# STATE OF CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD CENTRAL COAST REGION

#### STAFF REPORT FOR REGULAR MEETING DECEMBER 4-5, 2008

ITEM NUMBER:

5

SUBJECT:

**Low Threat and General Discharge Cases** 

DISCUSSION

General NPDES Permit for Discharges with Low Threat to Water Quality

# ExxonMobil Las Flores Canyon Drinking Water Production Well, Goleta, Santa Barbara County [Ryan Lodge (805) 549-3506]

Central Coast Water Board staff enrolled ExxonMobil under the National Pollutant Discharge Elimination System General Permit for Low Threat Discharges to Surface Water Order No. R3-2006-0063 (General Order). The ExxonMobil's Notice of Intent, dated September 9, 2008, requested enrollment for discharges associated with drinking water supply well development. The supply well development and pumping test water will be discharged to Las Flores Creek through an energy dissipation device to prevent erosion at the discharge point to the creek. The General Permit requires monitoring and reporting to ensure the discharges do not degrade water quality.

Central Coast Water Board staff's review of the application indicates the proposed discharge is appropriate for enrollment under the General Order and ExxonMobil was authorized to discharge in a September 23, 2008 Water Board letter. ExxonMobil is required to submit annual reports on January 31<sup>st</sup> of each year.

#### General Waiver of Waste Discharge Requirements for Specific Types of Discharges

#### Rio Del Mar Pump Station, Aptos, Santa Cruz County [Tom Sayles ( 805) 542-4640]

On September 26, 2008, Central Coast Water Board staff received Weber, Hayes, & Associates (WHA) In-situ Chemical Oxidation Field Pilot Test Workplan (Workplan). The Workplan proposes an in-situ chemical oxidation pilot test to determine if hydrogen peroxide will break down diesel free-product at the subject site. A bench scale pilot test, completed in July 2008, showed a successful breakdown of separate-phase diesel. The Central Coast Water Board requested a detailed workplan to complete a field pilot test to determine if the success of the bench scale can be duplicated in the filed. WHA proposes to conduct the field test using two stainless steel injection wells. WHA will perform a baseline sampling of soil and groundwater to obtain geochemical parameters and will compare the data to that collected during and after the pilot test. WHA will submit a technical report summarizing the results of the pilot test and will determine if full scale in-situ chemical oxidation can be used as the final remedial action to expedite cleanup of the subject site.

The workplan proposes the use of hydrogen peroxide injection for cleanup of hydrocarbon-affected soil and groundwater. Hydrogen peroxide is an in-situ remedial technology that reduces concentrations of petroleum products through chemical oxidation. The injection of hydrogen

peroxide into the subsurface must comply with the General Waiver of Waste Discharge Requirements for Specific Types of Discharges, Resolution No. R3-2008-0010 (General Waiver). The Workplan fully complies with the requirements of the General Waiver.

On October 16, 2008, Central Coast Water Board staff approved the proposed in-situ chemical oxidation pilot test and issued a Notice of Applicability to Ms. Amy Gross, the responsible party's representative, for enrollment under the General Waiver. This staff report serves as a notification to the Central Coast Water Board that Water Board staff has issued the Notice of Applicability to Ms. Amy Gross to implement the proposed Pilot Test.

## Martella Property; 347 West Market Street, Salinas, Monterey County [Wei Liu (805) 542-4648]

In June 2008, Environmental Technology International (ETI) submitted a Revised Corrective Action Plan (RCAP) for the Martella Property. The site has an approved Corrective Action Plan, initially using soil vapor extraction and groundwater extraction. During the past ten years, a variety of remedial technologies have been used at the site. However, contaminant concentrations have remained elevated in a few areas within the site. Central Coast Water Board staff requested the responsible party to submit an RCAP to identify and select more effective remedial alternatives so that cleanup can be completed.

Based on their evaluation, ETI selected in-situ chemical oxidation and monitored natural attenuation as the best cleanup alternatives. ETI proposes a pilot test of in-situ chemical oxidation using modified Fenton's Reagent to address residual petroleum hydrocarbons beneath the site. The injection of Fenton's Reagent into the subsurface must comply with the General Waiver. The RCAP provides the necessary information to fully comply with the requirements for enrollment under the General Waiver.

On August 27, 2008, Central Coast Water Board staff approved the RCAP and pilot test, and issued a Notice of Applicability to Ms. Maggie Fanoe, the responsible party's representative, for enrollment under the General Waiver. This staff report serves as notification to the Central Coast Water Board that Water Board staff has issued a Notice of Applicability to Ms. Maggie Fanoe to implement the RCAP.

## Thrifty Station No. 202, 4069 State Street, Santa Barbara, Santa Barbara County [John Mijares (805) 549-3696]

Central Coast Water Board staff has reviewed Environ Strategy Consultants, Inc.'s (ES) September 30, 2008 General Waiver application (Application) for the subject site. ES proposes to inject hydrogen peroxide, sodium persulfate, and ferrous sulfate solution to destroy petroleum hydrocarbons in soil and groundwater at the site.

The injection of hydrogen peroxide, sodium persulfate, and ferrous sulfate solution into the subsurface must comply with the General Waiver. Water Board staff concurred with the remedial action contingent on enrollment under the General Waiver. The application provides the necessary information to fully comply with the requirements for enrollment under the General Waiver. On October 8, 2008, Central Coast Water Board staff enrolled Mr. Roi Hertanto under the General Waiver. Mr. Hertanto is the responsible party for the subject site.

This staff report serves as a notification to the Central Coast Water Board that Water Board staff has issued a Notice of Applicability to Mr. Roi Hertanto for the injection of hydrogen peroxide, sodium persulfate, and ferrous sulfate solution, under the General Waiver to remediate hydrocarbons at the site.