



July 30, 2013

Michael Chee  
Pretreatment Coordinator  
Surface Water Protection Division  
California Regional Water Quality Control Board  
1515 Clay Street  
Oakland, CA 94612

Re: City of Richmond's Semi-annual Pretreatment Report

Dear Michael:

Enclosed is the City of Richmond's Pretreatment Semiannual Report for the period of January through June 2013.

"I certify under penalty of law that this document and all attachments submitted are prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the persons or persons who managed the systems, 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.

A handwritten signature in blue ink that reads "Chad Davisson".

Chad Davisson  
General Manager

Copies: CIWQS  
West County Wastewater District  
File

## Table of Contents

2013 JANUARY - JUNE TOXICS POLLUTANTS SUMMARY .....	3
SAMPLING PROCEDURES .....	3
METHOD OF SAMPLE DE-CHLORINATION .....	4
SAMPLE COMPOSITING.....	4
DATA VALIDATION .....	4
RESULTS .....	4
DISCUSSION OF RESULTS .....	4
INFLUENT METALS CONCENTRATIONS: .....	6
EFFLUENT METALS CONCENTRATIONS:.....	6
Part I – SEMI-VOLATILE ORGANICS – PART I.....	7
Part II – SEMI-VOLATILE ORGANICS PART II.....	8
Part III – VOLATILE ORGANICS.....	9
Part IV – ORGANOCHLORINE PESTICIDES .....	10
Part Va – SLUDGE TEST RESULTS .....	11
Part Vb – SLUDGE TEST RESULTS .....	12
SIGNIFICANT INDUSTRIAL USER COMPLIANCE REPORTS: .....	13
Table 1 – Metal Finisher’s Discharge Table.....	13
Non-Compliance Summary (Metal Finisher’s) .....	14
Conversion Coatings .....	14
Richmond Metal Painting.....	14
Parker Hannifin (Veriflo) .....	14
Table 2 – Non-Categorical Industrial User Discharge Table.....	15
Non-Compliance Summary (Non-categorical) .....	16
Burlington Northern Santa Fe (BNSF) .....	16
Bay Area Rapid Transit (BART) .....	16
California Oils Corporation.....	17
West County Wastewater District (WCWD): .....	17
Compliance with Pretreatment Program Requirements .....	19
Date of Last PCA or PCI Report .....	19
Date of Response to PCA or PCI Report.....	19
Unresolved (Required) Issues from PCI .....	19
Required Action - Staffing.....	19

Current Staffing for the City’s Pretreatment Program (Source Control):.....	19
Unresolved (Recommended) Issues from PCI.....	19
Plan(s) and Schedule for Resolving the Recommended Issues.....	20
Required Issues and Proposed Implementation Schedule from PCA.....	20
Update Sewer Use Ordinance.....	20
Update Enforcement Response Plan.....	20
Determine Appropriate Permitting Mechanism for West County Landfill.....	20
Review and Update Industrial User Permits.....	20
Review Sampling and Analysis Procedures with Industrial Users.....	20
Evaluate Need for Slug Discharge Control Plans.....	20
Implement Enforcement Response Plan.....	20
Influent, Effluent and Biosolids Attachments.....	21
Attachment A: Influent and Effluent Lab Results for Semi-volatile Organics, Organochlorine Pesticides, Ammonia and Cyanide.....	21
Attachment B: Influent and Effluent Lab Results for Volatile Organics and Selenium.....	23
Attachment C: Influent and Effluent Lab Results for Mercury.....	25
Attachment D: Transport Sludge Lab Results.....	27

## 2013 JANUARY - JUNE TOXICS POLLUTANTS SUMMARY

### SAMPLING PROCEDURES

Sample details are outlined in the table below:

Sample Location	Date Sampled	Time Sampled	Date to Lab	Time to Lab	Parameter	Preservative	Sample Type
A-002	02/14/13	13:10	02/16/13	10:00	Semi-volatile organics (625)	4 °C	Grab
E-001-D2	02/14/13	13:27	02/16/13	10:00	Semi-volatile organics (625)	4 °C	Grab
A-002	02/14/13	12:41	02/16/13	14:34	Volatile organics (624)	4 °C	Grab
E-001-D2	02/14/13	13:27	02/16/13	14:34	Volatile organics (624)	4 °C	Grab
A-002	02/14/13	13:10	02/16/13	10:00	Organochlorine pesticides (608)	4 °C	Grab
E-001-D2	02/14/13	13:27	02/16/13	10:00	Organochlorine pesticides (608)	4 °C	Grab
A-002	02/14/13	08:03	02/16/13	10:00	Metals	HNO <sub>3</sub> & 4 °C	Composite
E-001-D2	02/14/13	09:10	02/16/13	10:00	Metals	HNO <sub>3</sub> & 4 °C	Composite
A-002	02/14/13	12:41	02/16/13	14:34	Mercury <sup>1 2</sup>	HCl & 4 °C	Grab
E-001-D2	02/14/13	13:27	02/16/13	14:34	Mercury	HCl & 4 °C	Grab
A-002	02/14/13	08:03	02/16/13	14:34	Selenium	HNO <sub>3</sub> & 4 °C	Composite
E-001-D2	02/14/13	09:10	02/16/13	14:34	Selenium	HNO <sub>3</sub> & 4 °C	Composite
A-002	02/14/13	12:41	02/16/13	10:00	Cyanide	NaOH & 4 °C	Grab
E-001-D2	02/14/13	13:27	02/16/13	10:00	Cyanide	NaOH & 4 °C	Grab

Influent was collected after pre-chlorination, but had no chlorine residual. Final effluent was collected after chlorination but before de-chlorination because it is not de-chlorinated until mixed with WCWD final effluent.

<sup>1</sup> Method 1669, "Method for Sampling Ambient Water for Determination of Metals at EPA Ambient Criteria Levels," U.S. Environmental Protection Agency, Office of Water, Office of Science and Technology, Engineering and Analysis Division (4303), 401 M Street SW, Washington, DC 20460, April 1995 with January 1996 revisions.

<sup>2</sup> This Method follows the EPA Environmental Methods Management Council's "Guidelines and Format for Methods to Be Proposed at 40 CFR, part 136 or part 141."

## METHOD OF SAMPLE DE-CHLORINATION

Final effluent was not de-chlorinated before sending it to the laboratory for analysis.

## SAMPLE COMPOSITING

Metals samples were collected with flow-proportioned automatic composite samplers. The other samples were not composited, as required.

## DATA VALIDATION

Internal standards, spikes, duplicates, and blanks are not included with this report. However, all QA/QC data are available for review upon request. Based on the QA/QC validation data, the analytical results reviewed meet the laboratory acceptance criteria except as noted in the footnotes.

## RESULTS

The tabular data is included in the body of this report. Detailed lab results are located in the attachments listed:

Attachment A: Influent and Effluent Lab Results for Semi-volatile Organics, Organochlorine Pesticides, Ammonia, Metals and Cyanide

Attachment B: Influent and Effluent Lab Results for Volatile Organics, and Selenium

Attachment C: Influent and Effluent Lab Results for Mercury

Attachment D: Transport Sludge Results

## DISCUSSION OF RESULTS

No pollutant in this sample was detected in sufficient concentration to upset, interfere, or pass through the POTW. Based on the City's Industrial User monitoring, carbon tetrachloride, dichloroethanes, phenol, 1, 1, 1-trichloroethane, Trichloroethene, Methylene Chloride, and other toxic organics could occur in the influent. Industrial User's operating procedures will be reviewed during routine inspections to determine if best management practices are not being followed.

The City of Richmond is a co-member of the West County Agency (WCA) and each agency monitors their secondary effluent for toxicity reports prior to its mixing and becoming the combined effluent. The WCA's new NPDES permit (Order R2-2013-0016) limits became effective July 1, 2013. For this reporting period, the previous limits (under Order R2-2008-0003) are still in effect, and the Agency's combined effluent is monitored for these limits. The following parameters were detected in the City of Richmond secondary effluent but not at any amounts to violate or trigger any regulatory responses:

PARAMETER	DATE SAMPLED	INFLUENT RESULTS (µg/l)	EFFLUENT RESULTS (µg/l)	REGIONAL PERMIT LIMIT (µg/l), WQO/WQC
Chloroform	02/14/13	6.6	2.9	No Criteria
Benzyl butyl phthalate	02/14/13	N.D. (2.5)	4.7	5,200
Bromodichloromethane	02/14/13	N.D. (2.5)	0.8	46
Dibromochloromethane	02/14/13	N.D. (2.5)	0.3 J	34
Methyl tert-butyl ether (MTBE)	02/14/13	N.D. (2.5)	0.3	No Criteria
Toluene	02/14/13	2.6	0.7	200,000
2,4-Dimethylphenol	02/14/13	N.D. (2.5)	0.9	2,300
Di-n-octylphthalate	02/14/13	57	.65 J	No Criteria
Ammonia (as N)	02/14/13	Not Sampled	26	32
Arsenic	06/12/13	3.1	2.7	36.0
Copper	05/15/13	63	3.3	4.2
Lead	05/15/13	5.9	0.33 J	8.5
Mercury	06/12/13	.11	.015	0.025
Nickel	03/14/13	5.9	3.7	13
Selenium	03/14/13	1.10	0.45 J	5.0
Silver	01/10/13	0.35 J	0.32 J	2.2
Zinc	05/15/13	180	19	86

The City monitors industrial and commercial sources as part of our Pollution Prevention Program. There were no POTW discharge violations for any non-conventional pollutants during this reporting period.

## INFLUENT METALS CONCENTRATIONS:

CITY OF RICHMOND														
TABLE 1a METAL CONCENTRATIONS OF INFLUENT														
Date	Year	MGD	Sample Date	ARSENIC	CADMIUM	CHROMIUM	COPPER	CYANIDE	LEAD	MERCURY	NICKEL	SELENIUM	SILVER	ZINC
				ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l
January	2013	7.31	10-Jan	3.4	J 0.31	2.9	31	ND 3.0	3.0	0.07	5.4	J 0.62	J 0.35	120
February	2013	6.36	14-Feb	ND 4.5	J 1.0	5.1	71	ND 3.0	8.4	0.24	5.4	1.0	J 0.75	240
March	2013	5.88	14-Mar	2.9	J 0.53	2.9	62	ND 3.0	3.9	0.26	5.9	1.10	1.3	150
April	2013	4.83	17-Apr	2.0	J 0.44	3.1	54	ND 3.0	4.1	0.071	6	J 0.58	J 0.47	140
May	2013	5.31	15-May	2.9	J 1.20	4.4	63	ND 3.0	5.9	0.24	8.9	J 0.37	J 0.54	180
June	2013	5.71	12-Jun	3.1	J 0.88	4.2	65	ND 3.0	7.8	0.11	7.6	J 0.66	J 0.61	210
July**	2013													
August	2013													
September	2013													
October	2013													
November	2013													
December	2013													
Maximum				4.50	1.20	5.10	71.0	3.00	8.40	0.26	8.90	1.10	1.30	240
Minimum				2.00	0.31	2.90	31.0	3.00	3.00	0.07	5.40	0.37	0.35	120
Average				3.13	0.73	3.77	57.7	3.00	5.52	0.17	6.53	0.72	0.67	173

A "J" flagged result indicates an estimated concentration above the Method Detection Limit (MDL) as below RL/ML (Reporting Limit/Minimum Level)  
The "J" flag is equivalent to the DNQ Estimated Concentration Flag.

## EFFLUENT METALS CONCENTRATIONS:

CITY OF RICHMOND														
SECONDARY EFFLUENT METAL CONCENTRATIONS														
Date	Year	MGD	Sample Date	ARSENIC	CADMIUM	CHROMIUM	COPPER	CYANIDE	LEAD	MERCURY	NICKEL	SELENIUM	SILVER	ZINC
				ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l	ug/l
January	2013	7.14	10-Jan	2.2	ND 0.10	ND 0.90	2.8	ND 3.0	J 0.29	0.0180	3.1	J 0.28	J 0.32	18
February	2013	6.03	14-Feb	2.1	ND 0.20	ND 1.80	2.7	ND 3.0	ND 0.40	0.0056	2.5	J 0.42	ND 0.20	16
March	2013	5.65	14-Mar	1.9	ND 0.10	1.1	1.9	ND 3.0	J 0.25	0.0051	3.7	J 0.45	ND 0.10	15
April	2013	4.99	17-Apr	1.8	ND 0.10	2.20	2.5	ND 3.0	J 0.22	0.004	3.4	J 0.2	ND 0.10	11
May	2013	5.45	15-May	2.2	ND 0.10	ND 0.90	3.3	ND 3.0	J 0.33	0.0002	3.6	ND 0.06	ND 0.10	19
June	2013	5.55	12-Jun	2.7	ND 0.10	ND 0.90	2.1	ND 3.0	J 0.30	0.015	3.6	J 0.14	ND 0.10	18
July**	2013													
August	2013													
September	2013													
October	2013													
November	2013													
December	2013													
Maximum				2.70	0.20	2.20	3.30	3.00	0.40	0.0180	3.70	0.45	0.32	19.0
Minimum				1.80	0.10	0.90	1.90	3.00	0.22	0.0002	2.50	0.06	0.10	11.0
Average				2.15	0.12	1.30	2.55	3.00	0.30	0.0081	3.32	0.26	0.15	16.2
<b>PERMIT LIMIT (AMEL)</b>														

**DETAIL IS REPORTED PER NEW NPDES PERMIT ISSUED 03/01/08 FOR THE WCA COMBINED EFFLUENT**  
(\* Hg limit is from RWQCB2 Order No. R2-2007-0077)  
A "J" flagged result indicates an estimated concentration above the Method Detection Limit (MDL) as below RL/ML (Reporting Limit/Minimum Level)  
The "J" flag is equivalent to the DNQ Estimated Concentration Flag.

## Part I - SEMI-VOLATILE ORGANICS - PART I

### ORGANIC AND METALLIC POLLUTANT SMP - TEST RESULTS

#### I. SEMI-VOLATILE ORGANICS - PART I

Laboratory: Test America

Analytical Test Method - EPA 625

January - June 2013 Reporting Period

Sample Date/Time	2/14/2013	12:41	2/14/2013	13:47
Analysis Date/Time	2/25/2013	22:22	2/21/2013	21:54
Flow, MGD		6.36		6.03
Parameter	Reporting Limit ug/l*	Influent ug/l	Reporting Limit ug/l*	Effluent ug/l
<b>BASE/NEUTRAL EXTRACTABLES</b>				
Acenaphthene	5.7	N.D.	0.51	N.D.
Acenaphthylene	5.5	N.D.	0.51	N.D.
Anthracene	5.7	N.D.	0.51	N.D.
Benzidine	57	N.D.	5.1	N.D.
Benzo (a) anthracene	57	N.D.	5.1	N.D.
Benzo (b) fluoranthene	23	N.D.	2	N.D.
Benzo (k) fluoranthene	5.7	N.D.	0.51	N.D.
Benzo (a) pyrene	23	N.D.	2	N.D.
Benzo (g,h,i) perylene	57	N.D.	5.1	N.D.
Benzyl butyl phthalate	57	N.D.	5.1	4.7J
Bis (2-chloroethyl) ether	5.7	N.D.	0.51	N.D.
Bis (2-chloroethoxy) methane	5.7	N.D.	0.51	N.D.
Bis (2-ethylhexyl) phthalate	57	N.D.	5.1	N.D.
4-Bromophenyl phenyl ether	11	N.D.	1.0	N.D.
2-Chloronaphthalene	5.7	N.D.	0.51	N.D.
4-Chlorophenyl phenyl ether	5.7	N.D.	0.51	N.D.
Chrysene	5.7	N.D.	0.51	N.D.
Dibenzo (a,h) anthracene	5.7	N.D.	0.51	N.D.
Di-n-butylphthalate	2.3	N.D.	2	N.D.
3,3'-Dichlorobenzidine	57	N.D.	5.2	N.D.
Diethyl phthalate	11	7.5 J	1.0	N.D.
Dimethyl phthalate	5.7	N.D.	0.51	N.D.
2,4-Dinitrotoluene	57	N.D.	5.1	N.D.
2,6-Dinitrotoluene	57	N.D.	5.1	N.D.
Di-n-octylphthalate	57	N.D.	5.1	0.65J
Fluoranthene	5.7	N.D.	0.51	N.D.
Fluorene	5.7	N.D.	0.51	N.D.
Hexachlorobenzene	11	N.D.	1.0	N.D.
Hexachlorobutadiene	11	N.D.	1.0	N.D.
Hexachlorocyclopentadiene	57	N.D.	5.1	N.D.
Hexachloroethane	11	N.D.	1.0	N.D.
Indeno (1,2,3-cd) pyrene	23	N.D.	2	N.D.
Isophorone	11	N.D.	1.0	N.D.
Naphthalene	11	N.D.	1.0	N.D.
Nitrobenzene	11	N.D.	1.0	N.D.
N-Nitrosodimethylamine	23	N.D.	1	N.D.
N-Nitrosodiphenylamine	11	N.D.	1.0	N.D.
N-Nitroso-di-n-propylamine	23	N.D.	2	N.D.
Phenanthrene	5.7	N.D.	0.51	N.D.
Pyrene	5.7	N.D.	0.51	N.D.
1,2,4-Trichlorobenzene	52	N.D.	1.0	N.D.
<b>RECOVERY RATES</b>				
Nitrobenzene - d5	45-120%	81%	45-120%	81%
2-Fluorobiphenyl	50-120%	67%	50-120%	79%
Terphenyl - d14	50-125%	102%	50-125%	94%
2-Fluorophenol	30-120%	78%	30-120%	70%
Phenol - d6	35-120%	80%	35-120%	77%
2,4,6 - Tribromophenol	40-120%	112%	40-120%	98%

"J" - RESULT IS LESS THAN THE REPORTING LIMIT BUT GREATER THAN OR EQUAL TO THE METHOD DETECTION LIMIT (MDL), AND THE CONCENTRATION IS AN APPROXIMATE VALUE.

\*Detection limits are stated at the highest for either influent or effluent or both are listed.

## Part II - SEMI-VOLATILE ORGANICS PART II

### II. SEMI-VOLATILE ORGANICS PART II (all test results in ug/L except as noted)

Laboratory: Test America

Analytical Test Method - EPA 625

January - June 2013 Reporting Period

Sample Date/Time	02/14/2013	12:41	2/14/2013	13:47
Analysis Date/Time	02/21/2013	22:22	2/25/2013	21:54
Flow, MGD	6.36		6.03	
Parameter	Reporting Limit ug/l*	Influent ug/l	Reporting Limit ug/l*	Effluent ug/l
<b>ACID EXTRACTABLES</b>				
2-Chlorophenol	11.0	N.D.	1	N.D.
2,4-Dichlorophenol	23.0	N.D.	2	N.D.
2,4-Dimethylphenol	23.0	N.D.	2.0	0.31 J
2,4-Dinitrophenol	57.0	N.D.	5.1	N.D.
2-Nitrophenol	23.0	N.D.	2	N.D.
4-Nitrophenol	110.0	N.D.	5.1	N.D.
Pentachlorophenol	23.0	N.D.	2	N.D.
Phenol	11.0	53.0	1.0	N.D.
2,4,6-Trichlorophenol	11.0	N.D.	1.3	N.D.
<b>RECOVERY RATES</b>				
Nitrobenzene-d5	45-120%	81%	45-120%	85%
2-Fluorobiphenyl	50-120%	67%	50-120%	92%
Terphenyl-d14	50-125%	102%	50-125%	114%
2-Fluorophenol	30-120%	78%	30-120%	77%
Phenol-D6	35-120%	80%	35-120%	82%
2,4,6-Tribromophenol	40-120%	112%	40-120%	109%

N.A. means not analyzed

"J" - RESULT IS LESS THAN THE REPORTING LIMIT BUT GREATER THAN OR EQUAL TO THE METHOD DETECTION LIMIT (MDL), AND THE CONCENTRATION IS AN APPROXIMATE VALUE.

\*Detection limits are stated at the highest for either influent or effluent or both are listed.

# Part III - VOLATILE ORGANICS

## III. VOLATILE ORGANICS

Analytical Test Method - EPA 624

Laboratory: TEST AMERICA

January - June 2013 Reporting Period

	Influent		Effluent	
	Date	Time	Date	Time
Sample Date/time	2/14/2013	12:41	2/14/2013	13:27
Analysis Date/time	2/19/2013	20:54	2/19/2013	20:12
Flow, MGD		6.36		6.06
Parameter	Reporting Limit* ug/l	Influent ug/l	Reporting Limit* ug/l	Effluent ug/l
<b>VOLATILES</b>				
Acrolein	20.0	N.D.	5.0	N.D.
Acrolonitrile	10.0	N.D.	2.0	N.D.
Benzene	2.5	N.D.	0.5	N.D.
Bromodichloromethane	2.5	N.D.	0.5	0.8
Bromoform	2.5	N.D.	0.5	J 0.5
Bromomethane (Methyl Bromide)	2.5	N.D.	0.5	N.D.
Carbon tetrachloride	2.5	N.D.	0.5	N.D.
Chlorobenzene	2.5	N.D.	0.5	N.D.
Chloroethane (Ethyl Chloride)	2.5	N.D.	0.5	N.D.
2-Chloroethyl vinyl ether	5.0	N.D.	1.0	N.D.
Chloroform	2.5	6.6	0.5	2.9
Chloromethane (Methyl Chloride)	2.5	N.D.	0.5	N.D.
Dibromochloromethane	2.5	N.D.	0.5	0.3J
1,2-Dichlorobenzene	2.5	N.D.	0.5	N.D.
1,3-Dichlorobenzene	2.5	N.D.	0.5	N.D.
1,4-Dichlorobenzene	2.5	N.D.	0.5	N.D.
Dichlorodifluoromethane	2.5	N.D.	0.5	N.D.
1,1-Dichloroethane	2.5	N.D.	0.5	N.D.
1,2-Dichloroethane	2.5	N.D.	0.5	N.D.
1,1-Dichloroethene	2.5	N.D.	0.5	N.D.
cis-1,2-Dichloroethene	2.5	N.D.	0.5	N.D.
trans-1,2-Dichloroethene	2.5	N.D.	0.5	N.D.
1,2-Dichloropropane	2.5	N.D.	0.5	N.D.
cis-1,3-Dichloropropene	2.5	N.D.	0.5	N.D.
trans-1,3-Dichloropropene	2.5	N.D.	0.5	N.D.
Dichlorotrifluoroethane	2.5	N.D.	0.5	N.D.
Ethylbenzene	2.5	N.D.	0.5	N.D.
Methyl tert-butyl ether (MTBE)	2.5	N.D.	0.5	0.9
Methylene Chloride	3.0	N.D.	0.5	N.D.
1,1,2,2-Tetrachloroethane	2.5	N.D.	0.5	N.D.
Tetrachloroethene (PCE)	2.5	N.D.	0.5	N.D.
Toluene	2.5	2.6	0.5	0.7
1,1,2-Trichloroethane	2.5	N.D.	0.5	N.D.
1,1,1-Trichloroethane (TCA)	2.5	N.D.	0.5	N.D.
Trichloroethene (TCE)	2.5	N.D.	0.5	N.D.
Trichlorofluoromethane (F-11)	2.5	N.D.	0.5	N.D.
Trichlorotrifluoroethane	2.5	N.D.	1.0	N.D.
Vinyl Chloride	2.5	N.D.	0.5	N.D.
Xylenes, total	2.5	N.D.	0.5	N.D.

<b>RECOVERY RATES</b>				
4-Bromofluorobenzene (SS)	85-115%	98%	85-115%	105%
Dibromofluoromethane (SS)	85-115%	106%	85-115%	105%
1,2-Dichloroethane-d4 (SS)	75-125%	102%	75-125%	102%
Toluene-d8 (SS)	90-121%	96%	90-121%	87%

N.A. MEANS NOT ANALYZED

"B" INDICATES THE ANALYTE HAS BEEN DETECTED IN THE BLANK ASSOCIATED WITH THE SAMPLE

"J" - RESULT IS LESS THAN THE REPORTING LIMIT BUT GREATER THAN OR EQUAL TO THE METHOD DETECTION LIMIT (MDL), AND THE CONCENTRATION IS AN APPROXIMATE VALUE.

\*Detection limits are stated at the highest for either influent or effluent or both are listed.

## Part IV – ORGANOCHLORINE PESTICIDES

### IV. ORGANOCHLORINE PESTICIDES

Analytical Test Method - EPA 608

Laboratory: TEST AMERICA

January - June 2013 Reporting Period

	Influent		Effluent	
	Date	Time	Date	Time
Sample Date/time	2/14/2013	12:41	2/14/2013	13:24
Analysis Date/time	2/20/2013	15:58	2/20/2013	4:43
Flow, MGD				
Parameter	Reporting Limit* ug/l	Influent ug/l	Reporting Limit* ug/l	Effluent ug/l
Aldrin	0.0054	N.D.	0.0052	N.D.
alpha-BHC	0.0054	N.D.	0.0052	N.D.
beta-BHC	0.011	N.D.	0.010	N.D.
Chlordane (technical)	0.110	N.D.	0.10	N.D.
delta - BHC	0.0054	N.D.	0.0052	N.D.
Dieldrin	0.0054	N.D.	0.0052	N.D.
Endosulfan I	0.0054	N.D.	0.0052	N.D.
Endosulfan II	0.0054	N.D.	0.0052	N.D.
Endosulfan sulfate	0.0110	N.D.	0.010	N.D.
Endrin	0.0054	N.D.	0.0052	N.D.
Endrin aldehyde	0.011	N.D.	0.010	N.D.
Endrin keytone	0.011	N.D.	0.010	N.D.
gamma-BHC (Lindane)	0.011	N.D.	0.010	N.D.
Heptachlor	0.011	N.D.	0.010	N.D.
Heptachlor epoxide	0.0054	N.D.	0.0052	N.D.
Methoxychlor	0.0054	N.D.	0.0052	N.D.
Toxaphene	0.54	N.D.	0.5200	N.D.
4,4'-DDD	0.0054	N.D.	0.0052	N.D.
4,4'-DDE	0.0054	N.D.	0.0052	N.D.
4,4'-DDT	0.011	N.D.	0.010	N.D.
Arochlor 1016	0.54	N.D.	0.52	N.D.
Arochlor 1221	0.54	N.D.	0.52	N.D.
Arochlor 1232	0.54	N.D.	0.52	N.D.
Arochlor 1242	0.54	N.D.	0.52	N.D.
Arochlor 1248	0.54	N.D.	0.52	N.D.
Arochlor 1254	0.54	N.D.	0.52	N.D.
Arochlor 1260	0.54	N.D.	0.52	N.D.

"J" - RESULT IS LESS THAN THE REPORTING LIMIT BUT GREATER THAN OR EQUAL TO THE METHOD DETECTION LIMIT (MDL), AND THE CONCENTRATION IS AN APPROXIMATE VALUE.

\*Detection limits are stated at the highest for either influent or effluent or both are listed.

## Part Va - SLUDGE TEST RESULTS

<b>SLUDGE TEST RESULTS</b>		
<b>Laboratory: Test America</b>		
<b>Analytical Test Method - EPA 625</b>		
<b>January - June 2013 Reporting Period</b>		
<b>Sample Date</b>	02/25/2013	18:00
<b>Analysis Date</b>	03/07/2013	10:12
<b>Parameter</b>	<b>Reporting Limit ug/l*</b>	<b>Results ug/l</b>
<b>BASE/NEUTRAL EXTRACTABLES</b>		
Acenaphthene	67	N.D.
Acenaphthylene	67	N.D.
Anthracene	67	N.D.
Benzidine	670	N.D.
Benzo (a) anthracene	670	N.D.
Benzo (b) fluoranthene	270	N.D.
Benzo (k) fluoranthene	670	N.D.
Benzo (a) pyrene	270	N.D.
Benzo (g,h,i) perylene	670	N.D.
Benzyl butyl phthalate	670	N.D.
Bis (2-chloroethyl) ether	67	N.D.
Bis (2-chloroethoxy) methane	67	N.D.
Bis (2-ethylhexyl) phthalate	670	N.D.
4-Bromophenyl phenyl ether	130	N.D.
2-Chloronaphthalene	67	N.D.
4-Chlorophenyl phenyl ether	67	N.D.
Chrysene	67	N.D.
Dibenzo (a,h) anthracene	67	N.D.
Di-n-butylphthalate	270	N.D.
3,3'-Dichlorobenzidine	670	N.D.
Diethyl phthalate	130	N.D.
Dimethyl phthalate	67	N.D.
2,4-Dinitrotoluene	670	N.D.
2,6-Dinitrotoluene	670	N.D.
Di-n-octylphthalate	670	83 J
Fluoranthene	67	N.D.
Fluorene	67	N.D.
Hexachlorobenzene	130	N.D.
Hexachlorobutadiene	130	N.D.
Hexachlorocyclopentadiene	670	N.D.
Hexachloroethane	130	N.D.
Indeno (1,2,3-cd) pyrene	270	N.D.
Isophorone	130	N.D.
Naphthalene	130	N.D.
Nitrobenzene	130	N.D.
N-Nitrosodiphenylamine	130	N.D.
N-Nitroso-di-n-propylamine	270	N.D.
Phenanthrene	67	N.D.
Pyrene	67	N.D.
1,2,4-Trichlorobenzene	130	N.D.
<b>RECOVERY RATES</b>		
Nitrobenzene - d5	45-120%	70%
2-Fluorobiphenyl	50-120%	41%
Terphenyl - d14	50-125%	0%
2-Fluorophenol	30-120%	62%
Phenol - d6	35-120%	65%
2,4,6 - Tribromophenol	40-120%	0%
N.A. means not analyzed		
"J" - RESULT IS LESS THAN THE REPORTING LIMIT BUT GREATER THAN OR EQUAL TO THE METHOD DETECTION LIMIT (MDL), AND THE CONCENTRATION IS AN APPROXIMATE VALUE.		
*Detection limits are stated at the highest for either influent or effluent or both are listed.		

## Part Vb - SLUDGE TEST RESULTS

<b>SLUDGE TEST RESULTS</b>		
<b>Laboratory: Test America</b>		
<b>Analytical Test Method - EPA 6020 - Metals (ICP/MS)</b>		
<b>January - June 2013 Reporting Period</b>		
<b>Sample Date</b>	02/25/13	
<b>Analysis Date</b>	03/11/13	
<b>Parameter</b>	<b>Reporting Limit ug/l*</b>	<b>Results ug/l</b>
<b>Metals</b>		
Arsenic	50	88
Cadmium	50	38 J
Chromium	100	260
Copper	100	4500 B
Lead	50	470
Nickel	100	350
Selenium	100	42 J
Silver	50	29 J
Zinc	1000	10000
<b>Analytical Test Method - EPA 7470A - Mercury (CVAA)</b>		
	<b>Reporting Limit ug/l*</b>	<b>Results mg/l</b>
Mercury	0.002	0.0088
<b>General Chemistry</b>	<b>Reporting Limit ug/l*</b>	<b>Results mg/l</b>
Cyanide	25	ND
Ammonia	250	1200
Total Solids	10	16000
<i>"J" - RESULT IS LESS THAN THE REPORTING LIMIT BUT GREATER THAN OR EQUAL TO THE METHOD DETECTION LIMIT (MDL), AND THE CONCENTRATION IS AN APPROXIMATE VALUE.</i>		
<i>"B" - RESULTS INDICATES COMPOUND WAS FOUND IN THE BLANK AND THE SAMPLE.</i>		

**SIGNIFICANT INDUSTRIAL USER COMPLIANCE REPORTS:**

**Table 1 - Metal Finisher's Discharge Table**

<p align="center"><b>QUARTERLY INDUSTRIAL USER VIOLATION REPORT</b></p> <p align="center"><b>(REPORT FOR PERIOD 01/01/2013 TO 06/30/2013)</b></p>											
<p><b>INDUSTRIAL</b></p>											
<p><b>CATEGORY:</b> METAL FINISHING SUBCATEGORY (40 CFR PART 433, SUBPART A), all units in mg/l unless otherwise specified</p>											
INDUSTRIAL USER	COMPLIANCE STATUS LIST	SAMPLE/INSPECTION DATE/VIOLATION OCCURRED	SAMPLED BY POTW/IIU OTHER	FLOW (2)	SAMPLES IN VIOLATION			Date of and Comments or Follow-up, Corrective or enforcement Action Taken			
					PARA-METER	REPORT LEVEL	DISCH. LIMIT mg/l				
NAME AND ADDRESS	1	2	3	4							
Conversion Coatings											
710 South 33rd Street Richmond, CA 94804	CC	CC	CC	CC	A						Consistent compliance for the past 6 months.
New Source											
Richmond Metal Painting 1143 Marina Way South Richmond, CA 94804	CC	IL	CC	CC	2/13/2013	POTW	A	pH probe not calibrated Digital & Continuous pH/flow recording required			NOV#109 issued on 2/13/13 requiring equipment upgrade
New Source											
Parker Hanfin Veriflo Division 250 Canal Blvd Richmond, CA 94804		CC	CC	CC	CC		A				Consistent compliance for the past 6 months
New Source											
<p><b>(1) Compliance Status Key - #1 Most Recent Quarter</b></p> <p>SF - Significant Noncompliance, Federal Limits                      SL - Significant Noncompliance, Local Limits                      IF - Insignificant Noncompliance, Federal Limits                      IL - Insignificant Noncompliance, Local Limits                      ** indicates a corrected compliance status report</p>											
<p><b>(2) Flow Key (gpd) State actual flow if known</b></p> <p>A. 0 - 9,999                      B. 10,000 - 29,000                      C. 30,000 - 49,000                      D. 50,000 - 99,000                      E. 100,000 +</p>											

## **Non-Compliance Summary (Metal Finisher's)**

### **Conversion Coatings**

*Consistent Compliance for the past six months.*

### **Richmond Metal Painting**

#### *pH meter violation*

Richmond Metal Painting was issued NOV#109 on February 13, 2013 for failure to provide the required continuous pH monitoring equipment as well as their existing pH meter being out of calibration.

A written response was received on February 19, 2013 explaining they intend to install the required equipment by April 30, 2013.

The city witnessed the project completion by May 14, 2013.

Richmond Metal Painting has been in consistent compliance for the past three months (May – June 2013).

### **Parker Hannifin (Veriflo)**

*Consistent Compliance for the past six months.*

## QUARTERLY INDUSTRIAL USER VIOLATION REPORT

(REPORT FOR PERIOD 01/01/2013 TO 06/30/2013)

INDUSTRIAL USER	COMPLIANCE STATUS LIST				SAMPLE/INSPECTION DATE/VIOLATION OCCURRED	SAMPLED BY POTW/IU OTHER	FLOW (2)	SAMPLES IN VIOLATION		DATE OF AND COMMENTS OR FOLLOW-UP, CORRECTIVE OR ENFORCEMENT ACTION TAKEN	
	1	2	3	4				PARAMETER	REPORTED LEVEL mg/l		DISCH. LIMIT mg/l
NON-CATEGORICAL, All Units in mg/L											
Burlington Northern & Santa Fe 980 Hensley Street, Building 417 Richmond, CA 94801	CC	CC	CC	CC		IU	B			Consistent Compliance for the past 6 months.	
Non-Categorical											
Bay Area Rapid Transit 1281 Visalia Avenue Richmond, CA 94801	SL*	SL*	CC	IL	1/30/2013 1/30/2013 3/26/2013	IU IU IU		Cu Zn Cu	1.5 5.4 1.0	0.65 1.0 0.65	NOV# 108 issued on 02/15/2013, maintenance performed NOV# 108 issued on 02/15/2013, maintenance performed NOV# 117 issued on 4/8/13, repaired chemical feed hoses
					4/17/2013	IU		pH	5.5	>6 <10	NOV# 118 issued on 4/25/13, adjust chemical feed set point for pH
					5/17/2013	IU		pH	5.2	>6 <10	NOV# 119 issued on 6/14/13, further adjust chemical feed set point for pH
					6/19/2013	IU		Cu	1.1	0.65	NOV# 120 issued on 7/1/13, Discharge shut down 7/18/13 Wastewater to be hauled off site until further notice.
Non-Categorical											
California Oils Corporation 1145 Harbour Way South Richmond, CA 94804	CC	IL	SL*	IL	11/1/2012	IU	D	Reporting	Failure to monitor	NA	NOV# 113 issued on 3/8/13 for failure to re-sample 3 times. Violation recorded in October 2012, IU should have sampled for 3 consecutive month. IU omitted (missed) sampling in November 2012.
Non-Categorical											
West County Wastewater District 2377 Garden Tract Road Richmond, CA 94801	SL*	SL*	SL*	SL	3/14/2013 4/10/2013	IU	D	NH3 NH3	146.46 lbs 140.62 lbs	100 lbs 100 lbs	Under a time schedule to comply (see notes) Currently being reviewed by both Districts to determine who should hold permit and responsibility for compliance (refer to Pretreatment Audit Report - December 2012).
Non-Categorical											
<b>(1) Compliance Status Key - #1 Most Recent Quarter</b>											
SF - Significant Noncompliance, Federal Limits	CC - Consistent Compliance										
SL - Significant Noncompliance, Local Limits	* - On A time Schedule (Dates)										
IF - Insignificant Noncompliance, Federal Limits	U - Unknown										
IL - Insignificant Noncompliance, Local Limits	NS - Not Scheduled to be sampled										
** indicates a corrected compliance status report											
<b>(2) Flow Key (good) State actual flow if known</b>											
	A. 0 - 9999										
	B. 10,000 - 29,000										
	C. 30,000 - 49,000										
	D. 50,000 - 99,000										
	E. 100,000 +										

## Non-Compliance Summary (Non-categorical)

### Burlington Northern Santa Fe (BNSF)

*Consistent Compliance for the past six months.*

### Bay Area Rapid Transit (BART)

#### *Violations for Copper, Zinc and pH*

BART was issued several NOV's for exceeding local limits on Copper and Zinc for the maintenance shop discharge point. Below is a chronological listing of the events from the past six months:

- The first Notice of Violation (#108) was issued on February 15, 2013 for Copper (1.5 ppm) and Zinc (5.4 ppm) violations.
- A second Notice of Violation (#117) was issued on April 8, 2013 for a Copper (1.0 ppm) violation and the investigation led to repairs of pretreatment unit's chemical feed hose system (which had failed).
- A third Notice of Violation (#118) was issued on April 25, 2013 for a pH (5.5) violation and the investigation led to the adjustment of pretreatment unit's chemical feed set point.
- A compliance meeting was held on April 30, 2013 to discuss a Compliance Plan/Schedule and a written memo was issued.
- A written response was received on May 31, 2013 detailing BART's plan to install an evaporation treatment system within six months (no later than January 2014).
- A fourth Notice of Violation (#119) was issued on June 14, 2013 for a pH (5.2) violation and the investigation led to a further adjustment of pretreatment unit's chemical feed set point.
- A fifth Notice of Violation (#120) was issued on July 1, 2013, for the Copper (1.1 ppm) violation. The investigation report is still pending.
- The city deployed composite samplers for three consecutive days (July 15 - 18, 2013) to evaluate BART's "continuous" discharge for compliance. Twenty-four hour composite samples were collected July 15 - July 16<sup>th</sup> (Day 1), July 16<sup>th</sup> - July 17<sup>th</sup> (Day 2) and July 17<sup>th</sup> - July 18<sup>th</sup> (Day 3).
- During the monitoring period on July 18, 2013, the City and BART personnel identified that the pretreatment system had failed and required significant maintenance. Based on previous samples taken at this location (colorless, low viscosity, low amount of solids), Wastewater samples appeared to be untreated (dark color, high amount of suspended solids, thick viscous liquid).

The City requested a rush on the analyses performed for the samples taken at that time. Results that were received on July 22, 2013 indicated a slug discharge violation had occurred (extremely high concentrations of metals – Cu, Pb, Zn).

**Note: Violations for the slug-discharge will be reported during the next reporting period.**

City inspectors also informed BART to cease discharge from maintenance shop the same day on July 18, 2013.

- **Until this system is in place all blow-pit wastewater “events” will be hauled off site. All wastewater “event” records will be sent to the City as they occur.**
- **A more detailed report on the findings of these results will be reported in the July-December semi-annual report.**

## **California Oils Corporation**

### ***Oil & Grease Violations – October 2012***

A Notice of Violation was issued on February 21, 2013 for the Oil and Grease violation that occurred on October 17, 2012.

California Oils Corporation (Cal Oils) discharges a waste stream containing soluble vegetable oil. The facility has been under permit since 1997 and was never regulated for Oil and Grease. The City’s revised local limit for Oil and Grease is 90 mg/L.

The facility has requested a waiver on this limit. This is based on the grounds that the oil is water-soluble and not contributing to sewer line blockages.

The City is re-evaluating the Oil and Grease limit through a consultant and requiring the facility evaluate its sampling methodology, best management practices, and pretreatment methods. After careful review of all these issues, it was determined there were several areas during the sampling procedures that were flawed that contributed to these violations. The City worked jointly with California Oils to establish written procedures for sampling consistently.

Since these procedures were put into practice, there have been no oil & grease violations.

## **West County Wastewater District (WCWD):**

### ***Ammonia Violations – March and April 2013***

The West County Wastewater District continues to violate their permit for Ammonia levels.

The City receives leachate managed by the West County Wastewater District (WCWD) from the Republic Services Landfill. WCWD contributes their secondary effluent to the EBMUD North Richmond Water Reclamation Plant adjacent to it. However, several of the leachate waste streams from the Landfill are high in dissolved solids and chloride, which would interfere with the EBMUD reclamation project. This is under the terms of a Joint Power Agreement allowing the out of district discharge to be accepted by the City of Richmond, and the controlling mechanism is an Industrial Discharge Permit issued to WCWD by the City.

Both the City and the West County Wastewater District are meeting to determine the legal aspects of the permitting process regarding the West County Landfill. This is based on the findings of the December 2012 Pretreatment Compliance Audit. The City has hired Larry Walker and Associates to assist with this issue and should have this permitting issue resolved no later than December 31 2013.

## Compliance with Pretreatment Program Requirements

### Date of Last PCA or PCI Report

The date of the last PCA was December 3 – 5, 2012. The report on the results of the PCA was received on April 2, 2013.

The date of the last PCI was December 14, 2010. The report on the results of the PCI was received on April 8, 2011.

### Date of Response to PCA or PCI Report

A response was provided for the PCA on April 2, 2013.

A response was provided for the PCI on May 23, 2011.

### Unresolved (Required) Issues from PCI

The following issues were required/recommended items from the City's last Pretreatment Compliance Inspection (dated 12/14/2011):

#### Required Action - Staffing

City staff indicated that in the past few years the pretreatment program has lacked the staffing needed to complete annual SIU inspections. The regulations at 40 CFR 403.8(f) (3) require that the POTW have qualified personnel and sufficient resources to carry out the authorities and procedures necessary for implementing its pretreatment program. Therefore the City is required to ensure that it has sufficient qualified staff to implement the pretreatment program.

#### Current Staffing for the City's Pretreatment Program (Source Control):

The City has filled all existing vacant Source Control Inspector positions. These positions are:

- 2 – Source Control Inspector I
- 1 – Source Control Inspector III
- 1 – General Manager (Richmond Municipal Sewer District)

Mr. Chad Davisson (who left the City in August 2012) opted to return to the City as General Manager of the Richmond Municipal Sewer District in March 2013. This position also acts as the Manager of the Source Control Program for Wastewater.

**All other *requirements listed* in the PCI Report have been resolved and/or completed.**

### Unresolved (Recommended) Issues from PCI

- During the inspection, City staff indicated that SIUs are now encouraged to electronically submit SMRs to the City as PDF files, in accordance with paperless administration principles. It is strongly recommended that the City either collect hard-copy reports from all its SIUs or notify EPA's Office of Environmental Information that the City is receiving electronic reports and to follow up with all applicable standards and requirements related to receiving such reports.

## Plan(s) and Schedule for Resolving the Recommended Issues

- The City is still working with a consultant to determine the requirements to comply with Cross-Media Electronic Reporting Regulation (CROMERR). In the meantime, all SIUs are submitting hard copies of self-monitoring reports until the City is compliant with the EPA's requirements regarding electronic report submittal.

**All other recommendations listed in the PCI have been resolved and/or completed.**

## Required Issues and Proposed Implementation Schedule from PCA

The following issues were required/recommended items from the City's last Pretreatment Compliance Audit (dated December 3 – 4, 2012):

Action Item	Proposed Schedule
<b>Update Sewer Use Ordinance</b> <ul style="list-style-type: none"> <li>- Include definitions for indirect discharge and discharge</li> <li>- Provide legal authority for Enforcement Response Plan implementation</li> <li>- Update non-transferability language</li> </ul>	September 15, 2013
<b>Update Enforcement Response Plan</b> <ul style="list-style-type: none"> <li>- Update significant non-compliance definition</li> </ul>	September 15, 2013
<b>Determine Appropriate Permitting Mechanism for West County Landfill</b>	December 31, 2013
<b>Review and Update Industrial User Permits</b> <ul style="list-style-type: none"> <li>- Correct categorical standards and local limits applied</li> <li>- Clarify monitoring requirements and frequencies or implement monitoring waivers</li> <li>- Require zero-discharge statement for zero-discharge industrial users</li> <li>- Non-transferability language</li> <li>- Include 30-day reporting requirement for re-samples for violations</li> <li>- Correct typographical errors</li> </ul>	September 1, 2013
<b>Review Sampling and Analysis Procedures with Industrial Users</b> <ul style="list-style-type: none"> <li>- Use of appropriate analytical methods</li> <li>- Adequate calibration of field meters</li> <li>- Representative sampling of discharge</li> <li>- Proper documentation of sampling in chain-of-custody forms</li> </ul>	Completed* *Veriflo requires until December 31, 2013 to procure sampling equipment
<b>Evaluate Need for Slug Discharge Control Plans</b> <ul style="list-style-type: none"> <li>- Require industrial users to submit slug discharge control plans if necessary</li> <li>- Ensure slug discharge control plans meet 40 CFR 403.8(f)(2)(vi)</li> </ul>	September 1, 2013
<b>Implement Enforcement Response Plan</b>	Completed and on-going

## **Influent, Effluent and Biosolids Attachments**

**Attachment A: Influent and Effluent Lab Results for Semi-volatile Organics, Organochlorine Pesticides, Ammonia and Cyanide**

# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.  
TestAmerica Irvine  
17461 Derian Ave  
Suite 100  
Irvine, CA 92614-5817  
Tel: (949)261-1022

TestAmerica Job ID: 440-38480-1  
Client Project/Site: SemiAnnual

For:  
Veolia Water N. America Operating Svcs  
601 Canal Blvd.  
Richmond, California 94804

Attn: Jean McMahon



---

*Authorized for release by:  
3/5/2013 9:34:21 PM*

Janice Hsu  
Project Manager I  
janice.hsu@testamericainc.com

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

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8

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11

12



# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Sample Summary . . . . .	3
Case Narrative . . . . .	4
Client Sample Results . . . . .	5
Chronicle . . . . .	14
QC Sample Results . . . . .	16
QC Association . . . . .	29
Definitions . . . . .	32
Certification Summary . . . . .	33
Chain of Custody . . . . .	34
Receipt Checklists . . . . .	36

# Sample Summary

Client: Veolia Water N. America Operating Srvs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

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Lab Sample ID	Client Sample ID	Matrix	Collected	Received
440-38480-1	E-001-DC	Water	02/14/13 15:09	02/16/13 10:00
440-38480-2	E-001-D2	Water	02/14/13 13:27	02/16/13 10:00
440-38480-3	A-002	Water	02/14/13 12:41	02/16/13 10:00

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# Case Narrative

Client: Veolia Water N. America Operating Srvs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Job ID: 440-38480-1**

**Laboratory: TestAmerica Irvine**

## Narrative

### Job Narrative 440-38480-1

#### Comments

No additional comments.

#### Receipt

The samples were received on 2/16/2013 10:00 AM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 4.7° C.

#### GC/MS Semi VOA

Method(s) 625: Insufficient sample volume was available to perform batch matrix spike/matrix spike duplicate (MS/MSD) associated with batch 87046. The laboratory control sample (LCS) was performed in duplicate to provide precision data for this batch.

Method(s) 625: The laboratory control sample (LCS) and / or the laboratory control sample duplicate (LCSD) for batch 87046 exceeded control limits for the following analytes: benzidine. Per the EPA method, benzidine is known to be subject to oxidative losses during solvent concentration.

Method(s) 625: The following sample(s) required a dilution due to the nature of the sample matrix: A-002 (440-38480-3). Because of this dilution, the surrogate spike concentration in the sample was reduced to a level where the recovery calculation does not provide useful information.

No other analytical or quality issues were noted.

#### GC Semi VOA

Method(s) 608: The following sample(s) required a copper clean-up to reduce matrix interferences caused by sulfur: (LCS 440-86646/5-A), (MB 440-86646/1-A), CW17A\_0215130915 (440-38299-1), CW17A\_0215130915 (440-38299-1 MS), CW17A\_0215130915 (440-38299-1 MSD).

Method(s) 608: The continuing calibration verification (CCV) associated with batch 87071 recovered outside acceptance criteria, low biased for Methoxychlor. A reporting limit (RL) standard was analyzed, and the target analyte was detected. Since the associated samples were non-detect for this analyte, the data have been reported. (CCV 440-87071/30), A-002 (440-38480-3)

No other analytical or quality issues were noted.

#### Metals

Method(s) 200.8: The following sample(s) was diluted due to the nature of the sample matrix: A-002 (440-38480-3), E-001-D2 (440-38480-2). Elevated reporting limits (RLs) are provided.

No other analytical or quality issues were noted.

#### General Chemistry

No analytical or quality issues were noted.

#### Organic Prep

Method(s) 625: Elevated reporting limits are provided for the following sample(s) due to insufficient sample provided for preparation: A-002 (440-38480-3), E-001-DC (440-38480-1)

Batch 87046  
Method 3520C/8270\_LL

No other analytical or quality issues were noted.

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: E-001-DC**

**Lab Sample ID: 440-38480-1**

**Date Collected: 02/14/13 15:09**

**Matrix: Water**

**Date Received: 02/16/13 10:00**

**Method: 625 - Semivolatile Organic Compounds (GC/MS)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	ND		1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
1,2-Diphenylhydrazine(as Azobenzene)	ND		1.3	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
1,2-Dichlorobenzene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
1,3-Dichlorobenzene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
1,4-Dichlorobenzene	ND		0.66	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
2,4,5-Trichlorophenol	ND		2.6	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
2,4,6-Trichlorophenol	ND		1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
2,4-Dichlorophenol	ND		2.6	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
2,4-Dimethylphenol	ND		2.6	0.40	ug/L		02/21/13 19:05	02/25/13 21:27	1
2,4-Dinitrophenol	ND		6.6	1.2	ug/L		02/21/13 19:05	02/25/13 21:27	1
2,4-Dinitrotoluene	ND		6.6	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
2,6-Dinitrotoluene	ND		6.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
2-Chloronaphthalene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
2-Chlorophenol	ND		1.3	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
2-Methylnaphthalene	ND		1.3	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
2-Methylphenol	ND		2.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
2-Nitroaniline	ND		6.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
2-Nitrophenol	ND		2.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
3,3'-Dichlorobenzidine	ND		6.6	0.66	ug/L		02/21/13 19:05	02/25/13 21:27	1
3-Nitroaniline	ND		6.6	1.3	ug/L		02/21/13 19:05	02/25/13 21:27	1
4,6-Dinitro-2-methylphenol	ND		6.6	0.40	ug/L		02/21/13 19:05	02/25/13 21:27	1
4-Bromophenyl phenyl ether	ND		1.3	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
4-Chloro-3-methylphenol	ND		1.3	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
4-Chlorophenyl phenyl ether	ND		0.66	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
4-Nitroaniline	ND		6.6	0.66	ug/L		02/21/13 19:05	02/25/13 21:27	1
4-Nitrophenol	ND		6.6	3.3	ug/L		02/21/13 19:05	03/01/13 05:01	1
Acenaphthene	ND		0.66	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
Acenaphthylene	ND		0.66	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
Aniline	ND		13	0.40	ug/L		02/21/13 19:05	02/25/13 21:27	1
Anthracene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzidine	ND *		6.6	1.3	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzo[a]anthracene	ND		6.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzo[a]pyrene	ND		2.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzo[b]fluoranthene	ND		2.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzo[g,h,i]perylene	ND		6.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzo[k]fluoranthene	ND		0.66	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzoic acid	ND		26	4.0	ug/L		02/21/13 19:05	02/25/13 21:27	1
Benzyl alcohol	ND		6.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Bis(2-chloroethoxy)methane	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Bis(2-chloroethyl)ether	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
bis (2-chloroisopropyl) ether	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Bis(2-ethylhexyl) phthalate	ND		6.6	2.3	ug/L		02/21/13 19:05	02/25/13 21:27	1
Butyl benzyl phthalate	ND		6.6	0.93	ug/L		02/21/13 19:05	02/25/13 21:27	1
Chrysene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Di-n-butyl phthalate	ND		2.6	0.40	ug/L		02/21/13 19:05	02/25/13 21:27	1
Di-n-octyl phthalate	ND		6.6	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
Dibenz(a,h)anthracene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Dibenzofuran	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: E-001-DC**

**Lab Sample ID: 440-38480-1**

Date Collected: 02/14/13 15:09

Matrix: Water

Date Received: 02/16/13 10:00

**Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diethyl phthalate	0.34	J	1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Dimethyl phthalate	ND		0.66	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
Fluoranthene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Fluorene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Hexachlorobenzene	ND		1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Hexachlorobutadiene	ND		1.3	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
Hexachlorocyclopentadiene	ND		6.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Hexachloroethane	ND		1.3	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
Indeno[1,2,3-cd]pyrene	ND		2.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Isophorone	ND		1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
N-Nitrosodi-n-propylamine	ND		2.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
N-Nitrosodiphenylamine	ND		1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Naphthalene	ND		1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Nitrobenzene	ND		1.3	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Pentachlorophenol	ND		2.6	0.53	ug/L		02/21/13 19:05	02/25/13 21:27	1
Phenol	ND		1.3	0.40	ug/L		02/21/13 19:05	02/25/13 21:27	1
Phenanthrene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
Pyrene	ND		0.66	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1
3-Methylphenol + 4-Methylphenol	ND		6.6	0.26	ug/L		02/21/13 19:05	02/25/13 21:27	1
4-Chloroaniline	ND		2.6	0.40	ug/L		02/21/13 19:05	03/01/13 05:01	1
N-Nitrosodimethylamine	ND		2.6	0.13	ug/L		02/21/13 19:05	02/25/13 21:27	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
2,4,6-Tribromophenol	95		40 - 120	02/21/13 19:05	02/25/13 21:27	1
2,4,6-Tribromophenol	96		40 - 120	02/21/13 19:05	03/01/13 05:01	1
2-Fluorobiphenyl	72		50 - 120	02/21/13 19:05	02/25/13 21:27	1
2-Fluorobiphenyl	78		50 - 120	02/21/13 19:05	03/01/13 05:01	1
2-Fluorophenol	66		30 - 120	02/21/13 19:05	02/25/13 21:27	1
2-Fluorophenol	74		30 - 120	02/21/13 19:05	03/01/13 05:01	1
Nitrobenzene-d5	75		45 - 120	02/21/13 19:05	02/25/13 21:27	1
Nitrobenzene-d5	75		45 - 120	02/21/13 19:05	03/01/13 05:01	1
Phenol-d6	67		35 - 120	02/21/13 19:05	02/25/13 21:27	1
Phenol-d6	78		35 - 120	02/21/13 19:05	03/01/13 05:01	1
Terphenyl-d14	62		50 - 125	02/21/13 19:05	02/25/13 21:27	1
Terphenyl-d14	67		50 - 125	02/21/13 19:05	03/01/13 05:01	1

**Method: 608 - Organochlorine Pesticides in Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aldrin	ND		0.0053	0.0016	ug/L		02/20/13 15:58	02/22/13 04:14	1
alpha-BHC	ND		0.0053	0.0027	ug/L		02/20/13 15:58	02/22/13 04:14	1
beta-BHC	ND		0.011	0.0043	ug/L		02/20/13 15:58	02/22/13 04:14	1
Chlordane (technical)	ND		0.11	0.085	ug/L		02/20/13 15:58	02/22/13 04:14	1
delta-BHC	ND		0.0053	0.0037	ug/L		02/20/13 15:58	02/22/13 04:14	1
Dieldrin	ND		0.0053	0.0021	ug/L		02/20/13 15:58	02/22/13 04:14	1
Endosulfan I	ND		0.0053	0.0032	ug/L		02/20/13 15:58	02/22/13 04:14	1
Endosulfan II	ND		0.0053	0.0021	ug/L		02/20/13 15:58	02/22/13 04:14	1
Endosulfan sulfate	ND		0.011	0.0032	ug/L		02/20/13 15:58	02/22/13 04:14	1
Endrin	ND		0.0053	0.0021	ug/L		02/20/13 15:58	02/22/13 04:14	1
Endrin aldehyde	ND		0.011	0.0021	ug/L		02/20/13 15:58	02/22/13 04:14	1
Endrin ketone	ND		0.011	0.0074	ug/L		02/20/13 15:58	02/22/13 04:14	1

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: E-001-DC**

**Lab Sample ID: 440-38480-1**

Date Collected: 02/14/13 15:09

Matrix: Water

Date Received: 02/16/13 10:00

**Method: 608 - Organochlorine Pesticides in Water (Continued)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
gamma-BHC (Lindane)	ND		0.011	0.0032	ug/L		02/20/13 15:58	02/22/13 04:14	1
Heptachlor	ND		0.011	0.0032	ug/L		02/20/13 15:58	02/22/13 04:14	1
Heptachlor epoxide	ND		0.0053	0.0027	ug/L		02/20/13 15:58	02/22/13 04:14	1
Methoxychlor	ND		0.0053	0.0037	ug/L		02/20/13 15:58	02/22/13 04:14	1
Toxaphene	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 04:14	1
4,4'-DDD	ND		0.0053	0.0043	ug/L		02/20/13 15:58	02/22/13 04:14	1
4,4'-DDE	ND		0.0053	0.0032	ug/L		02/20/13 15:58	02/22/13 04:14	1
4,4'-DDT	ND		0.011	0.0043	ug/L		02/20/13 15:58	02/22/13 04:14	1
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
Tetrachloro-m-xylene	62		35 - 115				02/20/13 15:58	02/22/13 04:14	1

**Method: 608 - Polychlorinated Biphenyls (PCBs) (GC)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aroclor 1016	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 18:28	1
Aroclor 1221	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 18:28	1
Aroclor 1232	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 18:28	1
Aroclor 1242	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 18:28	1
Aroclor 1248	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 18:28	1
Aroclor 1254	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 18:28	1
Aroclor 1260	ND		0.53	0.27	ug/L		02/20/13 15:58	02/22/13 18:28	1
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
DCB Decachlorobiphenyl (Surr)	101		45 - 120				02/20/13 15:58	02/22/13 18:28	1

**Method: 200.8 - Metals (ICP/MS) - Total Recoverable**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	2.3		1.0	0.90	ug/L		02/21/13 08:44	02/21/13 20:10	1
Cadmium	ND		1.0	0.10	ug/L		02/21/13 08:44	02/21/13 20:10	1
Chromium	ND		1.0	0.90	ug/L		02/21/13 08:44	02/21/13 20:10	1
Copper	4.1		1.0	0.50	ug/L		02/21/13 08:44	02/21/13 20:10	1
Lead	0.26	J	1.0	0.20	ug/L		02/21/13 08:44	02/21/13 20:10	1
Nickel	2.6		1.0	0.50	ug/L		02/21/13 08:44	02/21/13 20:10	1
Silver	ND		1.0	0.10	ug/L		02/21/13 08:44	02/21/13 20:10	1
Zinc	21		5.0	4.0	ug/L		02/21/13 08:44	02/21/13 20:10	1

**General Chemistry**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.0050	0.0030	mg/L		02/20/13 16:43	02/20/13 22:49	1
<b>Analyte</b>	<b>Result</b>	<b>Qualifier</b>	<b>RL</b>	<b>RL</b>	<b>Unit</b>	<b>D</b>	<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
Total Solids	2500		10	10	mg/L			02/21/13 13:49	1

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: E-001-D2**

**Lab Sample ID: 440-38480-2**

**Date Collected: 02/14/13 13:27**

**Matrix: Water**

**Date Received: 02/16/13 10:00**

**Method: 625 - Semivolatile Organic Compounds (GC/MS)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
1,2-Diphenylhydrazine(as Azobenzene)	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
1,2-Dichlorobenzene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
1,3-Dichlorobenzene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
1,4-Dichlorobenzene	ND		0.51	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
2,4,5-Trichlorophenol	ND		2.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
2,4,6-Trichlorophenol	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
2,4-Dichlorophenol	ND		2.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
<b>2,4-Dimethylphenol</b>	<b>0.31</b>	<b>J</b>	2.0	0.30	ug/L		02/21/13 19:05	02/25/13 21:54	1
2,4-Dinitrophenol	ND		5.1	0.91	ug/L		02/21/13 19:05	02/25/13 21:54	1
2,4-Dinitrotoluene	ND		5.1	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
2,6-Dinitrotoluene	ND		5.1	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
2-Chloronaphthalene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
2-Chlorophenol	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
2-Methylnaphthalene	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
2-Methylphenol	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
2-Nitroaniline	ND		5.1	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
2-Nitrophenol	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
3,3'-Dichlorobenzidine	ND		5.1	0.51	ug/L		02/21/13 19:05	02/25/13 21:54	1
3-Nitroaniline	ND		5.1	1.0	ug/L		02/21/13 19:05	02/25/13 21:54	1
4,6-Dinitro-2-methylphenol	ND		5.1	0.30	ug/L		02/21/13 19:05	02/25/13 21:54	1
4-Bromophenyl phenyl ether	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
4-Chloro-3-methylphenol	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
4-Chlorophenyl phenyl ether	ND		0.51	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
4-Nitroaniline	ND		5.1	0.51	ug/L		02/21/13 19:05	02/25/13 21:54	1
4-Nitrophenol	ND		5.1	2.5	ug/L		02/21/13 19:05	03/01/13 05:28	1
Acenaphthene	ND		0.51	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
Acenaphthylene	ND		0.51	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
Aniline	ND		10	0.30	ug/L		02/21/13 19:05	02/25/13 21:54	1
Anthracene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzidine	ND *		5.1	1.0	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzo[a]anthracene	ND		5.1	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzo[a]pyrene	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzo[b]fluoranthene	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzo[g,h,i]perylene	ND		5.1	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzo[k]fluoranthene	ND		0.51	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzoic acid	ND		20	3.0	ug/L		02/21/13 19:05	02/25/13 21:54	1
Benzyl alcohol	ND		5.1	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Bis(2-chloroethoxy)methane	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Bis(2-chloroethyl)ether	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
bis (2-chloroisopropyl) ether	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Bis(2-ethylhexyl) phthalate	ND		5.1	1.7	ug/L		02/21/13 19:05	02/25/13 21:54	1
<b>Butyl benzyl phthalate</b>	<b>4.7</b>	<b>J</b>	5.1	0.71	ug/L		02/21/13 19:05	02/25/13 21:54	1
Chrysene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Di-n-butyl phthalate	ND		2.0	0.30	ug/L		02/21/13 19:05	02/25/13 21:54	1
<b>Di-n-octyl phthalate</b>	<b>0.65</b>	<b>J</b>	5.1	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
Dibenz(a,h)anthracene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Dibenzofuran	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: E-001-D2**

**Lab Sample ID: 440-38480-2**

Date Collected: 02/14/13 13:27

Matrix: Water

Date Received: 02/16/13 10:00

**Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diethyl phthalate	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Dimethyl phthalate	ND		0.51	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
Fluoranthene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Fluorene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Hexachlorobenzene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Hexachlorobutadiene	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
Hexachlorocyclopentadiene	ND		5.1	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Hexachloroethane	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
Indeno[1,2,3-cd]pyrene	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Isophorone	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
N-Nitrosodi-n-propylamine	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
N-Nitrosodiphenylamine	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Naphthalene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Nitrobenzene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Pentachlorophenol	ND		2.0	0.40	ug/L		02/21/13 19:05	02/25/13 21:54	1
Phenol	ND		1.0	0.30	ug/L		02/21/13 19:05	02/25/13 21:54	1
Phenanthrene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
Pyrene	ND		0.51	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1
3-Methylphenol + 4-Methylphenol	ND		5.1	0.20	ug/L		02/21/13 19:05	02/25/13 21:54	1
4-Chloroaniline	ND		2.0	0.30	ug/L		02/21/13 19:05	03/01/13 05:28	1
N-Nitrosodimethylamine	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 21:54	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
2,4,6-Tribromophenol	106		40 - 120	02/21/13 19:05	02/25/13 21:54	1
2,4,6-Tribromophenol	105		40 - 120	02/21/13 19:05	03/01/13 05:28	1
2-Fluorobiphenyl	75		50 - 120	02/21/13 19:05	02/25/13 21:54	1
2-Fluorobiphenyl	82		50 - 120	02/21/13 19:05	03/01/13 05:28	1
2-Fluorophenol	71		30 - 120	02/21/13 19:05	02/25/13 21:54	1
2-Fluorophenol	73		30 - 120	02/21/13 19:05	03/01/13 05:28	1
Nitrobenzene-d5	80		45 - 120	02/21/13 19:05	02/25/13 21:54	1
Nitrobenzene-d5	80		45 - 120	02/21/13 19:05	03/01/13 05:28	1
Phenol-d6	67		35 - 120	02/21/13 19:05	02/25/13 21:54	1
Phenol-d6	76		35 - 120	02/21/13 19:05	03/01/13 05:28	1
Terphenyl-d14	85		50 - 125	02/21/13 19:05	02/25/13 21:54	1
Terphenyl-d14	95		50 - 125	02/21/13 19:05	03/01/13 05:28	1

**Method: 608 - Organochlorine Pesticides in Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aldrin	ND		0.0052	0.0016	ug/L		02/20/13 15:58	02/22/13 04:43	1
alpha-BHC	ND		0.0052	0.0026	ug/L		02/20/13 15:58	02/22/13 04:43	1
beta-BHC	ND		0.010	0.0042	ug/L		02/20/13 15:58	02/22/13 04:43	1
Chlordane (technical)	ND		0.10	0.083	ug/L		02/20/13 15:58	02/22/13 04:43	1
delta-BHC	ND		0.0052	0.0036	ug/L		02/20/13 15:58	02/22/13 04:43	1
Dieldrin	ND		0.0052	0.0021	ug/L		02/20/13 15:58	02/22/13 04:43	1
Endosulfan I	ND		0.0052	0.0031	ug/L		02/20/13 15:58	02/22/13 04:43	1
Endosulfan II	ND		0.0052	0.0021	ug/L		02/20/13 15:58	02/22/13 04:43	1
Endosulfan sulfate	ND		0.010	0.0031	ug/L		02/20/13 15:58	02/22/13 04:43	1
Endrin	ND		0.0052	0.0021	ug/L		02/20/13 15:58	02/22/13 04:43	1
Endrin aldehyde	ND		0.010	0.0021	ug/L		02/20/13 15:58	02/22/13 04:43	1
Endrin ketone	ND		0.010	0.0073	ug/L		02/20/13 15:58	02/22/13 04:43	1

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: E-001-D2**

**Lab Sample ID: 440-38480-2**

Date Collected: 02/14/13 13:27

Matrix: Water

Date Received: 02/16/13 10:00

### Method: 608 - Organochlorine Pesticides in Water (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
gamma-BHC (Lindane)	ND		0.010	0.0031	ug/L		02/20/13 15:58	02/22/13 04:43	1
Heptachlor	ND		0.010	0.0031	ug/L		02/20/13 15:58	02/22/13 04:43	1
Heptachlor epoxide	ND		0.0052	0.0026	ug/L		02/20/13 15:58	02/22/13 04:43	1
Methoxychlor	ND		0.0052	0.0036	ug/L		02/20/13 15:58	02/22/13 04:43	1
Toxaphene	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 04:43	1
4,4'-DDD	ND		0.0052	0.0042	ug/L		02/20/13 15:58	02/22/13 04:43	1
4,4'-DDE	ND		0.0052	0.0031	ug/L		02/20/13 15:58	02/22/13 04:43	1
4,4'-DDT	ND		0.010	0.0042	ug/L		02/20/13 15:58	02/22/13 04:43	1
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
Tetrachloro-m-xylene	60		35 - 115				02/20/13 15:58	02/22/13 04:43	1

### Method: 608 - Polychlorinated Biphenyls (PCBs) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aroclor 1016	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 18:43	1
Aroclor 1221	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 18:43	1
Aroclor 1232	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 18:43	1
Aroclor 1242	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 18:43	1
Aroclor 1248	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 18:43	1
Aroclor 1254	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 18:43	1
Aroclor 1260	ND		0.52	0.26	ug/L		02/20/13 15:58	02/22/13 18:43	1
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
DCB Decachlorobiphenyl (Surr)	93		45 - 120				02/20/13 15:58	02/22/13 18:43	1

### Method: 200.8 - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
<b>Arsenic</b>	<b>2.1</b>		2.0	1.8	ug/L		02/21/13 08:44	02/21/13 20:14	2
Cadmium	ND		2.0	0.20	ug/L		02/21/13 08:44	02/21/13 20:14	2
Chromium	ND		2.0	1.8	ug/L		02/21/13 08:44	02/21/13 20:14	2
<b>Copper</b>	<b>2.7</b>		2.0	1.0	ug/L		02/21/13 08:44	02/21/13 20:14	2
Lead	ND		2.0	0.40	ug/L		02/21/13 08:44	02/21/13 20:14	2
<b>Nickel</b>	<b>2.5</b>		2.0	1.0	ug/L		02/21/13 08:44	02/21/13 20:14	2
Silver	ND		2.0	0.20	ug/L		02/21/13 08:44	02/21/13 20:14	2
<b>Zinc</b>	<b>16</b>		10	8.0	ug/L		02/21/13 08:44	02/21/13 20:14	2

### General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.0050	0.0030	mg/L		02/20/13 16:43	02/20/13 22:49	1
<b>Ammonia (as N)</b>	<b>26</b>		25	5.0	mg/L			02/19/13 14:48	50
<b>Analyte</b>	<b>Result</b>	<b>Qualifier</b>	<b>RL</b>	<b>RL</b>	<b>Unit</b>	<b>D</b>	<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
<b>Total Solids</b>	<b>2800</b>		10	10	mg/L			02/21/13 13:49	1

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: A-002**

**Lab Sample ID: 440-38480-3**

**Date Collected: 02/14/13 12:41**

**Matrix: Water**

**Date Received: 02/16/13 10:00**

**Method: 625 - Semivolatile Organic Compounds (GC/MS)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	ND		11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
1,2-Diphenylhydrazine(as Azobenzene)	ND		11	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
1,2-Dichlorobenzene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
1,3-Dichlorobenzene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
1,4-Dichlorobenzene	ND		5.7	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
2,4,5-Trichlorophenol	ND		23	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
2,4,6-Trichlorophenol	ND		11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
2,4-Dichlorophenol	ND		23	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
2,4-Dimethylphenol	ND		23	3.4	ug/L		02/21/13 19:05	02/25/13 22:22	10
2,4-Dinitrophenol	ND		57	10	ug/L		02/21/13 19:05	02/25/13 22:22	10
2,4-Dinitrotoluene	ND		57	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
2,6-Dinitrotoluene	ND		57	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
2-Chloronaphthalene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
2-Chlorophenol	ND		11	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
2-Methylnaphthalene	ND		11	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
<b>2-Methylphenol</b>	<b>4.9</b>	<b>J</b>	23	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
2-Nitroaniline	ND		57	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
2-Nitrophenol	ND		23	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
3,3'-Dichlorobenzidine	ND		57	5.7	ug/L		02/21/13 19:05	02/25/13 22:22	10
3-Nitroaniline	ND		57	11	ug/L		02/21/13 19:05	02/25/13 22:22	10
4,6-Dinitro-2-methylphenol	ND		57	3.4	ug/L		02/21/13 19:05	02/25/13 22:22	10
4-Bromophenyl phenyl ether	ND		11	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
4-Chloro-3-methylphenol	ND		11	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
4-Chlorophenyl phenyl ether	ND		5.7	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
4-Nitroaniline	ND		57	5.7	ug/L		02/21/13 19:05	02/25/13 22:22	10
4-Nitrophenol	ND		110	57	ug/L		02/21/13 19:05	03/01/13 05:56	20
Acenaphthene	ND		5.7	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
Acenaphthylene	ND		5.7	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
Aniline	ND		110	3.4	ug/L		02/21/13 19:05	02/25/13 22:22	10
Anthracene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Benzidine	ND *		57	11	ug/L		02/21/13 19:05	02/25/13 22:22	10
Benzo[a]anthracene	ND		57	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Benzo[a]pyrene	ND		23	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Benzo[b]fluoranthene	ND		23	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Benzo[g,h,i]perylene	ND		57	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Benzo[k]fluoranthene	ND		5.7	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
<b>Benzoic acid</b>	<b>490</b>		450	68	ug/L		02/21/13 19:05	03/01/13 05:56	20
<b>Benzyl alcohol</b>	<b>23</b>	<b>J</b>	57	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Bis(2-chloroethoxy)methane	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Bis(2-chloroethyl)ether	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
bis (2-chloroisopropyl) ether	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Bis(2-ethylhexyl) phthalate	ND		57	19	ug/L		02/21/13 19:05	02/25/13 22:22	10
Butyl benzyl phthalate	ND		57	8.0	ug/L		02/21/13 19:05	02/25/13 22:22	10
Chrysene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Di-n-butyl phthalate	ND		23	3.4	ug/L		02/21/13 19:05	02/25/13 22:22	10
Di-n-octyl phthalate	ND		57	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
Dibenz(a,h)anthracene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Dibenzofuran	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: A-002**

**Lab Sample ID: 440-38480-3**

Date Collected: 02/14/13 12:41

Matrix: Water

Date Received: 02/16/13 10:00

**Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
<b>Diethyl phthalate</b>	<b>7.5</b>	<b>J</b>	11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Dimethyl phthalate	ND		5.7	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
Fluoranthene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Fluorene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Hexachlorobenzene	ND		11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Hexachlorobutadiene	ND		11	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
Hexachlorocyclopentadiene	ND		57	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Hexachloroethane	ND		11	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
Indeno[1,2,3-cd]pyrene	ND		23	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Isophorone	ND		11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
N-Nitrosodi-n-propylamine	ND		23	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
N-Nitrosodiphenylamine	ND		11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Naphthalene	ND		11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Nitrobenzene	ND		11	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Pentachlorophenol	ND		23	4.5	ug/L		02/21/13 19:05	02/25/13 22:22	10
<b>Phenol</b>	<b>53</b>		11	3.4	ug/L		02/21/13 19:05	02/25/13 22:22	10
Phenanthrene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
Pyrene	ND		5.7	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10
<b>3-Methylphenol + 4-Methylphenol</b>	<b>85</b>		57	2.3	ug/L		02/21/13 19:05	02/25/13 22:22	10
4-Chloroaniline	ND		45	6.8	ug/L		02/21/13 19:05	03/01/13 05:56	20
N-Nitrosodimethylamine	ND		23	1.1	ug/L		02/21/13 19:05	02/25/13 22:22	10

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
2,4,6-Tribromophenol	82		40 - 120	02/21/13 19:05	02/25/13 22:22	10
2,4,6-Tribromophenol	80		40 - 120	02/21/13 19:05	03/01/13 05:56	20
2-Fluorobiphenyl	45	X	50 - 120	02/21/13 19:05	02/25/13 22:22	10
2-Fluorobiphenyl	52		50 - 120	02/21/13 19:05	03/01/13 05:56	20
2-Fluorophenol	77		30 - 120	02/21/13 19:05	02/25/13 22:22	10
2-Fluorophenol	72		30 - 120	02/21/13 19:05	03/01/13 05:56	20
Nitrobenzene-d5	86		45 - 120	02/21/13 19:05	02/25/13 22:22	10
Nitrobenzene-d5	86		45 - 120	02/21/13 19:05	03/01/13 05:56	20
Phenol-d6	76		35 - 120	02/21/13 19:05	02/25/13 22:22	10
Phenol-d6	86		35 - 120	02/21/13 19:05	03/01/13 05:56	20
Terphenyl-d14	32	X	50 - 125	02/21/13 19:05	02/25/13 22:22	10
Terphenyl-d14	31	X	50 - 125	02/21/13 19:05	03/01/13 05:56	20

**Method: 608 - Organochlorine Pesticides in Water**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aldrin	ND		0.0054	0.0016	ug/L		02/20/13 15:58	02/22/13 08:28	1
alpha-BHC	ND		0.0054	0.0027	ug/L		02/20/13 15:58	02/22/13 08:28	1
beta-BHC	ND		0.011	0.0043	ug/L		02/20/13 15:58	02/22/13 08:28	1
Chlordane (technical)	ND		0.11	0.086	ug/L		02/20/13 15:58	02/22/13 08:28	1
delta-BHC	ND		0.0054	0.0038	ug/L		02/20/13 15:58	02/22/13 08:28	1
Dieldrin	ND		0.0054	0.0022	ug/L		02/20/13 15:58	02/22/13 08:28	1
Endosulfan I	ND		0.0054	0.0032	ug/L		02/20/13 15:58	02/22/13 08:28	1
Endosulfan II	ND		0.0054	0.0022	ug/L		02/20/13 15:58	02/22/13 08:28	1
Endosulfan sulfate	ND		0.011	0.0032	ug/L		02/20/13 15:58	02/22/13 08:28	1
Endrin	ND		0.0054	0.0022	ug/L		02/20/13 15:58	02/22/13 08:28	1
Endrin aldehyde	ND		0.011	0.0022	ug/L		02/20/13 15:58	02/22/13 08:28	1
Endrin ketone	ND		0.011	0.0075	ug/L		02/20/13 15:58	02/22/13 08:28	1

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: A-002**

**Lab Sample ID: 440-38480-3**

Date Collected: 02/14/13 12:41

Matrix: Water

Date Received: 02/16/13 10:00

**Method: 608 - Organochlorine Pesticides in Water (Continued)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
gamma-BHC (Lindane)	ND		0.011	0.0032	ug/L		02/20/13 15:58	02/22/13 08:28	1
Heptachlor	ND		0.011	0.0032	ug/L		02/20/13 15:58	02/22/13 08:28	1
Heptachlor epoxide	ND		0.0054	0.0027	ug/L		02/20/13 15:58	02/22/13 08:28	1
Methoxychlor	ND		0.0054	0.0038	ug/L		02/20/13 15:58	02/22/13 08:28	1
Toxaphene	ND		0.54	0.27	ug/L		02/20/13 15:58	02/22/13 08:28	1
4,4'-DDD	ND		0.0054	0.0043	ug/L		02/20/13 15:58	02/22/13 08:28	1
4,4'-DDE	ND		0.0054	0.0032	ug/L		02/20/13 15:58	02/22/13 08:28	1
4,4'-DDT	ND		0.011	0.0043	ug/L		02/20/13 15:58	02/22/13 08:28	1
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
Tetrachloro-m-xylene	57		35 - 115				02/20/13 15:58	02/22/13 08:28	1

**Method: 608 - Polychlorinated Biphenyls (PCBs) (GC)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aroclor 1016	ND		0.54	0.27	ug/L		02/20/13 15:58	02/26/13 18:29	1
Aroclor 1221	ND		0.54	0.27	ug/L		02/20/13 15:58	02/26/13 18:29	1
Aroclor 1232	ND		0.54	0.27	ug/L		02/20/13 15:58	02/26/13 18:29	1
Aroclor 1242	ND		0.54	0.27	ug/L		02/20/13 15:58	02/26/13 18:29	1
Aroclor 1248	ND		0.54	0.27	ug/L		02/20/13 15:58	02/26/13 18:29	1
Aroclor 1254	ND		0.54	0.27	ug/L		02/20/13 15:58	02/26/13 18:29	1
Aroclor 1260	ND		0.54	0.27	ug/L		02/20/13 15:58	02/26/13 18:29	1
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
DCB Decachlorobiphenyl (Surr)	97		45 - 120				02/20/13 15:58	02/26/13 18:29	1

**Method: 200.8 - Metals (ICP/MS) - Total Recoverable**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	ND		5.0	4.5	ug/L		02/21/13 08:44	02/21/13 20:18	5
Cadmium	1.0	J	5.0	0.50	ug/L		02/21/13 08:44	02/21/13 20:18	5
Chromium	5.1		5.0	4.5	ug/L		02/21/13 08:44	02/21/13 20:18	5
Copper	71		5.0	2.5	ug/L		02/21/13 08:44	02/21/13 20:18	5
Lead	8.4		5.0	1.0	ug/L		02/21/13 08:44	02/21/13 20:18	5
Nickel	5.4		5.0	2.5	ug/L		02/21/13 08:44	02/21/13 20:18	5
Silver	0.75	J	5.0	0.50	ug/L		02/21/13 08:44	02/21/13 20:18	5
Zinc	240		25	20	ug/L		02/21/13 08:44	02/21/13 20:18	5

**General Chemistry**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.0050	0.0030	mg/L		02/20/13 16:43	02/20/13 22:49	1
<b>Analyte</b>	<b>Result</b>	<b>Qualifier</b>	<b>RL</b>	<b>RL</b>	<b>Unit</b>	<b>D</b>	<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
Total Solids	1100		10	10	mg/L			02/21/13 13:49	1

# Lab Chronicle

Client: Veolia Water N. America Operating Srvs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: E-001-DC**

**Lab Sample ID: 440-38480-1**

Date Collected: 02/14/13 15:09

Matrix: Water

Date Received: 02/16/13 10:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	625			755 mL	2 mL	87046	02/21/13 19:05	DM	TAL IRV
Total/NA	Analysis	625		1			87608	02/25/13 21:27	AI	TAL IRV
Total/NA	Analysis	625		1			88618	03/01/13 05:01	AI	TAL IRV
Total/NA	Prep	608			940 mL	2 mL	86646	02/20/13 15:58	AB	TAL IRV
Total/NA	Analysis	608		1			87071	02/22/13 04:14	JM	TAL IRV
Total/NA	Analysis	608		1			87306	02/22/13 18:28	JM	TAL IRV
Total Recoverable	Prep	200.2			50 mL	50 mL	86823	02/21/13 08:44	DT	TAL IRV
Total Recoverable	Analysis	200.8		1			87060	02/21/13 20:10	YS	TAL IRV
Total/NA	Prep	Distill/CN			50 mL	50 mL	86665	02/20/13 16:43	BT	TAL IRV
Total/NA	Analysis	SM 4500 CN E		1			86754	02/20/13 22:49	BT	TAL IRV
Total/NA	Analysis	SM 2540B		1	100 mL	100 mL	86928	02/21/13 13:49	XL	TAL IRV

**Client Sample ID: E-001-D2**

**Lab Sample ID: 440-38480-2**

Date Collected: 02/14/13 13:27

Matrix: Water

Date Received: 02/16/13 10:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	625			990 mL	2 mL	87046	02/21/13 19:05	DM	TAL IRV
Total/NA	Analysis	625		1			87608	02/25/13 21:54	AI	TAL IRV
Total/NA	Analysis	625		1			88618	03/01/13 05:28	AI	TAL IRV
Total/NA	Prep	608			960 mL	2 mL	86646	02/20/13 15:58	AB	TAL IRV
Total/NA	Analysis	608		1			87071	02/22/13 04:43	JM	TAL IRV
Total/NA	Analysis	608		1			87306	02/22/13 18:43	JM	TAL IRV
Total Recoverable	Prep	200.2			50 mL	50 mL	86823	02/21/13 08:44	DT	TAL IRV
Total Recoverable	Analysis	200.8		2			87060	02/21/13 20:14	YS	TAL IRV
Total/NA	Analysis	SM 4500 NH3 D		50	50 mL	50 mL	86272	02/19/13 14:48	DC	TAL IRV
Total/NA	Prep	Distill/CN			50 mL	50 mL	86665	02/20/13 16:43	BT	TAL IRV
Total/NA	Analysis	SM 4500 CN E		1			86754	02/20/13 22:49	BT	TAL IRV
Total/NA	Analysis	SM 2540B		1	100 mL	100 mL	86928	02/21/13 13:49	XL	TAL IRV

**Client Sample ID: A-002**

**Lab Sample ID: 440-38480-3**

Date Collected: 02/14/13 12:41

Matrix: Water

Date Received: 02/16/13 10:00

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	625			880 mL	2 mL	87046	02/21/13 19:05	DM	TAL IRV
Total/NA	Analysis	625		10			87608	02/25/13 22:22	AI	TAL IRV
Total/NA	Analysis	625		20			88618	03/01/13 05:56	AI	TAL IRV
Total/NA	Prep	608			930 mL	2 mL	86646	02/20/13 15:58	AB	TAL IRV
Total/NA	Analysis	608		1			87071	02/22/13 08:28	JM	TAL IRV
Total/NA	Analysis	608		1			87862	02/26/13 18:29	JM	TAL IRV
Total Recoverable	Prep	200.2			50 mL	50 mL	86823	02/21/13 08:44	DT	TAL IRV

TestAmerica Irvine

# Lab Chronicle

Client: Veolia Water N. America Operating Srvs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

**Client Sample ID: A-002**

**Lab Sample ID: 440-38480-3**

**Date Collected: 02/14/13 12:41**

**Matrix: Water**

**Date Received: 02/16/13 10:00**

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total Recoverable	Analysis	200.8		5			87060	02/21/13 20:18	YS	TAL IRV
Total/NA	Prep	Distill/CN			50 mL	50 mL	86665	02/20/13 16:43	BT	TAL IRV
Total/NA	Analysis	SM 4500 CN E		1			86754	02/20/13 22:49	BT	TAL IRV
Total/NA	Analysis	SM 2540B		1	100 mL	100 mL	86928	02/21/13 13:49	XL	TAL IRV

**Laboratory References:**

TAL IRV = TestAmerica Irvine, 17461 Derian Ave, Suite 100, Irvine, CA 92614-5817, TEL (949)261-1022



# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS)

Lab Sample ID: MB 440-87046/1-A

Matrix: Water

Analysis Batch: 87608

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 87046

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
1,2-Diphenylhydrazine(as Azobenzene)	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
1,2-Dichlorobenzene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
1,3-Dichlorobenzene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
1,4-Dichlorobenzene	ND		0.50	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
2,4,5-Trichlorophenol	ND		2.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
2,4,6-Trichlorophenol	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
2,4-Dichlorophenol	ND		2.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
2,4-Dimethylphenol	ND		2.0	0.30	ug/L		02/21/13 19:05	02/25/13 13:45	1
2,4-Dinitrophenol	ND		5.0	0.90	ug/L		02/21/13 19:05	02/25/13 13:45	1
2,4-Dinitrotoluene	ND		5.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
2,6-Dinitrotoluene	ND		5.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
2-Chloronaphthalene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
2-Chlorophenol	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
2-Methylnaphthalene	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
2-Methylphenol	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
2-Nitroaniline	ND		5.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
2-Nitrophenol	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
3,3'-Dichlorobenzidine	ND		5.0	0.50	ug/L		02/21/13 19:05	02/25/13 13:45	1
3-Nitroaniline	ND		5.0	1.0	ug/L		02/21/13 19:05	02/25/13 13:45	1
4,6-Dinitro-2-methylphenol	ND		5.0	0.30	ug/L		02/21/13 19:05	02/25/13 13:45	1
4-Bromophenyl phenyl ether	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
4-Chloro-3-methylphenol	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
4-Chlorophenyl phenyl ether	ND		0.50	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
4-Nitroaniline	ND		5.0	0.50	ug/L		02/21/13 19:05	02/25/13 13:45	1
Acenaphthene	ND		0.50	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
Acenaphthylene	ND		0.50	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
Aniline	ND		10	0.30	ug/L		02/21/13 19:05	02/25/13 13:45	1
Anthracene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzidine	ND		5.0	1.0	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzo[a]anthracene	ND		5.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzo[a]pyrene	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzo[b]fluoranthene	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzo[g,h,i]perylene	ND		5.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzo[k]fluoranthene	ND		0.50	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzoic acid	ND		20	3.0	ug/L		02/21/13 19:05	02/25/13 13:45	1
Benzyl alcohol	ND		5.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Bis(2-chloroethoxy)methane	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Bis(2-chloroethyl)ether	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
bis (2-chloroisopropyl) ether	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Bis(2-ethylhexyl) phthalate	ND		5.0	1.7	ug/L		02/21/13 19:05	02/25/13 13:45	1
Butyl benzyl phthalate	ND		5.0	0.70	ug/L		02/21/13 19:05	02/25/13 13:45	1
Chrysene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Di-n-butyl phthalate	ND		2.0	0.30	ug/L		02/21/13 19:05	02/25/13 13:45	1
Di-n-octyl phthalate	ND		5.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
Dibenz(a,h)anthracene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Dibenzofuran	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 440-87046/1-A

Matrix: Water

Analysis Batch: 87608

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 87046

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diethyl phthalate	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Dimethyl phthalate	ND		0.50	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
Fluoranthene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Fluorene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Hexachlorobenzene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Hexachlorobutadiene	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
Hexachlorocyclopentadiene	ND		5.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Hexachloroethane	ND		1.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
Indeno[1,2,3-cd]pyrene	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Isophorone	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
N-Nitrosodi-n-propylamine	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
N-Nitrosodiphenylamine	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Naphthalene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Nitrobenzene	ND		1.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Pentachlorophenol	ND		2.0	0.40	ug/L		02/21/13 19:05	02/25/13 13:45	1
Phenol	ND		1.0	0.30	ug/L		02/21/13 19:05	02/25/13 13:45	1
Phenanthrene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
Pyrene	ND		0.50	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1
3-Methylphenol + 4-Methylphenol	ND		5.0	0.20	ug/L		02/21/13 19:05	02/25/13 13:45	1
N-Nitrosodimethylamine	ND		2.0	0.10	ug/L		02/21/13 19:05	02/25/13 13:45	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
2,4,6-Tribromophenol	112		40 - 120	02/21/13 19:05	02/25/13 13:45	1
2-Fluorobiphenyl	67		50 - 120	02/21/13 19:05	02/25/13 13:45	1
2-Fluorophenol	78		30 - 120	02/21/13 19:05	02/25/13 13:45	1
Nitrobenzene-d5	81		45 - 120	02/21/13 19:05	02/25/13 13:45	1
Phenol-d6	80		35 - 120	02/21/13 19:05	02/25/13 13:45	1
Terphenyl-d14	102		50 - 125	02/21/13 19:05	02/25/13 13:45	1

Lab Sample ID: MB 440-87046/1-A

Matrix: Water

Analysis Batch: 88618

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 87046

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
4-Nitrophenol	ND		5.0	2.5	ug/L		02/21/13 19:05	03/01/13 04:34	1
4-Chloroaniline	ND		2.0	0.30	ug/L		02/21/13 19:05	03/01/13 04:34	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
2,4,6-Tribromophenol	109		40 - 120	02/21/13 19:05	03/01/13 04:34	1
2-Fluorobiphenyl	92		50 - 120	02/21/13 19:05	03/01/13 04:34	1
2-Fluorophenol	77		30 - 120	02/21/13 19:05	03/01/13 04:34	1
Nitrobenzene-d5	85		45 - 120	02/21/13 19:05	03/01/13 04:34	1
Phenol-d6	82		35 - 120	02/21/13 19:05	03/01/13 04:34	1
Terphenyl-d14	114		50 - 125	02/21/13 19:05	03/01/13 04:34	1

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 440-87046/2-A

Matrix: Water

Analysis Batch: 87608

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 87046

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,2,4-Trichlorobenzene	10.0	7.18		ug/L		72	44 - 120
1,2-Diphenylhydrazine(as Azobenzene)	10.0	8.99		ug/L		90	59 - 124
1,2-Dichlorobenzene	10.0	6.91		ug/L		69	43 - 120
1,3-Dichlorobenzene	10.0	6.82		ug/L		68	41 - 120
1,4-Dichlorobenzene	10.0	6.78		ug/L		68	41 - 120
2,4,5-Trichlorophenol	10.0	8.66		ug/L		87	20 - 138
2,4,6-Trichlorophenol	10.0	8.55		ug/L		85	20 - 139
2,4-Dichlorophenol	10.0	6.51		ug/L		65	21 - 132
2,4-Dimethylphenol	10.0	6.85		ug/L		68	51 - 120
2,4-Dinitrophenol	10.0	7.50		ug/L		75	20 - 134
2,6-Dinitrotoluene	10.0	8.68		ug/L		87	65 - 120
2-Chloronaphthalene	10.0	7.32		ug/L		73	54 - 120
2-Chlorophenol	10.0	7.49		ug/L		75	20 - 122
2-Methylnaphthalene	10.0	7.90		ug/L		79	55 - 120
2-Methylphenol	10.0	7.15		ug/L		72	47 - 120
2-Nitroaniline	10.0	7.77		ug/L		78	60 - 135
2-Nitrophenol	10.0	7.65		ug/L		76	21 - 132
3,3'-Dichlorobenzidine	10.0	7.97		ug/L		80	25 - 135
3-Nitroaniline	10.0	8.24		ug/L		82	63 - 123
4,6-Dinitro-2-methylphenol	10.0	8.52		ug/L		85	22 - 147
4-Bromophenyl phenyl ether	10.0	8.88		ug/L		89	58 - 120
4-Chloro-3-methylphenol	10.0	9.26		ug/L		93	46 - 123
4-Chlorophenyl phenyl ether	10.0	9.09		ug/L		91	50 - 122
4-Nitroaniline	10.0	8.44		ug/L		84	60 - 126
Acenaphthene	10.0	8.91		ug/L		89	57 - 120
Acenaphthylene	10.0	9.21		ug/L		92	60 - 120
Aniline	10.0	6.19	J	ug/L		62	53 - 120
Anthracene	10.0	9.65		ug/L		97	62 - 120
Benzidine	10.0	ND	*	ug/L		10	20 - 168
Benzo[a]anthracene	10.0	9.57		ug/L		96	62 - 120
Benzo[a]pyrene	10.0	9.22		ug/L		92	66 - 130
Benzo[b]fluoranthene	10.0	9.15		ug/L		92	46 - 125
Benzo[g,h,i]perylene	10.0	9.17		ug/L		92	52 - 136
Benzo[k]fluoranthene	10.0	9.93		ug/L		99	61 - 127
Benzoic acid	10.0	7.15	J	ug/L		72	20 - 120
Benzyl alcohol	10.0	8.22		ug/L		82	50 - 120
Bis(2-chloroethoxy)methane	10.0	8.00		ug/L		80	57 - 120
Bis(2-chloroethyl)ether	10.0	8.00		ug/L		80	54 - 120
bis (2-chloroisopropyl) ether	10.0	7.82		ug/L		78	45 - 120
Bis(2-ethylhexyl) phthalate	10.0	8.74		ug/L		87	61 - 126
Butyl benzyl phthalate	10.0	10.4		ug/L		104	57 - 129
Chrysene	10.0	9.71		ug/L		97	63 - 120
Di-n-butyl phthalate	10.0	9.91		ug/L		99	60 - 126
Di-n-octyl phthalate	10.0	7.90		ug/L		79	63 - 130
Dibenz(a,h)anthracene	10.0	9.09		ug/L		91	56 - 124
Dibenzofuran	10.0	9.09		ug/L		91	60 - 120
Diethyl phthalate	10.0	9.29		ug/L		93	44 - 131

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 440-87046/2-A

Matrix: Water

Analysis Batch: 87608

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 87046

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Dimethyl phthalate	10.0	9.46		ug/L		95	33 - 140
Fluoranthene	10.0	10.1		ug/L		101	64 - 120
Fluorene	10.0	9.27		ug/L		93	52 - 120
Hexachlorobenzene	10.0	8.94		ug/L		89	61 - 120
Hexachlorobutadiene	10.0	6.82		ug/L		68	34 - 120
Hexachlorocyclopentadiene	10.0	5.13		ug/L		51	23 - 120
Hexachloroethane	10.0	6.35		ug/L		64	34 - 120
Indeno[1,2,3-cd]pyrene	10.0	8.74		ug/L		87	59 - 128
Isophorone	10.0	9.32		ug/L		93	50 - 120
N-Nitrosodi-n-propylamine	10.0	8.24		ug/L		82	60 - 120
N-Nitrosodiphenylamine	10.0	8.86		ug/L		89	58 - 120
Naphthalene	10.0	8.17		ug/L		82	52 - 120
Nitrobenzene	10.0	7.89		ug/L		79	52 - 120
Pentachlorophenol	10.0	7.18		ug/L		72	20 - 137
Phenol	10.0	7.50		ug/L		75	20 - 120
Phenanthrene	10.0	9.58		ug/L		96	62 - 120
Pyrene	10.0	10.1		ug/L		101	54 - 120
3-Methylphenol + 4-Methylphenol	10.0	6.59		ug/L		66	50 - 120
N-Nitrosodimethylamine	10.0	7.28		ug/L		73	20 - 143

Surrogate	LCS %Recovery	LCS Qualifier	Limits
2,4,6-Tribromophenol	98		40 - 120
2-Fluorobiphenyl	79		50 - 120
2-Fluorophenol	70		30 - 120
Nitrobenzene-d5	81		45 - 120
Phenol-d6	77		35 - 120
Terphenyl-d14	94		50 - 125

Lab Sample ID: LCS 440-87046/2-A

Matrix: Water

Analysis Batch: 88618

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 87046

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
4-Nitrophenol	10.0	7.49		ug/L		75	20 - 151
4-Chloroaniline	10.0	8.34		ug/L		83	52 - 120

Surrogate	LCS %Recovery	LCS Qualifier	Limits
2,4,6-Tribromophenol	100		40 - 120
2-Fluorobiphenyl	90		50 - 120
2-Fluorophenol	75		30 - 120
Nitrobenzene-d5	83		45 - 120
Phenol-d6	82		35 - 120
Terphenyl-d14	99		50 - 125

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCSD 440-87046/3-A

Matrix: Water

Analysis Batch: 87608

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 87046

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
1,2,4-Trichlorobenzene	10.0	8.03		ug/L		80	44 - 120	11	20
1,2-Diphenylhydrazine(as Azobenzene)	10.0	9.98		ug/L		100	59 - 124	10	25
1,2-Dichlorobenzene	10.0	7.58		ug/L		76	43 - 120	9	25
1,3-Dichlorobenzene	10.0	7.39		ug/L		74	41 - 120	8	25
1,4-Dichlorobenzene	10.0	7.42		ug/L		74	41 - 120	9	25
2,4,5-Trichlorophenol	10.0	8.89		ug/L		89	20 - 138	3	30
2,4,6-Trichlorophenol	10.0	8.76		ug/L		88	20 - 139	2	30
2,4-Dichlorophenol	10.0	6.93		ug/L		69	21 - 132	6	20
2,4-Dimethylphenol	10.0	7.26		ug/L		73	51 - 120	6	25
2,4-Dinitrophenol	10.0	7.77		ug/L		78	20 - 134	3	25
2,6-Dinitrotoluene	10.0	9.18		ug/L		92	65 - 120	6	20
2-Chloronaphthalene	10.0	7.75		ug/L		77	54 - 120	6	20
2-Chlorophenol	10.0	7.53		ug/L		75	20 - 122	1	25
2-Methylnaphthalene	10.0	8.48		ug/L		85	55 - 120	7	20
2-Methylphenol	10.0	7.53		ug/L		75	47 - 120	5	20
2-Nitroaniline	10.0	8.50		ug/L		85	60 - 135	9	20
2-Nitrophenol	10.0	8.01		ug/L		80	21 - 132	5	25
3,3'-Dichlorobenzidine	10.0	8.85		ug/L		88	25 - 135	10	25
3-Nitroaniline	10.0	8.73		ug/L		87	63 - 123	6	25
4,6-Dinitro-2-methylphenol	10.0	9.20		ug/L		92	22 - 147	8	25
4-Bromophenyl phenyl ether	10.0	9.54		ug/L		95	58 - 120	7	25
4-Chloro-3-methylphenol	10.0	9.95		ug/L		99	46 - 123	7	25
4-Chlorophenyl phenyl ether	10.0	9.62		ug/L		96	50 - 122	6	20
4-Nitroaniline	10.0	8.73		ug/L		87	60 - 126	3	20
Acenaphthene	10.0	9.17		ug/L		92	57 - 120	3	20
Acenaphthylene	10.0	9.55		ug/L		95	60 - 120	4	20
Aniline	10.0	6.18	J	ug/L		62	53 - 120	0	30
Anthracene	10.0	10.1		ug/L		101	62 - 120	4	20
Benzidine	10.0	1.34	J *	ug/L		13	20 - 168	32	35
Benzo[a]anthracene	10.0	10.5		ug/L		105	62 - 120	9	20
Benzo[a]pyrene	10.0	9.97		ug/L		100	66 - 130	8	25
Benzo[b]fluoranthene	10.0	9.73		ug/L		97	46 - 125	6	25
Benzo[g,h,i]perylene	10.0	9.66		ug/L		97	52 - 136	5	25
Benzo[k]fluoranthene	10.0	10.8		ug/L		108	61 - 127	8	20
Benzoic acid	10.0	8.14	J	ug/L		81	20 - 120	13	30
Benzyl alcohol	10.0	8.69		ug/L		87	50 - 120	6	20
Bis(2-chloroethoxy)methane	10.0	8.18		ug/L		82	57 - 120	2	20
Bis(2-chloroethyl)ether	10.0	8.24		ug/L		82	54 - 120	3	20
bis (2-chloroisopropyl) ether	10.0	8.03		ug/L		80	45 - 120	3	20
Bis(2-ethylhexyl) phthalate	10.0	10.0		ug/L		100	61 - 126	14	20
Butyl benzyl phthalate	10.0	11.3		ug/L		113	57 - 129	8	20
Chrysene	10.0	10.4		ug/L		104	63 - 120	7	20
Di-n-butyl phthalate	10.0	10.4		ug/L		104	60 - 126	5	20
Di-n-octyl phthalate	10.0	8.95		ug/L		90	63 - 130	13	20
Dibenz(a,h)anthracene	10.0	9.92		ug/L		99	56 - 124	9	25
Dibenzofuran	10.0	9.54		ug/L		95	60 - 120	5	20
Diethyl phthalate	10.0	9.59		ug/L		96	44 - 131	3	30

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCSD 440-87046/3-A

Matrix: Water

Analysis Batch: 87608

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 87046

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Dimethyl phthalate	10.0	9.90		ug/L		99	33 - 140	5	30
Fluoranthene	10.0	10.6		ug/L		106	64 - 120	5	20
Fluorene	10.0	9.70		ug/L		97	52 - 120	5	20
Hexachlorobenzene	10.0	9.54		ug/L		95	61 - 120	7	20
Hexachlorobutadiene	10.0	7.79		ug/L		78	34 - 120	13	25
Hexachlorocyclopentadiene	10.0	5.20		ug/L		52	23 - 120	1	30
Hexachloroethane	10.0	7.06		ug/L		71	34 - 120	11	25
Indeno[1,2,3-cd]pyrene	10.0	9.69		ug/L		97	59 - 128	10	25
Isophorone	10.0	9.86		ug/L		99	50 - 120	6	20
N-Nitrosodi-n-propylamine	10.0	8.58		ug/L		86	60 - 120	4	20
N-Nitrosodiphenylamine	10.0	9.39		ug/L		94	58 - 120	6	20
Naphthalene	10.0	8.79		ug/L		88	52 - 120	7	20
Nitrobenzene	10.0	8.51		ug/L		85	52 - 120	8	25
Pentachlorophenol	10.0	8.20		ug/L		82	20 - 137	13	25
Phenol	10.0	7.33		ug/L		73	20 - 120	2	25
Phenanthrene	10.0	10.0		ug/L		100	62 - 120	5	20
Pyrene	10.0	10.7		ug/L		107	54 - 120	6	25
3-Methylphenol + 4-Methylphenol	10.0	6.78		ug/L		68	50 - 120	3	20
N-Nitrosodimethylamine	10.0	8.24		ug/L		82	20 - 143	12	20

Surrogate	LCSD %Recovery	LCSD Qualifier	LCSD Limits
2,4,6-Tribromophenol	104		40 - 120
2-Fluorobiphenyl	84		50 - 120
2-Fluorophenol	70		30 - 120
Nitrobenzene-d5	85		45 - 120
Phenol-d6	75		35 - 120
Terphenyl-d14	101		50 - 125

Lab Sample ID: LCSD 440-87046/3-A

Matrix: Water

Analysis Batch: 88618

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 87046

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
4-Nitrophenol	10.0	8.36		ug/L		84	20 - 151	11	30
4-Chloroaniline	10.0	8.49		ug/L		85	52 - 120	2	25

Surrogate	LCSD %Recovery	LCSD Qualifier	LCSD Limits
2,4,6-Tribromophenol	105		40 - 120
2-Fluorobiphenyl	93		50 - 120
2-Fluorophenol	75		30 - 120
Nitrobenzene-d5	85		45 - 120
Phenol-d6	79		35 - 120
Terphenyl-d14	106		50 - 125

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 608 - Organochlorine Pesticides in Water

Lab Sample ID: MB 440-86646/1-A

Matrix: Water

Analysis Batch: 87071

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 86646

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aldrin	ND		0.0050	0.0015	ug/L		02/20/13 15:58	02/22/13 01:53	1
alpha-BHC	ND		0.0050	0.0025	ug/L		02/20/13 15:58	02/22/13 01:53	1
beta-BHC	ND		0.010	0.0040	ug/L		02/20/13 15:58	02/22/13 01:53	1
Chlordane (technical)	ND		0.10	0.080	ug/L		02/20/13 15:58	02/22/13 01:53	1
delta-BHC	ND		0.0050	0.0035	ug/L		02/20/13 15:58	02/22/13 01:53	1
Dieldrin	ND		0.0050	0.0020	ug/L		02/20/13 15:58	02/22/13 01:53	1
Endosulfan I	ND		0.0050	0.0030	ug/L		02/20/13 15:58	02/22/13 01:53	1
Endosulfan II	ND		0.0050	0.0020	ug/L		02/20/13 15:58	02/22/13 01:53	1
Endosulfan sulfate	ND		0.010	0.0030	ug/L		02/20/13 15:58	02/22/13 01:53	1
Endrin	ND		0.0050	0.0020	ug/L		02/20/13 15:58	02/22/13 01:53	1
Endrin aldehyde	ND		0.010	0.0020	ug/L		02/20/13 15:58	02/22/13 01:53	1
Endrin ketone	ND		0.010	0.0070	ug/L		02/20/13 15:58	02/22/13 01:53	1
gamma-BHC (Lindane)	ND		0.010	0.0030	ug/L		02/20/13 15:58	02/22/13 01:53	1
Heptachlor	ND		0.010	0.0030	ug/L		02/20/13 15:58	02/22/13 01:53	1
Heptachlor epoxide	ND		0.0050	0.0025	ug/L		02/20/13 15:58	02/22/13 01:53	1
Methoxychlor	ND		0.0050	0.0035	ug/L		02/20/13 15:58	02/22/13 01:53	1
Toxaphene	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 01:53	1
4,4'-DDD	ND		0.0050	0.0040	ug/L		02/20/13 15:58	02/22/13 01:53	1
4,4'-DDE	ND		0.0050	0.0030	ug/L		02/20/13 15:58	02/22/13 01:53	1
4,4'-DDT	ND		0.010	0.0040	ug/L		02/20/13 15:58	02/22/13 01:53	1
<b>Surrogate</b>	<b>MB %Recovery</b>	<b>MB Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
Tetrachloro-m-xylene	80		35 - 115				02/20/13 15:58	02/22/13 01:53	1

Lab Sample ID: LCS 440-86646/2-A

Matrix: Water

Analysis Batch: 87071

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 86646

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Aldrin	0.500	0.460		ug/L		92	40 - 115
alpha-BHC	0.500	0.460		ug/L		92	45 - 115
beta-BHC	0.500	0.447		ug/L		89	55 - 115
delta-BHC	0.500	0.465		ug/L		93	55 - 115
Dieldrin	0.500	0.494		ug/L		99	55 - 115
Endosulfan I	0.500	0.482		ug/L		96	55 - 115
Endosulfan II	0.500	0.483		ug/L		97	55 - 120
Endosulfan sulfate	0.500	0.544		ug/L		109	60 - 120
Endrin	0.500	0.500		ug/L		100	55 - 115
Endrin aldehyde	0.500	0.465		ug/L		93	50 - 120
Endrin ketone	0.500	0.505		ug/L		101	55 - 120
gamma-BHC (Lindane)	0.500	0.467		ug/L		93	45 - 115
Heptachlor	0.500	0.460		ug/L		92	45 - 115
Heptachlor epoxide	0.500	0.468		ug/L		94	55 - 115
Methoxychlor	0.500	0.494		ug/L		99	60 - 120
4,4'-DDD	0.500	0.495		ug/L		99	55 - 120
4,4'-DDE	0.500	0.504		ug/L		101	50 - 120
4,4'-DDT	0.500	0.490		ug/L		98	55 - 120

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 608 - Organochlorine Pesticides in Water (Continued)

Lab Sample ID: LCS 440-86646/2-A

Matrix: Water

Analysis Batch: 87071

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 86646

Surrogate	LCS %Recovery	LCS Qualifier	Limits
DCB Decachlorobiphenyl (Surr)	89		45 - 120
Tetrachloro-m-xylene	82		35 - 115

Lab Sample ID: 440-38299-AJ-1-A MS

Matrix: Water

Analysis Batch: 87071

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 86646

Analyte	Sample Result	Sample Qualifier	Spike Added	MS		Unit	D	%Rec	%Rec.	
				Result	Qualifier				Limits	RPD
Aldrin	ND		0.481	0.406		ug/L		84	35 - 120	
alpha-BHC	ND		0.481	0.396		ug/L		82	40 - 120	
beta-BHC	ND		0.481	0.397		ug/L		83	50 - 120	
delta-BHC	ND		0.481	0.414		ug/L		86	50 - 120	
Dieldrin	ND		0.481	0.445		ug/L		93	50 - 120	
Endosulfan I	ND		0.481	0.435		ug/L		90	50 - 120	
Endosulfan II	ND		0.481	0.442		ug/L		92	50 - 125	
Endosulfan sulfate	ND		0.481	0.502		ug/L		104	55 - 125	
Endrin	ND		0.481	0.476		ug/L		99	50 - 120	
Endrin aldehyde	ND		0.481	0.412		ug/L		86	45 - 125	
Endrin ketone	ND		0.481	0.472		ug/L		98	50 - 125	
gamma-BHC (Lindane)	ND		0.481	0.406		ug/L		84	40 - 120	
Heptachlor	ND		0.481	0.402		ug/L		84	40 - 120	
Heptachlor epoxide	ND		0.481	0.448		ug/L		93	50 - 120	
Methoxychlor	ND		0.481	0.458		ug/L		95	55 - 125	
4,4'-DDD	ND		0.481	0.446		ug/L		93	50 - 125	
4,4'-DDE	ND		0.481	0.448		ug/L		93	45 - 125	
4,4'-DDT	ND		0.481	0.444		ug/L		92	50 - 125	

Surrogate	MS %Recovery	MS Qualifier	Limits
DCB Decachlorobiphenyl (Surr)	87		45 - 120
Tetrachloro-m-xylene	74		35 - 115

Lab Sample ID: 440-38299-AK-1-A MSD

Matrix: Water

Analysis Batch: 87071

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 86646

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD		Unit	D	%Rec	%Rec.		RPD	
				Result	Qualifier				Limits	RPD	Limit	
Aldrin	ND		0.476	0.388		ug/L		82	35 - 120	4	30	
alpha-BHC	ND		0.476	0.372		ug/L		78	40 - 120	6	30	
beta-BHC	ND		0.476	0.391		ug/L		82	50 - 120	2	30	
delta-BHC	ND		0.476	0.407		ug/L		86	50 - 120	2	30	
Dieldrin	ND		0.476	0.437		ug/L		92	50 - 120	2	30	
Endosulfan I	ND		0.476	0.428		ug/L		90	50 - 120	2	30	
Endosulfan II	ND		0.476	0.435		ug/L		91	50 - 125	2	30	
Endosulfan sulfate	ND		0.476	0.499		ug/L		105	55 - 125	1	30	
Endrin	ND		0.476	0.469		ug/L		99	50 - 120	1	30	
Endrin aldehyde	ND		0.476	0.401		ug/L		84	45 - 125	3	30	
Endrin ketone	ND		0.476	0.465		ug/L		98	50 - 125	1	30	
gamma-BHC (Lindane)	ND		0.476	0.391		ug/L		82	40 - 120	4	30	

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 608 - Organochlorine Pesticides in Water (Continued)

Lab Sample ID: 440-38299-AK-1-A MSD

Matrix: Water

Analysis Batch: 87071

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 86646

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec.	RPD	Limit
	Result	Qualifier	Added	Result	Qualifier				Limits		
Heptachlor	ND		0.476	0.388		ug/L		82	40 - 120	4	30
Heptachlor epoxide	ND		0.476	0.448		ug/L		94	50 - 120	0	30
Methoxychlor	ND		0.476	0.456		ug/L		96	55 - 125	1	30
4,4'-DDD	ND		0.476	0.438		ug/L		92	50 - 125	2	30
4,4'-DDE	ND		0.476	0.442		ug/L		93	45 - 125	1	30
4,4'-DDT	ND		0.476	0.439		ug/L		92	50 - 125	1	30
<b>Surrogate</b>	<b>%Recovery</b>	<b>MSD</b> <b>Qualifier</b>	<b>Limits</b>								
DCB Decachlorobiphenyl (Surr)	83		45 - 120								
Tetrachloro-m-xylene	67		35 - 115								

## Method: 608 - Polychlorinated Biphenyls (PCBs) (GC)

Lab Sample ID: MB 440-86646/1-A

Matrix: Water

Analysis Batch: 87306

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 86646

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac	
	Result	Qualifier								
Aroclor 1016	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 17:13	1	
Aroclor 1221	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 17:13	1	
Aroclor 1232	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 17:13	1	
Aroclor 1242	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 17:13	1	
Aroclor 1248	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 17:13	1	
Aroclor 1254	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 17:13	1	
Aroclor 1260	ND		0.50	0.25	ug/L		02/20/13 15:58	02/22/13 17:13	1	
<b>Surrogate</b>	<b>%Recovery</b>	<b>MB</b> <b>Qualifier</b>	<b>Limits</b>			<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>		
DCB Decachlorobiphenyl (Surr)	97		45 - 120			02/20/13 15:58	02/22/13 17:13	1		

Lab Sample ID: LCS 440-86646/5-A

Matrix: Water

Analysis Batch: 87306

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 86646

Analyte	Spike Added	LCS	LCS	Unit	D	%Rec	%Rec.	Limits
		Result	Qualifier				Limits	
Aroclor 1016	4.00	3.11		ug/L		78	50 - 115	
Aroclor 1260	4.00	3.64		ug/L		91	60 - 120	
<b>Surrogate</b>	<b>%Recovery</b>	<b>LCS</b> <b>Qualifier</b>	<b>Limits</b>					
DCB Decachlorobiphenyl (Surr)	100		45 - 120					

Lab Sample ID: 440-38299-AM-1-A MS

Matrix: Water

Analysis Batch: 87306

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 86646

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec.	Limits
	Result	Qualifier	Added	Result	Qualifier				Limits	
Aroclor 1016	ND		3.92	2.84		ug/L		72	45 - 120	
Aroclor 1260	ND		3.92	3.24		ug/L		83	55 - 125	

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 608 - Polychlorinated Biphenyls (PCBs) (GC) (Continued)

**Lab Sample ID: 440-38299-AM-1-A MS**  
**Matrix: Water**  
**Analysis Batch: 87306**

**Client Sample ID: Matrix Spike**  
**Prep Type: Total/NA**  
**Prep Batch: 86646**

Surrogate	MS MS		Limits
	%Recovery	Qualifier	
DCB Decachlorobiphenyl (Surr)	94		45 - 120

**Lab Sample ID: 440-38299-AN-1-A MSD**  
**Matrix: Water**  
**Analysis Batch: 87306**

**Client Sample ID: Matrix Spike Duplicate**  
**Prep Type: Total/NA**  
**Prep Batch: 86646**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD MSD		Unit	D	%Rec	%Rec.		RPD	Limit
				Result	Qualifier				Limits	RPD		
Aroclor 1016	ND		3.81	2.61		ug/L		69	45 - 120	8	30	
Aroclor 1260	ND		3.81	3.21		ug/L		84	55 - 125	1	25	

Surrogate	MSD MSD		Limits
	%Recovery	Qualifier	
DCB Decachlorobiphenyl (Surr)	94		45 - 120

## Method: 200.8 - Metals (ICP/MS)

**Lab Sample ID: MB 440-86823/1-A**  
**Matrix: Water**  
**Analysis Batch: 87060**

**Client Sample ID: Method Blank**  
**Prep Type: Total Recoverable**  
**Prep Batch: 86823**

Analyte	MB MB		RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Arsenic	ND		1.0	0.90	ug/L		02/21/13 08:44	02/21/13 19:43	1
Cadmium	ND		1.0	0.10	ug/L		02/21/13 08:44	02/21/13 19:43	1
Chromium	ND		1.0	0.90	ug/L		02/21/13 08:44	02/21/13 19:43	1
Copper	ND		1.0	0.50	ug/L		02/21/13 08:44	02/21/13 19:43	1
Lead	ND		1.0	0.20	ug/L		02/21/13 08:44	02/21/13 19:43	1
Nickel	ND		1.0	0.50	ug/L		02/21/13 08:44	02/21/13 19:43	1
Silver	ND		1.0	0.10	ug/L		02/21/13 08:44	02/21/13 19:43	1
Zinc	ND		5.0	4.0	ug/L		02/21/13 08:44	02/21/13 19:43	1

**Lab Sample ID: LCS 440-86823/2-A**  
**Matrix: Water**  
**Analysis Batch: 87060**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total Recoverable**  
**Prep Batch: 86823**

Analyte	Spike Added	LCS LCS		Unit	D	%Rec	%Rec.	
		Result	Qualifier				Limits	RPD
Arsenic	80.0	81.4		ug/L		102	85 - 115	
Cadmium	80.0	75.9		ug/L		95	85 - 115	
Chromium	80.0	83.5		ug/L		104	85 - 115	
Copper	80.0	79.0		ug/L		99	85 - 115	
Lead	80.0	84.3		ug/L		105	85 - 115	
Nickel	80.0	76.9		ug/L		96	85 - 115	
Silver	80.0	90.6		ug/L		113	85 - 115	
Zinc	80.0	79.9		ug/L		100	85 - 115	

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: 200.8 - Metals (ICP/MS) (Continued)

**Lab Sample ID: 440-38208-G-1-C MS**  
**Matrix: Water**  
**Analysis Batch: 87060**

**Client Sample ID: Matrix Spike**  
**Prep Type: Total Recoverable**  
**Prep Batch: 86823**

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec. Limits
	Result	Qualifier	Added	Result	Qualifier				
Arsenic	ND		80.0	78.2		ug/L		98	70 - 130
Cadmium	ND		80.0	70.8		ug/L		88	70 - 130
Chromium	1.2		80.0	77.9		ug/L		96	70 - 130
Copper	1.2		80.0	71.0		ug/L		87	70 - 130
Lead	ND		80.0	76.2		ug/L		95	70 - 130
Nickel	1.8		80.0	71.4		ug/L		87	70 - 130
Silver	ND		80.0	84.2		ug/L		105	70 - 130
Zinc	ND		80.0	71.3		ug/L		89	70 - 130

**Lab Sample ID: 440-38208-G-1-D MSD**  
**Matrix: Water**  
**Analysis Batch: 87060**

**Client Sample ID: Matrix Spike Duplicate**  
**Prep Type: Total Recoverable**  
**Prep Batch: 86823**

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
	Result	Qualifier	Added	Result	Qualifier						
Arsenic	ND		80.0	78.3		ug/L		98	70 - 130	0	20
Cadmium	ND		80.0	71.0		ug/L		89	70 - 130	0	20
Chromium	1.2		80.0	78.9		ug/L		97	70 - 130	1	20
Copper	1.2		80.0	70.7		ug/L		87	70 - 130	0	20
Lead	ND		80.0	76.0		ug/L		95	70 - 130	0	20
Nickel	1.8		80.0	71.9		ug/L		88	70 - 130	1	20
Silver	ND		80.0	84.3		ug/L		105	70 - 130	0	20
Zinc	ND		80.0	71.9		ug/L		90	70 - 130	1	20

## Method: SM 2540B - Solids, Total

**Lab Sample ID: MB 440-86928/1**  
**Matrix: Water**  
**Analysis Batch: 86928**

**Client Sample ID: Method Blank**  
**Prep Type: Total/NA**

Analyte	MB	MB	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Total Solids	ND		10	10	mg/L			02/21/13 13:49	1

**Lab Sample ID: LCS 440-86928/2**  
**Matrix: Water**  
**Analysis Batch: 86928**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total/NA**

Analyte	Spike	LCS	LCS	Unit	D	%Rec	%Rec. Limits
	Added	Result	Qualifier				
Total Solids	1000	994		mg/L		99	90 - 110

**Lab Sample ID: 440-38480-1 DU**  
**Matrix: Water**  
**Analysis Batch: 86928**

**Client Sample ID: E-001-DC**  
**Prep Type: Total/NA**

Analyte	Sample	Sample	DU	DU	Unit	D	RPD	RPD Limit
	Result	Qualifier	Result	Qualifier				
Total Solids	2500		2430		mg/L		1	10

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: SM 4500 CN E - Cyanide, Total (Low Level)

**Lab Sample ID:** MB 440-86665/1-A  
**Matrix:** Water  
**Analysis Batch:** 86754

**Client Sample ID:** Method Blank  
**Prep Type:** Total/NA  
**Prep Batch:** 86665

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		0.0050	0.0030	mg/L		02/20/13 16:43	02/20/13 22:48	1

**Lab Sample ID:** LCS 440-86665/2-A  
**Matrix:** Water  
**Analysis Batch:** 86754

**Client Sample ID:** Lab Control Sample  
**Prep Type:** Total/NA  
**Prep Batch:** 86665

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Cyanide, Total	0.100	0.107		mg/L		107	90 - 110

**Lab Sample ID:** 440-38011-N-5-B MS  
**Matrix:** Water  
**Analysis Batch:** 86754

**Client Sample ID:** Matrix Spike  
**Prep Type:** Total/NA  
**Prep Batch:** 86665

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Cyanide, Total	ND		0.100	0.114		mg/L		114	70 - 115

**Lab Sample ID:** 440-38011-N-5-C MSD  
**Matrix:** Water  
**Analysis Batch:** 86754

**Client Sample ID:** Matrix Spike Duplicate  
**Prep Type:** Total/NA  
**Prep Batch:** 86665

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Cyanide, Total	ND		0.100	0.107		mg/L		107	70 - 115	6	15

## Method: SM 4500 NH3 D - Ammonia

**Lab Sample ID:** MB 440-86272/9  
**Matrix:** Water  
**Analysis Batch:** 86272

**Client Sample ID:** Method Blank  
**Prep Type:** Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (as N)	ND		0.50	0.10	mg/L			02/19/13 14:23	1

**Lab Sample ID:** LCS 440-86272/7  
**Matrix:** Water  
**Analysis Batch:** 86272

**Client Sample ID:** Lab Control Sample  
**Prep Type:** Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia (as N)	1.00	1.02		mg/L		102	85 - 115

**Lab Sample ID:** 440-38099-E-1 MS  
**Matrix:** Water  
**Analysis Batch:** 86272

**Client Sample ID:** Matrix Spike  
**Prep Type:** Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia (as N)	ND		2.00	2.01		mg/L		100	75 - 125

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Method: SM 4500 NH3 D - Ammonia (Continued)

Lab Sample ID: 440-38099-E-1 MSD

Matrix: Water

Analysis Batch: 86272

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia (as N)	ND		2.00	2.01		mg/L		100	75 - 125	0	15

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12

# QC Association Summary

Client: Veolia Water N. America Operating Srvs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## GC/MS Semi VOA

### Prep Batch: 87046

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-1	E-001-DC	Total/NA	Water	625	
440-38480-2	E-001-D2	Total/NA	Water	625	
440-38480-3	A-002	Total/NA	Water	625	
LCS 440-87046/2-A	Lab Control Sample	Total/NA	Water	625	
LCS D 440-87046/3-A	Lab Control Sample Dup	Total/NA	Water	625	
MB 440-87046/1-A	Method Blank	Total/NA	Water	625	

### Analysis Batch: 87608

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-1	E-001-DC	Total/NA	Water	625	87046
440-38480-2	E-001-D2	Total/NA	Water	625	87046
440-38480-3	A-002	Total/NA	Water	625	87046
LCS 440-87046/2-A	Lab Control Sample	Total/NA	Water	625	87046
LCS D 440-87046/3-A	Lab Control Sample Dup	Total/NA	Water	625	87046
MB 440-87046/1-A	Method Blank	Total/NA	Water	625	87046

### Analysis Batch: 88618

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-1	E-001-DC	Total/NA	Water	625	87046
440-38480-2	E-001-D2	Total/NA	Water	625	87046
440-38480-3	A-002	Total/NA	Water	625	87046
LCS 440-87046/2-A	Lab Control Sample	Total/NA	Water	625	87046
LCS D 440-87046/3-A	Lab Control Sample Dup	Total/NA	Water	625	87046
MB 440-87046/1-A	Method Blank	Total/NA	Water	625	87046

## GC Semi VOA

### Prep Batch: 86646

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-1	E-001-DC	Total/NA	Water	608	
440-38480-2	E-001-D2	Total/NA	Water	608	
440-38480-3	A-002	Total/NA	Water	608	
440-38299-AJ-1-A MS	Matrix Spike	Total/NA	Water	608	
440-38299-AK-1-A MSD	Matrix Spike Duplicate	Total/NA	Water	608	
440-38299-AM-1-A MS	Matrix Spike	Total/NA	Water	608	
440-38299-AN-1-A MSD	Matrix Spike Duplicate	Total/NA	Water	608	
LCS 440-86646/2-A	Lab Control Sample	Total/NA	Water	608	
LCS 440-86646/5-A	Lab Control Sample	Total/NA	Water	608	
MB 440-86646/1-A	Method Blank	Total/NA	Water	608	

### Analysis Batch: 87071

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-1	E-001-DC	Total/NA	Water	608	86646
440-38480-2	E-001-D2	Total/NA	Water	608	86646
440-38480-3	A-002	Total/NA	Water	608	86646
440-38299-AJ-1-A MS	Matrix Spike	Total/NA	Water	608	86646
440-38299-AK-1-A MSD	Matrix Spike Duplicate	Total/NA	Water	608	86646
LCS 440-86646/2-A	Lab Control Sample	Total/NA	Water	608	86646
MB 440-86646/1-A	Method Blank	Total/NA	Water	608	86646

# QC Association Summary

Client: Veolia Water N. America Operating Srvs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## GC Semi VOA (Continued)

### Analysis Batch: 87306

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-1	E-001-DC	Total/NA	Water	608	86646
440-38480-2	E-001-D2	Total/NA	Water	608	86646
440-38299-AM-1-A MS	Matrix Spike	Total/NA	Water	608	86646
440-38299-AN-1-A MSD	Matrix Spike Duplicate	Total/NA	Water	608	86646
LCS 440-86646/5-A	Lab Control Sample	Total/NA	Water	608	86646
MB 440-86646/1-A	Method Blank	Total/NA	Water	608	86646

### Analysis Batch: 87862

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-3	A-002	Total/NA	Water	608	86646

## Metals

### Prep Batch: 86823

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38208-G-1-C MS	Matrix Spike	Total Recoverable	Water	200.2	
440-38208-G-1-D MSD	Matrix Spike Duplicate	Total Recoverable	Water	200.2	
440-38480-1	E-001-DC	Total Recoverable	Water	200.2	
440-38480-2	E-001-D2	Total Recoverable	Water	200.2	
440-38480-3	A-002	Total Recoverable	Water	200.2	
LCS 440-86823/2-A	Lab Control Sample	Total Recoverable	Water	200.2	
MB 440-86823/1-A	Method Blank	Total Recoverable	Water	200.2	

### Analysis Batch: 87060

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38208-G-1-C MS	Matrix Spike	Total Recoverable	Water	200.8	86823
440-38208-G-1-D MSD	Matrix Spike Duplicate	Total Recoverable	Water	200.8	86823
440-38480-1	E-001-DC	Total Recoverable	Water	200.8	86823
440-38480-2	E-001-D2	Total Recoverable	Water	200.8	86823
440-38480-3	A-002	Total Recoverable	Water	200.8	86823
LCS 440-86823/2-A	Lab Control Sample	Total Recoverable	Water	200.8	86823
MB 440-86823/1-A	Method Blank	Total Recoverable	Water	200.8	86823

## General Chemistry

### Analysis Batch: 86272

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38099-E-1 MS	Matrix Spike	Total/NA	Water	SM 4500 NH3 D	
440-38099-E-1 MSD	Matrix Spike Duplicate	Total/NA	Water	SM 4500 NH3 D	
440-38480-2	E-001-D2	Total/NA	Water	SM 4500 NH3 D	
LCS 440-86272/7	Lab Control Sample	Total/NA	Water	SM 4500 NH3 D	
MB 440-86272/9	Method Blank	Total/NA	Water	SM 4500 NH3 D	

### Prep Batch: 86665

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38011-N-5-B MS	Matrix Spike	Total/NA	Water	Distill/CN	
440-38011-N-5-C MSD	Matrix Spike Duplicate	Total/NA	Water	Distill/CN	
440-38480-1	E-001-DC	Total/NA	Water	Distill/CN	
440-38480-2	E-001-D2	Total/NA	Water	Distill/CN	
440-38480-3	A-002	Total/NA	Water	Distill/CN	

TestAmerica Irvine

# QC Association Summary

Client: Veolia Water N. America Operating Srvs  
 Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## General Chemistry (Continued)

### Prep Batch: 86665 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCS 440-86665/2-A	Lab Control Sample	Total/NA	Water	Distill/CN	
MB 440-86665/1-A	Method Blank	Total/NA	Water	Distill/CN	

### Analysis Batch: 86754

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38011-N-5-B MS	Matrix Spike	Total/NA	Water	SM 4500 CN E	86665
440-38011-N-5-C MSD	Matrix Spike Duplicate	Total/NA	Water	SM 4500 CN E	86665
440-38480-1	E-001-DC	Total/NA	Water	SM 4500 CN E	86665
440-38480-2	E-001-D2	Total/NA	Water	SM 4500 CN E	86665
440-38480-3	A-002	Total/NA	Water	SM 4500 CN E	86665
LCS 440-86665/2-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	86665
MB 440-86665/1-A	Method Blank	Total/NA	Water	SM 4500 CN E	86665

### Analysis Batch: 86928

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-38480-1	E-001-DC	Total/NA	Water	SM 2540B	
440-38480-1 DU	E-001-DC	Total/NA	Water	SM 2540B	
440-38480-2	E-001-D2	Total/NA	Water	SM 2540B	
440-38480-3	A-002	Total/NA	Water	SM 2540B	
LCS 440-86928/2	Lab Control Sample	Total/NA	Water	SM 2540B	
MB 440-86928/1	Method Blank	Total/NA	Water	SM 2540B	

# Definitions/Glossary

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Qualifiers

### GC/MS Semi VOA

Qualifier	Qualifier Description
*	LCS or LCSD exceeds the control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
X	Surrogate is outside control limits

### Metals

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
$\alpha$	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Certification Summary

Client: Veolia Water N. America Operating Svcs  
Project/Site: SemiAnnual

TestAmerica Job ID: 440-38480-1

## Laboratory: TestAmerica Irvine

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
Alaska	State Program	10	CA01531	06-30-13
Arizona	State Program	9	AZ0671	10-13-13
California	LA Cty Sanitation Districts	9	10256	01-31-14
California	NELAP	9	1108CA	01-31-14
California	State Program	9	2706	06-30-14
Guam	State Program	9	Cert. No. 12.002r	02-28-13
Nevada	State Program	9	CA015312007A	07-31-13
Oregon	NELAP	10	4005	09-12-13
USDA	Federal		P330-09-00080	06-06-14
USEPA UCMR	Federal	1	CA01531	01-31-15

#440-9400

17461 Derian Ave., #100, Irvine, CA 92614 (949) 261-1022 FAX (949) 260-3297  
 1014 E. Cooley Dr., Suite A, Colton, CA 92324 (909) 370-4667 FAX (909) 370-1046  
 4625 E. Cotton Center Blvd., Suite 189, Phoenix, AZ 85040 (602) 437-3340 FAX (602) 454-9303  
 6000 S. Eastern Ave., Suite 5E, Las Vegas, NV 89119 (702) 429-1264

# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## CHAIN OF CUSTODY FORM

Page 34 of 36

Sample Description	Sample Matrix	Container Type	# of Cont.	Sampling Date	Sampling Time	Preservatives	Analysis Required					Special Instructions
							Ammonia-N	As, Cd, Cr, Pb, Ni, Hg, Zn	625 (all)	608 Pesticides	For	
E-001-DC	Aq	Pt	1	2/14/13	1509	Sulfuric Acid or NaOH	✓					G-3
E-001-DR	Aq	Pt	1	2/14/13	1327	NaOH	✓					G
A-002	Aq	Pt	1	2/14/13	1241	NaOH	✓					G
E-001-D2	Aq	Pt	1	2/14/13	1327	H <sub>2</sub> SO <sub>4</sub>	✓					C
A-002	Aq	Pt	1	2/14/13	0803	HNO <sub>3</sub>	✓					C
E-001-DC	Aq	Pt	1	2/15/13	1309	HNO <sub>3</sub>	✓					C
E-001-D2	Aq	Pt	1	2/15/13	0910	HNO <sub>3</sub>	✓					G
E-001-D2	Aq	AL	2	2/14/13	1327	<6°C		✓				G
E-001-DC	Aq	AL	2	2/14/13	1339	<6°C		✓				G
A-002	Aq	AL	2	2/14/13	1310	<6°C		✓				G
E-001-D2	Aq	AL	2	2/14/13	1327	<6°C		✓				G
E-001-DC	Aq	AL	2	2/14/13	1339	<6°C		✓				G
A-002	Aq	AL	2	2/14/13	1310	<6°C		✓				G

Relinquished By: <i>Jean McMahon</i>	Date/Time: 2-15-13 13:00	Received By: <i>Debra Taylor</i>	Date/Time: 2-15-13 13:00
Relinquished By: <i>Debra Taylor</i>	Date/Time: 2-15-13 19:00	Received By: <i>Jean McMahon</i>	Date/Time: 2-16-13 10:00
Relinquished By:	Date/Time:	Received in Lab By:	Date/Time:

Turnaround Time: (Check)	72 hours
same day	5 days
24 hours	normal
48 hours	
Sample Integrity: (Check)	intact on ice

Note: By relinquishing samples to TestAmerica, client agrees to pay for the services requested on this chain of custody form and any additional analyses performed on this project. Payment for services is due within 30 days from the date of invoice. Sample(s) will be disposed of after 30 days.

3/5/2013

## CHAIN OF CUSTODY FORM

Client Name / Address:		Project / PO Number:		Analysis Required			
Yeolia Water 601 Canal Blvd Richmond, CA 94804		Semi-annual #2					
Project Manager: Jean McMahon		Phone Number: 510 812 9215					
Sampler: JM/SS		Fax Number:					
Sample Description	Sample Matrix	Container Type	# of Cont.	Sampling Date	Sampling Time	Preservatives	Special Instructions
A-002	A <sub>2</sub>	AL	1	2/14/13	1310	≤6°C	✓
E-001-DC	A <sub>2</sub>	AL	1	2/14/13	1327	≤6°C	✓
E-001-DC	A <sub>2</sub>	AL	1	2/14/13	1339	≤6°C	✓
Total Solids							
Relinquished By: <i>Jean McMahon</i>		Date / Time: 2-15-13 13:00	Received By: <i>Deirdre Taylor</i>		Date / Time: 2-15-13 13:00	Turnaround Time: (Check)	
Relinquished By: <i>Deirdre Taylor</i>		Date / Time: 2-15-13 19:00	Received By:		Date / Time:	same day _____ 72 hours _____ 24 hours _____ 5 days _____ 48 hours _____ normal _____	
Relinquished By:		Date / Time:	Received in Lab. By:		Date / Time:	Sample Integrity: (Check)	
			<i>Jean McMahon</i>		2/15/13 10:00	intact _____ on ice _____	

Note: By relinquishing samples to TestAmerica, client agrees to pay for the services requested on this chain of custody form and any additional analyses performed on this project. Payment for services is due within 30 days from the date of invoice. Sample(s) will be disposed of after 30 days.

513



## Login Sample Receipt Checklist

Client: Veolia Water N. America Operating Srvs

Job Number: 440-38480-1

**Login Number: 38480**

**List Number: 1**

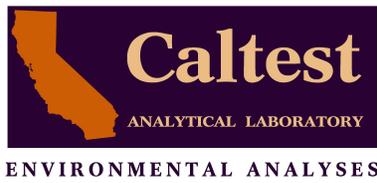
**Creator: Avila, Stephanie**

**List Source: TestAmerica Irvine**

Question	Answer	Comment
Radioactivity wasn't checked or is <=/ background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	JMA & JS & OPS
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



## **Attachment B: Influent and Effluent Lab Results for Volatile Organics and Selenium**



Monday, March 04, 2013

Jean McMahon  
Veolia Water / Richmond  
601 Canal Boulevard  
Richmond, CA 94804

RE: Lab Order: N020652  
Project ID: SEMI ANNUAL

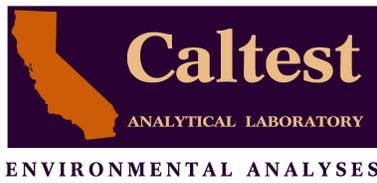
Collected By: JM/JS/OPS  
PO/Contract #:

Dear Jean McMahon:

Enclosed are the analytical results for sample(s) received by the laboratory on Friday, February 15, 2013. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report. If you have any questions concerning this report, please feel free to contact me.

Enclosures

Project Manager: Danielle Regan



### SAMPLE SUMMARY

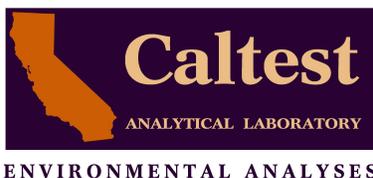
Lab Order: N020652

Project ID: SEMI ANNUAL

Lab ID	Sample ID	Matrix	Date Collected	Date Received
N020652001	E001-DC	Water	2/14/2013 13:39	2/15/2013 14:34
N020652002	E001-D2	Water	2/14/2013 13:27	2/15/2013 14:34
N020652003	A002	Water	2/14/2013 12:41	2/15/2013 14:34
N020652004	E001-DC	Water	2/14/2013 13:09	2/15/2013 14:34
N020652005	E001-D2	Water	2/14/2013 09:10	2/15/2013 14:34
N020652006	A002	Water	2/14/2013 08:03	2/15/2013 14:34

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## NARRATIVE

Lab Order: N020652  
Project ID: SEMI ANNUAL

### General Qualifiers and Notes

Caltest authorizes this report to be reproduced only in its entirety. Results are specific to the sample(s) as submitted and only to the parameter(s) reported.

Caltest certifies that all test results for wastewater and hazardous waste analyses meet all applicable NELAC requirements; all microbiology and drinking water testing meet applicable ELAP requirements, unless stated otherwise.

All analyses performed by EPA Methods or Standard Methods (SM) 20th Edition except where noted (SMOL=online edition).

Caltest collects samples in compliance with 40 CFR, EPA Methods, Cal. Title 22, and Standard Methods.

Dilution Factors (DF) reported greater than '1' have been used to adjust the result, Reporting Limit (RL), and Method Detection Limit (MDL).

All Solid, sludge, and/or biosolids data is reported in Wet Weight, unless otherwise specified.

Filtrations performed at Caltest for dissolved metals (excluding mercury) and/or pH analysis were not performed within the 15 minute holding time as specified by 40CFR 136.3 table II.

Results Qualifiers: Report fields may contain codes and non-numeric data correlating to one or more of the following definitions:

ND - Non Detect - indicates analytical result has not been detected.

RL - Reporting Limit is the quantitation limit at which the laboratory is able to detect an analyte. An analyte not detected at or above the RL is reported as ND unless otherwise noted or qualified. For analyses pertaining to the State Implementation Plan of the California Toxics Rule, the Caltest Reporting Limit (RL) is equivalent to the Minimum Level (ML). A standard is always run at or below the ML. Where Reporting Limits are elevated due to dilution, the ML calibration criteria has been met.

J - reflects estimated analytical result value detected below the Reporting Limit (RL) and above the Method Detection Limit (MDL). The 'J' flag is equivalent to the DNQ Estimated Concentration flag.

E - indicates an estimated analytical result value.

B - indicates the analyte has been detected in the blank associated with the sample.

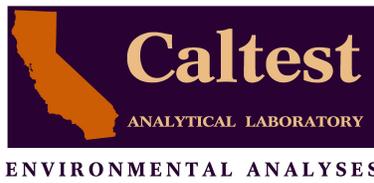
NC - means not able to be calculated for RPD or Spike Recoveries.

SS - compound is a Surrogate Spike used per laboratory quality assurance manual.

NOTE: This document represents a complete Analytical Report for the samples referenced herein and should be retained as a permanent record thereof.

### Qualifiers and Compound Notes

- 1 Analyte(s) reported as 'ND' means not detected at or above the listed Method Detection Limits (MDL).
- 2 Caltest allows one surrogate outside of laboratory control limits per SOP.
- 3 Sample diluted prior to analysis in an effort to reduce matrix interferences resulting in higher reporting limit(s).
- 4 Sample diluted due to a high concentration of non-target analyte(s), resulting in increased reporting limits.
- 5 Due to matrix interferences present in the sample, surrogate recoveries failed to meet the QA/QC acceptance criteria.



**NARRATIVE**

Lab Order: N020652  
Project ID: SEMI ANNUAL

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**Qualifiers and Compound Notes**

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6 Surrogates did not meet Caltest internal acceptance criteria. The sample passes all pertinent method criteria.





## ENVIRONMENTAL ANALYSES

## ANALYTICAL RESULTS

Lab Order: N020652

Project ID SEMI ANNUAL

Lab ID: N020652001 Date Collected: 2/14/2013 13:39 Matrix: Water  
 Sample ID: E001-DC Date Received: 2/15/2013 14:34

Parameters	Result Units	R. L.	MDL	DF Prepared	Batch	Analyzed	Batch	Qual
<b>Volatile Organic Analysis</b>		<b>Analytical Method: EPA 624</b>			<b>Analyzed by: AN</b>			
Acrolein	ND ug/L	5	1.7	1		02/19/13 19:30	VMS 2826	1
Acrylonitrile	ND ug/L	2.0	1.0	1		02/19/13 19:30	VMS 2826	
Benzene	ND ug/L	0.5	0.18	1		02/19/13 19:30	VMS 2826	
Bromodichloromethane	4.0 ug/L	0.5	0.16	1		02/19/13 19:30	VMS 2826	
Bromoform	ND ug/L	0.5	0.20	1		02/19/13 19:30	VMS 2826	
Bromomethane (Methyl Bromide)	ND ug/L	0.5	0.17	1		02/19/13 19:30	VMS 2826	
Carbon tetrachloride	ND ug/L	0.5	0.16	1		02/19/13 19:30	VMS 2826	
Chlorobenzene	ND ug/L	0.5	0.18	1		02/19/13 19:30	VMS 2826	
Chloroethane (Ethyl Chloride)	ND ug/L	0.5	0.38	1		02/19/13 19:30	VMS 2826	
2-Chloroethyl vinyl ether	ND ug/L	1.0	0.28	1		02/19/13 19:30	VMS 2826	
Chloroform	10 ug/L	0.5	0.19	1		02/19/13 19:30	VMS 2826	
Chloromethane(Methyl Chloride)	ND ug/L	0.5	0.23	1		02/19/13 19:30	VMS 2826	
Dibromochloromethane	1.4 ug/L	0.5	0.17	1		02/19/13 19:30	VMS 2826	
1,2-Dichlorobenzene	ND ug/L	0.5	0.27	1		02/19/13 19:30	VMS 2826	
1,3-Dichlorobenzene	ND ug/L	0.5	0.18	1		02/19/13 19:30	VMS 2826	
1,4-Dichlorobenzene	ND ug/L	0.5	0.18	1		02/19/13 19:30	VMS 2826	
Dichlorodifluoromethane (F-12)	ND ug/L	0.5	0.30	1		02/19/13 19:30	VMS 2826	
1,1-Dichloroethane	ND ug/L	0.5	0.19	1		02/19/13 19:30	VMS 2826	
1,2-Dichloroethane (EDC)	ND ug/L	0.5	0.18	1		02/19/13 19:30	VMS 2826	
1,1-Dichloroethene	ND ug/L	0.5	0.21	1		02/19/13 19:30	VMS 2826	
cis-1,2-Dichloroethene	ND ug/L	0.5	0.20	1		02/19/13 19:30	VMS 2826	
trans-1,2-Dichloroethene	ND ug/L	0.5	0.22	1		02/19/13 19:30	VMS 2826	
1,2-Dichloropropane	ND ug/L	0.5	0.18	1		02/19/13 19:30	VMS 2826	
cis-1,3-Dichloropropene	ND ug/L	0.5	0.16	1		02/19/13 19:30	VMS 2826	
trans-1,3-Dichloropropene	ND ug/L	0.5	0.16	1		02/19/13 19:30	VMS 2826	
Dichlorotrifluoroethane (F123)	ND ug/L	0.5	0.14	1		02/19/13 19:30	VMS 2826	
Ethylbenzene	ND ug/L	0.5	0.26	1		02/19/13 19:30	VMS 2826	
Methyl tert-butyl ether (MTBE)	0.8 ug/L	0.5	0.15	1		02/19/13 19:30	VMS 2826	
Methylene chloride	ND ug/L	0.5	0.30	1		02/19/13 19:30	VMS 2826	
1,1,1,2-Tetrachloroethane	ND ug/L	0.5	0.20	1		02/19/13 19:30	VMS 2826	
Tetrachloroethene (PCE)	ND ug/L	0.5	0.19	1		02/19/13 19:30	VMS 2826	
Toluene	0.5 ug/L	0.5	0.19	1		02/19/13 19:30	VMS 2826	
1,1,2-Trichloroethane	ND ug/L	0.5	0.16	1		02/19/13 19:30	VMS 2826	
1,1,1-Trichloroethane (TCA)	ND ug/L	0.5	0.19	1		02/19/13 19:30	VMS 2826	
Trichloroethene (TCE)	ND ug/L	0.5	0.20	1		02/19/13 19:30	VMS 2826	

3/4/2013 10:33

## REPORT OF LABORATORY ANALYSIS

Page 5 of 16

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 (707) 258-4000 • Fax (707) 226-1001 • e-mail: info@caltestlabs.com



## ENVIRONMENTAL ANALYSES

## ANALYTICAL RESULTS

Lab Order: N020652

Project ID SEMI ANNUAL

Lab ID: N020652001 Date Collected: 2/14/2013 13:39 Matrix: Water  
 Sample ID: E001-DC Date Received: 2/15/2013 14:34

Parameters	Result Units	R. L.	MDL	DF Prepared	Batch	Analyzed	Batch	Qual
Trichlorofluoromethane (F-11)	ND ug/L	0.5	0.29	1		02/19/13 19:30	VMS 2826	
Trichlorotrifluoroethane (F113)	ND ug/L	1.0	0.11	1		02/19/13 19:30	VMS 2826	
Vinyl chloride	ND ug/L	0.5	0.25	1		02/19/13 19:30	VMS 2826	
Xylenes, total	ND ug/L	0.5	0.26	1		02/19/13 19:30	VMS 2826	
4-Bromofluorobenzene (SS)	104 %	85-115		1		02/19/13 19:30	VMS 2826	
Dibromofluoromethane (SS)	104 %	85-115		1		02/19/13 19:30	VMS 2826	
1,2-Dichloroethane-d4 (SS)	104 %	75-125		1		02/19/13 19:30	VMS 2826	
Toluene-d8 (SS)	88 %	90-121		1		02/19/13 19:30	VMS 2826	2

Lab ID: N020652002 Date Collected: 2/14/2013 13:27 Matrix: Water  
 Sample ID: E001-D2 Date Received: 2/15/2013 14:34

Parameters	Result Units	R. L.	MDL	DF Prepared	Batch	Analyzed	Batch	Qual
<b>Volatile Organic Analysis</b>		<b>Analytical Method: EPA 624</b>			<b>Analyzed by: AN</b>			
Acrolein	ND ug/L	5	1.7	1		02/19/13 20:12	VMS 2826	1
Acrylonitrile	ND ug/L	2.0	1.0	1		02/19/13 20:12	VMS 2826	
Benzene	ND ug/L	0.5	0.18	1		02/19/13 20:12	VMS 2826	
Bromodichloromethane	0.8 ug/L	0.5	0.16	1		02/19/13 20:12	VMS 2826	
Bromoform	ND ug/L	0.5	0.20	1		02/19/13 20:12	VMS 2826	
Bromomethane (Methyl Bromide)	ND ug/L	0.5	0.17	1		02/19/13 20:12	VMS 2826	
Carbon tetrachloride	ND ug/L	0.5	0.16	1		02/19/13 20:12	VMS 2826	
Chlorobenzene	ND ug/L	0.5	0.18	1		02/19/13 20:12	VMS 2826	
Chloroethane (Ethyl Chloride)	ND ug/L	0.5	0.38	1		02/19/13 20:12	VMS 2826	
2-Chloroethyl vinyl ether	ND ug/L	1.0	0.28	1		02/19/13 20:12	VMS 2826	
Chloroform	2.9 ug/L	0.5	0.19	1		02/19/13 20:12	VMS 2826	
Chloromethane(Methyl Chloride)	ND ug/L	0.5	0.23	1		02/19/13 20:12	VMS 2826	
Dibromochloromethane	J0.3 ug/L	0.5	0.17	1		02/19/13 20:12	VMS 2826	
1,2-Dichlorobenzene	ND ug/L	0.5	0.27	1		02/19/13 20:12	VMS 2826	
1,3-Dichlorobenzene	ND ug/L	0.5	0.18	1		02/19/13 20:12	VMS 2826	
1,4-Dichlorobenzene	ND ug/L	0.5	0.18	1		02/19/13 20:12	VMS 2826	
Dichlorodifluoromethane (F-12)	ND ug/L	0.5	0.30	1		02/19/13 20:12	VMS 2826	
1,1-Dichloroethane	ND ug/L	0.5	0.19	1		02/19/13 20:12	VMS 2826	
1,2-Dichloroethane (EDC)	ND ug/L	0.5	0.18	1		02/19/13 20:12	VMS 2826	



ENVIRONMENTAL ANALYSES

**ANALYTICAL RESULTS**

Lab Order: N020652

Project ID SEMI ANNUAL

**Lab ID: N020652002** Date Collected: 2/14/2013 13:27 Matrix: Water  
**Sample ID: E001-D2** Date Received: 2/15/2013 14:34

Parameters	Result Units	R. L.	MDL	DF Prepared	Batch	Analyzed	Batch	Qual
1,1-Dichloroethene	ND ug/L	0.5	0.21	1		02/19/13 20:12	VMS 2826	
cis-1,2-Dichloroethene	ND ug/L	0.5	0.20	1		02/19/13 20:12	VMS 2826	
trans-1,2-Dichloroethene	ND ug/L	0.5	0.22	1		02/19/13 20:12	VMS 2826	
1,2-Dichloropropane	ND ug/L	0.5	0.18	1		02/19/13 20:12	VMS 2826	
cis-1,3-Dichloropropene	ND ug/L	0.5	0.16	1		02/19/13 20:12	VMS 2826	
trans-1,3-Dichloropropene	ND ug/L	0.5	0.16	1		02/19/13 20:12	VMS 2826	
Dichlorotrifluoroethane (F123)	ND ug/L	0.5	0.14	1		02/19/13 20:12	VMS 2826	
Ethylbenzene	ND ug/L	0.5	0.26	1		02/19/13 20:12	VMS 2826	
Methyl tert-butyl ether (MTBE)	0.9 ug/L	0.5	0.15	1		02/19/13 20:12	VMS 2826	
Methylene chloride	ND ug/L	0.5	0.30	1		02/19/13 20:12	VMS 2826	
1,1,2,2-Tetrachloroethane	ND ug/L	0.5	0.20	1		02/19/13 20:12	VMS 2826	
Tetrachloroethene (PCE)	ND ug/L	0.5	0.19	1		02/19/13 20:12	VMS 2826	
Toluene	0.7 ug/L	0.5	0.19	1		02/19/13 20:12	VMS 2826	
1,1,2-Trichloroethane	ND ug/L	0.5	0.16	1		02/19/13 20:12	VMS 2826	
1,1,1-Trichloroethane (TCA)	ND ug/L	0.5	0.19	1		02/19/13 20:12	VMS 2826	
Trichloroethene (TCE)	ND ug/L	0.5	0.20	1		02/19/13 20:12	VMS 2826	
Trichlorofluoromethane (F-11)	ND ug/L	0.5	0.29	1		02/19/13 20:12	VMS 2826	
Trichlorotrifluoroethane (F113)	ND ug/L	1.0	0.11	1		02/19/13 20:12	VMS 2826	
Vinyl chloride	ND ug/L	0.5	0.25	1		02/19/13 20:12	VMS 2826	
Xylenes, total	ND ug/L	0.5	0.26	1		02/19/13 20:12	VMS 2826	
4-Bromofluorobenzene (SS)	105 %	85-115		1		02/19/13 20:12	VMS 2826	
Dibromofluoromethane (SS)	105 %	85-115		1		02/19/13 20:12	VMS 2826	
1,2-Dichloroethane-d4 (SS)	102 %	75-125		1		02/19/13 20:12	VMS 2826	
Toluene-d8 (SS)	87 %	90-121		1		02/19/13 20:12	VMS 2826	2

**Lab ID: N020652003** Date Collected: 2/14/2013 12:41 Matrix: Water  
**Sample ID: A002** Date Received: 2/15/2013 14:34

Parameters	Result Units	R. L.	MDL	DF Prepared	Batch	Analyzed	Batch	Qual
<b>Volatile Organic Analysis</b>		<b>Analytical Method: EPA 624</b>			<b>Analyzed by: AN</b>			
Acrolein	ND ug/L	20	8.5	5		02/19/13 20:54	VMS 2826	3
Acrylonitrile	ND ug/L	10	5.0	5		02/19/13 20:54	VMS 2826	
Benzene	ND ug/L	2.5	0.90	5		02/19/13 20:54	VMS 2826	





## ENVIRONMENTAL ANALYSES

## ANALYTICAL RESULTS

Lab Order: N020652

Project ID SEMI ANNUAL

Lab ID: **N020652003** Date Collected: 2/14/2013 12:41 Matrix: Water  
 Sample ID: **A002** Date Received: 2/15/2013 14:34

Parameters	Result Units	R. L.	MDL	DF Prepared	Batch	Analyzed	Batch	Qual
Bromodichloromethane	ND ug/L	2.5	0.80	5		02/19/13 20:54	VMS 2826	
Bromoform	ND ug/L	2.5	1.0	5		02/19/13 20:54	VMS 2826	
Bromomethane (Methyl Bromide)	ND ug/L	2.5	0.85	5		02/19/13 20:54	VMS 2826	
Carbon tetrachloride	ND ug/L	2.5	0.80	5		02/19/13 20:54	VMS 2826	
Chlorobenzene	ND ug/L	2.5	0.90	5		02/19/13 20:54	VMS 2826	
Chloroethane (Ethyl Chloride)	ND ug/L	2.5	1.9	5		02/19/13 20:54	VMS 2826	
2-Chloroethyl vinyl ether	ND ug/L	5.0	1.4	5		02/19/13 20:54	VMS 2826	
Chloroform	6.6 ug/L	2.5	0.95	5		02/19/13 20:54	VMS 2826	
Chloromethane(Methyl Chloride)	ND ug/L	2.5	1.2	5		02/19/13 20:54	VMS 2826	
Dibromochloromethane	ND ug/L	2.5	0.85	5		02/19/13 20:54	VMS 2826	
1,2-Dichlorobenzene	ND ug/L	2.5	1.4	5		02/19/13 20:54	VMS 2826	
1,3-Dichlorobenzene	ND ug/L	2.5	0.90	5		02/19/13 20:54	VMS 2826	
1,4-Dichlorobenzene	ND ug/L	2.5	0.90	5		02/19/13 20:54	VMS 2826	
Dichlorodifluoromethane (F-12)	ND ug/L	2.5	1.5	5		02/19/13 20:54	VMS 2826	
1,1-Dichloroethane	ND ug/L	2.5	0.95	5		02/19/13 20:54	VMS 2826	
1,2-Dichloroethane (EDC)	ND ug/L	2.5	0.90	5		02/19/13 20:54	VMS 2826	
1,1-Dichloroethene	ND ug/L	2.5	1.0	5		02/19/13 20:54	VMS 2826	
cis-1,2-Dichloroethene	ND ug/L	2.5	1.0	5		02/19/13 20:54	VMS 2826	
trans-1,2-Dichloroethene	ND ug/L	2.5	1.1	5		02/19/13 20:54	VMS 2826	
1,2-Dichloropropane	ND ug/L	2.5	0.90	5		02/19/13 20:54	VMS 2826	
cis-1,3-Dichloropropene	ND ug/L	2.5	0.80	5		02/19/13 20:54	VMS 2826	
trans-1,3-Dichloropropene	ND ug/L	2.5	0.80	5		02/19/13 20:54	VMS 2826	
Dichlorotrifluoroethane (F123)	ND ug/L	2.5	0.70	5		02/19/13 20:54	VMS 2826	
Ethylbenzene	ND ug/L	2.5	1.3	5		02/19/13 20:54	VMS 2826	
Methyl tert-butyl ether (MTBE)	ND ug/L	2.5	0.75	5		02/19/13 20:54	VMS 2826	
Methylene chloride	ND ug/L	3.0	1.5	5		02/19/13 20:54	VMS 2826	
1,1,2,2-Tetrachloroethane	ND ug/L	2.5	1.0	5		02/19/13 20:54	VMS 2826	
Tetrachloroethene (PCE)	ND ug/L	2.5	0.95	5		02/19/13 20:54	VMS 2826	
Toluene	2.6 ug/L	2.5	0.95	5		02/19/13 20:54	VMS 2826	
1,1,2-Trichloroethane	ND ug/L	2.5	0.80	5		02/19/13 20:54	VMS 2826	
1,1,1-Trichloroethane (TCA)	ND ug/L	2.5	0.95	5		02/19/13 20:54	VMS 2826	
Trichloroethene (TCE)	ND ug/L	2.5	1.0	5		02/19/13 20:54	VMS 2826	
Trichlorofluoromethane (F-11)	ND ug/L	2.5	1.4	5		02/19/13 20:54	VMS 2826	
Trichlorotrifluoroethane (F113)	ND ug/L	2.5	0.55	5		02/19/13 20:54	VMS 2826	
Vinyl chloride	ND ug/L	2.5	1.2	5		02/19/13 20:54	VMS 2826	



**ANALYTICAL RESULTS**

Lab Order: N020652  
 Project ID SEMI ANNUAL

**Lab ID: N020652003** Date Collected: 2/14/2013 12:41 Matrix: Water  
**Sample ID: A002** Date Received: 2/15/2013 14:34

Parameters	Result	Units	R. L.	MDL	DF	Prepared	Batch	Analyzed	Batch	Qual
Xylenes, total	ND	ug/L	2.5	1.3	5			02/19/13 20:54	VMS 2826	
4-Bromofluorobenzene (SS)	98	%	85-115		5			02/19/13 20:54	VMS 2826	
Dibromofluoromethane (SS)	106	%	85-115		5			02/19/13 20:54	VMS 2826	
1,2-Dichloroethane-d4 (SS)	102	%	75-125		5			02/19/13 20:54	VMS 2826	
Toluene-d8 (SS)	96	%	90-121		5			02/19/13 20:54	VMS 2826	2

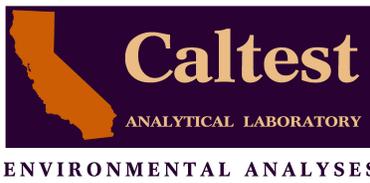
**Lab ID: N020652004** Date Collected: 2/14/2013 13:09 Matrix: Water  
**Sample ID: E001-DC** Date Received: 2/15/2013 14:34

Parameters	Result	Units	R. L.	MDL	DF	Prepared	Batch	Analyzed	Batch	Qual
<b>Metals by ICPMS Collision Mode, Total</b>		<b>Prep Method:</b> EPA 200.8		<b>Prep by:</b> UK						
		<b>Analytical Method:</b> EPA 200.8		<b>Analyzed by:</b> SMD						
Selenium	J0.49	ug/L	1.0	0.40	1	02/21/13 00:00	MPR 11658	02/22/13 21:31	MMS 6701	
<b>Chlorinated Pesticides &amp; PCBs Analysis</b>		<b>Prep Method:</b> EPA 608		<b>Prep by:</b> EAB						
		<b>Analytical Method:</b> EPA 608		<b>Analyzed by:</b> NTA						
4,4'-DDD	ND	ug/L	0.010	0.0040	1	02/21/13 00:00	SPR 5759	03/01/13 12:52	SMS 3021	1
Heptachlor	ND	ug/L	0.010	0.0050	1	02/21/13 00:00	SPR 5759	03/01/13 12:52	SMS 3021	
Decachlorobiphenyl (SS)	52	%	10-195		1	02/21/13 00:00	SPR 5759	03/01/13 12:52	SMS 3021	
Tetrachloro-m-xylene (SS)	86	%	25-105		1	02/21/13 00:00	SPR 5759	03/01/13 12:52	SMS 3021	

**Lab ID: N020652005** Date Collected: 2/14/2013 09:10 Matrix: Water  
**Sample ID: E001-D2** Date Received: 2/15/2013 14:34

Parameters	Result	Units	R. L.	MDL	DF	Prepared	Batch	Analyzed	Batch	Qual
<b>Metals by ICPMS Collision Mode, Total</b>		<b>Prep Method:</b> EPA 200.8		<b>Prep by:</b> UK						
		<b>Analytical Method:</b> EPA 200.8		<b>Analyzed by:</b> SMD						
Selenium	J0.42	ug/L	1.0	0.40	1	02/21/13 00:00	MPR 11658	02/22/13 21:37	MMS 6701	
<b>Chlorinated Pesticides &amp; PCBs Analysis</b>		<b>Prep Method:</b> EPA 608		<b>Prep by:</b> EAB						
		<b>Analytical Method:</b> EPA 608		<b>Analyzed by:</b> NTA						
4,4'-DDD	ND	ug/L	0.010	0.0040	1	02/21/13 00:00	SPR 5759	03/01/13 13:20	SMS 3021	1
Heptachlor	ND	ug/L	0.010	0.0050	1	02/21/13 00:00	SPR 5759	03/01/13 13:20	SMS 3021	





**ANALYTICAL RESULTS**

Lab Order: N020652  
 Project ID SEMI ANNUAL

**Lab ID: N020652005** Date Collected: 2/14/2013 09:10 Matrix: Water  
**Sample ID: E001-D2** Date Received: 2/15/2013 14:34

Parameters	Result	Units	R. L.	MDL	DF	Prepared	Batch	Analyzed	Batch	Qual
Decachlorobiphenyl (SS)	53	%	10-195		1	02/21/13 00:00	SPR 5759	03/01/13 13:20	SMS 3021	
Tetrachloro-m-xylene (SS)	80	%	25-105		1	02/21/13 00:00	SPR 5759	03/01/13 13:20	SMS 3021	

**Lab ID: N020652006** Date Collected: 2/14/2013 08:03 Matrix: Water  
**Sample ID: A002** Date Received: 2/15/2013 14:34

Parameters	Result	Units	R. L.	MDL	DF	Prepared	Batch	Analyzed	Batch	Qual
<b>Metals by ICPMS Collision Mode, Total</b>		<b>Prep Method:</b> EPA 200.8		<b>Prep by:</b> UK						
		<b>Analytical Method:</b> EPA 200.8		<b>Analyzed by:</b> SMD						
Selenium	1.0	ug/L	1.0	0.40	1	02/21/13 00:00	MPR 11658	02/22/13 21:43	MMS 6701	
<b>Chlorinated Pesticides &amp; PCBs Analysis</b>		<b>Prep Method:</b> EPA 608		<b>Prep by:</b> EAB						
		<b>Analytical Method:</b> EPA 608		<b>Analyzed by:</b> NTA						
4,4'-DDD	ND	ug/L	0.10	0.0080	2	02/21/13 00:00	SPR 5759	03/01/13 14:41	SMS 3021	1,4
Heptachlor	ND	ug/L	0.050	0.010	2	02/21/13 00:00	SPR 5759	03/01/13 14:41	SMS 3021	
Decachlorobiphenyl (SS)	4.8	%	10-195		2	02/21/13 00:00	SPR 5759	03/01/13 14:41	SMS 3021	5,6
Tetrachloro-m-xylene (SS)	98	%	25-105		2	02/21/13 00:00	SPR 5759	03/01/13 14:41	SMS 3021	





**QUALITY CONTROL DATA**

Lab Order: N020652

Project ID: SEMI ANNUAL

<b>Analysis Description:</b>	Metals by ICPMS Collision Mode, Total	<b>QC Batch:</b>	MPR/11658
<b>Analysis Method:</b>	EPA 200.8	<b>QC Batch Method:</b>	EPA 200.8

**METHOD BLANK:** 502109

Parameter	Blank Result	Reporting Limit	MDL	Units	Qualifiers
Selenium	ND	1.0	0.40	ug/L	

**LABORATORY CONTROL SAMPLE:** 502110

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Selenium	ug/L	20	21	103	85-115	

**MATRIX SPIKE & MATRIX SPIKE DUPLICATE:** 502112 502113

Parameter	Units	N020598002 Result	Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limit	RPD	Max RPD	Qualifiers
Selenium	ug/L	0.53	20	20	20	95	95	70-130	0.3	20	

**MATRIX SPIKE & MATRIX SPIKE DUPLICATE:** 502114 502115

Parameter	Units	N020690002 Result	Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limit	RPD	Max RPD	Qualifiers
Selenium	ug/L	0	20	19	20	97	98	70-130	0.7	20	

<b>Analysis Description:</b>	Chlorinated Pesticides & PCBs Analysis	<b>QC Batch:</b>	SPR/5759
<b>Analysis Method:</b>	EPA 608	<b>QC Batch Method:</b>	EPA 608

**METHOD BLANK:** 501825

Parameter	Blank Result	Reporting Limit	MDL	Units	Qualifiers
4,4'-DDD	ND	0.010	0.004	ug/L	
Heptachlor	ND	0.010	0.005	ug/L	
Decachlorobiphenyl (SS)	69	30-190		%	
Tetrachloro-m-xylene (SS)	71	25-105		%	





**QUALITY CONTROL DATA**

Lab Order: N020652

Project ID: SEMI ANNUAL

<b>Analysis Description:</b> Chlorinated Pesticides & PCBs Analysis	<b>QC Batch:</b> SPR/5759
<b>Analysis Method:</b> EPA 608	<b>QC Batch Method:</b> EPA 608

**LABORATORY CONTROL SAMPLE:** 501826

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
4,4'-DDD	ug/L	0.2	0.14	70	31-141	
Heptachlor	ug/L	0.2	0.12	60	34-111	
Decachlorobiphenyl (SS)	%			57	30-190	
Tetrachloro-m-xylene (SS)	%			52	25-105	

**MATRIX SPIKE & MATRIX SPIKE DUPLICATE:** 501828 501829

Parameter	Units	N020657001 Result	Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limit	RPD	Max RPD	Qualifiers
4,4'-DDD	ug/L	0	0.21	0.18	0.2	87	95	31-141	7.4	30	
Heptachlor	ug/L	0	0.21	0.15	0.17	72	84	34-111	13	52	
Decachlorobiphenyl (SS)	%					66	69	10-195	4.3		
Tetrachloro-m-xylene (SS)	%					69	79	25-105	12		

<b>Analysis Description:</b> Volatile Organic Analysis	<b>QC Batch:</b> VMS/2826
<b>Analysis Method:</b> EPA 624	<b>QC Batch Method:</b> EPA 624

**METHOD BLANK:** 501435

Parameter	Blank Result	Reporting Limit	MDL	Units	Qualifiers
Acrolein	ND	5	2	ug/L	
Acrylonitrile	ND	2.0	1.0	ug/L	
Benzene	ND	0.5	0.2	ug/L	
Bromodichloromethane	ND	0.5	0.2	ug/L	
Bromoform	ND	0.5	0.2	ug/L	
Bromomethane (Methyl Bromide)	ND	0.5	0.2	ug/L	
Carbon tetrachloride	ND	0.5	0.2	ug/L	
Chlorobenzene	ND	0.5	0.2	ug/L	
Chloroethane (Ethyl Chloride)	ND	0.5	0.4	ug/L	
2-Chloroethyl vinyl ether	ND	1.0	0.3	ug/L	
Chloroform	ND	0.5	0.2	ug/L	
Chloromethane(Methyl Chloride)	ND	0.5	0.2	ug/L	
Dibromochloromethane	ND	0.5	0.2	ug/L	
1,2-Dichlorobenzene	ND	0.5	0.3	ug/L	
1,3-Dichlorobenzene	ND	0.5	0.2	ug/L	
1,4-Dichlorobenzene	ND	0.5	0.2	ug/L	
Dichlorodifluoromethane (F-12)	ND	0.5	0.3	ug/L	





**QUALITY CONTROL DATA**

Lab Order: N020652

Project ID: SEMI ANNUAL

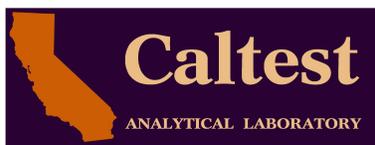
<b>Analysis Description:</b> Volatile Organic Analysis	<b>QC Batch:</b> VMS/2826
<b>Analysis Method:</b> EPA 624	<b>QC Batch Method:</b> EPA 624

Parameter	Blank Result	Reporting Limit	MDL	Units	Qualifiers
1,1-Dichloroethane	ND	0.5	0.2	ug/L	
1,2-Dichloroethane (EDC)	ND	0.5	0.2	ug/L	
1,1-Dichloroethene	ND	0.5	0.2	ug/L	
cis-1,2-Dichloroethene	ND	0.5	0.2	ug/L	
trans-1,2-Dichloroethene	ND	0.5	0.2	ug/L	
1,2-Dichloropropane	ND	0.5	0.2	ug/L	
cis-1,3-Dichloropropene	ND	0.5	0.2	ug/L	
trans-1,3-Dichloropropene	ND	0.5	0.2	ug/L	
Dichlorotrifluoroethane (F123)	ND	0.5	0.1	ug/L	
Ethylbenzene	ND	0.5	0.3	ug/L	
Methyl tert-butyl ether (MTBE)	ND	0.5	0.2	ug/L	
Methylene chloride	ND	0.5	0.3	ug/L	
1,1,2,2-Tetrachloroethane	ND	0.5	0.2	ug/L	
Tetrachloroethene (PCE)	ND	0.5	0.2	ug/L	
Toluene	ND	0.5	0.2	ug/L	
1,1,2-Trichloroethane	ND	0.5	0.2	ug/L	
1,1,1-Trichloroethane (TCA)	ND	0.5	0.2	ug/L	
Trichloroethene (TCE)	ND	0.5	0.2	ug/L	
Trichlorofluoromethane (F-11)	ND	0.5	0.3	ug/L	
Trichlorotrifluoroethane (F113)	ND	1.0	0.1	ug/L	
Vinyl chloride	ND	0.5	0.2	ug/L	
Xylenes, total	ND	0.5	0.3	ug/L	
4-Bromofluorobenzene (SS)	105	85-115		%	
Dibromofluoromethane (SS)	105	85-115		%	
1,2-Dichloroethane-d4 (SS)	101	75-125		%	
Toluene-d8 (SS)	97	90-121		%	

LABORATORY CONTROL SAMPLE: 501436

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Acrolein	ug/L	80	79	99	1-199	
Acrylonitrile	ug/L	80	80	100	76-112	
Benzene	ug/L	20	21	105	37-151	
Bromodichloromethane	ug/L	20	20	102	35-155	
Bromoform	ug/L	20	21	103	45-169	
Bromomethane (Methyl Bromide)	ug/L	20	19	94	10-242	
Carbon tetrachloride	ug/L	20	20	102	70-140	
Chlorobenzene	ug/L	20	18	92	37-160	
Chloroethane (Ethyl Chloride)	ug/L	20	19	94	14-230	
2-Chloroethyl vinyl ether	ug/L	40	38	96	1-305	





## ENVIRONMENTAL ANALYSES

## QUALITY CONTROL DATA

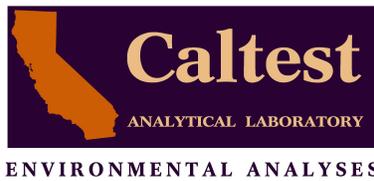
Lab Order: N020652

Project ID: SEMI ANNUAL

<b>Analysis Description:</b> Volatile Organic Analysis	<b>QC Batch:</b> VMS/2826
<b>Analysis Method:</b> EPA 624	<b>QC Batch Method:</b> EPA 624

LABORATORY CONTROL SAMPLE: 501436

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Chloroform	ug/L	20	20	100	51-138	
Chloromethane(Methyl Chloride)	ug/L	20	18	90	10-273	
Dibromochloromethane	ug/L	20	20	101	53-149	
1,2-Dichlorobenzene	ug/L	20	20	100	18-190	
1,3-Dichlorobenzene	ug/L	20	21	103	59-156	
1,4-Dichlorobenzene	ug/L	20	20	100	18-190	
1,1-Dichloroethane	ug/L	20	20	100	59-155	
1,1-Dichloroethene	ug/L	20	21	103	10-234	
trans-1,2-Dichloroethene	ug/L	20	20	101	54-156	
1,2-Dichloropropane	ug/L	20	20	101	10-210	
cis-1,3-Dichloropropene	ug/L	20	22	108	10-227	
trans-1,3-Dichloropropene	ug/L	20	21	107	17-183	
Ethylbenzene	ug/L	20	21	103	37-162	
Methyl tert-butyl ether (MTBE)	ug/L	20	20	98	73-123	
Methylene chloride	ug/L	20	19	94	10-221	
1,1,2,2-Tetrachloroethane	ug/L	20	20	99	46-157	
Tetrachloroethene (PCE)	ug/L	20	21	103	64-148	
Toluene	ug/L	20	21	106	47-150	
1,1,2-Trichloroethane	ug/L	20	21	103	52-150	
1,1,1-Trichloroethane (TCA)	ug/L	20	20	98	52-162	
Trichloroethene (TCE)	ug/L	20	20	102	71-157	
Trichlorofluoromethane (F-11)	ug/L	20	20	100	17-181	
Vinyl chloride	ug/L	20	20	98	10-251	
4-Bromofluorobenzene (SS)	%			100	85-115	
Dibromofluoromethane (SS)	%			97	85-115	
1,2-Dichloroethane-d4 (SS)	%			94	75-125	
Toluene-d8 (SS)	%			104	90-121	



## QUALITY CONTROL DATA QUALIFIERS

Lab Order: N020652

Project ID: SEMI ANNUAL

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### QUALITY CONTROL PARAMETER QUALIFIERS

Results Qualifiers: Report fields may contain codes and non-numeric data correlating to one or more of the following definitions:

NS - means not spiked and will not have recoveries reported for Analyte Spike Amounts

QC Codes Keys: These descriptors are used to help identify the specific QC samples and clarify the report.

MB - Method Blank

Method Blanks are reported to the same Method Detection Limits (MDLs) or Reporting Limits (RLs) as the analytical samples in the corresponding QC batch.

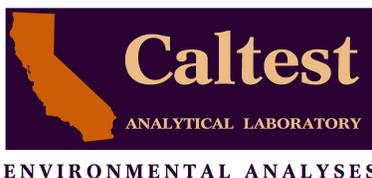
LCS/LCSD - Laboratory Control Spike / Laboratory Control Spike Duplicate

DUP - Duplicate of Original Sample Matrix

MS/MSD - Matrix Spike / Matrix Spike Duplicate

RPD - Relative Percent Difference

%Recovery - Spike Recovery stated as a percentage



### QUALITY CONTROL DATA CROSS REFERENCE TABLE

Lab Order: N020652

Project ID: SEMI ANNUAL

Lab ID	Sample ID	QC Batch Method	QC Batch	Analytical Method	Analytical Batch
N020652004	E001-DC	EPA 200.8	MPR/11658	EPA 200.8	MMS/6701
N020652005	E001-D2	EPA 200.8	MPR/11658	EPA 200.8	MMS/6701
N020652006	A002	EPA 200.8	MPR/11658	EPA 200.8	MMS/6701
N020652004	E001-DC	EPA 608	SPR/5759	EPA 608	SMS/3021
N020652005	E001-D2	EPA 608	SPR/5759	EPA 608	SMS/3021
N020652006	A002	EPA 608	SPR/5759	EPA 608	SMS/3021
N020652001	E001-DC	EPA 624	VMS/2826		
N020652002	E001-D2	EPA 624	VMS/2826		
N020652003	A002	EPA 624	VMS/2826		



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LAB ORDER # N020659

PROJECT # / PROJECT NAME  
 REPORT ATTN: Semiannual  
 Jean McMahon  
 STATE: CA ZIP: 94804

CLIENT: Veolia Water CITY: Richmond  
 ADDRESS: 601 Canal Blvd.  
 BILLING ADDRESS: Richmond CA 94804

PHONE #: 510412-2001 FAX PHONE: \_\_\_\_\_  
 SAMPLER (PRINT & SIGN NAME): JM/ds/ops

CALTEST #	DATE SAMPLED	TIME SAMPLED	MATRIX	CONTAINER AMOUNT/TYP	PRESERVATIVE	SAMPLE IDENTIFICATION SITE	CLIENT LAB #	COMP. OF GRAB	REMARKS
-1	2/14/13	1339	ML	6 VOA	HP/46°	E-001-DC		G ✓	
-1	2/13-14/13	1309	ML	2AL	<60°C			C ✓	
-2	2/14/13	1327	ML	1PT	HNO3			C ✓	
-2	2/14/13	1327	ML	6 VOA	HP/46°	E-001-DC		G ✓	
-3	2/13-14/13	0910	ML	2AL	<60°C			C ✓	
-3	2/14/13	1241	ML	1PT	HNO3			C ✓	
-3	2/14/13	1241	ML	6 VOA	HP/46°	A-002		G ✓	
-6	2/13/13	0803	ML	2AL	<60°C			C ✓	
-6	2/13/13	0803	ML	1PT	HNO3			C ✓	

By submittal of sample(s), client agrees to abide by the Terms and Conditions set forth on the reverse of this document.

RELINQUISHED BY: per M. Mark DATE/TIME: 2/15/13 1324  
 RECEIVED BY: [Signature] DATE/TIME: 2/15/13 1434  
 RELINQUISHED BY: [Signature] DATE/TIME: \_\_\_\_\_  
 RECEIVED BY: [Signature] DATE/TIME: \_\_\_\_\_

FOR LAB USE ONLY

BD: BIO \_\_\_\_\_ WC \_\_\_\_\_ MET \_\_\_\_\_ MICRO \_\_\_\_\_ BIO \_\_\_\_\_ MET \_\_\_\_\_ SV \_\_\_\_\_ VOA \_\_\_\_\_

CC: AA \_\_\_\_\_ SV \_\_\_\_\_ VOA \_\_\_\_\_

SIL: HP \_\_\_\_\_ PT \_\_\_\_\_ QT \_\_\_\_\_ VOA \_\_\_\_\_

W/HNO \_\_\_\_\_ H2SO \_\_\_\_\_ NaOH \_\_\_\_\_

PIL: HNO \_\_\_\_\_ H2SO \_\_\_\_\_ NaOH \_\_\_\_\_ HCL \_\_\_\_\_

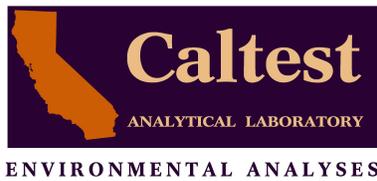
TEMP: 6 °C SEALED: Y  N  INTACT: Y  N

COMMENTS: \_\_\_\_\_

MATRIX: W = Aqueous Nondrinking Water, Digested Metals;  
 ML = Low R.L.s, Aqueous Nondrinking Water, Digested Metals;  
 DW = Drinking Water; SL = Soil, Sludge, Solid; FP = Free Product

CONTAINER TYPES: AL = Amber Liter; AHL = 500 ml Amber; PT = Pint (Plastic); QT = Quart (Plastic); HG = Half Gallon (Plastic); SJ = Soil Jar; B4 = 4 oz. BACT; BT = Brass Tube; VOA = 40 mL VOA; OTC = Other Type Container

## Attachment C: Influent and Effluent Lab Results for Mercury



Tuesday, March 05, 2013

Jean McMahon  
Veolia Water / Richmond  
601 Canal Boulevard  
Richmond, CA 94804

RE: Lab Order: N020653  
Project ID: MERCURY

Collected By: JM/JS  
PO/Contract #:

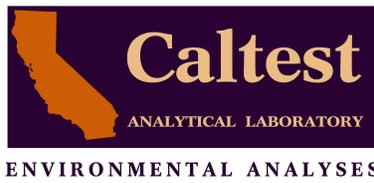
Dear Jean McMahon:

Enclosed are the analytical results for sample(s) received by the laboratory on Friday, February 15, 2013. Results reported herein conform to the most current NELAC standards, where applicable, unless otherwise narrated in the body of the report.

If you have any questions concerning this report, please feel free to contact me.

Enclosures

Project Manager: Danielle Regan

**SAMPLE SUMMARY**

Lab Order: N020653  
Project ID: MERCURY

---

Lab ID	Sample ID	Matrix	Date Collected	Date Received
N020653001	E001-DC	Water	2/14/2013 13:39	2/15/2013 14:34
N020653002	FIELD BLANK	Water	2/14/2013 13:39	2/15/2013 14:34
N020653003	E001-D2	Water	2/14/2013 13:27	2/15/2013 14:34
N020653004	A-002	Water	2/14/2013 12:41	2/15/2013 14:34

**REPORT OF LABORATORY ANALYSIS**

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## NARRATIVE

Lab Order: N020653  
Project ID: MERCURY

### General Qualifiers and Notes

Caltest authorizes this report to be reproduced only in its entirety. Results are specific to the sample(s) as submitted and only to the parameter(s) reported.

Caltest certifies that all test results for wastewater and hazardous waste analyses meet all applicable NELAC requirements; all microbiology and drinking water testing meet applicable ELAP requirements, unless stated otherwise.

All analyses performed by EPA Methods or Standard Methods (SM) 20th Edition except where noted (SMOL=online edition).

Caltest collects samples in compliance with 40 CFR, EPA Methods, Cal. Title 22, and Standard Methods.

Dilution Factors (DF) reported greater than '1' have been used to adjust the result, Reporting Limit (RL), and Method Detection Limit (MDL).

All Solid, sludge, and/or biosolids data is reported in Wet Weight, unless otherwise specified.

Filtrations performed at Caltest for dissolved metals (excluding mercury) and/or pH analysis were not performed within the 15 minute holding time as specified by 40CFR 136.3 table II.

Results Qualifiers: Report fields may contain codes and non-numeric data correlating to one or more of the following definitions:

ND - Non Detect - indicates analytical result has not been detected.

RL - Reporting Limit is the quantitation limit at which the laboratory is able to detect an analyte. An analyte not detected at or above the RL is reported as ND unless otherwise noted or qualified. For analyses pertaining to the State Implementation Plan of the California Toxics Rule, the Caltest Reporting Limit (RL) is equivalent to the Minimum Level (ML). A standard is always run at or below the ML. Where Reporting Limits are elevated due to dilution, the ML calibration criteria has been met.

J - reflects estimated analytical result value detected below the Reporting Limit (RL) and above the Method Detection Limit (MDL). The 'J' flag is equivalent to the DNQ Estimated Concentration flag.

E - indicates an estimated analytical result value.

B - indicates the analyte has been detected in the blank associated with the sample.

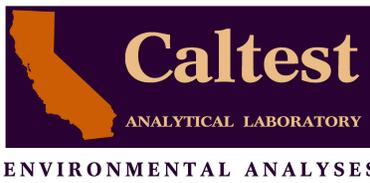
NC - means not able to be calculated for RPD or Spike Recoveries.

SS - compound is a Surrogate Spike used per laboratory quality assurance manual.

NOTE: This document represents a complete Analytical Report for the samples referenced herein and should be retained as a permanent record thereof.

### Qualifiers and Compound Notes

1 Analyte(s) reported as 'ND' means not detected at or above the listed Method Detection Limits (MDL).



**ANALYTICAL RESULTS**

Lab Order: N020653  
Project ID MERCURY

<b>Lab ID:</b>	<b>N020653001</b>	Date Collected:	2/14/2013 13:39	Matrix:	Water			
<b>Sample ID:</b>	<b>E001-DC</b>	Date Received:	2/15/2013 14:34					
<b>Parameters</b>	<b>Result Units</b>	<b>R. L.</b>	<b>MDL</b>	<b>DF Prepared</b>	<b>Batch</b>	<b>Analyzed</b>	<b>Batch</b>	<b>Qual</b>
<b>Mercury Analysis, Trace Level</b>	<b>Prep Method:</b>	EPA 1631E		<b>Prep by:</b>	UK			
	<b>Analytical Method:</b>	EPA 1631E				<b>Analyzed by:</b>	LM	
Mercury	0.0057 ug/L	0.0005	0.00020	1	02/21/13 00:00	MPR 11659	02/22/13 15:06	MHG 4192
<b>Methyl Mercury Analysis</b>	<b>Prep Method:</b>	Draft EPA 1630		<b>Prep by:</b>	JZH			
	<b>Analytical Method:</b>	Draft EPA 1630				<b>Analyzed by:</b>	JZH	
Methyl Mercury	0.15 ng/L	0.05	0.020	1	02/25/13 00:00	MPR 11663	03/01/13 00:00	MHG 4194

<b>Lab ID:</b>	<b>N020653002</b>	Date Collected:	2/14/2013 13:39	Matrix:	Water			
<b>Sample ID:</b>	<b>FIELD BLANK</b>	Date Received:	2/15/2013 14:34					
<b>Parameters</b>	<b>Result Units</b>	<b>R. L.</b>	<b>MDL</b>	<b>DF Prepared</b>	<b>Batch</b>	<b>Analyzed</b>	<b>Batch</b>	<b>Qual</b>
<b>Mercury Analysis, Trace Level</b>	<b>Prep Method:</b>	EPA 1631E		<b>Prep by:</b>	UK			
	<b>Analytical Method:</b>	EPA 1631E				<b>Analyzed by:</b>	LM	
Mercury	ND ug/L	0.0005	0.00020	1	02/21/13 00:00	MPR 11659	02/22/13 15:06	MHG 4192 1

<b>Lab ID:</b>	<b>N020653003</b>	Date Collected:	2/14/2013 13:27	Matrix:	Water			
<b>Sample ID:</b>	<b>E001-D2</b>	Date Received:	2/15/2013 14:34					
<b>Parameters</b>	<b>Result Units</b>	<b>R. L.</b>	<b>MDL</b>	<b>DF Prepared</b>	<b>Batch</b>	<b>Analyzed</b>	<b>Batch</b>	<b>Qual</b>
<b>Mercury Analysis, Trace Level</b>	<b>Prep Method:</b>	EPA 1631E		<b>Prep by:</b>	UK			
	<b>Analytical Method:</b>	EPA 1631E				<b>Analyzed by:</b>	LM	
Mercury	0.0056 ug/L	0.0005	0.00020	1	02/21/13 00:00	MPR 11659	02/22/13 15:06	MHG 4192
<b>Methyl Mercury Analysis</b>	<b>Prep Method:</b>	Draft EPA 1630		<b>Prep by:</b>	JZH			
	<b>Analytical Method:</b>	Draft EPA 1630				<b>Analyzed by:</b>	JZH	
Methyl Mercury	0.16 ng/L	0.05	0.020	1	02/25/13 00:00	MPR 11663	03/01/13 00:00	MHG 4194

<b>Lab ID:</b>	<b>N020653004</b>	Date Collected:	2/14/2013 12:41	Matrix:	Water			
<b>Sample ID:</b>	<b>A-002</b>	Date Received:	2/15/2013 14:34					
<b>Parameters</b>	<b>Result Units</b>	<b>R. L.</b>	<b>MDL</b>	<b>DF Prepared</b>	<b>Batch</b>	<b>Analyzed</b>	<b>Batch</b>	<b>Qual</b>
<b>Methyl Mercury Analysis</b>	<b>Prep Method:</b>	Draft EPA 1630		<b>Prep by:</b>	JZH			
	<b>Analytical Method:</b>	Draft EPA 1630				<b>Analyzed by:</b>	JZH	
Methyl Mercury	1.0 ng/L	0.05	0.020	1	02/25/13 00:00	MPR 11663	03/01/13 00:00	MHG 4194





ENVIRONMENTAL ANALYSES

**ANALYTICAL RESULTS**

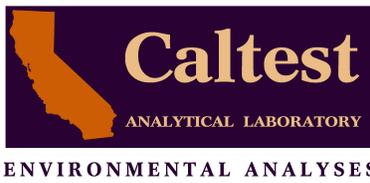
Lab Order: N020653  
 Project ID MERCURY

<b>Lab ID:</b>	<b>N020653004</b>	Date Collected:	2/14/2013 12:41	Matrix:	Water			
<b>Sample ID:</b>	<b>A-002</b>	Date Received:	2/15/2013 14:34					
<b>Parameters</b>	<b>Result Units</b>	<b>R. L.</b>	<b>MDL</b>	<b>DF Prepared</b>	<b>Batch</b>	<b>Analyzed</b>	<b>Batch</b>	<b>Qual</b>
<b>Mercury Analysis by FIMS, Low Level</b>	<b>Prep Method:</b>	EPA 245.1		<b>Prep by:</b>	UK			
	<b>Analytical Method:</b>	EPA 245.1, Low Level		<b>Analyzed by:</b>	LM			
Mercury	0.24 ug/L	0.050	0.0080	1	02/19/13 00:00	MPR 11653	02/20/13 15:53	MHG 4190

**REPORT OF LABORATORY ANALYSIS**

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**QUALITY CONTROL DATA**

Lab Order: N020653  
Project ID: MERCURY

<b>Analysis Description:</b> Mercury Analysis by FIMS, Low Level	<b>QC Batch:</b> MPR/11653
<b>Analysis Method:</b> EPA 245.1, Low Level	<b>QC Batch Method:</b> EPA 245.1

**METHOD BLANK:** 501596

Parameter	Blank Result	Reporting Limit	MDL	Units	Qualifiers
Mercury	ND	0.050	0.0080	ug/L	

**LABORATORY CONTROL SAMPLE:** 501597

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	ug/L	1	1	102	80-120	

**MATRIX SPIKE & MATRIX SPIKE DUPLICATE:** 501599 501600

Parameter	Units	N020625001 Result	Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limit	RPD	Max RPD	Qualifiers
Mercury	ug/L	0.2	1	1.1	1.2	88	97	80-120	8.4	20	

<b>Analysis Description:</b> Mercury Analysis, Trace Level	<b>QC Batch:</b> MPR/11659
<b>Analysis Method:</b> EPA 1631E	<b>QC Batch Method:</b> EPA 1631E

**METHOD BLANK:** 502158

Parameter	Blank Result	Reporting Limit	MDL	Units	Qualifiers
Mercury	ND	0.0005	0.0002	ug/L	

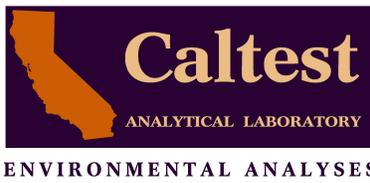
**LABORATORY CONTROL SAMPLE:** 502159

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Mercury	ug/L	0.02	0.021	105	80-120	

**MATRIX SPIKE & MATRIX SPIKE DUPLICATE:** 502161 502162

Parameter	Units	N020626002 Result	Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limit	RPD	Max RPD	Qualifiers
Mercury	ug/L	0.0067	0.02	0.027	0.027	102	101	80-120	0.4	24	





**QUALITY CONTROL DATA**

Lab Order: N020653  
 Project ID: MERCURY

<b>Analysis Description:</b> Methyl Mercury Analysis	<b>QC Batch:</b> MPR/11663
<b>Analysis Method:</b> Draft EPA 1630	<b>QC Batch Method:</b> Draft EPA 1630

**METHOD BLANK:** 502575

Parameter	Blank Result	Reporting Limit	MDL	Units	Qualifiers
Methyl Mercury	ND	0.05	0.02	ng/L	

**LABORATORY CONTROL SAMPLE:** 502576

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Methyl Mercury	ng/L	1.1	1.1	95	67-133	

**MATRIX SPIKE & MATRIX SPIKE DUPLICATE:** 502578 502579

Parameter	Units	N020476002 Result	Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limit	RPD	Max RPD	Qualifiers
Methyl Mercury	ng/L	0.03	1.1	1	1.1	92	93	65-135	0.7	35	





## QUALITY CONTROL DATA QUALIFIERS

Lab Order: N020653

Project ID: MERCURY

---

### QUALITY CONTROL PARAMETER QUALIFIERS

Results Qualifiers: Report fields may contain codes and non-numeric data correlating to one or more of the following definitions:

NS - means not spiked and will not have recoveries reported for Analyte Spike Amounts

QC Codes Keys: These descriptors are used to help identify the specific QC samples and clarify the report.

MB - Method Blank

Method Blanks are reported to the same Method Detection Limits (MDLs) or Reporting Limits (RLs) as the analytical samples in the corresponding QC batch.

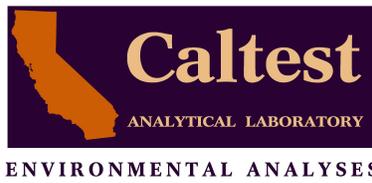
LCS/LCSD - Laboratory Control Spike / Laboratory Control Spike Duplicate

DUP - Duplicate of Original Sample Matrix

MS/MSD - Matrix Spike / Matrix Spike Duplicate

RPD - Relative Percent Difference

%Recovery - Spike Recovery stated as a percentage



### QUALITY CONTROL DATA CROSS REFERENCE TABLE

Lab Order: N020653

Project ID: MERCURY

Lab ID	Sample ID	QC Batch Method	QC Batch	Analytical Method	Analytical Batch
N020653004	A-002	EPA 245.1	MPR/11653	EPA 245.1, Low Level	MHG/4190
N020653001	E001-DC	EPA 1631E	MPR/11659	EPA 1631E	MHG/4192
N020653002	FIELD BLANK	EPA 1631E	MPR/11659	EPA 1631E	MHG/4192
N020653003	E001-D2	EPA 1631E	MPR/11659	EPA 1631E	MHG/4192
N020653001	E001-DC	Draft EPA 1630	MPR/11663	Draft EPA 1630	MHG/4194
N020653003	E001-D2	Draft EPA 1630	MPR/11663	Draft EPA 1630	MHG/4194
N020653004	A-002	Draft EPA 1630	MPR/11663	Draft EPA 1630	MHG/4194



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PAGE 01 OF 01 P.O. # NA200653 LAB ORDER # NA200653

**SAMPLE CHAIN OF CUSTODY**

CLIENT: Veolia Water  
 ADDRESS: 001 Canal Blvd. CITY: Richmond STATE: CA ZIP: 94804  
 BILLING ADDRESS: Richmond

PROJECT # / PROJECT NAME: None Mercury  
 REPORT ATTN: Jean McManon

PHONE #: 510-412-2001 FAX PHONE: \_\_\_\_\_  
 SAMPLER (PRINT & SIGN NAME): JM/JSS

CALTEST #	DATE SAMPLED	TIME SAMPLED	MATRIX	CONTAINER AMOUNT/TYPE	PRESERVATIVE	SAMPLE IDENTIFICATION SITE	CLIENT LAB #	COMP. OF GRAB	REMARKS
	2/14/13	1339	ML	10TC	HCl	E 001-DC		G	Mercury Ultra Clean
		1339				↓			Mercury
		1339				Field Blank			Methyl Mercury
		1327				E 001-D2			
		1321				↓			
		1241				A-002			
		1241				↓			
		1241				↓			
		1241				↓			

By submittal of sample(s), client agrees to abide by the Terms and Conditions set forth on the reverse of this document.

RELINQUISHED BY	DATE/TIME	RECEIVED BY	RELINQUISHED BY	DATE/TIME	RECEIVED BY
<i>[Signature]</i>	2/15/13 1324	<i>[Signature]</i>	<i>[Signature]</i>	2.15.13 1434	<i>[Signature]</i>

FOR LAB USE ONLY

Samples: WC \_\_\_\_\_ MICRO \_\_\_\_\_ BIO \_\_\_\_\_ MET \_\_\_\_\_ SV \_\_\_\_\_ VOA \_\_\_\_\_

BD: BIO \_\_\_\_\_ WC \_\_\_\_\_ MET \_\_\_\_\_

CC: AA \_\_\_\_\_ SV \_\_\_\_\_ VOA \_\_\_\_\_

SL: HP \_\_\_\_\_ PT \_\_\_\_\_ QT \_\_\_\_\_ VOA \_\_\_\_\_

W/HNO \_\_\_\_\_ H<sub>2</sub>SO<sub>4</sub> \_\_\_\_\_ NaOH \_\_\_\_\_

PL: HNO \_\_\_\_\_ H<sub>2</sub>SO<sub>4</sub> \_\_\_\_\_ NaOH \_\_\_\_\_ HCl \_\_\_\_\_

ANALYSES REQUESTED

TURN-AROUND TIME

STANDARD

RUSH

DUE DATE: \_\_\_\_\_

**MATRIX:** W = Aqueous Nondrinking Water, Digested Metals; ML = Low F.L.s, Aqueous Nondrinking Water, Digested Metals; DW = Drinking Water; SL = Soil, Sludge, Solid; FP = Free Product

**CONTAINER TYPES:** AL = Amber Litr; AHL = 500 ml Amber; PT = Pint (Plastic); QT = Quart (Plastic); HG = Half Gallon (Plastic); SJ = Soil Jar; B4 = 4 oz. BACT; BT = Brass Tube; VOA = 40 mL VOA; OTC = Other Type Container

**Attachment D: Transport Sludge Lab Results**

# TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

## ANALYTICAL REPORT

TestAmerica Laboratories, Inc.  
TestAmerica Irvine  
17461 Derian Ave  
Suite 100  
Irvine, CA 92614-5817  
Tel: (949)261-1022

TestAmerica Job ID: 440-39446-1  
Client Project/Site: Semi-Annual Sludge

For:  
Veolia Water N. America Operating Svcs  
601 Canal Blvd.  
Richmond, California 94804

Attn: Jean McMahan



---

*Authorized for release by:  
3/25/2013 10:26:02 AM*

Janice Hsu  
Project Manager I  
janice.hsu@testamericainc.com

*The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.*

*This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.*

*Results relate only to the items tested and the sample(s) as received by the laboratory.*

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# Table of Contents

Cover Page . . . . .	1
Table of Contents . . . . .	2
Sample Summary . . . . .	3
Case Narrative . . . . .	4
Client Sample Results . . . . .	6
Method Summary . . . . .	11
Chronicle . . . . .	12
QC Sample Results . . . . .	13
QC Association . . . . .	35
Definitions . . . . .	38
Certification Summary . . . . .	39
Chain of Custody . . . . .	40
Receipt Checklists . . . . .	41

# Sample Summary

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

---

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
440-39446-1	Transport Sludge	Water	02/25/13 18:00	02/28/13 09:45
440-39446-2	Transport Sludge (Bottom)	Water	02/25/13 18:00	02/28/13 09:45

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# Case Narrative

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

**Job ID: 440-39446-1**

**Laboratory: TestAmerica Irvine**

## Narrative

### Job Narrative 440-39446-1

#### Comments

No additional comments.

#### Receipt

The samples were received on 2/28/2013 9:45 AM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperatures of the 5 coolers at receipt time were 0.6° C, 0.6° C, 1.2° C, 1.2° C and 1.4° C.

#### GC/MS VOA

Method(s) 624: There was 2 layers for all of the voas received for method 624. The top layer (~40% of the voa) was logged in as sample #1 and the the bottom layer (~60% of the voa) was logged as sample #2. Both results were reported per client's request.

Method(s) 624: The following sample(s) was diluted due to the abundance of a non-target analyte: Transport Sludge (Bottom) (440-39446-2). Elevated reporting limits (RLs) are provided.

Method(s) 624, 8260B: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for batch 88718 were outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

Method(s) 624: The preservative used in the sample containers provided is not compatible with the analytes requested. The following sample(s) was received preserved with hydrochloric acid: (440-39050-1 MS), (440-39050-1 MSD). The requested target analyte list contains 2-chloroethylvinyl ether, acrolein, and acrylonitrile, which are acid-labile compounds that degrade in an acidic medium.

No other analytical or quality issues were noted.

#### GC/MS Semi VOA

Method(s) 625, 8270C LL: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for batch 89381 were outside control limits. The associated laboratory control sample (LCS) recovery met acceptance criteria.

Method(s) 625: The following sample(s) required a dilution due to the nature of the sample matrix: Transport Sludge (440-39446-1). Because of this dilution, the surrogate spike concentration in the sample was reduced to a level where the recovery calculation does not provide useful information.

Method(s) 625: The following sample(s) was diluted due to the abundance of non-target analytes: Transport Sludge (440-39446-1). Elevated reporting limits (RLs) are provided.

Method(s) 625: The continuing calibration verification (CCV) for 1,2-diphenylhydrazine associated with batch 90393/90394 recovered above the upper control limit. The samples associated with this CCV were non-detects for the affected analytes; therefore, the data have been reported.

Method(s) 625: The matrix spike / matrix spike duplicate (MS/MSD) precision for batch 89381 was outside control limits due to matrix interference.

No other analytical or quality issues were noted.

#### GC Semi VOA

Method(s) 608: The following sample(s) was diluted due to the nature of the sample matrix: Transport Sludge (440-39446-1). Elevated reporting limits (RLs) are provided. Due to sample matrix effects, the surrogate recovery was outside acceptance limitsTransport Sludge (440-39446-1)

Method(s) 608: The following sample(s) required a copper clean-up to reduce matrix interferences caused by sulfur: (LCS 440-89232/4-A).

Method(s) 608: Insufficient sample volume was available to perform batch matrix spike/matrix spike duplicate (MS/MSD) associated with

# Case Narrative

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

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## Job ID: 440-39446-1 (Continued)

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### Laboratory: TestAmerica Irvine (Continued)

batch 89232. The laboratory control sample (LCS) was performed in duplicate to provide precision data for this batch.

Method(s) 608: The following sample(s) was diluted due to the nature of the sample matrix: Transport Sludge (440-39446-1). Elevated reporting limits (RLs) are provided.

Method(s) 608: The continuing calibration verification (CCV) associated with batch 89913 recovered above the upper control limit for Endosulfan sulfate. The samples associated with this CCV were non-detects for the affected analytes; therefore, the data have been reported. The following samples are impacted: (CCV 440-89913/54), Transport Sludge (440-39446-1).

Method(s) 608: The following sample(s) required a dilution due to the nature of the sample matrix: Transport Sludge (440-39446-1). Because of this dilution, the surrogate spike concentration in the sample was reduced to a level where the recovery calculation does not provide useful information.

No other analytical or quality issues were noted.

### Metals

Method(s) 6020: The serial dilution performed for the following sample(s) associated with batch 90775 was outside control limits: (440-39446-1 SD), Transport Sludge (440-39446-1)

Method(s) 6020: The method blank for preparation batch 90775 contained Copper above the method detection limit (MDL) but below the reporting limit (RL). The associated sample(s) contained detects for this analyte at concentrations greater than 10X the value found in the method blank; therefore, re-extraction and/or re-analysis of samples was not performed.

No other analytical or quality issues were noted.

### General Chemistry

No analytical or quality issues were noted.

### Organic Prep

Method(s) 625: The following sample(s) was diluted due to the nature of the sample matrix: Transport Sludge (440-39446-1). Elevated reporting limits (RLs) are provided. Batch 89381

Method(s) 625: Due to the matrix, the following sample(s) could not be concentrated to the final method required volume: Transport Sludge (440-39446-1). The reporting limits (RLs) are elevated proportionately. Batch 89381.

No other analytical or quality issues were noted.



# Client Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

**Client Sample ID: Transport Sludge**

**Lab Sample ID: 440-39446-1**

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

**Method: 624 - Volatile Organic Compounds (GC/MS)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	ND		0.50	0.30	ug/L			03/01/13 10:50	1
2-Chloroethyl vinyl ether	ND		2.0	1.8	ug/L			02/28/13 21:07	1
1,1,2,2-Tetrachloroethane	ND		0.50	0.30	ug/L			03/01/13 10:50	1
Acrolein	ND		5.0	4.0	ug/L			02/28/13 21:07	1
1,1,2-Trichloroethane	ND		0.50	0.30	ug/L			03/01/13 10:50	1
Acrylonitrile	ND		2.0	1.2	ug/L			02/28/13 21:07	1
1,1-Dichloroethane	ND		0.50	0.40	ug/L			03/01/13 10:50	1
1,1-Dichloroethene	ND		0.50	0.42	ug/L			03/01/13 10:50	1
1,2-Dichlorobenzene	ND		0.50	0.32	ug/L			03/01/13 10:50	1
1,2-Dichloroethane	ND		0.50	0.28	ug/L			03/01/13 10:50	1
1,2-Dichloropropane	ND		0.50	0.35	ug/L			03/01/13 10:50	1
1,3-Dichlorobenzene	ND		0.50	0.35	ug/L			03/01/13 10:50	1
1,4-Dichlorobenzene	ND		0.50	0.37	ug/L			03/01/13 10:50	1
Benzene	ND		0.50	0.28	ug/L			03/01/13 10:50	1
Bromoform	ND		0.50	0.40	ug/L			03/01/13 10:50	1
Bromomethane	ND		0.50	0.42	ug/L			03/01/13 10:50	1
Carbon tetrachloride	ND		0.50	0.28	ug/L			03/01/13 10:50	1
Chlorobenzene	ND		0.50	0.36	ug/L			03/01/13 10:50	1
Dibromochloromethane	ND		0.50	0.40	ug/L			03/01/13 10:50	1
Chloroethane	ND		0.50	0.40	ug/L			03/01/13 10:50	1
Chloroform	ND		0.50	0.33	ug/L			03/01/13 10:50	1
Chloromethane	ND		0.50	0.40	ug/L			03/01/13 10:50	1
cis-1,3-Dichloropropene	ND		0.50	0.22	ug/L			03/01/13 10:50	1
Bromodichloromethane	ND		0.50	0.30	ug/L			03/01/13 10:50	1
Ethylbenzene	ND		0.50	0.25	ug/L			03/01/13 10:50	1
Methylene Chloride	ND		1.0	0.95	ug/L			03/01/13 10:50	1
Tetrachloroethene	ND		0.50	0.32	ug/L			03/01/13 10:50	1
<b>Toluene</b>	<b>4.0</b>		0.50	0.36	ug/L			03/01/13 10:50	1
trans-1,2-Dichloroethene	ND		0.50	0.30	ug/L			03/01/13 10:50	1
trans-1,3-Dichloropropene	ND		0.50	0.32	ug/L			03/01/13 10:50	1
Trichlorofluoromethane	ND		0.50	0.34	ug/L			03/01/13 10:50	1
Vinyl chloride	ND		0.50	0.40	ug/L			03/01/13 10:50	1
Trichloroethene	ND		0.50	0.26	ug/L			03/01/13 10:50	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Toluene-d8 (Surr)	100		80 - 120		02/28/13 21:07	1
Dibromofluoromethane (Surr)	99		80 - 120		02/28/13 21:07	1
4-Bromofluorobenzene (Surr)	89		80 - 120		03/01/13 10:50	1
Dibromofluoromethane (Surr)	106		80 - 120		03/01/13 10:50	1
Toluene-d8 (Surr)	104		80 - 120		03/01/13 10:50	1

**Method: 625 - Semivolatile Organic Compounds (GC/MS)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2,4-Trichlorobenzene	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
1,2-Diphenylhydrazine(as Azobenzene)	ND		130	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
1,2-Dichlorobenzene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
1,3-Dichlorobenzene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
1,4-Dichlorobenzene	ND		67	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
2,4,5-Trichlorophenol	ND		270	27	ug/L		03/04/13 20:34	03/07/13 10:12	20

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

**Client Sample ID: Transport Sludge**

**Lab Sample ID: 440-39446-1**

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

**Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
2,4,6-Trichlorophenol	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
2,4-Dichlorophenol	ND		270	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
2,4-Dimethylphenol	ND		270	40	ug/L		03/04/13 20:34	03/07/13 10:12	20
2,4-Dinitrophenol	ND		670	120	ug/L		03/04/13 20:34	03/07/13 10:12	20
2,4-Dinitrotoluene	ND		670	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
2,6-Dinitrotoluene	ND		670	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
2-Chloronaphthalene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
2-Chlorophenol	ND		130	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
2-Methylnaphthalene	ND		130	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
2-Methylphenol	ND		270	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
2-Nitroaniline	ND		670	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
2-Nitrophenol	ND		270	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
3,3'-Dichlorobenzidine	ND		670	67	ug/L		03/04/13 20:34	03/07/13 10:12	20
3-Nitroaniline	ND		670	130	ug/L		03/04/13 20:34	03/07/13 10:12	20
4,6-Dinitro-2-methylphenol	ND		670	40	ug/L		03/04/13 20:34	03/07/13 10:12	20
4-Bromophenyl phenyl ether	ND		130	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
4-Chloro-3-methylphenol	ND		130	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
4-Chlorophenyl phenyl ether	ND		67	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
4-Nitroaniline	ND		670	67	ug/L		03/04/13 20:34	03/07/13 10:12	20
4-Nitrophenol	ND		670	330	ug/L		03/04/13 20:34	03/07/13 10:12	20
Acenaphthene	ND		67	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
Acenaphthylene	ND		67	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
Aniline	ND		1300	40	ug/L		03/04/13 20:34	03/07/13 10:12	20
Anthracene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzidine	ND		670	130	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzo[a]anthracene	ND		670	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzo[a]pyrene	ND		270	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzo[b]fluoranthene	ND		270	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzo[g,h,i]perylene	ND		670	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzo[k]fluoranthene	ND		67	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzoic acid	ND		2700	400	ug/L		03/04/13 20:34	03/07/13 10:12	20
Benzyl alcohol	ND		670	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Bis(2-chloroethoxy)methane	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Bis(2-chloroethyl)ether	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
bis (2-chloroisopropyl) ether	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Bis(2-ethylhexyl) phthalate	ND		670	230	ug/L		03/04/13 20:34	03/07/13 10:12	20
Butyl benzyl phthalate	ND		670	93	ug/L		03/04/13 20:34	03/07/13 10:12	20
Chrysene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Di-n-butyl phthalate	ND		270	40	ug/L		03/04/13 20:34	03/07/13 10:12	20
<b>Di-n-octyl phthalate</b>	<b>83</b>	<b>J</b>	670	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
Dibenz(a,h)anthracene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Dibenzofuran	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Diethyl phthalate	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Dimethyl phthalate	ND		67	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
Fluoranthene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Fluorene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Hexachlorobenzene	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Hexachlorobutadiene	ND		130	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
Hexachlorocyclopentadiene	ND		670	13	ug/L		03/04/13 20:34	03/07/13 10:12	20

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

**Client Sample ID: Transport Sludge**

**Lab Sample ID: 440-39446-1**

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

### Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Hexachloroethane	ND		130	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
Indeno[1,2,3-cd]pyrene	ND		270	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Isophorone	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
N-Nitrosodi-n-propylamine	ND		270	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
N-Nitrosodiphenylamine	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Naphthalene	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Nitrobenzene	ND		130	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Pentachlorophenol	ND		270	53	ug/L		03/04/13 20:34	03/07/13 10:12	20
Phenol	ND		130	40	ug/L		03/04/13 20:34	03/07/13 10:12	20
Phenanthrene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
Pyrene	ND		67	13	ug/L		03/04/13 20:34	03/07/13 10:12	20
3-Methylphenol + 4-Methylphenol	ND		670	27	ug/L		03/04/13 20:34	03/07/13 10:12	20
4-Chloroaniline	ND		270	40	ug/L		03/04/13 20:34	03/07/13 10:12	20
N-Nitrosodimethylamine	ND		270	13	ug/L		03/04/13 20:34	03/07/13 10:12	20

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
2,4,6-Tribromophenol	0	X	40 - 120	03/04/13 20:34	03/07/13 10:12	20
2-Fluorobiphenyl	41	X	50 - 120	03/04/13 20:34	03/07/13 10:12	20
2-Fluorophenol	62		30 - 120	03/04/13 20:34	03/07/13 10:12	20
Nitrobenzene-d5	70		45 - 120	03/04/13 20:34	03/07/13 10:12	20
Phenol-d6	65		35 - 120	03/04/13 20:34	03/07/13 10:12	20
Terphenyl-d14	0	X	50 - 125	03/04/13 20:34	03/07/13 10:12	20

### Method: 608 - Organochlorine Pesticides in Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aldrin	ND		0.010	0.0030	ug/L		03/04/13 12:24	03/07/13 05:32	1
alpha-BHC	ND		0.010	0.0050	ug/L		03/04/13 12:24	03/07/13 05:32	1
beta-BHC	ND		0.020	0.0080	ug/L		03/04/13 12:24	03/07/13 05:32	1
Chlordane (technical)	ND		0.20	0.16	ug/L		03/04/13 12:24	03/07/13 05:32	1
delta-BHC	ND		0.010	0.0070	ug/L		03/04/13 12:24	03/07/13 05:32	1
Dieldrin	ND		0.010	0.0040	ug/L		03/04/13 12:24	03/07/13 05:32	1
Endosulfan I	ND		0.010	0.0060	ug/L		03/04/13 12:24	03/07/13 05:32	1
Endosulfan II	ND		0.010	0.0040	ug/L		03/04/13 12:24	03/07/13 05:32	1
Endosulfan sulfate	ND		0.020	0.0060	ug/L		03/04/13 12:24	03/07/13 05:32	1
Endrin	ND		0.010	0.0040	ug/L		03/04/13 12:24	03/07/13 05:32	1
Endrin aldehyde	ND		0.020	0.0040	ug/L		03/04/13 12:24	03/07/13 05:32	1
Endrin ketone	ND		0.020	0.014	ug/L		03/04/13 12:24	03/07/13 05:32	1
gamma-BHC (Lindane)	ND		0.020	0.0060	ug/L		03/04/13 12:24	03/07/13 05:32	1
Heptachlor	ND		0.020	0.0060	ug/L		03/04/13 12:24	03/07/13 05:32	1
Heptachlor epoxide	ND		0.010	0.0050	ug/L		03/04/13 12:24	03/07/13 05:32	1
Methoxychlor	ND		0.010	0.0070	ug/L		03/04/13 12:24	03/07/13 05:32	1
Toxaphene	ND		1.0	0.50	ug/L		03/04/13 12:24	03/07/13 05:32	1
4,4'-DDD	ND		0.010	0.0080	ug/L		03/04/13 12:24	03/07/13 05:32	1
4,4'-DDE	ND		0.010	0.0060	ug/L		03/04/13 12:24	03/07/13 05:32	1
4,4'-DDT	ND		0.020	0.0080	ug/L		03/04/13 12:24	03/07/13 05:32	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Tetrachloro-m-xylene	14	X	35 - 115	03/04/13 12:24	03/07/13 05:32	1

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Svcs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

**Client Sample ID: Transport Sludge**

**Lab Sample ID: 440-39446-1**

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

**Method: 608 - Polychlorinated Biphenyls (PCBs) (GC)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aroclor 1016	ND		1.0	0.50	ug/L		03/04/13 12:24	03/05/13 20:40	1
Aroclor 1221	ND		1.0	0.50	ug/L		03/04/13 12:24	03/05/13 20:40	1
Aroclor 1232	ND		1.0	0.50	ug/L		03/04/13 12:24	03/05/13 20:40	1
Aroclor 1242	ND		1.0	0.50	ug/L		03/04/13 12:24	03/05/13 20:40	1
Aroclor 1248	ND		1.0	0.50	ug/L		03/04/13 12:24	03/05/13 20:40	1
Aroclor 1254	ND		1.0	0.50	ug/L		03/04/13 12:24	03/05/13 20:40	1
Aroclor 1260	ND		1.0	0.50	ug/L		03/04/13 12:24	03/05/13 20:40	1

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
DCB Decachlorobiphenyl (Surr)	18	X	45 - 120	03/04/13 12:24	03/05/13 20:40	1

**Method: 6020 - Metals (ICP/MS) - Total Recoverable**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	88		50	45	ug/L		03/11/13 09:38	03/11/13 21:04	5
Cadmium	38	J	50	5.0	ug/L		03/11/13 09:38	03/11/13 21:04	5
Chromium	260		100	45	ug/L		03/11/13 09:38	03/11/13 21:04	5
Copper	4500	B	100	25	ug/L		03/11/13 09:38	03/11/13 21:04	5
Lead	470		50	10	ug/L		03/11/13 09:38	03/11/13 21:04	5
Nickel	350		100	25	ug/L		03/11/13 09:38	03/11/13 21:04	5
Selenium	42	J	100	25	ug/L		03/11/13 09:38	03/11/13 21:04	5
Silver	29	J	50	5.0	ug/L		03/11/13 09:38	03/11/13 21:04	5
Zinc	10000		1000	200	ug/L		03/11/13 09:38	03/12/13 10:50	5

**Method: 7470A - Mercury (CVAA)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	0.0088		0.0020	0.0010	mg/L		03/07/13 10:40	03/07/13 13:44	1

**General Chemistry**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Cyanide, Total	ND		25	17	ug/L		03/07/13 15:50	03/07/13 20:45	1
Ammonia (as N)	1200		250	50	mg/L			03/01/13 14:35	500
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Solids	16000		10	10	mg/L			03/01/13 16:34	1

**Client Sample ID: Transport Sludge (Bottom)**

**Lab Sample ID: 440-39446-2**

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

**Method: 624 - Volatile Organic Compounds (GC/MS)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	ND		5.0	3.0	ug/L			03/02/13 01:03	10
2-Chloroethyl vinyl ether	ND		20	18	ug/L			02/28/13 21:37	10
1,1,1,2-Tetrachloroethane	ND		5.0	3.0	ug/L			03/02/13 01:03	10
Acrolein	ND		50	40	ug/L			02/28/13 21:37	10
1,1,2-Trichloroethane	ND		5.0	3.0	ug/L			03/02/13 01:03	10
Acrylonitrile	ND		20	12	ug/L			02/28/13 21:37	10
1,1-Dichloroethane	ND		5.0	4.0	ug/L			03/02/13 01:03	10
1,1-Dichloroethene	ND		5.0	4.2	ug/L			03/02/13 01:03	10
1,2-Dichlorobenzene	ND		5.0	3.2	ug/L			03/02/13 01:03	10
1,2-Dichloroethane	ND		5.0	2.8	ug/L			03/02/13 01:03	10

TestAmerica Irvine

# Client Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

**Client Sample ID: Transport Sludge (Bottom)**

**Lab Sample ID: 440-39446-2**

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

**Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)**

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,2-Dichloropropane	ND		5.0	3.5	ug/L			03/02/13 01:03	10
1,3-Dichlorobenzene	ND		5.0	3.5	ug/L			03/02/13 01:03	10
1,4-Dichlorobenzene	ND		5.0	3.7	ug/L			03/02/13 01:03	10
Benzene	ND		5.0	2.8	ug/L			03/02/13 01:03	10
Bromoform	ND		5.0	4.0	ug/L			03/02/13 01:03	10
Bromomethane	ND		5.0	4.2	ug/L			03/02/13 01:03	10
Carbon tetrachloride	ND		5.0	2.8	ug/L			03/02/13 01:03	10
Chlorobenzene	ND		5.0	3.6	ug/L			03/02/13 01:03	10
Dibromochloromethane	ND		5.0	4.0	ug/L			03/02/13 01:03	10
Chloroethane	ND		5.0	4.0	ug/L			03/02/13 01:03	10
Chloroform	ND		5.0	3.3	ug/L			03/02/13 01:03	10
Chloromethane	ND		5.0	4.0	ug/L			03/02/13 01:03	10
cis-1,3-Dichloropropene	ND		5.0	2.2	ug/L			03/02/13 01:03	10
Bromodichloromethane	ND		5.0	3.0	ug/L			03/02/13 01:03	10
Ethylbenzene	ND		5.0	2.5	ug/L			03/02/13 01:03	10
Methylene Chloride	ND		10	9.5	ug/L			03/02/13 01:03	10
Tetrachloroethene	ND		5.0	3.2	ug/L			03/02/13 01:03	10
Toluene	ND		5.0	3.6	ug/L			03/02/13 01:03	10
trans-1,2-Dichloroethene	ND		5.0	3.0	ug/L			03/02/13 01:03	10
trans-1,3-Dichloropropene	ND		5.0	3.2	ug/L			03/02/13 01:03	10
Trichlorofluoromethane	ND		5.0	3.4	ug/L			03/02/13 01:03	10
Vinyl chloride	ND		5.0	4.0	ug/L			03/02/13 01:03	10
Trichloroethene	ND		5.0	2.6	ug/L			03/02/13 01:03	10

Surrogate	%Recovery	Qualifier	Limits	Prepared	Analyzed	Dil Fac
Toluene-d8 (Surr)	90		80 - 120		02/28/13 21:37	10
Dibromofluoromethane (Surr)	93		80 - 120		02/28/13 21:37	10
4-Bromofluorobenzene (Surr)	94		80 - 120		03/02/13 01:03	10
Dibromofluoromethane (Surr)	86		80 - 120		03/02/13 01:03	10
Toluene-d8 (Surr)	104		80 - 120		03/02/13 01:03	10

# Method Summary

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

Method	Method Description	Protocol	Laboratory
624	Volatile Organic Compounds (GC/MS)	40CFR136A	TAL IRV
625	Semivolatile Organic Compounds (GC/MS)	EPA	TAL IRV
608	Polychlorinated Biphenyls (PCBs) (GC)	40CFR136A	TAL IRV
608	Organochlorine Pesticides in Water	40CFR136A	TAL IRV
6020	Metals (ICP/MS)	SW846	TAL IRV
7470A	Mercury (CVAA)	SW846	TAL IRV
SM 2540B	Solids, Total	SM	TAL IRV
SM 4500 CN E	Cyanide, Total	SM	TAL IRV
SM 4500 NH3 D	Ammonia	SM	TAL IRV

#### Protocol References:

40CFR136A = "Methods for Organic Chemical Analysis of Municipal Industrial Wastewater", 40CFR, Part 136, Appendix A, October 26, 1984 and subsequent revisions.

EPA = US Environmental Protection Agency

SM = "Standard Methods For The Examination Of Water And Wastewater",

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

#### Laboratory References:

TAL IRV = TestAmerica Irvine, 17461 Derian Ave, Suite 100, Irvine, CA 92614-5817, TEL (949)261-1022

## Lab Chronicle

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

### Client Sample ID: Transport Sludge

Lab Sample ID: 440-39446-1

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	624		1	10 mL	10 mL	88644	02/28/13 21:07	WK	TAL IRV
Total/NA	Analysis	624		1	10 mL	10 mL	88718	03/01/13 10:50	SS	TAL IRV
Total/NA	Prep	625			300 mL	4 mL	89381	03/04/13 20:34	DM	TAL IRV
Total/NA	Analysis	625		20			89886	03/07/13 10:12	AI	TAL IRV
Total/NA	Prep	608			500 mL	2 mL	89232	03/04/13 12:24	AB	TAL IRV
Total/NA	Analysis	608		1			89559	03/05/13 20:40	JM	TAL IRV
Total/NA	Analysis	608		1			89913	03/07/13 05:32	JM	TAL IRV
Total/NA	Prep	7470A			2 mL	20 mL	89940	03/07/13 10:40	MM	TAL IRV
Total/NA	Analysis	7470A		1			90184	03/07/13 13:44	DB	TAL IRV
Total Recoverable	Prep	3005A			5 mL	50 mL	90775	03/11/13 09:38	DT	TAL IRV
Total Recoverable	Analysis	6020		5			90997	03/11/13 21:04	RC	TAL IRV
Total Recoverable	Analysis	6020		5			91099	03/12/13 10:50	RC	TAL IRV
Total/NA	Analysis	SM 4500 NH3 D		500	50 mL	50 mL	88862	03/01/13 14:35	DC	TAL IRV
Total/NA	Analysis	SM 2540B		1	100 mL	100 mL	88886	03/01/13 16:34	XL	TAL IRV
Total/NA	Prep	Distill/CN			50 mL	50 mL	90217	03/07/13 15:50	BT	TAL IRV
Total/NA	Analysis	SM 4500 CN E		1			90301	03/07/13 20:45	BT	TAL IRV

### Client Sample ID: Transport Sludge (Bottom)

Lab Sample ID: 440-39446-2

Date Collected: 02/25/13 18:00

Matrix: Water

Date Received: 02/28/13 09:45

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	624		10	10 mL	10 mL	88644	02/28/13 21:37	WK	TAL IRV
Total/NA	Analysis	624		10	10 mL	10 mL	88891	03/02/13 01:03	MP	TAL IRV

**Laboratory References:**

TAL IRV = TestAmerica Irvine, 17461 Derian Ave, Suite 100, Irvine, CA 92614-5817, TEL (949)261-1022

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS)

Lab Sample ID: MB 440-88644/4

Matrix: Water

Analysis Batch: 88644

Client Sample ID: Method Blank

Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
2-Chloroethyl vinyl ether	ND		2.0	1.8	ug/L			02/28/13 20:38	1
Acrolein	ND		5.0	4.0	ug/L			02/28/13 20:38	1
Acrylonitrile	ND		2.0	1.2	ug/L			02/28/13 20:38	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
Toluene-d8 (Surr)	97		80 - 120		02/28/13 20:38	1
Dibromofluoromethane (Surr)	98		80 - 120		02/28/13 20:38	1

Lab Sample ID: LCS 440-88644/5

Matrix: Water

Analysis Batch: 88644

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
2-Chloroethyl vinyl ether	25.0	21.0		ug/L		84	25 - 170

Surrogate	LCS %Recovery	LCS Qualifier	Limits
Toluene-d8 (Surr)	96		80 - 120
Dibromofluoromethane (Surr)	103		80 - 120

Lab Sample ID: LCSD 440-88644/6

Matrix: Water

Analysis Batch: 88644

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	Limit
2-Chloroethyl vinyl ether	25.0	19.9		ug/L		79	25 - 170	6	25

Surrogate	LCSD %Recovery	LCSD Qualifier	Limits
Toluene-d8 (Surr)	95		80 - 120
Dibromofluoromethane (Surr)	93		80 - 120

Lab Sample ID: 440-39050-E-1 MS

Matrix: Water

Analysis Batch: 88644

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
2-Chloroethyl vinyl ether	ND		25.0	ND	F	ug/L		0	25 - 170
Acrolein	ND		25.0	23.7		ug/L		95	40 - 160
Acrylonitrile	ND		25.0	15.8		ug/L		63	40 - 160

Surrogate	MS %Recovery	MS Qualifier	Limits
Toluene-d8 (Surr)	95		80 - 120
Dibromofluoromethane (Surr)	90		80 - 120

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

**Lab Sample ID: 440-39050-E-1 MSD**

**Matrix: Water**

**Analysis Batch: 88644**

**Client Sample ID: Matrix Spike Duplicate**

**Prep Type: Total/NA**

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec.	Limits	RPD	RPD
	Result	Qualifier	Added	Result	Qualifier							
2-Chloroethyl vinyl ether	ND		25.0	ND	F	ug/L		0	25 - 170	NC	25	
Acrolein	ND		25.0	24.5		ug/L		98	40 - 160	3	40	
Acrylonitrile	ND		25.0	16.5		ug/L		66	40 - 160	4	40	
		<b>MSD</b>	<b>MSD</b>									
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>									
Toluene-d8 (Surr)	95		80 - 120									
Dibromofluoromethane (Surr)	87		80 - 120									

**Lab Sample ID: MB 440-88718/4**

**Matrix: Water**

**Analysis Batch: 88718**

**Client Sample ID: Method Blank**

**Prep Type: Total/NA**

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
1,1,1-Trichloroethane	ND		0.50	0.30	ug/L			03/01/13 09:18	1
1,1,2,2-Tetrachloroethane	ND		0.50	0.30	ug/L			03/01/13 09:18	1
1,1,2-Trichloroethane	ND		0.50	0.30	ug/L			03/01/13 09:18	1
1,1-Dichloroethane	ND		0.50	0.40	ug/L			03/01/13 09:18	1
1,1-Dichloroethene	ND		0.50	0.42	ug/L			03/01/13 09:18	1
1,2-Dichlorobenzene	ND		0.50	0.32	ug/L			03/01/13 09:18	1
1,2-Dichloroethane	ND		0.50	0.28	ug/L			03/01/13 09:18	1
1,2-Dichloropropane	ND		0.50	0.35	ug/L			03/01/13 09:18	1
1,3-Dichlorobenzene	ND		0.50	0.35	ug/L			03/01/13 09:18	1
1,4-Dichlorobenzene	ND		0.50	0.37	ug/L			03/01/13 09:18	1
Benzene	ND		0.50	0.28	ug/L			03/01/13 09:18	1
Bromoform	ND		0.50	0.40	ug/L			03/01/13 09:18	1
Bromomethane	ND		0.50	0.42	ug/L			03/01/13 09:18	1
Carbon tetrachloride	ND		0.50	0.28	ug/L			03/01/13 09:18	1
Chlorobenzene	ND		0.50	0.36	ug/L			03/01/13 09:18	1
Dibromochloromethane	ND		0.50	0.40	ug/L			03/01/13 09:18	1
Chloroethane	ND		0.50	0.40	ug/L			03/01/13 09:18	1
Chloroform	ND		0.50	0.33	ug/L			03/01/13 09:18	1
Chloromethane	ND		0.50	0.40	ug/L			03/01/13 09:18	1
cis-1,3-Dichloropropene	ND		0.50	0.22	ug/L			03/01/13 09:18	1
Bromodichloromethane	ND		0.50	0.30	ug/L			03/01/13 09:18	1
Ethylbenzene	ND		0.50	0.25	ug/L			03/01/13 09:18	1
Methylene Chloride	ND		1.0	0.95	ug/L			03/01/13 09:18	1
Tetrachloroethene	ND		0.50	0.32	ug/L			03/01/13 09:18	1
Toluene	ND		0.50	0.36	ug/L			03/01/13 09:18	1
trans-1,2-Dichloroethene	ND		0.50	0.30	ug/L			03/01/13 09:18	1
trans-1,3-Dichloropropene	ND		0.50	0.32	ug/L			03/01/13 09:18	1
Trichlorofluoromethane	ND		0.50	0.34	ug/L			03/01/13 09:18	1
Vinyl chloride	ND		0.50	0.40	ug/L			03/01/13 09:18	1
Trichloroethene	ND		0.50	0.26	ug/L			03/01/13 09:18	1
		<b>MB</b>	<b>MB</b>						
<b>Surrogate</b>	<b>%Recovery</b>	<b>Qualifier</b>	<b>Limits</b>			<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>	
4-Bromofluorobenzene (Surr)	88		80 - 120				03/01/13 09:18	1	
Dibromofluoromethane (Surr)	109		80 - 120				03/01/13 09:18	1	

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 440-88718/4

Matrix: Water

Analysis Batch: 88718

Client Sample ID: Method Blank

Prep Type: Total/NA

Surrogate	MB MB		Limits	Prepared	Analyzed	Dil Fac
	%Recovery	Qualifier				
Toluene-d8 (Surr)	100		80 - 120		03/01/13 09:18	1

Lab Sample ID: LCS 440-88718/5

Matrix: Water

Analysis Batch: 88718

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,2,2-Tetrachloroethane	25.0	19.6		ug/L		78	55 - 130
1,1,2-Trichloroethane	25.0	20.8		ug/L		83	70 - 125
1,1-Dichloroethane	25.0	25.8		ug/L		103	70 - 125
1,1-Dichloroethene	25.0	23.3		ug/L		93	70 - 125
1,2-Dichlorobenzene	25.0	25.5		ug/L		102	75 - 120
1,2-Dichloroethane	25.0	25.4		ug/L		101	60 - 140
1,2-Dichloropropane	25.0	22.8		ug/L		91	70 - 125
1,3-Dichlorobenzene	25.0	26.4		ug/L		106	75 - 120
1,4-Dichlorobenzene	25.0	23.9		ug/L		96	75 - 120
Benzene	25.0	20.1		ug/L		80	70 - 120
Bromoform	25.0	24.1		ug/L		96	55 - 130
Bromomethane	25.0	29.7		ug/L		119	65 - 140
Carbon tetrachloride	25.0	26.4		ug/L		106	65 - 140
Chlorobenzene	25.0	24.7		ug/L		99	75 - 120
Dibromochloromethane	25.0	27.7		ug/L		111	70 - 140
Chloroethane	25.0	27.5		ug/L		110	60 - 140
Chloroform	25.0	25.6		ug/L		102	70 - 130
Chloromethane	25.0	28.9		ug/L		116	50 - 140
cis-1,3-Dichloropropene	25.0	23.9		ug/L		96	75 - 125
Bromodichloromethane	25.0	25.2		ug/L		101	70 - 135
Ethylbenzene	25.0	24.2		ug/L		97	75 - 125
Methylene Chloride	25.0	22.0		ug/L		88	55 - 130
Tetrachloroethene	25.0	25.0		ug/L		100	70 - 125
Toluene	25.0	24.5		ug/L		98	70 - 120
trans-1,2-Dichloroethene	25.0	24.6		ug/L		98	70 - 125
trans-1,3-Dichloropropene	25.0	25.5		ug/L		102	70 - 125
Trichlorofluoromethane	25.0	28.2		ug/L		113	65 - 145
Vinyl chloride	25.0	31.9		ug/L		128	55 - 135
Trichloroethene	25.0	24.4		ug/L		98	70 - 125

Surrogate	LCS LCS		Limits
	%Recovery	Qualifier	
4-Bromofluorobenzene (Surr)	99		80 - 120
Dibromofluoromethane (Surr)	115		80 - 120
Toluene-d8 (Surr)	101		80 - 120

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 440-39182-A-2 MSD

Matrix: Water

Analysis Batch: 88718

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec.	RPD	RPD
	Result	Qualifier	Added	Result	Qualifier						
1,1,1-Trichloroethane	ND		25.0	24.0		ug/L		96	65 - 140	6	20
1,1,2,2-Tetrachloroethane	ND		25.0	21.5		ug/L		86	55 - 135	4	30
1,1,2-Trichloroethane	ND		25.0	20.1		ug/L		80	65 - 130	6	25
1,1-Dichloroethane	ND		25.0	23.1		ug/L		92	65 - 130	2	20
1,1-Dichloroethene	ND		25.0	21.1		ug/L		84	60 - 130	8	20
1,2-Dichlorobenzene	ND		25.0	25.5		ug/L		102	75 - 125	1	20
1,2-Dichloroethane	ND		25.0	23.5		ug/L		94	60 - 140	6	20
1,2-Dichloropropane	ND		25.0	22.2		ug/L		89	65 - 130	3	20
1,3-Dichlorobenzene	ND		25.0	26.0		ug/L		104	75 - 125	3	20
1,4-Dichlorobenzene	ND		25.0	23.5		ug/L		94	75 - 125	2	20
Benzene	84		25.0	98.3	F	ug/L		56	65 - 125	5	20
Bromoform	ND		25.0	23.5		ug/L		94	55 - 135	3	25
Bromomethane	ND		25.0	23.4		ug/L		94	55 - 145	2	25
Carbon tetrachloride	ND		25.0	25.6		ug/L		102	65 - 140	5	25
Chlorobenzene	ND		25.0	23.5		ug/L		94	75 - 125	2	20
Dibromochloromethane	ND		25.0	26.4		ug/L		106	65 - 140	1	25
Chloroethane	ND		25.0	22.8		ug/L		91	55 - 140	2	25
Chloroform	ND		25.0	22.2		ug/L		89	65 - 135	3	20
Chloromethane	ND		25.0	23.0		ug/L		92	45 - 145	2	25
cis-1,3-Dichloropropene	ND		25.0	23.9		ug/L		96	70 - 130	1	20
Bromodichloromethane	ND		25.0	23.5		ug/L		94	70 - 135	4	20
Ethylbenzene	13		25.0	35.5		ug/L		92	65 - 130	4	20
Methylene Chloride	ND		25.0	19.8		ug/L		79	50 - 135	2	20
Tetrachloroethene	ND		25.0	24.6		ug/L		98	65 - 130	3	20
Toluene	13		25.0	37.0		ug/L		94	70 - 125	2	20
trans-1,2-Dichloroethene	ND		25.0	22.6		ug/L		90	65 - 130	4	20
trans-1,3-Dichloropropene	ND		25.0	24.8		ug/L		99	65 - 135	2	25
Trichlorofluoromethane	ND		25.0	24.3		ug/L		97	60 - 145	4	25
Vinyl chloride	ND		25.0	25.4		ug/L		102	45 - 140	3	30
Trichloroethene	ND		25.0	23.8		ug/L		95	65 - 125	1	20

Surrogate	MSD %Recovery	MSD Qualifier	MSD Limits
4-Bromofluorobenzene (Surr)	95		80 - 120
Dibromofluoromethane (Surr)	103		80 - 120
Toluene-d8 (Surr)	102		80 - 120

Lab Sample ID: 440-39182-B-2 MS

Matrix: Water

Analysis Batch: 88718

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec.	RPD	RPD
	Result	Qualifier	Added	Result	Qualifier						
1,1,1-Trichloroethane	ND		25.0	22.5		ug/L		90	65 - 140		
1,1,2,2-Tetrachloroethane	ND		25.0	22.4		ug/L		90	55 - 135		
1,1,2-Trichloroethane	ND		25.0	21.3		ug/L		85	65 - 130		
1,1-Dichloroethane	ND		25.0	22.6		ug/L		90	65 - 130		
1,1-Dichloroethene	ND		25.0	22.8		ug/L		91	60 - 130		
1,2-Dichlorobenzene	ND		25.0	25.8		ug/L		103	75 - 125		
1,2-Dichloroethane	ND		25.0	22.1		ug/L		88	60 - 140		

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 440-39182-B-2 MS

Client Sample ID: Matrix Spike

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 88718

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec.
	Result	Qualifier	Added	Result	Qualifier				
1,2-Dichloropropane	ND		25.0	22.9		ug/L		92	65 - 130
1,3-Dichlorobenzene	ND		25.0	26.8		ug/L		107	75 - 125
1,4-Dichlorobenzene	ND		25.0	23.9		ug/L		96	75 - 125
Benzene	84		25.0	104		ug/L		77	65 - 125
Bromoform	ND		25.0	24.2		ug/L		97	55 - 135
Bromomethane	ND		25.0	23.9		ug/L		95	55 - 145
Carbon tetrachloride	ND		25.0	24.4		ug/L		98	65 - 140
Chlorobenzene	ND		25.0	24.1		ug/L		96	75 - 125
Dibromochloromethane	ND		25.0	26.0		ug/L		104	65 - 140
Chloroethane	ND		25.0	23.2		ug/L		93	55 - 140
Chloroform	ND		25.0	21.4		ug/L		86	65 - 135
Chloromethane	ND		25.0	23.5		ug/L		94	45 - 145
cis-1,3-Dichloropropene	ND		25.0	24.2		ug/L		97	70 - 130
Bromodichloromethane	ND		25.0	22.5		ug/L		90	70 - 135
Ethylbenzene	13		25.0	36.8		ug/L		97	65 - 130
Methylene Chloride	ND		25.0	19.3		ug/L		77	50 - 135
Tetrachloroethene	ND		25.0	25.3		ug/L		101	65 - 130
Toluene	13		25.0	37.8		ug/L		97	70 - 125
trans-1,2-Dichloroethene	ND		25.0	23.5		ug/L		94	65 - 130
trans-1,3-Dichloropropene	ND		25.0	24.4		ug/L		98	65 - 135
Trichlorofluoromethane	ND		25.0	23.4		ug/L		94	60 - 145
Vinyl chloride	ND		25.0	26.2		ug/L		105	45 - 140
Trichloroethene	ND		25.0	23.6		ug/L		94	65 - 125
<b>MS MS</b>									
Surrogate	%Recovery	Qualifier	Limits						
4-Bromofluorobenzene (Surr)	95		80 - 120						
Dibromofluoromethane (Surr)	97		80 - 120						
Toluene-d8 (Surr)	102		80 - 120						

Lab Sample ID: MB 440-88891/4

Client Sample ID: Method Blank

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 88891

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
1,1,1-Trichloroethane	ND		0.50	0.30	ug/L			03/01/13 20:20	1
1,1,1,2-Tetrachloroethane	ND		0.50	0.30	ug/L			03/01/13 20:20	1
1,1,2-Trichloroethane	ND		0.50	0.30	ug/L			03/01/13 20:20	1
1,1-Dichloroethane	ND		0.50	0.40	ug/L			03/01/13 20:20	1
1,1-Dichloroethene	ND		0.50	0.42	ug/L			03/01/13 20:20	1
1,2-Dichlorobenzene	ND		0.50	0.32	ug/L			03/01/13 20:20	1
1,2-Dichloroethane	ND		0.50	0.28	ug/L			03/01/13 20:20	1
1,2-Dichloropropane	ND		0.50	0.35	ug/L			03/01/13 20:20	1
1,3-Dichlorobenzene	ND		0.50	0.35	ug/L			03/01/13 20:20	1
1,4-Dichlorobenzene	ND		0.50	0.37	ug/L			03/01/13 20:20	1
Benzene	ND		0.50	0.28	ug/L			03/01/13 20:20	1
Bromoform	ND		0.50	0.40	ug/L			03/01/13 20:20	1
Bromomethane	ND		0.50	0.42	ug/L			03/01/13 20:20	1
Carbon tetrachloride	ND		0.50	0.28	ug/L			03/01/13 20:20	1

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 440-88891/4

Matrix: Water

Analysis Batch: 88891

Client Sample ID: Method Blank

Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chlorobenzene	ND		0.50	0.36	ug/L			03/01/13 20:20	1
Dibromochloromethane	ND		0.50	0.40	ug/L			03/01/13 20:20	1
Chloroethane	ND		0.50	0.40	ug/L			03/01/13 20:20	1
Chloroform	ND		0.50	0.33	ug/L			03/01/13 20:20	1
Chloromethane	ND		0.50	0.40	ug/L			03/01/13 20:20	1
cis-1,3-Dichloropropene	ND		0.50	0.22	ug/L			03/01/13 20:20	1
Bromodichloromethane	ND		0.50	0.30	ug/L			03/01/13 20:20	1
Ethylbenzene	ND		0.50	0.25	ug/L			03/01/13 20:20	1
Methylene Chloride	1.58		1.0	0.95	ug/L			03/01/13 20:20	1
Tetrachloroethene	ND		0.50	0.32	ug/L			03/01/13 20:20	1
Toluene	ND		0.50	0.36	ug/L			03/01/13 20:20	1
trans-1,2-Dichloroethene	ND		0.50	0.30	ug/L			03/01/13 20:20	1
trans-1,3-Dichloropropene	ND		0.50	0.32	ug/L			03/01/13 20:20	1
Trichlorofluoromethane	ND		0.50	0.34	ug/L			03/01/13 20:20	1
Vinyl chloride	ND		0.50	0.40	ug/L			03/01/13 20:20	1
Trichloroethene	ND		0.50	0.26	ug/L			03/01/13 20:20	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
4-Bromofluorobenzene (Surr)	102		80 - 120		03/01/13 20:20	1
Dibromofluoromethane (Surr)	92		80 - 120		03/01/13 20:20	1
Toluene-d8 (Surr)	106		80 - 120		03/01/13 20:20	1

Lab Sample ID: LCS 440-88891/5

Matrix: Water

Analysis Batch: 88891

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,1-Trichloroethane	25.0	25.3		ug/L		101	65 - 135
1,1,2,2-Tetrachloroethane	25.0	27.4		ug/L		110	55 - 130
1,1,2-Trichloroethane	25.0	22.5		ug/L		90	70 - 125
1,1-Dichloroethane	25.0	25.8		ug/L		103	70 - 125
1,1-Dichloroethene	25.0	23.8		ug/L		95	70 - 125
1,2-Dichlorobenzene	25.0	23.8		ug/L		95	75 - 120
1,2-Dichloroethane	25.0	22.8		ug/L		91	60 - 140
1,2-Dichloropropane	25.0	23.9		ug/L		96	70 - 125
1,3-Dichlorobenzene	25.0	23.7		ug/L		95	75 - 120
1,4-Dichlorobenzene	25.0	22.5		ug/L		90	75 - 120
Benzene	25.0	23.6		ug/L		95	70 - 120
Bromoform	25.0	21.3		ug/L		85	55 - 130
Bromomethane	25.0	24.1		ug/L		96	65 - 140
Carbon tetrachloride	25.0	24.5		ug/L		98	65 - 140
Chlorobenzene	25.0	22.7		ug/L		91	75 - 120
Dibromochloromethane	25.0	22.3		ug/L		89	70 - 140
Chloroethane	25.0	29.4		ug/L		118	60 - 140
Chloroform	25.0	23.3		ug/L		93	70 - 130
Chloromethane	25.0	26.3		ug/L		105	50 - 140
cis-1,3-Dichloropropene	25.0	27.5		ug/L		110	75 - 125
Bromodichloromethane	25.0	24.2		ug/L		97	70 - 135

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 440-88891/5

Matrix: Water

Analysis Batch: 88891

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Ethylbenzene	25.0	26.0		ug/L		104	75 - 125
Methylene Chloride	25.0	23.8		ug/L		95	55 - 130
Tetrachloroethene	25.0	23.2		ug/L		93	70 - 125
Toluene	25.0	24.4		ug/L		98	70 - 120
trans-1,2-Dichloroethene	25.0	23.7		ug/L		95	70 - 125
trans-1,3-Dichloropropene	25.0	25.8		ug/L		103	70 - 125
Trichlorofluoromethane	25.0	26.5		ug/L		106	65 - 145
Vinyl chloride	25.0	30.7		ug/L		123	55 - 135
Trichloroethene	25.0	20.4		ug/L		82	70 - 125

Surrogate	LCS %Recovery	LCS Qualifier	Limits
4-Bromofluorobenzene (Surr)	102		80 - 120
Dibromofluoromethane (Surr)	90		80 - 120
Toluene-d8 (Surr)	106		80 - 120

Lab Sample ID: 440-39377-F-7 MS

Matrix: Water

Analysis Batch: 88891

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
1,1,1-Trichloroethane	ND		25.0	25.3		ug/L		101	65 - 140
1,1,1,2-Tetrachloroethane	ND		25.0	25.8		ug/L		103	55 - 135
1,1,2-Trichloroethane	ND		25.0	23.7		ug/L		95	65 - 130
1,1-Dichloroethane	ND		25.0	25.6		ug/L		102	65 - 130
1,1-Dichloroethene	ND		25.0	24.8		ug/L		99	60 - 130
1,2-Dichlorobenzene	ND		25.0	24.0		ug/L		96	75 - 125
1,2-Dichloroethane	ND		25.0	23.3		ug/L		93	60 - 140
1,2-Dichloropropane	ND		25.0	25.8		ug/L		103	65 - 130
1,3-Dichlorobenzene	ND		25.0	23.5		ug/L		94	75 - 125
1,4-Dichlorobenzene	ND		25.0	22.6		ug/L		90	75 - 125
Benzene	ND		25.0	24.4		ug/L		98	65 - 125
Bromoform	ND		25.0	21.6		ug/L		86	55 - 135
Bromomethane	ND		25.0	24.1		ug/L		96	55 - 145
Carbon tetrachloride	ND		25.0	25.6		ug/L		103	65 - 140
Chlorobenzene	ND		25.0	23.6		ug/L		94	75 - 125
Dibromochloromethane	ND		25.0	23.1		ug/L		92	65 - 140
Chloroethane	ND		25.0	29.0		ug/L		116	55 - 140
Chloroform	ND		25.0	23.4		ug/L		94	65 - 135
Chloromethane	ND		25.0	26.9		ug/L		107	45 - 145
cis-1,3-Dichloropropene	ND		25.0	28.1		ug/L		112	70 - 130
Bromodichloromethane	ND		25.0	25.6		ug/L		102	70 - 135
Ethylbenzene	ND		25.0	27.2		ug/L		109	65 - 130
Methylene Chloride	ND		25.0	22.4		ug/L		89	50 - 135
Tetrachloroethene	1.6		25.0	25.7		ug/L		96	65 - 130
Toluene	ND		25.0	25.6		ug/L		102	70 - 125
trans-1,2-Dichloroethene	ND		25.0	24.5		ug/L		98	65 - 130
trans-1,3-Dichloropropene	ND		25.0	26.2		ug/L		105	65 - 135
Trichlorofluoromethane	ND		25.0	26.7		ug/L		107	60 - 145

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 440-39377-F-7 MS

Client Sample ID: Matrix Spike

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 88891

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec. Limits
	Result	Qualifier	Added	Result	Qualifier				
Vinyl chloride	ND		25.0	30.1		ug/L		120	45 - 140
Trichloroethene	8.0		25.0	29.2		ug/L		85	65 - 125
<b>Surrogate</b>	<b>%Recovery</b>	<b>MS Qualifier</b>	<b>Limits</b>						
4-Bromofluorobenzene (Surr)	102		80 - 120						
Dibromofluoromethane (Surr)	89		80 - 120						
Toluene-d8 (Surr)	107		80 - 120						

Lab Sample ID: 440-39377-F-7 MSD

Client Sample ID: Matrix Spike Duplicate

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 88891

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
	Result	Qualifier	Added	Result	Qualifier						
1,1,1-Trichloroethane	ND		25.0	24.4		ug/L		98	65 - 140	4	20
1,1,1,2,2-Tetrachloroethane	ND		25.0	26.0		ug/L		104	55 - 135	1	30
1,1,1,2-Trichloroethane	ND		25.0	23.3		ug/L		93	65 - 130	1	25
1,1-Dichloroethane	ND		25.0	24.7		ug/L		99	65 - 130	4	20
1,1-Dichloroethene	ND		25.0	23.8		ug/L		95	60 - 130	4	20
1,2-Dichlorobenzene	ND		25.0	23.7		ug/L		95	75 - 125	1	20
1,2-Dichloroethane	ND		25.0	22.9		ug/L		92	60 - 140	2	20
1,2-Dichloropropane	ND		25.0	25.0		ug/L		100	65 - 130	3	20
1,3-Dichlorobenzene	ND		25.0	22.8		ug/L		91	75 - 125	3	20
1,4-Dichlorobenzene	ND		25.0	22.0		ug/L		88	75 - 125	3	20
Benzene	ND		25.0	24.2		ug/L		97	65 - 125	1	20
Bromoform	ND		25.0	20.8		ug/L		83	55 - 135	3	25
Bromomethane	ND		25.0	23.7		ug/L		95	55 - 145	2	25
Carbon tetrachloride	ND		25.0	24.5		ug/L		98	65 - 140	4	25
Chlorobenzene	ND		25.0	22.7		ug/L		91	75 - 125	4	20
Dibromochloromethane	ND		25.0	22.5		ug/L		90	65 - 140	3	25
Chloroethane	ND		25.0	28.3		ug/L		113	55 - 140	3	25
Chloroform	ND		25.0	23.4		ug/L		94	65 - 135	0	20
Chloromethane	ND		25.0	26.1		ug/L		104	45 - 145	3	25
cis-1,3-Dichloropropene	ND		25.0	28.0		ug/L		112	70 - 130	0	20
Bromodichloromethane	ND		25.0	24.6		ug/L		98	70 - 135	4	20
Ethylbenzene	ND		25.0	25.5		ug/L		102	65 - 130	7	20
Methylene Chloride	ND		25.0	22.8		ug/L		91	50 - 135	2	20
Tetrachloroethene	1.6		25.0	24.1		ug/L		90	65 - 130	6	20
Toluene	ND		25.0	24.8		ug/L		99	70 - 125	3	20
trans-1,2-Dichloroethene	ND		25.0	23.9		ug/L		95	65 - 130	3	20
trans-1,3-Dichloropropene	ND		25.0	26.0		ug/L		104	65 - 135	1	25
Trichlorofluoromethane	ND		25.0	25.0		ug/L		100	60 - 145	7	25
Vinyl chloride	ND		25.0	29.7		ug/L		119	45 - 140	1	30
Trichloroethene	8.0		25.0	27.9		ug/L		79	65 - 125	5	20
<b>Surrogate</b>	<b>%Recovery</b>	<b>MSD Qualifier</b>	<b>Limits</b>								
4-Bromofluorobenzene (Surr)	102		80 - 120								
Dibromofluoromethane (Surr)	89		80 - 120								

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 624 - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 440-39377-F-7 MSD

Matrix: Water

Analysis Batch: 88891

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Surrogate	MSD		Limits
	%Recovery	Qualifier	
Toluene-d8 (Surr)	108		80 - 120

## Method: 625 - Semivolatile Organic Compounds (GC/MS)

Lab Sample ID: MB 440-89381/1-A

Matrix: Water

Analysis Batch: 89886

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 89381

Analyte	MB		RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
1,2,4-Trichlorobenzene	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
1,2-Diphenylhydrazine(as Azobenzene)	ND		1.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
1,2-Dichlorobenzene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
1,3-Dichlorobenzene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
1,4-Dichlorobenzene	ND		0.50	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
2,4,5-Trichlorophenol	ND		2.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
2,4,6-Trichlorophenol	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
2,4-Dichlorophenol	ND		2.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
2,4-Dimethylphenol	ND		2.0	0.30	ug/L		03/04/13 20:34	03/07/13 02:48	1
2,4-Dinitrophenol	ND		5.0	0.90	ug/L		03/04/13 20:34	03/07/13 02:48	1
2,4-Dinitrotoluene	ND		5.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
2,6-Dinitrotoluene	ND		5.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
2-Chloronaphthalene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
2-Chlorophenol	ND		1.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
2-Methylnaphthalene	ND		1.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
2-Methylphenol	ND		2.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
2-Nitroaniline	ND		5.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
2-Nitrophenol	ND		2.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
3,3'-Dichlorobenzidine	ND		5.0	0.50	ug/L		03/04/13 20:34	03/07/13 02:48	1
3-Nitroaniline	ND		5.0	1.0	ug/L		03/04/13 20:34	03/07/13 02:48	1
4,6-Dinitro-2-methylphenol	ND		5.0	0.30	ug/L		03/04/13 20:34	03/07/13 02:48	1
4-Bromophenyl phenyl ether	ND		1.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
4-Chloro-3-methylphenol	ND		1.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
4-Chlorophenyl phenyl ether	ND		0.50	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
4-Nitroaniline	ND		5.0	0.50	ug/L		03/04/13 20:34	03/07/13 02:48	1
4-Nitrophenol	ND		5.0	2.5	ug/L		03/04/13 20:34	03/07/13 02:48	1
Acenaphthene	ND		0.50	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
Acenaphthylene	ND		0.50	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
Aniline	ND		10	0.30	ug/L		03/04/13 20:34	03/07/13 02:48	1
Anthracene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzidine	ND		5.0	1.0	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzo[a]anthracene	ND		5.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzo[a]pyrene	ND		2.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzo[b]fluoranthene	ND		2.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzo[g,h,i]perylene	ND		5.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzo[k]fluoranthene	ND		0.50	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzoic acid	ND		20	3.0	ug/L		03/04/13 20:34	03/07/13 02:48	1
Benzyl alcohol	ND		5.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 440-89381/1-A

Matrix: Water

Analysis Batch: 89886

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 89381

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Bis(2-chloroethoxy)methane	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Bis(2-chloroethyl)ether	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
bis (2-chloroisopropyl) ether	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Bis(2-ethylhexyl) phthalate	ND		5.0	1.7	ug/L		03/04/13 20:34	03/07/13 02:48	1
Butyl benzyl phthalate	ND		5.0	0.70	ug/L		03/04/13 20:34	03/07/13 02:48	1
Chrysene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Di-n-butyl phthalate	0.403	J	2.0	0.30	ug/L		03/04/13 20:34	03/07/13 02:48	1
Di-n-octyl phthalate	ND		5.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
Dibenz(a,h)anthracene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Dibenzofuran	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Diethyl phthalate	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Dimethyl phthalate	ND		0.50	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
Fluoranthene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Fluorene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Hexachlorobenzene	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Hexachlorobutadiene	ND		1.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
Hexachlorocyclopentadiene	ND		5.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Hexachloroethane	ND		1.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
Indeno[1,2,3-cd]pyrene	ND		2.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Isophorone	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
N-Nitrosodi-n-propylamine	ND		2.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
N-Nitrosodiphenylamine	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Naphthalene	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Nitrobenzene	ND		1.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Pentachlorophenol	ND		2.0	0.40	ug/L		03/04/13 20:34	03/07/13 02:48	1
Phenol	ND		1.0	0.30	ug/L		03/04/13 20:34	03/07/13 02:48	1
Phenanthrene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
Pyrene	ND		0.50	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1
3-Methylphenol + 4-Methylphenol	ND		5.0	0.20	ug/L		03/04/13 20:34	03/07/13 02:48	1
4-Chloroaniline	ND		2.0	0.30	ug/L		03/04/13 20:34	03/07/13 02:48	1
N-Nitrosodimethylamine	ND		2.0	0.10	ug/L		03/04/13 20:34	03/07/13 02:48	1

Surrogate	MB %Recovery	MB Qualifier	Limits	Prepared	Analyzed	Dil Fac
2,4,6-Tribromophenol	92		40 - 120	03/04/13 20:34	03/07/13 02:48	1
2-Fluorobiphenyl	78		50 - 120	03/04/13 20:34	03/07/13 02:48	1
2-Fluorophenol	69		30 - 120	03/04/13 20:34	03/07/13 02:48	1
Nitrobenzene-d5	76		45 - 120	03/04/13 20:34	03/07/13 02:48	1
Phenol-d6	80		35 - 120	03/04/13 20:34	03/07/13 02:48	1
Terphenyl-d14	99		50 - 125	03/04/13 20:34	03/07/13 02:48	1

Lab Sample ID: LCS 440-89381/2-A

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,2,4-Trichlorobenzene	10.0	5.38		ug/L		54	44 - 120
1,2-Diphenylhydrazine(as Azobenzene)	10.0	9.51		ug/L		95	59 - 124

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 440-89381/2-A

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
1,2-Dichlorobenzene	10.0	5.36		ug/L		54	43 - 120
1,3-Dichlorobenzene	10.0	5.12		ug/L		51	41 - 120
1,4-Dichlorobenzene	10.0	5.28		ug/L		53	41 - 120
2,4,5-Trichlorophenol	10.0	7.87		ug/L		79	20 - 138
2,4,6-Trichlorophenol	10.0	8.13		ug/L		81	20 - 139
2,4-Dichlorophenol	10.0	7.48		ug/L		75	21 - 132
2,4-Dimethylphenol	10.0	7.15		ug/L		71	51 - 120
2,4-Dinitrophenol	10.0	7.36		ug/L		74	20 - 134
2,6-Dinitrotoluene	10.0	8.46		ug/L		85	65 - 120
2-Chloronaphthalene	10.0	7.52		ug/L		75	54 - 120
2-Chlorophenol	10.0	7.02		ug/L		70	20 - 122
2-Methylnaphthalene	10.0	6.70		ug/L		67	55 - 120
2-Methylphenol	10.0	7.18		ug/L		72	47 - 120
2-Nitroaniline	10.0	8.25		ug/L		82	60 - 135
2-Nitrophenol	10.0	7.36		ug/L		74	21 - 132
3,3'-Dichlorobenzidine	10.0	5.80		ug/L		58	25 - 135
3-Nitroaniline	10.0	8.55		ug/L		85	63 - 123
4,6-Dinitro-2-methylphenol	10.0	8.48		ug/L		85	22 - 147
4-Bromophenyl phenyl ether	10.0	7.94		ug/L		79	58 - 120
4-Chloro-3-methylphenol	10.0	7.96		ug/L		80	46 - 123
4-Chlorophenyl phenyl ether	10.0	8.23		ug/L		82	50 - 122
4-Nitroaniline	10.0	9.05		ug/L		91	60 - 126
4-Nitrophenol	10.0	7.28		ug/L		73	20 - 151
Acenaphthene	10.0	7.92		ug/L		79	57 - 120
Acenaphthylene	10.0	8.07		ug/L		81	60 - 120
Aniline	10.0	7.71	J	ug/L		77	53 - 120
Anthracene	10.0	8.79		ug/L		88	62 - 120
Benzidine	10.0	5.19		ug/L		52	20 - 168
Benzo[a]anthracene	10.0	8.85		ug/L		88	62 - 120
Benzo[a]pyrene	10.0	8.55		ug/L		86	66 - 130
Benzo[b]fluoranthene	10.0	7.68		ug/L		77	46 - 125
Benzo[g,h,i]perylene	10.0	8.71		ug/L		87	52 - 136
Benzo[k]fluoranthene	10.0	8.05		ug/L		80	61 - 127
Benzoic acid	10.0	5.16	J	ug/L		52	20 - 120
Benzyl alcohol	10.0	8.28		ug/L		83	50 - 120
Bis(2-chloroethoxy)methane	10.0	7.95		ug/L		80	57 - 120
Bis(2-chloroethyl)ether	10.0	7.49		ug/L		75	54 - 120
bis (2-chloroisopropyl) ether	10.0	7.36		ug/L		74	45 - 120
Bis(2-ethylhexyl) phthalate	10.0	9.61		ug/L		96	61 - 126
Butyl benzyl phthalate	10.0	9.57		ug/L		96	57 - 129
Chrysene	10.0	9.09		ug/L		91	63 - 120
Di-n-butyl phthalate	10.0	8.97		ug/L		90	60 - 126
Di-n-octyl phthalate	10.0	8.29		ug/L		83	63 - 130
Dibenz(a,h)anthracene	10.0	8.57		ug/L		86	56 - 124
Dibenzofuran	10.0	8.21		ug/L		82	60 - 120
Diethyl phthalate	10.0	9.21		ug/L		92	44 - 131
Dimethyl phthalate	10.0	8.95		ug/L		89	33 - 140
Fluoranthene	10.0	9.12		ug/L		91	64 - 120

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 440-89381/2-A

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Fluorene	10.0	8.55		ug/L		86	52 - 120
Hexachlorobenzene	10.0	8.07		ug/L		81	61 - 120
Hexachlorobutadiene	10.0	4.31		ug/L		43	34 - 120
Hexachlorocyclopentadiene	10.0	4.14	J	ug/L		41	23 - 120
Hexachloroethane	10.0	4.36		ug/L		44	34 - 120
Indeno[1,2,3-cd]pyrene	10.0	8.28		ug/L		83	59 - 128
Isophorone	10.0	8.58		ug/L		86	50 - 120
N-Nitrosodi-n-propylamine	10.0	8.09		ug/L		81	60 - 120
N-Nitrosodiphenylamine	10.0	7.94		ug/L		79	58 - 120
Naphthalene	10.0	6.98		ug/L		70	52 - 120
Nitrobenzene	10.0	7.45		ug/L		75	52 - 120
Pentachlorophenol	10.0	7.00		ug/L		70	20 - 137
Phenol	10.0	7.31		ug/L		73	20 - 120
Phenanthrene	10.0	8.87		ug/L		89	62 - 120
Pyrene	10.0	9.66		ug/L		97	54 - 120
3-Methylphenol + 4-Methylphenol	10.0	7.39		ug/L		74	50 - 120
4-Chloroaniline	10.0	8.41		ug/L		84	52 - 120
N-Nitrosodimethylamine	10.0	7.29		ug/L		73	20 - 143

Surrogate	LCS %Recovery	LCS Qualifier	Limits
2,4,6-Tribromophenol	91		40 - 120
2-Fluorobiphenyl	83		50 - 120
2-Fluorophenol	71		30 - 120
Nitrobenzene-d5	76		45 - 120
Phenol-d6	79		35 - 120
Terphenyl-d14	95		50 - 125

Lab Sample ID: 440-39239-AA-1-A MS

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
1,2,4-Trichlorobenzene	ND		10.2	6.53		ug/L		64	45 - 120
1,2-Diphenylhydrazine(as Azobenzene)	ND		10.2	9.89		ug/L		97	60 - 120
1,2-Dichlorobenzene	ND		10.2	6.25		ug/L		61	40 - 120
1,3-Dichlorobenzene	ND		10.2	6.04		ug/L		59	35 - 120
1,4-Dichlorobenzene	ND		10.2	6.15		ug/L		60	35 - 120
2,4,5-Trichlorophenol	ND		10.2	8.91		ug/L		87	55 - 120
2,4,6-Trichlorophenol	ND		10.2	8.49		ug/L		83	55 - 120
2,4-Dichlorophenol	ND		10.2	7.99		ug/L		78	55 - 120
2,4-Dimethylphenol	ND		10.2	7.75		ug/L		76	40 - 120
2,4-Dinitrophenol	ND		10.2	8.48		ug/L		83	40 - 120
2,6-Dinitrotoluene	ND		10.2	9.16		ug/L		90	65 - 120
2-Chloronaphthalene	ND		10.2	8.04		ug/L		79	60 - 120
2-Chlorophenol	ND		10.2	7.40		ug/L		73	45 - 120
2-Methylnaphthalene	ND		10.2	7.57		ug/L		74	55 - 120
2-Methylphenol	ND		10.2	7.65		ug/L		75	50 - 120

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Svcs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 440-39239-AA-1-A MS

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec. Limits
	Result	Qualifier	Added	Result	Qualifier				
2-Nitroaniline	ND		10.2	8.82		ug/L		86	65 - 120
2-Nitrophenol	ND		10.2	7.76		ug/L		76	50 - 120
3,3'-Dichlorobenzidine	ND		10.2	4.45	J F	ug/L		44	45 - 135
3-Nitroaniline	ND		10.2	8.33		ug/L		82	60 - 120
4,6-Dinitro-2-methylphenol	ND		10.2	8.62		ug/L		84	45 - 120
4-Bromophenyl phenyl ether	ND		10.2	8.37		ug/L		82	60 - 120
4-Chloro-3-methylphenol	ND		10.2	8.51		ug/L		83	60 - 120
4-Chlorophenyl phenyl ether	ND		10.2	9.18		ug/L		90	65 - 120
4-Nitroaniline	ND		10.2	9.09		ug/L		89	55 - 125
4-Nitrophenol	ND		10.2	7.79		ug/L		76	45 - 120
Acenaphthene	ND		10.2	8.57		ug/L		84	60 - 120
Acenaphthylene	ND		10.2	8.72		ug/L		86	60 - 120
Aniline	ND		10.2	8.16	J	ug/L		80	35 - 120
Anthracene	ND		10.2	9.51		ug/L		93	65 - 120
Benzidine	ND		10.2	ND	F	ug/L		0	30 - 160
Benzo[a]anthracene	ND		10.2	9.69		ug/L		95	65 - 120
Benzo[a]pyrene	ND		10.2	9.44		ug/L		93	55 - 130
Benzo[b]fluoranthene	ND		10.2	8.13		ug/L		80	55 - 125
Benzo[g,h,i]perylene	ND		10.2	10.7		ug/L		105	45 - 135
Benzo[k]fluoranthene	ND		10.2	8.80		ug/L		86	55 - 125
Benzoic acid	ND		10.2	8.19	J	ug/L		80	25 - 125
Benzyl alcohol	ND		10.2	8.47		ug/L		83	40 - 120
Bis(2-chloroethoxy)methane	ND		10.2	8.43		ug/L		83	50 - 120
Bis(2-chloroethyl)ether	ND		10.2	6.89		ug/L		68	50 - 120
bis(2-chloroisopropyl) ether	ND		10.2	7.68		ug/L		75	45 - 120
Bis(2-ethylhexyl) phthalate	ND		10.2	11.0		ug/L		108	65 - 130
Butyl benzyl phthalate	ND		10.2	10.9		ug/L		107	55 - 130
Chrysene	ND		10.2	10.1		ug/L		99	65 - 120
Di-n-butyl phthalate	ND		10.2	10.1		ug/L		99	60 - 125
Di-n-octyl phthalate	ND		10.2	9.76		ug/L		96	65 - 135
Dibenz(a,h)anthracene	ND		10.2	9.50		ug/L		93	45 - 135
Dibenzofuran	ND		10.2	9.04		ug/L		89	65 - 120
Diethyl phthalate	ND		10.2	9.85		ug/L		97	55 - 120
Dimethyl phthalate	ND		10.2	9.76		ug/L		96	30 - 120
Fluoranthene	ND		10.2	10.1		ug/L		99	60 - 120
Fluorene	ND		10.2	9.42		ug/L		92	65 - 120
Hexachlorobenzene	ND		10.2	8.61		ug/L		84	60 - 120
Hexachlorobutadiene	ND		10.2	5.79		ug/L		57	40 - 120
Hexachlorocyclopentadiene	ND		10.2	5.15		ug/L		50	25 - 120
Hexachloroethane	ND		10.2	5.48		ug/L		54	35 - 120
Indeno[1,2,3-cd]pyrene	ND		10.2	9.34		ug/L		92	40 - 135
Isophorone	ND		10.2	9.19		ug/L		90	50 - 120
N-Nitrosodi-n-propylamine	ND		10.2	8.39		ug/L		82	45 - 120
N-Nitrosodiphenylamine	ND		10.2	8.10		ug/L		79	60 - 120
Naphthalene	ND		10.2	7.85		ug/L		77	55 - 120
Nitrobenzene	ND		10.2	8.12		ug/L		80	55 - 120
Pentachlorophenol	ND		10.2	7.83		ug/L		77	24 - 121
Phenol	ND		10.2	7.47		ug/L		73	40 - 120

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 440-39239-AA-1-A MS

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Phenanthrene	ND		10.2	9.48		ug/L		93	65 - 120
Pyrene	ND		10.2	10.3		ug/L		101	55 - 125
3-Methylphenol + 4-Methylphenol	ND		10.2	7.60		ug/L		75	50 - 120
4-Chloroaniline	ND		10.2	8.39		ug/L		82	55 - 120
N-Nitrosodimethylamine	ND		10.2	7.87		ug/L		77	45 - 120

Surrogate	MS %Recovery	MS Qualifier	Limits
2,4,6-Tribromophenol	95		40 - 120
2-Fluorobiphenyl	87		50 - 120
2-Fluorophenol	68		30 - 120
Nitrobenzene-d5	79		45 - 120
Phenol-d6	78		35 - 120
Terphenyl-d14	99		50 - 125

Lab Sample ID: 440-39239-AA-1-B MSD

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
1,2,4-Trichlorobenzene	ND		9.57	6.24		ug/L		65	45 - 120	5	20
1,2-Diphenylhydrazine(as Azobenzene)	ND		9.57	8.56		ug/L		89	60 - 120	14	25
1,2-Dichlorobenzene	ND		9.57	6.07		ug/L		63	40 - 120	3	25
1,3-Dichlorobenzene	ND		9.57	5.99		ug/L		63	35 - 120	1	25
1,4-Dichlorobenzene	ND		9.57	5.99		ug/L		63	35 - 120	3	25
2,4,5-Trichlorophenol	ND		9.57	7.86		ug/L		82	55 - 120	13	30
2,4,6-Trichlorophenol	ND		9.57	7.53		ug/L		79	55 - 120	12	30
2,4-Dichlorophenol	ND		9.57	7.17		ug/L		75	55 - 120	11	25
2,4-Dimethylphenol	ND		9.57	6.83		ug/L		71	40 - 120	13	25
2,4-Dinitrophenol	ND		9.57	7.49		ug/L		78	40 - 120	12	25
2,6-Dinitrotoluene	ND		9.57	8.43		ug/L		88	65 - 120	8	20
2-Chloronaphthalene	ND		9.57	7.40		ug/L		77	60 - 120	8	20
2-Chlorophenol	ND		9.57	6.87		ug/L		72	45 - 120	7	25
2-Methylnaphthalene	ND		9.57	6.96		ug/L		73	55 - 120	8	20
2-Methylphenol	ND		9.57	6.91		ug/L		72	50 - 120	10	25
2-Nitroaniline	ND		9.57	7.90		ug/L		83	65 - 120	11	25
2-Nitrophenol	ND		9.57	7.21		ug/L		75	50 - 120	7	25
3,3'-Dichlorobenzidine	ND		9.57	5.46		ug/L		57	45 - 135	20	25
3-Nitroaniline	ND		9.57	7.93		ug/L		83	60 - 120	5	25
4,6-Dinitro-2-methylphenol	ND		9.57	8.06		ug/L		84	45 - 120	7	25
4-Bromophenyl phenyl ether	ND		9.57	7.53		ug/L		79	60 - 120	11	25
4-Chloro-3-methylphenol	ND		9.57	7.49		ug/L		78	60 - 120	13	25
4-Chlorophenyl phenyl ether	ND		9.57	8.37		ug/L		87	65 - 120	9	25
4-Nitroaniline	ND		9.57	8.51		ug/L		89	55 - 125	7	25
4-Nitrophenol	ND		9.57	7.61		ug/L		80	45 - 120	2	30
Acenaphthene	ND		9.57	7.80		ug/L		81	60 - 120	9	25
Acenaphthylene	ND		9.57	7.85		ug/L		82	60 - 120	11	25
Aniline	ND		9.57	7.28	J	ug/L		76	35 - 120	11	30

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 625 - Semivolatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: 440-39239-AA-1-B MSD

Matrix: Water

Analysis Batch: 90394

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 89381

Analyte	Sample	Sample	Spike	MSD	MSD	Unit	D	%Rec	%Rec.	RPD	Limit
	Result	Qualifier	Added	Result	Qualifier				Limits		
Anthracene	ND		9.57	8.35		ug/L		87	65 - 120	13	25
Benzidine	ND		9.57	ND	F	ug/L		0	30 - 160	NC	35
Benzo[a]anthracene	ND		9.57	8.51		ug/L		89	65 - 120	13	20
Benzo[a]pyrene	ND		9.57	7.99		ug/L		83	55 - 130	17	25
Benzo[b]fluoranthene	ND		9.57	6.91		ug/L		72	55 - 125	16	25
Benzo[g,h,i]perylene	ND		9.57	9.23		ug/L		96	45 - 135	15	30
Benzo[k]fluoranthene	ND		9.57	7.76		ug/L		81	55 - 125	12	30
Benzoic acid	ND		9.57	5.93	J F	ug/L		62	25 - 125	32	30
Benzyl alcohol	ND		9.57	7.82		ug/L		82	40 - 120	8	30
Bis(2-chloroethoxy)methane	ND		9.57	7.60		ug/L		79	50 - 120	10	25
Bis(2-chloroethyl)ether	ND		9.57	7.73		ug/L		81	50 - 120	11	25
bis (2-chloroisopropyl) ether	ND		9.57	7.04		ug/L		74	45 - 120	9	25
Bis(2-ethylhexyl) phthalate	ND		9.57	9.20		ug/L		96	65 - 130	18	25
Butyl benzyl phthalate	ND		9.57	9.50		ug/L		99	55 - 130	14	25
Chrysene	ND		9.57	8.84		ug/L		92	65 - 120	13	25
Di-n-butyl phthalate	ND		9.57	8.65		ug/L		90	60 - 125	16	25
Di-n-octyl phthalate	ND		9.57	8.22		ug/L		86	65 - 135	17	20
Dibenz(a,h)anthracene	ND		9.57	8.52		ug/L		89	45 - 135	11	30
Dibenzofuran	ND		9.57	8.27		ug/L		86	65 - 120	9	25
Diethyl phthalate	ND		9.57	9.05		ug/L		95	55 - 120	9	30
Dimethyl phthalate	ND		9.57	9.01		ug/L		94	30 - 120	8	30
Fluoranthene	ND		9.57	8.84		ug/L		92	60 - 120	13	25
Fluorene	ND		9.57	8.64		ug/L		90	65 - 120	9	25
Hexachlorobenzene	ND		9.57	7.83		ug/L		82	60 - 120	10	25
Hexachlorobutadiene	ND		9.57	5.70		ug/L		60	40 - 120	2	25
Hexachlorocyclopentadiene	ND		9.57	5.07		ug/L		53	25 - 120	1	30
Hexachloroethane	ND		9.57	5.49		ug/L		57	35 - 120	0	25
Indeno[1,2,3-cd]pyrene	ND		9.57	8.22		ug/L		86	40 - 135	13	30
Isophorone	ND		9.57	7.97		ug/L		83	50 - 120	14	25
N-Nitrosodi-n-propylamine	ND		9.57	7.46		ug/L		78	45 - 120	12	25
N-Nitrosodiphenylamine	ND		9.57	7.02		ug/L		73	60 - 120	14	25
Naphthalene	ND		9.57	7.34		ug/L		77	55 - 120	7	25
Nitrobenzene	ND		9.57	7.26		ug/L		76	55 - 120	11	25
Pentachlorophenol	ND		9.57	6.51		ug/L		68	24 - 121	18	25
Phenol	ND		9.57	7.03		ug/L		73	40 - 120	6	25
Phenanthrene	ND		9.57	8.37		ug/L		87	65 - 120	12	25
Pyrene	ND		9.57	9.03		ug/L		94	55 - 125	14	25
3-Methylphenol + 4-Methylphenol	ND		9.57	7.05		ug/L		74	50 - 120	8	25
4-Chloroaniline	ND		9.57	7.94		ug/L		83	55 - 120	6	25
N-Nitrosodimethylamine	ND		9.57	7.02		ug/L		73	45 - 120	11	25

Surrogate	MSD	MSD	Limits
	%Recovery	Qualifier	
2,4,6-Tribromophenol	88		40 - 120
2-Fluorobiphenyl	82		50 - 120
2-Fluorophenol	70		30 - 120
Nitrobenzene-d5	75		45 - 120
Phenol-d6	77		35 - 120
Terphenyl-d14	92		50 - 125

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 608 - Organochlorine Pesticides in Water

Lab Sample ID: MB 440-89232/1-A

Matrix: Water

Analysis Batch: 89913

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 89232

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Aldrin	ND		0.0050	0.0015	ug/L		03/04/13 12:24	03/07/13 00:14	1
alpha-BHC	ND		0.0050	0.0025	ug/L		03/04/13 12:24	03/07/13 00:14	1
beta-BHC	ND		0.010	0.0040	ug/L		03/04/13 12:24	03/07/13 00:14	1
Chlordane (technical)	ND		0.10	0.080	ug/L		03/04/13 12:24	03/07/13 00:14	1
delta-BHC	ND		0.0050	0.0035	ug/L		03/04/13 12:24	03/07/13 00:14	1
Dieldrin	ND		0.0050	0.0020	ug/L		03/04/13 12:24	03/07/13 00:14	1
Endosulfan I	ND		0.0050	0.0030	ug/L		03/04/13 12:24	03/07/13 00:14	1
Endosulfan II	ND		0.0050	0.0020	ug/L		03/04/13 12:24	03/07/13 00:14	1
Endosulfan sulfate	ND		0.010	0.0030	ug/L		03/04/13 12:24	03/07/13 00:14	1
Endrin	ND		0.0050	0.0020	ug/L		03/04/13 12:24	03/07/13 00:14	1
Endrin aldehyde	ND		0.010	0.0020	ug/L		03/04/13 12:24	03/07/13 00:14	1
Endrin ketone	ND		0.010	0.0070	ug/L		03/04/13 12:24	03/07/13 00:14	1
gamma-BHC (Lindane)	ND		0.010	0.0030	ug/L		03/04/13 12:24	03/07/13 00:14	1
Heptachlor	ND		0.010	0.0030	ug/L		03/04/13 12:24	03/07/13 00:14	1
Heptachlor epoxide	ND		0.0050	0.0025	ug/L		03/04/13 12:24	03/07/13 00:14	1
Methoxychlor	ND		0.0050	0.0035	ug/L		03/04/13 12:24	03/07/13 00:14	1
Toxaphene	ND		0.50	0.25	ug/L		03/04/13 12:24	03/07/13 00:14	1
4,4'-DDD	ND		0.0050	0.0040	ug/L		03/04/13 12:24	03/07/13 00:14	1
4,4'-DDE	ND		0.0050	0.0030	ug/L		03/04/13 12:24	03/07/13 00:14	1
4,4'-DDT	ND		0.010	0.0040	ug/L		03/04/13 12:24	03/07/13 00:14	1
<b>Surrogate</b>	<b>MB %Recovery</b>	<b>MB Qualifier</b>	<b>Limits</b>				<b>Prepared</b>	<b>Analyzed</b>	<b>Dil Fac</b>
Tetrachloro-m-xylene	82		35 - 115				03/04/13 12:24	03/07/13 00:14	1

Lab Sample ID: LCS 440-89232/2-A

Matrix: Water

Analysis Batch: 89913

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 89232

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Aldrin	0.500	0.457		ug/L		91	40 - 115
alpha-BHC	0.500	0.491		ug/L		98	45 - 115
beta-BHC	0.500	0.481		ug/L		96	55 - 115
delta-BHC	0.500	0.525		ug/L		105	55 - 115
Dieldrin	0.500	0.473		ug/L		95	55 - 115
Endosulfan I	0.500	0.453		ug/L		91	55 - 115
Endosulfan II	0.500	0.477		ug/L		95	55 - 120
Endosulfan sulfate	0.500	0.514		ug/L		103	60 - 120
Endrin	0.500	0.474		ug/L		95	55 - 115
Endrin aldehyde	0.500	0.501		ug/L		100	50 - 120
Endrin ketone	0.500	0.503		ug/L		101	55 - 120
gamma-BHC (Lindane)	0.500	0.488		ug/L		98	45 - 115
Heptachlor	0.500	0.489		ug/L		98	45 - 115
Heptachlor epoxide	0.500	0.466		ug/L		93	55 - 115
Methoxychlor	0.500	0.487		ug/L		97	60 - 120
4,4'-DDD	0.500	0.493		ug/L		99	55 - 120
4,4'-DDE	0.500	0.485		ug/L		97	50 - 120
4,4'-DDT	0.500	0.519		ug/L		104	55 - 120

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 608 - Organochlorine Pesticides in Water (Continued)

Lab Sample ID: LCS 440-89232/2-A

Matrix: Water

Analysis Batch: 89913

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 89232

Surrogate	LCS LCS		Limits
	%Recovery	Qualifier	
Tetrachloro-m-xylene	81		35 - 115

Lab Sample ID: LCSD 440-89232/3-A

Matrix: Water

Analysis Batch: 89913

Client Sample ID: Lab Control Sample Dup

Prep Type: Total/NA

Prep Batch: 89232

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits		RPD	Limit
Aldrin	0.500	0.454		ug/L		91	40 - 115	1	30	
alpha-BHC	0.500	0.487		ug/L		97	45 - 115	1	30	
beta-BHC	0.500	0.477		ug/L		95	55 - 115	1	30	
delta-BHC	0.500	0.520		ug/L		104	55 - 115	1	30	
Dieldrin	0.500	0.469		ug/L		94	55 - 115	1	30	
Endosulfan I	0.500	0.449		ug/L		90	55 - 115	1	30	
Endosulfan II	0.500	0.473		ug/L		95	55 - 120	1	30	
Endosulfan sulfate	0.500	0.521		ug/L		104	60 - 120	1	30	
Endrin	0.500	0.511		ug/L		102	55 - 115	7	30	
Endrin aldehyde	0.500	0.480		ug/L		96	50 - 120	4	30	
Endrin ketone	0.500	0.491		ug/L		98	55 - 120	2	30	
gamma-BHC (Lindane)	0.500	0.484		ug/L		97	45 - 115	1	30	
Heptachlor	0.500	0.491		ug/L		98	45 - 115	0	30	
Heptachlor epoxide	0.500	0.462		ug/L		92	55 - 115	1	30	
Methoxychlor	0.500	0.527		ug/L		105	60 - 120	8	30	
4,4'-DDD	0.500	0.487		ug/L		97	55 - 120	1	30	
4,4'-DDE	0.500	0.480		ug/L		96	50 - 120	1	30	
4,4'-DDT	0.500	0.530		ug/L		106	55 - 120	2	30	

Surrogate	LCSD LCSD		Limits
	%Recovery	Qualifier	
Tetrachloro-m-xylene	81		35 - 115

## Method: 608 - Polychlorinated Biphenyls (PCBs) (GC)

Lab Sample ID: MB 440-89232/1-A

Matrix: Water

Analysis Batch: 89559

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 89232

Analyte	MB MB		RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Aroclor 1016	ND		0.50	0.25	ug/L		03/04/13 12:24	03/05/13 16:19	1
Aroclor 1221	ND		0.50	0.25	ug/L		03/04/13 12:24	03/05/13 16:19	1
Aroclor 1232	ND		0.50	0.25	ug/L		03/04/13 12:24	03/05/13 16:19	1
Aroclor 1242	ND		0.50	0.25	ug/L		03/04/13 12:24	03/05/13 16:19	1
Aroclor 1248	ND		0.50	0.25	ug/L		03/04/13 12:24	03/05/13 16:19	1
Aroclor 1254	ND		0.50	0.25	ug/L		03/04/13 12:24	03/05/13 16:19	1
Aroclor 1260	ND		0.50	0.25	ug/L		03/04/13 12:24	03/05/13 16:19	1

Surrogate	MB MB		Limits	Prepared	Analyzed	Dil Fac
	%Recovery	Qualifier				
DCB Decachlorobiphenyl (Surr)	90		45 - 120	03/04/13 12:24	03/05/13 16:19	1

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 608 - Polychlorinated Biphenyls (PCBs) (GC) (Continued)

**Lab Sample ID:** LCS 440-89232/4-A  
**Matrix:** Water  
**Analysis Batch:** 89559

**Client Sample ID:** Lab Control Sample  
**Prep Type:** Total/NA  
**Prep Batch:** 89232

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Aroclor 1016	4.00	3.59		ug/L		90	50 - 115
Aroclor 1260	4.00	3.75		ug/L		94	60 - 120
<b>Surrogate</b>		<b>LCS %Recovery</b>	<b>LCS Qualifier</b>				<b>Limits</b>
DCB Decachlorobiphenyl (Surr)		94					45 - 120

**Lab Sample ID:** LCSD 440-89232/5-A  
**Matrix:** Water  
**Analysis Batch:** 89559

**Client Sample ID:** Lab Control Sample Dup  
**Prep Type:** Total/NA  
**Prep Batch:** 89232

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Aroclor 1016	4.00	3.72		ug/L		93	50 - 115	4	30
Aroclor 1260	4.00	3.87		ug/L		97	60 - 120	3	25
<b>Surrogate</b>		<b>LCSD %Recovery</b>	<b>LCSD Qualifier</b>				<b>Limits</b>		
DCB Decachlorobiphenyl (Surr)		95					45 - 120		

## Method: 6020 - Metals (ICP/MS)

**Lab Sample ID:** MB 440-90775/1-A  
**Matrix:** Water  
**Analysis Batch:** 90997

**Client Sample ID:** Method Blank  
**Prep Type:** Total Recoverable  
**Prep Batch:** 90775

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Arsenic	ND		1.0	0.90	ug/L		03/11/13 09:38	03/11/13 20:15	1
Cadmium	ND		1.0	0.10	ug/L		03/11/13 09:38	03/11/13 20:15	1
Chromium	ND		2.0	0.90	ug/L		03/11/13 09:38	03/11/13 20:15	1
Copper	1.91	J	2.0	0.50	ug/L		03/11/13 09:38	03/11/13 20:15	1
Lead	ND		1.0	0.20	ug/L		03/11/13 09:38	03/11/13 20:15	1
Nickel	ND		2.0	0.50	ug/L		03/11/13 09:38	03/11/13 20:15	1
Selenium	ND		2.0	0.50	ug/L		03/11/13 09:38	03/11/13 20:15	1
Silver	ND		1.0	0.10	ug/L		03/11/13 09:38	03/11/13 20:15	1

**Lab Sample ID:** MB 440-90775/1-A  
**Matrix:** Water  
**Analysis Batch:** 91099

**Client Sample ID:** Method Blank  
**Prep Type:** Total Recoverable  
**Prep Batch:** 90775

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Zinc	ND		20	4.0	ug/L		03/11/13 09:38	03/12/13 10:07	1

**Lab Sample ID:** LCS 440-90775/2-A  
**Matrix:** Water  
**Analysis Batch:** 90997

**Client Sample ID:** Lab Control Sample  
**Prep Type:** Total Recoverable  
**Prep Batch:** 90775

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Arsenic	80.0	81.6		ug/L		102	80 - 120
Cadmium	80.0	80.5		ug/L		101	80 - 120
Chromium	80.0	81.2		ug/L		102	80 - 120

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 6020 - Metals (ICP/MS) (Continued)

**Lab Sample ID: LCS 440-90775/2-A**  
**Matrix: Water**  
**Analysis Batch: 90997**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total Recoverable**  
**Prep Batch: 90775**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec.	
							Limits	
Copper	80.0	81.0		ug/L		101	80 - 120	
Lead	80.0	79.4		ug/L		99	80 - 120	
Nickel	80.0	80.5		ug/L		101	80 - 120	
Selenium	80.0	82.1		ug/L		103	80 - 120	
Silver	80.0	72.3		ug/L		90	80 - 120	

**Lab Sample ID: LCS 440-90775/2-A**  
**Matrix: Water**  
**Analysis Batch: 91099**

**Client Sample ID: Lab Control Sample**  
**Prep Type: Total Recoverable**  
**Prep Batch: 90775**

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec.	
							Limits	
Zinc	80.0	88.2		ug/L		110	80 - 120	

**Lab Sample ID: 440-39239-I-1-B MS**  
**Matrix: Water**  
**Analysis Batch: 90997**

**Client Sample ID: Matrix Spike**  
**Prep Type: Total Recoverable**  
**Prep Batch: 90775**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec.	
									Limits	
Arsenic	ND		80.0	83.4		ug/L		104	75 - 125	
Cadmium	ND		80.0	79.1		ug/L		99	75 - 125	
Chromium	41		80.0	119		ug/L		97	75 - 125	
Copper	0.70	J B	80.0	76.9		ug/L		95	75 - 125	
Lead	ND		80.0	78.4		ug/L		98	75 - 125	
Nickel	0.50	J	80.0	76.5		ug/L		96	75 - 125	
Selenium	2.1		80.0	84.0		ug/L		102	75 - 125	
Silver	ND		80.0	70.6		ug/L		88	75 - 125	

**Lab Sample ID: 440-39239-I-1-B MS**  
**Matrix: Water**  
**Analysis Batch: 91099**

**Client Sample ID: Matrix Spike**  
**Prep Type: Total Recoverable**  
**Prep Batch: 90775**

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec.	
									Limits	
Zinc	5.2	J	80.0	74.8		ug/L		87	75 - 125	

**Lab Sample ID: 440-39239-I-1-C MSD**  
**Matrix: Water**  
**Analysis Batch: 90997**

**Client Sample ID: Matrix Spike Duplicate**  
**Prep Type: Total Recoverable**  
**Prep Batch: 90775**

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec.		RPD	
									Limits		RPD	Limit
Arsenic	ND		80.0	82.7		ug/L		103	75 - 125		1	20
Cadmium	ND		80.0	76.7		ug/L		96	75 - 125		3	20
Chromium	41		80.0	115		ug/L		92	75 - 125		4	20
Copper	0.70	J B	80.0	75.9		ug/L		94	75 - 125		1	20
Lead	ND		80.0	77.8		ug/L		97	75 - 125		1	20
Nickel	0.50	J	80.0	73.1		ug/L		91	75 - 125		5	20
Selenium	2.1		80.0	81.8		ug/L		100	75 - 125		3	20
Silver	ND		80.0	69.5		ug/L		87	75 - 125		1	20

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: 6020 - Metals (ICP/MS) (Continued)

Lab Sample ID: 440-39239-I-1-C MSD

Matrix: Water

Analysis Batch: 91099

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total Recoverable

Prep Batch: 90775

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD	MSD	Unit	D	%Rec	%Rec.	RPD	Limit
				Result	Qualifier				Limits		
Zinc	5.2	J	80.0	85.8		ug/L		101	75 - 125	14	20

## Method: 7470A - Mercury (CVAA)

Lab Sample ID: MB 440-89940/1-A

Matrix: Water

Analysis Batch: 90184

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 89940

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Mercury	ND		0.00020	0.00010	mg/L		03/07/13 10:40	03/07/13 13:29	1

Lab Sample ID: LCS 440-89940/2-A

Matrix: Water

Analysis Batch: 90184

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 89940

Analyte	Spike Added	LCS	LCS	Unit	D	%Rec	%Rec.
		Result	Qualifier				Limits
Mercury	0.00800	0.00825		mg/L		103	80 - 120

Lab Sample ID: 440-39613-C-1-E MS

Matrix: Water

Analysis Batch: 90184

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 89940

Analyte	Sample Result	Sample Qualifier	Spike Added	MS	MS	Unit	D	%Rec	%Rec.
				Result	Qualifier				Limits
Mercury	ND		0.00800	0.00752		mg/L		94	70 - 130

Lab Sample ID: 440-39613-C-1-F MSD

Matrix: Water

Analysis Batch: 90184

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 89940

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD	MSD	Unit	D	%Rec	%Rec.	RPD	Limit
				Result	Qualifier				Limits		
Mercury	ND		0.00800	0.00734		mg/L		92	70 - 130	2	20

## Method: SM 2540B - Solids, Total

Lab Sample ID: MB 440-88886/1

Matrix: Water

Analysis Batch: 88886

Client Sample ID: Method Blank

Prep Type: Total/NA

Analyte	MB	MB	RL	RL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Total Solids	ND		10	10	mg/L			03/01/13 16:34	1

Lab Sample ID: LCS 440-88886/2

Matrix: Water

Analysis Batch: 88886

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS	LCS	Unit	D	%Rec	%Rec.
		Result	Qualifier				Limits
Total Solids	1000	1030		mg/L		103	90 - 110

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: SM 2540B - Solids, Total (Continued)

Lab Sample ID: 440-39446-1 DU

Matrix: Water

Analysis Batch: 88886

Client Sample ID: Transport Sludge

Prep Type: Total/NA

Analyte	Sample		DU		Unit	D	RPD	Limit
	Result	Qualifier	Result	Qualifier				
Total Solids	16000		16100		mg/L		1	10

## Method: SM 4500 CN E - Cyanide, Total

Lab Sample ID: MB 440-90217/1-A

Matrix: Water

Analysis Batch: 90301

Client Sample ID: Method Blank

Prep Type: Total/NA

Prep Batch: 90217

Analyte	MB		RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Cyanide, Total	ND		25	17	ug/L		03/07/13 15:50	03/07/13 20:45	1

Lab Sample ID: LCS 440-90217/2-A

Matrix: Water

Analysis Batch: 90301

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Batch: 90217

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits

Lab Sample ID: 440-39843-I-1-B MS

Matrix: Water

Analysis Batch: 90301

Client Sample ID: Matrix Spike

Prep Type: Total/NA

Prep Batch: 90217

Analyte	Sample		Spike Added	MS		Unit	D	%Rec	%Rec. Limits
	Result	Qualifier		Result	Qualifier				
Cyanide, Total	ND		200	205		ug/L		103	70 - 115

Lab Sample ID: 440-39843-I-1-C MSD

Matrix: Water

Analysis Batch: 90301

Client Sample ID: Matrix Spike Duplicate

Prep Type: Total/NA

Prep Batch: 90217

Analyte	Sample		Spike Added	MSD		Unit	D	%Rec	%Rec. Limits	RPD	Limit
	Result	Qualifier		Result	Qualifier						
Cyanide, Total	ND		200	189		ug/L		95	70 - 115	8	15

## Method: SM 4500 NH3 D - Ammonia

Lab Sample ID: MB 440-88862/9

Matrix: Water

Analysis Batch: 88862

Client Sample ID: Method Blank

Prep Type: Total/NA

Analyte	MB		RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Ammonia (as N)	ND		0.50	0.10	mg/L			03/01/13 14:25	1

Lab Sample ID: LCS 440-88862/7

Matrix: Water

Analysis Batch: 88862

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits

TestAmerica Irvine

# QC Sample Results

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Method: SM 4500 NH3 D - Ammonia (Continued)

Lab Sample ID: 440-39233-AP-24 MS

Client Sample ID: Matrix Spike

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 88862

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec. Limits
Ammonia (as N)	ND		2.00	1.95		mg/L		98	75 - 125

Lab Sample ID: 440-39233-AP-24 MSD

Client Sample ID: Matrix Spike Duplicate

Matrix: Water

Prep Type: Total/NA

Analysis Batch: 88862

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
Ammonia (as N)	ND		2.00	1.95		mg/L		98	75 - 125	0	15

# QC Association Summary

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## GC/MS VOA

### Analysis Batch: 88644

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39050-E-1 MS	Matrix Spike	Total/NA	Water	624	
440-39050-E-1 MSD	Matrix Spike Duplicate	Total/NA	Water	624	
440-39446-1	Transport Sludge	Total/NA	Water	624	
440-39446-2	Transport Sludge (Bottom)	Total/NA	Water	624	
LCS 440-88644/5	Lab Control Sample	Total/NA	Water	624	
LCS 440-88644/6	Lab Control Sample Dup	Total/NA	Water	624	
MB 440-88644/4	Method Blank	Total/NA	Water	624	

### Analysis Batch: 88718

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39182-A-2 MSD	Matrix Spike Duplicate	Total/NA	Water	624	
440-39182-B-2 MS	Matrix Spike	Total/NA	Water	624	
440-39446-1	Transport Sludge	Total/NA	Water	624	
LCS 440-88718/5	Lab Control Sample	Total/NA	Water	624	
MB 440-88718/4	Method Blank	Total/NA	Water	624	

### Analysis Batch: 88891

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39377-F-7 MS	Matrix Spike	Total/NA	Water	624	
440-39377-F-7 MSD	Matrix Spike Duplicate	Total/NA	Water	624	
440-39446-2	Transport Sludge (Bottom)	Total/NA	Water	624	
LCS 440-88891/5	Lab Control Sample	Total/NA	Water	624	
MB 440-88891/4	Method Blank	Total/NA	Water	624	

## GC/MS Semi VOA

### Prep Batch: 89381

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	625	
440-39239-AA-1-A MS	Matrix Spike	Total/NA	Water	625	
440-39239-AA-1-B MSD	Matrix Spike Duplicate	Total/NA	Water	625	
LCS 440-89381/2-A	Lab Control Sample	Total/NA	Water	625	
MB 440-89381/1-A	Method Blank	Total/NA	Water	625	

### Analysis Batch: 89886

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	625	89381
MB 440-89381/1-A	Method Blank	Total/NA	Water	625	89381

### Analysis Batch: 90394

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39239-AA-1-A MS	Matrix Spike	Total/NA	Water	625	89381
440-39239-AA-1-B MSD	Matrix Spike Duplicate	Total/NA	Water	625	89381
LCS 440-89381/2-A	Lab Control Sample	Total/NA	Water	625	89381

## GC Semi VOA

### Prep Batch: 89232

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	608	

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# QC Association Summary

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## GC Semi VOA (Continued)

### Prep Batch: 89232 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCS 440-89232/2-A	Lab Control Sample	Total/NA	Water	608	
LCS 440-89232/4-A	Lab Control Sample	Total/NA	Water	608	
LCS 440-89232/3-A	Lab Control Sample Dup	Total/NA	Water	608	
LCS 440-89232/5-A	Lab Control Sample Dup	Total/NA	Water	608	
MB 440-89232/1-A	Method Blank	Total/NA	Water	608	

### Analysis Batch: 89559

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	608	89232
LCS 440-89232/4-A	Lab Control Sample	Total/NA	Water	608	89232
LCS 440-89232/5-A	Lab Control Sample Dup	Total/NA	Water	608	89232
MB 440-89232/1-A	Method Blank	Total/NA	Water	608	89232

### Analysis Batch: 89913

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	608	89232
LCS 440-89232/2-A	Lab Control Sample	Total/NA	Water	608	89232
LCS 440-89232/3-A	Lab Control Sample Dup	Total/NA	Water	608	89232
MB 440-89232/1-A	Method Blank	Total/NA	Water	608	89232

## Metals

### Prep Batch: 89940

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	7470A	
440-39613-C-1-E MS	Matrix Spike	Total/NA	Water	7470A	
440-39613-C-1-F MSD	Matrix Spike Duplicate	Total/NA	Water	7470A	
LCS 440-89940/2-A	Lab Control Sample	Total/NA	Water	7470A	
MB 440-89940/1-A	Method Blank	Total/NA	Water	7470A	

### Analysis Batch: 90184

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	7470A	89940
440-39613-C-1-E MS	Matrix Spike	Total/NA	Water	7470A	89940
440-39613-C-1-F MSD	Matrix Spike Duplicate	Total/NA	Water	7470A	89940
LCS 440-89940/2-A	Lab Control Sample	Total/NA	Water	7470A	89940
MB 440-89940/1-A	Method Blank	Total/NA	Water	7470A	89940

### Prep Batch: 90775

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39239-I-1-B MS	Matrix Spike	Total Recoverable	Water	3005A	
440-39239-I-1-C MSD	Matrix Spike Duplicate	Total Recoverable	Water	3005A	
440-39446-1	Transport Sludge	Total Recoverable	Water	3005A	
LCS 440-90775/2-A	Lab Control Sample	Total Recoverable	Water	3005A	
MB 440-90775/1-A	Method Blank	Total Recoverable	Water	3005A	

### Analysis Batch: 90997

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39239-I-1-B MS	Matrix Spike	Total Recoverable	Water	6020	90775
440-39239-I-1-C MSD	Matrix Spike Duplicate	Total Recoverable	Water	6020	90775

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# QC Association Summary

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Metals (Continued)

### Analysis Batch: 90997 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total Recoverable	Water	6020	90775
LCS 440-90775/2-A	Lab Control Sample	Total Recoverable	Water	6020	90775
MB 440-90775/1-A	Method Blank	Total Recoverable	Water	6020	90775

### Analysis Batch: 91099

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39239-I-1-B MS	Matrix Spike	Total Recoverable	Water	6020	90775
440-39239-I-1-C MSD	Matrix Spike Duplicate	Total Recoverable	Water	6020	90775
440-39446-1	Transport Sludge	Total Recoverable	Water	6020	90775
LCS 440-90775/2-A	Lab Control Sample	Total Recoverable	Water	6020	90775
MB 440-90775/1-A	Method Blank	Total Recoverable	Water	6020	90775

## General Chemistry

### Analysis Batch: 88862

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	SM 4500 NH3 D	
440-39233-AP-24 MS	Matrix Spike	Total/NA	Water	SM 4500 NH3 D	
440-39233-AP-24 MSD	Matrix Spike Duplicate	Total/NA	Water	SM 4500 NH3 D	
LCS 440-88862/7	Lab Control Sample	Total/NA	Water	SM 4500 NH3 D	
MB 440-88862/9	Method Blank	Total/NA	Water	SM 4500 NH3 D	

### Analysis Batch: 88886

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	SM 2540B	
440-39446-1 DU	Transport Sludge	Total/NA	Water	SM 2540B	
LCS 440-88886/2	Lab Control Sample	Total/NA	Water	SM 2540B	
MB 440-88886/1	Method Blank	Total/NA	Water	SM 2540B	

### Prep Batch: 90217

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	Distill/CN	
440-39843-I-1-B MS	Matrix Spike	Total/NA	Water	Distill/CN	
440-39843-I-1-C MSD	Matrix Spike Duplicate	Total/NA	Water	Distill/CN	
LCS 440-90217/2-A	Lab Control Sample	Total/NA	Water	Distill/CN	
MB 440-90217/1-A	Method Blank	Total/NA	Water	Distill/CN	

### Analysis Batch: 90301

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
440-39446-1	Transport Sludge	Total/NA	Water	SM 4500 CN E	90217
440-39843-I-1-B MS	Matrix Spike	Total/NA	Water	SM 4500 CN E	90217
440-39843-I-1-C MSD	Matrix Spike Duplicate	Total/NA	Water	SM 4500 CN E	90217
LCS 440-90217/2-A	Lab Control Sample	Total/NA	Water	SM 4500 CN E	90217
MB 440-90217/1-A	Method Blank	Total/NA	Water	SM 4500 CN E	90217

# Definitions/Glossary

Client: Veolia Water N. America Operating Srvs  
Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Qualifiers

### GC/MS VOA

Qualifier	Qualifier Description
F	MS or MSD exceeds the control limits

### GC/MS Semi VOA

Qualifier	Qualifier Description
F	MS or MSD exceeds the control limits
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
F	RPD of the MS and MSD exceeds the control limits
X	Surrogate is outside control limits

### GC Semi VOA

Qualifier	Qualifier Description
X	Surrogate is outside control limits

## Metals

Qualifier	Qualifier Description
B	Compound was found in the blank and sample.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

## Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
▫	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

# Certification Summary

Client: Veolia Water N. America Operating Srvs  
 Project/Site: Semi-Annual Sludge

TestAmerica Job ID: 440-39446-1

## Laboratory: TestAmerica Irvine

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
Alaska	State Program	10	CA01531	06-30-13
Arizona	State Program	9	AZ0671	10-13-13
California	LA Cty Sanitation Districts	9	10256	01-31-14
California	NELAP	9	1108CA	01-31-14
California	State Program	9	2706	06-30-14
Guam	State Program	9	Cert. No. 12.002r	03-28-13
Hawaii	State Program	9	N/A	01-31-14
Nevada	State Program	9	CA015312007A	07-31-13
New Mexico	State Program	6	N/A	03-28-13
Northern Mariana Islands	State Program	9	MP0002	03-28-13
Oregon	NELAP	10	4005	09-12-13
USDA	Federal		P330-09-00080	06-06-14
USEPA UCMR	Federal	1	CA01531	01-31-15





## Login Sample Receipt Checklist

Client: Veolia Water N. America Operating Svcs

Job Number: 440-39446-1

**Login Number: 39446**

**List Number: 1**

**Creator: Perez, Angel**

**List Source: TestAmerica Irvine**

Question	Answer	Comment
Radioactivity wasn't checked or is <math>\leq</math> background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	OPS
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	True	
Multiphasic samples are not present.	N/A	
Samples do not require splitting or compositing.	N/A	
Residual Chlorine Checked.	N/A	