



EXECUTIVE OFFICER’S REPORT • July 2018

Covers May 16, 2018 – June 15, 2018

State and Regional

Contents

- 1. Personnel Report – *Eric Shay*..... 1
- 2. Changes in Department of Water Resources Draft Prioritization of Groundwater Basins under SGMA Affecting the Lahontan Region – *Lisa Dernbach* 2
- 3. Standing Item - Lake Tahoe Nearshore Program Status – *Robert Larsen* 3
- 4. Standing Item - Lake Tahoe Municipal NPDES Permit Update – *Robert Larsen* 4
- 5. U.S. Army Corps of Engineers, Sacramento District’s In-Lieu Fee Program – Truckee Meadows Restoration Project – *Elizabeth van Diepen*..... 5
- 6. Tribal Consultation with San Manuel Band of Mission Indians – *Jennifer Watts* 5
- 7. Ski Run Marina Laminar Flow Aeration Pilot Test – *Russell Norman* 6
- 8. Standing Item - Leviathan Mine, Alpine County – *Leviathan Unit*..... 6
- 9. Woodfords Sodium Hypochlorite Solution Spill – Update of Spill Response and Cleanup Activities – *Abby Cazier*..... 9
- 10. Standing Item - Region-wide Grazing Update – *Bruce Warden & Ben Letton* 10
- 11. Per- and Polyfluoroalkyl Substances (PFAS) at Military Facilities, Lahontan Region – *Linda Stone*..... 12
- 12. 2018 Desert Symposium: Against the Current – *Jeff Fitzsimmons* 13
- 13. Support for Countywide Service Review for Wastewater - Local Agency Formation Commission for San Bernardino County – *Jehiel Cass*..... 14
- 14. Update on Barstow Perchlorate – *Alonzo Poach* 16
- 15. 4.55 Million Gallon Release of Tertiary Treated, Disinfected Wastewater at Palmdale Wastewater Reclamation Agricultural Site – *Jehiel Cass*.....
- 16. Standing Item – Quarterly Violation Report – First Quarter 2018LATE ADDITION

1. Personnel Report – *Eric Shay*

New Hires

- Trevor Miller, Water Resource Control Engineer, North Basin Regulatory Unit, South Lake Tahoe. This position is the office’s primary contact for domestic

wastewater treatment facilities and domestic wastewater issues in the north, in addition to being responsible for several industrial discharges. The position involves conducting field inspections, interacting with County health offices, reviewing design reports, determining compliance permits, and writing Waste Discharge Requirements and National Pollutant Discharge Elimination System Permits. The previous incumbent was Rob Tucker.

Vacancies – We are currently recruiting for the following positions:

- Water Resource Control Engineer (2 positions), Waste Water & Agricultural Operations Unit, Victorville. These positions provide regulatory oversight of projects involving discharges to groundwater or surface waters and projects intended to restore and/or enhance water quality in the Waste Discharge Requirements (WDRs), National Pollutant Discharge Elimination System (NPDES), and Site Cleanup Programs. The previous incumbents were Cephas Hurr and Mike Coony (pending retirement).
- Executive Assistant, South Lake Tahoe. This position provides administrative assistance and clerical support to the Executive Officer, the Assistant Executive Officer, and the Regional Board members.
- Office Technician, South Lake Tahoe. This position supports our technical staff by finalizing staff correspondence and board agenda packets.

Departures

- Kathy Otermat, Executive Assistant, South Lake Tahoe. Kathy has transferred to the Department of Housing and Community Development in Sacramento (promotion to Administrative Assistant I).
- Gina Gennaro, Seasonal Clerk, South Lake Tahoe. Gina has transferred to California Highway Patrol in South Lake Tahoe (promotion to Office Assistant).

2. Changes in Department of Water Resources Draft Prioritization of Groundwater Basins under SGMA Affecting the Lahontan Region – Lisa Dernbach

The Department of Water Resources (DWR) developed groundwater basin prioritizations following 2009 legislation requiring the collection of seasonal groundwater elevations in all statewide groundwater basins. The data were used to prioritize groundwater basins as high, medium, low, or very low, based on a variety of factors identified in law such as population and number of water wells in a basin.

Following the adoption of the 2014 Sustainable Groundwater Management Act (SGMA) and the 2016 modification to groundwater basin boundaries, DWR identified the need to use updated data and address new considerations that were not part of the original groundwater basin prioritization. The updated information DWR used to re-evaluate groundwater basin prioritization included:

- Adverse impacts on local habitat and local stream flows,
- Adjudicated areas,
- Critically overdrafted basins, and
- Groundwater-related transfers.

Based on this new evaluation, DWR recently released the 2018 SGMA Basin Prioritization. Of the 517 groundwater basins statewide, the newly released prioritization identifies 109 basins as high- or medium-priority, which are subject to SGMA. Fourteen basins previously ranked as low- or very-low are now ranked as high- or medium-priority. There were no changes to basin prioritization for the seven basins in the Lahontan Region identified as high- and medium-priority. However, the Owens Valley and Indian Wells

Valley were upgraded from medium priority to high priority, with the Indian Wells Valley being the region’s only critically overdrafted basin.

Lahontan Region Groundwater Basins Originally Subject to SGMA

Basin or Subbasin	Region Location	Previous Priority	Changed Priority	GSP Due
Martis Valley	North Lahontan	Medium	NA	2022
Tahoe South	North Lahontan	Medium	Very Low	NA
Owens Valley	South Lahontan	Medium	High**	2022
Indian Wells Valley	South Lahontan	Medium	High (critically overdraft)	2020
Antelope Valley*	South Lahontan	High	Very Low	Annual Reporting
Mojave Basin*	South Lahontan	Low to High	Very Low	Annual Reporting
El Mirage Valley*	South Lahontan	Medium	Very Low	Annual Reporting

GSP=Groundwater Sustainability Plan

NA=not applicable

*Adjudicated

**Based on partial adjudication and groundwater exports

Thirty-eight basins previously ranked as high- or medium-priority are now ranked low- or very-low priority in DWR’s new evaluation and are no longer subject to SGMA. This includes 24 adjudicated basins that are required to submit annual reports. There was only one change in the Draft Basin Prioritization affecting the Lahontan Region; the Tahoe South subbasin in the Tahoe Valley basin was downgraded from medium priority to very-low priority. This was likely based on information submitted by the Tahoe South Groundwater Sustainability Agency (GSA) showing 1) there is no documentation on groundwater level decline past or present in the basin and 2) annually only one-tenth of groundwater aquifer supply is used, indicating sustainability. While low-priority basins are not subject to SGMA and do not have to submit Groundwater Sustainability Plans (GSPs), DWR still encourages GSAs to update local groundwater management plans.

DWR is soliciting comments on the Draft 2018 SGMA Basin Prioritization, due by July 18, 2018. The 2018 SGMA Basin Prioritization is scheduled to be finalized by fall 2018. When the 2018 SGMA Basin Prioritization is made final, the basins newly subject to SGMA must form GSAs within two years and adopt GSPs within five years or they must develop an approved alternative plan.

North Lahontan Region

3. Standing Item - Lake Tahoe Nearshore Program Status – Robert Larsen

Lake Tahoe’s nearshore remains a complex research and monitoring topic. As the Water Board continues to fund long-term data collection, the agency and its partners have targeted understanding the drivers of attached algae (periphyton) growth, and in evaluating what (if any) management actions can be taken in response to elevated periphyton conditions.

A study led by the United States Geological Survey (USGS) shore looked closely at the sources of nutrients supporting periphyton at the Pineland monitoring location on Lake Tahoe’s west. The final report noted that high-concentration nutrient pulses delivered via groundwater following precipitation events were coincident with elevated periphyton growth. While not definitive, this research suggests that groundwater nutrient cycling may play an important role in periphyton growth timing, location, and density.

Even with existing long-term data collection efforts and studies, there are still many unknowns regarding the status of nearshore conditions in Lake Tahoe. Following Nearshore Agency Working Group (NAWG) recommendations, Water Board staff are working with agency and academic partners to develop contracts to initiate priority research projects. In light of the USGS study findings, Water Board staff expect to fund two different projects that will use isotopic analysis to better identify the source of the high-concentration nutrients being delivered by groundwater. Staff are also working on a project that will establish crayfish exclusion/inclusion plots to assess the impact of the invasive species on periphyton growth.

In addition to the periphyton research, the Water Board has funded the Tahoe Regional Planning Agency (TRPA) to lead a lake-wide aquatic plant survey to guide invasive species management action and a comprehensive human health survey to assess bacteria and toxin levels at popular public access sites. TRPA has selected a contractor for the plant survey, and has released a request for proposal for the human health study. Fieldwork for both projects should be conducted this summer, with final reports available early 2019.

Water Board staff plan to present a broad update on Lake Tahoe efforts at the September 2018 meeting that will include discussion of these and other nearshore program topics.

4. Standing Item - Lake Tahoe Municipal NPDES Permit Update – Robert Larsen

Order R6T-2017-0101 serves as the National Pollutant Discharge Elimination System (NPDES) Municipal Storm Water Permit (Permit) that regulates runoff discharges from the three municipalities on the California side of the Lake Tahoe Basin. As the primary implementing tool for the Lake Tahoe TMDL, the Permit incorporates the Lake Clarity Crediting Program (LCCP) to track and account for pollutant load reduction requirements.

Prior to the updated Permit adoption in March of last year, the three co-permittees (City of South Lake Tahoe, El Dorado County, and Placer County) all declared and were awarded sufficient Lake Clarity Credits to demonstrate the ten (10) percent fine sediment particle reduction required by the previous permit. The Permittees also submitted updated Pollutant Load Reduction Plans that describe potential actions to achieve a 21 percent fine sediment particle load reduction before the end of the new Permit term in 2020.

The co-permittees submitted the required annual reports in March of this year. The reports document local government's storm water program implementation efforts, and include brief summaries of the load reduction work documented in the LCCP. All three reports were deemed compliant with Permit requirements. On June 1, 2017, the Executive Officer issued a 13383 Order requiring the MS4 permittees to take specific actions to comply with the trash requirements.

The online tracking software that supports the LCCP continues to improve, supported by local government and state resources. The Water Board, the Nevada Division of Environmental Protection, and Tahoe Regional Planning Agency (TRPA) have made significant progress in integrating the LCCP into the region-wide Lake Tahoe Info (<https://laketahoeinfo.org/>) platform, including linking the LCCP tracking efforts with individual parcel tracking and Environmental Improvement Program databases.

The storm water tracking system is also now open to the public, allowing interested parties to explore Credit registrations, specific treatment facility and roadway segments targeted for maintenance, and view individual jurisdiction details. See <https://stormwater.laketahoeinfo.org/> for more information.

Water Board staff look forward to discussing these and other Permit accomplishments at the September Water Board meeting as part of the broader Lake Tahoe Programs Update presentation.

5. U.S. Army Corps of Engineers, Sacramento District's In-Lieu Fee Program – Truckee Meadows Restoration Project – Elizabeth van Diepen

The U.S. Army Corps of Engineers, Sacramento District's In-Lieu Fee (ILF) Program is administered by the National Fish and Wildlife Foundation (NFWF), and provides an option to mitigate for impacts to surface water bodies, including wetlands, in certain portions of the Lahontan Region under Clean Water Act dredge and fill permits. In the Lahontan Region, the ILF Program covers the Modoc area north of Tahoe to the Oregon border; the Tahoe area, including Truckee; and the Carson Walker Basin just south of Bridgeport. More information about the NFWF and the ILF Program can be found on page 19.

The program was approved through the execution of an Enabling Instrument in 2014 by the program sponsors, including the Water Board and the Central Valley Regional Water Quality Control Board. In-lieu fee mitigation payments (credits) are pooled to fund larger and more robust projects than generally feasible when permittees are responsible for implementing mitigation projects to offset impacts to surface waters. Projects implemented as part of the ILF Program are planned and scrutinized by NFWF staff, which includes wetland scientists and planners. To the extent feasible, credits are used in the watersheds generating the payments. NFWF is in the process of funding the first in-lieu fee project in the Lahontan Region, slated to be implemented in Truckee this summer. To date, approximately \$9,000 has been collected for the Modoc area; \$22,000 for the Carson Walker Basin; and \$225,000 for the Tahoe-Truckee area.

The Truckee Meadows Restoration Project (Project) Development Plan was jointly prepared by NFWF and the Truckee River Watershed Council (TRWC). The Project is in the ILF Program's Tahoe Service Area and will rehabilitate 6.56 acres of mountain wet meadow habitat within an 11.86-acre parcel. NFWF will release 2.91 credits collected from multiple projects located within the ILF Program's Tahoe Service that have paid into the program (\$225,000) to offset their surface water impacts.

The Project site has experienced a decline in function due to construction of artificial drainage ditches that contribute to more rapid runoff resulting in increased erosion and export of sediment to the Truckee River immediately downstream of the Project site. Project implementation will improve hydrologic function, wildlife and plant habitat, carbon sequestration, and downstream water quality.

The Truckee Meadows Restoration Project Development Plan has been thoroughly reviewed by the Interagency Review Team consisting of representatives from the National Oceanic and Atmospheric Administration, United States Army Corps of Engineers, United States Environmental Protection Agency, State Water Board, and Lahontan Water Board. Extensive comments received by the Interagency Review Team has yielded the revised and final Project Development Plan, which needs approval via amendment to the ILF Program Enabling Instrument.

In mid-June, I signed an amendment to the ILF Program Enabling Instrument, which will incorporate the approved Project Development Plan into the Enabling Instrument. Funding related to the 2.91 credits referenced, above, will be released to the TRWC once the remaining signatories sign the amendment. The TRWC plans to proceed with the Project this summer following receipt of this funding.

6. Tribal Consultation with San Manuel Band of Mission Indians – Jennifer Watts

Water Board staff are developing an amendment to the Water Quality Control Plan for the Lahontan Region (Basin Plan) that involves making changes to the beneficial uses assigned to the Mojave River and its tributaries. The project was prioritized in the 2015 Triennial Review. The California Environmental Quality Act (CEQA) has created an opportunity for Native American Tribes in California to consult with state agencies when agencies are

proposing to take actions subject to CEQA review. Water Board staff reached out to the San Manuel Band of Mission Indians (Tribe) to notify the Tribe that the Lahontan Water Board was initiating a project to amend the Basin Plan, as required by CEQA.

The Tribe identifies the Mojave River area as a part of its ancestral territory and had previously requested to be notified for projects undertaken by the Lahontan Water Board that affect this area. The Tribe responded affirmatively to the request for consultation. After consultation with the State Water Resources Control Board's Office of Public Participation, Water Board staff members Scott Ferguson, Dan Sussman, and Jennifer Watts traveled to southern California in May to meet with the Tribe's Cultural Resources Department at their headquarters in Highland. The meeting provided an opportunity to develop rapport, listen to the Tribe's ideas regarding protection of tribal cultural resources in the Mojave River watershed, and for Water Board staff to describe the rationale for the proposed changes to the Basin Plan and provide an overview of the Basin Plan Amendment process. The Tribal representative did not object to the changes being proposed to the Basin.

The meeting went very well and allowed for a good exchange of information. The Tribe's representative offered to review and assist Water Board staff with the CEQA elements addressing Tribal Cultural Resources. The Tribe's representative and Water Board staff expressed a mutual desire to continue the dialogue as the project proceeds.

7. Ski Run Marina Laminar Flow Aeration Pilot Test – *Russell Norman*

The Lahontan Water Board issued a 401 Water Quality Certification in June 2018 to Ski Run Marina for the first laminar flow aeration (LFA) pilot test project in Lake Tahoe. Ski Run Marina plans to run the LFA test for five years and conduct extensive monitoring to evaluate if laminar flow inversion and oxygenation will result in improved water and sediment quality and a reduction in aquatic invasive plant growth in Ski Run Marina.

LFA uses air diffusers consisting of microporous ceramic disks that are placed on the bed of the water body in the area to be aerated. The diffusers are connected to weighted air lines which are connected to an air compressor located in an upland area adjacent to the water body being treated. Atmospheric air is pumped through the system creating bubbles that diffuse through the water column. Surface tension on the bubbles helps facilitate the movement of water near the bed to the surface of the water body (i.e., laminar flow inversion) as the bubbles rise through the water column to the water surface. The water and sediment in the water body are aerated in the process. This action mixes the water in the water body breaking up any stratification present, aerates the water column from bed to surface, and aerates the bed sediments.

The increase in dissolved oxygen in the bed sediments is believed to result in transformation of ammonia in organic sediments to nitrite and then nitrate. Nitrate is not a preferred source of nitrogen for macrophytes (e.g., aquatic invasive plants) so, it is theorized that reducing ammonia in a water body with organic bed sediments will limit the growth of aquatic invasive plants. Once all sediment organic matter is oxidized, the remaining bed material will be mineral in nature. Mineral based bed material does not provide the nutrients to support macrophyte growth that organic bed sediments provide.

The 401 Water Quality Certification requires the Ski Run Marina to test the water quality for turbidity, pH, and nutrients; and measure in the sediment the thickness of organic top layer, nutrients, organic carbon content, and to survey the aquatic plants. The laminar flow technology has been used successfully at other lakes in the United States but this would be the first time used in Lake Tahoe.

8. Standing Item - Leviathan Mine, Alpine County – *Leviathan Unit*

Water Board staff continues coordinating with United States Environmental Protection Agency (USEPA), Atlantic Richfield Company (ARC), and project stakeholders

(including the Washoe Tribe of Nevada and California, Nevada Division of Environmental Protection, and the United States Forest Service) for the completion of current and proposed work at Leviathan Mine.

Remedial Investigation and Feasibility Study

ARC submitted a draft Site Characterization Report (SCR) for Leviathan Mine to USEPA and Leviathan Mine stakeholders on December 31, 2017. The SCR summarizes the site characterization components of the Remedial Investigation (RI) performed by ARC, which includes the study of 12 different media (including surface water, mine waste, groundwater, floodplain soil, and stream sediment, etc.). Since receiving ARC's draft SCR, Water Board staff has met multiple times with USEPA, ARC, and Leviathan Mine stakeholders to identify and address key issues with the draft SCR, including various statistical methodologies applied by ARC, mathematical errors, and unclear presentation of results. The SCR meetings have created a forum for the parties to identify issues, ask questions, share information, and explain decisions regarding statistical analysis and calculations. The stakeholders have expressed many of the same concerns about the SCR as those expressed by Water Board staff. Because of the ongoing meetings and remaining unresolved issues, USEPA has suspended the schedule for ARC's completion and submittal of the Draft RI, Draft Feasibility Study (FS), and Final RI/FS. USEPA has yet to specify revised submittal dates for these items. Water Board staff plans to continue its participation in meetings to facilitate resolution of the technical issues with the draft SCR. Water Board staff is preparing written comments on the draft SCR and intends to send those to USEPA, with copies to ARC, and the stakeholders by early July 2018.

In addition to commenting on the Draft SCR, Water Board staff reviewed and commented on ARC's January 31, 2018, *Interim Combined Acid Drainage Treatability Investigation Full Scale Field Demonstration Report*. In the previous January 2018 EO's Report Water Board staff reported that ARC was not able to successfully demonstrate that their High Density Sludge Treatment System (HDSTS) could cost effectively treat combined Acid Mine Drainage (AMD) from the four sources of AMD on the Leviathan Creek side of the mine site (Adit, Pit Underdrain, Channel Underdrain, and Delta Seep) while satisfying criteria for flow rate (143 gallons/minute), effluent quality (satisfy USEPA discharge criteria for dissolved metals and pH), operational downtime (less than 10%), and duration (30 days or until the ponds were completely evacuated). Essentially, Water Board staff did not consider ARC's 2017 demonstration to be successful. Pursuant to the March 27, 2015 *Leviathan Mine Work and Cost Allocation Settlement Agreement (SA)* between the Water Board and ARC, ARC's failure to demonstrate that the HDSTS could cost effectively treat combined AMD flows means the Water Board is not obligated to take over operation of AR's HDSTS for purposes of treating combined flows until the commencement of the Remedial Action. Also, pursuant to the SA, ARC and the Water Board remain responsible for treating the AMD sources that they are currently responsible for (i.e., Water Board - AMD from the Adit and Pit Underdrain, ARC - AMD from the Channel Underdrain and the Delta Seep), until commencement of the Remedial Action at the mine.

Water Board staff will continue to review and comment on RI/FS documents, as these documents will provide the basis for the selection of a final remedy for the Site, which will have long-term implications for the State.

Annual Leviathan Mine Technical Update Meeting

The USEPA hosted the Annual Leviathan Mine Technical Update Meeting on February 2, 2018, in Carson City, Nevada. This half-day meeting is an opportunity for stakeholders to hear about the activities that were conducted at the Leviathan Mine site during 2017. Water Board staff presented an overview of the 2017 Treatment Season (Emergency Spring Treatment, Pond Water Treatment of Adit and Pit Underdrain AMD sources) and maintenance activities. ARC and their contractors presented an overview of the 2017

Treatment Season (HDS treatment of the Channel Underdrain, Delta Seep, and Aspen Seep Bioreactor), RI/FS and risk assessment activities, documents, and work planned for 2018.

Emergency Spring Treatment Operations

In 1999, the Water Board constructed an onsite water treatment system at Leviathan Mine to treat AMD mixed with rain and snow that is held in lined evaporation ponds at the mine site to produce an effluent that satisfies USEPA discharge criteria for pH and dissolved metals. The objective for the Water Board's onsite water treatment system is to remove as much of the pond water as possible during the summer months (when the site is accessible) so that the available pond storage capacity for AMD and rain/snow going into the winter months is maximized. Every summer since constructing the onsite water treatment system, Water Board contractors have mobilized personnel, equipment, and supplies to Leviathan Mine to operate the onsite water treatment system. To date, over 130 million gallons of pond water have been treated through the Water Board's pond water treatment system.

Even with the implementation of summer treatment, it is still possible that during some water years the combined volume of AMD and rain/snow can exceed the available storage capacity of the evaporation ponds. When pond storage capacity is reached, excess inflow (AMD mixed with rain/snow) is diverted via an underground piping system to either Pond 3 for emergency spring treatment or directly to Leviathan Creek. During years when late-winter/early-spring site conditions indicate that there may not be adequate storage capacity remaining in the ponds to contain the estimated flow of AMD and rain/snow without discharge to Leviathan Creek, Water Board staff work with California Department of General Services (DGS) staff to conduct emergency spring treatment.

Emergency spring treatment is accomplished by means of a portable treatment system that can be mobilized to the site before site conditions permit mobilization/operation of the onsite treatment system. The decision to implement emergency spring treatment is based on consideration of several factors, including the following:

- Accumulated precipitation at the Monitor Pass SNOTEL site (as reported by the Natural Resources Conservation Service).
- Depth of AMD in the ponds (as reported by the United States Geological Survey [USGS]).
- AMD influent rate to the ponds from the Adit and the Pit Underdrain (as reported by the USGS).
- Weather forecasts (as reported by the National Oceanographic and Atmospheric Association [NOAA] and Open Snow [local forecaster]), and historic (1990-2017) average and median values for accumulated precipitation during late-winter and spring months at the Monitor Pass SNTOEL site.

Near the end of March 2018, the above measurements and forecasts indicated that emergency spring treatment would likely be necessary to prevent the ponds from reaching capacity and discharging untreated pond water to Leviathan Creek. DGS entered into contract with TKT Consulting, LLC (TKT) to conduct emergency spring treatment.

TKT mobilized to Leviathan Mine on April 20, 2018 and began treating pond water by means of the portable treatment system on April 25, 2018. TKT successfully treated and discharged approximately 920,000 gallons of AMD and ceased treating pond water on May 15, 2018. All discharge from TKT's portable treatment system to Leviathan Creek complied with USEPA's discharge criteria. Since the year 2000, emergency spring treatment has been put into service in 2005, 2006, 2011, 2017 and 2018.

Settlement Agreement (SA) Activities

Water Board staff has continued its efforts to review quarterly cost reports submitted by AR for their RI/FS work. Since January 1, 2018, Water Board staff has reviewed AR's cost reports for the 3rd and 4th quarters of 2017. Issues remain with AR's 4th quarter 2017 cost report. Staff's review of ARC's RI/FS costs will continue for the next several years and is a critical element of a complex cost-sharing and accounting system established by the SA. The SA provides that for every dollar ARC spends for RI/FS work over \$11 million dollars, ARC is to receive a 40-cent credit from the Water Board towards the amount ARC will have to pay for construction of the final Remedial Action for Leviathan Mine. Through the 3rd quarter of 2017, Water Board staff and ARC have come to agreement that ARC has spent nearly \$40 million in RI/FS costs, putting ARC's credit towards construction of the Remedial Action at approximately \$11.5 million.

Work Plan for 2018 Season

As part of annual field season preparation activities, Water Board staff prepared and submitted the following documents:

- 2018 Work Plan for Leviathan Mine to USEPA;
- Updated Health and Safety Plan for Leviathan Mine with assistance from the State Water Board's Health and Safety Office to USEPA;
- Updated Annual Road Use Plan to the United States Forest Service; and
- 2018 Hazardous Materials Business Plan for Leviathan Mine to Alpine County.

9. Woodfords Sodium Hypochlorite Solution Spill – Update of Spill Response and Cleanup Activities – Abby Cazier

On May 9, 2018, a tractor-trailer hauling approximately 4,900 gallons of 12.5 percent sodium hypochlorite (chlorine bleach) solution traveling east bound on Highway 88 near the town of Woodfords lost control and crashed on the north side of the highway. The tractor-trailer came to rest on the embankment on the north side of the highway. The tanker trailer ruptured on impact, causing the entire volume of sodium hypochlorite solution to be



Figure 1 – Overturned sodium hypochlorite solution tanker trailer on Highway 88 embankment

released to the surrounding soils and a drainage channel conveying the flow of an unnamed tributary of the West Fork Carson River. A small area of soil was also affected by diesel fuel and motor oil, where the tractor-portion of the tractor-trailer came to rest.

Immediately after the accident, the California Highway Patrol established a one (1)-square mile evacuation zone centered at the crash site for approximately nine (9) hours, which was lifted once a Hazardous Materials team cleared the scene. California State Highway 88 was closed for approximately 24 hours until the tractor and tanker trailer were removed from the crash site.

The Water Board, California Department of Fish and Wildlife (CDFW), and Nevada Division of Environmental Protection (NDEP) staffs responded to the scene on May 10, 2018, after the highway reopened, to evaluate the spill site and environmental impacts. The observed spill site impacts included chemically burned vegetation, increased soil pH (relative to background conditions), and chlorine odor. While CDFW staff did observe

macroinvertebrate mortality in the drainage channel, none of the parties observed any obvious impacts within the West Fork Carson River (e.g., no chlorine odor, no fish or aquatic organism mortality).

Water Board staff conducted field monitoring and collected water samples from the West Fork Carson River upstream and downstream of the unnamed tributary's confluence with the West Fork Carson River. NDEP staff also conducted field monitoring and water quality sampling downstream of Water Board sample locations and into Nevada. NDEP staff's field monitoring detected low levels of free chlorine at one sampling site (Hwy 89 bridge) early in the morning. Water Board field monitoring and sample results collected later in the day did not indicate any adverse water quality impacts.

California Department of Transportation (Caltrans) and the cleanup contractor for the trucking company, H2O Environmental, started their spill response and cleanup activities on May 10, 2018. The affected soil on the embankment was covered with plastic sheeting to minimize the transport of contaminated sediment/soil due to storm water runoff (showers and thunderstorm occurred the following week) until soil excavation activities occurred. Caltrans crews also cleared a culvert, allowing the unnamed tributary to return to its natural channel, eliminating surface water flow through the affected drainage channel. Native rock was installed in the tributary's natural channel to stabilize the banks and minimize channel erosion.

H2O Environmental began excavating affected soils and vegetation the week of May 29, 2018. Chemically burned vegetation and the top three inches of affected soils were removed from the embankment area and drainage channel. The excavated soil was disposed of at Lockwood Landfill in Reno, Nevada and vegetation debris was disposed of at Carson City Landfill in Carson City, Nevada.

On June 1, 2018, soil confirmation and background samples were collected for laboratory analysis. The analytical data indicate that remaining soils in the embankment has not been cleaned up to background conditions. Water Board staff provided its recommendations for additional cleanup activities to CDFW staff (lead for cleanup efforts) on June 13, 2018. The embankment will be hydroseeded and replanted with native vegetation following completion of cleanup activities.

10. Standing Item - Region-wide Grazing Update – Bruce Warden & Ben Letton

Bridgeport Valley

The Bridgeport Watershed Approach Stakeholders Group met February 7, 2018 to follow-up on their commitment under the Water Board's 2017 grazing waiver to develop bottom-of-valley treatment to address nutrient and pathogen inputs to surface waters in the Bridgeport Valley. Federal Natural Resources Conservation Service (NRCS) staff presented preliminary conceptual plans showing options for bottom of valley water quality treatment.

The treatment options include a variety of different types of structures designed to spread water once flow leaves Bridgeport Rancher's Organization (BRO) member's properties and enters Walker River Irrigation District property. Spreading contaminated water through the wetland enhances solar and vegetative treatment of water which will reduce bacteria concentrations and improve water quality. Bottom of valley diversions are located at Buckeye and Robinson Creeks. Advantages and disadvantages of each type of structure (such as reverse w-weirs and J-hook structures) were discussed with respect to durability, maintenance, effectiveness, fish passage, and cost. The structures are intended to reduce concentrations of sediment and bacteria in the water.

Some outcomes of stakeholder discussion:

- These small-scale structures will be easier to permit than larger-scale techniques.

- Proposed weirs with 2-3-foot diameter angular rocks are better for fish passage than concrete structures.
- The project requires access to the proposed project area for approximately two miles across generally wet soils and the use of low ground-pressure equipment during construction for site access.
- The Group is pursuing funding from a couple of sources--the U. S. Fish and Wildlife, and the Regional Conservation Partnership Program (RCP) through NRCS's Environmental Quality Incentives Program (EQIP) for partners involved in Agricultural Activities.
- Project duration is typically 3-4 years.

NRCS outlined the next steps for the project:

- Perform a more detailed survey and develop detailed engineered plans.
- Follow up on the potential U. S. Fish and Wildlife funding source.
- Assess permitting options: California Fish and Wildlife lake and stream bed alteration (LSA) Fish and Wildlife Code section 1602 letter; US Army Corps of Engineering 404 permits and Water Board 401 Water Quality Certification.

Water Board staff is working with the NRCS, the Irrigation District, and BRO memberships to develop an informational visit to the proposed project site this Summer, likely in late July 2018.

Los Angeles Department of Water and Power (LADWP) Grazing Lands

Staff are currently preparing a request for Report of Waste Discharge (ROWD) for LADWP grazing lands within the Lahontan Region to develop ownership-wide Waste Discharge Requirements (WDRs). Hundreds of water quality samples collected by Water Board staff and LADWP over the past eight years indicate that livestock are the predominant source of high bacterial contamination in many of Lahontan Region's surface waters within LADWP lands, including: Bishop, Horton, and Lower Pine Creeks. Environmental documents, technical reports, plans, diagrams, maps, mitigation and monitoring proposals, and other documents that characterize the discharge from livestock grazing and its impacts upon receiving waters will be included with the ROWD. It is expected that the ROWD letter for grazing on LADWP lands will be complete and submitted by late June 2018.

USFS and BLM Grazing Allotments, Federal NPS Permit Development

Lahontan Water Board staff are currently engaged in the development of a multi-regional effort with the Central Valley Water Board to develop a nonpoint source permit for certain activities on U.S. Forest Service and Bureau of Land Management lands. Livestock grazing and range management are activities that have been identified for inclusion in the permit. Staff are actively engaged with several National Forest to begin evaluating Best Management Practices (BMPs) on several allotments within the Lahontan Region. BMP evaluations that arise from site visits scheduled this summer will help to provide current documentation of BMP effectiveness and areas where water quality problems exist.

One potential area that staff will be focusing on for BMP evaluations and focused water quality sampling is the North and South Eagle Lake Allotments in the Lassen National Forest outside of Susanville, CA. Eagle Lake is currently 303(d) listed for nutrients and historically has been the focus of previous efforts to address problematic septic systems within the Spalding Tract by completing connections with the Spalding Community Services District's wastewater disposal system. However, public concerns over potentially discharge of pollutants from USFS grazing allotments to Eagle Lake continue to be an issue and warrant further investigation by staff.

11. Per- and Polyfluoroalkyl Substances (PFAS) at Military Facilities, Lahontan Region

– Linda Stone

In 2016, the U.S. Environmental Protection Agency (USEPA) established drinking water health advisories for two per- and polyfluoroalkyl substances (PFAS), which are commonly used for fire-fighting and retardation. The USEPA health advisory is set at 70 parts per trillion (ppt) and applies to perfluorooctane sulfonate (PFOS) and perfluorooctanoic acids (PFOA) individually and to their combined total concentration. No current health advisory or maximum contaminant level has been established for any other PFAS. The State Water Resources Control Board, Division of Drinking Water (DDW) is in the process of developing a health advisory for California later this year. In addition to the military sampling their monitoring wells at sites where PFAS were suspected, the DDW required all water purveyors (public and government) to collect and analyze water samples for six PFAS. The six PFAS include PFOS, PFOA, perfluorononanoic acid (PFNA), perfluorohexanesulfonic acid (PFHxS), perfluoroheptanoic acid (PFHpA), and perfluorobutanesulfonic acid (PFBS). These specific compounds were identified for analysis in the United States Environmental Protection Agency’s (US EPA) 3rd Unregulated Contaminant Monitoring Rule, published in 2012.

All military bases in our region that manage their own drinking water systems have complied with this requirement and have sampled all wells that provide drinking water to the installations. Based on the analytical results from these sampling events, only the Sierra Army Depot detected PFAS in one of their drinking water wells above the lifetime exposure limit. The USEPA lifetime exposure limit is 70 parts per trillion (ppt); the one impacted well had a concentration 76.3 ppt. The PFAS-impacted well has been taken off-line.

Some level of investigation and sampling for PFOS and PFOA have been conducted at seven of the eight major military facilities, and that sampling is summarized in the following table. The military is collecting samples in a systematic approach to determine the nature and extent of PFAS impacts at each base. Where PFAS were discovered in groundwater, the military is taking steps to identify if any off-base migration of PFAS are impacting drinking water wells. At Marine Corps Logistics Base, Barstow, one private residence was impacted and the Navy immediately provided replacement drinking water to that residence. At the Marine Corps Mountain Warfare Training Center, Bridgeport, the Navy found no reason to suspect the use or release of PFAS and determined no sampling was necessary. At the Naval Air Weapons Station China Lake, one site had the highest detected concentration of PFAS of any facility in the nation. This was an aircraft carrier deck simulator that one sample with a PFAS concentration of 8,000,000 ppt. The Navy is planning to characterize this and other sites in the near future.

Facility	PFOS/PFOA Groundwater Sampling to Date			Additional Sampling Planned
	Max Concentration Onsite Monitoring Wells	Facility Supply Wells	Offsite Supply Wells	
Air Force Plant 42	NS	ND	NS	Yes
China Lake Naval Air Weapons Station	8,000,000 ppt.	ND	NS	Yes
Edwards Air Force Base	277,000 ppt	ND	NS	Yes
Fort Irwin National Training Center	NS	ND	NS	Yes

Former George Air Force Base	5.40 ppt	NA	NS ²	Yes
Marine Corp Logistical Base Barstow, Nebo Annex	138 ppt	NA	Detected: replacement water provided for one residence.	Yes
Marine Corp Logistical Base Barstow, Yermo Annex	24 ppt	ND	NS	No
Sierra Army Depot	NS	Detected: one well, Well No. 8 at maximum concentration of 76.3 ppt.	NS	Yes

NS = not sampled; ND = not detected

NA = not applicable, facility gets water from offsite source.

ND = not detected.

NS = not sampled.

ppt = parts per trillion.

¹Highest detection of PFOS/PFOA documented at any military base, i.e., 8,000,000 ppt.

²Water Board staff have requested sampling of adjacent supply wells at George AFB. To date, the Air Force has not complied.

12. 2018 Desert Symposium: Against the Current – Jeff Fitzsimmons

From April 20 through 24, 2018, Water Board staff, Jeff Fitzsimmons, attended Desert Symposium 2018, which is based at the California State University Desert Studies Center located in Zxyzx, San Bernardino County. Desert Symposium has been an annual event since 1988 and guided by the Desert Symposium's Mission Statement: "The Desert Symposium stimulates, reports, documents and disseminates new research on any aspect of arid lands. It promotes scientific research and educational excellence by holding a themed annual meeting, leading field trips and fostering student involvement in research. Topics include but not limited to geologic sciences, life sciences and ecology, climate and hydrology, desert culture, history and arid lands management." In short, Desert Symposium serves to promote research, provide opportunity for networking within the scientific community, and allow for informal and formal discussions of topics and ideas.

The theme of 2018 Desert Symposium was "Against the Current" with focus on the Mojave River from its headwaters in the San Bernardino Mountains to its terminus at Soda Lake. The first two-days of the event included oral (Photograph 1), keynote, and poster presentations. The formal presentations were followed by a field trip with mini presentations at each of the field trip stops (Photographs 2 and 3). Topics presented pertained to animal and plant biodiversity, geochemistry, geologic history, hydrology, tectonics, and water quality. Speakers included professional and student researchers, professionals in industry, and representatives of local, state, and federal government practicing within the multiple disciplines of earth and natural sciences.



Photograph 1: Mr. Tom Spinks, Paleontology Volunteer for Anza-Borrego Desert State Park, California, presenting "Miocene Age Petrified Wood from the Alverson Formation."



Photograph 2: Ms. Whitney Seymour, Geographer with the United States Geological Survey, California Water Science Center, presenting on the recharge of the Upper Mojave Desert.



Photograph 3: Ms. Anna Garcia, Senior Hydrogeologist with the Mojave Water Agency, discussing the lacustrine sediments of Harper Basin.



Photograph 4: Dr. Jeff Lovich, Research Ecologist with the United States Geological Survey, Southwest Biological Center, discussing the Southwestern Pond Turtle population decline and hazards to which the turtles are exposed to in Afton Canyon.

The presentation by Dr. Jeff Lovich, Research Ecologist with the United States Geological Survey (USGS), provided an overview of Southwestern Pond Turtle presence within the Mojave River (Photograph 4). In general, recent population surveys appear to indicate that the Southwestern Pond Turtle is in decline. Water Board staff suggested additional areas along the Mojave River for future surveys. In addition, Water Board staff had discussions and follow up correspondence with Dr. Jeff Cromwell, USGS, regarding faulting through the Victorville and Barstow areas of the Mojave Desert.

13. Support for Countywide Service Review for Wastewater - Local Agency Formation Commission for San Bernardino County – Jehiel Cass

Water Board staff recently sent a letter of support to the Local Agency Formation Commission (LAFCO) of San Bernardino County regarding its recently completed Countywide Service Review for Wastewater. Wastewater services include collection, treatment, disposal, and recycled water uses. LAFCO also evaluated the use of onsite wastewater treatment systems (OWTS, or septic systems) in consideration of the State Board's new OWTS policy. OWTS may include advanced treatment systems.

LAFCO conducted the last wastewater service review in 2009. Because San Bernardino County is so large, the review was divided into four parts: a. Valley (San Bernardino City and environs), b. South Desert (Yucca Valley and environs), c. North Desert (Victor Valley and environs), and d. Mountain (San Gabriel and San Bernardino area). Staff reviewed the North Desert and Mountain chapters.

Three principle areas were evaluated. These include “governance and finance,” “authorized entity improvement needs,” and “improvement opportunity needs in areas with no entity.” LAFCO’s role, of course, is not to ensure wastewater services are provided, but to oversee whether the entities (e.g. governmental organizations) are effectively capable in providing those services and whether service boundaries are appropriate. LAFCO recommends areas, described below, where the Water Board is encouraged to engage in discussion with local entities regarding sewerage needs.

Governance and Finance

After reviewing many factors, LAFCO identified the following entities for continued oversight; what LAFCO calls “hot spots.”

Wastewater Entity	Reason for Hot Spot Listing
City of Adelanto	Serious financial, operational and managerial challenges.
Victor Valley Wastewater Reclamation Authority (VWVRA)	Negative impact to revenue cash flows affecting ability to service debt for the following reasons. <ol style="list-style-type: none"> 1. City of Victorville diverted about 1 million gallons per day of flow decreasing revenue. 2. City of Hesperia withholding payment due to disagreement with the VWVRA board of directors. 3. Unresolved difference with Federal Emergency Management Agency regarding grant for constructing Mojave Upper Narrows tunnel project.
Victorville Water District (City of Victorville)	Increasing operation and maintenance payments affecting debt service and needed capital expenditures.

Authorized Entity Improvement Needs

LAFCO made the following recommendations for governmental entities that are currently authorized to provide some form of wastewater services.

Wastewater Entity	Wastewater Service Opportunity
Wrightwood	Wrightwood Community Services District (CSD), formed in 2016, is authorized by LAFCO a wastewater planning function. All wastewater is currently disposed using OWTS. <ul style="list-style-type: none"> • LAFCO recommends monitoring of a groundwater monitoring well downgradient of the community that stopped when the Water Board had to rescind waste discharge requirements due to lack of a discharger. • LAFCO recommends the Water Board and CSD to have ongoing dialog regarding wastewater infrastructure needs, especially in the densely developed downtown part of the community.

Wastewater Entity	Wastewater Service Opportunity
Phelan-Pinon Hills	Phelan-Pinon Hills CSD, formed in 2008, has a developing commercial core area numerous adjacent large schools. All wastewater is currently disposed using OWTS. <ul style="list-style-type: none"> • LAFCO also recommends the Water Board and CSD to have ongoing dialog regarding wastewater infrastructure needs.
Hesperia	Only small portions of the City of Hesperia are connected to sewer. The new Hesperia Subregional wastewater treatment plant is located upgradient of three areas using OWTS that should be considered for sewer collection due to high density, or nearby sensitive receptors; area along Bear Valley Road, the historical downtown Hesperia, and areas along the Mojave River. Some developing areas along Rancho Road are upgradient of the Hesperia Subregional wastewater treatment plant, but still on OWTS. <ul style="list-style-type: none"> • LAFCO recommends the City evaluate options to improve sewerage treatment and disposal service in these areas.
Apple Valley	Only small portions of the Town of Apple Valley are connected to sewer. The new Apple Valley Subregional wastewater treatment plant is located downgradient of the town area that is within the Apple Valley Dry Lake drainage. Areas along Bear Valley Road and adjacent to the Mojave River remain connected to OWTS. <ul style="list-style-type: none"> • LAFCO recommends the Town evaluate options to improve sewerage treatment and disposal service in these areas.

Improvement Opportunity Needs in Areas with No Entity

There are a growing number of commercial areas in unincorporated San Bernardino County that have no entity recognized by LAFCO to provide sewerage services. LAFCO particularly identifies the Yermo area as one location where opportunity exists to consolidate and possibly expand sewerage treatment services. The area near the Interstate 15 and Daggett Road intersection has a growing number of commercial facilities serving travelers along the Las Vegas corridor. Additionally, there is a large school in the area. All wastewater in this area is currently treated by OWTS. LAFCO would recommend ongoing discussion between the Water Board and county to develop sewerage plans.

14. Update on Barstow Perchlorate – Alonzo Poach

Status of State Water Board Grant

Water Board staff submitted a grant application to conduct a pilot scale treatability study at the perchlorate source area located on Poplar Road in Barstow. The application was submitted to the Site Cleanup Subaccount Program (SCAP) in April 2016. The application was approved. On December 29, 2016, \$2.67 million was awarded to the project. In January 2018, the Department of General Services (DGS) and SCAP personnel selected APTIM Services, Inc. as the consultant. The work will include site characterization efforts and design and construction of a pilot scale remediation system in the source area. Data collected during the operation of the pilot-scale system will be used to evaluate the effectiveness and feasibility of a remedial technology for soil and groundwater treatment. APTIM will use this data to design a full-scale system for the treatment of perchlorate in the source area for soil and groundwater, under the direction and oversight of Water Board staff. Aquifer data will be used to evaluate groundwater remediation technologies for that portion of the perchlorate groundwater plume that has migrated downgradient of the source area. Water Board staff, Alonzo Poach and Bill Muir, conducted a site walk meeting on April 12, 2018, in Barstow with APTIM personnel. The goal of the site walk was for APTIM to better understand the site conditions and to discuss the upcoming scope of work. The scope of work for Phase I of the work was finalized on

June 5, 2018, and submitted to DGS to execute the contract so that planning for site characterization and remedial activities can begin.

Water Board Contract for Supplying Replacement Bottled Water to Residents Affected by Perchlorate Plume

After the discovery of perchlorate pollution in the Barstow area in November 2010, Water Board staff applied for grant money through the State Water Board's Division of Financial Assistance (DFA), Cleanup and Abatement Account (CAA) Unit, to provide replacement water to impacted residents. The Water Board currently supplies 8 residents in the area with replacement bottled water for drinking and cooking. This funding is good through the end of June 2018. As of April 2018, a total of 17 residential wells in the area are impacted by perchlorate at or above the 6 parts per billion maximum contaminant level (MCL). Water Board staff applied for additional funding through the DFA emergency drinking water/CAA unit to continue providing replacement drinking water to affected residents in the area. In June 2018, we were awarded \$57,600 in funding for approximately two years to supply safe drinking water to the community members affected by perchlorate. However, this funding can only be used for community members that qualify as disadvantaged, based on annual income guidelines. On May 30, 2018, Water Board staff, distributed self-certification income surveys to the effected community members. Water Board staff are currently evaluating and responding to the income surveys and working on contracting the new bottled water service order.

Status of Barstow Perchlorate Plume

Water Board staff collected second quarter 2018 groundwater samples during April 2018 from 32 private residential wells and from 20 groundwater monitoring wells owned by the city of Barstow.

Water Board staff continues to collect quarterly groundwater sampling to track plume movement and assess data trends. The second and fourth quarter sampling rounds (April and October) are more robust rounds of sampling used to evaluate the plume shape in winter and at the end of summer (when the highest and lowest water levels are expected, respectively). The first and third quarter sampling rounds (January and July) concentrate on defining the leading edge of the plume and monitoring residential wells that are impacted with perchlorate at or above the MCL. Based on the analytical results from the April 2018 quarterly sampling event, the plume continues to move southeast into the residential area south and east of Interstate 15. Generally, concentrations of perchlorate above 500 parts per billion are located west of Webster Road. However, perchlorate at the 6 parts per billion MCL is now observed east of Marks Road. Based on a limited number of monitoring wells that monitor deeper portions of the aquifer, the perchlorate plume still appears to be isolated to the shallow part of the aquifer. As of the April 2018 sampling event, 17 residential wells exceed the primary MCL for perchlorate. As discussed above, Water Board staff are currently contracting and evaluating whether residents qualify to receive State-funded replacement water based on DFA financial guidelines. The current perchlorate plume map is provided below.

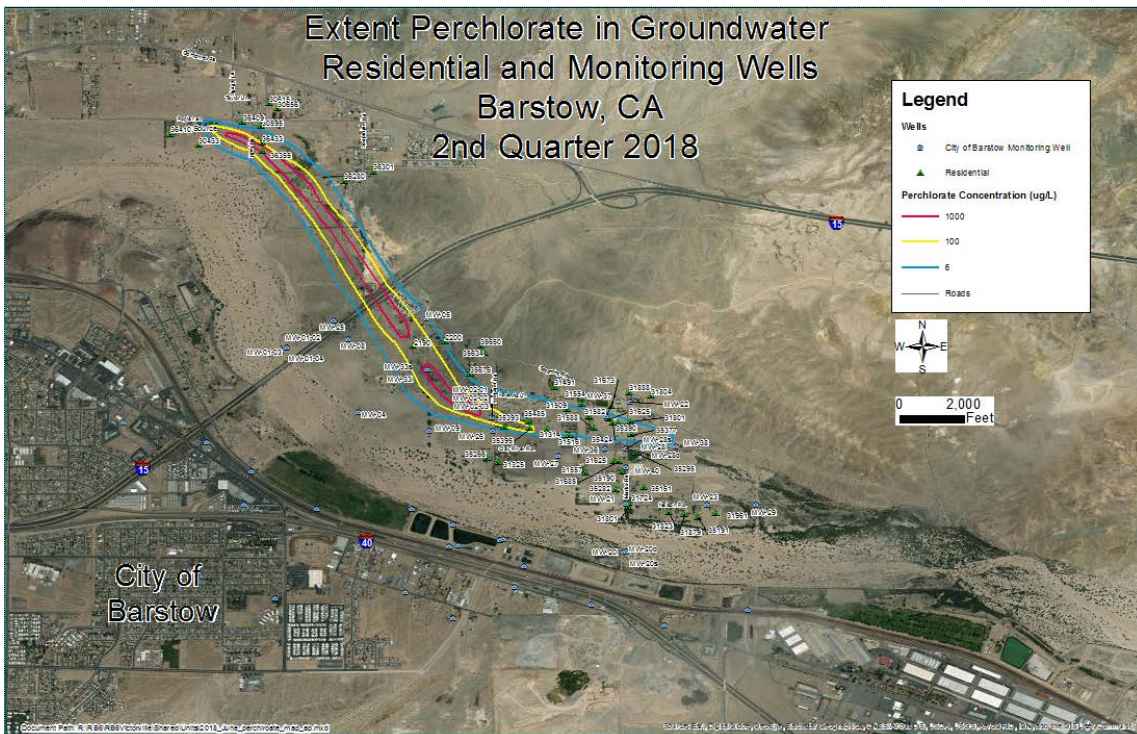


Figure 1 – Current perchlorate plume map



NFWF

Sacramento District CA In-Lieu Fee Program

CONTACT INFORMATION

Stephanie Tom Coupe
Senior Director, IDEA (CA)
stephanie.tomcoupe@nfwf.org
415-243-3103

Jana Doi
Manager, IDEA (CA)
jana.doi@nfwf.org
415-243-3102

Tim DiCintio
Senior Vice President, IDEA (DC)
timothy.dicintio@nfwf.org
202-595-2466

Bob Polin
Director, IDEA (DC)
bob.polin@nfwf.org
202-595-2450

PROGRAM AREA



ABOUT NFWF

The National Fish and Wildlife Foundation (NFWF) protects and restores our nation’s fish and wildlife and their habitats. Created by Congress in 1984, NFWF directs public conservation dollars to the most pressing environmental needs and matches those investments with private funds. Learn more at www.nfwf.org

BACKGROUND

The National Fish and Wildlife Foundation (NFWF) was established by Congress in 1984 as a private nonprofit corporation dedicated to supporting the conservation and management of the nation’s natural resources. Since its establishment, NFWF has directed hundreds of millions of dollars from federal, state and local agencies, corporations, foundations and individuals to critical projects benefiting the nation’s fish, wildlife, and natural resources. A key component of this work is NFWF’s Impact-Directed Environmental Accounts (IDEA) program. IDEA receives, manages, and disburses funds designated for specified conservation, mitigation, or restoration purposes arising from judicial and regulatory proceedings.

IDEA developed the Sacramento District California In-Lieu Fee Program (ILF Program), which establishes a collaborative and strategic approach to wetlands mitigation. The ILF Program, approved by the **U.S. Army Corps of Engineers**, the **U.S. Environmental Protection Agency**, the **National Marine Fisheries Service**, the **State Water Resources Control Board**, the **Central Valley Regional Water Quality Control Board**, and the **Lahontan Regional Water Quality Control Board**, offers permittees an in-lieu fee option to satisfy their compensatory mitigation obligations as determined by the applicable regulatory agencies for impacts to aquatic resources authorized under the Clean Water Act, the Rivers and Harbors Act, the Endangered Species Act, the Porter-Cologne Water Quality Control Act, and other applicable laws.

The ILF Program provides: 1.) Vernal Pool Credits for authorized impacts to vernal pool wetlands in 12 Vernal Pool Service Areas that are based on vernal pool recovery regions identified by the USFWS’s Vernal Pool Recovery Plan; and 2.) Aquatic Resource Credits for authorized impacts to wetlands (excluding vernal pools), other Waters of the U.S., Waters of the State, and certain species, in 17 Aquatic Resource Service Areas that are based on individual river systems.

Learn more at www.nfwf.org/ilf

HOW DOES THE ILF PROGRAM OPERATE?



PROGRAM PROCESS

- 1) Permittee submits permit application to regulatory agency
- 2) Regulatory agency determines mitigation requirement
- 3) Permittee verifies with regulatory agency use of ILF and number of credits
- 4) Permittee sends project information to NFWF
- 5) NFWF confirms project lies within Service Area
- 6) NFWF Determines Credit cost and contracts with permittee for Credits
- 7) NFWF provides executed Credit Transfer Agreement to regulatory agencies

PROGRAM BENEFITS

- Compliant with 2008 Compensatory Mitigation Rule
- Fully transfers permittee's mitigation obligation
- Consolidates funds to implement larger, multibenefit mitigation projects
- Watershed approach to compensation planning
- Collaborative and strategic process for project selection



The Sacramento River | Credit: Westervelt Ecological Services

CREDIT TYPES

The Sacramento District CA In-Lieu Fee Program offers two types of Credits: 1) Vernal Pool Credits for authorized impacts to vernal pool wetlands; and 2) Aquatic Resource Credits for authorized impacts to wetlands (excluding vernal pools), other Waters of the United States, Waters of the State, and certain species.

CREDIT PRICING

Credit pricing is based on the type and volume of Credits purchased. The final price for any individual Credit sale will be fixed upon the mutual execution of a Credit Transfer Agreement.

AQUATIC RESOURCE SERVICE AREAS



VERNAL POOL SERVICE AREAS



15. 4.55 Million Gallon Release of Tertiary Treated, Disinfected Wastewater at Palmdale Wastewater Reclamation Agricultural Site – *Jehiel Cass*

Between June 16 and 17, 2018, there was a release of 4.55 million gallons of tertiary treated, disinfected wastewater (“recycled water”) from the Palmdale Wastewater Reclamation Plant’s agricultural site. Recycled water is the term that the State of California uses for treated wastewater suitable for a beneficial reuse. This recycled water spill began Saturday evening, June 16, 2018, and was not discovered by the Sanitation Districts of Los Angeles County (Districts) staff until Sunday morning, June 17, 2018. At discovery, pumps supplying recycled water to the agricultural fields were immediately shut down. About 59,000 gallons of recycled water were recovered and returned to the wastewater treatment plant. Most of the recycled water percolated into the soil. To a limited extent, sandbags were used to contain the recycled water from spreading.

The spill was reported to the Office of Emergency Services and the Water Board. The spill occurred on property owned by the Los Angeles World Airports and leased to the Districts for crop irrigation using recycled water supplied by Districts’ Palmdale Wastewater Reclamation Plant. The cause was determined to be a coupling failure on a booster pump outlet manifold (See Figure 1).

The recycled water flowed for about one-half mile to the west and north along 40th Street East, as shown on Figure 2. After collecting at the intersection of Avenue N, some wastewater flowed east and some wastewater flowed north along the fence line between Air Force Plant 42 and the City of Los Angeles World Airports properties.

Water Board staff indicated the Districts’ response actions were appropriate and concurred with the recommended measures, as follows:

- Inspect the condition of the irrigation pipeline distribution system, and
- Investigate the use of supervisory control and data acquisition (SCADA) sensors on the irrigation system to facilitate failure release notification in future.

Water Board staff requested that the Districts notify us regarding the implementation of each recommendation.



Figure 1 – Photograph of coupling failure at Palmdale Wastewater Reclamation Plant Agricultural Site irrigation system booster pump station.



Figure 2 – Map showing location of June 16 to 17, 2018, 4.55-million-gallon spill of tertiary treated, disinfected recycled water at the Palmdale Wastewater Reclamation Plant. Blue line shows extent of the spill.

16. Standing Item-Quarterly Violations Report – 1st Quarter 2018 – Jeff Brooks

The Quarterly Violations Report for January 1, 2018 to March 31, 2018, includes an update on the Violation Priority System, a Synopsis of 1st Quarter 2018 Violations; and a Table of Pending Formal Enforcement Cases.

Violation Priority System-Revised

The Violation Priority System has been revised in response to the State Water Board adopting its 2017 Enforcement Policy, which became effective October 5, 2017. The previous violation priority values of either 1, 2, or 3 have been replaced with priority values of either A or B. The Priority Value of A is assigned to the more severe violations and B to moderate and minor violations. The attached table of 1st Quarter 2018 violations still shows a few numerical violation priority values, which will be revised to either A or B in the next few months as the SMARTS database is converted to the new system.

Synopsis of 1st Quarter 2018 Violations

Staff entered 59 violations into the CIWQS and SMARTS databases for the 1st Quarter 2018. The 59 violations is a significant reduction from the 146 violations entered for the previous quarter, the 4th Quarter of 2017. The reduction was primarily tied to separate actions at three facilities:

- Hot Creek Hatchery (Mono County)
- Burger Basket (San Bernardino County)
- Fort Irwin WWTP (San Bernardino County)

For Hot Creek Hatchery, the hatchery's compliance with flow and nitrate effluent limitations is largely influenced by the natural production rates and water quality of the springs that are the hatchery's water source. The hatchery went from 18 violations in the

4th Quarter down to five (5) violations, primarily due to natural decreases in spring production rates and natural decreases in the springs' nitrate concentrations.

For Burger Basket, its new wastewater treatment system operator has made significant improvements, which reduced the facility's quarterly violation count from 19 in the 4th Quarter to two (2) in the 1st Quarter.

For Fort Irwin's wastewater treatment plant, staff discovered that the majority of 4th Quarter violations entered into CIWQS were actually not effluent violations of the permit and, therefore have since been dismissed.

Overall, 1st Quarter 2018 violations were distributed across numerous facilities. There are two (2) Priority A violations linked to the City of Barstow that have been and continue to be addressed by two Cleanup and Abatement Orders. There are 53 Priority B violations identified and the remaining four violations are storm water-related violations. Staff continues to effectively address many of our Priority B violations with informal enforcement actions, such as phone conversations, email, and Notices of Violation. Crystal Geysers is an example of staff using staff enforcement letters (email and letters) to significantly improve compliance with monitoring and reporting requirements, and continue improving effluent quality. Staff is planning to expand its use of informal enforcement actions, targeting self-monitoring report submittals for timeliness and completeness during the next few months.

Staff is also committed to ensuring its enforcement work is being fully documented through data entry into the CIWQS, SMARTS, and GeoTracker databases. These databases, in part, allow the public and others to see staff's efforts to effectively protect water quality and beneficial uses. To assist staff, internal training is being provided over the next couple of months, in addition to standardizing and simplifying data entry to the greatest extent possible.

Table of Pending Formal Enforcement Cases

The table, below, identifies cases that staff is working on and internally discussing what the appropriate next steps should be in each case. Such actions could include proposed Cleanup and Abatement Orders, Cease and Desist Orders, Administrative Civil Liability Orders, Settlement Agreements, or Referrals to the California Attorney General.

Facility	Alleged Violations Summary	Schedule Action (Quarter/Year)
Tahoe Keys Marina MMP	Exceeding effluent limits for Total Iron, Total Nitrogen, Turbidity, Oil and Grease, and Total Phosphorous. Subject to MMPs.	3rd Quarter, 2018
Susanville CSD WWTP – Susanville, Lassen Co.	Exceeding effluent limitations for coliform and suspended solids. Subject to MMPs.	3rd Quarter, 2018
City of Victorville	Raw sewage discharge to waters of the U.S.	4th Quarter, 2018
VVWRA	Exceeding effluent limitations for multiple parameters. Subject to MMPs. Also, unauthorized treated sewage discharge to Mojave River.	4th Quarter, 2018

Attachment: 1st Quarter 2018 Quarterly Violations Table

Quarterly Violations
1st Quarter 2018
January 1, 2018 to March 31, 2018

Priority Violation	Responsible Party	Place (Facility)	Violation Type	Violation Program	Date Occured	Violation Description	Comments	Corrective Action	Enforcement Action
INYO COUNTY									
B	Crystal Geysers Roxane LLC	Crystal Geysers Roxane Olancho Water Bottling Facility	Reporting -> Late Report	WDRINDFP	2/2/2018	Corrective Action Plan Report was submitted on Feb 7, 2018. The report was due Feb 2, 2018. The Discharger's consultant did notify staff that report would be late.	No further action recommended due to minor nature of violation and Discharger consultant notifying staff ahead of time that report would be late.	null	null
B	Crystal Geysers Roxane LLC	Crystal Geysers Roxane Olancho Water Bottling Facility	Water Quality -> Effluent -> CAT1	WDRINDFP	2/2/2018	Total Dissolved Solids (TDS) Monthly Average (Mean) limit is 256 mg/L and reported value was 305 mg/L.	Filtering of cooling tower water effectively addressed arsenic effluent limitation violations observed in 4th Quarter 2017, but has yet to do so for the TDS effluent limitation violations.	Increasing filter change-out frequency is proposed. Follow-up sampling will be reported in 2nd Quarter 2018 monitoring report.	Staff Enforcement Letter
B	Crystal Geysers Roxane LLC	Crystal Geysers Roxane Olancho Water Bottling Facility	Reporting -> Deficient Reporting	WDRINDFP	2/5/2018	Multiple violations of Monitoring and Reporting Program No. 2017-0005 including lab reporting limits being too high; incorrectly reported MCLs; deficient sample QC; and incomplete reporting for haz waste manifests.	Some of these issues occurred in previous SMRs and were brought to the Discharger's attention, but continue to occur. Some of the issues are new and unique to the 4th Quarter 2017 SMR.	Discharger submitted an acceptable Comparison Standard and Detection Limits as required by Staff Enforcement Letter. Discharger has made significant progress in addressing issues identified in Staff Enforcement Letter, as reflected in its 1st Quarter 2018 SMR. Sampling of MW-7 for VOCs/SVOCs due next quarterly monitoring events.	Staff Enforcement Letter
B	Crystal Geysers Roxane LLC	Crystal Geysers Roxane Olancho Water Bottling Facility	Water Quality -> Effluent -> CAT1	WDRINDFP	3/20/2018	Total Dissolved Solids (TDS) Monthly Average (Mean) limit is 256 mg/L and reported value was 460 mg/L.	Filtering of cooling tower water effectively addressed arsenic effluent limitation violations, but has yet to do so for the TDS effluent limitation violations.	Increasing filter change-out frequency is proposed. Follow-up sampling will be reported in 2nd Quarter 2018 monitoring report.	Staff Enforcement Letter
B	USDI National Park Service Death Valley	DVNM HDQ Furnace Creek WWTF	Reporting -> Late Report	WDRMUNIOH	1/16/2018	Submitted 4th Quarter 2017 SMR 56 days late. Violated Board Order No 6-86-84, MRP II.	Quarterly SMR was due on 01/15/2018 and was received 03/12/2018.	Discharger did not propose or identify any corrective actions taken.	null
B	USDI National Park Service Death Valley	DVNM HDQ Furnace Creek WWTF	Order Conditions	WDRMUNIOH	1/31/2018	Failed to maintain minimum freeboard (2 feet) in Pond Nos. 1 and 2 for several days in January 2018. Violated Board Order No. R6V-1986-0084, WDR I.C.4.	Pond 1 freeboard was less than 2 feet, January 17-January 21. Pond 2 freeboard was less than 2 feet, January 20-January 21.	Discharger did not propose or identify any corrective actions taken.	null
B	Furnace Creek Inn & Ranch	Furn Crk Inn & Ranch Pack STP	Reporting -> Late Report	WDRMUNILRG	2/2/2018	Submitted 4th Quarter 2017 SMR 28 days late. Violated Board Order No. 2014-0153-DWQ MRP A.1.	Quarterly SMR was due on 02/01/2018 and received on 03/01/2018.	Discharger did not propose or identify any corrective actions taken.	null
B	Los Angeles City DWP	Independence WWTF	Reporting -> Deficient Reporting	WDRMUNILRG	3/31/2018	Failed to provide parameters related to sludge monitoring. Violated Board Order No. R6V-1995-0064, MRP I.D.2.a-d.	The 1st Quarter 2018 SMR was missing all sludge monitoring data.	Discharger did not propose or identify any corrective actions taken.	null
B	Lone Pine CSD	Lone Pine WWTF	Reporting -> Late Report	WDRMUNILRG	1/15/2018	No Annual SMR submitted. Violated Board Order No. R6V-1995-0036, MRP II.C.	null	Discharger did not propose or identify any corrective actions taken.	null
B	Rolling Green Utilities Inc	Rolling Green Terrace WTF	Order Conditions	WDRMUNIOH	1/23/2018	Violation of WDR Order I.C.2 - Evidence of infiltration to manhole indicates probable exfiltration from sewer collection system. Structural integrity of sewer main in proximity of sink hole in Pine Road is questionable.	Staff recommended Discharger prepare and implement a Sanitary Sewer Management Plan (SSMP) and to line sewer line in vicinity of Pine Rd. and Baker Creek. Staff will review SSMP, provide comments as necessary, with SSMP implementation to follow.	Discharger to submit Sanitary Sewer Management Plan by August 1, 2018 per Staff Enforcement Letter.	Staff Enforcement Letter

Quarterly Violations
1st Quarter 2018
January 1, 2018 to March 31, 2018

Priority Violation	Responsible Party	Place (Facility)	Violation Type	Violation Program	Date Occured	Violation Description	Comments	Corrective Action	Enforcement Action
B	Rolling Green Utilities Inc	Rolling Green Terrace WTF	Order Conditions	WDRMUNIOTH	1/23/2018	Violation of WDR Provision II.2 and MRP I.A.2 - Flow measurements must be reported. The facility has no flow measurement device.	Staff required installation of flow meter between septic tank and oxidation pond in order to comply with flow measurement requirements.	Discharger to submit a report by August 1, 2018, documenting that flow meter has been installed and is operable per Staff Enforcement Letter.	Staff Enforcement Letter
B	Rolling Green Utilities Inc	Rolling Green Terrace WTF	Order Conditions	WDRMUNIOTH	1/23/2018	Violation of Order Provision II.4 - Proposed change in character of waste disposal not reported. Unauthorized small basin constructed in corner of Percolation Pond No 3 to receive unauthorized septic tank waste discharges. Evidence of unauthorized septic tank waste discharge into Percolation Pond No 4 also observed.	Staff directed Discharger to cease the unauthorized waste discharge practices. Staff recommended characterizing, removing, and properly disposing of unauthorized waste materials from Pond No. 3 and Pond No. 4. Staff also recommended Discharger to investigate nature and extent of unauthorized waste discharge practices' on remaining soils and threat to groundwater quality.	The Discharger reported to staff that unauthorized septic tank waste discharges to Pond No. 3 and Pond No. 4 have ceased. Staff to follow up with Discharger regarding waste removal and impacts investigation.	Staff Enforcement Letter
B	USDI National Park Service Death Valley SW Village	Stovepipe Wells Village	Reporting -> Late Report	WDRMUNIOTH	1/15/2018	Submitted 2017 Annual SMR 57 days late. Violates Board Order No. R6V-1996-0161, MRP II.C.	Annual SMR was due on 01/15/2018 and received on 03/12/2018.	Discharger did not propose or identify any corrective actions taken.	null
B	Inyo Cnty Dept of Parks & Rec	Tecopa Hot Springs Park WWTF	Reporting -> Late Report	WDRMUNIOTH	1/30/2018	Submitted 2017 Annual SMR 23 days late. Violated Board Order No. R6V-1994-0102, MRP II.C.	The Annual SMR was due on 01/30/2018 and received on 02/22/2018.	Discharger did not propose or identify any corrective actions taken.	null
KERN COUNTY									
B	California City	California City WTF	Reporting -> Late Report	WDRMUNILRG	1/15/2018	No SMR submitted. Violated Board Order No. R6V-2000-0094 II.B.2.	null	Discharger did not propose or identify any corrective actions taken.	null
B	Calaveras Cement Company	Lehigh Southwest Cement Co	Water Quality -> Receiving Water -> Groundwater	LNDISPOTH	3/6/2018	Exceeded MCLs for Nitrate as N (10 mg/L), Sulfate (250 mg/L), Total Dissolved Solids (1,000 mg/L); and exceeded the USEPA Secondary MCL for pH (8.5 pH units) in multiple wells during the fourth quarter 2017 monitoring period. Violates Board Order 6-02-007, WDR section I.E.2 and II.A.11.	Nitrate as (NO3): MW-1 (56 mg/L). pH: MW-1 (9.9). Sulfate: MW-1 (620 mg/L), MW-4 (730 mg/L). Total Dissolved Solids: MW-1 (1,800 mg/L), MW-4 (1,900 mg/L).	Water Board staff is working with the discharger to determine appropriate next steps including transitioning to an EMP.	null
B	US Air Force Edwards Air Force Base	Main Base Class III Landfill	Water Quality -> Receiving Water -> Groundwater	LFOPER	1/25/2018	Exceeded MCLs and SMCLs in multiple wells for the following constituents: Arsenic (0.010mg/L), Total chromium (0.05 mg/L), Nickel (0.1mg/L), Selenium (0.05mg/L), Nitrate (10 mg/L), Chloride (500 mg/L), Iron (0.3mg/L), Sulfate (500 mg/L), TDS (1,000 mg/L). Violated Board Order RV6-2002-0019, WDR I.A.2.	Arsenic: Well 4-MW08 (0.013mg/L); Total Chromium: Well 4-MW07 (0.098mg/L); Nickel: Wells 4-MW02(0.7mg/L), 4-MW04 (0.16mg/L), and 4-MW07 (1.4mg/L); Selenium: Wells 4-MW02 (0.059mg/L) and 4-MW07(0.14mg/L); Nitrate: Wells 4-MW02 (26mg/L) and 4-MW07 (31mg/L).Chloride: Wells 4-MW02 (830 mg/L) and 4-MW07 (720mg/L); Iron: Wells 4-MW02 (2.7mg/L), 4-MW03 (1.4mg/L), 4-MW04 (0.57mg/L), 4-MW07(4.3mg/L), and 4-MW09 (0.45mg/L); Sulfate: Well 4-MW07 (630mg/L); Total Dissolved Solids: Wells 4-MW02 (2,510 mg/L), 4-MW07 (2,570mg/L), 4-MW10 (1,240mg/L), and 4-MW11 (1,180mg/L).	Discharger did not propose or identify any corrective actions taken.	null
B	Ridgecrest City	Ridgecrest Reclamation Irrigation Site	Order Conditions	REC	3/16/2018	1,000 gallons of secondary-treated wastewater discharged to soil. Discharge occurred when the outfall pipeline was ruptured during fiber optic line repair activities. Violated Order 6-93-86, WDR I.D.6.	No further action recommended.	Discharger repaired pipeline break and stopped release. All water percolated or evaporated.	null

Quarterly Violations
1st Quarter 2018
January 1, 2018 to March 31, 2018

Priority Violation	Responsible Party	Place (Facility)	Violation Type	Violation Program	Date Occured	Violation Description	Comments	Corrective Action	Enforcement Action
B	RJR Thomas LP	Willow Springs MHP	Reporting -> Late Report	WDRMUNIOTH	1/15/2018	Submitted 4th Quarter 2017 SMR 36 days late. Violated Board Order No. R6V-2002-0021, MRP III.B.	Quarterly SMR was due on 01/15/2018 and received on 02/20/2018.	Discharger did not propose or identify any corrective actions taken.	null
MONO COUNTY									
B	USDA Forest Service Inyo National Forest Mammoth Lakes	Convict Lake Campground WTF	Reporting -> Deficient Reporting	WDRMUNIOTH	1/15/2018	Failed to present 2017 monitoring data in graphical and tabular format. Violated Board Order No. R6V-1995-0037, MRP II.C.2.	null	Discharger did not propose or identify any corrective actions taken.	null
B	Ca Dept of Fish & Game Independence	Hot Creek Hatchery NPDES	Water Quality -> Effluent -> CAT1	NPDNONMUNIPRCS	2/5/2018	Nitrite Plus Nitrate (as N) Monthly Average limit is .23 mg/L and reported value was .25 mg/L at M-002.	Complied with TSO Interim Effluent Limitations. Not subject to MMPs.	Use the limit in the Time Schedule Order.	Time Schedule Order
B	Ca Dept of Fish & Game Independence	Hot Creek Hatchery NPDES	Water Quality -> Effluent -> CAT1	NPDNONMUNIPRCS	2/5/2018	Nitrite Plus Nitrate (as N) Monthly Average limit is 0.23 mg/L and reported value was .29 mg/L at M-001.	Complied with TSO Interim Effluent Limitations. Not subject to MMPs.	Use the limit as set in the Time Schedule Order.	Time Schedule Order
B	Ca Dept of Fish & Game Independence	Hot Creek Hatchery NPDES	Water Quality -> Effluent -> CAT1	NPDNONMUNIPRCS	2/5/2018	Nitrite Plus Nitrate (as N) Monthly Average limit is .23 mg/L and reported value was .28 mg/L at M-004.	Complied with TSO Interim Effluent Limitations. Not subject to MMPs.	Use the limit in the Time Schedule Order.	Time Schedule Order
B	Ca Dept of Fish & Game Independence	Hot Creek Hatchery NPDES	Water Quality -> Effluent -> OEV	NPDNONMUNIPRCS	2/15/2018	Flow Daily Maximum limit is 3.8 MGD and reported value was 4.5 MGD at M-003.	Complied with TSO Interim Effluent Limitations. Not subject to MMPs.	Use limit as set in TSO.	Time Schedule Order
B	Ca Dept of Fish & Game Independence	Hot Creek Hatchery NPDES	Water Quality -> Effluent -> OEV	NPDNONMUNIPRCS	3/5/2018	Flow Daily Maximum limit is 3.8 MGM and reported value was 4.9 MGM at M-003.	Complied with TSO Interim Effluent Limitations. Not subject to MMPs.	Use the limit as set in the Time Schedule Order.	Time Schedule Order
B	June Lake PUD	June Lake PUD STP	Reporting -> Deficient Reporting	WDRMUNILRG	1/30/2018	Failed to present 2017 monitoring data in graphical format. Violated Board Order No. R6V-1993-0019, MRP II.F.2.	null	Discharger did not propose or identify any corrective actions taken.	null
B	June Lake PUD	June Lake PUD STP	Reporting -> Deficient Reporting	WDRMUNILRG	3/31/2018	1st Quarter 2018 SMR failed to provide parameters related to Offsite Waste Disposal. Violated Board Order No. R6V-1993-0019, MRP I.E.	The Quarterly SMR did not provide any information regarding: waste volume and type, waste hauler, and offsite disposal facility/location.	Discharger did not propose or identify any corrective actions taken.	null
NEVADA COUNTY									
2	Truckee Meadows Water Authority	Teichert Cold Stream Disposal Yard	SW - Deficient BMP Implementation	CONSTW	2/9/2018	Lack of erosion controls on stockpiles violates Board Order 2009-0009-DWQ, Attachment D, Section D. Absent sediment controls for the access road violates of Board Order 2009-009-DWQ, Attachment D, Section E.	Effective stockpile cover will likely be delayed due to unavailable site access (muddy road conditions). Discharger required via Staff Enforcement Letter to install additional sediment controls for access road.	Discharger installed additional sediment controls (fiber rolls and erosion control fencing) to treat storm water runoff discharges (2/16/2018).	Staff Enforcement Letter
B	Truckee Meadows Water Authority	Donner Lake Dam Dredging Emergency	Water Quality -> Receiving Water -> Surface Water	CERFILLEXC	1/10/2018	Highly turbid water escaped the containment area above the dam by way of seepage through closed dam gates. The discharge entered Donner Creek causing the creek's receiving water objective for turbidity to be exceeded. Violates Clean Water Act Section 401 Water Quality Certification for Regional General Permit, Condition VI.B.7.	The project's treatment system was unable to adequately treat the volume of water entering the containment area. Seepage through the dam gates was reportedly not expected and, after discovery, attempts were made to seal the gates with plastic sheeting and slow the release.	Discharger planned to bring an additional pump the following day (Jan 11) to capture seepage below the dam and prevent, or at a minimum, reduce the turbid discharge to the creek.	null
B	Tahoe Truckee Sanitation Agency	Tahoe Truckee Sanitation Agency	Water Quality -> Receiving Water -> Groundwater	WDRMUNILRG	3/20/2018	Groundwater containing treated wastewater made available for percolation (measured at Well 31) had a pH measurement below the minimum pH level (6.5 pH units). Violates Board Order No. R6T-2002-0030, WDR II.C.4.	pH reading from Well 31 was 6.4 pH units. Discharger suspects that conditions within the Biological Nitrogen Removal system and biological activity in the soil-aquifer treatment system were responsible for the low pH level, which was one of four samples collected from Well 31 during the month of March 2018.	As reported in the March 2018 SMR, the Discharger will continue to monitor pH levels at Well 31 and make any necessary adjustments within the treatment system to return to and maintain compliance with pH receiving water limitations.	null
SAN BERNARDINO COUNTY									

Quarterly Violations
1st Quarter 2018
January 1, 2018 to March 31, 2018

Priority Violation	Responsible Party	Place (Facility)	Violation Type	Violation Program	Date Occured	Violation Description	Comments	Corrective Action	Enforcement Action
A	Barstow City	Barstow WTF Mojave River Bed	Water Quality -> Receiving Water -> Groundwater	WDRMUNILRG	1/10/2018	Exceeded MCLs for Nitrate as N (10 mg/L) in one monitoring well. The nitrate contamination is due to historical wastewater and biosolids disposal practices. Violated Board Order No. R6V-1994-0026, WDR I.B.5.	Nitrate as N: MW 06 (12.0 mg/L)	The City is providing affected residents with replacement water pursuant to a Water Board CAO. A groundwater treatment facility is under construction and will treat for nitrate and perchlorate (unrelated source) that has comingled with the nitrate-contamination.	Clean-up and Abatement Order
A	Barstow City	Barstow WTF Mojave River Bed	Water Quality -> Receiving Water -> Groundwater	WDRMUNILRG	2/13/2018	Exceeded MCLs for Nitrate as N (10 mg/L) in one monitoring well. The nitrate contamination is due to historical wastewater and biosolids disposal practices. Violated Board Order No. R6V-1994-0026, WDR I.B.5.	Nitrate as N: MW 06 (12.0 mg/L).	The City is providing affected residents with replacement water pursuant to a Water Board CAO. A groundwater treatment facility is under construction and will treat for nitrate and perchlorate (unrelated source) that has comingled with the nitrate-contamination.	Clean-up and Abatement Order
B	Adelanto Public Utility Authority	Adelanto CS	Water Quality -> Sanitary Sewer Overflow/Spill/	SSOMUNILRG	3/18/2018	Approx. 92,000 gallons of raw sewage spill discharged from a sewer system lift station manhole into an unnamed wash, tributary to Fremont Wash, which flows into the Mojave River, a water of the United States. This spill violates Board Order No. 2006-0003-DWQ, WDR C.1.	The discharge was caused when lift station maintenance staff failed to turn lift station pumps back on following routine maintenance activities. The discharge occurred over a 4-day period and affected an approximately 250-500 yard section of the desert wash.	The Discharger recovered an estimated 1,800 gallons, disinfected the affected area, and posted the area with precautionary signs. The Discharger developed a Standard Operating Procedure for lift station wet well cleanout activities (submitted 3/29/2018).	Oral Communication
B	Tennell, CR	Bear Valley Firestone	Reporting -> Deficient Reporting	WDRMUNIOWTS	3/31/2018	The 1st Quarter 2018 SMR failed to provide parameters related to flow monitoring and operations and maintenance reporting. Violated Board Order No. R6V-1988-0001, MRP I.A.1 and I.C.1-5.	The quarterly SMR was missing all required flow monitoring data and operations and maintenance information.	Discharger did not propose or identify any corrective actions taken.	null
B	Kim, Sun	Burger Basket	Water Quality -> Effluent -> CAT1	WDRMUNIOTH	1/19/2018	Biochemical Oxygen Demand (BOD) (5-day @ 20 Deg. C) 3-Sample Average (Mean) limit is 30 mg/L and reported value was 62 mg/L.	Certified operator has been addressing neglected system beginning 10/18/2017. Effluent quality has been steadily improving (3-sample mean for 10/18/2017-11/6/2017, 763 mg/L).	Replaced sock filters and tried new-style sock filter clips, which sealed sock filter very well. Ordered additional new-style clips and will install upon receipt. Cleaned out grease interceptor and replaced surge bowls.	null
B	Kim, Sun	Burger Basket	Water Quality -> Effluent -> CAT1	WDRMUNIOTH	2/13/2018	Biochemical Oxygen Demand (BOD) (5-day @ 20 Deg. C) 3-Sample Average (Mean) limit is 30 mg/L and reported value was 61 mg/L.	Certified operator has been addressing neglected system beginning 10/18/2017. Effluent quality has been steadily improving. Returned to compliance with BOD 3-sample mean effluent limitation on 3/12/2018 (BOD 3-sample mean for 1/19/2018-3/12/2018, 25 mg/L).	Replaced sock filters and tried new-style sock filter clips, which sealed sock filter very well. Ordered additional new-style clips and will install upon receipt. Cleaned out grease interceptor and replaced surge bowls.	null
B	Ca Dept of Transportation District 8	Desert Oasis Safety Rdside RES	Reporting -> Deficient Reporting	WDRMUNIOTH	1/31/2018	The Annual 2017 SMR failed to provide required flow data. Violated Board Order No. R6V-1997-0096, MRP I.A.1-4.	The Annual SMR did not provide any flow data.	Discharger is going to submit flow data following 5/8/2018 phone conversation with Water Board staff.	Oral Communication

Quarterly Violations
1st Quarter 2018
January 1, 2018 to March 31, 2018

Priority Violation	Responsible Party	Place (Facility)	Violation Type	Violation Program	Date Occured	Violation Description	Comments	Corrective Action	Enforcement Action
B	CH2M Hill(+)	Fort Irwin WTF	Deficient Monitoring	WDRMUNILRG	1/31/2018	Plant effluent reporting limit for phenol is 0.01 mg/L, and 1/3/2018 analytical results used a higher reporting limit of 0.02 mg/L. Plant effluent reporting limit for BOD 5 is 3 mg/L, and 1/3/2018 and 1/10/2018 analytical results used a higher reporting limit of 5 mg/L. 1/31/2018 analytical results used a high reporting limit of 10 mg/L. Violated Board Order No. R6V-2004-0005, MRP I.C.	Discharger needs to direct lab to meet reporting limit requirements established in MRP.	No action is being noted at this time.	null
B	CH2M Hill(+)	Fort Irwin WTF	Deficient Monitoring	WDRMUNILRG	2/28/2018	Plant effluent reporting limit for phenol is 0.01 mg/L, and 2/7/2018 analytical results used a higher reporting limit of 0.02 mg/L. Plant effluent reporting limit for BOD 5 is 3 mg/L, and 2/7/2018, 2/14/2018, 2/21/2018, and 2/28/2018 analytical results used a higher reporting limit of 5 mg/L. Violated Board Order No. R6V-2004-0005, MRP I.C.	Discharger needs to direct lab to meet reporting limit requirements established in MRP.	No action is being noted at this time.	null
B	Helendale CSD	Helendale Silverlakes STP	Water Quality -> Receiving Water -> Groundwater	WDRMUNILRG	1/18/2018	Exceeded MCLs for Chloride (500 mg/L), TDS (1,000 mg/L) in three wells. Violated Board Order No. R6V-2001-0039, WDR I.C.2.	Chloride: MW2 (1,080 mg/L), and MW3 (651 mg/L); TDS: MW2 (3,600 mg/L), MW3 (1,220 mg/L), and MW4 (2,290 mg/L). Additional investigation is necessary to assess the Dischargers impacts on groundwater TDS concentrations in relation to other potential sources of TDS in the area. Current effluent TDS concentration averages 800 ppm.	Updated WDRs and MRP (April 2018) should assist in evaluating TDS groundwater concentrations with respect to other potential TDS sources.	null
B	Helendale CSD	Helendale Silverlakes STP	Reporting -> Deficient Reporting	WDRMUNILRG	3/31/2018	Failed to provide parameters related to Influent Monitoring. Violated Board Order No. R6V-2001-0039 I.B.	The monthly SMR was missing the Influent TKN and Ammonia data.	Discharger did not propose or identify any corrective actions taken.	null
B	Lake Arrowhead Community Service	Lake Arrowhead CSD WTFS	Order Conditions	WDRMUNILRG	3/2/2018	In-plant spill of 6,300 gallons of untreated sewage at Willow Creek WWTP. Violates Board Order No. R6V-2009-0037, WDR I.D.1. and I.D.2.	A grease blockage within the Grit Classifier's return line caused the discharge to occur. A portion of the discharge migrated to the Facility's storm water discharge site. No surface waters were affected by the discharge.	District staff created earthen berms to contain the discharge upon its discovery. Staff diverted some of the flow back into the wastewater treatment system, and recovered a portion of the discharge using the District's vector truck. The Grit Classifier was taken offline, which stopped the discharge from continuing. The Grit Classifier was cleaned out, and District staff have increased maintenance frequency and are evaluating some design modifications to prevent a reoccurrence.	null
B	MP Mine Operations LLC	Mountain Pass Mine & Mill Ops	Order Conditions	LNDISPOTH	1/25/2018	A pipeline flange failed and caused an estimated 3,000 gallons of reclaim water to discharge onto the soil adjacent to a roadway. Violates Board Order No. R6V-2010-0047, WDR II.A.7.	The affected pipeline transports reclaimed water from the Paste Plant to the Mill. A dirt berm was constructed to contain the discharge. The discharge migrated approximately 200 feet from the failed flange.	The pipeline was repaired 2/8/2018. The Discharger removed approximately 10 cubic yards of affected soils and disposed of them at the paste tailings facility. Additional soil may be removed after receiving soils analytical results.	null

Quarterly Violations
1st Quarter 2018
January 1, 2018 to March 31, 2018

Priority Violation	Responsible Party	Place (Facility)	Violation Type	Violation Program	Date Occured	Violation Description	Comments	Corrective Action	Enforcement Action
B	MP Mine Operations LLC	Mountain Pass Mine & Mill Ops	Unauthorized Discharge	LNDISPOTH	1/25/2018	Approximately 30 gallons of reclaimed water was released at the paste plant. Violates Board Order No. R6V-2010-0047, WDR II.A.7.	A hose is connected to the reclaimed water pipeline and is used to spray down foam in the thickener tank. An employee placed the hose outside of secondary containment onto soil causing the discharge.	Discharger immediately had soil removed (approx. 2 cubic yards) and placed into the paste tailings facility. Discharger sending 10-day report.	null
B	US Marine Corps Barstow Logistic Base	Nebo Domestic WTF	Water Quality -> Receiving Water -> Groundwater	WDRMUNILRG	2/6/2018	Exceeded MCLs for Chloride (250mg/L) and TDS (1,000mg/L). Violated Board Order No. R6V-06-01-20, WDR I.B.2.	Chloride: NGW03 (270mg/L), NGW06 (300mg/L); TDS: NGW03 (1,040mg/L), NGW06 (1,100mg/L).	Discharger did not propose or identify any corrective actions taken.	null
B	TR Lodging Enterprises Inc	Oak Tree Inn	Reporting -> Deficient Reporting	WDRMUNIOWTS	1/31/2018	Failed to provide parameters related to flow and sludge monitoring, and operation and maintenance. Violated Board Order No. R6V-2001-0032, MRP I.A.1-3, I.H, and I.I, respectively.	The SMR was missing the daily flow data and sludge data, and operation and maintenance information. Discharger submitted ROWD requesting increased flow to 8,000 gal/day because installed plant capacity is 10,000 gal/day. NOA pending for coverage under General Order 2014-0153-DWQ.	Discharger did not propose or identify any corrective actions taken.	null
B	TR Lodging Enterprises Inc	Oak Tree Inn	Water Quality -> Receiving Water -> Groundwater	WDRMUNIOWTS	1/31/2018	Exceeded MCL for Nitrate as N (10 mg/L), Arsenic (0.010 mg/L), Lead (0.015 mg/L), and Thallium (0.002 mg/L) in multiple wells. Violated Board Order No. R6V-2001-0032, WDR I.B.1.b.	Nitrate as N: Well 1 (47 mg/L); Arsenic: Well 1 (0.022 mg/L), Well 2 (0.078 mg/L), Well 3 (0.058 mg/L); Lead: Well 2 (0.068 mg/L), Well 3 (0.045 mg/L); and Thallium: Well 2 (0.012 mg/L).	Discharger did not propose or identify any corrective actions taken.	null
B	MP Mine Operations LLC	Onsite Evaporation Ponds	Order Conditions	LNDISPOTH	2/21/2018	Approximately 20 gallons of waste water (storm water and process water combined) was released from the water line that connects the 204 to the evaporation ponds. Violates Board Order No. R6V-005-0011, WDR II.A.1.	Leak was observed during a 2-21-17 inspection by Water board staff. A connection failed within a vault located along the road just south of P-1. Water was in the vault and along the dirt berm. Staff requested a 10-day report by March 6, 2018.	Mine staff were present and immediately called it into maintenance. The leak was stopped and soil was removed.	Oral Communication
B	MP Mine Operations LLC	Onsite Evaporation Ponds	Order Conditions	LNDISPOTH	3/2/2018	A camlock within the hose broke during transfer of water form Pond 30D to Pond 30C causing a release of 100 gallons to the ground around the pond. Violated Board Order No. R6V-2005-0011, WDR II.A.1.	The area is within the lined area and drains back into the pond. Water in evaporation pond was primarily pit water (groundwater) stored for leak detection test purposes. Residual salt was within water released.	Mine staff caught it immediately and stopped the release. Discharger to submit 10-day report. No further action required.	null
B	Triple Net Properties	Phelan Shopping Center	Reporting -> Deficient Reporting	WDRMUNIOH	3/31/2018	Failed to provide parameters related to Operation & Maintenance. Violated Board Order No. R6V-1989-0001 MRP I.E.	The quarterly SMR was missing any Operation & Maintenance data.	Discharger did not propose or identify any corrective actions taken.	null
B	Ha & Yuo Enterprises Inc	Phelan Towne Square	Reporting -> Deficient Reporting	WDRMUNIOH	3/31/2018	Failed to provide parameters related to Operator & Maintenance. Violated Board Order No. R6V-1992-0105 MRP II.A-E.	The quarterly SMR was missing any Operation & Maintenance data.	Discharger did not propose or identify any corrective actions taken.	null
B	Victorville City	SCLA Central WWTP-Victorville Water Dist	Order Conditions	WDRMUNILRG	1/28/2018	Exceeded 23 MPN in more than 1 sample in 30 days. Violated Board Order No. R6V-2014-0002 I.D.a.ii.	01/28/2018 (24.29 MPN), 01/29/2018 (24.29 MPN), 01/30/2018 (24.29 MPN), and 01/31/2018 (24.29 MPN).	Discharger did not propose or identify any corrective actions taken.	null
B	Victorville City	SCLA Central WWTP-Victorville Water Dist	Reporting -> Late Report	WDRMUNILRG	1/30/2018	Failed to submit December 2017 Monthly SMR. Violated Board Order No. R6V-2014-0002 MRP I.B.	null	Discharger did not propose or identify any corrective actions taken.	null
B	Victorville City	SCLA Central WWTP-Victorville Water Dist	Reporting -> Deficient Reporting	WDRMUNILRG	1/31/2018	Failed to provide parameters related to Lab Analysis, Effluent, and Recycled Water Use Area Monitoring. Violated Board Order No. R6V-2014-0002 MRP II.A.6, II.C.1, and II.E.2, respectively.	The monthly SMR was missing the lab data sheets. No effluent MBAS data. No Recycled Water Use Area Monitoring data.	Discharger did not propose or identify any corrective actions taken.	null

Quarterly Violations
1st Quarter 2018
January 1, 2018 to March 31, 2018

Priority Violation	Responsible Party	Place (Facility)	Violation Type	Violation Program	Date Occured	Violation Description	Comments	Corrective Action	Enforcement Action
B	Victorville City	SCLA Central WWTP-Victorville Water Dist	Reporting -> Deficient Reporting	WDRMUNILRG	2/28/2018	Failed to provide parameters related to Lab Analysis, Effluent, Recycled Water Production, and Recycled Water Use Area Monitoring. Violated Board Order No. R6V-2014-0002 MRP II.A.6, II.C.1, II.D.1, and II.E.2, respectively.	The monthly SMR was missing the lab data sheets. No effluent data. No Recycled Water Production or Use Area Monitoring data.	Discharger did not propose or identify any corrective actions taken.	null
B	Victorville City	Victorville SD CS	Water Quality -> Sanitary Sewer Overflow/Spill/	SSOMUNILRG	1/11/2018	A contractor's pump malfunctioned during a sewer lateral lining procedure, causing a 3,900-gallon raw sewage discharge from a manhole. The discharge subsequently entered a concrete drainage channel and eventually into Oro Grande Wash. Violated Board Order No. 2006-0003-DWQ, WDR C.1.	Discharge flowed from a manhole onto the street at Camelback Dr. and Arrowhead Dr., Victorville, and then into the concrete channel and Oro Grande Wash. Discharge affected approximately 26 feet of Oro Grande Wash, a tributary of the Mojave River. There was no flow in the wash at the time of the discharge.	Sewage debris was removed from the affected sites. The street and concrete drainage channel were also disinfected. The City posted precautionary signs adjacent to the concrete drainage channel and affected portion of Oro Grande Wash.	null
3	Victor Elementary School District	Elementary School No 20	SW - Deficient BMP Implementation	CONSTW	2/27/2018	No effective BMPs around the site. Violates Board Order No. 2009-009-DWQ.	13-acre grading project with ephemeral drainage across the street east of the project site. Construction Manager claimed loose-soil berm along El Evado (east side) was a perimeter BMP. Staff explained that the berm was not an effective sediment/storm water runoff control BMP.	Construction manager verbally committed to installing appropriate perimeter BMPs around the whole site by March 6.	Oral Communication
3	Victor Elementary School District	Elementary School No 20	SW - Incomplete/ Insufficient SWPPP	CONSTW	3/2/2018	The SWPPP must be signed by the LRP, it's only signed by the QSD. Violates Board Order No. 2009-009-DWQ.	null	null	null
3	Roberts Group I LLC	Victorville Home2 Suites	SW - Deficient BMP Implementation	CONSTW	2/27/2018	Staff inspected the "Victorville Home2 Suites" construction site on Feb 27, 2018. No construction BMPs were observed anywhere on site, and the site is immediately adjacent to the Oro Grande Wash.	null	null	null