Sacramento River Temperature Task Group (SRTTG) Meeting

Thursday, May 23, 2019 | 1:00 pm – 3:00 pm

Meeting Summary

Participants

Craig Anderson, USFWS
Miles Daniels, NMFS
Crystal Davis, CDFW
Vadim Demchuk, SWRCB
Kyle De Juilio, Yurok Tribe
Charlie Chamberlain, USFWS
Randi Field, Reclamation
John Hannon, Reclamation
Mike Harris, CDFW

Matt Johnson, CDFW
George Kautsky, Hoopa Valley Tribe
Liz Kiteck, Reclamation
Kenneth Kundargi, CDFW
Duane Linander, CDFW
Alessia Siclari Melchor, SWRCB
Mary Suppiger, Reclamation
Craig Williams, SWRCB
Mike Wright, Reclamation

Key Discussion Topics with Summary of Outcomes and Agreements

Meeting Purpose and Overview

Members of the Sacramento River Temperature Task Group (SRTTG) are provided status updates on Sacramento River seasonal temperature targets and anticipated performance. In addition, the Sacramento River Temperature Management Plan is developed and monitored as part of State Water Board Order 90-5 and the NMFS Biological Opinion Reasonable and Prudent Alternative (RPA) actions.

Fishery Updates

Matt Johnson from CDFW provided an update of current activities. Matt confirmed collection of 33 winter run carcasses through May 22nd and emphasized this represents just 2.5% of the expected run and that it is very early in the season. The second aerial redd survey flight is scheduled for tomorrow, May 24th. The first aerial redd survey flight reported difficulty in visibility due to turbid water, however no shallow redds were observed. The ground crew is also looking for shallow redds and detected no redds in the riffles; two redds were found near River Mile 296 and all redds were above the CCR gage station.

Jim Smith from USFWS was unable to attend, however Jim provided an update of the Livingston Stone Fish Hatchery activities via e-mail prior to the meeting, that e-mail is attached. No other information was available.

Draft Temperature Management Plan

Jeff Rieker from Reclamation was unable to attend the meeting, however, Randi Field from Reclamation provided a few notes on Jeff's behalf. Reclamation submitted the 2019 Draft Temperature Management Plan (Plan) to NMFS on May 13th and NMFS provided a response on May 15th. Reclamation also submitted the Plan to the SWRCB on May 15th. Reclamation had not yet received a response back from the SWRCB, but as discussed at today's meeting the SWRCB plans to

respond to Reclamation. Jeff is also appreciative of the participation of the SRTTG members in the development of the Plan and optimistic about the temperature performance this year.

Hydrology and Operations Update

See Meeting Agenda and Handouts for reference materials.

Randi Field from Reclamation reviewed system operations, temperatures, trends, Lake Shasta isothermal baths, Lake Shasta cold water pool volume, and the Shasta Temperature Control Device (TCD) configuration.

Precipitation is stealing the headlines for the month of May with well above average precipitation and snow accumulations for most of California. Shasta Lake still is no longer encroached into the flood control space, however due to the increased inflows, storage is at 97% of capacity. Future operations are expected to manage storage refill and Keswick releases are expected to increase at the beginning of June (projected in the Operations Outlooks). Warming conditions are also expected in the near future.

Temperature Management

See Meeting Agenda and Handouts for reference materials.

Active temperature management began May 8th; releases from Shasta Lake are now made from Upper Temperature Control Device (TCD) gates and one Middle gate. In-river temperatures have been warm at the beginning of the month and relatively cool recently with the TCD gate change.

The most recent Shasta Lake temperature profiles suggest the cold water pool volumes are still above average for similar historic time periods. Conditions appear to be plentiful for future temperature management.

Preliminary modeling continues to show promising results. Similar to previous months, May consistently indicate warming in the farther reaches. It is suspected that modeled warming side flow "events" warm water below Keswick which can't be controlled early in the season. Remaining months appear to manage temperatures at or below 56°F at BSF and at or below 53.5°F at CCR. Cold-water-pool volumes and temperature management performance (e.g. TCD side gate timing) continue to suggest extremely favorable temperature performance this year.

Additional Topics

- George Kautsky raised a concern that Trinity River ROD flows were struggling for flow variability due to limitations of the Lewiston equipment/facility.
- Charlie Chamberlin provided an update on Clear Creek. Flows downstream of the dam are turbid and has interfered with the snorkel surveys.
- Matt Johnson was interested in an explanation of what appears to be a three-hour flow reduction in the Sacramento River below Keswick Dam on May 22nd.
- Miles Daniels requested a status update on the outage at monitoring station SHD.

Addendum

- On May 22nd, Reclamation's operators were attempting to manually adjust the Keswick gates
 while all of the system servers were offline for planned server replacement and rebooting.
 Keswick releases lagged for two hours approximately 3,000 cfs as a result of a disparity
 between local and downstream (USGS) observations until operations staff could recover and
 re-adjust Keswick gates.
- The SHD monitoring station is not operable due to a loss of the sensors and failure of the

sensor housing as a result of high flows released from Shasta Dam this year. A request to engineering design for repair has been submitted, an estimated return is still yet to be determined. Low Shasta Dam flows will likely be required for repairs.

Next Meeting

The next SRTTG meeting is scheduled for 1:00 pm., June 27, 2019, at the Northern California Area Office at Shasta Dam.