

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

**STAFF REPORT FOR REGULAR MEETING OF JANUARY 29-30, 2015**

Prepared on December 30, 2014

**ITEM NUMBER:** 9

**SUBJECT:** Amendment of Waste Discharge Requirements, National Pollutant Discharge Elimination System Permit No. CA0048143 for the City of Santa Barbara, El Estero Waste Water Treatment Facility, Order No. R3-2010-0011

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**KEY INFORMATION**

**Location:** 520 East Yanonali Street, Santa Barbara, CA 93103

**Place ID/Type:** 222443/Publicly Owned Treatment Works

**Type of Discharge:** Treated secondary wastewater and desalination brine

**Permitted Flow:** 11 million gallons per day (MGD) of treated wastewater and 12.5 MGD of desalination brine

**Average Daily Flow:** 11.0 million gallon per day (MGD) of secondary treated wastewater

**Water Reclamation:** Order 97-44

**Type of Treatment:** Secondary treatment system consists of screening and grinding, aerated grit removal, primary sedimentation, activated sludge stabilization, secondary clarification, disinfection by chlorination, and dechlorination facilities.

**Disposal Method:** Treated wastewater is discharged through a 8,720-foot ocean outfall. When the desalination facility is operational, brine discharge is comingled with wastewater and discharged through the same outfall.

**Solid Wastes:** Solid wastes (biosolids) are treated using gravity thickening, dissolved air floatation thickening, anaerobic digestion, and belt press dewatering. Anaerobically digested sludge is dewatered by a belt press system and the dewatered sludge is then conveyed to a dump truck for subsequent disposition. Dewatered biosolids are transported and composted.

**Existing Orders:** Waste Discharge Requirements Order No. R3-2010-0011

**This Action:** Adopt Amendment to Order No. R3-2010-0011

## DISCUSSION

The City of Santa Barbara owns and operates the El Estero Wastewater Treatment Facility (WWTF) and currently discharges pursuant to Order No. R3-2010-0011, National Pollutant Discharge Elimination System (NPDES) Permit No. CA0048143. The City (hereinafter Discharger) also owns a seawater desalination facility adjacent to the WWTF that is not currently operational, but is permitted to discharge up to 12.5 MGD of brine comingled with secondary treated wastewater through the WWTF ocean outfall. The desalination facility did operate for a short time in 1994; however, it was placed in standby mode in 1996 and has not been used since that time. Due to current drought conditions, the Discharger intends to place the desalination facility back into production mode to address projected water shortages in 2015-2016.

California Water Code (CWC) section 13142.5(b) states: *For each new or expanded coastal powerplant or other industrial installation using seawater for processing, the best available site, design, technology, and mitigation measures feasible to minimize intake and mortality of all forms of marine life.*

The Central Coast Water Board did not make a formal determination as to whether the desalination facility complied with CWC section 13142.5(b) when it permitted the project in 1991. The Discharger has requested that the Central Coast Water Board make such a determination now, prior to upgrades and possible operation of the desalination facility. The State Water Resources Control Board is developing amendments to the California Ocean Plan that will implement section 13142.5(b) for new or expanded facilities. As currently proposed, the amendments will not apply to existing facilities that have received a section 13142.5(b) determination. The proposed amendment will therefore provide some clarity as the Discharger takes actions necessary to resume operation of the desalination facility in time to meet the projected water shortages, should they occur.

CWC section 13142.5(b) applies only to new or expanded facilities. The Discharger does not plan to operate the desalination facility beyond the currently permitted production capacity. The proposed amendment finds that the facility would therefore not be considered expanded. The Discharger also maintains that its facility should not be considered new or expanded based solely on the fact that a formal CWC section 13142.5(b) determination was not made previously.

Water Board staff has reviewed the information and project-specific studies developed by the Discharger when it was designing and permitting the desalination facility. Based on this record, the proposed amendment finds that the desalination facility, at the time it was first permitted, complied with CWC section 13142.5(b) because it used the best available site, design, technology, and mitigation measures feasible to minimize the intake and mortality of all forms of marine life as of 1991, when the board first permitted the desalination facility.

The proposed amendments to Order R3-2010-011, NPDES Permit No. CA0048143 would add Attachment G to the permit, containing the CWC 13142.5(b) finding. Proposed Attachment G describes the site, design, technology, and mitigation measures that substantiate the finding. The attachment also describes additional mitigation measures the Discharger will undertake voluntarily, to minimize intake and mortality of marine life further.

**CHANGES FROM THE EXISTING ORDER**

The proposed amended Order, included as Attachment 1 to this staff report, is structured in accordance with the statewide NPDES permit template. The only substantive change to the proposed amended Order is the addition of the CWC section 13142.5(b) findings as new Attachment G of the existing NPDES permit. A new Finding U. is included in the permit, which references Attachment G. To facilitate review, all proposed changes within the amended order are shown with underlined text.

**PUBLIC COMMENTS**

On October 22, 2014, the Central Coast Water Board provided notice of the proposed permit amendment to the Discharger and interested persons and posted the proposed permit amendment on its website. Central Coast Regional Water Board staff received written comments during the public comment period from the Discharger (Attachment 2) and Santa Barbara Channelkeeper (Attachment 3). The final version of Attachment G includes several minor changes to the findings of fact, but no other changes are proposed at this time.

The Discharger supports amending Order No. R3-2010-0011, as proposed. A written response to Channelkeeper's comments/contentions on the proposed amended order is included for the board's consideration as Attachment 4.

**RECOMMENDATION**

Adopt Amended Order No. R3-2010-0011, as proposed.

**ATTACHMENTS**

1. Amended Order No. R3-2010-0011, which includes Attachment G
2. Comment letter from the City of Santa Barbara dated November 25, 2014
3. Comment letter from Santa Barbara Channelkeeper dated November 26, 2014
4. Central Coast Water Board staff Response to Public Comments