

INFORMATION SHEET

ORDER R5-2014-XXXX
EQUINOX RESOURCES (CALIFORNIA), INC. AND UNITED STATES
DEPARTMENT OF THE INTERIOR, BUREAU OF LAND MANAGEMENT
ZENDA MINE
KERN COUNTY

Equinox Resources (California) Inc. and the United States Department of the Interior, Bureau of Land Management (hereinafter jointly referred to as Discharger) each own a portion of the property on which the Zenda Mine is located. The mine is about two miles southwest of the town of Loraine and 12 miles north of the City of Tehachapi. The mining facility is currently regulated by Order No. 97-168, adopted by the Central Valley Water Board on 8 August 1997. Order No. 97-168 no longer reflects the plans and policies of the Central Valley Water Board.

The Discharger proposes to mine and process low-grade gold and silver ore on the mining facility property located in the southern Sierra Nevada. Approximately 800,000 tons of ore and 1,000,000 tons of overburden and waste rock would be removed by open pit mining. The ore would be processed using a cyanide heap-leaching method. The facility will consist of an open-pit mine, a heap-leach unit (WMU No. 1), a surface impoundment known as a "pregnant pond" (WMU No. 2), an ore stockpile, a crushing plant, and a recovery plant. The concentrations of cyanide used in the heap leach process or discharged to the pregnant pond will not exceed hazardous concentrations. The project is anticipated to last from three to five years. The mine has not yet operated and the ore-processing facilities have not been constructed. Mining will start when the Discharger determines that it is economically feasible to do so.

Title 27, section 22480 classifies mining wastes in three Groups; A, B, and C as follows:

"Group A wastes must be managed as hazardous waste pursuant to Chapter 11 of Division 4.5, of Title 22, California Code of Regulations (Title 22), provided Regional Water Board staff finds that such mining wastes pose a significant threat to water quality. Group B mining wastes are either: wastes that consist of or contain hazardous wastes that qualify for a variance under Title 22, provided Regional Water Board staff finds that such mining wastes pose a low threat to water quality; or mining wastes that consist of or contain non-hazardous soluble pollutants of concentrations that exceed water quality objectives (WQOs) for, or could cause, degradation of waters of the state. Group C wastes are wastes from which any discharge would be in compliance with the applicable water quality control plan, including WQOs other than turbidity."

The California Regional Water Quality Control Board (Central Valley Water Board) adopted Waste Discharge Requirements (WDRs) Order 97-168 on

8 August 1997, which classified the proposed mining units as a Group C mining waste pile, a Group A mining waste pile, and a Group A mining waste impoundment as defined in California Code of Regulations, title 23, section 2510 et seq. The proposed Order updates the existing WDRs to classify the proposed waste management units as a Group B mining waste pile, and a Group B mining waste impoundment, in accordance with California Code of Regulations, title 27, section 20005 et seq. (Title 27). As a precautionary measure, the Discharger proposes to construct WMU No. 1 and WMU No. 2 to the performance standards for Group A wastes.

The facility is located in the Loraine Mining District within the Tehachapi structural block. The facility is underlain by granodiorite of the Sierra Nevada Batholith that has been intruded by rhyolitic dikes and sills. Residual soils that have formed on the granodiorite are up to 24 inches thick. The topography consists of moderately steep granitic slopes vegetated by scrub oak and pines. There are six springs within one mile of the facility and Caliente Creek is located approximately one mile to the north.

The first encountered groundwater ranges from about 10 feet to 300 feet below the native ground surface. Monitoring data indicate background groundwater quality for first encountered groundwater has electrical conductivity (EC) ranging between 700 and 1,000 micromhos per centimeter. The direction of groundwater flow is generally toward the northwest and generally follows the topography. The groundwater elevation is over 490 feet above the flow line elevation of Caliente Creek at the closest point to the facility.

The quality of surface water in Caliente Creek and in springs located in the vicinity of the mining project is within primary and secondary drinking water standards for inorganic constituents except for concentrations of arsenic, manganese, iron, and turbidity. Surface water sampling locations have been established on Caliente Creek and at six seasonal springs within a mile of the mine.

The action to revise waste discharge requirements for this proposed mining facility is exempt from the provisions of the California Environmental Quality Act (CEQA), Public Resource Code section 21000, et seq., and the CEQA guidelines, in accordance with Title 14, section 15301.

This order requires full containment of wastes and does not permit degradation of surface water or groundwater. Further antidegradation analysis is therefore not needed. The discharge is consistent with the antidegradation provisions of State Water Resource Control Board Resolution 68-16.