

## Central Valley Regional Water Quality Control Board

26 June 2025

Melissa Savage, P.E.  
City Engineer  
City of Placerville  
3101 Center Street  
Placerville, CA 95667

VIA EMAIL:  
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**NOTICE OF APPLICABILITY (NOA); MUNICIPAL WASTEWATER DISCHARGERS THAT MEET OBJECTIVES/CRITERIA AT THE POINT OF DISCHARGE TO SURFACE WATER ORDER R5-2023-0025 (MUNICIPAL GENERAL ORDER), NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES) CAG585001; CITY OF PLACERVILLE, HANGTOWN CREEK WATER RECLAMATION FACILITY, EL DORADO COUNTY**

Our office received a Notice of Intent (NOI) dated 23 July 2024 from City of Placerville (Discharger), for discharge of tertiary treated domestic wastewater to surface water from the Hangtown Creek Water Reclamation Facility (Facility) to Hangtown Creek. The Municipal General Order requires the submittal of an NOI to apply for regulatory coverage of a surface water discharge. Based on the NOI and subsequent information submitted by the Discharger, staff have determined that the NOI requirements have been fulfilled, and the Facility is eligible for coverage under the Municipal General Order. This Facility's discharge is assigned Municipal General Order Enrollee Number R5-2023-0025-011 under NPDES Permit CAG585001. Please reference your Municipal General Order Enrollee Number, **R5-2023-0025-011**, in your correspondence and submitted documents.

Discharges to surface water from the Facility are currently regulated by the Municipal General Order by the NOA issued by the Executive Officer on 19 June 2020, Municipal General Order enrollee number R5-2017-0085-007. This NOA, R5-2023-0025-011, authorizing coverage under the Municipal General Order, shall become effective on **1 August 2025**, and will supersede the current NOA, R5-2017-0085-007. At which time the terms and conditions in General Order R5-2017-0085-01 will cease to be effective except for enforcement purposes. 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 Clean Water Act and regulations and guidelines adopted thereunder, the Discharger shall comply with the requirements contained in the Municipal General Order and as specified in this NOA, R5-2023-0025-011. This action in no way prevents the Central Valley Water Board from taking enforcement action for past violations of R5-2017-0085-007.

The enclosed [Municipal General Order](https://www.waterboards.ca.gov/centralvalley/board_decisions/general_orders/r5-2023-0025_npdes.pdf) is available online ([https://www.waterboards.ca.gov/centralvalley/board\\_decisions/general\\_orders/r5-2023-0025\\_npdes.pdf](https://www.waterboards.ca.gov/centralvalley/board_decisions/general_orders/r5-2023-0025_npdes.pdf)) and can be requested by email or phone from the [NPDES Permitting Contacts webpage](https://www.waterboards.ca.gov/centralvalley/water_issues/waste_to_surface_water/contacts/) ([https://www.waterboards.ca.gov/centralvalley/water\\_issues/waste\\_to\\_surface\\_water/contacts/](https://www.waterboards.ca.gov/centralvalley/water_issues/waste_to_surface_water/contacts/)). You are urged to familiarize yourself with the entire contents of the enclosed document.

The Monitoring and Reporting Program, Attachment E to the Municipal General Order, contains the general monitoring and reporting requirements. The Discharger specific monitoring and reporting requirements are included within this NOA, R5-2023-0025-011, as Appendix D. **Only the monitoring and reporting requirements specifically listed in Appendix D of this NOA, R5-2023-0025-011, are applicable to this Facility.**

The discharge of treated domestic wastewater shall be in accordance with the requirements contained in the Municipal General Order, as specified in this NOA, R5-2023-0025-011.

**Table 1. Facility Information**

<b>WDID</b>	5A090100001
<b>CIWQS Facility Place ID</b>	229595
<b>Discharger</b>	City of Placerville
<b>Name of Facility</b>	Hangtown Creek Water Reclamation Facility
<b>Facility Street Address</b>	2300 Coolwater Creek Road
<b>Facility City, State, Zip Code</b>	Placerville, CA 95667
<b>Facility County</b>	El Dorado County
<b>Facility Contact, Title and Phone</b>	Melissa Savage, P.E., City Engineer, (530) 642-5250
<b>Authorized Person to Sign and Submit Reports</b>	Same as Facility Contact
<b>Mailing Address</b>	3101 Center Street, Placerville CA 95667
<b>Billing Address</b>	Same as Mailing Address
<b>Type of Facility</b>	Publicly Owned Treatment Works (POTW)
<b>Major or Minor Facility</b>	Major
<b>Threat to Water Quality</b>	2
<b>Complexity</b>	B
<b>Pretreatment Program</b>	Not Applicable
<b>Recycling Requirements</b>	Not Applicable
<b>Facility Design Average Dry Weather Flow (ADWF)</b>	2.3 Million Gallons Per Day (MGD)
<b>Permitted ADWF</b>	2.3 MGD
<b>Watershed</b>	South Fork American
<b>Receiving Water</b>	Hangtown Creek
<b>Receiving Water Type</b>	Inland Surface Water
<b>Discharge Point 001</b>	Latitude: 38° 43' 52" N, Longitude: 120° 50' 48" W

## **I. FACILITY INFORMATION**

The Discharger provides sewerage service for the community of Placerville and a small portion of El Dorado County and serves a population of approximately 10,335. The current design average dry weather flow capacity of the Facility is 2.3 MGD.

### **The tertiary treatment system at the Facility consists of the following:**

- one rotary fine screen;
- two primary clarifiers;
- 4.0-mil HDPE lined with 4" thick fiber reinforced concrete underlayment flow equalization basin;
- three aeration basins;
  - two aeration basins with aerobic and anoxic stages followed by one low oxygen basin
- three secondary clarifiers;
- three cooling tower units;
- six multi-media filters;
  - two gravity media filters and four pressure filters
- one ultraviolet light disinfection channel; and
- a cascade aerator prior to discharge to Hangtown Creek.

### **Solids collection and disposal consist of the following:**

- solids collected from the primary clarifiers are digested in anaerobic digesters;
- solids collected from the secondary clarifiers are stored in waste activated sludge holding tanks, sent to a gravity thickener, and then also digested in anaerobic digesters;
- digested solids are dewatered using belt filter presses;
- the biosolids are hauled off-site and land applied by a separate commercial entity; and
- filter backwash water and decant from the belt filter press are collected in a sump and pumped to storage basin, then returned to the influent of the primary clarifier splitter box for treatment.

## **II. RECEIVING WATER BENEFICIAL USES**

The Facility discharges from Discharge Point 001 to Hangtown Creek, which flows to Weber Creek, a tributary to the South Fork of the American River within the South Fork of the American River watershed. According to the Water Quality Control Plan for the Sacramento River and San Joaquin River Basins (Basin Plan) and the Tributary Rule, the following beneficial uses apply to Hangtown Creek:

- Municipal and Domestic Supply (MUN)
- Agricultural Supply (AGR)

- Hydropower Generation (POW)
- Water Contact Recreation (REC-1)
- Non-contact Water Recreation (REC-2)
- Warm Freshwater Habitat (WARM)
- Cold Freshwater Habitat (COLD)
- Wildlife Habitat (WILD)

According to the Basin Plan, groundwater underlying the Facility is designated with the following existing beneficial uses:

- Municipal and Domestic Supply (MUN);
- Agricultural Supply, Including Irrigation and Stock Watering (AGR);
- Industrial Service Supply (IND);
- Industrial Process Supply (PRO);

### **III. RECEIVING WATER TOTAL MAXIMUM DAILY LOADS (TMDLS)**

Hangtown Creek is not listed for constituent(s) on the Clean Water Act 303(d) List of impaired water bodies. Therefore, no additional 303(d) based effluent limitations or monitoring requirements are included in this NOA, R5-2023-0025-011.

### **IV. DISCHARGE PROHIBITIONS**

Discharge prohibitions are contained in section IV of the Municipal General Order. Only the discharge prohibitions listed below are applicable to this Facility.

- A.** The discharge of wastes, other than those described in section I.A and meeting the eligibility criteria in section I.B of the Municipal General Order, is prohibited unless the Discharger obtains coverage under another general or individual Order that regulates the discharge of such wastes. The discharge of wastes at a location or in a manner different from that described in the NOI and this NOA, R5-2023-0025-011, is prohibited.
- B.** The bypass or overflow of wastes to surface waters is prohibited, except as allowed by Federal Standard Provisions sections I.G. and I.H in Attachment D, Standard Provisions, of the Municipal General Order.
- C.** Neither the discharge nor its treatment shall create a nuisance as defined in section 13050 of the Water Code.
- D.** Discharge of waste classified as 'hazardous', as defined in the CCR, Title 22, section 66261.1 et seq., is prohibited.
- E. Average Dry Weather Flow.** Discharges exceeding an average dry weather flow of 2.3 MGD are prohibited. (see Municipal General Order section IV.E)

### **V. EFFLUENT LIMITATIONS**

The Discharger shall maintain compliance with the following effluent limitations at Discharge Point 001. Effluent limitations are provided in the Municipal General Order. Only the effluent limitations listed below in Table 2 and items 1-4 are applicable to this Facility. Unless otherwise specified in this NOA, compliance shall be measured at Monitoring Location EFF-001, as described in the Monitoring and Reporting Program (MRP), Appendix D of this NOA, R5-2023-0025-011.

The Discharger shall maintain compliance with the effluent limitations specified in Table 2 and items 1-4 below.

**Table 2. Effluent Limitations**

<b>Parameter</b>	<b>Units</b>	<b>Average Monthly</b>	<b>Average Weekly</b>
Biochemical Oxygen Demand (5-day @ 20°Celsius) (BOD <sub>5</sub> )	milligrams per liter (mg/L)	10	15
Total Suspended Solids (TSS)	mg/L	10	15
Ammonia Nitrogen, Total (as N)	mg/L	2.2	4.6
Nitrate plus Nitrite, Total (as N)	mg/L	10	13
Electrical Conductivity @ 25°C	micromhos per centimeter (µmhos/cm)	700	--

1. **pH.** The pH shall at all times be within the range of 6.5 and 8.5.
2. **Percent Removal.** The average monthly percent removal of BOD<sub>5</sub> and TSS shall not be less than 85 percent.
3. **Total Coliform Organisms.** Effluent total coliform organisms shall not exceed:
  - a. 2.2 most probable number per 100 milliliters (MPN/100 mL), as a 7-day median;
  - b. 23 MPN/100 mL, more than once in any 30-day period; and
  - c. 240 MPN/100 mL, at any time.
4. **Chronic Whole Effluent Toxicity.**
  - a. **Maximum Daily Effluent Limitation (MDEL).** No chronic aquatic toxicity test using *Pimephales promelas* (fathead minnow) shall result in a "Fail" (as defined in section V.C of the MRP) at the Instream Waste Concentration (IWC, as defined in section V.B of the MRP) for the sub-lethal endpoint measured in the test **AND** a percent effect greater than or equal to 50 percent (as defined in section V.C of the MRP) for the survival endpoint.
  - b. **Monthly Median Effluent Limitation (MMEL).** No more than one chronic aquatic toxicity test using *Pimephales promelas* (fathead minnow) initiated in a toxicity calendar month shall result in a "Fail" (as defined in section V.C of the MRP) at the IWC for any endpoint.

## **VI. RECEIVING WATER LIMITATIONS**

### **1. Surface Water Limitations**

The Municipal General Order includes receiving surface water limitations in Section VI.A. Based on the information provided in the NOI, only the following receiving surface water limitations listed in Municipal General Order Section VI.A are applicable to the Facility.

- Biostimulatory Substances (VI.A.3);
- Chemical Constituents (VI.A.4);
- Color (VI.A.5);

- Dissolved Oxygen (VI.A.6.a. i, ii, and iv);
- Floating Material (VI.A.7);
- Oil and Grease (VI.A.8);
- pH (VI.A.9.a);
- Pesticides (VI.A.10);
- Radioactivity (VI.A.11);
- Suspended Sediments (VI.A.12);
- Settleable Substances (VI.A.13);
- Suspended Material (VI.A.14);
- Taste and Odors (VI.A.15);
- Temperature (VI.A.16.f ). For the City of Placerville, Hangtown Creek Water Reclamation Facility, the annual average ambient temperature shall not be increased by more than 5° F and the discharge shall not cause an exceedance of the limitations in Table 3 at monitoring Location RSW-002;

**Table 3. Temperature Receiving Water Limitations for Hangtown Creek**

Period	Instantaneous Maximum (°F)	Weekly Average (°F)
1 December through 30 April	--	58
1 May through 31 May	--	67
1 June through 15 October	77	72
16 October through 30 November	--	67

- Toxicity (VI.A.17a); and
- Turbidity (VI.A.18.a).

## **2. Groundwater Limitations**

The Municipal General Order includes groundwater limitations in section VI.B. Release of waste constituents from any storage, treatment, or disposal component associated with the Facility shall not cause the underlying groundwater to contain waste constituents in concentrations greater than background water quality or water quality objectives, whichever is greater.

## **VII. MONITORING AND REPORTING**

MRP requirements are contained in Appendix D of this NOA, R5-2023-0025-011.

## **VIII. PROVISIONS**

1. Provisions are contained in section VII of the Municipal General Order and the applicable provisions are referenced below:

### **A. Standard Provisions (VII.A).**

Applicable to all Dischargers.

**B. Monitoring and Reporting Program (MRP) Requirements (V.II.B).**

The MRP requirements applicable to this Facility are contained in Appendix D of this NOA, R5-2023-0025-011.

**C. Special Provisions (VII.C).**

Special Provisions are contained in section VII.C of the Municipal General Order. Only the following Special Provision sections from the Municipal General Order specified in Table 4 apply to this Facility:

**Table 4: Summary of Applicable Special Provisions**

<b>Special Provision</b>	<b>Section Reference</b>
1. Reopener Provisions	a. Major Modification of Treatment Works c. Water Effect Ratios (WERs) and Metal Translators
2. Special Studies, Technical Reports and Additional Monitoring Requirements	Not applicable
3. Best Management Practices and Pollution Prevention	Not applicable
4. Construction, Operation and Maintenance Specifications	a.i.(a)-(c). Filtration System Operating Specifications b.i.(a). UV Disinfection System – Dose b.ii.(a). UV Disinfection System – Transmittance b.iii-vi. UV Disinfection System – General c.i-x. Pond Operating Specifications
5. Special Provisions for Municipal Facilities	b. Sludge/Biosolids Treatment or Discharge Specifications
6. Other Special Provisions	a. Disinfection Requirements
7. Compliance Schedules	Not applicable

**IX. COMPLIANCE DETERMINATION**

The following compliance determinations, as contained and more fully described in the Municipal General Order, are applicable to this discharge (Municipal General Order section given in parentheses, if applicable):

- BOD<sub>5</sub> and TSS Effluent Limitations (VIII.A);
- Average Dry Weather Flow Effluent Prohibition (VIII.E);
- Total Coliform Organisms Effluent Limitations (VIII.F);
- Effluent Limitations (VIII.I);
- Dissolved Oxygen Receiving Water Limitation (VIII.J);
- Whole Effluent Toxicity Effluent Limitation (VIII.K);
- Period Average, Calendar Month Average, and Annual Average (VIII.O); and
- Turbidity Receiving Water Limitation (VIII.P).

## **X. ANTI-BACKSLIDING REQUIREMENTS**

Anti-backsliding requirements are specified in the Municipal General Order, section V.D.3, Attachment F (Fact Sheet). Sections 402(o) and 303(d)(4) of the Clean Water Act (CWA) and federal regulations at 40 Code of Federal Regulations (C.F.R.) 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.

Effluent limitations for acute toxicity and ammonia are less stringent than prescribed in previous NOA, R5-2017-0085-007. A more detailed anti-backsliding analysis is provided in Appendix C to this NOA R5-2023-0025-011 in section III.A Satisfaction of Anti-Backsliding Requirements. The relaxation of effluent limitations for acute toxicity and ammonia meet the exceptions provided in the federal anti-backsliding regulations.

## **XI. ANTIDEGRADATION REQUIREMENTS**

Antidegradation requirements are specified in the Municipal General Order, section V.D.4, Attachment F (Fact Sheet). This NOA R5-2023-0025-011 does not allow an increase in flow or mass of pollutants to the receiving water and the relaxation of effluent limitations for acute toxicity, consistent with the antidegradation provisions of 40 C.F.R. 131.12 and State Water Board Resolution 68-16.

A more detailed discussion of antidegradation is provided in Appendix C to this NOA R5-2023-0025-011, section III.B Antidegradation Policies.

## **XII. RATIONALE FOR LIMITATIONS AND MONITORING REQUIREMENTS**

Additional rationale for limitations and monitoring requirements is included in Attachment F, section V (Rationale for Effluent Limitations and Discharge Specifications), of the Municipal General Order and Appendix C of this NOA R5-2023-0025-011.

## **XIII. ENFORCEMENT**

Failure to comply with the applicable requirements of the Municipal General Order, as specified in this NOA R5-2023-0025-011, may result in enforcement actions, which could include civil liability (penalties). Effluent limitation violations may be subject to a Mandatory Minimum Penalty (MMP) of \$3,000 per violation. In addition, late monitoring reports may be subject to MMPs and/or discretionary penalties of up to \$1,000 per day late. If discharges do not occur during any report monitoring period, the Discharger must still submit the monitoring report indicating that no discharge occurred to avoid being subject to enforcement actions.

## **XIV. COMMUNICATION**

Until this NOA R5-2023-0025-011 becomes effective on 1 August 2025, you will need to comply with the effluent limitations and requirements contained in your existing permit, NOA, Enrollee Number R5-2017-0085-007. For your June and July 2025 monthly self-monitoring reports, you will need to demonstrate compliance with existing Order R5-2017-0085-007 through 31 July 2025. For your August 2025 self-monitoring report, you will need to demonstrate compliance with this NOA beginning 1 August 2025.



The Central Valley Water Board is implementing a Paperless Office system to reduce our paper use, increase efficiency, and provide a more effective way for our staff, the public, and interested parties to view documents in electronic form. Therefore, the Discharger is required to submit all self-monitoring, technical, and progress reports required by this NOA R5-2023-0025-011 via California Integrated Water Quality System (CIWQS) submittal. In general, if any monitoring data for a monitoring location can be submitted using a computable document format (CDF) file upload, then it should be submitted as a CDF file upload, such as characterization monitoring data. However, certain parameters that cannot be uploaded to the CIWQS data tables, such as Annual Operations Reports, should be uploaded as a Portable Document Format (PDF), Microsoft Word, or Microsoft Excel file attachment. Also, please upload or enter a cover letter summarizing the content of the report to the submittal tab of the CIWQS module for each submittal.

All other documents not required to be submitted via CIWQS shall be converted to a searchable PDF and submitted by email to [centralvalleysacramento@waterboards.ca.gov](mailto:centralvalleysacramento@waterboards.ca.gov). Please include the following information in the body of the email:

- Attention: NPDES Compliance and Enforcement Section
- Discharger: City of Placerville
- Facility: Hangtown Creek Water Reclamation Facility
- County: El Dorado County
- CIWQS Place ID: 229595

Documents that are 50 megabytes or larger must be transferred to a DVD or flash drive, and mailed to our office, attention "ECM Mailroom-NPDES".

Any person aggrieved by this action of the Central Valley Water Board may petition the State Water Board to review the action in accordance with California Water Code section 13320 and California Code of Regulations, Title 23, sections 2050 and following. The State Water Board must receive the petition by 5:00 p.m., 30 days after the date this NOA R5-2023-0025-011 is issued, except that if the thirtieth day following the date this NOA R5-2023-0025-011 is issued falls on a Saturday, Sunday, or state holiday, the petition must be received by the State Water Board by 5:00 p.m. on the next business day. [Links to the laws and regulations applicable to filing petitions](http://www.waterboards.ca.gov/public_notices/petitions/water_quality) ([http://www.waterboards.ca.gov/public\\_notices/petitions/water\\_quality](http://www.waterboards.ca.gov/public_notices/petitions/water_quality)) may be found on the Internet or will be provided upon request.

Now that your NOA R5-2023-0025-011 has been issued, the Central Valley Water Board's Compliance and Enforcement Section will take over management of your case. Jon Rohrbough of the Compliance and Enforcement section is your point of contact for any questions regarding this NOA, R5-2023-0025-011. If you find it necessary to make a change to your permitted operations, you will be directed to the appropriate Permitting staff. You may contact Jon Rohrbough by phone at (916) 464-4822 or email at [Jon.Rohrbough@waterboards.ca.gov](mailto:Jon.Rohrbough@waterboards.ca.gov).

**Original Signed by:**  
**Adam Laputz on 6/27/2025**

Patrick Pulupa  
Executive Officer

Appendices:

Appendix A – Location Map  
Appendix B – Flow Schematic  
Appendix C – Supplemental Fact Sheet  
Appendix D – Monitoring and Reporting Program  
Appendix E – Determination of WQBELs

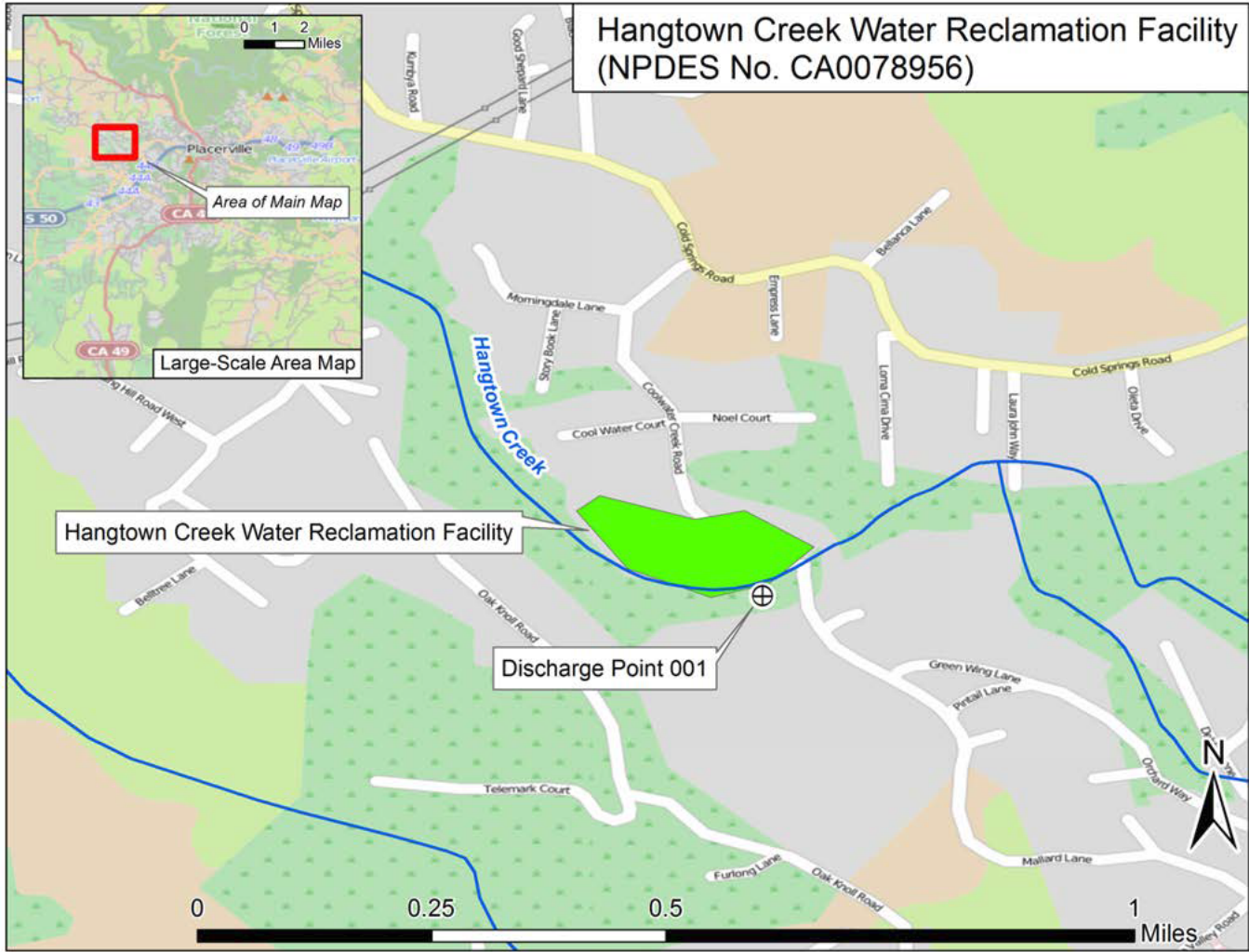
Enclosure (1):

Municipal General Order R5-2023-0025 (Discharger Only [email only])

cc:

Peter Kozelka, U.S. EPA, Region IX, San Francisco (email only)  
Prasad Gullapalli, U.S. EPA Region IX, San Francisco (email only)  
Afrooz Farsimadan, California State Water Resources Control Board (email only)  
Renan Jauregui, California State Water Resources Control Board (email only)  
Jarma Bennett, California State Water Resources Control Board (email only)  
Discharge Monitoring Reports, California State Water Resources Control Board (via  
email at [dmr@waterboards.ca.gov](mailto:dmr@waterboards.ca.gov))  
Chron File ([RB5S-chron@Waterboards.ca.gov](mailto:RB5S-chron@Waterboards.ca.gov))  
Xuan Luo, Central Valley Water Board, Rancho Cordova (email only)  
Jo Anne Kipps (email only)

APPENDIX A – LOCATION MAP



The diagram illustrates the wastewater treatment process at the Hangtown Creek Wastewater Treatment Plant. The flow begins with Influent entering the Screening and Grit Removal stage, which leads to a Splitter Box. From the Splitter Box, the flow goes to Primary Clarifier No. 1 and Primary Clarifier No. 2. The output from these clarifiers goes to a Wetwell, which then feeds into a Flow Equalization Basin (FEB). The FEB output goes to a series of Oxidation Ditch tanks: Anoxic 1A, Anoxic 1B, Oxidation 1A, and Oxidation 1B. A High Flow Bypass line connects the FEB to the Oxidation Ditch tanks. The output from the Oxidation Ditch tanks goes to Oxidation 2, which then feeds into the Secondary Clarifier Scum line. The Secondary Clarifier Scum line leads to a Splitter Box, which then feeds into Secondary Clarifier No. 1, Secondary Clarifier No. 2, and Secondary Clarifier No. 3. The output from these clarifiers goes to a Splitter Box, which then feeds into Pressure Filters. The output from the Pressure Filters goes to Filter #1 and Filter #2, which then feed into Filter Effluent Storage. The output from Filter Effluent Storage goes to a UV Channel, which then feeds into Emergency Chlorine Contact Basins. The output from the Emergency Chlorine Contact Basins goes to Hangtown Creek. A legend indicates that FEB stands for Flow Equalization Basin, and distinguishes between Liquid Flow (thin line) and Solids Flow (thick line).

## APPENDIX C – SUPPLEMENTAL FACT SHEET

### I. APPLICABLE PLANS, POLICIES, AND REGULATIONS

The requirements contained in this NOA R5-2023-0025-011 are based on the requirements and authorities described in Attachment F, section III of the Municipal General Order. In addition to the Fact Sheet contained in the Municipal General Order, the Central Valley Water Board incorporates this Supplemental Fact Sheet as findings of the Central Valley Water Board supporting the issuance of this NOA R5-2023-0025-011.

### II. RATIONALE FOR EFFLUENT LIMITATIONS

#### A. Bis(2-Ethylhexyl)Phthalate

Sampling in the Discharger's quarterly Effluent and Receiving Water Characterization Study, performed between 1 July 2021 and 30 June 2022, detected high Bis(2-Ethylhexyl)Phthalate (Bis-2) concentrations in - the effluent, receiving water, travel blank, and laboratory blank. The Discharger noted that there were laboratory Quality Assurance/Quality Control issues with the 26 July 2021 effluent and receiving water samples, specifically the matrix spike and matrix spike duplicate, which should be similar, but both were elevated and varied by 330 µg/L for a spike concentration of 4,000 µg/L. This delta is 80 times higher than the Bis-2 concentration reported for the effluent and receiving water. Bis-2 would be expected to be non-detect in the receiving water since Hangtown Creek has not had detections for Bis-2 during previous characterization studies. For the 24 January 2022 samples, the matrix spike and matrix spike duplicate were outside of the laboratory's 30 percent relative percent difference control limit, at 52 percent, which could be used to reject the data. Samples collected on 11 October 2021 and 11 April 2022 are also suspect due to laboratory blank and travel blank contamination. See Table C-1 below for sample results:

**Table C-1. Bis-2 Effluent and Receiving Water Characterization Study Data**

Location	Sample Date	Units	Bis-2 Results	MDL	RL	Lab Blank
EFF-001	7/26/2021	µg/L	4.1	0.58	1.5	ND
RSW-001	7/26/2021	µg/L	3.8	0.58	1.5	ND
EFF-001	10/11/2021	µg/L	ND	0.58	1.5	0.680
Travel Blank	10/11/2021	µg/L	ND	0.66	1.7	0.680
EFF-001	1/24/2022	µg/L	ND	0.58	1.5	ND
RSW-001	1/24/2022	µg/L	3.0	0.58	1.5	ND
Travel Blank	1/24/2022	µg/L	ND	0.58	1.5	ND
EFF-001	4/11/2022	µg/L	ND	0.58	1.5	ND
Travel Blank	4/11/2022	µg/L	0.94	0.58	1.5	ND

Section V.C.2.b.ii, in Attachment F, Fact Sheet, of the Municipal General Order establishes that section 1.2 of the State Implementation Policy (SIP) gives the Regional Water Quality Control Board (Central Valley Water Board) discretion to consider if any data are inappropriate or insufficient for use in implementing the SIP. Consistent with section 1.2 of the SIP, the Central Valley Water Board will not use data that are inappropriate or insufficient for purposes of the reasonable potential analysis, including where sample contamination or other issues are documented in a laboratory report or where documentation is available indicating that samples were collected under conditions that are not characteristic of the discharge. Central Valley Water Board staff have determined the Bis-2 data samples shown above are not representative of the effluent and receiving water based on the documented quality assurance/quality control issues. Therefore, no effluent limitations for Bis-2 are included in this NOA, R5-2023-0025-011.

### III. FINAL EFFLUENT LIMITATION CONSIDERATIONS

#### A. Satisfaction of Anti-Backsliding Requirements

The Clean Water Act specifies that a revised permit may not include effluent limitations that are less stringent than the previous permit unless a less stringent limitation is justified based on exceptions to the anti-backsliding provisions contained in CWA sections 402(o) or 303(d)(4), or, where applicable 40 Code of Federal Regulations (C.F.R.) section 122.44(l).

The effluent limitations in this NOA R5-2023-0025-011 are at least as stringent as the effluent limitations in the Facility's previous NOA, Enrollee Number R5-2017-0085-007, with the exception of effluent limitations for acute toxicity. This removal of effluent limitations is consistent with the anti-backsliding requirements of the CWA and federal regulations.

1. **CWA section 402(o)(1) and 303(d)(4).** CWA section 402(o)(1) prohibits the establishment of less stringent water quality-based effluent limits (WQBELs) "except in compliance with Section 303(d)(4)." CWA section 303(d)(4) has two parts: paragraph (A) which applies to nonattainment waters and paragraph (B) which applies to attainment waters.
  - a. For waters where standards are not attained, CWA section 303(d)(4)(A) specifies that any effluent limit based on a TMDL or other waste load allocation (WLA) may be revised only if the cumulative effect of all such revised effluent limits based on such TMDLs or WLAs will assure the attainment of such water quality standards.
  - b. For attainment waters, CWA section 303(d)(4)(B) specifies that a limitation based on a water quality standard may be relaxed where the action is consistent with the antidegradation policy.

Hangtown Creek is considered an attainment water for acute toxicity and ammonia because the receiving water is not listed as impaired on the CWA section 303(d) list for these constituents. The exceptions in CWA section 303(d)(4) address both waters in attainment with water quality standards and those not in attainment, i.e. waters on the CWA section 303(d) impaired waters list (State Water Resources Control Board Order WQ-2008-0006, Berry Petroleum Company, Poso Creek/McVan Facility). As discussed below, removal of acute toxicity effluent

limitations and relaxation of the ammonia limitations complies with federal and state antidegradation requirements. Thus, removal or relaxation of these effluent limitations meets the exception in CWA section 303(d)(4)(B).

2. **CWA section 402(o)(2).** CWA section 402(o)(2) provides several exceptions to the anti-backsliding regulations. CWA 402(o)(2)(B)(i) allows a renewed, reissued, or modified permit to contain a less stringent effluent limitation for a pollutant if information is available which was not available at the time of permit issuance (other than revised regulations, guidance, or test methods) and which would have justified the application of a less stringent effluent limitation at the time of permit issuance.

Updated information that was not available at the time NOA R5-2017-0085-007 was issued indicates that acute toxicity does not exhibit reasonable potential to cause or contribute to an exceedance of water quality objectives in the receiving water. New information about the absence of freshwater mussels was not available at the time NOA R5-2017-0085-007 was issued; therefore, the ammonia limitations in NOA R5-2017-0085-007 presumed freshwater mussels were present. The updated information that supports the removal of the effluent limitations for acute toxicity and relaxation of ammonia limitations is as follows:

- a. **Acute Toxicity.** Acute toxicity testing performed from February 2020 through January 2024 resulted in 100% survival of the test species (species) and therefore, no acute toxicity. The discharge does not show reasonable potential to cause acute toxicity in the receiving water.
- b. **Ammonia.** The Discharger provided a technical memorandum on 28 May 2025 documenting that freshwater mussels are not present 100 feet upstream (at receiving water monitoring station RSW-001), or as far as 1.6 miles downstream of the discharge point to Hangtown Creek. Ammonia limitation calculations were performed using freshwater mussels absent; therefore, resulting in less stringent limitations.

Thus, the removal of the effluent limitations for acute toxicity and relaxation of ammonia limitations in this NOA R5-2023-0025-011 is in accordance with CWA section 402(o)(2)(B)(i), which allows for the removal or relaxation of effluent limitations based on information that was not available at the time previous NOA, R5-2017-0085-007, was issued.

## **B. Antidegradation Policies**

This NOA R5-2023-0025-011 does not allow for an increase in flow or mass of pollutants to the receiving water. Therefore, a complete antidegradation analysis is not necessary. This NOA R5-2023-0025-011 requires compliance with applicable federal technology-based standards and with WQBELs where the discharge could have the reasonable potential to cause or contribute to an exceedance of water quality standards. The permitted discharge is consistent with the antidegradation provisions of 40 C.F.R. section 131.12 and the State Anti-Degradation Policy. Compliance with these requirements will result in the use of best practicable treatment or control of the discharge. The impact on existing water quality will be insignificant.

This NOA, R5-2023-0025-011, removes effluent limitations for acute toxicity and relaxes effluent limitations for ammonia. Based on Facility performance the relaxation or

removal of these effluent limitations is not expected to result in an increase in pollutants concentration or loading, a decrease in the level of treatment or control, or a reduction of water quality. Implementation of this NOA, R5-2023-0025-011, will result in the best practicable treatment or control of the discharge necessary to assure that a pollution or nuisance will not occur and the highest water quality consistent with the maximum benefit to the people of the State will be maintained. Thus, the removal of effluent limitations for acute toxicity and relaxation of effluent limitations for ammonia are consistent with the antidegradation provisions of 40 C.F.R. section 131.12 and State Water Resources Control Board (State Water Board) Resolution No. 68-16.

### **C. Salinity (Electrical Conductivity or EC)**

Based on effluent electrical conductivity data collected from 4 January 2021 through 30 September 2024, the maximum calendar annual average electrical conductivity of the effluent was 426 µmhos/cm. The Municipal General Order includes an effluent limitation for electrical conductivity of 700 µmhos/cm for dischargers enrolled under the Conservative Salinity Permitting Approach of the Salt Control Program that discharge to receiving waters with the agricultural supply beneficial use.

In accordance with the Basin Plan's Salt Control Program, the Discharger submitted a Notice of Intent on 12 July 2021 and elected for the Conservative Permitting Approach.

## **IV. RATIONALE FOR RECEIVING WATER LIMITATIONS**

### **A. Surface Water**

CWA section 303(a-c), requires states to adopt water quality standards, including criteria where they are necessary to protect beneficial uses. The Central Valley Water Board adopted water quality criteria as water quality objectives in the Basin Plan. The Basin Plan states that "[t]he numerical and narrative water quality objectives define the least stringent standards that the Regional Water Board will apply to regional waters in order to protect the beneficial uses." The Basin Plan includes numeric and narrative water quality objectives for various beneficial uses and water bodies. This NOA, R5-2023-0025-011, contains receiving surface water limitations based on the Basin Plan numerical and narrative water quality objectives for biostimulatory substances, color, chemical constituents, dissolved oxygen, floating material, oil and grease, pH, pesticides, radioactivity, suspended sediment, settleable substances, suspended material, tastes and odors, temperature, toxicity, and turbidity.

### **B. Groundwater – Not Applicable**

## **V. RATIONALE FOR MONITORING REQUIREMENTS**

CWA section 308 and 40 C.F.R. sections 122.41(h), (j)-(l), 122.44(i), and 122.48 require that all NPDES permits specify monitoring and reporting requirements. Water Code sections 13267 and 13383 also authorize the Central Valley Water Board to establish monitoring, inspection, entry, reporting, and recordkeeping requirements. The Monitoring and Reporting Program, Attachment E of the Municipal General Order establishes monitoring, reporting, and recordkeeping requirements that implement federal and state requirements. The following provides the rationale for the monitoring requirements contained in Monitoring and Reporting Program, Appendix D, of this NOA R5-2023-0025-011.



### A. Influent Monitoring

1. Influent monitoring is required to collect data on the characteristics of the wastewater and to assess compliance with effluent limitations (e.g., BOD<sub>5</sub> and TSS reduction requirements). The monitoring frequency for flow was retained from Order R5-2014-0015-01.
2. Influent monitoring frequencies for BOD<sub>5</sub> (one time per week) and TSS (one time per week) were retained from NOA, R5-2017-0085-007.

### B. Effluent Monitoring

1. Pursuant to the requirements of 40 C.F.R. section 122.44(i)(2) effluent monitoring is required for all constituents with effluent limitations. Effluent monitoring is necessary to assess compliance with effluent limitations, assess the effectiveness of the treatment process, and to assess the impacts of the discharge on the receiving stream and groundwater.
2. The following effluent monitoring frequencies have been revised from NOA R5-2017-0085-007. All other effluent sampling frequencies from NOA R5-2017-0085-007 are carried forward to this NOA R5-2023-0025-011:

**Table C-2. Revised Sampling Frequencies for Effluent Monitoring**

Parameter	Unit	Prior Sample Frequency	Revised Sample Frequency	Reason for Change
Acute Toxicity	% survival	1/Year	Discontinue	Note 1
Dissolved Organic Carbon (DOC)	mg/L	1/Quarter	Discontinue	Note 2

**Table C-2 Note:**

1. **Acute Toxicity.** A chronic toxicity test is generally protective of both chronic and acute toxicity and there were no acute toxicity failures during previous NOA R5-2017-0085-007; therefore, acute toxicity testing has been discontinued in this NOA, R5-2023-0025-011.
2. **Dissolved Organic Carbon.** Monitoring data collected during the term of NOA R5-2017-0085-007 indicate that the dissolved organic carbon dataset was stable and consistent. Therefore, this NOA decreases the effluent monitoring frequency for dissolved organic carbon from quarterly monitoring to monitoring during the required receiving water characterization monitoring frequency.

### C. Whole Effluent Toxicity Testing Requirements

1. **Acute Toxicity – Not Applicable**
2. **Chronic Toxicity.** Effluent monitoring frequency for chronic toxicity bioassay testing (once per quarter) has been retained from previous Order NOA, R5-2017-0085-007. Chronic whole effluent toxicity testing is required when discharging to Hangtown Creek in order to demonstrate compliance with the Statewide Toxicity Provisions.

## **D. Receiving Water Monitoring**

### **1. Hangtown Creek**

- a. Receiving water monitoring is necessary to assess compliance with receiving water limitations and to assess the impacts of the discharge to Hangtown Creek.
- b. The receiving water monitoring frequencies and sample types for pH, dissolved oxygen, temperature, and turbidity have been retained from NOA, R5-2017-0085-007 to determine compliance with receiving water limitations for these parameters. Receiving water monitoring for dissolved organic carbon and hardness has been retained to collect data for calculation of applicable metals criteria in future reasonable potential analyses. The frequencies for these parameters are shown on Table D-4 (Receiving Water Monitoring).
- c. The previous NOA, R5-2017-0085-007, required weekly receiving water monitoring for electrical conductivity and quarterly monitoring for dissolved organic carbon. Monitoring data collected during the term of NOA, R5-2017-0085-007 indicate that the discharge has not caused significant impacts to Hangtown Creek, both electrical conductivity and dissolved organic carbon datasets were stable and consistent. Therefore, this NOA decreases the receiving water monitoring frequency for electrical conductivity from once per week to once per month and dissolved organic carbon from quarterly monitoring to monitoring during the required receiving water characterization monitoring frequency.

### **2. Groundwater – Not Applicable**

## **E. Biosolids Monitoring – Not Applicable**

## **F. Water Supply Monitoring – Not Applicable**

## **G. Filtration System Monitoring**

1. Filtration system monitoring for turbidity is required for Dischargers of tertiary treated wastewater that meet the eligibility criteria in section I.B.4 of the Municipal General Order to determine compliance with the filtration system operating specifications in section VII.C.4.a of the Municipal General Order.
2. The monitoring frequency for turbidity (continuous) is retained from previous NOA R5-2017-0085-007 to evaluate compliance the turbidity operating specifications.

## **H. UV Disinfection System Monitoring**

1. Monitoring frequencies for flow (continuous), number of UV rows in operation (continuous), UV transmittance (continuous), and UV dose (continuous) have been retained from previous NOA R5-2017-0085-007, to evaluate compliance with UV operating specifications.

## **I. Pond Monitoring**

1. When any type of wastewater is directed to any storage basin, this NOA, R5-2023-0025-011, requires the Discharger to keep a log for FEB-001 to record the date, type of wastewater, volume, duration, and freeboard in the basin, which is retained from the previous NOA R5-2017-0085-007.

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

1. Under the authority of section 308 of the CWA (33 U.S.C. section 1318), U.S. EPA requires all dischargers 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 their own laboratories or their 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 submit annually the results of the DMR-QA Study or the results of the most recent Water Pollution Performance Evaluation Study 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.

#### **K. Effluent and Receiving Water Characterization Monitoring**

1. NOA R5-2017-0085-007 included quarterly effluent characterization monitoring for one year when discharging to Hangtown Creek. This NOA, R5-2023-0025-011, reduces the effluent characterization monitoring to semi-annual for one year. The Facility discharges less than 1.0 MGD, does not have any major Facility upgrades planned during the next five years, and the historical characterization data has been consistent during previous sampling events.
2. NOA R5-2017-0085-007 included semiannual upstream receiving water characterization monitoring for one year when discharging to Hangtown Creek. This NOA, R5-2023-0025-011, retains the semiannual upstream receiving water characterization monitoring for one year, to determine receiving water constituent concentrations during both the dry and wet seasons.

#### **L. Pyrethroid Pesticides Monitoring – Not Applicable**

### **VI. PRETREATMENT PROVISION – NOT APPLICABLE**

### **VII. DISCHARGE MONITORING REPORT-QUALITY ASSURANCE (DMR-QA) STUDY PROGRAM**

- A.** Under the authority of section 308 of the CWA (33 U.S.C. section 1318), U.S. EPA requires all dischargers 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 their own laboratories or their 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 submit annually the results of the DMR-QA Study or the results of the most recent Water Pollution Performance Evaluation Study 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. RECYCLED WATER POLICY ANNUAL REPORTS**

- A.** On 11 December 2018, the State Water Board adopted Resolution 2018-0057, which amends the Recycled Water Policy, section 3, to require wastewater and recycled water dischargers to annually report monthly volumes of influent, wastewater produced, and effluent, including treatment level and discharge type. Therefore, to incorporate monitoring and reporting required by the Recycled Water Policy, the Municipal General Order requires annual reporting of wastewater and recycled water use into Geotracker and confirmation of annual reporting to Geotracker is required by this NOA R5-2023-0025-011.

## IX. SUMMARY OF REASONABLE POTENTIAL ANALYSIS

### Abbreviations used in Table C-3:

MEC = Maximum Effluent Concentration  
 B = Maximum Receiving Water Concentration  
 C = Criterion used for Reasonable Potential Analysis  
 CMC = Criterion Maximum Concentration  
 CCC = Criterion Continuous Concentration  
 Water and Org = Human Health Criterion for Consumption of Water and Organisms  
 Org Only = Human Health Criterion for Consumption of Organisms Only  
 Basin Plan = Numeric Site-Specific Basin Plan Water Quality Objective  
 MCL = Drinking Water Standards Maximum Contaminant Level  
 RP= Reasonable Potential

**Table C-3: SUMMARY OF REASONABLE POTENTIAL ANALYSIS**

Parameter	Units	MEC	B	C	CMC	CCC	Water and Org	Org. Only	Basin Plan	MCL	RP
Ammonia (as Nitrogen)	mg/L	1.30	<0.1	1.23	5.62	1.23	--	--	--	--	Yes
Nitrate Plus Nitrite (as N)	mg/L	7.57	0.33	10	--	--	--	--	--	10	Yes
Bis (2-ethylhexyl) phthalate	µg/L	<1.5	<1.5	1.8	--	--	1.8	5.9	--	4	No
Electrical Conductivity @ 25°C	µmhos/cm	520	460	1600	--	--	--	--	--	1600	No

1. Table C-3 Notes:

- i. **CMC.** For ammonia, the CMC or criterion maximum concentration is based on the U.S. EPA National Recommended Ambient Water Quality Criteria Freshwater Aquatic Life Protection, 1-hour average.
- ii. **CCC.** For ammonia, the CCC or criterion continuous concentration is based on the U.S. EPA National Recommended Ambient Water Quality Criteria Freshwater Aquatic Life Protection, 30-day average.
- iii. **Ammonia and Nitrate plus Nitrite.** Reasonable potential exists due to the biological processes inherent to the treatment of domestic wastewater (see sections V.C.3.b.ii and V.C.3.b.ix in Attachment F, Fact Sheet, of the Municipal General Order).
- iv. **Electrical Conductivity.** Reasonable potential does not exist; however, an effluent limitation is included in this NOA, R5-2023-0025-0011, in order to implement the Conservative Permitting Approach of the Basin Plan's Salt Control Program.

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## **APPENDIX D – MONITORING AND REPORTING PROGRAM (MRP)**

The Municipal General Order contains monitoring and reporting requirements in Attachment E. Some of the monitoring and reporting requirements listed in the Municipal General Order are not applicable to the Facility. The monitoring and reporting requirements applicable to the Facility are contained in this Appendix and are described herein.

The Code of Federal Regulations (40 C.F.R. § 122.48) requires that all NPDES permits specify monitoring and reporting requirements. Water Code sections 13267 and 13383 also authorize the Central Valley Water Board to require technical and monitoring reports. This MRP establishes monitoring and reporting requirements that implement state and federal regulations.

### **I. GENERAL MONITORING PROVISIONS**

- A.** 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 the approval of the Central Valley Water Board.
- B.** Final effluent samples shall be taken downstream of the last addition of wastes to the treatment or discharge works where a representative sample may be obtained prior to mixing with the receiving waters. Samples shall be collected at such a point and in such a manner to ensure a representative sample of the discharge.
- C.** Chemical, bacteriological, and bioassay analyses of any material required by this NOA, R5-2023-0025-011, shall be conducted by a laboratory accredited for such analyses by the State Water Resources Control Board (State Water Board), Division of Drinking Water (DDW), in accordance with the provision of Water Code section 13176. Laboratories that perform sample analyses must be identified in all monitoring reports submitted to the Central Valley Water Board. Data generated from field measurements such as, pH, dissolved oxygen, electrical conductivity (EC), turbidity, and temperature are exempt pursuant to Water Code section 13176. A manual containing the steps followed in this program for any field measurements such as, but not limited to, pH, dissolved oxygen, EC, turbidity, and temperature must be kept onsite in the treatment facility laboratory and shall be available for inspection by Central Valley Water Board staff. The Discharger must demonstrate sufficient capability (qualified and trained employees, properly calibrated and maintained field instruments, etc.) to adequately perform these field measurements. The Quality Assurance-Quality Control Program must conform to U.S. EPA guidelines or to procedures approved by the Central Valley Water Board.
- D.** 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. All monitoring instruments and devices used by the Discharger to fulfill the prescribed

monitoring program shall be properly maintained and calibrated as necessary, at least yearly, 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. Laboratory analytical methods shall be sufficiently sensitive in accordance with the Sufficiently Sensitive Methods Rule (SSM Rule) specified under 40 C.F.R. 122.21(e)(3) and 122.44(i)(1)(iv). A U.S. EPA-approved analytical method is sufficiently sensitive for pollutant/parameter where:
  - The method minimum level (ML) is at or below the applicable water quality objective for the receiving water, or;
  - The method ML is above the applicable water quality objective for the receiving water but the amount of the pollutant/parameter in the discharge is high enough that the method detects and quantifies the level of the pollutant/parameter, or;
  - The method ML is above the applicable water quality objective for the receiving water, but the ML is the lowest of the 40 C.F.R. 136 U.S. EPA-approved analytical methods for the pollutant/parameter.
- 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, via email, to [QualityAssurance@waterboards.ca.gov](mailto:QualityAssurance@waterboards.ca.gov) to the State Water Resources Control.
- H. The Discharger shall file with the Central Valley Water Board technical reports on self-monitoring performed according to the detailed specifications contained in this MRP.
- I. The results of all monitoring required by this MRP shall be reported to the Central Valley Water Board and shall be submitted in such a format as to allow direct comparison with the limitations and requirements of the NOA R5-2023-0025-011. Unless otherwise specified, discharge flows shall be reported in terms of the monthly average and the daily maximum discharge flows.

**J. Multiple Discharge Points – Not Applicable**

**II. MONITORING LOCATIONS**

The Discharger shall establish the monitoring locations listed in Table D-1 to demonstrate compliance with the effluent limitations, discharge specifications, and other requirements in the NOA, R5-2023-0025-011.



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

Discharge Point Name	Monitoring Location Name	Monitoring Location Description
--	INF-001	Composite sampler after grit chamber and before the Parshall flume.
001	EFF-001	A location where a representative sample of the effluent can be collected prior to discharging to surface water Latitude: 38° 43' 51.7" N - Longitude: 120° 50' 48.8" W
--	RSW-001	100 feet upstream of the point of discharge and not influenced by the discharge of effluent.
--	RSW-002	1,000 feet downstream of the point of discharge.
--	FEB-001	Flow Equalization Basin Latitude: 38° 43' 54.0" N - Longitude: 120° 50' 56.2" W
--	FIL-001	Monitoring of the filter effluent to be measured immediately downstream of Gravity Filter MTU1 and prior to the UV disinfection system.
--	FIL-002	Monitoring of the filter effluent to be measured immediately downstream of Gravity Filter MTU2 and prior to the UV disinfection system.
--	FIL-003	Monitoring of the filter effluent to be measured immediately downstream of the pressure filters and prior to the UV disinfection system.
--	UVS-001	A location where a representative sample of wastewater can be collected upstream or downstream of the ultraviolet light (UV) disinfection system

The North latitude and West longitude information in Table D-1 are approximate for administrative purposes.

### III. INFLUENT MONITORING REQUIREMENTS

#### A. Monitoring Location INF-001

1. The Discharger shall monitor influent to the Facility at Monitoring Location INF-001 when discharging to Hangtown Creek as specified in Table D-2 and the testing requirements described in section III.A.2 below:

**Table D-2. Influent Monitoring**

Parameter	Units	Sample Type	Sampling Frequency
Flow	MGD	Meter	Continuous
Biochemical Oxygen Demand (5-day @ 20°Celsius)	mg/L	24-hour Composite	1/Week
Total Suspended Solids	mg/L	24-hour Composite	1/Week

2. **Table D-2 Testing Requirements.** The Discharger shall comply with the following testing requirements when monitoring for the parameters described in Table D-2:
  - a. **Applicable to all parameters.** Parameters shall be analyzed using the analytical methods described in 40 C.F.R. part 136; or by methods approved by the Central Valley Water Board or the State Water Board. In addition, if requested by the Discharger, the sample type may be modified by the Executive Officer to another 40 C.F.R. part 136 allowed sample type.
  - b. **Composite Sample.** All composite samples shall be collected from a 24-hour flow proportional composite.

#### IV. EFFLUENT MONITORING REQUIREMENTS

##### A. Monitoring Location EFF-001

1. The Discharger shall monitor treated domestic wastewater at Monitoring Location EFF-001 when discharging to Hangtown Creek as specified in Table D-3 and the testing requirements in section IV.A.2. If there was no discharge to receiving water during the designated monitoring period, monitoring is not required for that period. If there was no discharge, the Discharger shall so state in the monthly self-monitoring report (SMR).

**Table D-3. Effluent Monitoring**

Parameter	Units	Sample Type	Minimum Sampling Frequency
Flow	MGD	Meter	Continuous
Biochemical Oxygen Demand (5-day @ 20° C)	mg/L	24-hr Composite	2/Week
Biochemical Oxygen Demand (5-day @ 20° C)	percent removal	Calculate	1/Month
pH	standard units	Grab	5/Week
Total Suspended Solids	mg/L	24-hr Composite	2/Week
Total Suspended Solids	percent removal	Calculate	1/Month
Ammonia Nitrogen, Total (as N)	mg/L	Grab	1/Week
Dissolved Oxygen	mg/L	Grab	1/Month
Electrical Conductivity @ 25°C	µmhos/cm	Grab	1/Month
Hardness, Total (as CaCO <sub>3</sub> )	mg/L	Grab	1/Quarter
Nitrate Plus Nitrite (as N)	mg/L	Calculate	1/Week
Nitrate Nitrogen, Total (as N)	mg/L	Grab	1/Week
Nitrite Nitrogen, Total (as N)	mg/L	Grab	1/Week
Temperature	°F	Grab	1/Day
Total Coliform Organisms	MPN/100 mL	Grab	2/Week

2. **Table D-3 Testing Requirements.** The Discharger shall comply with the following testing requirements when monitoring for the parameters described in Table D-3:
  - a. **Applicable to all parameters.** Pollutants shall be analyzed using the analytical methods described in 40 C.F.R. Part 136 or by methods approved by the Central Valley Water Board or the State Water Board.
  - b. **Composite Sample.** All composite samples shall be collected from a 24-hour flow proportional composite.
  - c. **Grab Sample.** A grab sample is defined as an individual discrete sample collected over a period of time not exceeding 15 minutes. It can be taken manually, using a pump, scoop, vacuum, or other suitable device.
  - d. **Ammonia.** Samples for pH and temperature shall be recorded at the time of ammonia sample collection.
  - e. **Field Meter.** A hand-held field meter may be used for **pH, electrical conductivity, temperature, and dissolved oxygen**, provided the meter utilizes a U.S. EPA-approved algorithm/method and is calibrated and maintained in accordance with the manufacturer's instructions. A calibration and maintenance log for each meter used for monitoring required by this Monitoring and Reporting Program shall be maintained at the Facility.
  - f. **Total Coliform Organisms.** Total coliform organisms samples may be collected at any point following disinfection.
  - g. **Hardness-Dependent Metals.** Hardness, total (as CaCO<sub>3</sub>) and pH samples shall be taken concurrent with metals samples.
  - h. **Temperature, pH, Hardness, and Dissolved Oxygen.** The effluent samples for temperature, pH, hardness, and dissolved oxygen shall be taken approximately the same time and on the same date with the receiving water samples for these parameters.

## V. WHOLE EFFLUENT TOXICITY (WET) TESTING REQUIREMENTS

### A. Acute Toxicity Testing – Not Applicable.

### B. Chronic Toxicity Testing

The Discharger shall meet the following chronic toxicity testing requirements:

1. **Instream Waste Concentration (IWC) for Chronic Toxicity.** The chronic toxicity IWC is 100 percent effluent.
2. **Routine Monitoring Frequency.** The Discharger shall perform routine chronic toxicity testing **once per toxicity calendar quarter** in quarters in which there is expected to be at least 15 days of discharge within the toxicity calendar quarter. While the Discharger is conducting a TRE, the Executive Officer may authorize a reduction in the frequency of routine monitoring to a minimum of two (2) chronic aquatic toxicity tests per calendar year (12 consecutive months). The Discharger shall return to the routine monitoring

schedule either at the conclusion of the TRE or one year after the initiation of the TRE, whichever occurs sooner.

3. **Toxicity Calendar Month, Quarter, and Year**

- a. **Toxicity Calendar Month.** The toxicity calendar month is defined as the period of time beginning on the day of initiation of the routine toxicity monitoring to the day before the corresponding day of the next month if the corresponding day exists, or if not to the last day of the next month (e.g., from January 1 to January 31, from February 15 to March 14, from March 31 to April 29).
- b. **Toxicity Calendar Quarter.** A toxicity calendar quarter is defined as **three consecutive toxicity calendar months**. For purposes of this NOA R5-2023-0025-011, the toxicity calendar quarters **begin on January 1, April 1, July 1, and October 1** (i.e., from January 1 to March 31, from April 1 to June 30, from July 1 to September 30, from October 1 to December 31).
- c. **Toxicity Calendar Year.** A toxicity calendar year is defined as **twelve consecutive toxicity calendar months**.

4. **Chronic Toxicity Monthly Median Effluent Limitation (MMEL)**

**Compliance Testing.** If a routine chronic toxicity monitoring test results in a “Fail” (as defined in section V.C below) at the IWC, then a maximum of two chronic toxicity MMEL compliance tests shall be completed. The chronic toxicity MMEL compliance tests shall be initiated within the same toxicity calendar month that the routine monitoring chronic toxicity test was initiated that resulted in the “Fail” at the IWC. If the first chronic toxicity MMEL compliance test results in a “Fail” at the IWC, then the second chronic toxicity MMEL compliance test is unnecessary and is waived.

5. **Additional Routine Monitoring Tests for Toxicity Reduction Evaluation (TRE) Determination.** In order to determine if a TRE is necessary, an additional routine monitoring test is required when there is one violation of the chronic toxicity MDEL or MMEL, but not two violations, in a single toxicity calendar month. This additional routine monitoring test is not required if the Discharger is already conducting a TRE. This additional routine monitoring test shall be initiated within two weeks after the toxicity calendar month in which the MMEL or MDEL violation occurred. The toxicity calendar month of the violation and the toxicity calendar month of the additional routine monitoring shall be considered “successive toxicity calendar months” for purposes of determining whether a TRE is required. This additional routine monitoring test is also used for compliance purposes and could result in the need to conduct MMEL compliance testing per section V.B.4 above.

6. **Sample Volumes.** Adequate sample volumes shall be collected to provide renewal water to complete the test in the event that the discharge is intermittent.

7. **Test Species.** The testing shall be conducted using the most sensitive species. The Discharger shall conduct chronic toxicity tests with the *Pimephales promelas* (*fathead minnow*).

The Executive Officer shall have discretion to allow the temporary use of the next appropriate species as the most sensitive species when the Discharger submits documentation and the Executive Officer determines that the Discharger has encountered unresolvable test interference or cannot secure a reliable supply of test organisms. The “next appropriate species” is a species in Table 1 of the Statewide Toxicity Provisions in the same test method classification (e.g., chronic aquatic toxicity test methods, acute aquatic toxicity test method), in the same salinity classification (e.g., freshwater or marine), and in the same taxon as the most sensitive species. When there are no other species in Table 1 in the same taxon as the most sensitive species (e.g., freshwater chronic toxicity tests), the “next appropriate species” is the species exhibiting the highest percent effect at the IWC tested in the species sensitivity screening other than the most sensitive species.

8. **Test Methods.** The Discharger shall conduct the chronic toxicity tests on effluent samples at the IWC for the discharge in accordance with species and test methods described in Short-term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms (EPA/821/R02/013, 2002; Table IA, 40 C.F.R. part 136).
9. **Dilution and Control Water.** Dilution water and control water shall be prepared and used as specified in the test methods manual. If dilution water and control water are different from test organism culture water, then a second control using culture water shall also be used. A receiving water control or laboratory water control may be used as the diluent.
10. **Test Failure.** If the effluent chronic toxicity test does not meet all test acceptability criteria (TAC) specified in the referenced test method in EPA/821-R-02-013, the Discharger must conduct a Replacement Test as soon as possible, as specified in subsection B.11, below.
11. **Replacement Test.** When a required toxicity test for routine monitoring or a MMEL compliance test is not completed, a new toxicity test to replace the toxicity test that was not completed shall be initiated as soon as possible. The new toxicity test shall replace the routine monitoring or MMEL compliance test, as applicable, for the toxicity calendar month in which the toxicity test that was not completed was required to be initiated, even if the new toxicity test is initiated in a subsequent toxicity calendar month. The new toxicity test for routine monitoring or for the MMEL compliance test, as applicable, and any MMEL compliance tests required to be conducted due to the results of the new toxicity test shall be used to determine compliance with the effluent limitations for the toxicity calendar month in which the toxicity test that was not completed was required to be initiated. The new toxicity test and any MMEL compliance test required to be conducted due to the results of the new toxicity test shall not be used to substitute for any other required toxicity tests.

If it is determined that any specific monitoring event was not initiated in the required time period due to circumstances outside of the Discharger’s control that were not preventable with the reasonable exercise of care, the Discharger is not required to initiate the specific monitoring event in the

required time period if the Discharger promptly initiates or ultimately completes a replacement test.

### **C. Quality Assurance and Additional Requirements**

Quality assurance measures, instructions, and other recommendations and requirements are found in the test methods manual previously referenced. Additional requirements are below:

1. The discharge is subject to determination of “Pass” or “Fail” from a chronic toxicity test using the Test of Significant Toxicity (TST) statistical t-test approach described in section IV.B.1.c of the Statewide Toxicity Provisions.
2. The null hypothesis (Ho) for the TST statistical approach is:

Mean discharge IWC response  $\leq$  RMD x Mean control response, where the chronic RMD = 0.75 and the acute RMD = 0.80.

A test result that rejects this null hypothesis is reported as “Pass”. A test result that does not reject this null hypothesis is reported as “Fail”.

3. The relative “Percent Effect” at the discharge IWC is defined and reported as:

Percent Effect = ((Mean control response – Mean discharge IWC response) / (Mean control response)) x 100.

This is a t-test, a statistical analysis comparing two sets of replicate observations, i.e., a control and IWC. The purpose of this statistical test is to determine if the means of the two sets of observations are different (i.e., if the IWC or receiving water concentration differs from the control, the test result is “Fail”). The Welch’s t-test employed by the TST statistical approach is an adaptation of Student’s t-test and is used with two samples having unequal variances.

### **D. WET Testing Notification Requirements**

The Discharger shall notify the Central Valley Water Board of test results exceeding the chronic toxicity effluent limitation as soon as the Discharger learns of the exceedance, but no later than 24-hours after receipt of the monitoring results.

### **E. WET Testing Reporting Requirements**

The Discharger shall submit the full laboratory report for all toxicity testing (routine, MMEL, TRE, etc.) and, if applicable, progress reports on TREs as attachments to the SMRs in CIWQS for the reporting period (e.g., monthly, quarterly, semi-annually, or annually), and shall provide the data (i.e., Pass/Fail) in the PET tool for uploading into CIWQS. The laboratory report shall include:

1. The valid toxicity test results for the TST statistical approach, reported as “Pass” or “Fail” and “Percent Effect” at the IWC for the discharge, the dates of sample collection and initiation of each toxicity test, and all results for effluent parameters monitored concurrently with the toxicity test(s);
2. The statistical analysis used in section IV.B.1.c of the Statewide Toxicity Provisions; and

3. Statistical program (e.g., TST calculator, CETIS, etc.) output results, including graphical plots, for each toxicity test.

#### **F. Most Sensitive Species Screening**

If the effluent used in the species sensitivity screening is no longer representative of the current effluent, the Discharger shall perform rescreening to re-evaluate the most sensitive species. The species sensitivity screening shall be conducted as follows:

1. **Frequency of Testing for Species Sensitivity Screening.** Species sensitivity screening for chronic toxicity shall include, at a minimum, a set of chronic WET testing conducted in **each toxicity calendar quarter in which there is expected to be at least 15 days of discharge**. Species sensitivity screening for chronic toxicity shall be conducted using the water flea (*Ceriodaphnia dubia*), fathead minnow (*Pimephales promelas*), and green alga (*Pseudokirchneriella subcapitata*). The tests shall be performed at an IWC of no less than 100 percent effluent.

When there is no representative effluent available to complete tests in one of the sets in a species sensitivity screening, that set of testing shall not be required.

2. **Determination of Most Sensitive Species.** The Central Valley Water Board will determine the most sensitive species from the water flea (*Ceriodaphnia dubia*), fathead minnow (*Pimephales promelas*), and green alga (*Pseudokirchneriella subcapitata*) using the following procedure. If a single test in the species sensitivity screening testing results in a “Fail” using the TST statistical approach, then the species used in that test shall be established as the most sensitive species. If there is more than a single test that results in a “Fail”, then of the species with results of a “Fail”, the species that exhibits the highest percent effect shall be established as the most sensitive species. If none of the tests in the species sensitivity screening results in a “Fail”, but at least one of the species exhibits a percent effect greater than 10 percent, then the single species that exhibits the highest percent effect shall be established as the most sensitive species. In all other circumstances, the Executive Officer shall have discretion to determine which single species is the most sensitive considering the test results from the species sensitivity screening.

The “next appropriate species” is a species in Table 1 of the Statewide Toxicity Provisions in the same test method classification (e.g., chronic aquatic toxicity test methods, acute aquatic toxicity test method), in the same salinity classification (e.g., freshwater or marine), and in the same taxon as the most sensitive species. When there are no other species in Table 1 in the same taxon as the most sensitive species (e.g., freshwater chronic toxicity tests), the “next appropriate species” is the species exhibiting the highest percent effect at the IWC tested in the species sensitivity screening other than the most sensitive species. The Executive Officer shall have discretion to allow the temporary use of the next appropriate species as the most sensitive species when the Discharger submits documentation and the Executive

Officer determines that the Discharger has encountered unresolvable test interference or cannot secure a reliable supply of test organisms.

### **G. Toxicity Reduction Evaluations**

Reports for TREs shall be submitted in accordance with the schedule contained in the Discharger's approved TRE Work Plan, or as amended by the Discharger's TRE Action Plan.

1. **TRE Implementation.** The Discharger is required to initiate a TRE when there is any combination of two or more chronic toxicity MDEL or MMEL violations within a single toxicity calendar month or within two successive toxicity calendar months (as defined in paragraph V.B.5 above). If other information indicates toxicity (e.g., results of additional monitoring, results of monitoring at a higher concentration than the IWC, fish kills, or intermittent recurring toxicity), the Central Valley Water Board may require a TRE. A TRE may also be required when there is no effluent available to complete a routine monitoring test or MMEL compliance test.
  - a. **Preparation and Implementation of Detailed TRE Action Plan.** The Discharger shall conduct TREs in accordance with an approved TRE Work Plan. Within 30 days of the test result that triggered the TRE, the Discharger shall submit to the Executive Officer a TRE Action Plan per the Discharger's approved TRE Work Plan. The TRE Action Plan shall include the following information, and comply with additional conditions set by the Executive Officer:
    - i. Specific actions the Discharger will take to investigate and identify the cause(s) of toxicity, including a TRE WET monitoring schedule;
    - ii. Specific actions the Discharger will take to mitigate the impact of the discharge and prevent the recurrence of toxicity; and
    - iii. A schedule for these actions, progress reports, and the final report.
  - b. The Central Valley Water Board recognizes that toxicity may be episodic and identification of causes and reduction of sources of toxicity may not be successful in all cases. The TRE may be ended at any stage if monitoring finds there is no longer toxicity.
2. **TRE Work Plan Guidance.** The Discharger shall submit to the Central Valley Water Board a TRE Work Plan for approval by the Executive Officer by the date specified in Technical Reports table. If the Executive Officer does not disapprove the work plan within 60 days, the work plan shall become effective. The TRE Work Plan shall outline the procedures for identifying the source(s) of and reducing or eliminating effluent toxicity. The TRE Work Plan must be of adequate detail to allow the Discharger to immediately initiate a TRE and shall be developed in accordance with U.S. EPA guidance, as discussed below:
  - a. Toxicity Reduction Evaluation Guidance for Municipal Wastewater Treatment Plants, EPA/833-B-99/002, August 1999.



- b. Generalized Methodology for Conducting Industrial Toxicity Reduction Evaluations (TREs), EPA/600/2-88/070, April 1989.
- c. Methods for Aquatic Toxicity Identification Evaluations: Phase I Toxicity Characterization Procedures, Second Edition, EPA 600/6-91/003, February 1991.
- d. Toxicity Identification Evaluation: Characterization of Chronically Toxic Effluents, Phase I, EPA/600/6-91/005F, May 1992.
- e. Methods for Aquatic Toxicity Identification Evaluations: Phase II Toxicity Identification Procedures for Samples Exhibiting Acute and Chronic Toxicity, Second Edition, EPA/600/R-92/080, September 1993.
- f. Methods for Aquatic Toxicity Identification Evaluations: Phase III Toxicity Confirmation Procedures for Samples Exhibiting Acute and Chronic Toxicity, Second Edition, EPA 600/R-92/081, September 1993.
- g. Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters to Freshwater and Marine Organisms, Fifth Edition, EPA-821-R-02-012, October 2002.
- h. Short-term Methods for Estimating the Chronic Toxicity of Effluents and Receiving Waters to Freshwater Organisms, Fourth Edition, EPA-821-R-02-013, October 2002.
- i. Technical Support Document for Water Quality-based Toxics Control, EPA/505/2-90-001, March 1991.

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

#### **VII. RECYCLING MONITORING REQUIREMENTS – NOT APPLICABLE**

#### **VIII. RECEIVING WATER MONITORING REQUIREMENTS**

##### **A. Monitoring Locations RSW-001 and RSW-002**

1. The Discharger shall monitor Hangtown Creek at Monitoring Locations RSW-001 and RSW-002 when discharging to Hangtown Creek as specified in Table D-4 and the testing requirements in section VIII.A.2. If there was no discharge to receiving water during the designated monitoring period, monitoring is not required during that period. If there is no upstream flow in the receiving water during the designated monitoring period, monitoring is not required at RSW-001 during that period. Whenever monitoring is not required, the Discharger shall state so in the monthly SMR.

**Table D-4. Receiving Water Monitoring Requirements**

<b>Parameter</b>	<b>Units</b>	<b>Sample Type</b>	<b>Minimum Monitoring Frequency</b>
pH	standard units	Grab	1/Week
Dissolved Oxygen	mg/L	Grab	1/Week
Electrical Conductivity @ 25°C	µmhos/cm	Grab	1/Month
Hardness, Total (as CaCO <sub>3</sub> )	mg/L	Grab	1/Quarter

Parameter	Units	Sample Type	Minimum Monitoring Frequency
Temperature (1 June – 15 October)	°F	Grab	5/Week
Temperature (16 October – 31 May)	°F	Grab	2/Week
Turbidity	NTU	Grab	1/Week

2. Table D-4 Testing Requirements. The Discharger shall comply with the following testing requirements when monitoring for the parameters described in Table D-4:
  - a. **Applicable to all parameters.** Pollutants shall be analyzed using the analytical methods described in 40 C.F.R. Part 136 or by methods approved by the Central Valley Water Board or the State Water Board.
  - b. **Grab Sample.** A grab sample is defined as an individual discrete sample collected over a period of time not exceeding 15 minutes. It can be taken manually, using a pump, scoop, vacuum, or other suitable device.
  - c. **Field Meter.** A hand-held field meter may be used for **pH, electrical conductivity, temperature, dissolved oxygen, and turbidity**, provided the meter utilizes a U.S. EPA-approved algorithm/method and is calibrated and maintained in accordance with the manufacturer's instructions. A calibration and maintenance log for each meter used for monitoring required by this Monitoring and Reporting Program shall be maintained at the Facility.
  - d. **Temperature, pH, Hardness, and Dissolved Oxygen.** The receiving water samples for temperature, pH, hardness, and dissolved oxygen shall be taken approximately the same time and on the same date with the effluent samples for these parameters.
3. In conducting the receiving water sampling required by section VIII.A.1 above, a log shall be kept of the receiving water conditions throughout the reach bounded by Monitoring Locations RSW-001 and RSW-002. Attention shall be given to the presence or absence of:
  - a. Floating or suspended matter;
  - b. Discoloration;
  - c. Bottom deposits;
  - d. Aquatic life;
  - e. Visible films, sheens, or coatings;
  - f. Fungi, slimes, or objectionable growths; and
  - g. Potential nuisance conditions.

Notes on receiving water conditions shall be summarized in the monitoring report.

## IX. OTHER MONITORING REQUIREMENTS

### A. Biosolids – Not Applicable

## **B. Ponds**

### **1. Monitoring Location FEB-001**

- a. The Discharger shall keep a log regarding the use of the Flow Equalization Basin. In particular, the Discharger shall record the following when any type of wastewater is directed to the basin.
  - i. The date(s) when the wastewater is directed to the basin;
  - ii. The type(s) of wastewater (e.g., untreated due to plant upset, tertiary treated, etc.) directed to the basin;
  - iii. The total volume of wastewater directed to the basin (volume may be estimated), and;
  - iv. The daily freeboard in the basin.

## **C. Municipal Water Supply – Not Applicable**

## **D. Filtration System**

### **1. Monitoring Locations FIL-001, FIL-002, and FIL-003**

- a. The Discharger shall monitor the filtration system at Monitoring Locations FIL-001, FIL-002, and FIL-003 when discharging to Hangtown Creek as specified in Table D-5 and the testing requirements in section IX.D.1.b.

**Table D-5. Filtration System Monitoring Requirements**

<b>Parameter</b>	<b>Units</b>	<b>Sample Type</b>	<b>Sampling Frequency</b>
Turbidity	NTU	Meter	Continuous

- b. Table D-5 Testing Requirements. The Discharger shall comply with the following testing requirements when monitoring for the parameters described in Table D-5:
  - i. Pollutants shall be analyzed using the analytical methods described in 40 C.F.R. part 136 or by methods that have been approved by the Central Valley Water Board or the State Water Board.
  - ii. For continuous analyzers, the Discharger shall report documented routine meter maintenance activities including date, time of day, and duration, in which the analyzer(s) is not in operation. If analyzer(s) fail to provide continuous monitoring for more than two hours and influent and/or effluent from the disinfection process is not diverted for retreatment, the Discharger shall obtain and report hourly manual and/or grab sample results.
  - iii. Report daily average and maximum turbidity.

## **E. Ultraviolet Light (UV) Disinfection System**

### **1. Monitoring Locations UVS-001**

- a. The Discharger shall monitor the UV disinfection system at Monitoring Location UVS-001 when discharging to Hangtown Creek as specified in Table D-6 and the testing requirements in section IX.E.1.b.

**Table D-6. UV Disinfection System Monitoring Requirements**

Parameter	Units	Sample Type	Sampling Frequency	Monitoring Location
Flow	MGD	Meter	Continuous	UVS-001
Number of UV banks in operation	Number	Observation	Continuous	N/A
UV Transmittance	Percent (%)	Meter	Continuous	UVS-001
UV Dose	mJ/cm <sup>2</sup>	Calculated	Continuous	N/A

- b. Table D-6 Testing Requirements. The Discharger shall comply with the following testing requirements when monitoring for the parameters described in Table D-6:
- i. For continuous analyzers, the Discharger shall report documented routine meter maintenance activities including date, time of day, and duration, in which the analyzer(s) is not in operation. If analyzer(s) fail to provide continuous monitoring for more than two hours and influent and/or effluent from the disinfection process is not diverted for retreatment, the Discharger shall obtain and report hourly manual and/or grab sample results.
  - ii. The Discharger shall not decrease power settings or reduce the number of UV lamp banks in operation while the continuous analyzers are out of service and water is being disinfected.
  - iii. Report daily minimum number of UV banks in operation.
  - iv. Report daily minimum hourly average UV transmittance. The minimum hourly average transmittance shall consist of lowest average transmittance recorded over an hour of a day when flow is being discharged. If the system does not operate for an entire hour interval on a given day or if effluent flow is not discharged for an entire hour, the transmittance will be averaged based on the actual operation time when discharges are occurring.
  - v. Report daily minimum hourly average UV dose. The minimum hourly average dose shall consist of lowest hourly average dose provided in any channel that had at least one bank of lamps operating during the hour interval. For channels that did not operate for the entire hour interval or when effluent flow is not discharged for the entire hour, the dose will be averaged based on the actual operation time when discharges occurred.

**F. Pyrethroid Pesticides Monitoring – Not Applicable**

**G. Effluent Characterization and Receiving Water Characterization**

The Discharger shall monitor the effluent at Monitoring Locations EFF-001 and the receiving water at RSW-001, when discharging to the receiving water for the constituents listed in Table D-7, as described in this section.

**1. Monitoring Frequency**

- a. **Effluent Sampling.** Samples shall be collected from the effluent (Monitoring Location EFF-001) twice, once between **1 July 2026 and 30 September 2026** (dry season) and once between **1 January 2027 and 31 March 2027** (wet season).
- b. **Receiving Water Sampling.** Samples shall be collected from the upstream receiving water (Monitoring Location RSW-001) twice, once between **1 July 2026 and 30 September 2026** (dry season) and once between **1 January 2027 and 31 March 2027** (wet season).

All sampling shall be analyzed for the constituents listed in Table D-7, below. The results of such monitoring shall be submitted to the Central Valley Water Board with the quarterly SMRs. Each individual monitoring event shall provide representative sample results for the effluent.

2. **Sample Type.** Effluent samples shall be taken as described in Table D-7, below and the testing requirements in section IX.G.4.
3. **Analytical Methods Report Certification.** Prior to beginning the Effluent and Receiving Water Characterization monitoring, the Discharger shall provide a certification acknowledging the scheduled start date of the Effluent and Receiving Water Characterization monitoring and confirming that samples will be collected and analyzed as described in the previously submitted Analytical Methods Report. If there are changes to the previously submitted Analytical Methods Report, the Discharger shall outline those changes. A one-page certification form will be provided by the Central Valley Water Board staff that the Discharger can use to satisfy this requirement. The certification form shall be submitted electronically via CIWQS in accordance with the reporting requirements in Table D-9, Technical Reports.

**Table D-7. Effluent and Receiving Characterization Monitoring**  
**VOLATILE ORGANICS**

CTR Number	Volatile Organic Parameters	CAS Number	Units	Effluent Sample Type
25	2-Chloroethyl vinyl Ether	110-75-8	µg/L	Grab
17	Acrolein	107-02-8	µg/L	Grab
18	Acrylonitrile	107-13-1	µg/L	Grab
19	Benzene	71-43-2	µg/L	Grab
20	Bromoform	75-25-2	µg/L	Grab
21	Carbon Tetrachloride	56-23-5	µg/L	Grab
22	Chlorobenzene	108-90-7	µg/L	Grab
24	Chloroethane	75-00-3	µg/L	Grab
26	Chloroform	67-66-3	µg/L	Grab
35	Methyl Chloride	74-87-3	µg/L	Grab
23	Dibromochloromethane	124-48-1	µg/L	Grab
27	Dichlorobromomethane	75-27-4	µg/L	Grab
36	Methylene Chloride	75-09-2	µg/L	Grab
33	Ethylbenzene	100-41-4	µg/L	Grab

CTR Number	Volatile Organic Parameters	CAS Number	Units	Effluent Sample Type
89	Hexachlorobutadiene	87-68-3	µg/L	Grab
34	Methyl Bromide (Bromomethane)	74-83-9	µg/L	Grab
94	Naphthalene	91-20-3	µg/L	Grab
38	Tetrachloroethylene (PCE)	127-18-4	µg/L	Grab
39	Toluene	108-88-3	µg/L	Grab
40	trans-1,2-Dichloroethylene	156-60-5	µg/L	Grab
43	Trichloroethylene (TCE)	79-01-6	µg/L	Grab
44	Vinyl Chloride	75-01-4	µg/L	Grab
21	Methyl-tert-butyl ether (MTBE)	1634-04-4	µg/L	Grab
41	1,1,1-Trichloroethane	71-55-6	µg/L	Grab
42	1,1,2-Trichloroethane	79-00-5	µg/L	Grab
28	1,1-Dichloroethane	75-34-3	µg/L	Grab
30	1,1-Dichloroethylene (DCE)	75-35-4	µg/L	Grab
31	1,2-Dichloropropane	78-87-5	µg/L	Grab
32	1,3-Dichloropropylene	542-75-6	µg/L	Grab
37	1,1,2,2-Tetrachloroethane	79-34-5	µg/L	Grab
101	1,2,4-Trichlorobenzene	120-82-1	µg/L	Grab
29	1,2-Dichloroethane	107-06-2	µg/L	Grab
75	1,2-Dichlorobenzene	95-50-1	µg/L	Grab
76	1,3-Dichlorobenzene	541-73-1	µg/L	Grab
77	1,4-Dichlorobenzene	106-46-7	µg/L	Grab

#### SEMI-VOLATILE ORGANICS

CTR Number	Semi-Organic Volatile Parameters	CAS Number	Units	Effluent Sample Type
60	Benzo(a)Anthracene	56-55-3	µg/L	Grab
85	1,2-Diphenylhydrazine	122-66-7	µg/L	Grab
45	2-Chlorophenol	95-57-8	µg/L	Grab
46	2,4-Dichlorophenol	120-83-2	µg/L	Grab
47	2,4-Dimethylphenol	105-67-9	µg/L	Grab
49	2,4-Dinitrophenol	51-28-5	µg/L	Grab
82	2,4-Dinitrotoluene	121-14-2	µg/L	Grab
55	2,4,6-Trichlorophenol	88-06-2	µg/L	Grab
83	2,6-Dinitrotoluene	606-20-2	µg/L	Grab
50	2-Nitrophenol	88-75-5	µg/L	Grab
71	2-Chloronaphthalene	91-58-7	µg/L	Grab
78	3,3-Dichlorobenzidine	91-94-1	µg/L	Grab
62	Benzo(b)Fluoranthene	205-99-2	µg/L	Grab
52	4-Chloro-3-methylphenol	59-50-7	µg/L	Grab
48	2-Methyl-4,6-Dinitrophenol	534-52-1	µg/L	Grab
51	4-Nitrophenol	100-02-7	µg/L	Grab
69	4-Bromophenyl Phenyl Ether	101-55-3	µg/L	Grab

CTR Number	Semi-Organic Volatile Parameters	CAS Number	Units	Effluent Sample Type
72	4-Chlorophenyl Phenyl Ether	7005-72-3	µg/L	Grab
56	Acenaphthene	83-32-9	µg/L	Grab
57	Acenaphthylene	208-96-8	µg/L	Grab
58	Anthracene	120-12-7	µg/L	Grab
59	Benzidine	92-87-5	µg/L	Grab
61	Benzo(a)Pyrene	50-32-8	µg/L	Grab
63	Benzo(ghi)Perylene	191-24-2	µg/L	Grab
64	Benzo(k)Fluoranthene	207-08-9	µg/L	Grab
65	Bis (2-Chloroethoxy) Methane	111-91-1	µg/L	Grab
66	Bis (2-Chloroethyl) Ether	111-44-4	µg/L	Grab
67	Bis (2-Chloroisopropyl) Ether	108-60-1	µg/L	Grab
68	Bis(2-Ethylhexyl) Phthalate	117-81-7	µg/L	Grab
70	Butylbenzyl Phthalate	85-68-7	µg/L	Grab
73	Chrysene	218-01-9	µg/L	Grab
81	Di-n-butyl Phthalate	84-74-2	µg/L	Grab
84	Di-n-Octyl Phthalate	117-84-0	µg/L	Grab
74	Dibenzo(a,h)anthracene	53-70-3	µg/L	Grab
79	Diethyl Phthalate	84-66-2	µg/L	Grab
80	Dimethyl Phthalate	131-11-3	µg/L	Grab
86	Fluoranthene	206-44-0	µg/L	Grab
87	Fluorene	86-73-7	µg/L	Grab
88	Hexachlorobenzene	118-74-1	µg/L	Grab
90	Hexachlorocyclopentadiene	77-47-4	µg/L	Grab
91	Hexachloroethane	67-72-1	µg/L	Grab
92	Indeno(1,2,3-cd) Pyrene	193-39-5	µg/L	Grab
93	Isophorone	78-59-1	µg/L	Grab
98	N-Nitrosodiphenylamine	86-30-6	µg/L	Grab
96	N-Nitrosodimethylamine	62-75-9	µg/L	Grab
97	N-Nitrosodi-n-Propylamine	621-64-7	µg/L	Grab
95	Nitrobenzene	98-95-3	µg/L	Grab
53	Pentachlorophenol (PCP)	87-86-5	µg/L	Grab
99	Phenanthrene	85-01-8	µg/L	Grab
54	Phenol	108-95-2	µg/L	Grab
100	Pyrene	129-00-0	µg/L	Grab

#### INORGANICS

CTR Number	Inorganic Parameters	CAS Number	Units	Effluent Sample Type
NL	Aluminum	7429-90-5	µg/L	24-hour Composite
1	Antimony, Total	7440-36-0	µg/L	24-hour Composite
2	Arsenic, Total	7440-38-2	µg/L	24-hour Composite
15	Asbestos	1332-21-4	µg/L	24-hour Composite
3	Beryllium, Total	7440-41-7	µg/L	24-hour Composite
4	Cadmium, Total	7440-43-9	µg/L	24-hour Composite

CTR Number	Inorganic Parameters	CAS Number	Units	Effluent Sample Type
5a	Chromium, Total	7440-47-3	µg/L	24-hour Composite
6	Copper, Total	7440-50-8	µg/L	24-hour Composite
14	Iron, Total	7439-89-6	µg/L	24-hour Composite
7	Lead, Total	7439-92-1	µg/L	24-hour Composite
8	Mercury, Total	7439-97-6	µg/L	Grab
NL	Mercury, Methyl	22967-92-6	µg/L	Grab
NL	Manganese, Total	7439-96-5	µg/L	24-hour Composite
9	Nickel, Total	7440-02-0	µg/L	24-hour Composite
10	Selenium, Total	7782-49-2	µg/L	24-hour Composite
11	Silver, Total	7440-22-4	µg/L	24-hour Composite
12	Thallium, Total	7440-28-0	µg/L	24-hour Composite
13	Zinc, Total	7440-66-6	µg/L	24-hour Composite

#### NON-METALS/MINERALS

CTR Number	Non-Metal/Mineral Parameters	CAS Number	Units	Effluent Sample Type
NL	Boron	7440-42-8	µg/L	24-hour Composite
NL	Chloride	16887-00-6	mg/L	24-hour Composite
14	Cyanide, Total (as CN)	57-12-5	µg/L	Grab
NL	Sulfate	14808-79-8	mg/L	24-hour Composite
NL	Sulfide (as S)	5651-88-7	mg/L	24-hour Composite

#### PESTICIDES/PCBs/DIOXINS

CTR Number	Pesticide/PCB/Dioxin Parameters	CAS Number	Units	Effluent Sample Type
110	4,4-DDD	72-54-8	µg/L	24-hour Composite
109	4,4-DDE	72-55-9	µg/L	24-hour Composite
108	4,4-DDT	50-29-3	µg/L	24-hour Composite
112	alpha-Endosulfan	959-98-8	µg/L	24-hour Composite
103	alpha-BHC (Benzene hexachloride)	319-84-6	µg/L	24-hour Composite
102	Aldrin	309-00-2	µg/L	24-hour Composite
113	beta-Endosulfan	33213-65-9	µg/L	24-hour Composite
104	beta-BHC (Benzene hexachloride)	319-85-7	µg/L	24-hour Composite
107	Chlordane	57-74-9	µg/L	24-hour Composite



CTR Number	Pesticide/PCB/Dioxin Parameters	CAS Number	Units	Effluent Sample Type
106	delta-BHC (Benzene hexachloride)	319-86-8	µg/L	24-hour Composite
111	Dieldrin	60-57-1	µg/L	24-hour Composite
114	Endosulfan Sulfate	1031-07-8	µg/L	24-hour Composite
115	Endrin	72-20-8	µg/L	24-hour Composite
116	Endrin Aldehyde	7421-93-4	µg/L	24-hour Composite
117	Heptachlor	76-44-8	µg/L	24-hour Composite
118	Heptachlor Epoxide	1024-57-3	µg/L	24-hour Composite
105	gamma-BHC (Benzene hexachloride or Lindane)	58-89-9	µg/L	24-hour Composite
119	Polychlorinated Biphenyl (PCB) 1016	12674-11-2	µg/L	24-hour Composite
120	PCB 1221	11104-28-2	µg/L	24-hour Composite
121	PCB 1232	11141-16-5	µg/L	24-hour Composite
122	PCB 1242	53469-21-9	µg/L	24-hour Composite
123	PCB 1248	12672-29-6	µg/L	24-hour Composite
124	PCB 1254	11097-69-1	µg/L	24-hour Composite
125	PCB 1260	11096-82-5	µg/L	24-hour Composite
126	Toxaphene	8001-35-2	µg/L	24-hour Composite
16	2,3,7,8-TCDD (Dioxin)	1746-01-6	mg/L	24-hour Composite

#### CONVENTIONAL PARAMETERS

CTR Number	Conventional Parameters	CAS Number	Units	Effluent Sample Type
NL	pH	--	SU	Grab
NL	Temperature	--	°C	Grab

### NON-CONVENTIONAL PARAMETERS

CTR Number	Nonconventional Parameters	CAS Number	Units	Effluent Sample Type
NL	Foaming Agents (MBAS)	MBAS	mg/L	24-hour Composite
NL	Hardness (as CaCO <sub>3</sub> )	471-34-1	mg/L	Grab
NL	Specific Conductance (Electrical Conductivity or EC)	EC	µmhos /cm	24-hour Composite
NL	Total Dissolved Solids (TDS)	TDS	mg/L	24-hour Composite
NL	Dissolved Organic Carbon (DOC)	DOC	mg/L	24-hour Composite

### NUTRIENTS

CTR Number	Nutrient Parameters	CAS Number	Units	Effluent Sample Type
NL	Ammonia (as N)	7664-41-7	mg/L	24-hour Composite
NL	Nitrate (as N)	14797-55-8	mg/L	24-hour Composite
NL	Nitrite (as N)	14797-65-0	mg/L	24-hour Composite
NL	Phosphorus, Total (as P)	7723-14-0	mg/L	24-hour Composite

5. Table D-7 Testing Requirements. The Discharger shall comply with the following testing requirements when monitoring for the parameters described in Table D-7:
- Applicable to All Parameters.** Pollutants shall be analyzed using the analytical methods described in 40 C.F.R. Part 136 or by methods approved by the Central Valley Water Board or the State Water Board.
  - Grab Sample.** A grab sample is defined as an individual discrete sample collected over a period of time not exceeding 15 minutes. It can be taken manually, using a pump, scoop, vacuum, or other suitable device.
  - Composite Sample.** All composite samples shall be collected from a 24-hour flow proportional composite.
  - Redundant Sampling.** The Discharger is not required to conduct effluent monitoring for constituents that have already been sampled in a given month, as required in Table D-3, except for dissolved organic carbon, hardness, pH, and temperature, which shall be conducted concurrently with the characterization sampling.
  - Concurrent Sampling.** Effluent and receiving water sampling shall be conducted at approximately the same time, on the same date.
  - Sample Type.** All receiving water samples shall be taken as grab samples. Effluent samples shall be taken as described in Table D-7.
  - Bis (2-ethylhexyl) phthalate.** In order to verify if bis (2-ethylhexyl) phthalate is truly present in the effluent discharge, the Discharger shall take steps to assure that sample containers, sampling apparatus, and analytical equipment are not sources of the detected contaminant.

- h. **Total Mercury and methylmercury.** Samples for total mercury and methylmercury shall be taken using clean hands/dirty hands procedures, as described in U.S. EPA method 1669: Sampling Ambient Water for Trace Metals at EPA Water Quality Criteria Levels, for collection of equipment blanks (section 9.4.4.2), and shall be analyzed by U.S. EPA method 1630/1631 (Revision E) with a reporting limit of 0.05 ng/L for methylmercury and 0.5 nanograms per liter (ng/L) for total mercury.
- i. **Ammonia (as N).** Sampling is only required in the upstream receiving water.
- j. **Aluminum.** Aluminum can be tested by using either total or acid-soluble (inductively coupled plasma/atomic emission spectrometry or inductively coupled plasma/mass spectrometry) analysis methods, as supported by U.S. EPA's Ambient Water Quality Criteria for Aluminum document (EPA 440/5-86-008), or other methods that exclude aluminum silicate particles as approved by the Executive Officer for comparison with the 2018 U.S. EPA NAWQC for protection of freshwater aquatic life criterion aquatic life criteria. For comparison to the Secondary MCL, aluminum samples may be passed through a 1.5-micron filter.
- k. **Iron and Manganese.** Iron and manganese samples may be passed through a 1.5-micron filter for comparison with the Secondary MCL.

## **X. REPORTING REQUIREMENTS**

### **A. General Monitoring and Reporting Requirements**

- 1. The Discharger shall comply with all Standard Provisions (Attachment D of the Municipal General Order) related to monitoring, reporting, and recordkeeping.
- 2. Upon written request of the Central Valley Water Board, the Discharger shall submit a summary monitoring report. The report shall contain both tabular and graphical summaries of the monitoring data obtained during the previous year(s).
- 3. **Compliance Time Schedules - Not Applicable.**
- 4. The Discharger shall report to the Central Valley Water Board any toxic chemical release data it reports to the State Emergency Response Commission within 15 days of reporting the data to the Commission pursuant to section 313 of the "Emergency Planning and Community Right to Know Act" of 1986.
- 5. Monitoring frequencies may be adjusted by the Executive Officer to a less frequent basis if a Discharger makes a request and the request is backed by statistical trends of monitoring data submitted.

### **B. Self-Monitoring Reports**

- 1. The Discharger shall electronically submit SMRs using the State Water Board's California Integrated Water Quality System (CIWQS) [Program website](http://www.waterboards.ca.gov/ciwqs/index.html) ([www.waterboards.ca.gov/ciwqs/index.html](http://www.waterboards.ca.gov/ciwqs/index.html)). The CIWQS Web site

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 monthly SMRs including the results of all required monitoring using U.S. EPA-approved test methods or other test methods specified in this MRP. 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 MRP, 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 begin on 1 August 2025 and be completed according to the following:

**Table D-8. Monitoring Periods and Reporting Schedule**

<b>Sampling Frequency</b>	<b>Monitoring Period</b>	<b>SMR Due Date</b>
Continuous	All	Submit with monthly SMR
1/Day	(Midnight through 11:59 PM) or any 24-hour period that reasonably represents a calendar day for purposes of sampling.	Submit with monthly SMR
1/Week	Sunday through Saturday	Submit with monthly SMR
2/Week	Sunday through Saturday	Submit with monthly SMR
5/Week	Sunday through Saturday	Submit with monthly SMR
1/Month	1st day of calendar month through last day of calendar month	First day of second calendar month following month of sampling
1/Quarter	1 January through 31 March; 1 April through 30 June; 1 July through 30 September; 1 October through 31 December	1 May; 1 August; 1 November; 1 February of following year (respectively)
1/Year	1 January through 31 December	1 February of following year

4. **Reporting Protocols.** The Discharger shall report with each sample result the applicable RL and the current laboratory's MDL, as determined by the procedure in 40 C.F.R. 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 "Detected, but Not Quantified," or 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 "Not Detected," or 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. **Multiple Sample Data.** When determining compliance with an AMEL, 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 "Detected, but Not Quantified" (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.
6. 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 are 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. The cover letter must be uploaded directly into CIWQS and violations must be entered into CIWQS under the Violations tab for the reporting period in which the violation occurred in addition to them being identified in the cover letter.
  - c. The Discharger shall attach final laboratory reports for all contracted, commercial laboratories, including quality assurance/quality control information, with all its SMRs for which sample analyses were performed. Bench sheets are not required but should be available upon request by Regional Board staff.
7. The Discharger shall submit in the SMRs calculations and reports in accordance with the following requirements.
- a. **Calendar Annual Average Limitations – Not Applicable.**
  - b. **Mass Loading Limitations – Not Applicable.**
  - c. **Removal Efficiency (BOD<sub>5</sub> and TSS).** The Discharger shall calculate and report the percent removal of BOD<sub>5</sub> and TSS in the SMRs. The percent removal shall be calculated as specified in section VIII.A of the Limitations and Discharge Requirements in the Municipal General Order.
  - d. **Total Coliform Organisms Effluent Limitations.** The Discharger shall calculate and report the 7-day median of total coliform organisms for the effluent. The 7-day median of total coliform organisms shall be calculated as specified in section VIII.E of the Limitations and Discharge Requirements in the Municipal General Order.
  - e. **Dissolved Oxygen Receiving Water Limitations.** The Discharger shall report monthly in the SMR the dissolved oxygen concentrations in the receiving water (Monitoring Locations RSW-001 and RSW 002).
  - f. **Turbidity Receiving Water Limitations.** The Discharger shall calculate and report the turbidity increase in the receiving water applicable to the natural turbidity condition specified in section VI.A.18.a, of the Limitations and Discharge Requirements in the Municipal General Order.
  - g. **Temperature Effluent Limitation – Not Applicable.**
  - h. **Temperature Receiving Water Limitations.** The Discharger shall calculate and report the annual average ambient temperature increase in the receiving water based on the difference in temperature at Monitoring Locations RSW-001 and RSW-002 as well as report the instantaneous maximum and weekly average temperature at RSW-002 as specified in

section VI.A.16.f, of the Limitations and Discharge Requirements in the Municipal General Order.

- i. **Chlorpyrifos and Diazinon Effluent Limitations – Not Applicable.**
- j. **Total Calendar Annual Mass Loading Mercury Effluent Limitations – Not Applicable.**

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

1. The Discharger shall electronically submit DMRs together with SMRs using Electronic Self-Monitoring Reports module eSMR 2.5 or any upgraded version. Electronic submittal of DMRs will be in addition to electronic submittal of SMRs. Information about electronic submittal of DMRs is provided by the [Discharge Monitoring Report website](http://www.waterboards.ca.gov/water_issues/programs/discharge_monitoring/):  
([www.waterboards.ca.gov/water\\_issues/programs/discharge\\_monitoring/](http://www.waterboards.ca.gov/water_issues/programs/discharge_monitoring/)).

### **D. Other Reports**

1. **Special Study Reports – Not Applicable.**
2. **Analytical Methods Report.** The Discharger shall complete and submit an Analytical Methods Report, electronically via CIWQS submittal, by the due date specified in Table D-9 below. The Analytical Methods Report shall include the following for each constituent listed in tables D-2, D-3, D-4 and D-7 of this NOA, R5-2023-0025-011: 1) applicable water quality objective, 2) reporting level (RL), 3) method detection limit (MDL), and 4) analytical method. The analytical methods shall be sufficiently sensitive with RLs consistent with the SSM Rule (see also General Monitoring Provision F in the Municipal General Order), and with the Minimum Levels (MLs) in the SIP, Appendix 4. The “Reporting Level or RL” is synonymous with the “Method Minimum Level” described in the SSM Rule. If an RL is greater than the applicable water quality objective for a constituent, the Discharger shall explain how the proposed analytical method complies with the SSM Rule. Central Valley Water Board staff will provide a tool to assist the Discharger in completing this requirement. The tool will include the constituents and associated applicable water quality objectives to be included in the Analytical Methods Report.
3. **Annual Operations Report.** The Discharger shall submit in accordance with the reporting requirements in Table D-9, Technical Reports, a written report containing the following:
  - a. The names, certificate grades, and general responsibilities of all persons employed at the Facility.
  - b. The names and telephone numbers of persons to contact regarding the plant for emergency and routine situations.
  - c. A statement certifying when the flow meter(s) and other monitoring instruments and devices were last calibrated, including identification of who performed the calibration.
  - d. A statement certifying whether the current operation and maintenance manual, and contingency plan, reflect the wastewater treatment plant as

currently constructed and operated, and the dates when these documents were last revised and last reviewed for adequacy.

- e. The Discharger may also be requested to submit an annual report to the Central Valley Water Board with both tabular and graphical summaries of the monitoring data obtained during the previous year. Any such request shall be made in writing. The report shall discuss the compliance record. If violations have occurred, the report shall also discuss the corrective actions taken and planned to bring the discharge into full compliance with the waste discharge requirements.

**4. Annual Pretreatment Reporting Requirements – Not Applicable.**

- 5. Recycled Water Policy Annual Reports.** In accordance with Section 3 of the Water Quality Control Policy for Recycled Water (Recycled Water Policy) and as specified in this NOA, R5-2023-0025-011, the Discharger shall electronically submit an annual report of monthly data to the State Water Board by 30 April annually covering the previous calendar year using the State Water Board's [GeoTracker website](https://geotracker.waterboards.ca.gov/) (<https://geotracker.waterboards.ca.gov/>). Information for setting up and using the GeoTracker system can be found in the ESI Guide for Responsible Parties document on the State Water Board's website for [Electronic Submittal of Information](https://www.waterboards.ca.gov/ust/electronic_submittal/index.html) ([https://www.waterboards.ca.gov/ust/electronic\\_submittal/index.html](https://www.waterboards.ca.gov/ust/electronic_submittal/index.html)).

The annual report to GeoTracker must include volumetric reporting of the items listed in Section 3.2 of the [Recycled Water Policy](https://www.waterboards.ca.gov/board_decisions/adopted_orders/resolutions/2018/121118_7_final_amendment_oal.pdf) ([https://www.waterboards.ca.gov/board\\_decisions/adopted\\_orders/resolutions/2018/121118\\_7\\_final\\_amendment\\_oal.pdf](https://www.waterboards.ca.gov/board_decisions/adopted_orders/resolutions/2018/121118_7_final_amendment_oal.pdf)). A PDF of the upload confirmation from GeoTracker for the Recycled Water Policy Annual Report shall be uploaded into CIWQS to demonstrate compliance with this reporting requirement.

- 6. Technical Report Submittals.** The Municipal General Order, as specified in this NOA, R5-2023-0025-011, includes requirements to submit various reports and documents that may include, a Notice of Intent, special study technical reports, progress reports, and other reports identified in the MRP (hereafter referred to collectively as "technical reports"). The Technical Reports Table D-9 below summarizes the technical reports that are applicable to this discharge and required by this NOA, and the due dates for each submittal. All technical reports shall be submitted electronically via CIWQS submittal. Technical reports should be uploaded as a PDF, Microsoft Word, or Microsoft Excel file attachment.

**Table D-9. Technical Reports**

Report #	Technical Report	Due Date	CIWQS Report Name
1	Notice of Intent	31 July 2029	NOI
2	TRE Work Plan	1 October 2025	MRP V.G.2



<b>Report #</b>	<b>Technical Report</b>	<b>Due Date</b>	<b>CIWQS Report Name</b>
3	Analytical Methods Report	1 October 2025	MRP X.D.2
4	Analytical Methods Report Certification	1 April 2026	MRP IX.G.3
5	Annual Operations Report #1	1 February 2026	MRP X.D.3
6	Annual Operations Report #2	1 February 2027	MRP X.D.3
7	Annual Operations Report #3	1 February 2028	MRP X.D.3
8	Annual Operations Report #4	1 February 2029	MRP X.D.3
9	Annual Operations Report #5	1 February 2030	MRP X.D.3
10	Recycled Water Policy Annual Report Submittal Confirmation #1	30 April 2026	MRP X.D.5
11	Recycled Water Policy Annual Report Submittal Confirmation #2	30 April 2027	MRP X.D.5
12	Recycled Water Policy Annual Report Submittal Confirmation #3	30 April 2028	MRP X.D.5
13	Recycled Water Policy Annual Report Submittal Confirmation #4	30 April 2029	MRP X.D.5
14	Recycled Water Policy Annual Report Submittal Confirmation #5	30 April 2030	MRP X.D.5

## APPENDIX E – DETERMINATION OF WATER QUALITY-BASED EFFLUENT LIMITATIONS (WQBELS)

The Central Valley Water Board determined water quality-based effluent limitations (WQBELS) as described in the Municipal General Order, section V.C.4 of the Fact Sheet (Attachment F), using the effluent limits tables included in the Municipal General Order, section V.A.1 of the Limitations and Discharge Requirements. For parameters with both human health and aquatic life objectives/criteria, the final effluent limitations in this NOA are based on the lower of the effluent limitations based on the aquatic life objectives/criteria and human health objectives/criteria.

### Abbreviations and Notes:

1. CV = Coefficient of Variation (established in accordance with section 1.4 of the SIP)
2. MDEL = Maximum Daily Effluent Limitation
3. AMEL = Average Monthly Effluent Limitation
4. MDEL = Maximum Daily Effluent Limitation
5. AWEL = Average Weekly Effluent Limitation
6. CMC = Criterion Maximum Concentration
7. CCC = Criterion Continuous Concentration
8. Coefficient of Variation (CV) calculated using effluent sample data for the parameter listed.
9. Effluent Limit Table as indicated and contained in section V, Effluent Limitations and Discharge Specifications, of the Municipal General Order. Specific table listed is used to determine the appropriate AMEL, AWEL, or MDEL.

**Table E-1. Human Health WQBELS Calculations**

Parameter	Units	Criteria	CV	Effluent Limit Table in Municipal General Order	AMEL	AWEL
Nitrate Plus Nitrite (as N)	mg/L	10	0.2	Table 20B	10	13

**Table E-2. Aquatic Life WQBELS Calculations**

Parameter	Units	CMC	CCC	CV	Effluent Limit Table in Municipal General Order	AMEL	AWEL
Ammonia, Total (as N)	mg/L	5.62	1.23	1.3	Table 19B	2.2	4.6