STATE OF CALIFORNIA
REGIONAL WATER QUALITY CONTROL BOARD
CENTRAL COAST REGION

STAFF REPORT FOR REGULAR MEETING OF FEBRUARY 1-2, 2012
Prepared on January 11, 2012

ITEM NUMBER: **13**

SUBJECT: **Rescission of Waste Discharge Requirements Order No. 99-101 and Adoption of Waste Discharge Requirements Order No. R3-2012-0015, Tres Pinos Water District Domestic Wastewater Treatment Facility, San Benito County, WDID 3 350103001**

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KEY INFORMATION

Discharger:	Tres Pinos County Water District
Facility Name:	Tres Pinos County Water District Wastewater Facility
Facility Address:	1,200 feet west of Southside Road at Bolado Road, Tres Pinos, CA 95075 San Benito County
Type of Waste:	Domestic wastewater
Treatment:	Domestic wastewater is treated in two clay-lined, mechanically aerated ponds and by partial-mix facultative (aerobic-anaerobic) stabilization.
Disposal:	Wastewater is disposed of through a percolation pond and an evaporation pond (Pond 3 and Pond 4) in series.
Capacity:	560,000 gallons total capacity in ponds 3 and 4
Permitted Flow:	60,000 gallons per day
Existing Order:	Waste Discharge Requirements Order No. 99-101

This Action: **Adopt Waste Discharge Requirements Order No. R3-2012-0015**

SUMMARY

Staff's review of existing Waste Discharge Requirements (WDR) Order No. 99-101 and available data indicated deficiencies in the wastewater treatment facility's treatment performance and potential for groundwater quality impacts. This order revises waste discharge requirements to require improved wastewater treatment and monitoring at the site. The order also significantly revises monitoring and reporting requirements to reflect the need for additional data required to adequately evaluate the facility and develop a plan to decrease the amounts of salts and nutrients discharged and submit follow-up progress reports.

DISCUSSION

Facility Description

The Facility has an influent wet well, flow meter, and two acres of treatment and disposal ponds. Wastewater is treated in two clay-lined, mechanically aerated ponds. Wastewater is treated by partial-mix facultative (aerobic-anaerobic) stabilization. Wastewater is disposed of through a percolation pond and an evaporation pond in series.

The treatment ponds are adjacent to Tres Pinos Creek on gently rolling terrain. Depth to groundwater is generally less than 20 feet below ground surface. The general groundwater gradient is to the northwest.

The percolation ponds discharge to the San Juan Sub-basin of the Gilroy-Hollister Groundwater Basin.

The Facility is designed to serve a maximum population of 750 persons and permitted to have a daily flow of 60,000 gallons averaged over each month (30-day average). The historical average 30-day wastewater flow (2006 through 2010) is approximately 23,000 gpd.

Compliance History

Report reviews and inspections performed by Water Board staff of the Facility in November 2003 and February 2006 revealed broken flow meters that were unreported, disposal pond bank destabilization, and pond bank vegetation overgrowth. Other reports cite Tres Pinos CWD as having discussed reducing aerator operation based on the Water District's inability to pay its electrical bills. The Tres Pinos CWD re-evaluated its operations and addressed the aforementioned Facility maintenance requirements in June 2006.

Changes Within Proposed WDR Order No. R3-2012-0015

Changes in proposed Order No. R3-2012-0015 from the existing Order No. 99-101 are summarized below. Typographical errors and minor changes that do not alter the intent of the Order are not discussed below.

To reduce the loading of salts to the groundwater basin, the order now has phased effluent limits to protect groundwater water quality objectives and beneficial uses. These new limits are similar to those in waste discharge requirements adopted for the Ridgemark Estates' and the City of Hollister's wastewater treatment plants located a mile to five miles north of the Facility. The new limits are as follows:

Phased Effluent Limitations for Salt Constituents

Effective Date	***Limitations [a] (mg/L)***		
	TDS	***Sodium***	***Chloride***
February 2, 2012	Narrative B.9 and B.10	Narrative B.9 and B.10	Narrative B.9 and B.10
January 30, 2014	1,500	300	300
Sept. 30, 2016	1,200	200	200

Notes:
a. 30-day average

Phased Effluent Limitations for Nutrients

Effective Date	***Limitation [a] (mg/L as N)***	
	Nitrate	***Ammonia[b]***
February 2, 2012	Narrative B.9 and B.10	Narrative B.9 and B.10
January 30, 2014	10	10
September 30, 2016	5	5

Notes:

a. 30-day average
b. Total ammonia as nitrogen

Phased BOD and TSS Effluent Limitations

Effective Date	***Limitation[a] (mg/L)***	
	BOD_5	***TSS***
February 2, 2012	Narrative B.9 and B.10	Narrative B.9 and B.10
January 30, 2014	60	60
September 30, 2016	30	30

Notes:

a. 30-day average

The order includes two groundwater limitations in Section B. Specifications, Groundwater Limitations. The two limitations are derived from Section II.A.4 of the Basin Plan, Objectives For Groundwater .

Water Board staff added three new operational requirements in Section B. Specifications, System Operation to ensure that Tres Pinos CWD understands its responsibility for proper management of outside interactions with the Facility and for the proper management of generated solids.

The order includes a new subsection, Wastewater Disposal, in Section B. Specifications.

The order includes a new Section C – Salt and Nutrient Management Program in proposed Order R3-2012-0015. Findings 49 through 57 define the need for the Tres Pinos CWD to be responsible in reducing salt loading to the local groundwater basin. A nutrient management program is required so that the Tres Pinos CWD is actively monitoring nutrient loading to verify compliance and ensure protection of groundwater quality.

The order includes a new Section D – Long-Term Wastewater Management Plan. The Long-Term Wastewater Management Plan must evaluate treatment system performance and disposal capacity and propose actions that will enable the facility to meet the phased effluent limitations prescribed in the proposed Order and provide adequate treatment and disposal capacity for projected future flows.

Water Board staff added five new General Provisions in Section E. General Provisions as listed below:

3. All technical and monitoring reports submitted pursuant to this Order are required pursuant to Section 13267 of the California Water Code. Failure to submit reports in accordance with schedules established by this Order, attachments to this Order, or failure to submit a report of sufficient technical quality acceptable to the Executive Officer, may subject the discharger to enforcement action pursuant to Section 13268 of the California Water Code.

5. Physical facilities shall be designed and constructed according to accepted engineering practices and shall be capable of full compliance with this Order when properly operated and maintained. Operation and maintenance of the wastewater system shall conform to the Operations and Maintenance Plan, which shall be periodically reviewed, and, if appropriate, revised. The Operations and Maintenance Plan is subject to review by the Executive Officer, who shall be provided a current copy within ten days of any significant revision.

6. All discharges from the Facility shall comply with lawful requirements of the municipalities, counties, irrigation districts, drainage districts, and other local agencies regarding discharges of waste to land and surface waters within their jurisdiction.

9. This Order may be reopened to address any changes in State or Federal plans, policies, or regulations that would affect the quality requirements for the discharges.

12. The Regional Board retains the authority to amend the time schedules for any or all of the effluent limitations or Long-Term Wastewater Management Plan compliance deadlines if it determines delays are due to circumstances beyond the Tres Pinos CWD's control.

Changes Within Proposed Monitoring and Reporting Program No. R3-2012-0015

Monitoring modifications in the proposed Monitoring and Reporting Program (MRP) No. R3-2012-0015 are incorporated into this new MRP. The new MRP will assist the Water Board in gauging how well the wastewater treatment system is functioning. This requires measuring parameters from the water supply, influent, treatment ponds, and the effluent. Solids disposal monitoring is added to the MRP, which requires standard solids analyses prior to landfill disposal. This type of solids monitoring is common in many of the Water Board's recent WDRs for similar facilities.

Additional Groundwater Monitoring

Overall, frequency of groundwater monitoring has been increased from semiannual to quarterly sampling for all constituents except boron and sulfate. The table below shows constituents that have been added to the groundwater monitoring requirements.

Parameter/Constituent[a]	Units	Sample Type	Minimum Sampling and Analyzing Frequency
Nitrite (as N)	mg/L	Grab	Quarterly (March, June, Sept. Dec.)
Total Kjeldahl Nitrogen (as N)	mg/L	Grab	Quarterly (March, June, Sept. Dec.)
Total Nitrogen (as N)	mg/L	Grab	Quarterly (Dec., March, June, Sept.)
Boron	mg/L	Grab	Semiannually (March & September)
Sulfate	mg/L	Grab	Semiannually (March & September)

Notes:

a) Sampling for specific analytes may be reduced or discontinued upon Discharger request and Executive Officer approval for parameters/constituents for which additional data provides no benefit.

Added Facility Monitoring

1. Weekly inspections m be made of the wastewater treatment and disposal pond areas. During the inspection, notes shall be kept of any violations of waste discharge requirements. A log of these inspections shall be maintained and a summary of observations made during the inspections shall be submitted with each quarterly monitoring report.

Added Reporting

1. **Biennially, by January 30th** the Discharger shall submit an engineering technical report as specified in provision E.7 of Order No. R3-2012-0015 that evaluates the performance and capacity of the wastewater treatment and disposal system. The first report is due January 30, 2013.

2. **Biennially, by January 30th** the Discharger shall submit a Salt and Nutrient Management report as specified in provision C.9 of Order No. R3-2012-0015. The first report is due January 30, 2014.

COMMENTS

Mr. William Marcum of Sterling Environmental Engineering and Tres Pinos County Water District representatives submitted comments during the public comment period. Water Board staff provides excerpts of these comments along with Water Board staff's comments and responses in Attachment 2. The Water Board did not receive any other comments regarding Order No. R3-2012-0015. Water Board staff modified the draft order based on comments received from interested parties as noted in Attachment 2.

Attachment 3 includes copies of the original comment letters from Sterling Environmental Engineering and the Tres Pinos County Water District.

RECOMMENDATION

Adopt Order R3-2012-0015 as proposed.

ATTACHMENTS

1. Waste Discharge Requirements Order No. R3-2012-0015
2. Public Comment Correspondence
3. Copy of Original Comment Letters