



Lahontan Regional Water Quality  
Control Board



# EXECUTIVE OFFICER'S REPORT

April 2013

## STATE AND REGIONAL

### 1. Training on Collaborating with Citizen Monitors and Watershed Stewardship Organizations – *Lisa M. Petrusa*

Water Board staff recently attended a two-day training to learn about collaborations and partnerships with environmental agencies, watershed organizations and volunteer citizen monitoring groups. The attendees learned how to form a watershed group with concerned citizens, how and where to get funding, equipment and field expertise, and how to obtain viable and useable field data. The training also introduced hands-on field bio-assessment activities for citizen monitoring groups to use.

The Sierra Streams Institute and the State Board's Citizen Monitoring Coordinator of the Clean Water Team (CWT) led the workshop. The Sierra Streams Institute began as a citizens monitoring group and is now a non-profit organization located in Nevada City, CA. CWT is the citizen monitoring program of the State Water Resources Control Board. CWT coordinator(s) work statewide to provide technical assistance, trainings, quality assurance and quality control support, temporary equipment loans and guidance documents to citizen monitoring groups and watershed stewardship organizations. The CWT website is:

[http://www.waterboards.ca.gov/water\\_issues/p/rograms/swamp/cwt\\_volunteer.shtml](http://www.waterboards.ca.gov/water_issues/p/rograms/swamp/cwt_volunteer.shtml)

Local watershed groups and environmental agencies can partner with citizen monitoring programs to dramatically enhance the State's overall monitoring capacity. Currently, Water Board staff collaborates with several citizen monitoring groups. Staff, along with other agencies, plays a significant role in the annual Snapshot Day event, a one-day sampling event in the Tahoe-Truckee area water bodies. Agency-trained Team Leaders accompany teams of citizen volunteers to pre-determined sampling sites to collect water samples and record various stream health parameters. Besides the field sampling, Staff also helps organize the event and samples for fecal coliform and E. Coli in the office's laboratory.

Other citizen monitoring groups in our Region include Friends of the Inyo in Bishop. They have conducted the Citizen Water Watch program. A newly-formed group called Tahoe Pipe Keepers collects water samples from storm outfalls entering Lake Tahoe. They are sponsored by the League to Save Lake Tahoe. Water Board will help this group with organization, quality control questions, and equipment donations. The Truckee River Watershed Council, based in Truckee, has several active citizen monitoring programs assessing Truckee River watershed streams for chemical, physical, and biological health. Since 2010, Water Board staff has collaborated with the Alpine Watershed Group in Alpine County. Citizen monitors collect bacteria samples at six sites monthly during

sampling season (May-November) in addition to Water Board staff sampling.

Other ways citizen monitoring groups can help is by monitoring ephemeral wetlands in the southern part of our Region to evaluate possible impacts of solar power facilities on plant and animal species survival patterns. I am exploring options to expand the use of citizen monitoring groups across the Lahontan Regional Board.

## **2. California Water Plan Update –** *Chuck Curtis*

The Department of Water Resources is working on an update to the California Water Plan that includes sections receiving significant input from Water Board staff. This included drafting a new chapter of the Water Plan on Sediment Management and updating the North and South Lahontan hydrologic region sections in the Water Plan.

Through a series of workshops beginning last year, the Water Board's supervising engineer, Chuck Curtis, worked with staff of the Department of Water Resources, the State and other Regional Water Boards, the US Army Corps of Engineers, the Bureau of Reclamation, the US Forest Service, flood control agencies, Native American tribal representatives, and others to identify the issues associated with sediment management in California. The work included drafting sections on the connection of sediment management with other resource management strategies, the benefits and adverse effects of sediment, the costs of sediment management, and discussions of sediment source, transport, and deposition management. The chapter also includes recommendations to facilitate the management of sediment in California. Sediment is an integral part of the watershed, important for dynamic stream system structure and aquatic habitat, yet can cause significant problems when not appropriately managed. Excessive sedimentation reduces the capacity of water storage reservoirs, clogs harbors and navigable waterways, and causes river

aggradation that increases flooding. Regular sediment delivery is critical to maintaining coastal beaches and providing spawning and other aquatic life habitat. Water Board staff promoted holistic evaluation and management of sediment, including discussion of watershed protection and low-impact development (LID), to reduce the adverse impacts of development while recognizing the needs of the aquatic systems and society.

Water Board staff, Jan Zimmerman and Cindy Wise, participated in a series of regional forums beginning last summer to receive public input on water supply, integrated water management, local planning, and water quality related issues for update of the North and South Lahontan hydrologic region sections of the Water Plan. Staff also provided comments to the Department of Water Resources for updating the Water Plan's Lahontan Region sections.

A public review draft of the 2013 Water Plan is expected to be available for review and comment later this spring or early summer, with the finalized update available in the spring of 2014. Information on the Water Plan update and, when available, the public review draft may be found on the Department of Water Resources website at <http://www.waterplan.water.ca.gov/cwpu2013/index.cfm>.

## NORTH BASIN

### 3. **Lake Tahoe Municipal NPDES Permit Update** – *Robert Larsen*

The Lake Tahoe TMDL identified urban stormwater runoff as the primary controllable source of the pollutants causing Lake Tahoe's transparency decline. In December 2011, the Water Board adopted the Lake Tahoe Municipal NPDES Stormwater Permit for El Dorado County, Placer County, and the City of South Lake Tahoe, to facilitate TMDL implementation. The NPDES permit requires the co-permittees to each prepare and submit a Pollutant Load Reduction Plan (PLRP) and a Water Quality Monitoring Plan by March 15, 2013. The permittees submitted the required plans on the March 15 deadline.

The Tahoe Resource Conservation District submitted a collaborative monitoring plan on behalf of the three-co-permittees. The plan reflects a basin-wide collaborative monitoring effort that will support the Regional Storm Water Monitoring Program. Staff reviewed the plan and found that it meets the water quality monitoring requirements specified by the NPDES Permit.

Similarly, staff have reviewed the PLRPs submitted by the City of South Lake Tahoe and El Dorado and Placer Counties and found them compliant with permit requirements.

In accordance with the NPDES Permit provisions, the Water Board must review and consider approving the three PLRPs at a public meeting. Following a public review period, Water Board staff anticipate bringing a resolution before the Water Board at its June 2013 meeting that would approve the plans.

## SOUTH BASIN

#### 4. **Hinkley Stakeholders Form Working Group for Revised Chromium Background Study** - *Anne Holden*

Since December 2012, Hinkley stakeholders have been meeting monthly to discuss an approach to determining background levels of chromium in groundwater. This Background Study Working Group is comprised of Water Board staff, PG&E and its consultants, a sub-group of the Hinkley Community Advisory Committee, the CAC's consultant (Project Navigator) and Dr. John Izbicki of the US Geological Survey. The Working Group's current focus is to collaboratively develop a study approach that incorporates investigations of Hinkley Valley hydrology, geology, and geochemistry to determine the sources of chromium in groundwater. This effort is referred to as a "revised" background study plan, as it is intended to correct deficiencies in PG&E's 2007 Background Study Report which were identified by peer reviewers in 2011.

#### Revised Study Approach

The revised background study will be completed in two phases. Phase 1 involves the planning and development of the study approach, and Phase 2 will involve field investigations, sample collection, analysis, and data interpretation. Working Group meeting topics are currently centered on Phase 1 issues.

The revised study plan will be developed around individual site conceptual models (SCMs) for distinct portions of the Hinkley Valley. PG&E has proposed three SCM areas whose locations are described relative to the chromium plume: east, west and north. Studies will be tailored to address specific questions unique to each area's SCM; for example, in the east area, intensive agricultural groundwater extraction and irrigation may have influenced groundwater flow, geochemical conditions and chromium

distribution. In the west area, the influence of the Lockhart Fault on groundwater flow patterns will be a key question to address. In the north area, differences in rock types compared to the southern Hinkley Valley may influence chromium concentrations. In all areas, understanding variations in groundwater gradients and velocities, naturally-occurring chromium mineralogy, and geologic controls on groundwater flow (faulting, preferential pathways for groundwater flow) will be important.

#### US Geological Survey Involvement

Dr. John Izbicki of the USGS is a recognized expert on chromium in the Mojave Desert. He is advising the Working Group on using specialized techniques such as stable isotope analysis, element speciation, mineralogical analysis, and detailed groundwater flow studies into the revised background study. As a Working Group member, he will aid in developing the study approach(s) for the background study, and will submit a proposal detailing his agency's involvement in carrying out Phase 2 activities.

The USGS, as a federal agency, is generally restricted from accepting funds from private entities such as PG&E, but may accept funds from State agencies to conduct investigations. PG&E has agreed to provide funding for Dr. Izbicki's participation in the Working Group; therefore, Water Board staff has worked with the State Water Board's administrative and contracting departments to set up a holding account within the State Board's Cleanup and Abatement Account. PG&E will deposit funds into that account which will be used to execute a contract between the Water Board and the USGS for both phases of the background study. Water Board staff developed and submitted the contract proposal for Phase 1 of the revised background study to the State Board's contracting office in March 2013.

An informational item on Phase 1 activities will be scheduled for a future Water Board meeting, likely in fall 2013.

5. **Public Meeting Held in Hinkley to Discuss Manganese Issues** - Lisa Dernbach and Anne Holden

On March 14, 2013, Water Board staff hosted an informational meeting to discuss preliminary findings from a series of Working Group meetings convened in Hinkley to investigate manganese detections in domestic wells. Additional manganese investigations ordered by the Water Board were also presented.

During the summer of 2012, water samples collected by Hinkley citizens and Water Board staff showed that manganese was found at unusually high concentrations in certain water supply wells, and some residents noted black-colored water in their wells. There was a concern that the black water was a result of in-situ zone (IRZ) remediation actions being conducted by PG&E for chromium contamination. In response, a Manganese Working Group was formed, consisting of staff from the Water Board, the U.S. Geological Survey, PG&E, a subcommittee of the Community Advisory Committee (CAC) and its Independent Review Panel Manager, Project Navigator.

One goal of the Working Group was to form a general understanding of which wells could be affected by PG&E's IRZ, and which were likely not affected by the IRZ. Based on discussions and information presented at Working Group meetings, Water Board staff presented the following preliminary findings at the March 14 public meeting:

- Black water at the former community well located more than one mile from or on the southwest side of the Lockhart Fault upgradient of the IRZ areas, is likely due to stagnant well water rather

than PG&E's IRZ remediation actions. However, this preliminary finding will be further investigated as described below.

- Black water at residences located less than one mile from the IRZ areas and on the same side of the Lockhart Fault could be affected by PG&E's IRZs. Water Board staff issued an Investigative Order to PG&E, requiring additional monitoring of manganese in existing monitoring wells, installation of monitoring wells to close gaps in the existing well network, and tracer tests to investigate the fate and transport of IRZ byproducts.

At the meeting, members of the Hinkley CAC expressed concerns that Water Board staff presented premature conclusions without waiting for the results of additional investigations. The intent of the information presented at the meeting was to give Hinkley residents an update on the manganese issue, and communicate certain preliminary findings that could be supported by the current evidence at hand, such as groundwater flow patterns, velocities, and monitoring well data. Water Board staff acknowledged that additional data is needed and emphasized that the information presented at the public meeting was preliminary only. In response to the Investigative Order described above, PG&E has submitted a workplan to conduct additional monitoring and testing to evaluate if IRZ byproducts could potentially reach domestic wells of concern. Initial results of these investigations will be reported in November 2013 and this information will be relayed to the public.

On March 26, a second investigation Order was issued requiring PG&E to modify their Manganese Workplan. The Order imposes additional requirements for monitoring, tracer

tests, and sampling. The technical reports requested by the Order will be due to the Regional Board beginning late summer 2013 and through the end of the year. The Order also responded to concerns raised by the community.

6. **Lake Arrowhead Community Services District to receive "Wastewater Treatment Plant of the Year" Award** - *Mike Coony*

Lake Arrowhead Community Services District, located in the San Bernardino Mountains operates a wastewater treatment plant that has been selected to receive the California Plant of the Year award for a treatment plant treating and discharging in a category of less than 5 million gallons per day. The California Water Environment Association (CWEA) selected the plant out of all other plants of similar size in California for this award. The Discharger will be honored at the CWEA annual conference in Palm Springs, April 17 to 19, 2013.

7. **Changes to Public Informational Meeting Notices** - *Lisa Dernbach*

Lahontan Water Board (Water Board) staff often prepare and issue public notices for informational meetings not related to Water Board hearings. These meetings are informational about topics concerning a certain community, such as chromium or perchlorate contamination in groundwater, or a specific water body, such as Lake Tahoe.

In March, one such notice issued for a Hinkley public informational meeting to inform the community about preliminary findings from the Manganese Working Group. The community was concerned that black water was coming from some Hinkley residential domestic wells. A resident mistook the notice for an official Water Board hearing and complained that the notice was not released at least 10 days beforehand as required by the Bagley Keene Act. Despite immediate response by Board staff stating that the notice was not for a Water

Board hearing, the resident filed additional complaints to the State Water Resources Control Board and the CalEPA. All complaints insisted that the informational meeting scheduled for March 14 be cancelled. The March 14 meeting in Hinkley by Water Board staff continued as scheduled with the complainant not in attendance.

To prevent confusion of this sort in the future, Board staff will take care to state in public notices that meetings (1) are being put on by Water Board staff and not the Water Board, (2) will be informational only, and (3) will not include any kind of formal Water Board decision or recommendation.