

JOINT TESTIMONY FROM THE WESTERN WASHINGTON TREATY TRIBES

The Western Washington Treaty Tribes are concerned with the recent forecast performance for the Oregon Production Index Area Hatchery (OPIH), which is largely composed of Columbia River early and late coho hatchery stocks. Since 2015, there has been an overforecast in five out of the last six years (Figure 1). In two of those years (2015 and 2019), the preseason estimate was more than three times higher than the postseason return (a difference of more than 500,000 coho in each year). For example, in 2015, the preseason abundance prediction was 808,400 coho compared to the postseason estimate of 251,700 coho (PFMC 2021). In 2019, the preseason abundance prediction was 933,000 coho compared to the postseason estimate of 300,500 coho (PFMC 2021). The scale of these overestimates affects North of Falcon preseason modeling efforts.

Salmon run forecasts are used during preseason planning to determine ocean quotas, Pacific Salmon Treaty (PST) management unit status categories and corresponding exploitation rate ranges. When a large stock aggregate, such as OPIH, returns at lower than forecast abundances it affects the exploitation rates of co-migrating stocks.

In Washington, the tribes are most concerned with preterminal (ocean) impacts on Queets, Snohomish & Strait of Juan de Fuca natural coho stocks. In 2018, the National Marine Fisheries Service declared these stocks overfished and they are currently under rebuilding plans. This management response was triggered as a result of low escapement in 2015.

Internationally, the U.S. has an obligation to meet the provisions of the Southern Coho Management Plan adopted by the Pacific Salmon Commission. In 2019, southern U.S. fisheries exceeded the allowable exploitation rates (ER) associated with multiple postseason abundance categories, including the U.S. Interior Fraser Cap (the ER was 13.3%; the cap is 10%). The PST postseason coho analysis referenced lower than forecasted abundances for the Columbia River early and late hatchery stocks as a likely factor in the overage, in addition to environmental variables.

The 2021 OPIH forecast is 1,607,900—a return this high hasn't been seen in over twenty years (PFMC 2021). Alternatively, the 2021 forecasts for Washington coast natural coho stocks (Quillayute, Hoh and Queets Rivers) are the lowest preseason estimates since 2016. If the Columbia River early and late hatchery coho returns do not meet expectations then planned ocean fisheries would have a higher impact on natural stocks. This could exacerbate the natural coho issues mentioned in this statement and result in unforeseen consequences. We urge a precautionary management approach when developing 2021 coho fisheries.

Under this agenda item, we recommend Council discussion regarding the potential for an OPIH Methodology Review by the Science and Statistical Committee (SSC) over the next year. As described in detail above, the scale of the OPIH overforecast in recent years is concerning and

the relative impact it has on ocean fishing opportunity, stocks of concern and the preseason modeling process.

We believe a methodology review is appropriate based on the language in Council Operating Procedure 15, which states the SSC is responsible for reviewing “forecasting methods for major PFMC stocks” and states “the review of current and proposed methodologies for abundance and harvest projection... is intended to provide peer review of the technical estimation and modeling procedures, to ensure the best and most objective technical analyses possible, to minimize confusion during the preseason option development process, and to resolve disputes over methodology”.

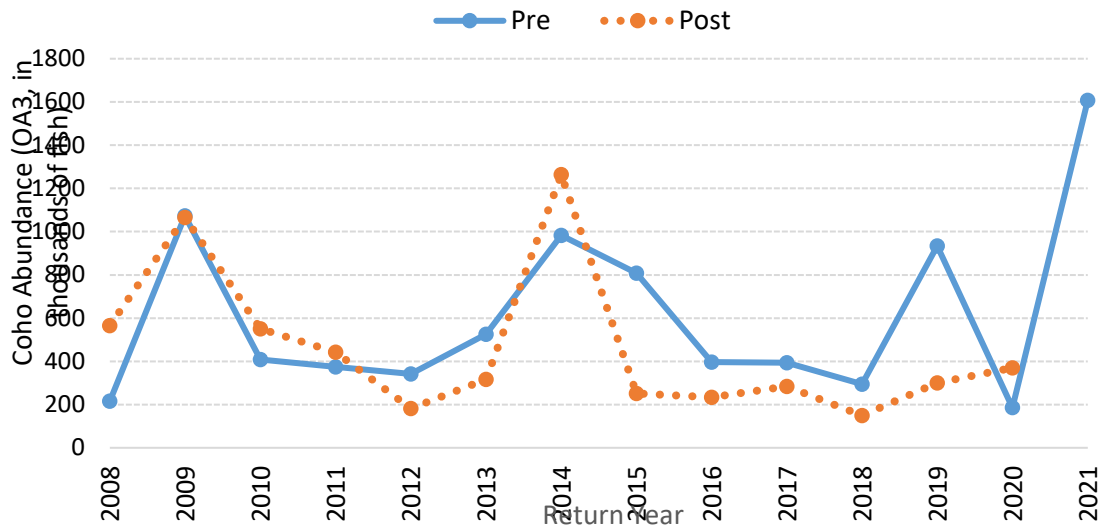


Figure 1. Preliminary preseason and postseason coho stock abundance estimates for Oregon Production Index Area Hatchery in thousands of fish (PFMC 2021; Table III-1).

References

Pacific Fishery Management Council. 2021. *Preseason Report I: Stock Abundance Analysis and Environmental Assessment Part 1 for 2021 Ocean Salmon Fishery Regulations.*

<https://www.pcouncil.org/documents/2021/03/2021-preseason-report-i.pdf/>

Pacific Fishery Management Council. 2008. *Council Operating Procedure 15: Salmon Estimation Methodology Updates and Review.*

<https://www.pcouncil.org/documents/2019/09/cop-15.pdf/>