Shasta Dam Raise Project
c/o: Kirsten Pringle, Stantec
3301 C Street, Suite 1900
Sacramento, CA 95816

VIA REGULAR & ELECTRONIC MAIL (shastadameir@stantec.com)

Subject: Notice of Preparation (NOP) for a Draft Environmental Impact Report (EIR) for the Shasta Dam Raise Project, Shasta County

Dear Ms. Pringle:

The California State Lands Commission (Commission) staff has reviewed the subject NOP for a Draft EIR for the Shasta Dam Raise Project (Project), which is being prepared by the Westlands Water District (District). The District, because it is considering becoming a cost-sharing partner with the U.S. Bureau of Reclamation (Reclamation), is the lead agency under the California Environmental Quality Act (CEQA) (Pub. Resources Code, § 21000 et seq.), and Reclamation, as the federal agency proposing to carry out the Project, is the lead agency under the National Environmental Policy Act (42 U.S.C. § 4321 et seq.). Reclamation released a Final Feasibility Report and Environmental Impact Statement (FEIS) on July 29, 2015; however, no Record of Decision has been released.

The Commission is a trustee agency for projects that could directly or indirectly affect sovereign land and their accompanying Public Trust resources or uses (Cal. Code Regs., tit. 14, § 15386). The Project is of state-wide concern and may indirectly affect downstream State sovereign lands; therefore, the Commission will act as a trustee agency for the Project.

Commission Jurisdiction and Public Trust Lands

The Commission has jurisdiction and management authority over all ungranted tidelands, submerged lands, and the beds of navigable lakes and waterways. The Commission also has certain residual and review authority for tidelands and submerged lands legislatively granted in trust to local jurisdictions (Pub. Resources Code, §§ 6009,
subd. (c); 6009.1; 6301; 6306). All tidelands and submerged lands, granted or ungranted, as well as navigable lakes and waterways, are subject to the protections of the common law Public Trust Doctrine.

Commission staff has determined that the Project will not occur on lands under the jurisdiction of the Commission. However, the Project may affect State sovereign land and resources pertaining to the Sacramento River and adjoining tributaries, and perhaps more indirectly the Delta and San Francisco Bay. On March 13, 2018, the California Secretary of the California Natural Resources Agency wrote a letter to Congressional leaders expressing opposition to the Project and referencing California Public Resources Code section 5093.542, prohibiting state agencies and departments from assisting in the Project in any way. The Commission concurs with Secretary Laird's letter. However, as a trustee agency and in the interests of ensuring a full and through analysis of Project impacts, the Commission respectfully submits the following comments.

**Project Description**

Reclamation proposes to raise Shasta Dam by approximately 6.5 feet to 18.5 feet. In the Comprehensive Plans (CP1 - CPS), dam raises of three different heights will be evaluated: 6.5 feet, 12.5 feet, and 18.5 feet. The Project has two primary objectives and five secondary objectives to optimize the water supply benefits and improve environmental water management of Shasta Dam and Reservoir:

**Primary Objectives:**

- Increase the survival of anadromous fish populations in the Sacramento River, primarily upstream from the Red Bluff Pumping Plant
- Increase water supply and water supply reliability for agricultural, municipal and industrial, and environmental purposes to help meet current and future water demands

**Secondary Objectives:**

- Conserve, restore, and enhance ecosystem resources in the Shasta Lake area and along the upper Sacramento River
- Reduce flood damage along the Sacramento River
- Develop additional hydropower generation capabilities at Shasta Dam
- Maintain and increase recreation opportunities at Shasta Lake
- Maintain or improve water quality conditions in the Sacramento River downstream from Shasta Dam and in the Delta

The Project Description identifies certain management measures that have the potential to affect lands under the Commission's jurisdiction:

- Enlarge Shasta Lake cold-water pool - All action alternatives would involve enlarging the cold-water pool by raising Shasta Dam to enlarge Shasta Reservoir.
• Modify temperature control device (TCD) - Minimum modifications to the TCD under all action alternatives would include raising the existing structure and modifying the shutter control.
• Increase conservation storage - All action alternatives would increase the conservation storage in Shasta Reservoir by raising Shasta Dam.
• Reduce demand - All action alternatives would include a water conservation program to augment current water use efficiency practices.
• Modify flood operations - Enlarging Shasta Reservoir would require adjustment of the existing flood operation guidelines, or rule curves, to reflect physical modifications, such as an increase in dam and spillway elevation. The rule curves would be revised with the goal of reducing flood damage and enhancing other objectives to the extent feasible.
• Maintain and increase recreation opportunities - Recreation is important to the Shasta Lake region; therefore, existing recreation opportunities would be maintained or increased under all action alternatives.
• Maintain or improve water quality - All action alternatives would maintain and potentially improve water quality by increasing Delta outflow during drought years and reducing salinity during critical periods, and may also provide additional operational flexibility for responses to Delta emergencies.

Environmental Review

Commission staff requests that the District consider the following comments when preparing the Draft EIR, to ensure that impacts to Public Trust resources and State sovereign land are adequately analyzed.

General Comments

1. Project Description: A thorough and complete Project Description should be included in the Draft EIR in order to facilitate meaningful environmental review of potential impacts, mitigation measures, and alternatives. The Project Description should be as precise as possible in describing the details of all allowable activities (e.g., types of equipment or methods that may be used, seasonal work windows, locations for material disposal, as well as timing and length of activities, etc.). In addition, the Draft EIR should include the maximum area of impact, including loss of land and habitat due to flooding and the volume of sediment and vegetation removed or disturbed, inclusive of impacts to any borrow sites not previously analyzed.

The Draft EIR should also include figures illustrating the change in lake levels for both preferred and alternative projects (preferably aerial overlays), so that public agencies and the public can visualize the proposed Project effects on existing land uses. In addition, the Draft EIR should include engineering plans and a detailed written description of activities. Thorough descriptions will facilitate a more robust analysis of the work that may be performed, and minimize the potential for subsequent environmental analysis to be required.
Biological Resources

2. The Draft EIR should disclose and analyze all potentially significant effects on sensitive species and habitats in and around the Project area, and if appropriate, identify feasible mitigation measures to reduce those impacts. Sensitive species include special-status wildlife, fish, and plants such as Pacific fisher, Northern spotted owl, Northern goshawk, Cooper's hawk, Purple martin, Foothill yellow-legged frog, Shasta salamander, special-status bats, mollusk species, and several rare plant populations. The District should conduct queries of the California Department of Fish and Wildlife's (CDFW) California Natural Diversity Database and U.S. Fish and Wildlife Service's (USFWS) Special Status Species Database to identify any special-status plant or wildlife species that may occur in the Project area. The Draft EIR should also include a discussion of consultation with CDFW, USFWS, and National Marine Fisheries Service (NMFS) as applicable, including any recommended mitigation measures and potentially required permits identified by these agencies.

3. Invasive Species: One of the major stressors in California waterways is introduced species. Therefore, the Draft EIR should consider the Project's potential to encourage the establishment or proliferation of aquatic invasive species (AIS) such as the quagga mussel, or other nonindigenous, invasive species including aquatic and terrestrial plants. For example, construction boats brought in from long stays at distant projects may transport new species to the Project area via hull biofouling, wherein marine and aquatic organisms attach to and accumulate on the hull and other submerged parts of a vessel. If the analysis in the Draft EIR finds potentially significant AIS impacts, possible mitigation could include contracting vessels from nearby, or requiring contractors to perform a certain degree of hull-cleaning. The CDFW's Invasive Species Program could assist with this analysis as well as with the development of appropriate mitigation (information at https://www.wildlife.ca.gov/Conservation/Invasives).

4. Construction Noise: The Draft EIR should also evaluate noise and vibration impacts on fish and birds from construction. Mitigation measures could include species-specific work windows as defined by CDFW, USFWS, and NMFS. Again, staff recommends early consultation with these agencies to minimize the impacts of the Project on sensitive species.

Climate Change

5. According to the Initial Study, it appears that Project construction would result in a potentially significant impact due to greenhouse gases (GHGs) produce during construction. A GHG emissions analysis consistent with the California Global Warming Solutions Act (Assembly Bill [AB] 32) and required by the State CEQA Guidelines should be included in the EIR. This analysis should identify a threshold for significance for GHG emissions, calculate the level of GHGs that will be emitted as a result of construction and ultimate build-out of the Project, determine the
significance of the impacts of those emissions, and, if impacts are significant, identify mitigation measures that would reduce them to the extent feasible.

Cultural Resources

6. The Project's Initial Study indicates that the Project may inundate traditional cultural properties. The FEIS prepared by Reclamation also indicated that the dam raise and reservoir expansion will have "disproportionally high" impacts on Native Americans, specifically the Winnemem Wintu Tribe. The Tribe lost most of their traditional homeland under the existing reservoir and raising the dam would have additional impacts on drowning cultural and sacred sites still used by the Tribe. Commission staff suggest that Tribal consultation be implemented as soon as possible. Details of this consultation should be included in the Draft EIR.

Recreation

7. Public Access and Recreation Impacts to the Sacramento River: Table 2.2-15a of the Initial Study attached to the NOP includes an initial assessment of public access and recreation impacts to the Sacramento River and other tributaries below Central Valley Project and State Water Project reservoirs. Commission staff encourages a robust analysis of potential impacts to public access sites, marinas, other boat launching facilities and moorings, and navigation. The analysis should consider how navigation may be constrained, improved, or more efficiently managed for the numerous bridge crossings that include moveable spans for passage of large vessels.

Mitigation and Alternatives

8. Deferred Mitigation: In order to avoid the improper deferral of mitigation, mitigation measures should either be presented as specific, feasible, enforceable obligations, or should be presented as formulas containing "performance standards which would mitigate the significant effect of the project and which may be accomplished in more than one specified way" (State CEQA Guidelines, §15126.4, subd. (a)).

An example measure taken from the FEIS, which may also be incorporated in the Draft EIR includes:

- **Mitigation Measure WQ-1: Develop and Implement a Comprehensive Multi-scale Sediment Reduction and Water Quality Improvement Program Within Watersheds Tributary to the Primary Study.**

Although the mitigation measure includes four fundamental components, there is no timing associated with the development of the Program. Would the Program be developed prior to construction of the Project? If so, how far in advance would it be prepared? Would the draft Program undergo review, and if so, by whom? Would additional environmental review be required to implement the Program?
Commission staff request that mitigation measures included in the Draft EIR more fully comply with the State CEQA Guidelines, as noted above.

Environmental Justice

9. An analysis of potential impacts associated with Environmental Justice should be presented in the EIR equivalent to what was provided in the FEIS. This analysis should include minority and low-income communities situated near the reservoir and those that directly depend on it for social, economic, cultural, historic, occupational, recreational, or other needs deemed significant by those communities.

Thank you for the opportunity to comment on the NOP for the Project. As a trustee agency, Commission staff requests that you keep us advised of changes to the Project Description and all other important developments. Please send additional information on the Project to the Commission staff listed below as the Draft EIR is being prepared.

Please refer questions concerning environmental review to Cynthia Herzog, Senior Environmental Scientist, at (916) 574-1310 or cynthia.herzog@slc.ca.gov or Joseph Fabel, Staff Attorney, at (916) 574-0964 or joseph.fabel@slc.ca.gov.

Sincerely,

Eric Gillies, Acting Chief
Division of Environmental Planning and Management

cc: Office of Planning and Research
J. Fabel, Commission
C. Herzog, Commission
N. Lee, Commission