

Regional Water Quality Control Board
North Coast Region

Executive Officer's Summary Report
8:30 A.M., Thursday, December 6, 2012
Santa Rosa

- ITEM: 11
- SUBJECT: Update on the Development of the Laguna de Santa Rosa Total Maximum Daily Loads for Nitrogen, Phosphorus, Dissolved Oxygen, Temperature, and Sediment (*David Kuszmar*)
- BOARD ACTION: This is an informational item. No action will be taken by the Regional Water Board.
- BACKGROUND: The Laguna de Santa Rosa is the largest tributary of the Russian River, draining 254 square miles of watershed area in Sonoma County, California. The watershed is the urban center of the North Coast Region, encompassing the Cities of Santa Rosa, Rohnert Park, Cotati, Sebastopol, and the Town of Windsor. Major tributaries to the Laguna de Santa Rosa include Windsor Creek, Mark West Creek, Santa Rosa Creek, Blucher Creek, and Copeland Creek. Land cover varies widely across the watershed, ranging from high-density residential and commercial, to croplands and pastures, vineyards and orchards, and forested areas.
- Staff is developing Total Maximum Daily Loads (TMDLs) to address impairments in the Laguna de Santa Rosa for nitrogen, phosphorus, dissolved oxygen, temperature, and sediment. Since staff's last live update to the Regional Water Board on January 27, 2011, considerable progress has been made in four key areas, including:
- Technical TMDL development,
 - Stakeholder outreach,
 - Early TMDL implementation, and
 - Support for the development of a water quality trading program.
- DISCUSSION: In addition to providing the Regional Water Board with an update on the schedule for the Laguna de Santa Rosa TMDLs, staff will present an overview of its progress to date in each of the four areas listed above. Specifically:

Technical TMDL Development

The specific, required components of a technical TMDL are:

- Problem Statement
- Numeric Targets
- Source Analysis
- Loading Capacity
- Load Allocation
- Margin of Safety

Preliminary drafts of several components of the technical TMDLs for the Laguna de Santa Rosa are complete and currently undergoing internal review. As part of this update, staff will provide the Regional Water Board with a summary of the technical work completed, and the work still in progress. Although staff will take this opportunity to present some preliminary findings to the Regional Water Board, an extensive technical review will not be part of this update.

Once a technical TMDL is completed, implementation and monitoring and reporting plans must be developed and approved by the Regional Water Board. Staff intend to develop such plans for the Laguna de Santa Rosa TMDLs, and to bring them to the Regional Water Board for adoption through the Basin Plan Amendment process.

Stakeholder Outreach

The Laguna de Santa Rosa watershed is a heavily populated, widely developed area spread over a unique and complex natural setting. Many of the watershed's occupants value it as a natural, cultural and economic resource. As such, there is a wide variety of stakeholders interested in the TMDL development efforts.

To meet the needs of these stakeholders, staff developed a Stakeholder Plan (June 27, 2010), and continues to implement that plan as it proceeds with its TMDL development work. As part of this update, staff will provide the Regional Water Board with a summary of its stakeholder outreach efforts to date, and planned efforts for the future.

Early TMDL Implementation Efforts

Nearly every major Regional Water Board permitting program is in effect in the Laguna de Santa Rosa watershed. The list of active

permits in the watershed includes: two major surface discharge permits for wastewater treatment plants (City of Santa Rosa and Town of Windsor); several permits for construction, industrial and municipal stormwater discharges; and several others for dairies and confined animal feeding operations.

To take advantage of opportunities for early TMDL implementation, TMDL staff is working closely with colleagues from each of the permitting programs listed above. TMDL staff is also closely involved in the execution of grants in the Laguna de Santa Rosa watershed, and with ongoing development of the region-wide Agricultural Lands Discharge Program. As part of this update, staff will highlight specific examples of these coordination efforts. The ultimate result will be an implementation plan for the Laguna de Santa Rosa that optimizes the use of existing Regional Water Board programs to meet the TMDLs.

Support for Water Quality Trading

The Sotoyome Resource Conservation District (RCD) recently was awarded a Conservation Innovation Grant by the USDA Natural Resources Conservation Service to develop with its partners (including the City of Santa Rosa, the Willamette Partnership, and many others) a water quality credit trading market in the Laguna de Santa Rosa watershed.

The need for such a market was driven in large part by two Regional Water Board decisions. The first was the decision establishing zero net loading effluent limitations for nitrogen and phosphorus in the City of Santa Rosa's permit for the Laguna Wastewater Treatment Plant (Order No. R1-2006-0045). The second was the decision approving the use of a Nutrient Offset Program by the City of Santa Rosa to meet its permit requirements (Resolution No. R1-2008-0061).

The RCD's proposed scope of work spans two years, and will require regular input from staff. If successful, this approach could help address complex water quality problems in the Laguna de Santa Rosa, and serve as a model for addressing similar problems in other North Coast waterbodies.

Staff will provide the Regional Water Board with an update on its efforts to date in this promising area of work as it relates to potential TMDL implementation.