2021 non-treaty Columbia River fisheries and upriver summer steelhead update

Staff reviewed multiple handouts with additional background, pre-season planning process, actions, wild upriver summer impacts, temperatures, and stock status information during the August 27 and September 16 Joint State Columbia River Salmon Fishery Policy Review Committee meetings.

Stock status updates

The cumulative upriver summer A-/B-index steelhead passage (July through October) at Bonneville Dam (67,752) is the lowest on record since 1938, and the cumulative unclipped passage (23,525) is the lowest since clipped/unclipped counting began in 1994.

The *U.S. v. Oregon* Technical Advisory Committee (TAC) meet weekly and reviewed information for the summer steelhead run. TAC most recently met on October 4 and is the last update for the year until run reconstruction is completed in 2022. Based on AFF sampling and 5-year average run timing, total A-Index steelhead passage is expected to be 57,000 fish (clipped = 35,600, and unclipped = 21,400) and total B-Index steelhead passage is expected to be 10,500 fish (clipped = 8,600, and unclipped = 1,900). Unclipped steelhead will be parsed into wild and hatchery unclipped components post season after the genetic data are analyzed.

Table 1. Actual return in 2020, 2021 preseason forecast, and catalog of available weekly TAC run size updates for 2021. NA indicates not available.

	Total A/B	Wild A/B	A Total	A Wild	B Total	B Wild
2020 Actual	107,591	33,410	75,392	28,132	32,199	5,278
2021 Forecast	96,800	28,500	89,200	27,500	7,600	1,000
TAC update 8/16			35,000	NA	NA	NA
TAC update 8/23			35,000	NA	NA	NA
TAC update 8/30			42,600	16,900	NA	NA
TAC update 9/7			47,900	17,300	NA	NA
TAC update 9/13			52,600	19,200	NA	NA
TAC update 9/20	63,600	NA	53,500	NA	10,100	NA
TAC update 9/27	65,500	NA	54,700	NA	10,800	NA
TAC update 10/4	67,500	NA	57,000	NA	10,500	NA

Current Columbia River Temperatures

Beginning in early June, Columbia River temperatures (as measured at Bonneville Dam) began to rise above the recent 10-year average (Figure 1). Above-average water temperatures continued through mid-August. Temperatures in June and most of July did not reach the levels observed in 2015 which was another drought year. However, several historically high ladder/forebay temperatures were observed during several days in August. Temperatures since the second half of August have continued to be at or below average.

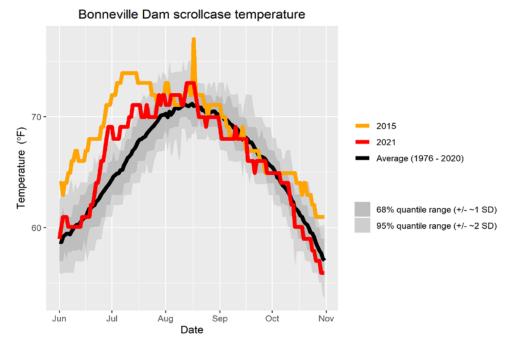


Figure 1. Water temperature June – November as measured at the Bonneville Dam scrollcase gauge. Temperature was 56°F on October 31, 2021.

Steelhead in-season modifications (to date)

- Drano Lake (closed to angling for and retention of steelhead): Boat angling closure within a sub-area of Drano Lake near the Little White Salmon River mouth beginning August 25 and was further modified to close all angling within the same sub-area September 4 through October 8.
- Wind River: Closed to all angling above Shipherd Falls beginning September 16.
- Snake River (and WA tributaries):
 - Closed to angling for and retention of steelhead downstream of Lower Granite including the tributaries beginning September 3.
 - o Reduced steelhead limit to 1 upstream of Lower Granite Dam to achieve concurrency between Idaho/Oregon/Washington.
 - o WDFW reduced steelhead limit to 1 within the Grand Ronde.
 - Impacts are covered in a separate Biological Opinion.
- Deschutes River: Closed to all angling from the mouth to Moody Rapids through September 30 and closed to angling for and retention of steelhead from Moody Rapids upstream to Sherars Falls on September 1.
- John Day: Closed steelhead retention downstream of Tumwater Falls and to angling for and retention of steelhead upstream of Tumwater Falls on September 1.
- Umatilla and Walla Walla rivers: Closed to angling for and retention of steelhead on September 1.
- Late Fall Zone 4/5 commercial fishery was adopted to begin later than planned preseason.

Other Actions

Hydrosystem: In late October, litigants on the Columbia River System Operations Biological Opinion, announced an agreement that details 2022 operations for the Federal Columbia River System. The agreement mainly focuses on additional spring spill, though does include fish protections outside this window including implementation of the Hydro System Operations Request (SOR) that was submitted to the Action Agencies by regional fish managers limiting the use of zero flow operations at lower Snake River dams to winter periods when fewer anadromous fish are present. As part of the agreement, the parties also agreed to stay their litigation on hydro system operations until July of 2022. The agreement provides a compromise while the parties work together to develop and begin implementing a long-term comprehensive solution that allows for broad-sense recovery of ESA-listed fish and protection for tribal rights in the Columbia River Basin while ensuring regional prosperity is not compromised.

Also, in late October, Washington Senator Patty Murray and Governor Jay Inslee announced a joint federal-state process to determine if the benefits provided by the Lower Snake River Dams (Ice Harbor, Lower Monumental, Little Goose, and Lower Granite) can be replaced in a way that could support dam breaching as a potential salmon recovery strategy. The process is anticipated to be completed in July 2022, and the Governor and Senator will present their recommendations, and work with relevant parties on next steps.

Pinniped Management: Co-managers this year have removed 34 pinnipeds (13 Steller sea lions (SSL) and 21 California sea lions (CSL)) at Bonneville Dam during the Spring 2021 management season. Pinniped management at Bonneville this fall began on September 13th and is on-going through November 19th. Through November 4, a total of, 17 SSL have been removed. Pinniped abundance at the dam remained unchanged, with ~25 Steller sea lions present. Of note is that fall management focuses solely on SSL, as CSL do not move that far up the river this time of year.

Pikeminnow Management: Our pikeminnow sport reward fishery began in April of this year and was extended through October 17. Exploitation is targeted between 10-20% of the pikeminnow population in the Columbia River Basin, which has been achieved for almost all of the program's 30-year history.

2022 North of Falcon (NOF): Pre-season forecasts of the 2022 summer steelhead runs are expected to be made available by early March in time for discussions with the public during NOF to determine what actions may be needed to protect upriver steelhead. Previous NOF steelhead discussions have focused on the need for action and shared contributions in achieving the goals of keeping wild summer steelhead impact rates below the allowable levels. Public meetings during 2022 are expected to be conducted similarly as they occurred in 2021 but it is too early to determine if they will be held in-person. For reference, two virtual NOF public meetings were held in 2021 by WDFW and ODFW to discuss summer and fall Columbia River fisheries planning and WDFW developed an online video/presentation specific to the mid/upper Columbia and Snake river areas to gather additional public input.