

**ADMINISTRATIVE CIVIL LIABILITY ORDER
FOR
AMADOR WATER AGENCY
AMADOR COUNTY SERVICE AREA NO. 3
LAKE CAMANCHE VILLAGE WASTEWATER TREATMENT PLANT
AMADOR COUNTY**

Introduction

The Amador Water Agency (AWA) (hereby known as “Discharger”) owns and operates the Lake Camanche Village Wastewater Treatment Plant (WWTP), which is located approximately one half mile north of the community of Lake Camanche Village in Amador County. The Discharger’s WWTP is regulated by Waste Discharge Requirements (WDRs) Order No. 5-01-033, which prescribes requirements for the treatment, storage and disposal of wastewater. The Discharger is also regulated under Cease and Desist (C&D) Order No. R5-2003-0126.

On 31 October 2005, the Executive Officer issued Administrative Civil Liability (ACL) Complaint No. R5-2005-0527, in the amount of \$100,000, for three spills that have occurred at the WWTP between February 2003 and July 2005.

Historical Overview

The WWTP collects, treats, and disposes of domestic wastewater from approximately 243 residential units within Lake Camanche Village. As of 2001, Lake Camanche Village was approaching 60% of complete build out of the 395 parcels available. The wastewater treatment facility provides secondary treatment with disinfection, followed by effluent disposal to a sprayfield.

The treatment plant consists of a 7 acre-foot aerated facultative pond, two 0.08 acre-foot settling basins, chlorination facilities (including a 240 foot long concrete lined chlorine contact chamber), a 19.5 acre-foot unlined storage pond, and a 12-acre effluent sprayfield.

Self monitoring reports submitted for the period from April 2002 to June 2005 indicate that monthly average flows range from approximately 41,000 to 90,000 gallons per day (gpd), with the highest flows occurring in February and March 2005. The WDRs do not contain a flow limitation as the WWTP did not contain an accurate flow meter at the time the updated WDRs were adopted in 2001.

The wastewater treatment portion of the WWTP was originally designed for complete build out of the Lake Camanche service area with a design flow capacity of approximately 281,000 gpd. However, the sprayfield and storage pond were not sized for full build out. As part of the September 2000 Report of Waste Discharge, the Discharger submitted a water balance that indicated that the storage pond does not have enough capacity to contain current flows, including seasonal precipitation using a 100 year return period. The water balance did not include capacity calculations for increased flows due to growth.

Because the Discharger could not immediately comply with WDRs Order No. 5-01-033, on 26 January 2001 the Regional Board also adopted Cease and Desist (C&D) Order No. 5-01-034. C&D Order No. 5-01-034 required the Discharger to (a) immediately prevent discharges of waste into surface water and surface water drainage courses, (b) immediately prevent tailwater runoff from the spray disposal areas, and (c) cease irrigation of the spray disposal fields 24 hours prior to, during, and 24 hours after periods of precipitation, or when the ground is saturated. The C&D also required the Discharger to be in full compliance with various Discharge Specifications, including treatment and storage pond freeboard

requirements (two feet of freeboard), and wastewater treatment, storage, and disposal design requirements (i.e., 100 year annual rainfall return requirements).

In addition to the items described above, the C&D also required the Discharger to (a) install an influent flow meter, (b) submit and implement a Spill Contingency plan to prevent unauthorized discharges, (c) submit and implement an Interim Sludge Management Plan, (d) submit and implement a Sewer Lift Station Safeguard Plan, (e) submit a Long Term Wastewater Disposal Plan, (f) submit a Revenue Plan, (g) submit a Sludge Disposal Plan, (h) submit a construction report certifying that all facility improvements had been made in order to comply with the WDRs, and (i) submit quarterly progress reports.

The Discharger submitted the majority of the technical reports and some of the quarterly progress reports, and has made certain improvements to the wastewater treatment plant and collection system. Reports submitted and improvements made include: submittal of a Spill Contingency Plan, submittal of a Long Term Wastewater Management Plan; identifying areas of I&I; making improvements to the collection system to reduce I&I; installing automated call out devices at each lift station to alert WWTP staff of potential problems; purchasing portable emergency generators that can be mobilized in case of power outages; constructing bypass piping and valves at each lift station to avoid spills in case of pump failure at a lift station; and purchase and operation of a "Turbo Mister" to provide an additional means of disposing of wastewater via evaporation.

The Discharger failed to submit several reports and make some improvements to the WWTP as required by the WDRs and C&D Order No. 5-01-034. These include: submittal of a groundwater monitoring well workplan and installation report, making final upgrades to Lift Station C to prevent overflows, and construction of additional storage and disposal areas. In a meeting with staff on 12 December 2002, and in a follow up letter dated 31 January 2003, the Discharger indicated that it did not want to make any large capital improvements to the existing WWTP, since it had entered into an agreement with East Bay Municipal Utility District (EBMUD) to determine the feasibility of regionalizing the wastewater systems within the Lake Camanche Area (i.e., AWA Lake Camanche Village, and EBMUD's Camanche North Shore and South Shore Recreation Areas wastewater plants).

Because the Discharger had significantly changed its approach toward upgrading the Lake Camanche Village WWTP, staff prepared, and the Regional Board adopted, C&D Order No. R5-2003-0126 on 5 September 2003.

C&D Order No. R5-2003-0126 requires the Discharger to comply with among other items, Discharge Prohibitions A.1 and A.7, and Reclamation Requirements D.7 of the WDRs. The C&D also requires the Discharger to submit a number of reports, including a Contingency Plan, a Lift Station Improvement Report, an I&I Reduction Study and Improvement Report, a Surface Water Investigation Report, a Feasibility Study, a Preferred Alternative Report, and quarterly progress reports. The Discharger has submitted all of the reports required by C&D Order No. R5-2003-0126.

Violations of the Waste Discharge Requirements and Cease and Desist Orders

The WDRs and C&D prohibit discharges of waste to surface waters and surface drainage courses. Since February 2003, there have been three documented spills that have entered either surface drainage courses or surface waters, which is a violation of the WDRs and C&Ds.

On 26 March 2003, staff issued a notice of violation (NOV) for the discharge of approximately 9,000 gallons of wastewater into a surface drainage course that flows to Lake Camanche. The spill occurred when a hose connection at a wastewater pump station failed. The pump station automatic shut down device did not activate because the automatic shut down was set too low. The spill did not enter the lake.

On 3 May 2005, an NOV was issued for freeboard violations and a spill that occurred between 28 and 30 March 2005 from the effluent storage pond. The Discharger failed to maintain two feet of freeboard within its storage pond from 4 February 2005 to when the NOV was issued on 3 May 2005 (and beyond). According to the Discharger's spill report, approximately 900,000 gallons of wastewater was released in a controlled manner from the WWTP effluent storage pond into a surface drainage course when it was determined that gopher holes were present in the berm on the effluent storage pond. The Discharger decided to release wastewater to prevent a catastrophic failure of the pond berms. The wastewater was discharged to a flowing surface water course leading to Lake Camanche. It is reasonable to assume that the spill entered Lake Camanche.

On 5 August 2005, the Discharger submitted a spill report for a spill that occurred on 27 July 2005. According to the spill report, approximately 800 to 1,000 gallons of disinfected treated wastewater was discharged into a surface water drainage course when an irrigation pipe broke in the sprayfields, and the tailwater return pumps failed to capture and return all effluent back to the treatment plant. The wastewater released into the drainage course soaked into the ground and did not enter Lake Camanche.

Discussion Of March 2005 Spill

On 7 June 2005, the Discharger submitted a report describing the steps that had been taken to maintain two feet of freeboard in the effluent storage pond, prior to the March 2005 spill. These steps included: making repairs to the collection system to reduce I&I; hauling wastewater offsite for disposal; notifying customers within the wastewater service area to conserve water; and use of evaporative disposal systems such as a turbo mister and spritzer barges. The Discharger also evaluated the feasibility of raising the effluent storage pond dam height. However, complications resulting from the Division of Dam Safety requirements prevented the Discharger from pursuing this alternative.

The 7 June 2005 report also provides information as to the improvements and measures that will be made to ensure that future freeboard levels in the ponds are greater than two feet. These include: continuing to make improvements to the collection system to reduce I&I, increasing storage capacity in the effluent storage pond by removing sediment/sludge and deepening the pond via excavation, replacing existing spray heads in the sprayfield with fogger nozzles to enhance evaporation, and adding additional misters to the effluent storage pond. In addition, in July 2005 the Amador Water Agency Board of Directors adopted a resolution which imposed a sewer connection moratorium until wastewater storage and disposal capacity at the WWTP is increased.

Administrative Civil Liability Complaint

The Discharger has violated its WDRs, C&Ds, the California Water Code, and the Clean Water Act by allowing the discharge of wastewater to surface water drainage courses and surface waters, and is subject to a civil liability action. On 31 October 2005, the Executive Officer issued Administrative Civil Liability Complaint No. R5-2005-0527 for \$100,000 to the Amador Water Agency. The ACL Complaint required that payment be made by 9 December 2005, or a hearing would be scheduled before the Regional Board.

In determining the amount of any civil liability pursuant to CWC Section 13327, the Regional Board must take into account the nature, circumstances, extent, and gravity of the violation or violations, whether the discharge is susceptible to cleanup or abatement, the degree of toxicity of the discharge, and, with respect to the violator, the ability to pay, the effect on ability to continue in business, any voluntary cleanup efforts undertaken, any prior history of violations, the degree of culpability, economic savings, if any, resulting from the violation, and other matters as justice may require.

These factors were considered as follows:

Nature and Circumstances

In January 2001 when updated WDRs for the WWTP were adopted by the Regional Board, a Cease and Desist (C&D) Order was also adopted because the Discharger could not comply with particular discharge specifications required by the WDRs. Specifically, it could not comply with Discharge Specification B.8 which states, *“The wastewater ponds shall have sufficient capacity to accommodate allowable wastewater flow, design seasonal precipitation, and ancillary inflow and infiltration. Design seasonal precipitation shall be based on total annual precipitation using a return period of 100 years, distributed monthly in accordance with the historical rainfall patterns.”*

Since February 2003, three documented spills into surface drainage courses and surface waters have occurred at the WWTP. On 24 February 2003, approximately 9,000 gallons was discharged into a surface drainage course due to a failed hose connection on a wastewater pump station. The affected surface drainage flows to Lake Camanche; however, none of the wastewater entered the lake.

Between 28 and 30 March 2005, approximately 900,000 gallons of wastewater was released in a controlled manner from the WWTP effluent storage pond into a surface water course when it was determined that gopher holes were present in the berms of the effluent storage pond. The Discharger decided to release wastewater from the pond to prevent a catastrophic failure of the pond berms. The wastewater was discharged to a surface watercourse leading to Lake Camanche. It is assumed that the spill entered Lake Camanche. Prior to the March 2005 spill, the freeboard in the effluent storage pond had been less than two feet since 4 February 2005.

On 27 July 2005, approximately 800 to 1,000 gallons of effluent was spilled into a drainage course adjacent to the spray disposal fields when an irrigation pipe broke in the sprayfield, and the tailwater return pumps failed to capture and return all effluent back to the treatment plant. The wastewater that was released into the drainage course soaked into the ground and did not enter Lake Camanche.

Extent

On 23 February 2003, a spill occurred at one of the lift station within the collection system. The spill occurred for approximately 90 minutes, releasing approximately 9,000 gallons of wastewater. For the March 2005 spill, approximately 900,000 gallons of wastewater was released in a controlled manner beginning on 28 March and ending on 30 March 2005. On 27 July 2005, a spill occurred from the tailwater control return sump. The spill occurred for approximately 200 minutes, releasing approximately 1,000 gallons.

Gravity

The Discharger failed to prevent the discharge of waste to surface waters and a surface water drainage course, both of which flow to Lake Camanche. Lake Camanche has a high level of beneficial uses including domestic water supply and recreation. Potential health risks from bacteria and viruses resulting from secondary disinfected treated wastewater are concern for humans and wildlife habitat.

Ability to Pay/Continue in Business

Staff is not aware of any reason why the Discharger is unable to pay the liability and continue in business.

Voluntary Cleanup Efforts Undertaken

For the February 2003 and July 2005 spills, the Discharger notified staff of the spills and began clean up activities as soon as the spills were detected. The spills were allowed to soak into the surface drainage course, and once it had dried up, the Discharger cleaned up any remaining residual solids or scum. The Discharger notified staff prior to the March 2005 spill. However, it was not possible for the Discharger to clean up the 900,000 gallon spill as the surface drainage course was already flowing with stormwater runoff.

Degree of Culpability

Since issuance of the updated WDRs and C&D Order in 2001, the Discharger has been aware that the WWTP has lacked sufficient storage and disposal capacity. The Discharger has taken measures to maintain two feet of freeboard in the wastewater ponds, increase storage and disposal capacities, and reduce the amount of I&I entering the collection system. These steps include: repairs to the collection system to reduce I&I; hauling wastewater offsite for disposal; notifying customers within the wastewater service area to conserve water; and use of evaporative disposal systems such as a turbo mister and spritzer barges. In the spring of 2005, the Discharger adopted a self-imposed sewer connection moratorium for the wastewater service area until wastewater storage and disposal capacity at the WWTP is increased.

Prior to the March 2005 spill, the Discharger notified staff that it had discovered gopher holes within the storage pond berm, and that it was going to have to release wastewater into a surface watercourse in order to prevent a potential catastrophic failure of the berm. Staff note that the gopher holes were high within the berm, and if the Discharger had maintained two feet of freeboard as required, the spill may not have occurred. Starting on 4 February 2005, the freeboard levels in the effluent storage pond were less than two feet. On the day that the Discharger began to release wastewater from the storage pond, the freeboard was approximately three to four inches. The Discharger's Contingency Plan, a document required by the C&D, states that the plan would be implemented when freeboard levels encroached within two of freeboard. The Discharger minimally implemented its Contingency Plan, including

pumping and hauling wastewater off site for disposal. Between 18 February 2005 and 28 March 2005 (the date of spill) the Discharger pumped and hauled approximately 3,000 gallons of wastewater off site on average once every six days. However, the Discharger's Contingency Plan provides an anticipated cost of \$2,000 per day for pumping and hauling of wastewater off site. The \$2,000 per day equates to approximately 9,000 gallons of wastewater being hauled off site each day. If the Discharger had pumped and hauled 9,000 gallons per day, five days a week, between the time that two feet of freeboard was reached and when the spill occurred, it may have prevented the spill from occurring or if not, at least would have reduced the amount of wastewater spilled during the March 2005 event.

Because the Discharger had known since at least 2001 (when the first C&D was adopted) that the WWTP lacked storage and disposal capacity, the Discharger should have considered other methods for obtaining additional storage and disposal capacity. These could have included deepening the wastewater treatment and storage ponds, removing accumulated sludge from the wastewater treatment and storage ponds, or hauling off more wastewater (at a minimum, the volume proposed in the Contingency Plan). The Discharger is aware of the potential penalty for wastewater system spills, as two C&Ds have been issued to the Discharger for lack of storage and disposal capacity.

Economic Savings

The Discharger received an economic benefit by not pumping and hauling as much wastewater off site as necessary to increase the capacity of the storage pond and to prevent the March 2005 spill from occurring.

The 28 March 2005 spill may have been prevented or minimized if the Discharger had fully implemented its Contingency Plan. This plan includes pumping and hauling of wastewater off site for disposal. While admittedly costly, a few other dischargers (among them Sierra Conservation Center and Putah Creek Resort) have done this in order to avoid spills to surface waters and a potential civil liability. As shown in the attached spreadsheets, staff has determined that the Discharger saved at a minimum \$67,500 in waste hauling and trucking costs associated with the March 2005 spill to Lake Camanche. Staff has not estimated the economic benefit accrued by the other two discharges.

Other Matters as Justice May Require

Staff spent approximately 100 hours, or \$8,000 in staff costs, in generation of the ACL Complaint, including review of the files. Staff estimate that we will incur another 100 hours of work (another \$8,000) to prepare the agenda material for the ACL Order and to prepare for the Regional Board presentation.

Prior History of Violations

Since issuance of the WDRs and C&D in 2001, the Discharger has been issued Notices of Violations for irrigating with wastewater 24 hours prior to, 24 after hours after, or during rain events; failure to comply with wastewater treatment and storage pond freeboard requirements; failure to comply with the effluent limitations; and for three spills that entered surface water and surface drainage courses. The Discharger has implemented measures and made improvements to the WWTP to both reduce the amount of wastewater entering the WWTP and increase its disposal capacity. When freeboard levels in the wastewater storage pond encroached within two feet in the effluent storage pond, the Discharger implemented its Contingency Plan to try and maintain two feet of freeboard. However, while the measures implemented and improvements made to the WWTP were a good beginning, they were not

sufficient to increase the storage capacity of the ponds to two feet or more of freeboard, or to prevent the discharge of wastewater.

Determination of Amount

For discharging waste in violation of the WDRs and C&D, and without obtaining an NPDES permit, the Regional Board may assess administrative civil liability based on CWC section 13385. The maximum administrative civil liability which can be imposed by the Regional Board under CWC Section 13385 is \$10,000 per day of discharge plus \$10 per gallon discharged in excess of 1,000 gallons per spill event.

For the three spills that occurred between February 2003 and August 2005, approximately 910,000 gallons of wastewater were released into surface waters over a period of five days. Of this, a total of 907,000 gallons were discharged in excess of 1,000 gallons per spill event. Therefore, the maximum administrative civil liability is \$50,000 (five days times \$10,000 per day) plus \$9,070,000 (910,000 gallons minus 1,000 gallons per spill event times \$10 per gallon), for a total maximum liability of \$9,120,000.

Response by the Discharger

In a letter dated 9 December 2005, the Discharger stated that it would agreed to pay the ACL in the amount of \$100,000 and requested that 50% (\$50,000) of the payment be utilized for a Supplemental Environmental Project (SEP).

The Amador Water Agency, California Department of Fish and Game, the Central Sierra Resource Conservation and Development Council, and the Foothill Conservancy have agreed to provide for the conservation and enhancement of habitat and natural resources at the New York Ranch Reservoir, located near Sutter Creek, in Amador County. The Amador Water Agency plans to donate and place the New York Ranch Reservoir property in a conservation easement to benefit the public.

The proposed SEP includes allocating \$50,000 towards preparing a Management Plan aimed at the maintenance, preservation, and enhancement of habitat and natural resources upstream and around New York Ranch Reservoir. The Management Plan will consider water quality goals and enhancement necessary for the preservation of habitat and natural resources for the site, and will also include a monitoring program aimed at measuring the success or failure in achieving the stated goals and objectives in the Management Plan, and provide a management section describing how results of the monitoring program will be integrated into future management of the site. Any unused funds from the allocated \$50,000 for the SEP will be paid to the State of California. Details of the SEP proposal are provided in Attachment A of the proposed ACL Order.

The proposed SEP states that the Discharger will submit the following reports to show that proposed project is moving forward, and to show how the money was spent:

- Partnership agreement between the Amador Water Agency, Department of Fish and Game, Central Sierra Resource Conservation and Development Council, and the Foothill Conservancy,
- Request for Proposal sent out to consultants for preparation of Management Plan,
- Executed contract and scope of work for the consultant that was chosen to prepare the Management Plan, and

- A completed Management Plan and copies of invoices.

Summary

Since issuance of its first C&D in 2001, the Discharger has been aware that its wastewater system lacks storage and disposal capacity. In lieu of making improvements to the WWTP, as required by the 2001 C&D, the Discharger elected to determine the feasibility of regionalizing the wastewater systems within the Lake Camanche Area. While undertaking the study, major improvements have been delayed. The Discharger did make some upgrades (i.e., make repairs to the collection system, and purchasing and using a turbo mister and spitzer barges for enhanced evaporation). However, these actions were insufficient to maintain two feet of freeboard in the effluent storage pond, and/or prevent the March 2005 spill from occurring. The March 2005 spill totaling approximately 900,000 gallons was due in part to the freeboard levels in the storage pond being less than two feet, and the presence of gopher holes high within the berm. While the Discharger implemented its Contingency Plan in that it hauled off a minimal amount of wastewater to try and obtain two feet of freeboard in the storage ponds, it appears that the Discharger did not fully implement the plan or do enough to prevent the spill. If the Discharger had pumped and hauled the amount of wastewater called for in the Contingency Plan, it may have prevented the spill from occurring, or if not, at least would have reduced the amount of wastewater spilled during the March 2005 event.

This item is being brought to the Board for consideration and adoption on advice from legal counsel because the Discharger proposed that half of the ACL amount be applied to a SEP. Although the Executive Officer has the authority to sign settlement agreements, the "settlement" would then be considered a contract and the enforcement mechanism would be through the court system, whereas an Order is enforceable by the Board through the Water Code.

The Executive Officer issued an ACL Complaint to the Amador Water Agency in the amount of \$100,000, and staff recommends that the Board adopt the ACL Order that includes the proposed SEP. If the SEP is not completed, then the Discharger must submit the remainder of the ACL (\$50,000) upon order of the Executive Officer.

JSK/MRL/WSW:

26/27 January 2006 Board meeting

Central Valley Regional Water Quality Control Board

Date prepared: 5 January 2006