

INFORMATION SHEET

ORDER R5-2018-XXXX
SIERRA PACIFIC INDUSTRIES
OROVILLE CEDAR MILL
BUTTE COUNTY

Background

Sierra Pacific Industries (hereafter “Discharger”) owns and operates a facility that generates wastewater, that has a land discharge to an onsite unlined recycle/disposal pond (Pond) and that requires Waste Discharge Requirements (WDRs). The facility is located at 3025 South 5th Avenue, in Oroville, CA, Section 19, T19N, R4E, MDB&M. The facility occupies Assessor’s Parcel Numbers (APN) 035-440-020, as shown on Attachment A, which is attached hereto and made part of this Order by reference.

WDRs Order 5-00-207, adopted by the Central Valley Water Board on 15 September 2000, prescribes requirements for the discharge. Order 5-00-207 did not specify a flow of wastewater for the Facility. The WDR for the Facility is considered backlogged as the permit was due for renewal in 2015. Therefore, Order 5-00-207 will be rescinded and replaced with this Order.

EXISTING FACILITY

The Facility lies in the northeast portion of the Sacramento Valley near the western Sierra Nevada foothills at an elevation of approximately 160 feet above mean sea level. The nearest surface water is the Feather River, located approximately 1 mile west of the Facility. Topographic relief of the area is relatively flat to gently southwest sloping.

Facility receives raw cedar logs that are stored on its 21 acre paved log deck prior to processing. While stored on the log deck approximately 865,000 gallons/day (gpd) of onsite well water are sprinkled over the logs. This flow volume either absorbs into the logs, evaporates, or runs off the log deck to the Pond. With two feet of freeboard the pond has approximately 14 acre feet of storage capacity. The logs are removed from the log deck as needed for processing in the saw mill.

The processing operation consists of de-barking and dimension milling of primarily fencing products. Milled cedar lumber is treated indoors, in a closed process, with Kop-Coat NP-1©, anti-sap stain and wood preservative that contains didecyl dimethyl ammonium chloride (a disinfectant) and 3-iodo-2-propynyl butyl carbamate (a preservative). Lumber is submerged in this product for approximately 2 minutes, raised and allowed to drip over the drip tank and drip pans. Residual product that collects in the drip pan is returned to the dip tank by means of a sump pump. No supply water is used in the treatment operations and all chemicals used in the treatment process are recycled in the closed system. Treated and dried lumber is then wrapped and stacked outdoors on an asphalt paved area prior to shipping. Approximately 83 million board feet of lumber are produced at the facility each year.

FACILITY DISCHARGE

The discharge/recycle system consists of a bark and debris concrete capture basin and one unlined pond. The log deck is sprinkled continuously from an onsite well. The sprinkler system pumps fresh groundwater and/or water from the Pond over the unprocessed logs. Less than <2 of this water drains to the paved log deck where it then gravity flows into a concrete capture basin before entering the Pond. After entering the Pond the water mixes with stormwater (seasonally) in the Pond and either evaporates, percolates or is pumped back via the sprinkling system atop the log deck. All other wastewater (sinks, toilets, drinking fountains, and truck wash clarifer) is captured and sent via municipal sewer line to the WWTP facility in Oroville for treatment.

The facility has added a bark processing plant. The plant will not utilize any supply water or discharge any process wastewater as a function of its operations. In a letter dated July 7, 2017 the City of Oroville determined that the addition of the bark plant was categorically exempt from CEQA under Section 21080 of the Public Resources Code. The bark plant, which was not covered in the previous permit, will not generate a process wastewater discharge from its operations. However, some additional stormwater will be generated from the proposed 10 acre bark processing plant and that water will be routed to the existing log deck Pond for reuse.

Constituents of concern that have the potential to degrade groundwater include salts (primarily TDS, sodium, and chloride), and nutrients as summarized below:

Constituent	Average Concentrations (mg/L)			
	Effluent ¹	Background Groundwater ²	Downgradient Groundwater ³	Potential Water Quality Objective
TDS	--	230	224	450 ⁴ to 1,500 ⁸
Specific Conductance	--	312	289	700 ⁵ to 900 ⁸
pH	--	6.7	7.2	6.5 to 8.5 ⁸
Turbidity	--	9.2	351	1 to 5 ⁸
Oil & Grease	--	<1.4	1.6	--
COD	--	<3	47	0.010 ⁶
Tannins & Lignins		<0.10	3.78	--

¹ No Pond data was required in the original permit.

² Compiled from NW-1, data collected 2010-2017.

³ Compiled from MW-2 & MW-3, data collected from 2010-2017.

⁴ Lowest agricultural water quality goal.

⁶ Primary Maximum Contaminant Level.

⁷ Secondary Maximum Contaminant Level.

⁸ Secondary Maximum Contaminant Level range.

GROUNDWATER CONDITIONS

The average depth to the shallow groundwater, based on the last 3 years of sampling data from onsite monitoring wells, is 17 feet in monitoring well MW-1, 10 feet in monitoring well MW-2 and

7 feet in monitoring well MW-3. The groundwater flow direction is generally northeast under hydraulic gradients generally ranging from 0.006 feet per foot (ft/ft) to 0.02 ft/ft. Based on historical groundwater surface elevation measurements, the groundwater appears to be mounded in the immediate vicinity of the pond, which may be inducing a limited localized gradient and flow direction. Regional flow is generally to the west/southwest towards the Feather River.

The United States Geological Survey (USGS) National Water Information System Web Interface identified two wells in the vicinity of the facility. One well was approximately 1-mile northeast of the facility and reported to be 335 feet deep with samples collected between 1957 and 2006. In general, total dissolved solids (TDS) concentrations range from 240 to 270 milligrams per liter (mg/l) and specific conductance ranges from 380 to 400 micro Siemens per centimeter (uS/cm).

The second well was approximately 500 feet northeast of the facility and reported to be 152 feet deep with samples collected between 1958 and 1987. In general, TDS concentrations range from 260 to 300 mg/l, specific conductance ranges from 380 to 430 uS/cm.

Based on the depth of the wells, they are assumed to be perforated or screened in the Laguna Formation, which occurs beneath the alluvium in the vicinity of the Feather River (DWR, 2014).

BASIN PLAN, BENEFICIAL USES, AND REGULATORY CONSIDERATIONS

The Water Quality Control Plan for the Sacramento River and San Joaquin River Basins, Fourth Edition, revised July 2016 (hereafter Basin Plan) designates beneficial uses, establishes water quality objectives, contains implementation plans and policies for protecting waters of the basin, and incorporates by reference plans and policies adopted by the State Water Board. The beneficial uses of underlying groundwater as set forth in the Basin Plan are Industrial Process Municipal and Domestic Supply (MUN), Agricultural Supply (AGR), Industrial Service Supply (IND), Industrial Process Supply (PRO).

ANTIDEGRADATION

Three groundwater monitoring wells were installed at the facility in 2001. Based on the data available, it is not possible to determine pre-1968 groundwater quality. Therefore, determination of compliance with Resolution 68-16 for this Facility must be based on existing background groundwater quality.

The discharge and the potential for groundwater degradation allowed in this Order is consistent with the Antidegradation Policy since; (a) the limited degradation allowed by this Order will not result in water quality less than the water quality objectives, or unreasonably affect present and anticipated beneficial uses, (b) the Discharger has implemented BMPs to minimize degradation, and (c) the limited degradation is of the maximum benefit to the people of the State.

CEQA

The adoption of this Order for a wastewater recycle/disposal system is categorically exempt from the provisions of CEQA in accordance with California Code of Regulations, title 14, section 15301, which exempts the “operation, repair, maintenance, [and] permitting ... of existing public or private structures, facilities, mechanical equipment, or topographical features” from environmental review.

TITLE 27

Title 27 of the California Code of Regulations (hereafter Title 27) contains regulatory requirements for the treatment, storage, processing, and disposal of solid waste. However, Title 27 exempts certain activities from its provisions. Discharges regulated by this Order are exempt from Title 27 pursuant to provisions that exempt domestic sewage, wastewater, and reuse. Title 27, section 20090 states in part:

- a. Wastewater - Discharges of wastewater to land, including but not limited to evaporation ponds, percolation ponds, or subsurface leach fields if the following conditions are met:
 - 1) The applicable RWQCB has issued WDRs, reclamation requirements, or waived such issuance;
 - 2) The discharge is in compliance with the applicable water quality control plan; and
 - 3) The wastewater does not need to be managed according to Chapter 11, Division 4.5, Title 22 of this code as a hazardous waste . . .
- b. Reuse - Recycling or other use of materials salvaged from waste, or produced by waste treatment, such as scrap metal, compost, and recycled chemicals, provided that discharges of residual wastes from recycling or treatment operations to land shall be according to applicable provisions of this division.

Proposed Order Terms and Conditions

DISCHARGE PROHIBITIONS, SPECIFICATIONS AND PROVISIONS

1. Discharge of wastes to surface waters or surface water drainage courses is prohibited.
2. Discharge of waste classified as ‘hazardous’, as defined in the California Code of Regulations, title 22, section 66261.1 et seq., is prohibited.
3. Discharge of waste classified as ‘designated’, as defined in CWC Section 13173, in a manner that causes violation of groundwater limitations, is prohibited.
4. Bypass around, or overflow from, the settling/recycling pond(s) or designated overflow pond(s) is prohibited.
5. Discharge of waste at a location or in a manner different from that described in the Findings is prohibited.

6. The discharge of toxic substances into the wastewater ponds such that biological treatment mechanisms are disrupted is prohibited. Discharge of solid or liquid waste or pollutants, including solvents, oil, grease, or other petroleum products, to surface water, or surface water drainage courses is prohibited.

MONITORING REQUIREMENTS

Section 13267 of the California Water Code authorizes the Central Valley Water Board to require the Discharger to submit monitoring and technical reports as necessary to investigate the impact of a waste discharge on waters of the State.

The proposed Order includes Influent, Pond, groundwater, and solids monitoring. This monitoring is necessary to monitor the discharge, evaluate compliance with limitations prescribed by this Order.

REOPENER

The conditions of discharge in the proposed Order were developed based on currently available technical information and applicable water quality laws, regulations, policies, and plans, and are intended to assure conformance with them. The proposed Order would set limitations based on the information provided thus far. If applicable laws and regulations change, or once new information is obtained that will change the overall discharge and its potential to impact groundwater, it may be appropriate to reopen the order.

LEGAL EFFECT OF RESCISSION OF PRIOR WDRS OR ORDERS ON EXISTING VIOLATIONS

The Board's rescission of prior waste discharge requirements and/or monitoring and reporting orders does not extinguish any violations that may have occurred during the time those waste discharge requirements or orders were in effect. The Central Valley Water Board reserves the right to take enforcement actions to address violations of prior prohibitions, limitations, specifications, requirements, or provisions of rescinded waste discharge requirements or orders as allowed by law.