STATE OF CALIFORNIA - CALIFORNIA NATURAL RESOURCES AGENCY

#### **DEPARTMENT OF WATER RESOURCES**

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September 28, 2020

Casey Arthur
Bureau of Reclamation
Willows Construction Office
1140 West Wood Street
Willows, California 95988

**Governor's Office of Planning & Research** 

Oct 19 2020

STATE CLEARINGHOUSE

Via electronic mail

B.F. Sisk Dam Raise and Reservoir Expansion Project Draft Environmental Impact Report/Supplemental Environmental Impact Statement SCH# 2009091004

Dear Mr. Arthur,

The California Department of Water Resources (DWR) has reviewed the San Luis and Delta-Mendota Water Authority (SLDMWA) and the United States Department of the Interior, Bureau of Reclamation's Draft Environmental Impact Report/Supplemental Environmental Impact Statement (EIR/SEIS) for the B.F Sisk Dam Raise and Reservoir Expansion Project (Project) dated August 2020 and provides the enclosed comments. DWR appreciates the opportunity to comment on the Draft EIR/SEIS and looks forward to working with SLDMWA and Bureau of Reclamation as the Project moves forward.

If you have any questions, please contact me at <a href="Ted.Craddock@water.ca.gov">Ted.Craddock@water.ca.gov</a> or your staff may contact David Duval, Chief of State Water Project Operations and Maintenance, at <a href="David.Duval@water.ca.gov">David.Duval@water.ca.gov</a>.

John Yarbrough for

Ted Craddock
Deputy Director
State Water Project

**Enclosure** 

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Enclosure: Department of Water Resources' Comments on the August 2020 Draft Environmental Impact Report/Supplemental Environmental Impact Statement for the B.F Sisk Dam Raise and Reservoir Expansion Project

## 2.2 Proposed Alternatives

Elements Common to all sub-alternatives.

- 1. On page 2-7, the Draft EIR/SEIS states the 10-foot raise would start during the final stages of the Safety of Dams (SOD) modification construction. The Project schedules require further analysis to optimize construction timelines to minimize impacts to reservoir operations. It is likely the final stages of construction for the SOD Modification Project will take until 2030 to complete. As a result, the schedule for completion and potential environmental impacts related to the extended timeline for construction (e.g., air quality and greenhouse gas emissions) need to be addressed in the EIR/SEIS.
- 2. On page 2-7, the Draft EIR/SEIS states the fill materials would be sourced from two borrow sites Basalt Hill and Borrow Area 6. The potential local borrow supply needs to be evaluated further to ensure sufficient materials are available for the Project. The EIR/SEIS should evaluate whether materials (quarried rock and sand) may be available onsite, after the SOD Project is completed. If additional materials cannot be acquired onsite for the Project, then additional analysis of offsite material resources needs to be included in the EIR/SEIS.
- 3. Page 2-8, the Draft EIR/SEIS states postconstruction maintenance activities would not increase the frequency of maintenance workers being on-site compared to existing maintenance activities at BF Sisk Dam. DWR is responsible for the operation and maintenance of BF Sisk Dam. The EIR/SEIS should include the rationale or analysis which provides the factual basis for this statement and further assess impacts on DWR's maintenance activities and staffing during construction and in the long term.

## 4.1 Water Quality and 4.11 Recreation

4. The San Luis Reservoir experiences periodic algae blooms. The EIR/SEIS should evaluate potential for long-term changes to water quality as a result of the reservoir raise and/or any changes to operations of the reservoirs that could induce algae blooms. If the evaluation indicates algae blooms may be induced, potential impacts to recreation should be analyzed.

# 4.2 Surface Water Supply

5. Potential water supply effects were estimated by using the CALSIM II model. The CALSIM II modeling and other analyses show there is the potential for impacts to the State Water Project (SWP). Given the importance of effective coordinated operations of the Central Valley Project (CVP) and SWP, the existence and/or extent of any SWP water supply reduction from the Project will be reassessed prior to construction, during construction, and at the time that any new regulatory requirement or permit issued for the Project affects SWP operations. SLDMWA, through these reassessments and ongoing coordination of operations between Bureau of Reclamation (Reclamation) and DWR, should

avoid, mitigate, or offset, through measures agreed to by DWR, any significant SWP water supply reduction resulting from the Project operations or construction impacts. Any adaptive management measures or restrictions imposed on SLDMWA, Reclamation, or the CVP through permits or other regulatory approvals issued for Project operations will be coordinated with DWR consistent with the rights and obligations of and between Reclamation and DWR agreed to in other independent agreements.

The EIR/SEIS should evaluate the potential water supply impacts to the SWP and if recent operational agreements between Reclamation and DWR with resource agencies may need to be re-negotiated to utilize the expanded storage available with the Project. If re-negotiations and new agreements between agencies are warranted, the environmental impact of expanded mitigation or compliance measures for resource agency permits should be addressed.

### 4.14 Public Utilities and Power

- 6. On Page 4-46, the Draft EIR/SEIS Section 4.14.5.3 Operation of Alternative 3 states that Alternative 3 would increase demand on existing pumps at Gianelli Plant by approximately 10% in years when the new reservoir space is filled. The existing Gianelli Plant's pumps/generators need to be evaluated to ensure they can operate under a higher reservoir head during generation and/or pumping. If the Gianelli pumps/generators are insufficient, the EIR/SEIS needs to analyze the additional environmental impacts of adding new and/or different pumping/generating facilities to meet operational need.
- 7. Currently, only three of the eight units can "top off" the filling of the reservoir without potential cavitation. The additional pumping load caused by the reservoir raise could accelerate cavitation damage to both the valves and pumps/generators. Similar to the comment above, if new pumps/generators are required, the EIR/SEIS needs to address if new facilities will be required and/or if those facilities can be accommodated onsite and if there are potential environmental impacts of new facilities.
- 8. Raising the crest while maintaining a sufficient crest width for maintenance access could require the extension of the downstream face which could encroach on the Gianelli Plant. This resulting configuration and loading condition need to be evaluated. The EIR/SEIS needs to evaluate if the additional dam raise would require physical relocation and/or re-configuration of Gianelli pumping plant that may have potential environmental impacts.

### Dam Safety

- Reclamation is evaluating the Project as a connected action to Reclamation and DWR's B. F. Sisk Dam SOD Modification Project. DWR agrees the proposed Project is an independent action to the SOD Modification Project.
- 10. The Project's additional expansion of reservoir and water loads resulting from the 10-foot raise in storage may require revisions to the SOD modification design. DWR and Reclamation have performed over a decade of analyses and exploration to design the final SOD modification for the existing dam configuration. The final SOD modification concept (berms, cutoff trench, drains)

is designed to stabilize the embankment for the loads and phreatic surface (saturation zones of embankment/foundation) associated with the current dimensions and maximum storage elevations. A new SOD stability analysis and design may be warranted and will require review by the independent consulting review board and may require additional time to the SOD modification design work. Similarly, the added height of the outlet towers and access bridge towers may require further seismic analysis. The EIR/SEIS should evaluate the new potential impacts on the underlying soils, geology, and hydrology in front of the dam resulting from the proposed Project as a result of expanded project disturbance areas (larger footprint) near the base of the dam.

11. Considering the Project may increase the dam's inundation area, the Public Services, Utilities and Hazards sections of the EIR/SEIS should analyze the potential environmental impacts of a larger inundation area below the dam.