Item 8
Update on the Development of the Agricultural Lands Discharge Program

An Information Item of the North Coast Regional Water Quality Control Board

January 29, 2015
Santa Rosa, California
Presentation Outline

• Agricultural Program progress to date
• Permits – common elements
• Permit development updates:
  – Agricultural Lands in the Tule Lake Basin
  – Lily Bulb Cultivation
  – Vineyards and Orchards
  – Statewide Grazing
Ag Program Progress to Date

• Stakeholder Advisory Group meetings since December 2011
• Staff developed permit outline and concepts with input from Advisory Group
• Outreach to local growers and other stakeholders
• Revised scope of program
  – Staff worked with Advisory Group on a proposal to the Regional Board in September 2013
  – Permits specific to commodity and/or geographic area
Agricultural Lands Discharge Program Permits

Existing Permits

- Cow Diaries WDRs, Conditional Waiver, and NPDES
- Scott River TMDL Conditional Waiver
- Shasta River TMDL Conditional Waiver

Under Development

- Cannabis Cultivation Waste Discharges WDRs
- Agricultural Lands in the Tule Lake Basin
- Lily Bulb Cultivation
- Vineyards and Orchards
- Statewide Grazing Regulatory Action Project
Ag Program Progress to Date

• Staff met with stakeholders in small groups to work on area and commodity specific permits

• Staff drafting permits for discharges from:
  – Cannabis cultivation
  – Agricultural lands in the Tule Lake Basin
  – Lily bulb cultivation

• Permit-specific Advisory Group will meet in 2015 to give input on working draft permit for the Tule Lake Basin
Permits – Common Elements

• Agricultural BMP planning and implementation
• Monitoring
  – Tracking BMP implementation and effectiveness
  – Option for group water quality sampling
• Option to join a third party group
• Regional Water Board spot-check inspections and enforcement
Agricultural Lands in the Tule Lake Basin
Representative Cropping Pattern
Total – 63,354 Acres

Percent Acreage
- Alfalfa: 27%
- Cereal Grains: 36%
- Potatoes: 15%
- Mint: 4%
- Onions: 3%
- Pasture: 12%
- Other: 3%

Total acreage: 63,354 Acres
Tulelake Wildlife Refuge Lease Lands
Water Supply Canal System

Tule Lake
Sump 1A

Private Land Drainage

Lease Land Drainage

Pump 10

Pump 11
Source Water Quality in the Tule Lake Basin

- TID water supply originates in Upper Klamath Lake and the Klamath River
- Source water quality characterized by:
  - high nutrient and organic content
  - large diurnal swings in pH and dissolved oxygen

TID Water Supply Deliveries (in thousand AF)

- Klamath Project Return Flows Via Lost River: 81 thousand AF
- Klamath Irrigation District Drainage Inputs to J Canal: 65 thousand AF
- Klamath River Flows Via Lost River: 60 thousand AF
Tulelake Irrigation District (TID) Ownership and Drainage Network

- Tule Lake Sump 1A
- Lease Land
- Private Land
- Lost River
- Tule Lake Sump 1B
- Lease Land
- Lease Land
- Private Land
- J Canal
- CA/OR Border
- Outflow
- Pump D
Subsurface Irrigation Drainage System
Tule Lake Basin Permit Development

• Permit will include surface and groundwater discharges associated with agricultural lands in the Tule Lake Basin including:
  – TID drain maintenance activities
  – Private lands
  – Federal lease lands

• Ag stakeholder preference for General Waste Discharge Requirements
Water Quality Goals for Tule Lake Basin

• Lost and Klamath River TMDLs were developed in coordination with Oregon to address pH and dissolved oxygen impairments
• TMDLs set load allocations for Lost River and Tule Lake for organic matter and nutrients
• TMDLs generally require 50% load reduction
• Meeting TMDL allocations and water quality standards is dependent on improving water quality in Upper Klamath Lake
Monitoring

Implementation of BMPs

Monitoring Feedback Loop

BMP effectiveness

Instream Water Quality

• Coordination with larger monitoring efforts
  • Klamath Basin Monitoring Program
  • Upper Klamath Basin Stewardship efforts
Staff Outreach to Stakeholders

• Staff developed informational documents for stakeholders
  – Guidelines for a third party group
  – Overview of Tule Lake permit elements

• Outreach
  – Met with agricultural and environmental stakeholders - January and March 2014
  – Staff presented to Siskiyou County Board of Supervisors – September 2014
  – Staff presented to Upper Klamath Basin Stewardship Group in Klamath Falls – November 2014
Development of Third Party Group

- Tulelake Irrigation District (TID), Lava Beds/Butte Valley RCD, and Klamath Water Users Association (KWUA) provided an outline of potential third party roles

- Staff and TID sent a joint informational letter to landowners explaining the upcoming permit and program – Sept. 2014

- TID held grower workshops to present their potential role in program coordination and to outreach to growers – Oct. 2014
Third Party Program - Potential Roles

- Fee collection and enrollment
- Develop a group water quality management plan
- Group annual reporting
- Technical assistance and education
- Likely to not include certification or inspections
Roles for Regional Board

• Review of third party reports and plans
• Review of individual compliance with third party plan
• Site inspections
• Executive Officer must approve third party functions
  – Determine if third party has capacity to fulfill desired roles
  – Ensure third party requirements are equivalent to or better than permit requirements
Next Steps

• Finalize working preliminary draft permit for Advisory Group review by April/May 2015
• Work with KWUA, RCD, and TID to develop a group water quality plan
• Work with all stakeholders on monitoring and reporting program
• Coordinate with Oregon Department of Agriculture and Oregon Department of Environmental Quality TMDL Program
• Public review draft of full permit with CEQA Analysis – Fall 2015
• Regional Board hearing – Early 2016
Questions?
Update on Lily Bulb Cultivation

- Permit will address discharges to surface water and groundwater
- Met with growers and environmental interests April 2014
- Regional Board requested a draft Water Quality Plan, which was submitted in July 2014
- Met with growers in August 2014 to discuss Water Quality Plan and permit structure
- Staff working with growers on next steps
Smith River Plain Monitoring

• Regional Water Board initiated surface water monitoring in fall of 2013 and will conclude summer of 2015
• Purpose of monitoring is to screen the Smith River and tributaries in lily bulb production areas for:
  – presence of pesticides, nutrients, and other contaminants
  – sediment toxicity, aquatic toxicity
• Regional Board to initiate groundwater well monitoring in 2015
• Additional monitoring and actions may be necessary based on results of screening
• Results to inform permit and monitoring requirements
Next Steps – Lily Bulb Cultivation

- Continue to work with growers on Water Quality Plan
- Meet with Advisory Group on working draft permit
- Public review draft permit – 2016
Vineyards and Orchards

• Permit will address discharges to surface water and groundwater
• Working with the San Francisco Bay Region on permit consistency
  – Vineyard and orchard certification programs overlap regions
  – Working on criteria for third party certification programs
• Draft permit - 2017
Statewide Grazing Regulatory Action Project

• Regional Board staff are participating in a statewide effort to develop a regulatory strategy to address potential impacts to water quality from livestock grazing

• Water Boards recently held listening sessions around the state to solicit early public comments

• Consideration of a staff proposal by the State Water Board is planned for late 2016
Questions?