REGIONAL WATER QUALITY CONTROL BOARD SAN DIEGO REGION

EXECUTIVE OFFICER SUMMARY REPORT May 12, 2021

ITEM 3

SUBJECT

NPDES Permit Reissuance: City of San Diego, South Bay Water Reclamation Plant Discharge to the Pacific Ocean through the South Bay Ocean Outfall (Tentative Order No. R9-2021-0011, NPDES No. CA0109045). (*Fisayo Osibodu and Keith Yaeger*)

STAFF RECOMMENDATION

Adoption of the Tentative Order No. R9-2021-0011 (Tentative Order; **Supporting Document No. 1**) is recommended.

KEY ISSUES

Significant changes between the Tentative Order and the current Order, Order No. R9-2013-0006, are described in the Significant Changes section of this Executive Officer Summary Report. The City of San Diego (City) is the designated Discharger under the Tentative Order and does not object to these changes.

PRACTICAL VISION

Consistent with the mission of the Strategy for Healthy Waters chapter of the Practical Vision, the Tentative Order integrates all applicable technology-based requirements, water quality-based effluent limitations, and receiving water quality standards to optimize protection of water quality and beneficial uses in the Pacific Ocean. Additionally, the Tentative Order has provisions allowing for participation in regional monitoring and assessment programs in keeping with San Diego Water Board Resolution No. R9-2012-0069, Resolution in Support of a Regional Monitoring Framework.

DISCUSSION

The City owns and operates the South Bay Water Reclamation Plant (SBWRP) which is designed to treat up to 15 million gallons per day (MGD) of raw wastewater to secondary treatment or tertiary treatment standards. The SBWRP discharges secondary treated wastewater, and at times tertiary-treated wastewater in excess of recycled water demands, to the Pacific Ocean through the South Bay Ocean Outfall. The SBWRP provides municipal wastewater treatment services to a population of approximately 125,000 people in the southern portion of the City of San Diego, the City of Imperial Beach, the City of Chula Vista, and unincorporated portions of South and East San Diego County. (See **Supporting Document No. 2**, location map.)

The City and the United States Section of the International Boundary and Water Commission (USIBWC) jointly own and operate the South Bay Ocean Outfall. Effluent from USIBWC's South Bay International Wastewater Treatment Plant (SBIWTP) is also discharged to the Pacific Ocean through the South Bay Ocean Outfall. The SBIWTP is regulated under a separate National Pollutant Discharge Elimination System (NPDES) permit which is also being considered for reissuance at today's Board meeting in Agenda Item 4, Tentative Order No. R9-2020-0001). The effluent from the SBWRP is combined

with the effluent from the SBIWTP within the South Bay Ocean Outfall prior to discharge to the Pacific Ocean. The total permitted flow to the South Bay Ocean Outfall is 40 million gallons per day (MGD), with the SBWRP permitted to discharge up to 15 MGD and the SBIWTP permitted to discharge up to 25 MGD.

The Tentative Order, if adopted, will supersede the current Order and reissue the NPDES permit for the City's discharge to the South Bay Ocean Outfall for a five-year term. The Tentative Order was developed based on information in the City's reissuance application, self-monitoring reports, and other available sources (e.g. inspection reports, meetings, and emails with the City).

The Tentative Order was noticed for a public hearing and released for public review and comment for a 30-day period on February 23, 2021. The public comment period closed on March 25, 2021. The San Diego Water Board received one comment letter from the City regarding the Tentative Order during the comment period. (See **Supporting Document No. 3**) The Response to Comments Report (**Supporting Document No. 4**) contains the San Diego Water Board's responses to the City's comments and when applicable describes actions taken to revise the Tentative Order in response to the comments. A copy of the Response to Comments Report and the Revised Tentative Order were provided to the City.

The following is a summary of the most significant comments received and the responses to those comments:

- 1 The City commented that addition of an effluent limitation for chronic toxicity is not sufficiently justified nor is it based on or consistent with available data. As a result, the chronic toxicity effluent limitation in the permit should be changed to a performance goal.
 - Since effluent from the SBWRP is monitored prior to commingling with the SBIWTP effluent and since there were no exceedances of the chronic toxicity performance goal during the previous permit term, establishing an effluent limitation for chronic toxicity for the discharge is not required at this time. As requested by the City, the San Diego Water Board has revised the Tentative Order to change the effluent limitation for chronic toxicity to a performance goal. The rationale in the Fact Sheet of the Tentative Order for establishing the chronic toxicity effluent limitation has been deleted.
- 2. Climate change and flood control provisions contained in sections 6.3.4.2-6.3.4.5 of the Tentative Order (Construction, Operation, and Maintenance Specifications) are premature prior to the City developing the Climate Change Action Plan required by the Tentative Order, and as a result should be removed. The climate change and flood control provisions in the Tentative Order do not account for a timeline to assess whether existing facilities are protected against impacts of climate change and flooding. It is more appropriate to assess and address compliance with these provisions after the City has developed its Climate Change Action Plan.

The San Diego Water Board has modified the requirement for the Facilities¹ to be protected against impacts of flooding from 100-year Tijuana River flows to apply to just the SBWRP and not to wastewater conveyance structures/facilities outside the footprint of the SBWRP. The current permit and previous iterations of the permit include similar flood, runoff, and storm protection provisions. In addition, the City in its comment letter stated the SBWRP is located outside the 100-year flood plain which means the City will be in compliance with the provision requiring the SBWRP to be protected against impacts of a 100-year 24-hour storm.

The San Diego Water Board has added additional text to clarify implementation of the requirement for the Facilities to be protected against regional impacts of changing climate conditions (e.g., rising sea levels, flooding, higher storm surges, and changing hydrography (including more intense atmospheric rivers)). The San Diego Water Board agrees that it is appropriate for the City to implement compliance with the requirement through development and implementation of applicable measures identified in the Climate Change Action Plan which is required to be submitted within three years of the effective date of the Tentative Order pursuant to section 6.1 of Attachment E of the Tentative Order.

The Revised Tentative Order (**Supporting Document No. 1**) displays the changes made after the February 23, 2021 public release in <u>red-underline</u> for added text and red strikeout for deleted text.

SIGNIFICANT CHANGES

The following are the significant differences between the Tentative Order and the current Order:

- 1. The Tentative Order establishes new effluent limitations for endosulfan based on results of a reasonable potential analysis.
- 2. The Tentative Order requires the City to monitor the receiving water for human marker HF183 when the overall compliance rate for bacteria receiving water limitations specified in the Order is below 90 percent within a rolling one-year period at a single monitoring location, or when bacteria receiving water limitations are exceeded more than 50 percent of the time within a rolling quarterly period for kelp/nearshore monitoring locations.
- 3. The Tentative Order requires the City to prepare and submit a Climate Change Action Plan within three years of the effective date of the Order.

¹ The term "Facilities" collectively refers to the SBWRP, South Bay Ocean Outfall; and any associated structure or system used in the storage, treatment, and recycling of wastewater at the SBWRP, or any structure or system used in conveyance of wastewater to or from the SBWRP.

4. The Tentative Order requires the City to develop and implement an Asset Management Plan to ensure the City has sufficient financial and technical resources to ensure proper operation and maintenance of its Facilities.

COMPLIANCE RECORD

From May 2013 through January 2021, the City reported four effluent violations and four deficient monitoring violations. Details of these violations are contained in the compliance summary information provided in Supporting Document No.1, Attachment F, section 2.4. To address these violations, the San Diego Water Board issued three staff enforcement letters.

PUBLIC NOTICE

The Tentative Order was noticed and released for public review and comment on February 23, 2021, with comments due by March 25, 2021. The Notice of Public Hearing and Comment Period was posted on the San Diego Water Board website for the duration of the comment period and sent to all interested parties. The Notice announced a public hearing to be held on May 12, 2021; availability of the Tentative Order for review; and provided instructions for submittal of written comments. A copy of the Notice is provided in **Supporting Document No. 5**. Notice of the public hearing on the Tentative Order was also provided in the Meeting Notice and Agenda for the May 12, 2021 San Diego Water Board meeting, which is posted on the San Diego Water Board website.

SUPPORTING DOCUMENTS

- 1. Revised Tentative Order
- 2. Location Map
- 3. Comment Letter from the City of San Diego
- 4. Response to Comments Report
- 5. Notice of Public Hearing