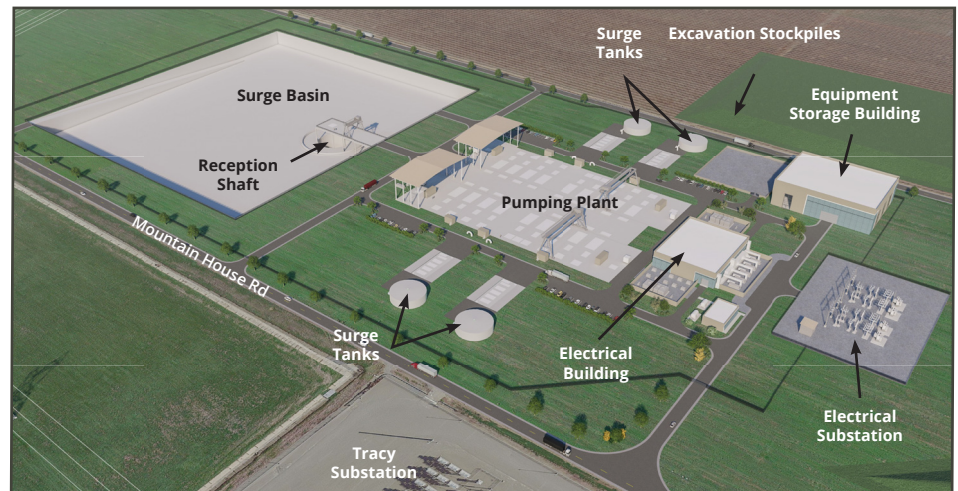


A CLOSER LOOK: PROPOSED BETHANY COMPLEX — CONNECTING TO THE AQUEDUCT

It takes a strategically located set of facilities to pump the water from the proposed Delta Conveyance Project tunnel after its 45-mile journey and lift it into Bethany Reservoir, the beginning of the State Water Project's California Aqueduct. The Delta Conveyance Design and Construction Authority (DCA), working at the direction of the Department of Water Resources (DWR), has designed the proposed Bethany Complex as the project's southern-most facilities in a manner that protects nearby habitat and creates transportation improvements for regional traffic movements.

Pumping Plant and Surge Basin

The proposed Bethany Complex's largest construction footprint is the 213-acre site at Kelso and Mountain House roads to pump the water from the 36-foot internal diameter tunnel. The tunnel boring machine originating from the Lower Roberts Island shaft site northwest of Stockton will be removed at the site. This shaft will be converted into a 15-acre surge basin that will help to regulate tunnel flows. Fourteen pumps will be constructed below ground to lift water at a rate up to 6,000 cubic feet per second. Additional facilities include an electrical building and a substation connected to nearby transmission lines.



Bethany Complex - Pumping Plant and Surge Basin

Bethany Reservoir Aqueduct

From the proposed pumping plant complex, the water has about another mile 2.5 miles to reach Bethany Reservoir. Most of this journey is through cut and cover shallow construction with short tunnel stretches. The tunneling construction site spans 138 acres and does not impact lands designated as conservation easements between the pumping plant and the reservoir.

Bethany Discharge Structure

The final proposed facility directs the water from the tunnels into Bethany Reservoir, requiring a 15-acre construction site. The discharge structure consists of eight 21-foot bays with radial gates to prevent reservoir water from backflowing into the tunnel. A cofferdam constructed with vertical sheet piles will dewater the immediate area of the reservoir to enable the construction of the bays and gates.

Bethany Reservoir State Recreation Area

The area's signature facility is its 608-acre reservoir which receives State Water Project water lifted from the nearby Banks Pumping Plant and discharges the water into the California Aqueduct. This area, including the bike path, will remain open during construction.



Road Expansions and Improvements

Construction will require between 110 and 150 construction trucks and vehicles during peak morning and evening hours on Mountain House Road with dedicated haul roads and potential traffic on Byron Highway to the new Lindemann Road interchange. There would also be traffic on the dedicated haul route coming in from the south and crossing Kelso Road into the site. There would also be construction traffic on Kelso Road within the limits of the footprint. A series of road projects will help manage the temporary traffic and leave permanent improvements going forward.

Key projects include:

- A new interchange at Byron Highway and Lindeman Road consisting of two new bridges over Byron Highway and the Union Pacific Rail Road
- Widening Byron Highway to four lanes near the new Lindemann Road interchange to Great Valley Parkway
- Widening the merge lane on West Grant Line Road just west of Mountain House Road
- Widening 2.2 miles of Mountain House Road between West Grant Line Road and the new haul road.



*Bethany Reservoir connecting to the California Aqueduct
Photo Credit: CA Department of Water Resources*

Pile Driving: Limited to 10 Days

Pile Driving is estimated to take 10 days. Impact pile driving can create significant noise. As proposed, the Delta Conveyance Project includes numerous design modifications to limit the extent of pile driving. An estimated six days of pile driving is necessary at the Lindemann Interchange access road to the Bethany Complex and four days for the new Lindemann bridge across the Union Pacific railroad tracks.

Construction Hours: A Focus on Daytime

Pile driving will be limited to the hours between 7 a.m. and 7 p.m. Construction will not occur during nighttime hours (10 p.m. to 7 a.m.) except when the construction activity requires the continuous pouring of concrete. These pours are not expected to take more than a month during the entire construction process. The concrete will be mixed at two proposed batch plants on 11.5 acres near the intersection of Kelso Road and a new Bethany access road east of Mountain House Road.

Engineering a Reliable Water Supply for California

The DCA's mission is to plan, permit, design and, if the proposed project is approved by DWR, build a modernized state-of-the-art sustainable, resilient, environmentally responsive, and cost-effective Delta Conveyance Project that resolves the long-standing need to assure affordable State Water Project reliability serving future generations of Californians in a way that respects the uniqueness of the Delta as a place and its communities.

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