California
WATER COMMISSION

Meeting Minutes
Meeting of the California Water Commission
Wednesday, July 20, 2022
State of California, Resources Building
715 P Street, First Floor Auditorium
Sacramento, CA 95814
Beginning at 9:30 a.m.

1. **Call to Order**

Chair Matthew Swanson called the meeting to order at 9:30 a.m.

2. **Roll Call**

Chair Swanson welcomed new Commissioner Sandra Matsumoto. Executive Secretary Kimberly Muljat called the roll. Commissioners Curtin, Gallagher, Matsumoto, Steiner, and Swanson were present in the auditorium, with Commissioner Solorio participating remotely, constituting a quorum.

3. **Closed Session**

The Commission did not hold a closed session.

4. **Approval May 18, 2022, Meeting Minutes**

Commissioner Curtin motioned to approve the May 18, 2022 meeting minutes. Commissioner Gallagher seconded the motion. All Commission members present voted in favor.

5. **Assistant Executive Officer's Report**

Executive Officer Yun presented to the California State Board of Food and Agriculture (CDFA) on June 7 about the Commission's work on water storage and drought. The State budget May revise slated $500 million for water storage in fiscal year 2025/2026. New staff telework schedules began July 1. Regarding the Commission's drought work, staff is setting up conversations with contacts in other countries and this month met with representatives from Chile. The Governor signed SB189 in June, which reenacts teleconference provisions put in place during the pandemic, extending them to July 2023. There will not be an August Commission meeting.

6. **Commission Member Reports**

Commissioner Gallagher and Chair Swanson attended the CDFA meeting on June 7.

Commissioner Solorio attended the California United Water Conference on June 23 in El Dorado County. He will need to leave today's meeting at 11 a.m. and will return at 12:30 p.m.

7. Public Testimony

There was no public testimony.

8. Consideration of Division of Safety of Dams Enforcement Regulations (Action Item)

The Department of Water Resources (DWR) Division of Safety of Dams (DSOD) developed proposed regulations to impose administrative civil penalties, punitive reservoir restrictions, and other actions to ensure compliance with California's Dam Safety Program. The Commission previously approved the regulations for submission to the Office of Administrative Law (OAL) in October 2021. DWR withdrew the regulations from OAL, made further modifications, and published the modified proposed regulations for public comment on June 20, 2022.

DSOD Division Chief Sharon Tapia provided an overview of the California Dam Safety Program and updated the Commission on the proposed enforcement regulations, and changes made, since the October 2021 meeting. DSOD modified the text for additional clarity, removing text that was either too open-ended or based on implied authority. DSOD regulates 1,239 dams and reservoirs that are non-Federally owned and operated. The downstream hazard classification of the dams includes 259 extremely high hazard, 438 high hazard, 174 significant hazard, and 368 low hazard; these classifications relate to the downstream consequences should the dam fail on a sunny day with a full reservoir and are not indicative of the condition of the dam itself.

In June 2017, Senate Bill 92 (SB92) bolstered DSOD's enforcement authority for dam safety violations to include civil penalties, property liens, and reimbursement of the Department's preparation of emergency action plans for non-compliant dam owners under Division 3, Part 1, Chapter 8 of the CA Water Code. The statute authorizes administrative enforcement but does not dictate the process, making it necessary to establish a regulatory process that is transparent, consistent, and equitable. Article 1.0 of the regulations contains provisions for DSOD to request information from owners who may have a suspected dam. Article 7.0 outlines the administrative enforcement framework. Violations include issues that can affect the safety of the dam, and an owner's compliance with the inundation map and Emergency Action Plan (EAP) requirements. DSOD will notice the violation and issue an administrative complaint. Owners may contest the complaint and request a hearing. Following the hearing, a final order is issued. Article 7.1 promotes and facilitates the fair and consistent assessment of the administrative civil penalties, which should align the violation to actual or potential public harm, deter owners from additional violations, deter the regulated community, and eliminate any economic advantage for non-compliance. Hearings will be held by DWR or the Office of Administrative Hearings (OAH); both will provide owners with due process, including established time frames for responses, the ability to contest a violation, and an option to submit a time extension with good cause.

Noteworthy modifications to the text included revising the usage of the word "may" to "shall" in many instances, removing the provisions for reimbursement of DWR costs and enforcement, clarifying who would be subject to information requests and how a suspected dam would be

determined, and adding clarifying criteria that will be considered when "may" is used in the regulation text. A 16-day comment period on the modified text received no comments.

With today's approval, DSOD will submit the final rulemaking package to OAL in August, expecting its approval in October, and implementation of the enforcement actions in early 2023.

Vice-chair Steiner asked who decides if a hearing is held by DWR or OAH and was told that DWR decides if they can do it in-house or outsource it to OAH, depending on how far along DWR is in setting up its presiding officer and hearing process. Initially, they will likely utilize OAH, though they anticipate most cases getting resolved without a hearing.

Commissioner Curtin asked if there were any regulations regarding a dam owner's financial responsibility in the case of a catastrophic event and was told that currently there are no provisions in the Water Code for dam owners to demonstrate financial assurances. He asked what the hazard classification was based on and was told that it was based on a hypothetical dam breach model and the extent of the flooding downstream, a worst-case scenario under sunny day conditions. He asked what percentage of high-hazard dams were privately owned and was told a little more than half. He asked how many dam inspectors they have and was told they currently have 81 and will be asking for additional positions for the enforcement program. Twenty to 25 members of the field engineering branch provide construction oversight, each one having 100 to 150 dams that they inspect. He asked how they prioritize the inspections and was told SB92 requires all dams, except low-hazard, to be inspected annually, but their objective is to inspect every dam every year because low-hazard dams can get out of control quickly. There are a lot of large retrofit projects in the works that will hit in the same time frame. He asked if there were any plans to expedite the regulation process and was told the rulemaking process has specific timeframes they must adhere to. Enforcement has been ongoing.

Commissioner Curtin motioned to vote to approve the enforcement regulations. Vice-chair Steiner seconded. Commissioners voted 6-0 to approve the regulations. Motion passed.

9. Six-Year Drought: California Droughts of the Past, Present, and Future Expert Panel

In support of Water Resilience Portfolio Action 26.3, to develop strategies to protect communities and fish and wildlife in the event of a drought lasting at least six years, a panel of experts presented climate science and water policy perspectives on the topic of droughts in California. CDFA Board President Don Cameron and Board Member Bryce Lundberg joined the Commission for this agenda item. Jeanine Jones, DWR Interstate Resource Manager and Drought Manager, was unable to appear and was invited to take part in a future meeting.

Dr. John Abatzoglou, Associate Professor of Climatology at the University of California, Merced, provided a data-driven approach on the ongoing drought from a climate lens, discussing the role human-caused climate change is having on modern drought in the state, and providing

insight into the potential for this drought to extend into a sixth year. California's volatile precipitation is reliably unreliable. The past three years have been the driest 36 months the state has seen in the incremental record. This drought has had its largest impact in the northern part of the state. There is a relatively narrow window for the state to receive meaningful precipitation. We are incredibly reliant on a small number of precipitation events to make or break our water year. Atmospheric rivers contribute most of the state's precipitation. As few as three snowfall events contribute most of the annual snowfall in much of the Sierra Nevada. Very few landfalling atmospheric rivers in the recent years has been a significant contributor to the precipitation deficit. Evaporative demand plays a significant role in longer-term droughts, as it increases vegetation thirst, reduces streamflow, and increases crop water demand. Rising evaporative demand is being driven by a warming climate. Drought is both a lack of supply and increase in demand. 2021 was the driest water year since 1980. "Hot drought" is a combination of higher rates of evaporative demand and lower rates of precipitation. The Palmer Drought Severity Index captures both the supply and demand curve and measures normalized soil moisture. Higher temperatures reduce the ability of mountains to hold onto snowpack. Climate change is a drought magnifier and made the 2012-2014 drought six to 15% more acute. We are currently in the worst 21-year "mega-drought," going back 1,200 years. Climate change has taken what would have been a long, dry period and made it the worst on record. Drought contributes to the escalation of fires in California's forests. The prospects for a longer duration drought are substantially high, as a warmer climate and higher demand further increase the odds of drought persistence. Extreme drought has been a staple in the state for the past decade. Ongoing drought exceeds past droughts based on some measures. Climate change increases the odds for extreme summer drought and particularly multi-year droughts.

Dr. Ellen Hanak, Vice President and Director of Water Policy at the Public Policy Institute of California, said we should think beyond six years when it comes to drought. We are in the era of the hot drought, which is changing the way runoff and snowpack behave, and changing the thirst of the atmosphere as well as our soils and vegetation. Most Californians rely on the Delta and its watershed, which supplies water to 30 million residents and almost six million acres of farmland, and is home to a unique, threatened freshwater ecosystem. Water availability and uses in the Delta watershed are changing. Inflows are changing because it has been drier, with more water depleted upstream and less reaching the Delta. Outflows are changing because in dry years, most outflow is to keep the Delta fresh enough for human uses and it is taking more water to do this. More outflow is required to protect ecosystems, but we have not stopped species decline. Dry year "safety valves" like reservoirs, exports, and emergency orders are playing a bigger role. Upstream depletions are increasing in dry years, reducing inflow. For any given amount of runoff, upstream depletions are going up. Delta flows vary greatly between wet and dry years. In 2021, 100% of runoff was used upstream and in the Delta. In 2017, 55% of runoff was uncaptured outflow. Four recommendations to better manage a warmer Delta watershed include better tracking of diversions and return flows, more realistic spring forecasting and a more streamlined curtailment process, simplifying regulations by basing them on hydrology instead of water-year types, and storing more water in wet years both above and below ground. To help our freshwater ecosystems adapt to modern droughts, we should set up

annual environmental watering plans for watersheds; invest in biodiversity strongholds; prepare for special actions such as nimble curtailments, water purchases, and conservation hatcheries; and store water for the environment. Urban areas will continue to build resilience. Small communities are more vulnerable, with fewer options. Avoiding and mitigating the effects of pumping is key. The state can help with consolidation and emergency supplies.

Public comment from Deirdre des Jardin, with California Water Research, who said the reliance on storage for meeting outflow requirements is the Water Board's curtailment process referencing Phase 8 of the Delta Water Quality Control Plan Update. Projects are managed to maximize deliveries, not to reduce the risk of being unable to meet water quality requirements.

Commissioner Gallagher asked how the Oroville Spillway emergency in 2017, which forced us to release extra water in a capture year, has affected the current drought. Dr. Hanak said the wet year of 2019 made up for it. The role of a multi-use reservoir as a drought buffer is not huge.

Chair Swanson asked what level of accuracy we could expect if forecasting beyond six years. Dr. Abatzoglou said it is a challenge to forecast even two to three months out and we are not at the state to get beyond seasonal forecasts. Bet on warm and calibrate for that.

Vice-chair Steiner said that when forward planning, purification and desalinization projects should be in the discussion. Dr. Hanak said that is exactly where urban systems are looking. A lot of planning has moved toward three things: long-term demand management, inter-connections, and alternative water supplies such as recycled water and stormwater. Brackish desal inland is something that is already up and running. It is important to do things in ways that are not too expensive.

Commissioner Curtin said the focus needs to be on how we get water into the ground. Dams that were designed for flood control must now serve drought control. Recycled water and desal would take a lot of pressure off the Central Valley Project and State Water Project so that water could be managed more effectively. He asked how the completion of the Water Storage Investment Program projects would help the management of the Delta. Dr. Hanak said on average it would add 150,000 acre-feet of water for ecosystems. He asked if there has been any thought to capturing and releasing stormwater into a system that can contain it in the ground. Dr. Hanak said the more we think about our systems together the better off we are because there are times when it is all coming down fast and there needs to be a place to put it. There is enthusiasm to do it now, but we must adapt our permitting process to make it possible.

Commissioner Gallagher said reconnecting floodplains needs to be a part of these discussions, not just increasing water, but how we use that water. Dr. Hanak said part of the challenge with Delta flows is that it has been dry. In the past decade there has been a lot of work looking at ways to get multiple benefits like flood protection, recharge, habitat, and recreational benefits.

Mr. Cameron said now is the time we should be aligning ourselves with the Governor's water resiliency program. He supports on-farm recharge and groundwater storage, says we need nimble curtailments, and to be prepared for the kind of events we will be seeing in the future. On the flip side, we need to be ready for the floods The permitting process is difficult where it should be quite simple.

Mr. Lundberg said we have new needs and new challenges. We need to be prepared and we need to have plans. We need to engage, not just locally but across California. We need to think about the whole state. He asked about the use of permanent salinity barriers and Dr. Hanak said they stop salt water from getting too far into the Delta. The recommendation is to consider a permanent operable barrier. What needs to be studied is the potential for harmful algal blooms and other ecosystem issues, and what would happen if export pumping were higher. He asked Dr. Abatzoglou if he should keep the FEMA flood insurance since he lives on Butte Creek and was told they expect hydrological extremes such as floods to become more prominent.

Commissioner Matsumoto asked Dr. Hanak to speak more to ecosystem recovery and how might we explore creating biodiversity strongholds. She was told biodiversity strongholds are places that have adequate habitat and cold water that fish can use, places where dams are not blocking access to cold water. Nimble curtailments and water compensation programs can be helpful. Making strategic decisions based on your annual water plan and being extra conservative on water releases are ways to help ecosystem recovery.

10. Water Storage Investment Program: Request to Increase Early Funding Award Amount (Action Item)

In February 2022, the Commission voted to adjust the Maximum Conditional Eligibility Determinations (MCEDs) of all projects in the Water Storage Investment Program (WSIP) to account for inflation. WSIP projects may receive up to five percent of a project's MCED as an early funding award to pay for completion of environmental documentation and permits. The Commission considered a request from Southern California Water Bank Authority (SCWBA), project proponent for the Willow Springs Water Bank Conjunctive Use Project (WSWB), to increase its early funding award amount to five percent of the new MCED.

WSIP Manager Amy Young provided some background on early funding and explained that it is a portion of the overall MCED, not an addition to it. Based on the inflation adjustment to SCWBA's MCED, they are eligible for an additional $1,643,444 in early funding. Since the execution of the early funding agreement in 2021, the State has reimbursed SCWBA four invoices totaling $1.2 million, roughly 25% of their early funding amount, and enough remains to cover environmental documentation, permits, and feasibility and technical studies. Staff is unclear on the need for the increase based on the pace of invoicing so far. The Commission risks stranded investment if the project does not make it to final award.

Mark Buehler, General Manager of SCWBA, said the WSWB is an adjudicated basin that ensures objective management by the watermaster. They plan to pre-deliver water from the San Luis

Reservoir into the WSWB where it cannot spill or evaporate. The empty space in the reservoir can be used to capture water for ecological benefit or exchange. In dry years, pulse flow releases from Oroville will aid salmon migration.

Dr. Kwabena Asante, Senior Hydrologist with GEI Consulting, said the public benefits of the project include adding water to the Feather River for juvenile Chinook salmon, and providing emergency water storage for communities along the California Aqueduct during future Delta supply failures. Early funding so far has been spent on progress reports, scheduling and invoicing, working with agencies on public benefit contracts, CEQA coverage for local infrastructure, a feasibility study, ecosystem water operations plan, and emergency response operations plan. Additional early funding will reduce uncertainty in planning and accelerate the design process to support permitting. Remaining funds will cover preliminary design, contracts for public benefits, water quality monitoring, and the pulse flow CEQA.

Vice-chair Steiner asked if some of SCWBA's plans for the funds qualify as early funding expenditures. Ms. Young said early funding can be used for any activities reasonably related to completing environmental documentation and the permitting process. Sometimes design is needed to apply for permits. As staff receives invoices, they look to be sure the work fits into the scope of work in the funding agreement.

Commissioner Curtin asked if the project expects to expand on the 320-acre percolation pond. Mr. Beuhler said yes, they plan to expand to a 1,000-acre percolation pond with 30 new wells. There is a lot of capacity to put water into the ground. A large on-site reservoir is needed to extract the water out of the ground. There are plans to incorporate hydropower on the site, which requires additional permitting. He asked when they think they will be up and running and was told they could start storing water this year if they had all the agreements in place.

Commissioner Matsumoto asked how this increase would "reduce uncertainty" as stated in the presentation. Mr. Beuhler said they cannot sign a contract for the full amount of the work until they know they have the money in hand and want to be able to plan the whole process out and make sure the contracts are large enough to get the entire job done.

Commissioner Curtin motioned to vote on an early funding increase of $1,643,444 that would bring their total early funding award to 5 percent of the project's current MCED. Vice-chair Steiner seconded. Commissioners voted 5-0 to approve the early funding increase. Motion passed. Commissioner Solorio was not present for the vote.

The Commission took a lunch break at 12:06 p.m. Commissioner Curtin left the meeting.

11. Water Storage Investment Program: Road to Final Funding

WSIP Manager Amy Young presented an overview of the program's remaining process from now until the WSIP projects' final award hearings, including project timelines, opportunities for Commission interaction with applicants, and remaining Commission discretion and decisions.

All applicants are currently working on Proposition 1 requirements, all on separate timelines. Commissioners will review the contracts for the administration of public benefits (CAPBs) before being finalized by the administering agencies. It will not be an approval, but an opportunity to comment. CAPBs will come after environmental documents and permits have been obtained. Applicants and the administering agencies will be available to answer questions. Once all Prop. 1 requirements are obtained, applicants will submit the materials to Commission staff and request a final award hearing.

Staff is looking for direction from the Commission on site visits, which would take place prior to the final award hearing. Because the *ex-parte* policy is in effect, if all Commissioners go on a site visit, it becomes a public meeting. A visit by a sub-committee would still be a public meeting but easier to coordinate. A single Commissioner acting as an envoy would not be considered a public meeting. A virtual tour could be assembled by the applicant and presented at a Commission meeting.

In September, the administering agencies will present to the Commission information on the CAPB process.

Before the first final award hearing, staff will brief the Commission on the details.

Public comment by James Crowder, with Soluri Meserve, representing Stop the Pacheco Dam Coalition, who said the Pacheco Reservoir Expansion Project has not and will not be able to meet the requirements for the final funding award. The project's costs have continually risen since the initial feasibility and the construction timeline will likely be substantially delayed. The Commission should rescind its funding. Valley Water should have updated the Commission regarding the project's increased cost and extended construction timeline. Given how little Valley Water has been able to accomplish on this project, it is hard to imagine the costs will not continue to skyrocket and further diminish the feasibility of this project. Additionally, DSOD recently determined the Pacheco Dam as designed is not feasible.

Vice-chair Steiner asked how Kern Fan can start construction ahead of the final award hearing, and Ms. Young said they are welcome to start constructing at any time at their own risk.

Chair Swanson and Vice-chair Steiner both support virtual tours over in-person tours.

Commissioner Matsumoto asked if there was a way to dig deeper into the public benefits of the projects. Ms. Young said a good time could be when the CAPBs come before the Commission.

Chair Swanson said we will be weighing in on all of the statutory requirements before approving any funding. Staff can help get you up to speed on the public benefits.

Commissioner Solorio is very interested in visiting all the sites in person, whether as a sub-committee or an envoy. There is a sense of urgency to move things along, and as the drought

continues there will be increased pressure on us to keep the projects on track. The more we know about these projects will be a benefit to us individually and collectively.

Chair Swanson said whatever we do needs to be timely and not get in the way of any applicant moving forward. He asked if staff could create a mechanism that allows site visits for those who want to that does not violate the *ex-parte* policy. Legal Counsel Holly Stout said the *ex-parte* policy mandates that you must be acting as a Commission. An envoy would need to have a clear idea of what the purpose of the visit would be and would need to be limited to the WSIP public benefits, not the broader benefits to society as a whole. The best option is to put it on a future meeting agenda for discussion with the entire Commission.

12. Consideration of Items for Next California Water Commission Meeting

The Commission will not meet in August. The next meeting of the Water Commission is currently scheduled for Wednesday, September 21, 2022, when the Commission will hear an informational presentation for the third group of landholdings being considered for Resolutions of Necessity for the Big Notch Project.

13. Adjourn

The Commission adjourned at 1:32 p.m.