

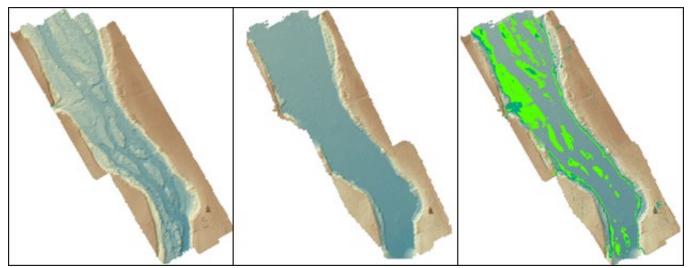
# Russian River Biological Opinion Update - February 3, 2025

Sonoma Water is continually planning and implementing the Russian River Biological Opinion requirements. Below is a brief synopsis of the current work. For more detailed information, please visit SonomaWater.org.

## **Dry Creek Habitat Enhancement Project**

#### **Habitat Monitoring and Maintenance**

Sonoma Water environmental staff are processing and analyzing data to evaluate and rate habitat enhancement reaches monitored in 2024. Staff evaluated 14 newly and previously constructed reaches to quantify habitat areas meeting desired conditions, and to identify maintenance needs. Methods include collecting bathymetric data with survey equipment, measuring water depth and velocity, recording aquatic habitat types and characteristics, collecting topographic data and aerial photography with drones, and monitoring fish use using pit tags and fish surveys. For the first time this year, staff used a drone with a LiDAR sensor to collect topographic data, as well as information on upper- and mid-level riparian canopy. The drone will also be used to characterize and quantify salmonid winter habitat.



Data collected using drone with LiDAR sensor showing topography and water surface elevation within Dry Creek Reach 4 at 115 cfs (left panel), 4300 cfs (middle panel), and potential salmonid winter habitat (right panel, light green polygons).

Sonoma Water Environmental staff are currently working to obtain long-term programmatic permits covering maintenance work for the next five years. Maintenance in the Reach 8 area to address sedimentation impacts, is expected to occur during the 2025 work season.



Aerial photograph of Reach 8 shortly after project implementation in 2018 (left panel, red rectangle shows unobstructed inlet). Ground photo of inlet in 2025 (right panel) showing sediment deposition, potentially obstructing inlet at lower flow. Maintenance would address impact of inlet sedimentation.

### **Public Outreach**

The annual meeting on the Russian River Biological Opinion will be held after a new Biological Opinion is issued.

## Fish Monitoring

Each fall and winter, Sonoma Water conducts spawner surveys to document the number and distribution of adult salmon and steelhead spawning in the Russian River Watershed. Once fish spawn, they leave a tell-tale depression in the streambed (called a redd) that indicates the location where the female deposited her eggs. By walking along tributary streams where coho and steelhead are likely to spawn, we count redds and measure them which allows us to estimate the number of coho salmon and steelhead redds each season.



Female coho salmon digging a redd in Willow Creek.

Thus far in 2025, we have observed more coho salmon redds than any other year since we began conducting spawner surveys in 2014. Though the coho spawning season is not yet over, we have already observed nearly twice as many coho redds this season (234) as our previous high count (120) during the 2021/22 season.

## **Russian River Estuary Management Project**

The mouth of the Russian River is open as of January 22, 2025. Fisheries, pinniped baseline, and water quality monitoring are complete for the season. Pinniped baseline surveys will begin again in mid-March, coinciding with the harbor seal pupping season. Fisheries and water quality monitoring are scheduled to begin in the late spring, depending on weather and river flow conditions.

## **Interim Flow Changes**

On August 20, 2024, Sonoma Water filed new temporary urgency change petitions with the State Water Resources Control Board (State Water Board) requesting that storage thresholds at Lake Mendocino be used as the hydrologic index for determining minimum instream flow requirements in the Russian River and Dry Creek starting November 1, 2024. Sonoma Water filed similar petitions in October of 2023, which the Division issued an order approving in December 2023. The State Water Board issued the Order approving the temporary urgency change petitions for a 180-day term. Based on the storage thresholds, the Russian River continues to be in a *Normal* water supply condition as of February 1. The water supply condition will be reassessed using the storage thresholds on March 1.

## **New Biological Opinion**

Sonoma Water and the U.S. Army Corps of Engineers (USACE) are in consultation with the National Marine Fisheries Service (NMFS), and California Department of Fish and Wildlife (CDFW) for the next Biological Opinion (BO). Implementation of projects and monitoring required by the 2008 BO will continue until a new BO is issued.