD) \* conversion factor (8.34)
- [2] When the Discharger continuously monitors effluent pH, levels shall be maintained within specified ranges 99 percent of the time. To determine 99 percent compliance, the following conditions shall be met:
- The total time during which pH is outside the range of 7.0 – 8.3 shall not exceed 7 hours and 26 minutes in any calendar month;
  - No single excursion from the range of 7.0 – 8.3 shall exceed 30 minutes;
  - No single excursion shall fall outside the range of 6.0 – 9.0; and
  - When continuous monitoring is not being performed, standard compliance guidelines shall be followed (i.e., between 7.0 – 8.3 at all times, measured daily).
- [3] As specified in section V of the Monitoring and Reporting Program (Attachment E).

- b. Percent Removal.** The average monthly percent removal of BOD 5-day 20°C and total suspended solids shall not be less than 85 percent.
- c. Dry Weather Flow.** Effluent average dry weather flow shall not exceed a monthly average of 1.2 MGD.
- d. Floating Material.** Discharge of treated wastewater through Discharge Point No. 001 shall not contain floating material, including solids, liquids, foams and scum, in concentrations that cause nuisance or adversely affect beneficial uses.
- e. Total Coliform Bacteria**
  - i. Total coliform concentrations shall not exceed a median of 2.2 MPN/100 mL as determined from the last 7 days of sampling results for which analyses have been completed;
  - ii. No more than one sample shall exceed 23 MPN/100 mL in any 30-day period; and
  - iii. No sample shall exceed 240 MPN/100 mL.
- f. Chronic Toxicity.** There shall be no chronic toxicity in the effluent discharge.
- g. Orthophosphorus.** Median orthophosphorus concentrations of effluent from May through September shall not exceed current levels, as measured by a comparison to effluent concentrations from 2004 and 2005.

**E. Interim Effluent Limitations – Not Applicable**

**F. Land Discharge Specifications – Not Applicable**

**G. Recycling Specifications**

Reclamation use of tertiary-treated wastewater shall adhere to applicable requirements of CWC part 13500 through part 13577 (Water Reclamation) and of CCR title 22, part 60301 through part 60357 (Water Recycling Criteria). Reclamation requirements have been retained from Order R3-2012-0027.

In July 2019, the State Water Board adopted Order No. WQ 2019-0037-EXEC amending existing Monitoring and Reporting Programs for NPDES permits and WDRs. This amendment added monitoring and reporting requirements specifically derived from the 2018-amended

Recycled Water Policy. Those requirements have been included within Attachment E of this Order.

**H. Salt and Nutrient Management Program**

Salt and Nutrient Management Program requirements have been retained from Order No. R3-2012-0027 and are similar to the requirements established in other permits in the Central Coast Region that irrigate with or land apply tertiary treated effluent.

**V. RATIONALE FOR RECEIVING WATER LIMITATIONS**

**A. Surface Water**

Receiving water quality is a result of many factors, some unrelated to the discharge. This Order considers these factors and is designed to minimize the influence of the discharge on the receiving water. Specific water quality objectives established by the Basin Plan to meet this goal for all inland surface waters are included as Receiving Water Limitations in Section V.A of this Order.

**B. Groundwater**

Groundwater limitations included in section V.B of the Order include general objectives as established in chapter 3, section 3.3.4 of the Basin Plan and specific numeric WQOs for groundwater within the Chorro Creek sub area of the Estero Bay groundwater unit as established in table 3-6 of the Basin Plan. All groundwater limitations in this Order are retained from the previous Order.

**VI. RATIONALE FOR PROVISIONS**

**A. Standard Provisions**

Standard Provisions, which apply to all NPDES permits in accordance with 40 CFR section 122.41, and additional conditions applicable to specified categories of permits in accordance with 40 CFR section 122.42, are provided in Attachment D. The Discharger must comply with all standard provisions and with those additional conditions that are applicable under section 122.42.

Sections 122.41(a)(1) and (b) through (n) of 40 CFR establish conditions that apply to all state-issued NPDES permits. These conditions must be incorporated into the permits either expressly or by reference. If incorporated by reference, a specific citation to the regulations must be included in the Order. Section 123.25(a)(12) of 40 CFR allows the state to omit or modify conditions to impose more stringent requirements. In accordance with 40 CFR section 123.25, this Order omits federal conditions that address enforcement authority specified in 40 CFR sections 122.41(j)(5) and (k)(2) because the enforcement authority under the Water Code is more stringent. In lieu of these conditions, this Order incorporates by reference Water Code section 13387(e).

**B. Special Provisions**

**1. Reopener Provisions**

The Order may be modified in accordance with the requirements set forth at 40 CFR 122 and 124, to include appropriate conditions or limits based on newly available information, or to implement any, new State water quality objectives that are approved by the U.S. EPA. As effluent is further characterized through additional monitoring, and if a need for additional effluent limitations becomes apparent after additional effluent characterization, the Order will be reopened to incorporate such limitations.

**2. Special Studies and Additional Monitoring Requirements**

The Order requires the Discharger to conduct accelerated whole effluent toxicity monitoring upon the detection of toxicity in the effluent and requires the Discharger to perform a TRE upon the determination of continued toxicity within the effluent. This requirement is retained from previous order.

**3. Best Management Practices and Pollution Prevention**

**a. Pollutant Minimization Program**

The Discharger is required to minimize the discharge of pollutants consistent with the requirements of section 2.4.5.1 of the State Implementation Policy (SIP). The goal of the Pollutant Minimization Program is to reduce all potential sources of a priority pollutant through pollutant minimization strategies to maintain the effluent concentration at or below water quality-based effluent limitations.

**4. Construction, Operation, and Maintenance Specifications**

Section V.C.4 of the Order requires the Discharger to comply with standard NPDES permit provisions based on federal and State regulations. This requirement has been retained from Order R3-2012-0027.

**5. Special Provisions for Publicly Owned Treatment Works**

**a. Biosolids Management.** The use and disposal of biosolids is regulated under federal and State laws and regulations, including permitting requirements and technical standards included in 40 CFR part 503. The Discharger is required to comply with the standards and time schedules contained in 40 CFR part 503. Title 27, CCR, division 2, subdivision 1, section 20005 establishes approved methods for the disposal of collected screenings, residual sludge, biosolids, and other solids removed from liquid wastes. Requirements to ensure the Discharger disposes of solids in compliance with State and federal regulations have been included in this Order.

**b. Collection System.** The State Water Board issued General Waste Discharge Requirements for Sanitary Sewer Systems, Water Quality Order 2006-0003-DWQ (General Order) on May 2, 2006. The State Water Board amended the Monitoring and Reporting Program for the General Order through Order WQ 2013-0058-EXEC on August 6, 2013. The General Order requires public agencies that own or operate sanitary sewer systems with sewer lines one mile of pipe or greater to enroll for coverage and comply with the General Order. The General Order requires agencies to develop sanitary sewer management plans and report all sanitary sewer overflows, among other requirements and prohibitions. The General Order contains requirements for operation and maintenance of collection systems and for reporting and mitigating sanitary sewer overflows that are more extensive, and therefore, more stringent than the requirements under federal standard provisions. The Discharger obtained enrollment for regulation under the General Order on January 9, 2007.

**6. Other Special Provisions**

**a. Discharges of Storm Water.** Discharges of storm water from POTWs with a design capacity greater than 1.0 MGD are applicable for coverage under General State Water Board Order No. 2014-0057-DWQ, NPDES General Permit No. CAS000001, *Waste Discharge Requirements for Dischargers of Storm Water Associated with Industrial Activities Excluding Construction Activities.*



**b. State Water Board Recycled Water Policy and State Board Order WQ 2019-0037-EXEC.** The Recycled Water Policy was approved by the State Water Board on December 11, 2018, and became effective on April 8, 2019. The purpose of the Recycled Water Policy is to encourage the safe use of recycled water in a manner that is protective of public health and the environment. State Board Order WQ 2019-0037-EXEC implements the Recycled Water Policy by amending the monitoring and reporting programs for dischargers subject to National Pollutant Discharge Elimination System permits, waste discharge requirements, master recycling permits, and water reclamation requirements to require annual reporting of volumetric data on wastewater and, if applicable, recycled water use by volume and category of reuse. Under State Board Order WQ-2019-0037-EXEC, the regional boards are expected to reissue or otherwise amend monitoring requirements to incorporate the requirements of State Board Order WQ 2019-0037-EXEC.

**c. Climate Change**

The Central Coast Water Board is addressing the threats of climate change and flooding by including provisions in new orders that ensure climate change mitigation and adaptation strategies are implemented. There is widespread scientific consensus that climate change is occurring and will continue at an accelerating rate into the future. Extreme weather events, including drought, high-intensity precipitation, flooding, and extreme heat have occurred through much of California in the recent years and are projected to increase in frequency, extent, or intensity due to climate change.

Climate change has the potential to impact discharging facilities through inundation, storm impacts, an erosion, increasing the risk of accidental discharge that results in discharge permit violations. These events have significant implications for wastewater treatment and operations, such as increased corrosion, deposition of solids, infiltration, overflows, inundation of facilities, impairment of treatment processes, and disruption of power or electrical components. Due to the long-term nature of these risks, there is a need to avoid piecemeal or reactionary adaptation and instead undertake proactive, long-term planning with consideration of various adaptation strategies that both keep facilities safe, maintain safe discharging practices, and avoid impacts to resources.

**7. Compliance Schedules – Not Applicable**

**8. Salt and Nutrient Management Program**

This Order requires the Discharger to develop and implement a Salt and Nutrient Management Program. This requirement is based on the Recycled Water Policy and is retained from Order No. R3-2012-0027.

**VII. RATIONALE FOR MONITORING AND REPORTING REQUIREMENTS**

40 CFR Section 122.48 requires that all NPDES permits specify requirements for recording and reporting monitoring results. Water Code sections 13267 and 13383 authorize the Central Coast Water Board to require technical and monitoring reports. The Monitoring and Reporting Program (MRP), Attachment E, establishes monitoring and reporting requirements that implement federal and state requirements. The technical and monitoring reports submitted to satisfy the recycling specifications and groundwater provisions of this Order are required pursuant to section 13267 of the California Water Code. The burden of these reports, including costs, bears a reasonable relationship to need for the reports and benefits to be obtained, namely, ensuring compliance with the Recycled Water Policy and regulations and thereby preventing potential threats to human health and the environment. Failure to submit reports in accordance with schedules established by

this Order or attachments to this Order, or failure to submit a report of sufficient technical quality to be acceptable to the Executive Officer, may subject the Discharger to enforcement action pursuant to section 13268 of the California Water Code. The following provides the rationale for the monitoring and reporting requirements contained in the MRP for this facility.

**A. Influent Monitoring**

In addition to influent flow monitoring, monitoring for BOD<sub>5</sub> and TSS is required to determine compliance with the Order's percent removal requirement for these pollutants. Influent monitoring requirements have been retained from Order R3-2012-0027. The requirement to provide monthly total volume of wastewater collected and treated by the wastewater treatment plant is based on the Recycled Water Policy, section 3.2.1.

Annual influent monitoring for major cations and anions has been added consistent with other Central Coast Water Board monitoring programs, such as Central Coast Ambient Monitoring Program and Irrigated Lands Program. The additional parameters will help efforts to discern sources of water quality impacts in the watershed through cation and anion mapping of various water sources.

**B. Effluent Monitoring**

Effluent monitoring is necessary to determine compliance with effluent limitations and evaluate compliance with applicable water quality objectives and criteria. Most effluent monitoring requirements have been retained from Order R3-2012-0027.

The effluent monitoring requirement for total residual chlorine was reduced from daily to daily-only-when-using sodium bisulfite or other dechlorination agents. Effluent monitoring frequency for phthalate esters was increased in this Order from once per year to once per quarter due to RPA results and establishment of an effluent limitation for this parameter. The requirement to annually report monthly volumes of wastewater produced, and effluent, including treatment level and discharge type is based on the Recycled Water Policy, section 3.2.3.

Annual effluent monitoring for calcium, magnesium, potassium, bicarbonate, carbonate, and fluoride has been added consistent with other Central Coast Water Board monitoring programs, such as Central Coast Ambient Monitoring Program and Irrigated Lands Program. The additional parameters will help efforts to discern sources of water quality impacts in the watershed through cation and anion mapping of various water sources.

**C. Whole Effluent Toxicity Testing Requirements**

Whole effluent toxicity (WET) limitations protect receiving water quality from the aggregate toxic effect of a mixture of pollutants in the effluent. Acute toxicity testing measures mortality in 100 percent effluent over a short test period and chronic toxicity testing is conducted over a longer period of time and may measure mortality, reproduction, and or growth. Acute and chronic toxicity monitoring requirements are retained from the previous order.

**D. Recycled Water Monitoring**

The Recycled Water Policy requires wastewater treatment plants and recycled water producers to submit annual reports of monthly volumes of influent, wastewater produced, and effluent, including treatment level and discharge type, as well as annual reports of recycled water use by volume and category of reuse. State Board Order WQ 2019-0037-EXEC amends the previous order's monitoring and reporting program to include these requirements, which are retained and incorporated in this Order. Recycling water monitoring requirements in this Order are based on title 22 criteria and the title 22 engineering report approved by DDW.

**E. Receiving Water Monitoring**

**1. Surface Water**

Surface water receiving water monitoring requirements are necessary to evaluate compliance with water quality objectives and the protection of beneficial uses. Surface water monitoring requirements have been retained from the previous order.

**2. Groundwater**

Groundwater monitoring requirements are necessary to evaluate compliance with water quality objectives and the protection of beneficial uses. Groundwater monitoring requirements have been retained from the previous order.

**F. Other Monitoring Requirements**

**1. Discharge Monitoring Report-Quality Assurance (DMR-QA) Study Program**

Under the authority of section 308 of the CWA (33 U.S.C. part 1318), U.S. EPA requires major permittees under the NPDES Program to participate in the annual DMR-QA Study Program. The DMR-QA Study evaluates the analytical ability of laboratories that routinely perform or support self-monitoring analyses required by NPDES permits. There are two options to satisfy the requirements of the DMR-QA Study Program: (1) The Discharger can obtain and analyze a DMR-QA sample as part of the DMR-QA Study; or (2) Per the waiver issued by U.S. EPA to the State Water Board, the Discharger can submit the results of the most recent Water Pollution Performance Evaluation Study from its own laboratories or its contract laboratories. A Water Pollution Performance Evaluation Study is similar to the DMR-QA Study. Thus, it also evaluates a laboratory's ability to analyze wastewater samples to produce quality data that ensure the integrity of the NPDES Program. The Discharger shall ensure that the results of the DMR-QA Study or the results of the most recent Water Pollution Performance Evaluation Study are submitted annually to the State Water Board. The State Water Board's Quality Assurance Program Officer will send the DMR-QA Study results or the results of the most recent Water Pollution Performance Evaluation Study to U.S. EPA's DMR-QA Coordinator and Quality Assurance Manager.

**VIII. PUBLIC PARTICIPATION**

The Central Coast Water Board will consider the issuance of WDRs that will serve as an NPDES permit for the California Men's Colony Wastewater Treatment Plant. As a step in the WDR adoption process, Central Coast Water Board staff has developed tentative WDRs and encourages public participation in the WDR adoption process.

**A. Notification of Interested Parties**

The Central Coast Water Board notified the Discharger and interested agencies and persons of its intent to prescribe WDRs for the discharge and is providing an opportunity to submit written comments and recommendations. Notification is provided through posting on the Central Coast Water Board website.

The public has access to the agenda notice and any changes in dates and locations through the Central Coast Water Board's website at: <http://www.waterboards.ca.gov/centralcoast/>

**B. Written Comments**

Interested persons were invited to submit written comments concerning tentative WDRs as provided through the notification process. Comments were due either in person, by email to

[centralcoast@waterboards.ca.gov](mailto:centralcoast@waterboards.ca.gov), or by mail to the Executive Officer at the Central Coast Water Board at:

Central Coast Regional Water Quality Control Board  
895 Aerovista Place, Suite 101  
San Luis Obispo, CA 93401-7906

To be fully responded to by staff and considered by the Central Coast Water Board, the written comments were due at the Central Coast Water Board office by 5:00 p.m. on **March 6, 2020**.

One public comment was received from the Morro Bay National Estuary Program (MBNEP) on February 24, 2020. The MBNEP asked for clarification on the "monthly maximum" portion of the receiving water limitation pertaining to temperature changes (limitation #13 on page 9 of this draft Order). Central Coast Water Board staff reviewed the related Central Coast Water Board Basin Plan objective and concurs the objective does not contain a "monthly maximum" qualification. As such, the draft Order has been amended to be consistent with the Basin Plan objective.

Comments were also received from the California Department of Corrections and Rehabilitation (CDCR) via email on March 6, 2020. The comment letter can be downloaded at [https://ftp.waterboards.ca.gov/?u=public&p=download&path=/CDCR\\_comment\\_letter.pdf](https://ftp.waterboards.ca.gov/?u=public&p=download&path=/CDCR_comment_letter.pdf). A summarized version of the comments and Central Coast Water Board staff responses are below:

1. CDCR comment: Item IV.C.1 & 2 "The production and use of reclaimed water shall comply with all applicable requirements of CCR, title 22, division 4, chapter 3 for recycled water." CMC is only the producer and not the user of the reclaimed water. At the point of discharge to the user, CMC must comply with CCR, title 22, division 4, chapter 3 and other cited requirements for recycled water, but CMC has no further control nor responsibilities beyond the point of discharger to the user, being SLO County Parks and Recreation. Per this permit, that responsibility becomes CMC's.

Staff response: Agreed. The permit has been revised to indicate the Discharger is the producer, not user, and that this permit covers the production of reclaimed (recycled) water.

2. CDCR comment: Item V.A.19 & 21 "Receiving waters shall not contain concentrations of chemical constituents..." Receiving waters may have contained these chemical constituents upstream of the point of discharge. CMC is not responsible for upstream water quality, except in matters of storm water runoff specifically attributed to CMC properties that are adjacent to a small portion of Chorro Creek upstream.

Staff response: The introduction to the receiving water limitations (Section V.5.A page 8) states, "Receiving water limitations are based on water quality objectives contained in the Basin Plan and are a required part of this Order. The discharge from the Facility shall not cause the following in the receiving waters..." The Discharger is directed to that language specifically; the intent of this statement is to clarify that compliance is based on the **effluent discharge's impacts** on receiving water quality, not background contributions unrelated to the effluent discharge. No changes to the proposed Order are recommended to address the comment.

3. CDCR comment: Item V.B "The Central Coast Water Board may require the Discharger to investigate the cause of exceedances in the groundwater before determining whether the Discharger caused any water condition that exceeds the following groundwater

conditions.” The seven items within this section, includes language that dictates if exceedances are detected, CMC will be liable for costs to investigate all potential causes whether on CMC property or not, i.e., high nitrate levels in the Chorro Valley Basin in the past were attributed to a local farmer who admitted excessive use of fertilizers on his crops.

Staff response: The purpose of the language cited in section V.B. is to clarify that the Discharger may be responsible for conducting investigations to determine if it is a cause of groundwater exceedances, where evidence indicates the Discharger may be causing or contributing to such groundwater exceedances. For example, if there is a discharge of waste that could impact groundwater, Central Coast Water Board may require an investigation to determine if the waste impacted groundwater. The Central Coast Water Board has the authority to require such investigations under California Water Code section 13267. The language in section V.B of the proposed order has been modified to clarify its purpose.

4. CDCR comment: Attachment B, Map contains error in labeling abandoned components of the facility.

Staff response: The document was submitted by CDCR originally as part of their renewal application package. We request that CDCR update the map for inclusion in the final Order.

5. CDCR comment: Attachment F facility contact information should be updated to reflect Scott Buffalo instead of Pres Meyers.

Staff response: Contact information has been updated as requested.

6. CDCR comment: Attachment F facility description incorrectly states the California National Guard and San Luis Obispo County own and maintain discrete wastewater collection systems.

Staff response: The proposed Order has been corrected to clarify the Discharger operates and maintains those particular collection systems under an agreement between the parties.

7. CDCR comment: Attachment F facility description incorrectly states the volume of recycled water used at Dairy Creek golf course. (1) The treated wastewater that is used by the County to irrigate is nowhere near “approximately 140 acres” of Dairy Creek golf course. It is used to irrigate the golf course, ball fields, and the botanical gardens. (2) Morro Bay golf course is permitted to utilize wastewater from imported source waters that the WWTP discharges to Chorro Creek which is then pumped from a well in the Chorro Creek Basin to irrigate the golf course. (3) The WWTP is required by Fish and Game to discharge primarily 0.75 cubic feet per second to Chorro Creek, if available. Morro Bay golf course, by permit and agreement, receives a set quantity of treated effluent for irrigation, if available. Dairy Creek golf course is permitted to utilize wastewater from imported source waters that the WWTP discharges to a holding pond at the WWTP of any remaining surplus treated effluent when needed for irrigation. Any other available amounts are discharged to Chorro Creek.

Staff response: The information in the description of the recycled water application site of the draft Order is taken directly from the Discharger's Report of Waste Discharge (the application package to support the request to renew the Discharger's order). (1) The application package only specified Dairy Creek golf course and stated land application

site size as 140 acres, and the Discharger has not provided an alternate estimate of size as part of their comments. As such, staff recommends not revising the proposed Order's acreage estimation because the Discharger has not provided substantial information with which to make any revision. The application package did not include any mention of ball fields and botanical gardens. (2) Morro Bay golf course's use of recycled water is beyond the scope of this proposed Order. (3) Any agreements between the Discharger and other California agencies with regards to minimum flow rates are also not a part of this proposed Order, in other words this proposed Order (and its predecessor) does not include a minimum flow requirement as an enforceable provision. No changes to the proposed Order are recommended regarding the Discharger's agreement with DFW (formerly named California Department of Fish and Game).

8. CDCR comment: Attachment F Rational for effluent limitations B.6.g salinity states "As described in the following discussion, current discharge is not causing Chorro Creek to exceed WQOs since background concentrations of the pollutants naturally exceed WQOs in table 3-5 in the Basin Plan. Implementation of the maximum daily effluent limitation for sulfate, along with the implementation of a salt management plan and discontinued use of sodium bisulfite for de-chlorination, as described in this Fact Sheet, will prevent further degradation and protect beneficial uses of Chorro Creek. The statement conflicts with the receiving water limitations not to exceed 50 mg/L for sodium.

Staff response: Please see staff response to CDCR comment 2. No change recommended.

9. CDCR comment: The comment is generally duplicative of the previous CDCR comment regarding background concentrations in upstream receiving water and groundwater in excess of Basin Plan objectives.

Staff response: Please see staff response to CDCR comment 2. No change is recommended.

10. CDCR comment: Attachment F section B.6.g Control of Salts states "Water softeners for the central steam plant now discharge to brine ponds and the Facility no longer discharges any water from the brine ponds into the wastewater system." This is an error in fact. The steam plant water softener discharges to a double wall storage container for periodic removal from site.

Staff response: The relevant section has been revised to reflect the updated information.

11. CDCR comment: Attachment F section B.6.g Control of Salts states "The Discharger has multiple Prison Industry Authority programs that occur on-site including a laundry program and a textile program. The laundry facility currently uses water softening to minimize the amount of detergents required. The Discharger is considering the use of a recycled water system to reduce the need for softening of raw water." This is an error in fact. The laundry facility does not utilize water softening to minimize the amount of detergents required. The Discharger is not considering the use of a recycled water system to reduce the need for softening of raw water.

Staff response: The relevant section has been revised to reflect the updated information.

12. CDCR comment: Attachment F section B.6.g Control of Salts states "There are no water softeners used at the State Military Department Facility and Cuesta College has one residential water softener, which is considered to have an insignificant impact on salt loading to the Facility. The Discharger has no control over the operation of these

facilities.” This is an error in fact. The Discharger has no direct knowledge of the extent of use of water softeners at its satellite systems and has no authority to control their use.

Staff response: The cited historical information was provided by the Discharger during previous discussions of their Salt Management Study. Since the Discharger is now indicating uncertainty of the current status of that information, staff will work with the Discharger and the satellite systems to verify and update the current salt contributions. No changes to the proposed Order are recommended based on the limited information provided in the Discharger's comment.

13. CDCR comment: Attachment F section B.6.g sources of salts discusses data set from the Discharger's May 2009 Salt Management Study. The data sets from Central Coast Water Authority source water are over a decade old and inadequate sampling for its ration for effluent limitations and discharge specifications for a permit. Many changes have occurred that may influence the veracity of the data and therefore the integrity of any conclusions inferred from that data.

Staff response: The portions of the data tables which are outdated are not the sole source of evidence considered for establishing the effluent limitations contained within the proposed Order. The proposed Order implements new influent monitoring requirements for salts. This new data set will provide updated information on source water contributions. The Discharger has the opportunity to provide updated data to supplement any existing data sets in support of their application and renewal process. The Discharger did not provide any updated monitoring data sets to the ones they've specifically identified as outdated. No changes to the proposed Order are recommended based on the Discharger's comments. Central Coast Water Board staff will continue to work with CMC to review updated data for incorporation in the next permit renewal.

14. CDCR comment: Attachment F section B.6.g conclusions on rationale for effluent limitations discusses the continued implementation of a Salt Management Study and Plan as well as acknowledgment of elevated salinity in source water and naturally occurring salinity in receiving waters. Discharger disputes the “effluent limitations due to not being science-based but based on a Regional Basin Plan that does not address specific natural conditions of surface and groundwater salinity upgradient of the point of discharge.

Staff response: The proposed Order acknowledges receiving water limitations compliance is evaluated on the **effluent discharge's contribution** to the natural system. In other words, the receiving water limitations do not require the Discharger to be held responsible for naturally occurring exceedances of water quality objectives. The comment does not distinguish between **receiving water limitations** and **effluent limitations**. There is one effluent limitation related to salinity (sulfate), and the effluent limitation (125 mg/L maximum daily) is well above the Basin Plan's sulfate surface water quality objective of 50 mg/L. The scientific rationale for setting the sulfate effluent limitation is described in the proposed Order (Fact Sheet section IV.C.6.g, pages F-27 through F-30) and sampling data supports the effluent limitation. As well, the proposed Order's rationale was thoroughly explained to **not** establish effluent limitations for chloride and sodium. The Discharger is incorrect that the effluent limitations do not address the specific natural conditions. No changes to the proposed Order are warranted to address the Discharger's comment.

**C. Public Hearing**

The Central Coast Water Board will hold a public hearing on the proposed Order during its regular Board meeting on the following date and time, by video and teleconference as authorized by and in furtherance of Executive Orders N-29-20 and N-33-20:

Date: May 28, 2020

Time: 9:00 am-5:00 pm

Location: Link to video and teleconference will be provided at

[https://www.waterboards.ca.gov/centralcoast/board\\_info/agendas/2020/2020\\_agendas.html](https://www.waterboards.ca.gov/centralcoast/board_info/agendas/2020/2020_agendas.html)

Interested persons are invited to participate using the video and teleconference service. At the public hearing, the Central Coast Water Board may hear testimony pertinent to the discharge, WDRs, and permit. For accuracy of the record, important testimony is requested in writing.

**D. Waste Discharge Requirements Petitions**

Any aggrieved person may petition the State Water Board to review the decision of the Central Coast Water Board regarding the final WDRs. The petition must be received by the State Water Board at the following address within 30 calendar days of the Central Coast Water Board's action:

State Water Resources Control Board  
Office of Chief Counsel  
P.O. Box 100, 1001 I Street  
Sacramento, CA 95812-0100

For instructions on how to file a petition for review, see:

[http://www.waterboards.ca.gov/public\\_notices/petitions/water\\_quality/wqpetition\\_instr.shtml](http://www.waterboards.ca.gov/public_notices/petitions/water_quality/wqpetition_instr.shtml)

**E. Information and Copying**

The Report of Waste Discharge, other supporting documents, and comments received are on file and may be inspected at the address above at any time between 8:00 a.m. and 5:00 p.m., Monday through Friday. Copying of documents may be arranged through the Central Coast Water Board by calling the Central Coast Water Board.

**F. Register of Interested Persons**

Any person interested in being placed on the mailing list for information regarding the WDRs and NPDES permit should contact the Central Coast Water Board, reference this facility, and provide a name, address, and phone number.

**G. Additional Information**

Requests for additional information or questions regarding this order should be directed to Katie DiSimone at 805-542-4638 or at [katie.disimone@waterboards.ca.gov](mailto:katie.disimone@waterboards.ca.gov).