CALIFORNIA REGIONAL WATER QUALITY CONTROL BOARD
CENTRAL VALLEY REGION

ADMINISTRATIVE CIVIL LIABILITY COMPLAINT R5-2014-0542

IN THE MATTER OF

TOWN OF DISCOVERY BAY COMMUNITY SERVICES DISTRICT
DISCOVERY BAY WASTEWATER TREATMENT PLANT
CONTRA COSTA COUNTY

This Complaint is issued to the Town of Discovery Bay Community Services District (hereafter Discharger) pursuant to California Water Code section 13385, which authorizes the imposition of administrative civil liability, and Water Code section 13323, which authorizes the Executive Officer to issue this Complaint and Water Code section 7, which authorizes the delegation of the Executive Officer's authority to a deputy, in this case the Assistant Executive Officer. This Complaint alleges that the Discharger violated provisions of Waste Discharge Requirements (WDRs) Order R5-2008-0179-01 (NPDES CA 0078590).

The Assistant Executive Officer of the Central Valley Regional Water Quality Control Board (Central Valley Water Board or Board) alleges the following:

BACKGROUND

1. The Discharger owns and operates a wastewater collection, treatment, and disposal system. The wastewater treatment plant (WWTP) provides sewerage service for the Town of Discovery Bay. Treated wastewater is discharged to Old River, which is a water of the United States.

2. On 7 June 2012, the Central Valley Water Board issued WDRs Order R5-2008-0179-01 which prescribes requirements for the discharge of wastewater from the Discharger's WWTP. The WDRs contain, among other items, prohibitions, effluent limitations, and monitoring and reporting requirements with which the Discharger must comply.

3. WDRs Order R5-2008-0179-01 includes Discharge Prohibition III.A, which states: "*Discharge of wastewater at a location or manner different from that described in the Findings is prohibited.*"

4. Attachment D in WDRs Order R5-2008-0179-01 includes Standard Provision I.D, which states: "*The Discharger shall at all times properly operate and maintain all facilities and systems of treatment and control (and related appurtenances) which are installed or used by the Discharger to achieve compliance with the conditions of this Order…*"

PREVIOUS ENFORCEMENT

5. Between April 2008 and June 2010, the Discharger reported seven sanitary sewer overflows which resulted in spills of over 1.7 million gallons of raw sewage into surface water. On 20 April 2012, the Assistant Executive Officer issued Administrative Civil Liability (ACL) Order R5-2012-0526, and proposed a civil liability of $241,000 in response to the seven sanitary sewer overflows. The Discharger has paid the penalty and the Board considers the violations listed in ACL Order R5-2012-0526 to be settled.

6. On 13 September 2013, the Assistant Executive Officer issued Administrative Civil Liability Order R5-2013-0581 to the Discharger for effluent limitation violations that occurred at the wastewater treatment plant between 1 March 2011 and 30 April 2013. The ACL Order assessed penalties for 23 violations of the effluent limitations contained in the WDRs, 21 of which were for violations of the total coliform limitations resulting from operational problems at the WWTP. The ACL Order assessed a mandatory minimum penalty of $54,000 and allowed the Discharger to apply $34,500 to a Supplemental Environmental Project (SEP). The Discharger paid $19,500 of the civil liability and is in the process of completing the SEP.

UNAUTHORIZED DISCHARGE FROM WASTEWATER TREATMENT PLANT

7. The wastewater treatment facility has two parallel plants that are bisected by State Road 4 with Plant 1 to the north and Plant 2 to the south. All flow enters the Plant 1 pump station, and is then split into the headworks for each plant. The two plants are connected by a 12-inch and an 8-inch line that runs from a pump station at Plant 1 to the headworks at Plant 2. Typically, wastewater flows from Plant 1 to Plant 2 via the 12-inch line. One purpose of the 8-inch line is to maintain flow to Plant 2 in the event that the 12-inch line is inoperable.

8. On 20 February 2014, the Discharger notified Board staff during a phone conversation that 534,181 gallons of partially treated wastewater were discharged to Old River. On 19 February 2014, the 12-inch line to Plant 2 was shut down for construction, and the 8-inch line was opened to allow water to continue to flow into the headworks at Plant 2. According to the Discharger's 5 March 2014 Notification Report, the 8-inch line had not been used for "many years". The Discharger's operators were not aware of a valve in the 8-inch line, as the valve had become buried and forgotten after many years of non-use. Because the valve was left open, a portion of the water in the 8-inch line flowed from the pump station at Plant 1 directly to the secondary clarifier at Plant 1. This portion of flow did not receive primary treatment (including primary settlement, ammonia removal, nitrification, and denitrification) prior to entering the secondary clarifiers, resulting in a discharge of partially treated wastewater. Additional details regarding the unauthorized discharge are found in Attachment A to this Complaint (the Discharger's 5 March 2014 *Discovery Bay CSD Written Notification of Partially Treated Effluent*) and in Attachment B to this Complaint (Water Board staff's 5 May 2014 *Compliance*

Evaluation Inspection and Notice of Violation), incorporated herein by reference.

9. The diversion around primary treatment took place from 2:21 pm on 19 February 2014 to 8:02 am on 20 February 2014. Partially treated wastewater was discharged to Old River between 8:00 pm on 19 February 2014 through 3:13 am on 20 February 2014, and again on 20 February 2014 from 6:32 am until 8:02 am. This resulted in raw wastewater mixing with partially treated wastewater in the secondary clarifier and a discharge of 534,181 gallons of partially treated wastewater to Old River, a water of the United States. The discharge of partially treated wastewater is a violation of Discharge Prohibition III.A of the WDRs.

REGULATORY CONSIDERATIONS

10. As described above, the Discharger discharged partially treated wastewater to waters of the United States in violation of Discharge Prohibition III.A of WDRs Order R5-2008-0179-01.

11. The *Water Quality Control Plan for the Sacramento River and San Joaquin River Basins, Fourth Edition* (Basin Plan) designates beneficial uses, establishes water quality objectives, contains implementation plans and policies for protecting waters of the basin, and incorporates by reference plans and policies adopted by the State Water Resources Control Board. Beneficial uses applicable to Old River are: municipal and domestic supply; agricultural irrigation; agricultural stock watering; industrial process water supply; industrial service supply; water contact recreation; other non-contact water recreation; warm freshwater aquatic habitat; cold freshwater aquatic habitat; warm fish migration habitat; cold fish migration habitat; warm spawning habitat; wildlife habitat; and navigation.

12. The Central Valley Regional Water Board may impose administrative civil liabilities for violations of a discharger's WDR permit and/or applicable Board orders pursuant to the procedures described in Water Code section 13323. This Administrative Civil Liability Complaint alleges the Discharger's conduct constitutes violations of the WDRs R5-2008-0179-01 and seeks administrative civil liabilities under Water Code section 13385.

13. Issuance of this Administrative Civil Liability Complaint to enforce Division 7, Chapter 5.5 of the Water Code is exempt from the provisions of the California Environmental Quality Act (Pub. Resources Code § 21000 et seq.), in accordance with California Code of Regulations, title 14, sections 15307, 15308, 15321(a)(2) and all applicable law.

CALCULATION OF CIVIL LIABILITIES UNDER WATER CODE SECTION 13385

14. Water Code section 13385, subdivision (a)(2) states that a person who violates a waste discharge requirement shall be liable civilly in accordance with this section.

15. Water Code section 13385, subdivisions (c) and (e), state in part:

(c) Civil liability may be imposed administratively by the state board or a regional board pursuant to Article 2.5 (commencing with Section 13323) of Chapter 5 in an amount not to exceed the sum of both of the following:

(1) Ten thousand dollars ($10,000) for each day in which the violation occurs.

(2) Where there is a discharge, any portion of which is not susceptible to cleanup or is not cleaned up, and the volume discharged but not cleaned up exceeds 1,000 gallons, an additional liability not to exceed ten dollars ($10) multiplied by the number of gallons by which the volume discharged but not cleaned up exceeds 1,000 gallons.

…..

(e) …. At a minimum, liability shall be assessed at a level that recovers the economic benefits, if any, derived from the acts that constitute the violation.

Maximum Civil Liability for Discharge to Surface Waters: Per Water Code section 13385, civil liability administratively imposed by the Central Valley Water Board may not exceed $10,000 per violation per day, plus $10 per gallon for each gallon of waste discharged over 1,000 gallons. The Discharger discharged 534,181 gallons of partially treated sewage over a 17 hour period to water of the United States. A total of 533,181 gallons were discharged in excess of 1,000 gallons, over a one-day period. The maximum administrative civil liability that may be assessed for the unauthorized is **five million three hundred forty one thousand and eight hundred and ten dollars ($5,341,810)**.

16. **Minimum Civil Liability for Discharge to Surface Waters:** Pursuant to Water Code section 13385(e), civil liability, at a minimum, must be assessed at a level that recovers the economic benefits, if any, derived from the acts that constitute the violation. In general, the partially treated discharge was due to insufficient training, inadequate maintenance, and an inadequate Contingency Plan and Standard Operating Procedures. The economic benefit gained by non-compliance has been calculated using the US EPA's BEN model. The economic benefit is calculated to be approximately **forty six thousand two hundred twenty four dollars ($46,224)**, which becomes the minimum civil liability which must be assessed pursuant to section 13385.

PROPOSED ADMINISTRATIVE CIVIL LIABILITY

17. Pursuant to Water Code section 13385, subdivision (e), the Board is required to take into account the nature, circumstances, extent, and gravity of the violations, whether the discharges are susceptible to cleanup or abatement, the degree of toxicity of the discharges, and, with respect to the violator, the ability to pay, the effect on its ability to continue its business, any voluntary cleanup efforts undertaken, any prior history of violations, the degree of culpability, economic benefit or savings, if any, resulting from the violations, and other matters that justice may require.

18. On 17 November 2009, the State Water Board adopted Resolution No. 2009-0083 amending the Water Quality Enforcement Policy (Enforcement Policy). The Enforcement Policy was approved by the Office of Administrative Law and became effective on 20 May 2010. The Enforcement Policy establishes a methodology for assessing administrative civil liability. The use of this methodology addresses the factors that are required to be considered when imposing a civil liability as outlined in Water Code sections 13327 and 13385(e). The entire Enforcement Policy can be found at:
http://www.waterboards.ca.gov/water_issues/programs/enforcement/docs/enf_policy_final11179.pdf

19. The recommended administrative civil liability was derived from the use of the penalty methodology in the Enforcement Policy, and Water Code sections 13327 and 13385(e), as explained in detail in Attachment C to this Complaint. The proposed civil liability takes into account such factors as the Discharger's culpability, history of violations, ability to pay and continue in business, and other factors as justice may require.

20. As described above, the maximum penalty for the violations is $5,341,810 and the minimum penalty is $46,224. Based on consideration of the above facts, and after applying the penalty methodology, the Assistant Executive Officer of the Central Valley Water Board proposes that civil liability be imposed administratively on the Discharger in the amount of **$271,320**. The specific factors considered in this penalty are detailed in Attachment C.

21. Notwithstanding the issuance of this Complaint, the Central Valley Water Board retains the authority to assess additional penalties for violations of the requirements of the Discharger's waste discharge requirements for which penalties have not yet been assessed or for violations that may subsequently occur.

22. On 14 February 2014, the Executive Officer designated Andrew Altevogt, Assistant Executive Officer, as the Lead Prosecution Officer for all enforcement matters originating in the Central Valley Region. The 14 February 2014 Delegation of Authority also authorizes Andrew Altevogt to issue Administrative Civil Liability Complaints.

TOWN OF DISCOVERY BAY IS HEREBY GIVEN NOTICE THAT:

1. The Assistant Executive Officer of the Central Valley Water Board proposes that the Discharger be assessed an Administrative Civil Liability in the amount of **two hundred seventy one thousand three hundred and twenty dollars ($271,320).** The amount of the proposed liability is based upon a review of the factors cited in Water Code section 13385, as well as the State Water Resources Control Board's 2010 Water Quality Enforcement Policy, and includes consideration of the economic benefit or savings resulting from the violations.

2. A hearing on this matter will be conducted at the Central Valley Water Board meeting scheduled on **9/10 October 2014**, unless one of the following occurs by **8 August 2014:**

   a) The Discharger waives the hearing by completing the attached form (checking the box next to Option #1) and returning it to the Central Valley Water Board, along with payment for the proposed civil liability of **two hundred seventy one thousand three hundred and twenty dollars ($271,320)**; or

   b) The Central Valley Water Board agrees to postpone any necessary hearing after the Discharger requests to engage in settlement discussions by checking the box next to Option #2 on the attached form, and returns it to the Board along with a letter describing the issues to be discussed; or

   c) The Central Valley Water Board agrees to postpone any necessary hearing after the Discharger requests a delay by checking the box next to Option #3 on the attached form, and returns it to the Board along with a letter describing the issues to be discussed.

3. If a hearing is held, the Central Valley Water Board will consider whether to affirm, reject, or modify the proposed Administrative Civil Liability, or whether to refer the matter to the Attorney General for recovery of judicial civil liability.

4. If this matter proceeds to hearing, the Assistant Executive Officer reserves the right to amend the proposed amount of civil liability to conform to the evidence presented, including but not limited to, increasing the proposed amount to account for the costs of enforcement (including staff, legal and expert witness costs) incurred after the date of the issuance of this Complaint through completion of the hearing.

Original Signed By

ANDREW ALTEVOGT, Assistant Executive Officer

11 July 2014

DATE

Attachment A: Veolia Notification Report
Attachment B: Regional Board Staff Inspection Report
Attachment C: Penalty Calculation Methodology

WAIVER FORM
FOR ADMINISTRATIVE CIVIL LIABILITY COMPLAINT

By signing this waiver, I affirm and acknowledge the following:

I am duly authorized to represent the Town of Discovery Bay (hereafter Discharger) in connection with Administrative Civil Liability Complaint R5-2014-0542 (hereafter Complaint). I am informed that California Water Code section 13323, subdivision (b), states that, "a hearing before the regional board shall be conducted within 90 days after the party has been served. The person who has been issued a complaint may waive the right to a hearing."

□ ***(OPTION 1: Check here if the Discharger waives the hearing requirement and will pay in full.)***

a. I hereby waive any right the Discharger may have to a hearing before the Central Valley Water Board.

b. I certify that the Discharger will remit payment for the proposed civil liability in the full amount of **two hundred seventy one thousand three hundred and twenty dollars ($271,320)** by check that references "ACL Complaint R5-2014-0542" made payable to the *State Water Pollution Cleanup and Abatement Account*. Payment must be received by the Central Valley Water Board by **8 August 2014.**

c. I understand the payment of the above amount constitutes a proposed settlement of the Complaint, and that any settlement will not become final until after a 30-day public *notice and comment period. Should the Central Valley Water Board receive significant new information or comments during this comment period, the Central Valley Water Board's Executive Officer may withdraw the complaint, return payment, and issue a new complaint. I also understand that approval of the settlement* will result in the Discharger having waived the right to contest the allegations in the Complaint and the imposition of civil liability.

d. I understand that payment of the above amount is not a substitute for compliance with applicable laws and that continuing violations of the type alleged in the Complaint may subject the Discharger to further enforcement, including additional civil liability.

□ ***(OPTION 2: Check here if the Discharger waives the 90-day hearing requirement in order to engage in settlement discussions*.)** I hereby waive any right the Discharger may have to a hearing before the Central Valley Water Board within 90 days after service of the complaint, but I reserve the ability to request a hearing in the future. I certify that the Discharger will promptly engage the Central Valley Water Board Prosecution Team in settlement discussions to attempt to resolve the outstanding violation(s). By checking this box, the Discharger requests that the Central Valley Water Board delay the hearing so that the Discharger and the Prosecution Team can discuss settlement. It remains within the discretion of the Central Valley Water Board to agree to delay the hearing. Any proposed settlement is subject to the conditions described above under "Option 1."

□ ***(OPTION 3: Check here if the Discharger waives the 90-day hearing requirement in order to extend the hearing date and/or hearing deadlines. Attach a separate sheet with the amount of additional time requested and the rationale.)*** I hereby waive any right the Discharger may have to a hearing before the Central Valley Water Board within 90 days after service of the complaint. By checking this box, the Discharger requests that the Central Valley Water Board delay the hearing and/or hearing deadlines so that the Discharger may have additional time to prepare for the hearing. It remains within the discretion of the Central Valley Water Board to approve the extension.

_____
(Print Name and Title)

_____
(Signature)

_____
(Date)

ATTACHMENT A

RECEIVED
SACRAMENTO
CVR WQCB
14 MAR -6 AM 10:33

VEOLIA
WATER

March 5, 2014

WDR Order No. R5-2008-0179
Permit Number: CA0078590

Mr. Mohammad Farhad
Regional Water Quality Control Board
Central Valley Region
11020 Sun Center Drive # 200
Rancho Cordova, SA 95370-6114

Subject: Discovery Bay CSD Written Notification of Partially Treated Effluent

Dear Mr. Farhad:

As discussed during the initial notification of this incident the 5-day reporting requirement was waived to receive the laboratory results of the grab samples that were taken during the course of this incident. A table of laboratory results is included in this report.

Incident Description

Plant no. 2 influent flow was scheduled to be temporarily shut-down on February 19, 2014 to accommodate part of capital improvement projects. During this scheduled shut-down of influent flow to Plant no. 2, plant operators were to switch the influent flow from a 12-inch line (that has been used for many years) to an 8-inch line (that has not been used for many years). These valves to switch the flow are located at Plant no1 influent pump station. The 8-inch line at Plant no.1 influent pump station was opened at approximately 2:21 pm.

After opening the valve influent flow was visually observed going into Plant no.2 headworks, no observable indications of anything unusual was seen prior to the end of the shift at 3:30 pm. Later in the early evening at approximately 7:55 pm the operations supervisor received an automatic notification of a high effluent NTU. The operations supervisor called the on-call operator whom responded by going to the facility to perform a plant status investigation. The plant operator arrived promptly to the facility and visually observed that Plant no.1 was hydraulically overloaded but could not determine the cause? At approximately 11:08 pm the operator raised the Plant no.1 influent flow slide gate at the influent pump station in an attempt to direct more flow to Plant no.2 and increased the UV dosage from 120 mj/cm-2 to 200 mj/cm-2. After midnight the plant operator began seeing the final effluent NTU drop. The operator thought he solved the problem and went home. Upon arrival to the facility the next morning at approximately 6:00 am the operator once again confirmed Plant no.1 was hydraulically overloaded. The project manager arrived at approximately 6:45 am and was notified and began troubleshooting the situation. Plant staff then manually diverted the effluent flow to the lagoons at 8:02 am.

The project manager instructed operators to direct all the flow to Plant no.1 and observed approximately 2.0 MGD in the headworks flow meter. He then instructed the operators to direct all the flow to Plant no.2 and the flow meter only registered 0.63 MGD with all the flow directed to Plant no.2. Plant no.1 still continued to receive flow to the clarifiers, at which time the project manager visually observed a back flow to the clarifier splitter structure at Plant

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Tel 925-634-8818
www.veoliawaterna.com

no.1 prior to the secondary clarifiers. Apparently when flow was directed down the 8-inch line, only a portion of this flow made it to Plant no.2 headworks because a tee in the line diverted influent flow directly to the clarifier splitter structure at Plant no. 1 through an open valve. The portion of the flow that went to the clarifier splitter structure, mixed with flow from the oxidation ditch at Plant no .1, went to the clarifiers, UV treatment, and ultimately to the river discharge. This portion of the 8-inch flow did, however, essentially bypass the oxidation ditch treatment process.

When the project manager visually observed flow to the splitter structure prior to the secondary clarifiers plant staff were instructed to divert the flow to the lagoons. Plant staff diverted the flow at the effluent station just prior to the UV Station to the lagoons at 8:02 am. The project manager called the Town engineer who described a valve at the Plant no.1 clarifier splitter structure that isolates the 8-inch line that connects to the 8-inch raw sewage influent pump station discharge line. The valve was not easily visible and needed to be excavated at which time the valve was determined to be open. Once the valve was closed, the influent pump station 8-inch line was opened. The pumps were turned on and it was confirmed there was no flow to the splitter structure. The valve, unknown to plant staff, had been open for many years and was undetected until the 8-inch line at the influent pump station had been opened.

Response

All the proper notifications to the regulatory agencies were made within the acceptable time limits. The project manager instructed plant staff to grab samples up-stream and down-stream of the discharge point in the Old River and to grab a sample of the export pump station wet well that was believed representative of the final effluent that was being discharged to the Old River. At the time of this incident, the Old River flow was going south, that is, from RSW-001 to RSW-002. It was not raining. Following is a table of the results of those samples that were taken on February 20, 2014. As can be seen, the background total coliform in the Old River was three times the level discharged during the incident.

Sample Location	Time	Total Coliform MPN	Fecal Coliform MPN	BOD mg/L	TSS mg/L
RSW -001	9:08am	1600 MPN	2.0 MPN	0.68 mg/L	3.89 mg/L
RSW- 002	9 :18am	1600 MPN	5.6 MPN	0.90 mg/L	4.89 mg/L
Effluent WW	9 :40am	540 MPN	79 MPN	23.4 mg/L	4.71 mg/L

Staff began an investigation to determine the amount of partially treated water that had been discharged into the Old River. One important fact is that once the NTU reaches 30 NTU for more than five minutes, the flow is automatically diverted to the lagoons by the SCADA system. The SCADA system then automatically resumes discharge once the NTU reaches and remains under 25 NTU for 15 min. Plant staff queried the SCADA tags for various parameters, Plant no.2 influent (Plant no.1 influent flow was not registering in SCADA at present due to construction), UV flow, NTU, UV dosage, UV banks on line and UVAS/UVT. The spreadsheet with this data is attached to this letter.

Another important fact is that the SCADA system was not reading the flows correctly because the influent flow meters and the lift station flow meters had recently been replaced and were not yet been rescaled properly in the SCADA system. The influent flow meters are on a scale of 0-7 MGD, the UV flow meter is on a scale of 0-6 MGD. However the SCADA system had a 0-10 scale for all meters. This resulted in skewed data on the SCADA system

and has been corrected. Although, we are not able to historically change the tags in the SCADA system. Even though the SCADA readings for these flow meters were skewed, the totalizer readings at the instrument are captured manually and represent accurate readings for reporting of daily flows including flows for UV dosages. We have added a separate column showing the re-scaled flow values for the UV flow in the attached spreadsheet.

Once the cause of the incident was identified and corrected, the plant staff continued to direct flow to the lagoons for over 5 hours until all the partially treated water in the system was processed. Final effluent discharge resumed in the Old River resumed at 1:25 pm on February 20, 2014.

Based on the sample results taken, after becoming aware of the incident there seems to have been minimal environmental impact. The amount of combined partially treated water has been calculated to be approximately 534,000 gallons and can be referred to in the attachment to this letter. Please call the District Engineer Gregory Harris at HERWIT Engineering (925) 672-6599 if you have any questions on the spreadsheet calculations.

The 8-inch line at the influent pump station will be labeled with a reminder that the splitter structure valve must be confirmed closed prior to opening the 8-inch valve.

"I certify under penalty of law that this document and all attachment were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

If you have any questions please call me at 925-634-8437.

Fermin Garcia

Fermin Garcia, Project Manager

Veolia Water West Operating Services

FG:

Enclosure:

Rick Howard, General Manager, Town of Discovery Bay

Virgil Koehne, Water and Wastewater Manager, Town of Discovery Bay

Gregory Harris, District Engineer, HERWIT Engineering

Attachment:

8-Inch Line Incident 2014 Spreadsheet

Date	wwtp2 UV MGD	wwtp2 UV MGD	wwtp2 UV MGD	wwtp2 UV_MGD	wwtp2 Inf_Q MGD	UV NTU	UV Dose	UVAS /UVT	Trojan 3000
	Raw Value as recorded	Adjusted for Scaling Issues	Flow that Did Not Meet Full Treatment (MGD)	Flow that Did Not Meet Full Treatment (Gallons)					UV Banks On
2/19/2014 16:30	2.638	1.583			0.063	3.8	315.8	69.6	4.0
2/19/2014 16:31	2.619	1.571			0.481	3.9	308.6	69.5	4.0
2/19/2014 16:32	2.628	1.577			0.466	3.9	304.7	69.4	4.0
2/19/2014 16:33	2.609	1.566			0.016	4.0	307.8	69.3	4.0
2/19/2014 16:34	2.534	1.521			0.075	4.1	310.1	69.2	4.0
2/19/2014 16:35	2.588	1.553			0.609	4.1	315.0	69.1	4.0
2/19/2014 16:36	2.613	1.568			0.044	4.2	312.6	69.0	4.0
2/19/2014 16:37	2.559	1.536			0.019	4.2	320.1	68.8	4.0
2/19/2014 16:38	2.631	1.579			0.481	4.3	315.0	68.8	4.0
2/19/2014 16:39	2.566	1.539			0.031	4.4	312.6	68.8	4.0
2/19/2014 16:40	2.559	1.536			0.016	4.4	316.7	68.7	4.0
2/19/2014 16:41	2.597	1.558			0.056	4.6	315.0	68.5	4.0
2/19/2014 16:42	2.594	1.556			0.069	4.6	302.2	68.4	4.0
2/19/2014 16:43	2.681	1.609			0.034	4.7	298.3	68.1	4.0
2/19/2014 16:44	2.578	1.547			0.038	4.7	298.3	68.1	4.0
2/19/2014 16:45	2.641	1.584			0.531	5.0	304.5	67.8	4.0
2/19/2014 16:46	2.563	1.538			0.016	5.1	303.7	67.6	4.0
2/19/2014 16:47	2.463	1.478			0.022	5.1	315.4	67.5	4.0
2/19/2014 16:48	2.388	1.433			0.069	5.2	309.0	67.4	4.0
2/19/2014 16:49	2.422	1.453			0.419	5.3	312.5	67.2	4.0
2/19/2014 16:50	2.388	1.433			0.216	5.3	318.9	67.2	4.0
2/19/2014 16:51	2.325	1.395			0.022	5.4	317.1	67.1	4.0
2/19/2014 16:52	2.278	1.367			0.053	5.5	322.7	67.0	4.0
2/19/2014 16:53	2.213	1.328			0.456	5.7	325.7	66.8	4.0
2/19/2014 16:54	2.172	1.303			0.019	5.7	328.7	66.8	4.0
2/19/2014 16:55	2.263	1.358			0.034	5.7	319.9	66.7	4.0

NOTES

LS =	Lift Station
FE =	Final Effluent
wwtp2=	Wastewater Plant No.2
wwtp1=	Wastewater Plant no.1
Q=	Flow
Inf =	Influent
UV =	Ultra Violet Light
UVAS=	

No Discharge from 3:14 am to 6:31 am

Adjustment for Flow based on Scaling Issues between Instrument and Scada Systm

SCADA Scaling	0 to 10
Instrument Scaling	0 to 6
Ratio =	0.6

2/19/2014 16:56	2.341	1.404	0.081	5.7	308.1	66.6	4.0
2/19/2014 16:57	2.303	1.382	0.034	5.7	314.3	66.6	4.0
2/19/2014 16:58	2.400	1.440	0.041	5.8	297.5	66.4	4.0
2/19/2014 16:59	2.425	1.455	0.556	5.9	296.7	66.4	4.0
2/19/2014 17:00	2.366	1.419	0.538	5.8	293.5	66.3	4.0
2/19/2014 17:01	2.353	1.412	0.025	5.8	307.9	66.2	4.0
2/19/2014 17:02	2.144	1.286	0.075	5.9	321.3	66.2	4.0
2/19/2014 17:03	2.125	1.275	0.606	6.0	328.5	66.2	4.0
2/19/2014 17:04	2.056	1.234	0.772	5.9	336.1	66.1	4.0
2/19/2014 17:05	1.925	1.155	0.631	6.0	343.0	66.1	4.0
2/19/2014 17:06	1.916	1.149	0.547	6.0	344.2	66.1	4.0
2/19/2014 17:07	1.916	1.149	0.775	6.0	343.0	66.1	4.0
2/19/2014 17:08	2.050	1.230	0.581	6.0	341.9	66.0	4.0
2/19/2014 17:09	2.109	1.266	0.031	6.0	318.3	65.9	4.0
2/19/2014 17:10	2.097	1.258	0.034	5.9	303.5	65.8	4.0
2/19/2014 17:11	2.394	1.436	0.694	6.0	292.7	65.8	4.0
2/19/2014 17:12	2.475	1.485	0.078	5.9	284.2	65.8	4.0
2/19/2014 17:13	2.531	1.519	0.019	6.0	283.5	65.8	4.0
2/19/2014 17:14	2.681	1.609	0.509	6.0	276.3	65.8	4.0
2/19/2014 17:15	2.781	1.669	0.691	6.0	272.9	65.8	4.0
2/19/2014 17:16	2.853	1.712	0.028	5.9	276.3	65.9	4.0
2/19/2014 17:17	2.819	1.691	0.394	5.9	269.0	65.9	4.0
2/19/2014 17:18	2.775	1.665	0.719	5.9	270.3	66.0	4.0
2/19/2014 17:19	2.766	1.659	0.709	5.9	271.0	66.0	4.0
2/19/2014 17:20	2.791	1.674	0.034	5.8	267.7	66.0	4.0
2/19/2014 17:21	2.791	1.674	0.300	5.8	273.6	66.0	4.0
2/19/2014 17:22	2.731	1.639	0.634	5.9	269.0	65.9	4.0
2/19/2014 17:23	2.728	1.637	0.034	5.9	272.9	65.9	4.0
2/19/2014 17:24	2.778	1.667	0.047	6.0	269.0	65.8	4.0
2/19/2014 17:25	2.703	1.622	0.544	5.9	272.3	65.7	4.0
2/19/2014 17:26	2.803	1.682	0.025	6.0	267.7	65.6	4.0
2/19/2014 17:27	2.972	1.783	0.022	6.1	264.6	65.6	4.0
2/19/2014 17:28	2.784	1.671	0.075	6.1	262.7	65.5	4.0
2/19/2014 17:29	2.872	1.723	0.053	6.1	250.2	65.4	4.0

2/19/2014 17:30	2.878	1.727	0.522	6.2	253.1	65.3	4.0
2/19/2014 17:31	2.931	1.759	0.025	6.2	252.5	65.3	4.0
2/19/2014 17:32	2.947	1.768	0.025	6.2	253.1	65.1	4.0
2/19/2014 17:33	2.838	1.703	0.456	6.2	248.0	65.1	4.0
2/19/2014 17:34	2.803	1.682	0.731	6.3	258.5	65.1	4.0
2/19/2014 17:35	2.822	1.693	0.028	6.3	257.3	65.1	4.0
2/19/2014 17:36	2.841	1.704	0.297	6.4	261.6	65.0	4.0
2/19/2014 17:37	2.750	1.650	0.694	6.4	259.1	64.8	4.0
2/19/2014 17:38	2.753	1.652	0.206	6.5	259.7	64.8	4.0
2/19/2014 17:39	2.722	1.633	0.038	6.7	265.5	64.7	4.0
2/19/2014 17:40	2.769	1.661	0.084	6.6	264.8	64.6	4.0
2/19/2014 17:41	2.731	1.639	0.056	6.7	254.3	64.4	4.0
2/19/2014 17:42	2.738	1.643	0.538	6.7	255.6	64.4	4.0
2/19/2014 17:43	2.734	1.641	0.325	6.8	256.2	64.4	4.0
2/19/2014 17:44	2.678	1.607	0.028	6.8	259.4	64.4	4.0
2/19/2014 17:45	2.675	1.605	0.041	7.0	258.7	64.3	4.0
2/19/2014 17:46	2.800	1.680	0.081	6.9	262.0	64.2	4.0
2/19/2014 17:47	2.738	1.643	0.656	7.2	269.6	64.2	4.0
2/19/2014 17:48	2.506	1.504	0.066	7.2	269.6	64.0	4.0
2/19/2014 17:49	2.550	1.530	0.056	7.2	274.8	63.9	4.0
2/19/2014 17:50	2.478	1.487	0.644	7.3	271.8	63.9	4.0
2/19/2014 17:51	2.434	1.461	0.813	7.3	271.1	63.9	4.0
2/19/2014 17:52	2.481	1.489	0.041	7.4	273.3	63.8	4.0
2/19/2014 17:53	2.494	1.496	0.506	7.4	269.6	63.7	4.0
2/19/2014 17:54	2.569	1.541	0.200	7.5	266.8	63.7	4.0
2/19/2014 17:55	2.594	1.556	0.031	7.6	261.4	63.6	4.0
2/19/2014 17:56	2.759	1.656	0.066	7.7	254.3	63.6	4.0
2/19/2014 17:57	2.775	1.665	0.503	7.7	254.3	63.6	4.0
2/19/2014 17:58	2.859	1.716	0.050	7.7	248.3	63.6	4.0
2/19/2014 17:59	2.778	1.667	0.019	7.8	245.3	63.5	4.0
2/19/2014 18:00	2.922	1.753	0.281	7.9	240.1	63.4	4.0
2/19/2014 18:01	2.925	1.755	0.722	7.9	239.0	63.4	4.0
2/19/2014 18:02	2.947	1.768	0.803	7.9	240.1	63.4	4.0
2/19/2014 18:03	2.913	1.748	0.084	8.0	242.4	63.3	4.0

2/19/2014 18:04	2.788	1.673	0.659	8.1	242.9	63.2	4.0
2/19/2014 18:05	2.806	1.684	0.819	8.1	238.4	63.2	4.0
2/19/2014 18:06	2.909	1.746	0.306	8.2	235.7	63.2	4.0
2/19/2014 18:07	2.959	1.776	0.347	8.5	229.9	63.0	4.0
2/19/2014 18:08	2.966	1.779	0.703	8.3	227.9	62.9	4.0
2/19/2014 18:09	3.034	1.821	0.091	8.3	233.5	62.9	4.0
2/19/2014 18:10	3.169	1.901	0.066	8.5	224.0	62.8	4.0
2/19/2014 18:11	3.272	1.963	0.538	8.5	223.6	62.7	4.0
2/19/2014 18:12	3.203	1.922	0.694	8.5	219.9	62.6	4.0
2/19/2014 18:13	3.272	1.963	0.063	8.5	218.5	62.6	4.0
2/19/2014 18:14	3.344	2.006	0.066	8.6	212.5	62.5	4.0
2/19/2014 18:15	3.181	1.909	0.566	8.7	211.6	62.4	4.0
2/19/2014 18:16	3.256	1.954	0.763	8.7	215.6	62.3	4.0
2/19/2014 18:17	3.203	1.922	0.213	8.8	221.7	62.3	4.0
2/19/2014 18:18	3.031	1.819	0.503	8.8	223.2	62.2	4.0
2/19/2014 18:19	3.038	1.823	0.778	8.9	222.2	62.1	4.0
2/19/2014 18:20	3.097	1.858	0.053	9.0	224.7	62.1	4.0
2/19/2014 18:21	3.031	1.819	0.025	9.1	217.4	61.9	4.0
2/19/2014 18:22	2.941	1.764	0.334	9.1	223.7	61.9	4.0
2/19/2014 18:23	3.003	1.802	0.656	9.2	222.2	61.8	4.0
2/19/2014 18:24	3.119	1.871	0.044	9.3	218.4	61.7	4.0
2/19/2014 18:25	3.097	1.858	0.075	9.4	214.7	61.6	4.0
2/19/2014 18:26	3.038	1.823	0.078	9.4	221.7	61.6	4.0
2/19/2014 18:27	3.006	1.804	0.047	9.4	219.3	61.5	4.0
2/19/2014 18:28	3.066	1.839	0.200	9.4	227.7	61.6	4.0
2/19/2014 18:29	3.047	1.828	0.044	9.5	214.1	61.4	4.0
2/19/2014 18:30	2.994	1.796	0.038	9.5	219.5	61.4	4.0
2/19/2014 18:31	2.866	1.719	0.159	9.5	223.5	61.4	4.0
2/19/2014 18:32	2.784	1.671	0.716	9.5	228.9	61.4	4.0
2/19/2014 18:33	2.709	1.626	0.047	9.4	228.9	61.3	4.0
2/19/2014 18:34	2.688	1.613	0.031	9.5	228.9	61.3	4.0
2/19/2014 18:35	2.756	1.654	0.659	9.6	234.1	61.2	4.0
2/19/2014 18:36	2.688	1.613	0.053	9.8	230.1	61.2	4.0
2/19/2014 18:37	2.650	1.590	0.053	9.8	236.5	61.1	4.0

2/19/2014 18:38	2.663	1.598	0.106	9.9	231.8	61.1	4.0
2/19/2014 18:39	2.675	1.605	0.075	9.9	229.5	61.1	4.0
2/19/2014 18:40	2.722	1.633	0.047	9.8	234.1	61.0	4.0
2/19/2014 18:41	2.713	1.628	0.513	9.8	231.8	61.0	4.0
2/19/2014 18:42	2.750	1.650	0.525	9.7	231.8	61.1	4.0
2/19/2014 18:43	2.725	1.635	0.044	9.8	232.9	61.0	4.0
2/19/2014 18:44	2.659	1.596	0.056	9.6	238.3	61.0	4.0
2/19/2014 18:45	2.619	1.571	0.684	9.7	245.9	61.0	4.0
2/19/2014 18:46	2.459	1.476	0.309	9.8	247.9	61.0	4.0
2/19/2014 18:47	2.347	1.408	0.044	9.7	260.9	61.0	4.0
2/19/2014 18:48	2.353	1.412	0.569	9.8	251.4	61.0	4.0
2/19/2014 18:49	2.375	1.425	0.538	10.0	252.1	61.0	4.0
2/19/2014 18:50	2.438	1.463	0.047	9.8	242.7	60.9	4.0
2/19/2014 18:51	2.444	1.466	0.469	9.9	244.6	60.9	4.0
2/19/2014 18:52	2.522	1.513	0.763	9.9	244.6	61.0	4.0
2/19/2014 18:53	2.522	1.513	0.066	9.8	237.1	61.0	4.0
2/19/2014 18:54	2.631	1.579	0.200	10.0	236.5	60.9	4.0
2/19/2014 18:55	2.703	1.622	0.753	10.0	231.8	60.9	4.0
2/19/2014 18:56	2.619	1.571	0.219	10.0	231.2	60.9	4.0
2/19/2014 18:57	2.753	1.652	0.047	10.0	226.2	60.9	4.0
2/19/2014 18:58	2.863	1.718	0.619	9.9	225.1	61.0	4.0
2/19/2014 18:59	2.863	1.718	0.853	9.9	224.6	60.9	4.0
2/19/2014 19:00	2.791	1.674	0.756	9.8	226.2	61.0	4.0
2/19/2014 19:01	2.863	1.718	0.078	9.8	224.1	60.9	4.0
2/19/2014 19:02	2.878	1.727	0.506	9.8	220.5	60.9	4.0
2/19/2014 19:03	2.822	1.693	0.788	9.9	227.3	60.9	4.0
2/19/2014 19:04	2.828	1.697	0.088	9.9	223.5	60.8	4.0
2/19/2014 19:05	2.991	1.794	0.150	10.1	219.0	60.7	4.0
2/19/2014 19:06	2.916	1.749	0.725	10.3	200.6	60.5	4.0
2/19/2014 19:07	3.541	2.124	0.047	10.4	186.7	60.5	4.0
2/19/2014 19:08	3.825	2.295	0.075	10.5	174.4	60.3	4.0
2/19/2014 19:09	4.013	2.408	0.528	10.9	169.8	60.1	4.0
2/19/2014 19:10	4.256	2.554	0.769	10.9	174.4	60.0	4.0
2/19/2014 19:11	3.688	2.213	0.038	11.0	180.0	59.8	4.0

2/19/2014 19:12	3.491	2.094	0.497	11.1	187.0	59.6	4.0
2/19/2014 19:13	3.306	1.984	0.800	11.2	196.5	59.6	4.0
2/19/2014 19:14	3.128	1.877	0.397	11.3	200.3	59.5	4.0
2/19/2014 19:15	3.156	1.894	0.047	11.5	209.6	59.2	4.0
2/19/2014 19:16	2.988	1.793	0.544	11.7	210.1	59.0	4.0
2/19/2014 19:17	2.831	1.699	0.169	12.1	210.1	58.9	4.0
2/19/2014 19:18	2.763	1.658	0.038	12.1	213.7	58.8	4.0
2/19/2014 19:19	2.850	1.710	0.622	12.4	215.3	58.5	4.0
2/19/2014 19:20	2.809	1.686	0.375	12.6	204.5	58.4	4.0
2/19/2014 19:21	2.819	1.691	0.047	12.7	201.6	58.2	4.0
2/19/2014 19:22	2.859	1.716	0.100	12.8	200.7	58.2	4.0
2/19/2014 19:23	2.969	1.781	0.081	12.9	192.6	58.2	4.0
2/19/2014 19:24	3.016	1.809	0.050	12.9	191.8	58.2	4.0
2/19/2014 19:25	3.097	1.858	0.572	13.1	191.0	58.1	4.0
2/19/2014 19:26	2.978	1.787	0.288	13.1	196.6	58.2	4.0
2/19/2014 19:27	3.056	1.834	0.072	13.1	192.2	58.2	4.0
2/19/2014 19:28	2.909	1.746	0.709	13.3	194.8	58.2	4.0
2/19/2014 19:29	2.872	1.723	0.763	13.4	198.8	58.1	4.0
2/19/2014 19:30	2.919	1.751	0.078	13.5	201.6	58.1	4.0
2/19/2014 19:31	2.894	1.736	0.659	13.6	199.3	58.2	4.0
2/19/2014 19:32	2.834	1.701	0.834	13.7	203.6	58.1	4.0
2/19/2014 19:33	2.794	1.676	0.075	13.9	202.6	58.0	4.0
2/19/2014 19:34	2.734	1.641	0.038	13.6	205.5	58.0	4.0
2/19/2014 19:35	2.888	1.733	0.316	13.7	205.5	57.8	4.0
2/19/2014 19:36	2.781	1.669	0.788	13.8	198.8	57.8	4.0
2/19/2014 19:37	2.844	1.706	0.131	13.6	200.7	57.8	4.0
2/19/2014 19:38	2.859	1.716	0.106	13.8	197.0	57.8	4.0
2/19/2014 19:39	2.934	1.761	0.684	13.7	198.8	57.8	4.0
2/19/2014 19:40	2.838	1.703	0.725	13.9	199.3	57.8	4.0
2/19/2014 19:41	2.831	1.699	0.072	14.0	204.0	57.7	4.0
2/19/2014 19:42	2.956	1.774	0.850	13.8	196.6	57.7	4.0
2/19/2014 19:43	2.906	1.744	0.834	14.0	195.2	57.8	4.0
2/19/2014 19:44	2.944	1.766	0.084	13.8	199.3	57.8	4.0
2/19/2014 19:45	2.988	1.793	0.572	13.9	197.9	57.7	4.0

2/19/2014 19:46	2.947	1.768			0.872	14.3	197.5	57.7	4.0	
2/19/2014 19:47	3.028	1.817			0.175	14.7	194.8	57.6	4.0	
2/19/2014 19:48	3.175	1.905			0.081	14.6	176.4	57.4	4.0	
2/19/2014 19:49	3.584	2.151			0.581	14.6	165.7	57.3	4.0	
2/19/2014 19:50	3.984	2.391			0.066	14.9	152.6	57.2	4.0	
2/19/2014 19:51	4.309	2.586			0.066	15.0	145.3	57.1	4.0	
2/19/2014 19:52	4.444	2.666			0.659	15.3	142.1	56.9	4.0	
2/19/2014 19:53	4.431	2.659			0.653	15.3	144.2	56.8	4.0	
2/19/2014 19:54	4.303	2.582			0.069	15.6	151.4	56.6	4.0	
2/19/2014 19:55	3.772	2.263			0.641	16.0	155.3	56.3	4.0	
2/19/2014 19:56	3.391	2.034			0.863	16.6	165.8	56.0	4.0	
2/19/2014 19:57	3.275	1.965			0.822	17.0	173.8	55.8	4.0	
2/19/2014 19:58	3.225	1.935			0.100	18.2	176.8	55.4	4.0	
2/19/2014 19:59	3.075	1.845			0.456	17.7	174.3	55.2	4.0	
2/19/2014 20:00	2.981	1.789	1.789	1242	0.900	17.6	175.1	55.0	4.0	No Longer Meeting Full Treatment
2/19/2014 20:01	2.884	1.731	1.731	1202	0.128	17.9	177.5	54.9	4.0	Max Disinfection for 4 banks on is
2/19/2014 20:02	3.097	1.858	1.858	1290	0.066	17.8	171.2	55.0	4.0	2.5 MGD at 55% UVAS/UVT. Limited
2/19/2014 20:03	3.369	2.021	2.021	1404	0.722	17.9	161.1	54.9	4.0	Treatment below 55% UVAS/UVT
2/19/2014 20:04	3.484	2.091	2.091	1452	0.563	17.5	147.8	54.9	4.0	
2/19/2014 20:05	4.141	2.484	2.484	1725	0.088	17.3	140.0	55.0	4.0	
2/19/2014 20:06	4.597	2.758	2.758	1915	0.631	17.2	133.4	55.3	4.0	
2/19/2014 20:07	4.403	2.642	2.642	1835	0.700	16.8	132.8	55.5	4.0	
2/19/2014 20:08	4.203	2.522	2.522	1751	0.063	16.5	144.1	55.7	4.0	
2/19/2014 20:09	4.063	2.438	2.438	1693	0.059	16.4	153.1	55.7	4.0	
2/19/2014 20:10	3.666	2.199	2.199	1527	0.725	16.6	161.1	55.6	4.0	
2/19/2014 20:11	3.216	1.929	1.929	1340	0.378	16.9	172.3	55.5	4.0	
2/19/2014 20:12	3.025	1.815	1.815	1260	0.056	17.6	171.6	55.2	4.0	
2/19/2014 20:13	3.209	1.926	1.926	1337	0.684	18.1	173.9	55.0	4.0	
2/19/2014 20:14	3.038	1.823	1.823	1266	0.888	18.6	172.0	54.8	4.0	
2/19/2014 20:15	3.003	1.802	1.802	1251	0.147	19.7	166.8	54.4	4.0	
2/19/2014 20:16	3.063	1.838	1.838	1276	0.078	20.7	162.1	54.1	4.0	
2/19/2014 20:17	3.216	1.929	1.929	1340	0.728	21.5	148.2	53.9	4.0	
2/19/2014 20:18	3.947	2.368	2.368	1645	0.088	22.2	139.0	53.7	4.0	
2/19/2014 20:19	4.228	2.537	2.537	1762	0.047	22.2	128.5	53.7	4.0	

2/19/2014 20:20	4.500	2.700	2.700	1875	0.138	22.1	123.6	53.5	4.0
2/19/2014 20:21	4.412	2.647	2.647	1839	0.488	21.8	128.1	53.7	4.0
2/19/2014 20:22	4.372	2.623	2.623	1822	0.697	21.7	131.3	54.0	4.0
2/19/2014 20:23	4.150	2.490	2.490	1729	0.063	21.4	139.9	54.0	4.0
2/19/2014 20:24	3.553	2.132	2.132	1480	0.122	20.9	149.9	54.1	4.0
2/19/2014 20:25	3.309	1.986	1.986	1379	0.728	20.7	154.9	54.0	4.0
2/19/2014 20:26	3.178	1.907	1.907	1324	0.834	20.5	159.4	54.0	4.0
2/19/2014 20:27	3.159	1.896	1.896	1316	0.094	20.5	165.3	53.8	4.0
2/19/2014 20:28	2.984	1.791	1.791	1243	0.191	19.9	166.4	53.6	4.0
2/19/2014 20:29	2.903	1.742	1.742	1210	0.763	19.8	173.5	53.7	4.0
2/19/2014 20:30	2.825	1.695	1.695	1177	0.744	19.6	172.6	53.6	4.0
2/19/2014 20:31	2.844	1.706	1.706	1185	0.081	19.7	172.6	53.7	4.0
2/19/2014 20:32	2.934	1.761	1.761	1223	0.659	19.6	169.5	53.8	4.0
2/19/2014 20:33	2.941	1.764	1.764	1225	0.353	19.3	169.5	54.0	4.0
2/19/2014 20:34	2.944	1.766	1.766	1227	0.069	19.1	167.6	54.2	4.0
2/19/2014 20:35	2.994	1.796	1.796	1247	0.116	18.6	168.3	54.2	4.0
2/19/2014 20:36	2.975	1.785	1.785	1240	0.056	18.3	169.1	54.4	4.0
2/19/2014 20:37	2.913	1.748	1.748	1214	0.628	17.8	173.5	54.6	4.0
2/19/2014 20:38	3.000	1.800	1.800	1250	0.647	17.8	176.7	54.6	4.0
2/19/2014 20:39	2.947	1.768	1.768	1228	0.575	18.1	176.3	54.9	4.0
2/19/2014 20:40	2.975	1.785	1.785	1240	0.859	17.4	174.3	55.0	4.0
2/19/2014 20:41	2.941	1.764	1.764	1225	0.556	17.2	176.3	55.0	4.0
2/19/2014 20:42	2.900	1.740	1.740	1208	0.047	17.4	175.9	55.1	4.0
2/19/2014 20:43	2.888	1.733	1.733	1203	0.688	17.2	179.1	55.1	4.0
2/19/2014 20:44	2.875	1.725	1.725	1198	0.888	17.5	180.0	55.2	4.0
2/19/2014 20:45	2.938	1.763	1.763	1224	0.469	17.5	177.1	54.9	4.0
2/19/2014 20:46	2.981	1.789	1.789	1242	0.666	17.6	174.3	55.0	4.0
2/19/2014 20:47	3.084	1.851	1.851	1285	0.875	17.7	167.2	54.9	4.0
2/19/2014 20:48	3.519	2.111	2.111	1466	0.094	17.9	149.9	54.9	4.0
2/19/2014 20:49	3.747	2.248	2.248	1561	0.056	17.7	143.3	54.8	4.0
2/19/2014 20:50	4.191	2.514	2.514	1746	0.503	17.9	139.8	54.7	4.0
2/19/2014 20:51	4.250	2.550	2.550	1771	0.841	17.9	138.7	54.7	4.0
2/19/2014 20:52	4.369	2.621	2.621	1820	0.100	18.0	138.9	54.7	4.0
2/19/2014 20:53	4.075	2.445	2.445	1698	0.050	18.5	144.5	54.6	4.0

2/19/2014 20:54	3.950	2.370	2.370	1646	0.609	18.8	149.3	54.4	4.0
2/19/2014 20:55	3.413	2.048	2.048	1422	0.863	19.2	153.7	54.2	4.0
2/19/2014 20:56	3.181	1.909	1.909	1326	0.094	19.3	161.8	54.1	4.0
2/19/2014 20:57	3.013	1.808	1.808	1255	0.678	19.5	167.2	53.9	4.0
2/19/2014 20:58	2.984	1.791	1.791	1243	0.891	19.8	167.2	53.7	4.0
2/19/2014 20:59	3.109	1.866	1.866	1296	0.928	20.3	168.7	53.6	4.0
2/19/2014 21:00	3.072	1.843	1.843	1280	0.606	20.3	158.5	53.4	4.0
2/19/2014 21:01	3.003	1.802	1.802	1251	0.328	20.3	146.0	53.4	4.0
2/19/2014 21:02	3.591	2.154	2.154	1496	0.844	19.7	132.4	53.4	4.0
2/19/2014 21:03	4.272	2.563	2.563	1780	0.103	19.7	131.7	53.6	4.0
2/19/2014 21:04	4.594	2.756	2.756	1914	0.369	19.2	125.8	53.7	4.0
2/19/2014 21:05	4.722	2.833	2.833	1967	0.791	19.4	124.2	53.7	4.0
2/19/2014 21:06	4.700	2.820	2.820	1958	0.725	18.9	122.8	53.9	4.0
2/19/2014 21:07	4.438	2.663	2.663	1849	0.078	18.9	126.9	54.0	4.0
2/19/2014 21:08	4.384	2.631	2.631	1827	0.500	19.2	137.6	54.0	4.0
2/19/2014 21:09	3.678	2.207	2.207	1533	0.938	19.5	144.7	53.8	4.0
2/19/2014 21:10	3.572	2.143	2.143	1488	0.938	19.8	144.0	53.4	4.0
2/19/2014 21:11	3.294	1.976	1.976	1372	0.878	19.9	151.3	53.3	4.0
2/19/2014 21:12	3.225	1.935	1.935	1344	0.106	20.5	152.5	53.0	4.0
2/19/2014 21:13	3.366	2.019	2.019	1402	0.697	20.1	146.8	52.8	4.0
2/19/2014 21:14	3.503	2.102	2.102	1460	0.913	20.2	134.4	52.7	4.0
2/19/2014 21:15	4.041	2.424	2.424	1684	0.944	20.4	130.0	52.6	4.0
2/19/2014 21:16	4.503	2.702	2.702	1876	0.831	20.1	121.1	52.8	4.0
2/19/2014 21:17	4.681	2.809	2.809	1951	0.084	19.9	120.0	52.9	4.0
2/19/2014 21:18	4.797	2.878	2.878	1999	0.638	19.5	118.1	53.0	4.0
2/19/2014 21:19	4.756	2.854	2.854	1982	0.884	19.3	119.0	53.4	4.0
2/19/2014 21:20	4.750	2.850	2.850	1979	0.119	19.2	122.3	53.4	4.0
2/19/2014 21:21	4.466	2.679	2.679	1861	0.206	19.7	125.5	53.3	4.0
2/19/2014 21:22	3.847	2.308	2.308	1603	0.816	19.6	133.3	53.1	4.0
2/19/2014 21:23	3.834	2.301	2.301	1598	0.094	19.8	136.8	53.0	4.0
2/19/2014 21:24	3.397	2.038	2.038	1415	0.538	19.6	147.7	52.9	4.0
2/19/2014 21:25	3.438	2.063	2.063	1432	0.884	19.4	147.7	52.8	4.0
2/19/2014 21:26	3.394	2.036	2.036	1414	0.953	19.6	148.3	52.8	4.0
2/19/2014 21:27	3.284	1.971	1.971	1368	0.938	19.4	149.2	52.8	4.0

2/19/2014 21:28	3.228	1.937	1.937	1345	0.947	19.3	152.5	52.8	4.0
2/19/2014 21:29	3.188	1.913	1.913	1328	0.941	19.1	153.8	52.8	4.0
2/19/2014 21:30	3.413	2.048	2.048	1422	0.822	18.9	147.7	52.9	4.0
2/19/2014 21:31	3.747	2.248	2.248	1561	0.072	18.9	136.8	53.0	4.0
2/19/2014 21:32	4.037	2.422	2.422	1682	0.631	18.4	123.8	53.2	4.0
2/19/2014 21:33	4.441	2.664	2.664	1850	0.888	18.3	120.0	53.2	4.0
2/19/2014 21:34	4.700	2.820	2.820	1958	0.084	18.2	117.3	53.5	4.0
2/19/2014 21:35	4.787	2.872	2.872	1995	0.372	18.0	124.4	53.6	4.0
2/19/2014 21:36	4.388	2.633	2.633	1828	0.609	18.0	131.1	53.8	4.0
2/19/2014 21:37	4.166	2.499	2.499	1736	0.078	17.9	136.4	53.6	4.0
2/19/2014 21:38	3.872	2.323	2.323	1613	0.263	18.1	146.3	53.6	4.0
2/19/2014 21:39	3.678	2.207	2.207	1533	0.706	18.4	145.1	53.3	4.0
2/19/2014 21:40	3.228	1.937	1.937	1345	0.100	18.8	152.2	52.9	4.0
2/19/2014 21:41	3.281	1.969	1.969	1367	0.600	18.9	151.3	52.6	4.0
2/19/2014 21:42	3.169	1.901	1.901	1320	0.788	19.3	147.7	52.4	4.0
2/19/2014 21:43	3.172	1.903	1.903	1322	0.125	19.5	154.9	52.4	4.0
2/19/2014 21:44	3.178	1.907	1.907	1324	0.409	20.0	151.5	52.3	4.0
2/19/2014 21:45	3.006	1.804	1.804	1253	0.781	19.8	152.2	52.3	4.0
2/19/2014 21:46	3.119	1.871	1.871	1299	0.141	19.6	153.5	52.3	4.0
2/19/2014 21:47	3.181	1.909	1.909	1326	0.106	19.5	147.7	52.5	4.0
2/19/2014 21:48	3.016	1.809	1.809	1257	0.622	19.2	160.6	52.6	4.0
2/19/2014 21:49	3.097	1.858	1.858	1290	0.150	19.2	156.8	52.8	4.0
2/19/2014 21:50	3.072	1.843	1.843	1280	0.059	19.1	159.2	52.9	4.0
2/19/2014 21:51	3.091	1.854	1.854	1288	0.113	19.3	157.1	53.1	4.0
2/19/2014 21:52	3.081	1.849	1.849	1284	0.378	19.1	156.1	53.3	4.0
2/19/2014 21:53	3.009	1.806	1.806	1254	0.716	18.6	161.0	53.3	4.0
2/19/2014 21:54	2.928	1.757	1.757	1220	0.106	18.5	169.9	53.5	4.0
2/19/2014 21:55	2.950	1.770	1.770	1229	0.678	18.2	170.3	53.6	4.0
2/19/2014 21:56	2.816	1.689	1.689	1173	0.834	18.2	176.0	53.6	4.0
2/19/2014 21:57	2.844	1.706	1.706	1185	0.847	18.2	174.3	53.7	4.0
2/19/2014 21:58	2.684	1.611	1.611	1118	0.478	18.0	180.4	53.7	4.0
2/19/2014 21:59	2.703	1.622	1.622	1126	0.634	17.9	182.7	53.7	4.0
2/19/2014 22:00	2.738	1.643	1.643	1141	0.834	18.1	176.0	53.7	4.0
2/19/2014 22:01	2.856	1.714	1.714	1190	0.472	18.0	174.3	53.9	4.0

2/19/2014 22:02	2.888	1.733	1.733	1203	0.609	18.1	170.6	53.8	4.0
2/19/2014 22:03	3.034	1.821	1.821	1264	0.763	18.1	167.6	53.8	4.0
2/19/2014 22:04	2.941	1.764	1.764	1225	0.141	18.2	164.6	53.8	4.0
2/19/2014 22:05	3.019	1.811	1.811	1258	0.494	18.4	166.8	53.8	4.0
2/19/2014 22:06	2.994	1.796	1.796	1247	0.806	18.3	166.8	53.8	4.0
2/19/2014 22:07	3.119	1.871	1.871	1299	0.219	18.5	163.2	53.8	4.0
2/19/2014 22:08	3.066	1.839	1.839	1277	0.556	18.5	168.3	53.9	4.0
2/19/2014 22:09	3.078	1.847	1.847	1283	0.834	18.5	164.6	54.0	4.0
2/19/2014 22:10	3.078	1.847	1.847	1283	0.856	18.8	160.8	53.8	4.0
2/19/2014 22:11	3.116	1.869	1.869	1298	0.803	18.7	160.8	53.9	4.0
2/19/2014 22:12	3.172	1.903	1.903	1322	0.756	18.9	162.8	53.7	4.0
2/19/2014 22:13	3.094	1.856	1.856	1289	0.850	18.9	163.2	53.7	4.0
2/19/2014 22:14	3.300	1.980	1.980	1375	0.856	18.8	157.8	53.7	4.0
2/19/2014 22:15	3.356	2.014	2.014	1398	0.150	19.1	155.6	53.5	4.0
2/19/2014 22:16	3.322	1.993	1.993	1384	0.363	19.0	152.2	53.4	4.0
2/19/2014 22:17	3.275	1.965	1.965	1365	0.803	18.9	149.2	53.3	4.0
2/19/2014 22:18	3.384	2.031	2.031	1410	0.194	19.1	146.8	53.3	4.0
2/19/2014 22:19	3.672	2.203	2.203	1530	0.138	19.1	141.6	53.2	4.0
2/19/2014 22:20	3.600	2.160	2.160	1500	0.603	19.2	141.1	53.1	4.0
2/19/2014 22:21	3.531	2.119	2.119	1471	0.678	19.2	140.3	53.1	4.0
2/19/2014 22:22	3.463	2.078	2.078	1443	0.581	19.1	145.4	53.1	4.0
2/19/2014 22:23	3.400	2.040	2.040	1417	0.831	19.0	143.7	53.1	4.0
2/19/2014 22:24	3.338	2.003	2.003	1391	0.850	19.0	145.7	53.1	4.0
2/19/2014 22:25	3.403	2.042	2.042	1418	0.159	19.3	149.2	53.0	4.0
2/19/2014 22:26	3.238	1.943	1.943	1349	0.656	19.3	149.5	53.0	4.0
2/19/2014 22:27	3.400	2.040	2.040	1417	0.828	19.3	148.6	52.8	4.0
2/19/2014 22:28	3.313	1.988	1.988	1380	0.250	19.3	152.5	52.9	4.0
2/19/2014 22:29	3.366	2.019	2.019	1402	0.234	19.2	149.8	52.8	4.0
2/19/2014 22:30	3.369	2.021	2.021	1404	0.684	19.3	147.1	52.8	4.0
2/19/2014 22:31	3.238	1.943	1.943	1349	0.166	19.3	148.6	52.8	4.0
2/19/2014 22:32	3.369	2.021	2.021	1404	0.119	19.3	149.2	52.7	4.0
2/19/2014 22:33	3.497	2.098	2.098	1457	0.103	19.4	147.4	52.7	4.0
2/19/2014 22:34	3.397	2.038	2.038	1415	0.616	19.2	152.9	52.7	4.0
2/19/2014 22:35	3.403	2.042	2.042	1418	0.159	19.4	151.9	52.6	4.0

2/19/2014 22:36	3.131	1.879	1.879	1305	0.125	19.1	152.5	52.7	4.0
2/19/2014 22:37	3.306	1.984	1.984	1378	0.522	19.1	155.1	52.8	4.0
2/19/2014 22:38	3.166	1.899	1.899	1319	0.800	18.9	153.8	52.8	4.0
2/19/2014 22:39	3.138	1.883	1.883	1307	0.300	19.0	160.3	52.7	4.0
2/19/2014 22:40	2.972	1.783	1.783	1238	0.806	18.9	161.0	52.8	4.0
2/19/2014 22:41	2.941	1.764	1.764	1225	0.606	19.2	162.5	52.7	4.0
2/19/2014 22:42	2.878	1.727	1.727	1199	0.119	19.6	164.0	52.7	4.0
2/19/2014 22:43	2.891	1.734	1.734	1204	0.625	19.3	162.1	52.7	4.0
2/19/2014 22:44	2.894	1.736	1.736	1206	0.606	19.5	158.2	52.6	4.0
2/19/2014 22:45	3.013	1.808	1.808	1255	0.122	19.4	152.5	52.5	4.0
2/19/2014 22:46	3.013	1.808	1.808	1255	0.119	19.7	154.2	52.5	4.0
2/19/2014 22:47	2.878	1.727	1.727	1199	0.394	19.6	165.1	52.5	4.0
2/19/2014 22:48	2.944	1.766	1.766	1227	0.706	20.0	153.9	52.5	4.0
2/19/2014 22:49	2.813	1.688	1.688	1172	0.131	20.0	163.6	52.5	4.0
2/19/2014 22:50	2.791	1.674	1.674	1163	0.447	20.0	169.9	52.5	4.0
2/19/2014 22:51	2.744	1.646	1.646	1143	0.784	19.8	162.3	52.5	4.0
2/19/2014 22:52	2.688	1.613	1.613	1120	0.844	19.8	173.7	52.6	4.0
2/19/2014 22:53	2.575	1.545	1.545	1073	0.231	20.0	180.6	52.6	4.0
2/19/2014 22:54	2.628	1.577	1.577	1095	0.744	19.9	175.0	52.6	4.0
2/19/2014 22:55	2.659	1.596	1.596	1108	0.847	19.7	173.3	52.5	4.0
2/19/2014 22:56	2.544	1.526	1.526	1060	0.853	19.8	168.9	52.4	4.0
2/19/2014 22:57	2.538	1.523	1.523	1057	0.403	19.6	175.0	52.6	4.0
2/19/2014 22:58	2.741	1.644	1.644	1142	0.138	19.6	168.7	52.5	4.0
2/19/2014 22:59	2.772	1.663	1.663	1155	0.747	19.9	166.7	52.6	4.0
2/19/2014 23:00	2.866	1.719	1.719	1194	0.800	19.6	166.3	52.6	4.0
2/19/2014 23:01	2.788	1.673	1.673	1161	0.116	19.3	164.7	52.7	4.0
2/19/2014 23:02	3.056	1.834	1.834	1273	0.844	19.3	158.9	52.7	4.0
2/19/2014 23:03	3.069	1.841	1.841	1279	0.319	19.2	157.8	52.8	4.0
2/19/2014 23:04	3.122	1.873	1.873	1301	0.075	19.0	157.5	52.8	4.0
2/19/2014 23:05	3.091	1.854	1.854	1288	0.716	19.2	155.5	52.8	4.0
2/19/2014 23:06	3.084	1.851	1.851	1285	0.888	19.2	156.5	52.8	4.0
2/19/2014 23:07	3.019	1.811	1.811	1258	0.888	19.2	158.5	52.8	4.0

After plant 1 weir gates raised

Date	wwtp2_LS_	MGD			wwtp2_	UV_I	UV Do	UVAS	UV Banks On
2/19/2014 23:08	3.041	1.824	1.824	1267	0.863	19.7	157.8	52.7	4.0
2/19/2014 23:09	2.959	1.776	1.776	1233	0.116	19.7	163.6	52.6	4.0
2/19/2014 23:10	2.938	1.763	1.763	1224	0.625	19.8	162.8	52.5	4.0
2/19/2014 23:11	3.156	1.894	1.894	1315	0.903	19.7	150.2	52.4	4.0
2/19/2014 23:12	3.088	1.853	1.853	1286	0.241	19.8	149.2	52.5	4.0
2/19/2014 23:13	3.091	1.854	1.854	1288	0.059	19.8	149.6	52.4	4.0
2/19/2014 23:14	3.259	1.956	1.956	1358	0.675	19.9	146.1	52.3	4.0
2/19/2014 23:15	3.191	1.914	1.914	1329	0.828	19.9	147.7	52.2	4.0
2/19/2014 23:16	3.253	1.952	1.952	1355	0.078	19.9	144.9	52.2	4.0
2/19/2014 23:17	3.119	1.871	1.871	1299	0.294	20.0	144.1	52.0	4.0
2/19/2014 23:18	3.334	2.001	2.001	1389	0.738	20.2	141.8	51.9	4.0
2/19/2014 23:19	3.300	1.980	1.980	1375	0.069	20.2	144.7	51.8	4.0
2/19/2014 23:20	3.253	1.952	1.952	1355	0.116	20.4	143.8	51.6	4.0
2/19/2014 23:21	3.331	1.999	1.999	1388	0.706	20.4	145.8	51.6	4.0
2/19/2014 23:22	3.241	1.944	1.944	1350	0.853	20.6	145.5	51.5	4.0
2/19/2014 23:23	3.147	1.888	1.888	1311	0.084	20.5	145.0	51.4	4.0
2/19/2014 23:24	3.334	2.001	2.001	1389	0.578	20.6	138.8	51.3	4.0
2/19/2014 23:25	3.213	1.928	1.928	1339	0.850	20.7	140.8	51.3	4.0
2/19/2014 23:26	3.122	1.873	1.873	1301	0.506	20.9	142.3	51.2	4.0
2/19/2014 23:27	3.247	1.948	1.948	1353	0.047	20.8	140.2	51.1	4.0
2/19/2014 23:28	3.313	1.988	1.988	1380	0.119	20.8	140.8	51.1	4.0
2/19/2014 23:29	3.203	1.922	1.922	1335	0.125	21.0	140.5	51.1	4.0
2/19/2014 23:30	3.022	1.813	1.813	1259	0.600	21.2	146.6	51.1	4.0
2/19/2014 23:31	3.000	1.800	1.800	1250	0.063	21.0	151.4	51.1	4.0
2/19/2014 23:32	2.834	1.701	1.701	1181	0.088	21.0	154.2	51.1	4.0
2/19/2014 23:33	2.644	1.586	1.586	1102	0.128	21.0	163.3	51.2	4.0
2/19/2014 23:34	2.516	1.509	1.509	1048	0.069	21.1	173.3	51.2	4.0
2/19/2014 23:35	2.256	1.354	1.354	940	0.756	21.1	179.0	51.2	4.0
2/19/2014 23:36	1.994	1.196	1.196	831	0.063	21.4	193.6	51.2	4.0
2/19/2014 23:37	1.959	1.176	1.176	816	0.391	21.3	205.5	51.2	4.0
2/19/2014 23:38	1.728	1.037	1.037	720	0.809	21.4	222.0	51.2	4.0
2/19/2014 23:39	1.566	0.939	0.939	652	0.481	21.4	222.0	51.2	4.0
2/19/2014 23:40	1.463	0.878	0.878	609	0.047	21.5	237.9	51.2	4.0

2/19/2014 23:41	1.434	0.861	0.861	598	0.628	21.6	234.7	51.2	4.0
2/19/2014 23:42	1.353	0.812	0.812	564	0.703	21.4	240.0	51.1	4.0
2/19/2014 23:43	1.391	0.834	0.834	579	0.047	21.3	266.4	51.2	4.0
2/19/2014 23:44	1.328	0.797	0.797	553	0.131	21.5	255.6	51.2	4.0
2/19/2014 23:45	1.138	0.683	0.683	474	0.078	21.5	283.5	51.2	4.0
2/19/2014 23:46	1.138	0.683	0.683	474	0.081	21.6	272.3	51.1	4.0
2/19/2014 23:47	1.141	0.684	0.684	475	0.684	21.3	273.9	51.1	4.0
2/19/2014 23:48	1.278	0.767	0.767	533	0.069	21.6	277.0	51.2	4.0
2/19/2014 23:49	1.238	0.743	0.743	516	0.084	21.7	266.4	51.2	4.0
2/19/2014 23:50	1.284	0.771	0.771	535	0.078	21.6	262.2	51.2	4.0
2/19/2014 23:51	1.281	0.769	0.769	534	0.063	21.6	267.9	51.3	4.0
2/19/2014 23:52	1.169	0.701	0.701	487	0.669	21.4	263.6	51.4	4.0
2/19/2014 23:53	1.334	0.801	0.801	556	0.834	21.5	280.2	51.4	4.0
2/19/2014 23:54	1.147	0.688	0.688	478	0.741	21.6	278.6	51.4	4.0
2/19/2014 23:55	1.122	0.673	0.673	467	0.059	21.3	307.5	51.5	4.0
2/19/2014 23:56	1.022	0.613	0.613	426	0.859	21.1	316.3	51.6	4.0
2/19/2014 23:57	0.997	0.598	0.598	415	0.806	21.1	314.3	51.6	4.0
2/19/2014 23:58	1.056	0.634	0.634	440	0.047	20.8	304.5	51.7	4.0
2/19/2014 23:59	1.069	0.641	0.641	445	0.172	20.7	299.0	51.9	4.0
2/20/2014 0:00	1.094	0.656	0.656	456	0.725	20.6	302.7	52.0	4.0
2/20/2014 0:01	1.109	0.666	0.666	462	0.047	20.3	302.7	52.0	4.0
2/20/2014 0:02	1.216	0.729	0.729	507	0.072	20.3	306.4	52.0	4.0
2/20/2014 0:03	1.278	0.767	0.767	533	0.684	19.9	295.5	52.1	4.0
2/20/2014 0:04	1.338	0.803	0.803	557	0.578	19.7	283.9	52.1	4.0
2/20/2014 0:05	1.466	0.879	0.879	611	0.044	19.2	269.1	52.3	4.0
2/20/2014 0:06	1.734	1.041	1.041	723	0.788	18.7	254.9	52.4	4.0
2/20/2014 0:07	1.781	1.069	1.069	742	0.859	18.0	251.5	52.6	4.0
2/20/2014 0:08	1.931	1.159	1.159	805	0.847	17.6	230.8	52.8	4.0
2/20/2014 0:09	1.925	1.155	1.155	802	0.225	16.7	231.4	53.7	4.0
2/20/2014 0:10	2.069	1.241	1.241	862	0.469	16.0	224.1	54.1	4.0
2/20/2014 0:11	2.169	1.301	1.301	904	0.781	15.3	236.3	54.9	4.0
2/20/2014 0:12	2.331	1.399	1.399	971	0.834	14.9	219.6	55.3	4.0
2/20/2014 0:13	2.403	1.442	1.442	1001	0.041	14.5	212.3	55.8	4.0
2/20/2014 0:14	2.403	1.442	1.442	1001	0.084	13.8	221.8	56.6	4.0

2/20/2014 0:15	2.525	1.515	1.515	1052	0.656	13.6	218.0	57.2	4.0
2/20/2014 0:16	2.575	1.545	1.545	1073	0.625	12.8	222.0	57.9	4.0
2/20/2014 0:17	2.631	1.579	1.579	1096	0.044	12.3	222.0	57.9	4.0
2/20/2014 0:18	2.584	1.551	1.551	1077	0.097	12.1	218.5	58.7	4.0
2/20/2014 0:19	2.613	1.568	1.568	1089	0.284	12.1	219.6	59.3	4.0
2/20/2014 0:20	2.419	1.451	1.451	1008	0.709	12.6	232.4	59.7	4.0
2/20/2014 0:21	2.328	1.397	1.397	970	0.059	13.0	230.6	59.8	4.0
2/20/2014 0:22	2.050	1.230	1.230	854	0.038	13.4	248.2	59.6	4.0
2/20/2014 0:23	1.900	1.140	1.140	792	0.709	13.9	252.8	59.3	4.0
2/20/2014 0:24	1.778	1.067	1.067	741	0.806	14.4	265.3	58.6	4.0
2/20/2014 0:25	1.606	0.964	0.964	669	0.050	14.8	266.7	58.1	4.0
2/20/2014 0:26	1.591	0.954	0.954	663	0.194	15.3	283.1	57.8	4.0
2/20/2014 0:27	1.428	0.857	0.857	595	0.697	16.2	281.6	57.0	4.0
2/20/2014 0:28	1.459	0.876	0.876	608	0.038	16.7	301.7	56.6	4.0
2/20/2014 0:29	1.478	0.887	0.887	616	0.072	17.4	291.9	56.2	4.0
2/20/2014 0:30	1.728	1.037	1.037	720	0.084	17.7	294.6	55.7	4.0
2/20/2014 0:31	1.722	1.033	1.033	717	0.075	18.1	278.3	55.4	4.0
2/20/2014 0:32	1.891	1.134	1.134	788	0.225	18.3	249.8	55.1	4.0
2/20/2014 0:33	2.038	1.223	1.223	849	0.063	18.8	239.8	54.5	4.0
2/20/2014 0:34	2.028	1.217	1.217	845	0.047	19.2	215.2	54.0	4.0
2/20/2014 0:35	1.919	1.151	1.151	799	0.059	19.3	216.6	53.5	4.0
2/20/2014 0:36	1.750	1.050	1.050	729	0.059	19.5	210.9	53.2	4.0
2/20/2014 0:37	1.678	1.007	1.007	699	0.047	20.0	217.6	52.8	4.0
2/20/2014 0:38	1.509	0.906	0.906	629	0.506	20.4	227.3	52.5	4.0
2/20/2014 0:39	1.303	0.782	0.782	543	0.131	20.2	243.5	52.3	4.0
2/20/2014 0:40	1.281	0.769	0.769	534	0.038	20.4	247.9	52.1	4.0
2/20/2014 0:41	1.219	0.731	0.731	508	0.544	20.2	269.1	52.1	4.0
2/20/2014 0:42	1.194	0.716	0.716	497	0.781	20.4	273.4	52.0	4.0
2/20/2014 0:43	1.147	0.688	0.688	478	0.056	20.4	274.8	52.0	4.0
2/20/2014 0:44	1.206	0.724	0.724	503	0.081	20.3	285.5	52.1	4.0
2/20/2014 0:45	1.234	0.741	0.741	514	0.081	20.3	287.1	52.0	4.0
2/20/2014 0:46	1.288	0.773	0.773	536	0.650	20.2	282.3	52.1	4.0
2/20/2014 0:47	1.613	0.968	0.968	672	0.250	20.0	253.7	52.1	4.0
2/20/2014 0:48	1.628	0.977	0.977	678	0.038	19.7	263.7	52.1	4.0

2/20/2014 0:49	1.678	1.007	1.007	699	0.081	20.0	235.3	52.1	4.0
2/20/2014 0:50	1.794	1.076	1.076	747	0.059	19.9	219.9	52.1	4.0
2/20/2014 0:51	1.731	1.039	1.039	721	0.056	19.8	225.9	52.1	4.0
2/20/2014 0:52	1.663	0.998	0.998	693	0.056	19.9	217.4	52.1	4.0
2/20/2014 0:53	1.431	0.859	0.859	596	0.509	20.2	225.0	52.1	4.0
2/20/2014 0:54	1.341	0.804	0.804	559	0.041	20.4	236.3	52.0	4.0
2/20/2014 0:55	1.219	0.731	0.731	508	0.047	20.4	252.6	51.9	4.0
2/20/2014 0:56	1.181	0.709	0.709	492	0.609	20.4	265.1	51.8	4.0
2/20/2014 0:57	1.091	0.654	0.654	454	0.828	20.6	279.2	51.8	4.0
2/20/2014 0:58	1.081	0.649	0.649	451	0.072	20.6	295.5	51.7	4.0
2/20/2014 0:59	1.003	0.602	0.602	418	0.044	20.7	300.8	51.7	4.0
2/20/2014 1:00	1.016	0.609	0.609	423	0.647	20.5	316.3	51.7	4.0
2/20/2014 1:01	1.075	0.645	0.645	448	0.063	20.6	316.3	51.7	4.0
2/20/2014 1:02	1.178	0.707	0.707	491	0.075	20.4	304.5	51.8	4.0
2/20/2014 1:03	1.319	0.791	0.791	549	0.694	20.3	297.2	51.7	4.0
2/20/2014 1:04	1.566	0.939	0.939	652	0.481	20.1	288.7	51.7	4.0
2/20/2014 1:05	1.813	1.088	1.088	755	0.038	20.3	263.7	51.7	4.0
2/20/2014 1:06	1.834	1.101	1.101	764	0.447	20.2	233.3	51.8	4.0
2/20/2014 1:07	1.872	1.123	1.123	780	0.794	20.2	218.2	51.9	4.0
2/20/2014 1:08	1.838	1.103	1.103	766	0.131	20.4	219.0	51.8	4.0
2/20/2014 1:09	1.738	1.043	1.043	724	0.044	20.6	214.2	51.7	4.0
2/20/2014 1:10	1.600	0.960	0.960	667	0.819	20.8	220.7	51.6	4.0
2/20/2014 1:11	1.628	0.977	0.977	678	0.631	21.1	216.7	51.4	4.0
2/20/2014 1:12	1.750	1.050	1.050	729	0.119	21.0	221.1	51.3	4.0
2/20/2014 1:13	1.744	1.046	1.046	727	0.784	20.9	222.9	51.1	4.0
2/20/2014 1:14	1.863	1.118	1.118	776	0.850	21.3	212.5	51.0	4.0
2/20/2014 1:15	1.950	1.170	1.170	813	0.859	21.3	213.3	51.0	4.0
2/20/2014 1:16	2.075	1.245	1.245	865	0.053	21.3	204.0	50.9	4.0
2/20/2014 1:17	2.144	1.286	1.286	893	0.419	21.4	194.3	50.8	4.0
2/20/2014 1:18	2.175	1.305	1.305	906	0.775	21.5	187.4	50.8	4.0
2/20/2014 1:19	2.344	1.406	1.406	977	0.059	21.7	184.5	50.7	4.0
2/20/2014 1:20	2.409	1.446	1.446	1004	0.038	21.7	181.1	50.6	4.0
2/20/2014 1:21	2.525	1.515	1.515	1052	0.378	22.2	167.6	50.5	4.0
2/20/2014 1:22	2.588	1.553	1.553	1078	0.044	22.6	162.0	50.3	4.0

2/20/2014 1:23	2.559	1.536	1.536	1066	0.031	23.0	160.7	50.1	4.0
2/20/2014 1:24	2.588	1.553	1.553	1078	0.069	23.2	156.5	49.9	4.0
2/20/2014 1:25	2.519	1.511	1.511	1049	0.106	23.1	156.5	49.6	4.0
2/20/2014 1:26	2.534	1.521	1.521	1056	0.691	23.3	156.1	49.6	4.0
2/20/2014 1:27	2.466	1.479	1.479	1027	0.047	23.7	149.5	49.3	4.0
2/20/2014 1:28	2.381	1.429	1.429	992	0.034	24.0	157.3	49.1	4.0
2/20/2014 1:29	1.975	1.185	1.185	823	0.794	24.3	160.5	48.8	4.0
2/20/2014 1:30	1.753	1.052	1.052	730	0.681	24.7	167.3	48.6	4.0
2/20/2014 1:31	1.669	1.001	1.001	695	0.044	24.8	171.2	48.3	4.0
2/20/2014 1:32	1.594	0.956	0.956	664	0.528	24.9	186.7	48.2	4.0
2/20/2014 1:33	1.497	0.898	0.898	624	0.622	25.1	189.6	48.1	4.0
2/20/2014 1:34	1.394	0.836	0.836	581	0.034	25.2	201.7	48.0	4.0
2/20/2014 1:35	1.447	0.868	0.868	603	0.078	25.3	207.1	47.9	4.0
2/20/2014 1:36	1.597	0.958	0.958	665	0.088	25.4	210.8	47.7	4.0
2/20/2014 1:37	1.872	1.123	1.123	780	0.069	25.5	202.5	47.6	4.0
2/20/2014 1:38	1.931	1.159	1.159	805	0.075	25.3	190.4	47.6	4.0
2/20/2014 1:39	1.959	1.176	1.176	816	0.063	25.4	169.5	47.5	4.0
2/20/2014 1:40	1.916	1.149	1.149	798	0.656	25.4	167.7	47.4	4.0
2/20/2014 1:41	1.944	1.166	1.166	810	0.066	25.5	165.4	47.3	4.0
2/20/2014 1:42	1.628	0.977	0.977	678	0.038	25.5	167.1	47.3	4.0
2/20/2014 1:43	1.522	0.913	0.913	634	0.063	25.9	168.3	47.3	4.0
2/20/2014 1:44	1.463	0.878	0.878	609	0.066	25.8	185.7	47.2	4.0
2/20/2014 1:45	1.263	0.758	0.758	526	0.709	25.7	202.5	47.2	4.0
2/20/2014 1:46	1.128	0.677	0.677	470	0.678	25.6	216.8	47.3	4.0
2/20/2014 1:47	1.078	0.647	0.647	449	0.038	25.5	237.9	47.5	4.0
2/20/2014 1:48	1.128	0.677	0.677	470	0.431	25.5	245.3	47.5	4.0
2/20/2014 1:49	1.091	0.654	0.654	454	0.747	25.6	243.8	47.4	4.0
2/20/2014 1:50	1.125	0.675	0.675	469	0.047	25.4	255.0	47.6	4.0
2/20/2014 1:51	1.069	0.641	0.641	445	0.034	25.3	250.5	47.6	4.0
2/20/2014 1:52	1.306	0.784	0.784	544	0.078	25.4	259.8	47.6	4.0
2/20/2014 1:53	1.547	0.928	0.928	645	0.056	25.2	239.2	47.7	4.0
2/20/2014 1:54	1.697	1.018	1.018	707	0.059	25.2	220.1	47.8	4.0
2/20/2014 1:55	1.669	1.001	1.001	695	0.375	24.8	206.1	47.8	4.0
2/20/2014 1:56	1.703	1.022	1.022	710	0.628	24.9	186.7	47.8	4.0

2/20/2014 1:57	1.688	1.013	1.013	703	0.044	24.7	183.9	47.8	4.0
2/20/2014 1:58	1.509	0.906	0.906	629	0.069	24.5	188.1	47.9	4.0
2/20/2014 1:59	1.338	0.803	0.803	557	0.059	24.7	196.6	47.9	4.0
2/20/2014 2:00	1.269	0.761	0.761	529	0.047	24.8	204.3	47.9	4.0
2/20/2014 2:01	1.156	0.694	0.694	482	0.053	24.9	228.0	48.0	4.0
2/20/2014 2:02	1.084	0.651	0.651	452	0.541	24.6	231.6	48.0	4.0
2/20/2014 2:03	0.981	0.589	0.589	409	0.803	24.4	252.0	48.0	4.0
2/20/2014 2:04	0.931	0.559	0.559	388	0.097	24.4	263.1	48.1	4.0
2/20/2014 2:05	1.000	0.600	0.600	417	0.038	24.7	270.1	48.1	4.0
2/20/2014 2:06	1.131	0.679	0.679	471	0.634	24.8	277.5	48.1	4.0
2/20/2014 2:07	1.125	0.675	0.675	469	0.041	24.8	264.8	48.2	4.0
2/20/2014 2:08	1.178	0.707	0.707	491	0.059	24.4	250.5	48.2	4.0
2/20/2014 2:09	1.103	0.662	0.662	460	0.091	24.3	252.0	48.1	4.0
2/20/2014 2:10	1.238	0.743	0.743	516	0.072	24.4	244.7	48.2	4.0
2/20/2014 2:11	1.481	0.889	0.889	617	0.059	24.0	236.6	48.3	4.0
2/20/2014 2:12	1.594	0.956	0.956	664	0.072	24.1	230.3	48.4	4.0
2/20/2014 2:13	1.631	0.979	0.979	680	0.306	23.8	208.9	48.4	4.0
2/20/2014 2:14	1.619	0.971	0.971	674	0.591	23.7	208.1	48.5	4.0
2/20/2014 2:15	1.603	0.962	0.962	668	0.059	24.1	200.5	48.6	4.0
2/20/2014 2:16	1.281	0.769	0.769	534	0.081	23.8	210.8	48.6	4.0
2/20/2014 2:17	1.263	0.758	0.758	526	0.072	23.9	216.4	48.7	4.0
2/20/2014 2:18	1.150	0.690	0.690	479	0.053	24.0	239.5	48.6	4.0
2/20/2014 2:19	1.081	0.649	0.649	451	0.653	24.1	247.3	48.6	4.0
2/20/2014 2:20	1.031	0.619	0.619	430	0.803	23.9	266.5	48.6	4.0
2/20/2014 2:21	0.988	0.593	0.593	411	0.044	24.0	276.8	48.6	4.0
2/20/2014 2:22	0.978	0.587	0.587	408	0.613	24.0	276.8	48.6	4.0
2/20/2014 2:23	0.928	0.557	0.557	387	0.725	23.9	286.1	48.6	4.0
2/20/2014 2:24	1.053	0.632	0.632	439	0.041	24.0	286.1	48.5	4.0
2/20/2014 2:25	1.141	0.684	0.684	475	0.081	24.0	278.6	48.6	4.0
2/20/2014 2:26	1.188	0.713	0.713	495	0.084	23.8	271.5	48.6	4.0
2/20/2014 2:27	1.394	0.836	0.836	581	0.059	23.8	260.2	48.7	4.0
2/20/2014 2:28	1.666	0.999	0.999	694	0.063	23.3	235.8	48.7	4.0
2/20/2014 2:29	1.716	1.029	1.029	715	0.059	23.2	210.8	48.7	4.0
2/20/2014 2:30	1.609	0.966	0.966	671	0.263	23.5	197.4	48.8	4.0

2/20/2014 2:31	1.466	0.879	0.879	611	0.613	23.5	199.7	48.8	4.0
2/20/2014 2:32	1.388	0.833	0.833	578	0.047	23.7	197.4	48.7	4.0
2/20/2014 2:33	1.200	0.720	0.720	500	0.038	23.7	220.4	48.8	4.0
2/20/2014 2:34	1.156	0.694	0.694	482	0.081	24.1	239.5	48.8	4.0
2/20/2014 2:35	1.025	0.615	0.615	427	0.047	24.2	250.0	48.7	4.0
2/20/2014 2:36	0.991	0.594	0.594	413	0.053	24.5	269.8	48.6	4.0
2/20/2014 2:37	0.988	0.593	0.593	411	0.550	24.3	275.0	48.6	4.0
2/20/2014 2:38	0.897	0.538	0.538	374	0.353	24.4	270.1	48.4	4.0
2/20/2014 2:39	0.863	0.518	0.518	359	0.047	24.6	285.5	48.4	4.0
2/20/2014 2:40	0.869	0.521	0.521	362	0.413	24.6	291.9	48.4	4.0
2/20/2014 2:41	0.894	0.536	0.536	372	0.069	24.7	300.9	48.4	4.0
2/20/2014 2:42	0.941	0.564	0.564	392	0.031	24.8	281.4	48.4	4.0
2/20/2014 2:43	0.944	0.566	0.566	393	0.072	24.9	294.1	48.4	4.0
2/20/2014 2:44	1.019	0.611	0.611	424	0.091	24.9	281.4	48.3	4.0
2/20/2014 2:45	1.166	0.699	0.699	486	0.066	24.8	275.6	48.3	4.0
2/20/2014 2:46	1.291	0.774	0.774	538	0.056	25.0	259.8	48.3	4.0
2/20/2014 2:47	1.353	0.812	0.812	564	0.059	25.2	239.2	48.3	4.0
2/20/2014 2:48	1.444	0.866	0.866	602	0.063	25.3	226.8	48.2	4.0
2/20/2014 2:49	1.428	0.857	0.857	595	0.631	25.5	222.2	48.2	4.0
2/20/2014 2:50	1.331	0.799	0.799	555	0.041	26.3	216.9	48.2	4.0
2/20/2014 2:51	1.238	0.743	0.743	516	0.034	26.2	211.8	48.1	4.0
2/20/2014 2:52	1.100	0.660	0.660	458	0.081	26.9	222.2	47.9	4.0
2/20/2014 2:53	1.025	0.615	0.615	427	0.059	26.9	230.3	47.7	4.0
2/20/2014 2:54	0.984	0.591	0.591	410	0.425	27.1	249.9	47.4	4.0
2/20/2014 2:55	0.881	0.529	0.529	367	0.375	27.9	258.2	47.3	4.0
2/20/2014 2:56	0.816	0.489	0.489	340	0.041	28.2	283.2	47.3	4.0
2/20/2014 2:57	0.866	0.519	0.519	361	0.550	28.0	281.1	47.2	4.0
2/20/2014 2:58	0.863	0.518	0.518	359	0.728	28.2	294.6	47.1	4.0
2/20/2014 2:59	0.869	0.521	0.521	362	0.044	28.1	287.7	47.0	4.0
2/20/2014 3:00	0.934	0.561	0.561	389	0.038	28.2	281.1	47.0	4.0
2/20/2014 3:01	1.166	0.699	0.699	486	0.081	28.7	272.9	46.9	4.0
2/20/2014 3:02	1.300	0.780	0.780	542	0.059	28.4	263.5	46.9	4.0
2/20/2014 3:03	1.388	0.833	0.833	578	0.063	28.3	233.9	46.7	4.0
2/20/2014 3:04	1.534	0.921	0.921	639	0.063	28.4	209.3	46.8	4.0

2/20/2014 3:05	1.516	0.909	0.909	632	0.659	29.2	193.6	46.9	4.0	
2/20/2014 3:06	1.434	0.861	0.861	598	0.066	29.3	193.6	46.8	4.0	
2/20/2014 3:07	1.363	0.818	0.818	568	0.038	29.3	193.6	46.6	4.0	
2/20/2014 3:08	1.222	0.733	0.733	509	0.053	30.0	195.2	46.5	4.0	
2/20/2014 3:09	1.081	0.649	0.649	451	0.084	30.1	210.3	46.3	4.0	
2/20/2014 3:10	0.981	0.589	0.589	409	0.059	31.1	231.4	46.1	4.0	
2/20/2014 3:11	0.956	0.574	0.574	398	0.659	31.1	248.2	46.1	4.0	
2/20/2014 3:12	0.897	0.538	0.538	374	0.803	31.2	253.4	46.0	4.0	
2/20/2014 3:13	0.869	0.521	0.521	362	0.047	31.3	264.5	45.8	4.0	
2/20/2014 3:14	0.859	0.516			0.678	32.1	270.5	45.7	4.0	NO DISCHARGE, Bypass Activated
2/20/2014 3:15	0.869	0.521			0.522	32.2	264.5	45.7	4.0	by SCADA
2/20/2014 3:16	0.919	0.551			0.041	32.3	272.6	45.6	4.0	
2/20/2014 3:17	0.978	0.587			0.041	32.2	264.2	45.4	4.0	
2/20/2014 3:18	1.216	0.729			0.088	32.0	240.1	45.2	4.0	
2/20/2014 3:19	1.438	0.863			0.066	32.2	227.7	45.2	4.0	
2/20/2014 3:20	1.541	0.924			0.641	32.2	202.8	45.2	4.0	
2/20/2014 3:21	1.631	0.979			0.088	32.0	184.5	45.3	4.0	
2/20/2014 3:22	1.644	0.986			0.038	32.3	171.3	45.2	4.0	
2/20/2014 3:23	1.409	0.846			0.078	33.0	168.5	45.0	4.0	
2/20/2014 3:24	1.375	0.825			0.063	33.1	172.7	44.9	4.0	
2/20/2014 3:25	1.294	0.776			0.075	33.5	184.5	44.8	4.0	
2/20/2014 3:26	1.247	0.748			0.641	33.8	192.6	44.6	4.0	
2/20/2014 3:27	1.066	0.639			0.041	34.0	189.2	44.4	4.0	
2/20/2014 3:28	1.125	0.675			0.456	34.0	190.2	44.3	4.0	
2/20/2014 3:29	1.038	0.623			0.822	34.3	214.4	44.2	4.0	
2/20/2014 3:30	1.044	0.626			0.297	34.5	214.4	44.0	4.0	
2/20/2014 3:31	1.053	0.632			0.053	35.2	217.1	43.9	4.0	
2/20/2014 3:32	1.106	0.664			0.644	34.8	215.7	43.9	4.0	
2/20/2014 3:33	1.184	0.711			0.047	35.1	217.1	43.8	4.0	
2/20/2014 3:34	1.447	0.868			0.047	35.1	210.4	43.7	4.0	
2/20/2014 3:35	1.650	0.990			0.069	35.2	180.0	43.7	4.0	
2/20/2014 3:36	1.841	1.104			0.047	35.1	170.4	43.8	4.0	
2/20/2014 3:37	1.975	1.185			0.063	35.1	152.6	43.8	4.0	
2/20/2014 3:38	1.938	1.163			0.631	35.4	149.3	43.6	4.0	

2/20/2014 3:39	1.925	1.155	0.297	35.5	144.1	43.5	4.0
2/20/2014 3:40	1.744	1.046	0.047	35.8	138.1	43.5	4.0
2/20/2014 3:41	1.438	0.863	0.075	35.8	140.1	43.4	4.0
2/20/2014 3:42	1.353	0.812	0.063	35.7	148.7	43.2	4.0
2/20/2014 3:43	1.325	0.795	0.303	36.0	166.6	43.1	4.0
2/20/2014 3:44	1.197	0.718	0.809	36.1	171.4	43.1	4.0
2/20/2014 3:45	1.147	0.688	0.056	36.6	186.0	43.1	4.0
2/20/2014 3:46	1.103	0.662	0.056	36.5	190.1	43.1	4.0
2/20/2014 3:47	0.934	0.561	0.694	35.9	202.8	43.1	4.0
2/20/2014 3:48	1.041	0.624	0.066	35.5	208.0	43.1	4.0
2/20/2014 3:49	1.006	0.604	0.038	35.7	213.5	43.1	4.0
2/20/2014 3:50	1.066	0.639	0.088	35.7	212.1	43.1	4.0
2/20/2014 3:51	1.109	0.666	0.094	35.5	210.7	43.1	4.0
2/20/2014 3:52	1.466	0.879	0.659	35.3	200.3	43.2	4.0
2/20/2014 3:53	1.647	0.988	0.150	35.2	182.0	43.2	4.0
2/20/2014 3:54	1.716	1.029	0.044	34.9	162.9	43.2	4.0
2/20/2014 3:55	1.653	0.992	0.069	34.9	151.0	43.3	4.0
2/20/2014 3:56	1.803	1.082	0.072	34.6	151.0	43.4	4.0
2/20/2014 3:57	1.584	0.951	0.063	34.6	146.4	43.3	4.0
2/20/2014 3:58	1.403	0.842	0.500	34.5	151.6	43.4	4.0
2/20/2014 3:59	1.300	0.780	0.047	34.7	153.5	43.4	4.0
2/20/2014 4:00	1.228	0.737	0.031	34.6	170.6	43.4	4.0
2/20/2014 4:01	1.156	0.694	0.619	34.2	174.8	43.4	4.0
2/20/2014 4:02	1.091	0.654	0.684	34.4	185.0	43.4	4.0
2/20/2014 4:03	1.066	0.639	0.047	34.7	199.1	43.4	4.0
2/20/2014 4:04	1.003	0.602	0.572	33.7	205.3	43.5	4.0
2/20/2014 4:05	1.044	0.626	0.803	33.1	209.3	43.5	4.0
2/20/2014 4:06	0.978	0.587	0.041	33.2	224.2	43.5	4.0
2/20/2014 4:07	1.038	0.623	0.063	33.3	227.3	43.6	4.0
2/20/2014 4:08	1.219	0.731	0.219	33.3	227.3	43.7	4.0
2/20/2014 4:09	1.403	0.842	0.713	33.1	218.4	43.8	4.0
2/20/2014 4:10	1.728	1.037	0.044	32.6	187.3	43.8	4.0
2/20/2014 4:11	1.909	1.146	0.072	32.7	166.7	43.8	4.0
2/20/2014 4:12	1.969	1.181	0.084	32.0	155.6	44.0	4.0

2/20/2014 4:13	1.997	1.198	0.644	32.1	145.1	44.1	4.0
2/20/2014 4:14	1.925	1.155	0.347	31.8	141.2	44.3	4.0
2/20/2014 4:15	1.847	1.108	0.031	31.6	147.7	44.4	4.0
2/20/2014 4:16	1.766	1.059	0.078	31.4	147.7	44.5	4.0
2/20/2014 4:17	1.563	0.938	0.556	31.5	149.8	44.5	4.0
2/20/2014 4:18	1.381	0.829	0.806	31.5	155.6	44.5	4.0
2/20/2014 4:19	1.272	0.763	0.647	31.3	177.2	44.6	4.0
2/20/2014 4:20	1.225	0.735	0.419	31.0	195.5	44.6	4.0
2/20/2014 4:21	1.184	0.711	0.750	30.9	211.9	44.7	4.0
2/20/2014 4:22	1.166	0.699	0.616	30.8	206.1	44.7	4.0
2/20/2014 4:23	1.200	0.720	0.050	31.0	209.5	44.7	4.0
2/20/2014 4:24	1.241	0.744	0.084	31.1	207.2	44.8	4.0
2/20/2014 4:25	1.347	0.808	0.078	31.1	208.4	44.8	4.0
2/20/2014 4:26	1.447	0.868	0.547	31.0	203.9	44.8	4.0
2/20/2014 4:27	1.894	1.136	0.038	30.8	192.6	44.9	4.0
2/20/2014 4:28	1.941	1.164	0.044	30.7	173.4	44.9	4.0
2/20/2014 4:29	1.828	1.097	0.091	30.8	154.4	44.9	4.0
2/20/2014 4:30	1.884	1.131	0.072	30.8	151.7	44.9	4.0
2/20/2014 4:31	1.772	1.063	0.609	31.0	152.3	44.9	4.0
2/20/2014 4:32	1.550	0.930	0.041	31.0	158.4	44.7	4.0
2/20/2014 4:33	1.478	0.887	0.038	31.5	167.1	44.6	4.0
2/20/2014 4:34	1.356	0.814	0.078	31.1	175.7	44.5	4.0
2/20/2014 4:35	1.213	0.728	0.831	31.5	182.8	44.5	4.0
2/20/2014 4:36	1.206	0.724	0.694	30.6	198.6	44.5	4.0
2/20/2014 4:37	1.238	0.743	0.056	30.5	207.2	44.6	4.0
2/20/2014 4:38	1.141	0.684	0.691	30.4	205.0	44.5	4.0
2/20/2014 4:39	1.206	0.724	0.809	30.3	220.8	44.5	4.0
2/20/2014 4:40	1.219	0.731	0.053	30.5	219.5	44.6	4.0
2/20/2014 4:41	1.406	0.844	0.081	30.2	211.9	44.7	4.0
2/20/2014 4:42	1.541	0.924	0.094	30.1	190.7	44.7	4.0
2/20/2014 4:43	1.816	1.089	0.691	30.0	184.5	44.6	4.0
2/20/2014 4:44	2.000	1.200	0.100	29.8	171.3	44.7	4.0
2/20/2014 4:45	2.144	1.286	0.053	29.6	159.0	44.7	4.0
2/20/2014 4:46	1.969	1.181	0.063	29.5	148.7	44.8	4.0

2/20/2014 4:47	1.925	1.155	0.266	29.4	149.7	44.8	4.0
2/20/2014 4:48	1.847	1.108	0.716	29.6	149.7	44.8	4.0
2/20/2014 4:49	1.719	1.031	0.047	29.3	152.8	44.8	4.0
2/20/2014 4:50	1.725	1.035	0.041	29.5	157.8	44.8	4.0
2/20/2014 4:51	1.544	0.926	0.097	29.8	164.5	44.9	4.0
2/20/2014 4:52	1.384	0.831	0.522	29.6	172.0	45.0	4.0
2/20/2014 4:53	1.256	0.754	0.816	29.4	179.6	45.0	4.0
2/20/2014 4:54	1.284	0.771	0.778	29.4	195.5	45.1	4.0
2/20/2014 4:55	1.234	0.741	0.363	29.3	199.6	45.1	4.0
2/20/2014 4:56	1.278	0.767	0.797	28.9	203.9	45.2	4.0
2/20/2014 4:57	1.294	0.776	0.644	28.7	205.0	45.3	4.0
2/20/2014 4:58	1.353	0.812	0.047	28.5	198.6	45.3	4.0
2/20/2014 4:59	1.463	0.878	0.097	28.8	193.6	45.3	4.0
2/20/2014 5:00	1.672	1.003	0.088	28.6	190.7	45.5	4.0
2/20/2014 5:01	1.919	1.151	0.613	28.8	179.6	45.5	4.0
2/20/2014 5:02	2.034	1.221	0.044	28.5	163.0	45.5	4.0
2/20/2014 5:03	1.972	1.183	0.047	28.3	153.3	45.5	4.0
2/20/2014 5:04	2.013	1.208	0.075	28.2	154.8	45.5	4.0
2/20/2014 5:05	1.997	1.198	0.225	28.3	146.2	45.5	4.0
2/20/2014 5:06	1.894	1.136	0.681	28.2	154.8	45.5	4.0
2/20/2014 5:07	1.709	1.026	0.197	28.1	156.9	45.5	4.0
2/20/2014 5:08	1.556	0.934	0.372	28.2	163.0	45.6	4.0
2/20/2014 5:09	1.344	0.806	0.803	28.3	173.1	45.6	4.0
2/20/2014 5:10	1.231	0.739	0.800	28.2	185.7	45.8	4.0
2/20/2014 5:11	1.169	0.701	0.053	28.1	202.9	45.9	4.0
2/20/2014 5:12	1.131	0.679	0.556	27.6	216.0	46.0	4.0
2/20/2014 5:13	1.263	0.758	0.822	27.8	220.9	46.0	4.0
2/20/2014 5:14	1.381	0.829	0.475	28.0	222.1	46.1	4.0
2/20/2014 5:15	1.541	0.924	0.069	27.5	203.9	46.2	4.0
2/20/2014 5:16	1.603	0.962	0.091	27.6	185.7	46.1	4.0
2/20/2014 5:17	1.772	1.063	0.613	27.2	185.7	46.2	4.0
2/20/2014 5:18	1.888	1.133	0.453	26.9	174.5	46.3	4.0
2/20/2014 5:19	2.075	1.245	0.047	26.9	162.4	46.3	4.0
2/20/2014 5:20	2.088	1.253	0.081	26.5	155.3	46.4	4.0

2/20/2014 5:21	2.016	1.209	0.528	26.9	148.9	46.4	4.0
2/20/2014 5:22	1.928	1.157	0.650	26.7	150.8	46.4	4.0
2/20/2014 5:23	1.859	1.116	0.056	26.6	154.3	46.4	4.0
2/20/2014 5:24	1.747	1.048	0.041	26.7	157.4	46.4	4.0
2/20/2014 5:25	1.591	0.954	0.569	27.1	160.7	46.4	4.0
2/20/2014 5:26	1.394	0.836	0.784	27.2	175.9	46.5	4.0
2/20/2014 5:27	1.372	0.823	0.069	26.8	204.4	46.6	4.0
2/20/2014 5:28	1.234	0.741	0.419	26.7	205.4	46.6	4.0
2/20/2014 5:29	1.269	0.761	0.797	26.8	208.3	46.7	4.0
2/20/2014 5:30	1.263	0.758	0.078	26.6	226.2	46.6	4.0
2/20/2014 5:31	1.384	0.831	0.038	26.7	220.2	46.7	4.0
2/20/2014 5:32	1.644	0.986	0.084	26.4	208.3	46.7	4.0
2/20/2014 5:33	1.753	1.052	0.650	26.6	198.8	46.7	4.0
2/20/2014 5:34	2.000	1.200	0.200	26.5	185.7	46.7	4.0
2/20/2014 5:35	2.116	1.269	0.038	26.5	175.8	46.7	4.0
2/20/2014 5:36	2.134	1.281	0.063	26.6	161.5	46.6	4.0
2/20/2014 5:37	1.966	1.179	0.553	26.9	158.9	46.5	4.0
2/20/2014 5:38	1.825	1.095	0.656	26.9	151.3	46.4	4.0
2/20/2014 5:39	1.772	1.063	0.047	26.5	158.5	46.4	4.0
2/20/2014 5:40	1.681	1.009	0.044	26.5	164.8	46.3	4.0
2/20/2014 5:41	1.703	1.022	0.609	26.5	170.4	46.3	4.0
2/20/2014 5:42	1.422	0.853	0.731	26.7	178.8	46.3	4.0
2/20/2014 5:43	1.153	0.692	0.044	27.4	189.0	46.2	4.0
2/20/2014 5:44	1.178	0.707	0.606	27.1	197.1	46.3	4.0
2/20/2014 5:45	1.222	0.733	0.841	26.8	224.7	46.3	4.0
2/20/2014 5:46	1.372	0.823	0.300	26.7	214.8	46.3	4.0
2/20/2014 5:47	1.581	0.949	0.078	26.4	205.0	46.4	4.0
2/20/2014 5:48	1.791	1.074	0.103	26.6	196.1	46.4	4.0
2/20/2014 5:49	1.869	1.121	0.659	26.6	183.3	46.3	4.0
2/20/2014 5:50	2.063	1.238	0.303	26.5	167.2	46.4	4.0
2/20/2014 5:51	2.116	1.269	0.041	26.6	160.7	46.4	4.0
2/20/2014 5:52	2.078	1.247	0.059	26.5	154.3	46.3	4.0
2/20/2014 5:53	1.994	1.196	0.619	26.7	152.2	46.3	4.0
2/20/2014 5:54	1.994	1.196	0.641	26.5	149.4	46.2	4.0

2/20/2014 5:55	2.038	1.223	0.047	26.4	155.3	46.2	4.0
2/20/2014 5:56	1.863	1.118	0.044	26.2	156.3	46.2	4.0
2/20/2014 5:57	1.641	0.984	0.803	26.1	160.7	46.3	4.0
2/20/2014 5:58	1.500	0.900	0.859	26.3	167.2	46.3	4.0
2/20/2014 5:59	1.363	0.818	0.206	26.2	176.6	46.4	4.0
2/20/2014 6:00	1.372	0.823	0.056	26.2	198.8	46.5	4.0
2/20/2014 6:01	1.428	0.857	0.784	26.0	207.3	46.6	4.0
2/20/2014 6:02	1.444	0.866	0.047	25.9	200.6	46.7	4.0
2/20/2014 6:03	1.406	0.844	0.075	26.1	204.4	46.6	4.0
2/20/2014 6:04	1.613	0.968	0.106	25.8	201.6	46.7	4.0
2/20/2014 6:05	1.844	1.106	0.453	25.5	200.6	46.7	4.0
2/20/2014 6:06	2.128	1.277	0.059	25.4	180.5	46.8	4.0
2/20/2014 6:07	2.206	1.324	0.038	25.6	168.3	46.8	4.0
2/20/2014 6:08	2.175	1.305	0.091	25.7	155.9	46.7	4.0
2/20/2014 6:09	2.056	1.234	0.338	25.7	153.0	46.8	4.0
2/20/2014 6:10	2.153	1.292	0.753	25.6	152.6	46.9	4.0
2/20/2014 6:11	1.891	1.134	0.197	25.6	158.4	46.8	4.0
2/20/2014 6:12	1.850	1.110	0.744	26.0	164.8	46.9	4.0
2/20/2014 6:13	1.688	1.013	0.859	25.5	168.9	46.9	4.0
2/20/2014 6:14	1.538	0.923	0.431	25.2	173.8	47.0	4.0
2/20/2014 6:15	1.453	0.872	0.044	24.8	186.4	47.1	4.0
2/20/2014 6:16	1.584	0.951	0.853	25.3	198.8	47.1	4.0
2/20/2014 6:17	1.453	0.872	0.244	24.9	214.6	47.2	4.0
2/20/2014 6:18	1.563	0.938	0.059	24.6	192.8	47.3	4.0
2/20/2014 6:19	1.669	1.001	0.069	24.5	192.0	47.4	4.0
2/20/2014 6:20	1.894	1.136	0.538	24.4	186.4	47.4	4.0
2/20/2014 6:21	2.038	1.223	0.044	24.6	175.1	47.5	4.0
2/20/2014 6:22	2.203	1.322	0.044	24.2	170.7	47.6	4.0
2/20/2014 6:23	2.256	1.354	0.100	24.3	165.7	47.6	4.0
2/20/2014 6:24	2.363	1.418	0.672	24.2	155.8	47.6	4.0
2/20/2014 6:25	2.266	1.359	0.500	24.5	159.1	47.6	4.0
2/20/2014 6:26	2.128	1.277	0.053	24.4	157.2	47.7	4.0
2/20/2014 6:27	2.094	1.256	0.831	24.6	158.1	47.7	4.0
2/20/2014 6:28	2.053	1.232	0.866	24.0	162.6	47.7	4.0

2/20/2014 6:29	1.975	1.185			0.553	24.1	165.2	47.9	4.0
2/20/2014 6:30	1.794	1.076			0.684	23.7	171.2	48.1	4.0
2/20/2014 6:31	1.734	1.041			0.825	23.5	173.0	48.1	4.0
2/20/2014 6:32	1.778	1.067	1.067	741	0.066	23.5	183.2	48.1	4.0
2/20/2014 6:33	1.853	1.112	1.112	772	0.034	23.6	187.4	48.1	4.0
2/20/2014 6:34	1.969	1.181	1.181	820	0.625	23.5	183.2	48.0	4.0
2/20/2014 6:35	2.006	1.204	1.204	836	0.575	23.6	173.6	48.2	4.0
2/20/2014 6:36	2.097	1.258	1.258	874	0.038	23.7	172.4	48.2	4.0
2/20/2014 6:37	2.159	1.296	1.296	900	0.047	23.5	170.7	48.2	4.0
2/20/2014 6:38	2.366	1.419	1.419	986	0.678	23.3	165.7	48.2	4.0
2/20/2014 6:39	2.294	1.376	1.376	956	0.650	23.8	158.6	48.2	4.0
2/20/2014 6:40	2.216	1.329	1.329	923	0.041	23.4	153.6	48.2	4.0
2/20/2014 6:41	2.100	1.260	1.260	875	0.606	23.2	155.4	48.2	4.0
2/20/2014 6:42	2.056	1.234	1.234	857	0.828	23.4	159.1	48.1	4.0
2/20/2014 6:43	1.975	1.185	1.185	823	0.078	23.4	165.2	48.1	4.0
2/20/2014 6:44	1.984	1.191	1.191	827	0.238	23.2	166.2	48.2	4.0
2/20/2014 6:45	1.853	1.112	1.112	772	0.703	23.3	171.2	48.2	4.0
2/20/2014 6:46	1.881	1.129	1.129	784	0.169	23.2	174.2	48.3	4.0
2/20/2014 6:47	1.894	1.136	1.136	789	0.041	23.3	176.6	48.2	4.0
2/20/2014 6:48	1.959	1.176	1.176	816	0.069	23.2	178.5	48.2	4.0
2/20/2014 6:49	2.097	1.258	1.258	874	0.588	23.2	174.2	48.3	4.0
2/20/2014 6:50	2.231	1.339	1.339	930	0.659	23.3	166.8	48.3	4.0
2/20/2014 6:51	2.341	1.404	1.404	975	0.053	23.6	158.6	48.2	4.0
2/20/2014 6:52	2.350	1.410	1.410	979	0.419	23.8	153.6	48.1	4.0
2/20/2014 6:53	2.247	1.348	1.348	936	0.753	24.2	153.1	48.1	4.0
2/20/2014 6:54	2.209	1.326	1.326	921	0.075	24.0	154.0	48.0	4.0
2/20/2014 6:55	2.237	1.342	1.342	932	0.353	23.7	155.8	48.0	4.0
2/20/2014 6:56	2.116	1.269	1.269	882	0.822	23.5	157.7	47.9	4.0
2/20/2014 6:57	2.109	1.266	1.266	879	0.875	23.5	158.6	47.9	4.0
2/20/2014 6:58	2.078	1.247	1.247	866	0.072	23.5	162.1	47.9	4.0
2/20/2014 6:59	1.969	1.181	1.181	820	0.553	23.5	165.7	48.1	4.0
2/20/2014 7:00	1.834	1.101	1.101	764	0.847	23.3	170.1	48.0	4.0
2/20/2014 7:01	2.016	1.209	1.209	840	0.331	23.5	176.6	48.1	4.0
2/20/2014 7:02	2.025	1.215	1.215	844	0.044	23.5	179.2	48.0	4.0

2/20/2014 7:03	2.175	1.305	1.305	906	0.516	23.6	173.6	48.1	4.0
2/20/2014 7:04	2.378	1.427	1.427	991	0.528	23.5	161.1	48.1	4.0
2/20/2014 7:05	2.347	1.408	1.408	978	0.044	23.5	159.6	48.1	4.0
2/20/2014 7:06	2.434	1.461	1.461	1014	0.388	23.4	153.1	48.0	4.0
2/20/2014 7:07	2.475	1.485	1.485	1031	0.753	23.4	153.6	48.0	4.0
2/20/2014 7:08	2.506	1.504	1.504	1044	0.888	23.4	148.9	48.0	4.0
2/20/2014 7:09	2.447	1.468	1.468	1020	0.863	23.5	149.3	48.0	4.0
2/20/2014 7:10	2.416	1.449	1.449	1007	0.609	23.1	146.5	48.0	4.0
2/20/2014 7:11	2.381	1.429	1.429	992	0.450	23.1	147.7	48.1	4.0
2/20/2014 7:12	2.528	1.517	1.517	1053	0.778	22.8	145.3	48.2	4.0
2/20/2014 7:13	2.475	1.485	1.485	1031	0.872	22.6	146.9	48.3	4.0
2/20/2014 7:14	2.588	1.553	1.553	1078	0.894	22.5	145.3	48.4	4.0
2/20/2014 7:15	2.600	1.560	1.560	1083	0.772	22.7	142.3	48.5	4.0
2/20/2014 7:16	2.763	1.658	1.658	1151	0.059	22.7	148.8	48.5	4.0
2/20/2014 7:17	2.831	1.699	1.699	1180	0.250	22.6	149.9	48.6	4.0
2/20/2014 7:18	2.791	1.674	1.674	1163	0.763	22.5	144.3	48.7	4.0
2/20/2014 7:19	2.844	1.706	1.706	1185	0.684	22.4	144.0	48.7	4.0
2/20/2014 7:20	3.000	1.800	1.800	1250	0.491	22.3	139.9	48.8	4.0
2/20/2014 7:21	2.988	1.793	1.793	1245	0.750	22.2	137.7	48.9	4.0
2/20/2014 7:22	2.966	1.779	1.779	1236	0.853	22.3	135.8	48.7	4.0
2/20/2014 7:23	3.000	1.800	1.800	1250	0.197	22.0	137.0	48.9	4.0
2/20/2014 7:24	3.034	1.821	1.821	1264	0.044	22.1	136.7	49.0	4.0
2/20/2014 7:25	2.888	1.733	1.733	1203	0.113	22.1	136.1	49.0	4.0
2/20/2014 7:26	2.834	1.701	1.701	1181	0.063	22.1	135.5	49.1	4.0
2/20/2014 7:27	2.991	1.794	1.794	1246	0.066	22.1	139.3	49.1	4.0
2/20/2014 7:28	2.969	1.781	1.781	1237	0.059	22.1	140.6	49.1	4.0
2/20/2014 7:29	2.831	1.699	1.699	1180	0.147	22.3	135.8	49.1	4.0
2/20/2014 7:30	2.722	1.633	1.633	1134	0.888	22.0	139.3	49.2	4.0
2/20/2014 7:31	2.697	1.618	1.618	1124	0.863	22.0	142.9	49.2	4.0
2/20/2014 7:32	2.506	1.504	1.504	1044	0.059	21.9	144.7	49.2	4.0
2/20/2014 7:33	2.463	1.478	1.478	1026	0.031	21.8	146.1	49.3	4.0
2/20/2014 7:34	2.291	1.374	1.374	954	0.100	21.7	151.9	49.3	4.0
2/20/2014 7:35	2.263	1.358	1.358	943	0.081	21.8	159.1	49.4	4.0
2/20/2014 7:36	2.178	1.307	1.307	908	0.047	22.0	165.3	49.5	4.0

2/20/2014 7:37	2.319	1.391	1.391	966	0.575	21.8	166.8	49.5	4.0	
2/20/2014 7:38	2.375	1.425	1.425	990	0.844	21.9	167.3	49.5	4.0	
2/20/2014 7:39	2.306	1.384	1.384	961	0.884	21.7	170.0	49.6	4.0	
2/20/2014 7:40	2.231	1.339	1.339	930	0.884	21.4	169.5	49.7	4.0	
2/20/2014 7:41	2.138	1.283	1.283	891	0.894	21.3	170.5	49.7	4.0	
2/20/2014 7:42	1.941	1.164	1.164	809	0.906	21.4	175.2	49.8	4.0	
2/20/2014 7:43	1.988	1.193	1.193	828	0.881	21.5	179.6	49.8	4.0	
2/20/2014 7:44	2.013	1.208	1.208	839	0.903	21.3	184.4	49.8	4.0	
2/20/2014 7:45	2.109	1.266	1.266	879	0.888	21.4	188.8	49.8	4.0	
2/20/2014 7:46	2.319	1.391	1.391	966	0.888	21.5	180.8	49.8	4.0	
2/20/2014 7:47	2.484	1.491	1.491	1035	0.881	21.2	180.8	49.9	4.0	
2/20/2014 7:48	2.850	1.710	1.710	1188	0.884	21.2	169.5	49.9	4.0	
2/20/2014 7:49	3.163	1.898	1.898	1318	0.894	21.0	159.0	49.9	4.0	
2/20/2014 7:50	3.472	2.083	2.083	1447	0.891	21.0	140.2	50.0	4.0	
2/20/2014 7:51	4.481	2.689	2.689	1867	0.881	21.1	131.4	50.0	4.0	
2/20/2014 7:52	4.825	2.895	2.895	2010	0.881	21.1	109.3	50.0	4.0	
2/20/2014 7:53	4.741	2.844	2.844	1975	0.897	21.2	103.3	50.1	4.0	
2/20/2014 7:54	4.525	2.715	2.715	1885	0.891	21.6	102.7	50.1	4.0	
2/20/2014 7:55	4.644	2.786	2.786	1935	0.888	21.7	103.7	50.1	4.0	
2/20/2014 7:56	4.481	2.689	2.689	1867	0.919	22.7	107.7	49.9	4.0	
2/20/2014 7:57	4.600	2.760	2.760	1917	0.888	23.1	103.9	49.4	4.0	
2/20/2014 7:58	4.441	2.664	2.664	1850	0.888	23.4	101.9	49.1	4.0	
2/20/2014 7:59	4.416	2.649	2.649	1840	0.888	23.6	105.6	48.9	4.0	
2/20/2014 8:00	4.422	2.653	2.653	1842	0.894	23.6	105.5	48.6	4.0	
2/20/2014 8:01	4.378	2.627	2.627	1824	0.897	23.4	106.8	48.6	4.0	
2/20/2014 8:02	1.053	0.632	0.632	439	0.903	23.6	106.5	48.6	4.0	NO DISCHARGE, Bypass Activated
							153.1	48.58	4	by Plant Staff Until process returned
							535	48.65	4	to normal

Total Flow for Less Than Full Treatment 534,181 gallons

ATTACHMENT B

CALIFORNIA Water Boards

EDMUND G. BROWN JR. GOVERNOR

MATTHEW RODRIQUEZ SECRETARY FOR ENVIRONMENTAL PROTECTION

Central Valley Regional Water Quality Control Board

5 May 2014

Rick Howard
General Manager
Town of Discovery Bay CSD
1800 Willow Lake Road
Discovery Bay, California 94505

COMPLIANCE EVALUATION INSPECTION AND NOTICE OF VIOLATION, TOWN OF DISCOVERY BAY COMMUNITY SERVICES DISTRICT, WASTEWATER TREATMENT PLANT, CONTRA COSTA COUNTY

The discharge of wastewater by the Town of Discovery Bay Community Services District (Discharger) from its Wastewater Treatment Plant (Facility) is regulated by Waste Discharge Requirements (WDRs) Order R5-2008-0179-01 (NPDES CA 0078590). Central Valley Water Board (Board) staff conducted an inspection of the Discovery Bay Wastewater Treatment Facility on 25 March 2014. A photo log of the inspection is included as Attachment A to this letter.

The purpose of the inspection was to determine the cause of the unauthorized bypass that occurred at the Facility on 19 – 20 February 2014.

The Facility has two plants that are bisected by State Road 4 with Plant 1 to the north and Plant 2 to the south. All flow enters the Plant 1 pump station, and is then split into the headworks for each plant. The two plants are connected by a 12-inch and an 8-inch line that runs from a pump station at Plant 1 to the headworks at Plant 2. On 19 February 2014, the 12-inch line to Plant 2 was shut down for construction, and the 8-inch line was opened in order to allow water to continue to flow into Plant 2's headworks.

According to the Discharger's 5 March 2014 Notification Report (*Discovery Bay CSD Written Notification of Partially Treated Effluent)*, at approximately 7:55 pm on 19 February 2014 the operations supervisor was notified of high turbidity readings at Plant 1. The operations supervisor contacted the on-call operator who performed a plant status investigation at Plant 1 and observed that Plant 1 was hydraulically overloaded. At 11:08 pm the on-call operator raised the Plant 1 influent flow slide gate at the influent pump station in an attempt to direct more flow to Plant 2. The operator also increased the UV treatment dosage from 120 millijoule per square centimeter (mJ/cm^2) to 200 mJ/cm^2. After midnight, the plant operator saw that the final effluent turbidity readings were dropping, and departed the Facility.

However, upon arrival at the Facility at approximately 6:00 am on 20 February 2014 for their normal shift, staff observed that Plant 1 was again hydraulically overloaded. According to the Discharger, inflow to Plant 2 was inadvertently directed back to the concrete splitter-structure at Plant 1, which caused a bypass of the headworks and oxidation ditch. Upon discovery of the

bypass, Facility staff then manually diverted the effluent flow to ponds at 8:02 am on 20 February 2014, preventing further discharge to Old River.

The treatment system bypass took place from 2:21 pm on 19 February 2014 to 8:02 am on 20 February 2014, and resulted in raw wastewater mixing with partially treated wastewater in the clarifiers and a discharge of 534,181 gallons of partially treated wastewater to Old River, a water of the US. The bypass and discharge of partially treated wastewater is a violation of Discharge Prohibitions III.A and III.B of the WDRs which prohibit the discharge of wastewater in a different manner from that described in the WDRs and prohibits the bypass of wastes to surface waters, respectively.

The purpose of the 8-inch line is to maintain flow to Plant 2 in the event that the 12-inch line is inoperable. But, according to the incident report, the 8-inch line had not been used for “many years”. The Discharger states that when the 8-inch line was opened and put into operation, Facility staff was unaware of a valve located just before the concrete splitter structure at Plant 1; this valve diverts flows to the two clarifiers at Plant 1 (see Attachment B to this letter). Facility staff became aware of the valve after contacting the Discharger’s engineer and describing the events. In addition, the Discharger stated during the inspection that the valve had been buried and had not been used in ten years. The burial and lack of proper operation of the valve is a violation of the Standard Provision I.D of the WDRs which requires the Discharger to properly operate and maintain all facilities and systems of treatment and control.

During the inspection, Board staff inspected the concrete splitter structure and the previously buried 8-inch valve. Staff observed fill material surrounding the valve box and the cover of the valve box had been recently painted orange. When the valve box was opened, the valve itself was under water and not visible to Board staff. The Discharger stated that the water in the valve box was shallow groundwater and is typical of the area.

The Notification Report from the Discharger also states that there were calibration issues associated with the supervisory control and data acquisition (SCADA) system. The lack of calibration calls into question the accuracy of the Discharger’s reported volume of the spill. According to that report: *“The influent flow meters and the lift station flow meters had recently been replaced and were not yet been [sic] rescaled properly in the SCADA system. This resulted in skewed data on the SCADA system and has been corrected.”* During the inspection, the Discharger stated that the issues associated with the SCADA system occurred for “two to three weeks” prior to the inspection. The failure to properly calibrate the SCADA system is a violation Standard Provision I.D of the WDRs. The Notification Report includes a table showing the flow-rates and volumes during the treatment bypass event time period that was developed using totalizer readings.

Based on observations and discussions during the inspection, Board staff finds that the treatment bypass was caused by a valve that was unknown to staff and was left open. The discharge occurred between 2:21 pm on 19 February 2014 and 8:02 am on 20 February 2014. The Discharger resumed discharging to Old River at 1:25 pm on 20 February 2014. Since that time, the valve has been closed, a new valve box has been installed, and the SCADA system issues have been addressed. According to the Notification Report, the 8-inch line at the influent pump station will be labeled with a reminder that the splitter structure valve must be confirmed closed prior to opening the 8-inch valve. Board staff also recommend installing a more permanent structure to prevent the valve box from being covered and/or buried again (e.g., a stand-up pipe with a protective bollard(s); and/or sealing the valve box in concrete).

If you have any questions, please contact me at (916) 464-4623 or Nichole.Morgan@waterboards.ca.gov.

Original Signed By Wendy Wyels for

NICHOLE MORGAN
Senior Water Resources Control Engineer
NPDES Compliance and Enforcement Unit

Attachment A: Photographs
Attachment B: Line Diagram

Attachment A—Photographs

Figure 1: 12-inch pipe at Plant 2 that was temporarily off-line for service.

Figure 2: Pump station and electrical control boxes at Plant 1.

Attachment A—Photographs

Figure 3: Manual flow meter at Plant 1. Flow meter was working during the inspection.

Figure 4: New 8-inch valve-box at Plant 1 with concrete splitter structure in the background.

Attachment A—Photographs

Figure 5: Inside new 8-inch valve-box.

Figure 6: Concrete splitter structure at Plant 1. Weirs 1 and 2 were flowing full at the time of the inspection and a board was blocking the flow to weir 3.

Attachment A—Photographs

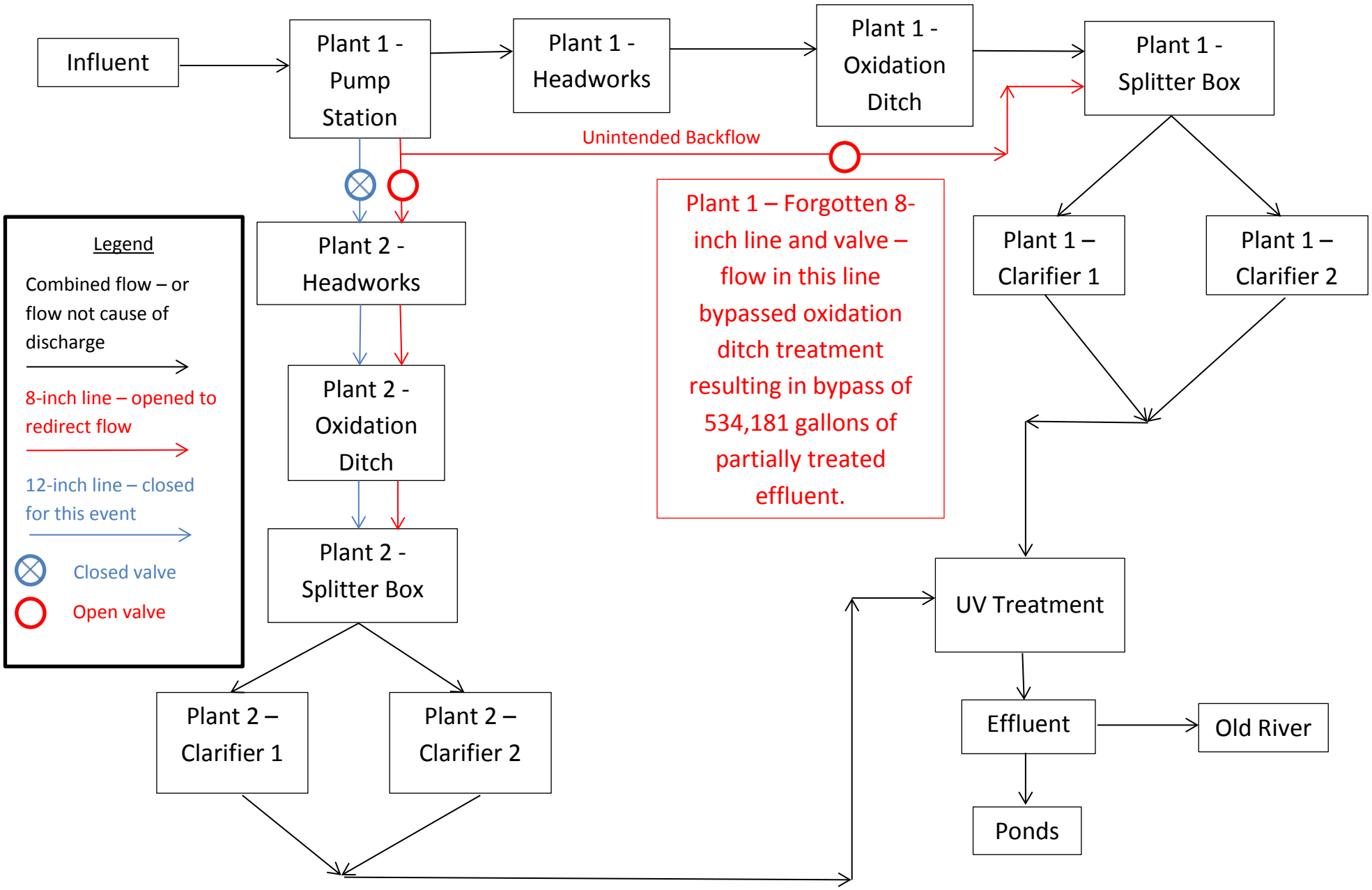
Figure 7: Plant 2 effluent sampler located adjacent to the UV disinfection structure.

Figure 8: UV disinfection system at Plant 2.

Attachment A—Photographs

Figure 10: Ponds at Plant 2.

Attachment B – Line Diagram
Discovery Bay WWTP
19 - 20 February 2014 Treatment Bypass Event



ATTACHMENT C

Attachment C – ACL Complaint No. R5-2014-0542
Specific Factors Considered for Administrative Civil Liability
Town of Discovery Bay Wastewater Treatment Plant

The State Water Board's *Water Quality Enforcement Policy* (Enforcement Policy) establishes a methodology for determining administrative civil liability by addressing the factors that are required to be considered under California Water Code section 13385(e). Each factor of the nine-step approach is discussed below, as is the basis for assessing the corresponding score. The Enforcement Policy can be found at:
http://www.waterboards.ca.gov/water_issues/programs/enforcement/docs/enf_policy_final111709.pdf.

The following steps are used in determining administrative civil liability for the 19-20 February 2014 unauthorized discharge.

Step 1 – Potential for Harm for Discharge Violations

The "potential harm to beneficial uses" factor considers the harm that may result from exposure to the pollutants in the illegal discharge, while evaluating the nature, circumstances, extent, and gravity of the violation(s). A three-factor scoring system is used for each violation or group of violations: (1) the potential for harm to beneficial uses; (2) the degree of toxicity of the discharge; and (3) whether the discharge is susceptible to cleanup or abatement.

Factor 1: Harm or Potential Harm to Beneficial Uses.

This factor evaluates direct or indirect harm or potential for harm from the violation. A score between 0 and 5 is assigned based on a determination of whether the harm or potential for harm to beneficial uses ranges from negligible (0) to major (5). The designated beneficial uses of Old River that could be impacted by the unauthorized discharge include municipal and domestic supply; agricultural irrigation; agricultural stock watering; industrial process water supply; industrial service supply; water contact recreation; other non-contact water recreation; warm freshwater aquatic habitat; cold freshwater aquatic habitat; warm fish migration habitat; cold fish migration habitat; warm spawning habitat; wildlife habitat; and navigation.

Discharges to surface water typically must be treated to a high standard to prevent adverse impacts such to aquatic life. Toxicity is the degree to which a substance can damage a living or non-living organism. Toxicity can refer to the effect on a whole organism, such as an animal, bacterium, or plant, as well as the effect on a substructure of the organism, such as a cell or an organ. In this case, the discharge consisted of partially treated wastewater. The treatment systems that flow was diverted around included the oxidation ditch, which is critical to removing ammonia. Fish are highly sensitive to even small concentrations of ammonia. In addition, the discharge point is within the tidal zone of Old River, and therefore the partially-treated wastewater was not immediately flushed out of the system, thus allowing for additional contact time with sensitive species.

On 31 March 2014 the Discharger submitted its electronic Self-Monitoring Report (eSMR) that includes routine sample data collected on 19 and 20 February 2014. However, Board staff does not believe that this data is representative of the conditions of the partially- treated discharge because the samples were not collected during the discharge event. A review of the report shows that the samples were collected approximately two hours before and approximately six hours after the event. The Discharger also submitted effluent and receiving

water samples as part of its 5 March 2014 *Discovery Bay CSD Written Notification of Partially Treated Effluent* but these samples were also taken after the discharge ceased.

Because there is no analytical data available regarding the ammonia content of the partially-treated wastewater which was discharged to Old River, it is appropriate to assign a "moderate" potential harm to beneficial uses. "Moderate" is defined as "impacts are observed or reasonably expected and impacts to beneficial uses are moderate and likely to attenuate without appreciable acute or chronic effects". Therefore, a score of 3 is assigned for this factor.

Factor 2: The Physical, Chemical, Biological or Thermal Characteristics of the Discharge.
A score between 0 and 4 is assigned based on a determination of the risk or threat of the discharged material. "Potential receptors" are those identified considering human, environmental, and ecosystem exposure pathways. The effluent was partially treated wastewater and received only partial disinfection. The Discharger did not collect samples of the partially treated wastewater, but it is reasonable to assume that the effluent had a higher-than-normal concentrations of biological oxygen demand (BOD), ammonia, and total coliform organisms. Elevated levels of these constituents can lead to low dissolved oxygen in the receiving water, impacts to aquatic life, and impacts to human health. It is appropriate to assign a "moderate" risk to this discharge and a score of 2 was assigned for this factor.

Factor 3: Susceptibility to Cleanup or Abatement.
A score of 0 is assigned for this factor if 50% or more of the discharge is susceptible to cleanup or abatement. A score of 1 is assigned if less than 50% of the discharge is susceptible to cleanup or abatement. This factor is evaluated regardless of whether the discharge was actually cleaned up or abated by the discharger. In this case, less than 50% of the discharge was susceptible to cleanup or abatement as the wastewater entered Old River. Therefore, a factor of 1 is assigned.

Final Score – "Potential for Harm"
The scores of the three factors are added to provide a Potential for Harm score for each violation or group of violations. In this case, **a final score of 6** was calculated. The total score is then used in Step 2, below.

Step 2 – Assessment for Discharge Violations
This step addresses administrative civil liabilities for the unauthorized discharge based on both a per-gallon and a per-day basis.

1. Per Gallon Assessments for Discharge Violations
When there is a discharge, the Central Valley Water Board is to determine an initial liability amount on a per gallon basis using on the Potential for Harm score and the Extent of Deviation from Requirement of the violation.

The Potential for Harm Score was determined in Step 1, and is 6. The Extent of Deviation is considered "moderate" because the WDRs prohibit the discharge of partially treated wastewater to surface waters. In particular, the WDRs prohibit the discharge of wastewater in

a manner or location different from that described in the Complaint. Table 1 of the Enforcement Policy (p. 14) is used to determine a "per gallon factor" based on the total score from Step 1 and the level of Deviation from Requirement. For this particular case, the factor is 0.150. This value is multiplied by the volume of discharge and the per gallon civil liability, as described below.

This Complaint assesses penalties for a discharge of 534,181 gallons. Water Code section 13385(c)(2) states that the civil liability amount is to be based on the number of gallons discharged—but not cleaned up—over 1,000 gallons, which for this Complaint, is 533,181 gallons. The maximum civil liability allowed under Water Code section 13385 on a per gallon basis is $10/gallon. However, the Enforcement Policy allows for a reduced per gallon penalty for high volume discharges. In this case, the discharge can be considered a high volume discharge and the reduced per volume factor of $2/gallon applies.

Therefore, the Per Gallon Assessment is calculated as: (0.150 factor from Table 1) x (533,181 gallons) x ($2 per gallon). The value is $159,954.30. For ease of calculation, this number has been rounded to $160,000.

2. Per Day Assessments for Discharge Volumes

When there is a discharge, the Central Valley Water Board is to determine an initial liability amount on a per day basis using the same Potential for Harm and the Extent of Deviation from Requirement that were used in the per-gallon analysis. The "per day" factor (determined from Table 2 of the Enforcement Policy) is 0.150.

The discharge of partially treated wastewater occurred for one day. Therefore, the Per Day Assessment is calculated as (0.150 factor from Table 2) x (1 day) x ($10,000 per day). The value is $1,500.

Initial Liability Amount: The value is determined by adding together the per gallon assessment and the per day assessment. For this case, the total is $160,000 + $1,500 for a total initial liability amount of **$161,500**.

Step 3 – Per Day Assessment for Non-Discharge Violation

This step is not applicable.

Step 4 – Adjustment Factors

There are three additional factors to be considered for modification of the amount of initial liability: the violator's culpability, efforts to clean-up or cooperate with regulatory authority, and the violator's compliance history. After each of these factors is considered for the violations involved, the applicable factor should be multiplied by the proposed amount for each violation to determine the revised amount for that violation.

Culpability

Higher liabilities should result from intentional or negligent violations as opposed to accidental violations. A multiplier between 0.5 and 1.5 is to be used, with a higher multiplier for negligent behavior. The Discharger was given a multiplier value of 1.4. The 19/20 February 2014

unauthorized discharge resulted from the Discharger not knowing the piping diagram of its wastewater treatment plant, and neglecting and burying a valve for a period of many years. The Discharger is culpable for the unauthorized discharge because (a) the valve was buried when the plant was graded, but at the time of the grading project the district engineer should have ensured that the valve was raised so that it would be visible after grading had been completed, (b) all wastewater treatment plant operators and district engineers should have a good understanding of the flow paths within a treatment plant, (c) and all wastewater treatment plant valves should be inspected and exercised on a regular basis. There was no reason that this discharge should have occurred. Furthermore, as noted in the History of Violations, below, this is not the first time that a valve at the facility has been left open and neglected. Therefore, it is appropriate to use a culpability multiplier of 1.4 for this adjustment factor.

Cleanup and Cooperation

This factor reflects the extent to which a discharger voluntarily cooperates in returning to compliance and correcting environmental damage. A multiplier between 0.75 and 1.5 is to be used, with a higher multiplier when there is a lack of cooperation. Over 500,000 gallons of partially treated wastewater were discharged to Old River, a water of the United States. Because the wastewater was discharged to a surface water body, the possibility to clean-up the unauthorized discharge was negated. However, the Discharger did respond to the unauthorized discharge upon arrival at the site and took measures to minimize the potential for a greater discharge. Additionally, the Discharger later excavated the valve. Therefore, the Discharger was given a multiplier value of 1.0.

History of Violation

When there is a history of repeat violations, the Enforcement Policy requires a minimum multiplier of 1.1 to be used. The Discharger has a history of violations including both sanitary sewer overflows and mandatory minimum penalties for effluent violations.

Between April 2008 and June 2010, the Discharger reported seven sanitary sewer overflows which resulted in spills of over 1.7 million gallons of raw sewage into surface water. The Discharge paid a civil liability of $241,000 to settle the violations. The spills were due in part pump failures, and inappropriate response by the plant staff to the pump failures.

On 13 September 2013, the Discharger was issued an Administrative Civil Liability Order for effluent limitation violations that occurred at the wastewater treatment plant between 1 March 2011 and 30 April 2013. The ACL Order assessed penalties for 23 violations of the effluent limitations contained in the WDRs, 21 of which were for violations of the total coliform limitations resulting from operational problems at the waste water treatment plant. The Discharger notified Board staff by letter on 6 March 2013 that the six total coliform violations occurring in 2011 were the result of the weirs to the ultraviolet (UV) disinfection system not being leveled, allowing for an uneven distribution of flow between the UV channels. In addition, the Discharger notified Board staff by letter on 30 April 2013 that the fourteen total coliform violations that occurred in 2013 were the result of a frozen 3-way valve. Per the Discharger's letter, "*According to the engineer for the Town of Discovery Bay, prior plant operators tried moving the 3-way valve at least five years ago and were unable to move the position of the*

valve." In response to the 2013 total coliform violations the Discharger stated that "*Plant staff are presently meeting twice per week to review Process Control Management Plans and determine a weekly Strategy Plan with specific parameters, goals and actions that are assigned to specific individuals and will continue until management is satisfied then staff can reduce the meetings to once per week*."

Given the previous violations were similar in nature to this violation a multiplier value of 1.2 is appropriate for this case.

Step 5 - Determination of Total Base Liability Amount

The Total Base Liability is determined by applying the adjustment factors from Step 4 to the Initial Liability Amount determined in Step 2.

Total Base Liability Amount: This value is calculated as the Initial Liability Amount ($161,500) X Adjustment Factors (1.4) (1.0) (1.2) and is equal to **$271,320**.

Step 6 - Ability to Pay and Ability to Continue in Business

The ability to pay and to continue in business factor must be considered when assessing administrative civil liabilities. The U.S.EPA's model MUNIPAY was used to analyze the economic and financial condition of Discovery Bay, and to quantify the Discharger's ability to pay a penalty. *The Town of Discovery Bay Community Services District Financial Statement and Independent Auditor's Report* (30 June 2012) was reviewed and it was determined that the Discharger has the ability to pay a $450,000 ACL. The Discharger's net current assets in its Business-type Activities amount is $5,642,930 which is more than sufficient to cover the penalty assessment even when subtracting a recommended balance of $907,010.

Step 7 – Other Factors as Justice May Require

If the Central Valley Water Board believes that the amount determined using the above factors is inappropriate, the amount may be adjusted under the provision for "other factors as justice may require," but only if express findings are made to justify this.

Costs of Investigation and Enforcement Adjustment

The costs of investigation and enforcement are "other factors as justice may require", but are not added to the liability amount.

Step 8 – Economic Benefit

Pursuant to Water Code section 13385(e), civil liability, at a minimum, must be assessed at a level that recovers the economic benefits, if any, derived from the acts that constitute the violation. The unauthorized discharge was due to: (1) the Discharger not providing sufficient training for its staff to be able to properly operate the WWTP at all times; (2) the Discharger not regularly maintaining the valve and allowing it to become buried; and (3) the Discharger not having an adequate Contingency Plan and Standard Operating Procedures. The US EPA BEN model was used to evaluate the economic benefit derived from delaying or avoiding

compliance with existing environmental regulations. Using the model, the economic benefit of noncompliance is calculated to be $46,224.

Final adjusted liability
The final adjusted liability is $271,320.

Step 9 – Maximum and Minimum Liability Amounts
The maximum and minimum amounts for discharge violation must be determined for comparison to the amounts being proposed. These values are calculated in the ACL Complaint, and the values are repeated here.

Maximum Liability Amount: $5,341,810

Minimum Liability Amount: the minimum liability is equal to the economic benefit plus 10%, which estimated to be $50,846.

Step 10 – Final liability Amount
The final liability amount consists of the added amounts for each violation, with any allowed adjustments, provided amounts are within the statutory minimum and maximum amounts. Without further investigation of the discharge, calculation of economic benefits, and additional staff time, the proposed Administrative Civil Liability is **$271,320**.