

EXECUTIVE OFFICER'S REPORT

North Coast Regional Water Quality Control Board
April 15, 2021

Drought Planning and Response Bryan McFadin

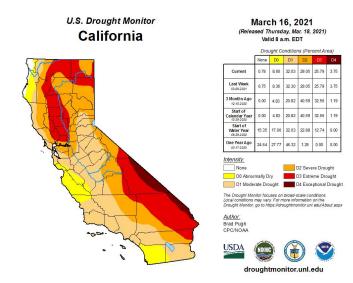
Water year 2021 is shaping up to be another very dry year, following on the similarly dry water year 2020. Precipitation levels are less than half of normal across much of the North Coast Region. The northern Humboldt and Del Norte coastal areas have fared slightly better but are still well below normal. Now in April with the wettest months already past, the likelihood of making up current deficits is very low. The State Water Resources Control Board (State Water Board) issued a press release on March 22, 2021 announcing its concerns about potential water shortages with a call for water conservation and planning. It also mailed early warning letters to each of the state's approximately 40,000 water rights holders recommending each water right holder to identify practical actions to increase drought resilience, such as increasing water conservation measures, reducing irrigated acreage, managing herd size, using innovative irrigation and monitoring technologies, or diversifying the water supply portfolio. The State Water Board will be relying on water right holders for accurate and timely water usage data and will engage more frequently over the year, if dry conditions worsen.

For more information on current precipitation conditions across the state see:

https://www.cnrfc.noaa.gov/awipsProducts/RNORR4RSA.php.

Streamflow Levels around the Region

North Coast Regional Water Quality Control Board (Regional Water Board) staff are collaborating with agency partners on efforts to respond to the ongoing drought conditions throughout the region. Regional Water Board staff convene a regular meeting attended by staff from the State Water Board Division of Water Rights, California Department of Fish and Wildlife, National Marine Fisheries Service, and Sonoma County to share information, coordinate monitoring, and collaborate on efforts to address instream flow issues.



https://droughtmonitor.unl.edu/data/png/current/curren

For the past few months this group has been preparing for drought conditions this summer, specifically focused on outreach, permit streamlining, and sharing information on projects to augment low stream flows. Staff are

-2-

currently developing and will be distributing informational flyers to increase drought awareness. A separate informational flyer on the use of near-stream water supply wells is also under development. This flyer will provide information to increase awareness of possible impacts on streams from the use of near stream wells, provide suggestions for minimizing those impacts, and highlight available resources for assistance and further information.

One specific tool available to support threatened and endangered salmonids during extreme low flow conditions is flow augmentation, using stored water. Regional Water Board staff are collaborating in an effort led by the National Marine Fisheries Service to develop a safe harbor process for streamflow augmentation projects that seek to release water stored in ponds and reservoirs to increase survival of rearing salmonids in key streams. This effort seeks to remove regulatory barriers to these habitat enhancement projects while providing standards to safeguard resources.

In other venues, Regional Water Board staff remain in coordination with the Division of Water Rights and others to respond to critically low streamflow conditions in the Scott. Shasta. Eel. and Russian Rivers. In the adjudicated Scott and Shasta River basins, staff are leading discussions with multiple stakeholders on appropriate funding and regulatory responses. In the Eel and Russian River basins, staff are participating in regular coordination meetings regarding the management of Lake Pillsbury and Lake Mendocino, which are at critically low storage levels entering the dry season. PG&E has filed a request with the Federal Energy Regulatory Commission for a drought variance to reduce flows from Lake Pillsbury to match outflows with low storage levels. Sonoma Water submitted a temporary urgency change petition (TUCP), approved by the State Water Board,

¹ The <u>Listing Policy</u> (Water Quality Control Policy for Developing California's Clean Water Act Section 303(d) List) defines "readily available data" as data that can be submitted to the California Environmental Data Exchange Network (CEDEN) or its successor database, as directed in the notice of solicitation. If CEDEN is unable to accept a

that allows for a drastic reduction in Lake Mendocino releases to preserve water through the dry season. Additional TUCPs are likely to be filed by Sonoma Water as the dry conditions and low streamflows worsen, with the need for difficult balancing between 1) municipal, domestic and irrigation water needs; 2) minimum streamflow conditions to support survival of aquatic life; and 3) protection against water quality impacts such as eutrophication and cyanobacteria blooms.

Update on Surface Water Quality Assessment - The 2018 305(b) and 303(d) Integrated Report

Mary Bartholomew

California combines the 305(b) Surface Water Quality Assessment (305(b) Assessment) and the 303(d) List of Impaired Waters (303(d) List) into a single process known as the Integrated Report, satisfying the requirements of both sections of the federal Clean Water Act. The 305(b) Assessment is a comprehensive review of all "readily available" surface water data in the Region, resulting in a determination of whether beneficial uses in a waterbody are supported. If any assessed beneficial uses are not supported, the waterbody and pollutant pair are placed on the 303(d) List. This combined report is submitted to USEPA for approval of the 303(d) List. Placement on this list generally triggers development of a pollution control plan called a total maximum daily load (TMDL) for each waterbody-pollutant pair on the list.

Following a public review process the State Water Resources Control Board adopted the 2018 Integrated Report on October 20, 2020,

particular subset of data, the State Water Board or the Regional Water Board will accept that data and information if it meets the formatting and quality assurance requirements detailed in section 6.1.4 of the Policy and the notice of solicitation for the current listing cycle.

which includes changes to the North Coast Regional Water Board's 303(d) List. The statewide 2018 Integrated Report was submitted to USEPA on February 11, 2021.

Tables of the new North Coast proposed listings and delistings for the 2018 Integrated Report cycle are shown below in Tables 1-6 (see Tables starting on Page 15). Two waterbodies were delisted in this cycle, including the Upper Little South Fork Elk for sediment and major portions of the Redwood Creek watershed for temperature. There were 19 new listings for metals, including two for copper in the Smith River and 1 for mercury in Plaskett Lake in the Eel River basin. There were also 5 new indicator bacteria listings on Mendocino County beaches and 7 new conventional pollutant and total dissolved solids listings affecting portions of the Eel, Russian and Smith rivers. Table 7 provides a summary of the entire proposed 2018 303(d) List for the North Coast Region, which is also available on the North Coast Reginal Water Board's webpage at:

https://www.waterboards.ca.gov/northcoast/water_is_sues/programs/tmdls/303d

Those waterbody-pollutant pairs listed in Table 7 as category 4a are those whose impairments are being addressed by an approved TMDL.

In the North Coast Region's 2018 Integrated Report, Regional Water Board staff initially recommended 303(d) List revisions for indicator bacteria in the Russian River hydrologic unit that aligned with the extent of impairment and pollution identified in the Russian River Pathogen TMDL (TMDL) adopted by the Regional Water Board on August 14, 2019. Public comment on the proposed 303(d) list revisions for the Russian River led State Water Board staff to recommend (which the State Water Board endorsed) that the State Water Board consider approval of the Russian River Pathogen TMDL prior to consideration of revised 303(d) listing of waters in the Russian River for indicator bacteria. This sequencing of actions is designed so the State Water Board can more fully understand the scope and approach of the analytical work conducted in the Russian River

through TMDL studies. A reevaluation of the data in consideration of public comments on the proposed 303(d) list and the schedule for bringing the TMDL to the State Water Board for approval is described in the next article in this EO Report.

The result of this approach is that indicator bacteria listings in the Russian River hydrologic unit from the 2014/2016 303(d) List will remain unchanged and will be revisited once the State Water Board has held a hearing to consider approval of the Russian River Pathogen TMDL. The current indicator bacteria listings include Green Valley Creek watershed, Laguna de Santa Rosa, Santa Rosa Creek, and segments of the Geyserville and Guerneville hydrologic subareas of the Russian River.

Update on the Adoption of the Russian River Pathogen TMDL

Lisa Bernard

In August 2019, the North Coast Regional Water Board adopted Resolution R1-2019-0038, which amended the Water Quality Control Plan for the North Coast Region (Basin Plan) to include the Action Plan for the Russian River Watershed Pathogen TMDL (Action Plan). The Action Plan summarizes the findings of the Total Maximum Daily Load (TMDL) analyses conducted across the Russian River Watershed to address pathogen pollution and listings of the Russian River on the Clean Water Act Section 303(d) list of impaired waters [303(d) list]. These analyses and the results are reported in the 2019 Staff Report for the Action Plan for the Russian River Pathogen TMDL (Staff Report).

The Regional Board's adoption of the Action Plan must be approved by the State Water Board and the Office of Administrative Law (OAL) before it is implemented as state regulation. It has not yet been brought before the State Board for approval, due to: 1) a delay associated with the requirement to make all documents posted to the web to be accessible

(i.e. compliant with the Americans with Disabilities Act); and 2) Regional Water Board staff redirection to support State Board staff with the State Board's October 2020 adoption of the 2018 Integrated Report and 303(d) listing of impaired waters.

As reported in the previous article, in October 2020, the State Board adopted the 2018 Integrated Report, updating the 303(d) List of impaired waters for three of the state's regions, including the North Coast Region. Section 303(d) of the Clean Water Act envisions an assessment of water quality impairment (e.g., exceedance of water quality standards) to precede the development of a TMDL and the implementation of an approved TMDL to be the mechanism for restoring water quality and attaining water quality standards. The timing of the 2018 Integrated Report and the associated adoption process for the updated 303(d) List interrupted the normal flow, by necessitating consideration of Russian River indicator bacteria listings after the Regional Board's adoption of the Action Plan, but before the State Board's consideration of the Action Plan.

Further, public comment on the draft 303(d) listing proposal for indicator bacteria in the Russian River watershed indicated concerns of Russian River residents 1) relative to the proposed listings, and 2) that would be best addressed before the State Board in the TMDL approval hearing, rather than the Integrated Report hearing. As such, the State Board chose to postpone consideration of the Russian River indicator bacteria related 303(d) listing considerations until a time after it conducts a hearing on approval of the Regional Water Board's adoption of the Action Plan and in the meantime to maintain the existing indicator bacteria listings for the Russian River watershed included on the 2014/2016 303(d) List.

The 2019 Staff Report describes the results of a subwatershed scale data assessment, considering E. coli, enterococci, Bacteroides, and PhyloChip™ data to define those specific locations in the Russian River watershed with evidence of pathogen related impairment or

pollution. This analysis primarily supports the determination of the Advanced Protection Management Program (APMP) boundary within which investigation of cess pools, failing Onsite Wastewater Treatment Systems (OWTS), and substandard OWTS are prioritized. The APMP is a key component of the Action Plan as the APMP areas and associated implementation actions are necessary to comply with the State Water Board's Water Quality Control Policy for Siting, Design, Operation, and Maintenance of Onsite Wastewater Treatment Systems (OWTS Policy).



Russian River Watershed Map

Triggered by the review of the Russian River watershed pathogen related data as part of the 2018 Integrated Report process, Regional Water Board staff completed a thorough review of all relevant data in 2020. Through this 2020 Data Reassessment process, Regional Board staff have determined that focused elements of the TMDL and Action Plan warrant another public review opportunity and reconsideration by the Regional Board. Therefore, narrow elements of the TMDL and Action Plan will be published in mid-May 2021 for a 45-day public comment review period, followed by a Regional Water Board hearing in October 2021, and a State Water Board hearing in spring of 2022. At this time, staff anticipate holding a workshop before the Regional Water Board on the proposed revised elements of the TMDL and Action Plan at the June 17/18, 2021 meeting.

Following approval by the State Board of the Regional Board's adoption of the revised TMDL and Action Plan, including the APMP boundary, Regional Board staff will propose that a future update to 303(d) list for the Russian River watershed simply reference the findings of the TMDL as the basis for impairment listings.

For further information, please see the Russian River Pathogen TMDL website https://www.waterboards.ca.gov/northcoast/waterissues/programs/tmdls/russian_river/ and sign-up for notifications on this project by going to: Email Subscription to Basin Planning and TMDL Project Updates.

Mendocino Coho Salmon Conservation Rearing Effort

Jonathan Warmerdam

The article below was largely developed for release to various media outlets through a partnership of state and federal agencies, environmental non-profits, and timberland owners, who are working together to save one of the nation's most endangered species, the Central California Coast Coho Salmon.

Beginning in 2018, federal and state agencies, along with landowners and non-governmental organizations, initiated a new extraordinary conservation effort to save a critically endangered species, the Central California Coast Coho Salmon.

Working together, members from the U.S. Army Corps of Engineers (USACE), the National Oceanic and Atmospheric Administration (NOAA) Fisheries, California Department of Fish and Wildlife (CDFW), North Coast Regional Water Quality Control Board, The Nature Conservancy, The Conservation Fund, and the Mendocino Redwood Company banded together to implement a new conservation rearing effort

in two watersheds of southern Mendocino County.

Conservation rearing is the extraordinary practice of collecting juvenile salmon from the wild, raising them in a controlled rearing facility, then releasing the adults back into the wild two years later to spawn on their own.

The decision to bring wild Coho Salmon for conservation rearing was guided by seven years of salmon and trout population monitoring in rivers and tributaries of the Mendocino coast. Despite extensive efforts to restore and improve aquatic habitat for Coho Salmon, along with some of the best habitat and water quality available in the central California coast, fish populations in Southern Mendocino rivers have not increased. The numbers of adults returning to breed each year have continued to trend at just a few hundred where they once numbered in the tens of thousands.

The Conservation Fund, The Nature Conservancy, Mendocino Redwood Company, North Coast Regional Water Quality Control Board, and other agency partners have made big investments in salmon habitat restoration in the last decade. The Garcia River and Navarro River watersheds have been the focal point of concerted pollution controls, flow improvements, and restoration actions, including through the North Coast Regional Water Quality Control Board's implementation of Total Maximum Daily Loads to address the sediment temperature impairments.

"The numbers of Garcia and Navarro River adult Coho Salmon returning to spawn in four of the last ten years have been below the threshold of fish necessary to maintain a viable population," said CDFW's Allan Renger, "and this conservation rearing pilot project relies on fish population monitoring to make informed decisions on when, how, and where to act."

To keep these salmon populations from becoming locally extinct, actions were taken to capture a small number of juvenile Coho Salmon from the Garcia and Navarro Rivers.

Starting annually in 2018, approximately 200 juvenile Coho Salmon were removed from the two rivers and carried out of the woods in backpacks full of cold water. They were then transported three hours away to Warm Springs Hatchery in Geyserville, Sonoma County.



Juvenile coho salmon awaiting transportation to the conservation hatchery at Warm Springs Dam in 2018. Photo credit: Jennifer Carah, The Nature Conservancy

The hatchery is co-operated by the U.S. Army Corps of Engineers and the California Department of Fish and Wildlife. At the hatchery, the salmon were tagged, genotyped, and raised to adulthood. Funding from The Nature Conservancy, The Conservation Fund, and NOAA Fisheries made this possible.

"The diversity of partners involved in this effort - State and federal agencies, environmental non-profits, and timberland owners – reflects the seriousness of the situation," said Jonathan Warmerdam, with the North Coast Regional Water Quality Control Board. "We simply can't allow these salmon to disappear as they did in the Gualala in 2004. This is really an 'all handson deck' effort to maintain and then recover these salmon." Salmon are a keystone species and represent the health of an ecosystem.

Researchers believe one of the reasons salmon populations are not responding to habitat improvements and availability is due to the ecological and genetic effects caused by severely depressed population numbers over the last decade.

The situation for these fish was exacerbated during California's severe drought in 2014 and

2015. During these years the river flows in Southern Mendocino County and elsewhere were so low that access for Coho Salmon to migrate upstream to spawn was extremely limited. This drove their already historically low numbers to even more dangerous levels, hindering successful spawning.

Coho Salmon in streams and rivers along California's Central Coast have been falling below critical threshold biologists call "population depensation." This results when there are so few salmon returning to a stream that they are unable to find a mate, causing their numbers to decline until extinction. And if a male and female do cross paths to spawn, they may be closely related, causing inbreeding. Such pairing can result in fewer offspring and genetic defects which can weaken the overall population.

"We know what the approximate depensation number for each watershed is based on its potential habitat size," said Bob Coey, North Coast Branch Chief with NOAA Fisheries West Coast Region in Santa Rosa. "For example, the threshold in the Garcia River is about 75 returning adults and about 200 in the Navarro. Unfortunately, numbers of returning adult Coho Salmon have fallen below this threshold in several of the last eight years, perpetuating and accelerating the downward spiraling abundance towards local extinction. It became clear that 2018 was the right time to act."

NOAA, CDFW, and USACE fisheries scientists reared the captured Coho Salmon at the hatchery and built what is called a "genetic breeding matrix", which is a scientific spreadsheet that identifies compatible mating pairs based on each fish's genetic makeup. The matrix matched those that are the least related to develop options for release that maximize genetic diversity and reduce the chance of matings between close relatives.

This approach will supplement Coho Salmon populations in the Garcia and Navarro Rivers, minimizing further erosion of genetic variability for the species, and hopefully boost

numbers.

"Since 2005, over one-third of the Garcia watershed has received conservation protection, more than twelve miles of stream habitat have been restored, and the majority of the forests are managed sustainably," said Jennifer Carah, Senior Scientist with The Nature Conservancy. "We are very hopeful that with a little matchmaking help the fish will bounce back and fully take advantage of these areas to thrive."

"Hopefully this will be the final step in a yearslong process to improve habitat through sediment reduction projects in the Garcia River watershed," said Scott Kelly North Coast Timberland Manager with The Conservation Fund. "This years-long effort has improved the roads and forest infrastructure of our Garcia River Forest, directly enhancing instream habitat by adding large wood for cover and to sort and restore spawning gravels in our streams."

This conservation rearing effort closely mirrors the actions taken in 2001 to help revive Coho Salmon in the Russian River watershed, in Sonoma County, when their numbers had declined to less than a dozen returning adults. A conservation rearing program there used a similar breeding matrix to ensure the greatest genetic variability for their offspring. As a result of this conservation-based breeding program at Warm Springs Hatchery, and continuing efforts to improve fish habitat, during the winter of 2017-2018 the program had its best year of returns to date and upwards of 700 adults returned to spawn.



A wild adult coho salmon is returned from conservation hatchery and released back into the Garcia River to

spawn with wild salmon in December 2020. Photo credit: Jonathan Warmerdam.

"The Mendocino watersheds are really important for Coho Salmon because they were once the stronghold for these fish along California's coast," said Coey. "There is so much opportunity for these fish because of the amount and quality of habitat available to them, and because of the support provided by this private and public partnership."

The next step for this effort is to monitor the success of the released adults by collecting genetic information from the next generation of juvenile Coho Salmon in the Garcia and Navarro Rivers, to gauge how successful the released fish were in contributing to the next generation. The partnership will learn and adapt the program based on lessons learned of this this first release year.

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Post-Fire Recovery Grant Update: Fire-Impacted Lands in Sonoma

County. Carrieann Lopez, Regional Water Board Project Manager, and Anya Starovoytov, Sonoma Resource Conservation District Project Director

Emergency Funding for Post-Fire Recovery Provided by: Clean Water Act (CWA) § 319(h) – Nonpoint Source Implementation

The Kincade Fire in October 2019 caused severe impacts across the north eastern portion of the Russian River watershed, including the Alexander Valley, Sulphur Creek, Maacama Creek, Brooks Creek, Windsor Creek and Mark West Creek subwatersheds; burning riparian areas and forests, destroying human infrastructure (houses, road culverts, fences), and increasing erosion and sedimentation into salmon-bearing streams. In the fall of 2020 Walbridge Fire further damaged portions of the Russian River watershed including additional portions of the Mark West Creek, Mill Creek,

Santa Rosa Creek, and Austin Creek subwatersheds.

In July 2020, the Sonoma Resource Conservation District (Sonoma RCD) was awarded emergency funding for post-fire recovery in the amount of \$353,727 to alleviate potential effects on water quality due to erosion and sediment deposition and improve riparian habitat within burned areas of the Russian River watershed.

The Sonoma RCD executed one large-scale road improvement project and one riparian restoration project within the Kincade Fire footprint. They implement two additional emergency projects within the Walbridge Fire perimeter included replacing a burned culvert and installing water bars along roads disturbed by dozer lines and firefighting activities. Overall, between July 2020 and January 2021, a total 132 Management Practices (MPs)² were implemented across four (4) properties that were impacted by the Kincade and Walbridge Fires with an estimated 516 tons/year of sediment prevented from entering tributaries to the Russian River.



A plastic 18-inch culvert routing an ephemeral drainage completely burned in the Walbridge Fire. The road was already starting to collapse when Sonoma RCD conducted a site visit on 11/23/2020, following the wildfire.

(L) - Conditions of project site after the onset of the rainy season – roadway

⁽R) - At culvert repair site. Note grass starting to grow through straw applied for erosion control in disturbed areas.



- (L) Dozer line impacts present following the Walbridge Fire.
- (R) Straw and native seed were applied as erosion control across disturbed areas.

The following work was completed through the expenditure of the Nonpoint Source 319(h) post-fire recovery emergency funds:

- Implementation of erosion control MPs to stormproof a 5-mile stretch of an unpaved access road, including 65 rolling dips, 2 critical dips, and 25 water bars.
- Installation of 240 native riparian plants along approximately 2,000 feet of Gird Creek.
- Replacement of a burned 18-inch culvert and adding two temporary critical dips along the access road where visual observation suggested that ephemeral drainages may divert down the road due to increased runoff this winter from the surrounding burned landscape.
- Implementation of erosion control MPs along approximately 1,000 feet of unsurfaced road (either existing or newly cut by CalFire as part of wildfire activities). The MPs included installing 23 cross drains, 13 water bars and applying seed and straw on areas disturbed by firefighting activities.

introduction of non-point source pollutants into receiving waters.

² Management Practices (MPs) are structural and nonstructural controls to reduce or eliminate the

Public outreach under this grant consisted of correspondence with landowners regarding potential post-fire recovery projects on their properties as well as workshops for appropriate MPs for impacted landowners. A webinar was held by the Sonoma RCD on November 17, 2020 for landowners impacted by 2020 wildfires, which highlighted appropriate erosion control and stormwater management MPs that could be utilized to address immediate concerns on fire-impacted lands. The webinar was recorded and posted on Sonoma RCD's YouTube channel to allow for future viewings by additional stakeholders.

Significant hurdles were encountered during this grant including delays in grant execution due to the COVID pandemic, the short timeline for implementing the recovery work before the grant funds expired, limited availability of general contractors in Sonoma County due to the immense amount of post-fire recovery work being conducted, and the 2020 wildfires that broke out just before the onset of construction within the Kincade Fire boundaries.

Sonoma RCD was dynamic in addressing new erosion concerns within the broader Russian River Watershed after the 2020 wildfire impacts were evident. This was feasible due to a newly developed relationship with a local contractor who had availability and the skillset necessary to conduct this emergency work as well as the expedited approval process and quick response from the North Coast Regional Water Board's Project Manager.

Additional erosion control and vegetation management activities will be necessary to restore burned areas of the Russian River watershed and support impacted communities. Sonoma RCD is continuing to collaborate with interested landowners and pursuing additional grant funding through the 319h and other grant programs to assist landowners in implementing additional MPs to continue the work of post-fire recovery.



Enforcement Report for April 2021 Executive Officer's Report

Diana Henrioulle, Zane Stromberg and Jordan Filak

Date Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
February 2, 2021	Nicholas and Kristen Brodrick	NOV	 Water Code sections 13260, 13264, and 13376 Clean Water Act section 301, 401, 404 	Ongoing

Comments: On February 2, 2021, the Southern Nonpoint Source & Forestry Unit Senior issued a Notice of Violation to Nicholas and Kristen Brodrick for discharges of waste from their property located on Felta Road, south of Felta Creek in Healdsburg. On December 1, 2020, while inspecting a nearby timber operation on Felta Road, North Coast Regional Water Quality Control Board staff observed vehicle tracks in the soft sediment bed of Felta Creek as well as large rocky debris indicating that fill had intentionally been placed in the stream bed using heavy industrial equipment. The NOV advised the Brodricks that such activity and waste discharges violate requirements of the Basin Plan, Clean Water Act, and Water Code, and could subject them to enforcement action including potential civil liability. The NOV directs the Brodricks to seek appropriate permitting for any further proposed work in Felta Creek. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
February 2, 2021	Clifford, Dianne, and James Vattuone	NOV	1. California Water Code sections 13260 and 132642. Basin Plan section 4.2.1 Prohibition 2	Ongoing

Comments: On February 2, 2021, the Enforcement Unit Senior issued a Notice of Violation to Clifford, Dianne, and James Vattuone for violations associated with activities on their property located in the Guerneville subarea of the lower Russian River watershed, Forestville. During a November 4, 2020, multi-agency inspection, Regional Water Board staff observed features and conditions associated with site development and use for cannabis cultivation that were causing or had resulted in discharges and threatened discharges of waste to receiving waters. The size and scope of site disturbance is sufficient to require coverage under the cannabis general order (CANGO). Regional Board staff advised the Vattuones of violations of the California Water Code and the Basin Plan. The NOV directs the Vattuones to enroll their property for coverage under the CANGO, and to provide a plan and schedule to correct the violations discussed within 30 days of the date of the NOV. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
February 2, 2021	John Farrow, Farrow Ready Mix, Inc	Expedited Payment Letter (Offer to Settle Mandatory Minimum Penalties)	Failure to Enroll for Coverage Under IGP	Posted for public comment (ending April 8, 2021)

Comments: On February 2, 2021, Assistant Executive Officer (AEO) Villacorta issued Settlement Offer No. R1-2021-0004, Offer To Participate in The Expedited Payment Program For Failure to Obtain Coverage under the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Industrial Activities, Order No. 2014-0057-DWQ NPDES NO. CAS000001 (IGP). The Settlement Offer advised the Discharger that his continued failure to enroll his facility, Farrow Ready Mix, Inc., for coverage under the IGP, following issuance by staff of two Notices of Noncompliance (NNCs), on January 28 and April 6, 2020, had subjected the Discharger to \$5,000 in Mandatory Minimum Penalties (MMPs). The Settlement Offer provided the Discharger the option to pay the MMPs and staff costs of \$2,049.85, or to contest the violation. The Settlement Offer also directed the Discharger to enroll his facility for coverage under the IGP by March 2, 2021. On February 16, 2021, Regional Water Board staff received the Discharger's signed Acceptance of the Settlement Offer, and on February 24, 2021, the Discharger submitted a Notice of Intent (NOI) enrolling the facility for coverage under the IGP. On March 8, 2021, staff posted a Notice of Settlement for public comment, through April 8, 2021. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
February 8, 2021	John Farrow, Farrow Ready Mix, Inc	NOV	1. California Water Code sections 13260, 13264, and 133762. Clean Water Act section 301	Enrolled for coverage

Comments: On February 8, 2021, the NPDES Unit Senior issued a Notice of Violation to John Farrow of Farrow Ready Mix, Inc. for violations associated with continued failure to obtain coverage under and comply with the requirements of the National Pollutant Discharge Elimination System (NPDES) general permit for storm water discharges associated with industrial activities (IGP). As discussed in the previous entry, on January 28, 2020 and April 6, 2020, respectively, Regional Water Board staff issued a first and second Notice of Non-Compliance to the Discharger, directing enrollment for coverage under the IGP. On February 2, 2021, AEO Villacorta issued the aforementioned Settlement Offer, Order No. R1-2021-0004, for MMPs associated with the Discharger's failure to enroll for IGP coverage when directed by staff to do so. As of February 8, 2021, the Discharger had not yet obtained appropriate regulatory coverage, while continuing to operate and conduct industrial activities. The NOV advised the Discharger of relevant requirements and the consequences of non-compliance, including further enforcement action and potential assessment of administrative civil liability of up to \$10,000 per day. The NOV urged the Discharger to enroll for coverage under the IGP immediately. As discussed above, the Discharger enrolled the facility for IGP coverage on February 24, 2021. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
February 10, 2021	Tina Lyn, Young Jacobsen, and Diane Sodosky	CAO and 13267 Order	 Statewide Cannabis General Order WDRs Regional Cannabis Order WDRs Basin Plan section Water Code sections 13260, 13264, and Clean Water Act section 301 	Ongoing

Comments: On February 10, 2021, the Executive Officer issued a Cleanup and Abatement (CAO) and 13267 Order to Tina Lyn, Young Jacobsen, and Diane Sodosky for violations associated with multiple parcels located northeast of the town of Redway and one mile south of Hooker Creek, in Humboldt County. The Dischargers have culverted more than 100 feet or watercourse and have graded a three-acre area upon which to construct greenhouses for cannabis cultivation. Regional Water Board staff described and documented these impacts in an April 13, 2020 Notice of Violation. The CAO requires the Dischargers to clean up and abate the effects of unauthorized fill of watercourses and wetlands. The CAO requires the dischargers to submit and, upon approval, implement a Cleanup, Restoration, and Monitoring Plan (CRMP), and to provide progress and monitoring reports. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
February 12, 2021	Justin and Mia Baldwin	NOV	1.Basin Plan 4.2.1 Prohibitions 1 & 2 2. State Cannabis Order WDR's (CANGO)	Ongoing

Comments: On February 12, 2021, the Enforcement Unit Senior issued a Notice of Violation to Justin and Mia Baldwin for violations associated with their property in the South Fork Eel River watershed, near the town of Garberville, in Humboldt County. During an interagency inspection on January 21, 2015, Regional Water Board staff observed conditions associated with site development and cannabis cultivation that had impacted the quality and beneficial uses of receiving waters. These conditions included features constructed within or adjacent to watercourses, discharges and potential discharges of waste to receiving waters, in violation of the Water Code and Basin Plan. In 2016, Mr. Baldwin enrolled the property for coverage under the Regional cannabis order, and subsequently enrolled the property for coverage under the CANGO. On November 20, 2020 staff inspected the property and observed that violations documented by staff in 2015 had not been corrected, and that there were additional features and conditions that were impacting or threatening to impact water quality. The NOV directs the Baldwins to provide a plan and schedule to correct the violations discussed within 30 days of the date of the NOV. This matter is ongoing.

Dat	e Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
	oruary 16, 2021	Ukiah Rifle and Pistol Club	Water Code Section 13383 Investigative Order	Inadequate Storm Water Management and Sampling Plan (SWMSP)	Rescinded; new investigative order pending.

Comments: On February 16, 2021, AEO Villacorta issued a Water Code section 13383 Investigative Order to Ukiah Rifle and Pistol Club (URPC) requiring revision of a Storm Water Management and Sampling Plan (SWMSP) submitted April 10, 2020 in response to a 2019 request by Regional Water Board staff. The URPC property is located north of Sulphur Creek on Vichy Springs Road, in Ukiah, Mendocino County. On December 3, 2020, Regional Water Board staff inspected the property to assess the adequacy of the April 10, 2020 SWMSP) and to evaluate site conditions and Best Management Practices (BMPs) installed throughout the site. During the December 3 inspection, Regional Water Board staff observed deficiencies both in the SWMSP and in BMPs deployed on the property. The 13383 Order directed URPC to revise the SWMSP to include additional sampling locations, show the BMP types and locations on a revised site map, and indicate the whole drainage system including all culverts, pipes, drop inlets, and French drains. The 13383 Order also directed the discharger to submit a revised SWMSP to the Regional Board within 30 days of the issuance of the Order. Following issuance of this Order, the Regional Water Board received comments from URPC and other interested parties, leading Board staff to determine it was appropriate to rescind the Order, and to develop and issue a revised order addressing comment received and providing for a formal public comment period. Accordingly, on March 18, 2021, AEO Villacorta rescinded the Order. This matter is ongoing, with a revised order pending.

Date Issued	Discharger	Action Type	Violation Type	Status as of March 25, 2021
February 24, 2021	Sierra Pacific Industries (SPI) and JBM Land LLC (JBM)	Water Code Sections 13267 and 13383 Investigative Order	Failure to submit Final Remedial Action Plan (FRAP)	Ongoing

Comments: On February 21, 2021, AEO Villacorta issued Water Code section 13267 and 13383 investigative order No. R1-2021-0013 to SPI and JBM for their property (Site) in Arcata, discharging to the Mad River Slough and Humboldt Bay Watershed. The Site was enrolled for coverage under the IGP until operations ceased, and the dischargers terminated permit coverage in 2019. During a March 2019 sampling event, dioxins and furans were detected in storm water from the Site and reported in the 2018/2019 Annual Storm Water Report. In their 2020 Annual Groundwater Monitoring Report, submitted September 2020, the dischargers reported that the water quality objective (WQO) for dioxins in the former source area would be met in less than a year, however the WQOs cited by the dischargers are significantly higher than those currently used by the Regional Water Board. Accordingly, the investigative order requires that the dischargers submit a final remedial action plan (FRAP) including slough sediment monitoring, groundwater monitoring and groundwater WQO compliance, a surface water monitoring plan that contains actions to meet WQOs, and proposed land use restrictions. The dischargers must submit the FRAP by June 23, 2021. This matter is ongoing.

Projected List of Future Regional Water Board Agenda Items

The following is a list of Regional Water Board agenda items that staff are planning for the next two Board meetings. **This list of agenda items is intended for general planning purposes and is subject to change.** Questions regarding the listed agenda items should be addressed to the identified staff person.

June 17 & 18, 2021

- Hatchery NPDES General Order Renewal (Justin McSmith) [A]
- Resolution to Approve the Elk River Restoration Project as an Exemption to the Enclosed Bays and Estuaries Policy Prohibiting Waste Discharges to Humboldt Bay (*J. McSmith*) [A]
- City of Yreka WDR (Roy O'Connor) [A]
- Mendocino County South Coast SWDS Closure WDRs (Terri Cia) [A]
- College of the Redwoods Rescission Order (Justin McSmith) [A]
- Russian River CSD WWTP NPDES Permit Renewal (Cathy Goodwin) [A]
- Fiscal Year 2021 2022 Division Work Plans (Matt St. John) [I]
- Reassessment of Fecal Indicator Bacteria and Microbial Source Tracking Data for the Russian River Pathogen TMDL (Alydda Mangelsdorf, Lisa Bernard) [W]

August 19 & 20, 2021

- Willits WWTP NPDES Permit (Matt Herman) [A]
- Nordic Aqua Farms NPDES Permit (Justin McSmith) [A]
- Roblar Road Quarry WDR (Ben Zabinsky) [A]

2018 303(d) List Changes

Table 1: North Coast Sediment Delisting

Waterbody Name	Listings Extent	Delisting Extent
Eureka Plain	Elk River Watershed, Upper Little South Fork Elk River	Entire waterbody

Table 2: North Coast Temperature Delistings: Redwood Creek Hydrologic Unit - Decreased Temperature Listing Extent

Waterbody Name	Listings Extent
Redwood Creek Hydrologic Area	Entire waterbody except Larry Dam Creek, Little Lost Man Creek, Lost Man Creek, Prairie Creek, and Tom McDonald Creek

Table 3: North Coast Metals Listings (New)

Waterbody Hydrologic Unit	Waterbody Name	Listings Extent	Pollutant
Eel River	North Fork Eel River Hydrologic Area, Lower North Fork Eel River Watershed	Mainstem North Fork Eel	Aluminum
Eel River	Upper Main Eel River Hydrologic Area (includes Tomki Creek)	Mainstem Eel River	Aluminum
Eel River	Van Duzen River Hydrologic Area	Yager Creek	Aluminum
Eureka Plain	Elk River Watershed, Upper Elk River	Mainstem Elk River, South Fork Elk River, and North Fork Elk River	Aluminum
Eureka Plain	Freshwater Creek	Mainstem Freshwater Creek	Aluminum
Eureka Plain	Jacoby Creek Watershed	Mainstem Jacoby Creek	Aluminum
Redwood Creek	Redwood Creek	Mainstem Redwood Creek	Aluminum
Russian River	Middle Russian River Hydrologic Area, Geyserville Hydrologic Subarea	Mainstem Russian River	Aluminum
Russian River	Upper Russian River Hydrologic Area, Coyote Valley Hydrologic Subarea	Mainstem Russian River	Aluminum

Waterbody Hydrologic Unit	Waterbody Name	Listings Extent	Pollutant
Russian River	Upper Russian River Hydrologic Area, Ukiah Hydrologic Subarea	East Fork Russian River	Aluminum
Trinity River	Lower Trinity River Hydrologic Area	Mainstem Trinity River	Aluminum
Klamath River	Lost River Hydrologic Area, Tule Lake and Mt Dome Hydrologic Subareas	Entire waterbody	Arsenic
Trinity River	South Fork Trinity River Hydrologic Area	Mainstem South Fork Trinity River	Boron
Smith River	Delilah Creek	Entire waterbody	Copper
Smith River	Tilas Slough	Entire waterbody	Copper
Russian River	Middle Russian River Hydrologic Area, Santa Rosa Creek Hydrologic Subarea, mainstem Santa Rosa Creek	Entire waterbody	Manganese
Russian River	Upper Russian River Hydrologic Area, Ukiah Hydrologic Subarea	Mainstem Russian River and East Fork Russian River	Manganese
Eel River	Plaskett Lake	Entire waterbody	Mercury
Mendocino Coast	Navarro River Hydrologic Area	Mainstem Navarro River	Nickel

Table 4: North Coast Ocean Beach Indicator Bacteria Listings (New)

Waterbody Hydrologic Unit	Waterbody Name Listings Extent	
Mendocino Coast	Greenwood State Beach	Entire waterbody
Mendocino Coast	MacKerricher State Park (near Mill Creek)	Entire waterbody
Mendocino Coast	Navarro River Beach	Entire waterbody
Mendocino Coast	Russian Gulch	Entire waterbody
Mendocino Coast	Van Damme State Park Beach	Entire waterbody

Table 5: North Coast Conventional Pollutant Listings (New)

Waterbody Hydrologic Unit	Waterbody Name	Listings Extent	Pollutant
Eel River	North Fork Eel River Hydrologic Area, Lower North Fork Eel River Watershed	Mainstem North Fork Eel	рН
Eel River	North Fork Eel River Hydrologic Area, Lower North Fork Eel River Watershed	Asbill Creek	Dissolved Oxygen
Russian River	Lower Russian River Hydrologic Area, Austin Creek Hydrologic Subarea	Mainstem Austin Creek	Dissolved Oxygen
Smith River	Elk Creek	Entire waterbody	Dissolved Oxygen
Smith River	Martin Ranch Northwest (minor unnamed coastal stream)	Entire waterbody	Dissolved Oxygen
Russian River	Middle Russian River Hydrologic Area, Geyserville Hydrologic Subarea	Mainstem Russian River	Specific Conductivity

Table 6: North Coast Total Dissolved Solids Listing (New)

Waterbody Hydrologic Unit	Waterbody Name	Listings Extent
Eel River	South Fork Eel River Hydrologic Area	Mainstem South Fork Eel River

Table 7: North Coast Regional Board 2018 303(d) List submitted to USEPA for approval

	Impaire	ed Water Bodies (Categories 4a, 4b¹, and	5)	
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category
Bodega HU	Bodega Harbor HA	Entire water body	Invasive Species	5
-	Campbell Cove	Entire water body	Indicator Bacteria	5
	Estero Americano HA,		Nutrients	5
	Estuary	Entire water body	Sedimentation/ Siltation	5
	Estero Americano HA, Americano Creek	Entire water body	Nutrients	5
	Estero de San Antonio HA,		Nutrients	5
	Stemple Creek & Estero de San Antonio	Entire water body	Sediment	5
Cape Mendocino	Mendocino Mattole River HA, Mattole Entire water body	Sedimentation/ Siltation	4a	
ни		I Follie Water book	Temperature	4a
Eel River HU	Lower Eel River HA (includes the Eel River Delta)	Mainstem Eel River	Aluminum	5
_		McNulty Slough	Oxygen, Dissolved	5
		Entire water body except McNulty Slough	Temperature	4a
		Entire water body	Sedimentation/ Siltation	4a
	Middle Fork Eel River HA,	Mainstem Middle Fork Eel River	Aluminum	5
	Eden Valley HSA & Round	Entire water body	Sedimentation/ Siltation	4a
	Valley HSA		Temperature	4a
	Middle Fork Eel River HA, Wilderness HSA & Black Butte River HSA	Entire water body	Temperature	4a
		Mainstem Eel River	Aluminum	5
	Middle Main Eel River HA	Tributaries to the Middle Main Eel River	Temperature	4a
		Entire water body	Sedimentation/ Siltation	4a
	North Fork Eel River HA,	Mainstem North Fork Eel River	Aluminum	5
	Lower North Fork Eel River Watershed	Managem North Fork Edit (Vol.	рН	5
	Tavel Watershed	Entire water body	Sedimentation/	4a

	Impair	ed Water Bodies (Categories 4a, 4b¹, and	I 5)	
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category
•			Siltation	
			Temperature	4a
		Asbill Creek	Oxygen, Dissolved	5
	North Fork Eel River HA, Upper North Fork Eel River Watershed	Entire water body	Temperature	4a
		Mainstem South Fork Eel River	Aluminum	5
			Total Dissolved Solids	5
	South Fork Eel River HA	Entire water body	Sedimentation/ Siltation	4a
		Entire water body except Dutch Charlie Creek and Redwood Creek	Temperature	4a
	Hanas Main Fal Diver IIA	Mainstem Eel River	Aluminum	5
	Upper Main Eel River HA (included Tomki Creek)	Firsting works a big die	Temperature	4a
	(Included Tolliki Creek)	Entire water body	Sedimentation/ Siltation	4a
	Upper Main Eel River HA, Lake Pillsbury HSA, Lake Pillsbury	Entire water body	Mercury	5
	Van Duzen River HA	Yager Creek	Aluminum	5
	van Duzen River HA	Entire water body	Sedimentation/ Siltation	4a
	Plaskett Lake	Entire water body	Mercury	5
Eureka Plain HU	Elk River Watershed, Lower Elk River and	Lower mainstem Elk River and Martin Slough	Indicator Bacteria	5
	Martin Slough	Entire water body	Sedimentation/ Siltation	5
	Elk River Watershed,	Mainstem, South Fork, and North Fork Elk River	Aluminum	5
	Upper Elk River	Entire water body	Sedimentation/ Siltation	5

Impaired Water Bodies (Categories 4a, 4b ¹ , and 5)				
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category
	Freshwater Creek	Mainstem Freshwater Creek	Aluminum	5
		Entire water body	Sedimentation/ Siltation	5
	Gannon Slough	Campbell Creek	Indicator Bacteria	5
	Lhorale aldt Davi	Futing weeten banks	Dioxin Toxic Equivalents	5
	Humboldt Bay	Entire water body	PCBs	5
	Landa Carala Matanaka I	Mainstem Jacoby Creek	Aluminum	5
	Jacoby Creek Watershed	Entire water body	Sediment	5
	Jolly Giant Creek	Jolly Giant Creek	Indicator Bacteria	5
Klamath River HU		Copco 1	Mercury	5
Kiailiaili Kivei HU	Copco Lake	Copco 1 and 2	Microcystin	4a
		Entire water body	Mercury	5
	Iron Gate Reservoir		Microcystin	4a
		Klamath Straits Drain	Mercury	5
		Entire water body	Arsenic	5
	Lost River HA, Tule Lake and Mt Dome HSAs		Oxygen, Dissolved	4a
	and Mt Dome HSAS		pH	4a
			Nutrients	4a
	Tule Lake and Lower Klamath Lake National Wildlife Refuge	Entire water body	pH (high)	4a
			Aluminum	5
	Lower HA, Klamath Glen	Mainstem Klamath River	Organic Enrichment/ Low Dissolved Oxygen	4a
	HSA		Nutrients	4a
		Entire water body	Sedimentation/ Siltation	5
			Temperature	4a
		China Creek, Grider Creek, Thompson Creek, Walker Creek	Sediment	5
	Middle HA and Lower HA,		Microcystin	4a
	Scott River to Trinity River	Mainstem Klamath River	Organic Enrichment/ Low Dissolved Oxygen	4a

Water Body	Water Body Name	ed Water Bodies (Categories 4a, 4b¹, and Listing Extent	5) Pollutant	Category
Hydrologic Unit	Water Dody Name			
		Entire water body	Nutrients	4a
		Entire water body except: (1) Portuguese Creek and its Tributaries, (2) Cedar Creek and its Tributaries, (3) Twin Valley Creek and its Tributaries, (4) North Fork Dillon Creek and its Tributaries from the headwaters to Vann Creek, (5) Canyon Creek and its Tributaries from the headwaters to confluence with Seiad Creek, (6) Elk Creek and its Tributaries from the headwaters to Bear Creek, (7) Tenmile Creek and its Tributaries, (8) Clear Creek and its Tributaries from the headwaters to the confluence with Tenmile Creek, and (9) Fort Goff Creek and its Tributaries.	Temperature	4 a
		Main atom Klass ath Divers	Organic Enrichment/ Low Dissolved Oxygen	4a
		Mainstem Klamath River	Microcystin	4a
	Middle HA, Iron Gate Dam		Aluminum	5
	to Scott River	Entire water hady	Nutrients	4a
		Entire water body	Temperature	4a
		Beaver Creek, Cow Creek, Deer Creek, Hungry Creek, West Fork Beaver Creek	Sediment	5
		Mainstem Klamath River	Organic Enrichment/ Low Dissolved Oxygen	4a
	Middle HA, Oregon to Iron Gate	Mainstem Klamath River (excluding the river reach from the Oregon border to the beginning of Copco 1 Reservoir)	Microcystin	4a
		Entire water hady	Nutrients	4a
		Entire water body	Temperature	4a
	Salmon River HA (except the Wooley Creek HSA)	Entire water body except: (1) Uncles Creek and its Tributaries, (2) Plummer Creek and its tributaries, (3)	Temperature	4a

Impaired Water Bodies (Categories 4a, 4b ¹ , and 5)				
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category
	the North Fork Salmon River and its Tributaries from the confluence with the Right-Hand Fork of the North Fork Salmon River to the downstream boundary of the Marble Mountain Wilderness, (4) Right Hand Fork of the North Fork Salmon River and its tributaries, (5) the North Fork Salmon River and its Tributaries from the headwaters to the confluence with the Right Hand Fork of the North Fork Salmon River, and (6) the South Fork Salmon River from the headwaters to the confluence with Garden Gulch.			
	Salmon River HA, Wooley Creek HSA	Entire water body except: (1) Wooley Creek and its tributaries from the head waters to the confluence with the North Fork Wooley Ck, (2) Wooley Creek and its Tributaries from the confluence of the North Fork Wooley Creek to Haypress Creek, and (3) North Fork Wooley Creek and its Tributaries.	Temperature	4a
		Entire water body except: (1) Mill Creek and its Tributaries from the headwaters to the confluence with Etna Creek and (2) Canyon Creek and its Tributaries from the headwaters to the downstream	Sedimentation/ Siltation	4a
	Scott River HA	boundary of the Marble Mountain Wilderness.	Temperature	4a
			Aluminum	5
		Mainstem Scott River from Young's Dam	Biostimulatory Conditions	5
			Oxygen, Dissolved	5
			pH	5
		Shackleford Creek above Campbell Lake	pН	5

	Impaire	ed Water Bodies (Categories 4a, 4b¹, and	1 5)	
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category
		Entire water body	Organic Enrichment / Low Dissolved Oxygen	4a
	Shasta River HA		Temperature	4a
		Mainstem Shasta River	Aluminum	4a
	Shasta River HA, Lake Shastina	Entire water body	Mercury	5
Mad River HU	Clam Beach (near Mad River mouth)	Entire water body	Indicator Bacteria	5
	Clam Beach (near Strawberry Creek) ²	Entire water body	Indicator Bacteria	5
			Sedimentation/Siltation	4a
	Mad River	Entire water body	Temperature	5
			Turbidity	4a
		Mainstem Mad River	Aluminum	
	Norton Creek	Widow White Creek	Indicator Bacteria	5
	Ruth Lake	Entire water body	Mercury	5
Mendocino Coast	Albion River HA, Albion River	Entire water body	Sedimentation/Siltation	4a
HU			Temperature	5
	Big River Beach at Mendocino Bay	Entire water body	Indicator Bacteria	5
		Little North Fork	Temperature	5
	Big River HA, Berry Gulch	Rocky Gulch, the Little North Fork, and Manley Gulch	Oxygen, Dissolved	5
	5. 5 5. 5.	Cookhouse Gulch, Railroad Gulch, and the mainstem Big River	Oxygen, Dissolved	5
	Big River HA, Big River	Futing water backy	Sedimentation/Siltation	4a
		Entire water body	Temperature	5
	Caspar Headlands State Beach	Entire water body	Indicator Bacteria	5
	Garcia River HA, Garcia	Entire water hady	Sediment	4a
	River	Entire water body	Temperature	5
	Greenwood State Beach	Entire water body	Indicator Bacteria	5
		Mainstem Gualala River	Aluminum	5

Impaired Water Bodies (Categories 4a, 4b¹, and 5)				
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category
•	Cualala Diver HA Cualala	Entire water body	Sedimentation/Siltation	4a
	Gualala River HA, Gualala River	Entire water body except: the Little North Fork Gualala River and its tributaries	Temperature	5
	Hare Creek Beach	Entire water body	Indicator Bacteria	5
	MacKerricher State Park (near Mill Creek)	Entire water body	Indicator Bacteria	5
	MacKerricher State Park (near Virgin Creek)	Entire water body	Indicator Bacteria	5
	Navarro River Beach	Entire water body	Indicator Bacteria	5
		Mainstem Navarro River	Nickel	5
	Navarro River HA	Entire water hady	Sedimentation/Siltation	4a
		Entire water body	Temperature	4a
	Navarro River HA, Delta	Entire water body	Sedimentation/Siltation	4a
		Entire water body	Sedimentation/Siltation	4a
	Noyo River HA, Noyo River	(1) Mainstem Noyo River from confluence of Duffy Gulch downstream to confluence with Hayshed Gulch; (2) South Fork Noyo River mainstem from confluence of Kass Creek downstream to confluence with Noyo River mainstem; (3) Little North Fork Noyo River, (4) Duffy Gulch, and (5) Kass Creek tributaries.	Temperature	5
	Noyo River HA, Pudding	Pudding Creek Lagoon	Indicator Bacteria	5
	Creek	Mainstem Pudding Creek	Temperature	5
	Pudding Creek Beach	Entire water body	Indicator Bacteria	5
		Entire water body	Sedimentation/Siltation	4a
	Rockport HA, Ten Mile River HSA	Entire water body except: (1) Mill Creek, (2) Gulch 11, (3) Churchman Creek, (4) Little Bear Haven Creek, (5) Buckhorn Creek, (6) Booth Gulch, (7) Smith Creek, (8) Bear Haven Creek, and (9) the Little North Fork Ten Mile River	Temperature	5
	Russian Gulch	Entire water body	Indicator Bacteria	5

	Impaired Water Bodies (Categories 4a, 4b¹, and 5)				
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category	
	Van Damme State Park Beach	Entire water body	Indicator Bacteria	5	
Redwood Creek		Mainstem Redwood Creek	Aluminum	5	
HU		Entire water body	Sedimentation/Siltation	4a	
	Redwood Creek	Entire water body except Larry Dam Creek, Little Lost Man Creek, Lost Man Creek, Prairie Creek, and Tom McDonald Creek	Temperature	5	
Russian River HU	Lauren Danaian Diametta	Mainstem Austin Creek	Oxygen, Dissolved	5	
Tussian Tivel 110	Lower Russian River HA, Austin Creek HSA	Entire water body	Sedimentation/Siltation	5	
	Austin Greek HOA	Entire water body	Temperature	5	
		Mainstem Russian River at Healdsburg Memorial Beach from the Railroad Bridge to Hwy 101	Aluminum	5	
	Lower Russian River HA, Guerneville HSA		Indicator Bacteria	5	
			Specific Conductivity	5	
		Mainstem Russian River at Fife Creek to	Aluminum		
		Dutch Bill Creek	Indicator Bacteria	5	
		Mainstem Dutch Bill Creek	Indicator Bacteria	5	
		Entire water body	Sedimentation/Siltation	5	
			Temperature	5	
	Lower Russian River HA,		Indicator Bacteria	5	
	Guerneville HSA, Green Valley Creek watershed	Entire water body	Oxygen, Dissolved	5	
	Middle Russian River HA,	Entire water body	Sedimentation/Siltation	5	
	Big Sulphur Creek HSA	Little water body	Temperature	5	
		Entire water body	Sedimentation/Siltation	5	
		Little water body	Temperature	5	
	Middle Russian River HA,	Mainstem Russian River	Aluminum	5	
	Geyserville HSA	IVIAIIISTEITI IVASSIAII IVIVEI	Specific Conductivity	5	
		Stream 1 on Fitch Mountain	Indicator Bacteria	5	
		Foss Creek	Diazinon	5	

	Impaire	ed Water Bodies (Categories 4a, 4b	¹ , and 5)	
Water Body Hydrologic Unit	Water Body Name	Listing Extent	Pollutant	Category
,		Indicator Bacteria	5	
			Oxygen, Dissolved	5
	Middle Russian River HA, Laguna HSA, mainstem	Entire water body	Mercury	5
	Laguna de Santa Rosa	Entire water body	Phosphorus	5
			Sedimentation/Siltation	5
			Temperature	5
	Middle Russian River HA,	Mainstem Colgan Creek	Oxygen, Dissolved	5
	Laguna HSA, tributaries to the Laguna de Santa Rosa		Indicator Bacteria	5
	(except Santa Rosa Creek	Entire water body	Sedimentation/Siltation	5
	and its tributaries)		Temperature	5
	Middle Russian River HA, Mark West HSA,		Aluminum	5
		st HSA, Mark West wnstream of the Entire water body	Oxygen, Dissolved	5
	mainstem Mark West		Phosphorus	5
	Creek downstream of the		Manganese	5
	confluence with the		Sedimentation/Siltation	5
	Laguria de Santa Rosa		Temperature	5
	Middle Russian River HA, Mark West HSA,		Sedimentation/Siltation	5
	mainstem Mark West Creek upstream of the confluence with the Laguna de Santa Rosa	Entire water body	Temperature	5
	Middle Russian River HA, Mark West HSA,		Sedimentation/Siltation	5
	tributaries to Mark West Creek (except Windsor Creek and its tributaries)	Entire water body	Temperature	5
	Middle Russian River HA,		Sedimentation/Siltation	5
	Mark West HSA, Windsor Creek and its tributaries	Entire water body	Temperature	5
	Middle Russian River HA,	Entire water hady	Indicator Bacteria	5
	Santa Rosa HSA,	Entire water body	Manganese	5

Water Body	Water Body Name	ed Water Bodies (Categories 4a, 4b¹, and Listing Extent	Pollutant	Category
Hydrologic Unit	mainstem Santa Rosa	_	Sedimentation/Siltation	5
	Creek		Temperature	5
	Middle Russian River HA, Santa Rosa HSA, Spring Lake (Santa Rosa Creek Reservoir)	Entire water body	Mercury	5
	Middle Russian River HA, Santa Rosa HSA, tributaries to Santa Rosa Creek	Entire water body	Indicator Bacteria	5
			Sedimentation/Siltation	5
			Temperature	5
	Middle Russian River HA, Warm Springs HSA	Entire water body	Sedimentation/Siltation	5
			Temperature	5
	Middle Russian River HA, Warms Springs HSA, Lake Sonoma	Entire water body	Mercury	5
	Upper Russian River HA,	Mainstem Russian River	Aluminum	5
	Coyote Valley HSA	Entire water body	Sedimentation/Siltation	5
			Temperature	5
	Upper Russian River HA, Coyote Valley HSA, Lake Mendocino	Entire water body	Mercury	5
	Upper Russian River HA,	Entire water hady	Sedimentation/Siltation	5
	Forsythe Creek HSA	Entire water body	Temperature	5
		Mainstem Russian River and East Fork	Aluminum	5
	Upper Russian River HA, Ukiah HSA	Russian River	Manganese	5
		Entire water body	Sedimentation/Siltation	5
		Entire water body	Temperature	5
Trinidad HU	Clam Beach (near Strawberry Creek) ³	Entire water body	Indicator Bacteria	5
	Dead Lake	Entire water body	Mercury	5
	Little River HA	Little River	Indicator Bacteria	5
	Luffenholtz Beach	Entire water body	Indicator Bacteria	5

Hydrologic Unit	Moonstone County Park Old Home Beach	Listing Extent Entire water body	Pollutant	Category
		Lentire weter hedy		
	LOld Home Beach	,	Indicator Bacteria	5
		Entire water body	Indicator Bacteria	5
	Trinidad State Beach	Entire water body	Indicator Bacteria	5
		Mainstem Trinity River	Aluminum	5
	Lower Trinity River HA	Entire water body except: (1) the New River and its tributaries, (2) Big French Creek and its tributaries, (3) the North Fork Trinity River and its tributaries, including the East Fork North Fork Trinity River and its tributaries, and (4) Manzanita Creek and its tributaries.	Sedimentation/ Siltation	4a
	Middle Trinity River HA	Entire water body	Sedimentation/Siltation	4a
		Mainstem South Fork Trinity River	Boron	5
	South Fork Trinity HA	Entire water body	Sedimentation/Siltation	4a
			Temperature	5
	Trinity Lake (was Claire Engle Lake)	Entire water body	Mercury	5
	Upper Trinity River HA	Entire water body except the Stuart Fork and its tributaries	Sedimentation/ Siltation	4a
	Upper Trinity HA, Trinity		Mercury	5
	River, East Fork Trinity River	Entire water body	Sedimentation/Siltation	4a
Smith River HU	Delilah Creek	Entire water body	Copper	5
	Elk Creek	Entire water body	Oxygen, Dissolved	5
	Martin Ranch Northwest (minor unnamed coastal stream)	Entire water body	Oxygen, Dissolved	5
	Tilas Slough	Entire water body	Copper	5

¹ Category 4a includes water bodies whose impairment is being addressed, at least one segment through a Total Maximum Daily Load (TMDL). Category 4b includes water bodies whose impairment is being addressed by an action other than a TMDL. Category 5 includes water bodies whose impairment is not yet being addressed. The North Coast Regional Water Quality Control Board does not currently have any water bodies in Category 4b.

² The water body "Clam Beach (near Strawberry Creek) spans both the Mad River HU and the Trinidad HU, and therefore is listed under both water bodies.