IV. EFFLUENT MONITORING REQUIREMENTS

A. Monitoring Location EFF-001

 The Discharger shall monitor final wastewater discharges from Discharge Point 001 at Monitoring Location EFF-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. Sampling must be conducted when there is a discharge, and must be collected during low tide conditions.

Parameter	Units	Sample Type	Minimum Sampling Frequency ⁸	Required Analytical Test Method
Total Flow ¹	MGD	Meter	1/Day	2
рН	standard units	Grab	1/Month	2
Biochemical Oxygen Demand (BOD) (5-day @ 20 Deg. C)	mg/L, lbs/day³	Grab	1/Month	2
Total Suspended Solids (TSS)	mg/L, lbs/day³	Grab	1/Week	2
Oil and Grease	mg/L, Ibs/day³	Grab	1/Week	2
Enterococcus	MPN/100 ml	Grab	32/Week ⁹	2, 4
Fecal Coliform	MPN/100 ml	Grab	32/Week ⁹	2, 4
Total Coliform	MPN/100 ml	Grab	32/Week 9	2, 4
Ammonia Nitrogen, Total (as N)	mg/L, lbs/day³	Grab	1/Month	2
Chronic Toxicity	Pass or Fail and % Effect (TST)	Grab	1/Year	5
Chlorine, Total Residual	µg/L, lbs/day³	Grab	<u>3</u> 2/Week	2
Temperature	°F	Grab	1/Month	2
Turbidity	NTU	Grab	1/Month	2
Arsenic, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	2
Cadmium, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	2
Copper, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	2
Mercury, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	2
Nickel, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	2

Table E-3. Effluent Monitoring – Regular Season (Memorial Day to Labor Day)

Parameter	Units	Sample Type	Minimum Sampling Frequency ⁸	Required Analytical Test Method
Selenium, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	2
Silver, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	3
Thallium, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	3
Zinc, Total Recoverable	µg/L, lbs/day³	Grab	1/Month	3
Cyanide, Total (as CN)	µg/L, lbs/day ³	Grab	1/Month	3
TCDD Equivalents ⁶	µg/L, lbs/day ³	Grab	1/Permit Term	3
Remaining Priority Pollutants ⁷	µg/L, lbs/day³	Grab	1/Year	3

¹ The Discharger shall measure flow using the flow meter. The Discharger shall report the total daily flow in million gallons per day (MGD) for each day a discharge occurs. Periods of no flow shall also be reported.

² Pollutants shall be analyzed using the analytical methods described in 40 C.F.R. part 136; for priority pollutants, the methods must meet the lowest ML's specified in Attachment 4 of the SIP, provided in Attachment H. Where no methods are specified for a given pollutant, the methods must be approved by the Regional Water Board or the State Water Board. If more than one analytical test method is listed for a given parameter, the Discharger must select from the listed methods and corresponding ML necessary to demonstrate compliance with applicable effluent limitations.

- ³ The mass emission (lbs/day) for the discharge shall be calculated and reported using the limitation concentration and the actual flow rate measured at the time of discharge, using the formula:
 - M = 8.34 x Ce x Q

where: M = mass discharge for a pollutant, lbs/day

- Ce = Reported concentration for a pollutant in mg/L
- Q = actual discharge flow rate, MGD.
- ⁴ Detection methods used for coliforms (total and fecal) and *Enterococcus* shall be those presented in Table 1A of 40 C.F.R. part 136, unless alternate methods have been approved by U.S. EPA pursuant to 40 C.F.R. part 136 or improved methods have been determined by the Executive Officer and/or U.S. EPA.
- ⁵ The Discharger shall conduct Whole Effluent Toxicity monitoring as outlined in section V. Refer to section V.A.7 of this MRP for the accelerated monitoring schedule. The median monthly summary result shall be reported as "Pass" or "Fail". The maximum daily single result shall be reported as "Pass or Fail" and "% Effect". When there is discharge more than 1 day in a calendar month period, up to three independent toxicity tests are required when one toxicity test results in "Fail".
- ⁶ TCDD equivalents shall be calculated using the following formula, where the ML's and the toxicity equivalency factors (TEFs) are as listed in the Table below. The Discharger shall report all measured values of individual congeners, including data qualifiers. When calculating TCDD equivalents, the Discharger shall set congener concentrations below the ML's to zero. U.S. EPA method 1613 may be used to analyze dioxin and furan congeners.

Dioxin-TEQ (TCDD equivalents) = Σ (C_x x TEF_x)

where: C_x = concentration of dioxin or furan congener x

TEF_x= TEF for congener x

Congeners	Minimum Levels (pg/L)	Toxicity Equivalence Factor (TEF)	
2,3,7,8 - tetra CDD	10	1.0	
1,2,3,7,8 - penta CDD	50	1.0	

Toxicity	Equivalency	Factors
----------	-------------	---------

Congeners	Minimum Levels (pg/L)	Toxicity Equivalence Factor (TEF)	
1,2,3,4,7,8 - hexa CDD	50	0.1	
1,2,3,6,7,8 - hexa CDD	50	0.1	
1,2,3,7,8,9 - hexa CDD	50	0.1	
1,2,3,4,6,7,8 - hepta CDD	50	0.01	
Octa CDD	100	0.0001	
2,3,7,8 - tetra CDF	10	0.1	
1,2,3,7,8 - penta CDF	50	0.05	
2,3,4,7,8 - penta CDF	50	0.5	
1,2,3,4,7,8 - hexa CDF	50	0.1	
1,2,3,6,7,8 - hexa CDF	50	0.1	
1,2,3,7,8,9 - hexa CDF	50	0.1	
2,3,4,6,7,8 - hexa CDF	50	0.1	
1,2,3,4,6,7,8 - hepta CDFs	50	0.01	
1,2,3,4,7,8,9 - hepta CDFs	50	0.01	
Octa CDF	100	0.0001	

- Priority pollutants as defined by California Toxics Rule (CTR) and included as Attachment I.
- ⁸ Two influent samples shall be collected at the specified frequency and should be representative of the intake water for the period sampled. The first influent sample shall be collected two hours prior to the effluent sample. The second influent sample shall be collected at approximately the same time as the effluent sample.
- 9. Monitoring shall be conducted <u>three two</u> times per week for a month. If all samples are in compliance with the limitations; the monitoring frequency may be reduced to weekly. If an exceedance occurs the frequency goes back to <u>threetwo</u> times per week until the facility is in compliance for a month.

Parameter	Units	Sample Type	Minimum Sampling Frequency	Required Analytical Test Method
Total Flow ¹	MGD	Meter	1/Day during discharge	з
рH	standard units	Grab	1/Discharge ²	3
BOD	mg/L, Ibs/day⁴	Grab	1/Discharge ²	3
TSS	mg/L, lbs/day⁴	Grab	1/Discharge ²	3
Oil and Grease	mg/L, Ibs/day⁴	Grab	1/Discharge ²	3
Enterococcus	MPN/100 ml	Grab	1/Discharge ²	3
Fecal Coliform	MPN/100 ml	Grab	1/Discharge ²	3
Total Coliform	MPN/100 ml	Grab	1/Discharge ²	3
Ammonia Nitrogen Total (as N)	mg/L, lbs/day⁴	Grab	1/Discharge ²	3
Chlorine, Total Residual	µg/L, lbs/day ⁴	Grab	1/Discharge ²	3

Table E-4. Effluent Monitoring – Off-Season (Following Labor Day and Prior to Memorial Day)