



Central Valley Regional Water Quality Control Board

11 December 2014

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NOTICE OF APPLICABILITY (NOA); LOW THREAT GENERAL WASTE DISCHARGE REQUIREMENTS ORDER R5-2013-0074; LOWER CHERRY AQUEDUCT MOBILE PLANT PROJECT; TUOLUMNE COUNTY

Our office received a Notice of Intent (NOI) on 3 October 2014 from the San Francisco Public Utilities Commission, on behalf of the City and County of San Francisco (Discharger) for its Lower Cherry Aqueduct Mobile Plant Project (Project). Based on the information in the NOI, Central Valley Regional Water Quality Control Board (Central Valley Water Board) staff has determined that the project meets the required conditions for approval under the General Order for *Dewatering and Other Low Threat Discharges to Surface Waters* (Low Threat General Order). This project is hereby assigned Low Threat General Order R5-2013-0074-146 and National Pollutant Discharge Elimination System (NPDES) Permit No. CAG995001. Please reference unique Order R5-2013-0074-146 in all future correspondence and documents.

The Low Threat General Order (enclosed) may be viewed at the following web address: http://www.waterboards.ca.gov/centralvalley/board_decisions/adopted_orders/general_orders/r5-2013-0074.pdf. You are urged to familiarize yourself with the contents of the entire document. The Low Threat General Order prescribes mandatory discharge monitoring requirements. The project activities shall be operated in accordance with the requirements contained in this NOA, the Low Threat General Order, and with the information submitted by the Dischargers.

CALIFORNIA TOXICS RULE / STATE IMPLEMENTATION POLICY MONITORING

The Low Threat General Order incorporates the requirements of the California Toxics Rule (CTR) and the State Water Resources Control Board's (State Water Board), *Policy for Implementation of Toxics Standards for Inland Surface Waters, Enclosed Bays, and Estuaries of California, 2005*, also known as the State Implementation Policy (SIP).

Section 5.3 of the SIP allows exceptions from meeting the Priority Pollutant criteria/objectives in order to implement control measures conducted to fulfill statutory requirements under the federal Safe Drinking Water Act or the California Health and Safety Code. The discharges authorized by this NOA are from activities to comply with Sections 116350-116405 of the California Health and Safety Code, which require water utilities to perform various duties in

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Hetch Hetchy Water and Power Mobile Pilot Plant

order to protect the integrity of the water system and public health. Therefore, the Discharger qualifies for the exception in Section 5.3 of the SIP and is not required to conduct Priority Pollutant (CTR constituent) sampling or comply with the Priority Pollutant criteria/objectives. When an exception has been granted, upon completion of the project the SIP requires certification by a qualified biologist that the receiving water beneficial uses have been restored.

As discussed in the following section, the Lower Cherry Aqueduct Mobile Plant Project will collect water from the receiving water, treat the water to ensure drinking water protection, and discharge the treated water back to the same receiving water. Thus, the project will improve water quality and not cause adverse impacts to the receiving water or impact beneficial uses. Since beneficial uses will not be impacted, certification by a qualified biologist of restored beneficial uses is unnecessary, and therefore not required by this NOA.

PROJECT DESCRIPTION

The Discharger is conducting a treatment study on Cherry Creek and the Tuolumne River as a part of the overall drought response. The Discharger is planning to deploy a Mobile Pilot Plant (MPP) at Holm Powerhouse (one of three powerhouses in the Hetch Hetchy Power system) on Cherry Creek between 10 December 2014 and 31 May 2015. The MPP will then be operated at the Early Intake Dam on the Tuolumne River between 1 April 2015 and 1 July 2015. The MPP is a mobile drinking water treatment plant that is being employed to conduct a small scale treatment study intended to ensure that the treatment of water from the Lower Cherry Aqueduct through the Sunol Valley Water Treatment Plant will meet the State and Federal Drinking Water Standards, should the Lower Cherry Aqueduct be used as a backup drinking water source.

Treatment of water by the MPP consists of two treatment trains. The water supply is initially dosed with sodium hypochlorite for disinfection, aluminum hydroxide for coagulation, and cationic polymer for coagulation. The second train is dosed with carbon dioxide to target a coagulation pH of about 6.5. Each train then includes a flocculation step employing mechanical mixers, followed by sedimentation in basins. The water is then filtered through dual media filters consisting of 48 inches of anthracite on top of 12 inches of sand. A nonionic polymer is added prior to filtration to aid the process. The filtered water turbidity is typically less than 0.1 NTU, and the typical flow rates for the MPP will be in the range of 3 gpm to 7 gpm. The MPP will intake source water upstream of Holm Powerhouse and the Early Intake Dam and treated effluent will be discharged to the receiving water at the normal return points for these facilities.

MONITORING AND REPORTING

The Discharger must notify Central Valley Water Board staff 24 hours 1) before the start of each new discharge, 2) as soon as noncompliance is anticipated, and 3) when the discharge ceases.

The Discharger must submit quarterly reports, as described in Attachment E, Section X of the Low Threat General Order, even if there is no discharge or receiving water flow during the reporting quarter, until the Discharger formally requests that coverage under the Order be

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terminated. The first quarterly monitoring report required under this Order is for the Fourth Quarter 2014 and is due by 1 February 2015. Please use the enclosed Monitoring Report Transmittal Form when submitting monitoring reports

Monitoring Locations – The Discharger shall monitor the effluent and receiving water at the specified locations as follows:

Table E-1. Monitoring Station Locations

Discharge Point Name	Monitoring Location Name	Monitoring Location Description		
001	EFF-001	A location where a representative sample of the effluent can be collected prior to discharging to surface water.		
	RSW-001	The receiving water, approximately 50 feet upstream from the point of discharge.		
	RSW-002	The receiving water, approximately 50 feet downstream from the point of discharge.		

Effluent Monitoring – The Discharger shall monitor the effluent at EFF-001 as follows:

Table E-3. Effluent Monitoring – Discharges Less than 4 Months in Duration

Parameter	Units	Sample Type	Minimum Sampling Frequency ^{1,2}	Required Analytical Test Method
Biochemical Oxygen Demand (5-Day @ 20 °C)	mg/L	Grab	2/Month	3
Chlorine, Total Residual	mg/L	Grab	1/Discharge Event	3,4,5
Electrical Conductivity @ 25 °C	µmhos/cm	Grab	2/Month	3
рН	standard units	Grab	2/Month	3
Settleable Solids	mL/L	Grab	2/Month	3
Total Suspended Solids	mg/L	Grab	2/Month	3

If the discharge is intermittent rather than continuous, then on the first day of each such intermittent discharge, the Discharger shall monitor and record data for all of the constituents listed above, after which the frequencies of analysis given in the schedule shall apply for the duration of each such intermittent discharge. In no event shall the Discharger be required to monitor and record data more often than twice the frequencies listed in the table.

The first sample shall be collected at the start of discharge.

Pollutants shall be analyzed using the analytical methods described in 40 CFR Part 136.

⁴ A handheld field meter may be used, provided the meter utilizes a USEPA-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.

Total chlorine residual must be monitored with a method sensitive to and accurate at a reporting level of 0.08 mg/L, or any more stringent reporting level included in a final statewide policy or standard for total residual chlorine.

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Hetch Hetchy Water and Power Mobile Pilot Plant

Receiving Water Monitoring – The Discharger shall monitor the receiving water at RSW-001 and RSW-002 as follows:

Table E-5. Receiving Water Monitoring – Discharge Less than 4 Months in Duration

Parameter	Units	Sample Type	Monitoring Frequency	Required Analytical Test Method
Dissolved Oxygen	mg/L	Grab	2/Week	1
Electrical Conductivity @ 25 °C	μmhos/cm	Grab	2/Week	1
рН	standard units	Grab	2/Week	1
Temperature	°F	Grab	2/Week	1
Turbidity	NTU	Grab	2/Week	1

Pollutants shall be analyzed using the analytical methods described in 40 CFR Part 136.

In conducting the receiving water sampling, a log shall be kept of the receiving water conditions throughout the reach bounded by 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
- q. Potential nuisance conditions

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

GENERAL INFORMATION AND REQUIREMENTS

The required annual fee (as specified in the annual billing you will receive from the State Water Resources Control Board) shall be submitted until the discharge is terminated. To terminate coverage under the Low Threat General Order, the Discharger <u>must</u> submit written notification to the Central Valley Water Board that the discharge regulated by this Low Threat General Order has ceased and is no longer necessary. If a timely written request is not received, then the Discharger will be required to pay additional annual fees as determined by the State Water Resources Control Board.

ENFORCEMENT

Failure to comply with the Low Threat General Order may result in enforcement actions, which could include civil liability. Effluent limitation violations are subject to a Mandatory Minimum Penalty (MMP) of \$3,000 per violation. Late reports may be subject to an MMP of \$3,000 for each period of 30 days late. When discharges do not occur during a quarterly monitoring period, the Discharger must still submit a quarterly report indicating that no discharge occurred to avoid being subject to enforcement actions.

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COMMUNICATION

All monitoring report submittals, notification of the beginning and end of discharge, and questions regarding compliance and enforcement shall be directed to Mohammad Farhad of the Central Valley Water Board's NPDES Compliance and Enforcement Unit. Mr. Farhad can be reached at (916) 464-1181 or Mohammad.Farhad@waterboards.ca.gov.

All documents, including monitoring reports, response to inspections, written notifications and documents submitted to comply with this NOA and the Low Threat General Order, should be submitted to the NPDES Compliance Unit. We are transitioning to a paperless office, therefore, please convert all documents to a searchable Portable Document Format (pdf) and email them to centralvalleysacramento@waterboards.ca.gov. Please also include the Discharger name, facility name, county, and CIWQS Place ID # 811132 in the body of the email. Documents that are 50 MB or larger should be transferred to a CD, DVD, or flash drive and mailed to our office, attention "ECM Mailroom-NPDES". Please include the enclosed Monitoring Report Transmittal Form as the first page of each monitoring report.

Questions regarding the permitting aspects of this Low Threat General Order, and written notification for termination of coverage under the Low Threat General Order, shall be directed to Jim Marshall of the Central Valley Water Board's NPDES Permitting Unit. Mr. Marshall can be reached at (916) 464-4772 or James.Marshall@waterboards.ca.gov.

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 of this NOA, except that if the thirtieth day following the date of this Order 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. Copies of the law and regulations applicable to filing petitions may be found on the internet at: http://www.waterboards.ca.gov/public_notices/petitions/water_quality or will be provided upon request.

Original Signed by Adam Laputz for

Pamela C. Creedon Executive Officer

Enclosure: General Order R5-2013-0074 (Discharger only)

Monitoring Report Transmittal Form (Discharger only)

cc: Dave Smith, U.S. Environmental Protection Agency, Region IX, San Francisco (via email) Phil Isorena, Division of Water Quality, State Water Board, Sacramento (via email)