

## **EXECUTIVE OFFICER'S REPORT**

North Coast Regional Water Quality Control Board May 17, 2018

# Dairy Regulatory Program Update Cherie Blatt

On January 19, 2012, the North Coast Regional Water Quality Control Board (Regional Water Board) adopted the Regulatory Program for Waste Discharges from Dairies and Concentrated Animal Feeding Operations, including the following Orders:

- R1-2012-0001, General NPDES No. CAG011001 (2012 NPDES);
- R1-2012-0002, General Waste Discharge Requirements (2012 GWDR); and
- R1-2012-0003, Conditional Waiver of Waste Discharge Requirements (2012 Waiver).

About 120 dairies are enrolled under the 2012 Waiver. Three dairies are enrolled under the 2012 GWDR. No dairies are enrolled under the 2012 NPDES permit, which expired in 2017, and is not planned for renewal. The five-year lifespan of the 2012 Waiver has since expired and been renewed by the Regional Water Board Order R1-2016-0045 while staff develops GWDRs for all dairies (2018 GWDR). One individual Waiver of WDR was adopted in 2015 and will be folded into the new 2018 GWDR.

The 2018 GWDR proposes to cover existing, expanding, and new dairies in the Region including dairies re-opening on previously abandoned dairy sites. This coverage is expected to add less than one dairy per year to the program based on outreach and conversations with the dairy community. About one dairy per year closes in the North Coast Region, due to retirement or other operator interests, so the overall total number of cow dairies is not expected to rise. The 2018

GWDR also proposes to provide coverage for dairy facilities milking animals other than cows, such as water buffalo, sheep, and goats, which will add about 10 facilities to the Dairy Program. More small sheep and goat dairies can be expected to be enrolled in the coming years.



Water Buffallo and Goats. Photos by Cheri Blatt, NCRWQCB

Changes being considered for the draft 2018 GWDR include a requirement for dairies to develop Riparian Area Management Plans. In addition, the draft 2018 GWDR will maintain requirements to develop Water Quality Plans, as well as Nutrient Management Plans for dairies with manure application to land. All of these plans are intended to enhance water quality protection of streams and watercourses including those from grazing impacts.

The Monitoring and Reporting Program will continue to include surface water and groundwater monitoring. Annual Reporting each November will ensure that the dairy operator has assessed the

effectiveness of all best management practices, including manure pond capacity, prior to the winter rainy season. Staff inspections in spring and fall, and group monitoring, ensure compliance.

A draft Initial Study per California Environmental Quality Act (CEQA) is being developed for the 2018 GWDR for all existing, expanding, and future dairies that meet the requirements of the Order. For any new dairies proposed for coverage, Water Quality Plans, Riparian Management Plans, and Nutrient Management Plans would be required for submittal at the time of permit application. In accordance with Assembly Bill 52 (Gatto), signed into law in 2015, the draft Initial Study will address protection of Tribal Cultural Resources.

The draft GWDR and Initial Study-CEQA package is tentatively scheduled to be distributed for 30-day public and agency review later in 2018.

Any new, expanding, or re-opening dairies at previously abandoned dairy sites, that apply for coverage in the future will only be considered by Regional Water Board if their application meets the requirements of the 2018 GWDR and the associated Initial Study/CEQA document. Dairy projects that do not meet these requirements will be denied general coverage and will need to draft a more appropriate CEQA document and apply for Individual WDRs.

Each year, North Coast Regional Water Board staff in the Dairy Program continue to work with various groups and organizations, meeting regularly, and keeping up with advancements in ways to protect water quality and provide compliance assistance to dairies enrolled in the Program. Regional Water Board staff coordinate with the following groups: California Dairy Quality Assurance Program; Western United Dairymen; Natural Resources Conservation Service: Resource Conservation Districts; the State 319(h) Grant Program; the roundtable group of State regulators of Confined Animal Facilities; Farm Bureaus including the Sonoma-Marin Animal Resource Committee Meeting: Air Resources Control Board: California Department of Food and Agriculture, including the

Alternative Manure Management Program (AMMP); University of California Cooperative Extension; University California at Davis Agriculture Program; Department of Water Resources Sustainable Groundwater Management Act (SGMA); Central Valley Dairy Representative Monitoring Program; the State Water Resources Control Board-Division of Water Quality–Land Disposal Unit (dead animal handling) and Division of Water Quality (regulation of compost operations).

For additional information please contact Cherie Blatt at 707-576-22755 or Cherie.Blatt@waterboards.ca.gov



# Cyanobacteria Education, Outreach, and Scientific Collaboration

Lisa Bernard and Rich Fadness

Cyanobacteria are aquatic and photosynthetic; that is, they live in the water, and can manufacture their own food. Because they are bacteria, they are quite small and usually unicellular, though they often grow in colonies large enough to see.1 Under certain water quality conditions cyanobacteria rapidly multiply, causing nuisance blooms. When these blooms contain toxin-producing species, they are termed harmful algal blooms (HABs). Human or animal exposure to cvanotoxins can occur by ingestion, dermal contact, and aspiration or inhalation. Exposure to these invisible toxins can cause rashes, skin and eye irritation, allergic reactions, gastrointestinal upset, and other effects including liver toxicity and neurotoxicity. At high levels, exposure can result in serious illness or death.

Blooms of toxin-producing cyanobacteria are found in lakes, reservoirs, rivers and estuaries throughout the North Coast Region. The presence, type, and

<sup>&</sup>lt;sup>1</sup> http://www.ucmp.berkeley.edu/bacteria/cyanointro.html

amount of cyanobacteria and cyanotoxins they produce vary within our waterbodies, seasonally, and from year to year. Cyanobacteria species identification within a particular system is important to aid in monitoring for the appropriate toxins and understanding the potential risks to public safety. Laboratory analysis is necessary to determine if specific cyanotoxins are present and whether those toxins exceed a recommended level for public health protection, as visual observation cannot provide this information.

There are generally two types of HABs;

1) planktonic, wherein the cyanobacteria organisms float or drift in a body of water; and

2) benthic, wherein colonies of cyanobacteria organisms are living on the bottom of a body of water, or attached to the substrate. Planktonic HABs can appear as foam, scum, or mats on the surface of fresh water lakes, reservoirs, and ponds. The blooms can be blue, bright green, brown, or red and may look like paint floating on the water. Benthic blooms can look like green, brown, yellow, or black growth on the bottom of the lakes and streams and do not affect the appearance of the water to the untrained eye.

Increased scientific understanding of benthic HABs is key to ongoing public health protection, education and outreach. Since 2015, the Regional Water Board's CyanoHAB program staff have focused on monitoring for the protection of public health while collecting data to further understand the habitat, growth patterns, and toxin production of benthic cyanobacteria found in North Coast Rivers to better understand the exposure routes and risks associated with these blooms.

Through monitoring under the Regional Water Board's CyanoHAB program, staff have discovered that benthic cyanobacteria species are impacting at least three of our major river systems (the Eel River, South Fork Eel River, and Russian River) and creating public health issues. There are a variety of benthic cyanoHABs forming in these waterbodies. For example, the figure below is a collage of cyanobacteria photos taken by Regional Board CyanoHAB program staff at the monitoring station

in the South Fork Eel River, just upstream of the popular Reggae on the River event location near Richardson's Grove State Park.



South Fork Eel River, Cooks Valley Aug. 29, 2017

This collage exemplifies the variety of benthic cyanobacteria that can be present in a single location. Analysis of these specific algal mats indicated high levels of cyanotoxins present within the colonies, which could be released to the water column, demonstrating the potential risk to public health.

In general, little is known about the variety of species, habitats, and toxicity associated with benthic HABs. As a result, there is uncertainty regarding the controllable factors, means of measurement, proper monitoring strategy and protocols, management, and mitigation of these benthic blooms. Some key questions related to these potentially toxin-producing species include:

- What are the water quality drivers that result in a benthic HAB?
- What is the fate and transport of toxins produced from benthic HABs, especially those occurring in a moving system?
- Can we develop ways to limit cost of monitoring and still protect public health?

With these and other questions in mind, North Coast CyanoHAB staff initiated an international scientific workgroup to accelerate mutual learning and further our understanding of benthic HABs. The purpose of the workgroup is to network with scientists and policy makers across the country and around the world in order to develop and answer

research questions, share data and monitoring protocols, share experiences and lessons learned on genetic and toxin analysis, and in general, gain a better understanding of benthic cyanobacteria, their habitat preferences, and the toxins they produce.

Regional Board CyanoHAB program staff coordinated a benthic HAB workgroup kickoff webinar meeting in July 2017, and facilitated the second webinar in January 2018. Both webinars were well attended by governmental representatives and research scientists across the United States as well as members from New Zealand and France. This is an open memberdriven workgroup with volunteer coordinators and presenters helping to set agendas and guide meeting content. U.S. EPA has agreed to host meeting information and agenda content for the Benthic HAB Workgroup on the EPA Nutrient Policy Data webpage.

#### Benthic HABs Discussion Group Mission Statement:

The mission of this international collaborative is to accelerate mutual understanding of benthic HABs in rivers and lake systems, by sharing data and monitoring protocols, experiences and lessons learned.

The next Benthic HAB Workgroup meeting is scheduled for May 22, 2018 and will highlight scientific research efforts led by Regional Water Board CyanoHAB program staff in collaboration with other researchers on benthic HABs in the Eel River and Russian River.

For additional information please contact Lisa Bernard at 707-576-2677 or <a href="mailto:lisa.bernard@waterboards.ca.gov">lisa.bernard@waterboards.ca.gov</a>



### Russian River Watershed Association Environmental Column: - Is Your Toilet Also A Trash Can? No!

Most things do not belong in the toilet. In fact, it is easier to list what *can* go in: water, toilet paper, pee and poo (the three P's).

However, many people seem to think the sanitary sewer system is a way to get rid of all kinds of waste. Drop it down the drain and it is out of sight, out of mind. What can go wrong? Plenty. Every time materials besides human waste and toilet paper get into our sewer system, it costs the community. These materials can clog the pipes and disrupt the wastewater treatment process. The clogging can back up sewer pipes and damage homes and businesses, as well as drive up sewer maintenance costs and increase sewer bills.



## Can I pour my cooking grease down the kitchen sink?

No. It is never OK to put fats, oils, and grease down the drain. Grease poured down the sink (or into the garbage disposal) will cool and harden, leading to unpleasant odors and blockages in your pipes. Instead, pour excess grease into a container with a tight-fitting lid for storing. Use a scraper or spatula to remove all the grease from the pan. Freeze it, or allow it to harden on its own, and throw the hardened oil away on trash day. For more information, see

www.rrwatershed.org/project/fats-oils-and-grease.

#### Expired medicines can be flushed down, right?

No. Recent studies of our nations' waterways have shown that flushing pharmaceuticals down the toilet or dumping them in the trash might be setting the stage for environmental and human health problems. Medicines should be brought to a local drug take-back site. Visit

<u>www.rrwatershed.org/project/safe-medicine-disposal</u> to learn how to properly dispose of unwanted medications.

# I've heard that disposable wipes must go in the trash, but if the package says "flushable" then is it OK to flush it in the toilet?

No. Tests have shown that "flushable" wipes do not degrade readily like toilet paper. Many municipalities around the state, country, and world are experiencing serious and costly problems with "flushable" products within their sewer systems. Even paper towels and tissues can't break down fast enough if flushed down the toilet. An option for reducing the waste of these wipes is to use sponges or rags that can be washed and reused.

# Can old cleaning or personal care products be emptied into the toilet before I put the containers in the trash?

No. Household hazardous materials should not be flushed because they do break down in water. Dissolved chemicals can travel through the sewer system and pollute the Russian River and the marine environment. Hazardous chemical products, such as antifreeze, batteries or motor oil, as well as solvents, bleach, nail polish, all cleaners, disinfectants, pesticides, polishes, stain removers, fabric softeners, ammonia, dryer sheets, hair care products, fragrances, skin care products, cosmetics, lotions, and more should be taken to a local household hazardous waste disposal site. For information regarding disposal of hazardous materials, including local disposal centers, visit www.recyclenow.org for Sonoma County and www.mendorecycle.org for Mendocino County.

Purchase products made with natural ingredients and avoid products that use chemicals like those mentioned above. For more information and ideas on safer cleaning and living products, visit Sebastopol Toxics Education Program (STEP) at <a href="https://www.healthyworld.org/STEPIndex.html">www.healthyworld.org/STEPIndex.html</a> or Community Action Publications at <a href="https://www.healthyworld.org">www.healthyworld.org</a>.

## I have a food sink. Can I dump food waste down the sink with no problems?

No. A large mass of food waste, even ground up, moving through the sanitary sewer pipes can mix with trash, grease, tree roots, and more to block a pipe. Small amounts are OK to keep your drain flowing, but your drain is not a garbage can. Food waste is compostable, and when combined with mulch are great for your garden.

## I've heard it is acceptable to clean painting equipment like brushes and rollers in the sink?

It depends. For Latex water-based paints, remove as much of the paint off the painting tools onto a newspaper before washing them in the sink. Oilbased paints and solvents must be treated as hazardous waste. For information regarding disposal of hazardous materials and paint, including local disposal centers, visit <a href="https://www.recyclenow.org">www.recyclenow.org</a> for Sonoma County and <a href="https://www.mendorecycle.org">www.mendorecycle.org</a> for Mendocino County.

## So, no trash should be flushed down the toilet or any drain?

Yes! Do not flush items like hair, wrappers, toys, cotton balls, feminine hygiene products, rags, dental floss, cigarette butts, dust/dirt/lint, rubber gloves, bandages, any plastic, condoms, underwear, and cat litter. This is just a small sample of the items found in the sanitary sewer system. Consider donating gently used clothing and toys. Determine if your plastic can be recycled; if not, then throwing it away. Any remaining waste can be placed in the trash to save yourself time, money, and stress while protecting your home, environment, and community.

This article was authored by Forest Frasieur, of the City of Santa Rosa, on behalf of RRWA for the March 2018 RRWA Environmental Column.



# **Enforcement Report for May 2018 Executive Officer's Report**Diana Henrioulle

Date Issued	Discharger	Action Type	Violation Type	Status as of April 25, 2018
3/21/2018	Green Diamond Resource Company	NOV	Unauthorized discharges to waters of the state	Complete

**Comments:** On March 21, 2018, the Nonpoint Source and Surface Water Protection Division Chief issued and Notice of Violation (NOV) to Green Diamond Resource Company for discharges from a road used in the wet season due to a lack of adequate drainage and road surface protection. On February 21, 2018, the Discharger submitted the *Notice of Discharge* to Staff, which documented that the Site was cleaned and re-rocked on February 14, 2018. No further action is required.

Date Issued	Discharger	Action Type	Violation Type	Status as of April 25, 2018
3/28/2018	Sunday Morning LLC	NOV	Unauthorized discharges to waters of the state associated with cannabis cultivation	Ongoing

**Comments:** On March 28, 2018, the Assistant Executive Officer (AEO) issued an NOV to Sunday Morning LLC for unauthorized discharges to waters of the state from site development and use for cannabis cultivation. The NOV transmits a site inspection report, includes a directive to enroll for regulatory coverage for waste discharge, and requires the discharger to submit a Water Resource Protection Plan (WRPP) and schedule to address violations. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of April 25, 2018
4/5/2018	Rhys Vineyards	NOV No. 2	NOV/13267	Ongoing

**Comments:** On April 5, 2018, the AEO issued an NOV to Rhys Vineyards for failure to fully comply with an NOV/13267 Order sent on February 24, 2017. The NOV identifies the Order directives that had not been satisfactorily fulfilled, transmits a draft Cleanup and Abatement Order (CAO) that includes directives to correct deficiencies in information provided, and advises the recipients that staff anticipate issuance of a final CAO on or around June 4, 2018. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of April 25, 2018
4/9/2018	Thomas and Tina	CAO	Unauthorized discharges to waters of the state and failure to obtain	Ongoing
	Harwood		necessary permits	

**Comments:** On April 9, 2018, the EO issued Cleanup and Abatement Order No. R1-2018-0027 to Thomas and Tina Harwood for unauthorized discharges of waste to waters of the state from an illegally constructed, unlined pond. The dischargers used an unlicensed contractor to build the pond, after the start of the rainy season, without applicable permits for land clearing, grading, and instream work. In inspecting the pond, staff observed that the interior and exterior slopes of the unlined, earthen pond had slope failures resulting in actual and threatened sediment discharges to

surface waters. In reflection of the imminent threat of catastrophic failure, staff recommended, and the EO concurred, that it was appropriate to issue a final CAO directly, rather than first issuing a draft CAO. The CAO requires that the dischargers take immediate action to prevent pond failure and/or minimize the potential for adverse impacts to receiving waters resulting from pond failure. The CAO further directs the dischargers to submit plans and timelines to correct sources of active and threatened discharges of waste to receiving waters throughout the property. The dischargers have taken immediate steps as directed to prevent pond failure and, to date, the pond has not failed. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of April 25, 2018
4/11/2018	Dorn Family Partnership	NOV	Failure to comply with NTMP General Waste Discharge Requirements	Ongoing

**Comments:** On April 11, 2018, the Nonpoint Source and Surface Water Protection Division Chief issued an NOV to the Dorn Family Partnership for failure to comply with the General WDRS for Non-Industrial Timber Management Plans, Order No. R1- 2013-0005. The NOV directs the discharger to take steps to address the violations, submit for review and approval a description of all controllable sediment discharge sites on the plan area and proposed corrective actions, by June 15, 2018, and fully implement all corrective actions by September 15, 2018. This matter is ongoing.

Date Issued	Discharger	Action Type	Violation Type	Status as of April 25, 2018
4/24/2018	Loleta CSD WWTF	ACLC	MMPs	Ongoing

**Comments:** On April 24, 2018, the AEO issued an Administrative Liability Complaint Order No. R1-2018-0026 to Loleta CSD WWTF for violations subject to mandatory minimum penalties (MMPs). The ACLC covers the period from June 1, 2014, to February 28, 2018, during which the discharger reported 111 effluent limit violations. 110 of these violations are subject to MMPs. Accordingly, the proposed penalty is \$330,000. Response from the discharger is due by May 24, 2018. 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 upcoming Board meetings in July and September 2018. **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.

### <u>July 11, 2018 (Santa Rosa)</u>

- \* Resolution approving Sonoma County Local Area Management Plan (Charles Reed) [A]
- Forestville WWTF WDRs (Cathy Goodwin) [A]
- DG Fairhaven Power, LLC, Fairhaven Power Facility WDRs (Justin McSmith) [A]
- Elk River Pilot Project CEQA Certification (Chuck Striplen) [A]
- Water Quality Trading Framework for Laguna de Santa Rosa (David Kuzsmar) [A]
- Fiscal Year 2018-2019 Work Plan for the NCRWQCB (Matt St. John) [I]
- Update on Regional Water Board Enforcement Priorities (Diana Henrioulle) [I]
- Update on Regional Water Board CyanoHAB Program (Lisa Bernard & Rich Fadness) [I]

#### <u>September 6, 2018 (TBD)</u>

- Ukiah NPDES Permit Renewal (Cathy Goodwin) [A]
- McKinleyville PUD WWTF WDRs (Justin McSmith) [A]
- Cloverdale WWFT NPDES (Imtiaz-Ali Kaylan) [A]
- Green Diamond Resource Company South Fork Elk Management Plan (Jim Burke) [A]
- Update on fire-related debris management (Charles Reed or Diana Henrioulle) [I]
- Update on post-fire Water Quality monitoring results (Katharine Carter) [I]
- 2018 Triennial Review of the *Water Quality Control Plan for the North Coast Region* and the Basin Planning Workplan for Fiscal Years 2018 2021 (*Alydda Mangelsdorf*) [A]

[U] = Uncontested Item [A] = Action Item

[W] = Workshop Item [I] = Information Item

[R] = Resolution

<sup>\*</sup>These items are pending county approval first, so timing is uncertain