



THE METROPOLITAN WATER DISTRICT
OF SOUTHERN CALIFORNIA

Board Report

Engineering Services Group

- **Engineering Services Group Monthly Activities Report for January 2026**

Summary

This monthly report provides highlights and a summary of Engineering Services Group activities for January 2026 in the following key areas:

- Colorado River Aqueduct (CRA) Program
- Dams & Reservoirs Program
- Distribution System Program
- Additional Facilities and Systems Program
- Prestressed Concrete Cylinder Pipe (PCCP) Program
- Water Treatment Plants Program
- Pure Water Southern California
- Drought Mitigation – State Water Project Dependent Areas
- Value Engineering Program

Purpose

Informational

Attachments

Detailed Report – Engineering Services Group’s Monthly Activities for January 2026

Engineering Services' Monthly Activities for January 2026 Highlights

In the month of January, Engineering Services embarked on the following major actions in support of the General Manager's business plan for Fiscal Year 2025/2026:

Goal: Complete Environmental Impact Report (EIR) and Planning, for Board to Consider Pure Water Southern California

Outcome: Complete EIR analyses and public process

The final EIR for Pure Water Southern California was completed and posted on Metropolitan's website in advance of a February action for the Board to consider its certification.

In support of the General Manager's Business Plan goal of providing organizational stability and delivering operational excellence, Engineering Services manages and executes projects within the adopted Capital Investment Plan (CIP) to maintain infrastructure resiliency, ensure regulatory compliance, enhance sustainability, and provide flexibility in system operations to address uncertain water supply conditions. In addition, Engineering Services provides technical services to enhance reliable system operation and real property planning, valuation, acquisition, and disposition services to protect Metropolitan's assets. Engineering Services empowers our staff and partners with our business partners and the communities we serve to accomplish Metropolitan's mission.

Recent key activities on CIP programs and other key engineering functions are described below.



Protect public health, the regional economy, and Metropolitan's assets

Colorado River Aqueduct (CRA) Program

The CRA program includes CIP projects to replace or refurbish facilities and components of the CRA system to reliably convey water from the Colorado River to Southern California.

- **CRA Eagle and Hinds Utilities** — This project will replace the existing potable water, non-potable water, and sewer lines at the Eagle Mountain and Hinds pumping plants. A construction contract was awarded in November 2025, and the Notice to Proceed was issued to the contractor in January 2026.
- **CRA Main Motor Protection Relays** — This project will replace the main motor protection relays for all 45 main motors at the five CRA pumping plants. Replacement will occur in a multi-phased approach to minimize operational disruptions. Five units will be replaced in the first phase. Two of the five units are currently in fabrication. Fabrication is 15 percent complete. The other three units are in final design. Final design is 5 percent complete and scheduled to be complete by December 2026.
- **CRA Pump Plant Sumps Rehabilitation** — This project rehabilitates the sump and circulating water systems at all five CRA pumping plants. The scope of work also includes replacement of the structural support systems, piping, valves, motors, and electrical equipment. Final design is complete and a board action to award a construction contract is planned for May 2026.
- **Black Metal Mountain Electrical Upgrades** — This project replaces the existing single-phase 2.4 kV power line delivering power to the Black Metal Mountain communication site with a more robust three-phase power line rated for 4.16 kV usage. The project will also enhance the main access road to the communications sites. Final design is 75 percent complete and scheduled to be complete by June 2026.

Dams & Reservoirs Program

The Dams & Reservoirs Program includes CIP projects to upgrade or refurbish Metropolitan's dams, reservoirs, and appurtenant facilities to reliably meet water storage needs and regulatory compliance.

- **Garvey Reservoir Rehabilitation** — This project will replace the aging reservoir floating cover and liner; strengthen the structure of the reservoir outlet tower to reduce the risk of damage following a major seismic event; and upgrade the reservoir's rainwater collection, pumping, and subdrain systems. The Board awarded a construction contract in December 2025, and a Notice to Proceed was issued to the contractor in January 2026. Construction is planned to be complete by June 2028.
- **Copper Basin Discharge Valve Replacement** — This project installs a new 54-inch fixed cone valve and actuator at the base of the dam, refurbishes a slide gate and the existing valve house, and upgrades all associated electrical systems and access ladders at the Copper Basin Reservoir. This project will also include the replacement of access ladders at the Gene Wash Dam. Final design and acquisition of environmental permits is complete and award of a construction contract is planned for June 2026.

- **Lake Mathews Pressure Control Structure (PCS) and Electrical System Upgrades** – This project will replace the aging Lake Mathews discharge facility and electrical system. The project includes the construction of a new PCS with a bypass pipeline alongside the existing forebay, a new chlorination facility, and upgrading the electrical system to accommodate future power needs. This project utilizes a progressive design-build project delivery method. A Request for Qualifications (RFQ) for Phase 1 design-build services was released in September 2025. Six statements of qualification were received in November 2025 and are being evaluated. A board action to authorize the Phase 1 agreement is planned for June 2026. The project is anticipated to be complete by 2032.

Distribution System Program

The Distribution System Program includes CIP projects to replace, upgrade, or refurbish existing facilities within Metropolitan's distribution system, including PCSs, hydroelectric power plants, and pipelines, to reliably meet water demands.

- **Auld Valley Pressure and Red Mountain Control Structure (PCS) Valve Replacement** – This project will rehabilitate one 42-inch sleeve valve and procure one 42-inch sleeve valve for the Red Mountain Pressure Control Structure and rehabilitate two 42-inch sleeve valves for the Auld Valley Pressure Control Structure. One valve at the Auld Valley PCS has been rehabilitated, and the second one is currently being rehabilitated by Metropolitan forces. Both valves will be installed during a future shutdown. Metropolitan is currently reviewing submittals provided by the vendor to procure the new 42-inch sleeve valve for Red Mountain, which is planned to be installed in the fall of 2026.
- **Skinner East Bypass Gates** – This project will replace three existing cast-iron slide gates at the East Lake Skinner Bypass inlet channel. The existing gates are heavily corroded and bind during lifting operations. The existing gates will be replaced with three stainless steel gate assemblies and new actuators. The new gates have been procured and are being stored onsite at the Skinner Plant. The new actuators are scheduled for delivery in February 2026. Final design for the contract package that includes installation of the new gates is approximately 60 percent complete and is scheduled to be complete in May 2026.
- **Hollywood Tunnel North Portal Equipment Upgrades** – The project will replace the existing valves with two new 24-inch-diameter sleeve valves operated by electric actuators for pressure control and two 24-inch-diameter bonneted knife gate valves for flow isolation at the Hollywood Tunnel North Portal along the Santa Monica Feeder. The valve procurement contract was awarded in March 2025. The valves are scheduled for delivery in Summer 2026. Final design for the valve installation is 95 percent complete and is scheduled to be complete in March 2026.

Additional Facilities and Systems Program

The Additional Facilities and Systems Program includes CIP projects to refurbish, replace, upgrade, or provide new facilities and systems that support Metropolitan's business and district-wide operations.

- **Diamond Valley Lake (DVL) Wave Attenuator Replacement** – This project adds a second attenuator to the existing wave attenuating system at the East Marina in Diamond Valley Lake. As part of the improvements, the existing floating wave attenuator (FWA) will be relocated to a new location, and the new attenuator will be installed in its place. The contractor continued the fabrication of the new North

FWA modules and completed relocation of the existing FWA to the new South location. Construction is 94 percent complete and is scheduled to be complete in February 2026.

- **Lake Mathews Tank Replacement** – This project will procure and install a new 6,000-gallon aboveground diesel fuel tank at Lake Mathews. A fuel dispensing system will also be installed, as well as control systems for the fuel tank, electrical connections, and employee safety features. Final design is complete, the project has been advertised, and bids were received in December 2025. A board action for award of a construction contract is scheduled for February 2026.



Diamond Valley Lake (DVL) Wave Attenuator Replacement –
Installation of Vinyl Rub Strip on New Floating Wave Attenuator

Prestressed Concrete Cylinder Pipe (PCCP) Program

The PCCP Program includes CIP projects to refurbish or upgrade Metropolitan's PCCP feeders to maintain water deliveries without unplanned shutdowns.

- **Sepulveda Feeder PCCP Rehabilitation Reach 2** – This project installs steel lining along 3.8 miles of PCCP through several cities, including Torrance and Los Angeles. The project was advertised on August 27, 2025. Three bids were received in November 2025, and the Board awarded the construction contract in January 2026. The project is expected to be complete by mid-2027.
- **Electromagnetic Inspection** – Regular inspections of the PCCP feeders are a critical step in evaluating the condition of each pipeline and assist staff in prioritizing the relining work on each feeder. This

project conducts the fifth cycle of electromagnetic and visual inspections of 'Metropolitan's approximately 146.4 miles of PCCP pipelines. Inspection of the Box Springs Feeder was completed in December 2025.

Water Treatment Plants Program

The Water Treatment Plants Program includes CIP projects to replace or refurbish facilities and components at Metropolitan's five water treatment plants to continue to reliably meet treated water demands.

- **Weymouth Administration Building Upgrades** — This project upgrades the Weymouth Administration Building to withstand a significant earthquake. The planned upgrades include structural strengthening consistent with current seismic standards for essential facilities, accessibility, and fire/life safety improvements, architectural modifications near the areas of structural upgrades, and improvements associated with the preservation of historic architectural features. Final design is complete, and award of a construction contract is planned for April 2026.
- **Diemer Chemical Feed Facility Improvements** — This project rehabilitates the Diemer plant's chemical feed facility to maintain operational reliability, meet Metropolitan's current chemical safety standards, and enhance worker safety. The Board awarded a construction contract in October 2025. The contractor has completed mobilization. Construction is seven percent complete and is scheduled to be complete in October 2027.
- **Water Quality Lab Building Upgrades** — This project upgrades the Michael J. McGuire Water Quality Laboratory in La Verne to increase its seismic resiliency and to efficiently address new and evolving water quality issues and regulations. Planned improvements include strengthening of the existing structure to meet current seismic criteria for essential facilities; building expansion and functional layout improvements; replacement of specialized laboratory equipment; and implementation of technology upgrades to support current and future water quality regulations. Final design is approximately nine percent complete and is scheduled to be complete in spring 2028.



Adapt to changing climate and water resources

Pure Water Southern California

Pure Water Southern California (Pure Water) is a large regional recycled water program that will provide a new local source of safe and reliable drinking water for Southern California. Pure Water currently focuses on five areas: program management, environmental planning, advanced water purification facility (AWPF) planning, demonstration testing, and preliminary design of initial pipeline reaches. Pure Water will produce up to 150 million gallons per day of purified water from the AWPF in Carson for indirect potable reuse (IPR) and direct potable reuse (DPR) applications.

- **Program Management** – Program management activities include project controls, scheduling, budget development, risk management, coordination with program partners and stakeholders, grants and funding, and preparation of various plans and studies. The Pure Water Program Management team was engaged in the following activities during this reporting period:
 - Presented guiding principles for program partnerships in December 2025 and January 2026 for board approval. The guiding principles would be used to develop term sheets for future agreements.
 - Presented program quarterly updates to the Board in January 2026.
 - Continued coordination and grant reporting efforts with the United States Bureau of Reclamation for the \$125,472,855 Large-Scale Water Recycling Program grant and the \$5 million WaterSmart grant. Metropolitan has received a total of approximately \$25.5 million to date.
 - The \$80 million state grant is also used to support the current phase of program work; approximately \$46 million is spent as of end of November. Continued to coordinate with the CAMP4W assessments.
 - On December 15, 2025, the Pure Water Southern California Project was certified by Governor Newsom for Judicial Streamlining under the SB 149 Infrastructure Streamlining Program.
- **Environmental Planning** – The final EIR was published in January 2026. A board action to consider certification of the final EIR is scheduled for February 2026.
- **Advanced Water Purification Facility** – The AWPF will purify treated wastewater from the Los Angeles Sanitation District's (LACSD) A.K. Warren Water Resource Facility using membrane bioreactors (MBRs), reverse osmosis (RO), and ultraviolet/advanced oxidation. With its expertise in biological wastewater treatment, LACSD will be responsible for implementing the AWPF pretreatment, including the MBR facilities. A final draft of conceptual facilities report has been prepared. This document records key assumptions of AWPF components and would be used for the upcoming RFQs for the progressive design-build contracts to design and construct the full-scale AWPF.
- **Demonstration Testing** – Operational improvements have been made at the Napolitano Innovation Center for the continued testing of the IPR processes, including the installation of a snail mitigation system. Planning of pilot-scale and demonstration-scale testing of DPR processes is in progress. Key testing equipment advertisements are underway, and equipment will be procured in 2026 to facilitate the design of the DPR testing facility.
- **Conveyance System** – The PWSC conveyance system consists of the backbone pipeline that extends 39 miles from the AWPF, repurposing an existing pipeline owned by the San Gabriel Valley Municipal Water District, and constructing a new DPR pipeline to convey water from the backbone eastward for raw water augmentation at Metropolitan's Weymouth plant. The Conceptual Design Report for the entire conveyance system has been completed. Preliminary design of the first two pipeline reaches across the cities of Carson, Long Beach and Lakewood is in progress. The RFQ for the CM/GC contract(s) for these two reaches is also being prepared and would be ready for advertisement in 2026.

Drought Mitigation – State Water Project Dependent Areas

The Drought Mitigation–State Water Project Dependent Areas Program includes CIP projects to replace, refurbish, upgrade, or construct new facilities, which are identified to mitigate the vulnerability experienced by specific member agencies that are affected during shortages of State Water Project supplies.

- **Wadsworth Bypass Pipeline** – This project installs a bypass pipeline and an isolation valve to interconnect the Wadsworth Pumping Plant with the Eastside Pipeline. This project is one of the four Rialto Pipeline service area supply reliability improvement projects. The contractor is currently installing electrical and SCADA control components. Construction is 99 percent complete and is scheduled to be complete in May 2026.
- **Inland Feeder Rialto Pipeline Intertie** – This project installs an interconnection pipeline and isolation valve structure between the Inland Feeder and Rialto Pipeline so that water can be delivered from DVL to the Rialto Pipeline. This project is one of the four Rialto Pipeline service area supply reliability improvement projects. The contractor has completed the SCADA and power duct bank and is currently performing electrical work in preparation for the MCC electrical equipment delivery in early 2026. Construction is scheduled to be complete in July 2026.
- **Foothill Pump Station Intertie and 132-inch Butterfly Valve Procurement** – This project will connect Metropolitan’s Inland Feeder to San Bernardino Valley Municipal Water District’s Foothill Pump Station. The project is one of four Rialto Pipeline service area supply reliability improvement projects. Foothill Pump Station will provide the hydraulic lift needed for direct water delivery from DVL to the Rialto Pipeline. The project will install supply and discharge bypass pipelines, isolation valves and their vault, and a surge protection system. The project requires permits from CA Fish and Wildlife and US Fish and Wildlife (USFWS) to address impacts to endangered species found at the project site. The project received a \$5M USBR grant, and USBR is assisting Metropolitan with permit consultation with USFWS. Due to the recent federal shutdown, USFWS is encountering delays to permit processing. It is anticipated USFWS consultant would be completed by first quarter of 2026. Final design review has been completed, and the construction package is planned to be signed off on by early 2026. A separate procurement contract for a 132-inch butterfly valve to be installed at Foothill Pump Station was awarded in March 2024, and the valve is planned to be delivered by late 2026.



Sustain Metropolitan’s mission with a strengthened
business model

Value Engineering Program

Engineering Services conducts a Value Engineering (VE) program to review capital projects and identify opportunities and alternatives to enhance project performance, optimize funding for CIP projects, and demonstrate responsible use of public funds. The objective of the VE program is to improve the overall value of CIP projects by applying an industry-accepted assessment methodology to examine a project’s function,

design, equipment, material selections, and contracting approach. This comprehensive assessment is conducted at strategic stages in a project's life cycle.

The VE Program is actively planning for these upcoming workshops:

- Security Upgrade Eastern Area 2: Mills WTP and Etiwanda PCS
- State Water Project Invasive Mussel Mitigation Initiative
- Weymouth Wheeler Gate Security and ZEV Infrastructure Upgrades
- Iron Mountain Pumping Plant Light and Power Switchrack Rehabilitation