

Board of Directors Water Planning and Stewardship Committee

10/8/2013 Board Meeting

7-4

Subject

Authorize entering into a Local Resources Program agreement with Eastern Municipal Water District for the Perris II Brackish Groundwater Desalter

Executive Summary

Authorization is requested to enter into a Local Resources Program (LRP) agreement with Eastern Municipal Water District (EMWD) for the Perris II Brackish Groundwater Desalter (Project). The Project would provide up to 6,000 acre-feet per year (AFY) of treated groundwater for potable uses within EMWD's service area. The Project would help achieve Metropolitan's LRP goal of developing 174,000 acre-feet (AF) of new water supply by 2025.

Details

Authorization is requested to enter into a LRP agreement with EMWD for the subject Project. The Project is a 6,000 AFY water treatment plant that will treat degraded groundwater from the West San Jacinto Groundwater Basin for potable purposes within EMWD's service area. The groundwater contains high concentrations of total dissolved solids, nitrate, and iron and manganese. EMWD would own and operate the project, and is expected to begin deliveries in May 2017.

The Project, described in **Attachment 1**, complies with LRP criteria adopted by the Board. Key terms of the proposed agreement, subject to approval in form by the General Counsel, include the following:

- 1. Pay for performance LRP financial incentives would only be paid for recovered groundwater delivered by the Project for beneficial use;
- 2. Sliding scale incentives up to \$250 per AF, calculated annually, based on actual project unit cost above Metropolitan's prevailing water rate;
- 3. Termination for nonperformance if construction does not commence within two years of agreement execution or recovered groundwater deliveries are not realized within five years of agreement execution;
- 4. Reduction in Metropolitan's contract commitment if the project falls short of production targets measured in four-year intervals throughout the agreement term; and
- 5. Rate structure integrity language.

In 2007, the Board established a goal of 174,000 AFY of new LRP yield. Since then, the Board has approved 22 projects with a potential yield of 104,880 AFY. Since inception of its regional local resources and groundwater recovery programs in 1982, Metropolitan has provided financial assistance for the production of over 2.4 million AF of recycled water and recovered groundwater. The board-approved policy goals of these programs, which benefit all member agencies regardless of individual project location, target increased regional water supply reliability and reduced demands for new sources of imported water supplies. LRP projects produced about 223,000 AF last fiscal year.

Policy

By Minute Item 47049 dated April 10, 2007, the Board adopted Local Resources Program revisions including goal of 174,000 AFY of new production.

California Environmental Quality Act (CEQA)

CEQA determination for Option #1:

Pursuant to the provisions of the National Environmental Policy Act (NEPA) and CEQA and the State CEQA Guidelines, the U.S. Army Corps of Engineers and Eastern Municipal Water District (EMWD), acting as the NEPA and CEQA Lead Agencies, respectively, prepared the Perris II Desalter Project Environmental Assessment (EA) and Finding of No Significant Impact (FONSI). On March 22, 2006, EMWD adopted the EA/FONSI and Mitigation Monitoring and Reporting Program (MMRP) and approved its project. Subsequent to that time, EMWD revised the project description and a Subsequent Mitigated Negative Declaration (MND) was prepared to address changes made to the design capacity of the project. On January 21, 2009, EMWD adopted the Subsequent MND and MMRP and approved the project modification. Since approval of the Subsequent MND, additional minor modifications to the approved project have occurred. EMWD prepared an Addendum to the Subsequent MND (Addendum) to address these minor modifications to the proposed project. On October 20, 2010, the Board adopted the Addendum and approved the proposed project modifications. Metropolitan, as a Responsible Agency under CEQA, is required to certify that it has reviewed and considered the information in the 2006 EA/FONSI and MMRP; the 2009 Subsequent MND and MMRP; and the 2010 Addendum, and adopt the Lead Agency's findings prior to approval of the formal terms and conditions for the proposed agreement. All environmental documentation referenced above is in Attachment 2 and is available in the Board Executive Secretary's Office for review.

The CEQA determination is: Review and consider information provided in the adopted 2006 EA/FONSI and MMRP, the adopted 2009 Subsequent MND and MMRP, and the 2010 Addendum and adopt the Lead Agency's findings related to the proposed action.

CEQA determination for Option #2:

None required

Board Options

Option #1

Adopt the CEQA determination, and review and consider the adopted 2006 EA/FONSI and MMRP, the adopted 2009 Subsequent MND and MMRP, and the 2010 Addendum prepared by EMWD as Lead Agency, adopt the Lead Agency's findings, and authorize the General Manager to enter into a Local Resources Program agreement for the Perris II Brackish Groundwater Desalter with EMWD for up to 6,000 AFY of recovered groundwater under terms included in this letter.

Fiscal Impact: \$23 million over 25 years based on project yield projections and estimated costs. These incentive payments are factored into Metropolitan's rate projections and would be included in future budgets. However, should project yield and costs be greater than anticipated, Metropolitan's maximum financial obligation could total up to \$37.5 million over 25 years.

Business Analysis: The project would contribute towards Metropolitan's local resources goal of developing 174,000 AFY of new supply by year 2025.

Option #2

Do not authorize execution of an agreement for the project.

Fiscal Impact: None

Business Analysis: Metropolitan would pursue other projects and it may take longer to meet the LRP goal of 174,000 AFY.

Staff Recommendation

Option #1

Deven N. Upadhyay Manager, Water Resource

9/18/2013

9/16/2013

Date

Date

Attachment 1 – EMWD Perris II Brackish Groundwater Desalter – Project Description

Attachment 2 - Perris II Brackish Groundwater Desalter Environmental Documents (available for review in the Board Executive Secretary's Office)

Ref# wrm12625833

Perris II Brackish Groundwater Desalter PROJECT DESCRIPTION

Overview

The proposed Perris II Brackish Groundwater Desalter (Project) will be owned and operated by Eastern Municipal Water District (EMWD). The Project will be located in the West San Jacinto Groundwater Basin (WSJGB) in the city of Perris, and will produce up to 6,000 acre-feet per year (AFY) of potable water by treating degraded local brackish groundwater. A baseline of 5,859 AFY was established for the Project, which is the current total recovered groundwater produced by the Perris I and Menifee Desalters in fiscal year 2012/13. Only Project production over the baseline will be eligible for Metropolitan's incentive under this Agreement.

Project Facilities

The Project (shown in Figure 1) consists of the proposed Perris II Desalter Plant, iron-manganese removal facility, two pump stations, clear well, up to seven new wells, approximately 62,500 lineal feet of brackish well-water collection pipeline, 11,300 lineal feet of brine disposal pipeline, 1,600 lineal feet of sewer pipeline; and approximately 2,200 lineal feet of potable water pipeline. The Plant will be a reverse osmosis desalination plant with an ultimate capacity of 5.4 million gallons per day (Mgd) of potable water

Existing Desalters

EMWD currently operates the Menifee Desalter and Perris I Desalter in WSJGB with a combined plant capacity approximately 8 Mgd of potable water supply. These two existing desalters are independent from the Project and are not part of this Agreement.

Source of Water

Source water would be degraded groundwater from WSJGB. The groundwater contains high concentrations of total dissolved solids, nitrate, and iron and manganese. The untreated groundwater is unsuitable for potable purposes and currently is not being used by EMWD. The WSJGB is unadjudicated groundwater basin and is being recharged by surface water percolation.

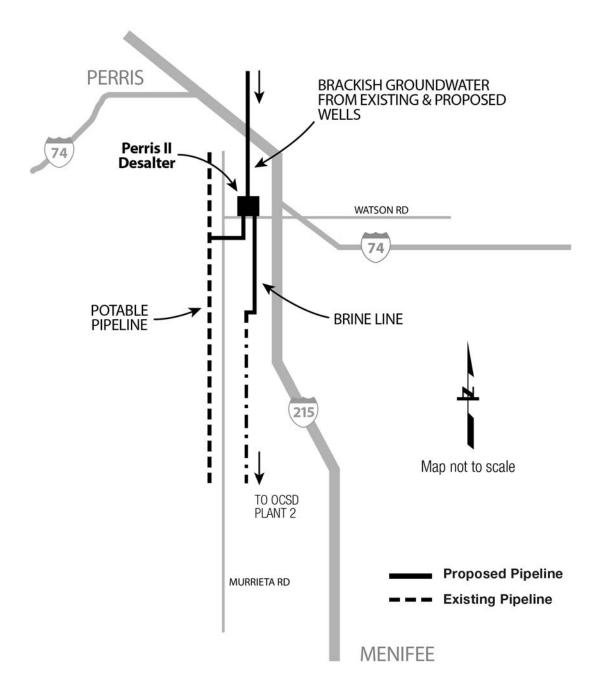
End Users

Project water would be delivered for potable uses to customers within EMWD's service area.

Points of Connection

Potable water project facilities terminate at the point of connection to EMWD's potable water conveyance and distribution system and sewer and storm drain systems.

FIGURE 1



PERRIS II BRACKISH GROUNDWATER DESALTER