

Weston Solutions, Inc. 1400 Weston Way P.O. Box 2653 West Chester, Pennsylvania 19380 610-701-3000 • Fax 610-701-3186 www.westonsolutions.com

The Trusted Integrator for Sustainable Solutions

February 19, 2015

Mr. Brian Sadowski New York State Department of Environmental Conservation 270 Michigan Avenue Buffalo, New York 14203-2915

W.O. No. 02181.086.022

Re:

Periodic Review Report (February 14, 2014 to February 14, 2015)

and IC/EC Certification

3M Tonawanda, New York Facility

Order on Consent # B9-0369-91-04, Site Code #915148

Dear Mr. Sadowski:

In accordance with the referenced Order on Consent (Order) and at 3M's direction, we are submitting the Periodic Review Report (PRR) for the 3M Tonawanda, NY facility for the period extending from February 14, 2014 to February 14, 2015.

We also have enclosed the completed Institutional and Engineering Controls Certification Form for this site.

Should you have any comments or questions, please contact me at 610-701-3677.

RECEIVED

FEB 2 4 2015

NYS DEC REGION 9 Very truly yours,

WESTON SOLUTIONS, INC.

Thomas A. Drew, P.G. Principal Project Manager

MIKE COMSIN FOR

J. Pettinelli, 3M (w/ enclosure)

K. Held, 3M (w/ enclosure)

G. May, NYSDEC (w/enclosure)

c:



Enclosure 2 NEW YORK STATE DEPARTMENT OF ENVIRONMENTAL CONSERVATION Site Management Periodic Review Report Notice Institutional and Engineering Controls Certification Form



	Sit	e No.	915148	Site Details	Box 1	
	Sit	e Name 3M	f O-Cel-O Sponge Plant			
	City	e Address: y/Town: To unty: Erie e Acreage:		Zip Code: 14150		
	Re	porting Peri	od: February 14, 2014 to	February 14, 2015		
					YES	NO
	1.	is the infor	mation above correct?		5	0
		If NO, incli	ude handwritten above or	on a separate sheet.		
	2.		or all of the site property mendment during this Re	been sold, subdivided, merged, or un porting Period?	ndergone a ಟ	
	3 .		been any change of use a CRR 375-1.11(d))?	at the site during this Reporting Perio	d C	25
	4.		federal, state, and/or loca e property during this Rep	il permits (e.g., building, discharge) b porting Period?	een issued	2
				s 2 thru 4, include documentation ov Nously submitted with this certific		
	5.	that docu		viously submitted with this certific		09
-	5.	that docu	mentation has been pre	viously submitted with this certific	ation form.	
	5.	that docu	mentation has been pre	viously submitted with this certific	cation form.	
		that docu	mentation has been pre	viously submitted with this certific	Box 2	
	6.	Is the curre	mentation has been pre	elopment? th the use(s) listed below?	Box 2	NO
	6.	Is the curre Industrial Are all ICs	mentation has been pre currently undergoing deve ent site use consistent wit /ECs in place and functio	elopment? th the use(s) listed below?	Box 2 YES State below and	NO
	6.	Is the curre Industrial Are all ICs	mentation has been precurrently undergoing device the site use consistent with the con	elopment? th the use(s) listed below? ning as designed? QUESTION 6 OR 7 IS NO, sign and designed.	Box 2 YES State below and continue.	NO
	6. 7.	Is the curre Industrial Are all ICs	mentation has been precurrently undergoing device the site use consistent with the con	elopment? th the use(s) listed below? ning as designed? QUESTION 6 OR 7 IS NO, sign and discrete of the complete of the com	Box 2 YES State below and continue.	NO

SITE NO. 915148 Box 3

Description of Institutional Controls

Parcel 65.09-6-5 <u>Owner</u>

Minnesota Mining & Manufacturing

Institutional Control

Landuse Restriction Monitoring Plan

A No Further Action Record of Decision (ROD) was issued for this site in March 1999. A Declaration of Convenants and Restrictions was placed on the property on March 21, 2001 prohibiting the residential use of the site. The graded area surrounding the catch basins are maintained and inspected annually. Groundwater monitoring is also conducted to confirm that site conditions remain unchanged and to detect any future migration of CS2, should it occur. The site is fenced.

Box 4

Description of Engineering Controls

Parcel 65.09-6-5 Engineering Control
Fencing/Access Control

			Box 5		
	Periodic Review Report (PRR) Certification Statements				
1.	I certify by checking "YES" below that:				
	 a) the Periodic Review report and all attachments were prepared under the dire reviewed by, the party making the certification; 	ction of,	, and		
	 b) to the best of my knowledge and belief, the work and conclusions described are in accordance with the requirements of the site remedial program, and gene engineering practices; and the information presented is accurate and compete. 	enerally accepted			
	engineering practices, and the information presented is accurate and compete.	YES	NO		
		55			
2.	If this site has an IC/EC Plan (or equivalent as required in the Decision Document), for or Engineering control listed in Boxes 3 and/or 4, I certify by checking "YES" below that following statements are true:				
	(a) the Institutional Control and/or Engineering Control(s) employed at this site in the date that the Control was put in-place, or was last approved by the Department		inged since		
	(b) nothing has occurred that would impair the ability of such Control, to protect the environment;	public h	ealth and		
	 (c) access to the site will continue to be provided to the Department, to evaluate including access to evaluate the continued maintenance of this Control; 	the ren	nedy,		
	 (d) nothing has occurred that would constitute a violation or failure to comply with Management Plan for this Control; and 	th the S	ite		
	(e) if a financial assurance mechanism is required by the oversight document for mechanism remains valid and sufficient for its intended purpose established in the				
		YES	NO		
		8	0		
	IF THE ANSWER TO QUESTION 2 IS NO, sign and date below and DO NOT COMPLETE THE REST OF THIS FORM. Otherwise continue.				

A Corrective Measures Work Plan must be submitted along with this form to address these issues.

Date

Signature of Owner, Remedial Party or Designated Representative

IC CERTIFICATIONS SITE NO. 915148

Box 6

SITE OWNER OR DESIGNATED REPRESENTATIVE SIGNATURE

I certify that all information and statements in Boxes 1,2, and 3 are true. I understand that a false statement made herein is punishable as a Class "A" misdemeanor, pursuant to Section 210.45 of the Penal Law.

Carl Carleton at 305 Sawyar print name print business	Ave Tonamah NY
print name print business	address
am certifying as <u>Plant Manager</u>	(Owner or Remedial Party)
for the Site named in the Site Details Section of this form.	
Signature of Owner, Remedial Party, or Designated Representative Rendering Certification	2-17-15 Date

IC/EC CERTIFICATIONS

		Box 7
Qualified Environmental Profe	essional Signature	
I certify that all information in Boxes 4 and 5 are true. I und punishable as a Class "A" misdemeanor, pursuant to Section 1400 W Dichard Lord Lord at West Capprint name print by	on 210.45 of the Penal La	
am certifying as a Qualified Environmental Professional for	the OWNER	-
am certifying as a Qualified Environmental Professional for	(Owner or Remedia	al Party)
Signature of Qualified Environmental Professional, for the Owner or Remedial Party, Rendering Certification	SEAL BELOW Stamp (Required for PE)	2-19-15 Date



PERIODIC REVIEW REPORT

Site Name and Location: 3M Facility, Tonawanda, New York

Registry Number: 915148 RECEIVED

Order on Consent: B9-0369-91-04 FEB **2 4** 2015

3M Project Contacts: Justin Pettinelli (3M Corporate)

Keith Held (3M Tonawanda)

NYS DEC

REGION 9

NYSDEC Project Lead: Glenn May

Reporting Period: February 14, 2014 to February 14, 2015

Background

The New York State Department of Environmental Conservation (NYSDEC) issued a Record of Decision (ROD) (Registry No. 915148) for the 3M facility in Tonawanda, New York. This ROD presents the selected remedial action for the Tonawanda facility based on the site's Administrative Record and public input. Following ROD issuance, the NYSDEC reclassified the 3M Tonawanda site from "Class 3 – Does not present a significant threat to the public health or environment – action may be deferred", to "Class 4 – Site properly closed – requires continued management."

3M is implementing the selected ROD remedy, No Further Action with Monitoring, under an Order on Consent (Index # B9-0369-91-04) (Order) according to the NYSDEC-approved Operation and Maintenance Work Plan (O&M Work Plan), which was made part of the Order. The original O&M Work Plan called for:

- Filing a Declaration of Covenants and Restrictions with the property deed at the Erie County Clerk's Office. This was completed and was reported in the initial progress report for the period ending March 31, 2001.
- Performing long-term groundwater monitoring. Involved semiannual sampling of site monitor wells MW-1, MW-2, MW-3, and MW-4 and annual sampling of the two site lysimeters, LY-1 and LY-2, with groundwater samples analyzed for carbon disulfide (CS₂).
- Inspecting the completed interim remedial measures (IRMs) (includes the CS₂ tank system, and the catch basin and associated swale) and maintaining the integrity of the IRMs.

Semiannual periodic review reports have been submitted by 3M to NYSDEC and these reports summarize project activities that occurred in the previous reporting periods. In



August 2005, the Five-Year Evaluation Report was submitted by 3M to NYSDEC and this report concluded that the selected remedy has been effective in meeting remediation goals outlined in the 1999 ROD and remains protective of human health and the environment. The aforementioned evaluation report also contained a recommended future course of action for the facility, including reductions in groundwater monitoring and reporting under the Order/O&M Plan.

By letter of May 18, 2006, NYSDEC provided comment on the Five-Year Evaluation Report. Based on the presence of CS₂ in the subsurface environment, NYSDEC required continued monitoring at this facility, but required only one site monitoring well (MW-4) and one site lysimeter (LY-2) be monitored for CS₂ on a semiannual basis and annual basis, respectively. According to the May 2006 NYSDEC correspondence, reporting on the maintenance of the drainage swale and associated catch basins would continue under the Order/O&M Plan; however, reporting on the continued operations, maintenance and inspection of the existing CS₂ tank system could be completed by 3M under NYSDEC's Chemical Bulk Storage Program.

This Periodic Review Report (PRR) reflects the O&M monitoring and reporting modifications agreed upon with NYSDEC. Sampling of the reduced monitoring network under the modified O&M Plan was completed in May 2014 and November 2014. The results from these sampling events are presented herein, along with a description of any maintenance activity conducted in the swale. Also, all analytical results presented in this (PRR) will be uploaded into NYSDEC's EQuIS system in March 2015.

Summary of Activities Performed During the Reporting Period

The following is a summary of activities performed by 3M during the reporting period:

- Groundwater samples for CS₂ analysis were collected from monitoring well MW-4 (primary sample and duplicate sample) and lysimeter LY-02 on May 28, 2014 in accordance with the O&M Plan modifications approved by NYSDEC. Laboratory analytical results from the May 28, 2014 sampling event are provided in this report. Photographs of the site groundwater monitoring well and lysimeter taken on November 11, 2014 are provided in Attachment A.
- Groundwater samples for CS₂ analysis were collected from monitoring well MW-4 (primary sample and duplicate sample) on November 14, 2014 pursuant to the O&M Plan modifications. The sampling results from the November 14, 2014 event are provided in this report.
- No maintenance activity was conducted in the subject drainage swale during the reporting period. Vegetation and grading in this swale are in good condition. Photographs showing the condition of the drainage swale, catch basin and fencing at the time of the site inspection in November 11, 2014 are provided in Attachment A.



• The annual compliance inspection/evaluation was completed on November 11, 2014. No deficiencies were noted during the inspection.

Groundwater Monitoring Results

Summary of Carbon Disulfide Water Analytical Results (mg/L)

	Sample ID and Result							
Sampling Date	MW-4	MW-4 Duplicate	LY-02					
5/28/2014	0.45 J	0.43 J	310					
11/14/2014	ND	ND	NS					

Notes: ND: Not detected at the reporting limit. The reporting limit for CS_2 is 5 μ g/L for MW-4, and 40 mg/L for LY-02 due to sample dilution at the laboratory.

NS: Not sampled per approved plan.

J: Result is less than the reporting limit of $5 \mu g/L$ but greater than or equal to the method detection limit of $0.19 \mu g/L$ and the concentration is an approximate value.

As noted above, CS₂ was not detected above the reporting limit in the groundwater samples collected from monitoring well MW-4 in May 2014 and November 2014. CS₂ was detected at a concentration of 310 mg/L in the pore water sample collected from lysimeter LY-02. This finding is consistent with previous sample results. A copy of the completed well purging/sampling forms and the laboratory data packages for the May and November 2014 sampling events is provided in Attachment B.



ATTACHMENT A SITE PHOTOGRAPHS – NOVEMBER 11, 2014



Groundwater Monitoring Well



Catch Basin, Swale and Fencing





Lysimeter



Drainage Collection





ATTACHMENT B WELL PURGING/SAMPLING FORMS AND LABORATORY ANALYTICAL PACKAGES MAY 2014 AND NOVEMBER 2014 SAMPLING EVENTS



WELL PURGING/SAM	IPLING FORMS	



Well Evacuation/Sampling Form

SITE INFORMATION -	TONAL	JANDA	N'	Υ			• •	5/28	3/14	
Well No .: Mw - Ø4			oudy Rain	Temp	: 65					
Sampling Team: Grea Flasuski					Sampler's Signature:					
WELL INFORMATION	,		. •			75				
Protective Casing: Intact	/ Damage	d		Concrete	Base:	. Onto	ct / Dar	naged		
Locked: YES	/ NO			Well Dia	meter:	.a."			٠ .	
WELL EVACUATION IN	ORMA	TION	*							
A. Total Depth (Top of Casing = To	oç):	T -	12.90	Well Eva	cuation Me	thod				
B. Depth to Water (DTW) (TOC):			31.18							
C. Column of Standing Water (C=/	A-B):		41.72	1 63	Péristalti	c Pump				
D. Purge Factor			0.16	()	Other (Specify)				
E. One Well Volume:			6.68	-		 		i		
F. Three Well Volumes (gal	•	•	20.03	TOTAL VOLUME PURGED: 20						
Sampled using LOW-FLOV	٧ .									
INDICATOR PARAMETE	RS							• •		
Time	0601	1032	1044	1056						
Purge Rate (gal. per minute)										
Total Gallons Purged			1		 	 		1.	1	
Temperature (°C):			1				-	-		
	14.6	13.9	13.3	13.3	-	ļ				
Specific Conductivity (s):	210.9	1047	3803	3880				 		
pH:	9.67	8.33	8.30	7.89	<u> </u>	<u> </u>				
SECONDARY PARAMETERS			<u> </u>		<u> </u>					
ORP (mV):		<u> </u>	<u> </u>		· .					
Dissolved Oxygen (mg/L):			<u> </u>	:				<u> </u>		
Turbidity:	102.6	192	292	173				<u> </u>		
NAPL Observed: YES / NO	:			Well Pum	ped Dry:	YES	/ (NO)	· ·	
ODOR: YES / NO		O.T	· · ·	Other:					, , , , , , , , , , , , , , , , , , , ,	
Odor Type: () Solvent () So	eptic ()	Omer			-					
SAMPLE COLLECTION II	VFORM	ATION			SAMPL	E DATE	. 5	186	14	
Sample No.			Time .		S	ample No).		Time	
Media Sample ID: Mw- Ø	4		11.00	Rinsate Bla	nk: (YES)	/ NO F	B-MW	• 04	7101	
Duplicate: YES / NO MW-		υp	1100	Field Blank: YES / NO						
Parameters: (1/2-8260 VOC)	Owly Non-filter	luorides *5PP red	7.6	Also sampi	ed for:			• ,		
	· · · · · · · · · · · · · · · · · · ·		COMMI	INTS		•				
			COMMI		ell Pumped	Dire	YES /	NO		
	•			Vo We	lume Purg eli Require	ed: s Maintena	nce? Y	nes /	@	
		*		Ac	cesa Regui	res Mainter	nance? Y	MES /	MO)	



Well Evacuation/Sampling Form

SITE INFORMATION 3	M To	nawai	du	· .			11	14/14	
Well No.: MW-Ø					Sunny Ck		y Tem	- \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	3
Sampling Team: Great Flas W5K1				Sampler's Signature:					
WELL INFORMATION						0		0	
Protective Casing: Intact	Damage	d ·		Concrete	Base:	Inta	ct y De	maged	
Locked: YES	' NO			Well Dim	neter:	3" C			
WELL EVACUATION INF	ORMAT	TON		.,					٠.
A. Total Depth (Top of Casing = To	OC):	7:	3.90	Well Eva	uation Me			• .	
B. Depth to Water (DTW) (TOC):			9.99		BAILER 2-Inch G				•
C. Column of Standing Water (O=A	-B):		0.68	1 (5)	Peristalti	Pump		٠.	
D. Purge Factor		x	,	1 ()	Other (Specify)			
E. One Well Volume:			6.5	1 -			·		
F. Three Well Volumes (gall			19.5	тотл	AL VO	LUME	PURG	ED: 19	.5
INDICATOR PARAMETE	1239	12116				T.	 	7	T :: :
	1237	1248	1356	1307	-		ļ.		+
Purge Rate (gal. per minute) Total Gallons Purged					ļ			<u> </u>	ļ
Temperature (°C):	12,7	1211	12,2	12.3.		<u> </u>	<u></u>		
Specific Conductivity (s):	254	1092	2130	3279					•
pH:	10.30	11.95.	15.19	9.01					
SECONDARY PARAMETERS	32.22			36.41				1	
ORP (mV):			Martin Carlo Colombia (1971)			1, 100 to			
Dissolved Oxygen (mg/L):									
Turbidity:	87.	311.	124	79				1	
NAPL Observed: YES / NO				Well Pum	ped Dry:	YES	1, 10	D .)	
ODOR: YES / NO				Other:					
Odor Type: () Solvent () Se	ptic ()	Other							
SAMPLE COLLECTION I	VFORM	ATION			SAMPL	E DATE	: 11	14 14	
Sample No.	,		Time		S	ample N	D.		Time
Sedia Sample ID: MW-00			1315		nk: YES		,		
Ouplicate: (YES) / NO MW-		luorides	1315	Field Blank	C(YES)/	NO F	3-Mw	røy	2 C 6.1
arameters: () 8260 VOC									
			COMMI						
				Vo W	-	-		`	NO NO



LABORATORY ANALYTICAL PACKAGES

.....Links Review your project results through **Total Access** Have a Question? Visit us at: www.testamericainc.com

<u>TestAmerica</u>

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc. TestAmerica Buffalo 10 Hazelwood Drive Amherst, NY 14228-2298 Tel: (716)691-2600

TestAmerica Job ID: 480-60621-1 Client Project/Site: 3M Tonawanda

Sampling Event: 3M Tonawanda, NY - Semi-Annual Monit.

For:

Weston Solutions, Inc. 1400 Weston Way PO BOX 2653 West Chester, Pennsylvania 19380

Attn: Mr. Tom Drew

Anne Puty

Authorized for release by: 5/31/2014 12:27:31 PM

Anne Pridgeon, Project Management Assistant I anne.pridgeon@testamericainc.com

Designee for

Candace Fox, Manager of Project Management (716)504-9844

candace.fox@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.

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

Table of Contents

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Detection Summary	5
Client Sample Results	6
Surrogate Summary	8
QC Sample Results	9
QC Association Summary	10
Lab Chronicle	11
Certification Summary	12
Method Summary	13
Sample Summary	14
Chain of Custody	15
Receipt Checklists	16

Definitions/Glossary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Qualifiers

GC/MS VOA

Qualifier

Qualifier Description

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
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
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)
NC	Not Calculated
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)

3

Case Narrative

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Job ID: 480-60621-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative 480-60621-1

Comments

No additional comments.

Receipt

The samples were received on 5/28/2014 11:55 AM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 2.1° C.

GC/MS VOA

Method 8260C: The following sample(s) was diluted to bring the concentration of target analytes within the calibration range: LY-02 (480-60621-4). Elevated reporting limits (RLs) are provided.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

4

Detection Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Client Sample ID: MW-04

Lab Sample ID: 480-60621-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Carbon disulfide	0.45	J	5.0	0.19	ug/L	1	_	8260C	Total/NA

Client Sample ID: MW-04 DUP

Lab Sample ID: 480-60621-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Carbon disulfide	0.43	J	5.0	0.19	ug/L	1		8260C	Total/NA

Client Sample ID: FB-MW-04 Lab Sample ID: 480-60621-3

No Detections.

Client Sample ID: LY-02 Lab Sample ID: 480-60621-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Carbon disulfide	310000		40000	1500	ug/L	8000	- Table	8260C	Total/NA

Client Sample ID: Trip Blank Lab Sample ID: 480-60621-5

No Detections.

Client Sample Results

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Client Sample ID: MW-04

Lab Sample ID: 480-60621-1

Date Collected: 05/28/14 11:00 Date Received: 05/28/14 11:55

Matrix: Monitor Well

Qualifier J	RL 5.0		Unit ug/L	D	Prepared	Analyzed 05/29/14 19:54	Dil Fac
		0.19	ug/L			05/29/14 19:54	1
Qualifier	Limits				Prepared	Analyzed	Dil Fac
	66 - 137					05/29/14 19:54	1
	71 - 126					05/29/14 19:54	1
	73 - 120					05/29/14 19:54	1
		71 - 126	71 - 126	71 - 126	71 - 126	66 - 137 71 - 126	66 - 137 05/29/14 19:54 71 - 126 05/29/14 19:54

Lab Sample ID: 480-60621-2

Matrix: Monitor Well

Client Sample ID: MW-04 DUP Date Collected: 05/28/14 11:00 Date Received: 05/28/14 11:55

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon disulfide	0.43	J	5.0	0.19	ug/L			05/29/14 20:18	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	106		66 - 137			-		05/29/14 20:18	1
Toluene-d8 (Surr)	99		71 - 126					05/29/14 20:18	1
4-Bromofluorobenzene (Surr)	103		73 - 120					05/29/14 20:18	1

Client Sample ID: FB-MW-04 Lab Sample ID: 480-60621-3 Date Collected: 05/28/14 10:15

Matrix: Monitor Well

Date Received: 05/28/14 11:55

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	KL	MDL	Unit	U	Prepared	Analyzed	DII Fac
Carbon disulfide	ND		5.0	0.19	ug/L			05/29/14 20:42	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	107		66 - 137			-		05/29/14 20:42	1
Toluene-d8 (Surr)	99		71 - 126					05/29/14 20:42	1
4-Bromofluorobenzene (Surr)	104		73 - 120					05/29/14 20:42	1

Client Sample ID: LY-02 Lab Sample ID: 480-60621-4

Date Collected: 05/28/14 11:30 **Matrix: Monitor Well**

Date Received: 05/28/14 11:55

Method: 8260C - Volatile Organic Compounds by GC/MS

Allalyte	Result	Qualifier	KL	MIDL	Oilit	U	Frepareu	Allalyzeu	DII Fac
Carbon disulfide	310000		40000	1500	ug/L			05/29/14 21:05	8000
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	106		66 - 137					05/29/14 21:05	8000
Toluene-d8 (Surr)	97		71 - 126					05/29/14 21:05	8000
4-Bromofluorobenzene (Surr)	105		73 - 120					05/29/14 21:05	8000

Client Sample Results

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Client Sample ID: Trip Blank Date Collected: 05/28/14 09:00

Lab Sample ID: 480-60621-5

Date Received: 05/28/14 11:55

4-Bromofluorobenzene (Surr)

Matrix: Water

Method: 8260C - Volatile Orga	nic Compounds	by GC/MS							
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon disulfide	ND	* 0.11 * 100-1-0-0-0-0-0-0-0-0-0-0-0-0-0-0-0-0-0	5.0	0.19	ug/L			05/29/14 21:29	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	105		66 - 137					05/29/14 21:29	1
Toluene-d8 (Surr)	99		71 - 126					05/29/14 21:29	1
4-Bromofluorobenzene (Surr)	105		73 ₋ 120					05/29/14 21:29	1

73 - 120

105

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

Method: 8260C - Volatile Organic Compounds by GC/MS

Matrix: Monitor Well Prep Type: Total/NA

			Percent Surr	ogate Recovery (Acceptance Limits)
	12DCE	TOL	BFB	
Client Sample ID	(66-137)	(71-126)	(73-120)	
MW-04	106	99	102	
MW-04 DUP	106	99	103	
FB-MW-04	107	99	104	
LY-02	106	97	105	
	MW-04 MW-04 DUP FB-MW-04	Client Sample ID (66-137) MW-04 106 MW-04 DUP 106 FB-MW-04 107	Client Sample ID (66-137) (71-126) MW-04 106 99 MW-04 DUP 106 99 FB-MW-04 107 99	Client Sample ID (66-137) (71-126) (73-120) MW-04 106 99 102 MW-04 DUP 106 99 103 FB-MW-04 107 99 104

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)

TOL = Toluene-d8 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

Method: 8260C - Volatile Organic Compounds by GC/MS

Matrix: Water Prep Type: Total/NA

				Percent Surro	gate Recovery (Acceptance Limits)
		12DCE	TOL	BFB	
Lab Sample ID	Client Sample ID	(66-137)	(71-126)	(73-120)	
480-60621-5	Trip Blank	105	99	105	
LCS 480-184587/5	Lab Control Sample	104	99	104	
LCSD 480-184587/6	Lab Control Sample Dup	105	98	105	
MB 480-184587/8	Method Blank	105	99	101	

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)

TOL = Toluene-d8 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

7

QC Sample Results

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Method: 8260C - Volatile Organic Compounds by GC/MS

Lab Sample ID: MB 480-184587/8

Matrix: Water

Carbon disulfide

Analyte

Analysis Batch: 184587

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

 MB
 Result
 Qualifier
 RL
 MDL
 Unit
 D
 Prepared
 Analyzed
 Dil Fac

 ND
 5.0
 0.19
 ug/L
 05/29/14 13:39
 1

мв мв

	2				
Surrogate	%Recovery	Qualifier	Limits	Prepared Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	105		66 - 137	05/29/14 13:39	1
Toluene-d8 (Surr)	99		71 - 126	05/29/14 13:39	1
4-Bromofluorobenzene (Surr)	101		73 - 120	05/29/14 13:39	1

Lab Sample ID: LCS 480-184587/5

Matrix: Water

Analysis Batch: 184587

LCS LCS

Surrogate	%Recovery	Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	104		66 - 137
Toluene-d8 (Surr)	99		71 - 126
4-Bromofluorobenzene (Surr)	104		73 - 120

Lab Sample ID: LCSD 480-184587/6

Matrix: Water

Analysis Batch: 184587

LCSD LCSD

Surrogate	%Recovery	Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	105		66 - 137
Toluene-d8 (Surr)	98		71 - 126
4-Bromofluorobenzene (Surr)	105		73 - 120

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

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

9

QC Association Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

GC/MS VOA

Analysis Batch: 184587

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-60621-1	MW-04	Total/NA	Monitor Well	8260C	
480-60621-2	MW-04 DUP	Total/NA	Monitor Well	8260C	
480-60621-3	FB-MW-04	Total/NA	Monitor Well	8260C	
480-60621-4	LY-02	Total/NA	Monitor Well	8260C	
480-60621-5	Trip Blank	Total/NA	Water	8260C	
LCS 480-184587/5	Lab Control Sample	Total/NA	Water	8260C	
LCSD 480-184587/6	Lab Control Sample Dup	Total/NA	Water	8260C	
MB 480-184587/8	Method Blank	Total/NA	Water	8260C	

Lab Chronicle

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Client Sample ID: MW-04

Date Collected: 05/28/14 11:00 Date Received: 05/28/14 11:55 Lab Sample ID: 480-60621-1

Matrix: Monitor Well

Batch Batch Dilution Batch Prepared Туре Method Factor Number or Analyzed Prep Type Run Analyst Lab 184587 05/29/14 19:54 CXM TAL BUF Total/NA Analysis 8260C

Client Sample ID: MW-04 DUP

Date Collected: 05/28/14 11:00 Date Received: 05/28/14 11:55 Lab Sample ID: 480-60621-2

Matrix: Monitor Well

7ate Necelvea. 00/20/14 11:00

Dilution Batch Batch Batch Prepared Factor Prep Type Type Method Run Number or Analyzed Analyst Lab Total/NA Analysis 8260C 184587 05/29/14 20:18 CXM TAL BUF

Client Sample ID: FB-MW-04

Date Collected: 05/28/14 10:15 Date Received: 05/28/14 11:55 Lab Sample ID: 480-60621-3

Matrix: Monitor Well

40

Dilution Batch Batch Batch Prepared Run Factor Number or Analyzed Prep Type Type Method Analyst TAL BUF 05/29/14 20:42 CXM Total/NA 8260C Analysis

Client Sample ID: LY-02

Date Collected: 05/28/14 11:30

Date Received: 05/28/14 11:55

Lab Sample ID: 480-60621-4

Matrix: Monitor Well

Dilution Batch Batch Batch Prepared Number or Analyzed Method Run Factor Analyst Lab Prep Type Type CXM TAL BUF 05/29/14 21:05 8260C 8000 184587 Total/NA Analysis

Client Sample ID: Trip Blank

Date Collected: 05/28/14 09:00

Date Received: 05/28/14 11:55

Lab Sample ID: 480-60621-5

Matrix: Water

Dilution Batch Prepared Batch Batch Factor Number or Analyzed Analyst Lab Method Run Prep Type Type CXM TAL BUF 8260C 184587 05/29/14 21:29 Total/NA Analysis

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TestAmerica Buffalo

Certification Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Laboratory: TestAmerica Buffalo

The certifications listed below are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
New York	NELAP	2	10026	03-31-15

TestAmerica Buffalo

Method Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Method 8260C **Method Description**

Volatile Organic Compounds by GC/MS

Protocol

Laboratory

SW846 TAL BUF

Protocol References:

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

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

12

13

Sample Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-60621-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
480-60621-1	MW-04	Monitor Well	05/28/14 11:00	05/28/14 11:55
480-60621-2	MW-04 DUP	Monitor Well	05/28/14 11:00	05/28/14 11:55
480-60621-3	FB-MW-04	Monitor Well	05/28/14 10:15	05/28/14 11:55
480-60621-4	LY-02	Monitor Well	05/28/14 11:30	05/28/14 11:55
480-60621-5	Trip Blank	Water	05/28/14 09:00	05/28/14 11:55

TestAmerica Buffalo									ŀ	•
10 Hazelwood Drive Amherst, NY 14228-2298			0	Chain of Custody	f Cust	ody			est.	estAmerica
(716) 691-7991		_) i		{			AN CAMBON AN	元(元本語のなく中でならの子がおける。一部の行政会
Client Information	Sampler.	F lassing	ي پکتر پکتر	Fox, C.	Lab PM: Fox, Candace L				iC No: i0-49818-11235.1	235.1
Jiert Contact Vr. Tom Drew	Phone:	S	00	E-Mail:	E-Mail: candace.fox@testamen	j	480-60621 Chain of Custody	ustody	ge: age 1 of 1	
Pompany: Meston Solutions, Inc.							Analysis Requested		#qop#.	
Address: 1400 Weston Way PO BOX 2653	Due Date Requested:	÷.			18	-			Preservation Codes:	:sopo:
Zity: Nest Chester	TAT Requested (days):	ıys):							A-HCL B-NaOH	M - Hexane N - None
				**************************************	Pro.				D - Nitic Acid	O - Asnaoz P - Nazoas O - Nazso3
Phone: 310-701-7302(Tel) 610-701-7401(Fax)	PO#: 55600								G-Amchior	
	WO#: 02181.086.017.0	100			(ON				I - Ice J - Di Water	
শত্যুল্য Name: 8M Tonawanda/ Event Desc: 3M Tonawanda, NY - Serni-Annual I	Project #. 48003524				10 20				K-EDTA	W - ph 4-5 Z - other (specify)
-	SSOW#:				N qs				of con	
		du		T	M\SM mioji (GOM) - B08	***************************************			TedmuM (B)	
Sample Identification	Sample Date	in a	G=grab) r	G=grab) BT-TISSUE, A-AIF)	ze		· · · · · · · · · · · · · · · · · · ·			Special Instructions/Note:
AW-04	4/86/2	3	g	Water	1				7	7
AW-04 DUP		00		Water	>					
-B-MW-04		1015		Water	->					
Y-02	~	8		Water	``,				100	
rip Blank	-1	9	-)	Water	->-				200	
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Possible Hazard Identification			- Indialogical		Sample D	le Disposal (A 1	өе тау be	if samples are retai	ined longer than 1 n	nonth)
	1		nogreat		Special In	structions/C	Special Instructions/QC Requirements:		Archive For	Months
inpty Kit Rejinquished Dis		Date:			Time:		Mel	Method of Shipment		
	=	11.2		Company	Receifed by:	J. Ag pa	1	Date/Turg		Company
	Date/Time:	2		Company	Received by:	od by:		Date/Time:		Company
elingüskéd by:	Date/Time:	_	0	Company	Received by:	ed by:		Date/Time:/	11/2	Company
Custody Seals Intact: Custody Seal No.: Δ Yes Δ No					Coolin	emperature(s	Cooler Temperature(s) °C and Other Remarks:	12/2		
					1			ŀ		

15

Login Sample Receipt Checklist

Client: Weston Solutions, Inc.

Job Number: 480-60621-1

Login Number: 60621

List Source: TestAmerica Buffalo

List Number: 1 Creator: Janish, Carl M

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	True	
The cooler's custody seal, if present, is 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	
There are no discrepancies between the sample IDs on the containers 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	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
If necessary, staff have been informed of any short hold time or quick TAT needs	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Sampling Company provided.	True	WESTON
Samples received within 48 hours of sampling.	True	
Samples requiring field filtration have been filtered in the field.	N/A	
Chlorine Residual checked.	N/A	

<u>TestAmerica</u>

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc. TestAmerica Buffalo 10 Hazelwood Drive Amherst, NY 14228-2298 Tel: (716)691-2600

TestAmerica Job ID: 480-71445-1 Client Project/Site: 3M Tonawanda

Sampling Event: 3M Tonawanda, NY - Semi-Annual Monit.

For

Weston Solutions, Inc. 1400 Weston Way PO BOX 2653 West Chester, Pennsylvania 19380

Attn: Mr. Tom Drew

Authorized for release by: 11/28/2014 11:26:30 AM

andace L. Fox

Candace Fox, Manager of Project Management (716)504-9844

candace.fox@testamericainc.com

...... Links

Review your project results through

Total Access

Have a Question?



Visit us at: www.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.

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

Table of Contents

Cover Page	1
Table of Contents	2
Definitions/Glossary	3
Case Narrative	4
Detection Summary	5
	6
	7
	8
	9
Lab Chronicle	10
Certification Summary	11
Method Summary	12
•	13
	14
Receint Checklists	15

Definitions/Glossary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Glossary

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
Percent Recovery
Contains Free Liquid
Contains no Free Liquid
Duplicate error ratio (normalized absolute difference)
Dilution Factor
Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
Decision level concentration
Minimum detectable activity
Estimated Detection Limit
Minimum detectable concentration
Method Detection Limit
Minimum Level (Dioxin)
Not Calculated
Not detected at the reporting limit (or MDL or EDL if shown)
Practical Quantitation Limit
Quality Control
Relative error ratio
Reporting Limit or Requested Limit (Radiochemistry)
Relative Percent Difference, a measure of the relative difference between two points
Toxicity Equivalent Factor (Dioxin)
Toxicity Equivalent Quotient (Dioxin)

3

Case Narrative

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Job ID: 480-71445-1

Laboratory: TestAmerica Buffalo

Narrative

Job Narrative 480-71445-1

Comments

No additional comments.

Receipt

The samples were received on 11/14/2014 1:55 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 3.6° C.

GC/MS VOA

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

A

Detection Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Client Sample ID: Trip Blank

Lab Sample ID: 480-71445-1

No Detections.

Client Sample ID: FB-MW-04

Lab Sample ID: 480-71445-2

No Detections.

Client Sample ID: MW-04

Lab Sample ID: 480-71445-3

No Detections.

Client Sample ID: MW-04 DUP

Lab Sample ID: 480-71445-4

No Detections.

5

Client Sample Results

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Client Sample ID: Trip Blank

Lab Sample ID: 480-71445-1

Date Collected: 11/14/14 12:00
Date Received: 11/14/14 13:55

Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon disulfide	ND		5.0	0.19	ug/L			11/25/14 06:05	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	108		66 - 137			-		11/25/14 06:05	1
Toluene-d8 (Surr)	98		71 - 126					11/25/14 06:05	1
4-Bromofluorobenzene (Surr)	100		73 - 120					11/25/14 06:05	1

Client Sample ID: FB-MW-04 Lab Sample ID: 480-71445-2

Date Collected: 11/14/14 12:25 Matrix: Monitor Well

Date Received: 11/14/14 13:55

Method: 8260C - Volatile Organic Compounds by GC/MS										
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac	
Carbon disulfide	ND		5.0	0.19	ug/L			11/25/14 06:30	1	
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac	
1,2-Dichloroethane-d4 (Surr)	109		66 - 137			-		11/25/14 06:30	1	
Toluene-d8 (Surr)	98		71 - 126					11/25/14 06:30	1	
4-Bromofluorobenzene (Surr)	101		73 - 120					11/25/14 06:30	1	

Client Sample ID: MW-04 Lab Sample ID: 480-71445-3

Date Collected: 11/14/14 13:15 Matrix: Monitor Well

Date Received: 11/14/14 13:55

Method: 8260C - Volatile Organic Compounds by GC/MS											
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac		
Carbon disulfide	ND		5.0	0.19	ug/L			11/25/14 06:55	1		
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac		
1,2-Dichloroethane-d4 (Surr)	109		66 - 137			-		11/25/14 06:55	1		
Toluene-d8 (Surr)	98		71 - 126					11/25/14 06:55	1		
4-Bromofluorobenzene (Surr)	102		73 - 120					11/25/14 06:55	1		

Client Sample ID: MW-04 DUP Lab Sample ID: 480-71445-4

Date Collected: 11/14/14 13:15

Date Received: 11/14/14 13:55

Matrix: Monitor Well

Method: 8260C - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon disulfide	ND		5.0	0.19	ug/L			11/25/14 07:20	1
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	110		66 - 137					11/25/14 07:20	1
Toluene-d8 (Surr)	98		71 - 126					11/25/14 07:20	1
4-Bromofluorobenzene (Surr)	100		73 - 120					11/25/14 07:20	1

Surrogate Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Method: 8260C - Volatile Organic Compounds by GC/MS

Matrix: Monitor Well Prep Type: Total/NA

Percent Surrogate Recovery (Acceptance Limits)

					•	, ,	
		12DCE	TOL	BFB			
Lab Sample ID	Client Sample ID	(66-137)	(71-126)	(73-120)			
480-71445-2	FB-MW-04	109	98	101			
480-71445-3	MVV-04	109	98	102			
480-71445-4	MW-04 DUP	110	98	100			

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)

TOL = Toluene-d8 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

Method: 8260C - Volatile Organic Compounds by GC/MS

Matrix: Water Prep Type: Total/NA

Percent Surrogate Recovery (Acceptance Limits)

		12DCE	TOL	BFB
Lab Sample ID	Client Sample ID	(66-137)	(71-126)	(73-120)
480-71445-1	Trip Blank	108	98	100
LCS 480-215760/5	Lab Control Sample	102	100	104
MB 480-215760/7	Method Blank	108	99	102

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)

TOL = Toluene-d8 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

TestAmerica Job ID: 480-71445-1

8

QC Sample Results

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

Method: 8260C - Volatile Organic Compounds by GC/MS

Lab Sample ID: MB 480-215760/7

Matrix: Water

Analysis Batch: 215760

Client Sample ID: Method Blank

Client Sample ID: Lab Control Sample

Prep Type: Total/NA

Prep Type: Total/NA

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Carbon disulfide	ND		5.0	0.19	ug/L			11/25/14 00:52	1
	MB	МВ							
Surrogate	%Recovery	Qualifier	Limits				Prepared	Analyzed	Dil Fac
1,2-Dichloroethane-d4 (Surr)	108		66 - 137					11/25/14 00:52	1
Toluene-d8 (Surr)	99		71 - 126					11/25/14 00:52	1
4-Bromofluorobenzene (Surr)	102		73 - 120					11/25/14 00:52	1

Lab Sample ID: LCS 480-215760/5

Matrix: Water

Analysis Batch: 215760

LCS LCS

MB MB

Surrogate	%Recovery	Qualifier	Limits
1,2-Dichloroethane-d4 (Surr)	102		66 - 137
Toluene-d8 (Surr)	100		71 - 126
4-Bromofluorobenzene (Surr)	104		73 - 120

TestAmerica Buffalo

q

QC Association Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

GC/MS VOA

Analysis Batch: 215760

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
480-71445-1	Trip Blank	Total/NA	Water	8260C	
480-71445-2	FB-MW-04	Total/NA	Monitor Well	8260C	
480-71445-3	MW-04	Total/NA	Monitor Well	8260C	
480-71445-4	MW-04 DUP	Total/NA	Monitor Well	8260C	
LCS 480-215760/5	Lab Control Sample	Total/NA	Water	8260C	
MB 480-215760/7	Method Blank	Total/NA	Water	8260C	

Lab Chronicle

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Client Sample ID: Trip Blank

Date Collected: 11/14/14 12:00 Date Received: 11/14/14 13:55 Lab Sample ID: 480-71445-1

Matrix: Water

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Type	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	215760	11/25/14 06:05	CDC	TAL BUF

Client Sample ID: FB-MW-04

Date Collected: 11/14/14 12:25

Date Received: 11/14/14 13:55

Lab Sample ID: 480-71445-2 Matrix: Monitor Well

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Type	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	215760	11/25/14 06:30	CDC	TAL BUF

Client Sample ID: MW-04

Date Collected: 11/14/14 13:15

Date Received: 11/14/14 13:55

Lab Sample ID: 480-71445-3

Matrix: Monitor Well

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Type	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	215760	11/25/14 06:55	CDC	TAL BUF

Client Sample ID: MW-04 DUP

Date Collected: 11/14/14 13:15

Date Received: 11/14/14 13:55

Lab Sample ID: 480-71445-4

Matrix: Monitor Well

	Batch	Batch		Dilution	Batch	Prepared		
Prep Type	Type	Method	Run	Factor	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	215760	11/25/14 07:20	CDC	TAL BUF

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

TestAmerica Buffalo

Certification Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Laboratory: TestAmerica Buffalo

The certifications listed below are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
New York	NELAP	2	10026	03-31-15

Method Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Method	Method Description	Protocol	Laboratory
8260C	Volatile Organic Compounds by GC/MS	SW846	TAL BUF

Protocol References:

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

Laboratory References:

TAL BUF = TestAmerica Buffalo, 10 Hazelwood Drive, Amherst, NY 14228-2298, TEL (716)691-2600

12

13

Sample Summary

Client: Weston Solutions, Inc. Project/Site: 3M Tonawanda

TestAmerica Job ID: 480-71445-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
480-71445-1	Trip Blank	Water	11/14/14 12:00	11/14/14 13:55
480-71445-2	FB-MW-04	Monitor Well	11/14/14 12:25	11/14/14 13:55
480-71445-3	MW-04	Monitor Well	11/14/14 13:15	11/14/14 13:55
480-71445-4	MW-04 DUP	Monitor Well	11/14/14 13:15	11/14/14 13:55

480-71445 Chain of Custody

Chain of Custody Record

<u>TestAmerica</u>

THE LEADER IN ENVIRONMENTAL TESTING

TAL-4124 (1007) 1) De	The second secon			
Onam as Oa	Tom Drew 610.701-3677	1.701-3677	1) // //	Chain of Custody Number 279216
Address	Telephone Number (Area Code)/Fax Nun	nber	Lab Nurpber	Page of
City State Zip Code	Site Contact 120 Contact		Analysis (Attach list if more space is needed)	
ع- ا	CampirWaybill Number			Snecial Instructions/
ContractPurchase Order/Oxore Mo.		Containers & Preservatives		Conditions of Receipt
Sample I.D. No. and Description (Containers for each sample may be combined on one line)	Ille Sendons Ilos Ilos HossH	NBOH NOOH HCI HOO		
150 Blank	/ 000/	X ×		
FB-MW-QY	1225	×		CS,
ı	13/5	X		(
l	1315	X		17NO
				Cerchay
				INN
Possible Hazard Identification Non-Hazard \(\preced{\text{Tammable}} \) Xkin Imiant \(\preced{\text{Poison B}} \)	Sample Disposal Unknown	Disposal By Lab Archive For	(A fee may be asse Months longer than 1 mont	(A fee may be assessed if samples are retained longer than 1 month)
Turn Around Time Required [27 24 Hours] A8 Hours 7 Days 14 Days 21 Days	Other	OC Requirements (Specify)		
7. Belinding Ed By	255] h/h/	1. Received By	Marthar Co	Date 17 1355
Ki	I (Time	2. Heceived By		-
3. Reinduished By	Date Time 3. Re	3. Received By	•	Date
Comments			704	

14

DISTRIBUTION: WHITE - Returned to Client with Report; CANARY - Stays with the Sample; PINK - Field Copy

15

Login Sample Receipt Checklist

Client: Weston Solutions, Inc.

Job Number: 480-71445-1

Login Number: 71445

List Source: TestAmerica Buffalo

List Number: 1 Creator: Janish, Carl M

Question	Answer	Comment
Radioactivity either was not measured or, if measured, is at or below background	True	
The cooler's custody seal, if present, is 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	
There are no discrepancies between the sample IDs on the containers 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	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
VOA sample vials do not have headspace or bubble is <6mm (1/4") in diameter.	True	
If necessary, staff have been informed of any short hold time or quick TAT needs	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Sampling Company provided.	True	WESTON
Samples received within 48 hours of sampling.	True	
Samples requiring field filtration have been filtered in the field.	N/A	
Chlorine Residual checked.	N/A	