TestAmerica
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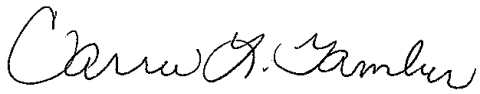
ANALYTICAL REPORT

Job Number: 180-59749-1

Job Description: Harley Davidson

For:
Groundwater Sciences Corporation
2601 Market Place Street, Suite 310
Harrisburg, PA 17110-9307

Attention: Allan Miller



Approved for release.
Carrie L Gamber
Senior Project Manager
10/24/2016 9:00 AM

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10/24/2016

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Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
U	Indicates the analyte was analyzed for but not detected.
^c	CCV Recovery is outside acceptance limits.
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.
E	Result exceeded calibration range.

GC/MS Semi VOA

Qualifier	Qualifier Description
U	Indicates the analyte was analyzed for but not detected.

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)

CASE NARRATIVE

Client: Groundwater Sciences Corporation

Project: Harley Davidson

Report Number: 180-59749-1

With the exceptions noted as flags or footnotes, standard analytical protocols were followed in the analysis of the samples and no problems were encountered or anomalies observed. In addition all laboratory quality control samples were within established control limits, with any exceptions noted below. Each sample was analyzed to achieve the lowest possible reporting limit within the constraints of the method. In some cases, due to interference or analytes present at high concentrations, samples were diluted. For diluted samples, the reporting limits are adjusted relative to the dilution required.

Calculations are performed before rounding to avoid round-off errors in calculated results.

All holding times were met and proper preservation noted for the methods performed on these samples, unless otherwise detailed in the individual sections below.

RECEIPT

The samples were received on 10/13/2016; the samples arrived in good condition, properly preserved and on ice. The temperature of the coolers at receipt was 1.1 C.

VOLATILES

The following samples was diluted to bring the concentration of target analytes within the calibration range: HD-MW-129-0/1-0 (180-59749-3), HD-MW-127-0/1-0 (180-59749-4), HD-MW-87-0/1-0 (180-59749-5), HD-MW-88-0/1-0 (180-59749-6) and HD-MW-12-0/1-0 (180-59749-7). Elevated reporting limits (RLs) are provided.

The continuing calibration verification (CCV) analyzed in batch 180-191289 was outside the method criteria for the following analyte(s): Acrylonitrile, Bromoform, Carbon tetrachloride, Dibromochloromethane, cis-1,3-Dichloropropene, and trans-1,3-Dichloropropene. A CCV standard at or below the reporting limit (RL) was analyzed with the affected samples and found to be acceptable. As indicated in the reference method, sample analysis may proceed; however, any detection for the affected analyte(s) is considered estimated.

The continuing calibration verification (CCV) analyzed in batch 180-191520 was outside the method criteria for the following analyte: Acrylonitrile, Bromomethane, and Chloromethane. A CCV standard at or below the reporting limit (RL) was analyzed with the affected samples and found to be acceptable. As indicated in the reference method, sample analysis may proceed; however, any detection for the affected analyte is considered estimated.

SEMIVOLATILES

incorrect volume of surrogate spiking solution was inadvertently added the following samples: HD-MW-127-0/1-0 (180-59749-4). Percent recoveries are based on the amount spiked.

Detection Summary

Client: Groundwater Sciences Corporation
Project/Site: Harley Davidson

TestAmerica Job ID: 180-59749-1

Client Sample ID: HD-QC6-0/1-2 — Lab Sample ID: 180-59749-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Acetone	5.0		5.0	2.5	ug/L	1		8260C	Total/NA

Client Sample ID: HD-MW-57-0/1-0 — Lab Sample ID: 180-59749-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,1-Dichloroethene	5.7		1.0	0.29	ug/L	1		8260C	Total/NA
1,1-Dichloroethane	0.28	J	1.0	0.24	ug/L	1		8260C	Total/NA
cis-1,2-Dichloroethene	4.6		1.0	0.29	ug/L	1		8260C	Total/NA
Chloroform	1.1		1.0	0.27	ug/L	1		8260C	Total/NA
Trichloroethene	14		1.0	0.26	ug/L	1		8260C	Total/NA
Tetrachloroethene	1.7		1.0	0.27	ug/L	1		8260C	Total/NA
1,4-Dioxane	12	J	200	7.5	ug/L	1		8260C	Total/NA

Client Sample ID: HD-MW-129-0/1-0 — Lab Sample ID: 180-59749-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Methylene Chloride	3.8	J	10	3.6	ug/L	10		8260C	Total/NA
cis-1,2-Dichloroethene	310		10	2.9	ug/L	10		8260C	Total/NA
Trichloroethene	3000	E	10	2.6	ug/L	10		8260C	Total/NA
Tetrachloroethene	470		10	2.7	ug/L	10		8260C	Total/NA
Methylene Chloride - DL	430		250	91	ug/L	250		8260C	Total/NA
cis-1,2-Dichloroethene - DL	340		250	72	ug/L	250		8260C	Total/NA
Trichloroethene - DL	4300		250	65	ug/L	250		8260C	Total/NA
Tetrachloroethene - DL	620		250	67	ug/L	250		8260C	Total/NA

Client Sample ID: HD-MW-127-0/1-0 — Lab Sample ID: 180-59749-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Methylene Chloride	4.6	J	10	3.6	ug/L	10		8260C	Total/NA
1,1-Dichloroethane	3.9	J	10	2.4	ug/L	10		8260C	Total/NA
cis-1,2-Dichloroethene	240		10	2.9	ug/L	10		8260C	Total/NA
1,1,1-Trichloroethane	4.9	J	10	2.2	ug/L	10		8260C	Total/NA
Trichloroethene	61		10	2.6	ug/L	10		8260C	Total/NA
Tetrachloroethene	15		10	2.7	ug/L	10		8260C	Total/NA
1,4-Dioxane	3.1		1.9	0.049	ug/L	1		8270D LL	Total/NA

Client Sample ID: HD-MW-87-0/1-0 — Lab Sample ID: 180-59749-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,1-Dichloroethene	2.9	J	10	2.9	ug/L	10		8260C	Total/NA
Methylene Chloride	4.4	J	10	3.6	ug/L	10		8260C	Total/NA
1,1-Dichloroethane	5.4	J	10	2.4	ug/L	10		8260C	Total/NA
cis-1,2-Dichloroethene	300		10	2.9	ug/L	10		8260C	Total/NA
1,1,1-Trichloroethane	4.4	J	10	2.2	ug/L	10		8260C	Total/NA
Trichloroethene	110		10	2.6	ug/L	10		8260C	Total/NA
Tetrachloroethene	15		10	2.7	ug/L	10		8260C	Total/NA
1,4-Dioxane	6.9		1.9	0.049	ug/L	1		8270D LL	Total/NA

Client Sample ID: HD-MW-88-0/1-0 — Lab Sample ID: 180-59749-6

This Detection Summary does not include radiochemical test results.

Client Sample ID: HD-MW-88-0/1-0 (Continued)

Lab Sample ID: 180-59749-6

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,1-Dichloroethene	1.6		1.0	0.29	ug/L	1		8260C	Total/NA
Acetone	3.3	J	5.0	2.5	ug/L	1		8260C	Total/NA
1,1-Dichloroethane	1.6		1.0	0.24	ug/L	1		8260C	Total/NA
cis-1,2-Dichloroethene	9.3		1.0	0.29	ug/L	1		8260C	Total/NA
Chloroform	0.28	J	1.0	0.27	ug/L	1		8260C	Total/NA
1,1,1-Trichloroethane	0.32	J	1.0	0.22	ug/L	1		8260C	Total/NA
Trichloroethene	59	E	1.0	0.26	ug/L	1		8260C	Total/NA
Tetrachloroethene	62	E	1.0	0.27	ug/L	1		8260C	Total/NA
1,1-Dichloroethene - DL	1.6	J	2.0	0.57	ug/L	2		8260C	Total/NA
1,1-Dichloroethane - DL	1.6	J	2.0	0.47	ug/L	2		8260C	Total/NA
cis-1,2-Dichloroethene - DL	9.1		2.0	0.57	ug/L	2		8260C	Total/NA
Trichloroethene - DL	63		2.0	0.52	ug/L	2		8260C	Total/NA
Tetrachloroethene - DL	60		2.0	0.54	ug/L	2		8260C	Total/NA

Client Sample ID: HD-MW-12-0/1-0

Lab Sample ID: 180-59749-7

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	58		3.0	0.86	ug/L	3		8260C	Total/NA
Trichloroethene	93		3.0	0.77	ug/L	3		8260C	Total/NA
Tetrachloroethene	4.3		3.0	0.80	ug/L	3		8260C	Total/NA

This Detection Summary does not include radiochemical test results.

Method: 8260C - Volatile Organic Compounds (GC/MS)

Client Sample ID: HD-QC6-0/1-2
Date Collected: 10/12/16 12:00
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-1
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	1.0	U	1.0	0.23	ug/L			10/15/16 22:57	1
Vinyl chloride	1.0	U	1.0	0.32	ug/L			10/15/16 22:57	1
Bromomethane	1.0	U	1.0	0.36	ug/L			10/15/16 22:57	1
Chloroethane	1.0	U	1.0	0.26	ug/L			10/15/16 22:57	1
1,1-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/15/16 22:57	1
Acetone	**5.0**		5.0	2.5	ug/L			10/15/16 22:57	1
Carbon disulfide	1.0	U	1.0	0.18	ug/L			10/15/16 22:57	1
Methylene Chloride	1.0	U	1.0	0.36	ug/L			10/15/16 22:57	1
trans-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/15/16 22:57	1
Methyl tert-butyl ether	1.0	U	1.0	0.24	ug/L			10/15/16 22:57	1
1,1-Dichloroethane	1.0	U	1.0	0.24	ug/L			10/15/16 22:57	1
cis-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/15/16 22:57	1
Bromochloromethane	1.0	U	1.0	0.38	ug/L			10/15/16 22:57	1
2-Butanone (MEK)	5.0	U	5.0	1.2	ug/L			10/15/16 22:57	1
Chloroform	1.0	U	1.0	0.27	ug/L			10/15/16 22:57	1
1,1,1-Trichloroethane	1.0	U	1.0	0.22	ug/L			10/15/16 22:57	1
Carbon tetrachloride	1.0	U ^c	1.0	0.24	ug/L			10/15/16 22:57	1
Benzene	1.0	U	1.0	0.26	ug/L			10/15/16 22:57	1
1,2-Dichloroethane	1.0	U	1.0	0.25	ug/L			10/15/16 22:57	1
Trichloroethene	1.0	U	1.0	0.26	ug/L			10/15/16 22:57	1
1,2-Dichloropropane	1.0	U	1.0	0.23	ug/L			10/15/16 22:57	1
Bromodichloromethane	1.0	U	1.0	0.23	ug/L			10/15/16 22:57	1
cis-1,3-Dichloropropene	1.0	U ^c	1.0	0.21	ug/L			10/15/16 22:57	1
4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59	ug/L			10/15/16 22:57	1
Toluene	1.0	U	1.0	0.28	ug/L			10/15/16 22:57	1
trans-1,3-Dichloropropene	1.0	U ^c	1.0	0.24	ug/L			10/15/16 22:57	1
1,1,2-Trichloroethane	1.0	U	1.0	0.35	ug/L			10/15/16 22:57	1
Tetrachloroethene	1.0	U	1.0	0.27	ug/L			10/15/16 22:57	1
2-Hexanone	5.0	U	5.0	0.74	ug/L			10/15/16 22:57	1
Dibromochloromethane	1.0	U ^c	1.0	0.40	ug/L			10/15/16 22:57	1
1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29	ug/L			10/15/16 22:57	1
Chlorobenzene	1.0	U	1.0	0.31	ug/L			10/15/16 22:57	1
1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20	ug/L			10/15/16 22:57	1
Ethylbenzene	1.0	U	1.0	0.27	ug/L			10/15/16 22:57	1
Xylenes, Total	2.0	U	2.0	0.48	ug/L			10/15/16 22:57	1
Styrene	1.0	U	1.0	0.26	ug/L			10/15/16 22:57	1
Bromoform	1.0	U ^c	1.0	0.29	ug/L			10/15/16 22:57	1
1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35	ug/L			10/15/16 22:57	1
Acrylonitrile	20	U ^c	20	2.8	ug/L			10/15/16 22:57	1
1,4-Dioxane	200	U	200	7.5	ug/L			10/15/16 22:57	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*124*		*72 - 134*		*10/15/16 22:57*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/15/16 22:57*	*1*
4-Bromofluorobenzene (Surr)	*117*		*72 - 120*		*10/15/16 22:57*	*1*
Dibromofluoromethane (Surr)	*106*		*77 - 127*		*10/15/16 22:57*	*1*

Method: 8260C - Volatile Organic Compounds (GC/MS)

Client Sample ID: HD-MW-57-0/1-0
Date Collected: 10/12/16 09:15
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-2
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	1.0	U	1.0	0.23	ug/L			10/15/16 23:21	1
Vinyl chloride	1.0	U	1.0	0.32	ug/L			10/15/16 23:21	1
Bromomethane	1.0	U	1.0	0.36	ug/L			10/15/16 23:21	1
Chloroethane	1.0	U	1.0	0.26	ug/L			10/15/16 23:21	1
1,1-Dichloroethene	**5.7**		1.0	0.29	ug/L			10/15/16 23:21	1
Acetone	5.0	U	5.0	2.5	ug/L			10/15/16 23:21	1
Carbon disulfide	1.0	U	1.0	0.18	ug/L			10/15/16 23:21	1
Methylene Chloride	1.0	U	1.0	0.36	ug/L			10/15/16 23:21	1
trans-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/15/16 23:21	1
Methyl tert-butyl ether	1.0	U	1.0	0.24	ug/L			10/15/16 23:21	1
1,1-Dichloroethane	**0.28**	**J**	1.0	0.24	ug/L			10/15/16 23:21	1
cis-1,2-Dichloroethene	**4.6**		1.0	0.29	ug/L			10/15/16 23:21	1
Bromochloromethane	1.0	U	1.0	0.38	ug/L			10/15/16 23:21	1
2-Butanone (MEK)	5.0	U	5.0	1.2	ug/L			10/15/16 23:21	1
Chloroform	**1.1**		1.0	0.27	ug/L			10/15/16 23:21	1
1,1,1-Trichloroethane	1.0	U	1.0	0.22	ug/L			10/15/16 23:21	1
Carbon tetrachloride	1.0	U ^c	1.0	0.24	ug/L			10/15/16 23:21	1
Benzene	1.0	U	1.0	0.26	ug/L			10/15/16 23:21	1
1,2-Dichloroethane	1.0	U	1.0	0.25	ug/L			10/15/16 23:21	1
Trichloroethene	**14**		1.0	0.26	ug/L			10/15/16 23:21	1
1,2-Dichloropropane	1.0	U	1.0	0.23	ug/L			10/15/16 23:21	1
Bromodichloromethane	1.0	U	1.0	0.23	ug/L			10/15/16 23:21	1
cis-1,3-Dichloropropene	1.0	U ^c	1.0	0.21	ug/L			10/15/16 23:21	1
4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59	ug/L			10/15/16 23:21	1
Toluene	1.0	U	1.0	0.28	ug/L			10/15/16 23:21	1
trans-1,3-Dichloropropene	1.0	U ^c	1.0	0.24	ug/L			10/15/16 23:21	1
1,1,2-Trichloroethane	1.0	U	1.0	0.35	ug/L			10/15/16 23:21	1
Tetrachloroethene	**1.7**		1.0	0.27	ug/L			10/15/16 23:21	1
2-Hexanone	5.0	U	5.0	0.74	ug/L			10/15/16 23:21	1
Dibromochloromethane	1.0	U ^c	1.0	0.40	ug/L			10/15/16 23:21	1
1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29	ug/L			10/15/16 23:21	1
Chlorobenzene	1.0	U	1.0	0.31	ug/L			10/15/16 23:21	1
1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20	ug/L			10/15/16 23:21	1
Ethylbenzene	1.0	U	1.0	0.27	ug/L			10/15/16 23:21	1
Xylenes, Total	2.0	U	2.0	0.48	ug/L			10/15/16 23:21	1
Styrene	1.0	U	1.0	0.26	ug/L			10/15/16 23:21	1
Bromoform	1.0	U ^c	1.0	0.29	ug/L			10/15/16 23:21	1
1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35	ug/L			10/15/16 23:21	1
Acrylonitrile	20	U ^c	20	2.8	ug/L			10/15/16 23:21	1
1,4-Dioxane	**12**	**J**	200	7.5	ug/L			10/15/16 23:21	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*123*		*72 - 134*		*10/15/16 23:21*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/15/16 23:21*	*1*
4-Bromofluorobenzene (Surr)	*113*		*72 - 120*		*10/15/16 23:21*	*1*
Dibromofluoromethane (Surr)	*105*		*77 - 127*		*10/15/16 23:21*	*1*

Method: 8260C - Volatile Organic Compounds (GC/MS)

Client Sample ID: HD-MW-129-0/1-0
Date Collected: 10/12/16 10:20
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-3
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	10	U	10	2.3	ug/L			10/15/16 23:45	10
Vinyl chloride	10	U	10	3.2	ug/L			10/15/16 23:45	10
Bromomethane	10	U	10	3.6	ug/L			10/15/16 23:45	10
Chloroethane	10	U	10	2.6	ug/L			10/15/16 23:45	10
1,1-Dichloroethene	10	U	10	2.9	ug/L			10/15/16 23:45	10
Acetone	50	U	50	25	ug/L			10/15/16 23:45	10
Carbon disulfide	10	U	10	1.8	ug/L			10/15/16 23:45	10
Methylene Chloride	**3.8**	**J**	10	3.6	ug/L			10/15/16 23:45	10
trans-1,2-Dichloroethene	10	U	10	2.9	ug/L			10/15/16 23:45	10
Methyl tert-butyl ether	10	U	10	2.4	ug/L			10/15/16 23:45	10
1,1-Dichloroethane	10	U	10	2.4	ug/L			10/15/16 23:45	10
cis-1,2-Dichloroethene	**310**		10	2.9	ug/L			10/15/16 23:45	10
Bromochloromethane	10	U	10	3.8	ug/L			10/15/16 23:45	10
2-Butanone (MEK)	50	U	50	12	ug/L			10/15/16 23:45	10
Chloroform	10	U	10	2.7	ug/L			10/15/16 23:45	10
1,1,1-Trichloroethane	10	U	10	2.2	ug/L			10/15/16 23:45	10
Carbon tetrachloride	10	U ^c	10	2.4	ug/L			10/15/16 23:45	10
Benzene	10	U	10	2.6	ug/L			10/15/16 23:45	10
1,2-Dichloroethane	10	U	10	2.5	ug/L			10/15/16 23:45	10
Trichloroethene	**3000**	**E**	10	2.6	ug/L			10/15/16 23:45	10
1,2-Dichloropropane	10	U	10	2.3	ug/L			10/15/16 23:45	10
Bromodichloromethane	10	U	10	2.3	ug/L			10/15/16 23:45	10
cis-1,3-Dichloropropene	10	U ^c	10	2.1	ug/L			10/15/16 23:45	10
4-Methyl-2-pentanone (MIBK)	50	U	50	5.9	ug/L			10/15/16 23:45	10
Toluene	10	U	10	2.8	ug/L			10/15/16 23:45	10
trans-1,3-Dichloropropene	10	U ^c	10	2.4	ug/L			10/15/16 23:45	10
1,1,2-Trichloroethane	10	U	10	3.5	ug/L			10/15/16 23:45	10
Tetrachloroethene	**470**		10	2.7	ug/L			10/15/16 23:45	10
2-Hexanone	50	U	50	7.4	ug/L			10/15/16 23:45	10
Dibromochloromethane	10	U ^c	10	4.0	ug/L			10/15/16 23:45	10
1,2-Dibromoethane (EDB)	10	U	10	2.9	ug/L			10/15/16 23:45	10
Chlorobenzene	10	U	10	3.1	ug/L			10/15/16 23:45	10
1,1,1,2-Tetrachloroethane	10	U	10	2.0	ug/L			10/15/16 23:45	10
Ethylbenzene	10	U	10	2.7	ug/L			10/15/16 23:45	10
Xylenes, Total	20	U	20	4.8	ug/L			10/15/16 23:45	10
Styrene	10	U	10	2.6	ug/L			10/15/16 23:45	10
Bromoform	10	U ^c	10	2.9	ug/L			10/15/16 23:45	10
1,1,2,2-Tetrachloroethane	10	U	10	3.5	ug/L			10/15/16 23:45	10
Acrylonitrile	200	U ^c	200	28	ug/L			10/15/16 23:45	10
1,4-Dioxane	2000	U	2000	75	ug/L			10/15/16 23:45	10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*116*		*72 - 134*		*10/15/16 23:45*	*10*
Toluene-d8 (Surr)	*115*		*80 - 120*		*10/15/16 23:45*	*10*
4-Bromofluorobenzene (Surr)	*100*		*72 - 120*		*10/15/16 23:45*	*10*
Dibromofluoromethane (Surr)	*103*		*77 - 127*		*10/15/16 23:45*	*10*

Method: 8260C - Volatile Organic Compounds (GC/MS)

Client Sample ID: HD-MW-127-0/1-0
Date Collected: 10/12/16 09:55
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-4
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	10	U	10	2.3	ug/L			10/16/16 00:33	10
Vinyl chloride	10	U	10	3.2	ug/L			10/16/16 00:33	10
Bromomethane	10	U	10	3.6	ug/L			10/16/16 00:33	10
Chloroethane	10	U	10	2.6	ug/L			10/16/16 00:33	10
1,1-Dichloroethene	10	U	10	2.9	ug/L			10/16/16 00:33	10
Acetone	50	U	50	25	ug/L			10/16/16 00:33	10
Carbon disulfide	10	U	10	1.8	ug/L			10/16/16 00:33	10
Methylene Chloride	**4.6**	**J**	10	3.6	ug/L			10/16/16 00:33	10
trans-1,2-Dichloroethene	10	U	10	2.9	ug/L			10/16/16 00:33	10
Methyl tert-butyl ether	10	U	10	2.4	ug/L			10/16/16 00:33	10
1,1-Dichloroethane	**3.9**	**J**	10	2.4	ug/L			10/16/16 00:33	10
cis-1,2-Dichloroethene	**240**		10	2.9	ug/L			10/16/16 00:33	10
Bromochloromethane	10	U	10	3.8	ug/L			10/16/16 00:33	10
2-Butanone (MEK)	50	U	50	12	ug/L			10/16/16 00:33	10
Chloroform	10	U	10	2.7	ug/L			10/16/16 00:33	10
1,1,1-Trichloroethane	**4.9**	**J**	10	2.2	ug/L			10/16/16 00:33	10
Carbon tetrachloride	10	U ^c	10	2.4	ug/L			10/16/16 00:33	10
Benzene	10	U	10	2.6	ug/L			10/16/16 00:33	10
1,2-Dichloroethane	10	U	10	2.5	ug/L			10/16/16 00:33	10
Trichloroethene	**61**		10	2.6	ug/L			10/16/16 00:33	10
1,2-Dichloropropane	10	U	10	2.3	ug/L			10/16/16 00:33	10
Bromodichloromethane	10	U	10	2.3	ug/L			10/16/16 00:33	10
cis-1,3-Dichloropropene	10	U ^c	10	2.1	ug/L			10/16/16 00:33	10
4-Methyl-2-pentanone (MIBK)	50	U	50	5.9	ug/L			10/16/16 00:33	10
Toluene	10	U	10	2.8	ug/L			10/16/16 00:33	10
trans-1,3-Dichloropropene	10	U ^c	10	2.4	ug/L			10/16/16 00:33	10
1,1,2-Trichloroethane	10	U	10	3.5	ug/L			10/16/16 00:33	10
Tetrachloroethene	**15**		10	2.7	ug/L			10/16/16 00:33	10
2-Hexanone	50	U	50	7.4	ug/L			10/16/16 00:33	10
Dibromochloromethane	10	U ^c	10	4.0	ug/L			10/16/16 00:33	10
1,2-Dibromoethane (EDB)	10	U	10	2.9	ug/L			10/16/16 00:33	10
Chlorobenzene	10	U	10	3.1	ug/L			10/16/16 00:33	10
1,1,1,2-Tetrachloroethane	10	U	10	2.0	ug/L			10/16/16 00:33	10
Ethylbenzene	10	U	10	2.7	ug/L			10/16/16 00:33	10
Xylenes, Total	20	U	20	4.8	ug/L			10/16/16 00:33	10
Styrene	10	U	10	2.6	ug/L			10/16/16 00:33	10
Bromoform	10	U ^c	10	2.9	ug/L			10/16/16 00:33	10
1,1,2,2-Tetrachloroethane	10	U	10	3.5	ug/L			10/16/16 00:33	10
Acrylonitrile	200	U ^c	200	28	ug/L			10/16/16 00:33	10
1,4-Dioxane	2000	U	2000	75	ug/L			10/16/16 00:33	10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*122*		*72 - 134*		*10/16/16 00:33*	*10*
Toluene-d8 (Surr)	*107*		*80 - 120*		*10/16/16 00:33*	*10*
4-Bromofluorobenzene (Surr)	*106*		*72 - 120*		*10/16/16 00:33*	*10*
Dibromofluoromethane (Surr)	*102*		*77 - 127*		*10/16/16 00:33*	*10*

Method: 8260C - Volatile Organic Compounds (GC/MS)

Client Sample ID: HD-MW-87-0/1-0
Date Collected: 10/12/16 11:50
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-5
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	10	U	10	2.3	ug/L			10/16/16 00:57	10
Vinyl chloride	10	U	10	3.2	ug/L			10/16/16 00:57	10
Bromomethane	10	U	10	3.6	ug/L			10/16/16 00:57	10
Chloroethane	10	U	10	2.6	ug/L			10/16/16 00:57	10
1,1-Dichloroethene	**2.9**	**J**	10	2.9	ug/L			10/16/16 00:57	10
Acetone	50	U	50	25	ug/L			10/16/16 00:57	10
Carbon disulfide	10	U	10	1.8	ug/L			10/16/16 00:57	10
Methylene Chloride	**4.4**	**J**	10	3.6	ug/L			10/16/16 00:57	10
trans-1,2-Dichloroethene	10	U	10	2.9	ug/L			10/16/16 00:57	10
Methyl tert-butyl ether	10	U	10	2.4	ug/L			10/16/16 00:57	10
1,1-Dichloroethane	**5.4**	**J**	10	2.4	ug/L			10/16/16 00:57	10
cis-1,2-Dichloroethene	**300**		10	2.9	ug/L			10/16/16 00:57	10
Bromochloromethane	10	U	10	3.8	ug/L			10/16/16 00:57	10
2-Butanone (MEK)	50	U	50	12	ug/L			10/16/16 00:57	10
Chloroform	10	U	10	2.7	ug/L			10/16/16 00:57	10
1,1,1-Trichloroethane	**4.4**	**J**	10	2.2	ug/L			10/16/16 00:57	10
Carbon tetrachloride	10	U ^c	10	2.4	ug/L			10/16/16 00:57	10
Benzene	10	U	10	2.6	ug/L			10/16/16 00:57	10
1,2-Dichloroethane	10	U	10	2.5	ug/L			10/16/16 00:57	10
Trichloroethene	**110**		10	2.6	ug/L			10/16/16 00:57	10
1,2-Dichloropropane	10	U	10	2.3	ug/L			10/16/16 00:57	10
Bromodichloromethane	10	U	10	2.3	ug/L			10/16/16 00:57	10
cis-1,3-Dichloropropene	10	U ^c	10	2.1	ug/L			10/16/16 00:57	10
4-Methyl-2-pentanone (MIBK)	50	U	50	5.9	ug/L			10/16/16 00:57	10
Toluene	10	U	10	2.8	ug/L			10/16/16 00:57	10
trans-1,3-Dichloropropene	10	U ^c	10	2.4	ug/L			10/16/16 00:57	10
1,1,2-Trichloroethane	10	U	10	3.5	ug/L			10/16/16 00:57	10
Tetrachloroethene	**15**		10	2.7	ug/L			10/16/16 00:57	10
2-Hexanone	50	U	50	7.4	ug/L			10/16/16 00:57	10
Dibromochloromethane	10	U ^c	10	4.0	ug/L			10/16/16 00:57	10
1,2-Dibromoethane (EDB)	10	U	10	2.9	ug/L			10/16/16 00:57	10
Chlorobenzene	10	U	10	3.1	ug/L			10/16/16 00:57	10
1,1,1,2-Tetrachloroethane	10	U	10	2.0	ug/L			10/16/16 00:57	10
Ethylbenzene	10	U	10	2.7	ug/L			10/16/16 00:57	10
Xylenes, Total	20	U	20	4.8	ug/L			10/16/16 00:57	10
Styrene	10	U	10	2.6	ug/L			10/16/16 00:57	10
Bromoform	10	U ^c	10	2.9	ug/L			10/16/16 00:57	10
1,1,2,2-Tetrachloroethane	10	U	10	3.5	ug/L			10/16/16 00:57	10
Acrylonitrile	200	U ^c	200	28	ug/L			10/16/16 00:57	10
1,4-Dioxane	2000	U	2000	75	ug/L			10/16/16 00:57	10

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*119*		*72 - 134*		*10/16/16 00:57*	*10*
Toluene-d8 (Surr)	*107*		*80 - 120*		*10/16/16 00:57*	*10*
4-Bromofluorobenzene (Surr)	*104*		*72 - 120*		*10/16/16 00:57*	*10*
Dibromofluoromethane (Surr)	*101*		*77 - 127*		*10/16/16 00:57*	*10*

Method: 8260C - Volatile Organic Compounds (GC/MS)

Client Sample ID: HD-MW-88-0/1-0
Date Collected: 10/12/16 13:52
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-6
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	1.0	U ^c	1.0	0.23	ug/L			10/18/16 19:05	1
Vinyl chloride	1.0	U	1.0	0.32	ug/L			10/18/16 19:05	1
Bromomethane	1.0	U ^c	1.0	0.36	ug/L			10/18/16 19:05	1
Chloroethane	1.0	U	1.0	0.26	ug/L			10/18/16 19:05	1
1,1-Dichloroethene	**1.6**		1.0	0.29	ug/L			10/18/16 19:05	1
Acetone	**3.3**	**J**	5.0	2.5	ug/L			10/18/16 19:05	1
Carbon disulfide	1.0	U	1.0	0.18	ug/L			10/18/16 19:05	1
Methylene Chloride	1.0	U	1.0	0.36	ug/L			10/18/16 19:05	1
trans-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/18/16 19:05	1
Methyl tert-butyl ether	1.0	U	1.0	0.24	ug/L			10/18/16 19:05	1
1,1-Dichloroethane	**1.6**		1.0	0.24	ug/L			10/18/16 19:05	1
cis-1,2-Dichloroethene	**9.3**		1.0	0.29	ug/L			10/18/16 19:05	1
Bromochloromethane	1.0	U	1.0	0.38	ug/L			10/18/16 19:05	1
2-Butanone (MEK)	5.0	U	5.0	1.2	ug/L			10/18/16 19:05	1
Chloroform	**0.28**	**J**	1.0	0.27	ug/L			10/18/16 19:05	1
1,1,1-Trichloroethane	**0.32**	**J**	1.0	0.22	ug/L			10/18/16 19:05	1
Carbon tetrachloride	1.0	U	1.0	0.24	ug/L			10/18/16 19:05	1
Benzene	1.0	U	1.0	0.26	ug/L			10/18/16 19:05	1
1,2-Dichloroethane	1.0	U	1.0	0.25	ug/L			10/18/16 19:05	1
Trichloroethene	**59**	**E**	1.0	0.26	ug/L			10/18/16 19:05	1
1,2-Dichloropropane	1.0	U	1.0	0.23	ug/L			10/18/16 19:05	1
Bromodichloromethane	1.0	U	1.0	0.23	ug/L			10/18/16 19:05	1
cis-1,3-Dichloropropene	1.0	U	1.0	0.21	ug/L			10/18/16 19:05	1
4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59	ug/L			10/18/16 19:05	1
Toluene	1.0	U	1.0	0.28	ug/L			10/18/16 19:05	1
trans-1,3-Dichloropropene	1.0	U	1.0	0.24	ug/L			10/18/16 19:05	1
1,1,2-Trichloroethane	1.0	U	1.0	0.35	ug/L			10/18/16 19:05	1
Tetrachloroethene	**62**	**E**	1.0	0.27	ug/L			10/18/16 19:05	1
2-Hexanone	5.0	U	5.0	0.74	ug/L			10/18/16 19:05	1
Dibromochloromethane	1.0	U	1.0	0.40	ug/L			10/18/16 19:05	1
1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29	ug/L			10/18/16 19:05	1
Chlorobenzene	1.0	U	1.0	0.31	ug/L			10/18/16 19:05	1
1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20	ug/L			10/18/16 19:05	1
Ethylbenzene	1.0	U	1.0	0.27	ug/L			10/18/16 19:05	1
Xylenes, Total	2.0	U	2.0	0.48	ug/L			10/18/16 19:05	1
Styrene	1.0	U	1.0	0.26	ug/L			10/18/16 19:05	1
Bromoform	1.0	U	1.0	0.29	ug/L			10/18/16 19:05	1
1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35	ug/L			10/18/16 19:05	1
Acrylonitrile	20	U ^c	20	2.8	ug/L			10/18/16 19:05	1
1,4-Dioxane	200	U	200	7.5	ug/L			10/18/16 19:05	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*120*		*72 - 134*		*10/18/16 19:05*	*1*
Toluene-d8 (Surr)	*103*		*80 - 120*		*10/18/16 19:05*	*1*
4-Bromofluorobenzene (Surr)	*113*		*72 - 120*		*10/18/16 19:05*	*1*
Dibromofluoromethane (Surr)	*107*		*77 - 127*		*10/18/16 19:05*	*1*

Method: 8260C - Volatile Organic Compounds (GC/MS)

Client Sample ID: HD-MW-12-0/1-0
Date Collected: 10/12/16 11:45
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-7
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	3.0	U	3.0	0.68	ug/L			10/19/16 21:46	3
Vinyl chloride	3.0	U	3.0	0.95	ug/L			10/19/16 21:46	3
Bromomethane	3.0	U	3.0	1.1	ug/L			10/19/16 21:46	3
Chloroethane	3.0	U	3.0	0.77	ug/L			10/19/16 21:46	3
1,1-Dichloroethene	3.0	U	3.0	0.86	ug/L			10/19/16 21:46	3
Acetone	15	U	15	7.5	ug/L			10/19/16 21:46	3
Carbon disulfide	3.0	U	3.0	0.55	ug/L			10/19/16 21:46	3
Methylene Chloride	3.0	U	3.0	1.1	ug/L			10/19/16 21:46	3
trans-1,2-Dichloroethene	3.0	U	3.0	0.86	ug/L			10/19/16 21:46	3
Methyl tert-butyl ether	3.0	U	3.0	0.73	ug/L			10/19/16 21:46	3
1,1-Dichloroethane	3.0	U	3.0	0.71	ug/L			10/19/16 21:46	3
cis-1,2-Dichloroethene	**58**		3.0	0.86	ug/L			10/19/16 21:46	3
Bromochloromethane	3.0	U	3.0	1.1	ug/L			10/19/16 21:46	3
2-Butanone (MEK)	15	U	15	3.5	ug/L			10/19/16 21:46	3
Chloroform	3.0	U	3.0	0.82	ug/L			10/19/16 21:46	3
1,1,1-Trichloroethane	3.0	U	3.0	0.67	ug/L			10/19/16 21:46	3
Carbon tetrachloride	3.0	U	3.0	0.73	ug/L			10/19/16 21:46	3
Benzene	3.0	U	3.0	0.77	ug/L			10/19/16 21:46	3
1,2-Dichloroethane	3.0	U	3.0	0.74	ug/L			10/19/16 21:46	3
Trichloroethene	**93**		3.0	0.77	ug/L			10/19/16 21:46	3
1,2-Dichloropropane	3.0	U	3.0	0.68	ug/L			10/19/16 21:46	3
Bromodichloromethane	3.0	U	3.0	0.70	ug/L			10/19/16 21:46	3
cis-1,3-Dichloropropene	3.0	U	3.0	0.62	ug/L			10/19/16 21:46	3
4-Methyl-2-pentanone (MIBK)	15	U	15	1.8	ug/L			10/19/16 21:46	3
Toluene	3.0	U	3.0	0.84	ug/L			10/19/16 21:46	3
trans-1,3-Dichloropropene	3.0	U	3.0	0.72	ug/L			10/19/16 21:46	3
1,1,2-Trichloroethane	3.0	U	3.0	1.0	ug/L			10/19/16 21:46	3
Tetrachloroethene	**4.3**		3.0	0.80	ug/L			10/19/16 21:46	3
2-Hexanone	15	U	15	2.2	ug/L			10/19/16 21:46	3
Dibromochloromethane	3.0	U	3.0	1.2	ug/L			10/19/16 21:46	3
1,2-Dibromoethane (EDB)	3.0	U	3.0	0.86	ug/L			10/19/16 21:46	3
Chlorobenzene	3.0	U	3.0	0.94	ug/L			10/19/16 21:46	3
1,1,1,2-Tetrachloroethane	3.0	U	3.0	0.59	ug/L			10/19/16 21:46	3
Ethylbenzene	3.0	U	3.0	0.82	ug/L			10/19/16 21:46	3
Xylenes, Total	6.0	U	6.0	1.5	ug/L			10/19/16 21:46	3
Styrene	3.0	U	3.0	0.79	ug/L			10/19/16 21:46	3
Bromoform	3.0	U	3.0	0.88	ug/L			10/19/16 21:46	3
1,1,2,2-Tetrachloroethane	3.0	U	3.0	1.0	ug/L			10/19/16 21:46	3
Acrylonitrile	60	U	60	8.3	ug/L			10/19/16 21:46	3
1,4-Dioxane	600	U	600	22	ug/L			10/19/16 21:46	3

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*95*		*72 - 134*		*10/19/16 21:46*	*3*
Toluene-d8 (Surr)	*106*		*80 - 120*		*10/19/16 21:46*	*3*
4-Bromofluorobenzene (Surr)	*99*		*72 - 120*		*10/19/16 21:46*	*3*
Dibromofluoromethane (Surr)	*98*		*77 - 127*		*10/19/16 21:46*	*3*

Method: 8260C - Volatile Organic Compounds (GC/MS) - DL

Client Sample ID: HD-MW-129-0/1-0
Date Collected: 10/12/16 10:20
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-3
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	250	U ^c	250	57	ug/L			10/18/16 18:40	250
Vinyl chloride	250	U	250	79	ug/L			10/18/16 18:40	250
Bromomethane	250	U ^c	250	91	ug/L			10/18/16 18:40	250
Chloroethane	250	U	250	65	ug/L			10/18/16 18:40	250
1,1-Dichloroethene	250	U	250	72	ug/L			10/18/16 18:40	250
Acetone	1300	U	1300	630	ug/L			10/18/16 18:40	250
Carbon disulfide	250	U	250	46	ug/L			10/18/16 18:40	250
Methylene Chloride	**430**		250	91	ug/L			10/18/16 18:40	250
trans-1,2-Dichloroethene	250	U	250	72	ug/L			10/18/16 18:40	250
Methyl tert-butyl ether	250	U	250	61	ug/L			10/18/16 18:40	250
1,1-Dichloroethane	250	U	250	59	ug/L			10/18/16 18:40	250
cis-1,2-Dichloroethene	**340**		250	72	ug/L			10/18/16 18:40	250
Bromochloromethane	250	U	250	94	ug/L			10/18/16 18:40	250
2-Butanone (MEK)	1300	U	1300	290	ug/L			10/18/16 18:40	250
Chloroform	250	U	250	69	ug/L			10/18/16 18:40	250
1,1,1-Trichloroethane	250	U	250	56	ug/L			10/18/16 18:40	250
Carbon tetrachloride	250	U	250	61	ug/L			10/18/16 18:40	250
Benzene	250	U	250	64	ug/L			10/18/16 18:40	250
1,2-Dichloroethane	250	U	250	61	ug/L			10/18/16 18:40	250
Trichloroethene	**4300**		250	65	ug/L			10/18/16 18:40	250
1,2-Dichloropropane	250	U	250	57	ug/L			10/18/16 18:40	250
Bromodichloromethane	250	U	250	58	ug/L			10/18/16 18:40	250
cis-1,3-Dichloropropene	250	U	250	52	ug/L			10/18/16 18:40	250
4-Methyl-2-pentanone (MIBK)	1300	U	1300	150	ug/L			10/18/16 18:40	250
Toluene	250	U	250	70	ug/L			10/18/16 18:40	250
trans-1,3-Dichloropropene	250	U	250	60	ug/L			10/18/16 18:40	250
1,1,2-Trichloroethane	250	U	250	87	ug/L			10/18/16 18:40	250
Tetrachloroethene	**620**		250	67	ug/L			10/18/16 18:40	250
2-Hexanone	1300	U	1300	190	ug/L			10/18/16 18:40	250
Dibromochloromethane	250	U	250	99	ug/L			10/18/16 18:40	250
1,2-Dibromoethane (EDB)	250	U	250	72	ug/L			10/18/16 18:40	250
Chlorobenzene	250	U	250	78	ug/L			10/18/16 18:40	250
1,1,1,2-Tetrachloroethane	250	U	250	49	ug/L			10/18/16 18:40	250
Ethylbenzene	250	U	250	69	ug/L			10/18/16 18:40	250
Xylenes, Total	500	U	500	120	ug/L			10/18/16 18:40	250
Styrene	250	U	250	66	ug/L			10/18/16 18:40	250
Bromoform	250	U	250	74	ug/L			10/18/16 18:40	250
1,1,2,2-Tetrachloroethane	250	U	250	86	ug/L			10/18/16 18:40	250
Acrylonitrile	5000	U ^c	5000	690	ug/L			10/18/16 18:40	250
1,4-Dioxane	50000	U	50000	1900	ug/L			10/18/16 18:40	250

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*120*		*72 - 134*		*10/18/16 18:40*	*250*
Toluene-d8 (Surr)	*106*		*80 - 120*		*10/18/16 18:40*	*250*
4-Bromofluorobenzene (Surr)	*118*		*72 - 120*		*10/18/16 18:40*	*250*
Dibromofluoromethane (Surr)	*102*		*77 - 127*		*10/18/16 18:40*	*250*

Method: 8260C - Volatile Organic Compounds (GC/MS) - DL

Client Sample ID: HD-MW-88-0/1-0
Date Collected: 10/12/16 13:52
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-6
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	2.0	U	2.0	0.46	ug/L			10/19/16 21:22	2
Vinyl chloride	2.0	U	2.0	0.63	ug/L			10/19/16 21:22	2
Bromomethane	2.0	U	2.0	0.72	ug/L			10/19/16 21:22	2
Chloroethane	2.0	U	2.0	0.52	ug/L			10/19/16 21:22	2
1,1-Dichloroethene	**1.6**	**J**	2.0	0.57	ug/L			10/19/16 21:22	2
Acetone	10	U	10	5.0	ug/L			10/19/16 21:22	2
Carbon disulfide	2.0	U	2.0	0.37	ug/L			10/19/16 21:22	2
Methylene Chloride	2.0	U	2.0	0.72	ug/L			10/19/16 21:22	2
trans-1,2-Dichloroethene	2.0	U	2.0	0.57	ug/L			10/19/16 21:22	2
Methyl tert-butyl ether	2.0	U	2.0	0.49	ug/L			10/19/16 21:22	2
1,1-Dichloroethane	**1.6**	**J**	2.0	0.47	ug/L			10/19/16 21:22	2
cis-1,2-Dichloroethene	**9.1**		2.0	0.57	ug/L			10/19/16 21:22	2
Bromochloromethane	2.0	U	2.0	0.75	ug/L			10/19/16 21:22	2
2-Butanone (MEK)	10	U	10	2.3	ug/L			10/19/16 21:22	2
Chloroform	2.0	U	2.0	0.55	ug/L			10/19/16 21:22	2
1,1,1-Trichloroethane	2.0	U	2.0	0.44	ug/L			10/19/16 21:22	2
Carbon tetrachloride	2.0	U	2.0	0.49	ug/L			10/19/16 21:22	2
Benzene	2.0	U	2.0	0.51	ug/L			10/19/16 21:22	2
1,2-Dichloroethane	2.0	U	2.0	0.49	ug/L			10/19/16 21:22	2
Trichloroethene	**63**		2.0	0.52	ug/L			10/19/16 21:22	2
1,2-Dichloropropane	2.0	U	2.0	0.45	ug/L			10/19/16 21:22	2
Bromodichloromethane	2.0	U	2.0	0.47	ug/L			10/19/16 21:22	2
cis-1,3-Dichloropropene	2.0	U	2.0	0.41	ug/L			10/19/16 21:22	2
4-Methyl-2-pentanone (MIBK)	10	U	10	1.2	ug/L			10/19/16 21:22	2
Toluene	2.0	U	2.0	0.56	ug/L			10/19/16 21:22	2
trans-1,3-Dichloropropene	2.0	U	2.0	0.48	ug/L			10/19/16 21:22	2
1,1,2-Trichloroethane	2.0	U	2.0	0.70	ug/L			10/19/16 21:22	2
Tetrachloroethene	**60**		2.0	0.54	ug/L			10/19/16 21:22	2
2-Hexanone	10	U	10	1.5	ug/L			10/19/16 21:22	2
Dibromochloromethane	2.0	U	2.0	0.79	ug/L			10/19/16 21:22	2
1,2-Dibromoethane (EDB)	2.0	U	2.0	0.58	ug/L			10/19/16 21:22	2
Chlorobenzene	2.0	U	2.0	0.63	ug/L			10/19/16 21:22	2
1,1,1,2-Tetrachloroethane	2.0	U	2.0	0.39	ug/L			10/19/16 21:22	2
Ethylbenzene	2.0	U	2.0	0.55	ug/L			10/19/16 21:22	2
Xylenes, Total	4.0	U	4.0	0.97	ug/L			10/19/16 21:22	2
Styrene	2.0	U	2.0	0.53	ug/L			10/19/16 21:22	2
Bromoform	2.0	U	2.0	0.59	ug/L			10/19/16 21:22	2
1,1,2,2-Tetrachloroethane	2.0	U	2.0	0.69	ug/L			10/19/16 21:22	2
Acrylonitrile	40	U	40	5.5	ug/L			10/19/16 21:22	2
1,4-Dioxane	400	U	400	15	ug/L			10/19/16 21:22	2

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*94*		*72 - 134*		*10/19/16 21:22*	*2*
Toluene-d8 (Surr)	*106*		*80 - 120*		*10/19/16 21:22*	*2*
4-Bromofluorobenzene (Surr)	*99*		*72 - 120*		*10/19/16 21:22*	*2*
Dibromofluoromethane (Surr)	*98*		*77 - 127*		*10/19/16 21:22*	*2*

Method: 8270D LL - Semivolatile Organic Compounds by GC/MS - Low Level

Client Sample ID: HD-MW-127-0/1-0
Date Collected: 10/12/16 09:55
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-4
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	3.1		1.9	0.049	ug/L		10/18/16 16:04	10/21/16 19:28	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*46*		*24 - 100*	*10/18/16 16:04*	*10/21/16 19:28*	*1*
2-Fluorophenol (Surr)	*44*		*20 - 100*	*10/18/16 16:04*	*10/21/16 19:28*	*1*
2,4,6-Tribromophenol (Surr)	*58*		*22 - 118*	*10/18/16 16:04*	*10/21/16 19:28*	*1*
Nitrobenzene-d5 (Surr)	*46*		*25 - 105*	*10/18/16 16:04*	*10/21/16 19:28*	*1*
Phenol-d5 (Surr)	*50*		*21 - 100*	*10/18/16 16:04*	*10/21/16 19:28*	*1*
Terphenyl-d14 (Surr)	*47*		*20 - 124*	*10/18/16 16:04*	*10/21/16 19:28*	*1*

Method: 8270D LL - Semivolatile Organic Compounds by GC/MS - Low Level

Client Sample ID: HD-MW-87-0/1-0
Date Collected: 10/12/16 11:50
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-5
Matrix: Water

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	**6.9**		1.9	0.049	ug/L		10/18/16 16:04	10/21/16 19:51	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*43*		*24 - 100*	*10/18/16 16:04*	*10/21/16 19:51*	*1*
2-Fluorophenol (Surr)	*43*		*20 - 100*	*10/18/16 16:04*	*10/21/16 19:51*	*1*
2,4,6-Tribromophenol (Surr)	*62*		*22 - 118*	*10/18/16 16:04*	*10/21/16 19:51*	*1*
Nitrobenzene-d5 (Surr)	*50*		*25 - 105*	*10/18/16 16:04*	*10/21/16 19:51*	*1*
Phenol-d5 (Surr)	*45*		*21 - 100*	*10/18/16 16:04*	*10/21/16 19:51*	*1*
Terphenyl-d14 (Surr)	*35*		*20 - 124*	*10/18/16 16:04*	*10/21/16 19:51*	*1*

Default Detection Limits

Client: Groundwater Sciences Corporation
Project/Site: Harley Davidson

TestAmerica Job ID: 180-59749-1

Method: 8260C - Volatile Organic Compounds (GC/MS)

Analyte	RL	MDL	Units	Method
1,1,1,2-Tetrachloroethane	1.0	0.20	ug/L	8260C
1,1,1-Trichloroethane	1.0	0.22	ug/L	8260C
1,1,2,2-Tetrachloroethane	1.0	0.35	ug/L	8260C
1,1,2-Trichloroethane	1.0	0.35	ug/L	8260C
1,1-Dichloroethane	1.0	0.24	ug/L	8260C
1,1-Dichloroethene	1.0	0.29	ug/L	8260C
1,2-Dibromoethane (EDB)	1.0	0.29	ug/L	8260C
1,2-Dichloroethane	1.0	0.25	ug/L	8260C
1,2-Dichloropropane	1.0	0.23	ug/L	8260C
1,4-Dioxane	200	7.5	ug/L	8260C
2-Butanone (MEK)	5.0	1.2	ug/L	8260C
2-Hexanone	5.0	0.74	ug/L	8260C
4-Methyl-2-pentanone (MIBK)	5.0	0.59	ug/L	8260C
Acetone	5.0	2.5	ug/L	8260C
Acrylonitrile	20	2.8	ug/L	8260C
Benzene	1.0	0.26	ug/L	8260C
Bromochloromethane	1.0	0.38	ug/L	8260C
Bromodichloromethane	1.0	0.23	ug/L	8260C
Bromoform	1.0	0.29	ug/L	8260C
Bromomethane	1.0	0.36	ug/L	8260C
Carbon disulfide	1.0	0.18	ug/L	8260C
Carbon tetrachloride	1.0	0.24	ug/L	8260C
Chlorobenzene	1.0	0.31	ug/L	8260C
Chloroethane	1.0	0.26	ug/L	8260C
Chloroform	1.0	0.27	ug/L	8260C
Chloromethane	1.0	0.23	ug/L	8260C
cis-1,2-Dichloroethene	1.0	0.29	ug/L	8260C
cis-1,3-Dichloropropene	1.0	0.21	ug/L	8260C
Dibromochloromethane	1.0	0.40	ug/L	8260C
Ethylbenzene	1.0	0.27	ug/L	8260C
Methyl tert-butyl ether	1.0	0.24	ug/L	8260C
Methylene Chloride	1.0	0.36	ug/L	8260C
Styrene	1.0	0.26	ug/L	8260C
Tetrachloroethene	1.0	0.27	ug/L	8260C
Toluene	1.0	0.28	ug/L	8260C
trans-1,2-Dichloroethene	1.0	0.29	ug/L	8260C
trans-1,3-Dichloropropene	1.0	0.24	ug/L	8260C
Trichloroethene	1.0	0.26	ug/L	8260C
Vinyl chloride	1.0	0.32	ug/L	8260C
Xylenes, Total	2.0	0.48	ug/L	8260C

Method: 8270D LL - Semivolatile Organic Compounds by GC/MS - Low Level

Prep: 3520C

Analyte	RL	MDL	Units	Method
1,4-Dioxane	2.0	0.052	ug/L	8270D LL

Surrogate Summary

Client: Groundwater Sciences Corporation
Project/Site: Harley Davidson

TestAmerica Job ID: 180-59749-1

Method: 8260C - Volatile Organic Compounds (GC/MS)

Matrix: Water **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)			
		12DCE	TOL	BFB	DBFM
Lab Sample ID	Client Sample ID	(72-134)	(80-120)	(72-120)	(77-127)
180-59749-1	HD-QC6-0/1-2	124	104	117	106
180-59749-2	HD-MW-57-0/1-0	123	104	113	105
180-59749-3	HD-MW-129-0/1-0	116	115	100	103
180-59749-3 - DL	HD-MW-129-0/1-0	120	106	118	102
180-59749-4	HD-MW-127-0/1-0	122	107	106	102
180-59749-5	HD-MW-87-0/1-0	119	107	104	101
180-59749-6	HD-MW-88-0/1-0	120	103	113	107
180-59749-6 - DL	HD-MW-88-0/1-0	94	106	99	98
180-59749-7	HD-MW-12-0/1-0	95	106	99	98
LCS 180-191289/9	Lab Control Sample	113	104	112	103
LCS 180-191520/9	Lab Control Sample	107	97	103	95
LCS 180-191652/7	Lab Control Sample	91	105	103	99
MB 180-191289/6	Method Blank	120	104	105	102
MB 180-191520/4	Method Blank	114	104	114	100
MB 180-191652/4	Method Blank	91	103	97	93

Surrogate Legend

12DCE = 1,2-Dichloroethane-d4 (Surr)
TOL = Toluene-d8 (Surr)
BFB = 4-Bromofluorobenzene (Surr)
DBFM = Dibromofluoromethane (Surr)

Method: 8270D LL - Semivolatile Organic Compounds by GC/MS - Low Level

Matrix: Water **Prep Type: Total/NA**

		Percent Surrogate Recovery (Acceptance Limits)					
		FBP	2FP	TBP	NBZ	PHL	TPH
Lab Sample ID	Client Sample ID	(24-100)	(20-100)	(22-118)	(25-105)	(21-100)	(20-124)
180-59749-4	HD-MW-127-0/1-0	46	44	58	46	50	47
180-59749-5	HD-MW-87-0/1-0	43	43	62	50	45	35
LCS 180-191579/2-A	Lab Control Sample	56	67	64	62	64	59
LCSD 180-191579/3-A	Lab Control Sample Dup	58	67	65	62	64	60
MB 180-191579/1-A	Method Blank	56	61	63	59	60	56

Surrogate Legend

FBP = 2-Fluorobiphenyl
2FP = 2-Fluorophenol (Surr)
TBP = 2,4,6-Tribromophenol (Surr)
NBZ = Nitrobenzene-d5 (Surr)
PHL = Phenol-d5 (Surr)
TPH = Terphenyl-d14 (Surr)

Method: 8260C - Volatile Organic Compounds (GC/MS)

Lab Sample ID: MB 180-191289/6
Matrix: Water
Analysis Batch: 191289

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	1.0	U	1.0	0.23	ug/L			10/15/16 14:46	1
Vinyl chloride	1.0	U	1.0	0.32	ug/L			10/15/16 14:46	1
Bromomethane	1.0	U	1.0	0.36	ug/L			10/15/16 14:46	1
Chloroethane	1.0	U	1.0	0.26	ug/L			10/15/16 14:46	1
1,1-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/15/16 14:46	1
Acetone	5.0	U	5.0	2.5	ug/L			10/15/16 14:46	1
Carbon disulfide	1.0	U	1.0	0.18	ug/L			10/15/16 14:46	1
Methylene Chloride	1.0	U	1.0	0.36	ug/L			10/15/16 14:46	1
trans-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/15/16 14:46	1
Methyl tert-butyl ether	1.0	U	1.0	0.24	ug/L			10/15/16 14:46	1
1,1-Dichloroethane	1.0	U	1.0	0.24	ug/L			10/15/16 14:46	1
cis-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/15/16 14:46	1
Bromochloromethane	1.0	U	1.0	0.38	ug/L			10/15/16 14:46	1
2-Butanone (MEK)	5.0	U	5.0	1.2	ug/L			10/15/16 14:46	1
Chloroform	1.0	U	1.0	0.27	ug/L			10/15/16 14:46	1
1,1,1-Trichloroethane	1.0	U	1.0	0.22	ug/L			10/15/16 14:46	1
Carbon tetrachloride	1.0	U	1.0	0.24	ug/L			10/15/16 14:46	1
Benzene	1.0	U	1.0	0.26	ug/L			10/15/16 14:46	1
1,2-Dichloroethane	1.0	U	1.0	0.25	ug/L			10/15/16 14:46	1
Trichloroethene	1.0	U	1.0	0.26	ug/L			10/15/16 14:46	1
1,2-Dichloropropane	1.0	U	1.0	0.23	ug/L			10/15/16 14:46	1
Bromodichloromethane	1.0	U	1.0	0.23	ug/L			10/15/16 14:46	1
cis-1,3-Dichloropropene	1.0	U	1.0	0.21	ug/L			10/15/16 14:46	1
4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59	ug/L			10/15/16 14:46	1
Toluene	1.0	U	1.0	0.28	ug/L			10/15/16 14:46	1
trans-1,3-Dichloropropene	1.0	U	1.0	0.24	ug/L			10/15/16 14:46	1
1,1,2-Trichloroethane	1.0	U	1.0	0.35	ug/L			10/15/16 14:46	1
Tetrachloroethene	1.0	U	1.0	0.27	ug/L			10/15/16 14:46	1
2-Hexanone	5.0	U	5.0	0.74	ug/L			10/15/16 14:46	1
Dibromochloromethane	1.0	U	1.0	0.40	ug/L			10/15/16 14:46	1
1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29	ug/L			10/15/16 14:46	1
Chlorobenzene	1.0	U	1.0	0.31	ug/L			10/15/16 14:46	1
1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20	ug/L			10/15/16 14:46	1
Ethylbenzene	1.0	U	1.0	0.27	ug/L			10/15/16 14:46	1
Xylenes, Total	2.0	U	2.0	0.48	ug/L			10/15/16 14:46	1
Styrene	1.0	U	1.0	0.26	ug/L			10/15/16 14:46	1
Bromoform	1.0	U	1.0	0.29	ug/L			10/15/16 14:46	1
1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35	ug/L			10/15/16 14:46	1
Acrylonitrile	20	U	20	2.8	ug/L			10/15/16 14:46	1
1,4-Dioxane	200	U	200	7.5	ug/L			10/15/16 14:46	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*120*		*72 - 134*		*10/15/16 14:46*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/15/16 14:46*	*1*
4-Bromofluorobenzene (Surr)	*105*		*72 - 120*		*10/15/16 14:46*	*1*
Dibromofluoromethane (Surr)	*102*		*77 - 127*		*10/15/16 14:46*	*1*

Method: 8260C - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 180-191289/9
Matrix: Water
Analysis Batch: 191289

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloromethane	10.0	12.8		ug/L		128	51 - 150
Vinyl chloride	10.0	12.2		ug/L		122	61 - 138
Bromomethane	10.0	8.43		ug/L		84	39 - 150
Chloroethane	10.0	11.2		ug/L		112	53 - 148
1,1-Dichloroethene	10.0	9.86		ug/L		99	71 - 122
Acetone	20.0	20.9		ug/L		105	10 - 150
Carbon disulfide	10.0	9.35		ug/L		93	57 - 137
Methylene Chloride	10.0	9.86		ug/L		99	71 - 129
trans-1,2-Dichloroethene	10.0	10.4		ug/L		104	80 - 121
Methyl tert-butyl ether	10.0	9.23		ug/L		92	68 - 124
1,1-Dichloroethane	10.0	11.0		ug/L		110	76 - 126
cis-1,2-Dichloroethene	10.0	10.1		ug/L		101	80 - 120
Bromochloromethane	10.0	9.24		ug/L		92	76 - 120
2-Butanone (MEK)	20.0	19.8		ug/L		99	41 - 150
Chloroform	10.0	10.7		ug/L		107	78 - 122
1,1,1-Trichloroethane	10.0	9.42		ug/L		94	57 - 128
Carbon tetrachloride	10.0	9.13		ug/L		91	59 - 145
Benzene	10.0	10.7		ug/L		107	80 - 121
1,2-Dichloroethane	10.0	11.7		ug/L		117	72 - 126
Trichloroethene	10.0	9.45		ug/L		95	79 - 120
1,2-Dichloropropane	10.0	11.2		ug/L		112	78 - 123
Bromodichloromethane	10.0	10.2		ug/L		102	72 - 124
cis-1,3-Dichloropropene	10.0	8.00		ug/L		80	67 - 127
4-Methyl-2-pentanone (MIBK)	20.0	17.6		ug/L		88	49 - 147
Toluene	10.0	10.9		ug/L		109	80 - 125
trans-1,3-Dichloropropene	10.0	7.52		ug/L		75	63 - 144
1,1,2-Trichloroethane	10.0	10.8		ug/L		108	77 - 127
Tetrachloroethene	10.0	11.2		ug/L		112	80 - 122
2-Hexanone	20.0	15.7		ug/L		79	40 - 150
Dibromochloromethane	10.0	9.15		ug/L		91	71 - 134
1,2-Dibromoethane (EDB)	10.0	10.0		ug/L		100	79 - 126
Chlorobenzene	10.0	11.4		ug/L		114	80 - 120
1,1,1,2-Tetrachloroethane	10.0	10.2		ug/L		102	75 - 135
Ethylbenzene	10.0	11.0		ug/L		110	80 - 123
Xylenes, Total	20.0	22.9		ug/L		115	80 - 123
Styrene	10.0	12.0		ug/L		120	80 - 125
Bromoform	10.0	8.31		ug/L		83	62 - 138
1,1,2,2-Tetrachloroethane	10.0	12.2		ug/L		122	78 - 135
Acrylonitrile	100	130		ug/L		130	66 - 146
1,4-Dioxane	200	230		ug/L		115	10 - 150

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*113*		*72 - 134*
Toluene-d8 (Surr)	*104*		*80 - 120*
4-Bromofluorobenzene (Surr)	*112*		*72 - 120*
Dibromofluoromethane (Surr)	*103*		*77 - 127*

Method: 8260C - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 180-191520/4
Matrix: Water
Analysis Batch: 191520

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	1.0	U	1.0	0.23	ug/L			10/18/16 13:17	1
Vinyl chloride	1.0	U	1.0	0.32	ug/L			10/18/16 13:17	1
Bromomethane	1.0	U	1.0	0.36	ug/L			10/18/16 13:17	1
Chloroethane	1.0	U	1.0	0.26	ug/L			10/18/16 13:17	1
1,1-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/18/16 13:17	1
Acetone	5.0	U	5.0	2.5	ug/L			10/18/16 13:17	1
Carbon disulfide	1.0	U	1.0	0.18	ug/L			10/18/16 13:17	1
Methylene Chloride	1.0	U	1.0	0.36	ug/L			10/18/16 13:17	1
trans-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/18/16 13:17	1
Methyl tert-butyl ether	1.0	U	1.0	0.24	ug/L			10/18/16 13:17	1
1,1-Dichloroethane	1.0	U	1.0	0.24	ug/L			10/18/16 13:17	1
cis-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/18/16 13:17	1
Bromochloromethane	1.0	U	1.0	0.38	ug/L			10/18/16 13:17	1
2-Butanone (MEK)	5.0	U	5.0	1.2	ug/L			10/18/16 13:17	1
Chloroform	1.0	U	1.0	0.27	ug/L			10/18/16 13:17	1
1,1,1-Trichloroethane	1.0	U	1.0	0.22	ug/L			10/18/16 13:17	1
Carbon tetrachloride	1.0	U	1.0	0.24	ug/L			10/18/16 13:17	1
Benzene	1.0	U	1.0	0.26	ug/L			10/18/16 13:17	1
1,2-Dichloroethane	1.0	U	1.0	0.25	ug/L			10/18/16 13:17	1
Trichloroethene	1.0	U	1.0	0.26	ug/L			10/18/16 13:17	1
1,2-Dichloropropane	1.0	U	1.0	0.23	ug/L			10/18/16 13:17	1
Bromodichloromethane	1.0	U	1.0	0.23	ug/L			10/18/16 13:17	1
cis-1,3-Dichloropropene	1.0	U	1.0	0.21	ug/L			10/18/16 13:17	1
4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59	ug/L			10/18/16 13:17	1
Toluene	1.0	U	1.0	0.28	ug/L			10/18/16 13:17	1
trans-1,3-Dichloropropene	1.0	U	1.0	0.24	ug/L			10/18/16 13:17	1
1,1,2-Trichloroethane	1.0	U	1.0	0.35	ug/L			10/18/16 13:17	1
Tetrachloroethene	1.0	U	1.0	0.27	ug/L			10/18/16 13:17	1
2-Hexanone	5.0	U	5.0	0.74	ug/L			10/18/16 13:17	1
Dibromochloromethane	1.0	U	1.0	0.40	ug/L			10/18/16 13:17	1
1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29	ug/L			10/18/16 13:17	1
Chlorobenzene	1.0	U	1.0	0.31	ug/L			10/18/16 13:17	1
1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20	ug/L			10/18/16 13:17	1
Ethylbenzene	1.0	U	1.0	0.27	ug/L			10/18/16 13:17	1
Xylenes, Total	2.0	U	2.0	0.48	ug/L			10/18/16 13:17	1
Styrene	1.0	U	1.0	0.26	ug/L			10/18/16 13:17	1
Bromoform	1.0	U	1.0	0.29	ug/L			10/18/16 13:17	1
1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35	ug/L			10/18/16 13:17	1
Acrylonitrile	20	U	20	2.8	ug/L			10/18/16 13:17	1
1,4-Dioxane	200	U	200	7.5	ug/L			10/18/16 13:17	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*114*		*72 - 134*		*10/18/16 13:17*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/18/16 13:17*	*1*
4-Bromofluorobenzene (Surr)	*114*		*72 - 120*		*10/18/16 13:17*	*1*
Dibromofluoromethane (Surr)	*100*		*77 - 127*		*10/18/16 13:17*	*1*

Method: 8260C - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 180-191520/9
Matrix: Water
Analysis Batch: 191520

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloromethane	10.0	11.6		ug/L		116	51 - 150
Vinyl chloride	10.0	10.7		ug/L		107	61 - 138
Bromomethane	10.0	8.21		ug/L		82	39 - 150
Chloroethane	10.0	9.82		ug/L		98	53 - 148
1,1-Dichloroethene	10.0	8.85		ug/L		89	71 - 122
Acetone	20.0	19.5		ug/L		97	10 - 150
Carbon disulfide	10.0	8.62		ug/L		86	57 - 137
Methylene Chloride	10.0	9.96		ug/L		100	71 - 129
trans-1,2-Dichloroethene	10.0	9.07		ug/L		91	80 - 121
Methyl tert-butyl ether	10.0	9.05		ug/L		90	68 - 124
1,1-Dichloroethane	10.0	10.2		ug/L		102	76 - 126
cis-1,2-Dichloroethene	10.0	9.53		ug/L		95	80 - 120
Bromochloromethane	10.0	9.24		ug/L		92	76 - 120
2-Butanone (MEK)	20.0	21.4		ug/L		107	41 - 150
Chloroform	10.0	9.83		ug/L		98	78 - 122
1,1,1-Trichloroethane	10.0	8.46		ug/L		85	57 - 128
Carbon tetrachloride	10.0	8.05		ug/L		80	59 - 145
Benzene	10.0	10.2		ug/L		102	80 - 121
1,2-Dichloroethane	10.0	10.8		ug/L		108	72 - 126
Trichloroethene	10.0	9.13		ug/L		91	79 - 120
1,2-Dichloropropane	10.0	10.9		ug/L		109	78 - 123
Bromodichloromethane	10.0	10.2		ug/L		102	72 - 124
cis-1,3-Dichloropropene	10.0	8.64		ug/L		86	67 - 127
4-Methyl-2-pentanone (MIBK)	20.0	18.1		ug/L		90	49 - 147
Toluene	10.0	9.93		ug/L		99	80 - 125
trans-1,3-Dichloropropene	10.0	7.79		ug/L		78	63 - 144
1,1,2-Trichloroethane	10.0	10.1		ug/L		101	77 - 127
Tetrachloroethene	10.0	9.66		ug/L		97	80 - 122
2-Hexanone	20.0	15.8		ug/L		79	40 - 150
Dibromochloromethane	10.0	9.06		ug/L		91	71 - 134
1,2-Dibromoethane (EDB)	10.0	10.1		ug/L		101	79 - 126
Chlorobenzene	10.0	10.5		ug/L		105	80 - 120
1,1,1,2-Tetrachloroethane	10.0	9.51		ug/L		95	75 - 135
Ethylbenzene	10.0	10.1		ug/L		101	80 - 123
Xylenes, Total	20.0	21.3		ug/L		107	80 - 123
Styrene	10.0	10.9		ug/L		109	80 - 125
Bromoform	10.0	9.14		ug/L		91	62 - 138
1,1,2,2-Tetrachloroethane	10.0	11.7		ug/L		117	78 - 135
Acrylonitrile	100	129		ug/L		129	66 - 146
1,4-Dioxane	200	231		ug/L		116	10 - 150

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*107*		*72 - 134*
Toluene-d8 (Surr)	*97*		*80 - 120*
4-Bromofluorobenzene (Surr)	*103*		*72 - 120*
Dibromofluoromethane (Surr)	*95*		*77 - 127*

Method: 8260C - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: MB 180-191652/4
Matrix: Water
Analysis Batch: 191652

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloromethane	1.0	U	1.0	0.23	ug/L			10/19/16 11:51	1
Vinyl chloride	1.0	U	1.0	0.32	ug/L			10/19/16 11:51	1
Bromomethane	1.0	U	1.0	0.36	ug/L			10/19/16 11:51	1
Chloroethane	1.0	U	1.0	0.26	ug/L			10/19/16 11:51	1
1,1-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/19/16 11:51	1
Acetone	5.0	U	5.0	2.5	ug/L			10/19/16 11:51	1
Carbon disulfide	1.0	U	1.0	0.18	ug/L			10/19/16 11:51	1
Methylene Chloride	1.0	U	1.0	0.36	ug/L			10/19/16 11:51	1
trans-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/19/16 11:51	1
Methyl tert-butyl ether	1.0	U	1.0	0.24	ug/L			10/19/16 11:51	1
1,1-Dichloroethane	1.0	U	1.0	0.24	ug/L			10/19/16 11:51	1
cis-1,2-Dichloroethene	1.0	U	1.0	0.29	ug/L			10/19/16 11:51	1
Bromochloromethane	1.0	U	1.0	0.38	ug/L			10/19/16 11:51	1
2-Butanone (MEK)	5.0	U	5.0	1.2	ug/L			10/19/16 11:51	1
Chloroform	1.0	U	1.0	0.27	ug/L			10/19/16 11:51	1
1,1,1-Trichloroethane	1.0	U	1.0	0.22	ug/L			10/19/16 11:51	1
Carbon tetrachloride	1.0	U	1.0	0.24	ug/L			10/19/16 11:51	1
Benzene	1.0	U	1.0	0.26	ug/L			10/19/16 11:51	1
1,2-Dichloroethane	1.0	U	1.0	0.25	ug/L			10/19/16 11:51	1
Trichloroethene	1.0	U	1.0	0.26	ug/L			10/19/16 11:51	1
1,2-Dichloropropane	1.0	U	1.0	0.23	ug/L			10/19/16 11:51	1
Bromodichloromethane	1.0	U	1.0	0.23	ug/L			10/19/16 11:51	1
cis-1,3-Dichloropropene	1.0	U	1.0	0.21	ug/L			10/19/16 11:51	1
4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59	ug/L			10/19/16 11:51	1
Toluene	1.0	U	1.0	0.28	ug/L			10/19/16 11:51	1
trans-1,3-Dichloropropene	1.0	U	1.0	0.24	ug/L			10/19/16 11:51	1
1,1,2-Trichloroethane	1.0	U	1.0	0.35	ug/L			10/19/16 11:51	1
Tetrachloroethene	1.0	U	1.0	0.27	ug/L			10/19/16 11:51	1
2-Hexanone	5.0	U	5.0	0.74	ug/L			10/19/16 11:51	1
Dibromochloromethane	1.0	U	1.0	0.40	ug/L			10/19/16 11:51	1
1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29	ug/L			10/19/16 11:51	1
Chlorobenzene	1.0	U	1.0	0.31	ug/L			10/19/16 11:51	1
1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20	ug/L			10/19/16 11:51	1
Ethylbenzene	1.0	U	1.0	0.27	ug/L			10/19/16 11:51	1
Xylenes, Total	2.0	U	2.0	0.48	ug/L			10/19/16 11:51	1
Styrene	1.0	U	1.0	0.26	ug/L			10/19/16 11:51	1
Bromoform	1.0	U	1.0	0.29	ug/L			10/19/16 11:51	1
1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35	ug/L			10/19/16 11:51	1
Acrylonitrile	20	U	20	2.8	ug/L			10/19/16 11:51	1
1,4-Dioxane	200	U	200	7.5	ug/L			10/19/16 11:51	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
1,2-Dichloroethane-d4 (Surr)	*91*		*72 - 134*		*10/19/16 11:51*	*1*
Toluene-d8 (Surr)	*103*		*80 - 120*		*10/19/16 11:51*	*1*
4-Bromofluorobenzene (Surr)	*97*		*72 - 120*		*10/19/16 11:51*	*1*
Dibromofluoromethane (Surr)	*93*		*77 - 127*		*10/19/16 11:51*	*1*

Method: 8260C - Volatile Organic Compounds (GC/MS) (Continued)

Lab Sample ID: LCS 180-191652/7
Matrix: Water
Analysis Batch: 191652

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Chloromethane	10.0	11.0		ug/L		110	51 - 150
Vinyl chloride	10.0	10.7		ug/L		107	61 - 138
Bromomethane	10.0	11.5		ug/L		115	39 - 150
Chloroethane	10.0	9.70		ug/L		97	53 - 148
1,1-Dichloroethene	10.0	9.78		ug/L		98	71 - 122
Acetone	20.0	25.4		ug/L		127	10 - 150
Carbon disulfide	10.0	9.96		ug/L		100	57 - 137
Methylene Chloride	10.0	10.3		ug/L		103	71 - 129
trans-1,2-Dichloroethene	10.0	10.1		ug/L		101	80 - 121
Methyl tert-butyl ether	10.0	10.0		ug/L		100	68 - 124
1,1-Dichloroethane	10.0	9.90		ug/L		99	76 - 126
cis-1,2-Dichloroethene	10.0	10.0		ug/L		100	80 - 120
Bromochloromethane	10.0	9.56		ug/L		96	76 - 120
2-Butanone (MEK)	20.0	22.7		ug/L		114	41 - 150
Chloroform	10.0	9.86		ug/L		99	78 - 122
1,1,1-Trichloroethane	10.0	9.95		ug/L		100	57 - 128
Carbon tetrachloride	10.0	10.4		ug/L		104	59 - 145
Benzene	10.0	10.2		ug/L		102	80 - 121
1,2-Dichloroethane	10.0	9.44		ug/L		94	72 - 126
Trichloroethene	10.0	10.1		ug/L		101	79 - 120
1,2-Dichloropropane	10.0	9.61		ug/L		96	78 - 123
Bromodichloromethane	10.0	9.80		ug/L		98	72 - 124
cis-1,3-Dichloropropene	10.0	9.97		ug/L		100	67 - 127
4-Methyl-2-pentanone (MIBK)	20.0	20.7		ug/L		104	49 - 147
Toluene	10.0	10.8		ug/L		108	80 - 125
trans-1,3-Dichloropropene	10.0	9.49		ug/L		95	63 - 144
1,1,2-Trichloroethane	10.0	10.4		ug/L		104	77 - 127
Tetrachloroethene	10.0	10.6		ug/L		106	80 - 122
2-Hexanone	20.0	24.4		ug/L		122	40 - 150
Dibromochloromethane	10.0	9.88		ug/L		99	71 - 134
1,2-Dibromoethane (EDB)	10.0	10.6		ug/L		106	79 - 126
Chlorobenzene	10.0	10.8		ug/L		108	80 - 120
1,1,1,2-Tetrachloroethane	10.0	10.7		ug/L		107	75 - 135
Ethylbenzene	10.0	11.1		ug/L		111	80 - 123
Xylenes, Total	20.0	22.0		ug/L		110	80 - 123
Styrene	10.0	10.8		ug/L		108	80 - 125
Bromoform	10.0	10.2		ug/L		102	62 - 138
1,1,2,2-Tetrachloroethane	10.0	10.6		ug/L		106	78 - 135
Acrylonitrile	100	96.7		ug/L		97	66 - 146
1,4-Dioxane	200	148	J	ug/L		74	10 - 150

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
1,2-Dichloroethane-d4 (Surr)	*91*		*72 - 134*
Toluene-d8 (Surr)	*105*		*80 - 120*
4-Bromofluorobenzene (Surr)	*103*		*72 - 120*
Dibromofluoromethane (Surr)	*99*		*77 - 127*

Method: 8270D LL - Semivolatile Organic Compounds by GC/MS - Low Level

Lab Sample ID: MB 180-191579/1-A
Matrix: Water
Analysis Batch: 191892

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 191579

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,4-Dioxane	2.0	U	2.0	0.052	ug/L		10/18/16 16:04	10/21/16 12:17	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
2-Fluorobiphenyl	*56*		*24 - 100*	*10/18/16 16:04*	*10/21/16 12:17*	*1*
2-Fluorophenol (Surr)	*61*		*20 - 100*	*10/18/16 16:04*	*10/21/16 12:17*	*1*
2,4,6-Tribromophenol (Surr)	*63*		*22 - 118*	*10/18/16 16:04*	*10/21/16 12:17*	*1*
Nitrobenzene-d5 (Surr)	*59*		*25 - 105*	*10/18/16 16:04*	*10/21/16 12:17*	*1*
Phenol-d5 (Surr)	*60*		*21 - 100*	*10/18/16 16:04*	*10/21/16 12:17*	*1*
Terphenyl-d14 (Surr)	*56*		*20 - 124*	*10/18/16 16:04*	*10/21/16 12:17*	*1*

Lab Sample ID: LCS 180-191579/2-A
Matrix: Water
Analysis Batch: 191892

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 191579

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits		
1,4-Dioxane			20.0	13.1		ug/L		65	25 - 106		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
2-Fluorobiphenyl	*56*		*24 - 100*
2-Fluorophenol (Surr)	*67*		*20 - 100*
2,4,6-Tribromophenol (Surr)	*64*		*22 - 118*
Nitrobenzene-d5 (Surr)	*62*		*25 - 105*
Phenol-d5 (Surr)	*64*		*21 - 100*
Terphenyl-d14 (Surr)	*59*		*20 - 124*

Lab Sample ID: LCSD 180-191579/3-A
Matrix: Water
Analysis Batch: 191892

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 191579

Analyte			Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec. Limits	RPD	RPD Limit
1,4-Dioxane			20.0	13.0		ug/L		65	25 - 106	1	16

Surrogate	*LCSD %Recovery*	*LCSD Qualifier*	*Limits*
2-Fluorobiphenyl	*58*		*24 - 100*
2-Fluorophenol (Surr)	*67*		*20 - 100*
2,4,6-Tribromophenol (Surr)	*65*		*22 - 118*
Nitrobenzene-d5 (Surr)	*62*		*25 - 105*
Phenol-d5 (Surr)	*64*		*21 - 100*
Terphenyl-d14 (Surr)	*60*		*20 - 124*

GC/MS VOA

Analysis Batch: 191289

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
180-59749-1	HD-QC6-0/1-2	Total/NA	Water	8260C	
180-59749-2	HD-MW-57-0/1-0	Total/NA	Water	8260C	
180-59749-3	HD-MW-129-0/1-0	Total/NA	Water	8260C	
180-59749-4	HD-MW-127-0/1-0	Total/NA	Water	8260C	
180-59749-5	HD-MW-87-0/1-0	Total/NA	Water	8260C	
MB 180-191289/6	Method Blank	Total/NA	Water	8260C	
LCS 180-191289/9	Lab Control Sample	Total/NA	Water	8260C	

Analysis Batch: 191520

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
180-59749-3 - DL	HD-MW-129-0/1-0	Total/NA	Water	8260C	
180-59749-6	HD-MW-88-0/1-0	Total/NA	Water	8260C	
MB 180-191520/4	Method Blank	Total/NA	Water	8260C	
LCS 180-191520/9	Lab Control Sample	Total/NA	Water	8260C	

Analysis Batch: 191652

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
180-59749-6 - DL	HD-MW-88-0/1-0	Total/NA	Water	8260C	
180-59749-7	HD-MW-12-0/1-0	Total/NA	Water	8260C	
MB 180-191652/4	Method Blank	Total/NA	Water	8260C	
LCS 180-191652/7	Lab Control Sample	Total/NA	Water	8260C	

GC/MS Semi VOA

Prep Batch: 191579

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
180-59749-4	HD-MW-127-0/1-0	Total/NA	Water	3520C	
180-59749-5	HD-MW-87-0/1-0	Total/NA	Water	3520C	
MB 180-191579/1-A	Method Blank	Total/NA	Water	3520C	
LCS 180-191579/2-A	Lab Control Sample	Total/NA	Water	3520C	
LCSD 180-191579/3-A	Lab Control Sample Dup	Total/NA	Water	3520C	

Analysis Batch: 191892

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
180-59749-4	HD-MW-127-0/1-0	Total/NA	Water	8270D LL	191579
180-59749-5	HD-MW-87-0/1-0	Total/NA	Water	8270D LL	191579
MB 180-191579/1-A	Method Blank	Total/NA	Water	8270D LL	191579
LCS 180-191579/2-A	Lab Control Sample	Total/NA	Water	8270D LL	191579
LCSD 180-191579/3-A	Lab Control Sample Dup	Total/NA	Water	8270D LL	191579

Client Sample ID: HD-QC6-0/1-2

Lab Sample ID: 180-59749-1

Date Collected: 10/12/16 12:00

Matrix: Water

Date Received: 10/13/16 16:58

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	5 mL	5 mL	191289	10/15/16 22:57	DLF	TAL PIT
	Instrument ID: CHHP5									

Client Sample ID: HD-MW-57-0/1-0

Lab Sample ID: 180-59749-2

Date Collected: 10/12/16 09:15

Matrix: Water

Date Received: 10/13/16 16:58

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	5 mL	5 mL	191289	10/15/16 23:21	DLF	TAL PIT
	Instrument ID: CHHP5									

Client Sample ID: HD-MW-129-0/1-0

Lab Sample ID: 180-59749-3

Date Collected: 10/12/16 10:20

Matrix: Water

Date Received: 10/13/16 16:58

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		10	5 mL	5 mL	191289	10/15/16 23:45	DLF	TAL PIT
	Instrument ID: CHHP5									
Total/NA	Analysis	8260C	DL	250	5 mL	5 mL	191520	10/18/16 18:40	DLF	TAL PIT
	Instrument ID: CHHP5									

Client Sample ID: HD-MW-127-0/1-0

Lab Sample ID: 180-59749-4

Date Collected: 10/12/16 09:55

Matrix: Water

Date Received: 10/13/16 16:58

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		10	5 mL	5 mL	191289	10/16/16 00:33	DLF	TAL PIT
	Instrument ID: CHHP5									
Total/NA	Prep	3520C			270 mL	0.25 mL	191579	10/18/16 16:04	BJT	TAL PIT
Total/NA	Analysis	8270D LL		1	1 mL	1 mL	191892	10/21/16 19:28	VVP	TAL PIT
	Instrument ID: CH732									

Client Sample ID: HD-MW-87-0/1-0

Lab Sample ID: 180-59749-5

Date Collected: 10/12/16 11:50

Matrix: Water

Date Received: 10/13/16 16:58

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		10	5 mL	5 mL	191289	10/16/16 00:57	DLF	TAL PIT
	Instrument ID: CHHP5									
Total/NA	Prep	3520C			270 mL	0.25 mL	191579	10/18/16 16:04	BJT	TAL PIT
Total/NA	Analysis	8270D LL		1	1 mL	1 mL	191892	10/21/16 19:51	VVP	TAL PIT
	Instrument ID: CH732									

Lab Chronicle

Client: Groundwater Sciences Corporation
Project/Site: Harley Davidson

TestAmerica Job ID: 180-59749-1

Client Sample ID: HD-MW-88-0/1-0

Date Collected: 10/12/16 13:52
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-6

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		1	5 mL	5 mL	191520	10/18/16 19:05	DLF	TAL PIT
	Instrument ID: CHHP5									
Total/NA	Analysis	8260C	DL	2	5 mL	5 mL	191652	10/19/16 21:22	DLF	TAL PIT
	Instrument ID: CHHP6									

Client Sample ID: HD-MW-12-0/1-0

Date Collected: 10/12/16 11:45
Date Received: 10/13/16 16:58

Lab Sample ID: 180-59749-7

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	8260C		3	5 mL	5 mL	191652	10/19/16 21:46	DLF	TAL PIT
	Instrument ID: CHHP6									

Laboratory References:

TAL PIT = TestAmerica Pittsburgh, 301 Alpha Drive, RIDC Park, Pittsburgh, PA 15238, TEL (412)963-7058

Analyst References:

Lab: TAL PIT

Batch Type: Prep

BJT = Bill Trout

Batch Type: Analysis

DLF = Donald Ferguson

VVP = Vincent Piccolino

Certification Summary

Client: Groundwater Sciences Corporation
Project/Site: Harley Davidson

TestAmerica Job ID: 180-59749-1

Laboratory: TestAmerica Pittsburgh

The certifications listed below are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
Pennsylvania	NELAP	3	02-00416	04-30-17

Method Summary

Client: Groundwater Sciences Corporation
Project/Site: Harley Davidson

TestAmerica Job ID: 180-59749-1

Method	Method Description	Protocol	Laboratory
8260C	Volatile Organic Compounds (GC/MS)	SW846	TAL PIT
8270D LL	Semivolatile Organic Compounds by GC/MS - Low Level	SW846	TAL PIT

Protocol References:

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

Laboratory References:

TAL PIT = TestAmerica Pittsburgh, 301 Alpha Drive, RIDC Park, Pittsburgh, PA 15238, TEL (412)963-7058

Sample Summary

Client: Groundwater Sciences Corporation
Project/Site: Harley Davidson

TestAmerica Job ID: 180-59749-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
180-59749-1	HD-QC6-0/1-2	Water	10/12/16 12:00	10/13/16 16:58
180-59749-2	HD-MW-57-0/1-0	Water	10/12/16 09:15	10/13/16 16:58
180-59749-3	HD-MW-129-0/1-0	Water	10/12/16 10:20	10/13/16 16:58
180-59749-4	HD-MW-127-0/1-0	Water	10/12/16 09:55	10/13/16 16:58
180-59749-5	HD-MW-87-0/1-0	Water	10/12/16 11:50	10/13/16 16:58
180-59749-6	HD-MW-88-0/1-0	Water	10/12/16 13:52	10/13/16 16:58
180-59749-7	HD-MW-12-0/1-0	Water	10/12/16 11:45	10/13/16 16:58

GC/MS VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP5 Analysis Batch Number: 189445

Lab Sample ID: ICIS 180-189445/6 Client Sample ID:

Date Analyzed: 09/28/16 14:51 Lab File ID: 50928006.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Isobutyl alcohol	6.93	Incomplete Integration	fergusond	09/29/16 08:24
1,4-Dioxane	8.02	Incomplete Integration	fergusond	09/29/16 08:24

Lab Sample ID: IC 180-189445/7 Client Sample ID:

Date Analyzed: 09/28/16 15:15 Lab File ID: 50928007.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
2,2-Dichloropropane	5.94	Poor chromatography	fergusond	09/29/16 09:04
1,4-Dioxane	8.02	Incomplete Integration	fergusond	09/29/16 09:04

Lab Sample ID: IC 180-189445/8 Client Sample ID:

Date Analyzed: 09/28/16 15:39 Lab File ID: 50928008.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
2,2-Dichloropropane	5.93	Poor chromatography	fergusond	09/29/16 09:09

Lab Sample ID: IC 180-189445/9 Client Sample ID:

Date Analyzed: 09/28/16 16:03 Lab File ID: 50928009.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
2,2-Dichloropropane	5.94	Poor chromatography	fergusond	09/29/16 09:13
1,4-Dioxane	8.02	Poor chromatography	fergusond	09/29/16 09:13

GC/MS VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP5 Analysis Batch Number: 189445

Lab Sample ID: IC 180-189445/10 Client Sample ID:

Date Analyzed: 09/28/16 16:27 Lab File ID: 50928010.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
2,2-Dichloropropane	5.94	Poor chromatography	fergusond	09/29/16 09:21
Isobutyl alcohol	6.93	Poor chromatography	fergusond	09/29/16 09:21

Lab Sample ID: IC 180-189445/11 Client Sample ID:

Date Analyzed: 09/28/16 16:51 Lab File ID: 50928011.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
2,2-Dichloropropane	5.94	Poor chromatography	fergusond	09/29/16 09:23
4-Methyl-2-pentanone (MIBK)	8.82	Peak Tail	fergusond	09/29/16 09:28

Lab Sample ID: IC 180-189445/15 Client Sample ID:

Date Analyzed: 09/28/16 18:27 Lab File ID: 50928015.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
2,2-Dichloropropane	5.94	Poor chromatography	fergusond	09/29/16 11:02
Isobutyl alcohol	6.93	Poor chromatography	fergusond	09/29/16 11:02

GC/MS VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP5 Analysis Batch Number: 191289

Lab Sample ID: 180-59749-3 Client Sample ID: HD-MW-129-0/1-0

Date Analyzed: 10/15/16 23:45 Lab File ID: 51015028.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Chloroform	6.37	Incomplete Integration	fergusond	10/17/16 08:21

Lab Sample ID: 180-59749-5 Client Sample ID: HD-MW-87-0/1-0

Date Analyzed: 10/16/16 00:57 Lab File ID: 51015031.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Chloroform	6.36	Incomplete Integration	fergusond	10/17/16 08:29

GC/MS VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP5 Analysis Batch Number: 191520

Lab Sample ID: CCVIS 180-191520/2 Client Sample ID:

Date Analyzed: 10/18/16 12:14 Lab File ID: 51018002.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Trichlorofluoromethane	2.68	Incomplete Integration	fergusond	10/18/16 13:14
1,4-Dioxane	8.01	Incomplete Integration	fergusond	10/18/16 13:14

Lab Sample ID: MB 180-191520/4 Client Sample ID:

Date Analyzed: 10/18/16 13:17 Lab File ID: 51018004.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Methylene Chloride	4.13	Incomplete Integration	fergusond	10/18/16 13:39

GC/MS VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP6 Analysis Batch Number: 191498

Lab Sample ID: IC 180-191498/6 Client Sample ID:

Date Analyzed: 10/17/16 14:23 Lab File ID: 61017006.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Dichlorofluoromethane	2.59	Incomplete Integration	fergusond	10/18/16 09:55
Allyl chloride	3.80	Incomplete Integration	fergusond	10/18/16 09:55
Vinyl acetate	5.12	Incomplete Integration	fergusond	10/18/16 09:55
1,2-Dichloropropane	7.84	Incomplete Integration	fergusond	10/18/16 09:55
1,4-Dioxane	7.94	Poor chromatography	fergusond	10/18/16 09:55

Lab Sample ID: IC 180-191498/7 Client Sample ID:

Date Analyzed: 10/17/16 14:48 Lab File ID: 61017007.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Dichlorodifluoromethane	1.54	Poor chromatography	fergusond	10/18/16 10:03
Isobutyl alcohol	6.82	Incomplete Integration	fergusond	10/18/16 10:03
1,4-Dioxane	7.93	Incomplete Integration	fergusond	10/18/16 10:03

Lab Sample ID: IC 180-191498/10 Client Sample ID:

Date Analyzed: 10/17/16 16:01 Lab File ID: 61017010.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
1,4-Dioxane	7.93	Incomplete Integration	fergusond	10/18/16 10:09

Lab Sample ID: IC 180-191498/12 Client Sample ID:

Date Analyzed: 10/17/16 16:49 Lab File ID: 61017012.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
1,4-Dioxane	7.93	Incomplete Integration	fergusond	10/18/16 10:15

GC/MS VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP6 Analysis Batch Number: 191498

Lab Sample ID: IC 180-191498/13 Client Sample ID:

Date Analyzed: 10/17/16 17:13 Lab File ID: 61017013.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
1,4-Dioxane	7.93	Incomplete Integration	fergusond	10/18/16 10:20

GC/MS VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP6 Analysis Batch Number: 191652

Lab Sample ID: CCVIS 180-191652/2 Client Sample ID:

Date Analyzed: 10/19/16 10:44 Lab File ID: 61019002.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Trichlorofluoromethane	2.59	Incomplete Integration	fergusond	10/19/16 11:08

Lab Sample ID: 180-59749-7 Client Sample ID: HD-MW-12-0/1-0

Date Analyzed: 10/19/16 21:46 Lab File ID: 61019028.D GC Column: DB-624 ID: 0.18(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Acetone	3.33	Incomplete Integration	fergusond	10/20/16 07:57

GC/MS SEMI VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CH732 Analysis Batch Number: 189377

Lab Sample ID: IC 180-189377/3 Client Sample ID:

Date Analyzed: 09/28/16 05:28 Lab File ID: D09280003.D GC Column: Rxi-5SilMS ID: 0.32(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
1,4-Dioxane	1.57	Poor chromatography	piccolinov	09/28/16 06:56
N-Nitrosodimethylamine	2.19	Poor chromatography	piccolinov	09/28/16 06:56
Pyridine	2.31	Poor chromatography	piccolinov	09/28/16 06:56
Methyl methanesulfonate	4.49	Poor chromatography	piccolinov	09/28/16 06:56
Dibenz(a,h)anthracene	19.53	Poor chromatography	piccolinov	09/28/16 06:56
Benzo[g,h,i]perylene	20.15	Poor chromatography	piccolinov	09/28/16 06:56

Lab Sample ID: IC 180-189377/4 Client Sample ID:

Date Analyzed: 09/28/16 05:55 Lab File ID: D09280004.D GC Column: Rxi-5SilMS ID: 0.32(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Pyridine	2.23	Poor chromatography	piccolinov	09/28/16 07:01

Lab Sample ID: IC 180-189377/5 Client Sample ID:

Date Analyzed: 09/28/16 06:22 Lab File ID: D09280005.D GC Column: Rxi-5SilMS ID: 0.32(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Benzoic acid	7.13	Poor chromatography	piccolinov	09/28/16 07:03

GC/MS SEMI VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CH732 Analysis Batch Number: 189377

Lab Sample ID: IC 180-189377/8 Client Sample ID:

Date Analyzed: 09/28/16 07:44 Lab File ID: D09280008.D GC Column: Rxi-5SilMS ID: 0.32(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Indeno[1,2,3-cd]pyrene	19.57	Poor chromatography	piccolinov	09/28/16 08:13

GC/MS SEMI VOA MANUAL INTEGRATION SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CH732 Analysis Batch Number: 191892

Lab Sample ID: CCVIS 180-191892/3 Client Sample ID:

Date Analyzed: 10/21/16 11:50 Lab File ID: D10210003.D GC Column: Rxi-5SilMS ID: 0.32(mm)

COMPOUND NAME	RETENTION TIME	MANUAL INTEGRATION		
		REASON	ANALYST	DATE
Indeno[1,2,3-cd]pyrene	19.66	Poor chromatography	piccolinov	10/21/16 12:15
Benzo[g,h,i]perylene	20.35	Poor chromatography	piccolinov	10/21/16 12:15

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
OPLVISPKMIX1i_00052	01/31/17	08/04/16	Methanol, Lot 0000082533	250 mL	SVLVstd1_00039	50 mL	1,1'-Biphenyl	200 ug/mL
							1,2,4,5-Tetrachlorobenzene	200 ug/mL
							1,2,4-Trichlorobenzene	200 ug/mL
							1,2-Dichlorobenzene	200 ug/mL
							1,2-Diphenylhydrazine	200 ug/mL
							1,3-Dichlorobenzene	200 ug/mL
							1,3-Dinitrobenzene	200 ug/mL
							1,4-Dichlorobenzene	200 ug/mL
							1,4-Dioxane	200 ug/mL
							1-Methylnaphthalene	200 ug/mL
							2,2'-oxybis[1-chloropropane]	200 ug/mL
							2,3,4,6-Tetrachlorophenol	200 ug/mL
							2,4,5-Trichlorophenol	200 ug/mL
							2,4,6-Trichlorophenol	200 ug/mL
							2,4-Dichlorophenol	200 ug/mL
							2,4-Dimethylphenol	200 ug/mL
							2,4-Dinitrophenol	400 ug/mL
							2,4-Dinitrotoluene	200 ug/mL
							2,6-Dichlorophenol	200 ug/mL
							2,6-Dinitrotoluene	200 ug/mL
							2-Chloronaphthalene	200 ug/mL
							2-Chlorophenol	200 ug/mL
							2-Methylnaphthalene	200 ug/mL
							2-Methylphenol	200 ug/mL
							2-Nitroaniline	200 ug/mL
							2-Nitrophenol	200 ug/mL
							3 & 4 Methylphenol	200 ug/mL
							3-Nitroaniline	200 ug/mL
							4,6-Dinitro-2-methylphenol	400 ug/mL
							4-Bromophenyl phenyl ether	200 ug/mL
							4-Chloro-3-methylphenol	200 ug/mL
							4-Chloroaniline	200 ug/mL
							4-Chlorophenyl phenyl ether	200 ug/mL
							4-Methylphenol	200 ug/mL
							4-Nitroaniline	200 ug/mL
							4-Nitrophenol	400 ug/mL
							Acenaphthene	200 ug/mL
							Acenaphthylene	200 ug/mL
							Acetophenone	200 ug/mL
							Aniline	200 ug/mL
							Anthracene	200 ug/mL
							Azobenzene	200 ug/mL
							Benzo[a]anthracene	200 ug/mL
							Benzo[a]pyrene	200 ug/mL
							Benzo[b]fluoranthene	200 ug/mL
							Benzo[g,h,i]perylene	200 ug/mL
							Benzo[k]fluoranthene	200 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Benzyl alcohol	200 ug/mL
							Bis(2-chloroethoxy)methane	200 ug/mL
							Bis(2-chloroethyl)ether	200 ug/mL
							Bis(2-ethylhexyl) phthalate	200 ug/mL
							Butyl benzyl phthalate	200 ug/mL
							Carbazole	200 ug/mL
							Chrysene	200 ug/mL
							Di-n-butyl phthalate	200 ug/mL
							Di-n-octyl phthalate	200 ug/mL
							Dibenz(a,h)anthracene	200 ug/mL
							Dibenzofuran	200 ug/mL
							Diethyl phthalate	200 ug/mL
							Dimethyl phthalate	200 ug/mL
							Fluoranthene	200 ug/mL
							Fluorene	200 ug/mL
							Hexachlorobenzene	200 ug/mL
							Hexachlorobutadiene	200 ug/mL
							Hexachlorocyclopentadiene	200 ug/mL
							Hexachloroethane	200 ug/mL
							Hexadecane	200 ug/mL
							Indeno[1,2,3-cd]pyrene	200 ug/mL
							Isophorone	200 ug/mL
							Methyl Phenols,Total	400 ug/mL
							n-Decane	200 ug/mL
							N-Nitrosodi-n-propylamine	200 ug/mL
							N-Nitrosodimethylamine	200 ug/mL
							N-Nitrosodiphenylamine	200 ug/mL
							n-Octadecane	200 ug/mL
							Naphthalene	200 ug/mL
							Nitrobenzene	200 ug/mL
							Pentachlorophenol	400 ug/mL
							Phenanthrene	200 ug/mL
							Phenol	200 ug/mL
							Pyrene	200 ug/mL
							Pyridine	200 ug/mL
							Total Cresols	400 ug/mL
					SVLVstd10_00005	25 mL	Benzoic acid	200 ug/mL
							Indene	200 ug/mL
					SVLVstd11_00005	25 mL	Atrazine	200 ug/mL
							Benzaldehyde	200 ug/mL
							Caprolactam	200 ug/mL
					SVLVstd9_00004	25 mL	3,3'-Dichlorobenzidine	200 ug/mL
							Benzidine	200 ug/mL
.SVLVstd1_00039	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3 & 4 Methylphenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Azobenzene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							Methyl Phenols,Total	2000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
							Total Cresols	2000 ug/mL
.SVLVstd10_00005	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
.SVLVstd11_00005	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
.SVLVstd9_00004	01/31/17		Restek, Lot A0112567		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
OPQL8270SURi_00048	03/24/17	09/24/16	Methanol, Lot b#00000118655	500 mL	SVLVSURSPK_00002	20 mL	2,4,6-Tribromophenol (Surr)	200 ug/mL
							2-Fluorobiphenyl	200 ug/mL
							2-Fluorophenol (Surr)	200 ug/mL
							Nitrobenzene-d5 (Surr)	200 ug/mL
							Phenol-d5 (Surr)	200 ug/mL
							Terphenyl-d14 (Surr)	200 ug/mL
.SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
.SVLVIntstd_00004	02/28/18		Restek, Lot A093676		(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
SVTAPSTD0.38i_00001	03/14/17	09/24/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	4.75 uL	Benzo[e]pyrene	0.19 ug/mL
							2,3,5,6-Tetrachlorophenol	0.19 ug/mL
							2-Naphthylamine	0.19 ug/mL
							7,12-Dimethylbenz(a)anthracene	0.19 ug/mL
							1,1'-Biphenyl	0.19 ug/mL
							1,2,4,5-Tetrachlorobenzene	0.19 ug/mL
							1,2,4-Trichlorobenzene	0.19 ug/mL
							1,2-Dichlorobenzene	0.19 ug/mL
							1,2-Diphenylhydrazine	0.19 ug/mL
							1,3-Dichlorobenzene	0.19 ug/mL
							1,3-Dinitrobenzene	0.19 ug/mL
							1,4-Dichlorobenzene	0.19 ug/mL
							1,4-Dioxane	0.19 ug/mL
							1-Methylnaphthalene	0.19 ug/mL
							2,2'-oxybis[1-chloropropane]	0.19 ug/mL
							2,3,4,6-Tetrachlorophenol	0.19 ug/mL
							2,4,5-Trichlorophenol	0.19 ug/mL
							2,4,6-Trichlorophenol	0.19 ug/mL
							2,4-Dichlorophenol	0.19 ug/mL
							2,4-Dimethylphenol	0.19 ug/mL
							2,4-Dinitrophenol	0.38 ug/mL
							2,4-Dinitrotoluene	0.19 ug/mL
							2,6-Dichlorophenol	0.19 ug/mL
							2,6-Dinitrotoluene	0.19 ug/mL
							2-Chloronaphthalene	0.19 ug/mL
							2-Chlorophenol	0.19 ug/mL
							2-Methylnaphthalene	0.19 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2-Methylphenol	0.19 ug/mL
							2-Nitroaniline	0.19 ug/mL
							2-Nitrophenol	0.19 ug/mL
							3-Nitroaniline	0.19 ug/mL
							4,6-Dinitro-2-methylphenol	0.38 ug/mL
							4-Bromophenyl phenyl ether	0.19 ug/mL
							4-Chloro-3-methylphenol	0.19 ug/mL
							4-Chloroaniline	0.19 ug/mL
							4-Chlorophenyl phenyl ether	0.19 ug/mL
							4-Methylphenol	0.19 ug/mL
							4-Nitroaniline	0.19 ug/mL
							4-Nitrophenol	0.38 ug/mL
							Acenaphthene	0.19 ug/mL
							Acenaphthylene	0.19 ug/mL
							Acetophenone	0.19 ug/mL
							Aniline	0.19 ug/mL
							Anthracene	0.19 ug/mL
							Benzo[a]anthracene	0.19 ug/mL
							Benzo[a]pyrene	0.19 ug/mL
							Benzo[b]fluoranthene	0.19 ug/mL
							Benzo[g,h,i]perylene	0.19 ug/mL
							Benzo[k]fluoranthene	0.19 ug/mL
							Benzyl alcohol	0.19 ug/mL
							Bis(2-chloroethoxy)methane	0.19 ug/mL
							Bis(2-chloroethyl)ether	0.19 ug/mL
							Bis(2-ethylhexyl) phthalate	0.19 ug/mL
							Butyl benzyl phthalate	0.19 ug/mL
							Carbazole	0.19 ug/mL
							Chrysene	0.19 ug/mL
							Di-n-butyl phthalate	0.19 ug/mL
							Di-n-octyl phthalate	0.19 ug/mL
							Dibenz(a,h)anthracene	0.19 ug/mL
							Dibenzofuran	0.19 ug/mL
							Diethyl phthalate	0.19 ug/mL
							Dimethyl phthalate	0.19 ug/mL
							Fluoranthene	0.19 ug/mL
							Fluorene	0.19 ug/mL
							Hexachlorobenzene	0.19 ug/mL
							Hexachlorobutadiene	0.19 ug/mL
							Hexachlorocyclopentadiene	0.19 ug/mL
							Hexachloroethane	0.19 ug/mL
							Hexadecane	0.19 ug/mL
							Indeno[1,2,3-cd]pyrene	0.19 ug/mL
							Isophorone	0.19 ug/mL
							n-Decane	0.19 ug/mL
							N-Nitrosodi-n-propylamine	0.19 ug/mL
							N-Nitrosodimethylamine	0.19 ug/mL
							N-Nitrosodiphenylamine	0.19 ug/mL

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							n-Octadecane	0.19 ug/mL
							Naphthalene	0.19 ug/mL
							Nitrobenzene	0.19 ug/mL
							Pentachlorophenol	0.38 ug/mL
							Phenanthrene	0.19 ug/mL
							Phenol	0.19 ug/mL
							Pyrene	0.19 ug/mL
							Pyridine	0.19 ug/mL
							Benzoic acid	0.19 ug/mL
							Indene	0.19 ug/mL
							Atrazine	0.19 ug/mL
							Benzaldehyde	0.19 ug/mL
							Caprolactam	0.19 ug/mL
							3,3'-Dichlorobenzidine	0.19 ug/mL
							Benzidine	0.19 ug/mL
							2,4,6-Tribromophenol (Surr)	0.19 ug/mL
							2-Fluorobiphenyl	0.19 ug/mL
							2-Fluorophenol (Surr)	0.19 ug/mL
							Nitrobenzene-d5 (Surr)	0.19 ug/mL
							Phenol-d5 (Surr)	0.19 ug/mL
							Terphenyl-d14 (Surr)	0.19 ug/mL
							Methyl methanesulfonate	0.19 ug/mL
							N-Nitrosopyrrolidine	0.19 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18	Restek, Lot A093676			(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
SVTAPSTD10i_00187	10/01/16	09/24/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	125 uL	Benzo[e]pyrene	5 ug/mL
							2,3,5,6-Tetrachlorophenol	5 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2-Naphthylamine	5 ug/mL
							7,12-Dimethylbenz(a)anthracene	5 ug/mL
							1,1'-Biphenyl	5 ug/mL
							1,2,4,5-Tetrachlorobenzene	5 ug/mL
							1,2,4-Trichlorobenzene	5 ug/mL
							1,2-Dichlorobenzene	5 ug/mL
							1,2-Diphenylhydrazine	5 ug/mL
							1,3-Dichlorobenzene	5 ug/mL
							1,3-Dinitrobenzene	5 ug/mL
							1,4-Dichlorobenzene	5 ug/mL
							1,4-Dioxane	5 ug/mL
							1-Methylnaphthalene	5 ug/mL
							2,2'-oxybis[1-chloropropane]	5 ug/mL
							2,3,4,6-Tetrachlorophenol	5 ug/mL
							2,4,5-Trichlorophenol	5 ug/mL
							2,4,6-Trichlorophenol	5 ug/mL
							2,4-Dichlorophenol	5 ug/mL
							2,4-Dimethylphenol	5 ug/mL
							2,4-Dinitrophenol	10 ug/mL
							2,4-Dinitrotoluene	5 ug/mL
							2,6-Dichlorophenol	5 ug/mL
							2,6-Dinitrotoluene	5 ug/mL
							2-Chloronaphthalene	5 ug/mL
							2-Chlorophenol	5 ug/mL
							2-Methylnaphthalene	5 ug/mL
							2-Methylphenol	5 ug/mL
							2-Nitroaniline	5 ug/mL
							2-Nitrophenol	5 ug/mL
							3-Nitroaniline	5 ug/mL
							4,6-Dinitro-2-methylphenol	10 ug/mL
							4-Bromophenyl phenyl ether	5 ug/mL
							4-Chloro-3-methylphenol	5 ug/mL
							4-Chloroaniline	5 ug/mL
							4-Chlorophenyl phenyl ether	5 ug/mL
							4-Methylphenol	5 ug/mL
							4-Nitroaniline	5 ug/mL
							4-Nitrophenol	10 ug/mL
							Acenaphthene	5 ug/mL
							Acenaphthylene	5 ug/mL
							Acetophenone	5 ug/mL
							Aniline	5 ug/mL
							Anthracene	5 ug/mL
							Benzo[a]anthracene	5 ug/mL
							Benzo[a]pyrene	5 ug/mL
							Benzo[b]fluoranthene	5 ug/mL
							Benzo[g,h,i]perylene	5 ug/mL
							Benzo[k]fluoranthene	5 ug/mL
							Benzyl alcohol	5 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Bis(2-chloroethoxy)methane	5 ug/mL
							Bis(2-chloroethyl)ether	5 ug/mL
							Bis(2-ethylhexyl) phthalate	5 ug/mL
							Butyl benzyl phthalate	5 ug/mL
							Carbazole	5 ug/mL
							Chrysene	5 ug/mL
							Di-n-butyl phthalate	5 ug/mL
							Di-n-octyl phthalate	5 ug/mL
							Dibenz(a,h)anthracene	5 ug/mL
							Dibenzofuran	5 ug/mL
							Diethyl phthalate	5 ug/mL
							Dimethyl phthalate	5 ug/mL
							Fluoranthene	5 ug/mL
							Fluorene	5 ug/mL
							Hexachlorobenzene	5 ug/mL
							Hexachlorobutadiene	5 ug/mL
							Hexachlorocyclopentadiene	5 ug/mL
							Hexachloroethane	5 ug/mL
							Hexadecane	5 ug/mL
							Indeno[1,2,3-cd]pyrene	5 ug/mL
							Isophorone	5 ug/mL
							n-Decane	5 ug/mL
							N-Nitrosodi-n-propylamine	5 ug/mL
							N-Nitrosodimethylamine	5 ug/mL
							N-Nitrosodiphenylamine	5 ug/mL
							n-Octadecane	5 ug/mL
							Naphthalene	5 ug/mL
							Nitrobenzene	5 ug/mL
							Pentachlorophenol	10 ug/mL
							Phenanthrene	5 ug/mL
							Phenol	5 ug/mL
							Pyrene	5 ug/mL
							Pyridine	5 ug/mL
							Benzoic acid	5 ug/mL
							Indene	5 ug/mL
							Atrazine	5 ug/mL
							Benzaldehyde	5 ug/mL
							Caprolactam	5 ug/mL
							3,3'-Dichlorobenzidine	5 ug/mL
							Benzidine	5 ug/mL
							2,4,6-Tribromophenol (Surr)	5 ug/mL
							2-Fluorobiphenyl	5 ug/mL
							2-Fluorophenol (Surr)	5 ug/mL
							Nitrobenzene-d5 (Surr)	5 ug/mL
							Phenol-d5 (Surr)	5 ug/mL
							Terphenyl-d14 (Surr)	5 ug/mL
							Methyl methanesulfonate	5 ug/mL
							N-Nitrosopyrrolidine	5 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18		Restek, Lot A093676		(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
SVTAPSTD10i_00192	10/24/16	10/17/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18		Restek, Lot A093676		(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
SVTAPSTD10i_00192	10/24/16	10/17/16	MeCl2, Lot 2022771	1 mL	SVTAPITSTCKi_00015	125 uL	1,4-Dioxane	5 ug/mL
							2,4,6-Tribromophenol (Surr)	5 ug/mL
							2-Fluorobiphenyl	5 ug/mL
							2-Fluorophenol (Surr)	5 ug/mL
							Nitrobenzene-d5 (Surr)	5 ug/mL
							Phenol-d5 (Surr)	5 ug/mL
							Terphenyl-d14 (Surr)	5 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	SVLVstd1_00041	800 uL	1,4-Dioxane	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Terphenyl-d14 (Surr)	40 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,4-Dioxane	1000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
SVTAPSTD2.0i_00011	03/24/17	09/14/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	25 uL	Benzo[e]pyrene	1 ug/mL
							2,3,5,6-Tetrachlorophenol	1 ug/mL
							2-Naphthylamine	1 ug/mL
							7,12-Dimethylbenz(a)anthracene	1 ug/mL
							1,1'-Biphenyl	1 ug/mL
							1,2,4,5-Tetrachlorobenzene	1 ug/mL
							1,2,4-Trichlorobenzene	1 ug/mL
							1,2-Dichlorobenzene	1 ug/mL
							1,2-Diphenylhydrazine	1 ug/mL
							1,3-Dichlorobenzene	1 ug/mL
							1,3-Dinitrobenzene	1 ug/mL
							1,4-Dichlorobenzene	1 ug/mL
							1,4-Dioxane	1 ug/mL
							1-Methylnaphthalene	1 ug/mL
							2,2'-oxybis[1-chloropropane]	1 ug/mL
							2,3,4,6-Tetrachlorophenol	1 ug/mL
							2,4,5-Trichlorophenol	1 ug/mL
							2,4,6-Trichlorophenol	1 ug/mL
							2,4-Dichlorophenol	1 ug/mL
							2,4-Dimethylphenol	1 ug/mL
							2,4-Dinitrophenol	2 ug/mL
							2,4-Dinitrotoluene	1 ug/mL
							2,6-Dichlorophenol	1 ug/mL
							2,6-Dinitrotoluene	1 ug/mL
							2-Chloronaphthalene	1 ug/mL
							2-Chlorophenol	1 ug/mL
							2-Methylnaphthalene	1 ug/mL
							2-Methylphenol	1 ug/mL
							2-Nitroaniline	1 ug/mL
							2-Nitrophenol	1 ug/mL
							3-Nitroaniline	1 ug/mL
							4,6-Dinitro-2-methylphenol	2 ug/mL
							4-Bromophenyl phenyl ether	1 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4-Chloro-3-methylphenol	1 ug/mL
							4-Chloroaniline	1 ug/mL
							4-Chlorophenyl phenyl ether	1 ug/mL
							4-Methylphenol	1 ug/mL
							4-Nitroaniline	1 ug/mL
							4-Nitrophenol	2 ug/mL
							Acenaphthene	1 ug/mL
							Acenaphthylene	1 ug/mL
							Acetophenone	1 ug/mL
							Aniline	1 ug/mL
							Anthracene	1 ug/mL
							Benzo[a]anthracene	1 ug/mL
							Benzo[a]pyrene	1 ug/mL
							Benzo[b]fluoranthene	1 ug/mL
							Benzo[g,h,i]perylene	1 ug/mL
							Benzo[k]fluoranthene	1 ug/mL
							Benzyl alcohol	1 ug/mL
							Bis(2-chloroethoxy)methane	1 ug/mL
							Bis(2-chloroethyl)ether	1 ug/mL
							Bis(2-ethylhexyl) phthalate	1 ug/mL
							Butyl benzyl phthalate	1 ug/mL
							Carbazole	1 ug/mL
							Chrysene	1 ug/mL
							Di-n-butyl phthalate	1 ug/mL
							Di-n-octyl phthalate	1 ug/mL
							Dibenz(a,h)anthracene	1 ug/mL
							Dibenzofuran	1 ug/mL
							Diethyl phthalate	1 ug/mL
							Dimethyl phthalate	1 ug/mL
							Fluoranthene	1 ug/mL
							Fluorene	1 ug/mL
							Hexachlorobenzene	1 ug/mL
							Hexachlorobutadiene	1 ug/mL
							Hexachlorocyclopentadiene	1 ug/mL
							Hexachloroethane	1 ug/mL
							Hexadecane	1 ug/mL
							Indeno[1,2,3-cd]pyrene	1 ug/mL
							Isophorone	1 ug/mL
							n-Decane	1 ug/mL
							N-Nitrosodi-n-propylamine	1 ug/mL
							N-Nitrosodimethylamine	1 ug/mL
							N-Nitrosodiphenylamine	1 ug/mL
							n-Octadecane	1 ug/mL
							Naphthalene	1 ug/mL
							Nitrobenzene	1 ug/mL
							Pentachlorophenol	2 ug/mL
							Phenanthrene	1 ug/mL
							Phenol	1 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Pyrene	1 ug/mL
							Pyridine	1 ug/mL
							Benzoic acid	1 ug/mL
							Indene	1 ug/mL
							Atrazine	1 ug/mL
							Benzaldehyde	1 ug/mL
							Caprolactam	1 ug/mL
							3,3'-Dichlorobenzidine	1 ug/mL
							Benzidine	1 ug/mL
							2,4,6-Tribromophenol (Surr)	1 ug/mL
							2-Fluorobiphenyl	1 ug/mL
							2-Fluorophenol (Surr)	1 ug/mL
							Nitrobenzene-d5 (Surr)	1 ug/mL
							Phenol-d5 (Surr)	1 ug/mL
							Terphenyl-d14 (Surr)	1 ug/mL
							Methyl methanesulfonate	1 ug/mL
							N-Nitrosopyrrolidine	1 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18	Restek, Lot A093676			(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
SVTAPSTD20i_00010	03/24/17	09/24/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	250 uL	Benzo[e]pyrene	10 ug/mL
							2,3,5,6-Tetrachlorophenol	10 ug/mL
							2-Naphthylamine	10 ug/mL
							7,12-Dimethylbenz(a)anthracene	10 ug/mL
							1,1'-Biphenyl	10 ug/mL
							1,2,4,5-Tetrachlorobenzene	10 ug/mL
							1,2,4-Trichlorobenzene	10 ug/mL
							1,2-Dichlorobenzene	10 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,2-Diphenylhydrazine	10 ug/mL
							1,3-Dichlorobenzene	10 ug/mL
							1,3-Dinitrobenzene	10 ug/mL
							1,4-Dichlorobenzene	10 ug/mL
							1,4-Dioxane	10 ug/mL
							1-Methylnaphthalene	10 ug/mL
							2,2'-oxybis[1-chloropropane]	10 ug/mL
							2,3,4,6-Tetrachlorophenol	10 ug/mL
							2,4,5-Trichlorophenol	10 ug/mL
							2,4,6-Trichlorophenol	10 ug/mL
							2,4-Dichlorophenol	10 ug/mL
							2,4-Dimethylphenol	10 ug/mL
							2,4-Dinitrophenol	20 ug/mL
							2,4-Dinitrotoluene	10 ug/mL
							2,6-Dichlorophenol	10 ug/mL
							2,6-Dinitrotoluene	10 ug/mL
							2-Chloronaphthalene	10 ug/mL
							2-Chlorophenol	10 ug/mL
							2-Methylnaphthalene	10 ug/mL
							2-Methylphenol	10 ug/mL
							2-Nitroaniline	10 ug/mL
							2-Nitrophenol	10 ug/mL
							3-Nitroaniline	10 ug/mL
							4,6-Dinitro-2-methylphenol	20 ug/mL
							4-Bromophenyl phenyl ether	10 ug/mL
							4-Chloro-3-methylphenol	10 ug/mL
							4-Chloroaniline	10 ug/mL
							4-Chlorophenyl phenyl ether	10 ug/mL
							4-Methylphenol	10 ug/mL
							4-Nitroaniline	10 ug/mL
							4-Nitrophenol	20 ug/mL
							Acenaphthene	10 ug/mL
							Acenaphthylene	10 ug/mL
							Acetophenone	10 ug/mL
							Aniline	10 ug/mL
							Anthracene	10 ug/mL
							Benzo[a]anthracene	10 ug/mL
							Benzo[a]pyrene	10 ug/mL
							Benzo[b]fluoranthene	10 ug/mL
							Benzo[g,h,i]perylene	10 ug/mL
							Benzo[k]fluoranthene	10 ug/mL
							Benzyl alcohol	10 ug/mL
							Bis(2-chloroethoxy)methane	10 ug/mL
							Bis(2-chloroethyl)ether	10 ug/mL
							Bis(2-ethylhexyl) phthalate	10 ug/mL
							Butyl benzyl phthalate	10 ug/mL
							Carbazole	10 ug/mL
							Chrysene	10 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Di-n-butyl phthalate	10 ug/mL
							Di-n-octyl phthalate	10 ug/mL
							Dibenz(a,h)anthracene	10 ug/mL
							Dibenzofuran	10 ug/mL
							Diethyl phthalate	10 ug/mL
							Dimethyl phthalate	10 ug/mL
							Fluoranthene	10 ug/mL
							Fluorene	10 ug/mL
							Hexachlorobenzene	10 ug/mL
							Hexachlorobutadiene	10 ug/mL
							Hexachlorocyclopentadiene	10 ug/mL
							Hexachloroethane	10 ug/mL
							Hexadecane	10 ug/mL
							Indeno[1,2,3-cd]pyrene	10 ug/mL
							Isophorone	10 ug/mL
							n-Decane	10 ug/mL
							N-Nitrosodi-n-propylamine	10 ug/mL
							N-Nitrosodimethylamine	10 ug/mL
							N-Nitrosodiphenylamine	10 ug/mL
							n-Octadecane	10 ug/mL
							Naphthalene	10 ug/mL
							Nitrobenzene	10 ug/mL
							Pentachlorophenol	20 ug/mL
							Phenanthrene	10 ug/mL
							Phenol	10 ug/mL
							Pyrene	10 ug/mL
							Pyridine	10 ug/mL
							Benzoic acid	10 ug/mL
							Indene	10 ug/mL
							Atrazine	10 ug/mL
							Benzaldehyde	10 ug/mL
							Caprolactam	10 ug/mL
							3,3'-Dichlorobenzidine	10 ug/mL
							Benzidine	10 ug/mL
							2,4,6-Tribromophenol (Surr)	10 ug/mL
							2-Fluorobiphenyl	10 ug/mL
							2-Fluorophenol (Surr)	10 ug/mL
							Nitrobenzene-d5 (Surr)	10 ug/mL
							Phenol-d5 (Surr)	10 ug/mL
							Terphenyl-d14 (Surr)	10 ug/mL
							Methyl methanesulfonate	10 ug/mL
							N-Nitrosopyrrolidine	10 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
..SVLVIntstd_00004	02/28/18		Restek, Lot A093676		(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
SVTAPSTD4.0i_00011	03/24/17	09/24/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	50 uL	Benzo[e]pyrene	2 ug/mL
							2,3,5,6-Tetrachlorophenol	2 ug/mL
							2-Naphthylamine	2 ug/mL
							7,12-Dimethylbenz(a)anthracene	2 ug/mL
							1,1'-Biphenyl	2 ug/mL
							1,2,4,5-Tetrachlorobenzene	2 ug/mL
							1,2,4-Trichlorobenzene	2 ug/mL
							1,2-Dichlorobenzene	2 ug/mL
							1,2-Diphenylhydrazine	2 ug/mL
							1,3-Dichlorobenzene	2 ug/mL
							1,3-Dinitrobenzene	2 ug/mL
							1,4-Dichlorobenzene	2 ug/mL
							1,4-Dioxane	2 ug/mL
							1-Methylnaphthalene	2 ug/mL
							2,2'-oxybis[1-chloropropane]	2 ug/mL
							2,3,4,6-Tetrachlorophenol	2 ug/mL
							2,4,5-Trichlorophenol	2 ug/mL
							2,4,6-Trichlorophenol	2 ug/mL
							2,4-Dichlorophenol	2 ug/mL
							2,4-Dimethylphenol	2 ug/mL
							2,4-Dinitrophenol	4 ug/mL
							2,4-Dinitrotoluene	2 ug/mL
							2,6-Dichlorophenol	2 ug/mL
							2,6-Dinitrotoluene	2 ug/mL
							2-Chloronaphthalene	2 ug/mL
							2-Chlorophenol	2 ug/mL
							2-Methylnaphthalene	2 ug/mL
							2-Methylphenol	2 ug/mL
							2-Nitroaniline	2 ug/mL
							2-Nitrophenol	2 ug/mL
							3-Nitroaniline	2 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4,6-Dinitro-2-methylphenol	4 ug/mL
							4-Bromophenyl phenyl ether	2 ug/mL
							4-Chloro-3-methylphenol	2 ug/mL
							4-Chloroaniline	2 ug/mL
							4-Chlorophenyl phenyl ether	2 ug/mL
							4-Methylphenol	2 ug/mL
							4-Nitroaniline	2 ug/mL
							4-Nitrophenol	4 ug/mL
							Acenaphthene	2 ug/mL
							Acenaphthylene	2 ug/mL
							Acetophenone	2 ug/mL
							Aniline	2 ug/mL
							Anthracene	2 ug/mL
							Benzo[a]anthracene	2 ug/mL
							Benzo[a]pyrene	2 ug/mL
							Benzo[b]fluoranthene	2 ug/mL
							Benzo[g,h,i]perylene	2 ug/mL
							Benzo[k]fluoranthene	2 ug/mL
							Benzyl alcohol	2 ug/mL
							Bis(2-chloroethoxy)methane	2 ug/mL
							Bis(2-chloroethyl)ether	2 ug/mL
							Bis(2-ethylhexyl) phthalate	2 ug/mL
							Butyl benzyl phthalate	2 ug/mL
							Carbazole	2 ug/mL
							Chrysene	2 ug/mL
							Di-n-butyl phthalate	2 ug/mL
							Di-n-octyl phthalate	2 ug/mL
							Dibenz(a,h)anthracene	2 ug/mL
							Dibenzofuran	2 ug/mL
							Diethyl phthalate	2 ug/mL
							Dimethyl phthalate	2 ug/mL
							Fluoranthene	2 ug/mL
							Fluorene	2 ug/mL
							Hexachlorobenzene	2 ug/mL
							Hexachlorobutadiene	2 ug/mL
							Hexachlorocyclopentadiene	2 ug/mL
							Hexachloroethane	2 ug/mL
							Hexadecane	2 ug/mL
							Indeno[1,2,3-cd]pyrene	2 ug/mL
							Isophorone	2 ug/mL
							n-Decane	2 ug/mL
							N-Nitrosodi-n-propylamine	2 ug/mL
							N-Nitrosodimethylamine	2 ug/mL
							N-Nitrosodiphenylamine	2 ug/mL
							n-Octadecane	2 ug/mL
							Naphthalene	2 ug/mL
							Nitrobenzene	2 ug/mL
							Pentachlorophenol	4 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Phenanthrene	2 ug/mL
							Phenol	2 ug/mL
							Pyrene	2 ug/mL
							Pyridine	2 ug/mL
							Benzoic acid	2 ug/mL
							Indene	2 ug/mL
							Atrazine	2 ug/mL
							Benzaldehyde	2 ug/mL
							Caprolactam	2 ug/mL
							3,3'-Dichlorobenzidine	2 ug/mL
							Benzidine	2 ug/mL
							2,4,6-Tribromophenol (Surr)	2 ug/mL
							2-Fluorobiphenyl	2 ug/mL
							2-Fluorophenol (Surr)	2 ug/mL
							Nitrobenzene-d5 (Surr)	2 ug/mL
							Phenol-d5 (Surr)	2 ug/mL
							Terphenyl-d14 (Surr)	2 ug/mL
							Methyl methanesulfonate	2 ug/mL
							N-Nitrosopyrrolidine	2 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18		Restek, Lot A093676		(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
SVTAPSTD40i_00010	03/24/17	09/14/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	500 uL	Benzo[e]pyrene	20 ug/mL
							2,3,5,6-Tetrachlorophenol	20 ug/mL
							2-Naphthylamine	20 ug/mL
							7,12-Dimethylbenz(a)anthracene	20 ug/mL
							1,1'-Biphenyl	20 ug/mL
							1,2,4,5-Tetrachlorobenzene	20 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,2,4-Trichlorobenzene	20 ug/mL
							1,2-Dichlorobenzene	20 ug/mL
							1,2-Diphenylhydrazine	20 ug/mL
							1,3-Dichlorobenzene	20 ug/mL
							1,3-Dinitrobenzene	20 ug/mL
							1,4-Dichlorobenzene	20 ug/mL
							1,4-Dioxane	20 ug/mL
							1-Methylnaphthalene	20 ug/mL
							2,2'-oxybis[1-chloropropane]	20 ug/mL
							2,3,4,6-Tetrachlorophenol	20 ug/mL
							2,4,5-Trichlorophenol	20 ug/mL
							2,4,6-Trichlorophenol	20 ug/mL
							2,4-Dichlorophenol	20 ug/mL
							2,4-Dimethylphenol	20 ug/mL
							2,4-Dinitrophenol	40 ug/mL
							2,4-Dinitrotoluene	20 ug/mL
							2,6-Dichlorophenol	20 ug/mL
							2,6-Dinitrotoluene	20 ug/mL
							2-Chloronaphthalene	20 ug/mL
							2-Chlorophenol	20 ug/mL
							2-Methylnaphthalene	20 ug/mL
							2-Methylphenol	20 ug/mL
							2-Nitroaniline	20 ug/mL
							2-Nitrophenol	20 ug/mL
							3-Nitroaniline	20 ug/mL
							4,6-Dinitro-2-methylphenol	40 ug/mL
							4-Bromophenyl phenyl ether	20 ug/mL
							4-Chloro-3-methylphenol	20 ug/mL
							4-Chloroaniline	20 ug/mL
							4-Chlorophenyl phenyl ether	20 ug/mL
							4-Methylphenol	20 ug/mL
							4-Nitroaniline	20 ug/mL
							4-Nitrophenol	40 ug/mL
							Acenaphthene	20 ug/mL
							Acenaphthylene	20 ug/mL
							Acetophenone	20 ug/mL
							Aniline	20 ug/mL
							Anthracene	20 ug/mL
							Benzo[a]anthracene	20 ug/mL
							Benzo[a]pyrene	20 ug/mL
							Benzo[b]fluoranthene	20 ug/mL
							Benzo[g,h,i]perylene	20 ug/mL
							Benzo[k]fluoranthene	20 ug/mL
							Benzyl alcohol	20 ug/mL
							Bis(2-chloroethoxy)methane	20 ug/mL
							Bis(2-chloroethyl)ether	20 ug/mL
							Bis(2-ethylhexyl) phthalate	20 ug/mL
							Butyl benzyl phthalate	20 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Carbazole	20 ug/mL
							Chrysene	20 ug/mL
							Di-n-butyl phthalate	20 ug/mL
							Di-n-octyl phthalate	20 ug/mL
							Dibenz(a,h)anthracene	20 ug/mL
							Dibenzofuran	20 ug/mL
							Diethyl phthalate	20 ug/mL
							Dimethyl phthalate	20 ug/mL
							Fluoranthene	20 ug/mL
							Fluorene	20 ug/mL
							Hexachlorobenzene	20 ug/mL
							Hexachlorobutadiene	20 ug/mL
							Hexachlorocyclopentadiene	20 ug/mL
							Hexachloroethane	20 ug/mL
							Hexadecane	20 ug/mL
							Indeno[1,2,3-cd]pyrene	20 ug/mL
							Isophorone	20 ug/mL
							n-Decane	20 ug/mL
							N-Nitrosodi-n-propylamine	20 ug/mL
							N-Nitrosodimethylamine	20 ug/mL
							N-Nitrosodiphenylamine	20 ug/mL
							n-Octadecane	20 ug/mL
							Naphthalene	20 ug/mL
							Nitrobenzene	20 ug/mL
							Pentachlorophenol	40 ug/mL
							Phenanthrene	20 ug/mL
							Phenol	20 ug/mL
							Pyrene	20 ug/mL
							Pyridine	20 ug/mL
							Benzoic acid	20 ug/mL
							Indene	20 ug/mL
							Atrazine	20 ug/mL
							Benzaldehyde	20 ug/mL
							Caprolactam	20 ug/mL
							3,3'-Dichlorobenzidine	20 ug/mL
							Benzidine	20 ug/mL
							2,4,6-Tribromophenol (Surr)	20 ug/mL
							2-Fluorobiphenyl	20 ug/mL
							2-Fluorophenol (Surr)	20 ug/mL
							Nitrobenzene-d5 (Surr)	20 ug/mL
							Phenol-d5 (Surr)	20 ug/mL
							Terphenyl-d14 (Surr)	20 ug/mL
							Methyl methanesulfonate	20 ug/mL
							N-Nitrosopyrrolidine	20 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18		Restek, Lot A093676		(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
SVTAPSTD60i_00010	03/24/17	09/24/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	750 uL	Benzo[e]pyrene	30 ug/mL
							2,3,5,6-Tetrachlorophenol	30 ug/mL
							2-Naphthylamine	30 ug/mL
							7,12-Dimethylbenz(a)anthracene	30 ug/mL
							1,1'-Biphenyl	30 ug/mL
							1,2,4,5-Tetrachlorobenzene	30 ug/mL
							1,2,4-Trichlorobenzene	30 ug/mL
							1,2-Dichlorobenzene	30 ug/mL
							1,2-Diphenylhydrazine	30 ug/mL
							1,3-Dichlorobenzene	30 ug/mL
							1,3-Dinitrobenzene	30 ug/mL
							1,4-Dichlorobenzene	30 ug/mL
							1,4-Dioxane	30 ug/mL
							1-Methylnaphthalene	30 ug/mL
							2,2'-oxybis[1-chloropropane]	30 ug/mL
							2,3,4,6-Tetrachlorophenol	30 ug/mL
							2,4,5-Trichlorophenol	30 ug/mL
							2,4,6-Trichlorophenol	30 ug/mL
							2,4-Dichlorophenol	30 ug/mL
							2,4-Dimethylphenol	30 ug/mL
							2,4-Dinitrophenol	60 ug/mL
							2,4-Dinitrotoluene	30 ug/mL
							2,6-Dichlorophenol	30 ug/mL
							2,6-Dinitrotoluene	30 ug/mL
							2-Chloronaphthalene	30 ug/mL
							2-Chlorophenol	30 ug/mL
							2-Methylnaphthalene	30 ug/mL
							2-Methylphenol	30 ug/mL
							2-Nitroaniline	30 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2-Nitrophenol	30 ug/mL
							3-Nitroaniline	30 ug/mL
							4,6-Dinitro-2-methylphenol	60 ug/mL
							4-Bromophenyl phenyl ether	30 ug/mL
							4-Chloro-3-methylphenol	30 ug/mL
							4-Chloroaniline	30 ug/mL
							4-Chlorophenyl phenyl ether	30 ug/mL
							4-Methylphenol	30 ug/mL
							4-Nitroaniline	30 ug/mL
							4-Nitrophenol	60 ug/mL
							Acenaphthene	30 ug/mL
							Acenaphthylene	30 ug/mL
							Acetophenone	30 ug/mL
							Aniline	30 ug/mL
							Anthracene	30 ug/mL
							Benzo[a]anthracene	30 ug/mL
							Benzo[a]pyrene	30 ug/mL
							Benzo[b]fluoranthene	30 ug/mL
							Benzo[g,h,i]perylene	30 ug/mL
							Benzo[k]fluoranthene	30 ug/mL
							Benzyl alcohol	30 ug/mL
							Bis(2-chloroethoxy)methane	30 ug/mL
							Bis(2-chloroethyl)ether	30 ug/mL
							Bis(2-ethylhexyl) phthalate	30 ug/mL
							Butyl benzyl phthalate	30 ug/mL
							Carbazole	30 ug/mL
							Chrysene	30 ug/mL
							Di-n-butyl phthalate	30 ug/mL
							Di-n-octyl phthalate	30 ug/mL
							Dibenz(a,h)anthracene	30 ug/mL
							Dibenzofuran	30 ug/mL
							Diethyl phthalate	30 ug/mL
							Dimethyl phthalate	30 ug/mL
							Fluoranthene	30 ug/mL
							Fluorene	30 ug/mL
							Hexachlorobenzene	30 ug/mL
							Hexachlorobutadiene	30 ug/mL
							Hexachlorocyclopentadiene	30 ug/mL
							Hexachloroethane	30 ug/mL
							Hexadecane	30 ug/mL
							Indeno[1,2,3-cd]pyrene	30 ug/mL
							Isophorone	30 ug/mL
							n-Decane	30 ug/mL
							N-Nitrosodi-n-propylamine	30 ug/mL
							N-Nitrosodimethylamine	30 ug/mL
							N-Nitrosodiphenylamine	30 ug/mL
							n-Octadecane	30 ug/mL
							Naphthalene	30 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Nitrobenzene	30 ug/mL
							Pentachlorophenol	60 ug/mL
							Phenanthrene	30 ug/mL
							Phenol	30 ug/mL
							Pyrene	30 ug/mL
							Pyridine	30 ug/mL
							Benzoic acid	30 ug/mL
							Indene	30 ug/mL
							Atrazine	30 ug/mL
							Benzaldehyde	30 ug/mL
							Caprolactam	30 ug/mL
							3,3'-Dichlorobenzidine	30 ug/mL
							Benzidine	30 ug/mL
							2,4,6-Tribromophenol (Surr)	30 ug/mL
							2-Fluorobiphenyl	30 ug/mL
							2-Fluorophenol (Surr)	30 ug/mL
							Nitrobenzene-d5 (Surr)	30 ug/mL
							Phenol-d5 (Surr)	30 ug/mL
							Terphenyl-d14 (Surr)	30 ug/mL
							Methyl methanesulfonate	30 ug/mL
							N-Nitrosopyrrolidine	30 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18	Restek, Lot A093676			(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
SVTAPSTD80i_00010	03/24/17	09/24/16	MeCl2, Lot 2022771	1 mL	SVTAPITINTRNi_00012	10 uL	1,4-Dichlorobenzene-d4	4 ug/mL
							Acenaphthene-d10	4 ug/mL
							Chrysene-d12	4 ug/mL
							Naphthalene-d8	4 ug/mL
							Perylene-d12	4 ug/mL
							Phenanthrene-d10	4 ug/mL
					SVTAPITSTCKi_00015	1000 uL	Benzo[e]pyrene	40 ug/mL
							2,3,5,6-Tetrachlorophenol	40 ug/mL
							2-Naphthylamine	40 ug/mL
							7,12-Dimethylbenz(a)anthracene	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
							Benzoic acid	40 ug/mL
							Indene	40 ug/mL
							Atrazine	40 ug/mL
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
							3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
							2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
							Methyl methanesulfonate	40 ug/mL
							N-Nitrosopyrrolidine	40 ug/mL
.SVTAPITINTRNi_00012	09/15/17	09/15/16	MeCl2, Lot 2022771	25 mL	SVLVIntstd_00004	5 mL	1,4-Dichlorobenzene-d4	400 ug/mL
							Acenaphthene-d10	400 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Chrysene-d12	400 ug/mL
							Naphthalene-d8	400 ug/mL
							Perylene-d12	400 ug/mL
							Phenanthrene-d10	400 ug/mL
..SVLVIntstd_00004	02/28/18		Restek, Lot A093676		(Purchased Reagent)		1,4-Dichlorobenzene-d4	2000 ug/mL
							Acenaphthene-d10	2000 ug/mL
							Chrysene-d12	2000 ug/mL
							Naphthalene-d8	2000 ug/mL
							Perylene-d12	2000 ug/mL
							Phenanthrene-d10	2000 ug/mL
.SVTAPITSTCKi_00015	03/24/17	09/24/16	MeCl2, Lot 2022771	20 mL	sv benzoepyre_00003	800 uL	Benzo[e]pyrene	40 ug/mL
					SV2356TCPs_00003	800 uL	2,3,5,6-Tetrachlorophenol	40 ug/mL
					SV2NAPAMINEs_00004	800 uL	2-Naphthylamine	40 ug/mL
					sv712dimbenza_00011	800 uL	7,12-Dimethylbenz(a)anthracene	40 ug/mL
					SVLVstd1_00041	800 uL	1,1'-Biphenyl	40 ug/mL
							1,2,4,5-Tetrachlorobenzene	40 ug/mL
							1,2,4-Trichlorobenzene	40 ug/mL
							1,2-Dichlorobenzene	40 ug/mL
							1,2-Diphenylhydrazine	40 ug/mL
							1,3-Dichlorobenzene	40 ug/mL
							1,3-Dinitrobenzene	40 ug/mL
							1,4-Dichlorobenzene	40 ug/mL
							1,4-Dioxane	40 ug/mL
							1-Methylnaphthalene	40 ug/mL
							2,2'-oxybis[1-chloropropane]	40 ug/mL
							2,3,4,6-Tetrachlorophenol	40 ug/mL
							2,4,5-Trichlorophenol	40 ug/mL
							2,4,6-Trichlorophenol	40 ug/mL
							2,4-Dichlorophenol	40 ug/mL
							2,4-Dimethylphenol	40 ug/mL
							2,4-Dinitrophenol	80 ug/mL
							2,4-Dinitrotoluene	40 ug/mL
							2,6-Dichlorophenol	40 ug/mL
							2,6-Dinitrotoluene	40 ug/mL
							2-Chloronaphthalene	40 ug/mL
							2-Chlorophenol	40 ug/mL
							2-Methylnaphthalene	40 ug/mL
							2-Methylphenol	40 ug/mL
							2-Nitroaniline	40 ug/mL
							2-Nitrophenol	40 ug/mL
							3-Nitroaniline	40 ug/mL
							4,6-Dinitro-2-methylphenol	80 ug/mL
							4-Bromophenyl phenyl ether	40 ug/mL
							4-Chloro-3-methylphenol	40 ug/mL
							4-Chloroaniline	40 ug/mL
							4-Chlorophenyl phenyl ether	40 ug/mL
							4-Methylphenol	40 ug/mL
							4-Nitroaniline	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4-Nitrophenol	80 ug/mL
							Acenaphthene	40 ug/mL
							Acenaphthylene	40 ug/mL
							Acetophenone	40 ug/mL
							Aniline	40 ug/mL
							Anthracene	40 ug/mL
							Benzo[a]anthracene	40 ug/mL
							Benzo[a]pyrene	40 ug/mL
							Benzo[b]fluoranthene	40 ug/mL
							Benzo[g,h,i]perylene	40 ug/mL
							Benzo[k]fluoranthene	40 ug/mL
							Benzyl alcohol	40 ug/mL
							Bis(2-chloroethoxy)methane	40 ug/mL
							Bis(2-chloroethyl)ether	40 ug/mL
							Bis(2-ethylhexyl) phthalate	40 ug/mL
							Butyl benzyl phthalate	40 ug/mL
							Carbazole	40 ug/mL
							Chrysene	40 ug/mL
							Di-n-butyl phthalate	40 ug/mL
							Di-n-octyl phthalate	40 ug/mL
							Dibenz(a,h)anthracene	40 ug/mL
							Dibenzofuran	40 ug/mL
							Diethyl phthalate	40 ug/mL
							Dimethyl phthalate	40 ug/mL
							Fluoranthene	40 ug/mL
							Fluorene	40 ug/mL
							Hexachlorobenzene	40 ug/mL
							Hexachlorobutadiene	40 ug/mL
							Hexachlorocyclopentadiene	40 ug/mL
							Hexachloroethane	40 ug/mL
							Hexadecane	40 ug/mL
							Indeno[1,2,3-cd]pyrene	40 ug/mL
							Isophorone	40 ug/mL
							n-Decane	40 ug/mL
							N-Nitrosodi-n-propylamine	40 ug/mL
							N-Nitrosodimethylamine	40 ug/mL
							N-Nitrosodiphenylamine	40 ug/mL
							n-Octadecane	40 ug/mL
							Naphthalene	40 ug/mL
							Nitrobenzene	40 ug/mL
							Pentachlorophenol	80 ug/mL
							Phenanthrene	40 ug/mL
							Phenol	40 ug/mL
							Pyrene	40 ug/mL
							Pyridine	40 ug/mL
					SVLVstd10_00006	400 uL	Benzoic acid	40 ug/mL
							Indene	40 ug/mL
					SVLVstd11_00006	400 uL	Atrazine	40 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Benzaldehyde	40 ug/mL
							Caprolactam	40 ug/mL
					SVLVstd9_00006	400 uL	3,3'-Dichlorobenzidine	40 ug/mL
							Benzidine	40 ug/mL
					SVLVSURSPK_00002	160 uL	2,4,6-Tribromophenol (Surr)	40 ug/mL
							2-Fluorobiphenyl	40 ug/mL
							2-Fluorophenol (Surr)	40 ug/mL
							Nitrobenzene-d5 (Surr)	40 ug/mL
							Phenol-d5 (Surr)	40 ug/mL
							Terphenyl-d14 (Surr)	40 ug/mL
					svmethylmetha_00011	800 uL	Methyl methanesulfonate	40 ug/mL
					SVNNITROPYROs_00017	800 uL	N-Nitrosopyrrolidine	40 ug/mL
..sv benzoepyre_00003	03/17/20		Absolute, Lot 031715		(Purchased Reagent)		Benzo[e]pyrene	1000 ug/mL
..SV2356TCPs_00003	09/21/20		Absolute, Lot 092115		(Purchased Reagent)		2,3,5,6-Tetrachlorophenol	1000 ug/mL
..SV2NAPAMINEs_00004	06/30/17		Ultra Scientific, Lot Ck-1617		(Purchased Reagent)		2-Naphthylamine	1000 ug/mL
..sv712dimbenza_00011	04/09/20		Absolute, Lot 040915		(Purchased Reagent)		7,12-Dimethylbenz(a)anthracene	1000 ug/mL
..SVLVstd1_00041	04/30/17		Restek, Lot A0114832		(Purchased Reagent)		1,1'-Biphenyl	1000 ug/mL
							1,2,4,5-Tetrachlorobenzene	1000 ug/mL
							1,2,4-Trichlorobenzene	1000 ug/mL
							1,2-Dichlorobenzene	1000 ug/mL
							1,2-Diphenylhydrazine	1000 ug/mL
							1,3-Dichlorobenzene	1000 ug/mL
							1,3-Dinitrobenzene	1000 ug/mL
							1,4-Dichlorobenzene	1000 ug/mL
							1,4-Dioxane	1000 ug/mL
							1-Methylnaphthalene	1000 ug/mL
							2,2'-oxybis[1-chloropropane]	1000 ug/mL
							2,3,4,6-Tetrachlorophenol	1000 ug/mL
							2,4,5-Trichlorophenol	1000 ug/mL
							2,4,6-Trichlorophenol	1000 ug/mL
							2,4-Dichlorophenol	1000 ug/mL
							2,4-Dimethylphenol	1000 ug/mL
							2,4-Dinitrophenol	2000 ug/mL
							2,4-Dinitrotoluene	1000 ug/mL
							2,6-Dichlorophenol	1000 ug/mL
							2,6-Dinitrotoluene	1000 ug/mL
							2-Chloronaphthalene	1000 ug/mL
							2-Chlorophenol	1000 ug/mL
							2-Methylnaphthalene	1000 ug/mL
							2-Methylphenol	1000 ug/mL
							2-Nitroaniline	1000 ug/mL
							2-Nitrophenol	1000 ug/mL
							3-Nitroaniline	1000 ug/mL
							4,6-Dinitro-2-methylphenol	2000 ug/mL
							4-Bromophenyl phenyl ether	1000 ug/mL
							4-Chloro-3-methylphenol	1000 ug/mL
							4-Chloroaniline	1000 ug/mL
							4-Chlorophenyl phenyl ether	1000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4-Methylphenol	1000 ug/mL
							4-Nitroaniline	1000 ug/mL
							4-Nitrophenol	2000 ug/mL
							Acenaphthene	1000 ug/mL
							Acenaphthylene	1000 ug/mL
							Acetophenone	1000 ug/mL
							Aniline	1000 ug/mL
							Anthracene	1000 ug/mL
							Benzo[a]anthracene	1000 ug/mL
							Benzo[a]pyrene	1000 ug/mL
							Benzo[b]fluoranthene	1000 ug/mL
							Benzo[g,h,i]perylene	1000 ug/mL
							Benzo[k]fluoranthene	1000 ug/mL
							Benzyl alcohol	1000 ug/mL
							Bis(2-chloroethoxy)methane	1000 ug/mL
							Bis(2-chloroethyl)ether	1000 ug/mL
							Bis(2-ethylhexyl) phthalate	1000 ug/mL
							Butyl benzyl phthalate	1000 ug/mL
							Carbazole	1000 ug/mL
							Chrysene	1000 ug/mL
							Di-n-butyl phthalate	1000 ug/mL
							Di-n-octyl phthalate	1000 ug/mL
							Dibenz(a,h)anthracene	1000 ug/mL
							Dibenzofuran	1000 ug/mL
							Diethyl phthalate	1000 ug/mL
							Dimethyl phthalate	1000 ug/mL
							Fluoranthene	1000 ug/mL
							Fluorene	1000 ug/mL
							Hexachlorobenzene	1000 ug/mL
							Hexachlorobutadiene	1000 ug/mL
							Hexachlorocyclopentadiene	1000 ug/mL
							Hexachloroethane	1000 ug/mL
							Hexadecane	1000 ug/mL
							Indeno[1,2,3-cd]pyrene	1000 ug/mL
							Isophorone	1000 ug/mL
							n-Decane	1000 ug/mL
							N-Nitrosodi-n-propylamine	1000 ug/mL
							N-Nitrosodimethylamine	1000 ug/mL
							N-Nitrosodiphenylamine	1000 ug/mL
							n-Octadecane	1000 ug/mL
							Naphthalene	1000 ug/mL
							Nitrobenzene	1000 ug/mL
							Pentachlorophenol	2000 ug/mL
							Phenanthrene	1000 ug/mL
							Phenol	1000 ug/mL
							Pyrene	1000 ug/mL
							Pyridine	1000 ug/mL
..SVLVstd10_00006	05/31/17		Restek, Lot A0115596		(Purchased Reagent)		Benzoic acid	2000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Indene	2000 ug/mL
..SVLVstd11_00006	05/31/17		Restek, Lot A0115387		(Purchased Reagent)		Atrazine	2000 ug/mL
							Benzaldehyde	2000 ug/mL
							Caprolactam	2000 ug/mL
..SVLVstd9_00006	09/30/17		Restek, Lot A0118008		(Purchased Reagent)		3,3'-Dichlorobenzidine	2000 ug/mL
							Benzidine	2000 ug/mL
..SVLVSURSPK_00002	08/31/19		Restek, Lot A0103960		(Purchased Reagent)		2,4,6-Tribromophenol (Surr)	5000 ug/mL
							2-Fluorobiphenyl	5000 ug/mL
							2-Fluorophenol (Surr)	5000 ug/mL
							Nitrobenzene-d5 (Surr)	5000 ug/mL
							Phenol-d5 (Surr)	5000 ug/mL
							Terphenyl-d14 (Surr)	5000 ug/mL
..svmethylmetha_00011	02/13/20		Absolute, Lot 021315		(Purchased Reagent)		Methyl methanesulfonate	1000 ug/mL
..SVNNITROPYROs_00017	01/08/19		absolute, Lot 010816		(Purchased Reagent)		N-Nitrosopyrrolidine	1000 ug/mL
VOA8260INT_00061	10/22/16	09/22/16	Methanol, Lot 136118	10 mL	VOA8260INTRES_00126	1 mL	1,4-Dichlorobenzene-d4	25 ug/mL
							Chlorobenzene-d5	25 ug/mL
							Fluorobenzene (IS)	25 ug/mL
							TBA-d9 (IS)	500 ug/mL
.VOA8260INTRES_00126	08/31/20		Restek, Lot A0113246		(Purchased Reagent)		1,4-Dichlorobenzene-d4	250 ug/mL
							Chlorobenzene-d5	250 ug/mL
							Fluorobenzene (IS)	250 ug/mL
							TBA-d9 (IS)	5000 ug/mL
VOA8260INT_00062	11/11/16	10/11/16	Methanol, Lot 2019054	10 mL	VOA8260INTRES_00127	1 mL	1,4-Dichlorobenzene-d4	25 ug/mL
							Chlorobenzene-d5	25 ug/mL
							Fluorobenzene (IS)	25 ug/mL
							TBA-d9 (IS)	500 ug/mL
.VOA8260INTRES_00127	08/31/20		Restek, Lot A0113246		(Purchased Reagent)		1,4-Dichlorobenzene-d4	250 ug/mL
							Chlorobenzene-d5	250 ug/mL
							Fluorobenzene (IS)	250 ug/mL
							TBA-d9 (IS)	5000 ug/mL
VOA8260SURR_00059	10/22/16	09/22/16	Methanol, Lot 136118	100 mL	VOA8260SURRES_00116	1 mL	1,2-Dichloroethane-d4 (Surr)	25 ug/mL
							4-Bromofluorobenzene (Surr)	25 ug/mL
							Dibromofluoromethane (Surr)	25 ug/mL
							Toluene-d8 (Surr)	25 ug/mL
.VOA8260SURRES_00116	07/31/20		Restek, Lot A0112455		(Purchased Reagent)		1,2-Dichloroethane-d4 (Surr)	2500 ug/mL
							4-Bromofluorobenzene (Surr)	2500 ug/mL
							Dibromofluoromethane (Surr)	2500 ug/mL
							Toluene-d8 (Surr)	2500 ug/mL
VOA8260SURR_00060	11/11/16	10/11/16	Methanol, Lot 2019054	100 mL	VOA8260SURRES_00117	1 mL	1,2-Dichloroethane-d4 (Surr)	25 ug/mL
							4-Bromofluorobenzene (Surr)	25 ug/mL
							Dibromofluoromethane (Surr)	25 ug/mL
							Toluene-d8 (Surr)	25 ug/mL
.VOA8260SURRES_00117	07/31/20		Restek, Lot A0112455		(Purchased Reagent)		1,2-Dichloroethane-d4 (Surr)	2500 ug/mL
							4-Bromofluorobenzene (Surr)	2500 ug/mL
							Dibromofluoromethane (Surr)	2500 ug/mL
							Toluene-d8 (Surr)	2500 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
VOA8260VOA2ND_00209	10/21/16	10/14/16	Methanol, Lot 136118	10 mL	VOA8260GAS2ND_00166	0.1 mL	Bromomethane	25 ug/mL
							Chloroethane	25 ug/mL
							Chloromethane	25 ug/mL
							Vinyl chloride	25 ug/mL
					VOA8260VOA2ND_00207	1 mL	1,1,1,2-Tetrachloroethane	25 ug/mL
							1,1,1-Trichloroethane	25 ug/mL
							1,1,2,2-Tetrachloroethane	25 ug/mL
							1,1,2-Trichloroethane	25 ug/mL
							1,1-Dichloroethane	25 ug/mL
							1,1-Dichloroethene	25 ug/mL
							1,2-Dibromoethane (EDB)	25 ug/mL
							1,2-Dichloroethane	25 ug/mL
							1,2-Dichloropropane	25 ug/mL
							1,4-Dioxane	500 ug/mL
							Acrylonitrile	250 ug/mL
							Benzene	25 ug/mL
							Bromochloromethane	25 ug/mL
							Bromodichloromethane	25 ug/mL
							Bromoform	25 ug/mL
							Carbon disulfide	25 ug/mL
							Carbon tetrachloride	25 ug/mL
							Chlorobenzene	25 ug/mL
							Chloroform	25 ug/mL
							cis-1,2-Dichloroethene	25 ug/mL
							cis-1,3-Dichloropropene	25 ug/mL
							Dibromochloromethane	25 ug/mL
							Ethylbenzene	25 ug/mL
							Methyl tert-butyl ether	25 ug/mL
							Methylene Chloride	25 ug/mL
							Styrene	25 ug/mL
							Tetrachloroethene	25 ug/mL
							Toluene	25 ug/mL
							trans-1,2-Dichloroethene	25 ug/mL
							trans-1,3-Dichloropropene	25 ug/mL
							Trichloroethene	25 ug/mL
							Xylenes, Total	50 ug/mL
.VOA8260GAS2ND_00166	11/30/18		Restek, Lot A0115484		(Purchased Reagent)		Bromomethane	2500 ug/mL
							Chloroethane	2500 ug/mL
							Chloromethane	2500 ug/mL
							Vinyl chloride	2500 ug/mL
.VOA8260VOA2ND_00207	11/04/16	10/04/16	Methanol, Lot 136118	10 mL	VOA8260MEGA2_00052	1 mL	1,1,1,2-Tetrachloroethane	250 ug/mL
							1,1,1-Trichloroethane	250 ug/mL
							1,1,2,2-Tetrachloroethane	250 ug/mL
							1,1,2-Trichloroethane	250 ug/mL
							1,1-Dichloroethane	250 ug/mL
							1,1-Dichloroethene	250 ug/mL
							1,2-Dibromoethane (EDB)	250 ug/mL
							1,2-Dichloroethane	250 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,2-Dichloropropane	250 ug/mL
							1,4-Dioxane	5000 ug/mL
							Acrylonitrile	2500 ug/mL
							Benzene	250 ug/mL
							Bromochloromethane	250 ug/mL
							Bromodichloromethane	250 ug/mL
							Bromoform	250 ug/mL
							Carbon disulfide	250 ug/mL
							Carbon tetrachloride	250 ug/mL
							Chlorobenzene	250 ug/mL
							Chloroform	250 ug/mL
							cis-1,2-Dichloroethene	250 ug/mL
							cis-1,3-Dichloropropene	250 ug/mL
							Dibromochloromethane	250 ug/mL
							Ethylbenzene	250 ug/mL
							Methyl tert-butyl ether	250 ug/mL
							Methylene Chloride	250 ug/mL
							Styrene	250 ug/mL
							Tetrachloroethene	250 ug/mL
							Toluene	250 ug/mL
							trans-1,2-Dichloroethene	250 ug/mL
							trans-1,3-Dichloropropene	250 ug/mL
							Trichloroethene	250 ug/mL
							Xylenes, Total	500 ug/mL
..VOA8260MEGA2_00052	01/31/17		Restek, Lot A0118163		(Purchased Reagent)		1,1,1,2-Tetrachloroethane	2500 ug/mL
							1,1,1-Trichloroethane	2500 ug/mL
							1,1,2,2-Tetrachloroethane	2500 ug/mL
							1,1,2-Trichloroethane	2500 ug/mL
							1,1-Dichloroethane	2500 ug/mL
							1,1-Dichloroethene	2500 ug/mL
							1,2-Dibromoethane (EDB)	2500 ug/mL
							1,2-Dichloroethane	2500 ug/mL
							1,2-Dichloropropane	2500 ug/mL
							1,4-Dioxane	50000 ug/mL
							Acrylonitrile	25000 ug/mL
							Benzene	2500 ug/mL
							Bromochloromethane	2500 ug/mL
							Bromodichloromethane	2500 ug/mL
							Bromoform	2500 ug/mL
							Carbon disulfide	2500 ug/mL
							Carbon tetrachloride	2500 ug/mL
							Chlorobenzene	2500 ug/mL
							Chloroform	2500 ug/mL
							cis-1,2-Dichloroethene	2500 ug/mL
							cis-1,3-Dichloropropene	2500 ug/mL
							Dibromochloromethane	2500 ug/mL
							Ethylbenzene	2500 ug/mL
							Methyl tert-butyl ether	2500 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Methylene Chloride	2500 ug/mL
							Styrene	2500 ug/mL
							Tetrachloroethene	2500 ug/mL
							Toluene	2500 ug/mL
							trans-1,2-Dichloroethene	2500 ug/mL
							trans-1,3-Dichloropropene	2500 ug/mL
							Trichloroethene	2500 ug/mL
							Xylenes, Total	5000 ug/mL
VOA8260VOAPRI_00213	10/05/16	09/28/16	Methanol, Lot 136118	10 mL	VOA8260GAS1ST_00166	0.1 mL	Bromomethane	25 ug/mL
							Butadiene	25 ug/mL
							Chloroethane	25 ug/mL
							Chloromethane	25 ug/mL
							Dichlorodifluoromethane	25 ug/mL
							Dichlorofluoromethane	25 ug/mL
							Trichlorofluoromethane	25 ug/mL
							Vinyl chloride	25 ug/mL
					VOA8260VOAPRI_00210	1 mL	2-Butanone (MEK)	25 ug/mL
							2-Hexanone	25 ug/mL
							4-Methyl-2-pentanone (MIBK)	25 ug/mL
							Acetone	25 ug/mL
							1,1,1,2-Tetrachloroethane	25 ug/mL
							1,1,1-Trichloroethane	25 ug/mL
							1,1,2,2-Tetrachloroethane	25 ug/mL
							1,1,2-Trichloro-1,2,2-trifluoroethane	25 ug/mL
							1,1,2-Trichloroethane	25 ug/mL
							1,1-Dichloroethane	25 ug/mL
							1,1-Dichloroethene	25 ug/mL
							1,1-Dichloropropene	25 ug/mL
							1,2,3-Trichlorobenzene	25 ug/mL
							1,2,3-Trichloropropane	25 ug/mL
							1,2,4-Trichlorobenzene	25 ug/mL
							1,2,4-Trimethylbenzene	25 ug/mL
							1,2-Dibromo-3-Chloropropane	25 ug/mL
							1,2-Dibromoethane (EDB)	25 ug/mL
							1,2-Dichlorobenzene	25 ug/mL
							1,2-Dichloroethane	25 ug/mL
							1,2-Dichloropropane	25 ug/mL
							1,3,5-Trimethylbenzene	25 ug/mL
							1,3-Dichlorobenzene	25 ug/mL
							1,3-Dichloropropane	25 ug/mL
							1,4-Dichlorobenzene	25 ug/mL
							1,4-Dioxane	500 ug/mL
							2,2-Dichloropropane	25 ug/mL
							2-Chlorotoluene	25 ug/mL
							2-Methyl-2-propanol	250 ug/mL
							3-Chloro-1-propene	25 ug/mL
							4-Chlorotoluene	25 ug/mL

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							4-Isopropyltoluene	25 ug/mL
							Acrylonitrile	250 ug/mL
							Benzene	25 ug/mL
							Bromobenzene	25 ug/mL
							Bromochloromethane	25 ug/mL
							Bromodichloromethane	25 ug/mL
							Bromoform	25 ug/mL
							Carbon disulfide	25 ug/mL
							Carbon tetrachloride	25 ug/mL
							Chlorobenzene	25 ug/mL
							Chloroform	25 ug/mL
							cis-1,2-Dichloroethene	25 ug/mL
							cis-1,3-Dichloropropene	25 ug/mL
							Cyclohexane	25 ug/mL
							Dibromochloromethane	25 ug/mL
							Dibromomethane	25 ug/mL
							Ethyl ether	25 ug/mL
							Ethyl methacrylate	25 ug/mL
							Ethylbenzene	25 ug/mL
							Hexachlorobutadiene	25 ug/mL
							Hexane	25 ug/mL
							Iodomethane	25 ug/mL
							Isobutyl alcohol	625 ug/mL
							Isopropylbenzene	25 ug/mL
							m-Xylene & p-Xylene	25 ug/mL
							Methyl acetate	125 ug/mL
							Methyl tert-butyl ether	25 ug/mL
							Methylcyclohexane	25 ug/mL
							Methylene Chloride	25 ug/mL
							n-Butylbenzene	25 ug/mL
							n-Heptane	25 ug/mL
							N-Propylbenzene	25 ug/mL
							Naphthalene	25 ug/mL
							o-Xylene	25 ug/mL
							sec-Butylbenzene	25 ug/mL
							Styrene	25 ug/mL
							tert-Butylbenzene	25 ug/mL
							Tetrachloroethene	25 ug/mL
							Tetrahydrofuran	50 ug/mL
							Toluene	25 ug/mL
							trans-1,2-Dichloroethene	25 ug/mL
							trans-1,3-Dichloropropene	25 ug/mL
							trans-1,4-Dichloro-2-butene	25 ug/mL
							Trichloroethene	25 ug/mL
.VOA8260GAS1ST_00166	10/31/18		Restek, Lot A0115012		(Purchased Reagent)		Bromomethane	2500 ug/mL
							Butadiene	2500 ug/mL
							Chloroethane	2500 ug/mL
							Chloromethane	2500 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Dichlorodifluoromethane	2500 ug/mL
							Dichlorofluoromethane	2500 ug/mL
							Trichlorofluoromethane	2500 ug/mL
							Vinyl chloride	2500 ug/mL
.VOA8260VOAPRI_00210	10/07/16	09/07/16	Methanol, Lot 127999	10 mL	VOA8260KET1ST_00074	0.2 mL	2-Butanone (MEK)	250 ug/mL
							2-Hexanone	250 ug/mL
							4-Methyl-2-pentanone (MIBK)	250 ug/mL
							Acetone	250 ug/mL
					VOA8260MEGA1_00053	1 mL	1,1,1,2-Tetrachloroethane	250 ug/mL
							1,1,1-Trichloroethane	250 ug/mL
							1,1,2,2-Tetrachloroethane	250 ug/mL
							1,1,2-Trichloro-1,2,2-trifluoroethane	250 ug/mL
							1,1,2-Trichloroethane	250 ug/mL
							1,1-Dichloroethane	250 ug/mL
							1,1-Dichloroethene	250 ug/mL
							1,1-Dichloropropene	250 ug/mL
							1,2,3-Trichlorobenzene	250 ug/mL
							1,2,3-Trichloropropane	250 ug/mL
							1,2,4-Trichlorobenzene	250 ug/mL
							1,2,4-Trimethylbenzene	250 ug/mL
							1,2-Dibromo-3-Chloropropane	250 ug/mL
							1,2-Dibromoethane (EDB)	250 ug/mL
							1,2-Dichlorobenzene	250 ug/mL
							1,2-Dichloroethane	250 ug/mL
							1,2-Dichloropropane	250 ug/mL
							1,3,5-Trimethylbenzene	250 ug/mL
							1,3-Dichlorobenzene	250 ug/mL
							1,3-Dichloropropane	250 ug/mL
							1,4-Dichlorobenzene	250 ug/mL
							1,4-Dioxane	5000 ug/mL
							2,2-Dichloropropane	250 ug/mL
							2-Chlorotoluene	250 ug/mL
							2-Methyl-2-propanol	2500 ug/mL
							3-Chloro-1-propene	250 ug/mL
							4-Chlorotoluene	250 ug/mL
							4-Isopropyltoluene	250 ug/mL
							Acrylonitrile	2500 ug/mL
							Benzene	250 ug/mL
							Bromobenzene	250 ug/mL
							Bromochloromethane	250 ug/mL
							Bromodichloromethane	250 ug/mL
							Bromoform	250 ug/mL
							Carbon disulfide	250 ug/mL
							Carbon tetrachloride	250 ug/mL
							Chlorobenzene	250 ug/mL
							Chloroform	250 ug/mL
							cis-1,2-Dichloroethene	250 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							cis-1,3-Dichloropropene	250 ug/mL
							Cyclohexane	250 ug/mL
							Dibromochloromethane	250 ug/mL
							Dibromomethane	250 ug/mL
							Ethyl ether	250 ug/mL
							Ethyl methacrylate	250 ug/mL
							Ethylbenzene	250 ug/mL
							Hexachlorobutadiene	250 ug/mL
							Hexane	250 ug/mL
							Iodomethane	250 ug/mL
							Isobutyl alcohol	6250 ug/mL
							Isopropylbenzene	250 ug/mL
							m-Xylene & p-Xylene	250 ug/mL
							Methyl acetate	1250 ug/mL
							Methyl tert-butyl ether	250 ug/mL
							Methylcyclohexane	250 ug/mL
							Methylene Chloride	250 ug/mL
							n-Butylbenzene	250 ug/mL
							n-Heptane	250 ug/mL
							N-Propylbenzene	250 ug/mL
							Naphthalene	250 ug/mL
							o-Xylene	250 ug/mL
							sec-Butylbenzene	250 ug/mL
							Styrene	250 ug/mL
							tert-Butylbenzene	250 ug/mL
							Tetrachloroethene	250 ug/mL
							Tetrahydrofuran	500 ug/mL
							Toluene	250 ug/mL
							trans-1,2-Dichloroethene	250 ug/mL
							trans-1,3-Dichloropropene	250 ug/mL
							trans-1,4-Dichloro-2-butene	250 ug/mL
							Trichloroethene	250 ug/mL
..VOA8260KET1ST_00074	11/30/18		Restek, Lot A0115554		(Purchased Reagent)		2-Butanone (MEK)	12500 ug/mL
							2-Hexanone	12500 ug/mL
							4-Methyl-2-pentanone (MIBK)	12500 ug/mL
							Acetone	12500 ug/mL
..VOA8260MEGA1_00053	03/31/18		Restek, Lot A0108177		(Purchased Reagent)		1,1,1,2-Tetrachloroethane	2500 ug/mL
							1,1,1-Trichloroethane	2500 ug/mL
							1,1,2,2-Tetrachloroethane	2500 ug/mL
							1,1,2-Trichloro-1,2,2-trifluoroethane	2500 ug/mL
							1,1,2-Trichloroethane	2500 ug/mL
							1,1-Dichloroethane	2500 ug/mL
							1,1-Dichloroethene	2500 ug/mL
							1,1-Dichloropropene	2500 ug/mL
							1,2,3-Trichlorobenzene	2500 ug/mL
							1,2,3-Trichloropropane	2500 ug/mL
							1,2,4-Trichlorobenzene	2500 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,2,4-Trimethylbenzene	2500 ug/mL
							1,2-Dibromo-3-Chloropropane	2500 ug/mL
							1,2-Dibromoethane (EDB)	2500 ug/mL
							1,2-Dichlorobenzene	2500 ug/mL
							1,2-Dichloroethane	2500 ug/mL
							1,2-Dichloropropane	2500 ug/mL
							1,3,5-Trimethylbenzene	2500 ug/mL
							1,3-Dichlorobenzene	2500 ug/mL
							1,3-Dichloropropane	2500 ug/mL
							1,4-Dichlorobenzene	2500 ug/mL
							1,4-Dioxane	50000 ug/mL
							2,2-Dichloropropane	2500 ug/mL
							2-Chlorotoluene	2500 ug/mL
							2-Methyl-2-propanol	25000 ug/mL
							3-Chloro-1-propene	2500 ug/mL
							4-Chlorotoluene	2500 ug/mL
							4-Isopropyltoluene	2500 ug/mL
							Acrylonitrile	25000 ug/mL
							Benzene	2500 ug/mL
							Bromobenzene	2500 ug/mL
							Bromochloromethane	2500 ug/mL
							Bromodichloromethane	2500 ug/mL
							Bromoform	2500 ug/mL
							Carbon disulfide	2500 ug/mL
							Carbon tetrachloride	2500 ug/mL
							Chlorobenzene	2500 ug/mL
							Chloroform	2500 ug/mL
							cis-1,2-Dichloroethene	2500 ug/mL
							cis-1,3-Dichloropropene	2500 ug/mL
							Cyclohexane	2500 ug/mL
							Dibromochloromethane	2500 ug/mL
							Dibromomethane	2500 ug/mL
							Ethyl ether	2500 ug/mL
							Ethyl methacrylate	2500 ug/mL
							Ethylbenzene	2500 ug/mL
							Hexachlorobutadiene	2500 ug/mL
							Hexane	2500 ug/mL
							Iodomethane	2500 ug/mL
							Isobutyl alcohol	62500 ug/mL
							Isopropylbenzene	2500 ug/mL
							m-Xylene & p-Xylene	2500 ug/mL
							Methyl acetate	12500 ug/mL
							Methyl tert-butyl ether	2500 ug/mL
							Methylcyclohexane	2500 ug/mL
							Methylene Chloride	2500 ug/mL
							n-Butylbenzene	2500 ug/mL
							n-Heptane	2500 ug/mL
							N-Propylbenzene	2500 ug/mL

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Naphthalene	2500 ug/mL
							o-Xylene	2500 ug/mL
							sec-Butylbenzene	2500 ug/mL
							Styrene	2500 ug/mL
							tert-Butylbenzene	2500 ug/mL
							Tetrachloroethene	2500 ug/mL
							Tetrahydrofuran	5000 ug/mL
							Toluene	2500 ug/mL
							trans-1,2-Dichloroethene	2500 ug/mL
							trans-1,3-Dichloropropene	2500 ug/mL
							trans-1,4-Dichloro-2-butene	2500 ug/mL
							Trichloroethene	2500 ug/mL
VOA8260VOAPRI_00216	10/21/16	10/14/16	Methanol, Lot 136118	10 mL	VOA8260GAS1ST_00168	0.1 mL	Bromomethane	25 ug/mL
							Butadiene	25 ug/mL
							Chloroethane	25 ug/mL
							Chloromethane	25 ug/mL
							Dichlorodifluoromethane	25 ug/mL
							Dichlorofluoromethane	25 ug/mL
							Trichlorofluoromethane	25 ug/mL
							Vinyl chloride	25 ug/mL
					VOA8260VOAPRI_00214	1 mL	2-Butanone (MEK)	25 ug/mL
							2-Hexanone	25 ug/mL
							4-Methyl-2-pentanone (MIBK)	25 ug/mL
							Acetone	25 ug/mL
							1,1,1,2-Tetrachloroethane	25 ug/mL
							1,1,1-Trichloroethane	25 ug/mL
							1,1,2,2-Tetrachloroethane	25 ug/mL
							1,1,2-Trichloro-1,2,2-trifluoroethane	25 ug/mL
							1,1,2-Trichloroethane	25 ug/mL
							1,1-Dichloroethane	25 ug/mL
							1,1-Dichloroethene	25 ug/mL
							1,1-Dichloropropene	25 ug/mL
							1,2,3-Trichlorobenzene	25 ug/mL
							1,2,3-Trichloropropane	25 ug/mL
							1,2,4-Trichlorobenzene	25 ug/mL
							1,2,4-Trimethylbenzene	25 ug/mL
							1,2-Dibromo-3-Chloropropane	25 ug/mL
							1,2-Dibromoethane (EDB)	25 ug/mL
							1,2-Dichlorobenzene	25 ug/mL
							1,2-Dichloroethane	25 ug/mL
							1,2-Dichloropropane	25 ug/mL
							1,3,5-Trimethylbenzene	25 ug/mL
							1,3-Dichlorobenzene	25 ug/mL
							1,3-Dichloropropane	25 ug/mL
							1,4-Dichlorobenzene	25 ug/mL
							1,4-Dioxane	500 ug/mL
							2,2-Dichloropropane	25 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2-Chlorotoluene	25 ug/mL
							2-Methyl-2-propanol	250 ug/mL
							3-Chloro-1-propene	25 ug/mL
							4-Chlorotoluene	25 ug/mL
							4-Isopropyltoluene	25 ug/mL
							Acrylonitrile	250 ug/mL
							Benzene	25 ug/mL
							Bromobenzene	25 ug/mL
							Bromochloromethane	25 ug/mL
							Bromodichloromethane	25 ug/mL
							Bromoform	25 ug/mL
							Carbon disulfide	25 ug/mL
							Carbon tetrachloride	25 ug/mL
							Chlorobenzene	25 ug/mL
							Chloroform	25 ug/mL
							cis-1,2-Dichloroethene	25 ug/mL
							cis-1,3-Dichloropropene	25 ug/mL
							Cyclohexane	25 ug/mL
							Dibromochloromethane	25 ug/mL
							Dibromomethane	25 ug/mL
							Ethyl ether	25 ug/mL
							Ethyl methacrylate	25 ug/mL
							Ethylbenzene	25 ug/mL
							Hexachlorobutadiene	25 ug/mL
							Hexane	25 ug/mL
							Iodomethane	25 ug/mL
							Isobutyl alcohol	625 ug/mL
							Isopropylbenzene	25 ug/mL
							m-Xylene & p-Xylene	25 ug/mL
							Methyl acetate	125 ug/mL
							Methyl tert-butyl ether	25 ug/mL
							Methylcyclohexane	25 ug/mL
							Methylene Chloride	25 ug/mL
							n-Butylbenzene	25 ug/mL
							n-Heptane	25 ug/mL
							N-Propylbenzene	25 ug/mL
							Naphthalene	25 ug/mL
							o-Xylene	25 ug/mL
							sec-Butylbenzene	25 ug/mL
							Styrene	25 ug/mL
							tert-Butylbenzene	25 ug/mL
							Tetrachloroethene	25 ug/mL
							Tetrahydrofuran	50 ug/mL
							Toluene	25 ug/mL
							trans-1,2-Dichloroethene	25 ug/mL
							trans-1,3-Dichloropropene	25 ug/mL
							trans-1,4-Dichloro-2-butene	25 ug/mL
							Trichloroethene	25 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
.VOA8260GAS1ST_00168	04/30/19		Restek, Lot A0118719		(Purchased Reagent)		Bromomethane	2500 ug/mL
							Butadiene	2500 ug/mL
							Chloroethane	2500 ug/mL
							Chloromethane	2500 ug/mL
							Dichlorodifluoromethane	2500 ug/mL
							Dichlorofluoromethane	2500 ug/mL
							Trichlorofluoromethane	2500 ug/mL
							Vinyl chloride	2500 ug/mL
.VOA8260VOAPRI_00214	11/04/16	10/04/16	Methanol, Lot 136118	10 mL	VOA8260KET1ST_00079	0.2 mL	2-Butanone (MEK)	250 ug/mL
							2-Hexanone	250 ug/mL
							4-Methyl-2-pentanone (MIBK)	250 ug/mL
							Acetone	250 ug/mL
					VOA8260MEGA1_00054	1 mL	1,1,1,2-Tetrachloroethane	250 ug/mL
							1,1,1-Trichloroethane	250 ug/mL
							1,1,2,2-Tetrachloroethane	250 ug/mL
							1,1,2-Trichloro-1,2,2-trifluoroethane	250 ug/mL
							1,1,2-Trichloroethane	250 ug/mL
							1,1-Dichloroethane	250 ug/mL
							1,1-Dichloroethene	250 ug/mL
							1,1-Dichloropropene	250 ug/mL
							1,2,3-Trichlorobenzene	250 ug/mL
							1,2,3-Trichloropropane	250 ug/mL
							1,2,4-Trichlorobenzene	250 ug/mL
							1,2,4-Trimethylbenzene	250 ug/mL
							1,2-Dibromo-3-Chloropropane	250 ug/mL
							1,2-Dibromoethane (EDB)	250 ug/mL
							1,2-Dichlorobenzene	250 ug/mL
							1,2-Dichloroethane	250 ug/mL
							1,2-Dichloropropane	250 ug/mL
							1,3,5-Trimethylbenzene	250 ug/mL
							1,3-Dichlorobenzene	250 ug/mL
							1,3-Dichloropropane	250 ug/mL
							1,4-Dichlorobenzene	250 ug/mL
							1,4-Dioxane	5000 ug/mL
							2,2-Dichloropropane	250 ug/mL
							2-Chlorotoluene	250 ug/mL
							2-Methyl-2-propanol	2500 ug/mL
							3-Chloro-1-propene	250 ug/mL
							4-Chlorotoluene	250 ug/mL
							4-Isopropyltoluene	250 ug/mL
							Acrylonitrile	2500 ug/mL
							Benzene	250 ug/mL
							Bromobenzene	250 ug/mL
							Bromochloromethane	250 ug/mL
							Bromodichloromethane	250 ug/mL
							Bromoform	250 ug/mL
							Carbon disulfide	250 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Carbon tetrachloride	250 ug/mL
							Chlorobenzene	250 ug/mL
							Chloroform	250 ug/mL
							cis-1,2-Dichloroethene	250 ug/mL
							cis-1,3-Dichloropropene	250 ug/mL
							Cyclohexane	250 ug/mL
							Dibromochloromethane	250 ug/mL
							Dibromomethane	250 ug/mL
							Ethyl ether	250 ug/mL
							Ethyl methacrylate	250 ug/mL
							Ethylbenzene	250 ug/mL
							Hexachlorobutadiene	250 ug/mL
							Hexane	250 ug/mL
							Iodomethane	250 ug/mL
							Isobutyl alcohol	6250 ug/mL
							Isopropylbenzene	250 ug/mL
							m-Xylene & p-Xylene	250 ug/mL
							Methyl acetate	1250 ug/mL
							Methyl tert-butyl ether	250 ug/mL
							Methylcyclohexane	250 ug/mL
							Methylene Chloride	250 ug/mL
							n-Butylbenzene	250 ug/mL
							n-Heptane	250 ug/mL
							N-Propylbenzene	250 ug/mL
							Naphthalene	250 ug/mL
							o-Xylene	250 ug/mL
							sec-Butylbenzene	250 ug/mL
							Styrene	250 ug/mL
							tert-Butylbenzene	250 ug/mL
							Tetrachloroethene	250 ug/mL
							Tetrahydrofuran	500 ug/mL
							Toluene	250 ug/mL
							trans-1,2-Dichloroethene	250 ug/mL
							trans-1,3-Dichloropropene	250 ug/mL
							trans-1,4-Dichloro-2-butene	250 ug/mL
							Trichloroethene	250 ug/mL
..VOA8260KET1ST_00079	11/30/18		Restek, Lot A0115554		(Purchased Reagent)		2-Butanone (MEK)	12500 ug/mL
							2-Hexanone	12500 ug/mL
							4-Methyl-2-pentanone (MIBK)	12500 ug/mL
							Acetone	12500 ug/mL
..VOA8260MEGA1_00054	03/31/18		Restek, Lot A0108177		(Purchased Reagent)		1,1,1,2-Tetrachloroethane	2500 ug/mL
							1,1,1-Trichloroethane	2500 ug/mL
							1,1,2,2-Tetrachloroethane	2500 ug/mL
							1,1,2-Trichloro-1,2,2-trifluoroethane	2500 ug/mL
							1,1,2-Trichloroethane	2500 ug/mL
							1,1-Dichloroethane	2500 ug/mL
							1,1-Dichloroethene	2500 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							1,1-Dichloropropene	2500 ug/mL
							1,2,3-Trichlorobenzene	2500 ug/mL
							1,2,3-Trichloropropane	2500 ug/mL
							1,2,4-Trichlorobenzene	2500 ug/mL
							1,2,4-Trimethylbenzene	2500 ug/mL
							1,2-Dibromo-3-Chloropropane	2500 ug/mL
							1,2-Dibromoethane (EDB)	2500 ug/mL
							1,2-Dichlorobenzene	2500 ug/mL
							1,2-Dichloroethane	2500 ug/mL
							1,2-Dichloropropane	2500 ug/mL
							1,3,5-Trimethylbenzene	2500 ug/mL
							1,3-Dichlorobenzene	2500 ug/mL
							1,3-Dichloropropane	2500 ug/mL
							1,4-Dichlorobenzene	2500 ug/mL
							1,4-Dioxane	50000 ug/mL
							2,2-Dichloropropane	2500 ug/mL
							2-Chlorotoluene	2500 ug/mL
							2-Methyl-2-propanol	25000 ug/mL
							3-Chloro-1-propene	2500 ug/mL
							4-Chlorotoluene	2500 ug/mL
							4-Isopropyltoluene	2500 ug/mL
							Acrylonitrile	25000 ug/mL
							Benzene	2500 ug/mL
							Bromobenzene	2500 ug/mL
							Bromochloromethane	2500 ug/mL
							Bromodichloromethane	2500 ug/mL
							Bromoform	2500 ug/mL
							Carbon disulfide	2500 ug/mL
							Carbon tetrachloride	2500 ug/mL
							Chlorobenzene	2500 ug/mL
							Chloroform	2500 ug/mL
							cis-1,2-Dichloroethene	2500 ug/mL
							cis-1,3-Dichloropropene	2500 ug/mL
							Cyclohexane	2500 ug/mL
							Dibromochloromethane	2500 ug/mL
							Dibromomethane	2500 ug/mL
							Ethyl ether	2500 ug/mL
							Ethyl methacrylate	2500 ug/mL
							Ethylbenzene	2500 ug/mL
							Hexachlorobutadiene	2500 ug/mL
							Hexane	2500 ug/mL
							Iodomethane	2500 ug/mL
							Isobutyl alcohol	62500 ug/mL
							Isopropylbenzene	2500 ug/mL
							m-Xylene & p-Xylene	2500 ug/mL
							Methyl acetate	12500 ug/mL
							Methyl tert-butyl ether	2500 ug/mL
							Methylcyclohexane	2500 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							Methylene Chloride	2500 ug/mL
							n-Butylbenzene	2500 ug/mL
							n-Heptane	2500 ug/mL
							N-Propylbenzene	2500 ug/mL
							Naphthalene	2500 ug/mL
							o-Xylene	2500 ug/mL
							sec-Butylbenzene	2500 ug/mL
							Styrene	2500 ug/mL
							tert-Butylbenzene	2500 ug/mL
							Tetrachloroethene	2500 ug/mL
							Tetrahydrofuran	5000 ug/mL
							Toluene	2500 ug/mL
							trans-1,2-Dichloroethene	2500 ug/mL
							trans-1,3-Dichloropropene	2500 ug/mL
							trans-1,4-Dichloro-2-butene	2500 ug/mL
							Trichloroethene	2500 ug/mL
VOA8260VOAPRI_00216	10/21/16	10/14/16	Methanol, Lot 136118	10 mL	VOA8260VOAPRI_00214	1 mL	Xylenes, Total	50 ug/mL
.VOA8260VOAPRI_00214	11/04/16	10/04/16	Methanol, Lot 136118	10 mL	VOA8260MEGA1_00054	1 mL	Xylenes, Total	500 ug/mL
..VOA8260MEGA1_00054	03/31/18		Restek, Lot A0108177		(Purchased Reagent)		Xylenes, Total	5000 ug/mL
voaW2CLEReste_00001	10/05/16	09/28/16	Methanol, Lot 2019056	10 mL	VOACEVERES_00104	0.2 mL	2-Chloroethyl vinyl ether	50 ug/mL
.VOACEVERES_00104	11/30/18		Restek, Lot A0115628		(Purchased Reagent)		2-Chloroethyl vinyl ether	2500 ug/mL
voaW2cleveRes_00002	10/24/16	10/17/16	Methanol, Lot 2019056	10 mL	VOACEVERES2ND_00067	0.2 mL	2-Chloroethyl vinyl ether	50 ug/mL
.VOACEVERES2ND_00067	11/30/18		Restek, Lot A0115500		(Purchased Reagent)		2-Chloroethyl vinyl ether	2500 ug/mL
voaWAcro1stRe_00008	10/01/16	09/01/16	Methanol, Lot 2019052	100 mL	VOAACRORES_00102	0.125 mL	Acrolein	25 ug/mL
.VOAACRORES_00102	10/31/16		Restek, Lot A0119846		(Purchased Reagent)		Acrolein	20000 ug/mL
voaWacro2ndRe_00007	10/20/16	09/20/16	Methanol, Lot 2019052	100 mL	VOAACRRES2ND_00091	0.125 mL	Acrolein	25 ug/mL
.VOAACRRES2ND_00091	10/31/16		Restek, Lot A0119844		(Purchased Reagent)		Acrolein	20000 ug/mL
voaWEEmixRest_00001	10/27/16	09/27/16	Methanol, Lot 2019056	25 mL	VOARESEE1ST_00035	0.125 mL	1,2-dichloro-4-(trifluoromethyl)benzene	25 ug/mL
							2,3,6-Trichlorotoluene	25 ug/mL
							2,3- & 3,4- Dichlorotoluene	50 ug/mL
							2,4,5-Trichlorotoluene	25 ug/mL
							2,4- & 2,5- & 2,6-Dichlorotoluene	75 ug/mL
							2,4-Dichloro-1-(triflouromethyl)-benzene	25 ug/mL
							2,5-Dichlorobenzotrifluoride	25 ug/mL
							2-Chlorobenzotrifluoride	25 ug/mL
							3-Chlorobenzotrifluoride	25 ug/mL
							3-Chlorotoluene	25 ug/mL
							4-Chlorobenzotrifluoride	25 ug/mL
.VOARESEE1ST_00035	01/01/18		Restek, Lot A0120234		(Purchased Reagent)		1,2-dichloro-4-(trifluoromethyl)benzene	5000 ug/mL
							2,3,6-Trichlorotoluene	5000 ug/mL
							2,3- & 3,4- Dichlorotoluene	10000 ug/mL
							2,4,5-Trichlorotoluene	5000 ug/mL

REAGENT TRACEABILITY SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Reagent ID	Exp Date	Prep Date	Dilutant Used	Reagent Final Volume	Parent Reagent		Analyte	Concentration
					Reagent ID	Volume Added		
							2,4- & 2,5- & 2,6-Dichlorotoluene	15000 ug/mL
							2,4-Dichloro-1-(triflouromethyl)-benzene	5000 ug/mL
							2,5-Dichlorobenzotrifluoride	5000 ug/mL
							2-Chlorobenzotrifluoride	5000 ug/mL
							3-Chlorobenzotrifluoride	5000 ug/mL
							3-Chlorotoluene	5000 ug/mL
							4-Chlorobenzotrifluoride	5000 ug/mL
voaWket2ndRes_00013	10/20/17	09/20/16	Methanol, Lot 2019052	50 mL	VOA8260KET2ND_00079	0.1 mL	2-Butanone (MEK)	25 ug/mL
							2-Hexanone	25 ug/mL
							4-Methyl-2-pentanone (MIBK)	25 ug/mL
							Acetone	25 ug/mL
.VOA8260KET2ND_00079	11/30/18		Restek, Lot A0115554		(Purchased Reagent)		2-Butanone (MEK)	12500 ug/mL
							2-Hexanone	12500 ug/mL
							4-Methyl-2-pentanone (MIBK)	12500 ug/mL
							Acetone	12500 ug/mL
voaWKetPriRes_00002	10/26/16	09/26/16	Methanol, Lot 2019054	50 mL	VOA8260KET1ST_00075	0.1 mL	2-Butanone (MEK)	25 ug/mL
							4-Methyl-2-pentanone (MIBK)	25 ug/mL
.VOA8260KET1ST_00075	11/30/18		Restek, Lot A0115554		(Purchased Reagent)		2-Butanone (MEK)	12500 ug/mL
							4-Methyl-2-pentanone (MIBK)	12500 ug/mL
voaWKetPriRes_00002	10/26/16	09/26/16	Methanol, Lot 2019054	50 mL	VOA8260KET1ST_00075	0.1 mL	2-Hexanone	25 ug/mL
							Acetone	25 ug/mL
.VOA8260KET1ST_00075	11/30/18		Restek, Lot A0115554		(Purchased Reagent)		2-Hexanone	12500 ug/mL
							Acetone	12500 ug/mL
voaWVA1stRest_00008	09/30/16	09/06/16	Methanol, Lot 2019052	25 mL	VOA8260VARES_00069	0.125 mL	Vinyl acetate	25 ug/mL
.VOA8260VARES_00069	09/30/16		Restek, Lot A0118255		(Purchased Reagent)		Vinyl acetate	5000 ug/mL
voaWva2ndRest_00007	10/20/16	09/20/16	Methanol, Lot 2019052	25 mL	VOA8260VARES2_00076	0.125 mL	Vinyl acetate	25 ug/mL
.VOA8260VARES2_00076	11/30/16		Restek, Lot A0119399		(Purchased Reagent)		Vinyl acetate	5000 ug/mL

Reagent

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sv benzoepyre_00003

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CERTIFIED WEIGHT REPORT

Part Number: 71016
Lot Number: 031715
Description: Benzo(e)pyrene

Solvent(s): **Lot#**
Methylene chloride 72062

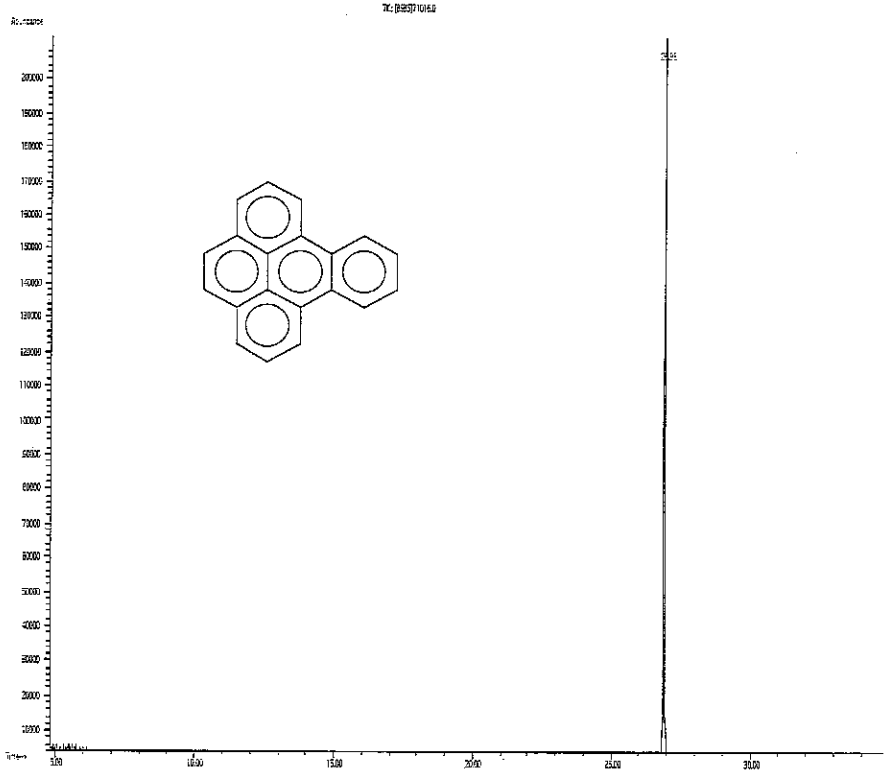
Expiration Date: 031720
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 1000

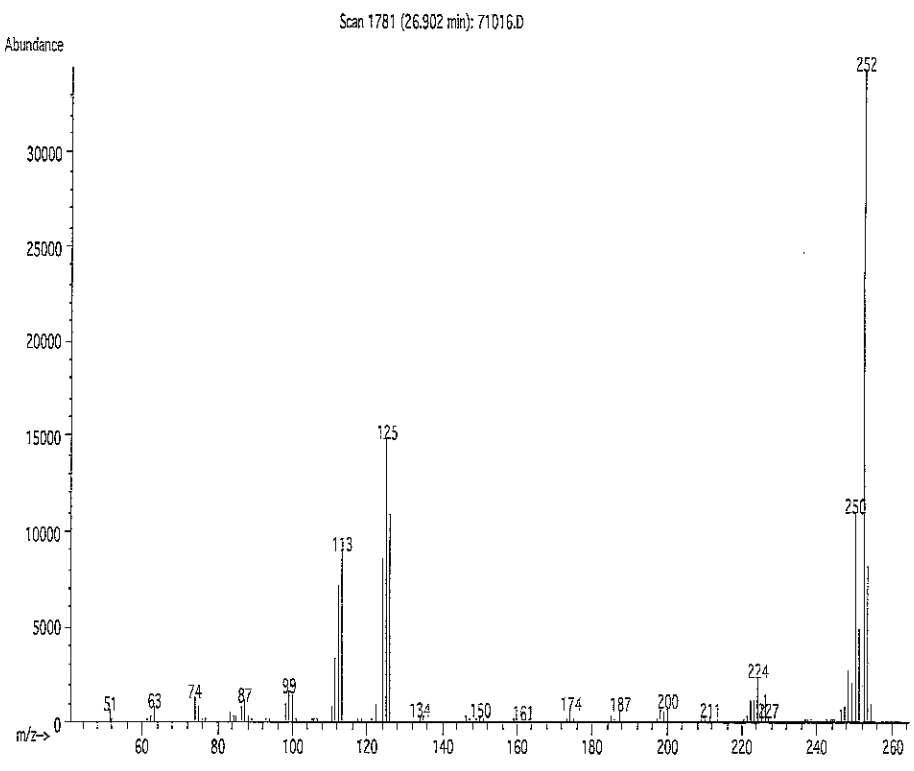
Formulated By:	Paul Barron	031715	DATE
Reviewed By:	Pedro L. Rentas	031715	DATE

5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 100.0 0.003 Flask Uncertainty

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty	MSDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. Benzo(e)pyrene	1016	012013	1000	99.5	0.2	0.10051	0.10082	1003.1	0.0041	00192-97-2	N/A	N/A

Method GC8MSD-3.M: Column:SPB-5 (30m X 0.25mm ID X 0.25µm film thickness) Temp 1 = 50°C (1min.), Temp 2 = 300°C (9min.), Rate = 10°C/min., Injector B= 250°C, Detector B = 275°C, Split Ratio = 100:1, Scan Rate = 2. Analysis performed by: Candice Warren.





Reagent

SV2356TCPs_00003

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CERTIFIED WEIGHT REPORT

Part Number: 70315
Lot Number: 092115
Description: 2,3,5,6-Tetrachlorophenol

Solvent(s): Methylene chloride **Lot#** 72062

Expiration Date: 092120
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 1000

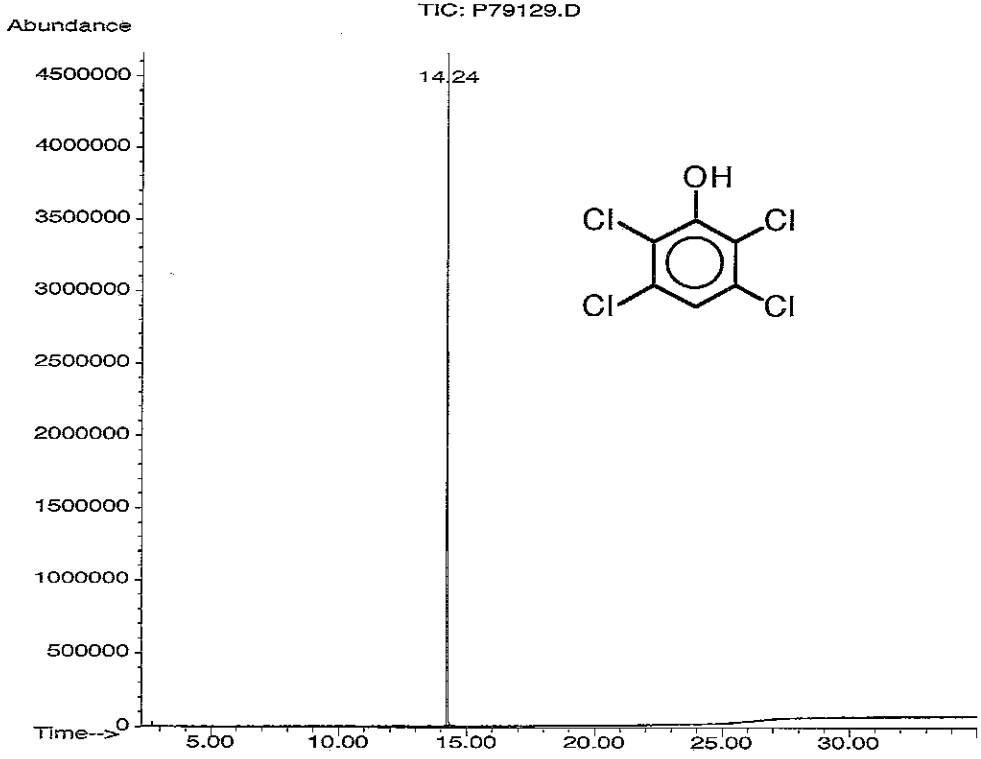
Weight(s) shown below were combined and diluted to (mL): 25.0 | 5E-05 Balance Uncertainty | 0.001 Flask Uncertainty

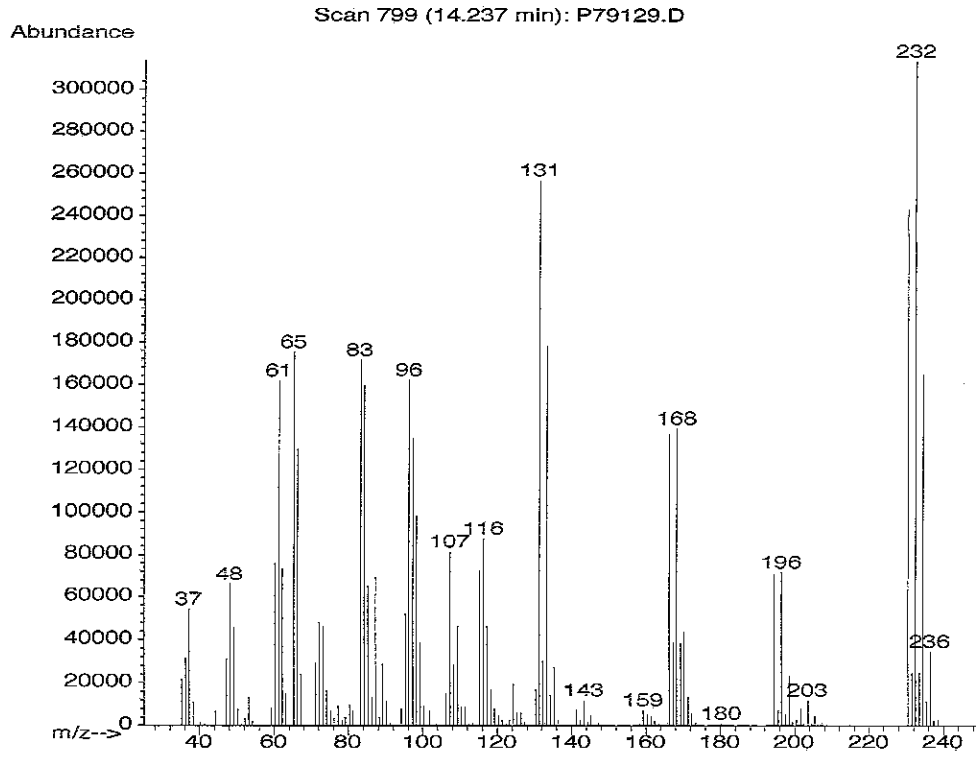
Formulated By:	Paul Barron	092115 DATE
Reviewed By:	Pedro L. Rentas	092115 DATE

MSDS Information
(Solvent Safety Info. On Attached pg.)

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty	CAS#	OSHA PEL (TWA)	LD50
1. 2,3,5,6-Tetrachlorophenol	315	060697	1000	98	0.2	0.02551	0.02555	1001.7	0.0057	00935-95-5	N/A	N/A

Method GC8MSD-3.M: Column: SPB-5 (30m X 0.25mm ID X 0.25µm film thickness) Temp 1 = 50°C (1min.), Temp 2 = 300°C (9 min.), Rate = 10°C/min., Injector B= 200°C, Detector B = 300°C. Scan Rate = 2, Split Ratio = 100:1. Analysis performed by Lance R. Boynton.





Reagent

SV2NAPAMINEs_00004

Certificate of Analysis

2-Naphthylamine Solution

Product Number: EPA-1135 **Page:** 1 of 1

Lot Number: CK-1617 **Lot Issue Date:** 20-May-2013 **Expiration Date:** 30-Jun-2017

This certified Reference Material (RM) was manufactured and verified in accordance with ULTRA's ISO 9001 registered quality system, and the analyte concentrations were verified by our ISO 17025 accredited laboratory. The true value and uncertainty value at the 95% confidence level for each analyte, determined gravimetrically, is listed below.

Analyte	CAS#	Analyte Lot	True Value
2-naphthylamine	000091-59-8	RM06488	1001 ± 5 µg/mL

Matrix: methanol (methyl alcohol)

Storage: Store at Room Temperature (15-30°C)

ULTRA uses balances calibrated with weights traceable to NIST in compliance with ANSI/NCSL Z-540-1 and ISO 9001, and calibrated Class A glassware in the manufacturing of these standards.

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William J. Leary
Quality Assurance Manager

Reagent

sv712dimbenza_00011

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CERTIFIED WEIGHT REPORT

Part Number:	70411	**Solvent(s):**	**Lot#**
Lot Number:	040915	Methylene chloride	72062
Description:	7,12-Dimethylbenz(a)anthracene		
Expiration Date:	040920		
Recommended Storage:	Refrigerate (4 °C)		
Nominal Concentration (µg/mL):	1000		

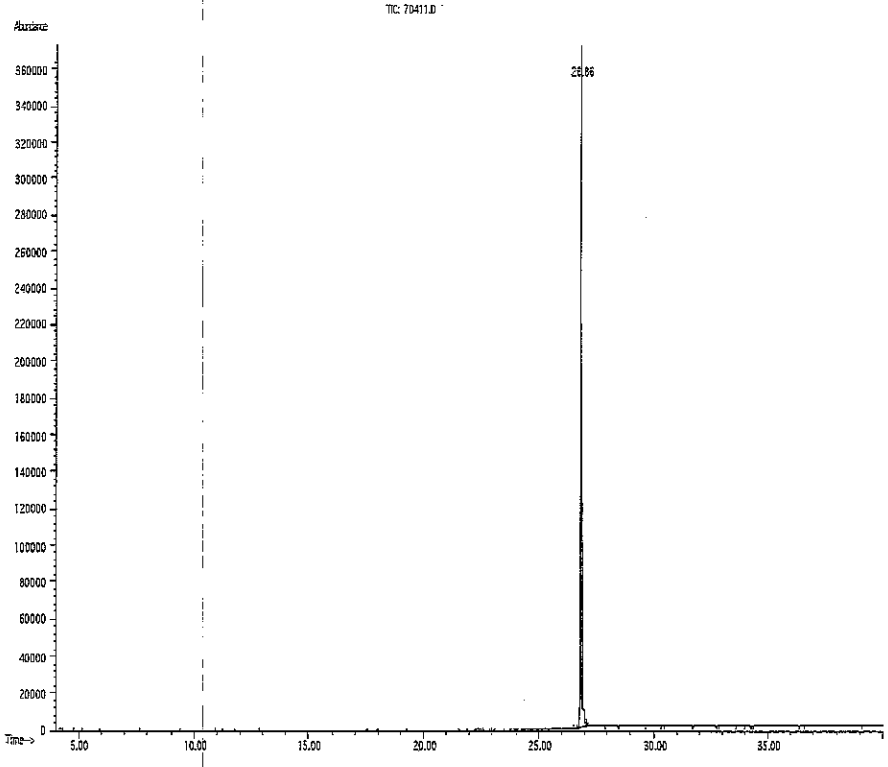
Weight(s) shown below were combined and diluted to (mL): 25.0 (5E-05 Balance Uncertainty, 0.001 Flask Uncertainty)

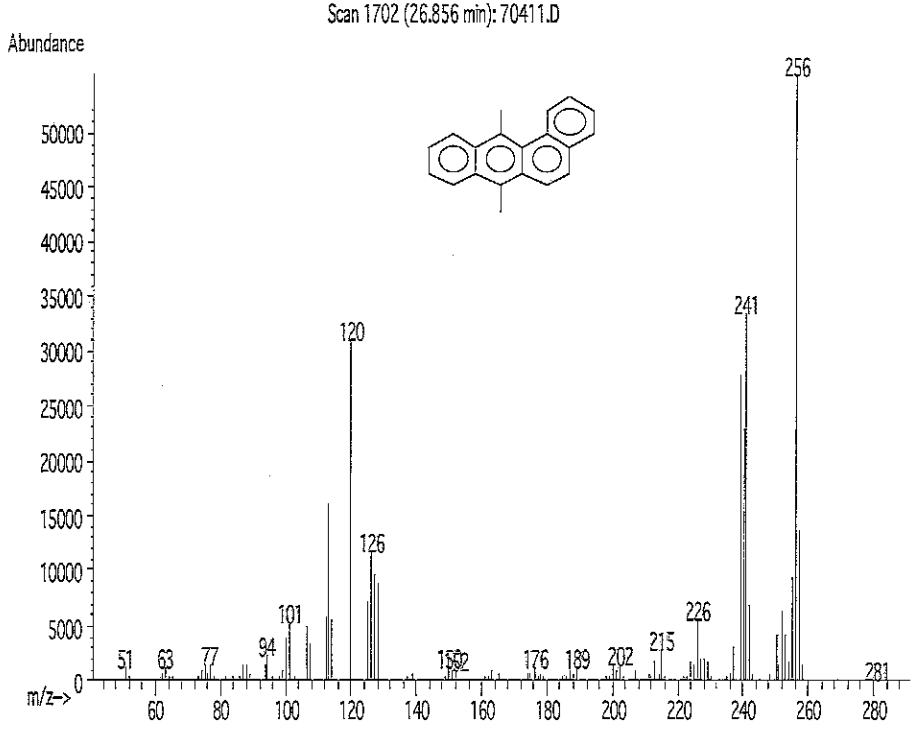
Formulated By: Paul Barron	040915 DATE
Reviewed By: Pedro L. Rentas	040915 DATE

MSDS Information
(Solvent Safety Info. On Attached pg.)

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight (g)	Actual Weight (g)	Actual Conc(µg/mL)	Expanded Uncertainty	CAS#	OSHA PEL (TWA)	LD50
1. 7,12-Dimethylbenz(a)anthracene	411	GGR4E-DC	1000	98	0.2	0.02551	0.02553	1000.9	0.00566	00057-97-6	N/A	orl-rat 327mg/kg

Method GC8MSD-3.M: Column:SPB-5 (30m X 0.25mm ID X 0.25µm film thickness), Temp 1 = 50°C (1min.), Temp 2 = 300°C (9 min.), Rate = 10°C/min., Injector B= 200°C, Detector B = 300°C, Scan Rate = 2, Analysis performed by Candice Warren.





Reagent

SVLVIntstd_00004

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Certificate of Analysis

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Reference Material Producer
Certificate #3222.01

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ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ MSDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 567684 **Lot No.:** A093676

Description : 8270 Internal Standard

8270 Internal Standard 2,000µg/mL, Methylene Chloride, 5mL/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : February 2018 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive.

C E R T I F I E D V A L U E S

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	1,4-Dichlorobenzene-d4	2,000.0 µg/mL	+/- 11.6282	µg/mL	Gravimetric
	CAS # 3855-82-1		+/- 92.7158	µg/mL	Unstressed
	Purity 99%		+/- 101.3766	µg/mL	Stressed
2	Naphthalene-d8	2,000.0 µg/mL	+/- 11.6282	µg/mL	Gravimetric
	CAS # 1146-65-2		+/- 92.7158	µg/mL	Unstressed
	Purity 99%		+/- 101.3766	µg/mL	Stressed
3	Acenaphthene-d10	2,000.0 µg/mL	+/- 11.6282	µg/mL	Gravimetric
	CAS # 15067-26-2		+/- 92.7163	µg/mL	Unstressed
	Purity 97%		+/- 101.3771	µg/mL	Stressed
4	Phenanthrene-d10	2,000.0 µg/mL	+/- 11.6282	µg/mL	Gravimetric
	CAS # 1517-22-2		+/- 92.7158	µg/mL	Unstressed
	Purity 99%		+/- 101.3766	µg/mL	Stressed
5	Chrysene-d12	2,000.0 µg/mL	+/- 11.6281	µg/mL	Gravimetric
	CAS # 1719-03-5		+/- 92.7150	µg/mL	Unstressed
	Purity 98%		+/- 101.3758	µg/mL	Stressed
6	Perylene-d12	2,000.0 µg/mL	+/- 11.6282	µg/mL	Gravimetric
	CAS # 1520-96-3		+/- 92.7158	µg/mL	Unstressed
	Purity 99%		+/- 101.3766	µg/mL	Stressed

Solvent: Methylene Chloride
CAS # 75-09-2
Purity 99%

Column:
30m x .25mm x .25um
Rtx-5 (cat.#10223)

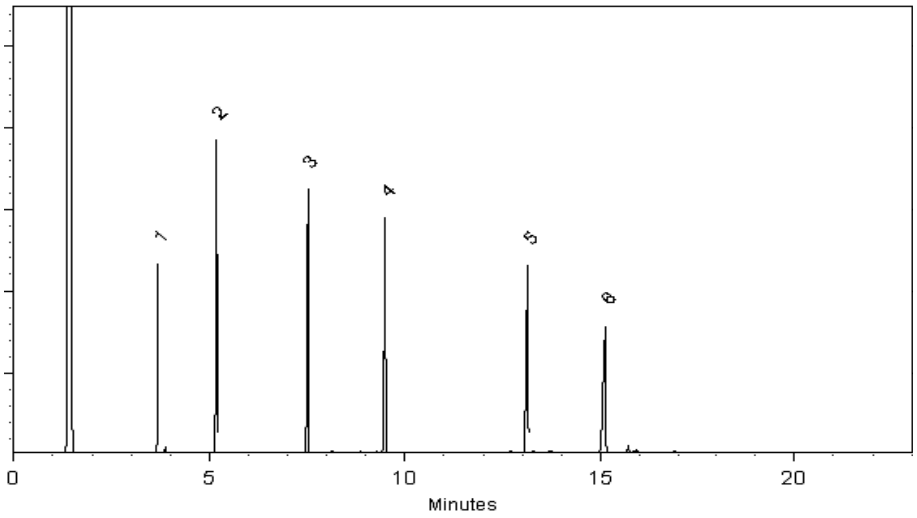
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
75°C (hold 1 min.) to 330°C
@ 20°C/min. (hold 10 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



Jodi E. Breon - QA Analyst

Date Passed: 27-Feb-2013 **Balance:** 1128342313

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date of the unopened ampul stored at the recommended storage condition is the last day of the month listed in the expiration date field.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

- Purity and/or chemical identity are determined by one or more of the following techniques: GC/FID, HPLC, GC/μECD, GC/MS, LC/MS, RI, and/or melting point.
- Compounds with a listed purity of less than 99% have been weight corrected to compensate for impurities and/or salts. A correction factor is used to calculate the amount of compound necessary to achieve the desired concentration of the parent compound in solution.
- Purity of isomeric compounds is reported as the sum of the isomers.
- Purity values are rounded to the nearest whole number.

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO Guides 34 and 35. The certified combined stressed uncertainty value (includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

$$U_{combined\ stressed} = k\sqrt{U^2_{gravimetric} + U^2_{homogeneity} + U^2_{storage\ stability} + U^2_{shipping\ stability}}$$

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- It is important to note that the shipping stability uncertainty was obtained under temperature extremes for specific time intervals; therefore, the certified combined stressed uncertainty value should only be applied to the product if it was stored at non-standard temperature conditions up to and including 7 days. Contact Restek Technical Service at www.restek.com/Contact-Us for use recommendations if your shipment was in-transit for more than 7 days at non-standard temperature conditions.
- Apply the certified combined unstressed uncertainty value if the product was received under standard shipping conditions. Apply the certified combined stressed uncertainty value if the product was received under non-standard conditions as specified below.

Label Conditions	Standard Conditions	Non-Standard Conditions
25°C Nominal (Room Temperature)	< 60°C	≥ 60°C up to 7 days
10°C or colder (Refrigerate)	< 40°C	≥ 40°C up to 7 days
0°C or colder (Freezer)	< 25°C	≥ 25°C up to 7 days

- Separate (not combined) uncertainty values for gravimetric uncertainty are also displayed on the certificate, if needed, separate homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty values are available by contacting Restek Technical Service at www.restek.com/Contact-Us.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampules are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

- Concentration is based upon gravimetric preparation using either a balance whose calibration has been verified daily using NIST traceable weights, and/or dilutions with Class A glassware.

Handling Notes:

- Samples should be transferred into deactivated vials for handling and storage. Restek supplies deactivated vials along with most standards packed in 2 mL ampules. Due to space constraints, Restek does not supply vials for larger volume ampules. Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31840, which includes complete instructions. Restek will also deactivate larger volume vials from our inventory as a custom ordered item. Contact your Restek sales or customer service representative for details.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

Reagent

SVLVstd1_00039

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ilac-MRA

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Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 570666 **Lot No.:** A0114832

Description : 8270 List 1 / Std #1 MegaMix (2016)

8270 List 1 / Std #1 MegaMix (2016) 500-2000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 10 mL **Pkg Amt:** > 5 mL

Expiration Date : April 30, 2017 **Storage:** 10°C or colder

Handling: Carcinogen/reproductive toxin. Photosensitive. Sonicate.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	1,4-Dioxane **CAS #** 123-91-1 (Lot SHBG1461V) **Purity** 99%	1,000.9 µg/mL	+/- 5.8193 µg/mL +/- 11.9648 µg/mL +/- 19.0418 µg/mL	Gravimetric Unstressed Stressed
2	Pyridine **CAS #** 110-86-1 (Lot SHBC7174V) **Purity** 99%	1,004.7 µg/mL	+/- 5.8416 µg/mL +/- 12.0106 µg/mL +/- 19.1148 µg/mL	Gravimetric Unstressed Stressed
3	N-Nitrosodimethylamine **CAS #** 62-75-9 (Lot 4370100) **Purity** 99%	1,002.6 µg/mL	+/- 5.8294 µg/mL +/- 11.9855 µg/mL +/- 19.0748 µg/mL	Gravimetric Unstressed Stressed
4	Aniline **CAS #** 62-53-3 (Lot K22Z462) **Purity** 99%	1,001.8 µg/mL	+/- 5.8246 µg/mL +/- 11.9756 µg/mL +/- 19.0590 µg/mL	Gravimetric Unstressed Stressed
5	Bis(2-chloroethyl)ether **CAS #** 111-44-4 (Lot SHBD4430V) **Purity** 99%	1,000.2 µg/mL	+/- 5.8152 µg/mL +/- 11.9565 µg/mL +/- 19.0285 µg/mL	Gravimetric Unstressed Stressed
6	2-Chlorophenol **CAS #** 95-57-8 (Lot STBF2690V) **Purity** 99%	1,001.6 µg/mL	+/- 5.8236 µg/mL +/- 11.9736 µg/mL +/- 19.0558 µg/mL	Gravimetric Unstressed Stressed
7	Phenol **CAS #** 108-95-2 (Lot SHBF1351V) **Purity** 99%	1,000.6 µg/mL	+/- 5.8176 µg/mL +/- 11.9612 µg/mL +/- 19.0361 µg/mL	Gravimetric Unstressed Stressed

24	Bis(2-chloroethoxy)methane		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 111-91-1	(Lot 3299900)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
25	2,4-Dichlorophenol		1,002.2	µg/mL	+/-	5.8271	µg/mL	Gravimetric
	CAS # 120-83-2	(Lot BCBH1617V)			+/-	11.9808	µg/mL	Unstressed
	Purity 99%				+/-	19.0672	µg/mL	Stressed
26	1,2,4-Trichlorobenzene		1,000.1	µg/mL	+/-	5.8144	µg/mL	Gravimetric
	CAS # 120-82-1	(Lot SHBC5541V)			+/-	11.9547	µg/mL	Unstressed
	Purity 98%				+/-	19.0258	µg/mL	Stressed
27	Naphthalene		1,000.4	µg/mL	+/-	5.8164	µg/mL	Gravimetric
	CAS # 91-20-3	(Lot MKBH4351V)			+/-	11.9588	µg/mL	Unstressed
	Purity 99%				+/-	19.0323	µg/mL	Stressed
28	2,6-Dichlorophenol		1,001.1	µg/mL	+/-	5.8205	µg/mL	Gravimetric
	CAS # 87-65-0	(Lot MKBN2776V)			+/-	11.9672	µg/mL	Unstressed
	Purity 99%				+/-	19.0456	µg/mL	Stressed
29	4-Chloroaniline		1,000.7	µg/mL	+/-	5.8182	µg/mL	Gravimetric
	CAS # 106-47-8	(Lot 12528PH)			+/-	11.9624	µg/mL	Unstressed
	Purity 99%				+/-	19.0380	µg/mL	Stressed
30	Hexachlorobutadiene		1,000.7	µg/mL	+/-	5.8182	µg/mL	Gravimetric
	CAS # 87-68-3	(Lot J31X013)			+/-	11.9626	µg/mL	Unstressed
	Purity 98%				+/-	19.0382	µg/mL	Stressed
31	2-Methylnaphthalene		1,001.3	µg/mL	+/-	5.8216	µg/mL	Gravimetric
	CAS # 91-57-6	(Lot 19399MJV)			+/-	11.9696	µg/mL	Unstressed
	Purity 99%				+/-	19.0494	µg/mL	Stressed
32	4-Chloro-3-methylphenol		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 59-50-7	(Lot STBC0769V)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
33	1-Methylnaphthalene		1,001.1	µg/mL	+/-	5.8203	µg/mL	Gravimetric
	CAS # 90-12-0	(Lot 525000-10)			+/-	11.9668	µg/mL	Unstressed
	Purity 99%				+/-	19.0450	µg/mL	Stressed
34	1,2,4,5-Tetrachlorobenzene		1,000.1	µg/mL	+/-	5.8145	µg/mL	Gravimetric
	CAS # 95-94-3	(Lot 06024AIV)			+/-	11.9549	µg/mL	Unstressed
	Purity 99%				+/-	19.0260	µg/mL	Stressed
35	Hexachlorocyclopentadiene		999.7	µg/mL	+/-	5.8126	µg/mL	Gravimetric
	CAS # 77-47-4	(Lot 150909)			+/-	11.9510	µg/mL	Unstressed
	Purity 97%				+/-	19.0199	µg/mL	Stressed
36	2,4,6-Trichlorophenol		1,001.4	µg/mL	+/-	5.8220	µg/mL	Gravimetric
	CAS # 88-06-2	(Lot MKBH7393V)			+/-	11.9704	µg/mL	Unstressed
	Purity 99%				+/-	19.0507	µg/mL	Stressed
37	2,4,5-Trichlorophenol		1,000.1	µg/mL	+/-	5.8145	µg/mL	Gravimetric
	CAS # 95-95-4	(Lot 150806JLM)			+/-	11.9549	µg/mL	Unstressed
	Purity 99%				+/-	19.0260	µg/mL	Stressed
38	2-Chloronaphthalene		1,000.9	µg/mL	+/-	5.8193	µg/mL	Gravimetric
	CAS # 91-58-7	(Lot AJ2UI-TE)			+/-	11.9648	µg/mL	Unstressed
	Purity 99%				+/-	19.0418	µg/mL	Stressed
39	Biphenyl		1,000.6	µg/mL	+/-	5.8178	µg/mL	Gravimetric
	CAS # 92-52-4	(Lot 1277976)			+/-	11.9616	µg/mL	Unstressed
	Purity 99%				+/-	19.0368	µg/mL	Stressed

56	Azobenzene		1,001.2	µg/mL	+/-	5.8213	µg/mL	Gravimetric
	CAS # 103-33-3	(Lot MKBS2559V)			+/-	11.9688	µg/mL	Unstressed
	Purity 99%				+/-	19.0482	µg/mL	Stressed
57	Diphenylamine		850.7	µg/mL	+/-	4.9460	µg/mL	Gravimetric
	CAS # 122-39-4	(Lot MKBN8295V)			+/-	10.1693	µg/mL	Unstressed
	Purity 99%				+/-	16.1843	µg/mL	Stressed
58	2-Nitroaniline		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 88-74-4	(Lot MKBK7597V)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
59	4,6-Dinitro-2-methylphenol (Dinitro-o-cresol)		2,000.9	µg/mL	+/-	11.6336	µg/mL	Gravimetric
	CAS # 534-52-1	(Lot LC12394V)			+/-	23.9193	µg/mL	Unstressed
	Purity 99%				+/-	38.0672	µg/mL	Stressed
60	4-Bromophenyl phenyl ether		999.8	µg/mL	+/-	5.8131	µg/mL	Gravimetric
	CAS # 101-55-3	(Lot STBB9729V)			+/-	11.9520	µg/mL	Unstressed
	Purity 98%				+/-	19.0215	µg/mL	Stressed
61	Hexachlorobenzene		1,001.6	µg/mL	+/-	5.8234	µg/mL	Gravimetric
	CAS # 118-74-1	(Lot LC10604V)			+/-	11.9732	µg/mL	Unstressed
	Purity 99%				+/-	19.0551	µg/mL	Stressed
62	Pentachlorophenol		2,000.5	µg/mL	+/-	11.6311	µg/mL	Gravimetric
	CAS # 87-86-5	(Lot 150902JLM)			+/-	23.9142	µg/mL	Unstressed
	Purity 98%				+/-	38.0591	µg/mL	Stressed
63	Phenanthrene		1,001.9	µg/mL	+/-	5.8249	µg/mL	Gravimetric
	CAS # 85-01-8	(Lot MKBT8628V)			+/-	11.9764	µg/mL	Unstressed
	Purity 99%				+/-	19.0602	µg/mL	Stressed
64	n-Octadecane (C18)		1,000.8	µg/mL	+/-	5.8187	µg/mL	Gravimetric
	CAS # 593-45-3	(Lot 27SOF)			+/-	11.9636	µg/mL	Unstressed
	Purity 99%				+/-	19.0399	µg/mL	Stressed
65	Anthracene		1,001.4	µg/mL	+/-	5.8224	µg/mL	Gravimetric
	CAS # 120-12-7	(Lot MKBK5208V)			+/-	11.9712	µg/mL	Unstressed
	Purity 99%				+/-	19.0520	µg/mL	Stressed
66	Carbazole		1,000.4	µg/mL	+/-	5.8161	µg/mL	Gravimetric
	CAS # 86-74-8	(Lot 4017900)			+/-	11.9583	µg/mL	Unstressed
	Purity 98%				+/-	19.0314	µg/mL	Stressed
67	Di-n-butylphthalate		1,003.6	µg/mL	+/-	5.8348	µg/mL	Gravimetric
	CAS # 84-74-2	(Lot MKBL8501V)			+/-	11.9967	µg/mL	Unstressed
	Purity 99%				+/-	19.0926	µg/mL	Stressed
68	Fluoranthene		1,000.7	µg/mL	+/-	5.8184	µg/mL	Gravimetric
	CAS # 206-44-0	(Lot MKBQ6360V)			+/-	11.9629	µg/mL	Unstressed
	Purity 98%				+/-	19.0389	µg/mL	Stressed
69	Pyrene		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 129-00-0	(Lot BCBL6786V)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
70	Benzyl butyl phthalate		1,000.3	µg/mL	+/-	5.8158	µg/mL	Gravimetric
	CAS # 85-68-7	(Lot 03027HV)			+/-	11.9576	µg/mL	Unstressed
	Purity 99%				+/-	19.0304	µg/mL	Stressed
71	Benz(a)anthracene		1,000.1	µg/mL	+/-	5.8147	µg/mL	Gravimetric
	CAS # 56-55-3	(Lot ER031412-01)			+/-	11.9553	µg/mL	Unstressed
	Purity 99%				+/-	19.0266	µg/mL	Stressed

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

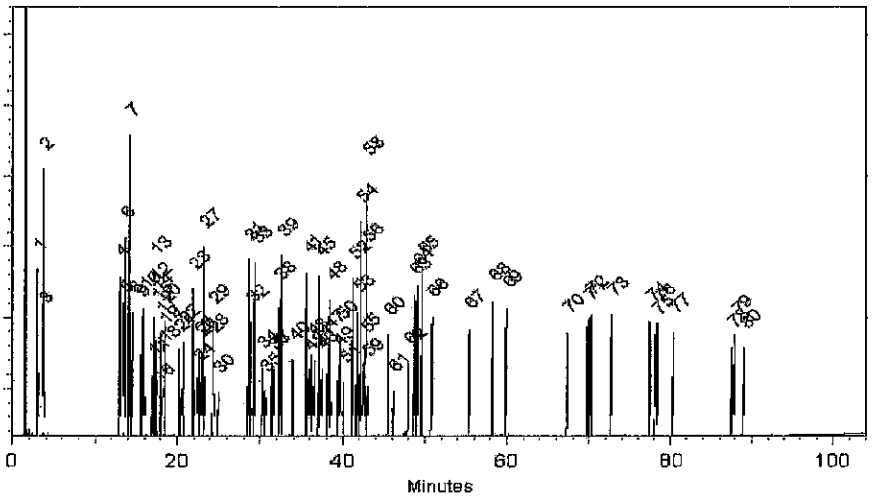
Carrier Gas:
hydrogen-constant pressure 10 psi

Temp. Program:
35°C (hold 3 min.) to 330°C
@ 3°C/min. (hold 3 min.)

Inj. Temp:
250°C

Det. Temp:
300°C

Det. Type:
FID



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Kendra Swope - Mix Technician

Date Mixed: 20-Oct-2015 **Balance:** B442140311

Jodi E. Breon - QA Analyst

Date Passed: 04-Nov-2015

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 570666 **Lot No.:** A0114832

Description : 8270 List 1 / Std #1 MegaMix (2016)

8270 List 1 / Std #1 MegaMix (2016) 500-2000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 10 mL **Pkg Amt:** > 5 mL

Expiration Date : April 30, 2017 **Storage:** 10°C or colder

Handling: Carcinogen/reproductive toxin. Photosensitive. Sonicate.

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)		Expanded Uncertainty (95% C.L.; K=2)		
1	1,4-Dioxane		1,000.9 µg/mL		+/- 5.8193 µg/mL		Gravimetric
	CAS # 123-91-1	(Lot SHBG1461V)			+/- 11.9648 µg/mL		Unstressed
	Purity 99%				+/- 19.0418 µg/mL		Stressed
2	Pyridine		1,004.7 µg/mL		+/- 5.8416 µg/mL		Gravimetric
	CAS # 110-86-1	(Lot SHBC7174V)			+/- 12.0106 µg/mL		Unstressed
	Purity 99%				+/- 19.1148 µg/mL		Stressed
3	N-Nitrosodimethylamine		1,002.6 µg/mL		+/- 5.8294 µg/mL		Gravimetric
	CAS # 62-75-9	(Lot 4370100)			+/- 11.9855 µg/mL		Unstressed
	Purity 99%				+/- 19.0748 µg/mL		Stressed
4	Aniline		1,001.8 µg/mL		+/- 5.8246 µg/mL		Gravimetric
	CAS # 62-53-3	(Lot K22Z462)			+/- 11.9756 µg/mL		Unstressed
	Purity 99%				+/- 19.0590 µg/mL		Stressed
5	Bis(2-chloroethyl)ether		1,000.2 µg/mL		+/- 5.8152 µg/mL		Gravimetric
	CAS # 111-44-4	(Lot SHBD4430V)			+/- 11.9565 µg/mL		Unstressed
	Purity 99%				+/- 19.0285 µg/mL		Stressed
6	2-Chlorophenol		1,001.6 µg/mL		+/- 5.8236 µg/mL		Gravimetric
	CAS # 95-57-8	(Lot STBF2690V)			+/- 11.9736 µg/mL		Unstressed
	Purity 99%				+/- 19.0558 µg/mL		Stressed
7	Phenol		1,000.6 µg/mL		+/- 5.8176 µg/mL		Gravimetric
	CAS # 108-95-2	(Lot SHBF1351V)			+/- 11.9612 µg/mL		Unstressed
	Purity 99%				+/- 19.0361 µg/mL		Stressed

24	Bis(2-chloroethoxy)methane		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 111-91-1	(Lot 3299900)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
25	2,4-Dichlorophenol		1,002.2	µg/mL	+/-	5.8271	µg/mL	Gravimetric
	CAS # 120-83-2	(Lot BCBH1617V)			+/-	11.9808	µg/mL	Unstressed
	Purity 99%				+/-	19.0672	µg/mL	Stressed
26	1,2,4-Trichlorobenzene		1,000.1	µg/mL	+/-	5.8144	µg/mL	Gravimetric
	CAS # 120-82-1	(Lot SHBC5541V)			+/-	11.9547	µg/mL	Unstressed
	Purity 98%				+/-	19.0258	µg/mL	Stressed
27	Naphthalene		1,000.4	µg/mL	+/-	5.8164	µg/mL	Gravimetric
	CAS # 91-20-3	(Lot MKBH4351V)			+/-	11.9588	µg/mL	Unstressed
	Purity 99%				+/-	19.0323	µg/mL	Stressed
28	2,6-Dichlorophenol		1,001.1	µg/mL	+/-	5.8205	µg/mL	Gravimetric
	CAS # 87-65-0	(Lot MKBN2776V)			+/-	11.9672	µg/mL	Unstressed
	Purity 99%				+/-	19.0456	µg/mL	Stressed
29	4-Chloroaniline		1,000.7	µg/mL	+/-	5.8182	µg/mL	Gravimetric
	CAS # 106-47-8	(Lot 12528PH)			+/-	11.9624	µg/mL	Unstressed
	Purity 99%				+/-	19.0380	µg/mL	Stressed
30	Hexachlorobutadiene		1,000.7	µg/mL	+/-	5.8182	µg/mL	Gravimetric
	CAS # 87-68-3	(Lot J31X013)			+/-	11.9626	µg/mL	Unstressed
	Purity 98%				+/-	19.0382	µg/mL	Stressed
31	2-Methylnaphthalene		1,001.3	µg/mL	+/-	5.8216	µg/mL	Gravimetric
	CAS # 91-57-6	(Lot 19399MJV)			+/-	11.9696	µg/mL	Unstressed
	Purity 99%				+/-	19.0494	µg/mL	Stressed
32	4-Chloro-3-methylphenol		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 59-50-7	(Lot STBC0769V)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
33	1-Methylnaphthalene		1,001.1	µg/mL	+/-	5.8203	µg/mL	Gravimetric
	CAS # 90-12-0	(Lot 525000-10)			+/-	11.9668	µg/mL	Unstressed
	Purity 99%				+/-	19.0450	µg/mL	Stressed
34	1,2,4,5-Tetrachlorobenzene		1,000.1	µg/mL	+/-	5.8145	µg/mL	Gravimetric
	CAS # 95-94-3	(Lot 06024AIV)			+/-	11.9549	µg/mL	Unstressed
	Purity 99%				+/-	19.0260	µg/mL	Stressed
35	Hexachlorocyclopentadiene		999.7	µg/mL	+/-	5.8126	µg/mL	Gravimetric
	CAS # 77-47-4	(Lot 150909)			+/-	11.9510	µg/mL	Unstressed
	Purity 97%				+/-	19.0199	µg/mL	Stressed
36	2,4,6-Trichlorophenol		1,001.4	µg/mL	+/-	5.8220	µg/mL	Gravimetric
	CAS # 88-06-2	(Lot MKBH7393V)			+/-	11.9704	µg/mL	Unstressed
	Purity 99%				+/-	19.0507	µg/mL	Stressed
37	2,4,5-Trichlorophenol		1,000.1	µg/mL	+/-	5.8145	µg/mL	Gravimetric
	CAS # 95-95-4	(Lot 150806JLM)			+/-	11.9549	µg/mL	Unstressed
	Purity 99%				+/-	19.0260	µg/mL	Stressed
38	2-Chloronaphthalene		1,000.9	µg/mL	+/-	5.8193	µg/mL	Gravimetric
	CAS # 91-58-7	(Lot AJ2UI-TE)			+/-	11.9648	µg/mL	Unstressed
	Purity 99%				+/-	19.0418	µg/mL	Stressed
39	Biphenyl		1,000.6	µg/mL	+/-	5.8178	µg/mL	Gravimetric
	CAS # 92-52-4	(Lot 1277976)			+/-	11.9616	µg/mL	Unstressed
	Purity 99%				+/-	19.0368	µg/mL	Stressed

56	Azobenzene		1,001.2	µg/mL	+/-	5.8213	µg/mL	Gravimetric
	CAS # 103-33-3	(Lot MKBS2559V)			+/-	11.9688	µg/mL	Unstressed
	Purity 99%				+/-	19.0482	µg/mL	Stressed
57	Diphenylamine		850.7	µg/mL	+/-	4.9460	µg/mL	Gravimetric
	CAS # 122-39-4	(Lot MKBN8295V)			+/-	10.1693	µg/mL	Unstressed
	Purity 99%				+/-	16.1843	µg/mL	Stressed
58	2-Nitroaniline		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 88-74-4	(Lot MKBK7597V)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
59	4,6-Dinitro-2-methylphenol (Dinitro-o-cresol)		2,000.9	µg/mL	+/-	11.6336	µg/mL	Gravimetric
	CAS # 534-52-1	(Lot LC12394V)			+/-	23.9193	µg/mL	Unstressed
	Purity 99%				+/-	38.0672	µg/mL	Stressed
60	4-Bromophenyl phenyl ether		999.8	µg/mL	+/-	5.8131	µg/mL	Gravimetric
	CAS # 101-55-3	(Lot STBB9729V)			+/-	11.9520	µg/mL	Unstressed
	Purity 98%				+/-	19.0215	µg/mL	Stressed
61	Hexachlorobenzene		1,001.6	µg/mL	+/-	5.8234	µg/mL	Gravimetric
	CAS # 118-74-1	(Lot LC10604V)			+/-	11.9732	µg/mL	Unstressed
	Purity 99%				+/-	19.0551	µg/mL	Stressed
62	Pentachlorophenol		2,000.5	µg/mL	+/-	11.6311	µg/mL	Gravimetric
	CAS # 87-86-5	(Lot 150902JLM)			+/-	23.9142	µg/mL	Unstressed
	Purity 98%				+/-	38.0591	µg/mL	Stressed
63	Phenanthrene		1,001.9	µg/mL	+/-	5.8249	µg/mL	Gravimetric
	CAS # 85-01-8	(Lot MKBT8628V)			+/-	11.9764	µg/mL	Unstressed
	Purity 99%				+/-	19.0602	µg/mL	Stressed
64	n-Octadecane (C18)		1,000.8	µg/mL	+/-	5.8187	µg/mL	Gravimetric
	CAS # 593-45-3	(Lot 27SOF)			+/-	11.9636	µg/mL	Unstressed
	Purity 99%				+/-	19.0399	µg/mL	Stressed
65	Anthracene		1,001.4	µg/mL	+/-	5.8224	µg/mL	Gravimetric
	CAS # 120-12-7	(Lot MKBK5208V)			+/-	11.9712	µg/mL	Unstressed
	Purity 99%				+/-	19.0520	µg/mL	Stressed
66	Carbazole		1,000.4	µg/mL	+/-	5.8161	µg/mL	Gravimetric
	CAS # 86-74-8	(Lot 4017900)			+/-	11.9583	µg/mL	Unstressed
	Purity 98%				+/-	19.0314	µg/mL	Stressed
67	Di-n-butylphthalate		1,003.6	µg/mL	+/-	5.8348	µg/mL	Gravimetric
	CAS # 84-74-2	(Lot MKBL8501V)			+/-	11.9967	µg/mL	Unstressed
	Purity 99%				+/-	19.0926	µg/mL	Stressed
68	Fluoranthene		1,000.7	µg/mL	+/-	5.8184	µg/mL	Gravimetric
	CAS # 206-44-0	(Lot MKBQ6360V)			+/-	11.9629	µg/mL	Unstressed
	Purity 98%				+/-	19.0389	µg/mL	Stressed
69	Pyrene		1,000.2	µg/mL	+/-	5.8151	µg/mL	Gravimetric
	CAS # 129-00-0	(Lot BCBL6786V)			+/-	11.9561	µg/mL	Unstressed
	Purity 99%				+/-	19.0279	µg/mL	Stressed
70	Benzyl butyl phthalate		1,000.3	µg/mL	+/-	5.8158	µg/mL	Gravimetric
	CAS # 85-68-7	(Lot 03027HV)			+/-	11.9576	µg/mL	Unstressed
	Purity 99%				+/-	19.0304	µg/mL	Stressed
71	Benz(a)anthracene		1,000.1	µg/mL	+/-	5.8147	µg/mL	Gravimetric
	CAS # 56-55-3	(Lot ER031412-01)			+/-	11.9553	µg/mL	Unstressed
	Purity 99%				+/-	19.0266	µg/mL	Stressed

Column:
30m x 0.25mm x 0.25µm
Rtx-5 (cat.#10223)

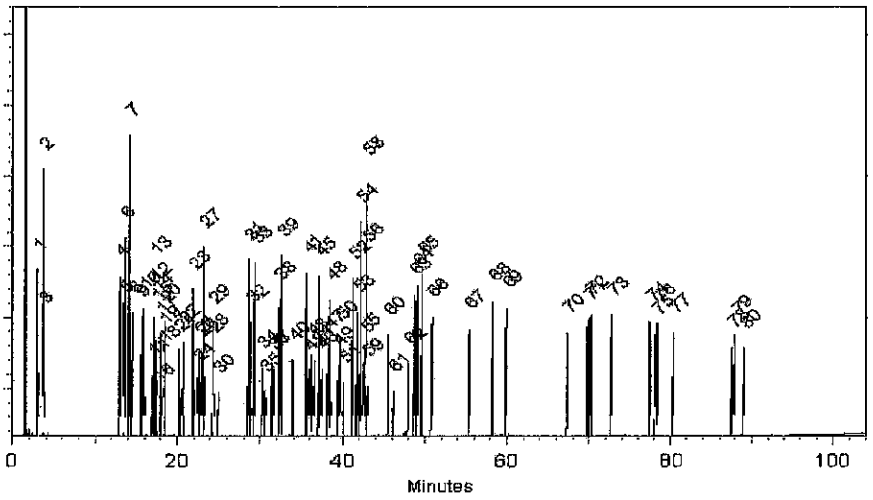
Carrier Gas:
hydrogen-constant pressure 10 psi

Temp. Program:
35°C (hold 3 min.) to 330°C
@ 3°C/min. (hold 3 min.)

Inj. Temp:
250°C

Det. Temp:
300°C

Det. Type:
FID



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Kendra Swope - Mix Technician

Date Mixed: 20-Oct-2015 **Balance:** B442140311

Jodi E. Breon - QA Analyst

Date Passed: 04-Nov-2015

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

Reagent

SVLVstd10_00005

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569731 **Lot No.:** A0115596

Description : 8270 List 1 / Std #10

8270 List 1 / Std #10 2,000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : May 31, 2017 **Storage:** 10°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	Indene	2,009.8 µg/mL	+/- 11.6852 µg/mL	Gravimetric
	CAS # 95-13-6 (Lot MKBP3098V)		+/- 112.6875 µg/mL	Unstressed
	Purity 99%		+/- 115.3242 µg/mL	Stressed
2	Benzoic acid	2,011.6 µg/mL	+/- 11.6953 µg/mL	Gravimetric
	CAS # 65-85-0 (Lot MKBL6689V)		+/- 112.7856 µg/mL	Unstressed
	Purity 99%		+/- 115.4247 µg/mL	Stressed

Solvent: Methylene Chloride
CAS # 75-09-2
Purity 99%

Reagent

SVLVstd10_00006

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Catalog No. : 569731 **Lot No.:** A0115596

Description : 8270 List 1 / Std #10

8270 List 1 / Std #10 2,000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : May 31, 2017 **Storage:** 10°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Indene	2,009.8 µg/mL	+/- 11.6852	µg/mL	Gravimetric
	CAS # 95-13-6 (Lot MKBP3098V)		+/- 112.6875	µg/mL	Unstressed
	Purity 99%		+/- 115.3242	µg/mL	Stressed
2	Benzoic acid	2,011.6 µg/mL	+/- 11.6953	µg/mL	Gravimetric
	CAS # 65-85-0 (Lot MKBL6689V)		+/- 112.7856	µg/mL	Unstressed
	Purity 99%		+/- 115.4247	µg/mL	Stressed

Solvent: Methylene Chloride
CAS # 75-09-2
Purity 99%

Reagent

SVLVstd11_00005

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569732 **Lot No.:** A0115387

Description : 8270 List 1 / Std #11

8270 List 1 / Std #11 2,000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : May 31, 2017 **Storage:** 10°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)		Expanded Uncertainty (95% C.L.; K=2)		
1	Benzaldehyde		2,017.4	µg/mL	+/- 11.7290	µg/mL	Gravimetric
	CAS # 100-52-7	(Lot SHBD3510V)			+/- 64.6675	µg/mL	Unstressed
	Purity 99%				+/- 75.1734	µg/mL	Stressed
2	epsilon-Caprolactam		2,012.4	µg/mL	+/- 11.7003	µg/mL	Gravimetric
	CAS # 105-60-2	(Lot I16X016)			+/- 64.5088	µg/mL	Unstressed
	Purity 99%				+/- 74.9890	µg/mL	Stressed
3	Atrazine		2,003.5	µg/mL	+/- 11.6483	µg/mL	Gravimetric
	CAS # 1912-24-9	(Lot TZ8ED)			+/- 64.2223	µg/mL	Unstressed
	Purity 98%				+/- 74.6560	µg/mL	Stressed

Solvent: Methylene Chloride
CAS # 75-09-2
Purity 99%

Reagent

SVLVstd11_00006

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569732 **Lot No.:** A0115387

Description : 8270 List 1 / Std #11

8270 List 1 / Std #11 2,000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : May 31, 2017 **Storage:** 10°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)		Expanded Uncertainty (95% C.L.; K=2)		
1	Benzaldehyde		2,017.4	µg/mL	+/- 11.7290	µg/mL	Gravimetric
	CAS # 100-52-7	(Lot SHBD3510V)			+/- 64.6675	µg/mL	Unstressed
	Purity 99%				+/- 75.1734	µg/mL	Stressed
2	epsilon-Caprolactam		2,012.4	µg/mL	+/- 11.7003	µg/mL	Gravimetric
	CAS # 105-60-2	(Lot I16X016)			+/- 64.5088	µg/mL	Unstressed
	Purity 99%				+/- 74.9890	µg/mL	Stressed
3	Atrazine		2,003.5	µg/mL	+/- 11.6483	µg/mL	Gravimetric
	CAS # 1912-24-9	(Lot TZ8ED)			+/- 64.2223	µg/mL	Unstressed
	Purity 98%				+/- 74.6560	µg/mL	Stressed

Solvent: Methylene Chloride
CAS # 75-09-2
Purity 99%

Reagent

SVLVstd9_00004

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569730 **Lot No.:** A0112567

Description : 8270 List 1 / Std #9

8270 List 1 / Std #9 2,000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 10 mL **Pkg Amt:** > 5 mL

Expiration Date : January 31, 2017 **Storage:** 10°C or colder

Handling: Contains carcinogen/reproductive toxin.

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Benzidine		2,001.0 µg/mL	+/- 11.6337	µg/mL	Gravimetric
	CAS # 92-87-5	(Lot 150701JLMB)		+/- 21.9078	µg/mL	Unstressed
	Purity 99%			+/- 37.1592	µg/mL	Stressed
2	3,3'-Dichlorobenzidine		2,001.5 µg/mL	+/- 11.6369	µg/mL	Gravimetric
	CAS # 91-94-1	(Lot 150701JLMA)		+/- 21.9138	µg/mL	Unstressed
	Purity 99%			+/- 37.1694	µg/mL	Stressed

Solvent: Methylene Chloride
CAS # 75-09-2
Purity 99%

Reagent

SVLVstd9_00006

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569730 **Lot No.:** A0118008

Description : 8270 List 1 / Std #9

8270 List 1 / Std #9 2,000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 10 mL **Pkg Amt:** > 5 mL

Expiration Date : September 30, 2017 **Storage:** 10°C or colder

Handling: Contains carcinogen/reproductive toxin.

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Benzidine		2,007.6 µg/mL	+/- 11.7817	µg/mL	Gravimetric
	CAS # 92-87-5	(Lot 160309JLM)		+/- 24.0524	µg/mL	Unstressed
	Purity 99%			+/- 38.2276	µg/mL	Stressed
2	3,3'-Dichlorobenzidine		2,006.0 µg/mL	+/- 11.7723	µg/mL	Gravimetric
	CAS # 91-94-1	(Lot 160311JLM)		+/- 24.0332	µg/mL	Unstressed
	Purity 99%			+/- 38.1971	µg/mL	Stressed

Solvent: Methylene Chloride
CAS # 75-09-2
Purity 99%

Reagent

SVLVSURSPK_00002

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Catalog No. : 567685 **Lot No.:** A0103960

Description : 8270 Surrogate Standard

8270 Surrogate Standard 5,000 ug/ml, Methylene Chloride, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : June 30, 2019 **Storage:** 10°C or colder

Handling: Sonicate prior to use.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	2-Fluorophenol	5,006.1 µg/mL	+/- 29.1044	µg/mL	Gravimetric
	CAS # 367-12-4 (Lot STBC5591V)		+/- 124.7363	µg/mL	Unstressed
	Purity 99%		+/- 156.8636	µg/mL	Stressed
2	Phenol-d5	5,002.5 µg/mL	+/- 29.0834	µg/mL	Gravimetric
	CAS # 4165-62-2 (Lot X479P6)		+/- 124.6466	µg/mL	Unstressed
	Purity 99%		+/- 156.7508	µg/mL	Stressed
3	Nitrobenzene-d5	5,003.7 µg/mL	+/- 29.0901	µg/mL	Gravimetric
	CAS # 4165-60-0 (Lot PR-20474)		+/- 124.6753	µg/mL	Unstressed
	Purity 99%		+/- 156.7868	µg/mL	Stressed
4	2-Fluorobiphenyl	5,002.4 µg/mL	+/- 29.0826	µg/mL	Gravimetric
	CAS # 321-60-8 (Lot B19Z016)		+/- 124.6429	µg/mL	Unstressed
	Purity 99%		+/- 156.7461	µg/mL	Stressed
5	2,4,6-Tribromophenol	5,024.2 µg/mL	+/- 29.2093	µg/mL	Gravimetric
	CAS # 118-79-6 (Lot 29699MJV)		+/- 125.1861	µg/mL	Unstressed
	Purity 99%		+/- 157.4292	µg/mL	Stressed
6	p-Terphenyl-d14	5,010.4 µg/mL	+/- 29.1291	µg/mL	Gravimetric
	CAS # 1718-51-0 (Lot PR-20577)		+/- 124.8422	µg/mL	Unstressed
	Purity 99%		+/- 156.9968	µg/mL	Stressed

Reagent

svmethylmetha_00011

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Analytical Reference Material ARM

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Scopes: http://AbsoluteStandards.com

CERTIFIED WEIGHT REPORT

Part Number: 70443
Lot Number: 021315
Description: Methyl methane sulfonate

Solvent(s): Methylene chloride **Lot#** 72062

Expiration Date: 021320
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 1000

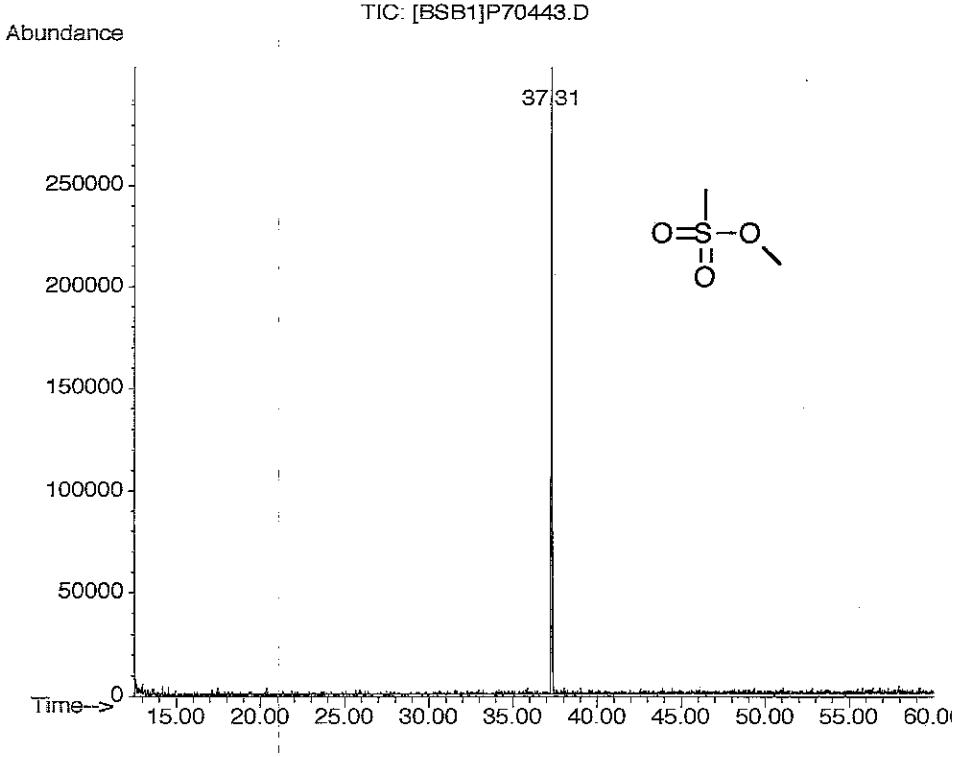
Weight(s) shown below were combined and diluted to: 25.0 5E-05 Balance Uncertainty 0.001 Flask Uncertainty

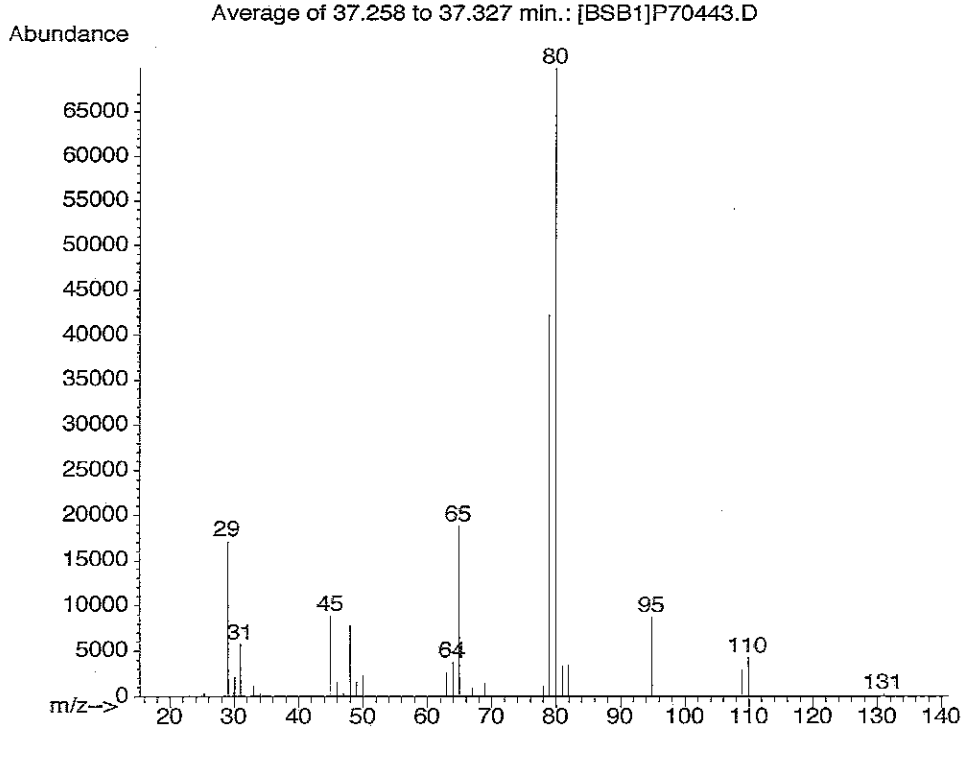
Paul Barron	021315
Formulated By: Paul Barron	DATE
Pedro Rentas	021315
Reviewed By: Pedro L. Rentas	DATE

MSDS Information
(Solvent Safety Info. On Attached pg.)

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight (g)	Actual Weight (g)	Actual Conc(µg/mL)	Expanded Uncertainty	CAS#	OSHA PEL (TWA)	LD50
1. Methyl methane sulfonate	443	07322PW	1000	99	0.2	0.02524	0.02530	1002.2	0.00565	00066-27-3	N/A	orl-rat 225mg/kg

Method GC6MSD-1: Column: Vocol (60m X 0.25mm ID X 1.5µm film thickness). Temp. 1=35°C (10min.), Temp. 2=200°C (8.75 min.), Rate=4°C/min., Injector Temp.=200°C, Detector Temp.=220°C. Analysis performed by Pedro Rentas.





Reagent

SVNNITROPYROs_00017

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Certified Reference Material CRM

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Scopes: http://AbsoluteStandards.com

CERTIFIED WEIGHT REPORT

Part Number: 70451
Lot Number: 010816
Description: N-Nitrosopyrrolidine

Expiration Date: 010819
Recommended Storage: Freezer (0 °C)
Nominal Concentration (µg/mL): 1000
NIST Test ID#: 822-275872-11

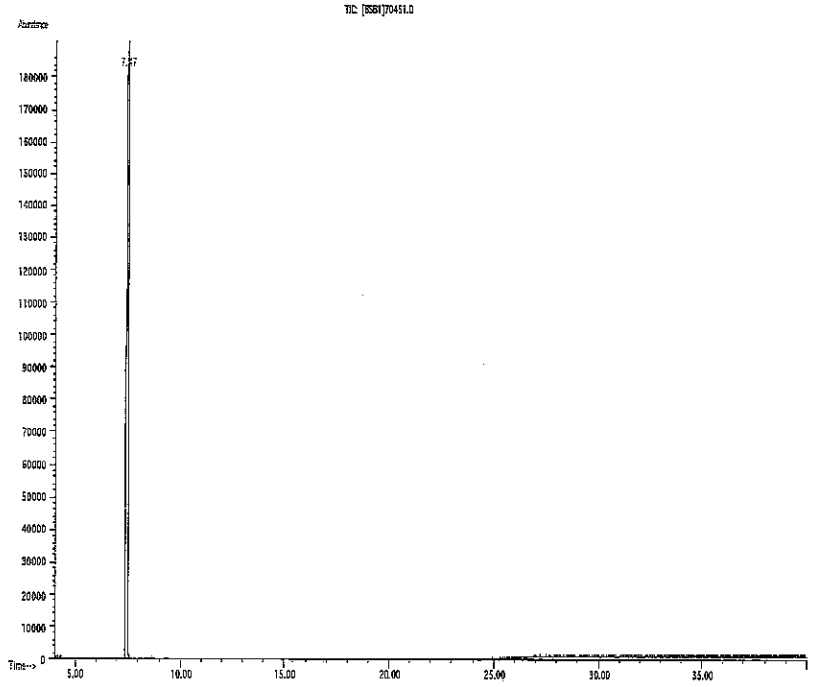
Solvent(s):	Lot#
Methylene chloride	72062

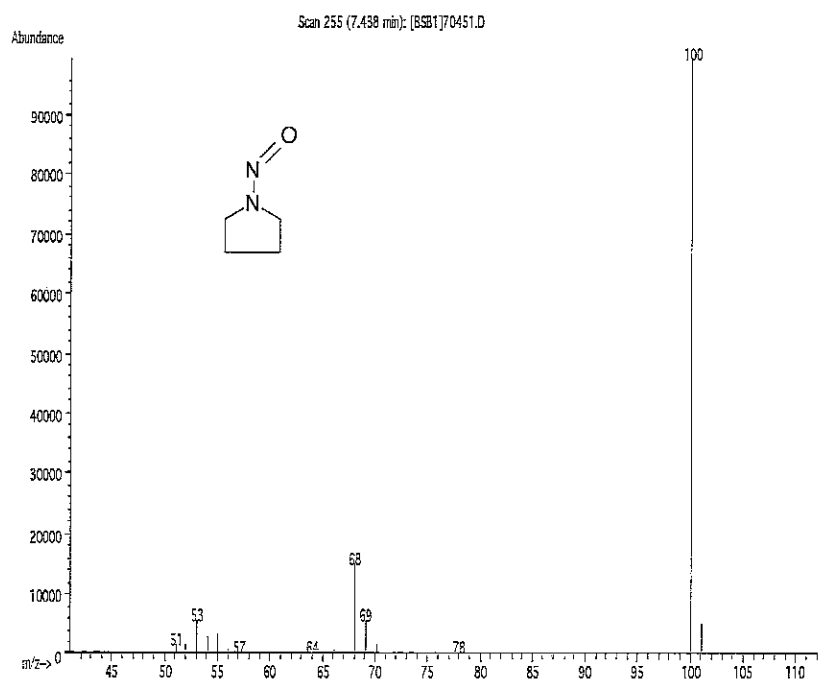
5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 25.0 0.001 Flask Uncertainty

Giovanni Esposito	010816
Formulated By: Giovanni Esposito	DATE
Pedro Rentas	010816
Reviewed By: Pedro L. Rentas	DATE

Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight (g)	Actual Weight (g)	Actual Conc(µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	MSDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1. N-Nitrosopyrrolidine	451	04025BM	1000	99	0.2	0.02525	0.02529	1001.6	5.7	930-55-2	N/A	orl-rat 900mg/kg

Method GC8MSD-3.M: Column:SPB-5 (30m X 0.25mm ID X 0.25µm film thickness) Temp 1 = 50°C (1min.), Temp 2 = 300°C (9min.), Rate = 10°C/min., Injector B= 200°C, Detector B = 275°C, Split Ratio = 100:1, Scan Rate = 2. Analysis performed by: Candice Warren.





- The certified value is the concentration calculated from gravimetric and volumetric measurements unless otherwise stated.
- Standards are prepared gravimetrically using balances that are calibrated with weights traceable to NIST (see above).
- Standards are certified (+/-) 0.5% of the stated value, unless otherwise stated.
- All Standards, after opening ampule, should be stored with caps tight and under appropriate laboratory conditions.
- Uncertainty Reference: Taylor, B.N. and Kuyat, C.E., "Guidelines for Evaluating and Expressing the Uncertainty of NIST Measurement Result," NIST Technical Note 1297, U.S. Government Printing Office, Washington, DC, (1994).

Reagent

VOA8260GAS1ST_00166

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Catalog No. : 569722 **Lot No.:** A0115012

Description : 8260 List 1 / Std #3 Gases (2015)

8260 List 1 / Std #3 Gases (2015) 2,500 ug/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : October 31, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Dichlorodifluoromethane (CFC-12) **CAS #** 75-71-8 **Purity** 99% (Lot Q167-08)	2,502.3 µg/mL	+/- 17.1236 +/- 140.5935 +/- 143.8698	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
2	Chloromethane (methyl chloride) **CAS #** 74-87-3 **Purity** 99% (Lot SHBF7067V)	2,506.2 µg/mL	+/- 15.8909 +/- 140.6631 +/- 143.9478	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
3	Vinyl chloride **CAS #** 75-01-4 **Purity** 99% (Lot 25LPST)	2,507.2 µg/mL	+/- 16.0743 +/- 140.7405 +/- 144.0261	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
4	1,3-Butadiene **CAS #** 106-99-0 **Purity** 99% (Lot SHBF3387V)	2,517.0 µg/mL	+/- 17.1894 +/- 141.4157 +/- 144.7114	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
5	Bromomethane (methyl bromide) **CAS #** 74-83-9 **Purity** 99% (Lot 101604)	2,511.3 µg/mL	+/- 17.3826 +/- 141.1222 +/- 144.4097	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
6	Chloroethane (ethyl chloride) **CAS #** 75-00-3 **Purity** 99% (Lot SHBD1717V)	2,497.4 µg/mL	+/- 16.0992 +/- 140.2015 +/- 143.4741	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
7	Dichlorofluoromethane (CFC-21) **CAS #** 75-43-4 **Purity** 99% (Lot Q9B-58)	2,516.3 µg/mL	+/- 19.2032 +/- 141.6354 +/- 144.9242	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

8	Trichlorofluoromethane (CFC-11)		2,512.2	µg/mL	+/-	18.6489	µg/mL	Gravimetric
	CAS # 75-69-4	(Lot SHBF6387V)			+/-	141.3341	µg/mL	Unstressed
	Purity 99%				+/-	144.6191	µg/mL	Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

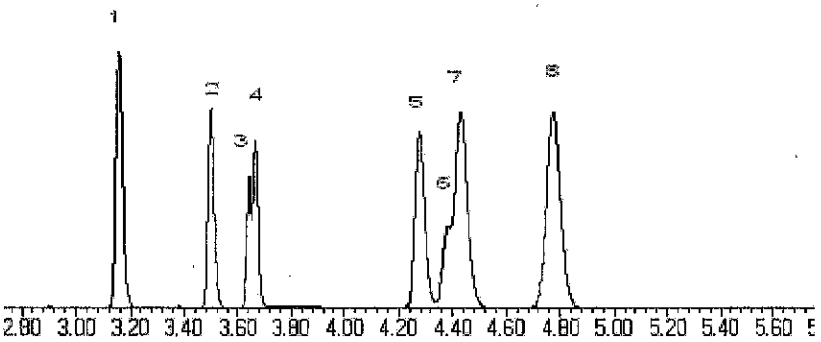
Carrier Gas:
helium-constant flow 2.0 mL/min.

Temp. Program:
40°C (hold 6 min.) to 100°C
@ 6°C/min.

Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Kendra Swope - Mix Technician

Date Mixed: 29-Oct-2015 **Balance:** 1125113331

Jennifer L. Pollino - QC Analyst

Date Passed: 02-Nov-2015

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

Reagent

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569722 **Lot No.:** A0118719

Description : 8260 List 1 / Std #3 Gases (2015)

8260 List 1 / Std #3 Gases (2015) 2,500 ug/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : April 30, 2019 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L., K=2)	
1	Dichlorodifluoromethane (CFC-12) **CAS #** 75-71-8 (Lot Q167-08) **Purity** 99%	2,504.2 µg/mL	+/- 18.7109 µg/mL +/- 140.8995 µg/mL +/- 144.1737 µg/mL	Gravimetric Unstressed Stressed
2	Chloromethane (methyl chloride) **CAS #** 74-87-3 (Lot SHBG1480V) **Purity** 99%	2,500.6 µg/mL	+/- 18.9897 µg/mL +/- 140.7385 µg/mL +/- 144.0070 µg/mL	Gravimetric Unstressed Stressed
3	Vinyl chloride **CAS #** 75-01-4 (Lot 25LPST) **Purity** 99%	2,499.8 µg/mL	+/- 20.8058 µg/mL +/- 140.9486 µg/mL +/- 144.2103 µg/mL	Gravimetric Unstressed Stressed
4	1,3-Butadiene **CAS #** 106-99-0 (Lot SHBF3387V) **Purity** 99%	2,500.6 µg/mL	+/- 21.2874 µg/mL +/- 141.0663 µg/mL +/- 144.3274 µg/mL	Gravimetric Unstressed Stressed
5	Bromomethane (methyl bromide) **CAS #** 74-83-9 (Lot 101604) **Purity** 99%	2,500.1 µg/mL	+/- 22.8576 µg/mL +/- 141.2859 µg/mL +/- 144.5409 µg/mL	Gravimetric Unstressed Stressed
6	Chloroethane (ethyl chloride) **CAS #** 75-00-3 (Lot SHBD1717V) **Purity** 99%	2,500.3 µg/mL	+/- 19.5969 µg/mL +/- 140.8062 µg/mL +/- 144.0725 µg/mL	Gravimetric Unstressed Stressed
7	Dichlorofluoromethane (CFC-21) **CAS #** 75-43-4 (Lot Q9B-58) **Purity** 99%	2,504.7 µg/mL	+/- 19.5937 µg/mL +/- 141.0449 µg/mL +/- 144.3170 µg/mL	Gravimetric Unstressed Stressed

8	Trichlorofluoromethane (CFC-11)		2,524.5	µg/mL	+/-	16.8928	µg/mL	Gravimetric
	CAS # 75-69-4.SEC	(Lot Q12B-59)			+/-	141.7952	µg/mL	Unstressed
	Purity 99%				+/-	145.1017	µg/mL	Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

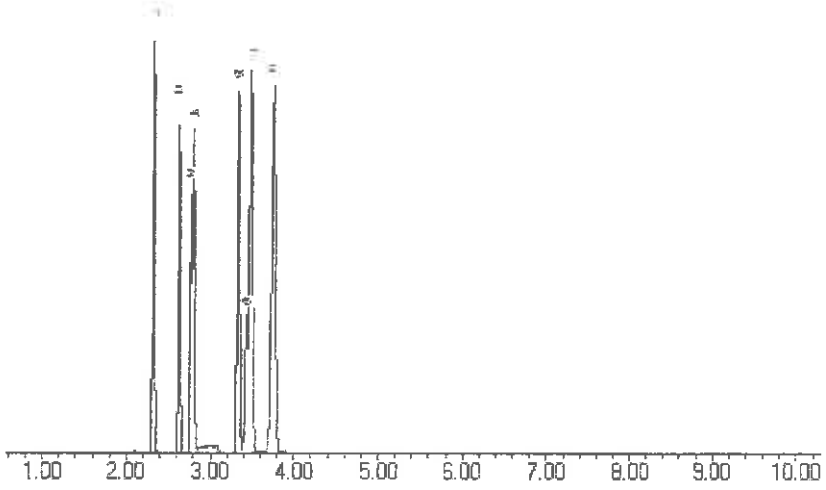
Carrier Gas:
helium-constant flow 2.0 mL/min.

Temp. Program:
40°C (hold 6 min.) to 100°C
@ 6°C/min.

Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Lane Klbe - Mix Technician

Date Mixed: 17-Nov-2015 **Balance:** 1127510105

Jennifer L. Pollino - QC Analyst

Date Passed: 10-Dec-2015

Manufactured under Restek's ISO 9001:2008
Registered Quality System
Certificate #FM 80397

Reagent

VOA8260GAS2ND_00166

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569722.sec **Lot No.:** A0115484

Description : 8260 List 1 / Std #3 Gases (2015)

8260 List 1 / Std #3 Gases (2015) 2,500 ug/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L., K=2)		
1	Dichlorodifluoromethane (CFC-12) CAS # 75-71-8.SEC (Lot 22274) Purity 99%	2,505.6 µg/mL	+/- 16.6251 +/- 140.7169 +/- 143.9990	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
2	Chloromethane (methyl chloride) CAS # 74-87-3.SEC (Lot 18343) Purity 99%	2,517.3 µg/mL	+/- 17.3796 +/- 141.4522 +/- 144.7477	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
3	Vinyl chloride CAS # 75-01-4.SEC (Lot MKBK6872V) Purity 99%	2,510.2 µg/mL	+/- 16.6342 +/- 140.9727 +/- 144.2609	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
4	1,3-Butadiene CAS # 106-99-0.SEC (Lot 22331) Purity 99%	2,516.5 µg/mL	+/- 17.4874 +/- 141.4240 +/- 144.7182	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
5	Bromomethane (methyl bromide) CAS # 74-83-9.SEC (Lot Q119-46) Purity 99%	2,511.5 µg/mL	+/- 16.8310 +/- 141.0664 +/- 144.3557	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
6	Chloroethane (ethyl chloride) CAS # 75-00-3.SEC (Lot 00004202) Purity 99%	2,504.8 µg/mL	+/- 16.4341 +/- 140.6469 +/- 143.9283	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
7	Dichlorofluoromethane (CFC-21) CAS # 75-43-4.SEC (Lot SHBC0858V) Purity 99%	2,500.5 µg/mL	+/- 16.1659 +/- 140.3776 +/- 143.6540	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

8	Trichlorofluoromethane (CFC-11)		2,524.5	µg/mL	+/-	16.8928	µg/mL	Gravimetric
	CAS # 75-69-4.SEC	(Lot Q12B-59)			+/-	141.7952	µg/mL	Unstressed
	Purity 99%				+/-	145.1017	µg/mL	Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

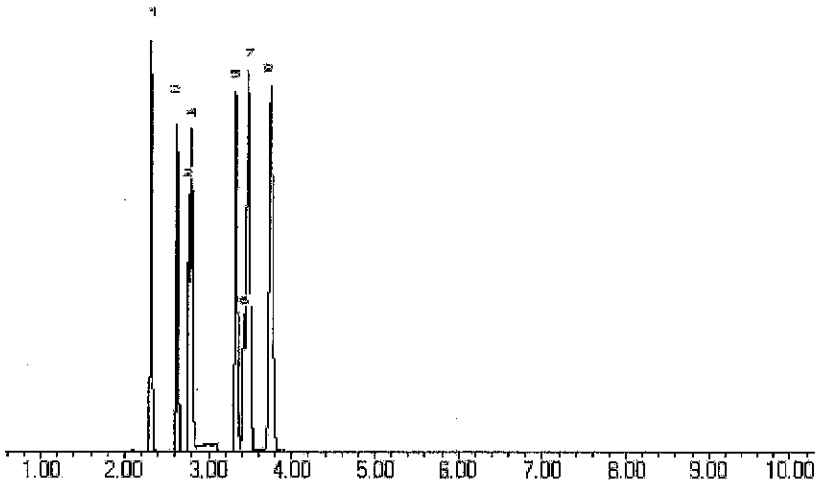
Carrier Gas:
helium-constant flow 2.0 mL/min.

Temp. Program:
40°C (hold 6 min.) to 100°C
@ 6°C/min.

Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Lane Kibe - Mix Technician

Date Mixed: 17-Nov-2015 **Balance:** 1127510105

Jennifer L. Pollino - QC Analyst

Date Passed: 10-Dec-2015

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

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VOA8260INTRES_00126

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 568718 **Lot No.:** A0113246

Description : 8260 Internal Standard 2014

8260 Internal Standard 2014 250-5,000 ug/ml, P&T Methanol, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : August 31, 2020 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)		Expanded Uncertainty (95% C.L., K=2)		
1	tert-Butyl-d9-alcohol **CAS #** 25725-11-5 **Purity** 99%	(Lot I201P18)	5,000.4	µg/mL	+/- 29.0712 +/- 106.0450 +/- 106.5155	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
2	2-Butanone-d5 **CAS #** 24313-50-6 **Purity** 99%	(Lot M276P24)	1,250.2	µg/mL	+/- 7.2688 +/- 26.5135 +/- 26.6311	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
3	Fluorobenzene **CAS #** 462-06-6 **Purity** 99%	(Lot BCBK8171V)	250.2	µg/mL	+/- 1.4580 +/- 5.3070 +/- 5.3305	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
4	1,4-Dioxane-d8 **CAS #** 17647-74-4 **Purity** 98%	(Lot I-19073)	5,000.6	µg/mL	+/- 29.0727 +/- 106.0502 +/- 106.5208	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
5	Chlorobenzene-d5 **CAS #** 3114-55-4 **Purity** 99%	(Lot PR-23926)	250.4	µg/mL	+/- 1.4592 +/- 5.3113 +/- 5.3348	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
6	1,4-Dichlorobenzene-d4 **CAS #** 3855-82-1 **Purity** 99%	(Lot PR-18488)	250.0	µg/mL	+/- 1.4569 +/- 5.3028 +/- 5.3263	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Reagent

VOA8260INTRES_00127

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 568718 **Lot No.:** A0113246

Description : 8260 Internal Standard 2014

8260 Internal Standard 2014 250-5,000 ug/ml, P&T Methanol, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : August 31, 2020 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L., K=2)	
1	tert-Butyl-d9-alcohol **CAS #** 25725-11-5 **Purity** 99% (Lot I201P18)	5,000.4 µg/mL	+/- 29.0712 µg/mL +/- 106.0450 µg/mL +/- 106.5155 µg/mL	Gravimetric Unstressed Stressed
2	2-Butanone-d5 **CAS #** 24313-50-6 **Purity** 99% (Lot M276P24)	1,250.2 µg/mL	+/- 7.2688 µg/mL +/- 26.5135 µg/mL +/- 26.6311 µg/mL	Gravimetric Unstressed Stressed
3	Fluorobenzene **CAS #** 462-06-6 **Purity** 99% (Lot BCBK8171V)	250.2 µg/mL	+/- 1.4580 µg/mL +/- 5.3070 µg/mL +/- 5.3305 µg/mL	Gravimetric Unstressed Stressed
4	1,4-Dioxane-d8 **CAS #** 17647-74-4 **Purity** 98% (Lot I-19073)	5,000.6 µg/mL	+/- 29.0727 µg/mL +/- 106.0502 µg/mL +/- 106.5208 µg/mL	Gravimetric Unstressed Stressed
5	Chlorobenzene-d5 **CAS #** 3114-55-4 **Purity** 99% (Lot PR-23926)	250.4 µg/mL	+/- 1.4592 µg/mL +/- 5.3113 µg/mL +/- 5.3348 µg/mL	Gravimetric Unstressed Stressed
6	1,4-Dichlorobenzene-d4 **CAS #** 3855-82-1 **Purity** 99% (Lot PR-18488)	250.0 µg/mL	+/- 1.4569 µg/mL +/- 5.3028 µg/mL +/- 5.3263 µg/mL	Gravimetric Unstressed Stressed

Reagent

VOA8260KET1ST_00074

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569721 **Lot No.:** A0115554

Description : 8260 List 1/ Std #2 Ketones (2015)

8260 List 1/ Std #2 Ketones (2015) 12,500 µg/ml, P&T Methanol/Water (90:10), 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Acetone **CAS #** 67-64-1 **Purity** 99%	(Lot 07196AK)	12,501.8 µg/mL	+/- 72.6865 µg/mL +/- 754.2890 µg/mL +/- 756.0798 µg/mL		Gravimetric Unstressed Stressed
2	2-Butanone (MEK) **CAS #** 78-93-3 **Purity** 98%	(Lot SHBG0444V)	12,499.7 µg/mL	+/- 72.6744 µg/mL +/- 754.1625 µg/mL +/- 755.9530 µg/mL		Gravimetric Unstressed Stressed
3	4-Methyl-2-pentanone (MIBK) **CAS #** 108-10-1 **Purity** 99%	(Lot SHBF9556V)	12,500.6 µg/mL	+/- 72.6796 µg/mL +/- 754.2166 µg/mL +/- 756.0072 µg/mL		Gravimetric Unstressed Stressed
4	2-Hexanone **CAS #** 591-78-6 **Purity** 99%	(Lot MKBT3158V)	12,502.4 µg/mL	+/- 72.6900 µg/mL +/- 754.3252 µg/mL +/- 756.1161 µg/mL		Gravimetric Unstressed Stressed

Solvent: P&T Methanol/Water (90:10)
CAS # 67-56-1/7732-18-5
Purity 99%

Reagent

VOA8260KET1ST_00075

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569721 **Lot No.:** A0115554

Description : 8260 List 1/ Std #2 Ketones (2015)

8260 List 1/ Std #2 Ketones (2015) 12,500 µg/ml, P&T Methanol/Water (90:10), 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	Acetone **CAS #** 67-64-1 **Purity** 99%	(Lot 07196AK)	12,501.8 µg/mL	+/- 72.6865 µg/mL +/- 754.2890 µg/mL +/- 756.0798 µg/mL	Gravimetric Unstressed Stressed
2	2-Butanone (MEK) **CAS #** 78-93-3 **Purity** 98%	(Lot SHBG0444V)	12,499.7 µg/mL	+/- 72.6744 µg/mL +/- 754.1625 µg/mL +/- 755.9530 µg/mL	Gravimetric Unstressed Stressed
3	4-Methyl-2-pentanone (MIBK) **CAS #** 108-10-1 **Purity** 99%	(Lot SHBF9556V)	12,500.6 µg/mL	+/- 72.6796 µg/mL +/- 754.2166 µg/mL +/- 756.0072 µg/mL	Gravimetric Unstressed Stressed
4	2-Hexanone **CAS #** 591-78-6 **Purity** 99%	(Lot MKBT3158V)	12,502.4 µg/mL	+/- 72.6900 µg/mL +/- 754.3252 µg/mL +/- 756.1161 µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol/Water (90:10)
CAS # 67-56-1/7732-18-5
Purity 99%

Reagent

VOA8260KET2ND_00079

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569721 **Lot No.:** A0115554

Description : 8260 List 1/ Std #2 Ketones (2015)

8260 List 1/ Std #2 Ketones (2015) 12,500 µg/ml, P&T Methanol/Water (90:10), 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	Acetone **CAS #** 67-64-1 **Purity** 99%	(Lot 07196AK)	12,501.8 µg/mL	+/- 72.6865 µg/mL +/- 754.2890 µg/mL +/- 756.0798 µg/mL	Gravimetric Unstressed Stressed
2	2-Butanone (MEK) **CAS #** 78-93-3 **Purity** 98%	(Lot SHBG0444V)	12.499.7 µg/mL	+/- 72.6744 µg/mL +/- 754.1625 µg/mL +/- 755.9530 µg/mL	Gravimetric Unstressed Stressed
3	4-Methyl-2-pentanone (MIBK) **CAS #** 108-10-1 **Purity** 99%	(Lot SHBF9556V)	12.500.6 µg/mL	+/- 72.6796 µg/mL +/- 754.2166 µg/mL +/- 756.0072 µg/mL	Gravimetric Unstressed Stressed
4	2-Hexanone **CAS #** 591-78-6 **Purity** 99%	(Lot MKBT3158V)	12.502.4 µg/mL	+/- 72.6900 µg/mL +/- 754.3252 µg/mL +/- 756.1161 µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol/Water (90:10)
CAS # 67-56-1/7732-18-5
Purity 99%

Reagent

VOA8260MEGA1_00053

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569720 **Lot No.:** A0118177

Description : 8260 List 1 / Std #1 MegaMix (2015)

8260 List 1 / Std #1 MegaMix (2015) 1250-62500 µg/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : March 31, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	Diethyl ether (ethyl ether) **CAS #** 60-29-7 (Lot SHBG1462V) **Purity** 99%	2,503.5 µg/mL	+/- 14.5556 µg/mL +/- 151.0472 µg/mL +/- 151.4059 µg/mL	Gravimetric Unstressed Stressed
2	1,1,2-Trichlorotrifluoroethane (CFC-113) **CAS #** 76-13-1 (Lot 00004562) **Purity** 99%	2,500.0 µg/mL	+/- 14.5352 µg/mL +/- 150.8361 µg/mL +/- 151.1942 µg/mL	Gravimetric Unstressed Stressed
3	1,1-Dichloroethane **CAS #** 75-34-3 (Lot 00008621) **Purity** 99%	2,500.1 µg/mL	+/- 14.5359 µg/mL +/- 150.8436 µg/mL +/- 151.2017 µg/mL	Gravimetric Unstressed Stressed
4	tert-Butanol (TBA) **CAS #** 75-65-0 (Lot SHBD0362V) **Purity** 99%	25,033.4 µg/mL	+/- 145.5386 µg/mL +/- 1,510.3737 µg/mL +/- 1,513.9596 µg/mL	Gravimetric Unstressed Stressed
5	Iodomethane (methyl iodide) **CAS #** 74-88-4 (Lot SHBF2149V) **Purity** 98%	2,502.9 µg/mL	+/- 14.5522 µg/mL +/- 151.0123 µg/mL +/- 151.3708 µg/mL	Gravimetric Unstressed Stressed
6	Methyl acetate **CAS #** 79-20-9 (Lot SHBD7134V) **Purity** 98%	12,508.6 µg/mL	+/- 72.7223 µg/mL +/- 754.6987 µg/mL +/- 756.4905 µg/mL	Gravimetric Unstressed Stressed
7	Allyl chloride (3-chloropropene) **CAS #** 107-05-1 (Lot SHBF8133V) **Purity** 99%	2,500.0 µg/mL	+/- 19.2743 µg/mL +/- 151.3663 µg/mL +/- 151.7231 µg/mL	Gravimetric Unstressed Stressed

8	Methylene chloride (dichloromethane) **CAS #** 75-09-2 **Purity** 99%	(Lot SHBF9870V)	2,521.4	µg/mL	+/- 14.6595 +/- 152.1257 +/- 152.4869	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
9	Carbon disulfide **CAS #** 75-15-0 **Purity** 99%	(Lot S20A856)	2,516.0	µg/mL	+/- 14.6282 +/- 151.8014 +/- 152.1618	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
10	Acrylonitrile **CAS #** 107-13-1 **Purity** 99%	(Lot J08Z057)	25,001.3	µg/mL	+/- 145.3518 +/- 1,508.4355 +/- 1,512.0167	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
11	cis-1,2-Dichloroethene **CAS #** 156-59-2 **Purity** 98%	(Lot MKBV2831V)	2,507.8	µg/mL	+/- 14.5807 +/- 151.3079 +/- 151.6671	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
12	n-Hexane (C6) **CAS #** 110-54-3 **Purity** 99%	(Lot SHBF7674V)	2,512.4	µg/mL	+/- 14.6072 +/- 151.5827 +/- 151.9426	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
13	1,1-dichloroethene **CAS #** 75-35-4 **Purity** 99%	(Lot 73896KMV)	2,508.1	µg/mL	+/- 14.5825 +/- 151.3263 +/- 151.6856	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
14	2,2-Dichloropropane **CAS #** 594-20-7 **Purity** 99%	(Lot BCBL9720V)	2,507.6	µg/mL	+/- 14.5795 +/- 151.2961 +/- 151.6553	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
15	trans-1,2-Dichloroethene **CAS #** 156-60-5 **Purity** 99%	(Lot MKBH9850V)	2,509.8	µg/mL	+/- 14.5919 +/- 151.4243 +/- 151.7838	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
16	Isobutanol (2-Methyl-1-propanol) **CAS #** 78-83-1 **Purity** 99%	(Lot SHBD1647V)	62,815.4	µg/mL	+/- 365.1949 +/- 3,789.9281 +/- 3,798.9260	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
17	Methyl-tert-butyl ether (MTBE) **CAS #** 1634-04-4 **Purity** 99%	(Lot MKBV2134V)	2,510.0	µg/mL	+/- 14.5934 +/- 151.4394 +/- 151.7990	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
18	Bromochloromethane **CAS #** 74-97-5 **Purity** 99%	(Lot 00004559)	2,507.0	µg/mL	+/- 14.5759 +/- 151.2584 +/- 151.6175	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
19	Tetrahydrofuran **CAS #** 109-99-9 **Purity** 99%	(Lot SHBG2910V)	5,025.3	µg/mL	+/- 29.2172 +/- 303.1956 +/- 303.9154	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
20	1,1,1-trichloroethane **CAS #** 71-55-6 **Purity** 99%	(Lot B15MW0705)	2,508.9	µg/mL	+/- 14.5868 +/- 151.3715 +/- 151.7309	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
21	Cyclohexane **CAS #** 110-82-7 **Purity** 99%	(Lot MKBV3194V)	2,503.4	µg/mL	+/- 14.5548 +/- 151.0397 +/- 151.3983	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
22	1,1-Dichloropropene **CAS #** 563-58-6 **Purity** 99%	(Lot PR09161302)	2,507.4	µg/mL	+/- 14.5781 +/- 151.2810 +/- 151.6402	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
23	carbon tetrachloride **CAS #** 56-23-5 **Purity** 99%	(Lot SHBG1763V)	2,505.9	µg/mL	+/- 14.5694 +/- 151.1905 +/- 151.5495	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

24	n-Heptane (C7) **CAS #** 142-82-5 **Purity** 99%	(Lot MKBV6176V)	2,510.8	µg/mL	+/- +/- +/-	14.5977 151.4847 151.8443	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
25	1,2-Dichloroethane **CAS #** 107-06-2 **Purity** 99%	(Lot MKBV4565V)	2,511.1	µg/mL	+/- +/- +/-	14.5999 151.5073 151.8670	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
26	Benzene **CAS #** 71-43-2 **Purity** 99%	(Lot SHBG1169V)	2,502.9	µg/mL	+/- +/- +/-	14.5519 151.0095 151.3681	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
27	Trichloroethene **CAS #** 79-01-6 **Purity** 99%	(Lot SHBF0943V)	2,500.4	µg/mL	+/- +/- +/-	14.5374 150.8587 151.2169	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
28	Methylcyclohexane **CAS #** 108-87-2 **Purity** 99%	(Lot 50996APV)	2,503.9	µg/mL	+/- +/- +/-	14.5577 151.0699 151.4285	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
29	1,2-Dichloropropane **CAS #** 78-87-5 **Purity** 99%	(Lot 01113D0V)	2,523.5	µg/mL	+/- +/- +/-	14.6718 152.2539 152.6154	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
30	bromodichloromethane **CAS #** 75-27-4 **Purity** 98%	(Lot MKBL1617V)	2,509.0	µg/mL	+/- +/- +/-	14.5878 151.3818 151.7412	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
31	1,4-Dioxane **CAS #** 123-91-1 **Purity** 99%	(Lot SHBG6312V)	50,018.1	µg/mL	+/- +/- +/-	290.7945 3,017.8137 3,024.9785	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
32	Dibromomethane **CAS #** 74-95-3 **Purity** 98%	(Lot 10183283)	2,511.4	µg/mL	+/- +/- +/-	14.6013 151.5222 151.8820	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
33	cis-1,3-Dichloropropene **CAS #** 10061-01-5 **Purity** 99%	(Lot 22622)	2,506.0	µg/mL	+/- +/- +/-	14.5701 151.1981 151.5571	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
34	Toluene **CAS #** 108-88-3 **Purity** 99%	(Lot MKBV5601V)	2,515.5	µg/mL	+/- +/- +/-	14.6253 151.7713 152.1316	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
35	Ethyl methacrylate **CAS #** 97-63-2 **Purity** 99%	(Lot SHBD9190V)	2,503.1	µg/mL	+/- +/- +/-	14.5534 151.0246 151.3832	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
36	trans-1,3-Dichloropropene **CAS #** 10061-02-6 **Purity** 99%	(Lot C584177)	2,508.0	µg/mL	+/- +/- +/-	14.5817 151.3188 151.6780	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
37	1,1,2-Trichloroethane **CAS #** 79-00-5 **Purity** 99%	(Lot FGB01)	2,508.4	µg/mL	+/- +/- +/-	14.5839 151.3414 151.7007	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
38	1,3-Dichloropropane **CAS #** 142-28-9 **Purity** 99%	(Lot BCBG2162V)	2,522.8	µg/mL	+/- +/- +/-	14.6675 152.2087 152.5701	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
39	Tetrachloroethene **CAS #** 127-18-4 **Purity** 99%	(Lot SHBD9374V)	2,518.9	µg/mL	+/- +/- +/-	14.6450 151.9749 152.3357	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

40	dibromochloromethane **CAS #** 124-48-1 **Purity** 98%	(Lot MKBQ6577V)	2,505.4	µg/mL	+/- 14.5664 +/- 151.1601 +/- 151.5190	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
41	1,2-Dibromoethane (EDB) **CAS #** 106-93-4 **Purity** 99%	(Lot BCBH3877V)	2,505.1	µg/mL	+/- 14.5650 +/- 151.1453 +/- 151.5041	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
42	Chlorobenzene **CAS #** 108-90-7 **Purity** 99%	(Lot SHBF0505V)	2,505.6	µg/mL	+/- 14.5679 +/- 151.1755 +/- 151.5344	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
43	1,1,2,2-Tetrachloroethane **CAS #** 79-34-5 **Purity** 99%	(Lot CFA4D)	2,505.1	µg/mL	+/- 14.5650 +/- 151.1453 +/- 151.5041	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
44	Ethylbenzene **CAS #** 100-41-4 **Purity** 99%	(Lot SHBG5920V)	2,506.1	µg/mL	+/- 14.5708 +/- 151.2056 +/- 151.5646	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
45	m-Xylene **CAS #** 108-38-3 **Purity** 99%	(Lot SHBF8095V)	1,254.4	µg/mL	+/- 7.2930 +/- 75.6820 +/- 75.8617	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
46	p-Xylene **CAS #** 106-42-3 **Purity** 99%	(Lot SHBF3427V)	1,250.0	µg/mL	+/- 7.2676 +/- 75.4180 +/- 75.5971	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
47	o-Xylene **CAS #** 95-47-6 **Purity** 99%	(Lot SHBF7003V)	2,506.3	µg/mL	+/- 14.5716 +/- 151.2132 +/- 151.5722	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
48	Styrene **CAS #** 100-42-5 **Purity** 99%	(Lot MKBS7097V)	2,503.9	µg/mL	+/- 14.5577 +/- 151.0699 +/- 151.4285	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
49	Isopropylbenzene (cumene) **CAS #** 98-82-8 **Purity** 99%	(Lot 10185056)	2,509.4	µg/mL	+/- 14.5897 +/- 151.4017 +/- 151.7612	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
50	bromoform **CAS #** 75-25-2 **Purity** 99%	(Lot SHBC3410V)	2,503.3	µg/mL	+/- 14.5541 +/- 151.0322 +/- 151.3907	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
51	1,1,1,2-Tetrachloroethane **CAS #** 630-20-6 **Purity** 99%	(Lot MKBS3769V)	2,505.0	µg/mL	+/- 14.5643 +/- 151.1378 +/- 151.4966	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
52	chloroform **CAS #** 67-66-3 **Purity** 99%	(Lot MKBV2089V)	2,507.8	µg/mL	+/- 14.5803 +/- 151.3037 +/- 151.6629	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
53	1,2,3-Trichloropropane **CAS #** 96-18-4 **Purity** 99%	(Lot BCBH8722V)	2,504.8	µg/mL	+/- 14.5628 +/- 151.1227 +/- 151.4815	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
54	trans-1,4-dichloro-2-butene **CAS #** 110-57-6 **Purity** 95%	(Lot MKBP6041V)	2,499.7	µg/mL	+/- 14.5334 +/- 150.8172 +/- 151.1753	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
55	n-Propylbenzene **CAS #** 103-65-1 **Purity** 99%	(Lot MKBJ0332V)	2,507.5	µg/mL	+/- 14.5788 +/- 151.2886 +/- 151.6478	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

56	Bromobenzene		2,515.1	µg/mL	+/-	14.6232	µg/mL	Gravimetric
	CAS # 108-86-1	(Lot MKBD4032V)			+/-	151.7486	µg/mL	Unstressed
	Purity 99%				+/-	152.1089	µg/mL	Stressed
57	1,2,4-Trimethylbenzene		2,503.7	µg/mL	+/-	14.5565	µg/mL	Gravimetric
	CAS # 95-63-6	(Lot MKBJ6229V)			+/-	151.0566	µg/mL	Unstressed
	Purity 98%				+/-	151.4152	µg/mL	Stressed
58	2-Chlorotoluene		2,502.1	µg/mL	+/-	14.5476	µg/mL	Gravimetric
	CAS # 95-49-8	(Lot MKBH8892V)			+/-	150.9643	µg/mL	Unstressed
	Purity 99%				+/-	151.3227	µg/mL	Stressed
59	4-Chlorotoluene		2,512.6	µg/mL	+/-	14.6086	µg/mL	Gravimetric
	CAS # 106-43-4	(Lot MKBL7753V)			+/-	151.5978	µg/mL	Unstressed
	Purity 99%				+/-	151.9577	µg/mL	Stressed
60	tert-Butylbenzene		2,507.8	µg/mL	+/-	14.5803	µg/mL	Gravimetric
	CAS # 98-06-6	(Lot S52237V)			+/-	151.3037	µg/mL	Unstressed
	Purity 99%				+/-	151.6629	µg/mL	Stressed
61	1,3,5-Trimethylbenzene		2,502.5	µg/mL	+/-	14.5498	µg/mL	Gravimetric
	CAS # 108-67-8	(Lot BCBJ6245V)			+/-	150.9869	µg/mL	Unstressed
	Purity 99%				+/-	151.3454	µg/mL	Stressed
62	sec-Butylbenzene		2,521.8	µg/mL	+/-	14.6617	µg/mL	Gravimetric
	CAS # 135-98-8	(Lot MKBK3151V)			+/-	152.1484	µg/mL	Unstressed
	Purity 99%				+/-	152.5096	µg/mL	Stressed
63	p-Isopropyltoluene (p-Cymene)		2,502.6	µg/mL	+/-	14.5505	µg/mL	Gravimetric
	CAS # 99-87-6	(Lot MKBK4439V)			+/-	150.9945	µg/mL	Unstressed
	Purity 99%				+/-	151.3529	µg/mL	Stressed
64	1,3-Dichlorobenzene		2,505.8	µg/mL	+/-	14.5686	µg/mL	Gravimetric
	CAS # 541-73-1	(Lot BCBM5751V)			+/-	151.1830	µg/mL	Unstressed
	Purity 99%				+/-	151.5419	µg/mL	Stressed
65	1,4-Dichlorobenzene		2,504.1	µg/mL	+/-	14.5592	µg/mL	Gravimetric
	CAS # 106-46-7	(Lot MKBS1350V)			+/-	151.0850	µg/mL	Unstressed
	Purity 99%				+/-	151.4437	µg/mL	Stressed
66	n-Butylbenzene		2,503.3	µg/mL	+/-	14.5541	µg/mL	Gravimetric
	CAS # 104-51-8	(Lot 09418JJV)			+/-	151.0322	µg/mL	Unstressed
	Purity 99%				+/-	151.3907	µg/mL	Stressed
67	1,2-Dichlorobenzene		2,505.5	µg/mL	+/-	14.5672	µg/mL	Gravimetric
	CAS # 95-50-1	(Lot SHBD7331V)			+/-	151.1679	µg/mL	Unstressed
	Purity 99%				+/-	151.5268	µg/mL	Stressed
68	1,2-Dibromo-3-chloropropane		2,508.6	µg/mL	+/-	14.5854	µg/mL	Gravimetric
	CAS # 96-12-8	(Lot FBL01-JM)			+/-	151.3565	µg/mL	Unstressed
	Purity 99%				+/-	151.7158	µg/mL	Stressed
69	1,2,4-Trichlorobenzene		2,518.6	µg/mL	+/-	14.6435	µg/mL	Gravimetric
	CAS # 120-82-1	(Lot 26896BM)			+/-	151.9598	µg/mL	Unstressed
	Purity 99%				+/-	152.3206	µg/mL	Stressed
70	Hexachlorobutadiene		2,499.9	µg/mL	+/-	14.5344	µg/mL	Gravimetric
	CAS # 87-68-3	(Lot J31X013)			+/-	150.8275	µg/mL	Unstressed
	Purity 98%				+/-	151.1856	µg/mL	Stressed
71	Naphthalene		2,514.9	µg/mL	+/-	14.6217	µg/mL	Gravimetric
	CAS # 91-20-3	(Lot MKBH4351V)			+/-	151.7336	µg/mL	Unstressed
	Purity 99%				+/-	152.0938	µg/mL	Stressed

72	1,2,3-Trichlorobenzene		2,502.0 µg/mL	+/-	14.5468	µg/mL	Gravimetric
	CAS # 87-61-6	(Lot MKBS4859V)		+/-	150.9567	µg/mL	Unstressed
	Purity 99%			+/-	151.3151	µg/mL	Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

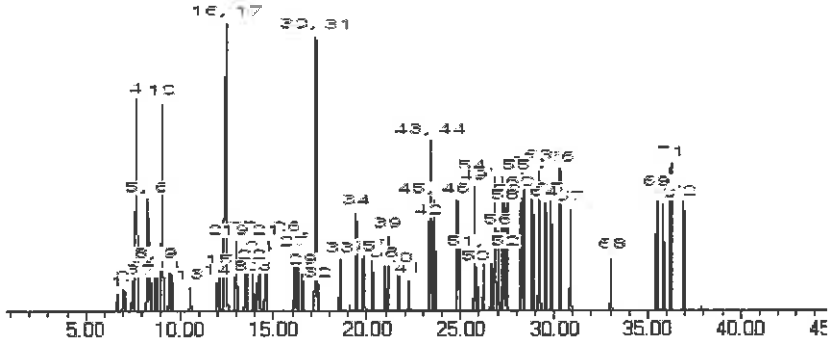
Carrier Gas:
helium-constant pressure 30 psi

Temp. Program:
40°C (hold 6 min.) to 240°C
@ 6°C/min. (hold 10 min.)

Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Rebecca Hauver

Date Mixed: 21-Mar-2016 **Balance:** 1125113331

Jodi E. Breon

Jodi E. Breon - QA Analyst

Date Passed: 28-Mar-2016

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

Reagent

VOA8260MEGA1_00054

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: (800)356-1688
Fax: (814)353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

ACCREDITED
ISO Guide 34 Accredited
Reference Material Producer
Certificate #3222.01

ilac-MRA

ACCREDITED
ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569720 **Lot No.:** A0118177

Description : 8260 List 1 / Std #1 MegaMix (2015)

8260 List 1 / Std #1 MegaMix (2015) 1250-62500 µg/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : March 31, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)		Expanded Uncertainty (95% C.L.; K=2)			
1	Diethyl ether (ethyl ether) **CAS #** 60-29-7 **Purity** 99%	(Lot SHBG1462V)	2,503.5	µg/mL	+/- 14.5556 +/- 151.0472 +/- 151.4059	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
2	1,1,2-Trichlorotrifluoroethane (CFC-113) **CAS #** 76-13-1 **Purity** 99%	(Lot 00004562)	2,500.0	µg/mL	+/- 14.5352 +/- 150.8361 +/- 151.1942	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
3	1,1-Dichloroethane **CAS #** 75-34-3 **Purity** 99%	(Lot 00008621)	2,500.1	µg/mL	+/- 14.5359 +/- 150.8436 +/- 151.2017	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
4	tert-Butanol (TBA) **CAS #** 75-65-0 **Purity** 99%	(Lot SHBD0362V)	25,033.4	µg/mL	+/- 145.5386 +/- 1,510.3737 +/- 1,513.9596	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
5	Iodomethane (methyl iodide) **CAS #** 74-88-4 **Purity** 98%	(Lot SHBF2149V)	2,502.9	µg/mL	+/- 14.5522 +/- 151.0123 +/- 151.3708	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
6	Methyl acetate **CAS #** 79-20-9 **Purity** 98%	(Lot SHBD7134V)	12,508.6	µg/mL	+/- 72.7223 +/- 754.6987 +/- 756.4905	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
7	Allyl chloride (3-chloropropene) **CAS #** 107-05-1 **Purity** 99%	(Lot SHBF8133V)	2,500.0	µg/mL	+/- 19.2743 +/- 151.3663 +/- 151.7231	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

8	Methylene chloride (dichloromethane) **CAS #** 75-09-2 **Purity** 99%	(Lot SHBF9870V)	2,521.4	µg/mL	+/- 14.6595 +/- 152.1257 +/- 152.4869	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
9	Carbon disulfide **CAS #** 75-15-0 **Purity** 99%	(Lot S20A856)	2,516.0	µg/mL	+/- 14.6282 +/- 151.8014 +/- 152.1618	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
10	Acrylonitrile **CAS #** 107-13-1 **Purity** 99%	(Lot J08Z057)	25,001.3	µg/mL	+/- 145.3518 +/- 1,508.4355 +/- 1,512.0167	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
11	cis-1,2-Dichloroethene **CAS #** 156-59-2 **Purity** 98%	(Lot MKBV2831V)	2,507.8	µg/mL	+/- 14.5807 +/- 151.3079 +/- 151.6671	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
12	n-Hexane (C6) **CAS #** 110-54-3 **Purity** 99%	(Lot SHBF7674V)	2,512.4	µg/mL	+/- 14.6072 +/- 151.5827 +/- 151.9426	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
13	1,1-dichloroethene **CAS #** 75-35-4 **Purity** 99%	(Lot 73896KMV)	2,508.1	µg/mL	+/- 14.5825 +/- 151.3263 +/- 151.6856	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
14	2,2-Dichloropropane **CAS #** 594-20-7 **Purity** 99%	(Lot BCBL9720V)	2,507.6	µg/mL	+/- 14.5795 +/- 151.2961 +/- 151.6553	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
15	trans-1,2-Dichloroethene **CAS #** 156-60-5 **Purity** 99%	(Lot MKBH9850V)	2,509.8	µg/mL	+/- 14.5919 +/- 151.4243 +/- 151.7838	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
16	Isobutanol (2-Methyl-1-propanol) **CAS #** 78-83-1 **Purity** 99%	(Lot SHBD1647V)	62,815.4	µg/mL	+/- 365.1949 +/- 3,789.9281 +/- 3,798.9260	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
17	Methyl-tert-butyl ether (MTBE) **CAS #** 1634-04-4 **Purity** 99%	(Lot MKBV2134V)	2,510.0	µg/mL	+/- 14.5934 +/- 151.4394 +/- 151.7990	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
18	Bromochloromethane **CAS #** 74-97-5 **Purity** 99%	(Lot 00004559)	2,507.0	µg/mL	+/- 14.5759 +/- 151.2584 +/- 151.6175	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
19	Tetrahydrofuran **CAS #** 109-99-9 **Purity** 99%	(Lot SHBG2910V)	5,025.3	µg/mL	+/- 29.2172 +/- 303.1956 +/- 303.9154	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
20	1,1,1-trichloroethane **CAS #** 71-55-6 **Purity** 99%	(Lot B15MW0705)	2,508.9	µg/mL	+/- 14.5868 +/- 151.3715 +/- 151.7309	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
21	Cyclohexane **CAS #** 110-82-7 **Purity** 99%	(Lot MKBV3194V)	2,503.4	µg/mL	+/- 14.5548 +/- 151.0397 +/- 151.3983	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
22	1,1-Dichloropropene **CAS #** 563-58-6 **Purity** 99%	(Lot PR09161302)	2,507.4	µg/mL	+/- 14.5781 +/- 151.2810 +/- 151.6402	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
23	carbon tetrachloride **CAS #** 56-23-5 **Purity** 99%	(Lot SHBG1763V)	2,505.9	µg/mL	+/- 14.5694 +/- 151.1905 +/- 151.5495	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

24	n-Heptane (C7) **CAS #** 142-82-5 **Purity** 99%	(Lot MKBV6176V)	2,510.8	µg/mL	+/- +/- +/-	14.5977 151.4847 151.8443	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
25	1,2-Dichloroethane **CAS #** 107-06-2 **Purity** 99%	(Lot MKBV4565V)	2,511.1	µg/mL	+/- +/- +/-	14.5999 151.5073 151.8670	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
26	Benzene **CAS #** 71-43-2 **Purity** 99%	(Lot SHBG1169V)	2,502.9	µg/mL	+/- +/- +/-	14.5519 151.0095 151.3681	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
27	Trichloroethene **CAS #** 79-01-6 **Purity** 99%	(Lot SHBF0943V)	2,500.4	µg/mL	+/- +/- +/-	14.5374 150.8587 151.2169	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
28	Methylcyclohexane **CAS #** 108-87-2 **Purity** 99%	(Lot 50996APV)	2,503.9	µg/mL	+/- +/- +/-	14.5577 151.0699 151.4285	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
29	1,2-Dichloropropane **CAS #** 78-87-5 **Purity** 99%	(Lot 01113D0V)	2,523.5	µg/mL	+/- +/- +/-	14.6718 152.2539 152.6154	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
30	bromodichloromethane **CAS #** 75-27-4 **Purity** 98%	(Lot MKBL1617V)	2,509.0	µg/mL	+/- +/- +/-	14.5878 151.3818 151.7412	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
31	1,4-Dioxane **CAS #** 123-91-1 **Purity** 99%	(Lot SHBG6312V)	50,018.1	µg/mL	+/- +/- +/-	290.7945 3,017.8137 3,024.9785	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
32	Dibromomethane **CAS #** 74-95-3 **Purity** 98%	(Lot 10183283)	2,511.4	µg/mL	+/- +/- +/-	14.6013 151.5222 151.8820	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
33	cis-1,3-Dichloropropene **CAS #** 10061-01-5 **Purity** 99%	(Lot 22622)	2,506.0	µg/mL	+/- +/- +/-	14.5701 151.1981 151.5571	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
34	Toluene **CAS #** 108-88-3 **Purity** 99%	(Lot MKBV5601V)	2,515.5	µg/mL	+/- +/- +/-	14.6253 151.7713 152.1316	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
35	Ethyl methacrylate **CAS #** 97-63-2 **Purity** 99%	(Lot SHBD9190V)	2,503.1	µg/mL	+/- +/- +/-	14.5534 151.0246 151.3832	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
36	trans-1,3-Dichloropropene **CAS #** 10061-02-6 **Purity** 99%	(Lot C584177)	2,508.0	µg/mL	+/- +/- +/-	14.5817 151.3188 151.6780	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
37	1,1,2-Trichloroethane **CAS #** 79-00-5 **Purity** 99%	(Lot FGB01)	2,508.4	µg/mL	+/- +/- +/-	14.5839 151.3414 151.7007	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
38	1,3-Dichloropropane **CAS #** 142-28-9 **Purity** 99%	(Lot BCBG2162V)	2,522.8	µg/mL	+/- +/- +/-	14.6675 152.2087 152.5701	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
39	Tetrachloroethene **CAS #** 127-18-4 **Purity** 99%	(Lot SHBD9374V)	2,518.9	µg/mL	+/- +/- +/-	14.6450 151.9749 152.3357	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

40	dibromochloromethane **CAS #** 124-48-1 **Purity** 98%	(Lot MKBQ6577V)	2,505.4	µg/mL	+/- 14.5664 +/- 151.1601 +/- 151.5190	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
41	1,2-Dibromoethane (EDB) **CAS #** 106-93-4 **Purity** 99%	(Lot BCBH3877V)	2,505.1	µg/mL	+/- 14.5650 +/- 151.1453 +/- 151.5041	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
42	Chlorobenzene **CAS #** 108-90-7 **Purity** 99%	(Lot SHBF0505V)	2,505.6	µg/mL	+/- 14.5679 +/- 151.1755 +/- 151.5344	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
43	1,1,2,2-Tetrachloroethane **CAS #** 79-34-5 **Purity** 99%	(Lot CFA4D)	2,505.1	µg/mL	+/- 14.5650 +/- 151.1453 +/- 151.5041	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
44	Ethylbenzene **CAS #** 100-41-4 **Purity** 99%	(Lot SHBG5920V)	2,506.1	µg/mL	+/- 14.5708 +/- 151.2056 +/- 151.5646	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
45	m-Xylene **CAS #** 108-38-3 **Purity** 99%	(Lot SHBF8095V)	1,254.4	µg/mL	+/- 7.2930 +/- 75.6820 +/- 75.8617	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
46	p-Xylene **CAS #** 106-42-3 **Purity** 99%	(Lot SHBF3427V)	1,250.0	µg/mL	+/- 7.2676 +/- 75.4180 +/- 75.5971	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
47	o-Xylene **CAS #** 95-47-6 **Purity** 99%	(Lot SHBF7003V)	2,506.3	µg/mL	+/- 14.5716 +/- 151.2132 +/- 151.5722	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
48	Styrene **CAS #** 100-42-5 **Purity** 99%	(Lot MKBS7097V)	2,503.9	µg/mL	+/- 14.5577 +/- 151.0699 +/- 151.4285	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
49	Isopropylbenzene (cumene) **CAS #** 98-82-8 **Purity** 99%	(Lot 10185056)	2,509.4	µg/mL	+/- 14.5897 +/- 151.4017 +/- 151.7612	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
50	bromoform **CAS #** 75-25-2 **Purity** 99%	(Lot SHBC3410V)	2,503.3	µg/mL	+/- 14.5541 +/- 151.0322 +/- 151.3907	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
51	1,1,1,2-Tetrachloroethane **CAS #** 630-20-6 **Purity** 99%	(Lot MKBS3769V)	2,505.0	µg/mL	+/- 14.5643 +/- 151.1378 +/- 151.4966	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
52	chloroform **CAS #** 67-66-3 **Purity** 99%	(Lot MKBV2089V)	2,507.8	µg/mL	+/- 14.5803 +/- 151.3037 +/- 151.6629	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
53	1,2,3-Trichloropropane **CAS #** 96-18-4 **Purity** 99%	(Lot BCBH8722V)	2,504.8	µg/mL	+/- 14.5628 +/- 151.1227 +/- 151.4815	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
54	trans-1,4-dichloro-2-butene **CAS #** 110-57-6 **Purity** 95%	(Lot MKBP6041V)	2,499.7	µg/mL	+/- 14.5334 +/- 150.8172 +/- 151.1753	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
55	n-Propylbenzene **CAS #** 103-65-1 **Purity** 99%	(Lot MKBJ0332V)	2,507.5	µg/mL	+/- 14.5788 +/- 151.2886 +/- 151.6478	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

56	Bromobenzene		2,515.1	µg/mL	+/-	14.6232	µg/mL	Gravimetric
	CAS # 108-86-1	(Lot MKBD4032V)			+/-	151.7486	µg/mL	Unstressed
	Purity 99%				+/-	152.1089	µg/mL	Stressed
57	1,2,4-Trimethylbenzene		2,503.7	µg/mL	+/-	14.5565	µg/mL	Gravimetric
	CAS # 95-63-6	(Lot MKBJ6229V)			+/-	151.0566	µg/mL	Unstressed
	Purity 98%				+/-	151.4152	µg/mL	Stressed
58	2-Chlorotoluene		2,502.1	µg/mL	+/-	14.5476	µg/mL	Gravimetric
	CAS # 95-49-8	(Lot MKBH8892V)			+/-	150.9643	µg/mL	Unstressed
	Purity 99%				+/-	151.3227	µg/mL	Stressed
59	4-Chlorotoluene		2,512.6	µg/mL	+/-	14.6086	µg/mL	Gravimetric
	CAS # 106-43-4	(Lot MKBL7753V)			+/-	151.5978	µg/mL	Unstressed
	Purity 99%				+/-	151.9577	µg/mL	Stressed
60	tert-Butylbenzene		2,507.8	µg/mL	+/-	14.5803	µg/mL	Gravimetric
	CAS # 98-06-6	(Lot S52237V)			+/-	151.3037	µg/mL	Unstressed
	Purity 99%				+/-	151.6629	µg/mL	Stressed
61	1,3,5-Trimethylbenzene		2,502.5	µg/mL	+/-	14.5498	µg/mL	Gravimetric
	CAS # 108-67-8	(Lot BCBJ6245V)			+/-	150.9869	µg/mL	Unstressed
	Purity 99%				+/-	151.3454	µg/mL	Stressed
62	sec-Butylbenzene		2,521.8	µg/mL	+/-	14.6617	µg/mL	Gravimetric
	CAS # 135-98-8	(Lot MKBK3151V)			+/-	152.1484	µg/mL	Unstressed
	Purity 99%				+/-	152.5096	µg/mL	Stressed
63	p-Isopropyltoluene (p-Cymene)		2,502.6	µg/mL	+/-	14.5505	µg/mL	Gravimetric
	CAS # 99-87-6	(Lot MKBK4439V)			+/-	150.9945	µg/mL	Unstressed
	Purity 99%				+/-	151.3529	µg/mL	Stressed
64	1,3-Dichlorobenzene		2,505.8	µg/mL	+/-	14.5686	µg/mL	Gravimetric
	CAS # 541-73-1	(Lot BCBM5751V)			+/-	151.1830	µg/mL	Unstressed
	Purity 99%				+/-	151.5419	µg/mL	Stressed
65	1,4-Dichlorobenzene		2,504.1	µg/mL	+/-	14.5592	µg/mL	Gravimetric
	CAS # 106-46-7	(Lot MKBS1350V)			+/-	151.0850	µg/mL	Unstressed
	Purity 99%				+/-	151.4437	µg/mL	Stressed
66	n-Butylbenzene		2,503.3	µg/mL	+/-	14.5541	µg/mL	Gravimetric
	CAS # 104-51-8	(Lot 09418JJV)			+/-	151.0322	µg/mL	Unstressed
	Purity 99%				+/-	151.3907	µg/mL	Stressed
67	1,2-Dichlorobenzene		2,505.5	µg/mL	+/-	14.5672	µg/mL	Gravimetric
	CAS # 95-50-1	(Lot SHBD7331V)			+/-	151.1679	µg/mL	Unstressed
	Purity 99%				+/-	151.5268	µg/mL	Stressed
68	1,2-Dibromo-3-chloropropane		2,508.6	µg/mL	+/-	14.5854	µg/mL	Gravimetric
	CAS # 96-12-8	(Lot FBL01-JM)			+/-	151.3565	µg/mL	Unstressed
	Purity 99%				+/-	151.7158	µg/mL	Stressed
69	1,2,4-Trichlorobenzene		2,518.6	µg/mL	+/-	14.6435	µg/mL	Gravimetric
	CAS # 120-82-1	(Lot 26896BM)			+/-	151.9598	µg/mL	Unstressed
	Purity 99%				+/-	152.3206	µg/mL	Stressed
70	Hexachlorobutadiene		2,499.9	µg/mL	+/-	14.5344	µg/mL	Gravimetric
	CAS # 87-68-3	(Lot J31X013)			+/-	150.8275	µg/mL	Unstressed
	Purity 98%				+/-	151.1856	µg/mL	Stressed
71	Naphthalene		2,514.9	µg/mL	+/-	14.6217	µg/mL	Gravimetric
	CAS # 91-20-3	(Lot MKBH4351V)			+/-	151.7336	µg/mL	Unstressed
	Purity 99%				+/-	152.0938	µg/mL	Stressed

72	1,2,3-Trichlorobenzene		2,502.0 µg/mL	+/-	14.5468	µg/mL	Gravimetric
	CAS # 87-61-6	(Lot MKBS4859V)		+/-	150.9567	µg/mL	Unstressed
	Purity 99%			+/-	151.3151	µg/mL	Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

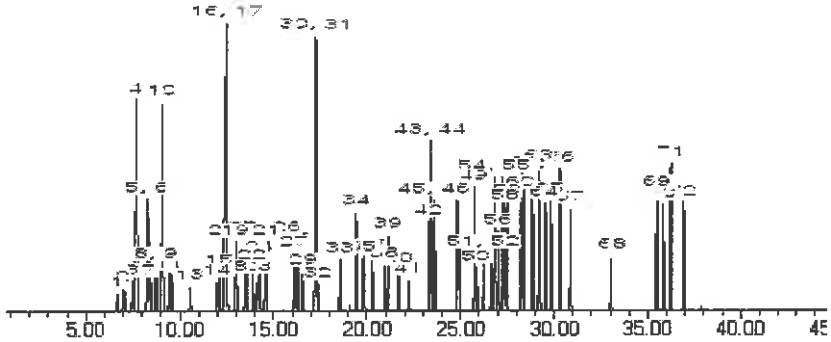
Carrier Gas:
helium-constant pressure 30 psi

Temp. Program:
40°C (hold 6 min.) to 240°C
@ 6°C/min. (hold 10 min.)

Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Rebecca Hauver

Date Mixed: 21-Mar-2016 **Balance:** 1125113331

Jodi E. Breon

Jodi E. Breon - QA Analyst

Date Passed: 28-Mar-2016

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

Reagent

VOA8260MEGA2_00052

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Reference Material Producer
Certificate #3222.01

Certificate of Analysis

ilac-MRA

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ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569720.sec **Lot No.:** A0108163

Description : 8260 List 1 / Std #1 MegaMix (2015)

8260 List 1 / Std #1 MegaMix (2015) 1250-62500 µg/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : January 31, 2017 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	Diethyl ether (ethyl ether) **CAS #** 60-29-7.SEC (Lot F23X068) **Purity** 99%	2,501.1 µg/mL	+/- 14.5418 µg/mL +/- 133.1044 µg/mL +/- 133.2511 µg/mL	Gravimetric Unstressed Stressed
2	1,1,2-Trichlorotrifluoroethane (CFC-113) **CAS #** 76-13-1.SEC (Lot 18342) **Purity** 99%	2,501.1 µg/mL	+/- 14.5418 µg/mL +/- 133.1044 µg/mL +/- 133.2511 µg/mL	Gravimetric Unstressed Stressed
3	1,1-Dichloroethene **CAS #** 75-35-4.SEC (Lot 903000) **Purity** 99%	2,502.8 µg/mL	+/- 14.5512 µg/mL +/- 133.1908 µg/mL +/- 133.3377 µg/mL	Gravimetric Unstressed Stressed
4	tert-Butanol (TBA) **CAS #** 75-65-0.SEC (Lot XYXDO) **Purity** 98%	25,000.5 µg/mL	+/- 145.3477 µg/mL +/- 1,330.4725 µg/mL +/- 1,331.9397 µg/mL	Gravimetric Unstressed Stressed
5	Iodomethane (methyl iodide) **CAS #** 74-88-4.SEC (Lot A13Y016) **Purity** 97%	2,500.5 µg/mL	+/- 14.5383 µg/mL +/- 133.0732 µg/mL +/- 133.2199 µg/mL	Gravimetric Unstressed Stressed
6	Methyl acetate **CAS #** 79-20-9.SEC (Lot YDGVD) **Purity** 99%	12,500.6 µg/mL	+/- 72.6759 µg/mL +/- 665.2553 µg/mL +/- 665.9889 µg/mL	Gravimetric Unstressed Stressed
7	Allyl chloride (3-chloropropene) **CAS #** 107-05-1.SEC (Lot 5MNOA-DQ) **Purity** 99%	2,501.3 µg/mL	+/- 14.5425 µg/mL +/- 133.1110 µg/mL +/- 133.2578 µg/mL	Gravimetric Unstressed Stressed

8	Methylene chloride (dichloromethane)		2,501.4	µg/mL	+/-	14.5432	µg/mL	Gravimetric
	CAS # 75-09-2.SEC	(Lot FGM02)			+/-	133.1177	µg/mL	Unstressed
	Purity 99%				+/-	133.2645	µg/mL	Stressed
9	Carbon disulfide		2,501.2	µg/mL	+/-	14.5422	µg/mL	Gravimetric
	CAS # 75-15-0.SEC	(Lot MKBL1376V)			+/-	133.1086	µg/mL	Unstressed
	Purity 98%				+/-	133.2554	µg/mL	Stressed
10	Acrylonitrile		25,002.1	µg/mL	+/-	145.3569	µg/mL	Gravimetric
	CAS # 107-13-1.SEC	(Lot CCFKL)			+/-	1,330.5571	µg/mL	Unstressed
	Purity 99%				+/-	1,332.0244	µg/mL	Stressed
11	cis-1,2-Dichloroethene		2,500.3	µg/mL	+/-	14.5367	µg/mL	Gravimetric
	CAS # 156-59-2.SEC	(Lot HGC01-BLKT)			+/-	133.0578	µg/mL	Unstressed
	Purity 99%				+/-	133.2045	µg/mL	Stressed
12	n-Hexane (C6)		2,500.1	µg/mL	+/-	14.5358	µg/mL	Gravimetric
	CAS # 110-54-3.SEC	(Lot K24W001)			+/-	133.0499	µg/mL	Unstressed
	Purity 98%				+/-	133.1967	µg/mL	Stressed
13	1,1-Dichloroethane		2,503.0	µg/mL	+/-	14.5527	µg/mL	Gravimetric
	CAS # 75-34-3.SEC	(Lot 2663100)			+/-	133.2041	µg/mL	Unstressed
	Purity 99%				+/-	133.3510	µg/mL	Stressed
14	2,2-Dichloropropane		2,500.8	µg/mL	+/-	14.5396	µg/mL	Gravimetric
	CAS # 594-20-7.SEC	(Lot GI01)			+/-	133.0844	µg/mL	Unstressed
	Purity 99%				+/-	133.2312	µg/mL	Stressed
15	trans-1,2-Dichloroethene		2,500.2	µg/mL	+/-	14.5362	µg/mL	Gravimetric
	CAS # 156-60-5.SEC	(Lot TS5UB)			+/-	133.0538	µg/mL	Unstressed
	Purity 97%				+/-	133.2005	µg/mL	Stressed
16	Isobutanol (2-Methyl-1-propanol)		62,501.3	µg/mL	+/-	363.3687	µg/mL	Gravimetric
	CAS # 78-83-1.SEC	(Lot PH2XK)			+/-	3,326.1766	µg/mL	Unstressed
	Purity 99%				+/-	3,329.8447	µg/mL	Stressed
17	Methyl-tert-butyl ether (MTBE)		2,500.5	µg/mL	+/-	14.5381	µg/mL	Gravimetric
	CAS # 1634-04-4.SEC	(Lot ZAQTA-MS)			+/-	133.0711	µg/mL	Unstressed
	Purity 99%				+/-	133.2178	µg/mL	Stressed
18	Bromochloromethane		2,500.6	µg/mL	+/-	14.5388	µg/mL	Gravimetric
	CAS # 74-97-5.SEC	(Lot 345600)			+/-	133.0777	µg/mL	Unstressed
	Purity 99%				+/-	133.2245	µg/mL	Stressed
19	Tetrahydrofuran		5,002.3	µg/mL	+/-	29.0835	µg/mL	Gravimetric
	CAS # 109-99-9.SEC	(Lot XWFLA)			+/-	266.2087	µg/mL	Unstressed
	Purity 99%				+/-	266.5023	µg/mL	Stressed
20	1,1,1-Trichloroethane		2,501.9	µg/mL	+/-	14.5461	µg/mL	Gravimetric
	CAS # 71-55-6.SEC	(Lot 1103200)			+/-	133.1443	µg/mL	Unstressed
	Purity 99%				+/-	133.2911	µg/mL	Stressed
21	Cyclohexane		2,501.5	µg/mL	+/-	14.5439	µg/mL	Gravimetric
	CAS # 110-82-7.SEC	(Lot YADRA)			+/-	133.1243	µg/mL	Unstressed
	Purity 99%				+/-	133.2711	µg/mL	Stressed
22	1,1-Dichloropropene		2,501.1	µg/mL	+/-	14.5419	µg/mL	Gravimetric
	CAS # 563-58-6.SEC	(Lot 2028500)			+/-	133.1054	µg/mL	Unstressed
	Purity 97%				+/-	133.2522	µg/mL	Stressed
23	Carbon tetrachloride		2,501.9	µg/mL	+/-	14.5465	µg/mL	Gravimetric
	CAS # 56-23-5.SEC	(Lot 11466)			+/-	133.1477	µg/mL	Unstressed
	Purity 98%				+/-	133.2946	µg/mL	Stressed

24	n-Heptane (C7)		2,500.4	µg/mL	+/-	14.5374	µg/mL	Gravimetric
	CAS # 142-82-5.SEC	(Lot OGM01)			+/-	133.0644	µg/mL	Unstressed
	Purity 99%				+/-	133.2112	µg/mL	Stressed
25	1,2-Dichloroethane		2,501.9	µg/mL	+/-	14.5461	µg/mL	Gravimetric
	CAS # 107-06-2.SEC	(Lot FO6PK)			+/-	133.1443	µg/mL	Unstressed
	Purity 99%				+/-	133.2911	µg/mL	Stressed
26	Benzene		2,500.9	µg/mL	+/-	14.5403	µg/mL	Gravimetric
	CAS # 71-43-2.SEC	(Lot B28Y008)			+/-	133.0911	µg/mL	Unstressed
	Purity 99%				+/-	133.2378	µg/mL	Stressed
27	Trichloroethene		2,500.6	µg/mL	+/-	14.5387	µg/mL	Gravimetric
	CAS # 79-01-6.SEC	(Lot H04X050)			+/-	133.0760	µg/mL	Unstressed
	Purity 98%				+/-	133.2228	µg/mL	Stressed
28	Methylcyclohexane		2,500.5	µg/mL	+/-	14.5381	µg/mL	Gravimetric
	CAS # 108-87-2.SEC	(Lot 24MSD-CD)			+/-	133.0711	µg/mL	Unstressed
	Purity 99%				+/-	133.2178	µg/mL	Stressed
29	1,2-Dichloropropane		2,500.0	µg/mL	+/-	14.5352	µg/mL	Gravimetric
	CAS # 78-87-5.SEC	(Lot OGG01)			+/-	133.0445	µg/mL	Unstressed
	Purity 99%				+/-	133.1912	µg/mL	Stressed
30	Bromodichloromethane		2,501.5	µg/mL	+/-	14.5439	µg/mL	Gravimetric
	CAS # 75-27-4.SEC	(Lot 10171168)			+/-	133.1243	µg/mL	Unstressed
	Purity 99%				+/-	133.2711	µg/mL	Stressed
31	1,4-Dioxane		50,000.8	µg/mL	+/-	290.6935	µg/mL	Gravimetric
	CAS # 123-91-1.SEC	(Lot CHA4A)			+/-	2,660.9280	µg/mL	Unstressed
	Purity 99%				+/-	2,663.8624	µg/mL	Stressed
32	Dibromomethane		2,500.6	µg/mL	+/-	14.5388	µg/mL	Gravimetric
	CAS # 74-95-3.SEC	(Lot FGI01-OICH)			+/-	133.0777	µg/mL	Unstressed
	Purity 99%				+/-	133.2245	µg/mL	Stressed
33	cis-1,3-Dichloropropene		2,501.0	µg/mL	+/-	14.5410	µg/mL	Gravimetric
	CAS # 10061-01-5.SEC	(Lot 7ZLXJ-TJ)			+/-	133.0977	µg/mL	Unstressed
	Purity 99%				+/-	133.2445	µg/mL	Stressed
34	Toluene		2,500.1	µg/mL	+/-	14.5359	µg/mL	Gravimetric
	CAS # 108-88-3.SEC	(Lot YND2B-BD)			+/-	133.0511	µg/mL	Unstressed
	Purity 99%				+/-	133.1979	µg/mL	Stressed
35	Ethyl methacrylate		2,500.8	µg/mL	+/-	14.5396	µg/mL	Gravimetric
	CAS # 97-63-2.SEC	(Lot MLWYK-LS)			+/-	133.0844	µg/mL	Unstressed
	Purity 99%				+/-	133.2312	µg/mL	Stressed
36	trans-1,3-Dichloropropene		2,501.6	µg/mL	+/-	14.5444	µg/mL	Gravimetric
	CAS # 10061-02-6.SEC	(Lot 2ECIC-NM)			+/-	133.1282	µg/mL	Unstressed
	Purity 98%				+/-	133.2750	µg/mL	Stressed
37	1,1,2-Trichloroethane		2,501.0	µg/mL	+/-	14.5410	µg/mL	Gravimetric
	CAS # 79-00-5.SEC	(Lot 732700)			+/-	133.0977	µg/mL	Unstressed
	Purity 99%				+/-	133.2445	µg/mL	Stressed
38	1,3-Dichloropropane		2,500.8	µg/mL	+/-	14.5396	µg/mL	Gravimetric
	CAS # 142-28-9.SEC	(Lot AGN01-EFPC)			+/-	133.0844	µg/mL	Unstressed
	Purity 99%				+/-	133.2312	µg/mL	Stressed
39	Tetrachloroethene		2,500.0	µg/mL	+/-	14.5352	µg/mL	Gravimetric
	CAS # 127-18-4.SEC	(Lot F09W014)			+/-	133.0445	µg/mL	Unstressed
	Purity 99%				+/-	133.1912	µg/mL	Stressed

40	Dibromochloromethane		2,501.8	µg/mL	+/-	14.5454	µg/mL	Gravimetric
	CAS # 124-48-1.SEC	(Lot I13W021)			+/-	133.1377	µg/mL	Unstressed
	Purity 97%				+/-	133.2845	µg/mL	Stressed
41	1,2-Dibromoethane (EDB)		2,502.1	µg/mL	+/-	14.5472	µg/mL	Gravimetric
	CAS # 106-93-4.SEC	(Lot 1368400)			+/-	133.1542	µg/mL	Unstressed
	Purity 98%				+/-	133.3011	µg/mL	Stressed
42	Chlorobenzene		2,501.6	µg/mL	+/-	14.5447	µg/mL	Gravimetric
	CAS # 108-90-7.SEC	(Lot 1161936)			+/-	133.1310	µg/mL	Unstressed
	Purity 99%				+/-	133.2778	µg/mL	Stressed
43	1,1,1,2-Tetrachloroethane		2,500.8	µg/mL	+/-	14.5396	µg/mL	Gravimetric
	CAS # 630-20-6.SEC	(Lot GC01-QSHR)			+/-	133.0844	µg/mL	Unstressed
	Purity 99%				+/-	133.2312	µg/mL	Stressed
44	Ethylbenzene		2,500.3	µg/mL	+/-	14.5367	µg/mL	Gravimetric
	CAS # 100-41-4.SEC	(Lot PI4SE-GR)			+/-	133.0578	µg/mL	Unstressed
	Purity 99%				+/-	133.2045	µg/mL	Stressed
45	m-Xylene		1,250.4	µg/mL	+/-	7.2698	µg/mL	Gravimetric
	CAS # 108-38-3.SEC	(Lot OUKMG-GB)			+/-	66.5422	µg/mL	Unstressed
	Purity 99%				+/-	66.6156	µg/mL	Stressed
46	o-Xylene		2,501.3	µg/mL	+/-	14.5425	µg/mL	Gravimetric
	CAS # 95-47-6.SEC	(Lot FGL01-KTPK)			+/-	133.1110	µg/mL	Unstressed
	Purity 99%				+/-	133.2578	µg/mL	Stressed
47	p-Xylene		1,251.6	µg/mL	+/-	7.2771	µg/mL	Gravimetric
	CAS # 106-42-3.SEC	(Lot GM01)			+/-	66.6087	µg/mL	Unstressed
	Purity 99%				+/-	66.6822	µg/mL	Stressed
48	Styrene		2,500.9	µg/mL	+/-	14.5403	µg/mL	Gravimetric
	CAS # 100-42-5.SEC	(Lot OFIOL-IA)			+/-	133.0911	µg/mL	Unstressed
	Purity 99%				+/-	133.2378	µg/mL	Stressed
49	Isopropylbenzene (cumene)		2,501.3	µg/mL	+/-	14.5425	µg/mL	Gravimetric
	CAS # 98-82-8.SEC	(Lot 2PHXG-IH)			+/-	133.1110	µg/mL	Unstressed
	Purity 99%				+/-	133.2578	µg/mL	Stressed
50	Bromoform		2,501.5	µg/mL	+/-	14.5439	µg/mL	Gravimetric
	CAS # 75-25-2.SEC	(Lot 1039300)			+/-	133.1243	µg/mL	Unstressed
	Purity 99%				+/-	133.2711	µg/mL	Stressed
51	1,1,2,2-Tetrachloroethane		2,502.9	µg/mL	+/-	14.5519	µg/mL	Gravimetric
	CAS # 79-34-5.SEC	(Lot CFA4D-AQ)			+/-	133.1975	µg/mL	Unstressed
	Purity 99%				+/-	133.3444	µg/mL	Stressed
52	Chloroform		2,501.6	µg/mL	+/-	14.5447	µg/mL	Gravimetric
	CAS # 67-66-3.SEC	(Lot 1297547)			+/-	133.1310	µg/mL	Unstressed
	Purity 99%				+/-	133.2778	µg/mL	Stressed
53	1,2,3-Trichloropropane		2,501.9	µg/mL	+/-	14.5465	µg/mL	Gravimetric
	CAS # 96-18-4.SEC	(Lot OGI01)			+/-	133.1477	µg/mL	Unstressed
	Purity 98%				+/-	133.2946	µg/mL	Stressed
54	trans-1,4-Dichloro-2-butene		2,502.7	µg/mL	+/-	14.5510	µg/mL	Gravimetric
	CAS # 110-57-6.SEC	(Lot 100700-2)			+/-	133.1893	µg/mL	Unstressed
	Purity 97%				+/-	133.3362	µg/mL	Stressed
55	n-Propylbenzene		2,500.0	µg/mL	+/-	14.5352	µg/mL	Gravimetric
	CAS # 103-65-1.SEC	(Lot T2HFC-IT)			+/-	133.0445	µg/mL	Unstressed
	Purity 99%				+/-	133.1912	µg/mL	Stressed

56	Bromobenzene **CAS #** 108-86-1.SEC **Purity** 99%	(Lot 2FUHG-EM)	2,501.6 µg/mL	+/- 14.5447 +/- 133.1310 +/- 133.2778	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
57	1,2,4-Trimethylbenzene **CAS #** 95-63-6.SEC **Purity** 99%	(Lot SC7LO-QA)	2,502.4 µg/mL	+/- 14.5490 +/- 133.1709 +/- 133.3177	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
58	2-Chlorotoluene **CAS #** 95-49-8.SEC **Purity** 99%	(Lot SW8QG-AO)	2,500.5 µg/mL	+/- 14.5381 +/- 133.0711 +/- 133.2178	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
59	4-Chlorotoluene **CAS #** 106-43-4.SEC **Purity** 99%	(Lot P4XHJ-AO)	2,500.3 µg/mL	+/- 14.5367 +/- 133.0578 +/- 133.2045	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
60	tert-Butylbenzene **CAS #** 98-06-6.SEC **Purity** 99%	(Lot OGN01)	2,501.6 µg/mL	+/- 14.5447 +/- 133.1310 +/- 133.2778	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
61	1,3,5-Trimethylbenzene **CAS #** 108-67-8.SEC **Purity** 99%	(Lot FGH02-CMLN)	2,500.3 µg/mL	+/- 14.5367 +/- 133.0578 +/- 133.2045	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
62	sec-Butylbenzene **CAS #** 135-98-8.SEC **Purity** 99%	(Lot OGN01)	2,500.1 µg/mL	+/- 14.5359 +/- 133.0511 +/- 133.1979	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
63	4-Isopropyltoluene (p-cymene) **CAS #** 99-87-6.SEC **Purity** 99%	(Lot 1721700)	2,501.6 µg/mL	+/- 14.5447 +/- 133.1310 +/- 133.2778	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
64	1,3-Dichlorobenzene **CAS #** 541-73-1.SEC **Purity** 99%	(Lot FMDFD-KA)	2,501.5 µg/mL	+/- 14.5439 +/- 133.1243 +/- 133.2711	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
65	1,4-Dichlorobenzene **CAS #** 106-46-7.SEC **Purity** 99%	(Lot YWKDC-MK)	2,500.3 µg/mL	+/- 14.5367 +/- 133.0578 +/- 133.2045	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
66	n-Butylbenzene **CAS #** 104-51-8.SEC **Purity** 99%	(Lot OGN01)	2,500.6 µg/mL	+/- 14.5388 +/- 133.0777 +/- 133.2245	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
67	1,2-Dichlorobenzene **CAS #** 95-50-1.SEC **Purity** 99%	(Lot 4NRGF-OT)	2,500.0 µg/mL	+/- 14.5352 +/- 133.0445 +/- 133.1912	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
68	1,2-Dibromo-3-chloropropane **CAS #** 96-12-8.SEC **Purity** 97%	(Lot LC00408V)	2,500.5 µg/mL	+/- 14.5383 +/- 133.0732 +/- 133.2199	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
69	1,2,4-Trichlorobenzene **CAS #** 120-82-1.SEC **Purity** 99%	(Lot OGO01)	2,501.0 µg/mL	+/- 14.5410 +/- 133.0977 +/- 133.2445	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
70	Hexachlorobutadiene **CAS #** 87-68-3.SEC **Purity** 97%	(Lot 2009400)	2,501.0 µg/mL	+/- 14.5412 +/- 133.0990 +/- 133.2458	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
71	Naphthalene **CAS #** 91-20-3.SEC **Purity** 99%	(Lot 4KW3H-OO)	2,500.5 µg/mL	+/- 14.5381 +/- 133.0711 +/- 133.2178	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

72	1,2,3-Trichlorobenzene		2,502.4	µg/mL	+/-	14.5490	µg/mL	Gravimetric
	CAS # 87-61-6.SEC	(Lot A0043055)			+/-	133.1709	µg/mL	Unstressed
	Purity 99%				+/-	133.3177	µg/mL	Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Column:
60m x 0.25mm x 1.4µm
Rtx-502.2 (cat.#10916)

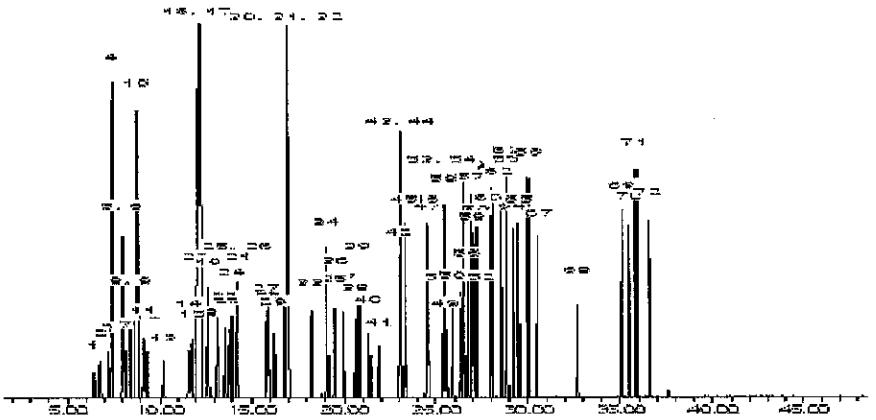
Carrier Gas:
helium-constant pressure 30 psi

Temp. Program:
40°C (hold 6 min.) to 240°C
@ 6°C/min. (hold 10 min.)

Inj. Temp:
200°C

Det. Temp:
250°C

Det. Type:
MSD



This chromatogram represents a general set of testing conditions chosen for product acceptance. For optimal results in your lab, conditions should be adjusted for your specific instrument, method, and application.

Tyler Brown - QA Analyst

Date Mixed: 07-Jan-2015 **Balance:** 1127510105

Date Passed: 14-Jan-2015

Manufactured under Restek's ISO 9001:2008 Registered Quality System Certificate #FM 80397

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 567650 **Lot No.:** A0112455

Description : 8260 Surrogate Standard

8260 Surrogate Standard 2,500 ug/ml, P&T Methanol, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : July 31, 2020 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L., K=2)		
1	Dibromofluoromethane **CAS #** 1868-53-7 **Purity** 99%	(Lot 022012)	2,509.6 µg/mL	+/- 14.5910 µg/mL +/- 28.2993 µg/mL +/- 32.5644 µg/mL		Gravimetric Unstressed Stressed
2	1,2-Dichloroethane-d4 **CAS #** 17060-07-0 **Purity** 99%	(Lot 14C-191)	2,507.5 µg/mL	+/- 14.5788 µg/mL +/- 28.2757 µg/mL +/- 32.5371 µg/mL		Gravimetric Unstressed Stressed
3	Toluene-d8 **CAS #** 2037-26-5 **Purity** 99%	(Lot PR-26282)	2,509.0 µg/mL	+/- 14.5875 µg/mL +/- 28.2926 µg/mL +/- 32.5566 µg/mL		Gravimetric Unstressed Stressed
4	1-Bromo-4-fluorobenzene (BFB) **CAS #** 460-00-4 **Purity** 99%	(Lot 20401KOV)	2,506.0 µg/mL	+/- 14.5701 µg/mL +/- 28.2587 µg/mL +/- 32.5176 µg/mL		Gravimetric Unstressed Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Reagent

VOA8260SURRES_00117

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 567650 **Lot No.:** A0112455

Description : 8260 Surrogate Standard

8260 Surrogate Standard 2,500 ug/ml, P&T Methanol, 5 ml/ampul

Container Size : 5 mL **Pkg Amt:** > 5 mL

Expiration Date : July 31, 2020 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)		Expanded Uncertainty (95% C.L., K=2)		
1	Dibromofluoromethane **CAS #** 1868-53-7 **Purity** 99%	(Lot 022012)	2,509.6	µg/mL	+/- 14.5910 +/- 28.2993 +/- 32.5644	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
2	1,2-Dichloroethane-d4 **CAS #** 17060-07-0 **Purity** 99%	(Lot 14C-191)	2,507.5	µg/mL	+/- 14.5788 +/- 28.2757 +/- 32.5371	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
3	Toluene-d8 **CAS #** 2037-26-5 **Purity** 99%	(Lot PR-26282)	2,509.0	µg/mL	+/- 14.5875 +/- 28.2926 +/- 32.5566	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
4	1-Bromo-4-fluorobenzene (BFB) **CAS #** 460-00-4 **Purity** 99%	(Lot 20401KOV)	2,506.0	µg/mL	+/- 14.5701 +/- 28.2587 +/- 32.5176	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Reagent

VOA8260VARES_00069

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569724 **Lot No.:** A0118255

Description : 8260 List 1 / Std #6 Vinyl Acetate (2015)

8260 List 1 / Std #6 Vinyl Acetate (2015) 5000 ug/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : September 30, 2016 **Storage:** 0°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Vinyl acetate **CAS #** 108-05-4 (Lot STBD7333V) **Purity** 99%	5,003.0 µg/mL	+/- 29.3604 +/- 301.8795 +/- 302.5961	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:
Vinyl acetate is a volatile organic ester included in the target lists of several US EPA and other methods. Under acidic conditions, esters react with alcohols to form new esters (transesterification). Methanol-based mixes containing halogenated compounds are slightly acidic, so it is important to minimize exposure of vinyl acetate to mixes of halogenated compounds in methanol. For this reason, we offer vinyl acetate in individual solution, and suggest that it be introduced into the working level calibration solution immediately before use. This will minimize problems and ensure more consistent results.

Reagent

VOA8260VARES2_00076

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569724.sec **Lot No.:** A0119399

Description : 8260 List 1 / Std #6 Vinyl Acetate (2015)

8260 List 1 / Std #6 Vinyl Acetate (2015) 5000 ug/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2016 **Storage:** 0°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound		Grav. Conc. (weight/volume)		Expanded Uncertainty (95% C.L., K=2)		
1	Vinyl acetate **CAS #** 108-05-4.SEC **Purity** 99%	(Lot F3Z5C)	5,009.0	µg/mL	+/- 29.3956 +/- 302.2416 +/- 302.9590	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:

Vinyl acetate is a volatile organic ester included in the target lists of several US EPA and other methods. Under acidic conditions, esters react with alcohols to form new esters (transesterification). Methanol-based mixes containing halogenated compounds are slightly acidic, so it is important to minimize exposure of vinyl acetate to mixes of halogenated compounds in methanol. For this reason, we offer vinyl acetate in individual solution, and suggest that it be introduced into the working level calibration solution immediately before use. This will minimize problems and ensure more consistent results.

Reagent

VOAACRORES_00102

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 568720 **Lot No.:** A0119846

Description : 8260 List 1/Std #5 Acrolein High

8260 List 1/Std #5 Acrolein High 19,750 µg/mL, Water, 1 mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : October 31, 2016 **Storage:** 0°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	Acrolein	19,873.0 µg/mL	+/- 116.3608 µg/mL	Gravimetric
	CAS # 107-02-8 (Lot 160518JLM)		+/- 637.1909 µg/mL	Unstressed
	Purity 99%		+/- 740.6647 µg/mL	Stressed

Solvent: Water
CAS # 7732-18-5
Purity 99%

Reagent

VOAACRRES2ND_00091

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 568720.sec **Lot No.:** A0119844

Description : 8260 List 1/Std #5 Acrolein High

8260 List 1/Std #5 Acrolein High 19,750 µg/ml, Water, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : October 31, 2016 **Storage:** 0°C or colder

Handling: This product is photosensitive.

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	Acrolein	19.778.4 µg/mL	+/- 115.8066	µg/mL	Gravimetric
	CAS # 107-02-8.SEC (Lot 5050900)		+/- 634.1564	µg/mL	Unstressed
	Purity 98%		+/- 737.1374	µg/mL	Stressed

Solvent: Water
CAS # 7732-18-5
Purity 99%

Reagent

VOACEVERES_00104

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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569723 **Lot No.:** A0115628

Description : 8260 List 1 / Std #4 2-CEVE (2015)

8260 List 1 / Std #4 2-CEVE (2015) 2,500 ug/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	2-Chloroethyl vinyl ether **CAS #** 110-75-8 (Lot MKBK2735V) **Purity** 99%	2,509.2 µg/mL	+/- 14.5887 +/- 53.7223 +/- 55.2841	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:
Degradation of tetrachloroethylene to pentachloroethane may occur if solutions containing 2-chloroethyl vinyl ether are combined with solutions that contain tetrachloroethylene.

Reagent

VOACEVERES2ND_00067

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: (800)356-1688
Fax: (814)353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

ACCREDITED ISO Guide 34 Accredited Reference Material Producer Certificate #3222.01

ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 569723.sec **Lot No.:** A0115500

Description : 8260 List 1 / Std #4 2-CEVE (2015)

8260 List 1 / Std #4 2-CEVE (2015) 2,500 ug/ml, P&T Methanol, 1 ml/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : November 30, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)		
1	2-Chloroethyl vinyl ether **CAS #** 110-75-8.SEC (Lot BQZ2K-QD) **Purity** 99%	2,501.5 µg/mL	+/- 14.5439 +/- 53.5574 +/- 55.1144	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Tech Tips:
Degradation of tetrachloroethylene to pentachloroethane may occur if solutions containing 2-chloroethyl vinyl ether are combined with solutions that contain tetrachloroethylene.

Reagent

VOARESEE1ST_00035

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: (800)356-1688
Fax: (814)353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

ACCREDITED
ISO Guide 34 Accredited
Reference Material Producer
Certificate #3222.01

Certificate of Analysis

ILAC-MRA

ACCREDITED
ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 568363-FL **Lot No.:** A0120234

Description : Custom EE Standard

Custom EE Standard 5,000µg/mL, P&T Methanol, 1mL/ampul

Container Size : 2 mL **Pkg Amt:** > 1 mL

Expiration Date : January 31, 2018 **Storage:** 0°C or colder

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L., K=2)		
1	3-Chlorobenzotrifluoride **CAS #** 98-15-7 (Lot 21324DO) **Purity** 99%	5,025.0 µg/mL	+/- 29.4895 +/- 281.7753 +/- 288.3671	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
2	4-Chlorobenzotrifluoride **CAS #** 98-56-6 (Lot 08507BO) **Purity** 99%	5,031.0 µg/mL	+/- 29.5247 +/- 282.1117 +/- 288.7115	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
3	2-Chlorobenzotrifluoride **CAS #** 88-16-4 (Lot I0316DQ) **Purity** 99%	5,011.0 µg/mL	+/- 29.4074 +/- 280.9902 +/- 287.5637	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
4	3-Chlorotoluene **CAS #** 108-41-8 (Lot 13528LX) **Purity** 99%	5,046.0 µg/mL	+/- 29.6128 +/- 282.9528 +/- 289.5723	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
5	2,4-Dichlorobenzotrifluoride **CAS #** 320-60-5 (Lot MKBL3552V) **Purity** 99%	5,018.0 µg/mL	+/- 29.4484 +/- 281.3828 +/- 287.9654	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
6	3,4-Dichlorobenzotrifluoride **CAS #** 328-84-7 (Lot 11105EJV) **Purity** 99%	5,031.0 µg/mL	+/- 29.5247 +/- 282.1117 +/- 288.7115	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
7	2,5-Dichlorobenzotrifluoride **CAS #** 320-50-3 (Lot 04415DSV) **Purity** 99%	5,047.0 µg/mL	+/- 29.6186 +/- 283.0089 +/- 289.6296	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

8	2,4-Dichlorotoluene **CAS #** 95-73-8 **Purity** 99%	(Lot 4194700)	5,036.0 µg/mL	+/- 29.5541 +/- 282.3921 +/- 288.9984	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
9	2,5-Dichlorotoluene **CAS #** 19398-61-9 **Purity** 99%	(Lot 1381346V)	5,016.0 µg/mL	+/- 29.4367 +/- 281.2706 +/- 287.8507	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
10	2,6-Dichlorotoluene **CAS #** 118-69-4 **Purity** 99%	(Lot MKBG8583V)	5,027.0 µg/mL	+/- 29.5013 +/- 281.8874 +/- 288.4819	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
11	3,4-Dichlorotoluene **CAS #** 95-75-0 **Purity** 99%	(Lot 09419AS)	5,021.0 µg/mL	+/- 29.4660 +/- 281.5510 +/- 288.1376	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
12	2,3-Dichlorotoluene **CAS #** 32768-54-0 **Purity** 99%	(Lot 41215)	5,031.0 µg/mL	+/- 29.5247 +/- 282.1117 +/- 288.7115	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
13	2,4,5-Trichlorotoluene **CAS #** 6639-30-1 **Purity** 99%	(Lot 5150700)	5,041.0 µg/mL	+/- 29.5834 +/- 282.6725 +/- 289.2853	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
14	2,3,6-Trichlorotoluene **CAS #** 2077-46-5 **Purity** 99%	(Lot NT054179)	5,003.0 µg/mL	+/- 29.3604 +/- 280.5416 +/- 287.1046	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Solvent: P&T Methanol
CAS # 67-56-1
Purity 99%

Method 8260C Low Level

Volatile Organic Compounds (GC/MS) by Method 8260C Low Level

FORM II
GC/MS VOA SURROGATE RECOVERY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Matrix: Water Level: Low

GC Column (1): DB-624 ID: 0.18(mm)

Client Sample ID	Lab Sample ID	DBFM #	DCA #	TOL #	BFB #
HD-QC6-0/1-2	180-59749-1	106	124	104	117
HD-MW-57-0/1-0	180-59749-2	105	123	104	113
HD-MW-129-0/1-0	180-59749-3	103	116	115	100
HD-MW-129-0/1-0 DL	180-59749-3 DL	102	120	106	118
HD-MW-127-0/1-0	180-59749-4	102	122	107	106
HD-MW-87-0/1-0	180-59749-5	101	119	107	104
HD-MW-88-0/1-0	180-59749-6	107	120	103	113
HD-MW-88-0/1-0 DL	180-59749-6 DL	98	94	106	99
HD-MW-12-0/1-0	180-59749-7	98	95	106	99
	MB 180-191289/6	102	120	104	105
	MB 180-191520/4	100	114	104	114
	MB 180-191652/4	93	91	103	97
	LCS 180-191289/9	103	113	104	112
	LCS 180-191520/9	95	107	97	103
	LCS 180-191652/7	99	91	105	103

	QC LIMITS
DBFM = Dibromofluoromethane (Surr)	77-127
DCA = 1,2-Dichloroethane-d4 (Surr)	72-134
TOL = Toluene-d8 (Surr)	80-120
BFB = 4-Bromofluorobenzene (Surr)	72-120

Column to be used to flag recovery values

FORM II 8260C

FORM III
GC/MS VOA LAB CONTROL SAMPLE RECOVERY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Matrix: Water Level: Low Lab File ID: 51015009.D

Lab ID: LCS 180-191289/9 Client ID:

COMPOUND	SPIKE ADDED (ug/L)	LCS CONCENTRATION (ug/L)	LCS % REC	QC LIMITS REC	#
Chloromethane	10.0	12.8	128	51-150	
Vinyl chloride	10.0	12.2	122	61-138	
Bromomethane	10.0	8.43	84	39-150	
Chloroethane	10.0	11.2	112	53-148	
1,1-Dichloroethene	10.0	9.86	99	71-122	
Acetone	20.0	20.9	105	10-150	
Carbon disulfide	10.0	9.35	93	57-137	
Methylene Chloride	10.0	9.86	99	71-129	
trans-1,2-Dichloroethene	10.0	10.4	104	80-121	
Methyl tert-butyl ether	10.0	9.23	92	68-124	
1,1-Dichloroethane	10.0	11.0	110	76-126	
cis-1,2-Dichloroethene	10.0	10.1	101	80-120	
Bromochloromethane	10.0	9.24	92	76-120	
2-Butanone (MEK)	20.0	19.8	99	41-150	
Chloroform	10.0	10.7	107	78-122	
1,1,1-Trichloroethane	10.0	9.42	94	57-128	
Carbon tetrachloride	10.0	9.13	91	59-145	
Benzene	10.0	10.7	107	80-121	
1,2-Dichloroethane	10.0	11.7	117	72-126	
Trichloroethene	10.0	9.45	95	79-120	
1,2-Dichloropropane	10.0	11.2	112	78-123	
Bromodichloromethane	10.0	10.2	102	72-124	
cis-1,3-Dichloropropene	10.0	8.00	80	67-127	
4-Methyl-2-pentanone (MIBK)	20.0	17.6	88	49-147	
Toluene	10.0	10.9	109	80-125	
trans-1,3-Dichloropropene	10.0	7.52	75	63-144	
1,1,2-Trichloroethane	10.0	10.8	108	77-127	
Tetrachloroethene	10.0	11.2	112	80-122	
2-Hexanone	20.0	15.7	79	40-150	
Dibromochloromethane	10.0	9.15	91	71-134	
1,2-Dibromoethane (EDB)	10.0	10.0	100	79-126	
Chlorobenzene	10.0	11.4	114	80-120	
1,1,1,2-Tetrachloroethane	10.0	10.2	102	75-135	
Ethylbenzene	10.0	11.0	110	80-123	
Xylenes, Total	20.0	22.9	115	80-123	
Styrene	10.0	12.0	120	80-125	
Bromoform	10.0	8.31	83	62-138	
1,1,2,2-Tetrachloroethane	10.0	12.2	122	78-135	
Acrylonitrile	100	130	130	66-146	
1,4-Dioxane	200	230	115	10-150	

Column to be used to flag recovery and RPD values

FORM III 8260C

FORM III
GC/MS VOA LAB CONTROL SAMPLE RECOVERY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Matrix: Water Level: Low Lab File ID: 51018009.D

Lab ID: LCS 180-191520/9 Client ID:

COMPOUND	SPIKE ADDED (ug/L)	LCS CONCENTRATION (ug/L)	LCS % REC	QC LIMITS REC	#
Chloromethane	10.0	11.6	116	51-150	
Vinyl chloride	10.0	10.7	107	61-138	
Bromomethane	10.0	8.21	82	39-150	
Chloroethane	10.0	9.82	98	53-148	
1,1-Dichloroethene	10.0	8.85	89	71-122	
Acetone	20.0	19.5	97	10-150	
Carbon disulfide	10.0	8.62	86	57-137	
Methylene Chloride	10.0	9.96	100	71-129	
trans-1,2-Dichloroethene	10.0	9.07	91	80-121	
Methyl tert-butyl ether	10.0	9.05	90	68-124	
1,1-Dichloroethane	10.0	10.2	102	76-126	
cis-1,2-Dichloroethene	10.0	9.53	95	80-120	
Bromochloromethane	10.0	9.24	92	76-120	
2-Butanone (MEK)	20.0	21.4	107	41-150	
Chloroform	10.0	9.83	98	78-122	
1,1,1-Trichloroethane	10.0	8.46	85	57-128	
Carbon tetrachloride	10.0	8.05	80	59-145	
Benzene	10.0	10.2	102	80-121	
1,2-Dichloroethane	10.0	10.8	108	72-126	
Trichloroethene	10.0	9.13	91	79-120	
1,2-Dichloropropane	10.0	10.9	109	78-123	
Bromodichloromethane	10.0	10.2	102	72-124	
cis-1,3-Dichloropropene	10.0	8.64	86	67-127	
4-Methyl-2-pentanone (MIBK)	20.0	18.1	90	49-147	
Toluene	10.0	9.93	99	80-125	
trans-1,3-Dichloropropene	10.0	7.79	78	63-144	
1,1,2-Trichloroethane	10.0	10.1	101	77-127	
Tetrachloroethene	10.0	9.66	97	80-122	
2-Hexanone	20.0	15.8	79	40-150	
Dibromochloromethane	10.0	9.06	91	71-134	
1,2-Dibromoethane (EDB)	10.0	10.1	101	79-126	
Chlorobenzene	10.0	10.5	105	80-120	
1,1,1,2-Tetrachloroethane	10.0	9.51	95	75-135	
Ethylbenzene	10.0	10.1	101	80-123	
Xylenes, Total	20.0	21.3	107	80-123	
Styrene	10.0	10.9	109	80-125	
Bromoform	10.0	9.14	91	62-138	
1,1,2,2-Tetrachloroethane	10.0	11.7	117	78-135	
Acrylonitrile	100	129	129	66-146	
1,4-Dioxane	200	231	116	10-150	

Column to be used to flag recovery and RPD values

FORM III 8260C

FORM III
GC/MS VOA LAB CONTROL SAMPLE RECOVERY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Matrix: Water Level: Low Lab File ID: 61019007.D

Lab ID: LCS 180-191652/7 Client ID:

COMPOUND	SPIKE ADDED (ug/L)	LCS CONCENTRATION (ug/L)	LCS % REC	QC LIMITS REC	#
Chloromethane	10.0	11.0	110	51-150	
Vinyl chloride	10.0	10.7	107	61-138	
Bromomethane	10.0	11.5	115	39-150	
Chloroethane	10.0	9.70	97	53-148	
1,1-Dichloroethene	10.0	9.78	98	71-122	
Acetone	20.0	25.4	127	10-150	
Carbon disulfide	10.0	9.96	100	57-137	
Methylene Chloride	10.0	10.3	103	71-129	
trans-1,2-Dichloroethene	10.0	10.1	101	80-121	
Methyl tert-butyl ether	10.0	10.0	100	68-124	
1,1-Dichloroethane	10.0	9.90	99	76-126	
cis-1,2-Dichloroethene	10.0	10.0	100	80-120	
Bromochloromethane	10.0	9.56	96	76-120	
2-Butanone (MEK)	20.0	22.7	114	41-150	
Chloroform	10.0	9.86	99	78-122	
1,1,1-Trichloroethane	10.0	9.95	100	57-128	
Carbon tetrachloride	10.0	10.4	104	59-145	
Benzene	10.0	10.2	102	80-121	
1,2-Dichloroethane	10.0	9.44	94	72-126	
Trichloroethene	10.0	10.1	101	79-120	
1,2-Dichloropropane	10.0	9.61	96	78-123	
Bromodichloromethane	10.0	9.80	98	72-124	
cis-1,3-Dichloropropene	10.0	9.97	100	67-127	
4-Methyl-2-pentanone (MIBK)	20.0	20.7	104	49-147	
Toluene	10.0	10.8	108	80-125	
trans-1,3-Dichloropropene	10.0	9.49	95	63-144	
1,1,2-Trichloroethane	10.0	10.4	104	77-127	
Tetrachloroethene	10.0	10.6	106	80-122	
2-Hexanone	20.0	24.4	122	40-150	
Dibromochloromethane	10.0	9.88	99	71-134	
1,2-Dibromoethane (EDB)	10.0	10.6	106	79-126	
Chlorobenzene	10.0	10.8	108	80-120	
1,1,1,2-Tetrachloroethane	10.0	10.7	107	75-135	
Ethylbenzene	10.0	11.1	111	80-123	
Xylenes, Total	20.0	22.0	110	80-123	
Styrene	10.0	10.8	108	80-125	
Bromoform	10.0	10.2	102	62-138	
1,1,2,2-Tetrachloroethane	10.0	10.6	106	78-135	
Acrylonitrile	100	96.7	97	66-146	
1,4-Dioxane	200	148 J	74	10-150	

Column to be used to flag recovery and RPD values

FORM III 8260C

FORM IV
GC/MS VOA METHOD BLANK SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 51015006.D Lab Sample ID: MB 180-191289/6

Matrix: Water Heated Purge:(Y/N) N

Instrument ID: CHHP5 Date Analyzed: 10/15/2016 14:46

GC Column: DB-624 ID: 0.18(mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
	LCS 180-191289/9	51015009.D	10/15/2016 16:10
HD-QC6-0/1-2	180-59749-1	51015026.D	10/15/2016 22:57
HD-MW-57-0/1-0	180-59749-2	51015027.D	10/15/2016 23:21
HD-MW-129-0/1-0	180-59749-3	51015028.D	10/15/2016 23:45
HD-MW-127-0/1-0	180-59749-4	51015030.D	10/16/2016 00:33
HD-MW-87-0/1-0	180-59749-5	51015031.D	10/16/2016 00:57

FORM IV
GC/MS VOA METHOD BLANK SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 51018004.D Lab Sample ID: MB 180-191520/4

Matrix: Water Heated Purge:(Y/N) N

Instrument ID: CHHP5 Date Analyzed: 10/18/2016 13:17

GC Column: DB-624 ID: 0.18(mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
	LCS 180-191520/9	51018009.D	10/18/2016 15:44
HD-MW-129-0/1-0 DL	180-59749-3 DL	51018016.D	10/18/2016 18:40
HD-MW-88-0/1-0	180-59749-6	51018017.D	10/18/2016 19:05

FORM IV
GC/MS VOA METHOD BLANK SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 61019004.D Lab Sample ID: MB 180-191652/4

Matrix: Water Heated Purge:(Y/N) N

Instrument ID: CHHP6 Date Analyzed: 10/19/2016 11:51

GC Column: DB-624 ID: 0.18(mm)

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
	LCS 180-191652/7	61019007.D	10/19/2016 13:15
HD-MW-88-0/1-0 DL	180-59749-6 DL	61019027.D	10/19/2016 21:22
HD-MW-12-0/1-0	180-59749-7	61019028.D	10/19/2016 21:46

FORM V
GC/MS VOA INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 50928002.D BFB Injection Date: 09/28/2016

Instrument ID: CHHP5 BFB Injection Time: 12:00

Analysis Batch No.: 189445

M/E	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE	
50	15.0 - 40.0 % of mass 95	22.7	
75	30.0 - 60.0 % of mass 95	52.4	
95	Base Peak, 100% relative abundance	100.0	
96	5.0 - 9.0 % of mass 95	7.8	
173	Less than 2.0 % of mass 174	0.6	(0.8) 1
174	50.0 - 120.00 % of mass 95	70.8	
175	5.0 - 9.0 % of mass 174	6.2	(8.7) 1
176	95.0 - 101.0 % of mass 174	67.7	(95.6) 1
177	5.0 - 9.0 % of mass 176	4.9	(7.2) 2

1-Value is % mass 174 2-Value is % mass 176

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS AND STANDARDS:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
	IC 180-189445/5	50928005.D	09/28/2016	14:27
	ICIS 180-189445/6	50928006.D	09/28/2016	14:51
	IC 180-189445/7	50928007.D	09/28/2016	15:15
	IC 180-189445/8	50928008.D	09/28/2016	15:39
	IC 180-189445/9	50928009.D	09/28/2016	16:03
	IC 180-189445/10	50928010.D	09/28/2016	16:27
	IC 180-189445/11	50928011.D	09/28/2016	16:51
	IC 180-189445/15	50928015.D	09/28/2016	18:27

FORM V
GC/MS VOA INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 51015005.D BFB Injection Date: 10/15/2016

Instrument ID: CHHP5 BFB Injection Time: 13:06

Analysis Batch No.: 191289

M/E	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE	
50	15.0 - 40.0 % of mass 95	24.4	
75	30.0 - 60.0 % of mass 95	53.7	
95	Base Peak, 100% relative abundance	100.0	
96	5.0 - 9.0 % of mass 95	6.9	
173	Less than 2.0 % of mass 174	0.0	(0.0) 1
174	50.0 - 120.00 % of mass 95	68.8	
175	5.0 - 9.0 % of mass 174	5.3	(7.6) 1
176	95.0 - 101.0 % of mass 174	66.5	(96.6) 1
177	5.0 - 9.0 % of mass 176	4.0	(6.0) 2

1-Value is % mass 174 2-Value is % mass 176

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS AND STANDARDS:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
	CCVIS 180-191289/2	51015002.D	10/15/2016	13:43
	MB 180-191289/6	51015006.D	10/15/2016	14:46
	LCS 180-191289/9	51015009.D	10/15/2016	16:10
HD-QC6-0/1-2	180-59749-1	51015026.D	10/15/2016	22:57
HD-MW-57-0/1-0	180-59749-2	51015027.D	10/15/2016	23:21
HD-MW-129-0/1-0	180-59749-3	51015028.D	10/15/2016	23:45
HD-MW-127-0/1-0	180-59749-4	51015030.D	10/16/2016	00:33
HD-MW-87-0/1-0	180-59749-5	51015031.D	10/16/2016	00:57

FORM V
GC/MS VOA INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 51018001.D BFB Injection Date: 10/18/2016

Instrument ID: CHHP5 BFB Injection Time: 11:36

Analysis Batch No.: 191520

M/E	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE	
50	15.0 - 40.0 % of mass 95	28.3	
75	30.0 - 60.0 % of mass 95	55.4	
95	Base Peak, 100% relative abundance	100.0	
96	5.0 - 9.0 % of mass 95	6.9	
173	Less than 2.0 % of mass 174	0.3	(0.5) 1
174	50.0 - 120.00 % of mass 95	71.4	
175	5.0 - 9.0 % of mass 174	6.1	(8.6) 1
176	95.0 - 101.0 % of mass 174	70.2	(98.3) 1
177	5.0 - 9.0 % of mass 176	4.0	(5.7) 2

1-Value is % mass 174 2-Value is % mass 176

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS AND STANDARDS:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
	CCVIS 180-191520/2	51018002.D	10/18/2016	12:14
	MB 180-191520/4	51018004.D	10/18/2016	13:17
	LCS 180-191520/9	51018009.D	10/18/2016	15:44
HD-MW-129-0/1-0 DL	180-59749-3 DL	51018016.D	10/18/2016	18:40
HD-MW-88-0/1-0	180-59749-6	51018017.D	10/18/2016	19:05

FORM V
GC/MS VOA INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 61017001.D BFB Injection Date: 10/17/2016

Instrument ID: CHHP6 BFB Injection Time: 11:29

Analysis Batch No.: 191498

M/E	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE	
50	15.0 - 40.0 % of mass 95	20.0	
75	30.0 - 60.0 % of mass 95	48.8	
95	Base Peak, 100% relative abundance	100.0	
96	5.0 - 9.0 % of mass 95	6.2	
173	Less than 2.0 % of mass 174	0.4	(0.4) 1
174	50.0 - 120.00 % of mass 95	80.8	
175	5.0 - 9.0 % of mass 174	5.7	(7.0) 1
176	95.0 - 101.0 % of mass 174	81.2	(100.4) 1
177	5.0 - 9.0 % of mass 176	5.6	(6.9) 2

1-Value is % mass 174 2-Value is % mass 176

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS AND STANDARDS:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
	IC 180-191498/6	61017006.D	10/17/2016	14:23
	IC 180-191498/7	61017007.D	10/17/2016	14:48
	ICIS 180-191498/8	61017008.D	10/17/2016	15:12
	IC 180-191498/9	61017009.D	10/17/2016	15:36
	IC 180-191498/10	61017010.D	10/17/2016	16:01
	IC 180-191498/12	61017012.D	10/17/2016	16:49
	IC 180-191498/13	61017013.D	10/17/2016	17:13

FORM V
GC/MS VOA INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: 61019001.D BFB Injection Date: 10/19/2016

Instrument ID: CHHP6 BFB Injection Time: 10:04

Analysis Batch No.: 191652

M/E	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE	
50	15.0 - 40.0 % of mass 95	19.5	
75	30.0 - 60.0 % of mass 95	49.0	
95	Base Peak, 100% relative abundance	100.0	
96	5.0 - 9.0 % of mass 95	7.0	
173	Less than 2.0 % of mass 174	0.0	(0.0) 1
174	50.0 - 120.00 % of mass 95	85.9	
175	5.0 - 9.0 % of mass 174	6.2	(7.3) 1
176	95.0 - 101.0 % of mass 174	82.6	(96.2) 1
177	5.0 - 9.0 % of mass 176	5.1	(6.2) 2

1-Value is % mass 174 2-Value is % mass 176

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS AND STANDARDS:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
	CCVIS 180-191652/2	61019002.D	10/19/2016	10:44
	MB 180-191652/4	61019004.D	10/19/2016	11:51
	LCS 180-191652/7	61019007.D	10/19/2016	13:15
HD-MW-88-0/1-0 DL	180-59749-6 DL	61019027.D	10/19/2016	21:22
HD-MW-12-0/1-0	180-59749-7	61019028.D	10/19/2016	21:46

FORM VIII
GC/MS VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191289/2 Date Analyzed: 10/15/2016 13:43

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm)

Lab File ID (Standard): 51015002.D Heated Purge: (Y/N) N

Calibration ID: 33103

		TBAd9		FB		CBNZd5	
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		103841	4.28	391254	7.27	84605	10.37
UPPER LIMIT		207682	4.78	782508	7.77	169210	10.87
LOWER LIMIT		51921	3.78	195627	6.77	42303	9.87
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191289/6		109368	4.27	367034	7.27	79469	10.37
LCS 180-191289/9		106442	4.28	356610	7.27	79471	10.37
180-59749-1	HD-QC6-0/1-2	135084	4.26	362861	7.28	82836	10.37
180-59749-2	HD-MW-57-0/1-0	124871	4.26	370195	7.27	84950	10.37
180-59749-3	HD-MW-129-0/1-0	95883	4.27	372269	7.27	75906	10.38
180-59749-4	HD-MW-127-0/1-0	115388	4.27	375819	7.27	82881	10.38
180-59749-5	HD-MW-87-0/1-0	104893	4.27	372400	7.27	78640	10.37

TBAd9 = TBA-d9 (IS)
FB = Fluorobenzene (IS)
CBNZd5 = Chlorobenzene-d5

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8260C

FORM VIII
GC/MS VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191289/2 Date Analyzed: 10/15/2016 13:43

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm)

Lab File ID (Standard): 51015002.D Heated Purge: (Y/N) N

Calibration ID: 33103

		DCBd4					
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		97009	12.72				
UPPER LIMIT		194018	13.22				
LOWER LIMIT		48505	12.22				
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191289/6		91693	12.72				
LCS 180-191289/9		108535	12.72				
180-59749-1	HD-QC6-0/1-2	119352	12.72				
180-59749-2	HD-MW-57-0/1-0	122644	12.72				
180-59749-3	HD-MW-129-0/1-0	81488	12.72				
180-59749-4	HD-MW-127-0/1-0	94014	12.72				
180-59749-5	HD-MW-87-0/1-0	87485	12.72				

DCBd4 = 1,4-Dichlorobenzene-d4

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8260C

FORM VIII
GC/MS VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191520/2 Date Analyzed: 10/18/2016 12:14

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm)

Lab File ID (Standard): 51018002.D Heated Purge: (Y/N) N

Calibration ID: 33103

		TBAd9		FB		CBNZd5	
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		118181	4.27	373749	7.27	86775	10.38
UPPER LIMIT		236362	4.77	747498	7.77	173550	10.88
LOWER LIMIT		59091	3.77	186875	6.77	43388	9.88
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191520/4		119767	4.27	368452	7.27	84437	10.37
LCS 180-191520/9		135362	4.26	388682	7.27	91259	10.37
180-59749-3 DL	HD-MW-129-0/1-0 DL	121193	4.26	360703	7.27	80416	10.37
180-59749-6	HD-MW-88-0/1-0	137362	4.26	360436	7.27	85520	10.37

TBAd9 = TBA-d9 (IS)
FB = Fluorobenzene (IS)
CBNZd5 = Chlorobenzene-d5

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8260C

FORM VIII
GC/MS VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191520/2 Date Analyzed: 10/18/2016 12:14

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm)

Lab File ID (Standard): 51018002.D Heated Purge: (Y/N) N

Calibration ID: 33103

		DCBd4					
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		114965	12.72				
UPPER LIMIT		229930	13.22				
LOWER LIMIT		57483	12.22				
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191520/4		118218	12.72				
LCS 180-191520/9		121446	12.72				
180-59749-3 DL	HD-MW-129-0/1-0 DL	117884	12.72				
180-59749-6	HD-MW-88-0/1-0	125716	12.72				

DCBd4 = 1,4-Dichlorobenzene-d4

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8260C

FORM VIII
GC/MS VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191652/2 Date Analyzed: 10/19/2016 10:44

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm)

Lab File ID (Standard): 61019002.D Heated Purge: (Y/N) N

Calibration ID: 33286

		TBAd9		FB		CBNZd5	
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		125265	4.14	472576	7.18	116257	10.29
UPPER LIMIT		250530	4.64	945152	7.68	232514	10.79
LOWER LIMIT		62633	3.64	236288	6.68	58129	9.79
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191652/4		110754	4.13	412428	7.18	102982	10.29
LCS 180-191652/7		114457	4.14	440334	7.18	105718	10.29
180-59749-6 DL	HD-MW-88-0/1-0 DL	85508	4.13	383378	7.18	94544	10.29
180-59749-7	HD-MW-12-0/1-0	90089	4.12	389045	7.18	94819	10.29

TBAd9 = TBA-d9 (IS)
FB = Fluorobenzene (IS)
CBNZd5 = Chlorobenzene-d5

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8260C

FORM VIII
GC/MS VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191652/2 Date Analyzed: 10/19/2016 10:44

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm)

Lab File ID (Standard): 61019002.D Heated Purge: (Y/N) N

Calibration ID: 33286

		DCBd4					
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		178681	12.63				
UPPER LIMIT		357362	13.13				
LOWER LIMIT		89341	12.13				
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191652/4		154261	12.63				
LCS 180-191652/7		171312	12.63				
180-59749-6 DL	HD-MW-88-0/1-0 DL	138573	12.64				
180-59749-7	HD-MW-12-0/1-0	139067	12.64				

DCBd4 = 1,4-Dichlorobenzene-d4

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8260C

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-QC6-0/1-2 | Lab Sample ID: 180-59749-1

Matrix: Water | Lab File ID: 51015026.D

Analysis Method: 8260C | Date Collected: 10/12/2016 12:00

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 22:57

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	1.0	U	1.0	0.23
75-01-4	Vinyl chloride	1.0	U	1.0	0.32
74-83-9	Bromomethane	1.0	U	1.0	0.36
75-00-3	Chloroethane	1.0	U	1.0	0.26
75-35-4	1,1-Dichloroethene	1.0	U	1.0	0.29
67-64-1	Acetone	5.0		5.0	2.5
75-15-0	Carbon disulfide	1.0	U	1.0	0.18
75-09-2	Methylene Chloride	1.0	U	1.0	0.36
156-60-5	trans-1,2-Dichloroethene	1.0	U	1.0	0.29
1634-04-4	Methyl tert-butyl ether	1.0	U	1.0	0.24
75-34-3	1,1-Dichloroethane	1.0	U	1.0	0.24
156-59-2	cis-1,2-Dichloroethene	1.0	U	1.0	0.29
74-97-5	Bromochloromethane	1.0	U	1.0	0.38
78-93-3	2-Butanone (MEK)	5.0	U	5.0	1.2
67-66-3	Chloroform	1.0	U	1.0	0.27
71-55-6	1,1,1-Trichloroethane	1.0	U	1.0	0.22
56-23-5	Carbon tetrachloride	1.0	U ^c	1.0	0.24
71-43-2	Benzene	1.0	U	1.0	0.26
107-06-2	1,2-Dichloroethane	1.0	U	1.0	0.25
79-01-6	Trichloroethene	1.0	U	1.0	0.26
78-87-5	1,2-Dichloropropane	1.0	U	1.0	0.23
75-27-4	Bromodichloromethane	1.0	U	1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	1.0	U ^c	1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59
108-88-3	Toluene	1.0	U	1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	1.0	U ^c	1.0	0.24
79-00-5	1,1,2-Trichloroethane	1.0	U	1.0	0.35
127-18-4	Tetrachloroethene	1.0	U	1.0	0.27
591-78-6	2-Hexanone	5.0	U	5.0	0.74
124-48-1	Dibromochloromethane	1.0	U ^c	1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29
108-90-7	Chlorobenzene	1.0	U	1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20
100-41-4	Ethylbenzene	1.0	U	1.0	0.27
1330-20-7	Xylenes, Total	2.0	U	2.0	0.48
100-42-5	Styrene	1.0	U	1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-QC6-0/1-2 | Lab Sample ID: 180-59749-1

Matrix: Water | Lab File ID: 51015026.D

Analysis Method: 8260C | Date Collected: 10/12/2016 12:00

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 22:57

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	1.0	U ^c	1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35
107-13-1	Acrylonitrile	20	U ^c	20	2.8
123-91-1	1,4-Dioxane	200	U	200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	124		72-134
2037-26-5	Toluene-d8 (Surr)	104		80-120
460-00-4	4-Bromofluorobenzene (Surr)	117		72-120
1868-53-7	Dibromofluoromethane (Surr)	106		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015026.D
Lims ID: 180-59749-A-1
Client ID: HD-QC6-0/1-2
Sample Type: Client
Inject. Date: 15-Oct-2016 22:57:30 ALS Bottle#: 24 Worklist Smp#: 26
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-026
Misc. Info.: 180-59749-A-1
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:15:13 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:15:13

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.263	4.278	-0.015	0	135084	1000.0	
* 2 Fluorobenzene (IS)	96	7.275	7.271	0.004	97	362861	50.0	
* 3 Chlorobenzene-d5	119	10.371	10.373	-0.002	93	82836	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.719	12.722	-0.003	97	119352	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.551	6.547	0.004	93	86573	52.9	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.916	6.918	-0.002	0	137474	61.8	
$ 7 Toluene-d8 (Surr)	98	8.923	8.919	0.004	96	340124	52.2	
$ 8 4-Bromofluorobenzene (Surr	95	11.558	11.560	-0.002	83	141426	58.7	
12 Chloromethane	50		1.771				ND	
13 Vinyl chloride	62		1.905				ND	
15 Bromomethane	94		2.240				ND	
16 Chloroethane	64		2.392				ND	
22 1,1-Dichloroethene	96		3.341				ND	
24 Acetone	43	3.448	3.450	-0.002	93	17889	25.1	
26 Carbon disulfide	76		3.621				ND	
31 Methylene Chloride	84	4.111	4.132	-0.021	26	3930	1.65	
33 Acrylonitrile	53		4.515				ND	
34 trans-1,2-Dichloroethene	96		4.551				ND	
35 Methyl tert-butyl ether	73		4.570				ND	
37 1,1-Dichloroethane	63		5.190				ND	
45 cis-1,2-Dichloroethene	96		5.938				ND	
46 2-Butanone (MEK)	43		5.951				ND	
49 Chlorobromomethane	128		6.218				ND	
52 Chloroform	83		6.364				ND	
53 1,1,1-Trichloroethane	97		6.522				ND	
56 Carbon tetrachloride	117		6.693				ND	
58 Benzene	78		6.924				ND	
59 1,2-Dichloroethane	62		7.003				ND	
64 Trichloroethene	130		7.660				ND	
67 1,2-Dichloropropane	63		7.934				ND	
70 1,4-Dioxane	88		8.019				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
71 Dichlorobromomethane	83		8.220				ND	
74 cis-1,3-Dichloropropene	75		8.664				ND	
75 4-Methyl-2-pentanone (MIBK	43		8.816				ND	
76 Toluene	91		8.986				ND	
77 trans-1,3-Dichloropropene	75		9.242				ND	
79 1,1,2-Trichloroethane	97		9.436				ND	
80 Tetrachloroethene	164		9.503				ND	
82 2-Hexanone	43		9.649				ND	
84 Chlorodibromomethane	129		9.801				ND	
85 Ethylene Dibromide	107		9.917				ND	
87 Chlorobenzene	112		10.404				ND	
89 1,1,1,2-Tetrachloroethane	131		10.501				ND	
90 Ethylbenzene	106		10.501				ND	
91 m-Xylene & p-Xylene	106		10.635				ND	
92 o-Xylene	106		11.018				ND	
93 Styrene	104		11.036				ND	
94 Bromoform	173		11.225				ND	
99 1,1,2,2-Tetrachloroethane	83		11.700				ND	
S 133 Xylenes, Total	106		1.000				ND	

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

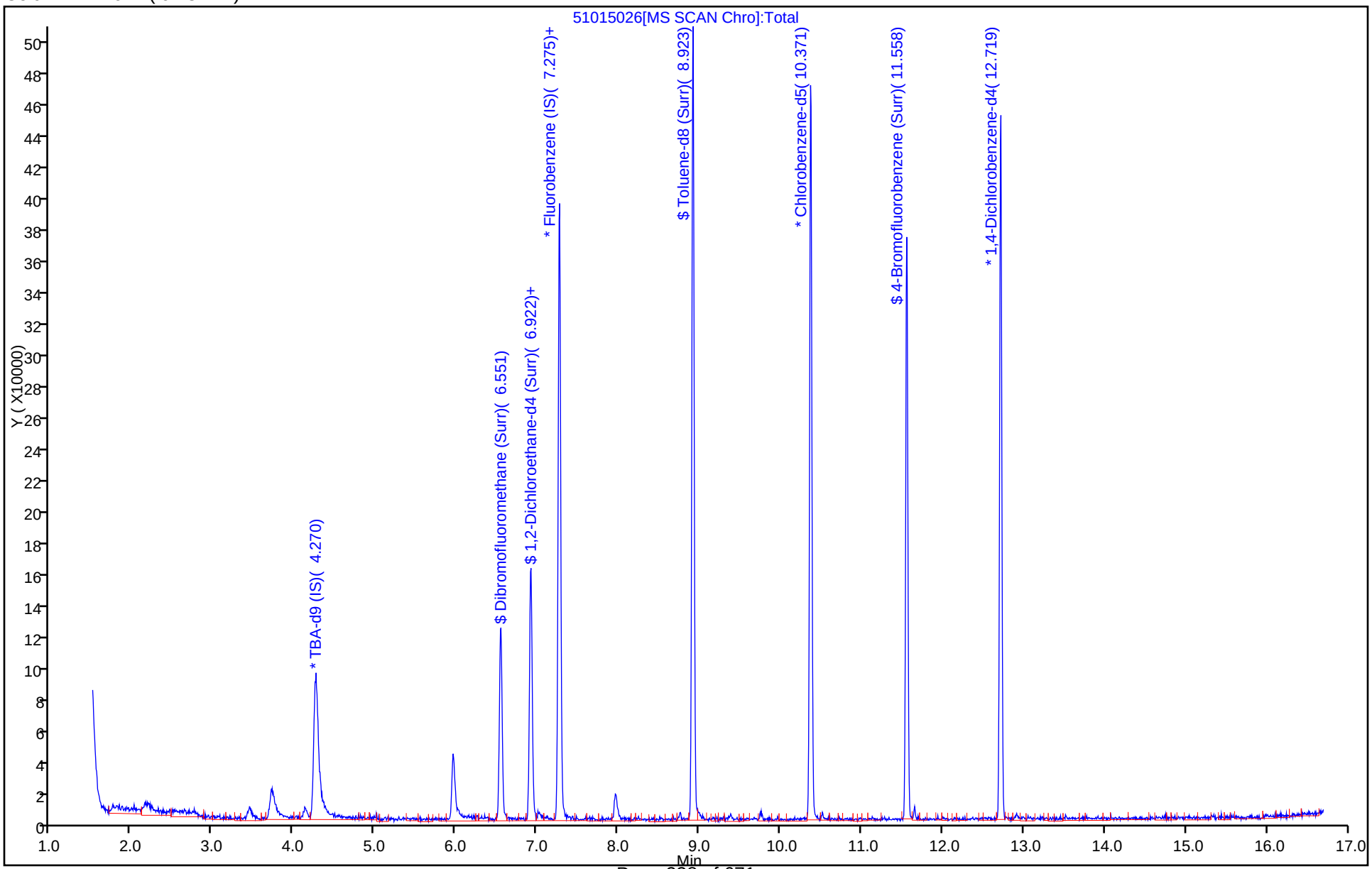
Report Date: 17-Oct-2016 08:15:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015026.D

Injection Date:	15-Oct-2016 22:57:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	180-59749-A-1	Lab Sample ID:	180-59749-1	Worklist Smp#:	26
Client ID:	HD-QC6-0/1-2				
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	24
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015026.D				
Lims ID:	180-59749-A-1				
Client ID:	HD-QC6-0/1-2				
Sample Type:	Client				
Inject. Date:	15-Oct-2016 22:57:30	ALS Bottle#:	24	Worklist Smp#:	26
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Sample Info:	180-0013887-026				
Misc. Info.:	180-59749-A-1				
Operator ID:	001562	Instrument ID:	CHHP5		
Method:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m				
Limit Group:	VOA 8260C ICAL				
Last Update:	17-Oct-2016 08:15:13	Calib Date:	04-Oct-2016 16:03:30		
Integrator:	RTE	ID Type:	Deconvolution ID		
Quant Method:	Internal Standard	Quant By:	Initial Calibration		
Last ICal File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D				
Column 1 :	DB-624 (0.18 mm)		Det: MS SCAN		
Process Host:	XAWRK001				

First Level Reviewer: fergusond Date: 17-Oct-2016 08:15:13

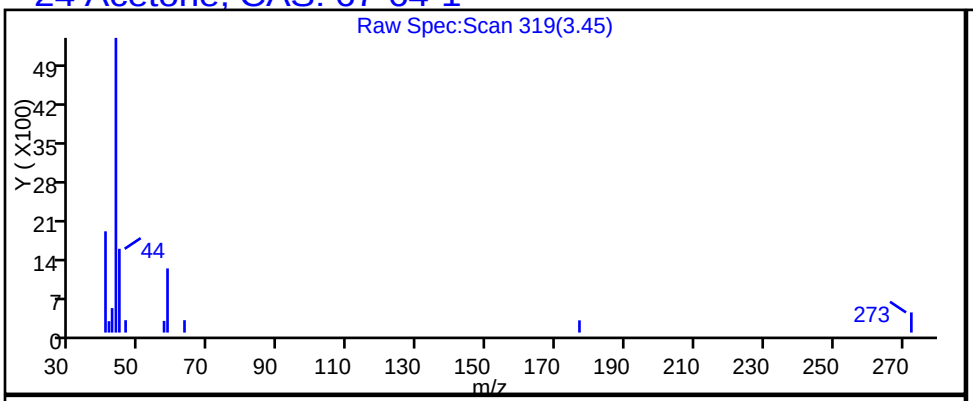
Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	52.9	105.86
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	61.8	123.65
$ 7 Toluene-d8 (Surr)	50.0	52.2	104.37
$ 8 4-Bromofluorobenzene (Surr)	50.0	58.7	117.45

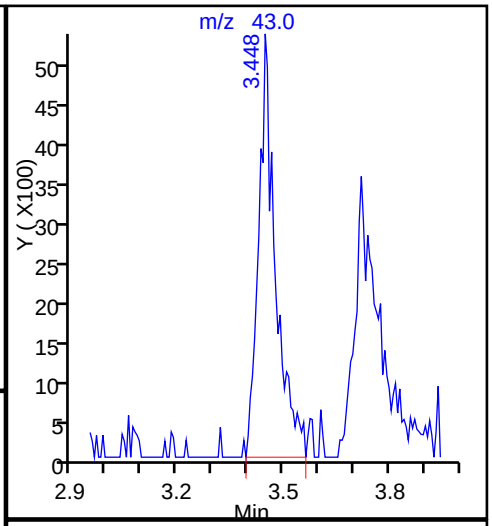
Report Date: 17-Oct-2016 08:15:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

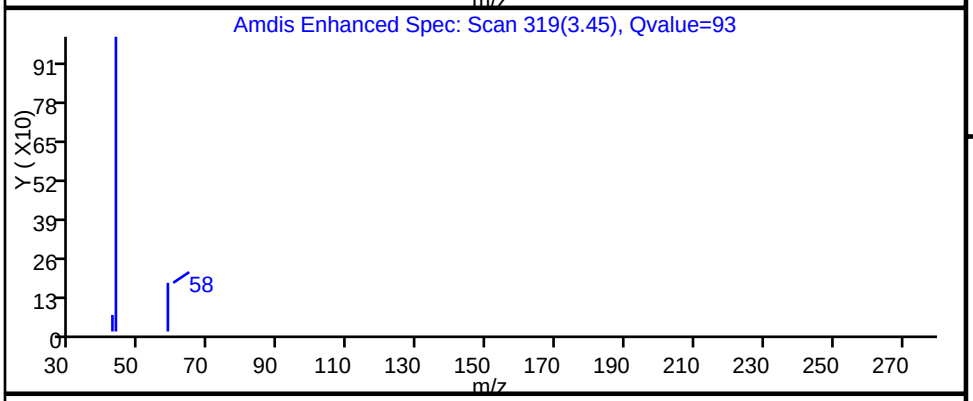
TestAmerica Pittsburgh

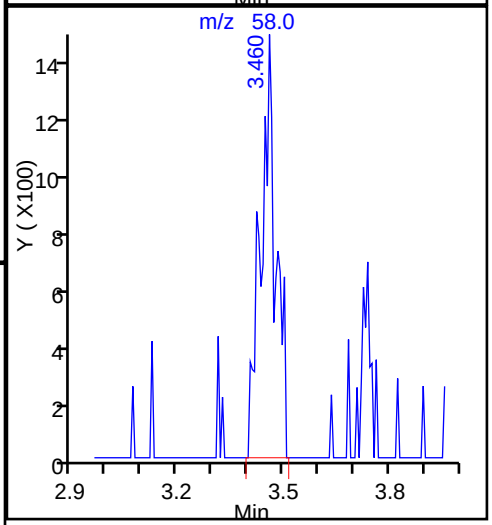
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015026.D		
Injection Date:	15-Oct-2016 22:57:30	Instrument ID:	CHHP5
Lims ID:	180-59749-A-1	Lab Sample ID:	180-59749-1
Client ID:	HD-QC6-0/1-2		
Operator ID:	001562	ALS Bottle#:	24 Worklist Smp#: 26
Purge Vol:	5.000 mL	Dil. Factor:	1.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

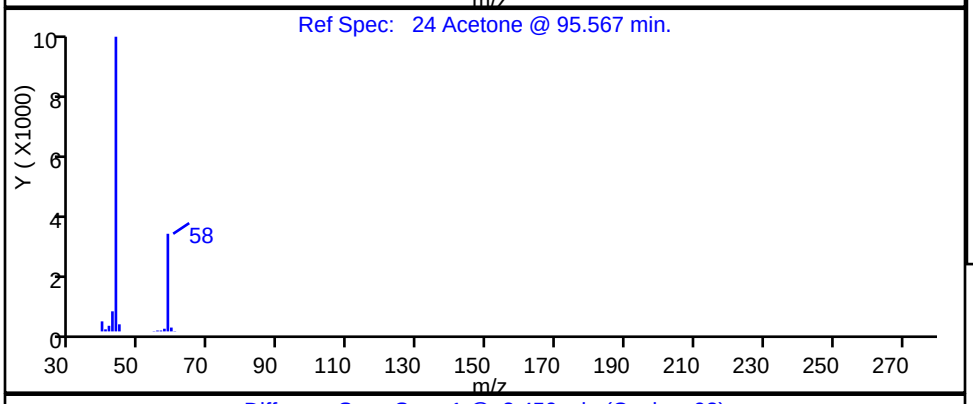
24 Acetone, CAS: 67-64-1

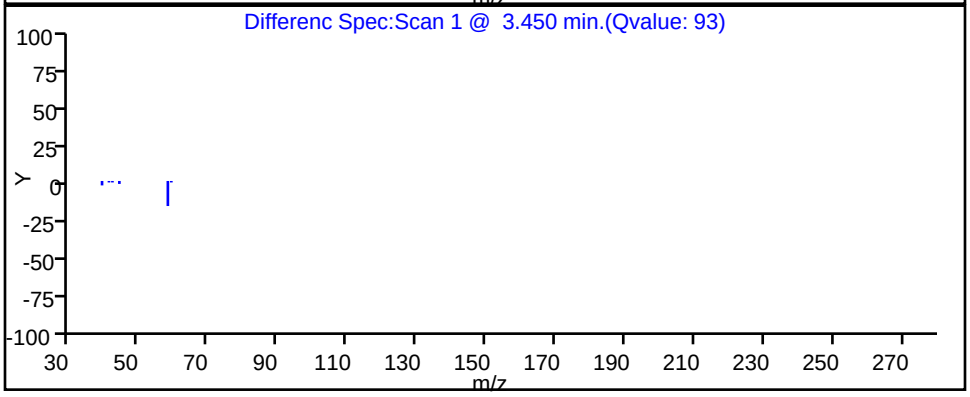












FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-57-0/1-0 | Lab Sample ID: 180-59749-2

Matrix: Water | Lab File ID: 51015027.D

Analysis Method: 8260C | Date Collected: 10/12/2016 09:15

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 23:21

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	1.0	U	1.0	0.23
75-01-4	Vinyl chloride	1.0	U	1.0	0.32
74-83-9	Bromomethane	1.0	U	1.0	0.36
75-00-3	Chloroethane	1.0	U	1.0	0.26
75-35-4	1,1-Dichloroethene	5.7		1.0	0.29
67-64-1	Acetone	5.0	U	5.0	2.5
75-15-0	Carbon disulfide	1.0	U	1.0	0.18
75-09-2	Methylene Chloride	1.0	U	1.0	0.36
156-60-5	trans-1,2-Dichloroethene	1.0	U	1.0	0.29
1634-04-4	Methyl tert-butyl ether	1.0	U	1.0	0.24
75-34-3	1,1-Dichloroethane	0.28	J	1.0	0.24
156-59-2	cis-1,2-Dichloroethene	4.6		1.0	0.29
74-97-5	Bromochloromethane	1.0	U	1.0	0.38
78-93-3	2-Butanone (MEK)	5.0	U	5.0	1.2
67-66-3	Chloroform	1.1		1.0	0.27
71-55-6	1,1,1-Trichloroethane	1.0	U	1.0	0.22
56-23-5	Carbon tetrachloride	1.0	U ^c	1.0	0.24
71-43-2	Benzene	1.0	U	1.0	0.26
107-06-2	1,2-Dichloroethane	1.0	U	1.0	0.25
79-01-6	Trichloroethene	14		1.0	0.26
78-87-5	1,2-Dichloropropane	1.0	U	1.0	0.23
75-27-4	Bromodichloromethane	1.0	U	1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	1.0	U ^c	1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59
108-88-3	Toluene	1.0	U	1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	1.0	U ^c	1.0	0.24
79-00-5	1,1,2-Trichloroethane	1.0	U	1.0	0.35
127-18-4	Tetrachloroethene	1.7		1.0	0.27
591-78-6	2-Hexanone	5.0	U	5.0	0.74
124-48-1	Dibromochloromethane	1.0	U ^c	1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29
108-90-7	Chlorobenzene	1.0	U	1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20
100-41-4	Ethylbenzene	1.0	U	1.0	0.27
1330-20-7	Xylenes, Total	2.0	U	2.0	0.48
100-42-5	Styrene	1.0	U	1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-57-0/1-0 | Lab Sample ID: 180-59749-2

Matrix: Water | Lab File ID: 51015027.D

Analysis Method: 8260C | Date Collected: 10/12/2016 09:15

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 23:21

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	1.0	U ^c	1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35
107-13-1	Acrylonitrile	20	U ^c	20	2.8
123-91-1	1,4-Dioxane	12	J	200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	123		72-134
2037-26-5	Toluene-d8 (Surr)	104		80-120
460-00-4	4-Bromofluorobenzene (Surr)	113		72-120
1868-53-7	Dibromofluoromethane (Surr)	105		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D
Lims ID: 180-59749-B-2
Client ID: HD-MW-57-0/1-0
Sample Type: Client
Inject. Date: 15-Oct-2016 23:21:30 ALS Bottle#: 25 Worklist Smp#: 27
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-027
Misc. Info.: 180-59749-B-2
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:17:13 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:17:13

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.260	4.278	-0.018	0	124871	1000.0	
* 2 Fluorobenzene (IS)	96	7.272	7.271	0.001	97	370195	50.0	
* 3 Chlorobenzene-d5	119	10.374	10.373	0.001	93	84950	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.716	12.722	-0.006	96	122644	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.548	6.547	0.001	93	87769	52.6	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.919	6.918	0.001	0	139089	61.3	
$ 7 Toluene-d8 (Surr)	98	8.920	8.919	0.001	95	349015	52.2	
$ 8 4-Bromofluorobenzene (Surr	95	11.561	11.560	0.001	82	139010	56.3	
12 Chloromethane	50		1.771				ND	
13 Vinyl chloride	62		1.905				ND	
15 Bromomethane	94		2.240				ND	
16 Chloroethane	64		2.392				ND	
22 1,1-Dichloroethene	96	3.342	3.341	0.001	92	60147	28.7	
24 Acetone	43	3.470	3.450	0.020	29	1670	2.30	
26 Carbon disulfide	76		3.621				ND	
31 Methylene Chloride	84		4.132				ND	
33 Acrylonitrile	53		4.515				ND	
34 trans-1,2-Dichloroethene	96		4.551				ND	
35 Methyl tert-butyl ether	73		4.570				ND	
37 1,1-Dichloroethane	63	5.191	5.190	0.001	29	5970	1.41	
45 cis-1,2-Dichloroethene	96	5.933	5.938	-0.005	86	55906	23.1	
46 2-Butanone (MEK)	43		5.951				ND	
49 Chlorobromomethane	128		6.218				ND	
52 Chloroform	83	6.359	6.364	-0.005	95	20815	5.52	
53 1,1,1-Trichloroethane	97	6.523	6.522	0.001	1	887	0.2950	
56 Carbon tetrachloride	117		6.693				ND	
58 Benzene	78		6.924				ND	
59 1,2-Dichloroethane	62		7.003				ND	
64 Trichloroethene	130	7.661	7.660	0.001	94	142845	68.7	
67 1,2-Dichloropropane	63		7.934				ND	
70 1,4-Dioxane	88	8.026	8.019	0.007	29	884	57.9	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
71 Dichlorobromomethane	83		8.220				ND	
74 cis-1,3-Dichloropropene	75		8.664				ND	
75 4-Methyl-2-pentanone (MIBK	43		8.816				ND	
76 Toluene	91		8.986				ND	
77 trans-1,3-Dichloropropene	75		9.242				ND	
79 1,1,2-Trichloroethane	97		9.436				ND	
80 Tetrachloroethene	164	9.498	9.503	-0.005	93	13318	8.50	
82 2-Hexanone	43		9.649				ND	
84 Chlorodibromomethane	129		9.801				ND	
85 Ethylene Dibromide	107		9.917				ND	
87 Chlorobenzene	112		10.404				ND	
89 1,1,1,2-Tetrachloroethane	131		10.501				ND	
90 Ethylbenzene	106		10.501				ND	
91 m-Xylene & p-Xylene	106		10.635				ND	
92 o-Xylene	106		11.018				ND	
93 Styrene	104		11.036				ND	
94 Bromoform	173		11.225				ND	
99 1,1,2,2-Tetrachloroethane	83		11.700				ND	
S 133 Xylenes, Total	106		1.000				ND	

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

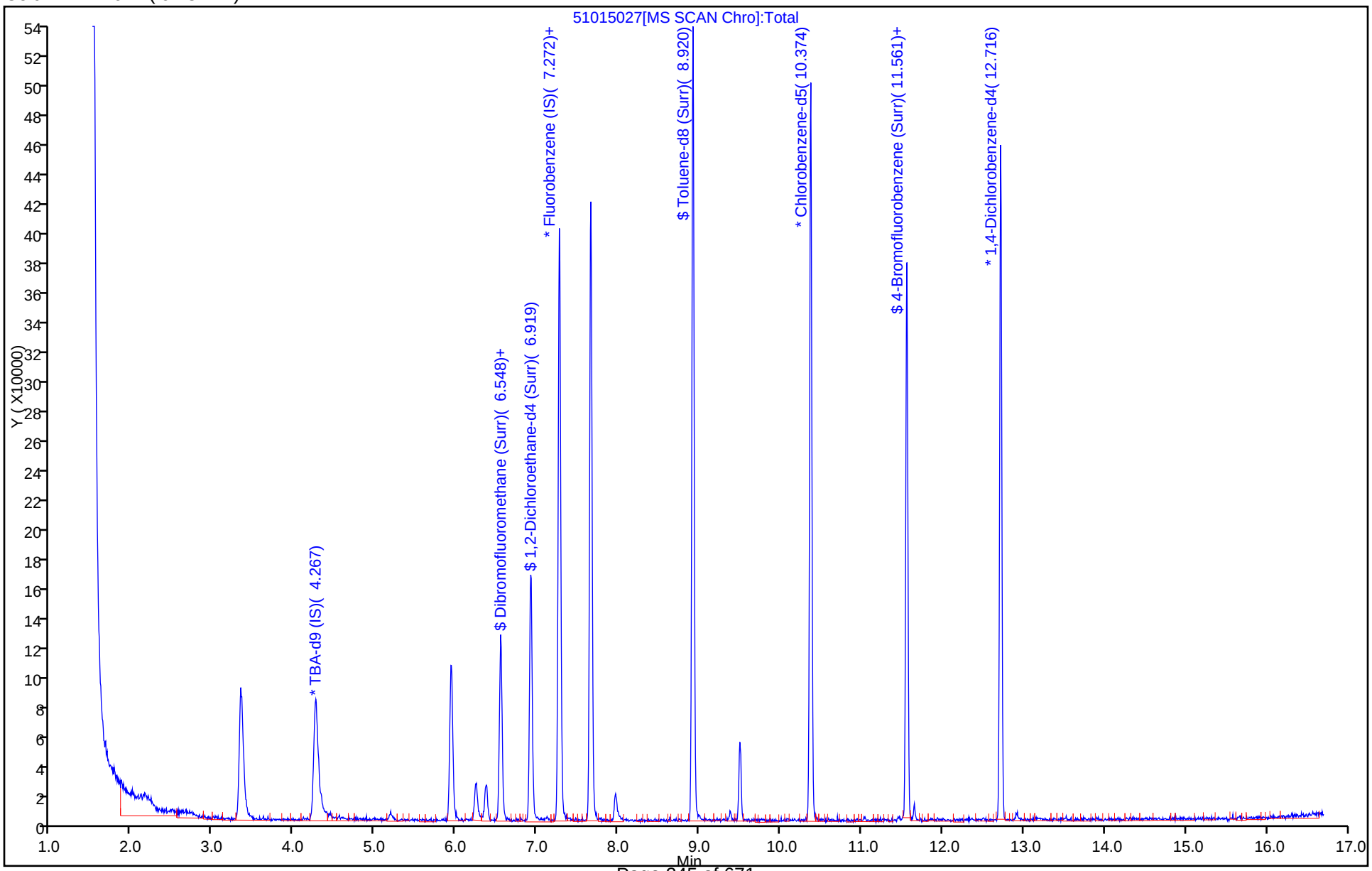
Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D

Injection Date:	15-Oct-2016 23:21:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	180-59749-B-2	Lab Sample ID:	180-59749-2	Worklist Smp#:	27
Client ID:	HD-MW-57-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	25
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D
Lims ID: 180-59749-B-2
Client ID: HD-MW-57-0/1-0
Sample Type: Client
Inject. Date: 15-Oct-2016 23:21:30 ALS Bottle#: 25 Worklist Smp#: 27
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-027
Misc. Info.: 180-59749-B-2
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:17:13 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:17:13

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	52.6	105.20
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	61.3	122.62
$ 7 Toluene-d8 (Surr)	50.0	52.2	104.43
$ 8 4-Bromofluorobenzene (Surr)	50.0	56.3	112.57

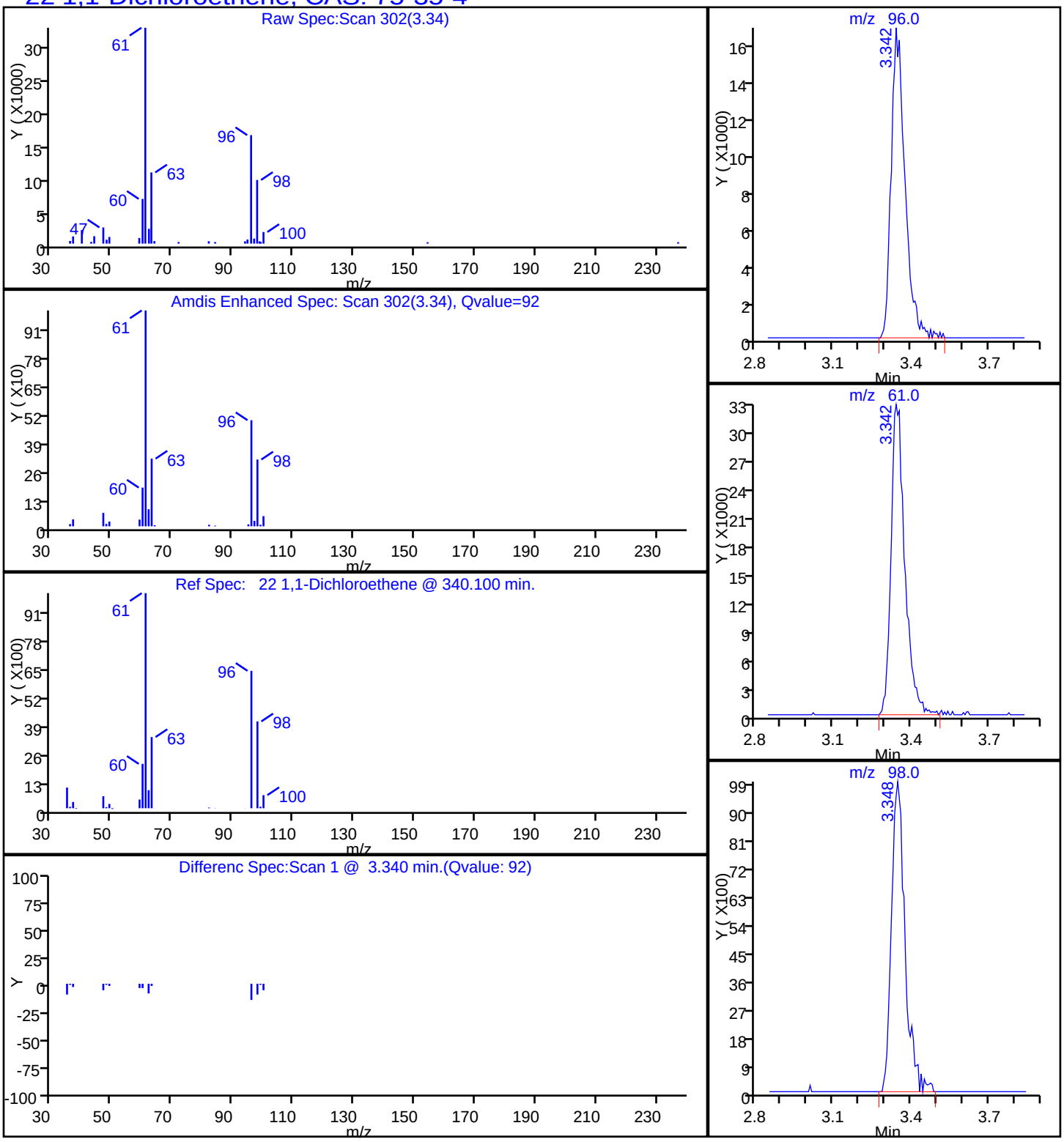
Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D

Injection Date:	15-Oct-2016 23:21:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-2	Lab Sample ID:	180-59749-2		
Client ID:	HD-MW-57-0/1-0				
Operator ID:	001562	ALS Bottle#:	25	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

22 1,1-Dichloroethene, CAS: 75-35-4



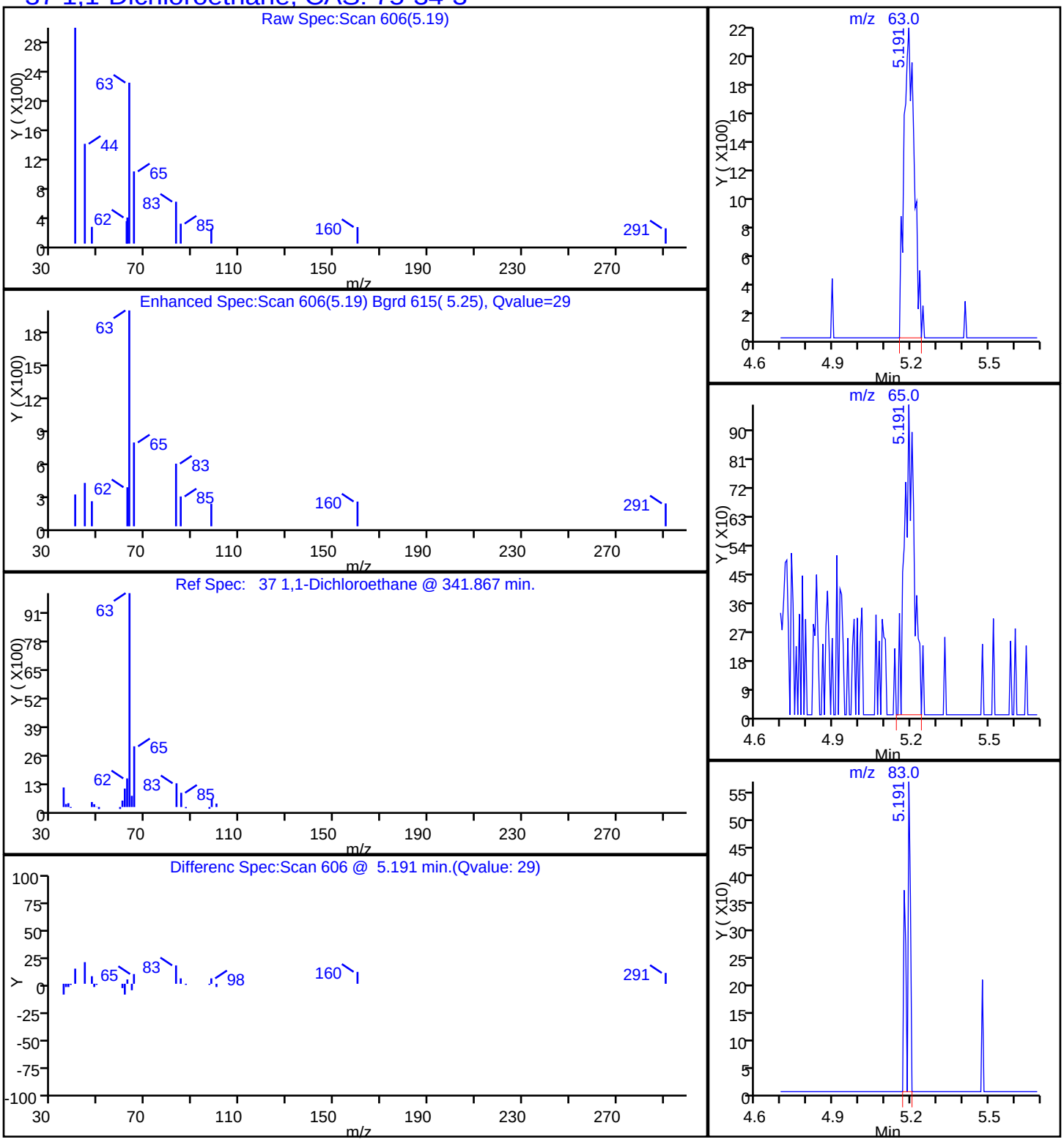
Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D

Injection Date:	15-Oct-2016 23:21:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-2	Lab Sample ID:	180-59749-2		
Client ID:	HD-MW-57-0/1-0				
Operator ID:	001562	ALS Bottle#:	25	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

37 1,1-Dichloroethane, CAS: 75-34-3

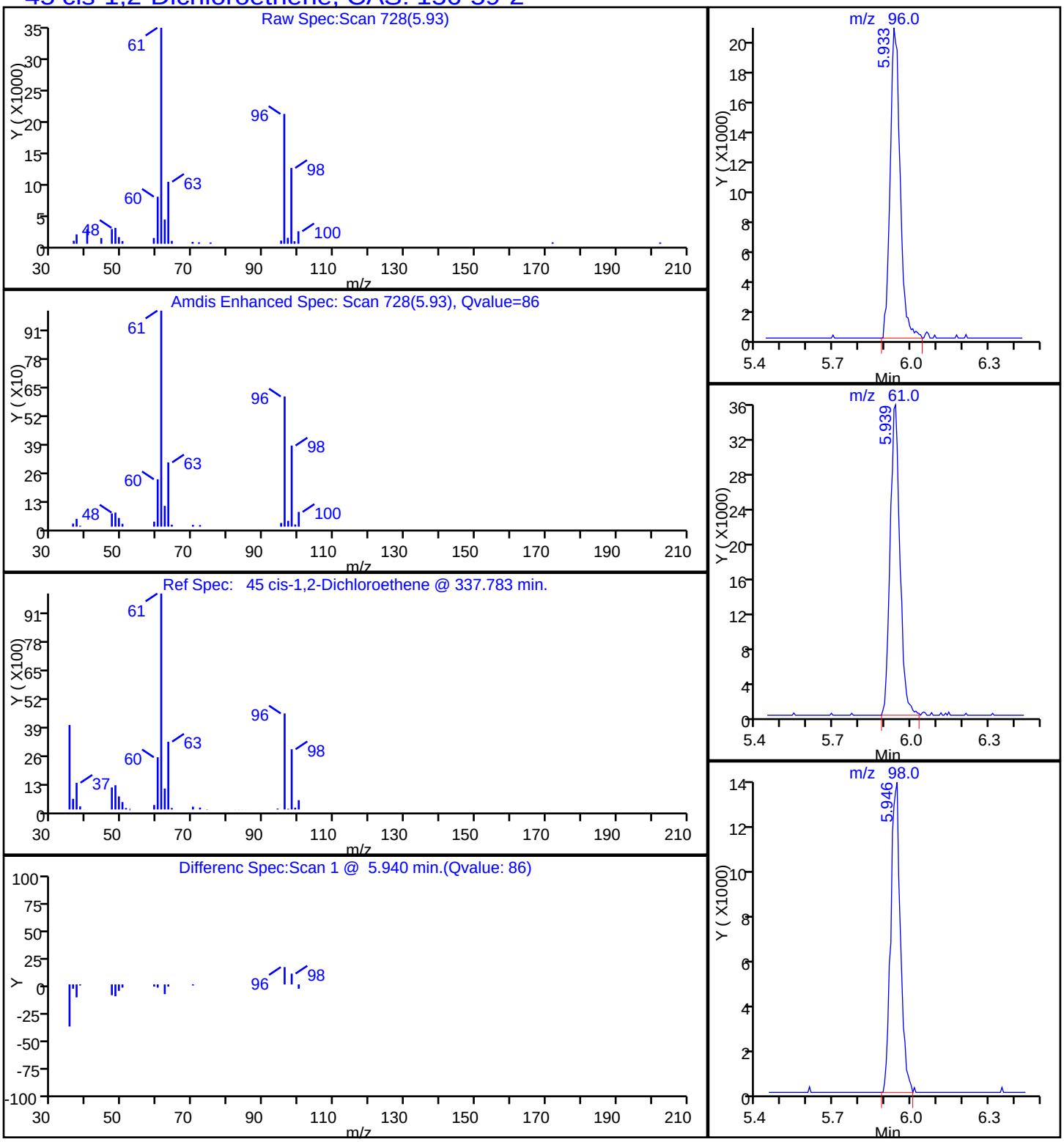


Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D				
Injection Date:	15-Oct-2016 23:21:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-2	Lab Sample ID:	180-59749-2		
Client ID:	HD-MW-57-0/1-0				
Operator ID:	001562	ALS Bottle#:	25	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

45 cis-1,2-Dichloroethene, CAS: 156-59-2

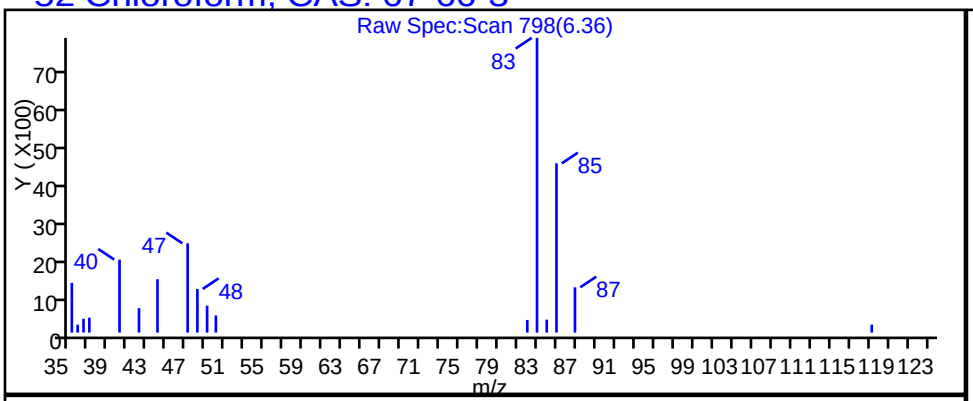


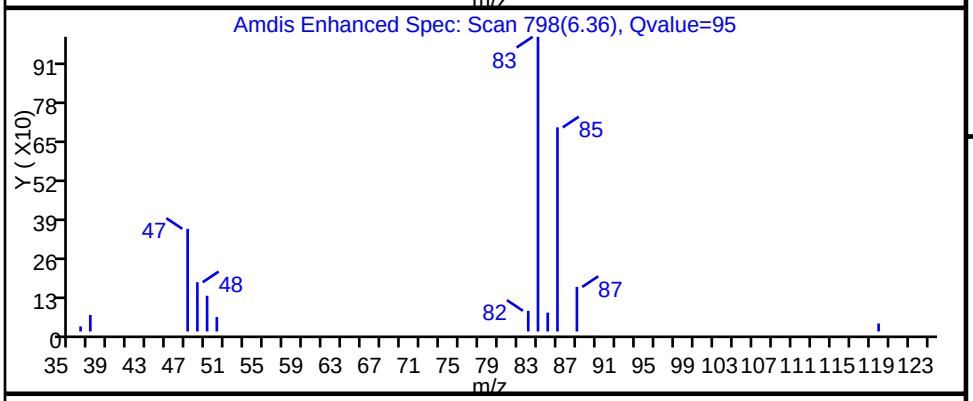
Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

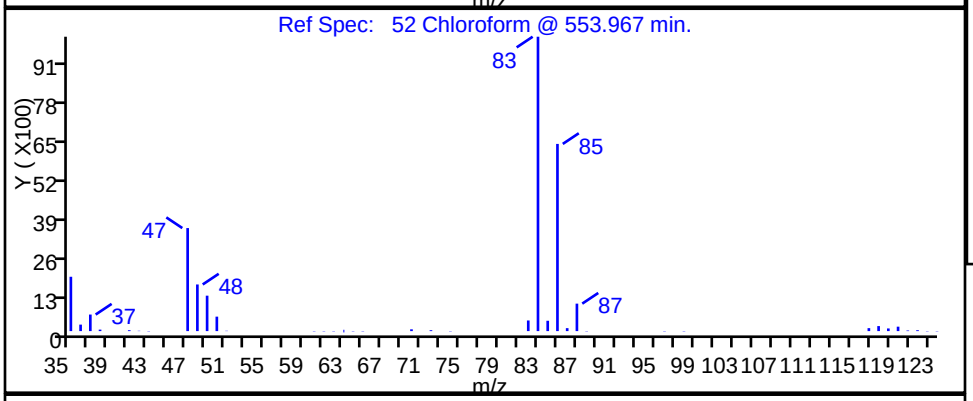
TestAmerica Pittsburgh

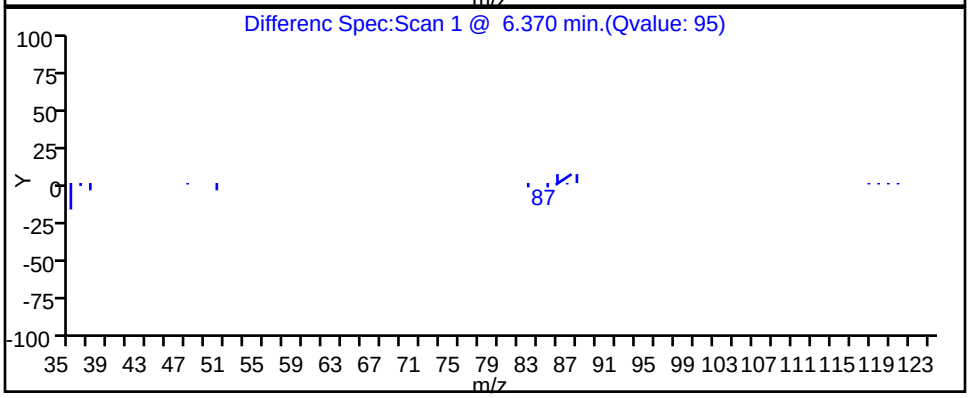
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D		
Injection Date:	15-Oct-2016 23:21:30	Instrument ID:	CHHP5
Lims ID:	180-59749-B-2	Lab Sample ID:	180-59749-2
Client ID:	HD-MW-57-0/1-0		
Operator ID:	001562	ALS Bottle#:	25 Worklist Smp#: 27
Purge Vol:	5.000 mL	Dil. Factor:	1.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

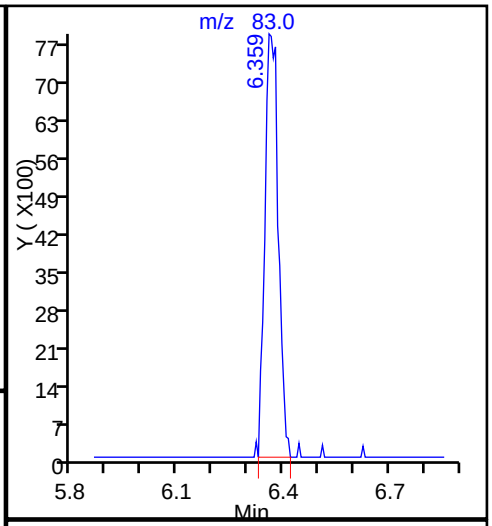
52 Chloroform, CAS: 67-66-3

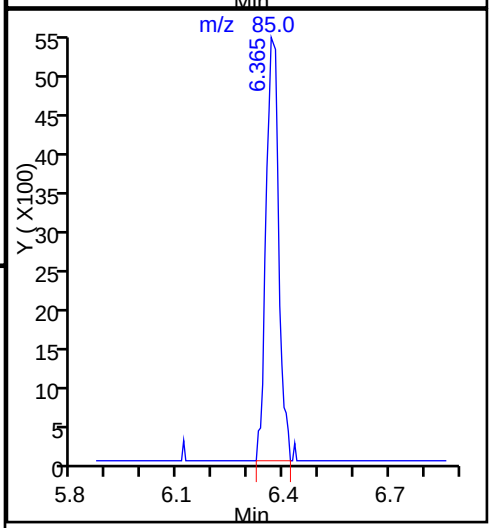












Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D

Injection Date: 15-Oct-2016 23:21:30 Instrument ID: CHHP5

Lims ID: 180-59749-B-2 Lab Sample ID: 180-59749-2

Client ID: HD-MW-57-0/1-0

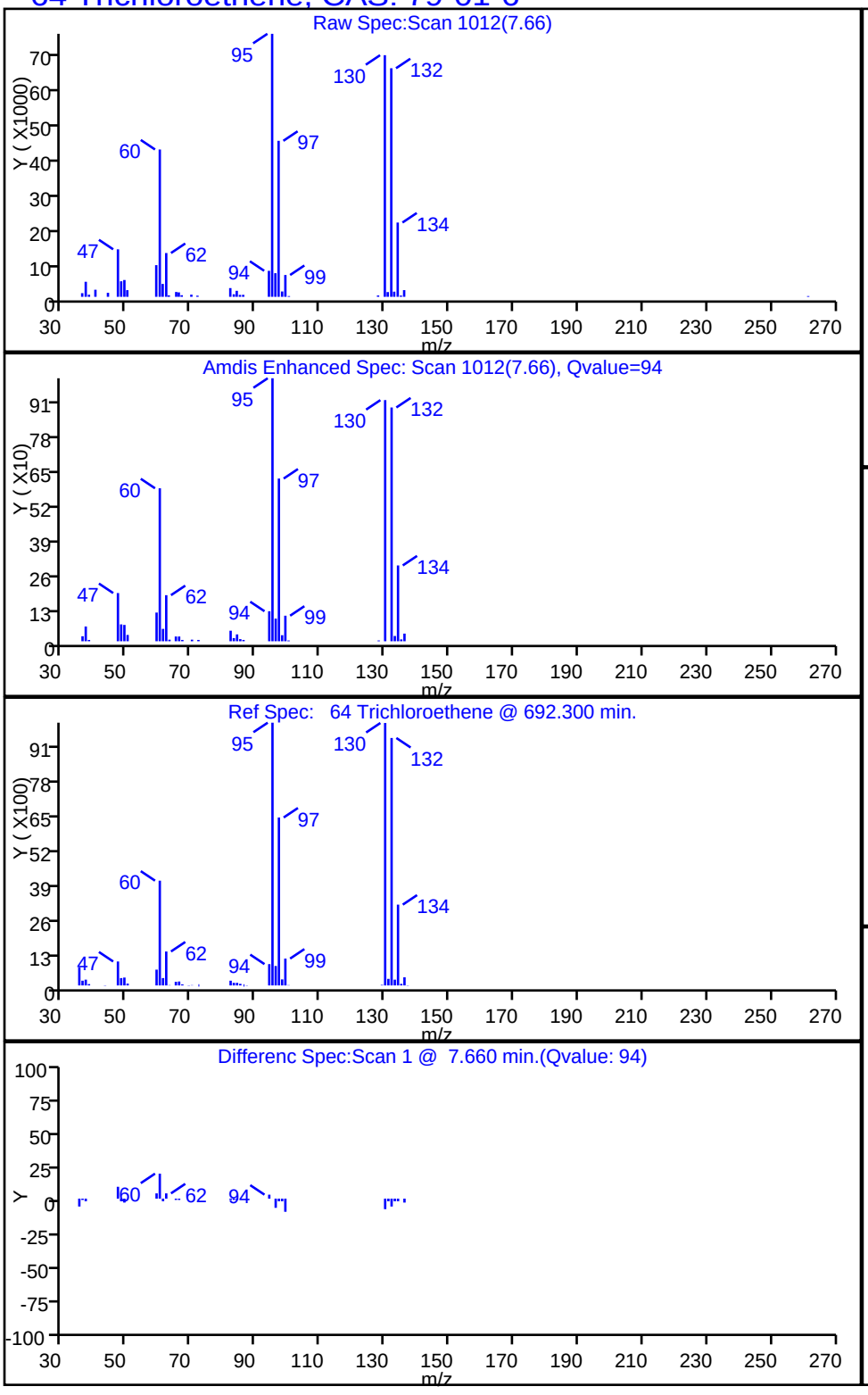
Operator ID: 001562 ALS Bottle#: 25 Worklist Smp#: 27

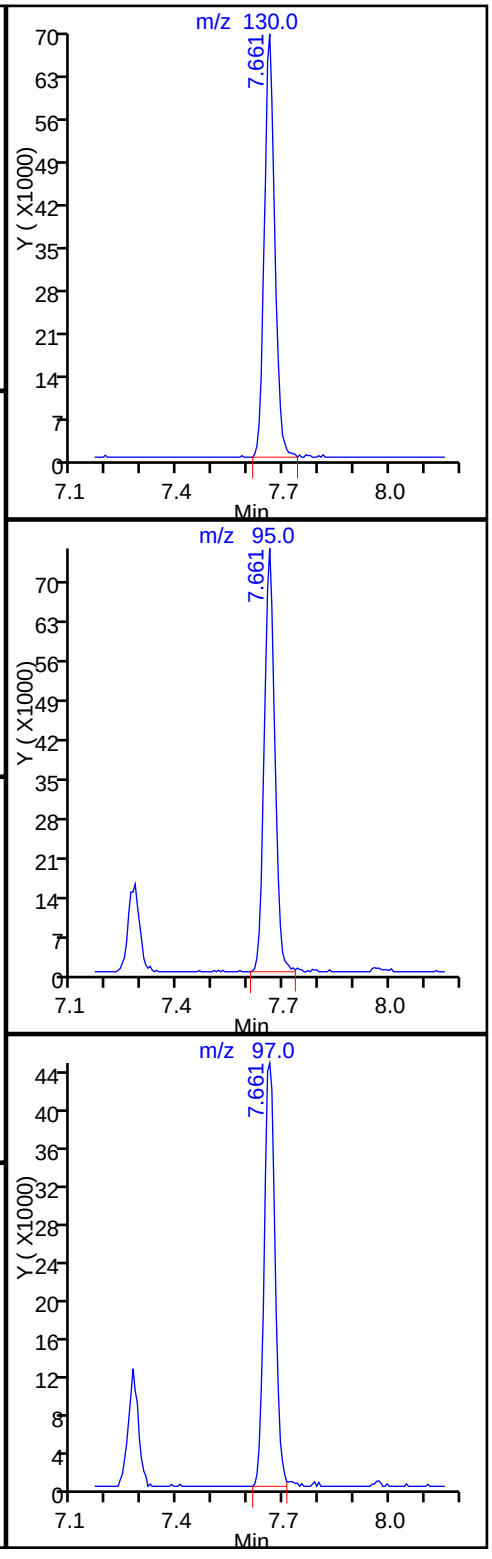
Purge Vol: 5.000 mL Dil. Factor: 1.0000

Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL

Column: DB-624 (0.18 mm) Detector MS SCAN

64 Trichloroethene, CAS: 79-01-6





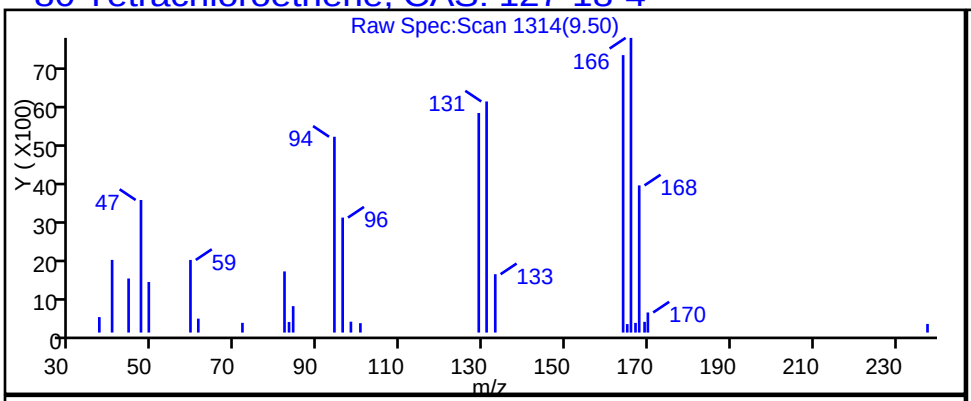
Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

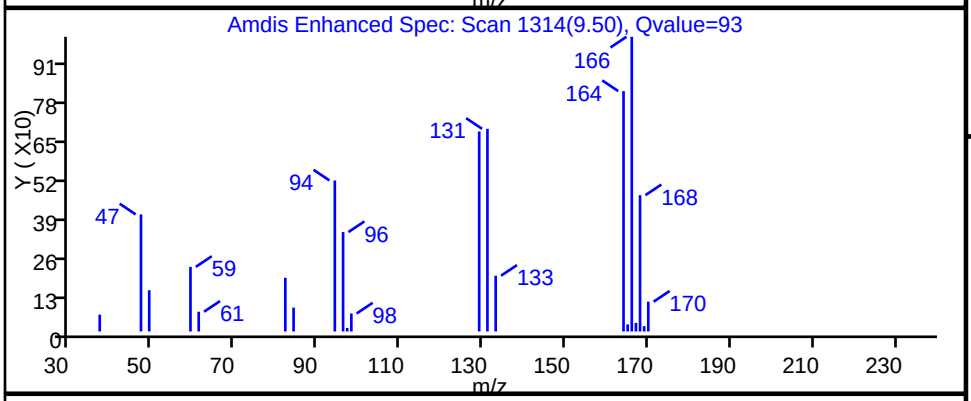
TestAmerica Pittsburgh

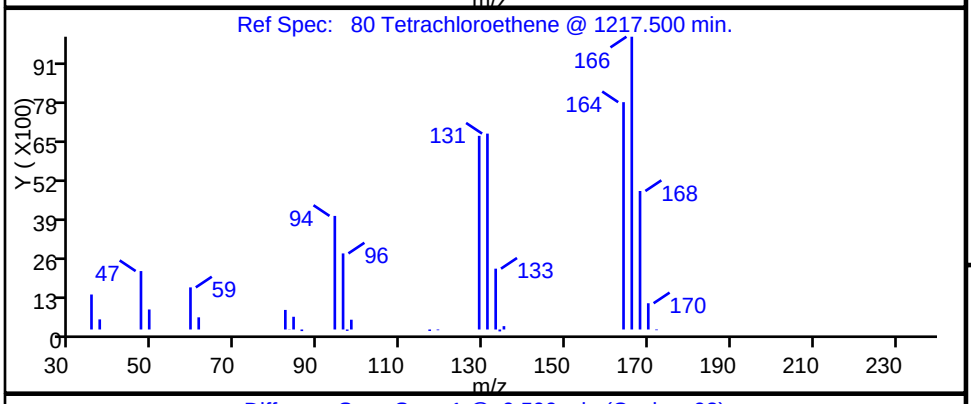
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D

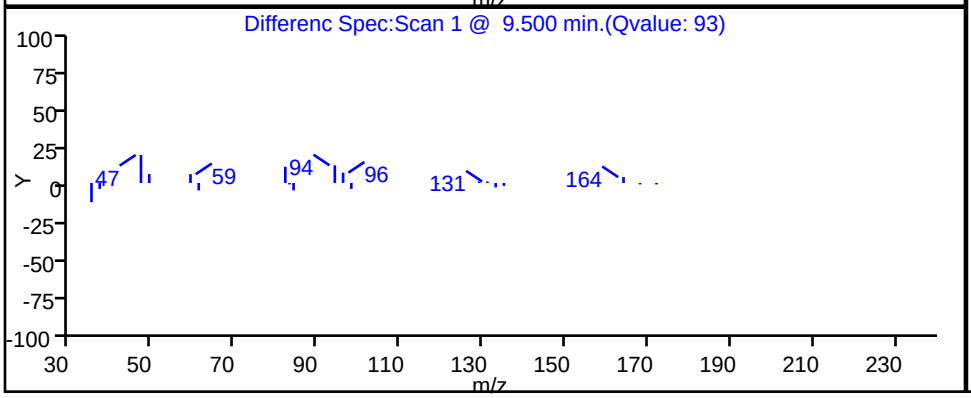
Injection Date:	15-Oct-2016 23:21:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-2	Lab Sample ID:	180-59749-2		
Client ID:	HD-MW-57-0/1-0				
Operator ID:	001562	ALS Bottle#:	25	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

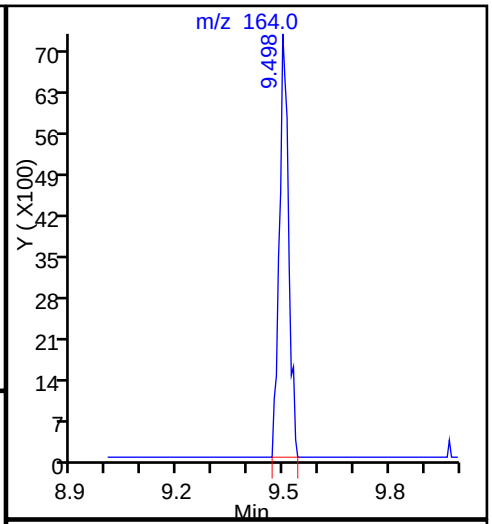
80 Tetrachloroethene, CAS: 127-18-4

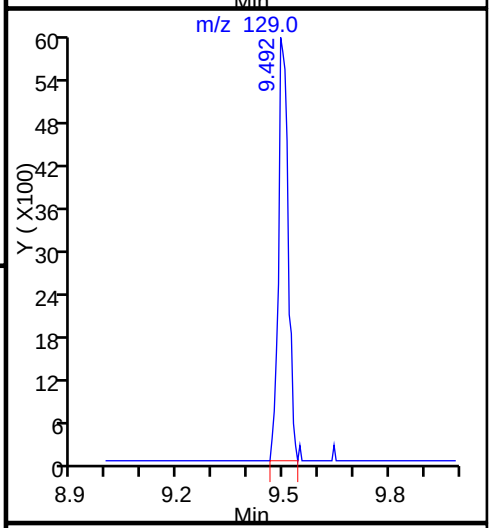


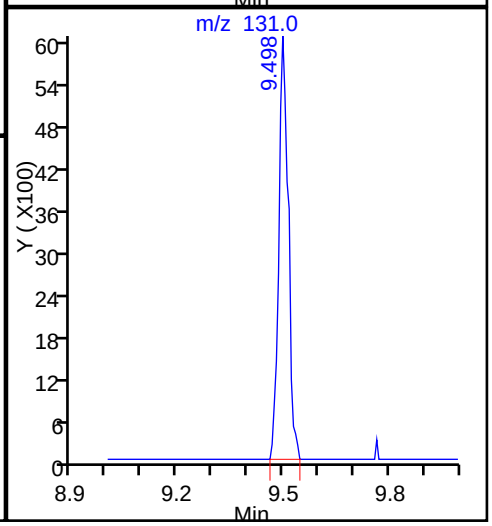










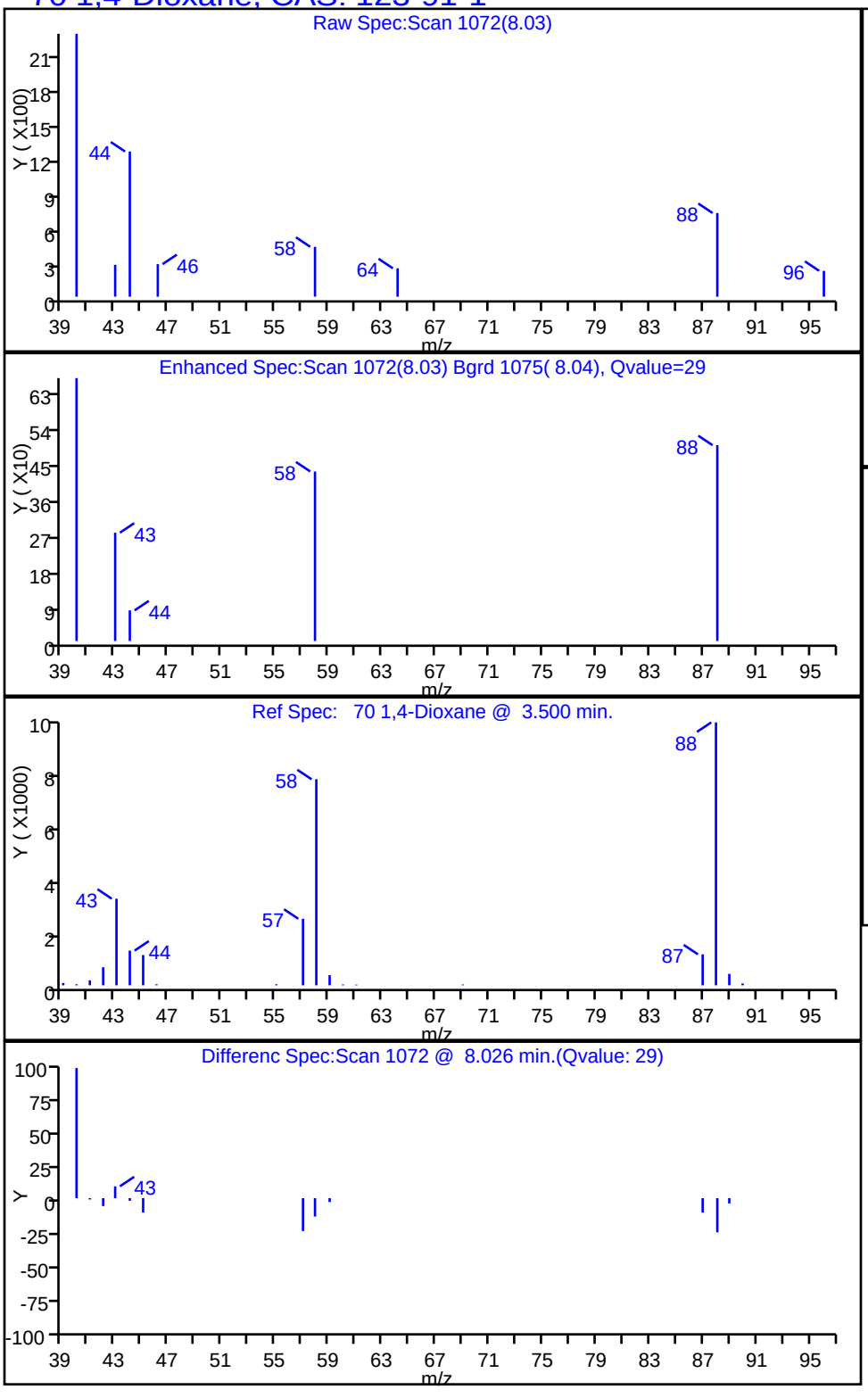


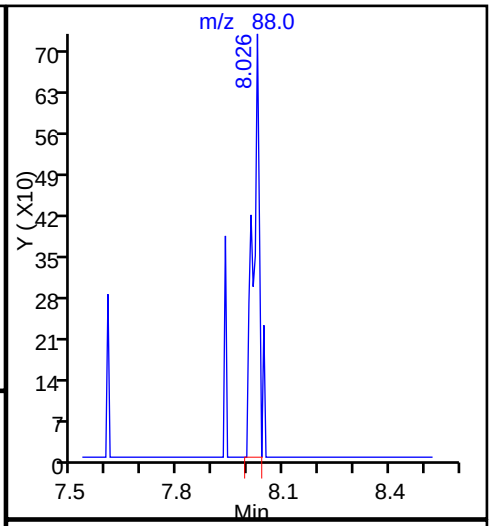
Report Date: 17-Oct-2016 08:17:14 Chrom Revision: 2.2 08-Sep-2016 14:45:52

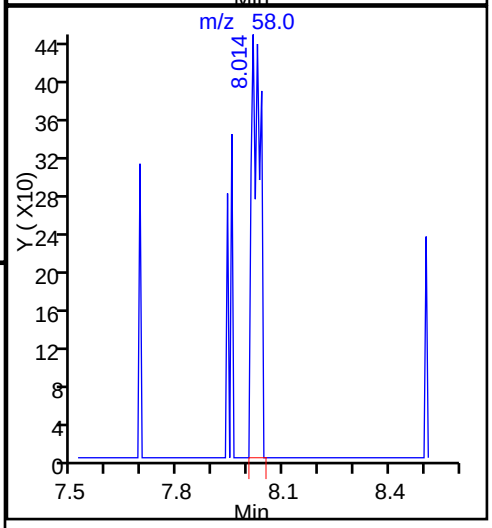
TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015027.D				
Injection Date:	15-Oct-2016 23:21:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-2	Lab Sample ID:	180-59749-2		
Client ID:	HD-MW-57-0/1-0				
Operator ID:	001562	ALS Bottle#:	25	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

70 1,4-Dioxane, CAS: 123-91-1







FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-129-0/1-0 | Lab Sample ID: 180-59749-3

Matrix: Water | Lab File ID: 51015028.D

Analysis Method: 8260C | Date Collected: 10/12/2016 10:20

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 23:45

Soil Aliquot Vol: | Dilution Factor: 10

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	10	U	10	2.3
75-01-4	Vinyl chloride	10	U	10	3.2
74-83-9	Bromomethane	10	U	10	3.6
75-00-3	Chloroethane	10	U	10	2.6
75-35-4	1,1-Dichloroethene	10	U	10	2.9
67-64-1	Acetone	50	U	50	25
75-15-0	Carbon disulfide	10	U	10	1.8
75-09-2	Methylene Chloride	3.8	J	10	3.6
156-60-5	trans-1,2-Dichloroethene	10	U	10	2.9
1634-04-4	Methyl tert-butyl ether	10	U	10	2.4
75-34-3	1,1-Dichloroethane	10	U	10	2.4
156-59-2	cis-1,2-Dichloroethene	310		10	2.9
74-97-5	Bromochloromethane	10	U	10	3.8
78-93-3	2-Butanone (MEK)	50	U	50	12
67-66-3	Chloroform	10	U	10	2.7
71-55-6	1,1,1-Trichloroethane	10	U	10	2.2
56-23-5	Carbon tetrachloride	10	U ^c	10	2.4
71-43-2	Benzene	10	U	10	2.6
107-06-2	1,2-Dichloroethane	10	U	10	2.5
79-01-6	*Trichloroethene*	*3000*	*E*	*10*	*2.6*
78-87-5	1,2-Dichloropropane	10	U	10	2.3
75-27-4	Bromodichloromethane	10	U	10	2.3
10061-01-5	cis-1,3-Dichloropropene	10	U ^c	10	2.1
108-10-1	4-Methyl-2-pentanone (MIBK)	50	U	50	5.9
108-88-3	Toluene	10	U	10	2.8
10061-02-6	trans-1,3-Dichloropropene	10	U ^c	10	2.4
79-00-5	1,1,2-Trichloroethane	10	U	10	3.5
127-18-4	Tetrachloroethene	470		10	2.7
591-78-6	2-Hexanone	50	U	50	7.4
124-48-1	Dibromochloromethane	10	U ^c	10	4.0
106-93-4	1,2-Dibromoethane (EDB)	10	U	10	2.9
108-90-7	Chlorobenzene	10	U	10	3.1
630-20-6	1,1,1,2-Tetrachloroethane	10	U	10	2.0
100-41-4	Ethylbenzene	10	U	10	2.7
1330-20-7	Xylenes, Total	20	U	20	4.8
100-42-5	Styrene	10	U	10	2.6

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-129-0/1-0 | Lab Sample ID: 180-59749-3

Matrix: Water | Lab File ID: 51015028.D

Analysis Method: 8260C | Date Collected: 10/12/2016 10:20

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 23:45

Soil Aliquot Vol: | Dilution Factor: 10

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	10	U ^c	10	2.9
79-34-5	1,1,2,2-Tetrachloroethane	10	U	10	3.5
107-13-1	Acrylonitrile	200	U ^c	200	28
123-91-1	1,4-Dioxane	2000	U	2000	75

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	116		72-134
2037-26-5	Toluene-d8 (Surr)	115		80-120
460-00-4	4-Bromofluorobenzene (Surr)	100		72-120
1868-53-7	Dibromofluoromethane (Surr)	103		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D
Lims ID: 180-59749-A-3
Client ID: HD-MW-129-0/1-0
Sample Type: Client
Inject. Date: 15-Oct-2016 23:45:30 ALS Bottle#: 26 Worklist Smp#: 28
Purge Vol: 5.000 mL Dil. Factor: 10.0000
Sample Info: 180-0013887-028
Misc. Info.: 180-59749-A-3, 10x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:21:10 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:21:10

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.274	4.278	-0.004	0	95883	1000.0	
* 2 Fluorobenzene (IS)	96	7.273	7.271	0.002	97	372269	50.0	
* 3 Chlorobenzene-d5	119	10.376	10.373	0.003	93	75906	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.718	12.722	-0.004	98	81488	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.549	6.547	0.002	93	86040	51.3	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.920	6.918	0.002	0	132355	58.0	
$ 7 Toluene-d8 (Surr)	98	8.922	8.919	0.003	95	343217	57.5	
$ 8 4-Bromofluorobenzene (Surr	95	11.556	11.560	-0.004	82	110255	50.0	
12 Chloromethane	50		1.771				ND	
13 Vinyl chloride	62		1.905				ND	
15 Bromomethane	94		2.240				ND	
16 Chloroethane	64		2.392				ND	
22 1,1-Dichloroethene	96	3.343	3.341	0.002	1	842	0.3989	
24 Acetone	43	3.465	3.450	0.015	82	2740	3.75	
26 Carbon disulfide	76		3.621				ND	
31 Methylene Chloride	84	4.140	4.132	0.008	90	4649	1.90	
33 Acrylonitrile	53		4.515				ND	
34 trans-1,2-Dichloroethene	96	4.542	4.551	-0.009	1	1944	0.9005	
35 Methyl tert-butyl ether	73		4.570				ND	
37 1,1-Dichloroethane	63		5.190				ND	
45 cis-1,2-Dichloroethene	96	5.935	5.938	-0.003	85	374438	153.6	
46 2-Butanone (MEK)	43		5.951				ND	
49 Chlorobromomethane	128		6.218				ND	
52 Chloroform	83	6.373	6.364	0.009	27	2386	0.6291	M
53 1,1,1-Trichloroethane	97		6.522				ND	
56 Carbon tetrachloride	117		6.693				ND	
58 Benzene	78		6.924				ND	
59 1,2-Dichloroethane	62		7.003				ND	
64 Trichloroethene	130	7.663	7.660	0.003	92	3126145	1494.1	E
67 1,2-Dichloropropane	63		7.934				ND	
70 1,4-Dioxane	88		8.019				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
71 Dichlorobromomethane	83		8.220				ND	
74 cis-1,3-Dichloropropene	75		8.664				ND	
75 4-Methyl-2-pentanone (MIBK	43		8.816				ND	
76 Toluene	91		8.986				ND	
77 trans-1,3-Dichloropropene	75		9.242				ND	
79 1,1,2-Trichloroethane	97		9.436				ND	
80 Tetrachloroethene	164	9.500	9.503	-0.003	92	326038	232.9	
82 2-Hexanone	43		9.649				ND	
84 Chlorodibromomethane	129		9.801				ND	
85 Ethylene Dibromide	107		9.917				ND	
87 Chlorobenzene	112		10.404				ND	
89 1,1,1,2-Tetrachloroethane	131		10.501				ND	
90 Ethylbenzene	106		10.501				ND	
91 m-Xylene & p-Xylene	106		10.635				ND	
92 o-Xylene	106		11.018				ND	
93 Styrene	104		11.036				ND	
94 Bromoform	173		11.225				ND	
99 1,1,2,2-Tetrachloroethane	83		11.700				ND	
S 133 Xylenes, Total	106		1.000				ND	

QC Flag Legend

Processing Flags

E - Exceeded Maximum Amount

Review Flags

M - Manually Integrated

Reagents:

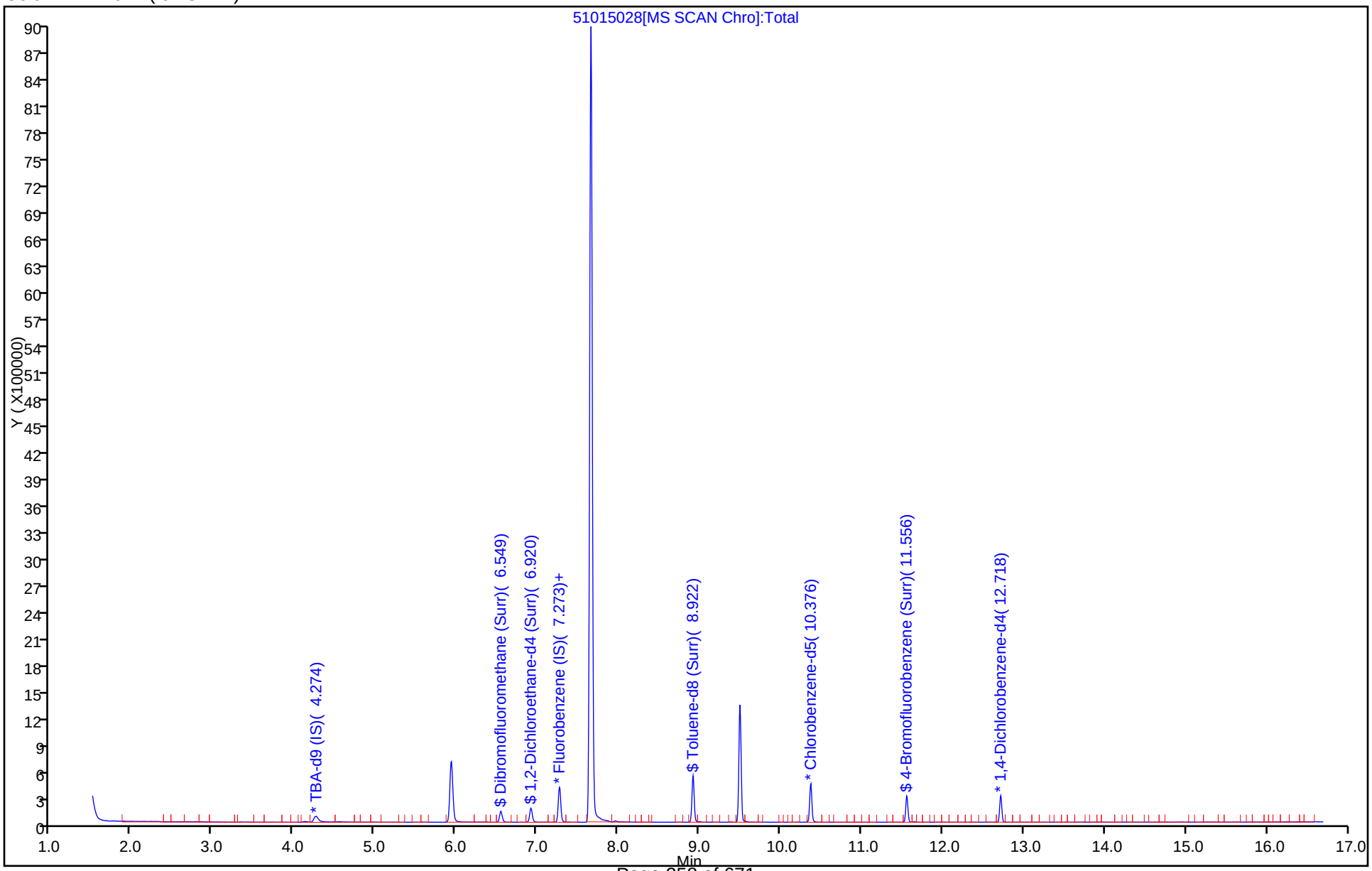
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

Report Date: 17-Oct-2016 08:21:11 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D				
Injection Date:	15-Oct-2016 23:45:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	180-59749-A-3	Lab Sample ID:	180-59749-3	Worklist Smp#:	28
Client ID:	HD-MW-129-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	10.0000	ALS Bottle#:	26
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D
Lims ID: 180-59749-A-3
Client ID: HD-MW-129-0/1-0
Sample Type: Client
Inject. Date: 15-Oct-2016 23:45:30 ALS Bottle#: 26 Worklist Smp#: 28
Purge Vol: 5.000 mL Dil. Factor: 10.0000
Sample Info: 180-0013887-028
Misc. Info.: 180-59749-A-3, 10x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:21:10 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:21:10

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	51.3	102.55
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	58.0	116.04
$ 7 Toluene-d8 (Surr)	50.0	57.5	114.93
$ 8 4-Bromofluorobenzene (Surr)	50.0	50.0	99.92

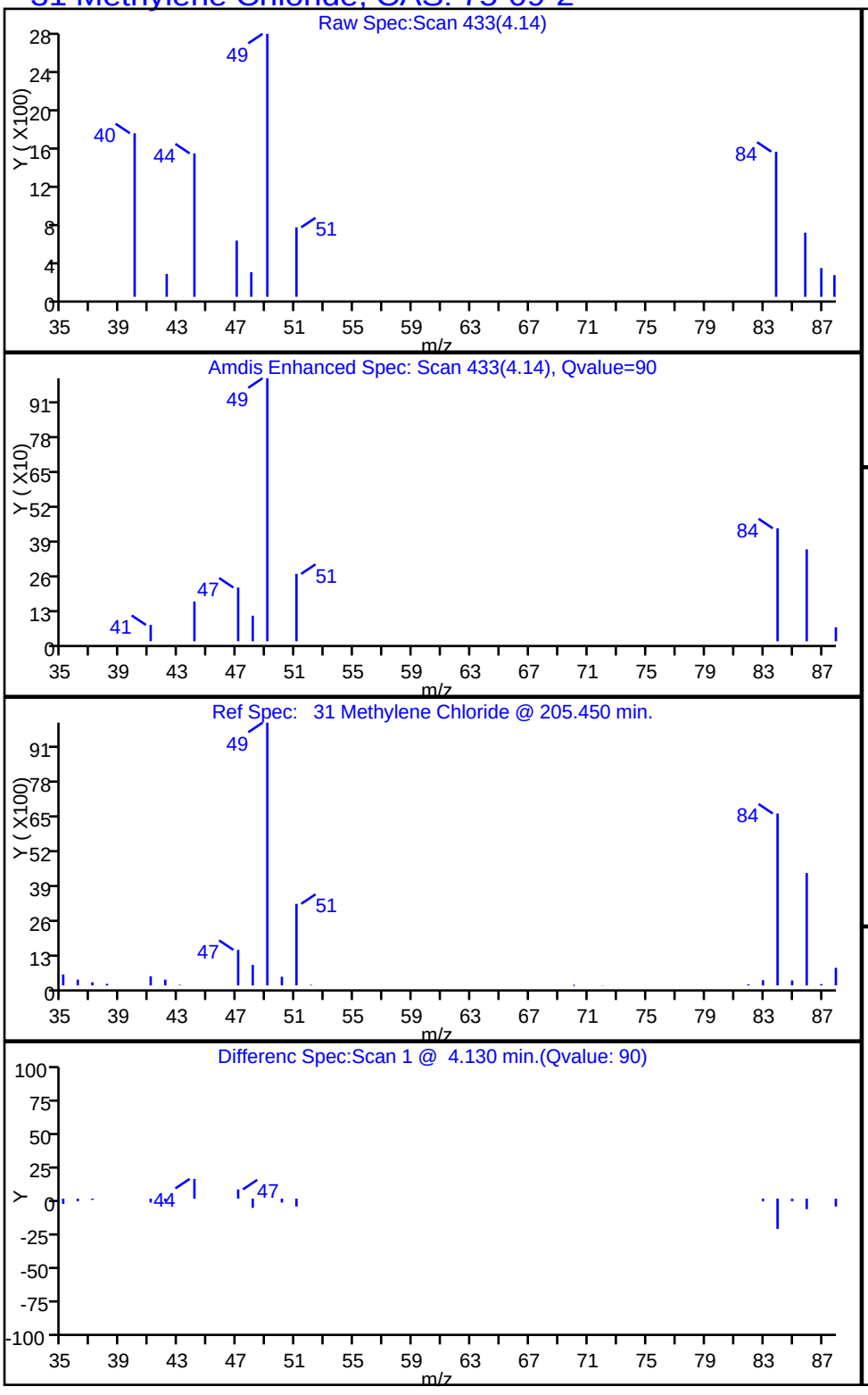
Report Date: 17-Oct-2016 08:21:11 Chrom Revision: 2.2 08-Sep-2016 14:45:52

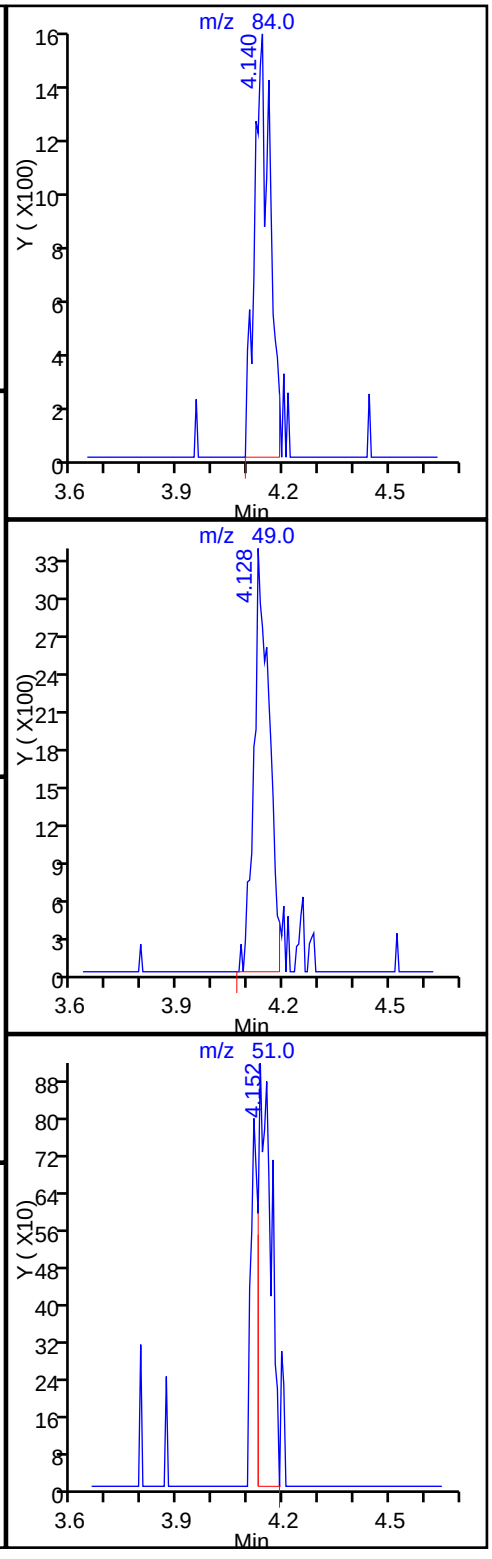
TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D

Injection Date:	15-Oct-2016 23:45:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-3	Lab Sample ID:	180-59749-3		
Client ID:	HD-MW-129-0/1-0				
Operator ID:	001562	ALS Bottle#:	26	Worklist Smp#:	28
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

31 Methylene Chloride, CAS: 75-09-2



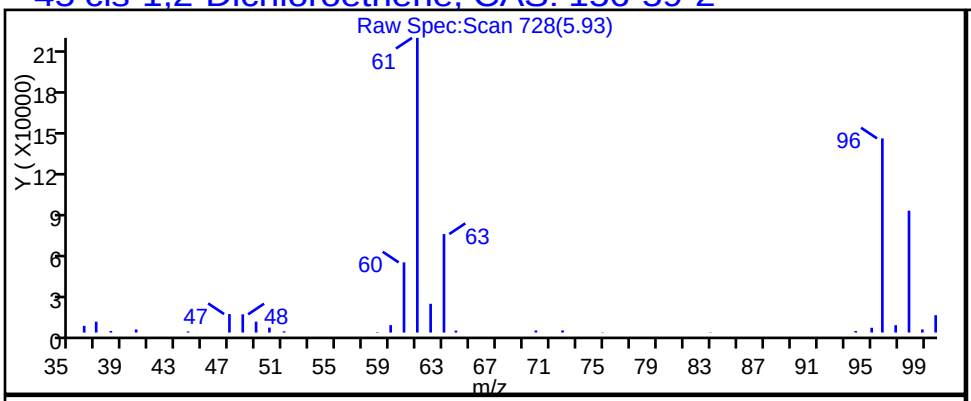


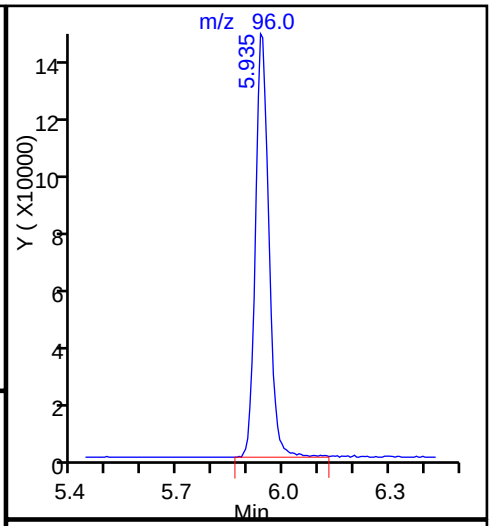
Report Date: 17-Oct-2016 08:21:11 Chrom Revision: 2.2 08-Sep-2016 14:45:52

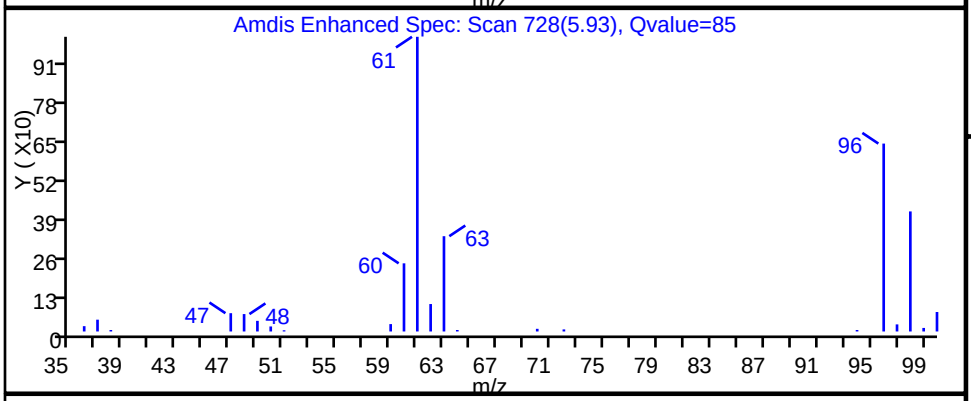
TestAmerica Pittsburgh

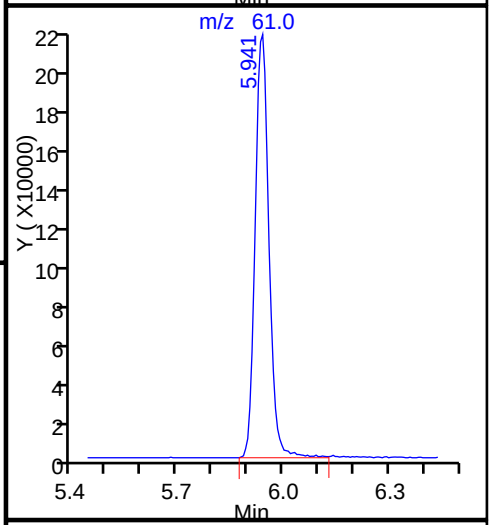
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D				
Injection Date:	15-Oct-2016 23:45:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-3	Lab Sample ID:	180-59749-3		
Client ID:	HD-MW-129-0/1-0				
Operator ID:	001562	ALS Bottle#:	26	Worklist Smp#:	28
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

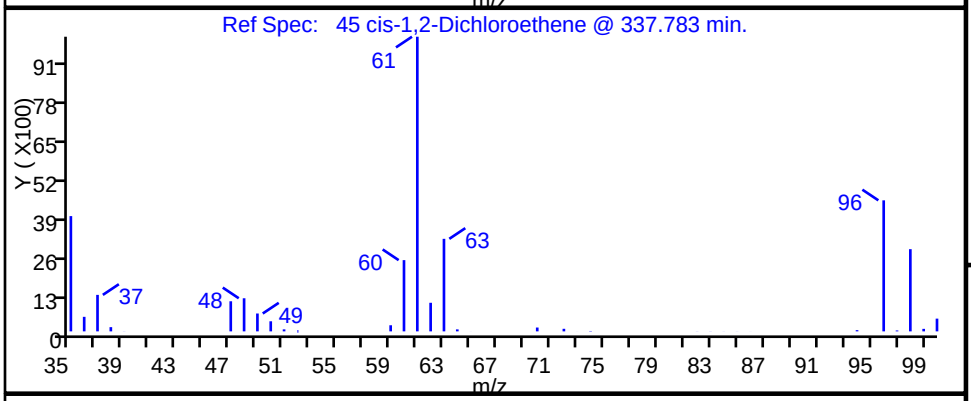
45 cis-1,2-Dichloroethene, CAS: 156-59-2

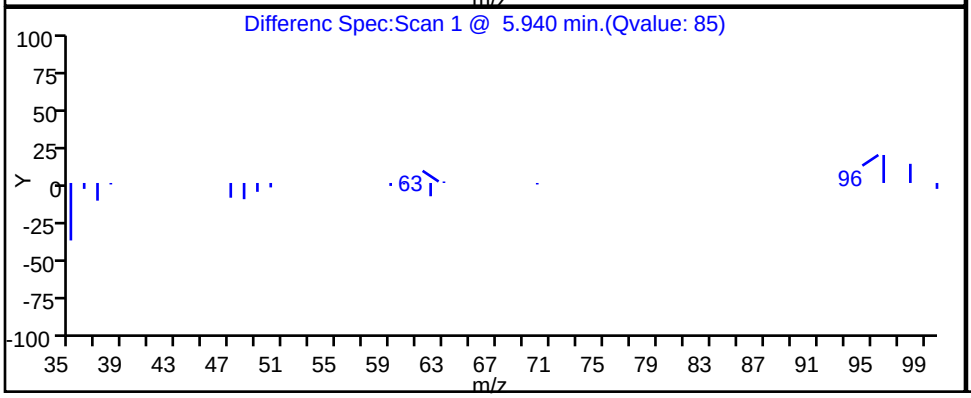


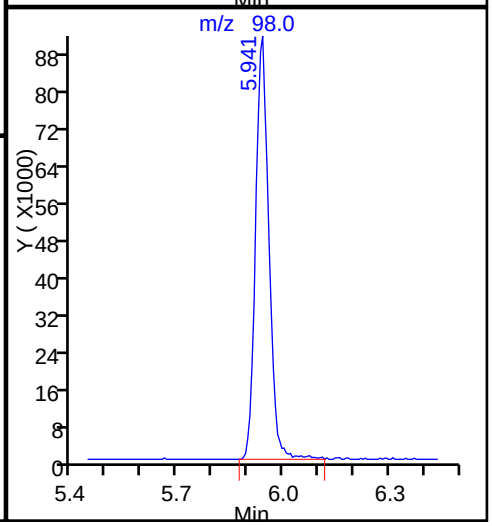












Report Date: 17-Oct-2016 08:21:11 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D

Injection Date: 15-Oct-2016 23:45:30 Instrument ID: CHHP5

Lims ID: 180-59749-A-3 Lab Sample ID: 180-59749-3

Client ID: HD-MW-129-0/1-0

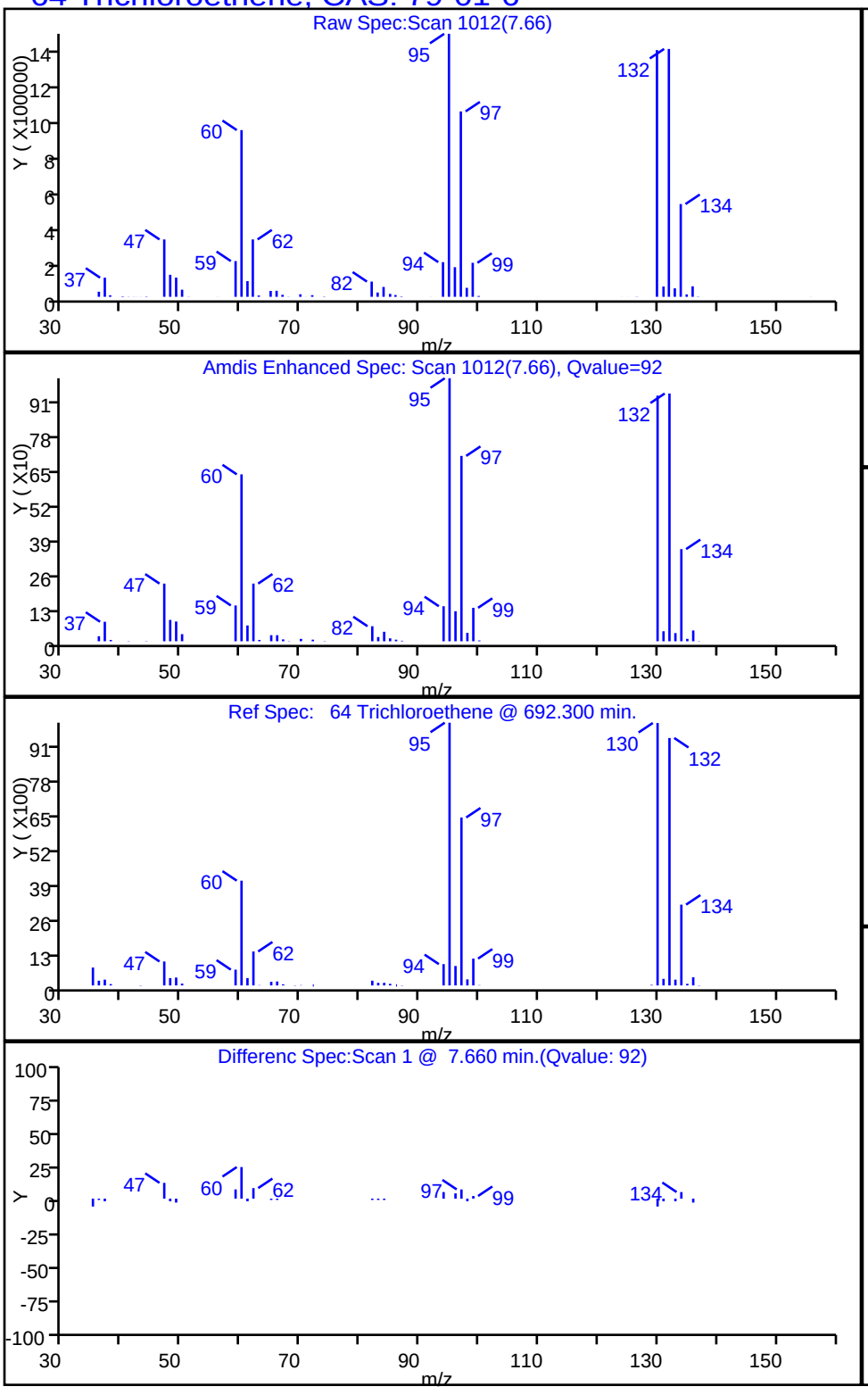
Operator ID: 001562 ALS Bottle#: 26 Worklist Smp#: 28

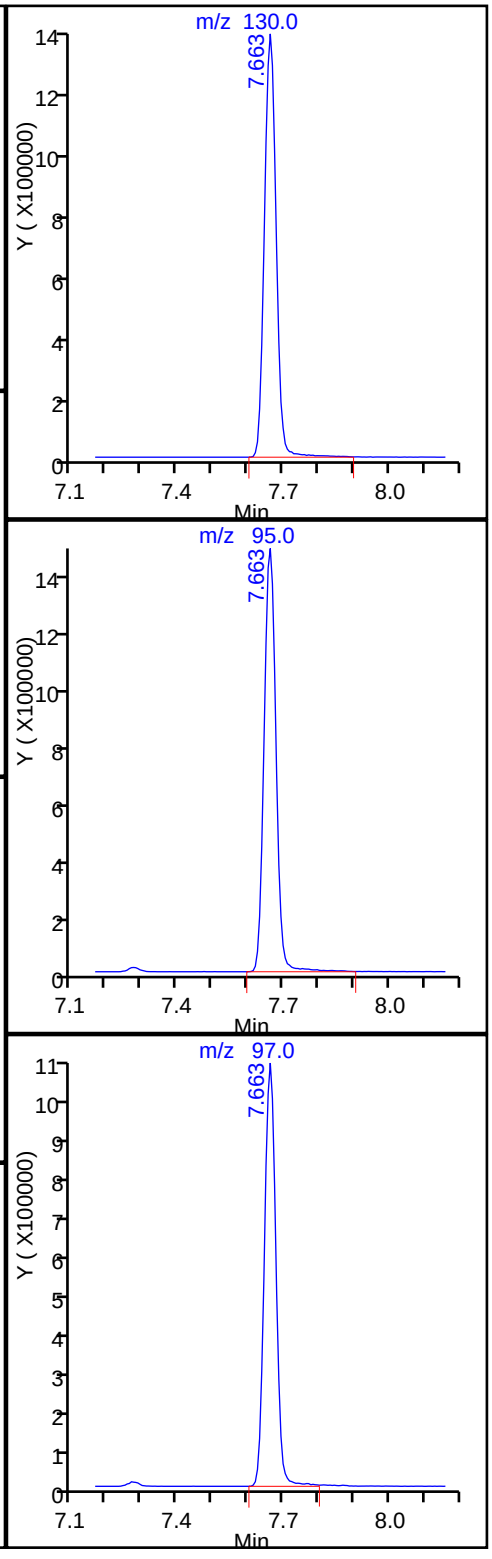
Purge Vol: 5.000 mL Dil. Factor: 10.0000

Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL

Column: DB-624 (0.18 mm) Detector MS SCAN

64 Trichloroethene, CAS: 79-01-6



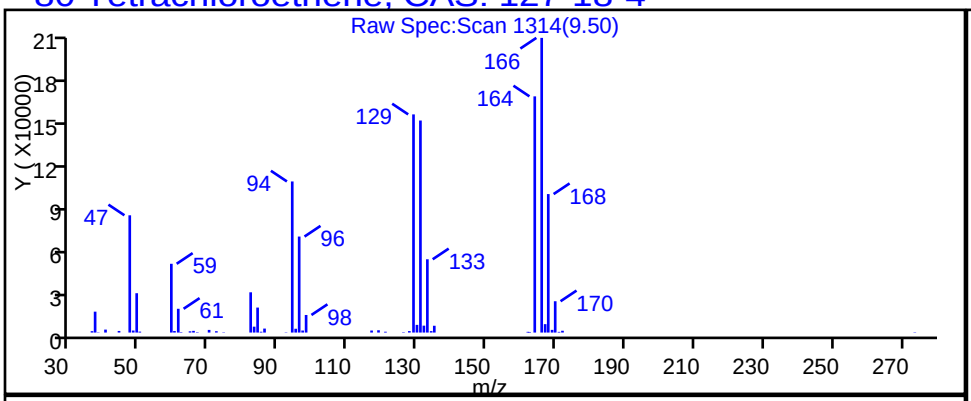


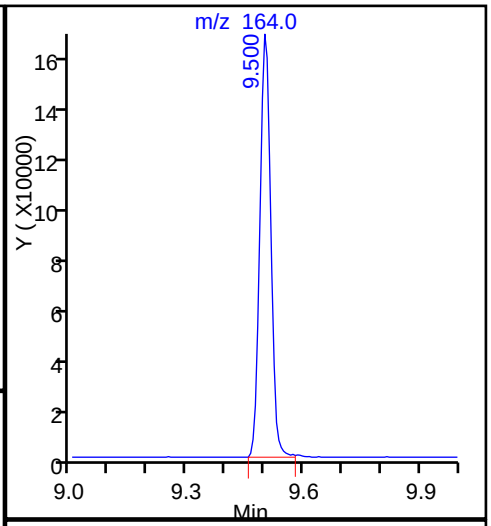
Report Date: 17-Oct-2016 08:21:11 Chrom Revision: 2.2 08-Sep-2016 14:45:52

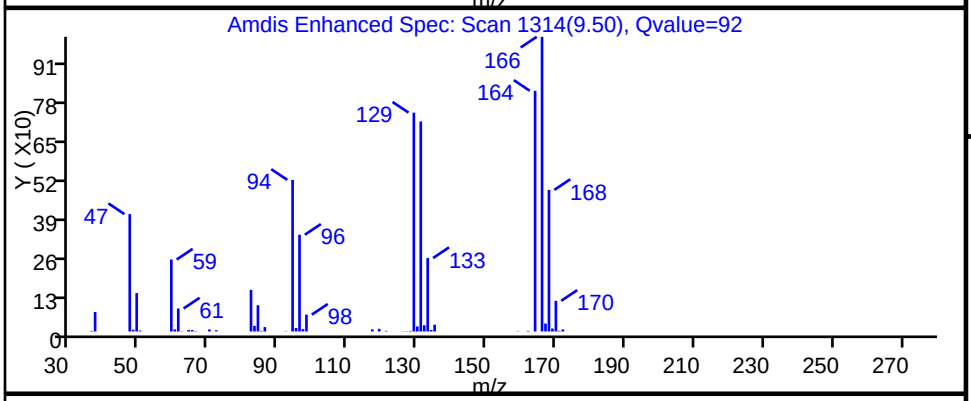
TestAmerica Pittsburgh

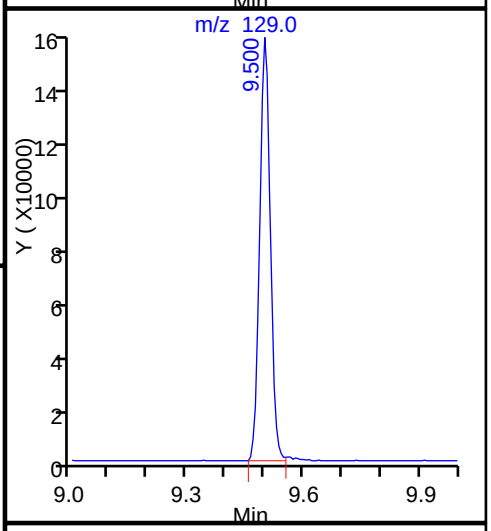
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D		
Injection Date:	15-Oct-2016 23:45:30	Instrument ID:	CHHP5
Lims ID:	180-59749-A-3	Lab Sample ID:	180-59749-3
Client ID:	HD-MW-129-0/1-0		
Operator ID:	001562	ALS Bottle#:	26 Worklist Smp#: 28
Purge Vol:	5.000 mL	Dil. Factor:	10.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

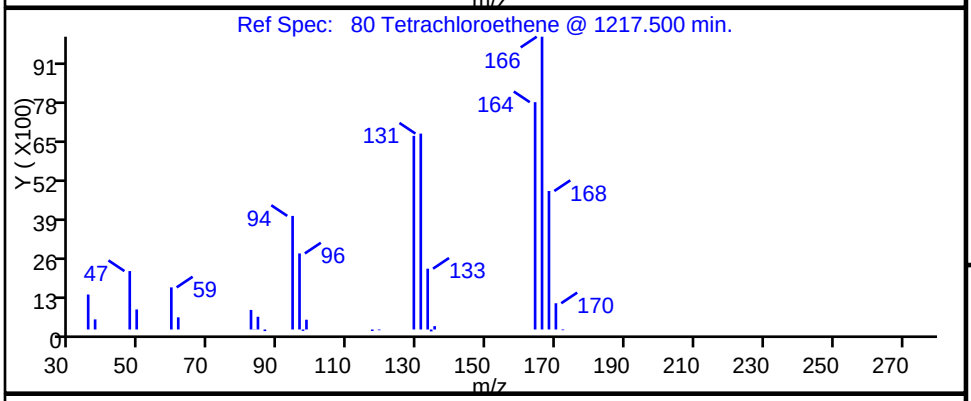
80 Tetrachloroethene, CAS: 127-18-4

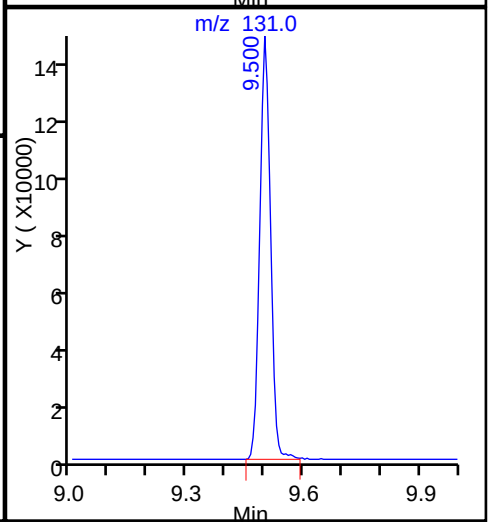


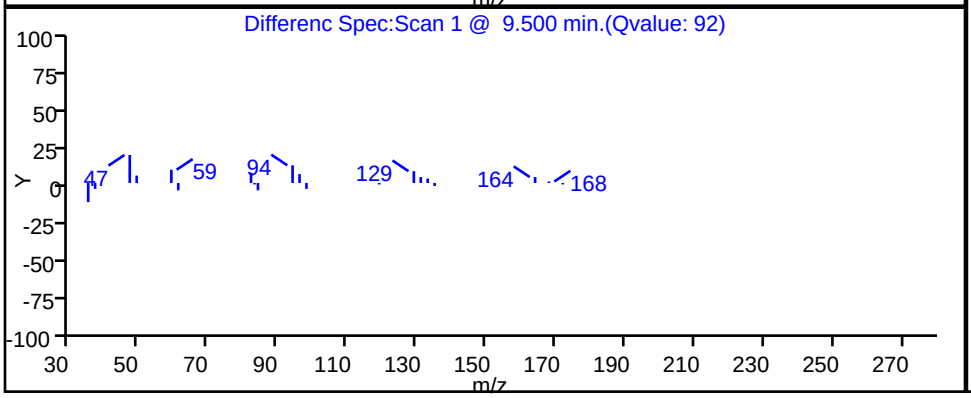












Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

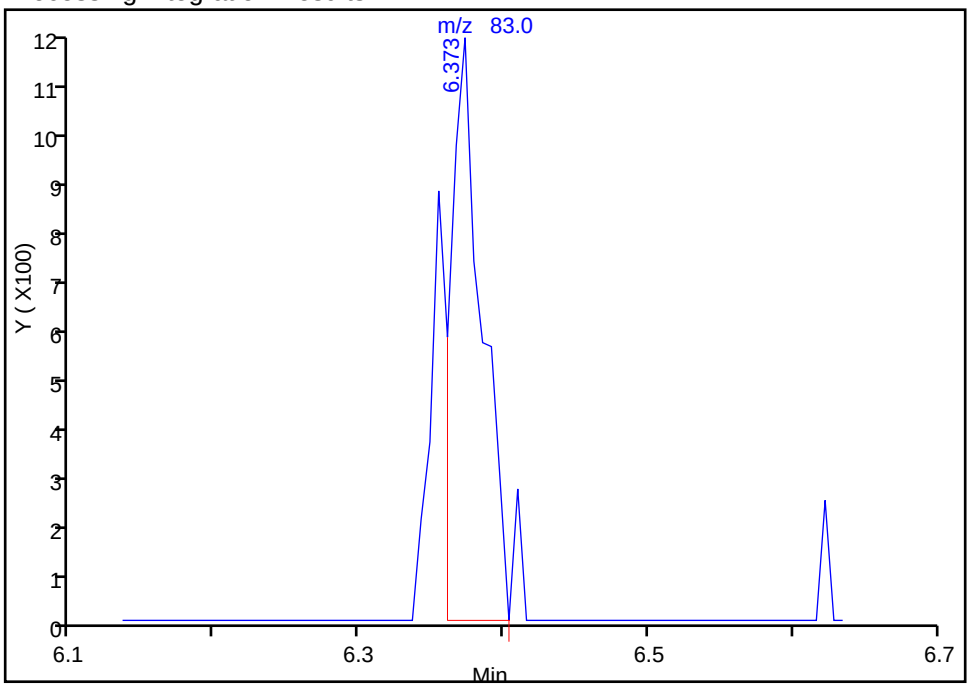
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015028.D				
Injection Date:	15-Oct-2016 23:45:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-3	Lab Sample ID:	180-59749-3		
Client ID:	HD-MW-129-0/1-0				
Operator ID:	001562	ALS Bottle#:	26	Worklist Smp#:	28
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

52 Chloroform, CAS: 67-66-3

Signal: 1

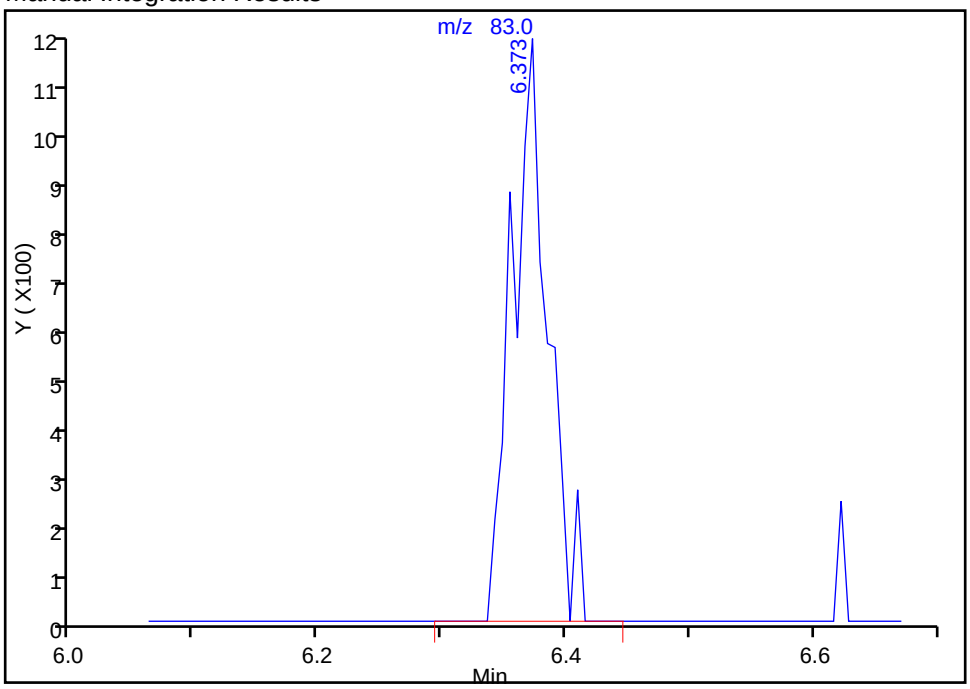
Processing Integration Results

RT: 6.37
Area: 1766
Amount: 0.465642
Amount Units: ng



Manual Integration Results

RT: 6.37
Area: 2386
Amount: 0.629118
Amount Units: ng



Reviewer: fergusond, 17-Oct-2016 08:21:10

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-129-0/1-0 DL | Lab Sample ID: 180-59749-3 DL

Matrix: Water | Lab File ID: 51018016.D

Analysis Method: 8260C | Date Collected: 10/12/2016 10:20

Sample wt/vol: 5(mL) | Date Analyzed: 10/18/2016 18:40

Soil Aliquot Vol: | Dilution Factor: 250

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191520 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	250	U ^c	250	57
75-01-4	Vinyl chloride	250	U	250	79
74-83-9	Bromomethane	250	U ^c	250	91
75-00-3	Chloroethane	250	U	250	65
75-35-4	1,1-Dichloroethene	250	U	250	72
67-64-1	Acetone	1300	U	1300	630
75-15-0	Carbon disulfide	250	U	250	46
75-09-2	Methylene Chloride	430		250	91
156-60-5	trans-1,2-Dichloroethene	250	U	250	72
1634-04-4	Methyl tert-butyl ether	250	U	250	61
75-34-3	1,1-Dichloroethane	250	U	250	59
156-59-2	cis-1,2-Dichloroethene	340		250	72
74-97-5	Bromochloromethane	250	U	250	94
78-93-3	2-Butanone (MEK)	1300	U	1300	290
67-66-3	Chloroform	250	U	250	69
71-55-6	1,1,1-Trichloroethane	250	U	250	56
56-23-5	Carbon tetrachloride	250	U	250	61
71-43-2	Benzene	250	U	250	64
107-06-2	1,2-Dichloroethane	250	U	250	61
79-01-6	Trichloroethene	4300		250	65
78-87-5	1,2-Dichloropropane	250	U	250	57
75-27-4	Bromodichloromethane	250	U	250	58
10061-01-5	cis-1,3-Dichloropropene	250	U	250	52
108-10-1	4-Methyl-2-pentanone (MIBK)	1300	U	1300	150
108-88-3	Toluene	250	U	250	70
10061-02-6	trans-1,3-Dichloropropene	250	U	250	60
79-00-5	1,1,2-Trichloroethane	250	U	250	87
127-18-4	Tetrachloroethene	620		250	67
591-78-6	2-Hexanone	1300	U	1300	190
124-48-1	Dibromochloromethane	250	U	250	99
106-93-4	1,2-Dibromoethane (EDB)	250	U	250	72
108-90-7	Chlorobenzene	250	U	250	78
630-20-6	1,1,1,2-Tetrachloroethane	250	U	250	49
100-41-4	Ethylbenzene	250	U	250	69
1330-20-7	Xylenes, Total	500	U	500	120
100-42-5	Styrene	250	U	250	66

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-129-0/1-0 DL | Lab Sample ID: 180-59749-3 DL

Matrix: Water | Lab File ID: 51018016.D

Analysis Method: 8260C | Date Collected: 10/12/2016 10:20

Sample wt/vol: 5(mL) | Date Analyzed: 10/18/2016 18:40

Soil Aliquot Vol: | Dilution Factor: 250

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191520 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	*Bromoform*	*250*	*U*	*250*	*74*
79-34-5	*1,1,2,2-Tetrachloroethane*	*250*	*U*	*250*	*86*
107-13-1	*Acrylonitrile*	*5000*	*U ^c*	*5000*	*690*
123-91-1	*1,4-Dioxane*	*50000*	*U*	*50000*	*1900*

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	120		72-134
2037-26-5	Toluene-d8 (Surr)	106		80-120
460-00-4	4-Bromofluorobenzene (Surr)	118		72-120
1868-53-7	Dibromofluoromethane (Surr)	102		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018016.D
Lims ID: 180-59749-B-3
Client ID: HD-MW-129-0/1-0
Sample Type: Client
Inject. Date: 18-Oct-2016 18:40:30 ALS Bottle#: 16 Worklist Smp#: 16
Purge Vol: 5.000 mL Dil. Factor: 250.0000
Sample Info: 180-0013928-016
Misc. Info.: 180-59749-B-3, 250x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 07:40:29 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 07:40:29

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.261	4.273	-0.012	0	121193	1000.0	
* 2 Fluorobenzene (IS)	96	7.272	7.266	0.006	97	360703	50.0	
* 3 Chlorobenzene-d5	119	10.374	10.375	0.000	92	80416	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.723	12.717	0.006	97	117884	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.548	6.542	0.006	92	82527	50.8	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.919	6.913	0.006	0	132798	60.1	
$ 7 Toluene-d8 (Surr)	98	8.920	8.921	-0.001	96	334224	52.8	
$ 8 4-Bromofluorobenzene (Surr	95	11.561	11.561	0.000	83	138471	59.2	
12 Chloromethane	50		1.760				ND	
13 Vinyl chloride	62		1.906				ND	
15 Bromomethane	94		2.235				ND	
16 Chloroethane	64		2.369				ND	
22 1,1-Dichloroethene	96		3.336				ND	
24 Acetone	43		3.439				ND	
26 Carbon disulfide	76		3.616				ND	
31 Methylene Chloride	84	4.133	4.121	0.012	96	20496	8.63	
33 Acrylonitrile	53		4.510				ND	
34 trans-1,2-Dichloroethene	96		4.540				ND	
35 Methyl tert-butyl ether	73		4.559				ND	
37 1,1-Dichloroethane	63		5.179				ND	
45 cis-1,2-Dichloroethene	96	5.933	5.927	0.006	85	16293	6.90	
46 2-Butanone (MEK)	43		5.946				ND	
49 Chlorobromomethane	128		6.213				ND	
52 Chloroform	83		6.359				ND	
53 1,1,1-Trichloroethane	97		6.524				ND	
56 Carbon tetrachloride	117		6.694				ND	
58 Benzene	78		6.925				ND	
59 1,2-Dichloroethane	62		7.004				ND	
64 Trichloroethene	130	7.661	7.655	0.006	94	175393	86.5	
67 1,2-Dichloropropane	63		7.929				ND	
70 1,4-Dioxane	88		8.014				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
71 Dichlorobromomethane	83		8.215				ND	
74 cis-1,3-Dichloropropene	75		8.659				ND	
75 4-Methyl-2-pentanone (MIBK	43		8.811				ND	
76 Toluene	91		8.987				ND	
77 trans-1,3-Dichloropropene	75		9.237				ND	
79 1,1,2-Trichloroethane	97		9.432				ND	
80 Tetrachloroethene	164	9.498	9.498	0.000	91	18469	12.5	
82 2-Hexanone	43		9.644				ND	
84 Chlorodibromomethane	129		9.803				ND	
85 Ethylene Dibromide	107		9.912				ND	
87 Chlorobenzene	112		10.405				ND	
89 1,1,1,2-Tetrachloroethane	131		10.496				ND	
90 Ethylbenzene	106		10.502				ND	
91 m-Xylene & p-Xylene	106		10.636				ND	
92 o-Xylene	106		11.013				ND	
93 Styrene	104		11.038				ND	
94 Bromoform	173		11.220				ND	
99 1,1,2,2-Tetrachloroethane	83		11.701				ND	
S 133 Xylenes, Total	106		1.000				ND	

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

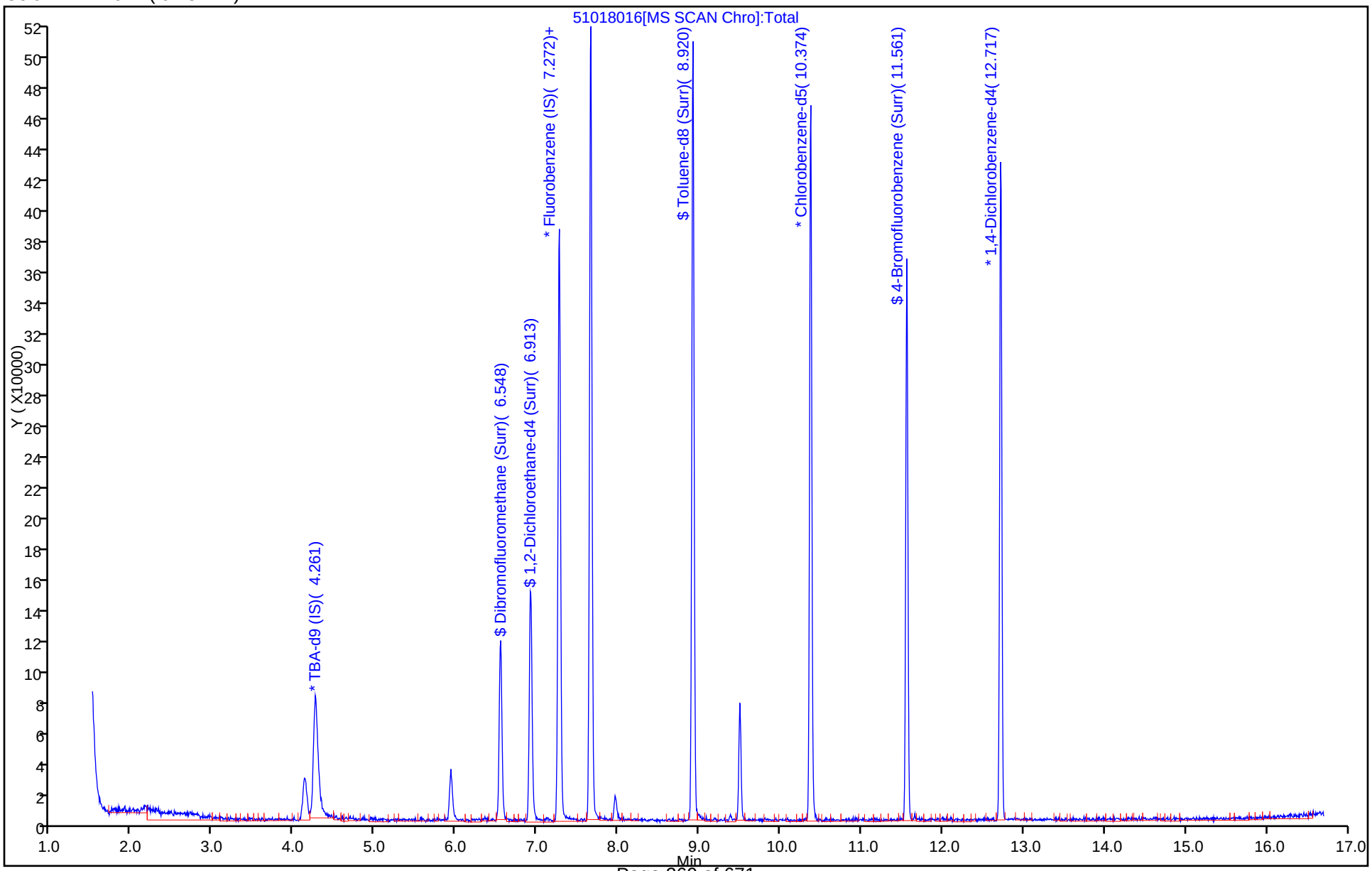
Report Date: 19-Oct-2016 07:40:29 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018016.D

Injection Date:	18-Oct-2016 18:40:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	180-59749-B-3	Lab Sample ID:	180-59749-3	Worklist Smp#:	16
Client ID:	HD-MW-129-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	250.0000	ALS Bottle#:	16
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018016.D
Lims ID: 180-59749-B-3
Client ID: HD-MW-129-0/1-0
Sample Type: Client
Inject. Date: 18-Oct-2016 18:40:30 ALS Bottle#: 16 Worklist Smp#: 16
Purge Vol: 5.000 mL Dil. Factor: 250.0000
Sample Info: 180-0013928-016
Misc. Info.: 180-59749-B-3, 250x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 07:40:29 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 07:40:29

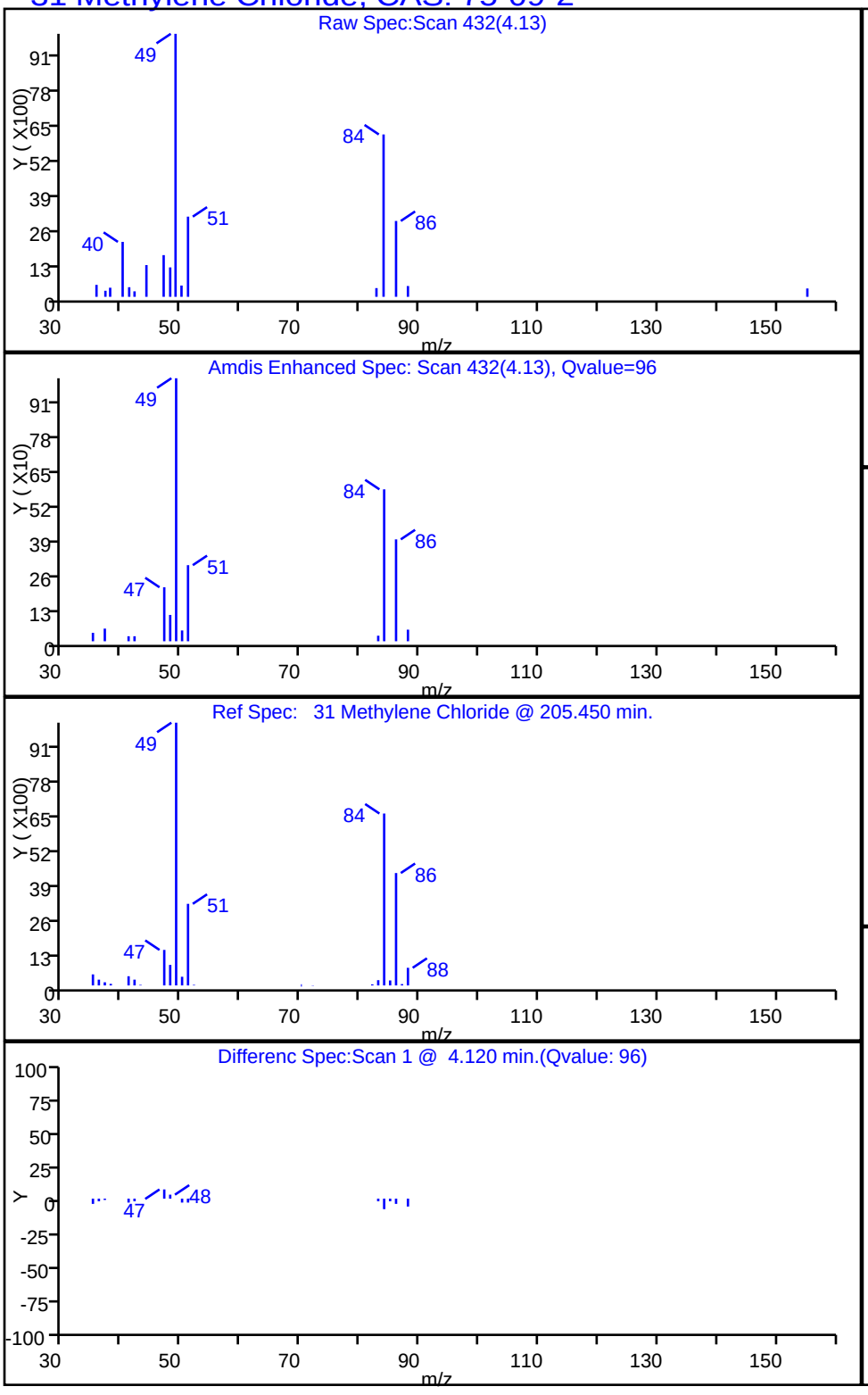
Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	50.8	101.52
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	60.1	120.16
$ 7 Toluene-d8 (Surr)	50.0	52.8	105.65
$ 8 4-Bromofluorobenzene (Surr)	50.0	59.2	118.46

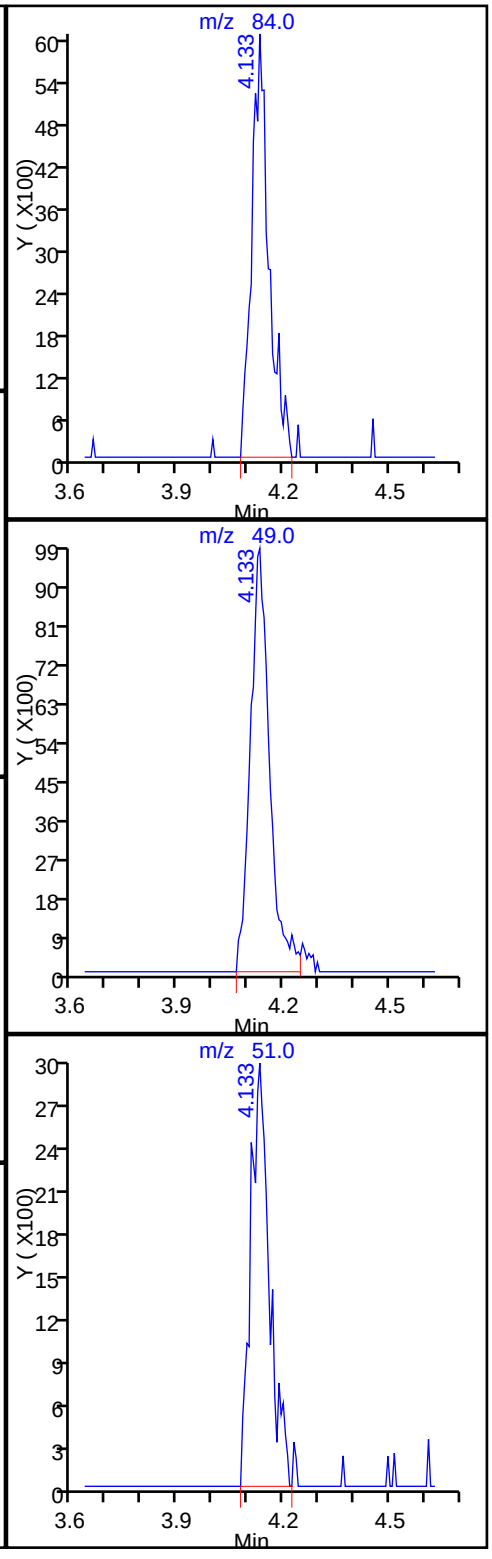
Report Date: 19-Oct-2016 07:40:29 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018016.D		
Injection Date:	18-Oct-2016 18:40:30	Instrument ID:	CHHP5
Lims ID:	180-59749-B-3	Lab Sample ID:	180-59749-3
Client ID:	HD-MW-129-0/1-0		
Operator ID:	001562	ALS Bottle#:	16 Worklist Smp#: 16
Purge Vol:	5.000 mL	Dil. Factor:	250.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

31 Methylene Chloride, CAS: 75-09-2





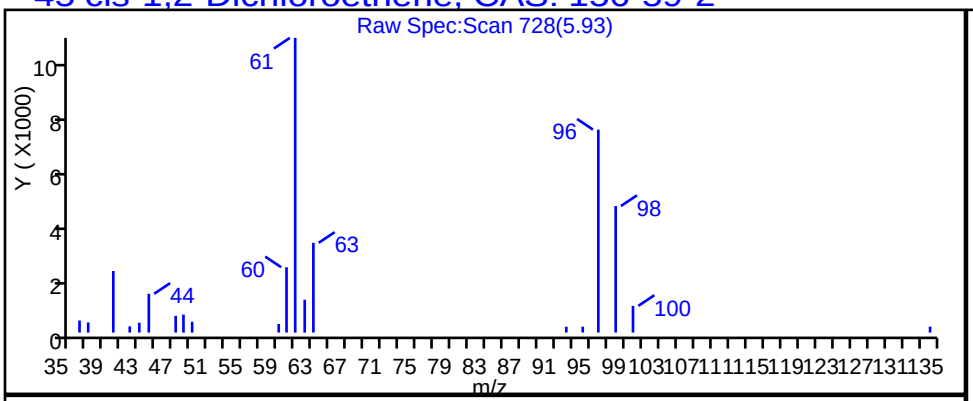
Report Date: 19-Oct-2016 07:40:29 Chrom Revision: 2.2 08-Sep-2016 14:45:52

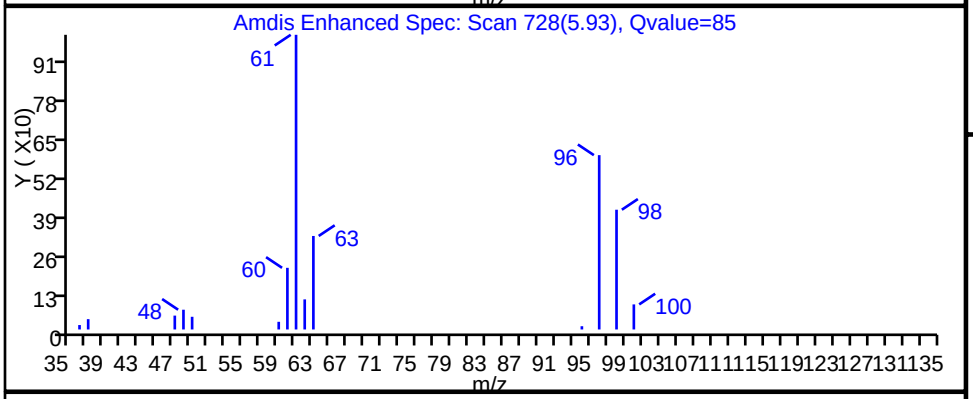
TestAmerica Pittsburgh

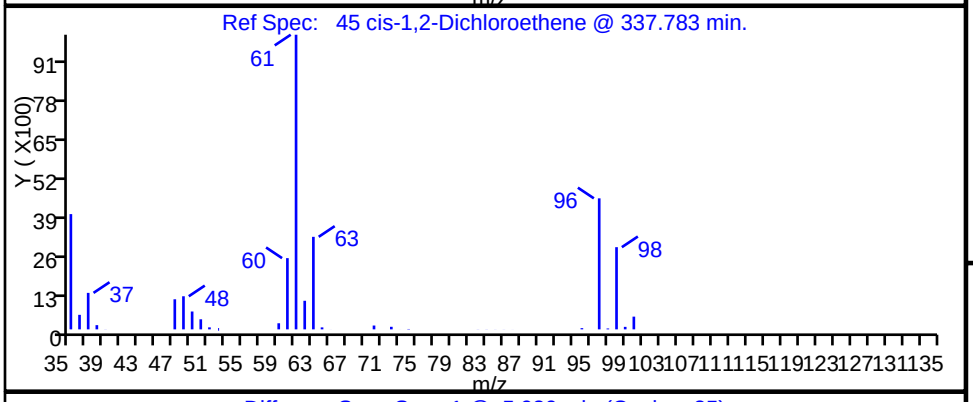
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018016.D

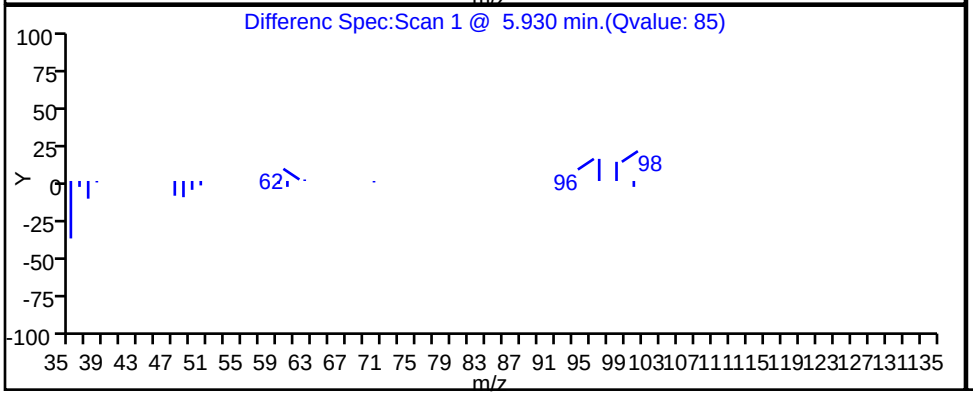
Injection Date:	18-Oct-2016 18:40:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-3	Lab Sample ID:	180-59749-3		
Client ID:	HD-MW-129-0/1-0				
Operator ID:	001562	ALS Bottle#:	16	Worklist Smp#:	16
Purge Vol:	5.000 mL	Dil. Factor:	250.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

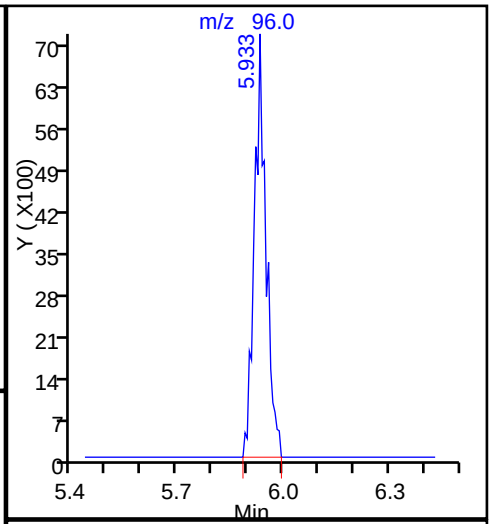
45 cis-1,2-Dichloroethene, CAS: 156-59-2

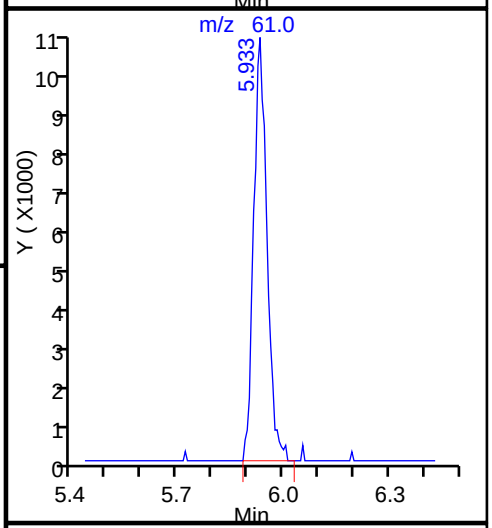


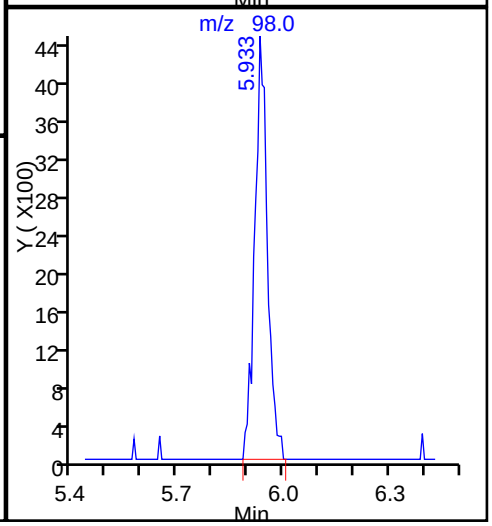












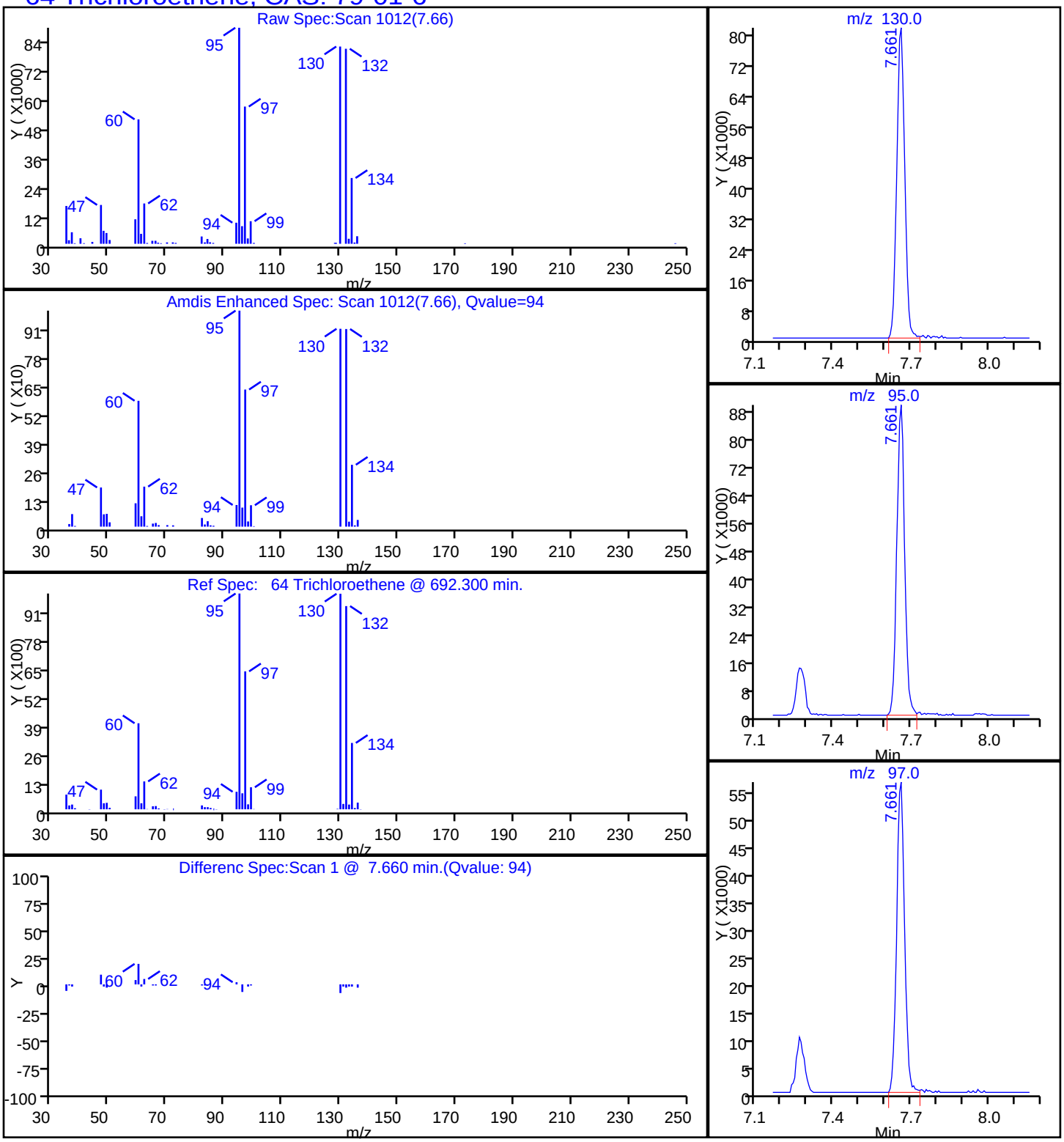
Report Date: 19-Oct-2016 07:40:29 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018016.D

Injection Date:	18-Oct-2016 18:40:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-3	Lab Sample ID:	180-59749-3		
Client ID:	HD-MW-129-0/1-0				
Operator ID:	001562	ALS Bottle#:	16	Worklist Smp#:	16
Purge Vol:	5.000 mL	Dil. Factor:	250.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

64 Trichloroethene, CAS: 79-01-6



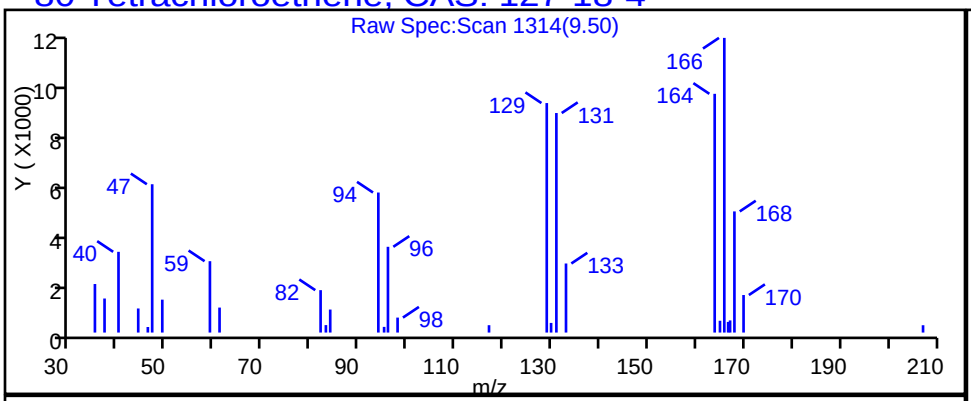
Report Date: 19-Oct-2016 07:40:29 Chrom Revision: 2.2 08-Sep-2016 14:45:52

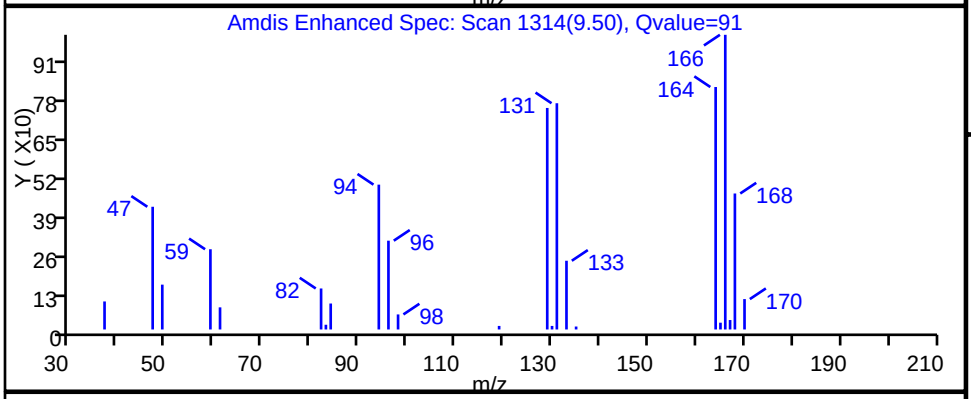
TestAmerica Pittsburgh

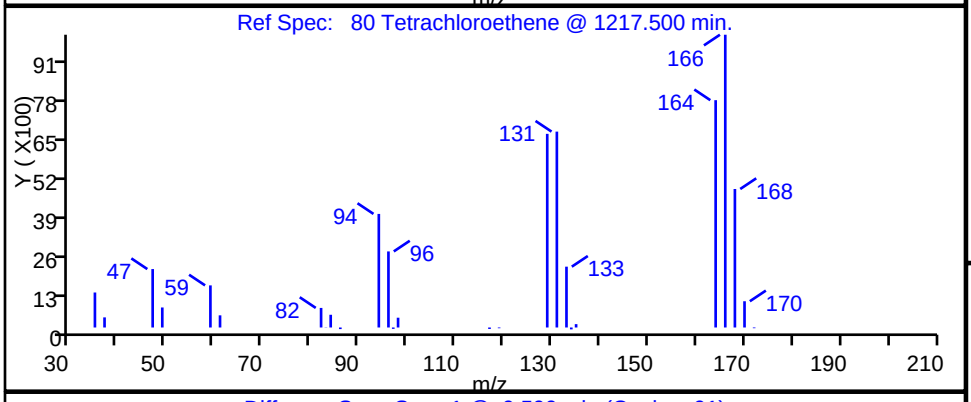
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018016.D

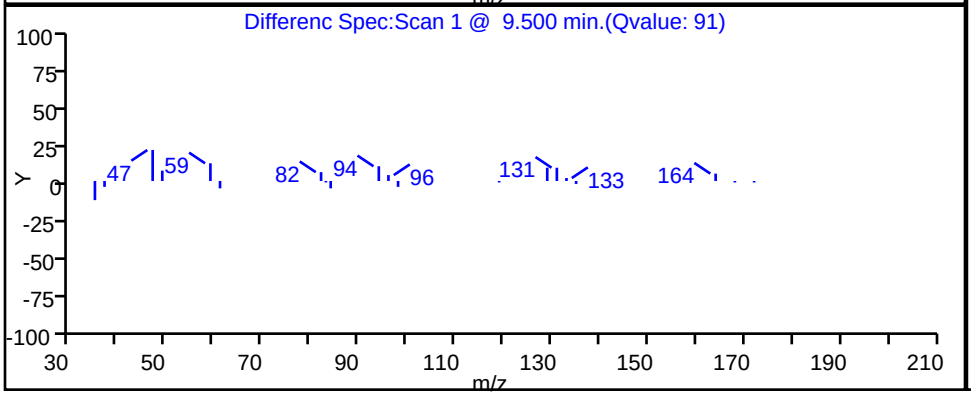
Injection Date:	18-Oct-2016 18:40:30	Instrument ID:	CHHP5
Lims ID:	180-59749-B-3	Lab Sample ID:	180-59749-3
Client ID:	HD-MW-129-0/1-0		
Operator ID:	001562	ALS Bottle#:	16 Worklist Smp#: 16
Purge Vol:	5.000 mL	Dil. Factor:	250.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

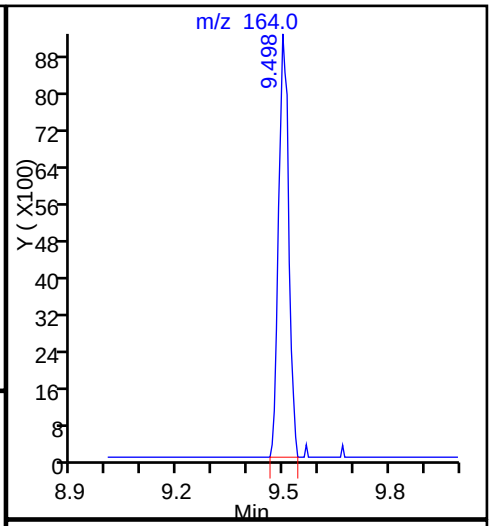
80 Tetrachloroethene, CAS: 127-18-4

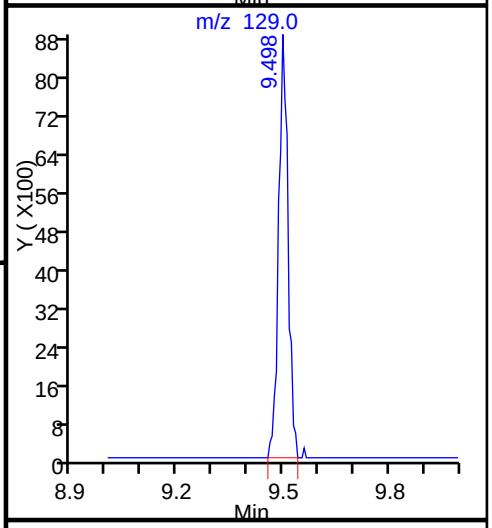


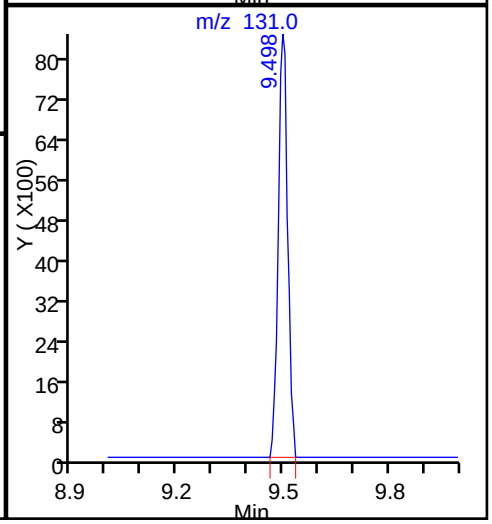












FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-127-0/1-0 | Lab Sample ID: 180-59749-4

Matrix: Water | Lab File ID: 51015030.D

Analysis Method: 8260C | Date Collected: 10/12/2016 09:55

Sample wt/vol: 5(mL) | Date Analyzed: 10/16/2016 00:33

Soil Aliquot Vol: | Dilution Factor: 10

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	10	U	10	2.3
75-01-4	Vinyl chloride	10	U	10	3.2
74-83-9	Bromomethane	10	U	10	3.6
75-00-3	Chloroethane	10	U	10	2.6
75-35-4	1,1-Dichloroethene	10	U	10	2.9
67-64-1	Acetone	50	U	50	25
75-15-0	Carbon disulfide	10	U	10	1.8
75-09-2	Methylene Chloride	4.6	J	10	3.6
156-60-5	trans-1,2-Dichloroethene	10	U	10	2.9
1634-04-4	Methyl tert-butyl ether	10	U	10	2.4
75-34-3	1,1-Dichloroethane	3.9	J	10	2.4
156-59-2	cis-1,2-Dichloroethene	240		10	2.9
74-97-5	Bromochloromethane	10	U	10	3.8
78-93-3	2-Butanone (MEK)	50	U	50	12
67-66-3	Chloroform	10	U	10	2.7
71-55-6	1,1,1-Trichloroethane	4.9	J	10	2.2
56-23-5	Carbon tetrachloride	10	U ^c	10	2.4
71-43-2	Benzene	10	U	10	2.6
107-06-2	1,2-Dichloroethane	10	U	10	2.5
79-01-6	Trichloroethene	61		10	2.6
78-87-5	1,2-Dichloropropane	10	U	10	2.3
75-27-4	Bromodichloromethane	10	U	10	2.3
10061-01-5	cis-1,3-Dichloropropene	10	U ^c	10	2.1
108-10-1	4-Methyl-2-pentanone (MIBK)	50	U	50	5.9
108-88-3	Toluene	10	U	10	2.8
10061-02-6	trans-1,3-Dichloropropene	10	U ^c	10	2.4
79-00-5	1,1,2-Trichloroethane	10	U	10	3.5
127-18-4	Tetrachloroethene	15		10	2.7
591-78-6	2-Hexanone	50	U	50	7.4
124-48-1	Dibromochloromethane	10	U ^c	10	4.0
106-93-4	1,2-Dibromoethane (EDB)	10	U	10	2.9
108-90-7	Chlorobenzene	10	U	10	3.1
630-20-6	1,1,1,2-Tetrachloroethane	10	U	10	2.0
100-41-4	Ethylbenzene	10	U	10	2.7
1330-20-7	Xylenes, Total	20	U	20	4.8
100-42-5	Styrene	10	U	10	2.6

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-127-0/1-0 | Lab Sample ID: 180-59749-4

Matrix: Water | Lab File ID: 51015030.D

Analysis Method: 8260C | Date Collected: 10/12/2016 09:55

Sample wt/vol: 5(mL) | Date Analyzed: 10/16/2016 00:33

Soil Aliquot Vol: | Dilution Factor: 10

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	10	U ^c	10	2.9
79-34-5	1,1,2,2-Tetrachloroethane	10	U	10	3.5
107-13-1	Acrylonitrile	200	U ^c	200	28
123-91-1	1,4-Dioxane	2000	U	2000	75

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	122		72-134
2037-26-5	Toluene-d8 (Surr)	107		80-120
460-00-4	4-Bromofluorobenzene (Surr)	106		72-120
1868-53-7	Dibromofluoromethane (Surr)	102		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D
Lims ID: 180-59749-A-4
Client ID: HD-MW-127-0/1-0
Sample Type: Client
Inject. Date: 16-Oct-2016 00:33:30 ALS Bottle#: 28 Worklist Smp#: 30
Purge Vol: 5.000 mL Dil. Factor: 10.0000
Sample Info: 180-0013887-030
Misc. Info.: 180-59749-A-4, 10x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:26:08 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:26:08

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.269	4.278	-0.009	0	115388	1000.0	
* 2 Fluorobenzene (IS)	96	7.274	7.271	0.003	97	375819	50.0	
* 3 Chlorobenzene-d5	119	10.377	10.373	0.004	93	82881	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.719	12.722	-0.003	97	94014	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.544	6.547	-0.003	92	86677	51.2	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.921	6.918	0.003	0	140902	61.2	
$ 7 Toluene-d8 (Surr)	98	8.923	8.919	0.004	96	349121	53.5	
$ 8 4-Bromofluorobenzene (Surr	95	11.557	11.560	-0.003	82	127297	52.8	
12 Chloromethane	50		1.771				ND	
13 Vinyl chloride	62		1.905				ND	
15 Bromomethane	94		2.240				ND	
16 Chloroethane	64		2.392				ND	
22 1,1-Dichloroethene	96	3.338	3.341	-0.003	38	2796	1.31	
24 Acetone	43		3.450				ND	
26 Carbon disulfide	76		3.621				ND	
31 Methylene Chloride	84	4.141	4.132	0.009	80	5639	2.28	
33 Acrylonitrile	53		4.515				ND	
34 trans-1,2-Dichloroethene	96	4.549	4.551	-0.002	51	2370	1.09	
35 Methyl tert-butyl ether	73		4.570				ND	
37 1,1-Dichloroethane	63	5.188	5.190	-0.002	95	8478	1.97	
45 cis-1,2-Dichloroethene	96	5.936	5.938	-0.002	84	294691	119.7	
46 2-Butanone (MEK)	43		5.951				ND	
49 Chlorobromomethane	128		6.218				ND	
52 Chloroform	83		6.364				ND	
53 1,1,1-Trichloroethane	97	6.514	6.522	-0.008	71	7530	2.47	
56 Carbon tetrachloride	117		6.693				ND	
58 Benzene	78		6.924				ND	
59 1,2-Dichloroethane	62		7.003				ND	
64 Trichloroethene	130	7.664	7.660	0.004	93	64544	30.6	
67 1,2-Dichloropropane	63		7.934				ND	
70 1,4-Dioxane	88		8.019				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
71 Dichlorobromomethane	83		8.220				ND	
74 cis-1,3-Dichloropropene	75		8.664				ND	
75 4-Methyl-2-pentanone (MIBK	43		8.816				ND	
76 Toluene	91		8.986				ND	
77 trans-1,3-Dichloropropene	75		9.242				ND	
79 1,1,2-Trichloroethane	97		9.436				ND	
80 Tetrachloroethene	164	9.507	9.503	0.004	93	11140	7.29	
82 2-Hexanone	43		9.649				ND	
84 Chlorodibromomethane	129		9.801				ND	
85 Ethylene Dibromide	107		9.917				ND	
87 Chlorobenzene	112		10.404				ND	
89 1,1,1,2-Tetrachloroethane	131		10.501				ND	
90 Ethylbenzene	106		10.501				ND	
91 m-Xylene & p-Xylene	106		10.635				ND	
92 o-Xylene	106		11.018				ND	
93 Styrene	104		11.036				ND	
94 Bromoform	173		11.225				ND	
99 1,1,2,2-Tetrachloroethane	83		11.700				ND	
S 133 Xylenes, Total	106		1.000				ND	

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

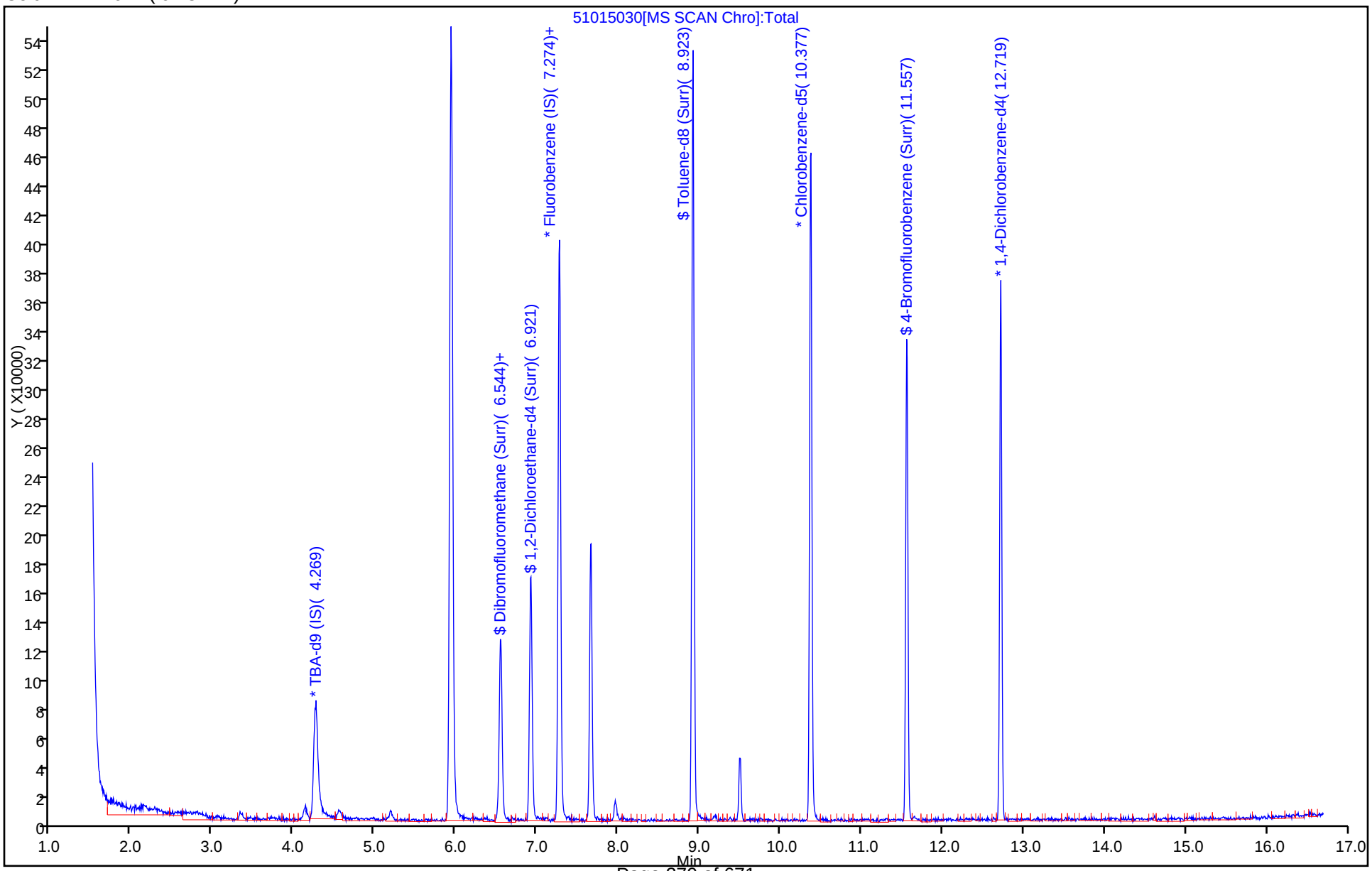
Report Date: 17-Oct-2016 08:26:08 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D

Injection Date:	16-Oct-2016 00:33:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	180-59749-A-4	Lab Sample ID:	180-59749-4	Worklist Smp#:	30
Client ID:	HD-MW-127-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	10.0000	ALS Bottle#:	28
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D
Lims ID: 180-59749-A-4
Client ID: HD-MW-127-0/1-0
Sample Type: Client
Inject. Date: 16-Oct-2016 00:33:30 ALS Bottle#: 28 Worklist Smp#: 30
Purge Vol: 5.000 mL Dil. Factor: 10.0000
Sample Info: 180-0013887-030
Misc. Info.: 180-59749-A-4, 10x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:26:08 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:26:08

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	51.2	102.33
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	61.2	122.36
$ 7 Toluene-d8 (Surr)	50.0	53.5	107.07
$ 8 4-Bromofluorobenzene (Surr)	50.0	52.8	105.66

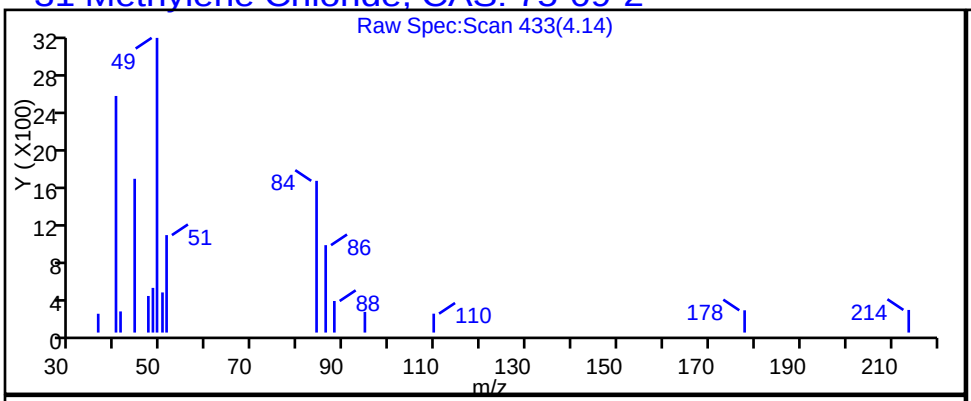
Report Date: 17-Oct-2016 08:26:09 Chrom Revision: 2.2 08-Sep-2016 14:45:52

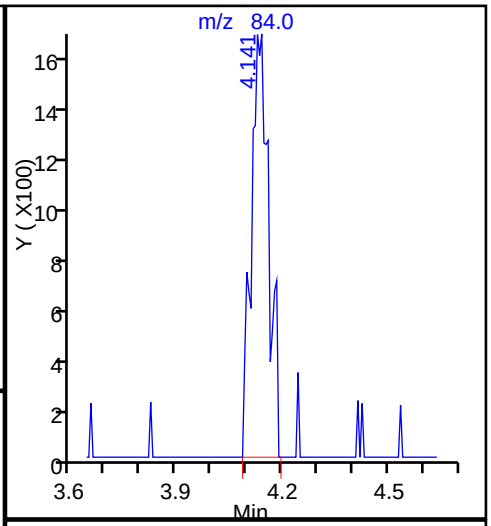
TestAmerica Pittsburgh

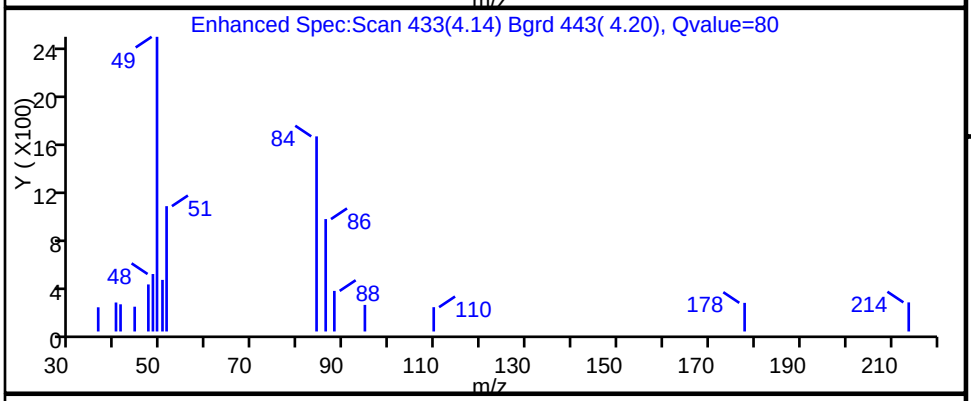
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D

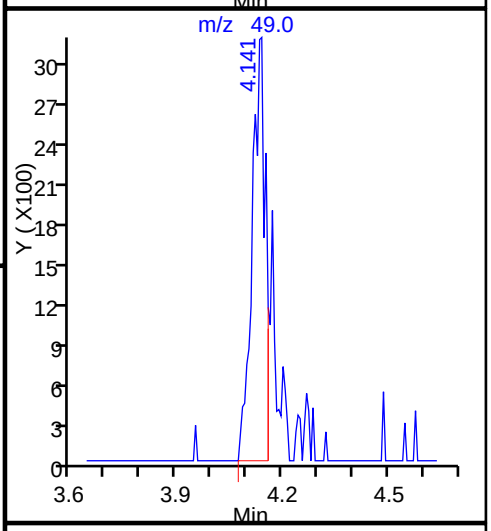
Injection Date:	16-Oct-2016 00:33:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-4	Lab Sample ID:	180-59749-4		
Client ID:	HD-MW-127-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	30
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

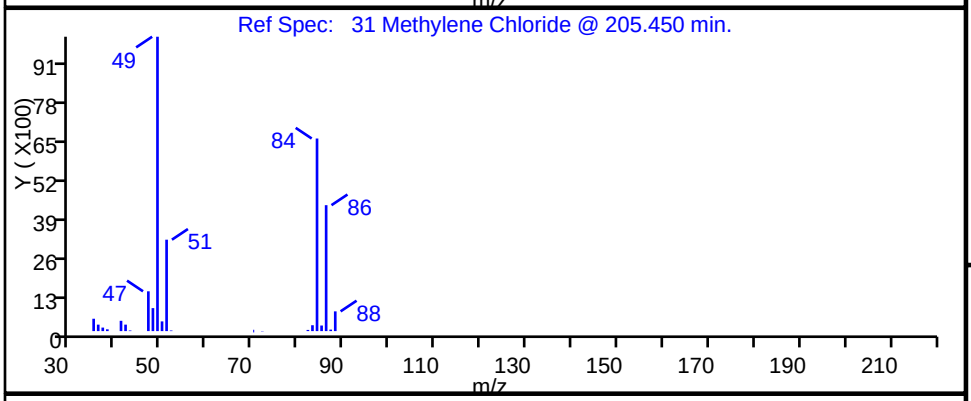
31 Methylene Chloride, CAS: 75-09-2

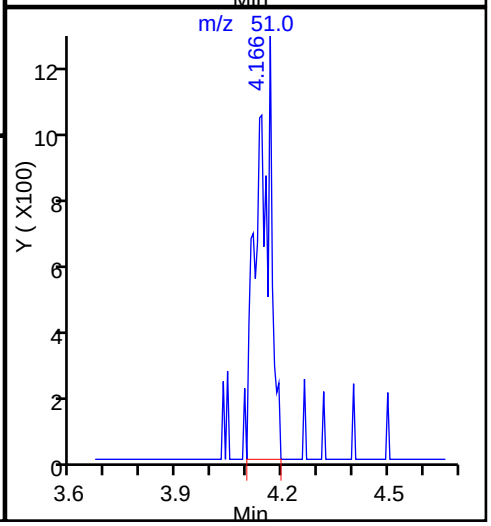


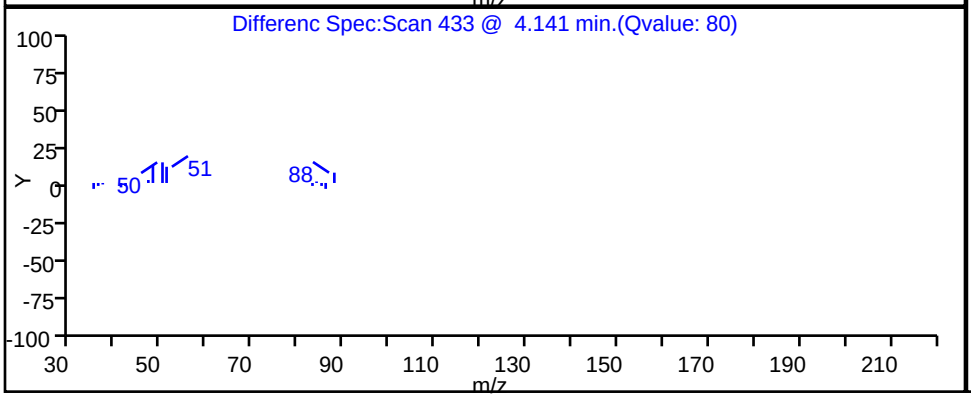












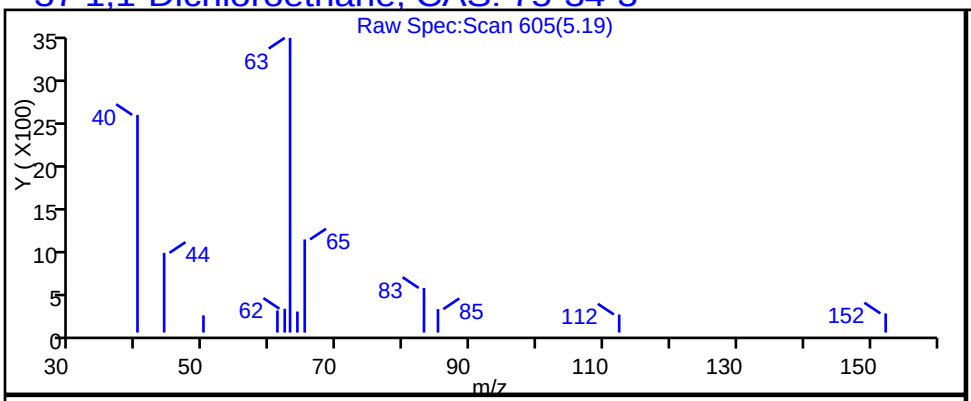
Report Date: 17-Oct-2016 08:26:09 Chrom Revision: 2.2 08-Sep-2016 14:45:52

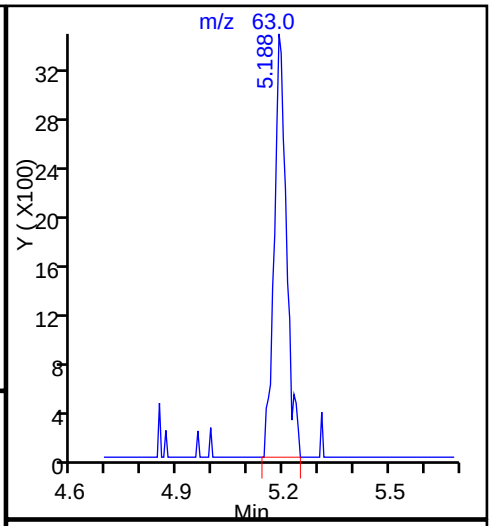
TestAmerica Pittsburgh

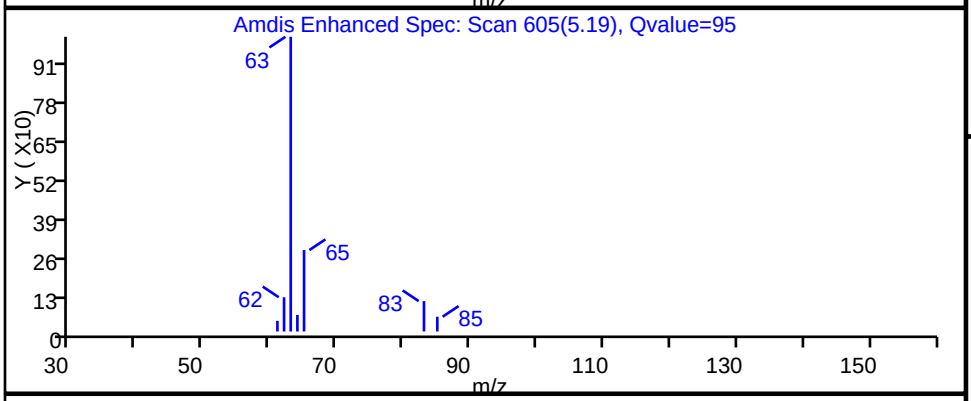
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D

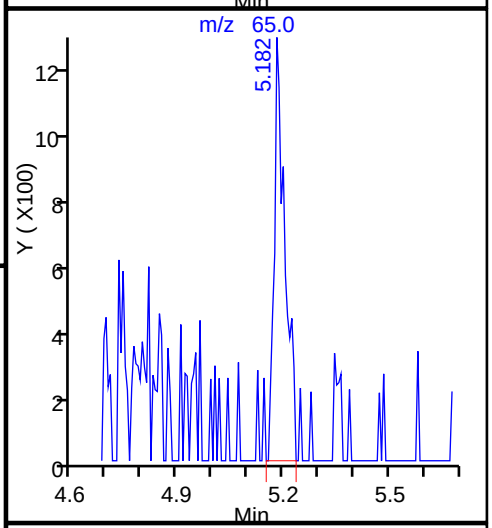
Injection Date:	16-Oct-2016 00:33:30	Instrument ID:	CHHP5
Lims ID:	180-59749-A-4	Lab Sample ID:	180-59749-4
Client ID:	HD-MW-127-0/1-0		
Operator ID:	001562	ALS Bottle#:	28 Worklist Smp#: 30
Purge Vol:	5.000 mL	Dil. Factor:	10.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

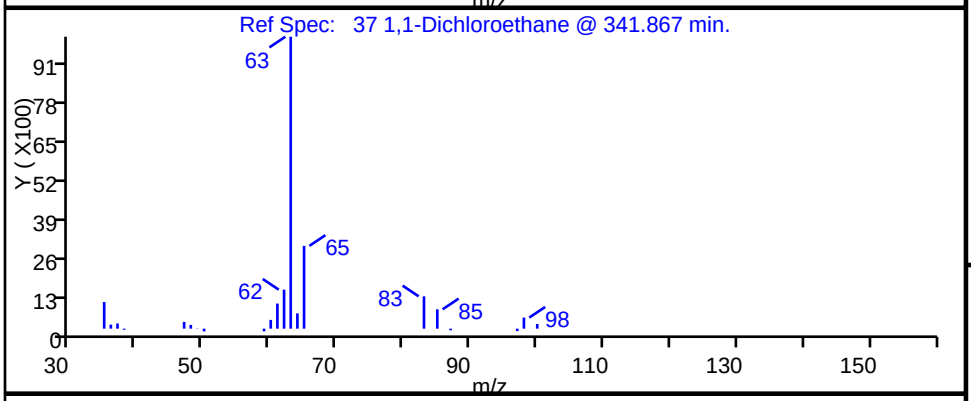
37 1,1-Dichloroethane, CAS: 75-34-3

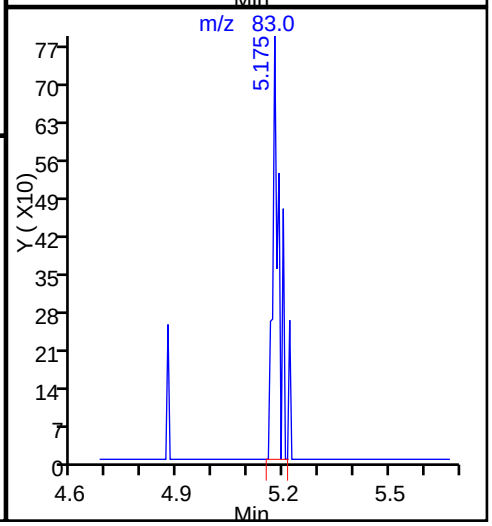


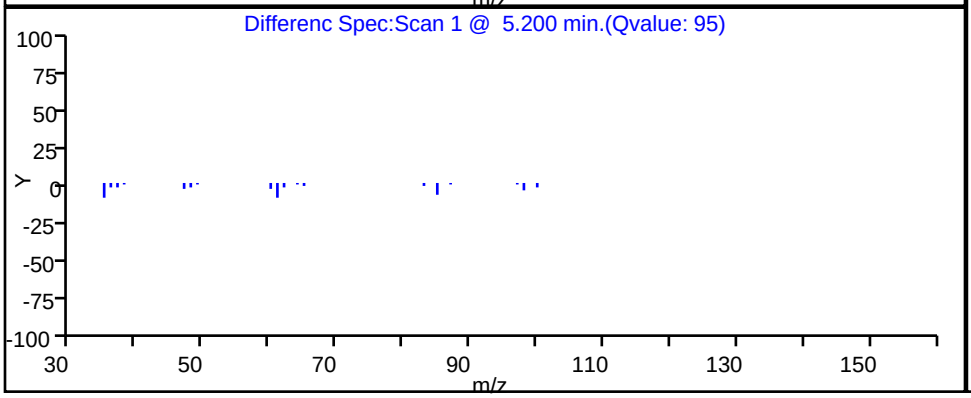










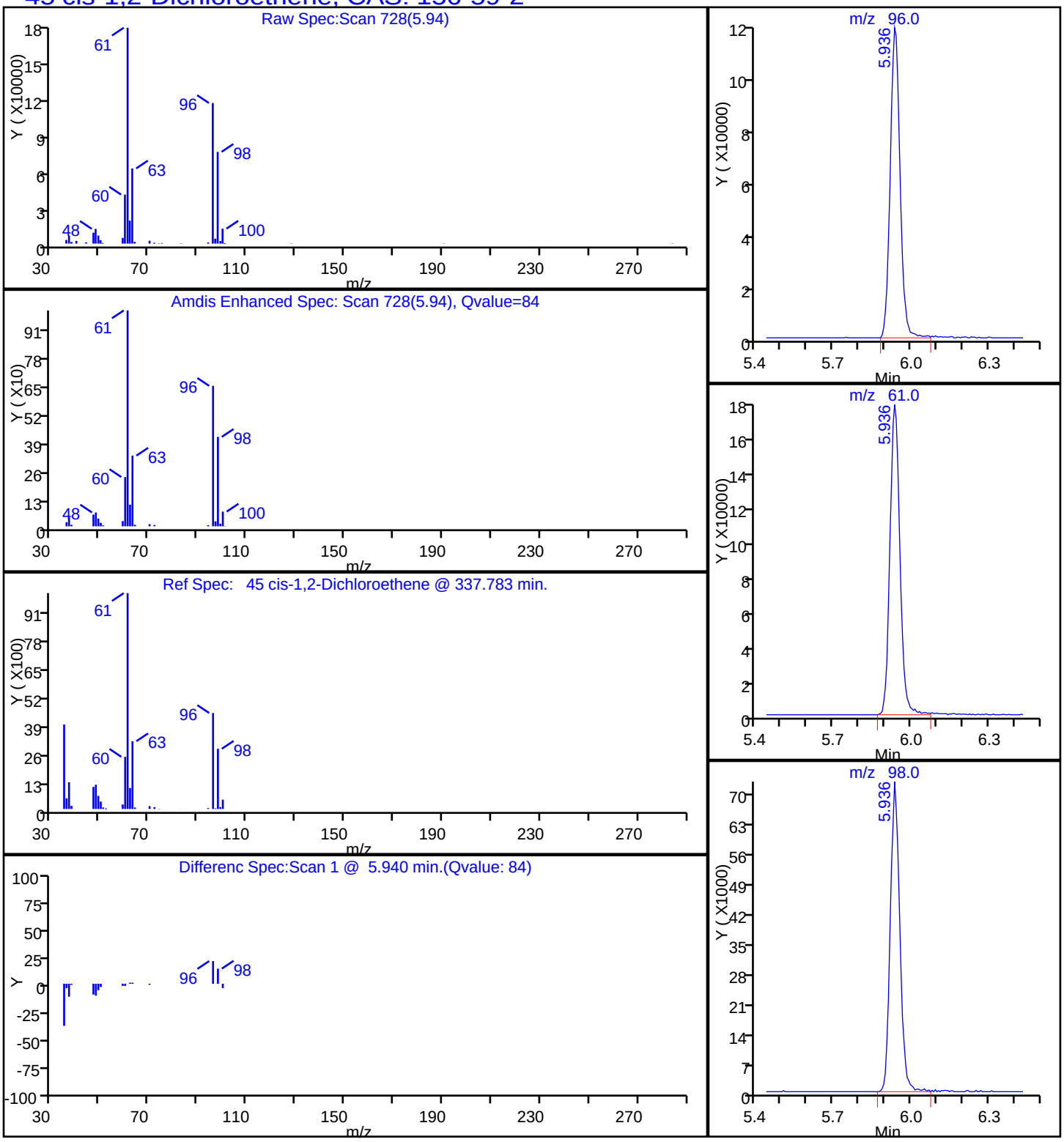


Report Date: 17-Oct-2016 08:26:09 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D				
Injection Date:	16-Oct-2016 00:33:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-4	Lab Sample ID:	180-59749-4		
Client ID:	HD-MW-127-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	30
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

45 cis-1,2-Dichloroethene, CAS: 156-59-2



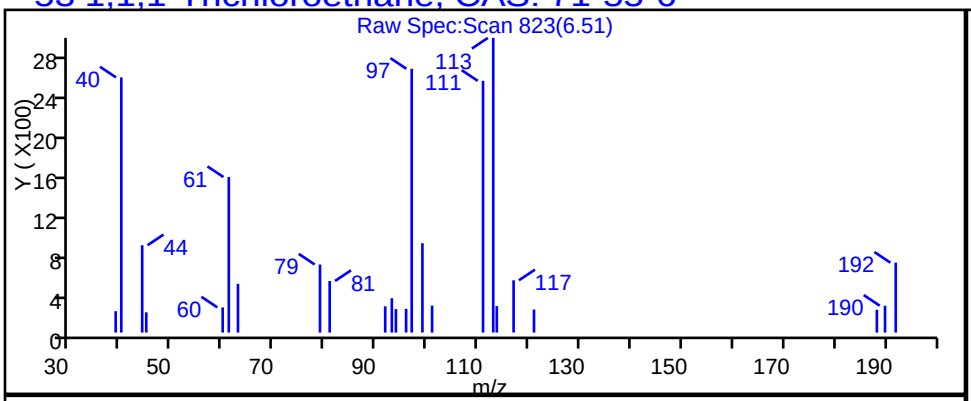
Report Date: 17-Oct-2016 08:26:09 Chrom Revision: 2.2 08-Sep-2016 14:45:52

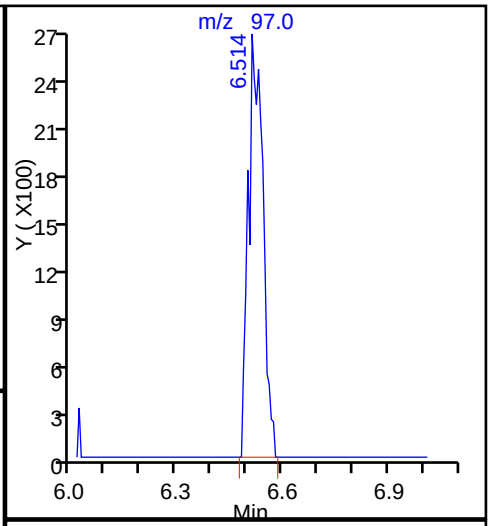
TestAmerica Pittsburgh

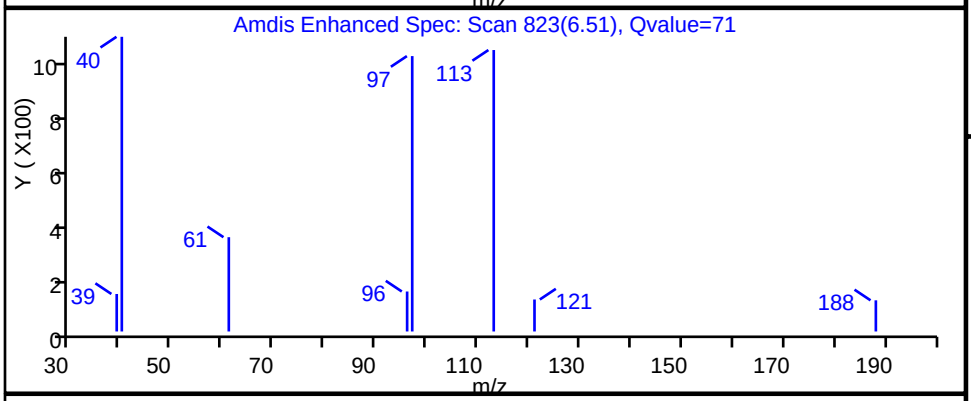
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D

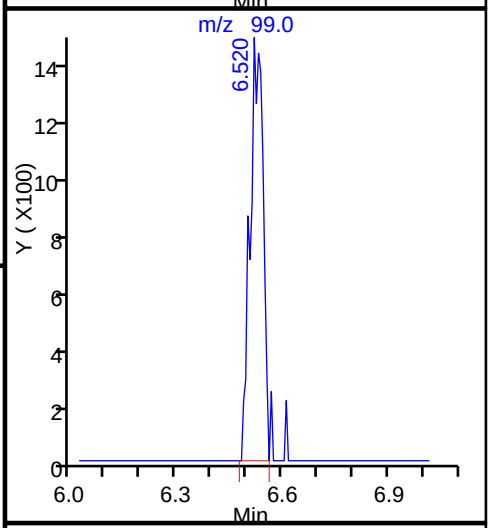
Injection Date:	16-Oct-2016 00:33:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-4	Lab Sample ID:	180-59749-4		
Client ID:	HD-MW-127-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	30
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

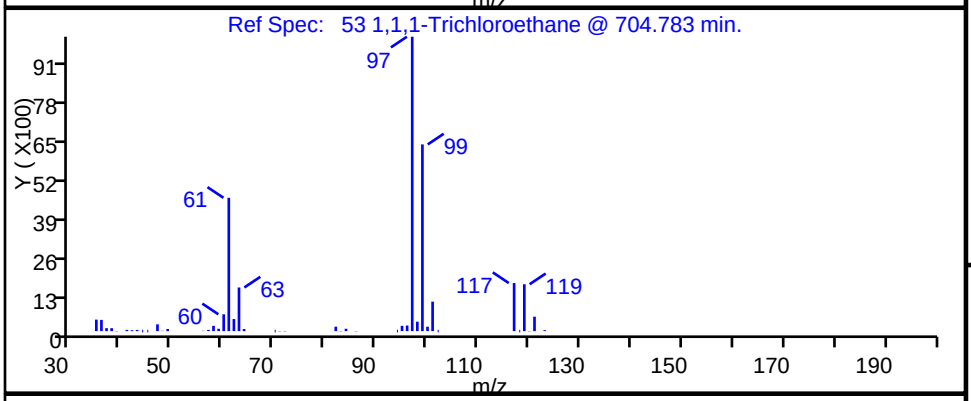
53 1,1,1-Trichloroethane, CAS: 71-55-6

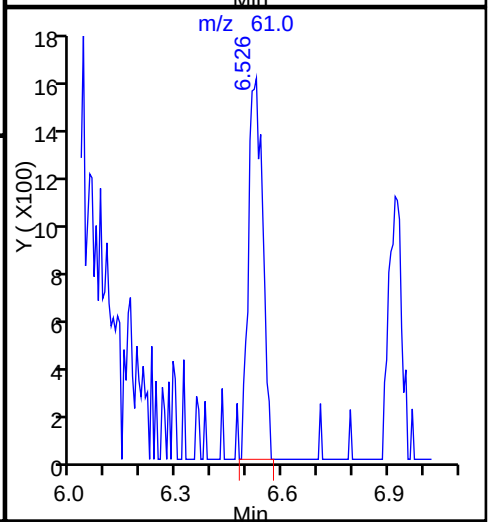


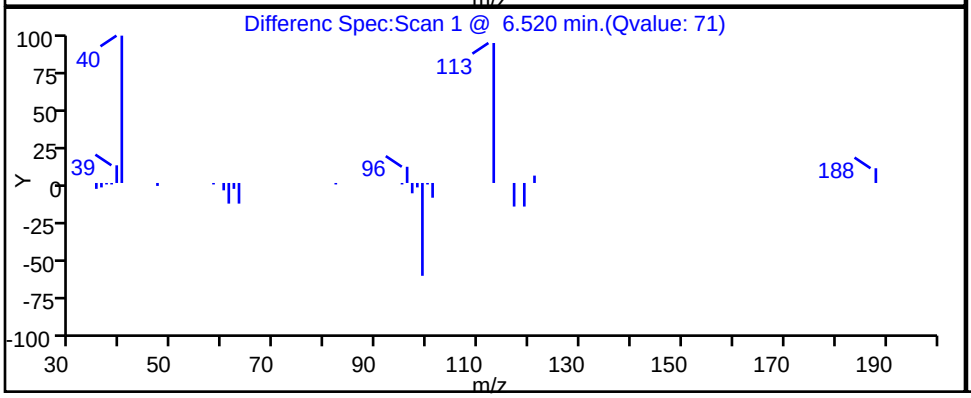










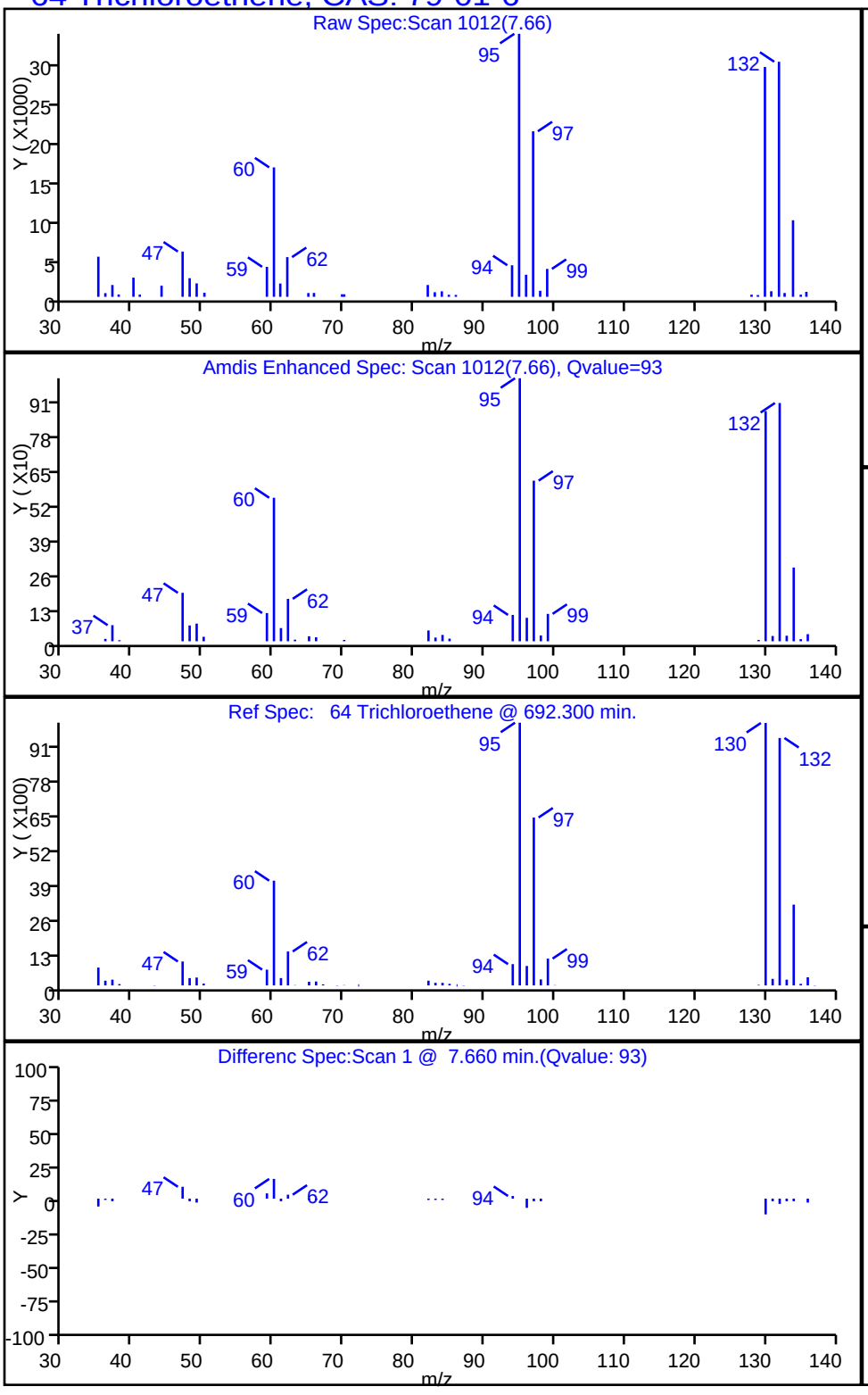


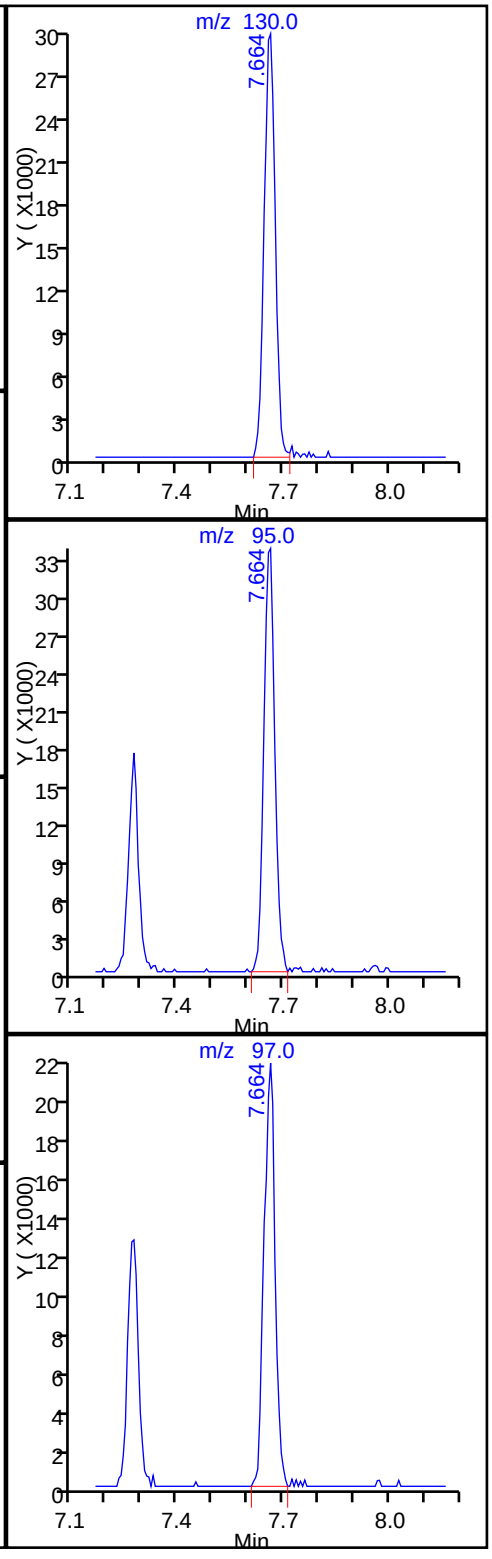
Report Date: 17-Oct-2016 08:26:09 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D				
Injection Date:	16-Oct-2016 00:33:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-4	Lab Sample ID:	180-59749-4		
Client ID:	HD-MW-127-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	30
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

64 Trichloroethene, CAS: 79-01-6





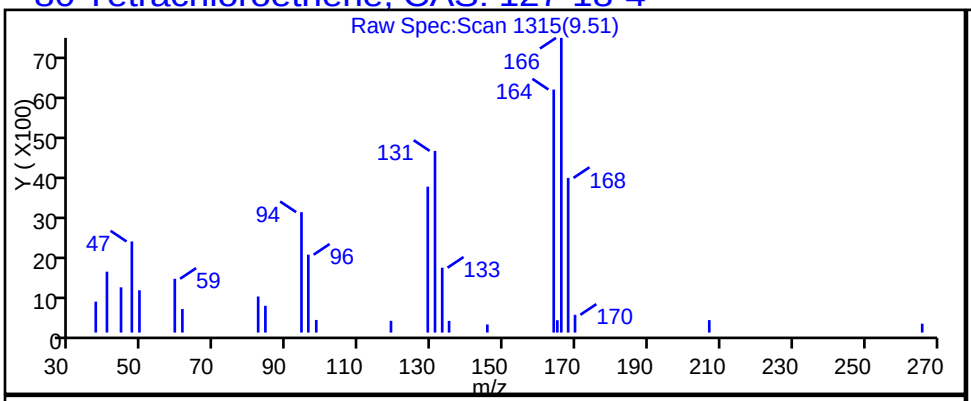
Report Date: 17-Oct-2016 08:26:09 Chrom Revision: 2.2 08-Sep-2016 14:45:52

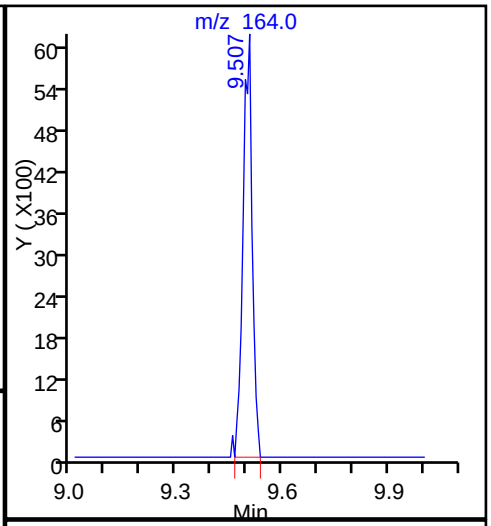
TestAmerica Pittsburgh

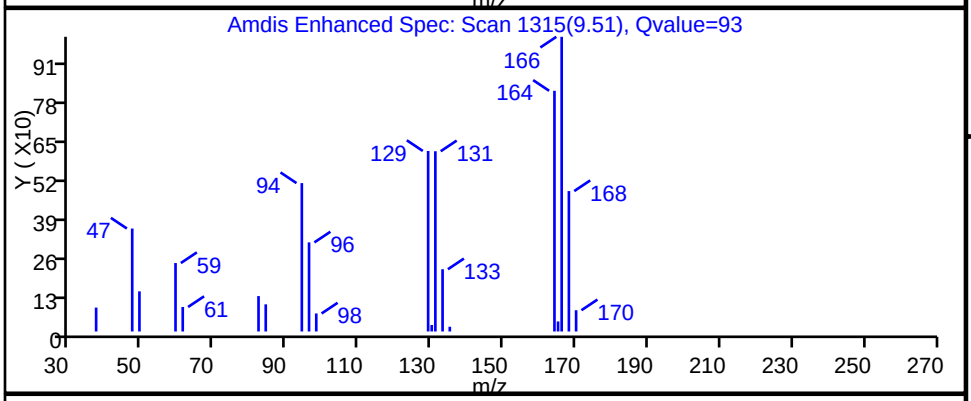
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015030.D

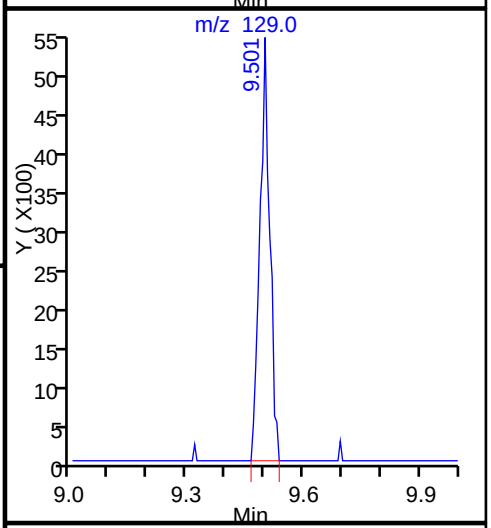
Injection Date:	16-Oct-2016 00:33:30	Instrument ID:	CHHP5
Lims ID:	180-59749-A-4	Lab Sample ID:	180-59749-4
Client ID:	HD-MW-127-0/1-0		
Operator ID:	001562	ALS Bottle#:	28 Worklist Smp#: 30
Purge Vol:	5.000 mL	Dil. Factor:	10.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

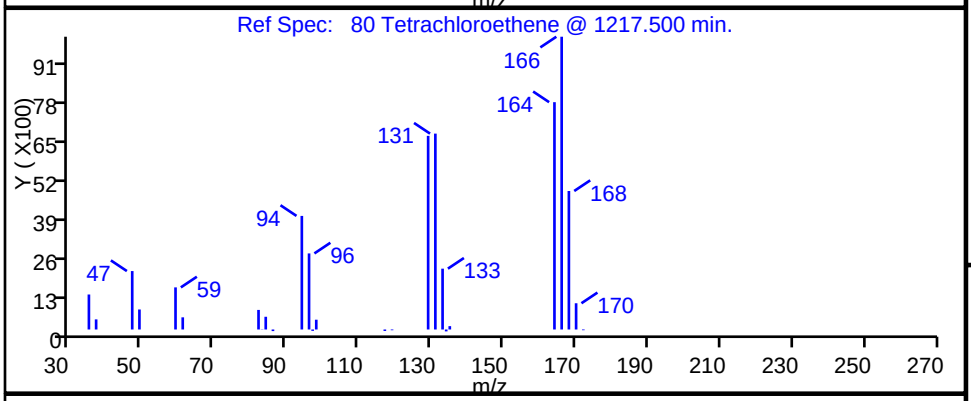
80 Tetrachloroethene, CAS: 127-18-4

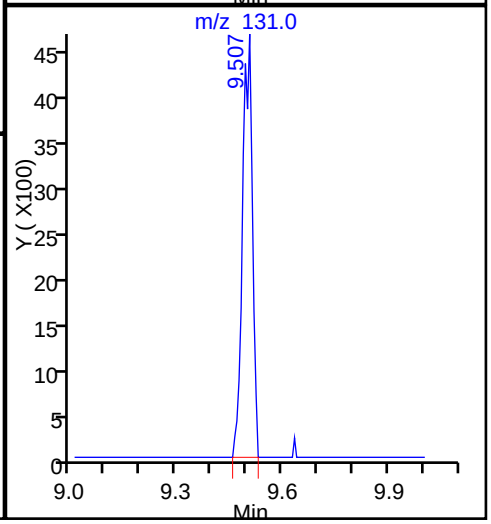


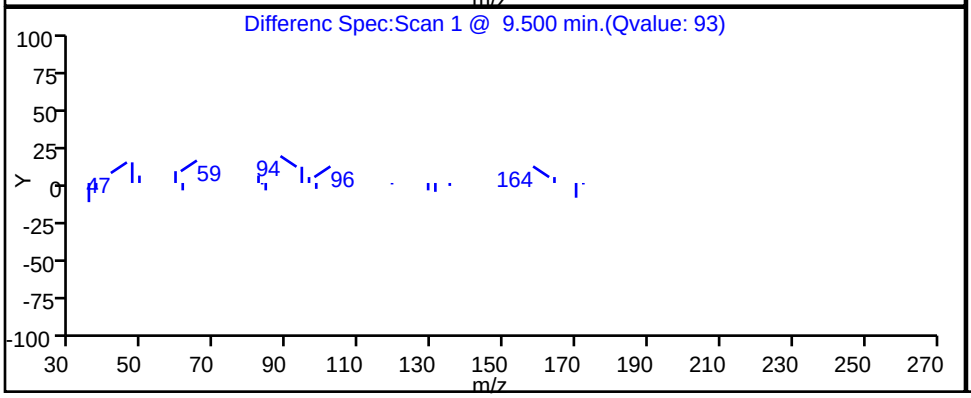












FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-87-0/1-0 | Lab Sample ID: 180-59749-5

Matrix: Water | Lab File ID: 51015031.D

Analysis Method: 8260C | Date Collected: 10/12/2016 11:50

Sample wt/vol: 5(mL) | Date Analyzed: 10/16/2016 00:57

Soil Aliquot Vol: | Dilution Factor: 10

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	10	U	10	2.3
75-01-4	Vinyl chloride	10	U	10	3.2
74-83-9	Bromomethane	10	U	10	3.6
75-00-3	Chloroethane	10	U	10	2.6
75-35-4	1,1-Dichloroethene	2.9	J	10	2.9
67-64-1	Acetone	50	U	50	25
75-15-0	Carbon disulfide	10	U	10	1.8
75-09-2	Methylene Chloride	4.4	J	10	3.6
156-60-5	trans-1,2-Dichloroethene	10	U	10	2.9
1634-04-4	Methyl tert-butyl ether	10	U	10	2.4
75-34-3	1,1-Dichloroethane	5.4	J	10	2.4
156-59-2	cis-1,2-Dichloroethene	300		10	2.9
74-97-5	Bromochloromethane	10	U	10	3.8
78-93-3	2-Butanone (MEK)	50	U	50	12
67-66-3	Chloroform	10	U	10	2.7
71-55-6	1,1,1-Trichloroethane	4.4	J	10	2.2
56-23-5	Carbon tetrachloride	10	U ^c	10	2.4
71-43-2	Benzene	10	U	10	2.6
107-06-2	1,2-Dichloroethane	10	U	10	2.5
79-01-6	Trichloroethene	110		10	2.6
78-87-5	1,2-Dichloropropane	10	U	10	2.3
75-27-4	Bromodichloromethane	10	U	10	2.3
10061-01-5	cis-1,3-Dichloropropene	10	U ^c	10	2.1
108-10-1	4-Methyl-2-pentanone (MIBK)	50	U	50	5.9
108-88-3	Toluene	10	U	10	2.8
10061-02-6	trans-1,3-Dichloropropene	10	U ^c	10	2.4
79-00-5	1,1,2-Trichloroethane	10	U	10	3.5
127-18-4	Tetrachloroethene	15		10	2.7
591-78-6	2-Hexanone	50	U	50	7.4
124-48-1	Dibromochloromethane	10	U ^c	10	4.0
106-93-4	1,2-Dibromoethane (EDB)	10	U	10	2.9
108-90-7	Chlorobenzene	10	U	10	3.1
630-20-6	1,1,1,2-Tetrachloroethane	10	U	10	2.0
100-41-4	Ethylbenzene	10	U	10	2.7
1330-20-7	Xylenes, Total	20	U	20	4.8
100-42-5	Styrene	10	U	10	2.6

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-87-0/1-0 | Lab Sample ID: 180-59749-5

Matrix: Water | Lab File ID: 51015031.D

Analysis Method: 8260C | Date Collected: 10/12/2016 11:50

Sample wt/vol: 5(mL) | Date Analyzed: 10/16/2016 00:57

Soil Aliquot Vol: | Dilution Factor: 10

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	10	U ^c	10	2.9
79-34-5	1,1,2,2-Tetrachloroethane	10	U	10	3.5
107-13-1	Acrylonitrile	200	U ^c	200	28
123-91-1	1,4-Dioxane	2000	U	2000	75

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	119		72-134
2037-26-5	Toluene-d8 (Surr)	107		80-120
460-00-4	4-Bromofluorobenzene (Surr)	104		72-120
1868-53-7	Dibromofluoromethane (Surr)	101		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D
Lims ID: 180-59749-A-5
Client ID: HD-MW-87-0/1-0
Sample Type: Client
Inject. Date: 16-Oct-2016 00:57:30 ALS Bottle#: 29 Worklist Smp#: 31
Purge Vol: 5.000 mL Dil. Factor: 10.0000
Sample Info: 180-0013887-031
Misc. Info.: 180-59749-A-5, 10x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:29:54 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:29:54

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.265	4.278	-0.013	0	104893	1000.0	
* 2 Fluorobenzene (IS)	96	7.270	7.271	-0.001	97	372400	50.0	
* 3 Chlorobenzene-d5	119	10.373	10.373	0.000	93	78640	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.715	12.722	-0.007	97	87485	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.546	6.547	-0.001	93	85023	50.7	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.918	6.918	0.000	0	136203	59.7	
$ 7 Toluene-d8 (Surr)	98	8.919	8.919	0.000	96	331884	53.6	
$ 8 4-Bromofluorobenzene (Surr	95	11.559	11.560	-0.001	82	119055	52.1	
12 Chloromethane	50		1.771				ND	
13 Vinyl chloride	62		1.905				ND	
15 Bromomethane	94		2.240				ND	
16 Chloroethane	64		2.392				ND	
22 1,1-Dichloroethene	96	3.377	3.341	0.036	1	3098	1.47	
24 Acetone	43		3.450				ND	
26 Carbon disulfide	76		3.621				ND	
31 Methylene Chloride	84	4.143	4.132	0.011	91	5395	2.20	
33 Acrylonitrile	53		4.515				ND	
34 trans-1,2-Dichloroethene	96		4.551				ND	
35 Methyl tert-butyl ether	73		4.570				ND	
37 1,1-Dichloroethane	63	5.196	5.190	0.006	94	11500	2.70	
45 cis-1,2-Dichloroethene	96	5.932	5.938	-0.006	85	366639	150.3	
46 2-Butanone (MEK)	43		5.951				ND	
49 Chlorobromomethane	128		6.218				ND	
52 Chloroform	83	6.364	6.364	0.000	1	1321	0.3482	M
53 1,1,1-Trichloroethane	97	6.522	6.522	0.000	94	6713	2.22	
56 Carbon tetrachloride	117		6.693				ND	
58 Benzene	78		6.924				ND	
59 1,2-Dichloroethane	62		7.003				ND	
64 Trichloroethene	130	7.660	7.660	0.000	94	118696	56.7	
67 1,2-Dichloropropane	63		7.934				ND	
70 1,4-Dioxane	88		8.019				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
71 Dichlorobromomethane	83		8.220				ND	
74 cis-1,3-Dichloropropene	75		8.664				ND	
75 4-Methyl-2-pentanone (MIBK	43		8.816				ND	
76 Toluene	91		8.986				ND	
77 trans-1,3-Dichloropropene	75		9.242				ND	
79 1,1,2-Trichloroethane	97		9.436				ND	
80 Tetrachloroethene	164	9.497	9.503	-0.006	94	11169	7.70	
82 2-Hexanone	43		9.649				ND	
84 Chlorodibromomethane	129		9.801				ND	
85 Ethylene Dibromide	107		9.917				ND	
87 Chlorobenzene	112		10.404				ND	
89 1,1,1,2-Tetrachloroethane	131		10.501				ND	
90 Ethylbenzene	106		10.501				ND	
91 m-Xylene & p-Xylene	106		10.635				ND	
92 o-Xylene	106		11.018				ND	
93 Styrene	104		11.036				ND	
94 Bromoform	173		11.225				ND	
99 1,1,2,2-Tetrachloroethane	83		11.700				ND	
S 133 Xylenes, Total	106		1.000				ND	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

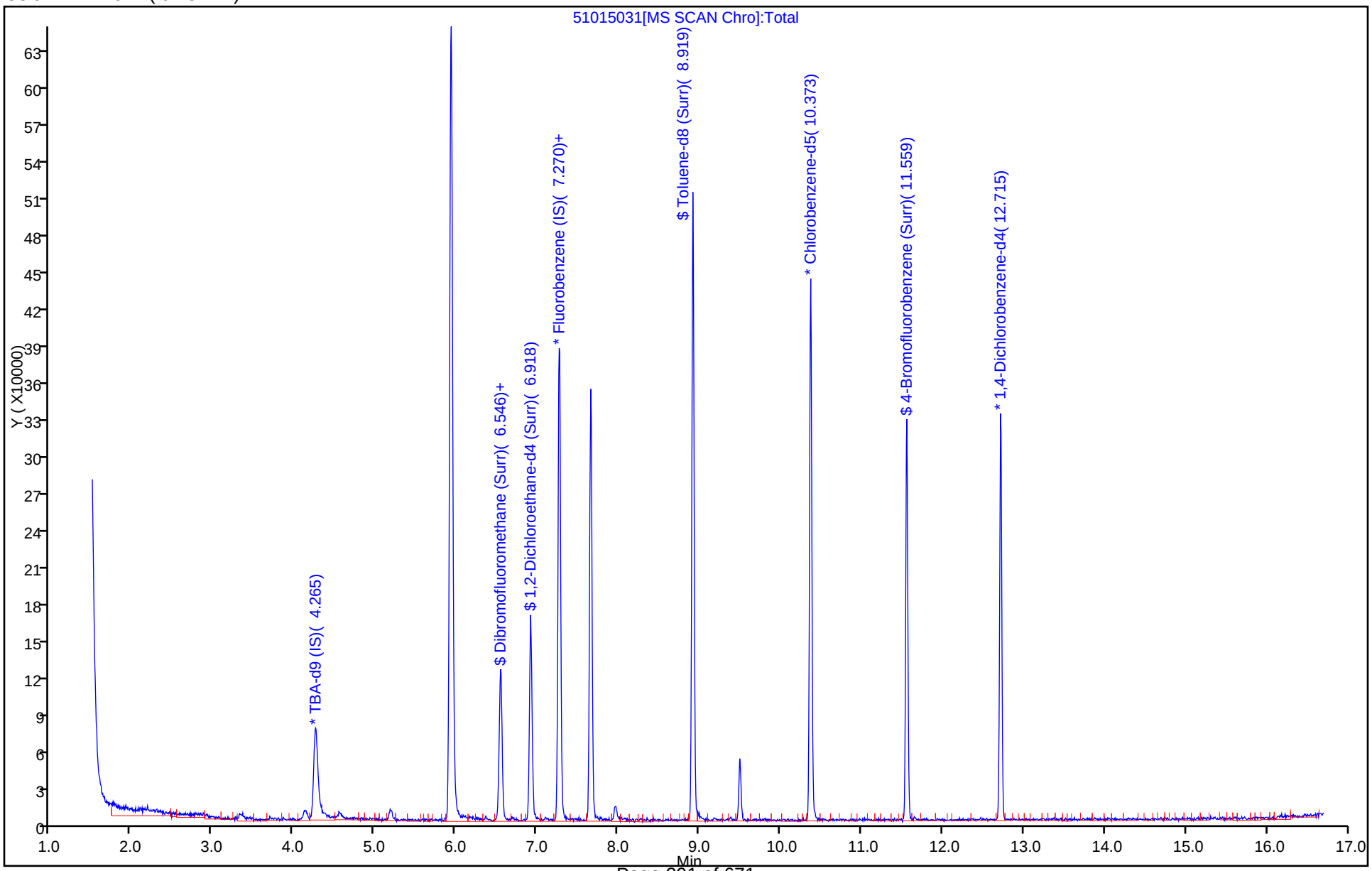
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D

Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5	Worklist Smp#:	31
Client ID:	HD-MW-87-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	10.0000	ALS Bottle#:	29
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D
Lims ID: 180-59749-A-5
Client ID: HD-MW-87-0/1-0
Sample Type: Client
Inject. Date: 16-Oct-2016 00:57:30 ALS Bottle#: 29 Worklist Smp#: 31
Purge Vol: 5.000 mL Dil. Factor: 10.0000
Sample Info: 180-0013887-031
Misc. Info.: 180-59749-A-5, 10x
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 17-Oct-2016 08:29:54 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK001

First Level Reviewer: fergusond Date: 17-Oct-2016 08:29:54

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	50.7	101.30
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	59.7	119.37
$ 7 Toluene-d8 (Surr)	50.0	53.6	107.27
$ 8 4-Bromofluorobenzene (Surr)	50.0	52.1	104.15

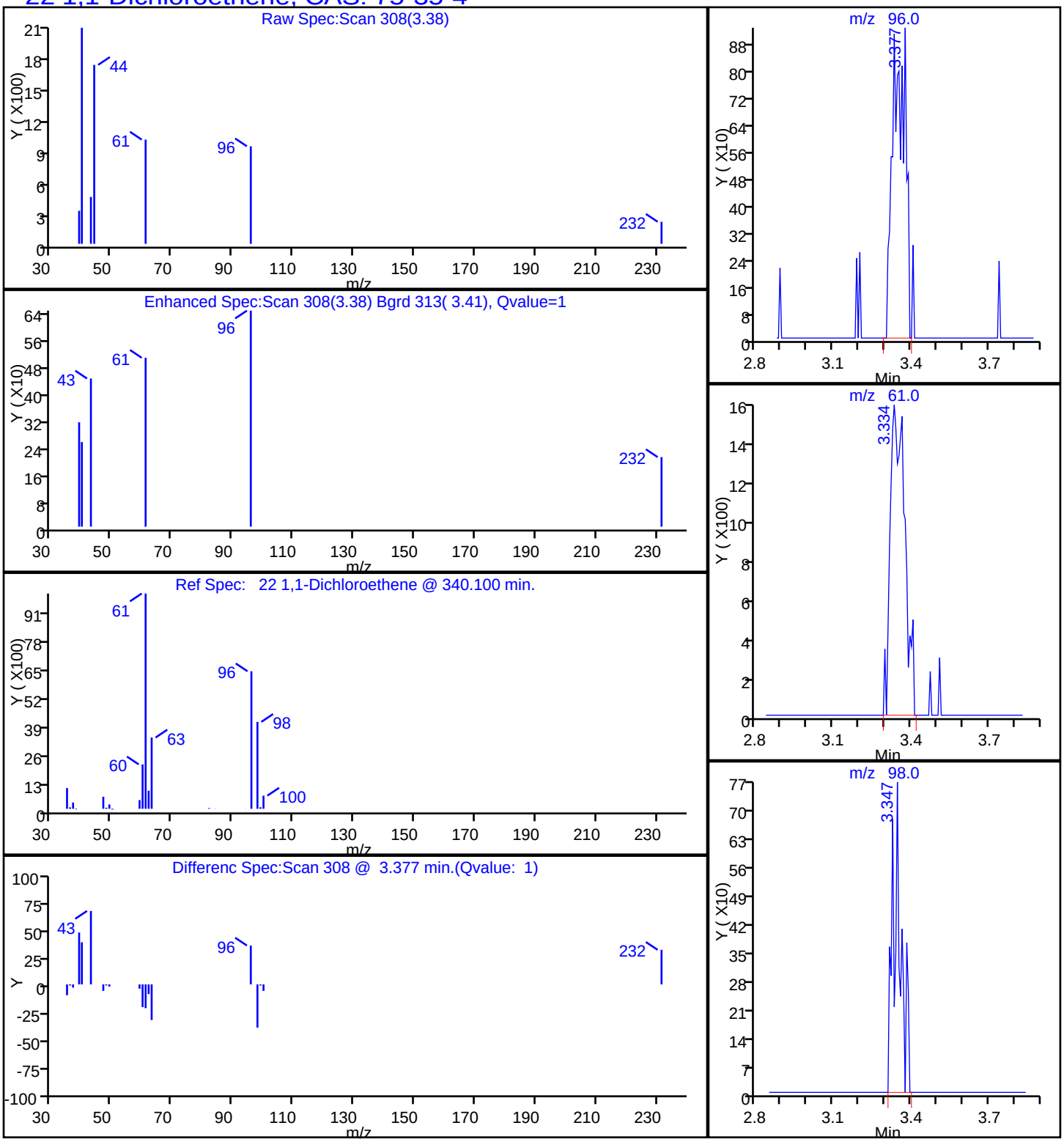
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D

Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

22 1,1-Dichloroethene, CAS: 75-35-4

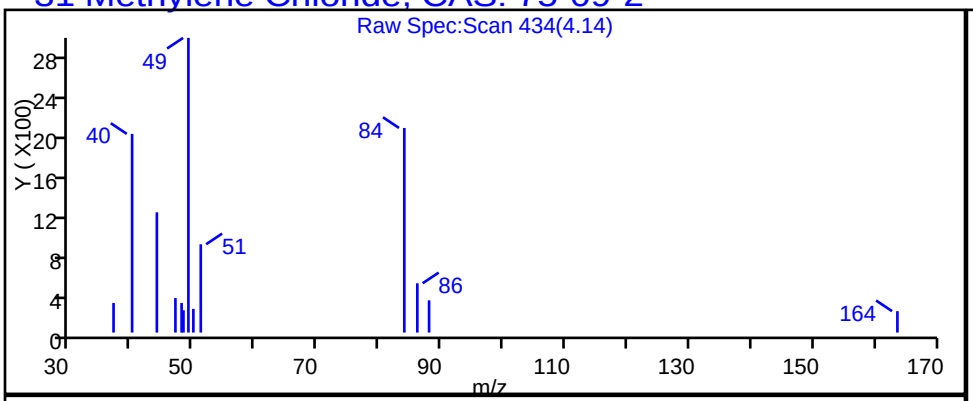


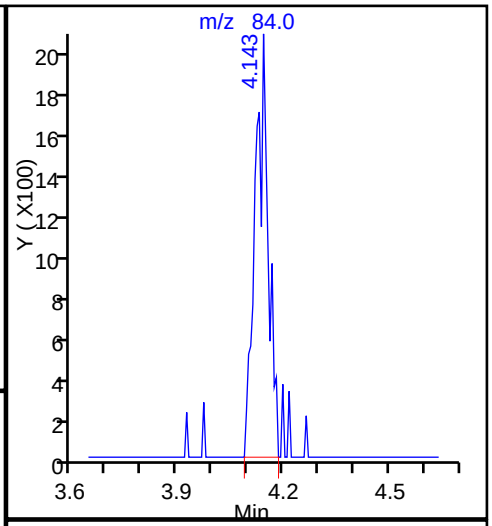
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

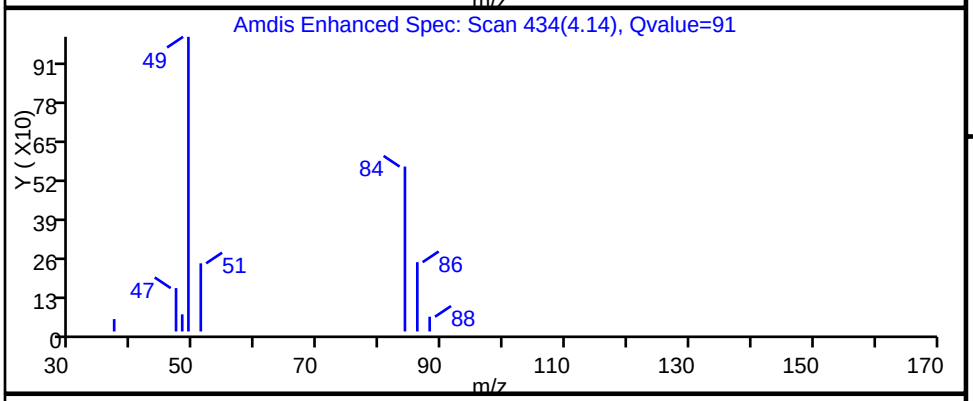
TestAmerica Pittsburgh

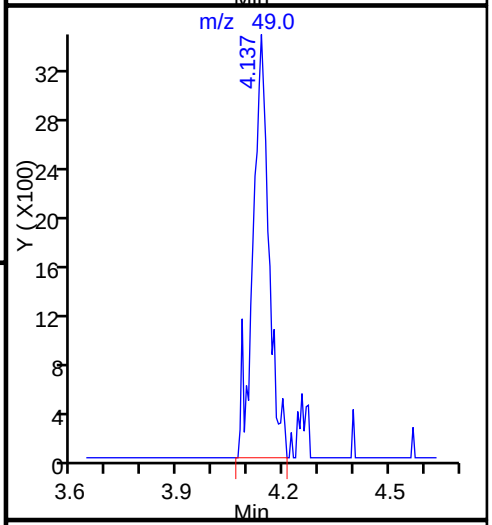
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D				
Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

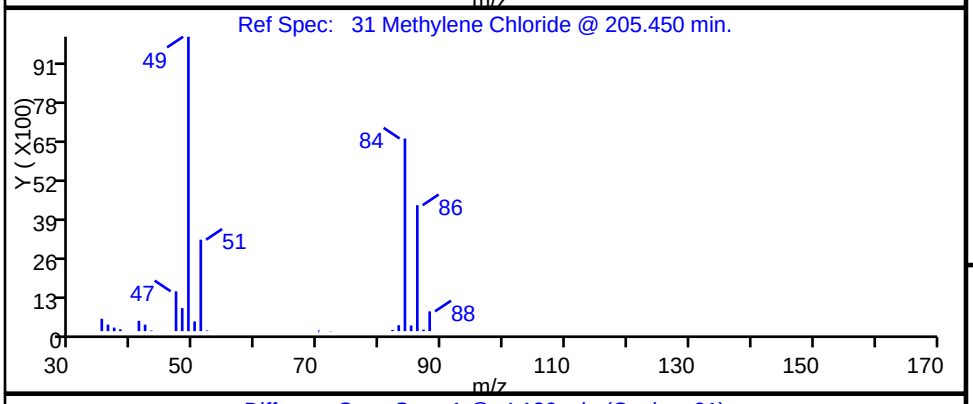
31 Methylene Chloride, CAS: 75-09-2

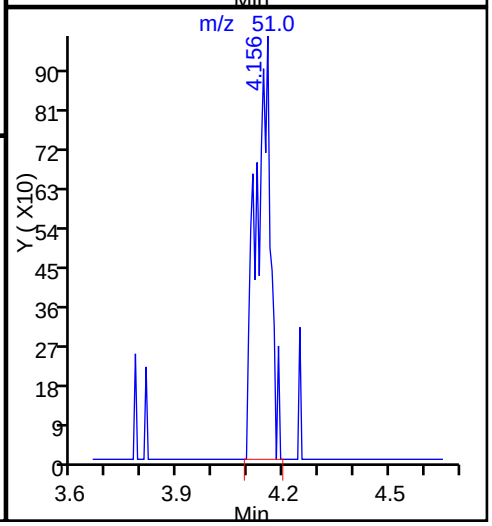


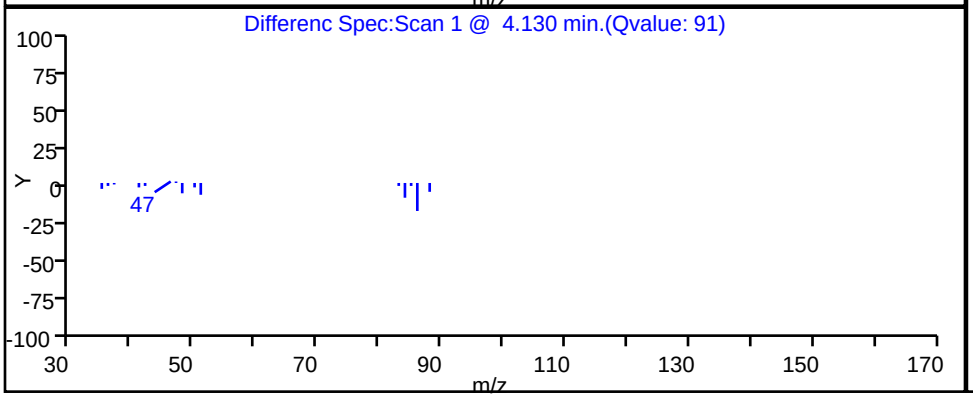












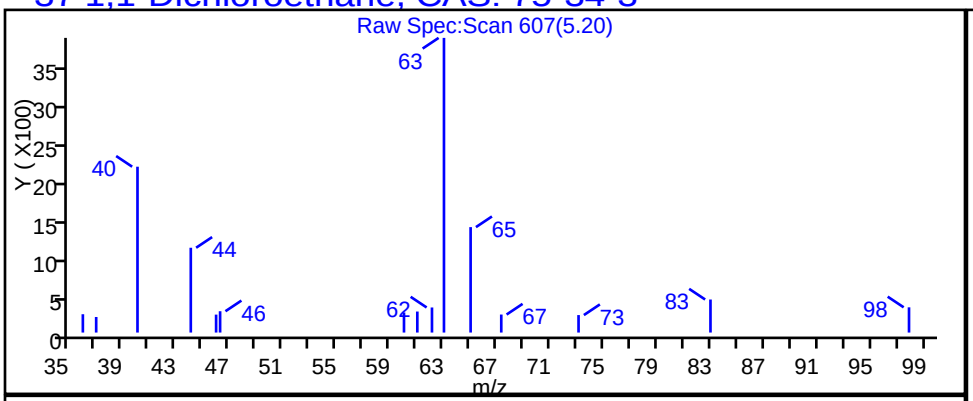
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

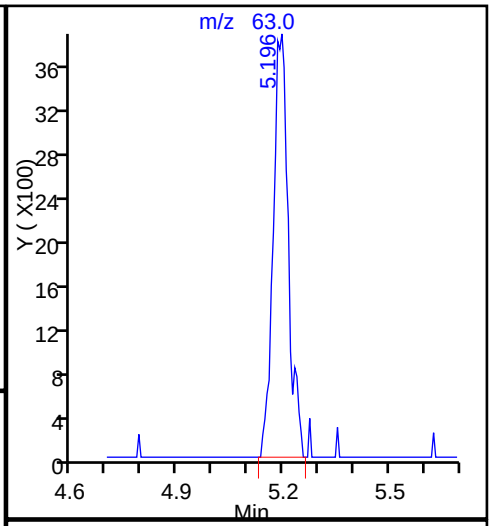
TestAmerica Pittsburgh

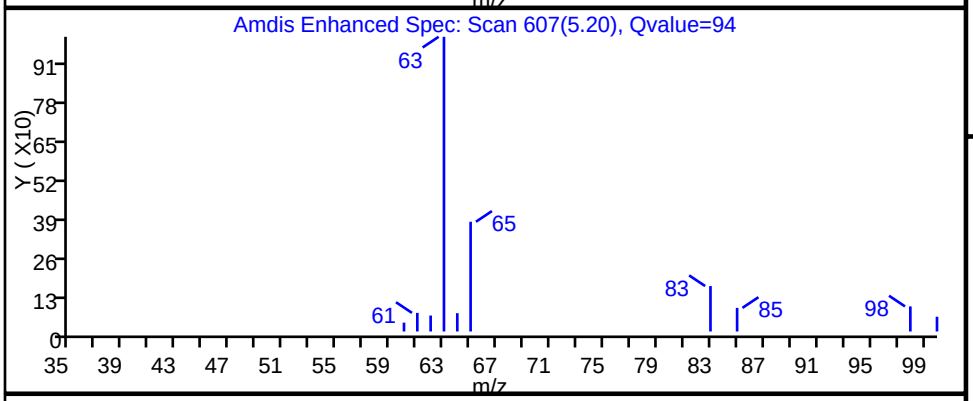
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D

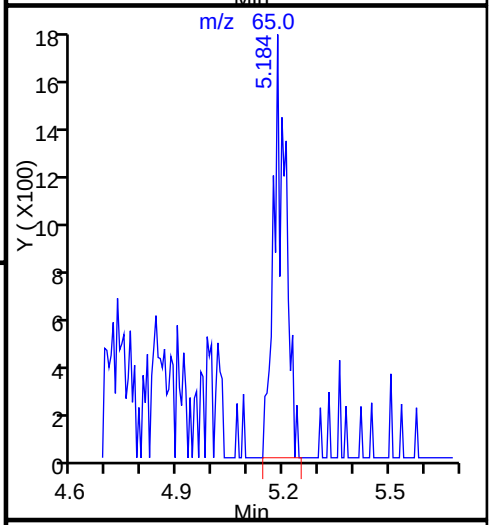
Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

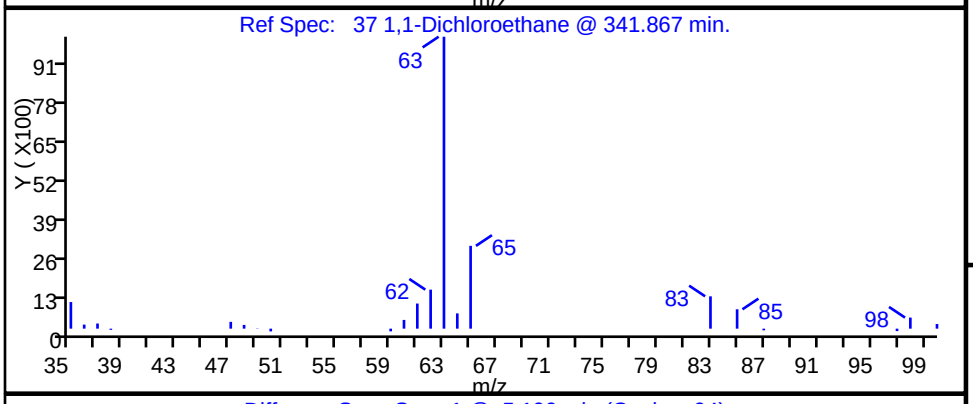
37 1,1-Dichloroethane, CAS: 75-34-3

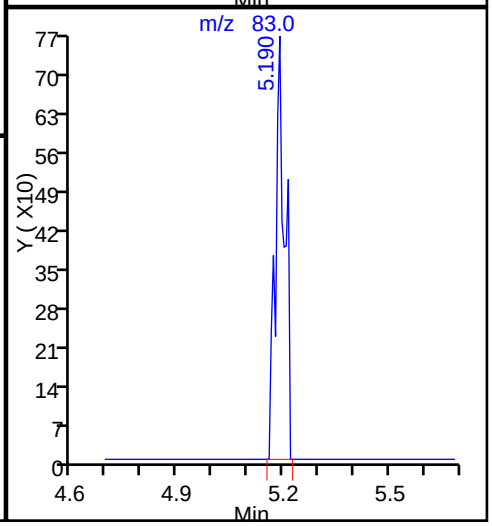


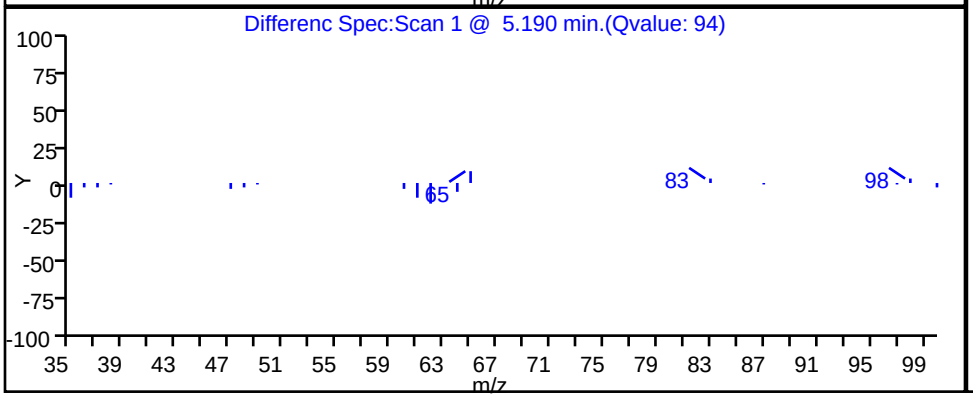












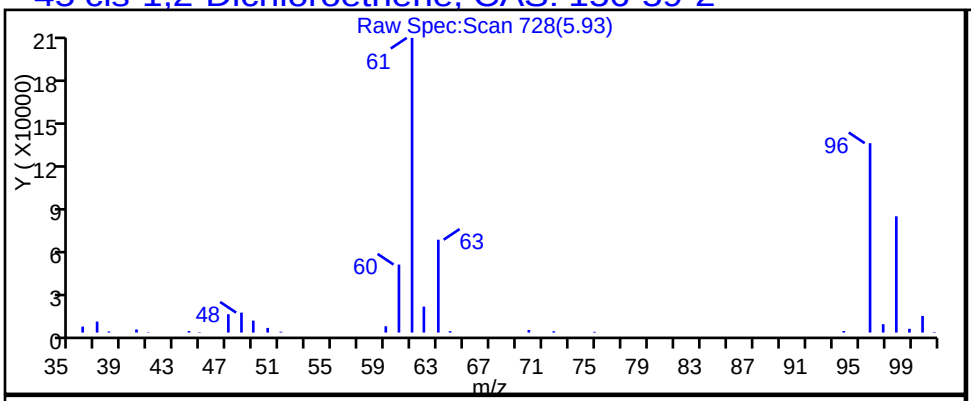
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

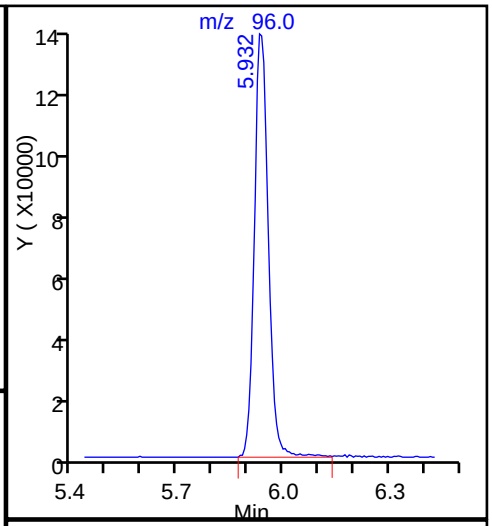
TestAmerica Pittsburgh

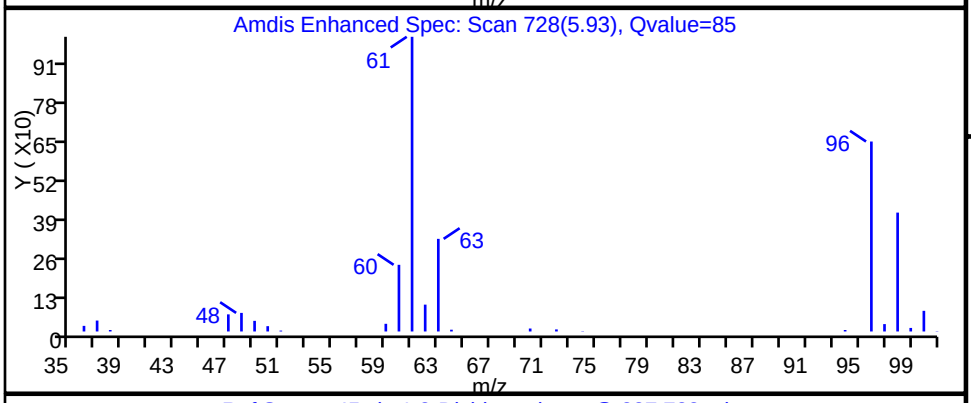
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D

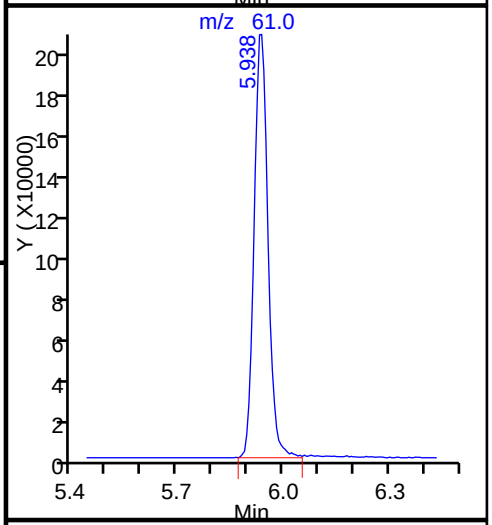
Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

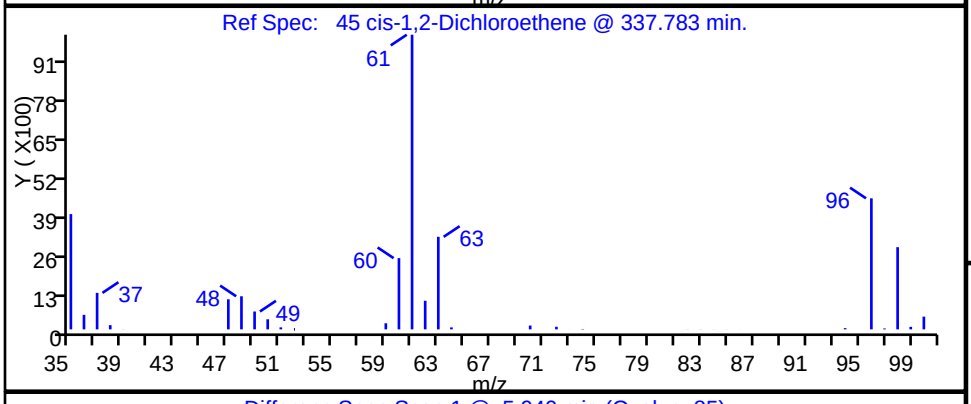
45 cis-1,2-Dichloroethene, CAS: 156-59-2

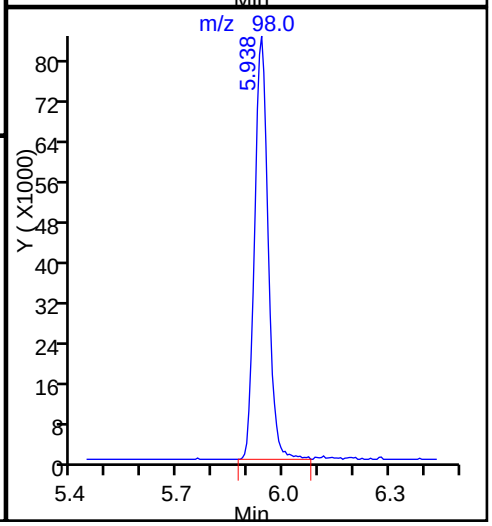


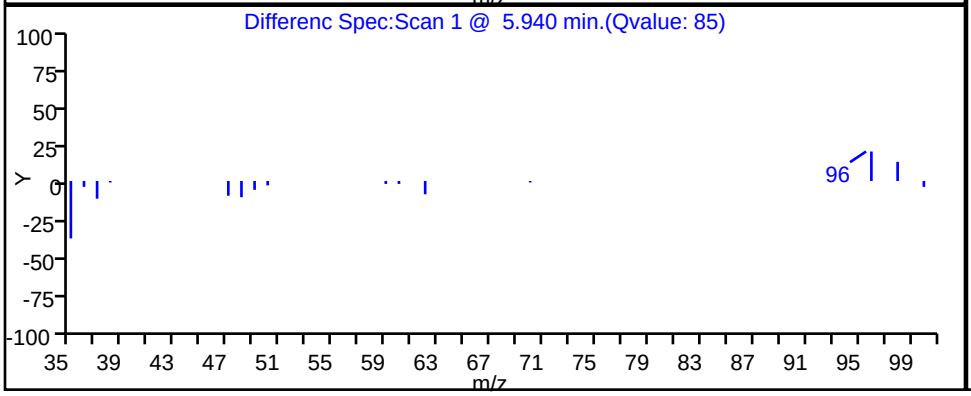










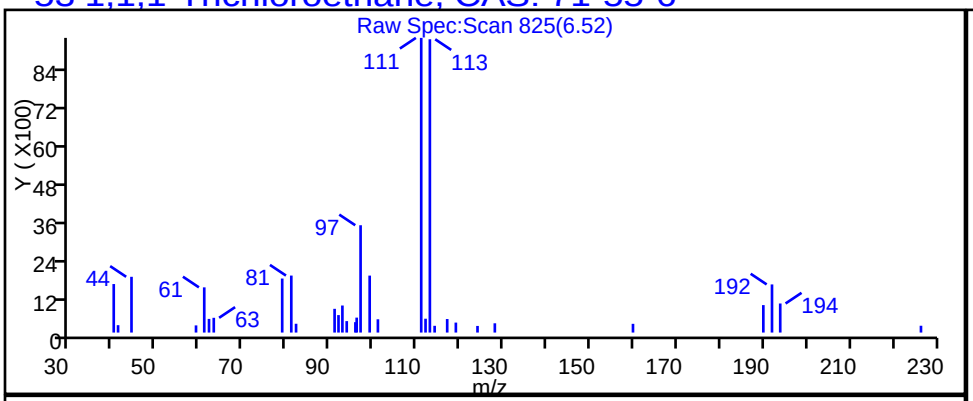


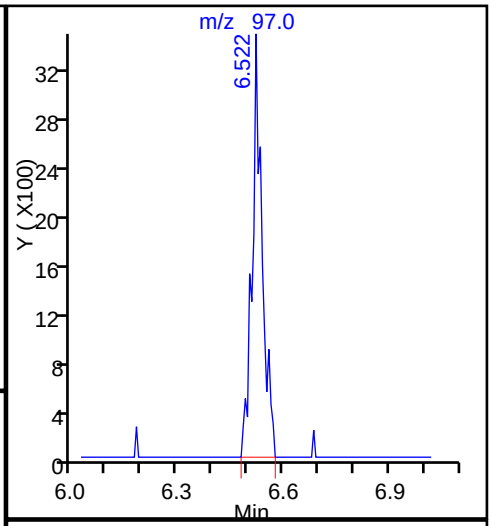
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

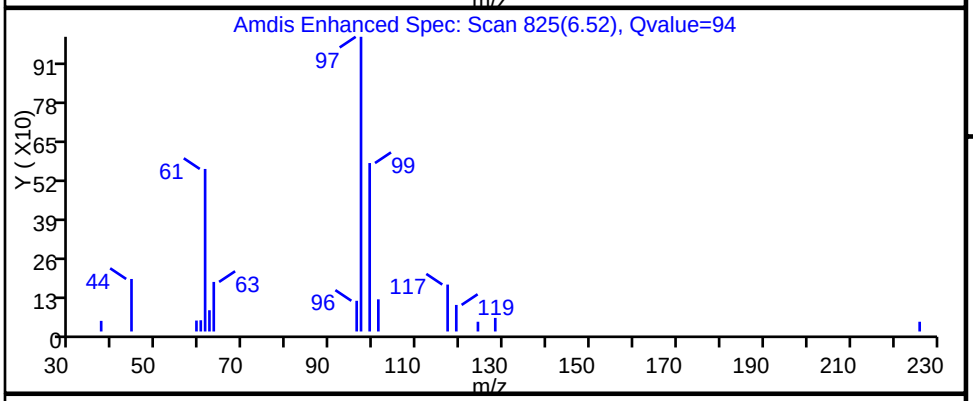
TestAmerica Pittsburgh

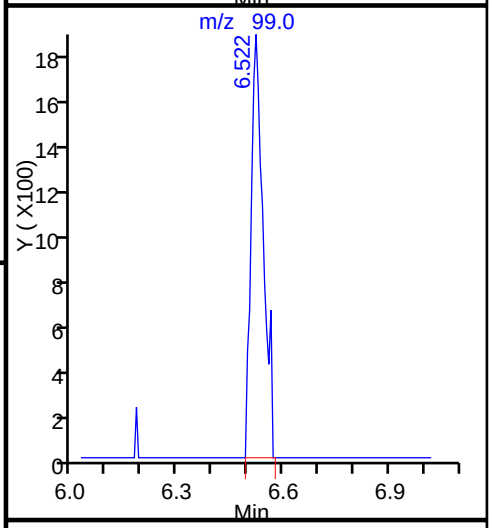
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D				
Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

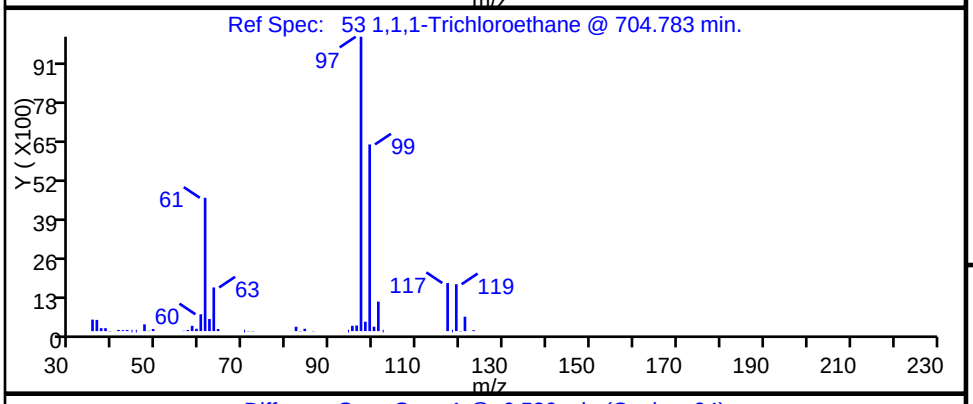
53 1,1,1-Trichloroethane, CAS: 71-55-6

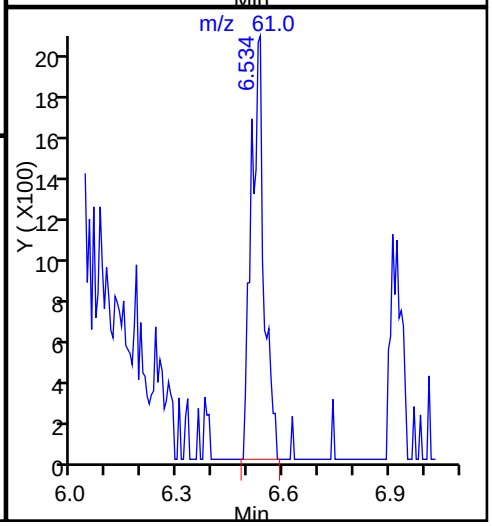


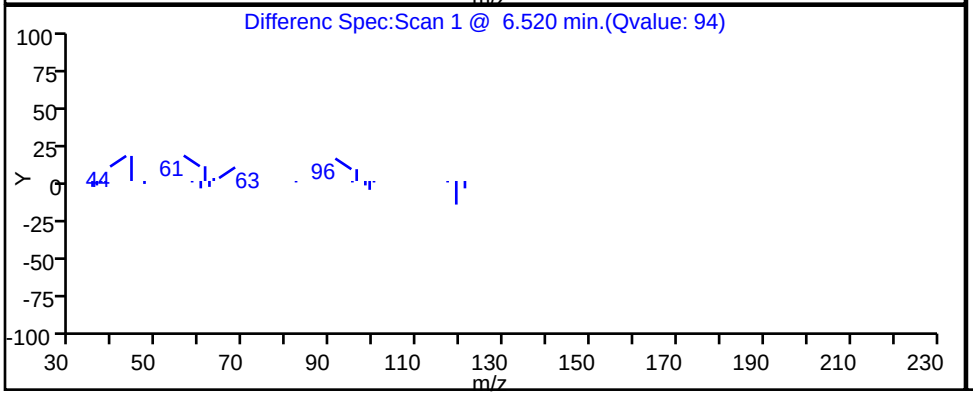












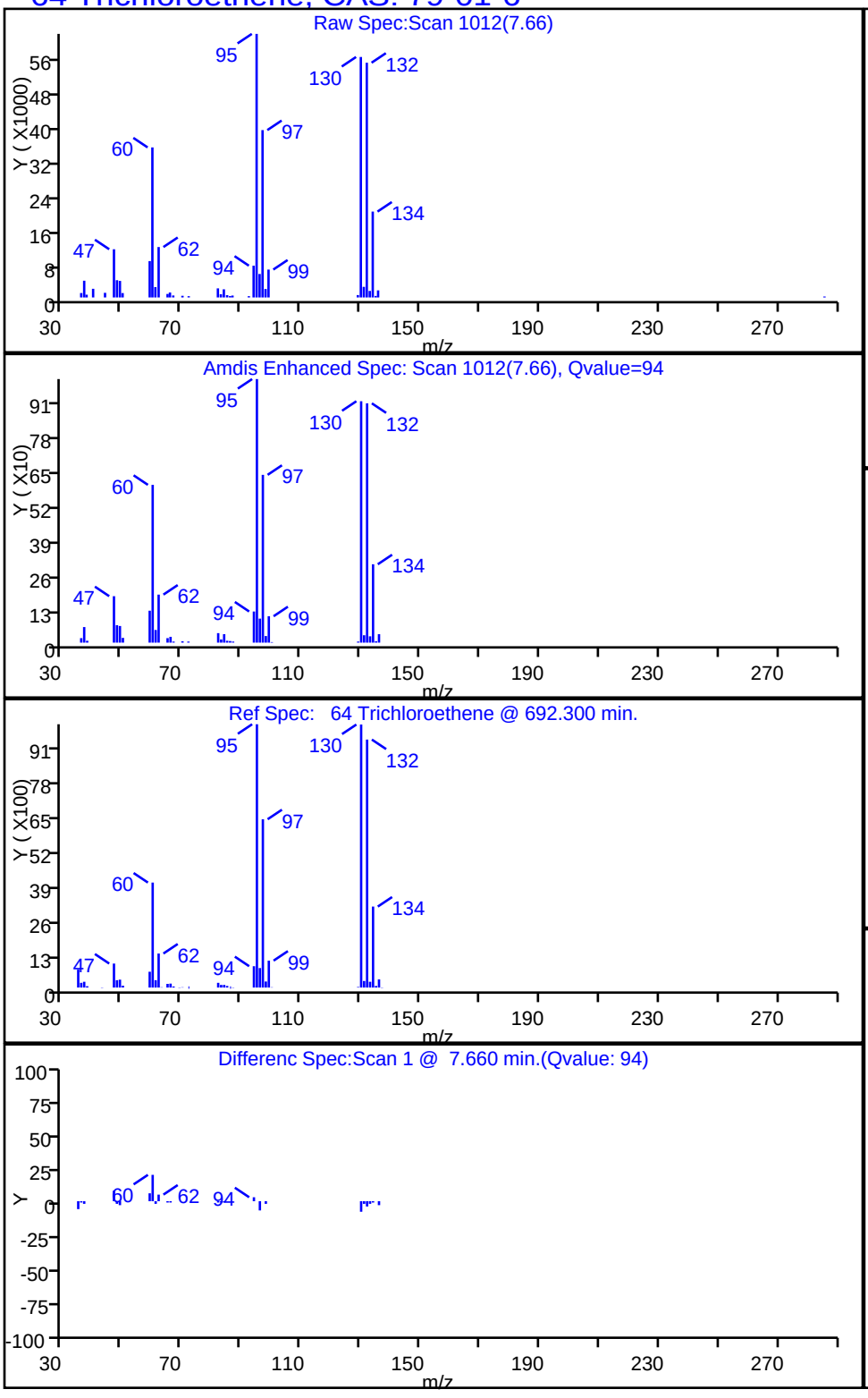
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

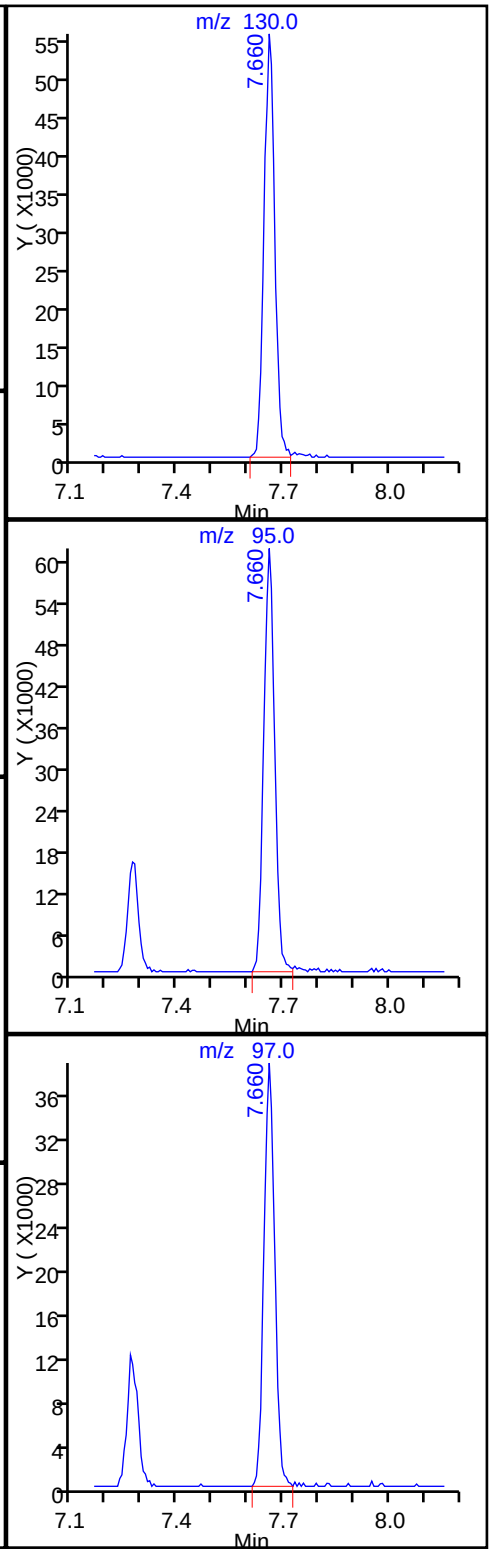
TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D

Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

64 Trichloroethene, CAS: 79-01-6





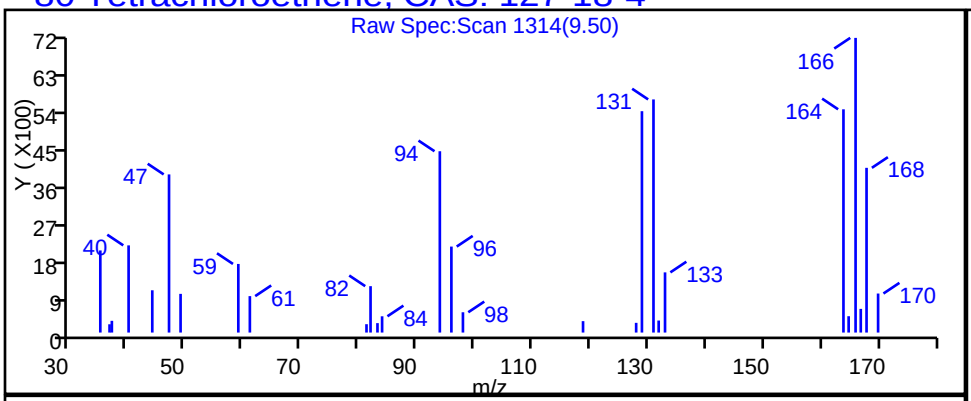
Report Date: 17-Oct-2016 08:29:55 Chrom Revision: 2.2 08-Sep-2016 14:45:52

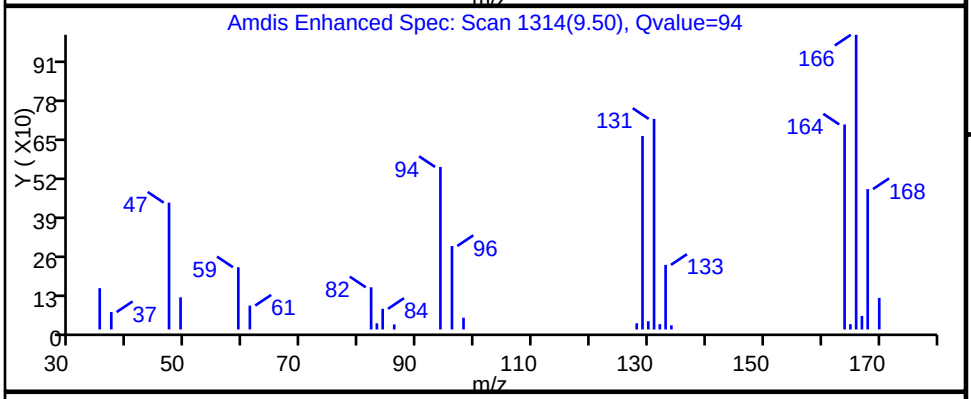
TestAmerica Pittsburgh

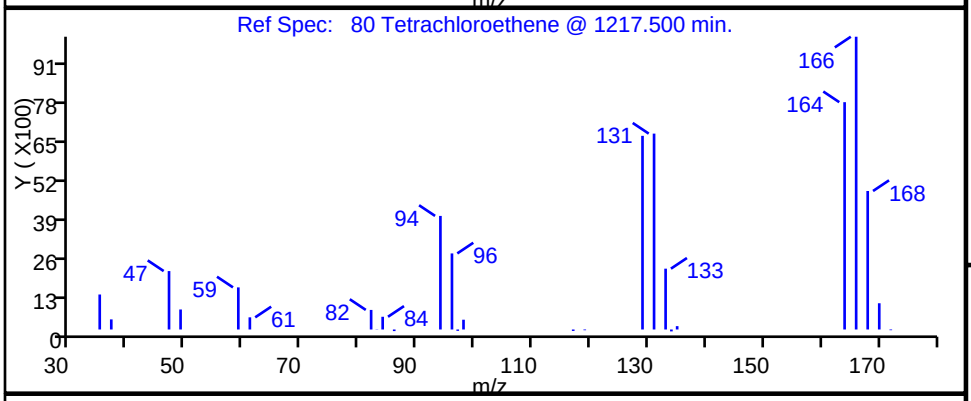
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D

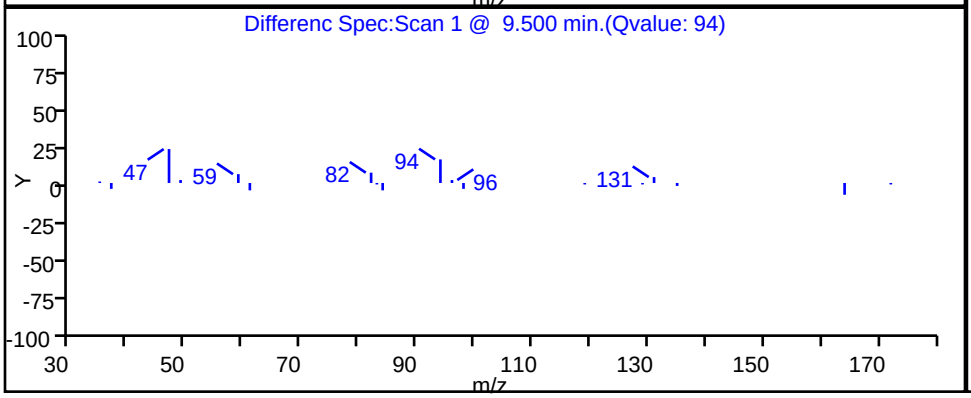
Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

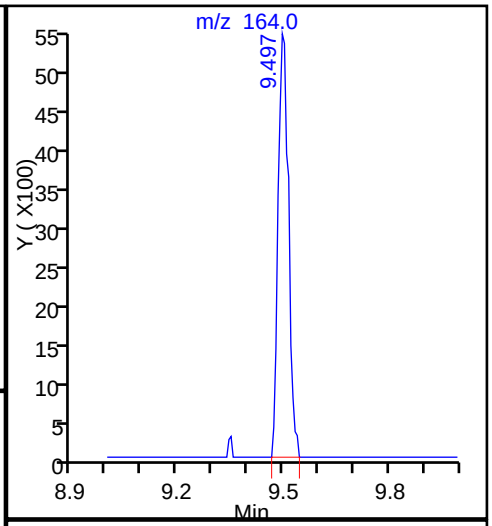
80 Tetrachloroethene, CAS: 127-18-4

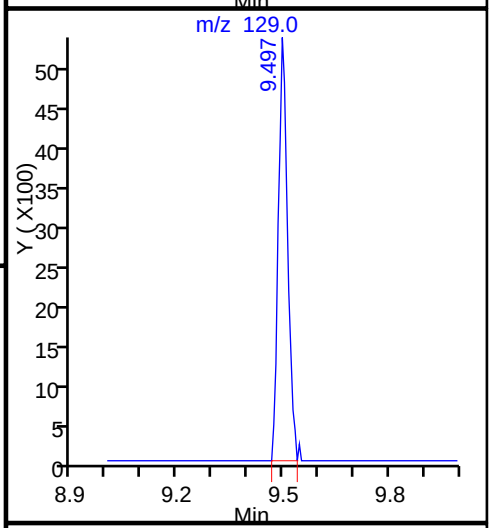


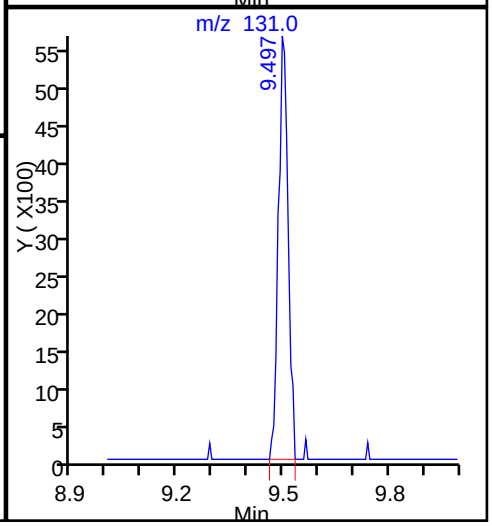












Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

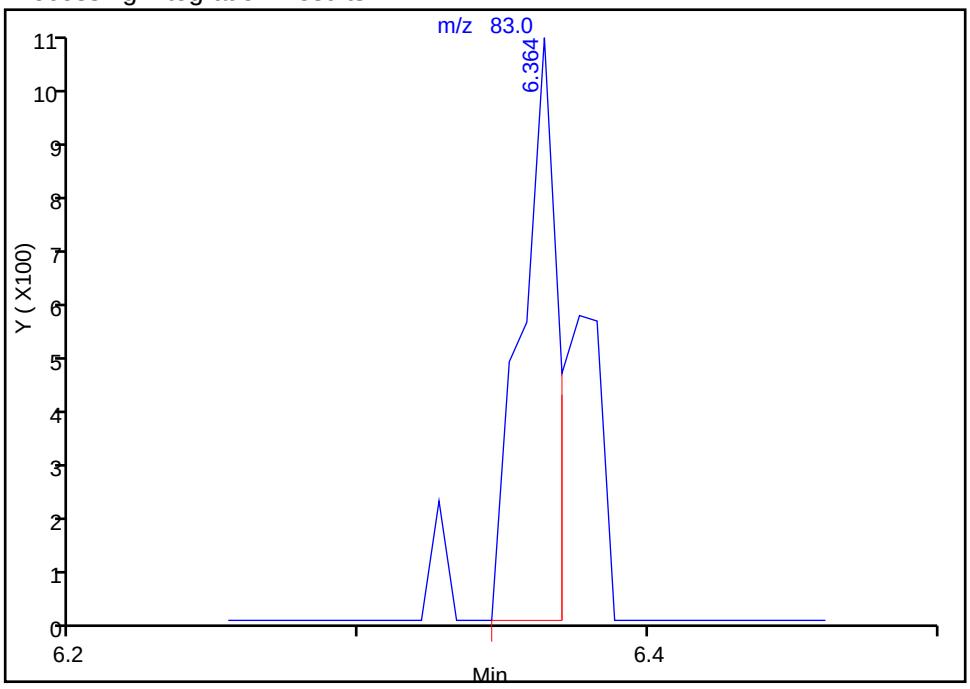
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015031.D				
Injection Date:	16-Oct-2016 00:57:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-A-5	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	001562	ALS Bottle#:	29	Worklist Smp#:	31
Purge Vol:	5.000 mL	Dil. Factor:	10.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

52 Chloroform, CAS: 67-66-3

Signal: 1

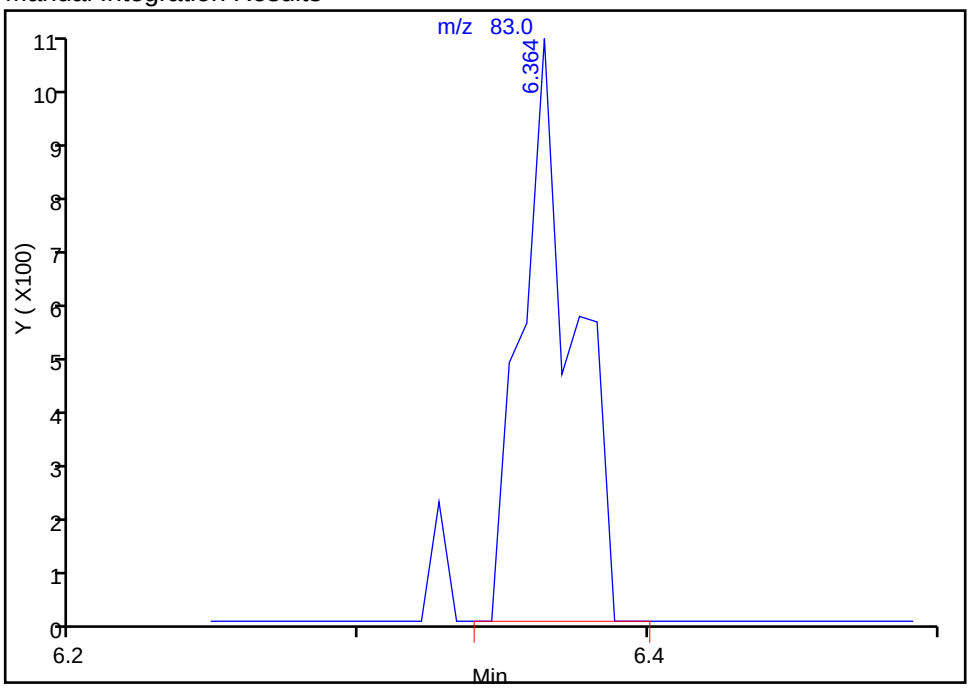
Processing Integration Results

RT: 6.36
Area: 920
Amount: 0.242492
Amount Units: ng



Manual Integration Results

RT: 6.36
Area: 1321
Amount: 0.348186
Amount Units: ng



Reviewer: fergusond, 17-Oct-2016 08:29:54

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-88-0/1-0 | Lab Sample ID: 180-59749-6

Matrix: Water | Lab File ID: 51018017.D

Analysis Method: 8260C | Date Collected: 10/12/2016 13:52

Sample wt/vol: 5(mL) | Date Analyzed: 10/18/2016 19:05

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191520 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	1.0	U ^c	1.0	0.23
75-01-4	Vinyl chloride	1.0	U	1.0	0.32
74-83-9	Bromomethane	1.0	U ^c	1.0	0.36
75-00-3	Chloroethane	1.0	U	1.0	0.26
75-35-4	1,1-Dichloroethene	1.6		1.0	0.29
67-64-1	Acetone	3.3	J	5.0	2.5
75-15-0	Carbon disulfide	1.0	U	1.0	0.18
75-09-2	Methylene Chloride	1.0	U	1.0	0.36
156-60-5	trans-1,2-Dichloroethene	1.0	U	1.0	0.29
1634-04-4	Methyl tert-butyl ether	1.0	U	1.0	0.24
75-34-3	1,1-Dichloroethane	1.6		1.0	0.24
156-59-2	cis-1,2-Dichloroethene	9.3		1.0	0.29
74-97-5	Bromochloromethane	1.0	U	1.0	0.38
78-93-3	2-Butanone (MEK)	5.0	U	5.0	1.2
67-66-3	Chloroform	0.28	J	1.0	0.27
71-55-6	1,1,1-Trichloroethane	0.32	J	1.0	0.22
56-23-5	Carbon tetrachloride	1.0	U	1.0	0.24
71-43-2	Benzene	1.0	U	1.0	0.26
107-06-2	1,2-Dichloroethane	1.0	U	1.0	0.25
79-01-6	*Trichloroethene*	*59*	*E*	*1.0*	*0.26*
78-87-5	1,2-Dichloropropane	1.0	U	1.0	0.23
75-27-4	Bromodichloromethane	1.0	U	1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	1.0	U	1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59
108-88-3	Toluene	1.0	U	1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	1.0	U	1.0	0.24
79-00-5	1,1,2-Trichloroethane	1.0	U	1.0	0.35
127-18-4	*Tetrachloroethene*	*62*	*E*	*1.0*	*0.27*
591-78-6	2-Hexanone	5.0	U	5.0	0.74
124-48-1	Dibromochloromethane	1.0	U	1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29
108-90-7	Chlorobenzene	1.0	U	1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20
100-41-4	Ethylbenzene	1.0	U	1.0	0.27
1330-20-7	Xylenes, Total	2.0	U	2.0	0.48
100-42-5	Styrene	1.0	U	1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-88-0/1-0 | Lab Sample ID: 180-59749-6

Matrix: Water | Lab File ID: 51018017.D

Analysis Method: 8260C | Date Collected: 10/12/2016 13:52

Sample wt/vol: 5(mL) | Date Analyzed: 10/18/2016 19:05

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191520 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	1.0	U	1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35
107-13-1	Acrylonitrile	20	U ^c	20	2.8
123-91-1	1,4-Dioxane	200	U	200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	120		72-134
2037-26-5	Toluene-d8 (Surr)	103		80-120
460-00-4	4-Bromofluorobenzene (Surr)	113		72-120
1868-53-7	Dibromofluoromethane (Surr)	107		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D
Lims ID: 180-59749-B-6
Client ID: HD-MW-88-0/1-0
Sample Type: Client
Inject. Date: 18-Oct-2016 19:05:30 ALS Bottle#: 17 Worklist Smp#: 17
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-017
Misc. Info.: 180-59749-B-6
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 07:42:39 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 07:42:39

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.262	4.273	-0.011	0	137362	1000.0	
* 2 Fluorobenzene (IS)	96	7.268	7.266	0.002	97	360436	50.0	
* 3 Chlorobenzene-d5	119	10.370	10.375	-0.004	93	85520	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.718	12.717	0.001	97	125716	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.550	6.542	0.008	92	87294	53.7	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.915	6.913	0.002	0	132761	60.1	
$ 7 Toluene-d8 (Surr)	98	8.922	8.921	0.001	95	345364	51.3	
$ 8 4-Bromofluorobenzene (Surr	95	11.557	11.561	-0.005	84	141039	56.7	
12 Chloromethane	50		1.760				ND	
13 Vinyl chloride	62		1.906				ND	
15 Bromomethane	94		2.235				ND	
16 Chloroethane	64		2.369				ND	
22 1,1-Dichloroethene	96	3.344	3.336	0.008	89	16326	7.99	
24 Acetone	43	3.435	3.439	-0.004	73	11542	16.3	
26 Carbon disulfide	76		3.616				ND	
31 Methylene Chloride	84	4.098	4.121	-0.023	1	1665	0.7017	
33 Acrylonitrile	53		4.510				ND	
34 trans-1,2-Dichloroethene	96		4.540				ND	
35 Methyl tert-butyl ether	73		4.559				ND	
37 1,1-Dichloroethane	63	5.187	5.179	0.008	96	33198	8.05	
45 cis-1,2-Dichloroethene	96	5.935	5.927	0.008	86	109500	46.4	
46 2-Butanone (MEK)	43		5.946				ND	
49 Chlorobromomethane	128		6.213				ND	
52 Chloroform	83	6.355	6.359	-0.004	82	5178	1.41	
53 1,1,1-Trichloroethane	97	6.519	6.524	-0.005	35	4756	1.62	
56 Carbon tetrachloride	117		6.694				ND	
58 Benzene	78		6.925				ND	
59 1,2-Dichloroethane	62		7.004				ND	
64 Trichloroethene	130	7.663	7.655	0.008	95	596330	294.4	E
67 1,2-Dichloropropane	63		7.929				ND	
70 1,4-Dioxane	88		8.014				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
71 Dichlorobromomethane	83		8.215				ND	
74 cis-1,3-Dichloropropene	75		8.659				ND	
75 4-Methyl-2-pentanone (MIBK	43		8.811				ND	
76 Toluene	91		8.987				ND	
77 trans-1,3-Dichloropropene	75		9.237				ND	
79 1,1,2-Trichloroethane	97		9.432				ND	
80 Tetrachloroethene	164	9.500	9.498	0.002	93	486038	308.2	E
82 2-Hexanone	43		9.644				ND	
84 Chlorodibromomethane	129		9.803				ND	
85 Ethylene Dibromide	107		9.912				ND	
87 Chlorobenzene	112		10.405				ND	
89 1,1,1,2-Tetrachloroethane	131		10.496				ND	
90 Ethylbenzene	106		10.502				ND	
91 m-Xylene & p-Xylene	106		10.636				ND	
92 o-Xylene	106		11.013				ND	
93 Styrene	104		11.038				ND	
94 Bromoform	173		11.220				ND	
99 1,1,2,2-Tetrachloroethane	83		11.701				ND	
S 133 Xylenes, Total	106		1.000				ND	

QC Flag Legend

Processing Flags

E - Exceeded Maximum Amount

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

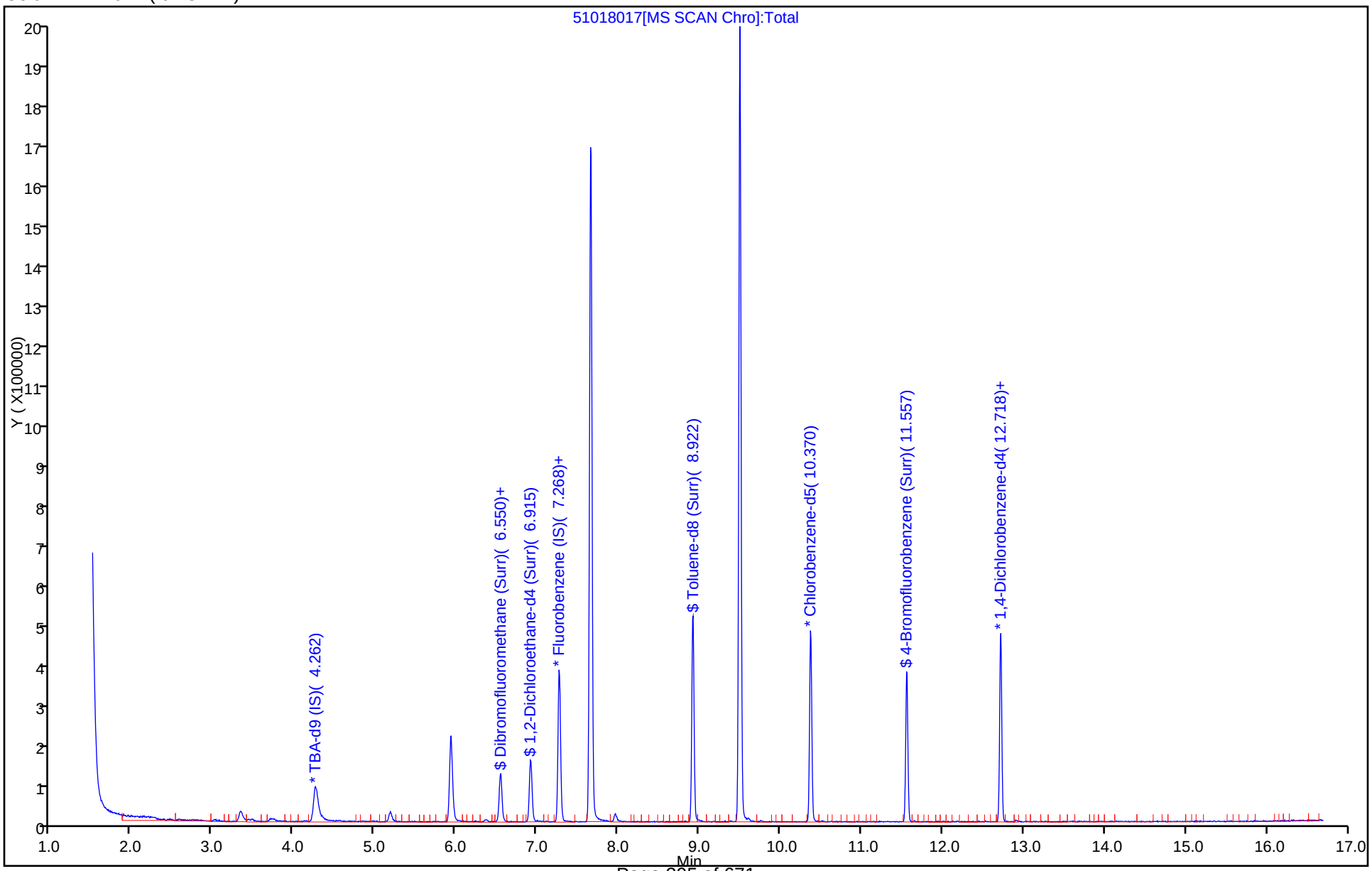
Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6	Worklist Smp#:	17
Client ID:	HD-MW-88-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	17
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D
Lims ID: 180-59749-B-6
Client ID: HD-MW-88-0/1-0
Sample Type: Client
Inject. Date: 18-Oct-2016 19:05:30 ALS Bottle#: 17 Worklist Smp#: 17
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-017
Misc. Info.: 180-59749-B-6
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 07:42:39 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 07:42:39

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	53.7	107.46
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	60.1	120.21
$ 7 Toluene-d8 (Surr)	50.0	51.3	102.65
$ 8 4-Bromofluorobenzene (Surr)	50.0	56.7	113.45

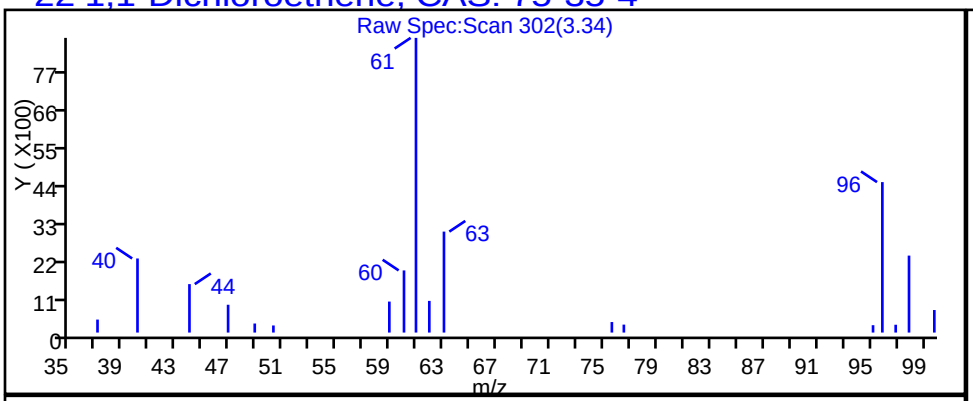
Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

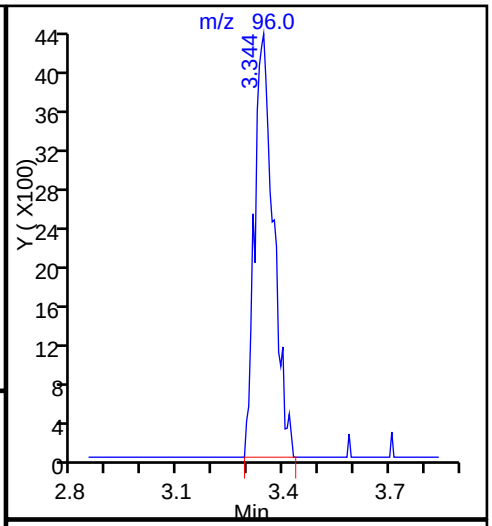
TestAmerica Pittsburgh

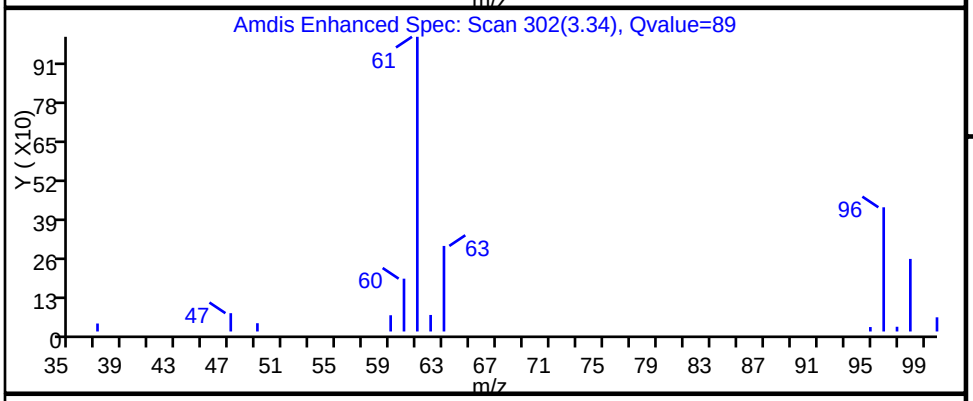
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

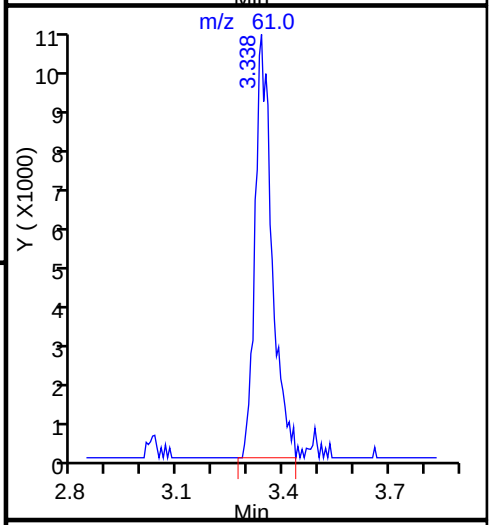
Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6
Client ID:	HD-MW-88-0/1-0		
Operator ID:	001562	ALS Bottle#:	17 Worklist Smp#: 17
Purge Vol:	5.000 mL	Dil. Factor:	1.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

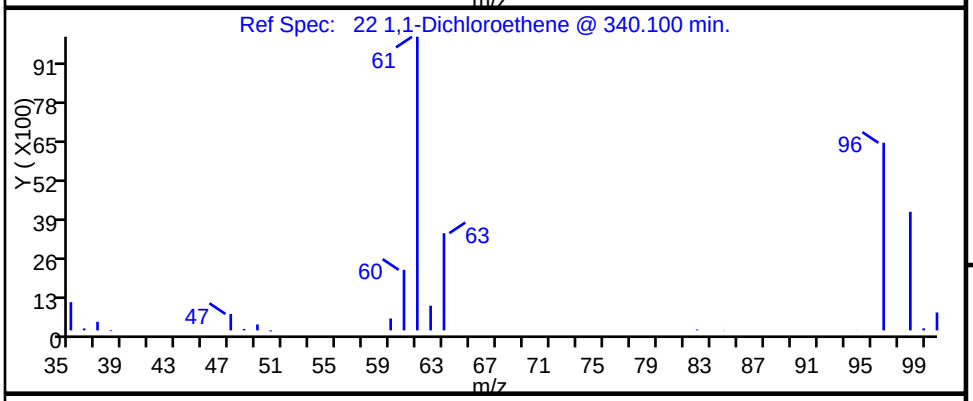
22 1,1-Dichloroethene, CAS: 75-35-4

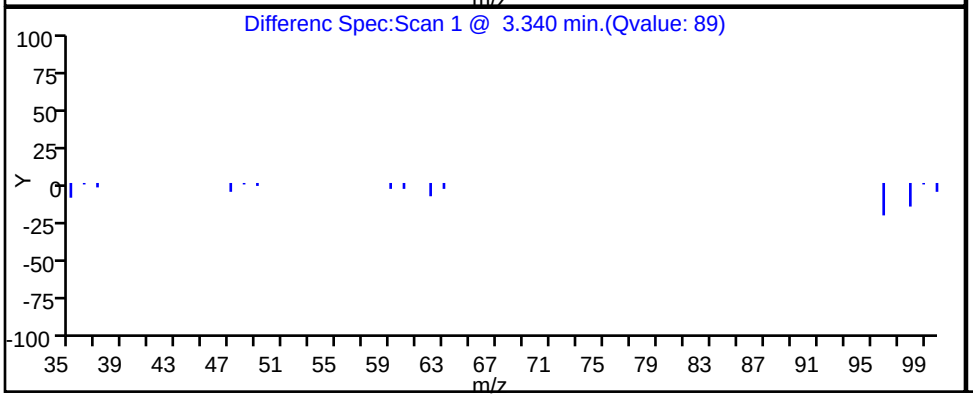


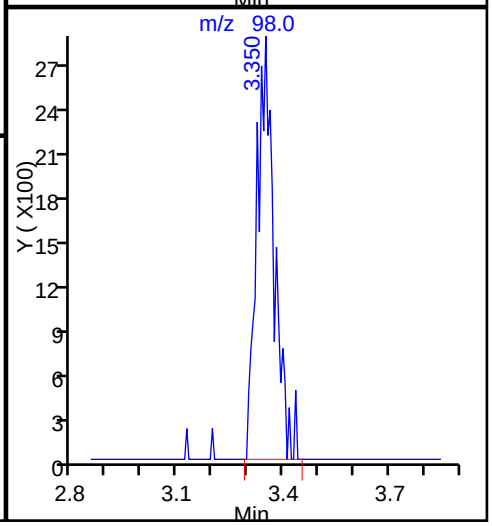












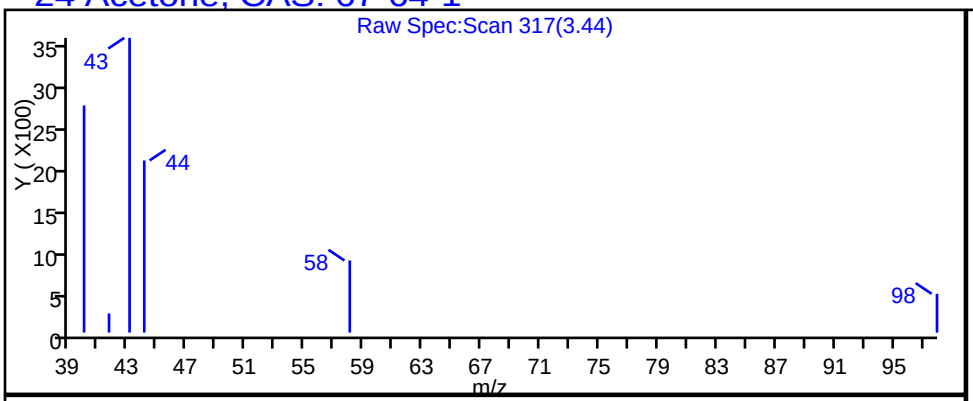
Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

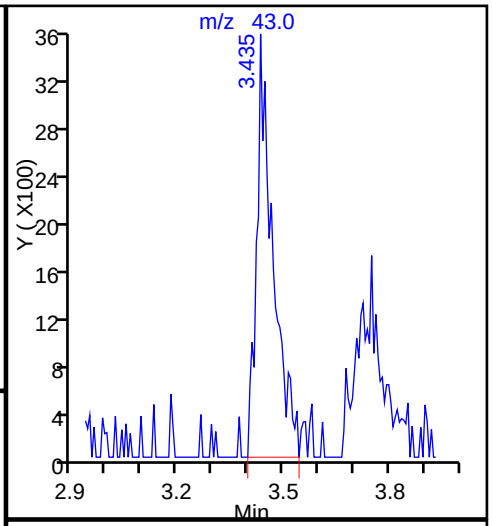
TestAmerica Pittsburgh

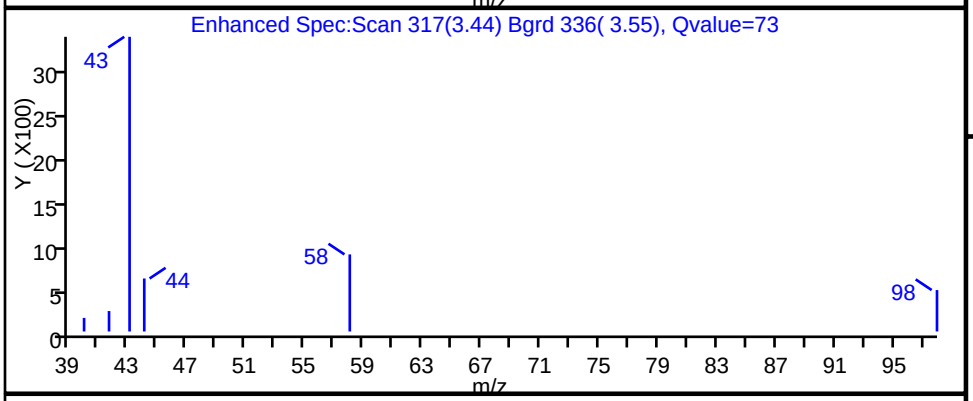
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

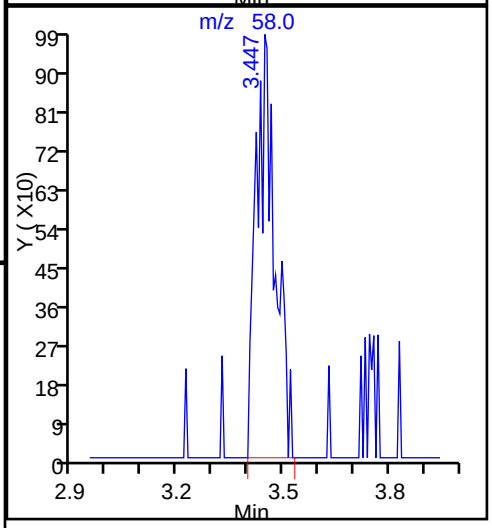
Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	17	Worklist Smp#:	17
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

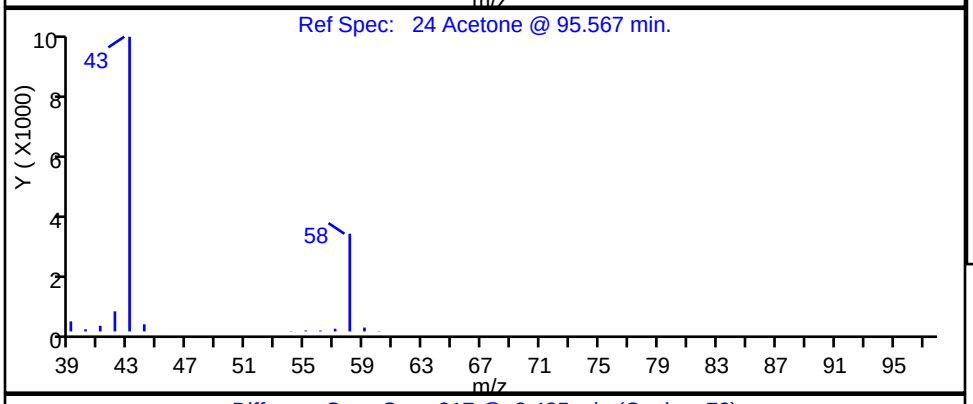
24 Acetone, CAS: 67-64-1

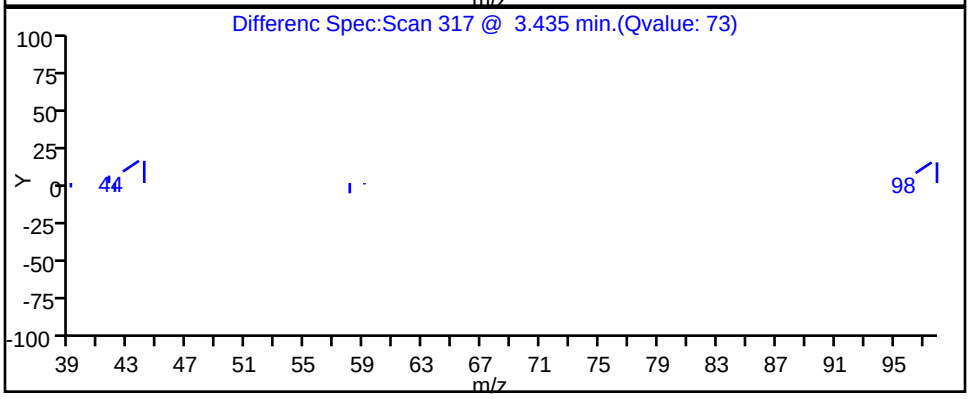












Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

Injection Date: 18-Oct-2016 19:05:30 Instrument ID: CHHP5

Lims ID: 180-59749-B-6 Lab Sample ID: 180-59749-6

Client ID: HD-MW-88-0/1-0

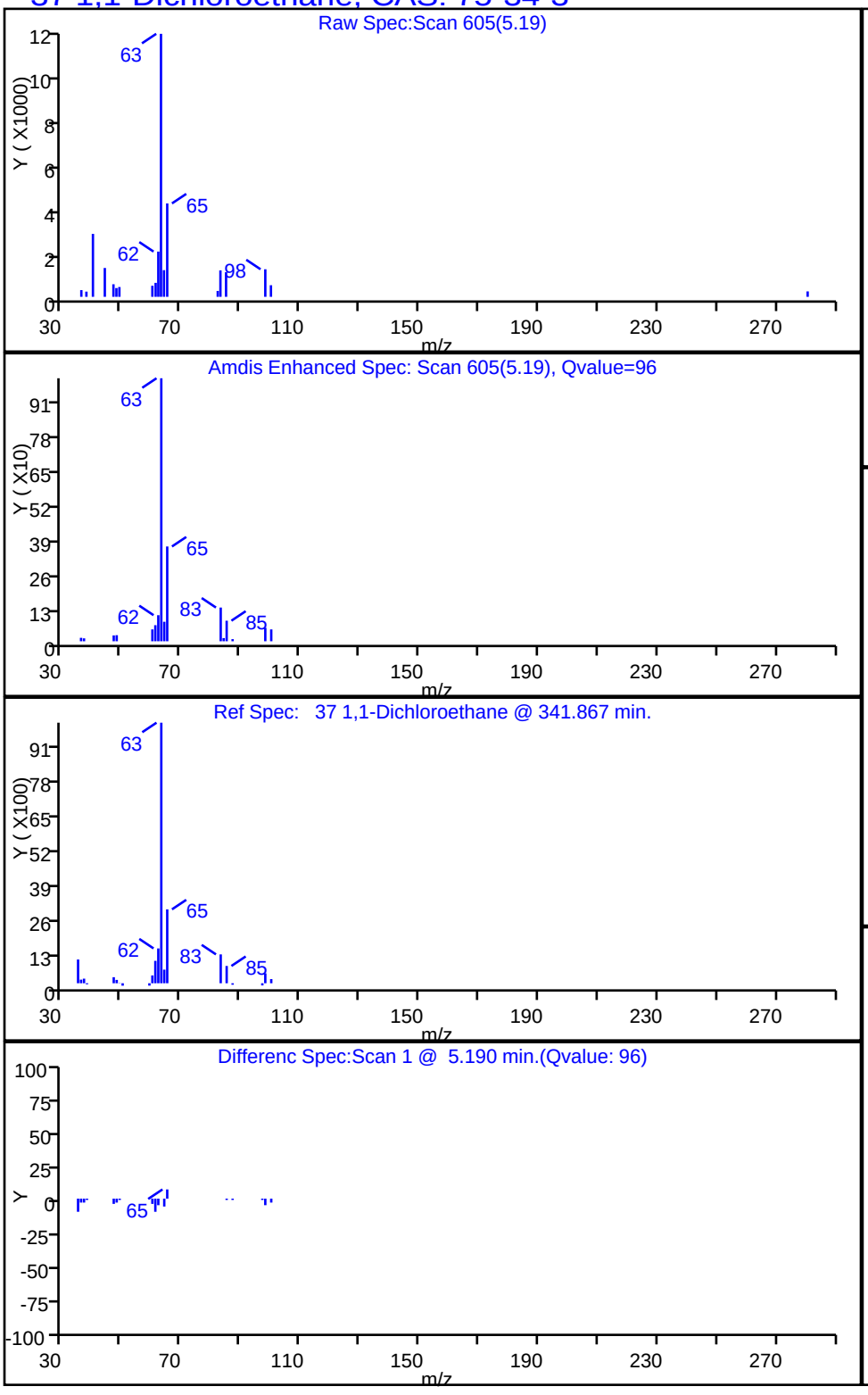
Operator ID: 001562 ALS Bottle#: 17 Worklist Smp#: 17

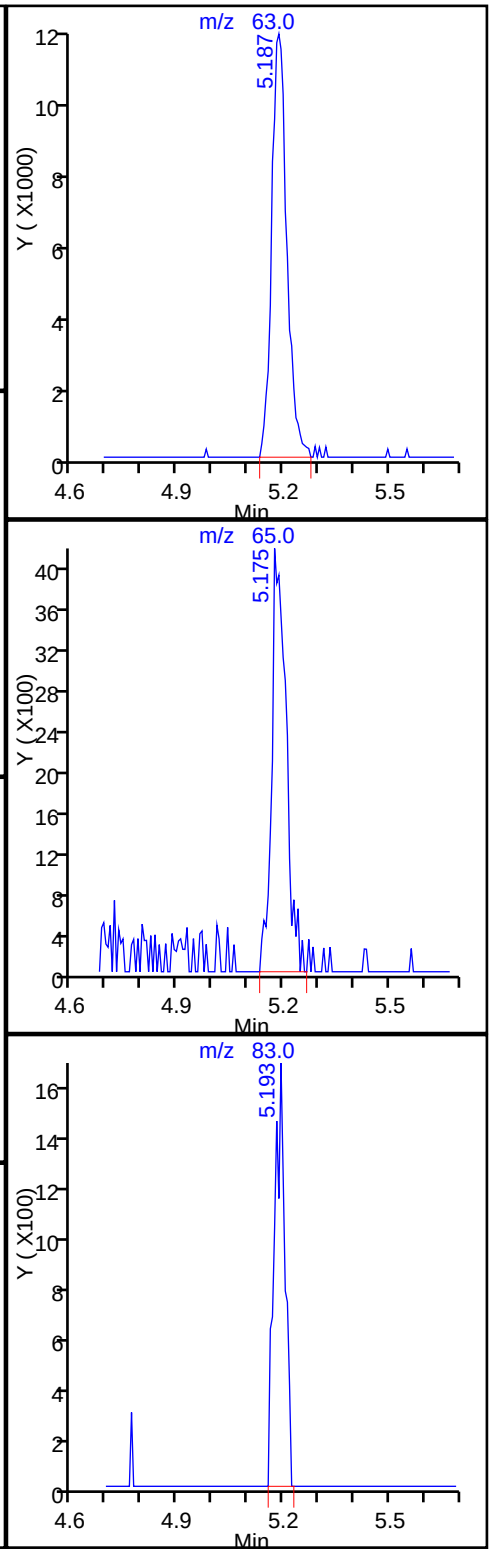
Purge Vol: 5.000 mL Dil. Factor: 1.0000

Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL

Column: DB-624 (0.18 mm) Detector MS SCAN

37 1,1-Dichloroethane, CAS: 75-34-3





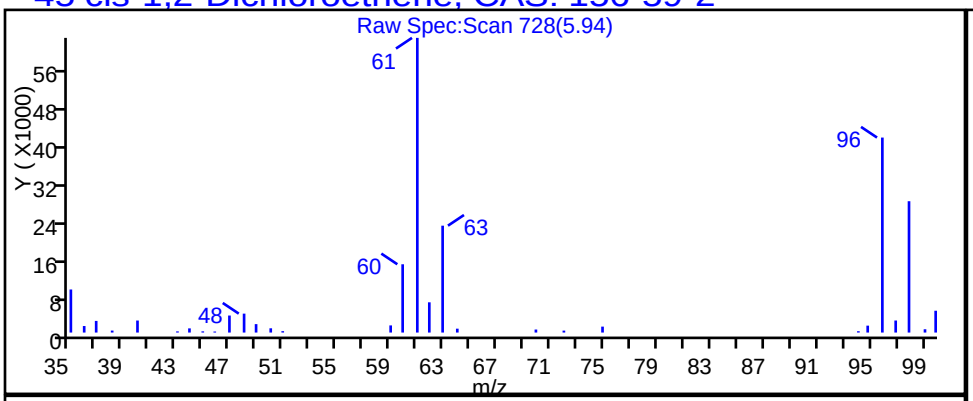
Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

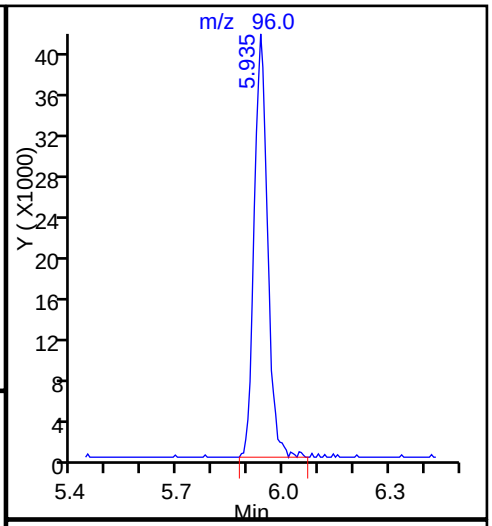
TestAmerica Pittsburgh

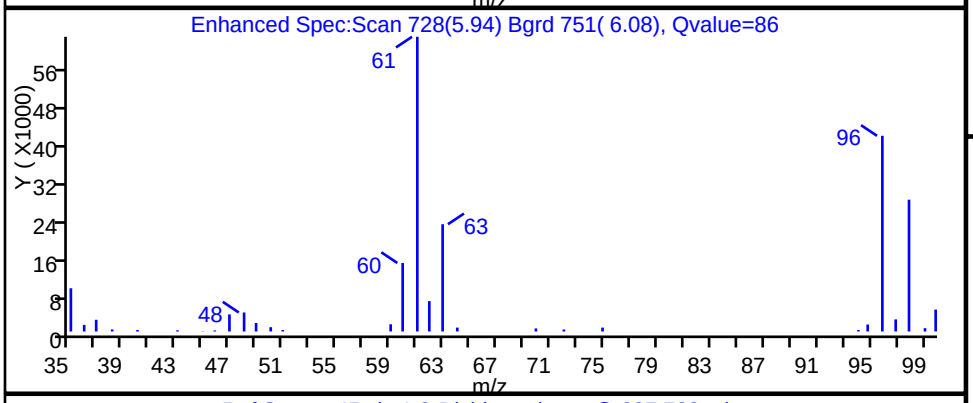
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

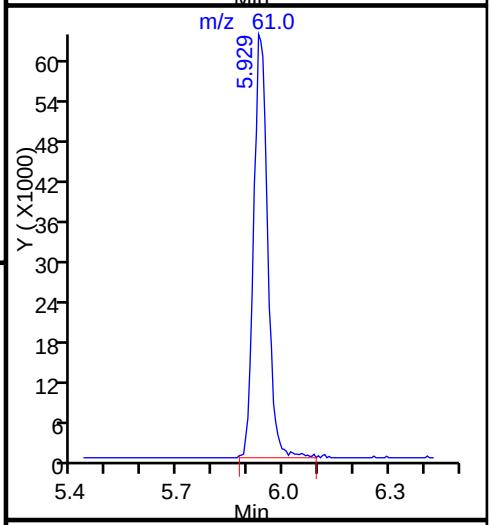
Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	17	Worklist Smp#:	17
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

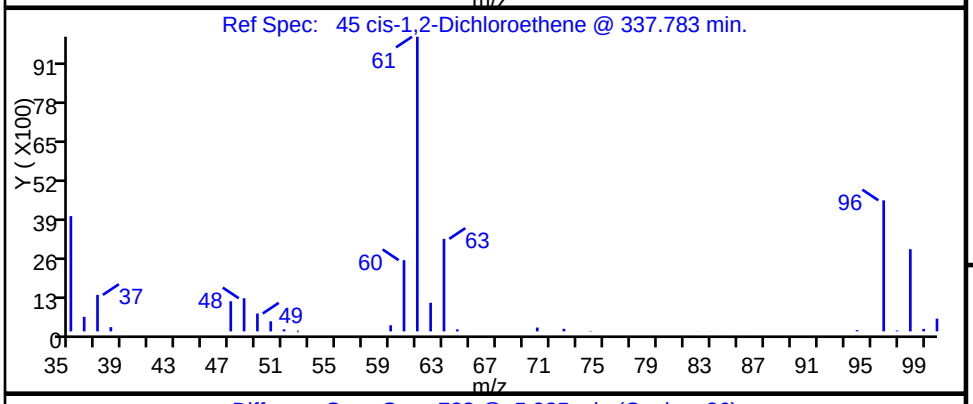
45 cis-1,2-Dichloroethene, CAS: 156-59-2

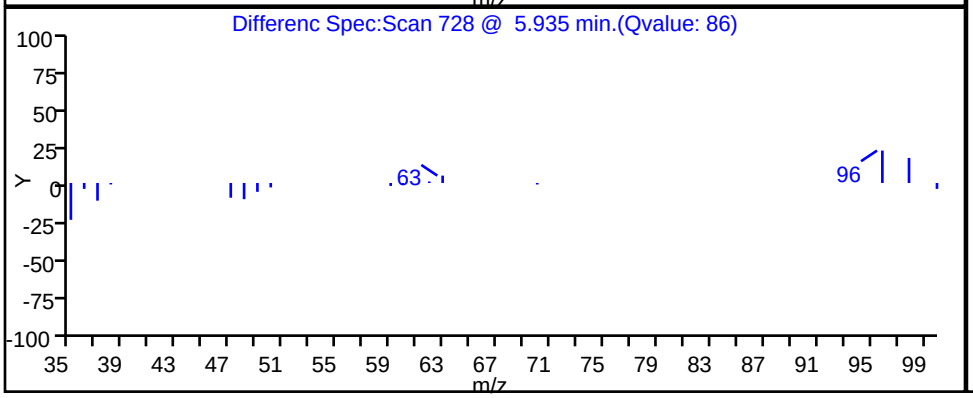


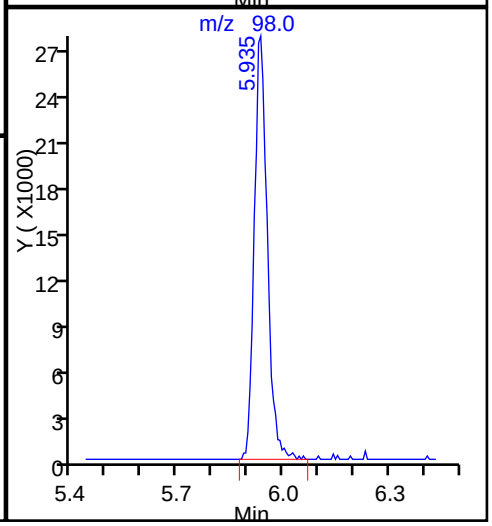












Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

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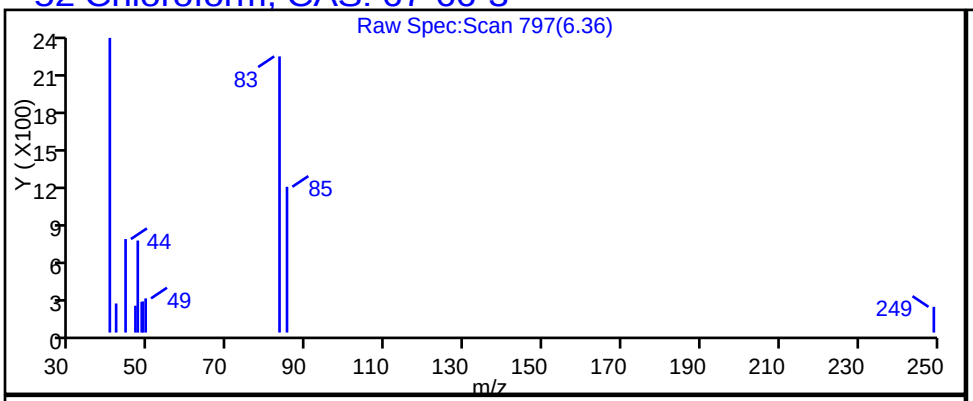
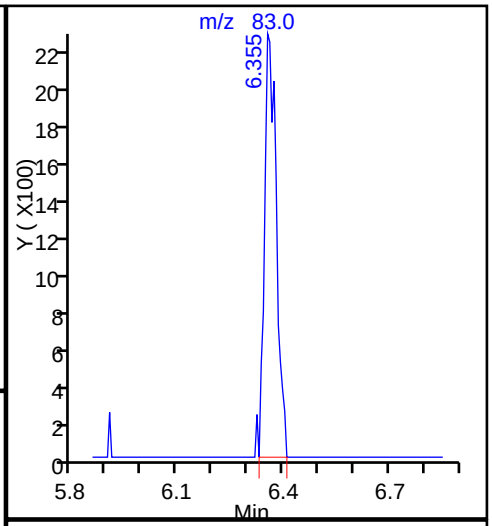
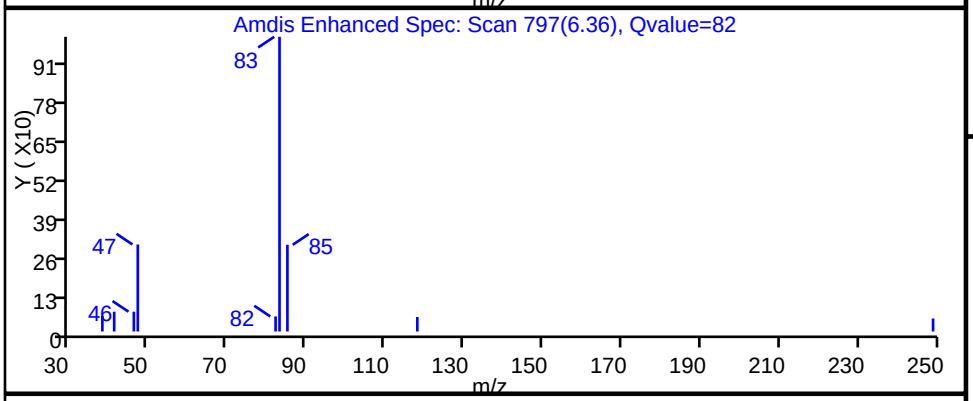
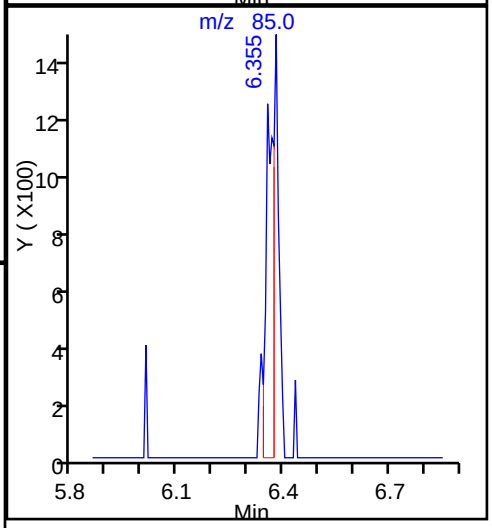
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D				
Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	17	Worklist Smp#:	17
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

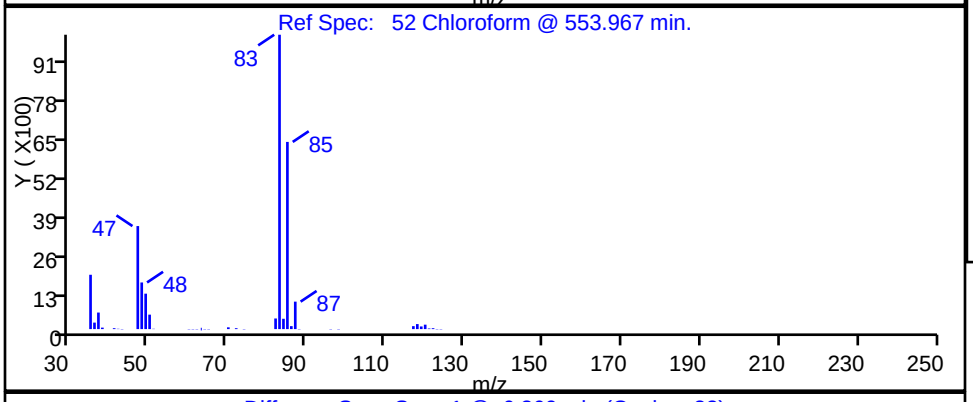
52 Chloroform, CAS: 67-66-3

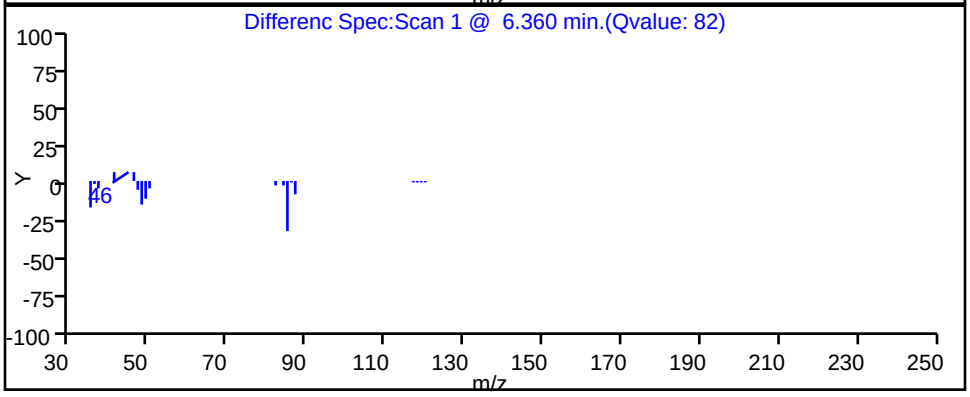












Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

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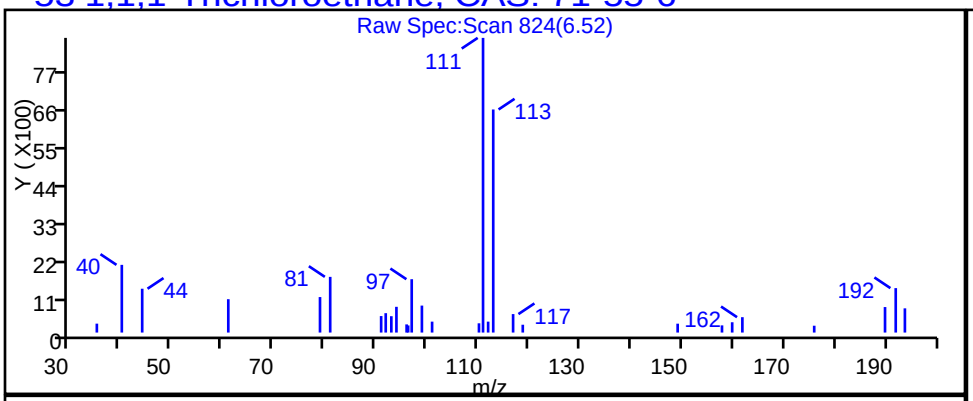
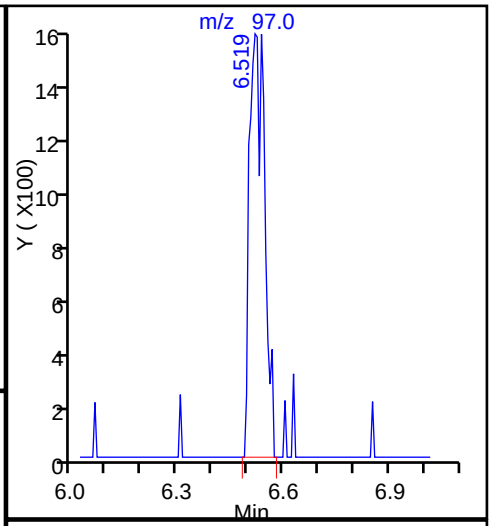
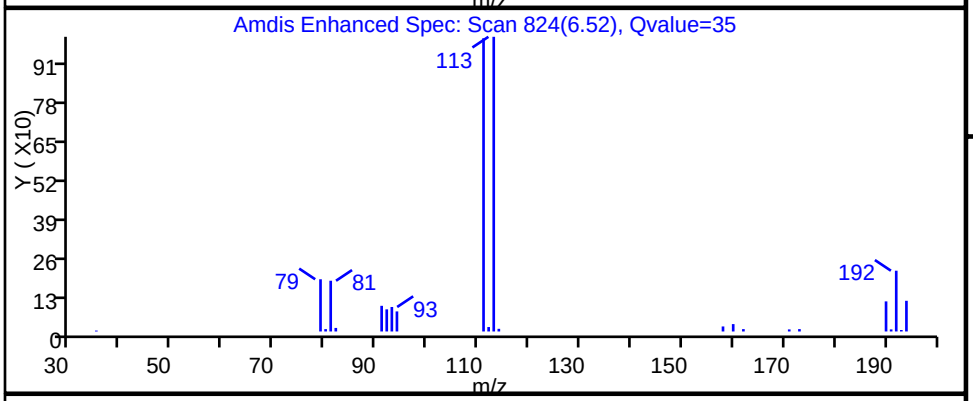
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

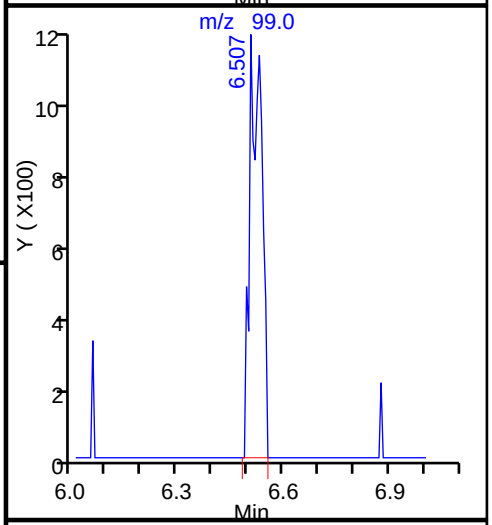
Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	17	Worklist Smp#:	17
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

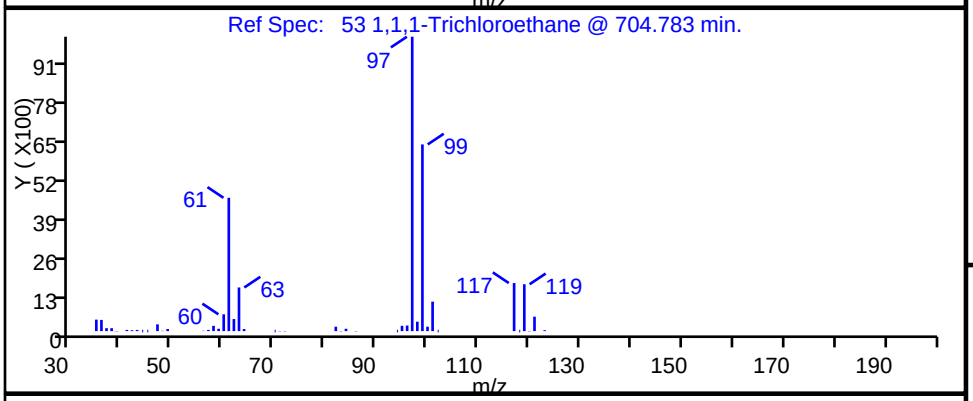
53 1,1,1-Trichloroethane, CAS: 71-55-6

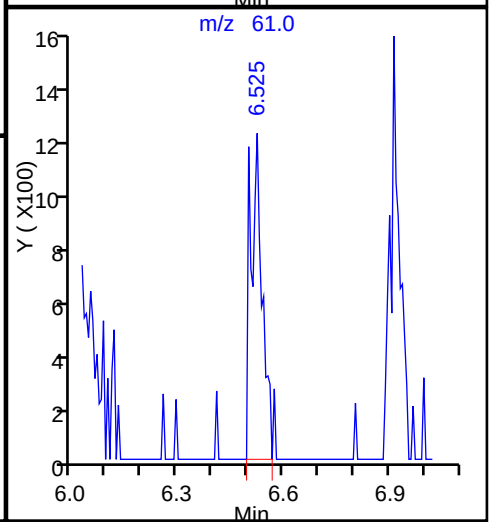


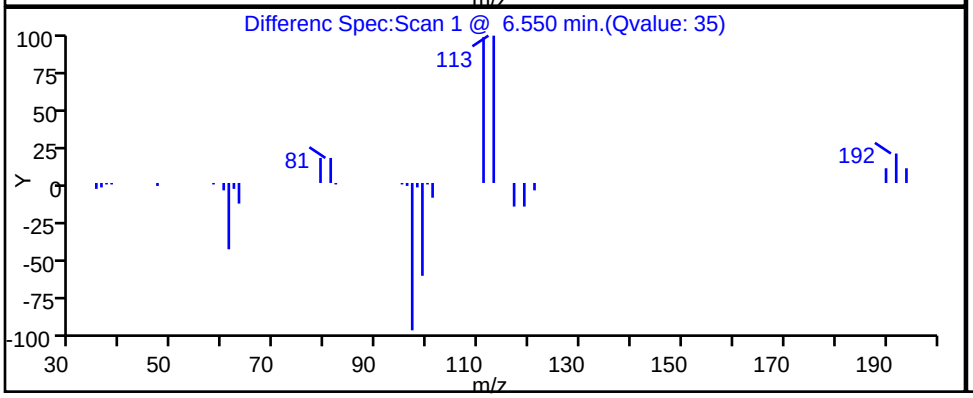












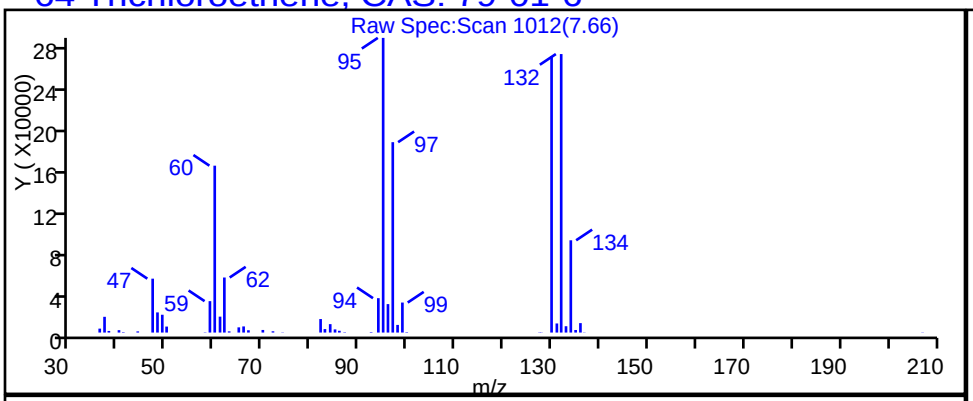
Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

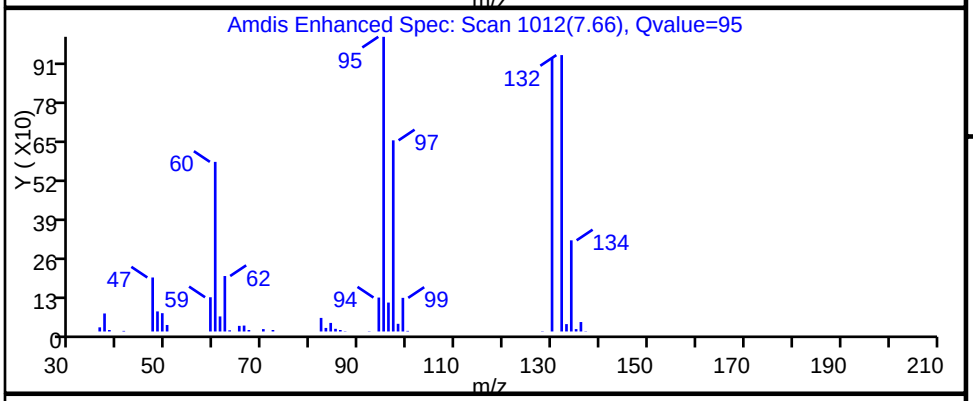
TestAmerica Pittsburgh

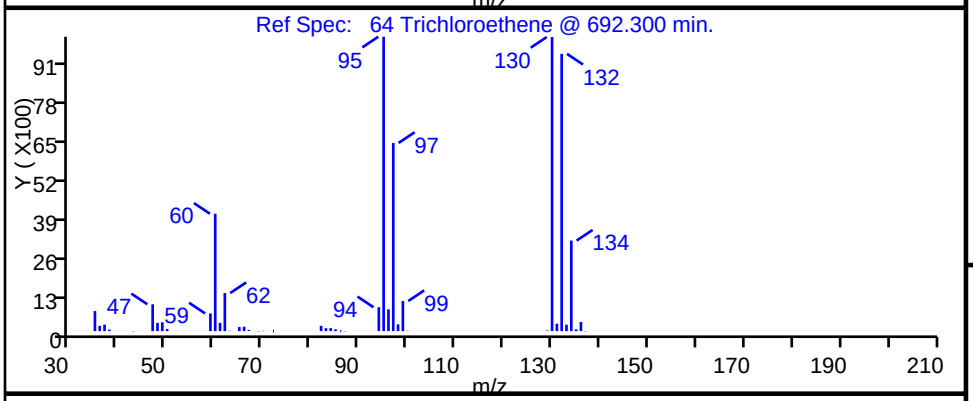
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

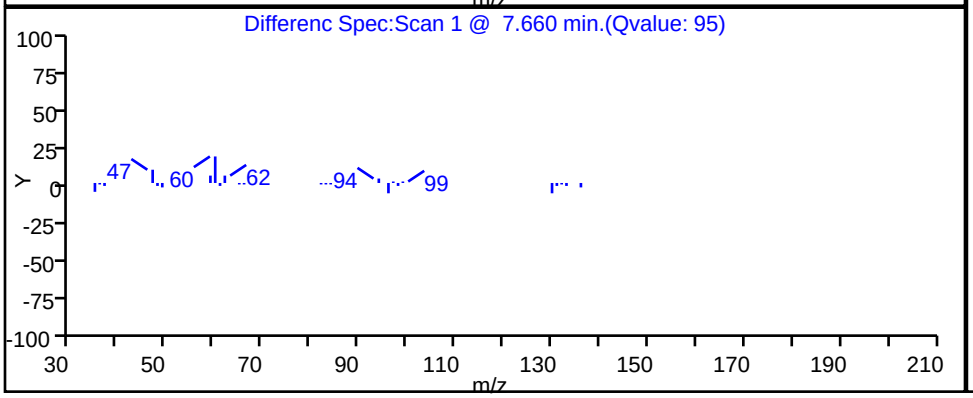
Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5		
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	17	Worklist Smp#:	17
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

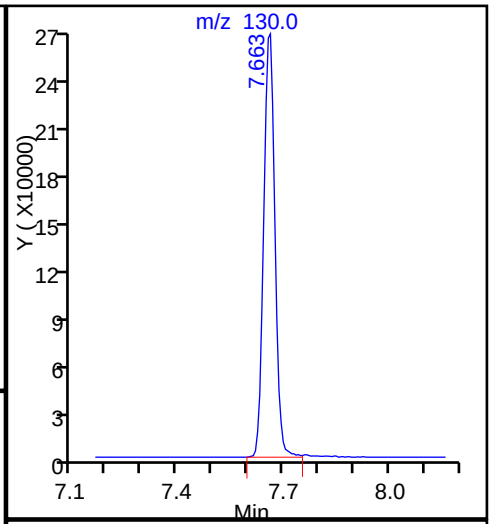
64 Trichloroethene, CAS: 79-01-6

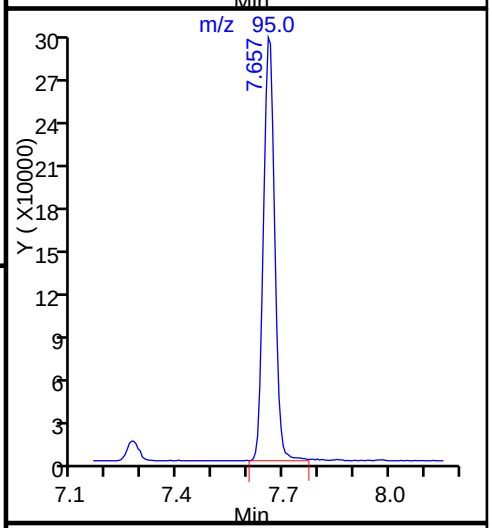


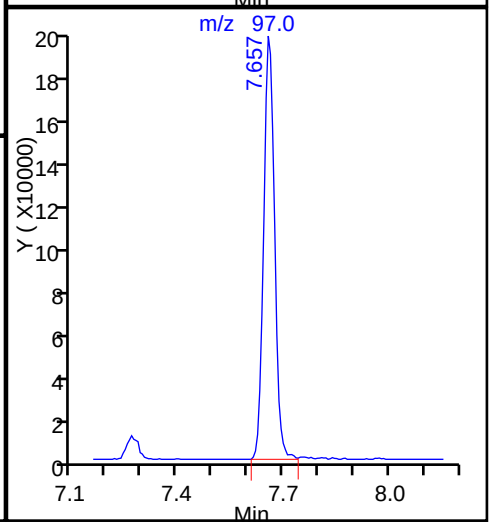












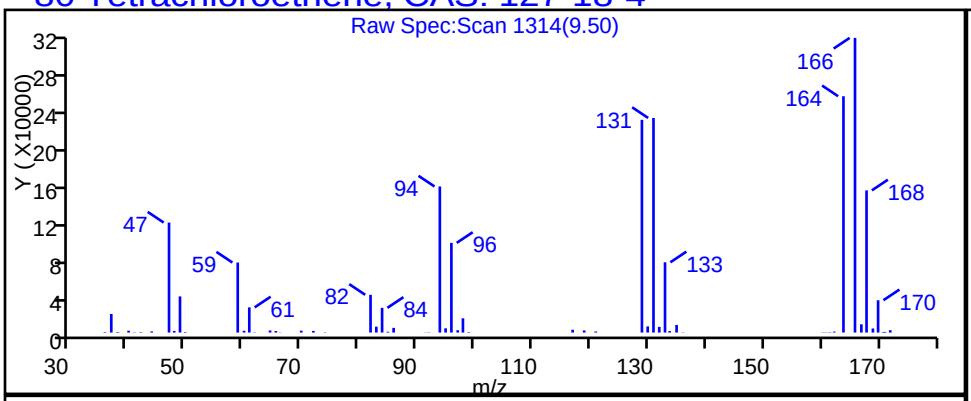
Report Date: 19-Oct-2016 07:42:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

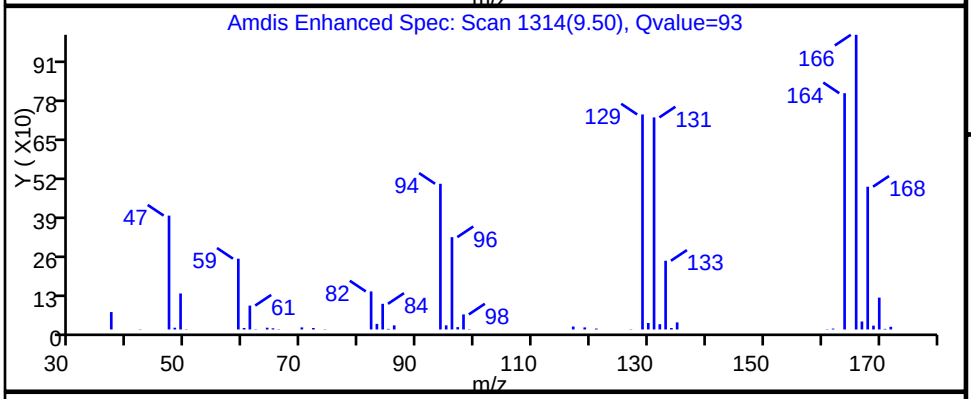
TestAmerica Pittsburgh

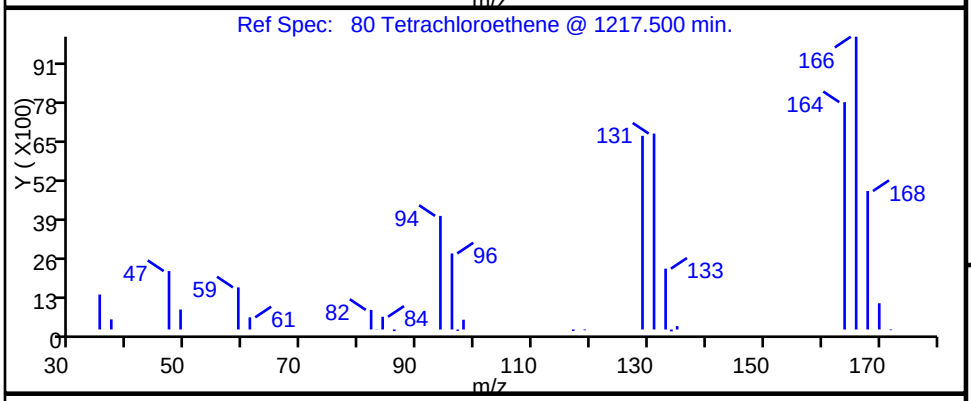
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018017.D

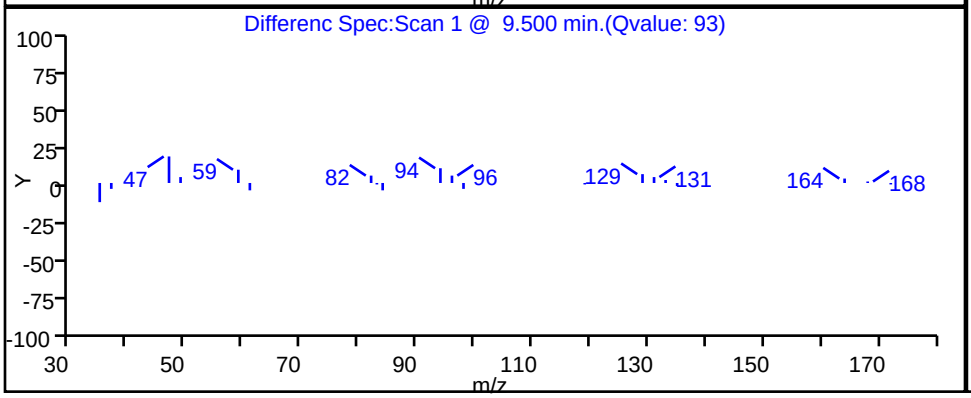
Injection Date:	18-Oct-2016 19:05:30	Instrument ID:	CHHP5
Lims ID:	180-59749-B-6	Lab Sample ID:	180-59749-6
Client ID:	HD-MW-88-0/1-0		
Operator ID:	001562	ALS Bottle#:	17 Worklist Smp#: 17
Purge Vol:	5.000 mL	Dil. Factor:	1.0000
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL
Column:	DB-624 (0.18 mm)	Detector	MS SCAN

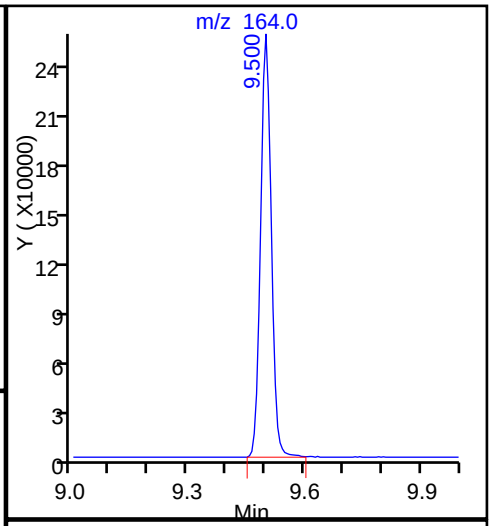
80 Tetrachloroethene, CAS: 127-18-4

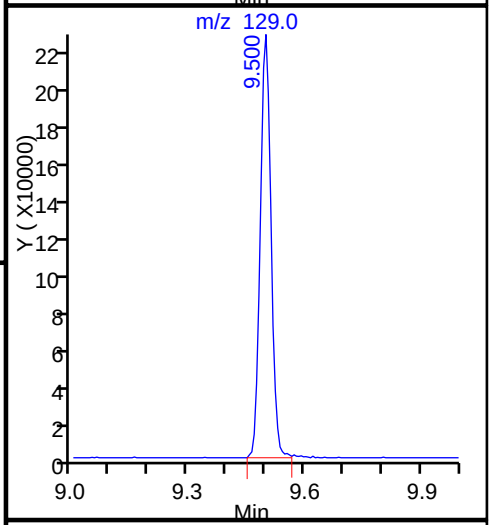


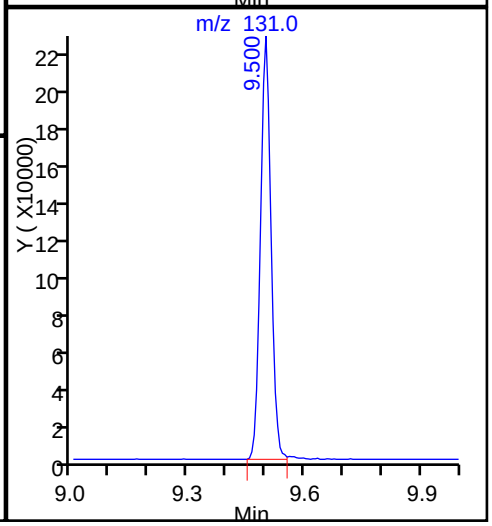












FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-88-0/1-0 DL | Lab Sample ID: 180-59749-6 DL

Matrix: Water | Lab File ID: 61019027.D

Analysis Method: 8260C | Date Collected: 10/12/2016 13:52

Sample wt/vol: 5(mL) | Date Analyzed: 10/19/2016 21:22

Soil Aliquot Vol: | Dilution Factor: 2

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191652 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	2.0	U	2.0	0.46
75-01-4	Vinyl chloride	2.0	U	2.0	0.63
74-83-9	Bromomethane	2.0	U	2.0	0.72
75-00-3	Chloroethane	2.0	U	2.0	0.52
75-35-4	1,1-Dichloroethene	1.6	J	2.0	0.57
67-64-1	Acetone	10	U	10	5.0
75-15-0	Carbon disulfide	2.0	U	2.0	0.37
75-09-2	Methylene Chloride	2.0	U	2.0	0.72
156-60-5	trans-1,2-Dichloroethene	2.0	U	2.0	0.57
1634-04-4	Methyl tert-butyl ether	2.0	U	2.0	0.49
75-34-3	1,1-Dichloroethane	1.6	J	2.0	0.47
156-59-2	cis-1,2-Dichloroethene	9.1		2.0	0.57
74-97-5	Bromochloromethane	2.0	U	2.0	0.75
78-93-3	2-Butanone (MEK)	10	U	10	2.3
67-66-3	Chloroform	2.0	U	2.0	0.55
71-55-6	1,1,1-Trichloroethane	2.0	U	2.0	0.44
56-23-5	Carbon tetrachloride	2.0	U	2.0	0.49
71-43-2	Benzene	2.0	U	2.0	0.51
107-06-2	1,2-Dichloroethane	2.0	U	2.0	0.49
79-01-6	Trichloroethene	63		2.0	0.52
78-87-5	1,2-Dichloropropane	2.0	U	2.0	0.45
75-27-4	Bromodichloromethane	2.0	U	2.0	0.47
10061-01-5	cis-1,3-Dichloropropene	2.0	U	2.0	0.41
108-10-1	4-Methyl-2-pentanone (MIBK)	10	U	10	1.2
108-88-3	Toluene	2.0	U	2.0	0.56
10061-02-6	trans-1,3-Dichloropropene	2.0	U	2.0	0.48
79-00-5	1,1,2-Trichloroethane	2.0	U	2.0	0.70
127-18-4	Tetrachloroethene	60		2.0	0.54
591-78-6	2-Hexanone	10	U	10	1.5
124-48-1	Dibromochloromethane	2.0	U	2.0	0.79
106-93-4	1,2-Dibromoethane (EDB)	2.0	U	2.0	0.58
108-90-7	Chlorobenzene	2.0	U	2.0	0.63
630-20-6	1,1,1,2-Tetrachloroethane	2.0	U	2.0	0.39
100-41-4	Ethylbenzene	2.0	U	2.0	0.55
1330-20-7	Xylenes, Total	4.0	U	4.0	0.97
100-42-5	Styrene	2.0	U	2.0	0.53

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-88-0/1-0 DL | Lab Sample ID: 180-59749-6 DL

Matrix: Water | Lab File ID: 61019027.D

Analysis Method: 8260C | Date Collected: 10/12/2016 13:52

Sample wt/vol: 5(mL) | Date Analyzed: 10/19/2016 21:22

Soil Aliquot Vol: | Dilution Factor: 2

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191652 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	*Bromoform*	*2.0*	*U*	*2.0*	*0.59*
79-34-5	*1,1,2,2-Tetrachloroethane*	*2.0*	*U*	*2.0*	*0.69*
107-13-1	*Acrylonitrile*	*40*	*U*	*40*	*5.5*
123-91-1	*1,4-Dioxane*	*400*	*U*	*400*	*15*

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	94		72-134
2037-26-5	Toluene-d8 (Surr)	106		80-120
460-00-4	4-Bromofluorobenzene (Surr)	99		72-120
1868-53-7	Dibromofluoromethane (Surr)	98		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D
Lims ID: 180-59749-C-6
Client ID: HD-MW-88-0/1-0
Sample Type: Client
Inject. Date: 19-Oct-2016 21:22:30 ALS Bottle#: 27 Worklist Smp#: 27
Purge Vol: 5.000 mL Dil. Factor: 2.0000
Sample Info: 180-0013943-027
Misc. Info.: 180-59749-C-6, 2x
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 20-Oct-2016 07:55:43 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK024

First Level Reviewer: fergusond Date: 20-Oct-2016 07:55:43

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.132	4.139	-0.007	89	85508	1000.0	
* 2 Fluorobenzene (IS)	96	7.180	7.181	-0.001	99	383378	50.0	
* 3 Chlorobenzene-d5	119	10.289	10.289	0.000	87	94544	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.637	12.631	0.006	97	138573	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.456	6.451	0.005	93	80487	49.2	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.827	6.822	0.005	69	104434	47.1	
$ 7 Toluene-d8 (Surr)	98	8.835	8.835	0.000	93	365877	52.9	
$ 8 4-Bromofluorobenzene (Surr	95	11.475	11.476	-0.001	89	128879	49.5	
12 Chloromethane	50		1.699				ND	
13 Vinyl chloride	62		1.839				ND	
15 Bromomethane	94		2.162				ND	
16 Chloroethane	64		2.296				ND	
22 1,1-Dichloroethene	96	3.238	3.226	0.012	94	7601	4.03	
24 Acetone	43	3.323	3.324	-0.001	33	3894	8.51	
26 Carbon disulfide	76		3.500				ND	
31 Methylene Chloride	84		4.005				ND	
33 Acrylonitrile	53		4.394				ND	
34 trans-1,2-Dichloroethene	96		4.425				ND	
35 Methyl tert-butyl ether	73		4.443				ND	
37 1,1-Dichloroethane	63	5.075	5.070	0.005	95	14426	4.08	
43 cis-1,2-Dichloroethene	96	5.836	5.830	0.006	78	53625	22.6	
44 2-Butanone (MEK)	43		5.842				ND	
48 Chlorobromomethane	128		6.116				ND	
50 Chloroform	83	6.274	6.268	0.006	17	2833	0.8635	
51 1,1,1-Trichloroethane	97	6.426	6.420	0.006	15	1542	0.7792	
53 Carbon tetrachloride	117		6.597				ND	
56 Benzene	78		6.828				ND	
57 1,2-Dichloroethane	62		6.907				ND	
61 Trichloroethene	130	7.569	7.570	-0.001	98	328151	157.8	
64 1,2-Dichloropropane	63		7.838				ND	
65 1,4-Dioxane	88		7.929				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
68 Dichlorobromomethane	83		8.124				ND	
71 cis-1,3-Dichloropropene	75		8.574				ND	
72 4-Methyl-2-pentanone (MIBK	43		8.732				ND	
73 Toluene	91		8.902				ND	
74 trans-1,3-Dichloropropene	75		9.152				ND	
76 1,1,2-Trichloroethane	97		9.346				ND	
77 Tetrachloroethene	164	9.419	9.413	0.006	97	245500	150.4	
79 2-Hexanone	43		9.565				ND	
81 Chlorodibromomethane	129		9.717				ND	
82 Ethylene Dibromide	107		9.827				ND	
84 Chlorobenzene	112		10.320				ND	
86 1,1,1,2-Tetrachloroethane	131		10.417				ND	
87 Ethylbenzene	106		10.417				ND	
88 m-Xylene & p-Xylene	106		10.551				ND	
89 o-Xylene	106		10.934				ND	
90 Styrene	104		10.952				ND	
91 Bromoform	173		11.135				ND	
96 1,1,2,2-Tetrachloroethane	83		11.615				ND	
S 131 Xylenes, Total	106		1.000				ND	

Reagents:

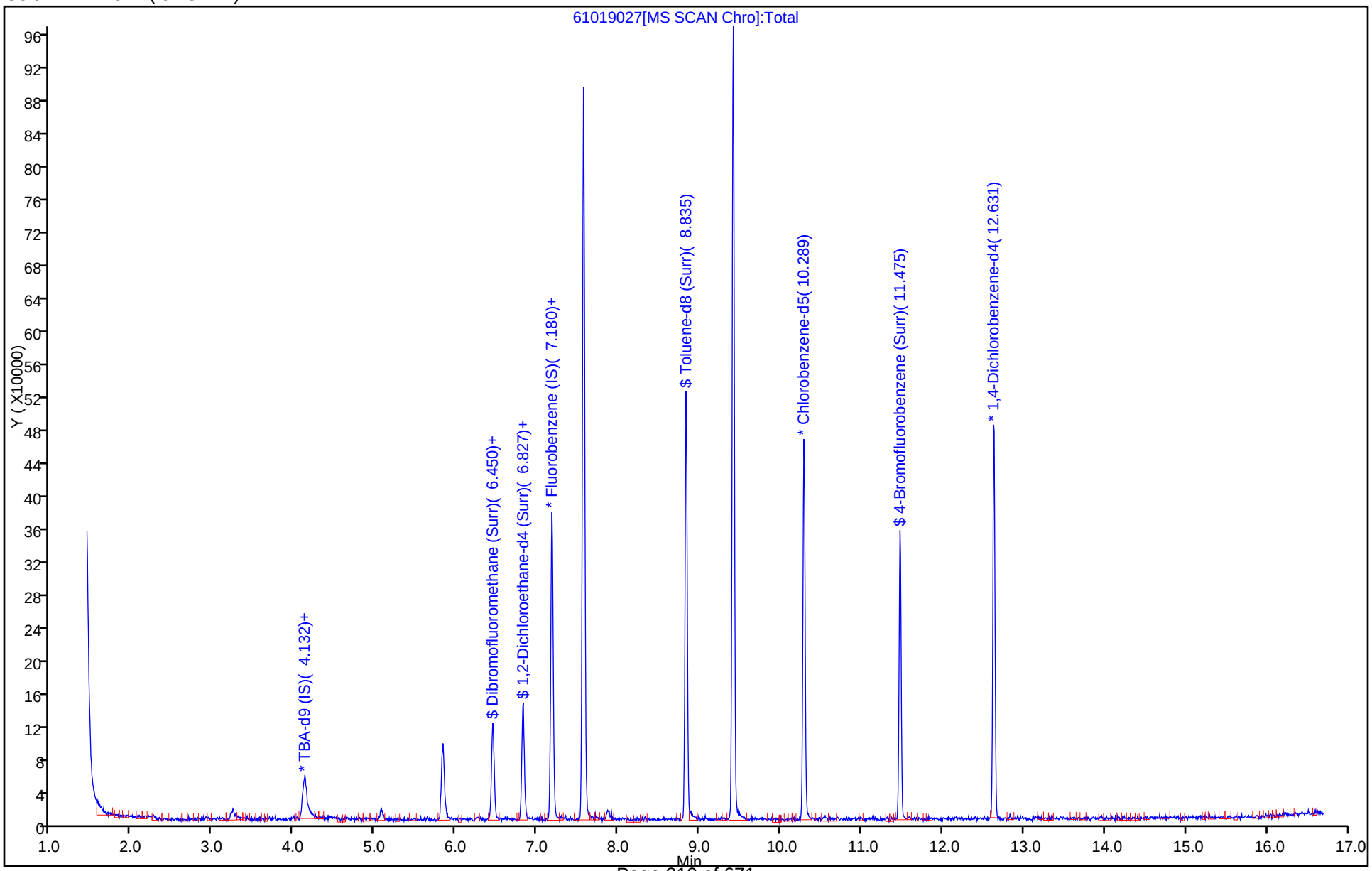
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00060	Amount Added:	2.00	Units: uL	Run Reagent

Report Date: 20-Oct-2016 07:55:44 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D				
Injection Date:	19-Oct-2016 21:22:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	180-59749-C-6	Lab Sample ID:	180-59749-6	Worklist Smp#:	27
Client ID:	HD-MW-88-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	2.0000	ALS Bottle#:	27
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D
Lims ID: 180-59749-C-6
Client ID: HD-MW-88-0/1-0
Sample Type: Client
Inject. Date: 19-Oct-2016 21:22:30 ALS Bottle#: 27 Worklist Smp#: 27
Purge Vol: 5.000 mL Dil. Factor: 2.0000
Sample Info: 180-0013943-027
Misc. Info.: 180-59749-C-6, 2x
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 20-Oct-2016 07:55:43 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK024

First Level Reviewer: fergusond Date: 20-Oct-2016 07:55:43

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	49.2	98.33
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	47.1	94.29
$ 7 Toluene-d8 (Surr)	50.0	52.9	105.81
$ 8 4-Bromofluorobenzene (Surr)	50.0	49.5	99.01

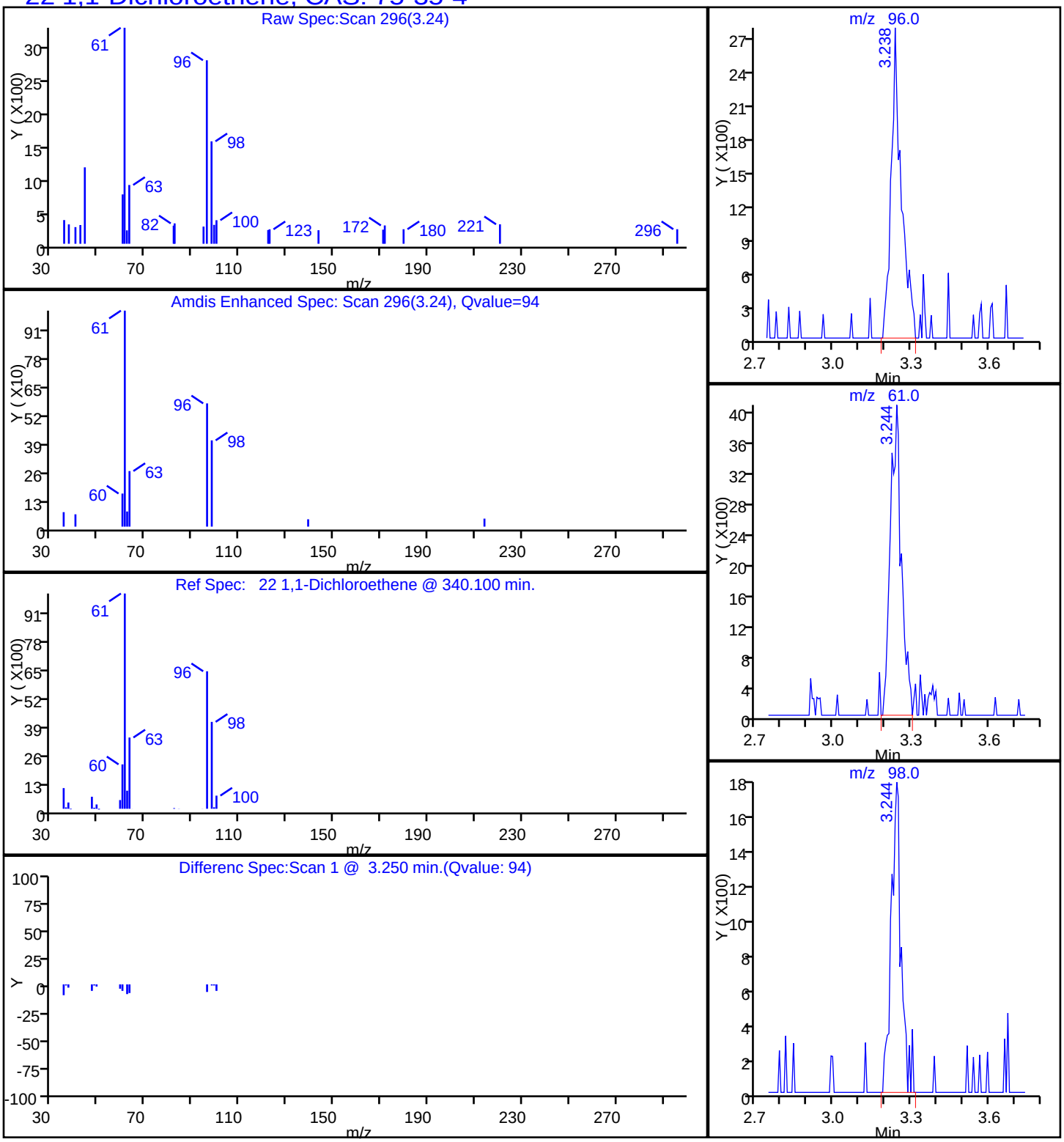
Report Date: 20-Oct-2016 07:55:44 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D

Injection Date:	19-Oct-2016 21:22:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-C-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	27	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	2.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

22 1,1-Dichloroethene, CAS: 75-35-4



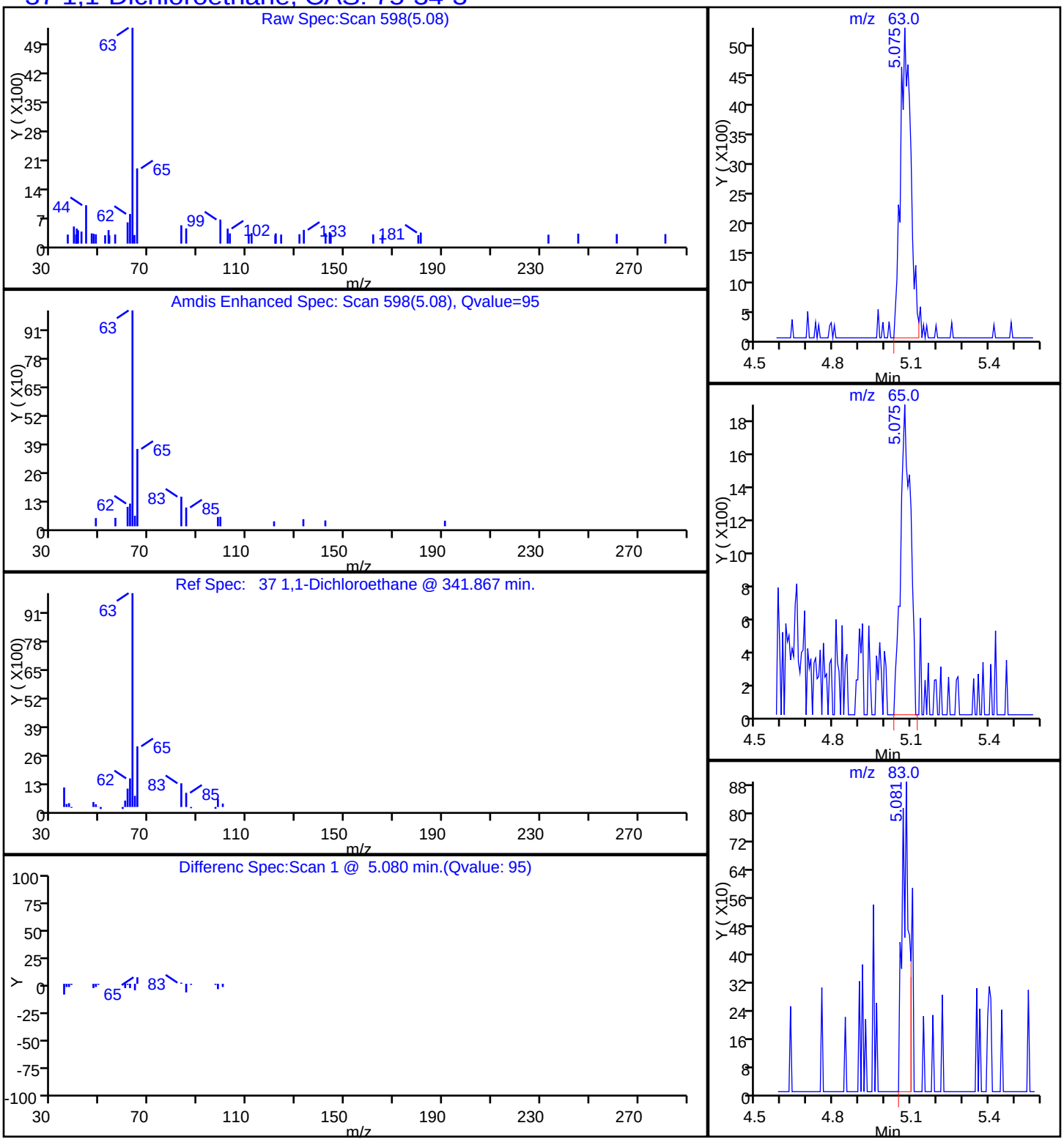
Report Date: 20-Oct-2016 07:55:44 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D

Injection Date:	19-Oct-2016 21:22:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-C-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	27	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	2.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

37 1,1-Dichloroethane, CAS: 75-34-3

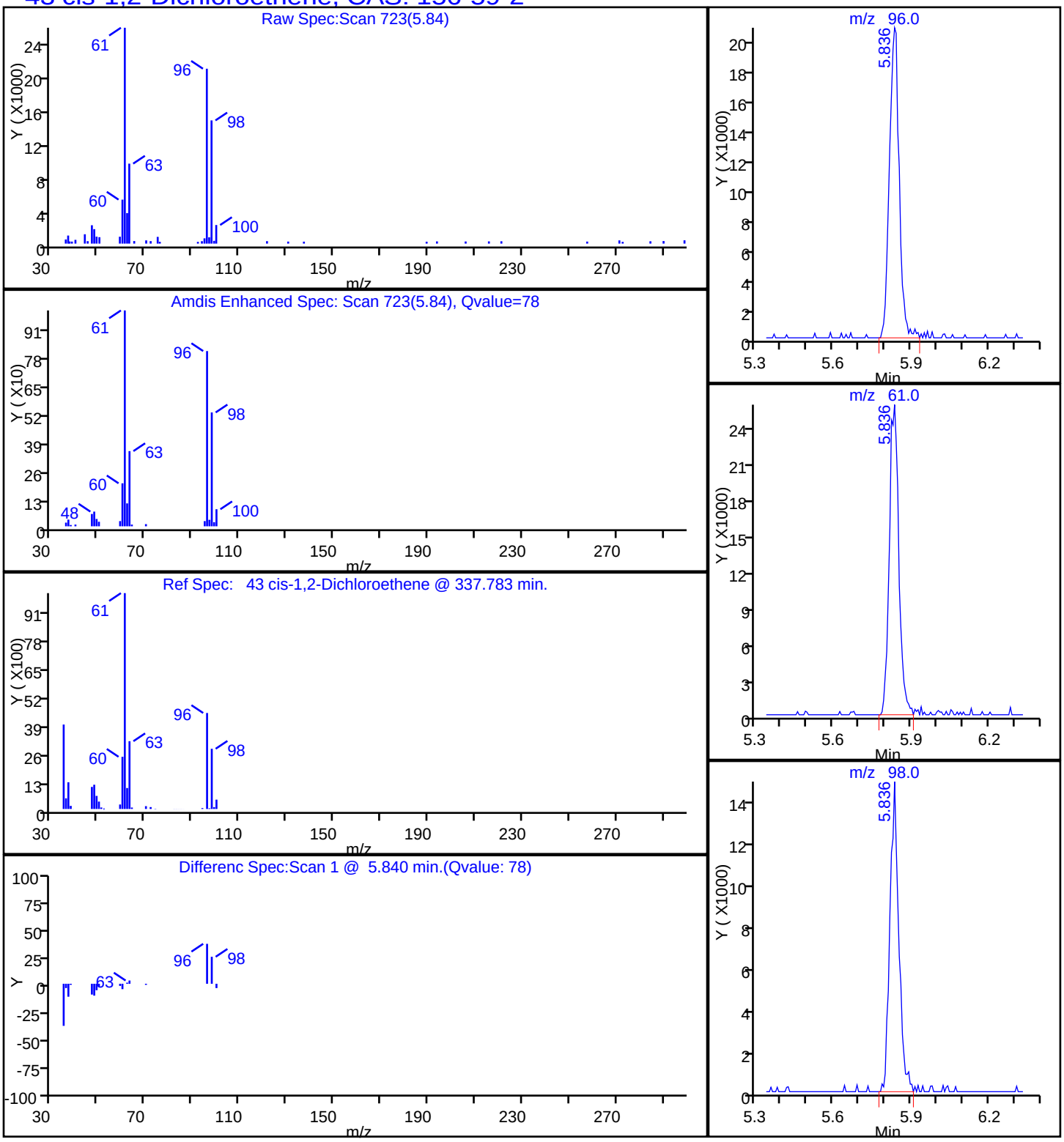


Report Date: 20-Oct-2016 07:55:44 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D				
Injection Date:	19-Oct-2016 21:22:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-C-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	27	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	2.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

43 cis-1,2-Dichloroethene, CAS: 156-59-2



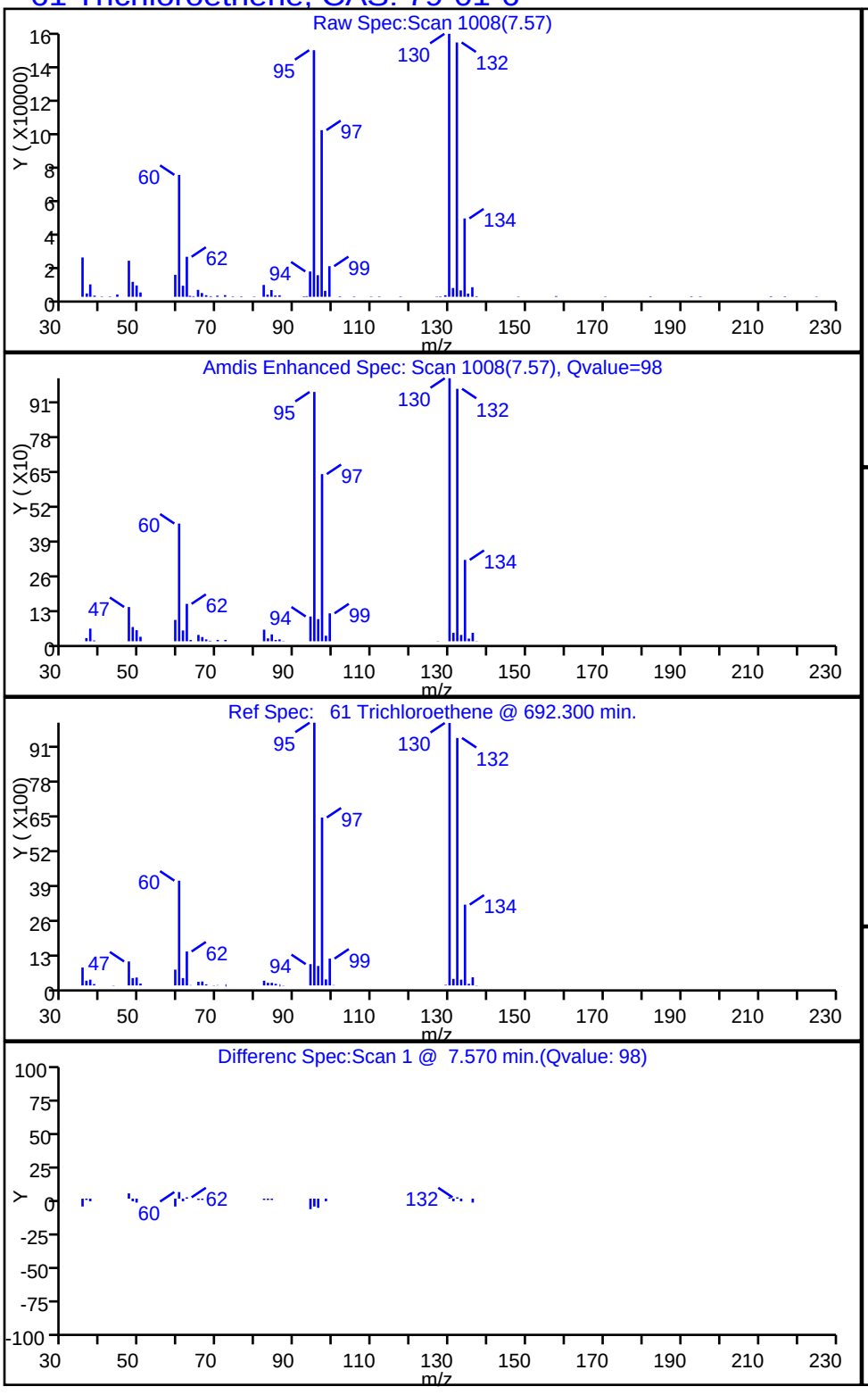
Report Date: 20-Oct-2016 07:55:44 Chrom Revision: 2.2 08-Sep-2016 14:45:52

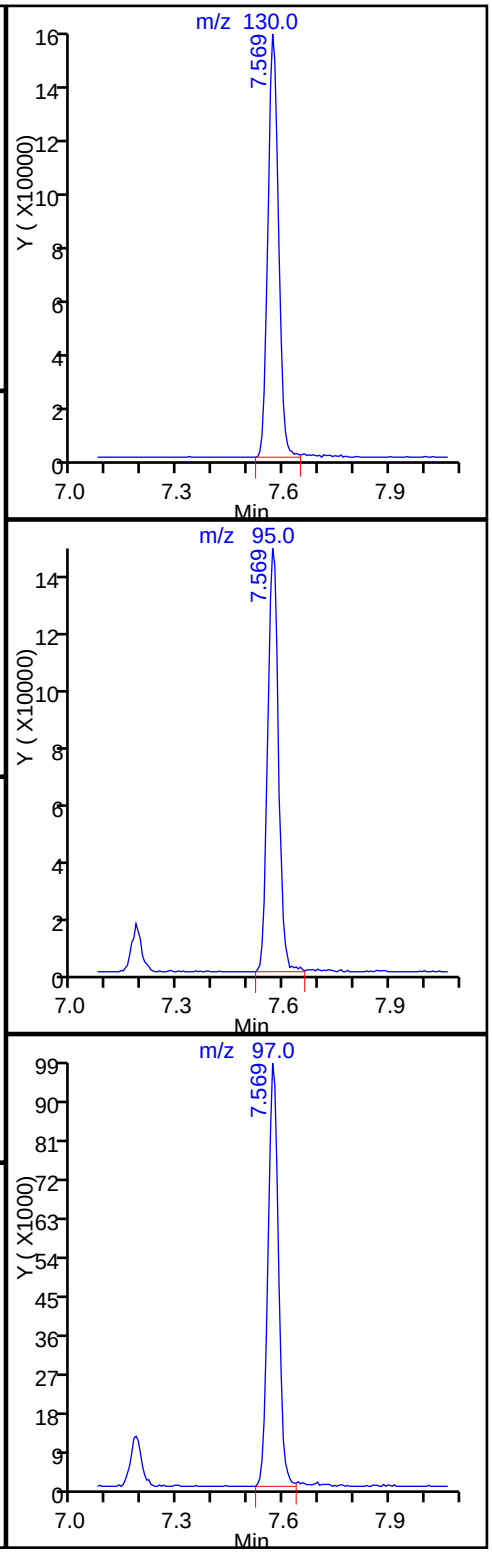
TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D

Injection Date:	19-Oct-2016 21:22:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-C-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	27	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	2.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

61 Trichloroethene, CAS: 79-01-6





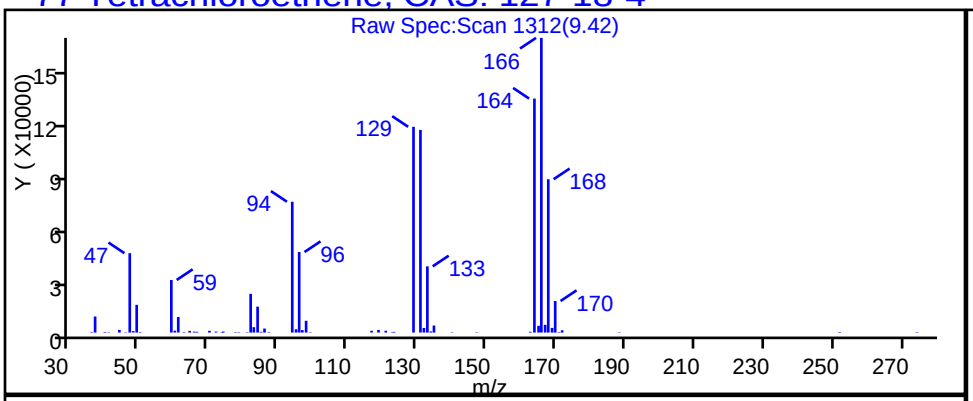
Report Date: 20-Oct-2016 07:55:44 Chrom Revision: 2.2 08-Sep-2016 14:45:52

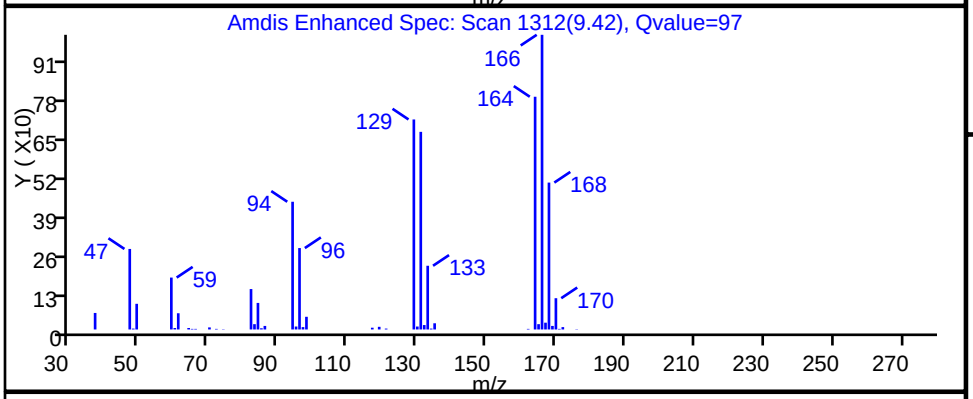
TestAmerica Pittsburgh

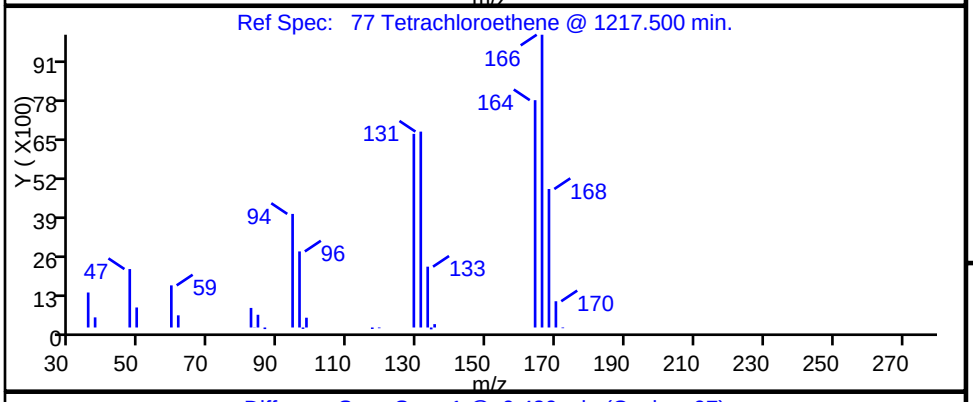
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019027.D

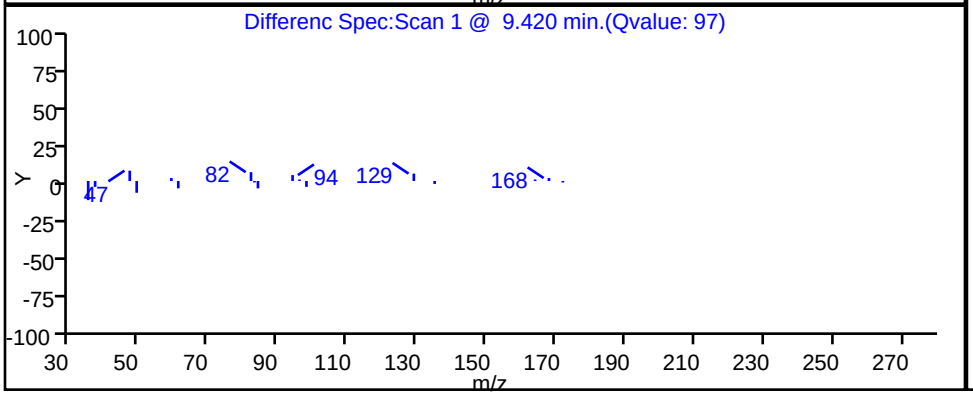
Injection Date:	19-Oct-2016 21:22:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-C-6	Lab Sample ID:	180-59749-6		
Client ID:	HD-MW-88-0/1-0				
Operator ID:	001562	ALS Bottle#:	27	Worklist Smp#:	27
Purge Vol:	5.000 mL	Dil. Factor:	2.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

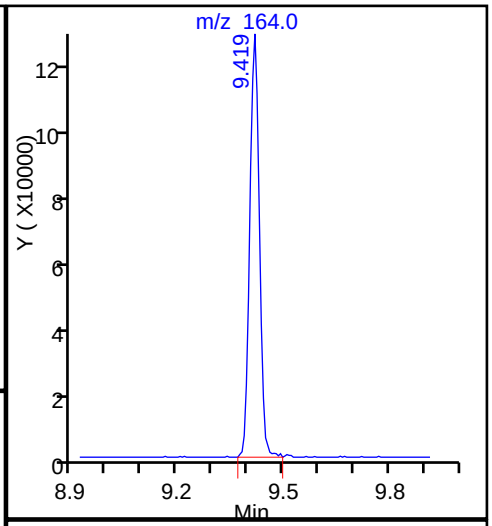
77 Tetrachloroethene, CAS: 127-18-4

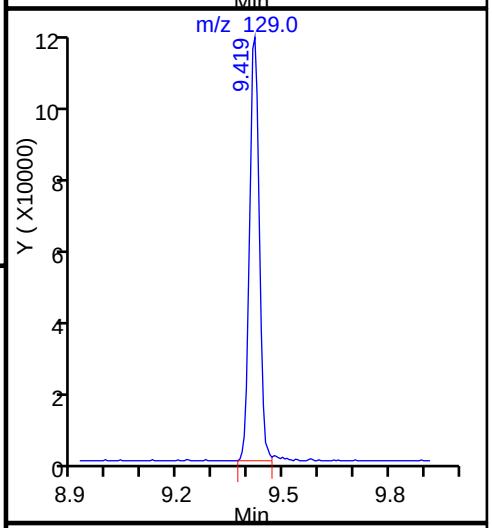


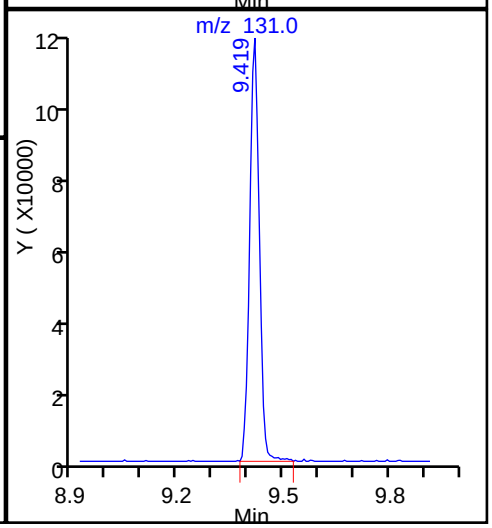












FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-12-0/1-0 | Lab Sample ID: 180-59749-7

Matrix: Water | Lab File ID: 61019028.D

Analysis Method: 8260C | Date Collected: 10/12/2016 11:45

Sample wt/vol: 5(mL) | Date Analyzed: 10/19/2016 21:46

Soil Aliquot Vol: | Dilution Factor: 3

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191652 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	3.0	U	3.0	0.68
75-01-4	Vinyl chloride	3.0	U	3.0	0.95
74-83-9	Bromomethane	3.0	U	3.0	1.1
75-00-3	Chloroethane	3.0	U	3.0	0.77
75-35-4	1,1-Dichloroethene	3.0	U	3.0	0.86
67-64-1	Acetone	15	U	15	7.5
75-15-0	Carbon disulfide	3.0	U	3.0	0.55
75-09-2	Methylene Chloride	3.0	U	3.0	1.1
156-60-5	trans-1,2-Dichloroethene	3.0	U	3.0	0.86
1634-04-4	Methyl tert-butyl ether	3.0	U	3.0	0.73
75-34-3	1,1-Dichloroethane	3.0	U	3.0	0.71
156-59-2	cis-1,2-Dichloroethene	58		3.0	0.86
74-97-5	Bromochloromethane	3.0	U	3.0	1.1
78-93-3	2-Butanone (MEK)	15	U	15	3.5
67-66-3	Chloroform	3.0	U	3.0	0.82
71-55-6	1,1,1-Trichloroethane	3.0	U	3.0	0.67
56-23-5	Carbon tetrachloride	3.0	U	3.0	0.73
71-43-2	Benzene	3.0	U	3.0	0.77
107-06-2	1,2-Dichloroethane	3.0	U	3.0	0.74
79-01-6	Trichloroethene	93		3.0	0.77
78-87-5	1,2-Dichloropropane	3.0	U	3.0	0.68
75-27-4	Bromodichloromethane	3.0	U	3.0	0.70
10061-01-5	cis-1,3-Dichloropropene	3.0	U	3.0	0.62
108-10-1	4-Methyl-2-pentanone (MIBK)	15	U	15	1.8
108-88-3	Toluene	3.0	U	3.0	0.84
10061-02-6	trans-1,3-Dichloropropene	3.0	U	3.0	0.72
79-00-5	1,1,2-Trichloroethane	3.0	U	3.0	1.0
127-18-4	Tetrachloroethene	4.3		3.0	0.80
591-78-6	2-Hexanone	15	U	15	2.2
124-48-1	Dibromochloromethane	3.0	U	3.0	1.2
106-93-4	1,2-Dibromoethane (EDB)	3.0	U	3.0	0.86
108-90-7	Chlorobenzene	3.0	U	3.0	0.94
630-20-6	1,1,1,2-Tetrachloroethane	3.0	U	3.0	0.59
100-41-4	Ethylbenzene	3.0	U	3.0	0.82
1330-20-7	Xylenes, Total	6.0	U	6.0	1.5
100-42-5	Styrene	3.0	U	3.0	0.79

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-12-0/1-0 | Lab Sample ID: 180-59749-7

Matrix: Water | Lab File ID: 61019028.D

Analysis Method: 8260C | Date Collected: 10/12/2016 11:45

Sample wt/vol: 5(mL) | Date Analyzed: 10/19/2016 21:46

Soil Aliquot Vol: | Dilution Factor: 3

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191652 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	3.0	U	3.0	0.88
79-34-5	1,1,2,2-Tetrachloroethane	3.0	U	3.0	1.0
107-13-1	Acrylonitrile	60	U	60	8.3
123-91-1	1,4-Dioxane	600	U	600	22

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	95		72-134
2037-26-5	Toluene-d8 (Surr)	106		80-120
460-00-4	4-Bromofluorobenzene (Surr)	99		72-120
1868-53-7	Dibromofluoromethane (Surr)	98		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019028.D
Lims ID: 180-59749-A-7
Client ID: HD-MW-12-0/1-0
Sample Type: Client
Inject. Date: 19-Oct-2016 21:46:30 ALS Bottle#: 28 Worklist Smp#: 28
Purge Vol: 5.000 mL Dil. Factor: 3.0000
Sample Info: 180-0013943-028
Misc. Info.: 180-59749-A-7, 3x
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 20-Oct-2016 07:57:39 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK024

First Level Reviewer: fergusond Date: 20-Oct-2016 07:57:39

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.119	4.139	-0.020	91	90089	1000.0	
* 2 Fluorobenzene (IS)	96	7.179	7.181	-0.002	99	389045	50.0	
* 3 Chlorobenzene-d5	119	10.288	10.289	-0.001	86	94819	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.636	12.631	0.005	96	139067	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.449	6.451	-0.002	93	81761	49.2	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.826	6.822	0.004	69	107297	47.7	
$ 7 Toluene-d8 (Surr)	98	8.834	8.835	-0.001	93	367497	53.0	
$ 8 4-Bromofluorobenzene (Surr	95	11.474	11.476	-0.002	89	129399	49.6	
12 Chloromethane	50		1.699				ND	
13 Vinyl chloride	62		1.839				ND	
15 Bromomethane	94		2.162				ND	
16 Chloroethane	64		2.296				ND	
22 1,1-Dichloroethene	96		3.226				ND	
24 Acetone	43	3.328	3.324	0.004	1	3523	7.59	M
26 Carbon disulfide	76		3.500				ND	
31 Methylene Chloride	84		4.005				ND	
33 Acrylonitrile	53		4.394				ND	
34 trans-1,2-Dichloroethene	96		4.425				ND	
35 Methyl tert-butyl ether	73		4.443				ND	
37 1,1-Dichloroethane	63		5.070				ND	
43 cis-1,2-Dichloroethene	96	5.835	5.830	0.005	79	232336	96.6	
44 2-Butanone (MEK)	43		5.842				ND	
48 Chlorobromomethane	128		6.116				ND	
50 Chloroform	83		6.268				ND	
51 1,1,1-Trichloroethane	97		6.420				ND	
53 Carbon tetrachloride	117		6.597				ND	
56 Benzene	78		6.828				ND	
57 1,2-Dichloroethane	62		6.907				ND	
61 Trichloroethene	130	7.568	7.570	-0.002	97	328366	155.6	
64 1,2-Dichloropropane	63		7.838				ND	
65 1,4-Dioxane	88		7.929				ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
68 Dichlorobromomethane	83		8.124				ND	
71 cis-1,3-Dichloropropene	75		8.574				ND	
72 4-Methyl-2-pentanone (MIBK	43		8.732				ND	
73 Toluene	91		8.902				ND	
74 trans-1,3-Dichloropropene	75		9.152				ND	
76 1,1,2-Trichloroethane	97		9.346				ND	
77 Tetrachloroethene	164	9.412	9.413	-0.001	95	11629	7.10	
79 2-Hexanone	43		9.565				ND	
81 Chlorodibromomethane	129		9.717				ND	
82 Ethylene Dibromide	107		9.827				ND	
84 Chlorobenzene	112		10.320				ND	
86 1,1,1,2-Tetrachloroethane	131		10.417				ND	
87 Ethylbenzene	106		10.417				ND	
88 m-Xylene & p-Xylene	106		10.551				ND	
89 o-Xylene	106		10.934				ND	
90 Styrene	104		10.952				ND	
91 Bromoform	173		11.135				ND	
96 1,1,2,2-Tetrachloroethane	83		11.615				ND	
S 131 Xylenes, Total	106		1.000				ND	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00060	Amount Added:	2.00	Units: uL	Run Reagent

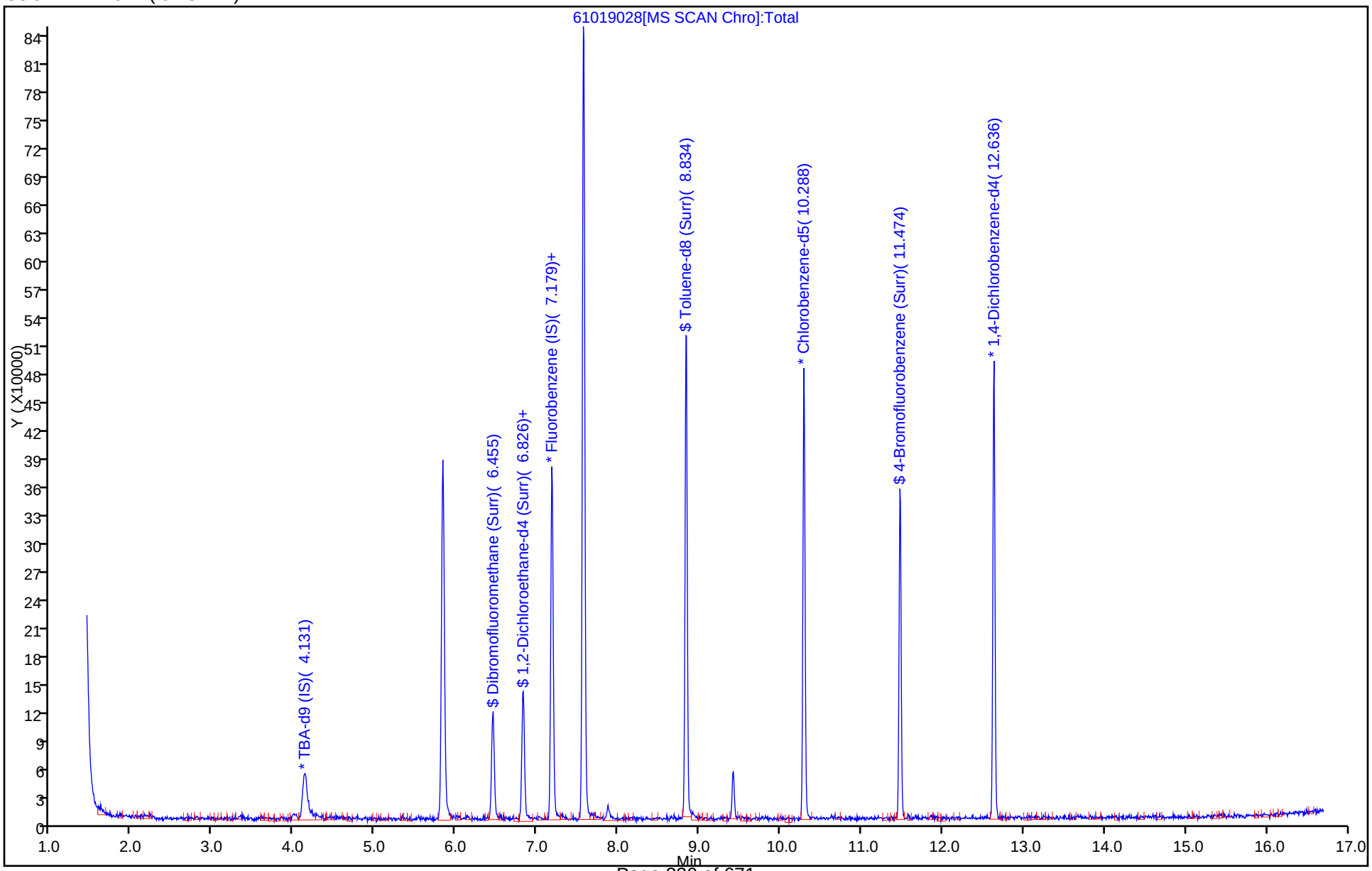
Report Date: 20-Oct-2016 07:57:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019028.D

Injection Date:	19-Oct-2016 21:46:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	180-59749-A-7	Lab Sample ID:	180-59749-7	Worklist Smp#:	28
Client ID:	HD-MW-12-0/1-0				
Purge Vol:	5.000 mL	Dil. Factor:	3.0000	ALS Bottle#:	28
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019028.D
Lims ID: 180-59749-A-7
Client ID: HD-MW-12-0/1-0
Sample Type: Client
Inject. Date: 19-Oct-2016 21:46:30 ALS Bottle#: 28 Worklist Smp#: 28
Purge Vol: 5.000 mL Dil. Factor: 3.0000
Sample Info: 180-0013943-028
Misc. Info.: 180-59749-A-7, 3x
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 20-Oct-2016 07:57:39 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK024

First Level Reviewer: fergusond Date: 20-Oct-2016 07:57:39

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	49.2	98.43
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	47.7	95.47
$ 7 Toluene-d8 (Surr)	50.0	53.0	105.97
$ 8 4-Bromofluorobenzene (Surr)	50.0	49.6	99.13

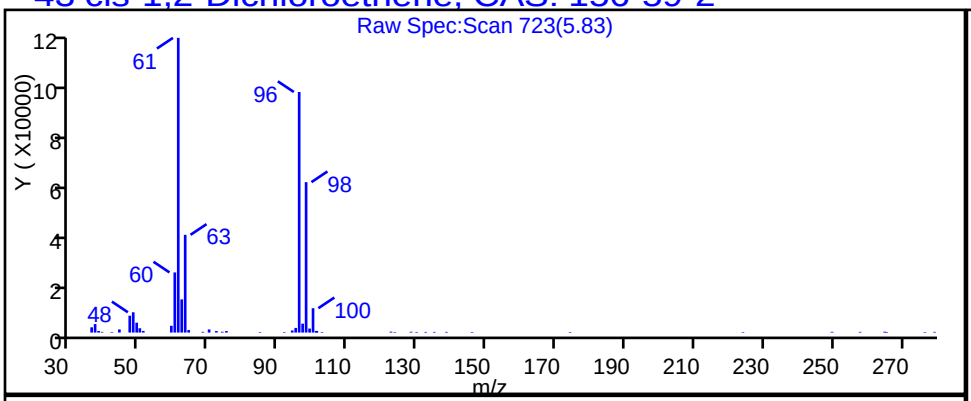
Report Date: 20-Oct-2016 07:57:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

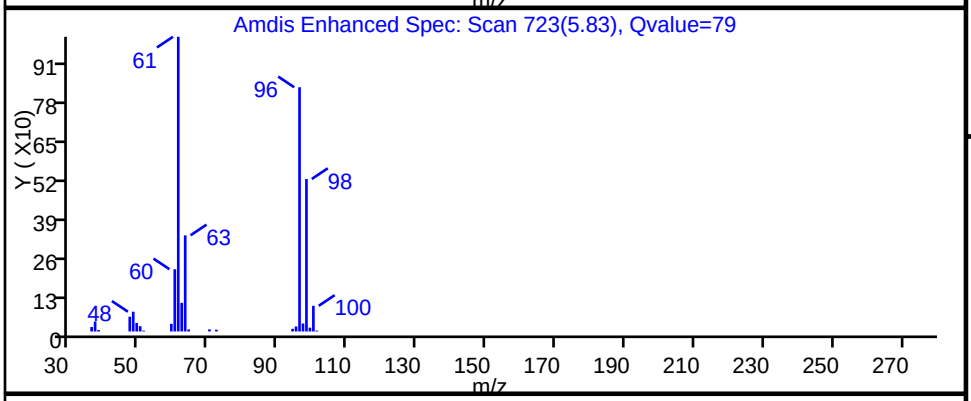
TestAmerica Pittsburgh

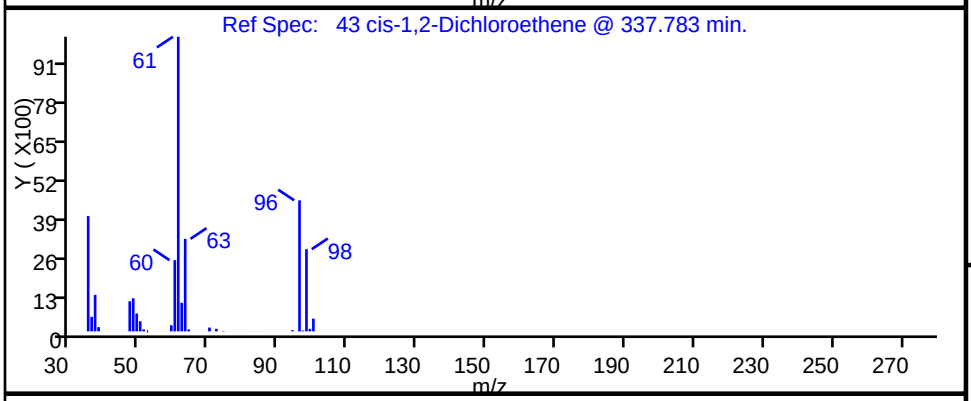
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019028.D

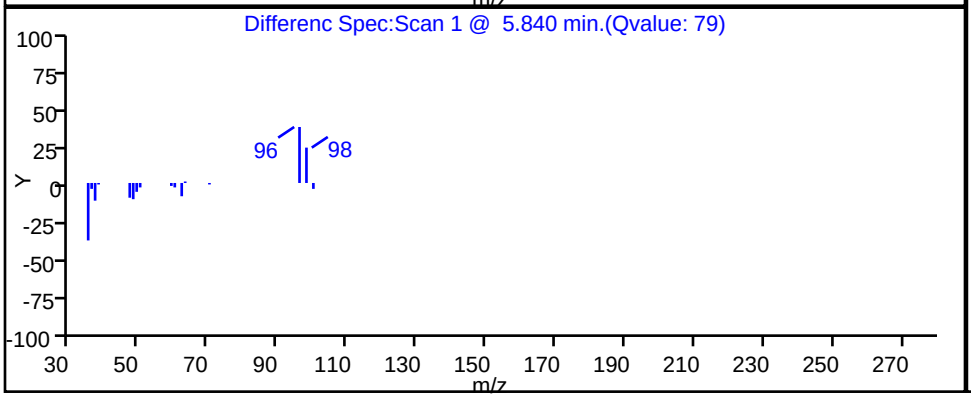
Injection Date:	19-Oct-2016 21:46:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-A-7	Lab Sample ID:	180-59749-7		
Client ID:	HD-MW-12-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	28
Purge Vol:	5.000 mL	Dil. Factor:	3.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

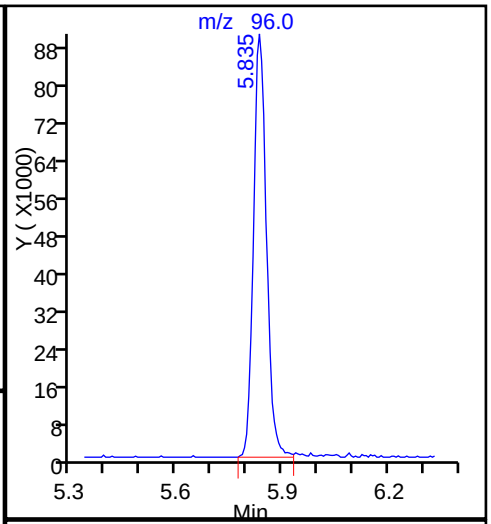
43 cis-1,2-Dichloroethene, CAS: 156-59-2

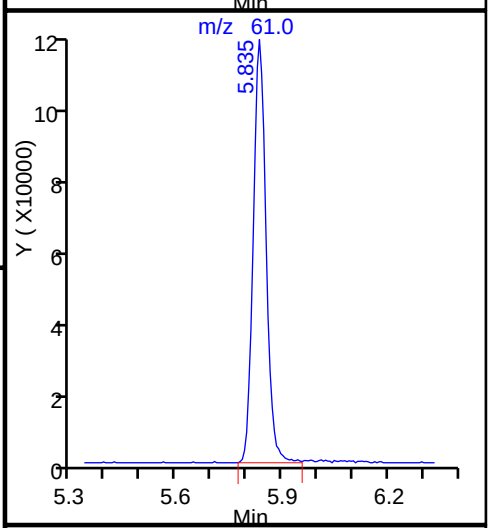


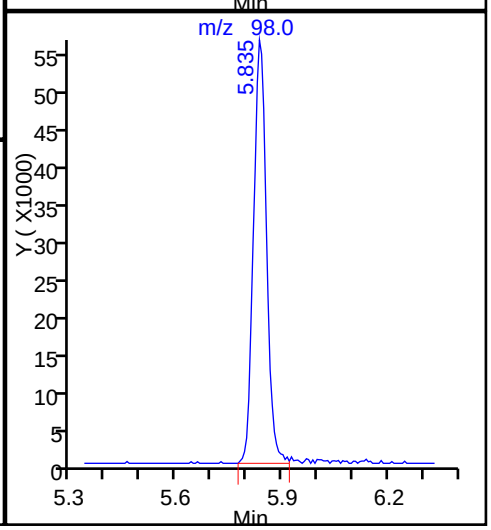












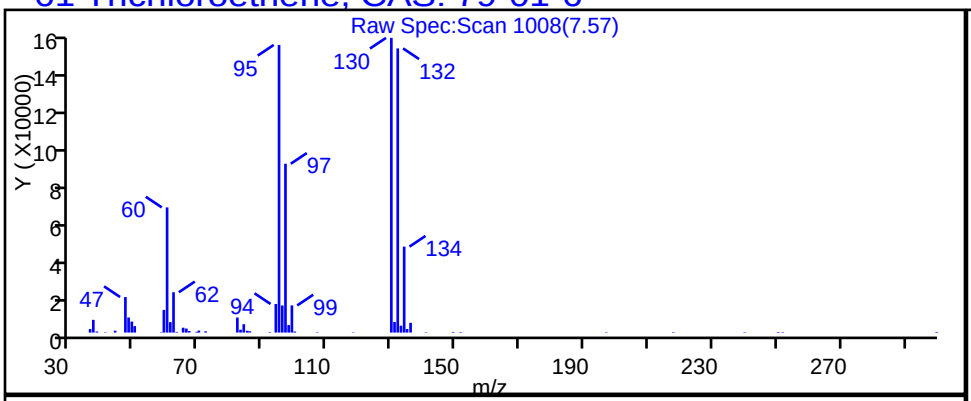
Report Date: 20-Oct-2016 07:57:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

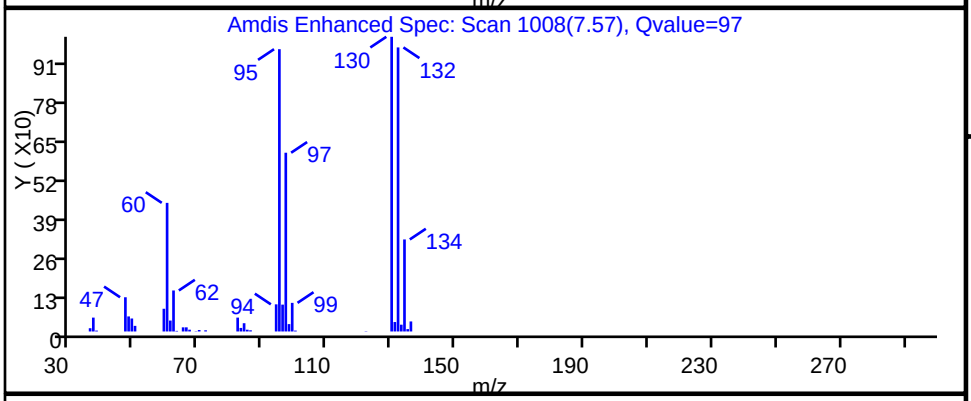
TestAmerica Pittsburgh

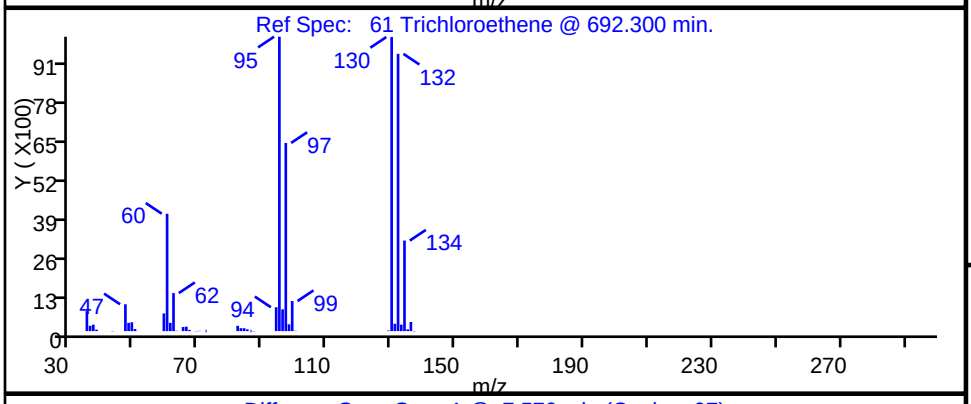
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019028.D

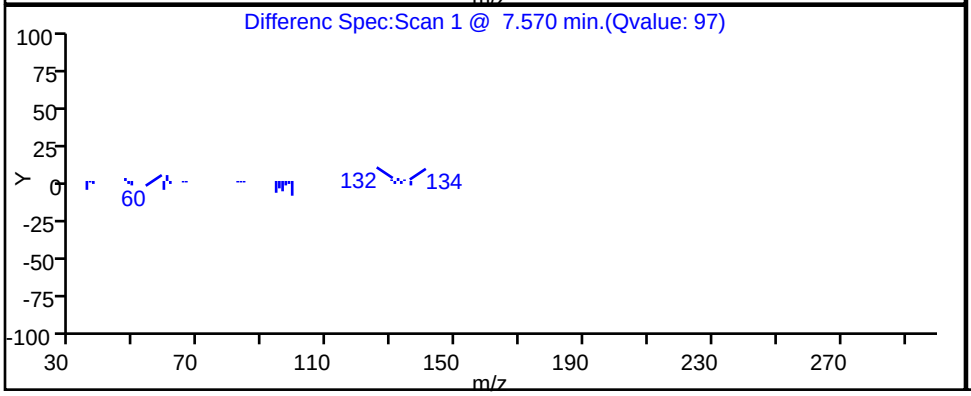
Injection Date:	19-Oct-2016 21:46:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-A-7	Lab Sample ID:	180-59749-7		
Client ID:	HD-MW-12-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	28
Purge Vol:	5.000 mL	Dil. Factor:	3.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

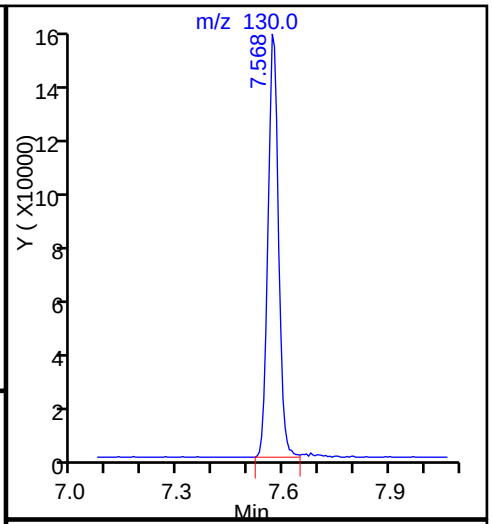
61 Trichloroethene, CAS: 79-01-6

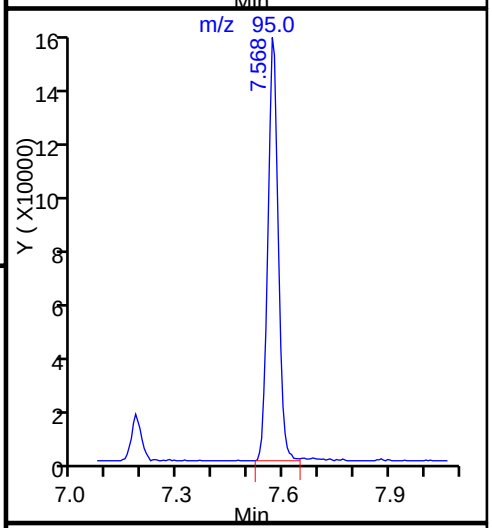


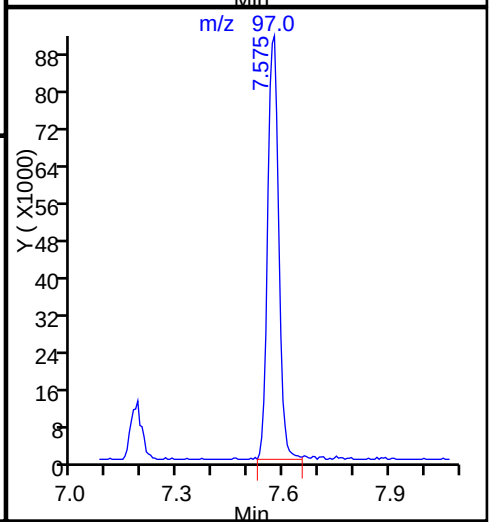












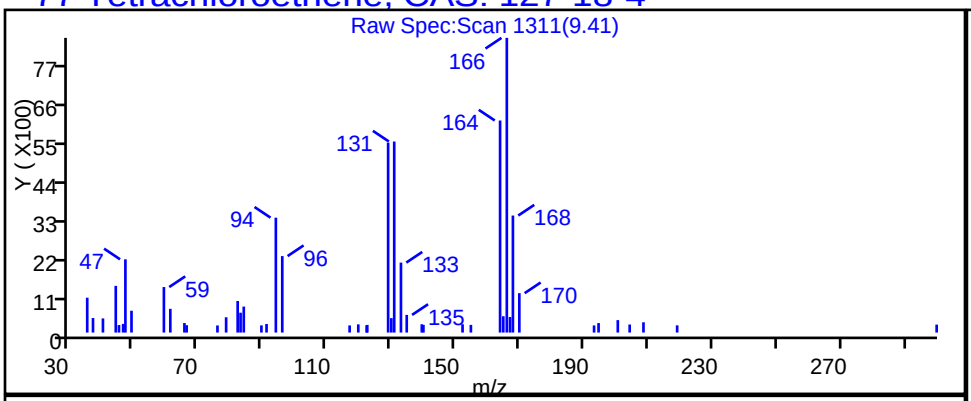
Report Date: 20-Oct-2016 07:57:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

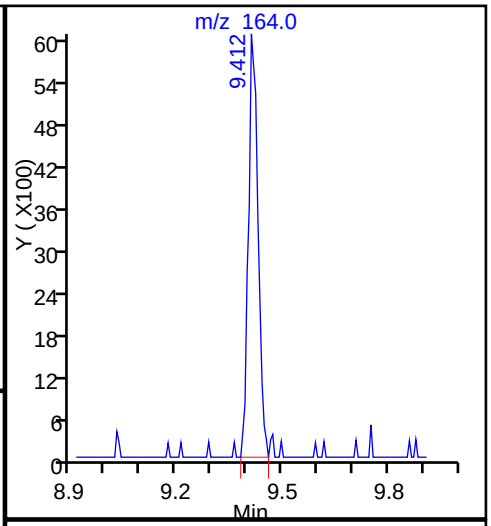
TestAmerica Pittsburgh

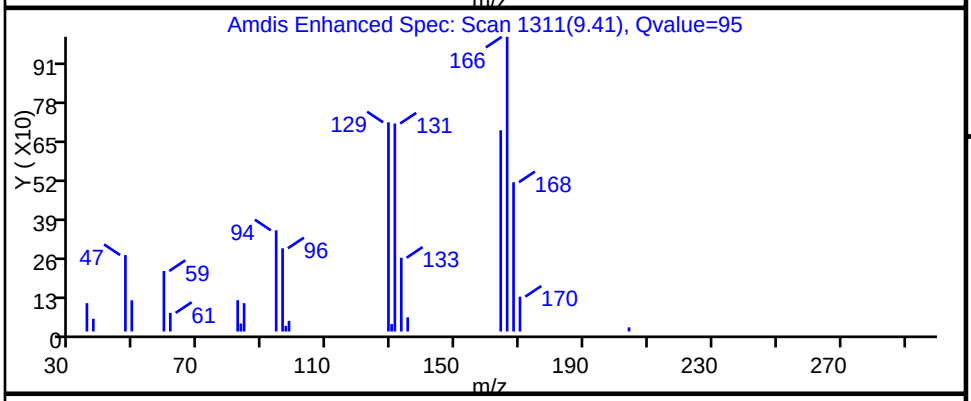
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019028.D

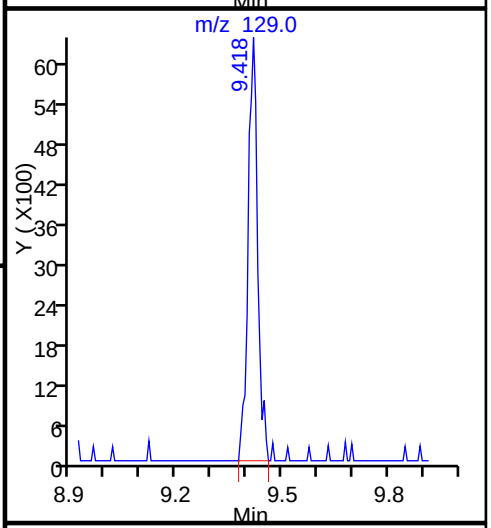
Injection Date:	19-Oct-2016 21:46:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-A-7	Lab Sample ID:	180-59749-7		
Client ID:	HD-MW-12-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	28
Purge Vol:	5.000 mL	Dil. Factor:	3.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

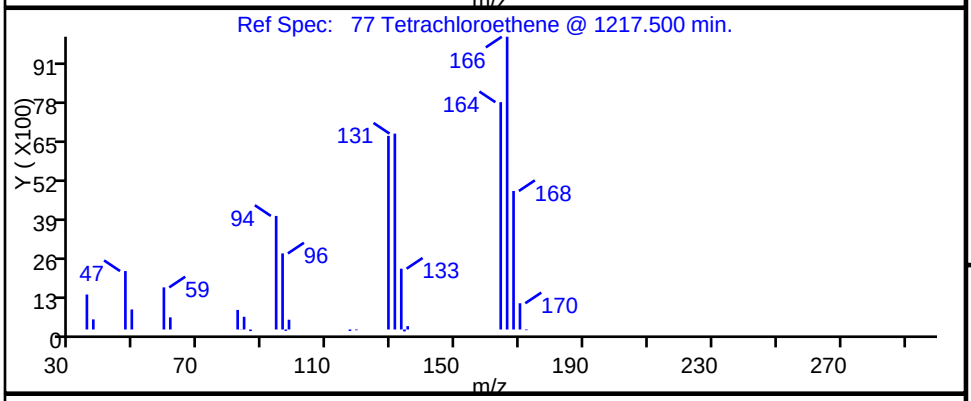
77 Tetrachloroethene, CAS: 127-18-4

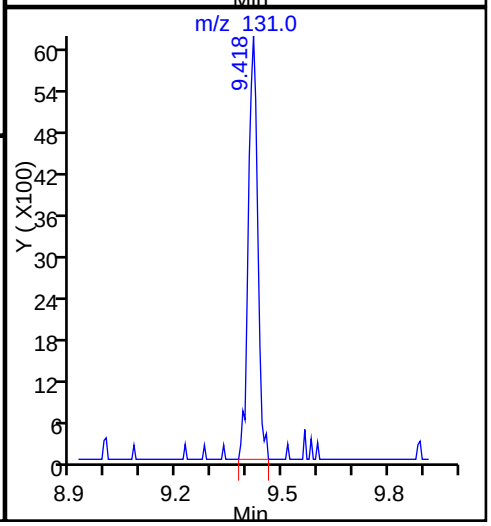


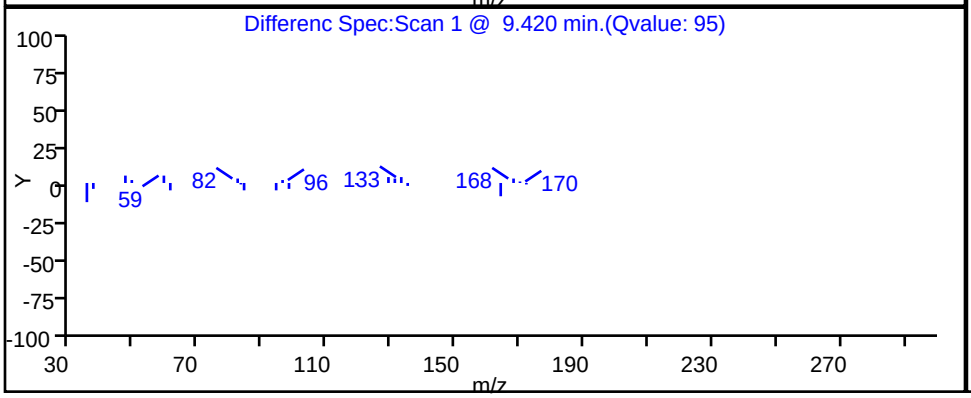












Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

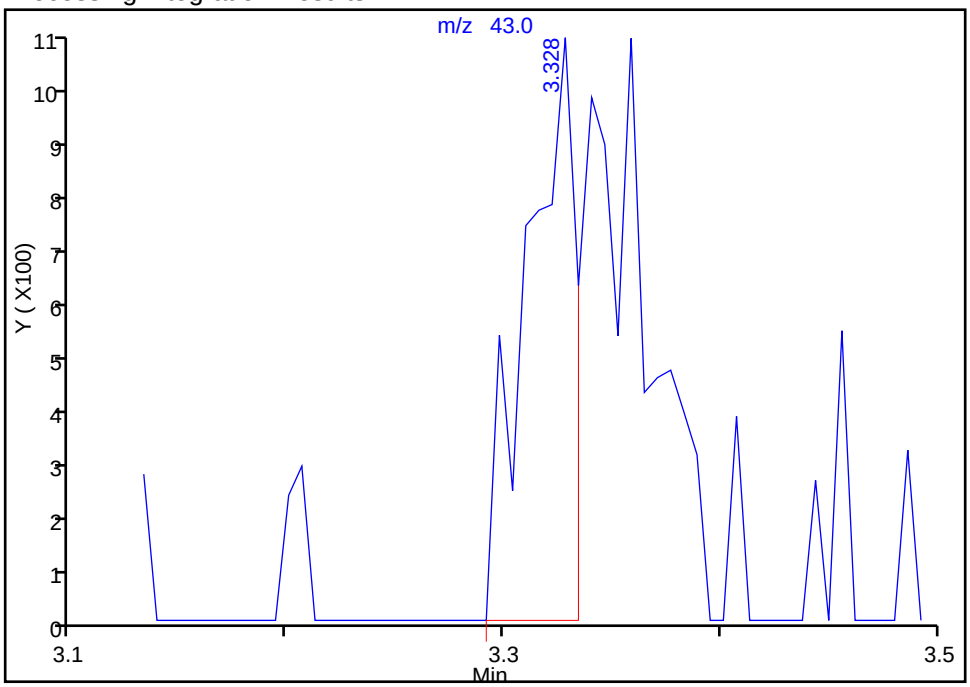
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019028.D				
Injection Date:	19-Oct-2016 21:46:30	Instrument ID:	CHHP6		
Lims ID:	180-59749-A-7	Lab Sample ID:	180-59749-7		
Client ID:	HD-MW-12-0/1-0				
Operator ID:	001562	ALS Bottle#:	28	Worklist Smp#:	28
Purge Vol:	5.000 mL	Dil. Factor:	3.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

24 Acetone, CAS: 67-64-1

Signal: 1

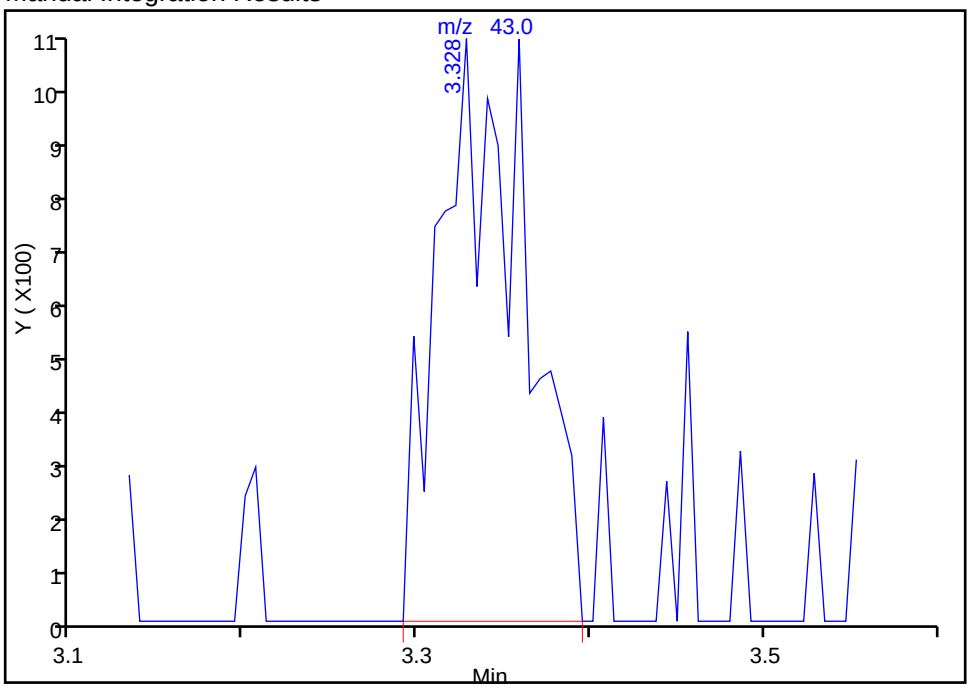
Processing Integration Results

RT: 3.33
Area: 1631
Amount: 3.512955
Amount Units: ng



Manual Integration Results

RT: 3.33
Area: 3523
Amount: 7.588069
Amount Units: ng



Reviewer: fergusond, 20-Oct-2016 07:57:39

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-189445/15	50928015.D
Level 2	IC 180-189445/5	50928005.D
Level 3	ICIS 180-189445/6	50928006.D
Level 4	IC 180-189445/7	50928007.D
Level 5	IC 180-189445/8	50928008.D
Level 6	IC 180-189445/9	50928009.D
Level 7	IC 180-189445/10	50928010.D
Level 8	IC 180-189445/11	50928011.D

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
Dichlorodifluoromethane	0.2847 0.3321	0.3183 0.3360	0.3472 0.3152	0.3647	0.3348	Ave		0.3291			0.1000	7.2		20.0			
Chloromethane	0.3967 0.3833	0.3641 0.3914	0.3875 0.3794	0.3770	0.3737	Ave		0.3816			0.1000	2.7		20.0			
Vinyl chloride	0.2964 0.3119	0.2980 0.3165	0.3300 0.3045	0.3213	0.3030	Ave		0.3102			0.1000	3.8		20.0			
1,3-Butadiene	0.3097 0.3504	0.3630 0.3531	0.3705 0.3423	0.3620	0.3442	Ave		0.3494			0.0100	5.4		20.0			
Bromomethane	0.1711 0.1299	0.1259 0.1307	0.1325 0.1320	0.1337	0.1206	Ave		0.1345			0.0500	11.4		20.0			
Chloroethane	0.2259 0.1900	0.1833 0.1995	0.1926 0.1958	0.1881	0.1809	Ave		0.1945			0.0500	7.2		20.0			
Dichlorofluoromethane	0.4572 0.4056	0.3811 0.4229	0.3956 0.4127	0.4140	0.3895	Ave		0.4098			0.0100	5.8		20.0			
Trichlorofluoromethane	0.2681 0.2922	0.2875 0.3034	0.3046 0.2954	0.3097	0.2840	Ave		0.2931			0.1000	4.6		20.0			
Ethyl ether	0.2661 0.2577	0.2253 0.2551	0.2446 0.2824	0.2416	0.2575	Ave		0.2538			0.0100	6.7		20.0			
Acrolein	0.0599 0.0589	0.0561 0.0580	0.0591 0.0651	0.0518	0.0574	Ave		0.0583			0.0100	6.4		20.0			
1,1-Dichloroethene	0.2737 0.2878	0.2791 0.2911	0.2912 0.2846	0.2817	0.2789	Ave		0.2835			0.1000	2.2		20.0			
1,1,2-Trichloro-1,2,2-trifluoroethane	0.2557 0.2892	0.2739 0.2937	0.3038 0.2818	0.2969	0.2874	Ave		0.2853			0.1000	5.3		20.0			
Acetone	0.0954 0.0912	0.1026 0.0893	0.1084 0.1138	0.0882	0.0955	Ave		0.0981			0.0500	9.5		20.0			
Iodomethane	0.4217 0.4028	0.3946 0.4103	0.4072 0.4133	0.4060	0.3878	Ave		0.4055			0.0100	2.6		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
Carbon disulfide	0.7234 0.7718	0.7461 0.7776	0.8013 0.7676	0.7724	0.7439	Ave		0.7630			0.1000	3.2		20.0			
Allyl chloride	0.1959 0.1870	0.1767 0.1889	0.1884 0.1915	0.1778	0.1846	Ave		0.1864			0.0100	3.5		20.0			
Methyl acetate	0.2780 0.2390	0.2207 0.2398	0.2387 0.2633	0.2198	0.2311	Ave		0.2413			0.1000	8.3		20.0			
Methylene Chloride	0.4696 0.3088	0.3127 0.3160	0.3168 0.3187	0.2998	0.2908	Ave		0.3291			0.1000	17.5		20.0			
tert-Butyl alcohol	1.1010 1.1227	1.1957 1.0770	1.1922 1.1646	0.9928	1.1028	Ave		1.1186			0.0100	6.0		20.0			
Acrylonitrile	0.1255 0.1156	0.1116 0.1160	0.1176 0.1271	0.1076	0.1150	Ave		0.1170			0.0100	5.6		20.0			
trans-1,2-Dichloroethene	0.2889 0.2893	0.2841 0.2945	0.2976 0.2896	0.2922	0.2834	Ave		0.2899			0.1000	1.7		20.0			
Methyl tert-butyl ether	0.8730 0.8239	0.7474 0.8300	0.8170 0.8480	0.7800	0.7812	Ave		0.8126			0.1000	5.0		20.0			
Hexane	0.4573 0.4647	0.4393 0.4746	0.4687 0.4579	0.4607	0.4463	Ave		0.4587			0.0100	2.5		20.0			
1,1-Dichloroethane	0.6042 0.5733	0.5525 0.5800	0.5824 0.5820	0.5597	0.5411	Ave		0.5719			0.2000	3.5		20.0			
Vinyl acetate	0.5918 0.5896	0.5531 0.5977	0.5749 0.6190	0.5545	0.5641	Ave		0.5806			0.0100	4.0		20.0			
2,2-Dichloropropane	0.3425 0.3337	0.3632 0.3345	0.3534 0.3250	0.3446	0.3309	Ave		0.3410			0.0100	3.7		20.0			
cis-1,2-Dichloroethene	0.3424 0.3325	0.3115 0.3349	0.3268 0.3386	0.3172	0.3160	Ave		0.3275			0.1000	3.5		20.0			
2-Butanone (MEK)	0.1562 0.1470	0.1554 0.1409	0.1431 0.1596	0.1267	0.1420	Ave		0.1464			0.0500	7.3		20.0			
Bromochloromethane	0.1467 0.1356	0.1275 0.1393	0.1295 0.1429	0.1313	0.1263	Ave		0.1349			0.0100	5.6		20.0			
Tetrahydrofuran	0.1344 0.0916	0.0906 0.0951	0.0981 0.1078	0.0800	0.0952	Ave		0.0991			0.0100	16.4		20.0			
Chloroform	0.5637 0.5083	0.4712 0.5162	0.5088 0.5214	0.4971	0.4886	Ave		0.5094			0.2000	5.3		20.0			
1,1,1-Trichloroethane	0.4070 0.3999	0.3975 0.4144	0.4173 0.4060	0.4172	0.3900	Ave		0.4062			0.1000	2.4		20.0			
Cyclohexane	0.5960 0.5982	0.5877 0.6110	0.6284 0.5781	0.6157	0.5840	Ave		0.5999			0.1000	2.9		20.0			
Carbon tetrachloride	0.2872 0.3364	0.3191 0.3510	0.3363 0.3430	0.3296	0.3267	Ave		0.3287			0.1000	5.9		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
1,1-Dichloropropene	0.4045 0.4094	0.3905 0.4180	0.4147 0.4069	0.4140	0.3965	Ave		0.4068			0.0100	2.3		20.0			
Isobutyl alcohol	0.0091 0.0066	0.0066 0.0067	0.0076 0.0080	0.0061	0.0072	Ave		0.0072		*	0.0100	13.3		20.0			
Benzene	1.2499 1.1394	1.1255 1.1419	1.1812 1.1386	1.1175	1.0930	Ave		1.1484			0.5000	4.2		20.0			
1,2-Dichloroethane	0.4401 0.4085	0.3683 0.4192	0.3907 0.4323	0.3782	0.3851	Ave		0.4028			0.1000	6.5		20.0			
n-Heptane	0.3588 0.3898	0.3756 0.3874	0.3930 0.3889	0.3766	0.3750	Ave		0.3806			0.0100	3.0		20.0			
Trichloroethene	0.2832 0.2835	0.2646 0.2873	0.2887 0.2945	0.2736	0.2727	Ave		0.2810			0.2000	3.5		20.0			
Methylcyclohexane	0.4435 0.5004	0.4947 0.5090	0.5289 0.4857	0.5055	0.4942	Ave		0.4952			0.1000	5.0		20.0			
1,2-Dichloropropane	0.3217 0.2999	0.2678 0.2988	0.2965 0.3097	0.2776	0.2808	Ave		0.2941			0.1000	6.0		20.0			
1,4-Dioxane	0.0018 0.0021	0.0017 0.0022	0.0022 0.0024	0.0020	0.0021	Ave		0.0021		*	0.0100	10.8		20.0			
Dibromomethane	0.1523 0.1614	0.1374 0.1604	0.1499 0.1692	0.1439	0.1497	Ave		0.1530			0.0100	6.7		20.0			
Bromodichloromethane	0.3121 0.3398	0.2904 0.3430	0.3129 0.3534	0.3067	0.3148	Ave		0.3217			0.2000	6.7		20.0			
2-Chloroethyl vinyl ether	0.1568 0.1626	0.1470 0.1591	0.1510 0.1694	0.1413	0.1477	Ave		0.1544			0.0100	6.0		20.0			
cis-1,3-Dichloropropene	0.4078 0.4366	0.3826 0.4310	0.4179 0.4546	0.3935	0.3993	Ave		0.4154			0.2000	5.8		20.0			
4-Methyl-2-pentanone (MIBK)	1.3300 1.2449	1.3028 1.2835	1.2990 1.3376	1.2146	1.2244	Ave		1.2796			0.1000	3.7		20.0			
Toluene	5.5176 4.8097	5.3247 4.6596	5.4471 4.6725	5.0749	4.8495	Ave		5.0445			0.4000	6.9		20.0			
trans-1,3-Dichloropropene	1.4733 1.6008	1.5067 1.6188	1.6048 1.7152	1.5140	1.5255	Ave		1.5699			0.1000	5.1		20.0			
Ethyl methacrylate	1.6330 1.5554	1.5225 1.5112	1.5599 1.6238	1.4847	1.4742	Ave		1.5456			0.0100	3.8		20.0			
1,1,2-Trichloroethane	1.0303 0.9240	0.9267 0.9028	0.9492 0.9564	0.9144	0.8902	Ave		0.9368			0.1000	4.7		20.0			
Tetrachloroethene	0.8882 0.8937	0.9800 0.8932	1.0165 0.8856	0.9281	0.8918	Ave		0.9221			0.2000	5.4		20.0			
1,3-Dichloropropane	1.9571 1.7418	1.7086 1.7051	1.8377 1.8072	1.7127	1.6703	Ave		1.7675			0.0100	5.4		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
2-Hexanone	0.9948 1.0005	1.0138 1.0070	1.0558 1.0672	0.9738	0.9965	Ave		1.0137			0.1000	3.1		20.0			
Dibromochloromethane	0.8204 0.8895	0.8133 0.8930	0.8580 0.9574	0.8434	0.8340	Ave		0.8636			0.1000	5.5		20.0			
1,2-Dibromoethane (EDB)	0.9561 0.9439	0.9307 0.9329	1.0025 0.9842	0.9279	0.9043	Ave		0.9478			0.1000	3.4		20.0			
3-Chlorobenzotrifluoride	1.6823 1.5641	1.8298 1.5756	1.7786 1.5313	1.6079	1.6587	Ave		1.6535			0.0100	6.4		20.0			
Chlorobenzene	3.2166 2.9207	3.2217 2.8758	3.2576 2.9134	3.0092	2.9255	Ave		3.0426			0.5000	5.3		20.0			
4-Chlorobenzotrifluoride	1.5390 1.4821	1.6777 1.4830	1.6720 1.4402	1.5534	1.5449	Ave		1.5491			0.0100	5.6		20.0			
1,1,1,2-Tetrachloroethane	0.8993 0.9422	0.9320 0.9411	0.9938 0.9794	0.9373	0.9398	Ave		0.9456			0.0100	3.1		20.0			
Ethylbenzene	1.9537 1.6722	1.9081 1.6312	1.9001 1.6436	1.7245	1.7248	Ave		1.7698			0.1000	7.4		20.0			
m-Xylene & p-Xylene	2.3955 2.0616	2.2131 2.0280	2.3364 2.0290	2.1382	2.0945	Ave		2.1620			0.1000	6.5		20.0			
o-Xylene	2.1442 1.8932	2.0729 1.8542	2.2103 1.8623	1.9728	1.9734	Ave		1.9979			0.3000	6.6		20.0			
Styrene	3.6473 3.1970	3.4171 3.1503	3.5945 3.1172	3.3000	3.2692	Ave		3.3366			0.3000	6.0		20.0			
Bromoform	0.4518 0.5422	0.4553 0.5456	0.4929 0.5688	0.4790	0.5028	Ave		0.5048			0.1000	8.6		20.0			
2-Chlorobenzotrifluoride	1.5714 1.3913	1.6387 1.4290	1.6307 1.3642	1.4924	1.5247	Ave		1.5053			0.0100	7.0		20.0			
Isopropylbenzene	5.1249 4.4907	5.4138 4.4369	5.5319 4.2120	4.9286	4.9271	Ave		4.8832			0.1000	9.7		20.0			
Bromobenzene	1.1802 1.0563	1.0041 1.0157	1.0837 1.1262	1.0232	1.0077	Ave		1.0621			0.0100	6.0		20.0			
1,1,2,2-Tetrachloroethane	1.1464 1.0954	1.1364 1.0770	1.1926 1.0859	1.0998	1.0938	Ave		1.1159			0.3000	3.5		20.0			
trans-1,4-Dichloro-2-butene	0.3117 0.4478	0.3642 0.4424	0.3882 0.4916	0.3867	0.3937	Ave		0.4033			0.0100	13.8		20.0			
1,2,3-Trichloropropane	0.3432 0.3807	0.3595 0.3691	0.3688 0.4124	0.3319	0.3498	Ave		0.3644			0.0100	6.8		20.0			
N-Propylbenzene	1.3224 1.2329	1.2478 1.2256	1.3449 1.2824	1.2292	1.2472	Ave		1.2665			0.0100	3.6		20.0			
2-Chlorotoluene	1.1553 1.0361	1.0213 0.9998	1.0924 1.0690	1.0017	1.0292	Ave		1.0506			0.0100	5.0		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
3-Chlorotoluene	1.1306 1.0938	1.1503 1.1113	1.1714 1.1732	1.0796	1.0952	Ave		1.1257			0.0100	3.2		20.0			
1,3,5-Trimethylbenzene	3.3044 3.2506	3.4234 3.1906	3.7154 3.2809	3.3576	3.3046	Ave		3.3534			0.0100	4.8		20.0			
4-Chlorotoluene	1.1796 1.0769	1.0844 1.0585	1.1282 1.1123	1.1063	1.0409	Ave		1.0984			0.0100	4.0		20.0			
tert-Butylbenzene	2.8643 2.6754	2.9344 2.6618	3.0969 2.7221	2.8484	2.7620	Ave		2.8207			0.0100	5.2		20.0			
1,2,4-Trimethylbenzene	3.4022 3.2336	3.3150 3.2250	3.5948 3.2808	3.3411	3.2961	Ave		3.3361			0.0100	3.6		20.0			
3,4-Dichlorobenzotrifluoride	0.9604 0.8677	0.9626 0.9071	0.9468 0.8949	0.8893	0.9179	Ave		0.9183			0.0100	3.8		20.0			
sec-Butylbenzene	3.9473 3.6714	4.0403 3.6718	4.2779 3.6836	3.9748	3.8375	Ave		3.8881			0.0100	5.5		20.0			
1,3-Dichlorobenzene	1.8631 1.6612	1.6358 1.6843	1.7592 1.7268	1.6654	1.6494	Ave		1.7057			0.6000	4.4		20.0			
4-Isopropyltoluene	2.9843 2.9075	3.1498 2.9480	3.3952 2.9294	3.1434	3.0366	Ave		3.0618			0.0100	5.3		20.0			
1,4-Dichlorobenzene	1.8787 1.6786	1.6047 1.6893	1.7329 1.7184	1.6545	1.6085	Ave		1.6957			0.5000	5.1		20.0			
2,4-Dichlorobenzotrifluoride	0.7157 0.7453	0.8337 0.7859	0.8397 0.7599	0.7726	0.7943	Ave		0.7809			0.0100	5.4		20.0			
2,5-Dichlorobenzotrifluoride	1.0279 0.8679	0.8553 0.8879	0.9182 0.8698	0.8858	0.8892	Ave		0.9002			0.0100	6.1		20.0			
n-Butylbenzene	2.3254 2.5214	2.5529 2.6015	2.7701 2.5146	2.6372	2.5502	Ave		2.5592			0.0100	4.9		20.0			
1,2-Dichlorobenzene	1.5835 1.3847	1.3441 1.4352	1.4600 1.4155	1.4245	1.3722	Ave		1.4275			0.4000	5.1		20.0			
1,2-Dibromo-3-Chloropropane	0.1162 0.1638	0.1237 0.1630	0.1417 0.1619	0.1411	0.1354	Ave		0.1433			0.0500	12.8		20.0			
2,4- & 2,5- & 2,6- Dichlorotoluene	0.8904 0.9411	0.8585 1.0312	0.9099 0.8899	0.9573	0.8696	Ave		0.9185			0.0100	6.2		20.0			
2,3- & 3,4- Dichlorotoluene	0.8253 0.9654	0.8041 1.0648	0.8510 0.9015	0.9374	0.8260	Ave		0.8969			0.0100	9.9		20.0			
1,2,4-Trichlorobenzene	0.6088 0.7087	0.5307 0.7720	0.5496 0.6664	0.6648	0.5286	Ave		0.6287			0.2000	14.2		20.0			
Hexachlorobutadiene	0.2867 0.3411	0.2609 0.3493	0.2876 0.3068	0.3480	0.2648	Ave		0.3056			0.0100	11.9		20.0			
Naphthalene	1.5853 2.1229	1.5116 2.2323	1.5837 2.0109	1.9860	1.6323	Ave		1.8331			0.0100	15.5		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
1,2,3-Trichlorobenzene	0.4741 0.6717	0.4747 0.7158	0.4765 0.6242	0.6215	0.4594	Ave		0.5647			0.0100	18.5		20.0			
2,4,5-Trichlorotoluene	0.3887 0.5715	0.3746 0.5758	0.3794 0.6397	0.5156	0.4065	Qua	0.0483	0.3496	0.0011627		0.0100				0.9960		0.9900
2,3,6-Trichlorotoluene	0.4168 0.5044	0.3684 0.5385	0.3731 0.5829	0.4731	0.3673	Ave		0.4531			0.0100	18.5		20.0			
Dibromofluoromethane (Surr)	0.2494 0.2213	0.2212 0.2290	0.2227 0.2328	0.2123	0.2143	Ave		0.2254				5.3		20.0			
1,2-Dichloroethane-d4 (Surr)	0.3728 0.2984	0.2960 0.3048	0.2975 0.3187	0.2830	0.2799	Ave		0.3064				9.6		20.0			
Toluene-d8 (Surr)	4.7811 3.5328	4.4473 3.5414	4.2179 3.5628	3.8089	3.5805	Ave		3.9341				12.4		20.0			
4-Bromofluorobenzene (Surr)	1.9176 1.2974	1.5482 1.3152	1.5428 1.3052	1.3554	1.3471	Ave		1.4536				14.7		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-189445/15	50928015.D
Level 2	IC 180-189445/5	50928005.D
Level 3	ICIS 180-189445/6	50928006.D
Level 4	IC 180-189445/7	50928007.D
Level 5	IC 180-189445/8	50928008.D
Level 6	IC 180-189445/9	50928009.D
Level 7	IC 180-189445/10	50928010.D
Level 8	IC 180-189445/11	50928011.D

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
Dichlorodifluoromethane	FB	Ave	10690 458360	71866 517273	149434 594622	233239	286586	5.00 175	25.0 200	50.0 250	75.0	100
Chloromethane	FB	Ave	14896 529035	82217 602464	166785 715799	241116	319936	5.00 175	25.0 200	50.0 250	75.0	100
Vinyl chloride	FB	Ave	11131 430527	67290 487261	142059 574513	205496	259398	5.00 175	25.0 200	50.0 250	75.0	100
1,3-Butadiene	FB	Ave	11630 483690	81965 543545	159499 645769	231496	294630	5.00 175	25.0 200	50.0 250	75.0	100
Bromomethane	FB	Ave	6425 179335	28423 201143	57020 249057	85488	103284	5.00 175	25.0 200	50.0 250	75.0	100
Chloroethane	FB	Ave	8482 262204	41381 307056	82913 369458	120292	154860	5.00 175	25.0 200	50.0 250	75.0	100
Dichlorofluoromethane	FB	Ave	17168 559873	86050 650922	170288 778608	264797	333435	5.00 175	25.0 200	50.0 250	75.0	100
Trichlorofluoromethane	FB	Ave	10067 403311	64906 466981	131129 557326	198057	243151	5.00 175	25.0 200	50.0 250	75.0	100
Ethyl ether	FB	Ave	9992 355655	50880 392719	105303 532822	154531	220471	5.00 175	25.0 200	50.0 250	75.0	100
Acrolein	FB	Ave	44990 104587	63295 111599	76305 135147	77266	98265	100 225	125 250	150 275	175	200
1,1-Dichloroethene	FB	Ave	10276 397280	63024 448034	125340 536898	180155	238772	5.00 175	25.0 200	50.0 250	75.0	100
1,1,2-Trichloro-1,2,2-trifluoroethane	FB	Ave	9603 399231	61838 452132	130777 531712	189868	246005	5.00 175	25.0 200	50.0 250	75.0	100
Acetone	FB	Ave	17917 251763	46330 275016	93351 429187	112819	163522	25.0 350	50.0 400	100 500	150	200
Iodomethane	FB	Ave	15834 556019	89104 631551	175284 779677	259664	331996	5.00 175	25.0 200	50.0 250	75.0	100
Carbon disulfide	FB	Ave	27165 1065277	168464 1197032	344904 1448012	493985	636790	5.00 175	25.0 200	50.0 250	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
Allyl chloride	FB	Ave	7357 258155	39908 290699	81088 361279	113739	158003	5.00 175	25.0 200	50.0 250	75.0	100
Methyl acetate	FB	Ave	52192 1649696	249111 1845387	513733 2483416	702937	989286	25.0 875	125 1000	250 1250	375	500
Methylene Chloride	FB	Ave	17634 426263	70608 486344	136351 601264	191714	248945	5.00 175	25.0 200	50.0 250	75.0	100
tert-Butyl alcohol	TBAd9	Ave	7031 226412	43687 248639	91791 424180	100842	175170	50.0 1750	250 2000	500 2500	750	1000
Acrylonitrile	FB	Ave	47134 1595619	251919 1785952	506135 2398340	688371	984865	50.0 1750	250 2000	500 2500	750	1000
trans-1,2-Dichloroethene	FB	Ave	10848 399345	64137 453303	128097 546321	186846	242614	5.00 175	25.0 200	50.0 250	75.0	100
Methyl tert-butyl ether	FB	Ave	32782 1137208	168750 1277687	351687 1599850	498829	668767	5.00 175	25.0 200	50.0 250	75.0	100
Hexane	FB	Ave	17173 641372	99179 730587	201761 863925	294623	382026	5.00 175	25.0 200	50.0 250	75.0	100
1,1-Dichloroethane	FB	Ave	22688 791340	124748 892754	250709 1097957	357941	463249	5.00 175	25.0 200	50.0 250	75.0	100
Vinyl acetate	FB	Ave	22224 813773	124882 920108	247447 1167757	354644	482877	5.00 175	25.0 200	50.0 250	75.0	100
2,2-Dichloropropane	FB	Ave	12860 460557	82003 514868	152109 613165	220411	283273	5.00 175	25.0 200	50.0 250	75.0	100
cis-1,2-Dichloroethene	FB	Ave	12859 458996	70338 515559	140653 638803	202864	270490	5.00 175	25.0 200	50.0 250	75.0	100
2-Butanone (MEK)	FB	Ave	29322 405849	70196 433920	123236 602303	162114	243152	25.0 350	50.0 400	100 500	150	200
Bromochloromethane	FB	Ave	5510 187177	28786 214350	55765 269656	83995	108079	5.00 175	25.0 200	50.0 250	75.0	100
Tetrahydrofuran	FB	Ave	10096 252879	40908 292739	84484 406653	102313	162987	10.0 350	50.0 400	100 500	150	200
Chloroform	FB	Ave	21166 701553	106387 794529	219008 983614	317928	418252	5.00 175	25.0 200	50.0 250	75.0	100
1,1,1-Trichloroethane	FB	Ave	15282 551963	89741 637944	179626 765914	266824	333856	5.00 175	25.0 200	50.0 250	75.0	100
Cyclohexane	FB	Ave	22381 825734	132691 940533	270504 1090502	393783	499925	5.00 175	25.0 200	50.0 250	75.0	100
Carbon tetrachloride	FB	Ave	10784 464285	72050 540246	144754 647100	210787	279676	5.00 175	25.0 200	50.0 250	75.0	100
1,1-Dichloropropene	FB	Ave	15189 565138	88172 643461	178499 767529	264793	339413	5.00 175	25.0 200	50.0 250	75.0	100
Isobutyl alcohol	FB	Ave	8501 229140	36993 259634	81817 379056	96836	155112	125 4375	625 5000	1250 6250	1875	2500

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
Benzene	FB	Ave	46937 1572726	254127 1757741	508467 2148048	714707	935681	5.00 175	25.0 200	50.0 250	75.0	100
1,2-Dichloroethane	FB	Ave	16526 563911	83155 645294	168180 815576	241844	329629	5.00 175	25.0 200	50.0 250	75.0	100
n-Heptane	FB	Ave	13473 538032	84810 596259	169187 733636	240879	321049	5.00 175	25.0 200	50.0 250	75.0	100
Trichloroethene	FB	Ave	10635 391355	59752 442295	124282 555599	174968	233451	5.00 175	25.0 200	50.0 250	75.0	100
Methylcyclohexane	FB	Ave	16654 690668	111705 783449	227665 916346	323290	423059	5.00 175	25.0 200	50.0 250	75.0	100
1,2-Dichloropropane	FB	Ave	12079 413907	60459 459878	127630 584173	177506	240411	5.00 175	25.0 200	50.0 250	75.0	100
1,4-Dioxane	FB	Ave	1385 57759	7674 68092	18703 91056	25174	35757	100 3500	500 4000	1000 5000	1500	2000
Dibromomethane	FB	Ave	5718 222830	31017 246884	64533 319168	92045	128114	5.00 175	25.0 200	50.0 250	75.0	100
Bromodichloromethane	FB	Ave	11721 469062	65568 528051	134689 666672	196174	269493	5.00 175	25.0 200	50.0 250	75.0	100
2-Chloroethyl vinyl ether	FB	Ave	11777 448780	66368 489958	129983 639029	180791	252919	10.0 350	50.0 400	100 500	150	200
cis-1,3-Dichloropropene	FB	Ave	15312 602623	86393 663457	179881 857554	251659	341854	5.00 175	25.0 200	50.0 250	75.0	100
4-Methyl-2-pentanone (MIBK)	CBNZ d5	Ave	54694 797589	122588 926821	244850 1178935	335198	480094	25.0 350	50.0 400	100 500	150	200
Toluene	CBNZ d5	Ave	45382 1540826	250517 1682347	513370 2059034	700271	950725	5.00 175	25.0 200	50.0 250	75.0	100
trans-1,3-Dichloropropene	CBNZ d5	Ave	12118 512837	70888 584449	151244 755849	208912	299065	5.00 175	25.0 200	50.0 250	75.0	100
Ethyl methacrylate	CBNZ d5	Ave	13431 498267	71631 545625	147016 715550	204867	289004	5.00 175	25.0 200	50.0 250	75.0	100
1,1,2-Trichloroethane	CBNZ d5	Ave	8474 296021	43600 325970	89462 421462	126179	174528	5.00 175	25.0 200	50.0 250	75.0	100
Tetrachloroethene	CBNZ d5	Ave	7305 286294	46107 322489	95806 390254	128065	174830	5.00 175	25.0 200	50.0 250	75.0	100
1,3-Dichloropropane	CBNZ d5	Ave	16097 557979	80387 615623	173194 796390	236331	327449	5.00 175	25.0 200	50.0 250	75.0	100
2-Hexanone	CBNZ d5	Ave	40910 641023	95392 727168	199013 940605	268740	390723	25.0 350	50.0 400	100 500	150	200
Dibromochloromethane	CBNZ d5	Ave	6748 284965	38264 322398	80861 421891	116382	163509	5.00 175	25.0 200	50.0 250	75.0	100
1,2-Dibromoethane (EDB)	CBNZ d5	Ave	7864 302382	43786 336816	94484 433724	128036	177281	5.00 175	25.0 200	50.0 250	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
3-Chlorobenzotrifluoride	CBNZ d5	Ave	13837 501052	86089 568861	167629 674810	221872	325187	5.00 175	25.0 200	50.0 250	75.0	100
Chlorobenzene	CBNZ d5	Ave	26456 935674	151578 1038308	307016 1283875	415228	573529	5.00 175	25.0 200	50.0 250	75.0	100
4-Chlorobenzotrifluoride	CBNZ d5	Ave	12658 474811	78935 535427	157585 634675	214343	302880	5.00 175	25.0 200	50.0 250	75.0	100
1,1,1,2-Tetrachloroethane	CBNZ d5	Ave	7397 301837	43847 339798	93667 431610	129328	184241	5.00 175	25.0 200	50.0 250	75.0	100
Ethylbenzene	CBNZ d5	Ave	16069 535707	89774 588956	179081 724283	237960	338139	5.00 175	25.0 200	50.0 250	75.0	100
m-Xylene & p-Xylene	CBNZ d5	Ave	19703 660431	104122 732214	220203 894138	295041	410611	5.00 175	25.0 200	50.0 250	75.0	100
o-Xylene	CBNZ d5	Ave	17636 606481	97527 669468	208318 820686	272213	386886	5.00 175	25.0 200	50.0 250	75.0	100
Styrene	CBNZ d5	Ave	29999 1024166	160769 1137392	338771 1373671	455350	640914	5.00 175	25.0 200	50.0 250	75.0	100
Bromoform	CBNZ d5	Ave	3716 173705	21420 196974	46454 250642	66096	98575	5.00 175	25.0 200	50.0 250	75.0	100
2-Chlorobenzotrifluoride	CBNZ d5	Ave	12925 445699	77098 515937	153686 601185	205934	298914	5.00 175	25.0 200	50.0 250	75.0	100
Isopropylbenzene	CBNZ d5	Ave	42152 1438617	254712 1601919	521363 1856126	680086	965945	5.00 175	25.0 200	50.0 250	75.0	100
Bromobenzene	DCBd 4	Ave	10402 335108	51813 372499	111101 457221	148563	210327	5.00 175	25.0 200	50.0 250	75.0	100
1,1,2,2-Tetrachloroethane	CBNZ d5	Ave	9429 350916	53467 388860	112400 478532	151754	214426	5.00 175	25.0 200	50.0 250	75.0	100
trans-1,4-Dichloro-2-butene	DCBd 4	Ave	2747 142073	18793 162235	39794 199562	56147	82182	5.00 175	25.0 200	50.0 250	75.0	100
1,2,3-Trichloropropane	DCBd 4	Ave	3025 120795	18550 135370	37807 167416	48188	73005	5.00 175	25.0 200	50.0 250	75.0	100
N-Propylbenzene	DCBd 4	Ave	11655 391139	64388 449479	137883 520622	178470	260318	5.00 175	25.0 200	50.0 250	75.0	100
2-Chlorotoluene	DCBd 4	Ave	10182 328722	52704 366676	111988 433970	145432	214825	5.00 175	25.0 200	50.0 250	75.0	100
3-Chlorotoluene	DCBd 4	Ave	9964 347023	59357 407541	120089 476276	156751	228591	5.00 175	25.0 200	50.0 250	75.0	100
1,3,5-Trimethylbenzene	DCBd 4	Ave	29123 1031283	176655 1170104	380898 1331948	487495	689771	5.00 175	25.0 200	50.0 250	75.0	100
4-Chlorotoluene	DCBd 4	Ave	10396 341659	55960 388183	115660 451546	160629	217267	5.00 175	25.0 200	50.0 250	75.0	100
tert-Butylbenzene	DCBd 4	Ave	25244 848792	151423 976167	317495 1105106	413561	576505	5.00 175	25.0 200	50.0 250	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
1,2,4-Trimethylbenzene	DCBd 4	Ave	29985 1025893	171063 1182727	368535 1331907	485092	687986	5.00 175	25.0 200	50.0 250	75.0	100
3,4-Dichlorobenzotrifluoride	DCBd 4	Ave	8464 275283	49672 332649	97070 363317	129124	191586	5.00 175	25.0 200	50.0 250	75.0	100
sec-Butylbenzene	DCBd 4	Ave	34789 1164794	208489 1346555	438571 1495442	577107	801000	5.00 175	25.0 200	50.0 250	75.0	100
1,3-Dichlorobenzene	DCBd 4	Ave	16420 527038	84410 617701	180357 701021	241806	344274	5.00 175	25.0 200	50.0 250	75.0	100
4-Isopropyltoluene	DCBd 4	Ave	26302 922428	162536 1081141	348072 1189271	456389	633830	5.00 175	25.0 200	50.0 250	75.0	100
1,4-Dichlorobenzene	DCBd 4	Ave	16558 532535	82805 619510	177659 697625	240218	335734	5.00 175	25.0 200	50.0 250	75.0	100
2,4-Dichlorobenzotrifluoride	DCBd 4	Ave	6308 236466	43021 288217	86084 308481	112177	165788	5.00 175	25.0 200	50.0 250	75.0	100
2,5-Dichlorobenzotrifluoride	DCBd 4	Ave	9059 275343	44137 325609	94133 353135	128604	185607	5.00 175	25.0 200	50.0 250	75.0	100
n-Butylbenzene	DCBd 4	Ave	20495 799943	131735 954056	283992 1020867	382904	532308	5.00 175	25.0 200	50.0 250	75.0	100
1,2-Dichlorobenzene	DCBd 4	Ave	13956 439306	69358 526341	149684 574668	206824	286425	5.00 175	25.0 200	50.0 250	75.0	100
1,2-Dibromo-3-Chloropropane	DCBd 4	Ave	1024 51968	6383 59793	14522 65712	20490	28259	5.00 175	25.0 200	50.0 250	75.0	100
2,4- & 2,5- & 2,6- Dichlorotoluene	DCBd 4	Ave	23542 895681	132895 1134530	279843 1083822	416963	544542	15.0 525	75.0 600	150 750	225	300
2,3- & 3,4- Dichlorotoluene	DCBd 4	Ave	14548 612541	82991 781028	174489 731951	272209	344803	10.0 350	50.0 400	100 500	150	200
1,2,4-Trichlorobenzene	DCBd 4	Ave	5366 224849	27384 283129	56350 270525	96525	110342	5.00 175	25.0 200	50.0 250	75.0	100
Hexachlorobutadiene	DCBd 4	Ave	2527 108209	13462 128089	29481 124544	50527	55279	5.00 175	25.0 200	50.0 250	75.0	100
Naphthalene	DCBd 4	Ave	13972 673501	78002 818645	162362 816381	288344	340708	5.00 175	25.0 200	50.0 250	75.0	100
1,2,3-Trichlorobenzene	DCBd 4	Ave	4178 213098	24495 262521	48849 253424	90239	95882	5.00 175	25.0 200	50.0 250	75.0	100
2,4,5-Trichlorotoluene	DCBd 4	Qua	3426 181305	19332 211177	38901 259688	74862	84846	5.00 175	25.0 200	50.0 250	75.0	100
2,3,6-Trichlorotoluene	DCBd 4	Ave	3673 160030	19008 197483	38254 236633	68694	76660	5.00 175	25.0 200	50.0 250	75.0	100
Dibromofluoromethane (Surr)	FB	Ave	9367 305502	49937 352514	95843 439137	135786	183477	5.00 175	25.0 200	50.0 250	75.0	100
1,2-Dichloroethane-d4 (Surr)	FB	Ave	14000 411914	66838 469162	128063 601271	180965	239641	5.00 175	25.0 200	50.0 250	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
Toluene-d8 (Surr)	CBNZ d5	Ave	39324 1131749	209241 1278630	397523 1570018	525578	701950	5.00 175	25.0 200	50.0 250	75.0	100
4-Bromofluorobenzene (Surr)	CBNZ d5	Ave	15772 415635	72842 474859	145407 575151	187031	264099	5.00 175	25.0 200	50.0 250	75.0	100

Curve Type Legend:

Ave = Average ISTD
Qua = Quadratic ISTD

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
READBACK PERCENT ERROR

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189445

SDG No.:

Instrument ID: CHHP5 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 14:27 Calibration End Date: 09/28/2016 18:27 Calibration ID: 33005

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-189445/15	50928015.D
Level 2	IC 180-189445/5	50928005.D
Level 3	ICIS 180-189445/6	50928006.D
Level 4	IC 180-189445/7	50928007.D
Level 5	IC 180-189445/8	50928008.D
Level 6	IC 180-189445/9	50928009.D
Level 7	IC 180-189445/10	50928010.D
Level 8	IC 180-189445/11	50928011.D

ANALYTE	PERCENT ERROR						PERCENT ERROR LIMIT					
	LVL 1 # LVL 7 #	LVL 2 # LVL 8 #	LVL 3 #	LVL 4 #	LVL 5 #	LVL 6 #	LVL 1 LVL 7	LVL 2 LVL 8	LVL 3	LVL 4	LVL 5	LVL 6
2,4,5-Trichlorotoluene	6.5 -0.8	-1.5 -0.1	-6.3	14.6	-10.5	2.4	70 70	70 70	70	70	70	70

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928005.D
Lims ID: IC VSTD5
Client ID:
Sample Type: IC Calib Level: 2
Inject. Date: 28-Sep-2016 14:27:30 ALS Bottle#: 5 Worklist Smp#: 5
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-005
Misc. Info.: IC VSTD5
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 11:05:14 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 09:00:57

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.278	4.275	0.003	0	146143	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.278	7.280	-0.002	97	451578	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.380	10.376	0.004	89	94097	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.728	12.725	0.003	98	103205	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.554	6.556	-0.002	93	49937	25.0	24.5	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.925	6.927	-0.002	0	66838	25.0	24.2	
$ 7 Toluene-d8 (Surr)	98	8.926	8.922	0.004	93	209241	25.0	28.3	
$ 8 4-Bromofluorobenzene (Surr	95	11.566	11.563	0.003	85	72842	25.0	26.6	
11 Dichlorodifluoromethane	85	1.620	1.616	0.004	98	71866	25.0	24.2	
12 Chloromethane	50	1.766	1.756	0.010	99	82217	25.0	23.9	
13 Vinyl chloride	62	1.900	1.896	0.004	98	67290	25.0	24.0	
14 Butadiene	39	1.936	1.926	0.010	99	81965	25.0	26.0	
15 Bromomethane	94	2.247	2.249	-0.003	91	28423	25.0	23.4	
16 Chloroethane	64	2.374	2.377	-0.003	98	41381	25.0	23.6	
17 Dichlorofluoromethane	67	2.660	2.657	0.004	97	86050	25.0	23.2	
18 Trichlorofluoromethane	101	2.685	2.669	0.016	90	64906	25.0	24.5	
20 Ethyl ether	59	3.050	3.046	0.004	95	50880	25.0	22.2	
21 Acrolein	56	3.226	3.222	0.004	97	63295	125.0	120.2	
22 1,1-Dichloroethene	96	3.335	3.338	-0.003	96	63024	25.0	24.6	
23 1,1,2-Trichloro-1,2,2-trif	101	3.390	3.393	-0.003	93	61838	25.0	24.0	
24 Acetone	43	3.445	3.441	0.004	98	46330	50.0	52.3	
25 Iodomethane	142	3.530	3.533	-0.003	98	89104	25.0	24.3	
26 Carbon disulfide	76	3.621	3.624	-0.003	99	168464	25.0	24.4	
28 3-Chloro-1-propene	76	3.901	3.916	-0.015	87	39908	25.0	23.7	
30 Methyl acetate	43	3.938	3.934	0.004	99	249111	125.0	114.3	
31 Methylene Chloride	84	4.132	4.135	-0.003	98	70608	25.0	23.8	
32 2-Methyl-2-propanol	59	4.418	4.402	0.016	97	43687	250.0	267.2	
33 Acrylonitrile	53	4.522	4.518	0.004	98	251919	250.0	238.4	
34 trans-1,2-Dichloroethene	96	4.552	4.555	-0.003	96	64137	25.0	24.5	
35 Methyl tert-butyl ether	73	4.576	4.573	0.003	99	168750	25.0	23.0	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.972	4.974	-0.002	95	99179	25.0	23.9	
37 1,1-Dichloroethane	63	5.191	5.187	0.004	97	124748	25.0	24.2	
38 Vinyl acetate	43	5.240	5.242	-0.002	97	124882	25.0	23.8	
44 2,2-Dichloropropane	77	5.933	5.935	-0.002	67	82003	25.0	26.6	
45 cis-1,2-Dichloroethene	96	5.939	5.942	-0.003	85	70338	25.0	23.8	
46 2-Butanone (MEK)	43	5.957	5.960	-0.003	98	70196	50.0	53.1	
49 Chlorobromomethane	128	6.225	6.221	0.004	95	28786	25.0	23.6	
51 Tetrahydrofuran	42	6.249	6.246	0.003	93	40908	50.0	45.7	
52 Chloroform	83	6.371	6.374	-0.003	96	106387	25.0	23.1	
53 1,1,1-Trichloroethane	97	6.529	6.526	0.003	98	89741	25.0	24.5	
54 Cyclohexane	56	6.596	6.599	-0.003	95	132691	25.0	24.5	
56 Carbon tetrachloride	117	6.700	6.702	-0.002	91	72050	25.0	24.3	
55 1,1-Dichloropropene	75	6.718	6.714	0.004	90	88172	25.0	24.0	
57 Isobutyl alcohol	41	6.925	6.927	-0.002	43	36993	625.0	565.5	
58 Benzene	78	6.931	6.933	-0.002	97	254127	25.0	24.5	
59 1,2-Dichloroethane	62	7.010	7.012	-0.002	97	83155	25.0	22.9	
62 n-Heptane	43	7.290	7.292	-0.002	95	84810	25.0	24.7	
64 Trichloroethene	130	7.661	7.663	-0.002	95	59752	25.0	23.5	
66 Methylcyclohexane	83	7.898	7.900	-0.002	92	111705	25.0	25.0	
67 1,2-Dichloropropane	63	7.941	7.937	0.004	93	60459	25.0	22.8	
68 Dibromomethane	93	8.026	8.028	-0.002	96	31017	25.0	22.4	
70 1,4-Dioxane	88	8.026	8.022	0.004	40	7674	500.0	412.2	
71 Dichlorobromomethane	83	8.220	8.223	-0.003	97	65568	25.0	22.6	
73 2-Chloroethyl vinyl ether	63	8.519	8.521	-0.002	92	66368	50.0	47.6	
74 cis-1,3-Dichloropropene	75	8.665	8.667	-0.002	91	86393	25.0	23.0	
75 4-Methyl-2-pentanone (MIBK	43	8.823	8.819	0.004	99	122588	50.0	50.9	
76 Toluene	91	8.993	8.989	0.004	97	250517	25.0	26.4	
77 trans-1,3-Dichloropropene	75	9.242	9.239	0.003	99	70888	25.0	24.0	
78 Ethyl methacrylate	69	9.303	9.300	0.003	92	71631	25.0	24.6	
79 1,1,2-Trichloroethane	97	9.437	9.433	0.004	93	43600	25.0	24.7	
80 Tetrachloroethene	164	9.504	9.506	-0.002	94	46107	25.0	26.6	
81 1,3-Dichloropropane	76	9.595	9.592	0.003	97	80387	25.0	24.2	
82 2-Hexanone	43	9.650	9.652	-0.002	98	95392	50.0	50.0	
84 Chlorodibromomethane	129	9.808	9.811	-0.003	91	38264	25.0	23.5	
85 Ethylene Dibromide	107	9.924	9.920	0.004	99	43786	25.0	24.5	
86 3-Chlorobenzotrifluoride	180	10.380	10.383	-0.002	90	86089	25.0	27.7	
87 Chlorobenzene	112	10.411	10.407	0.004	93	151578	25.0	26.5	
88 4-Chlorobenzotrifluoride	180	10.471	10.468	0.003	96	78935	25.0	27.1	
89 1,1,1,2-Tetrachloroethane	131	10.508	10.498	0.010	89	43847	25.0	24.6	
90 Ethylbenzene	106	10.508	10.504	0.004	98	89774	25.0	27.0	
91 m-Xylene & p-Xylene	106	10.642	10.638	0.004	0	104122	25.0	25.6	
92 o-Xylene	106	11.019	11.015	0.004	97	97527	25.0	25.9	
93 Styrene	104	11.043	11.040	0.003	95	160769	25.0	25.6	
94 Bromoform	173	11.226	11.228	-0.002	95	21420	25.0	22.5	
96 2-Chlorobenzotrifluoride	180	11.293	11.289	0.004	96	77098	25.0	27.2	
97 Isopropylbenzene	105	11.384	11.386	-0.002	96	254712	25.0	27.7	
100 Bromobenzene	156	11.700	11.703	-0.003	96	51813	25.0	23.6	
99 1,1,2,2-Tetrachloroethane	83	11.700	11.703	-0.003	74	53467	25.0	25.5	
102 trans-1,4-Dichloro-2-buten	53	11.737	11.733	0.004	81	18793	25.0	22.6	
101 1,2,3-Trichloropropane	110	11.761	11.757	0.004	88	18550	25.0	24.7	
103 N-Propylbenzene	120	11.804	11.806	-0.002	99	64388	25.0	24.6	
104 2-Chlorotoluene	126	11.895	11.891	0.004	95	52704	25.0	24.3	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.956	11.958	-0.002	96	59357	25.0	25.5	
106 1,3,5-Trimethylbenzene	105	11.986	11.989	-0.003	95	176655	25.0	25.5	
107 4-Chlorotoluene	126	12.017	12.013	0.004	99	55960	25.0	24.7	
108 tert-Butylbenzene	119	12.302	12.299	0.003	93	151423	25.0	26.0	
110 1,2,4-Trimethylbenzene	105	12.363	12.360	0.003	98	171063	25.0	24.8	
111 1,2-dichloro-4-(trifluorom	214	12.406	12.402	0.004	97	49672	25.0	26.2	
112 sec-Butylbenzene	105	12.521	12.524	-0.003	95	208489	25.0	26.0	
113 1,3-Dichlorobenzene	146	12.643	12.639	0.004	96	84410	25.0	24.0	
114 4-Isopropyltoluene	119	12.680	12.682	-0.002	96	162536	25.0	25.7	
115 1,4-Dichlorobenzene	146	12.747	12.749	-0.002	94	82805	25.0	23.7	
116 2,4-Dichloro-1-(triflourom	214	12.771	12.773	-0.002	95	43021	25.0	26.7	
118 2,5-Dichlorobenzotrifluori	214	12.813	12.816	-0.003	0	44137	25.0	23.8	
120 n-Butylbenzene	91	13.087	13.090	-0.003	98	131735	25.0	24.9	
121 1,2-Dichlorobenzene	146	13.099	13.102	-0.003	93	69358	25.0	23.5	
122 1,2-Dibromo-3-Chloropropan	75	13.890	13.899	-0.009	76	6383	25.0	21.6	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.036	14.033	0.003	0	132895	75.0	70.1	
125 2,3- & 3,4- Dichlorotoluen	125	14.456	14.452	0.004	0	82991	50.0	44.8	
126 1,2,4-Trichlorobenzene	180	14.718	14.720	-0.002	93	27384	25.0	21.1	
127 Hexachlorobutadiene	225	14.858	14.866	-0.008	95	13462	25.0	21.3	
128 Naphthalene	128	14.985	14.982	0.003	97	78002	25.0	20.6	
129 1,2,3-Trichlorobenzene	180	15.210	15.207	0.003	95	24495	25.0	21.0	
131 2,4,5-Trichlorotoluene	159	15.989	15.985	0.004	0	19332	25.0	24.6	
130 2,3,6-Trichlorotoluene	159	16.086	16.083	0.003	96	19008	25.0	20.3	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		50.0	51.5	
S 134 1,2-Dichloroethene, Total	96				0		50.0	48.3	
S 135 1,3-Dichloropropene, Total	1				0		50.0	47.0	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Reagents:

voaWAcro1stRe_00008	Amount Added:	5.00	Units: uL	
VOA8260SURR_00059	Amount Added:	1.00	Units: uL	
voaWVA1stRest_00008	Amount Added:	1.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	1.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	1.00	Units: uL	
voaW2CLEReste_00001	Amount Added:	1.00	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	1.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

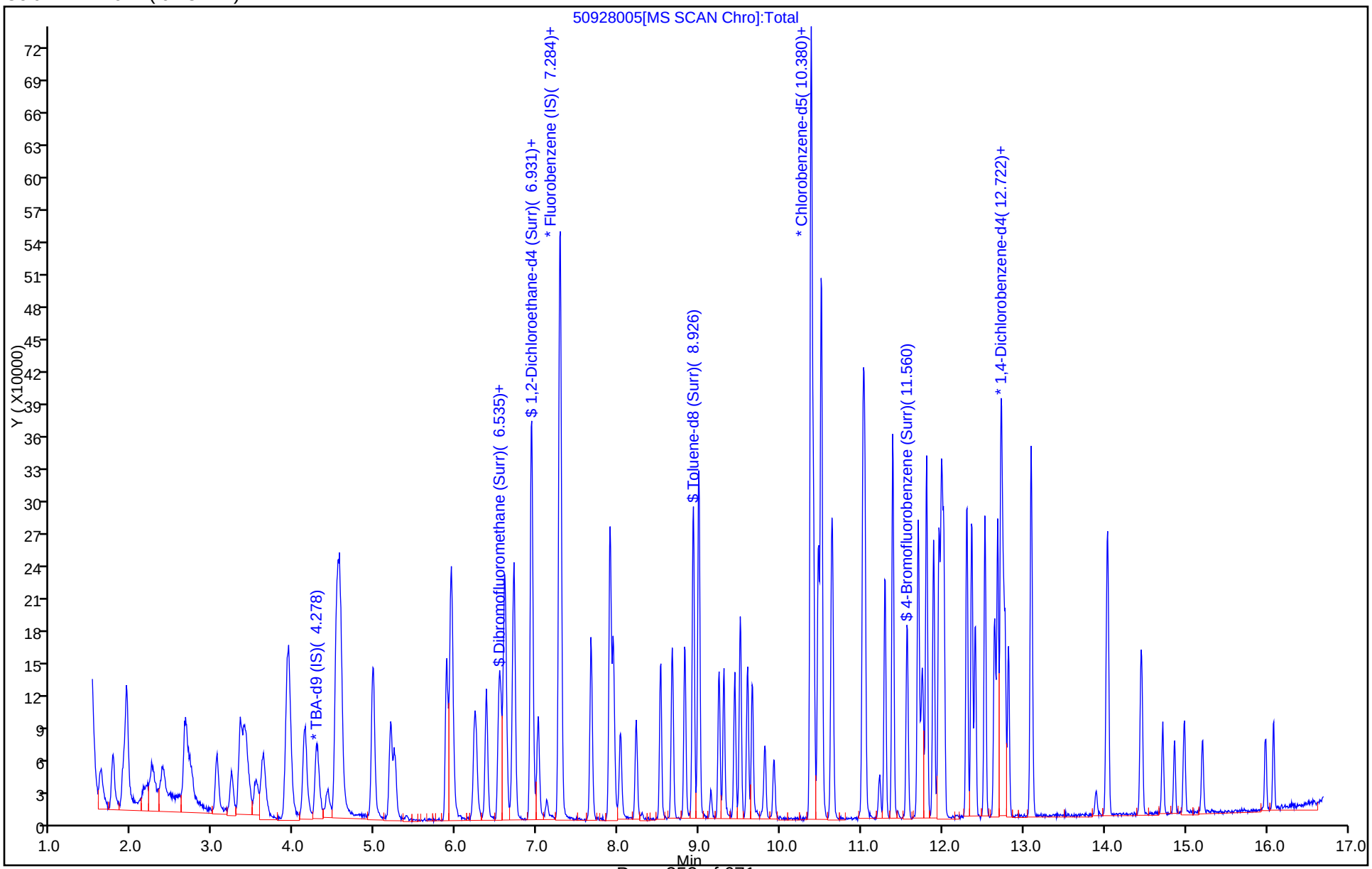
Report Date: 29-Sep-2016 11:05:15 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928005.D

Injection Date:	28-Sep-2016 14:27:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	IC VSTD5			Worklist Smp#:	5
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	5
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928006.D
Lims ID: ICIS VSTD10
Client ID:
Sample Type: ICIS Calib Level: 3
Inject. Date: 28-Sep-2016 14:51:30 ALS Bottle#: 6 Worklist Smp#: 6
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-006
Misc. Info.: ICIS VSTD10
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 11:04:48 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 08:02:36

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.271	4.271	0.000	0	153984	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.276	7.276	0.000	98	430453	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.379	10.379	0.000	89	94247	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.721	12.721	0.000	96	102520	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.552	6.552	0.000	92	95843	50.0	49.4	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.923	6.923	0.000	0	128063	50.0	48.5	
$ 7 Toluene-d8 (Surr)	98	8.925	8.925	0.000	94	397523	50.0	53.6	
$ 8 4-Bromofluorobenzene (Surr	95	11.565	11.565	0.000	87	145407	50.0	53.1	
11 Dichlorodifluoromethane	85	1.613	1.613	0.000	98	149434	50.0	52.7	
12 Chloromethane	50	1.765	1.765	0.000	99	166785	50.0	50.8	
13 Vinyl chloride	62	1.899	1.899	0.000	98	142059	50.0	53.2	
14 Butadiene	39	1.935	1.935	0.000	96	159499	50.0	53.0	
15 Bromomethane	94	2.251	2.251	0.000	92	57020	50.0	49.2	
16 Chloroethane	64	2.385	2.385	0.000	99	82913	50.0	49.5	
17 Dichlorofluoromethane	67	2.659	2.659	0.000	96	170288	50.0	48.3	
18 Trichlorofluoromethane	101	2.665	2.665	0.000	56	131129	50.0	52.0	
20 Ethyl ether	59	3.042	3.042	0.000	96	105303	50.0	48.2	
21 Acrolein	56	3.225	3.225	0.000	99	76305	150.0	152.1	
22 1,1-Dichloroethene	96	3.340	3.340	0.000	95	125340	50.0	51.4	
23 1,1,2-Trichloro-1,2,2-trif	101	3.401	3.401	0.000	95	130777	50.0	53.2	
24 Acetone	43	3.450	3.450	0.000	100	93351	100.0	110.6	
25 Iodomethane	142	3.523	3.523	0.000	98	175284	50.0	50.2	
26 Carbon disulfide	76	3.620	3.620	0.000	100	344904	50.0	52.5	
28 3-Chloro-1-propene	76	3.918	3.918	0.000	88	81088	50.0	50.5	
30 Methyl acetate	43	3.936	3.936	0.000	99	513733	250.0	247.3	
31 Methylene Chloride	84	4.125	4.125	0.000	98	136351	50.0	48.1	
32 2-Methyl-2-propanol	59	4.405	4.405	0.000	97	91791	500.0	532.9	
33 Acrylonitrile	53	4.520	4.520	0.000	99	506135	500.0	502.4	
34 trans-1,2-Dichloroethene	96	4.551	4.551	0.000	96	128097	50.0	51.3	
35 Methyl tert-butyl ether	73	4.575	4.575	0.000	99	351687	50.0	50.3	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.971	4.971	0.000	95	201761	50.0	51.1	
37 1,1-Dichloroethane	63	5.190	5.190	0.000	97	250709	50.0	50.9	
38 Vinyl acetate	43	5.244	5.244	0.000	97	247447	50.0	49.5	
44 2,2-Dichloropropane	77	5.932	5.932	0.000	86	152109	50.0	51.8	
45 cis-1,2-Dichloroethene	96	5.938	5.938	0.000	85	140653	50.0	49.9	
46 2-Butanone (MEK)	43	5.956	5.956	0.000	99	123236	100.0	97.8	
49 Chlorobromomethane	128	6.224	6.224	0.000	93	55765	50.0	48.0	
51 Tetrahydrofuran	42	6.242	6.242	0.000	90	84484	100.0	99.0	
52 Chloroform	83	6.370	6.370	0.000	96	219008	50.0	49.9	
53 1,1,1-Trichloroethane	97	6.528	6.528	0.000	98	179626	50.0	51.4	
54 Cyclohexane	56	6.595	6.595	0.000	95	270504	50.0	52.4	
56 Carbon tetrachloride	117	6.698	6.698	0.000	94	144754	50.0	51.2	
55 1,1-Dichloropropene	75	6.717	6.717	0.000	91	178499	50.0	51.0	
57 Isobutyl alcohol	41	6.930	6.930	0.000	81	81817	1250.0	1312.2	M
58 Benzene	78	6.930	6.930	0.000	98	508467	50.0	51.4	
59 1,2-Dichloroethane	62	7.009	7.009	0.000	97	168180	50.0	48.5	
62 n-Heptane	43	7.288	7.288	0.000	93	169187	50.0	51.6	
64 Trichloroethene	130	7.666	7.666	0.000	97	124282	50.0	51.4	
66 Methylcyclohexane	83	7.897	7.897	0.000	96	227665	50.0	53.4	
67 1,2-Dichloropropane	63	7.939	7.939	0.000	93	127630	50.0	50.4	
70 1,4-Dioxane	88	8.018	8.018	0.000	40	18703	1000.0	1054.0	M
68 Dibromomethane	93	8.018	8.018	0.000	97	64533	50.0	49.0	
71 Dichlorobromomethane	83	8.219	8.219	0.000	98	134689	50.0	48.6	
73 2-Chloroethyl vinyl ether	63	8.523	8.523	0.000	94	129983	100.0	97.8	
74 cis-1,3-Dichloropropene	75	8.663	8.663	0.000	91	179881	50.0	50.3	
75 4-Methyl-2-pentanone (MIBK	43	8.822	8.822	0.000	99	244850	100.0	101.5	
76 Toluene	91	8.992	8.992	0.000	98	513370	50.0	54.0	
77 trans-1,3-Dichloropropene	75	9.241	9.241	0.000	99	151244	50.0	51.1	
78 Ethyl methacrylate	69	9.302	9.302	0.000	91	147016	50.0	50.5	
79 1,1,2-Trichloroethane	97	9.436	9.436	0.000	93	89462	50.0	50.7	
80 Tetrachloroethene	164	9.503	9.503	0.000	94	95806	50.0	55.1	
81 1,3-Dichloropropane	76	9.594	9.594	0.000	96	173194	50.0	52.0	
82 2-Hexanone	43	9.649	9.649	0.000	98	199013	100.0	104.2	
84 Chlorodibromomethane	129	9.807	9.807	0.000	92	80861	50.0	49.7	
85 Ethylene Dibromide	107	9.917	9.917	0.000	97	94484	50.0	52.9	
86 3-Chlorobenzotrifluoride	180	10.379	10.379	0.000	87	167629	50.0	53.8	
87 Chlorobenzene	112	10.409	10.409	0.000	93	307016	50.0	53.5	
88 4-Chlorobenzotrifluoride	180	10.470	10.470	0.000	96	157585	50.0	54.0	
89 1,1,1,2-Tetrachloroethane	131	10.501	10.501	0.000	91	93667	50.0	52.6	
90 Ethylbenzene	106	10.507	10.507	0.000	99	179081	50.0	53.7	
91 m-Xylene & p-Xylene	106	10.640	10.640	0.000	0	220203	50.0	54.0	
92 o-Xylene	106	11.018	11.018	0.000	98	208318	50.0	55.3	
93 Styrene	104	11.042	11.042	0.000	96	338771	50.0	53.9	
94 Bromoform	173	11.224	11.224	0.000	93	46454	50.0	48.8	
96 2-Chlorobenzotrifluoride	180	11.291	11.291	0.000	96	153686	50.0	54.2	
97 Isopropylbenzene	105	11.389	11.389	0.000	97	521363	50.0	56.6	
100 Bromobenzene	156	11.699	11.699	0.000	96	111101	50.0	51.0	
99 1,1,2,2-Tetrachloroethane	83	11.705	11.705	0.000	94	112400	50.0	53.4	
102 trans-1,4-Dichloro-2-buten	53	11.735	11.735	0.000	83	39794	50.0	48.1	
101 1,2,3-Trichloropropane	110	11.760	11.760	0.000	87	37807	50.0	50.6	
103 N-Propylbenzene	120	11.802	11.802	0.000	99	137883	50.0	53.1	
104 2-Chlorotoluene	126	11.894	11.894	0.000	95	111988	50.0	52.0	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.954	11.954	0.000	96	120089	50.0	52.0	
106 1,3,5-Trimethylbenzene	105	11.985	11.985	0.000	93	380898	50.0	55.4	
107 4-Chlorotoluene	126	12.015	12.015	0.000	99	115660	50.0	51.4	
108 tert-Butylbenzene	119	12.301	12.301	0.000	93	317495	50.0	54.9	
110 1,2,4-Trimethylbenzene	105	12.362	12.362	0.000	98	368535	50.0	53.9	
111 1,2-dichloro-4-(trifluorom	214	12.405	12.405	0.000	97	97070	50.0	51.6	
112 sec-Butylbenzene	105	12.520	12.520	0.000	95	438571	50.0	55.0	
113 1,3-Dichlorobenzene	146	12.642	12.642	0.000	97	180357	50.0	51.6	
114 4-Isopropyltoluene	119	12.678	12.678	0.000	97	348072	50.0	55.4	
115 1,4-Dichlorobenzene	146	12.745	12.745	0.000	94	177659	50.0	51.1	
116 2,4-Dichloro-1-(triflourom	214	12.770	12.770	0.000	96	86084	50.0	53.8	
118 2,5-Dichlorobenzotrifluori	214	12.812	12.812	0.000	0	94133	50.0	51.0	
120 n-Butylbenzene	91	13.092	13.092	0.000	98	283992	50.0	54.1	
121 1,2-Dichlorobenzene	146	13.104	13.104	0.000	95	149684	50.0	51.1	
122 1,2-Dibromo-3-Chloropropan	75	13.895	13.895	0.000	74	14522	50.0	49.4	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.035	14.035	0.000	0	279843	150.0	148.6	
125 2,3- & 3,4- Dichlorotoluen	125	14.455	14.455	0.000	0	174489	100.0	94.9	
126 1,2,4-Trichlorobenzene	180	14.716	14.716	0.000	94	56350	50.0	43.7	
127 Hexachlorobutadiene	225	14.862	14.862	0.000	95	29481	50.0	47.0	
128 Naphthalene	128	14.984	14.984	0.000	98	162362	50.0	43.2	
129 1,2,3-Trichlorobenzene	180	15.209	15.209	0.000	94	48849	50.0	42.2	
131 2,4,5-Trichlorotoluene	159	15.988	15.988	0.000	0	38901	50.0	46.8	
130 2,3,6-Trichlorotoluene	159	16.085	16.085	0.000	94	38254	50.0	41.2	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		100.0	109.3	
S 134 1,2-Dichloroethene, Total	96				0		100.0	101.2	
S 135 1,3-Dichloropropene, Total	1				0		100.0	101.4	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWAcro1stRe_00008	Amount Added:	6.00	Units: uL	
voaWVA1stRest_00008	Amount Added:	2.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	2.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	2.00	Units: uL	
voaW2CLEReste_00001	Amount Added:	2.00	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	2.00	Units: uL	
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

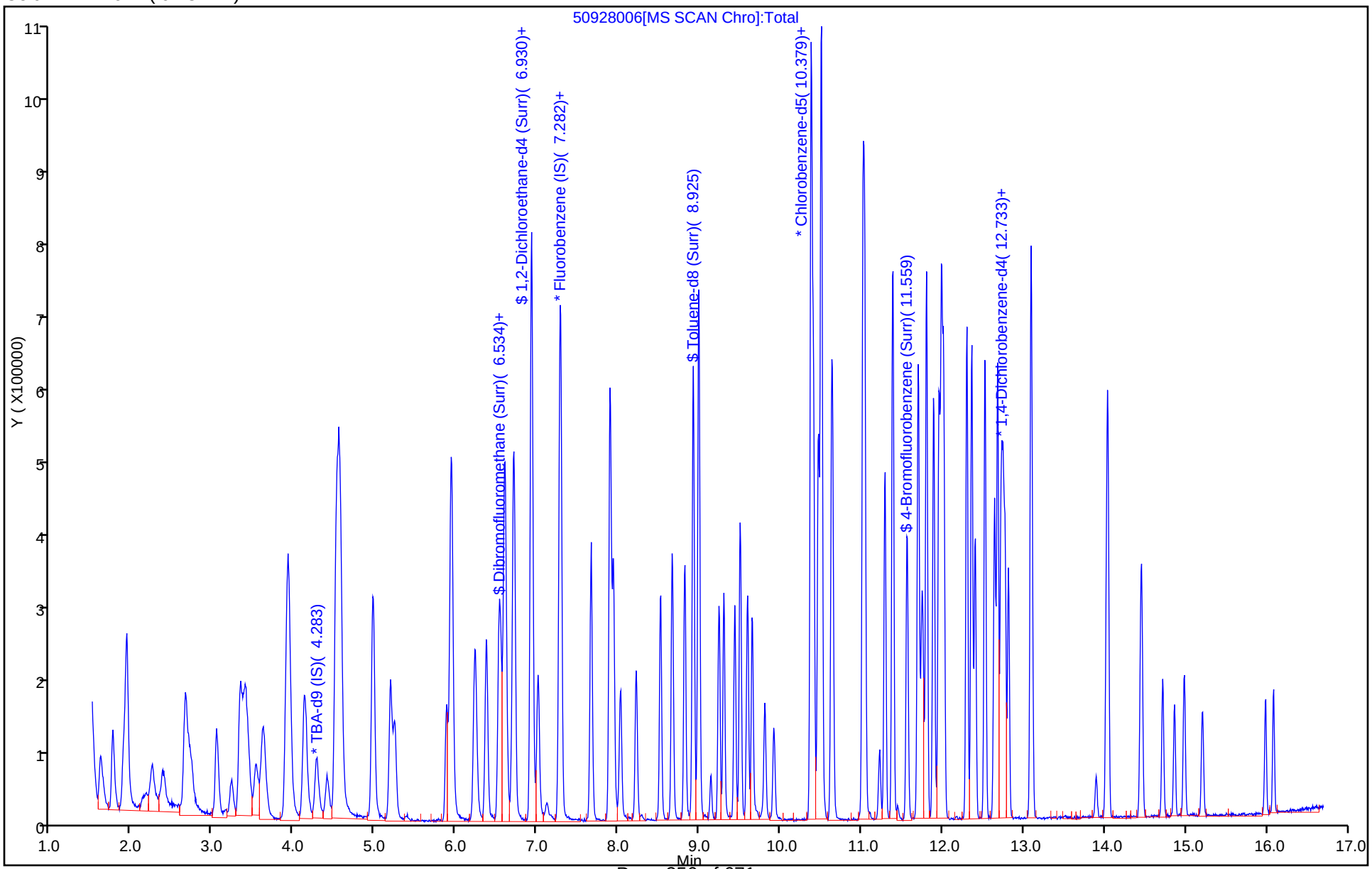
Report Date: 29-Sep-2016 11:04:49 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928006.D

Injection Date:	28-Sep-2016 14:51:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	ICIS VSTD10			Worklist Smp#:	6
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	6
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh

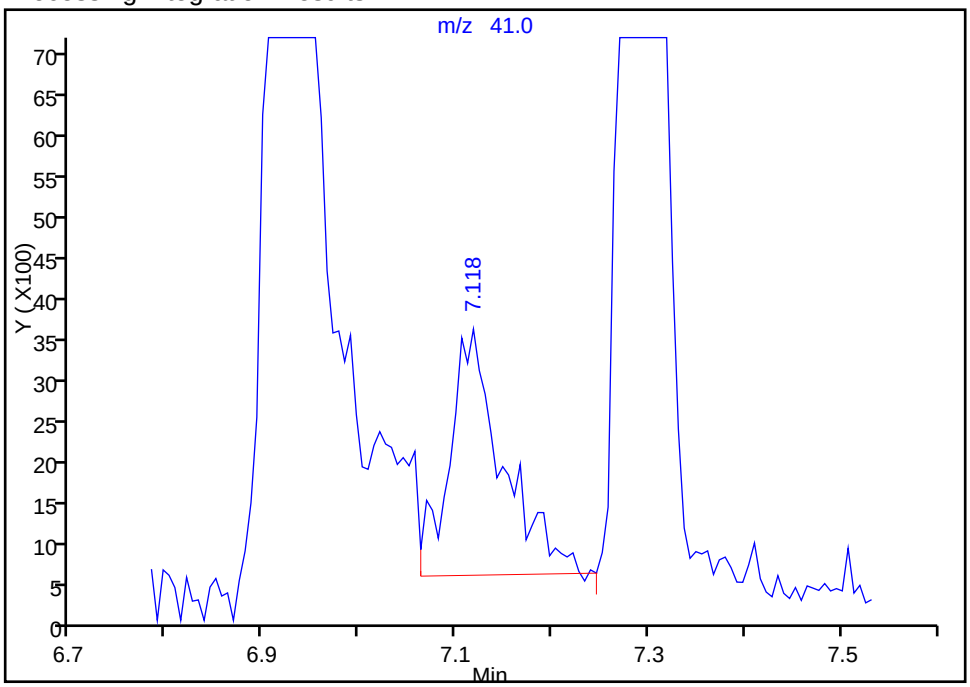
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928006.D				
Injection Date:	28-Sep-2016 14:51:30	Instrument ID:	CHHP5		
Lims ID:	ICIS VSTD10				
Client ID:					
Operator ID:	001562	ALS Bottle#:	6	Worklist Smp#:	6
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

57 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

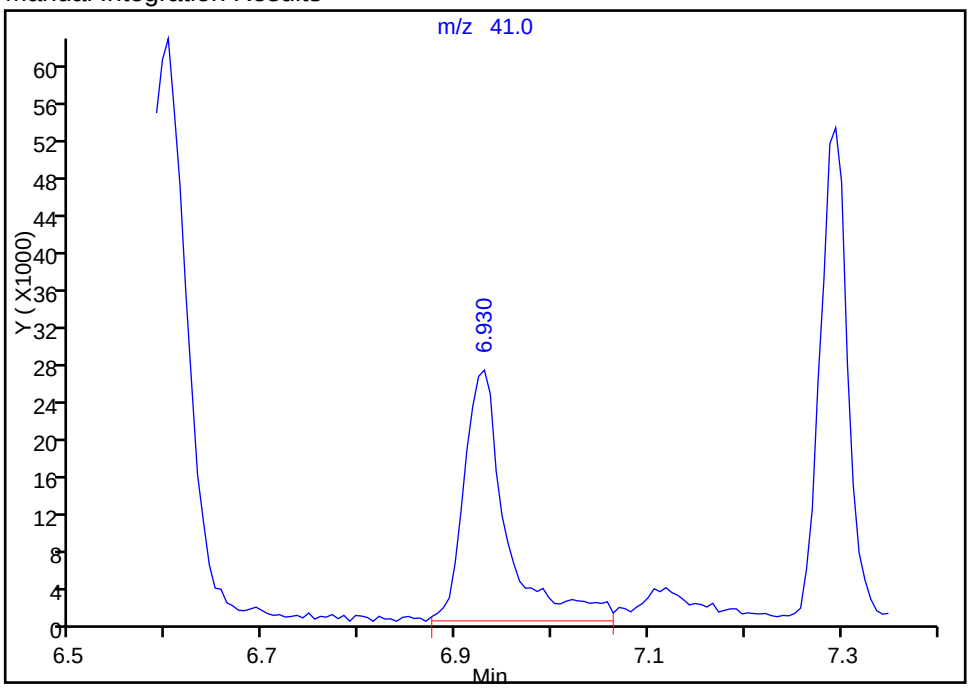
Processing Integration Results

RT: 7.12
Area: 11560
Amount: 717.7616
Amount Units: ng



Manual Integration Results

RT: 6.93
Area: 81817
Amount: 1312.1903
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 08:24:47
Audit Action: Assigned Compound ID Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

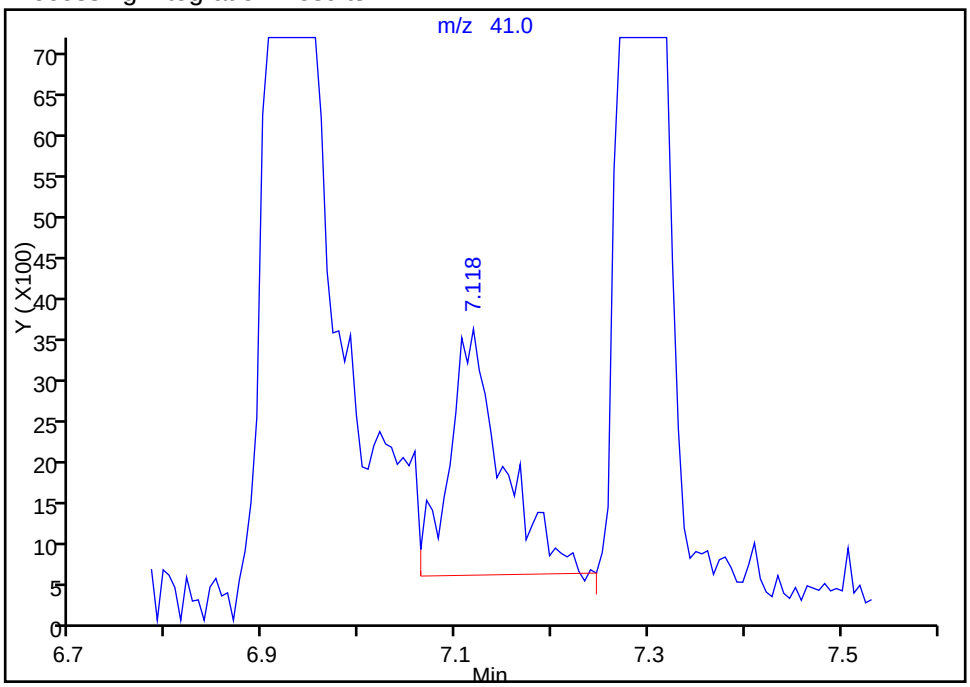
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928006.D
Injection Date: 28-Sep-2016 14:51:30 Instrument ID: CHHP5
Lims ID: ICIS VSTD10
Client ID:
Operator ID: 001562 ALS Bottle#: 6 Worklist Smp#: 6
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

57 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

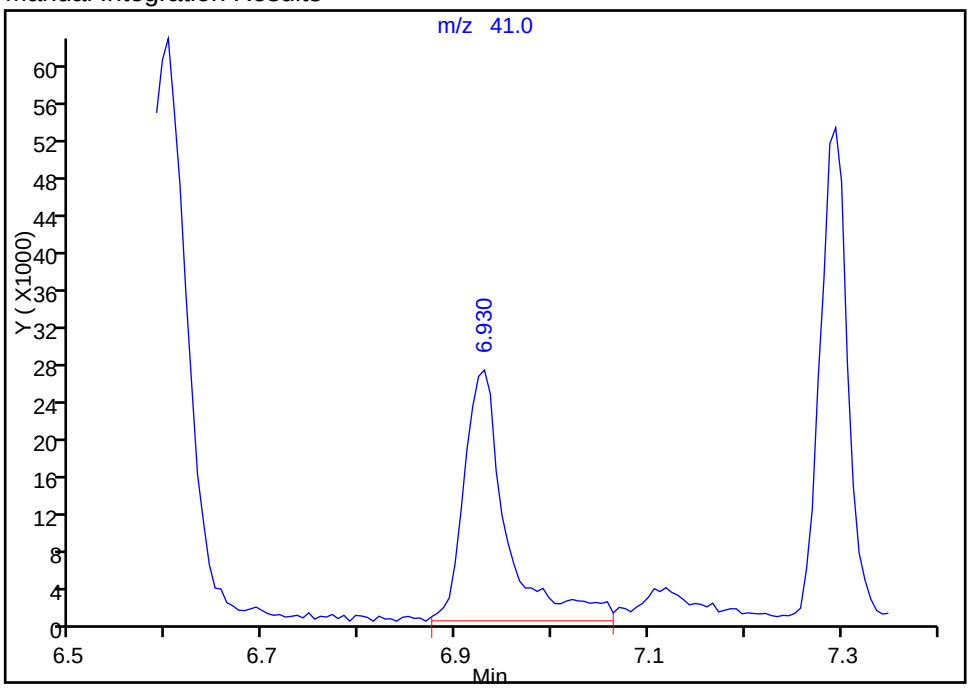
Processing Integration Results

RT: 7.12
Area: 11560
Amount: 717.7616
Amount Units: ng



Manual Integration Results

RT: 6.93
Area: 81817
Amount: 1312.1903
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 08:24:47
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

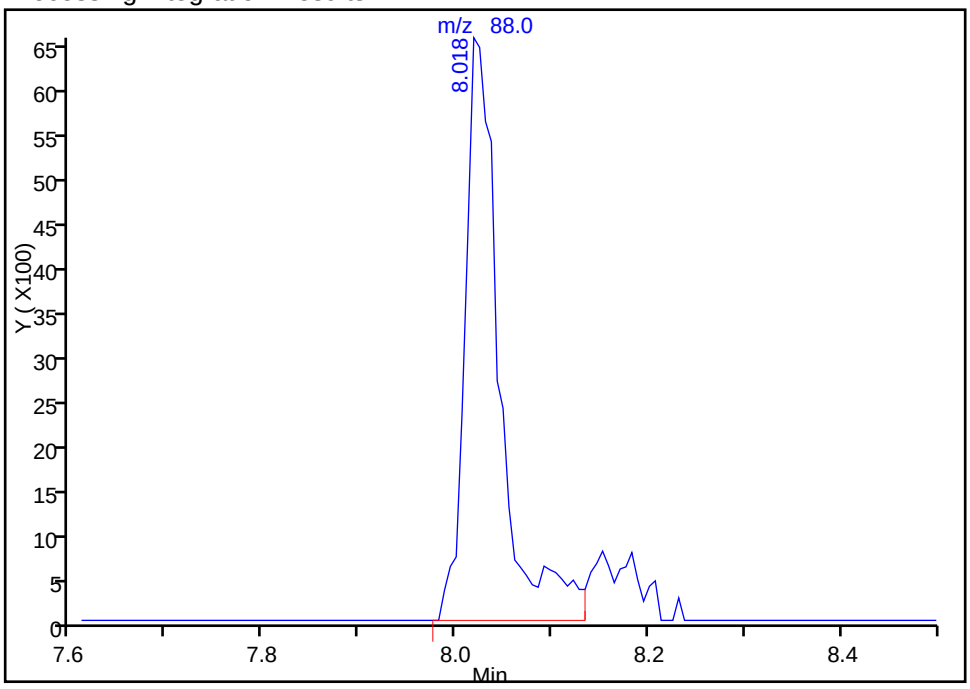
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928006.D
Injection Date: 28-Sep-2016 14:51:30 Instrument ID: CHHP5
Lims ID: ICIS VSTD10
Client ID:
Operator ID: 001562 ALS Bottle#: 6 Worklist Smp#: 6
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

70 1,4-Dioxane, CAS: 123-91-1

Signal: 1

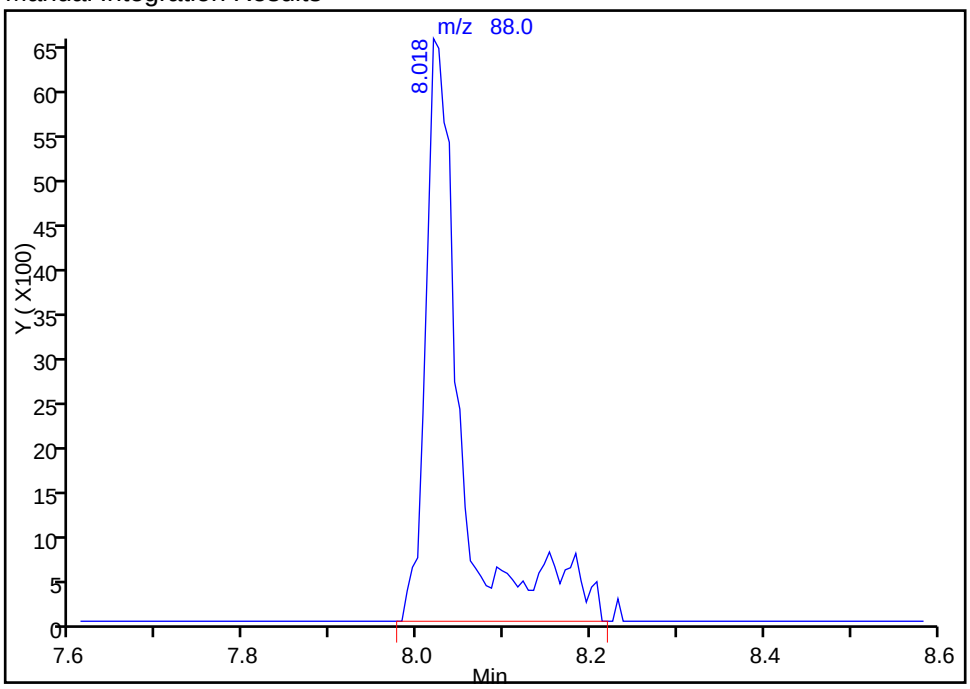
Processing Integration Results

RT: 8.02
Area: 16360
Amount: 965.0116
Amount Units: ng



Manual Integration Results

RT: 8.02
Area: 18703
Amount: 1053.9638
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 08:24:47
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928007.D
Lims ID: IC VSTD15
Client ID:
Sample Type: IC Calib Level: 4
Inject. Date: 28-Sep-2016 15:15:30 ALS Bottle#: 7 Worklist Smp#: 7
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-007
Misc. Info.: IC VSTD15
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 10:33:41 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 09:04:50

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.275	4.275	0.000	0	135429	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.280	7.280	0.000	98	426361	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.376	10.376	0.000	88	91991	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.725	12.725	0.000	94	96794	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.556	6.556	0.000	93	135786	75.0	70.7	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.927	6.927	0.000	0	180965	75.0	69.3	
$ 7 Toluene-d8 (Surr)	98	8.922	8.922	0.000	94	525578	75.0	72.6	
$ 8 4-Bromofluorobenzene (Surr	95	11.563	11.563	0.000	84	187031	75.0	69.9	
11 Dichlorodifluoromethane	85	1.616	1.616	0.000	99	233239	75.0	83.1	
12 Chloromethane	50	1.756	1.756	0.000	99	241116	75.0	74.1	
13 Vinyl chloride	62	1.896	1.896	0.000	84	205496	75.0	77.7	
14 Butadiene	39	1.926	1.926	0.000	96	231496	75.0	77.7	
15 Bromomethane	94	2.249	2.249	0.000	91	85488	75.0	74.5	
16 Chloroethane	64	2.377	2.377	0.000	99	120292	75.0	72.5	
17 Dichlorofluoromethane	67	2.657	2.657	0.000	97	264797	75.0	75.8	
18 Trichlorofluoromethane	101	2.669	2.669	0.000	75	198057	75.0	79.2	
20 Ethyl ether	59	3.046	3.046	0.000	95	154531	75.0	71.4	
21 Acrolein	56	3.222	3.222	0.000	98	77266	175.0	155.5	
22 1,1-Dichloroethene	96	3.338	3.338	0.000	96	180155	75.0	74.5	
23 1,1,2-Trichloro-1,2,2-trif	101	3.393	3.393	0.000	95	189868	75.0	78.0	
24 Acetone	43	3.441	3.441	0.000	99	112819	150.0	134.9	
25 Iodomethane	142	3.533	3.533	0.000	98	259664	75.0	75.1	
26 Carbon disulfide	76	3.624	3.624	0.000	100	493985	75.0	75.9	
28 3-Chloro-1-propene	76	3.916	3.916	0.000	89	113739	75.0	71.6	
30 Methyl acetate	43	3.934	3.934	0.000	99	702937	375.0	341.6	
31 Methylene Chloride	84	4.135	4.135	0.000	98	191714	75.0	68.3	
32 2-Methyl-2-propanol	59	4.402	4.402	0.000	97	100842	750.0	665.7	
33 Acrylonitrile	53	4.518	4.518	0.000	99	688371	750.0	689.9	
34 trans-1,2-Dichloroethene	96	4.555	4.555	0.000	96	186846	75.0	75.6	
35 Methyl tert-butyl ether	73	4.573	4.573	0.000	98	498829	75.0	72.0	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.974	4.974	0.000	95	294623	75.0	75.3	
37 1,1-Dichloroethane	63	5.187	5.187	0.000	97	357941	75.0	73.4	
38 Vinyl acetate	43	5.242	5.242	0.000	98	354644	75.0	71.6	
44 2,2-Dichloropropane	77	5.935	5.935	0.000	86	220411	75.0	75.9	M
45 cis-1,2-Dichloroethene	96	5.942	5.942	0.000	86	202864	75.0	72.6	
46 2-Butanone (MEK)	43	5.960	5.960	0.000	100	162114	150.0	129.9	
49 Chlorobromomethane	128	6.221	6.221	0.000	94	83995	75.0	73.0	
51 Tetrahydrofuran	42	6.246	6.246	0.000	90	102313	150.0	121.1	
52 Chloroform	83	6.374	6.374	0.000	95	317928	75.0	73.2	
53 1,1,1-Trichloroethane	97	6.526	6.526	0.000	97	266824	75.0	77.0	
54 Cyclohexane	56	6.599	6.599	0.000	95	393783	75.0	77.0	
56 Carbon tetrachloride	117	6.702	6.702	0.000	95	210787	75.0	75.2	
55 1,1-Dichloropropene	75	6.714	6.714	0.000	91	264793	75.0	76.3	
57 Isobutyl alcohol	41	6.927	6.927	0.000	65	96836	1875.0	1656.0	
58 Benzene	78	6.933	6.933	0.000	98	714707	75.0	73.0	
59 1,2-Dichloroethane	62	7.012	7.012	0.000	97	241844	75.0	70.4	
62 n-Heptane	43	7.292	7.292	0.000	96	240879	75.0	74.2	
64 Trichloroethene	130	7.663	7.663	0.000	96	174968	75.0	73.0	
66 Methylcyclohexane	83	7.900	7.900	0.000	93	323290	75.0	76.6	
67 1,2-Dichloropropane	63	7.937	7.937	0.000	90	177506	75.0	70.8	
70 1,4-Dioxane	88	8.022	8.022	0.000	39	25174	1500.0	1432.2	M
68 Dibromomethane	93	8.028	8.028	0.000	97	92045	75.0	70.5	
71 Dichlorobromomethane	83	8.223	8.223	0.000	98	196174	75.0	71.5	
73 2-Chloroethyl vinyl ether	63	8.521	8.521	0.000	93	180791	150.0	137.3	
74 cis-1,3-Dichloropropene	75	8.667	8.667	0.000	90	251659	75.0	71.0	
75 4-Methyl-2-pentanone (MIBK	43	8.819	8.819	0.000	98	335198	150.0	142.4	
76 Toluene	91	8.989	8.989	0.000	98	700271	75.0	75.5	
77 trans-1,3-Dichloropropene	75	9.239	9.239	0.000	99	208912	75.0	72.3	
78 Ethyl methacrylate	69	9.300	9.300	0.000	90	204867	75.0	72.0	
79 1,1,2-Trichloroethane	97	9.433	9.433	0.000	93	126179	75.0	73.2	
80 Tetrachloroethene	164	9.506	9.506	0.000	94	128065	75.0	75.5	
81 1,3-Dichloropropane	76	9.592	9.592	0.000	96	236331	75.0	72.7	
82 2-Hexanone	43	9.652	9.652	0.000	97	268740	150.0	144.1	
84 Chlorodibromomethane	129	9.811	9.811	0.000	91	116382	75.0	73.2	
85 Ethylene Dibromide	107	9.920	9.920	0.000	96	128036	75.0	73.4	
86 3-Chlorobenzotrifluoride	180	10.383	10.383	0.000	92	221872	75.0	72.9	
87 Chlorobenzene	112	10.407	10.407	0.000	92	415228	75.0	74.2	
88 4-Chlorobenzotrifluoride	180	10.468	10.468	0.000	98	214343	75.0	75.2	
89 1,1,1,2-Tetrachloroethane	131	10.498	10.498	0.000	92	129328	75.0	74.3	
90 Ethylbenzene	106	10.504	10.504	0.000	99	237960	75.0	73.1	
91 m-Xylene & p-Xylene	106	10.638	10.638	0.000	0	295041	75.0	74.2	
92 o-Xylene	106	11.015	11.015	0.000	97	272213	75.0	74.1	
93 Styrene	104	11.040	11.040	0.000	95	455350	75.0	74.2	
94 Bromoform	173	11.228	11.228	0.000	95	66096	75.0	71.2	
96 2-Chlorobenzotrifluoride	180	11.289	11.289	0.000	95	205934	75.0	74.4	
97 Isopropylbenzene	105	11.386	11.386	0.000	97	680086	75.0	75.7	
100 Bromobenzene	156	11.703	11.703	0.000	97	148563	75.0	72.3	
99 1,1,2,2-Tetrachloroethane	83	11.703	11.703	0.000	93	151754	75.0	73.9	
102 trans-1,4-Dichloro-2-buten	53	11.733	11.733	0.000	82	56147	75.0	71.9	
101 1,2,3-Trichloropropane	110	11.757	11.757	0.000	87	48188	75.0	68.3	
103 N-Propylbenzene	120	11.806	11.806	0.000	99	178470	75.0	72.8	
104 2-Chlorotoluene	126	11.891	11.891	0.000	95	145432	75.0	71.5	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.958	11.958	0.000	96	156751	75.0	71.9	
106 1,3,5-Trimethylbenzene	105	11.989	11.989	0.000	93	487495	75.0	75.1	
107 4-Chlorotoluene	126	12.013	12.013	0.000	99	160629	75.0	75.5	
108 tert-Butylbenzene	119	12.299	12.299	0.000	93	413561	75.0	75.7	
110 1,2,4-Trimethylbenzene	105	12.360	12.360	0.000	98	485092	75.0	75.1	
111 1,2-dichloro-4-(trifluorom	214	12.402	12.402	0.000	97	129124	75.0	72.6	
112 sec-Butylbenzene	105	12.524	12.524	0.000	95	577107	75.0	76.7	
113 1,3-Dichlorobenzene	146	12.639	12.639	0.000	96	241806	75.0	73.2	
114 4-Isopropyltoluene	119	12.682	12.682	0.000	97	456389	75.0	77.0	
115 1,4-Dichlorobenzene	146	12.749	12.749	0.000	92	240218	75.0	73.2	
116 2,4-Dichloro-1-(triflourom	214	12.773	12.773	0.000	96	112177	75.0	74.2	
118 2,5-Dichlorobenzotrifluori	214	12.816	12.816	0.000	0	128604	75.0	73.8	
120 n-Butylbenzene	91	13.090	13.090	0.000	98	382904	75.0	77.3	
121 1,2-Dichlorobenzene	146	13.102	13.102	0.000	94	206824	75.0	74.8	
122 1,2-Dibromo-3-Chloropropan	75	13.899	13.899	0.000	76	20490	75.0	73.8	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.033	14.033	0.000	0	416963	225.0	234.5	
125 2,3- & 3,4- Dichlorotoluen	125	14.452	14.452	0.000	0	272209	150.0	156.8	
126 1,2,4-Trichlorobenzene	180	14.720	14.720	0.000	94	96525	75.0	79.3	
127 Hexachlorobutadiene	225	14.866	14.866	0.000	91	50527	75.0	85.4	
128 Naphthalene	128	14.982	14.982	0.000	98	288344	75.0	81.3	
129 1,2,3-Trichlorobenzene	180	15.207	15.207	0.000	94	90239	75.0	93.0	
131 2,4,5-Trichlorotoluene	159	15.985	15.985	0.000	0	74862	75.0	85.9	
130 2,3,6-Trichlorotoluene	159	16.083	16.083	0.000	95	68694	75.0	78.3	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		150.0	148.2	
S 134 1,2-Dichloroethene, Total	96				0		150.0	148.2	
S 135 1,3-Dichloropropene, Total	1				0		150.0	143.4	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWAcro1stRe_00008	Amount Added:	7.00	Units: uL	
VOA8260SURR_00059	Amount Added:	3.00	Units: uL	
voaWVA1stRest_00008	Amount Added:	3.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	3.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	3.00	Units: uL	
voaW2CLEReste_00001	Amount Added:	3.00	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	3.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

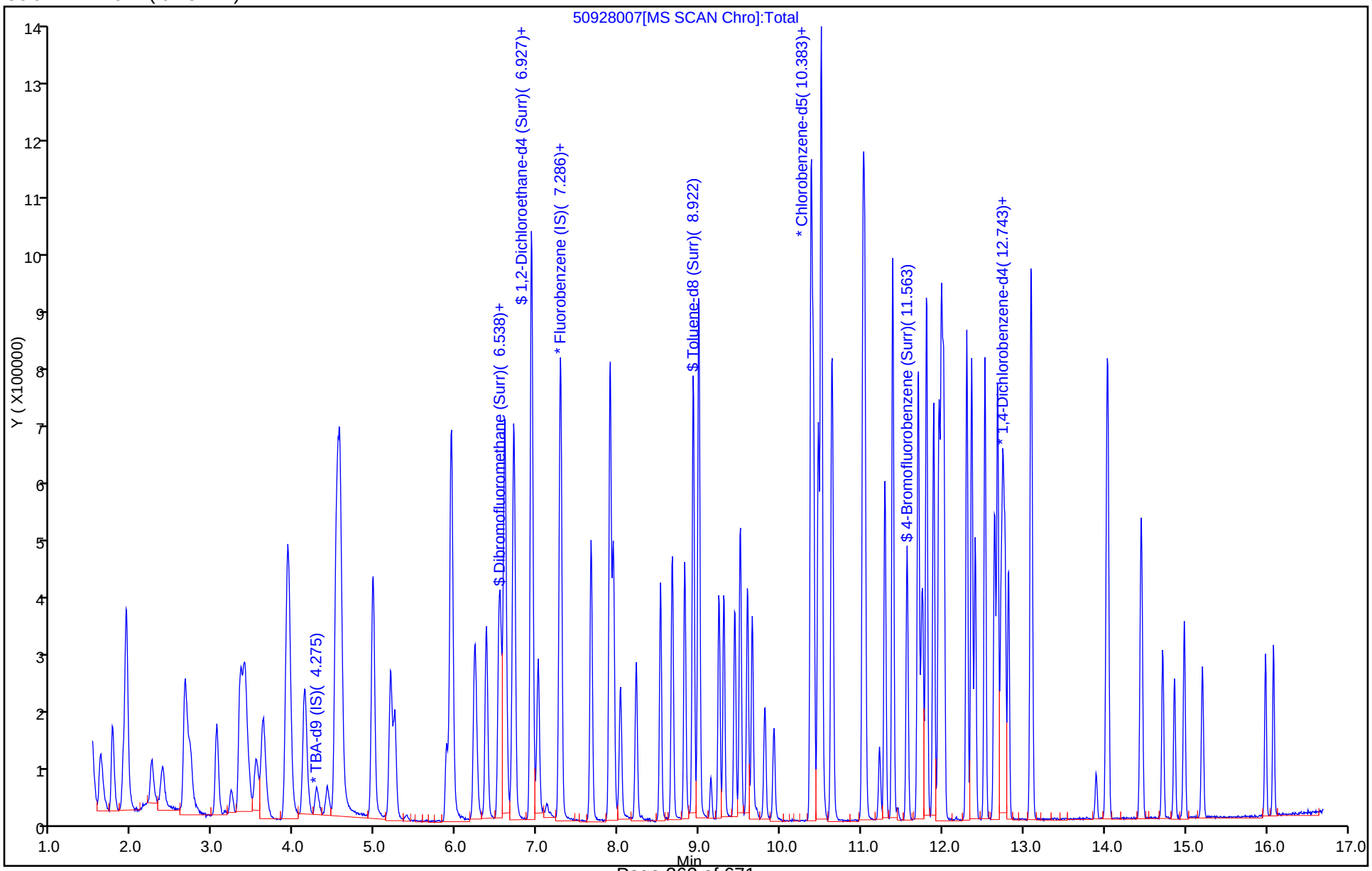
Report Date: 29-Sep-2016 10:33:43 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928007.D

Injection Date:	28-Sep-2016 15:15:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	IC VSTD15			Worklist Smp#:	7
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	7
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

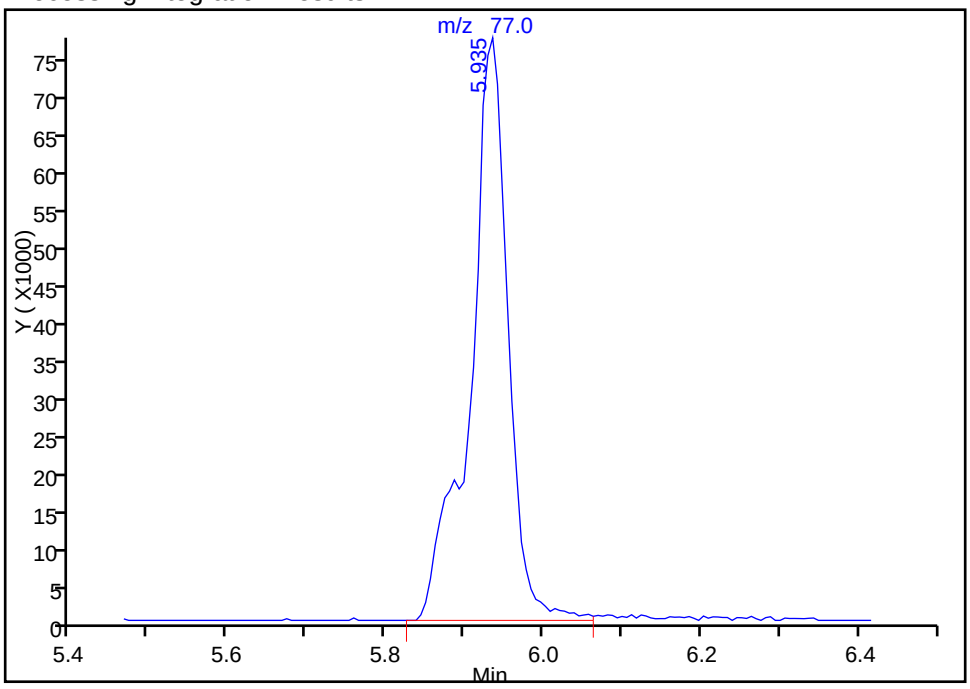
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928007.D				
Injection Date:	28-Sep-2016 15:15:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD15				
Client ID:					
Operator ID:	001562	ALS Bottle#:	7	Worklist Smp#:	7
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

44 2,2-Dichloropropane, CAS: 594-20-7

Signal: 1

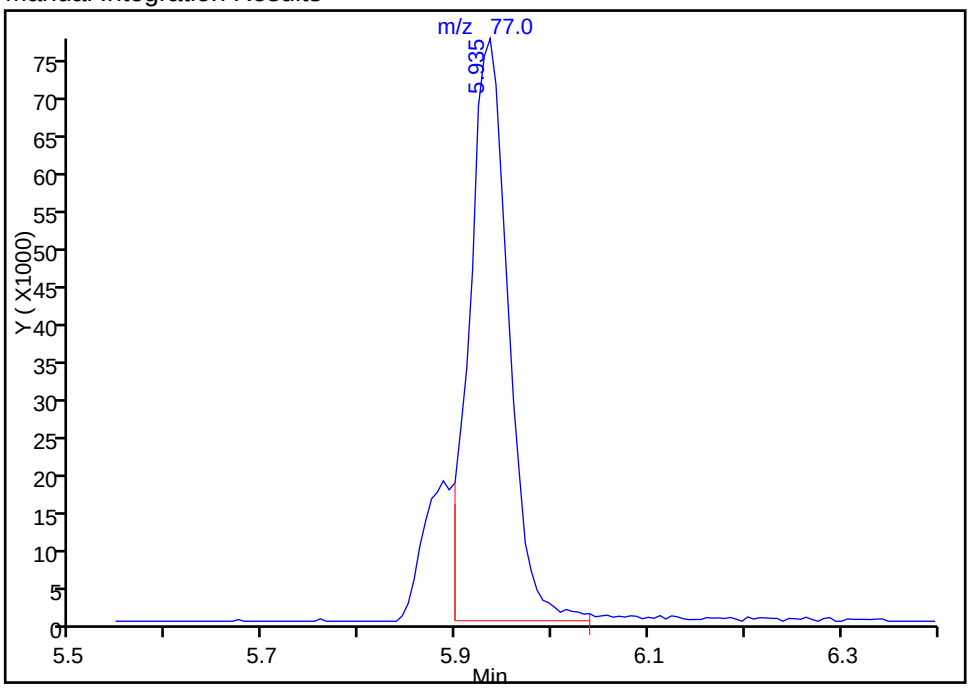
Processing Integration Results

RT: 5.94
Area: 259269
Amount: 83.404485
Amount Units: ng



Manual Integration Results

RT: 5.94
Area: 220411
Amount: 75.855500
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:04:50

Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

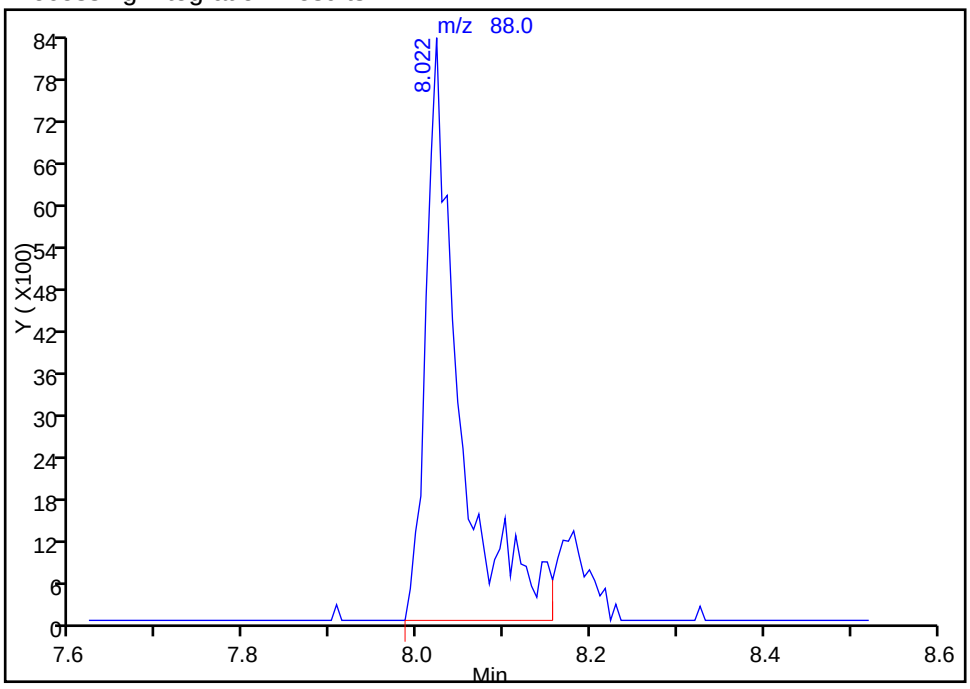
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928007.D				
Injection Date:	28-Sep-2016 15:15:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD15				
Client ID:					
Operator ID:	001562	ALS Bottle#:	7	Worklist Smp#:	7
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

70 1,4-Dioxane, CAS: 123-91-1

Signal: 1

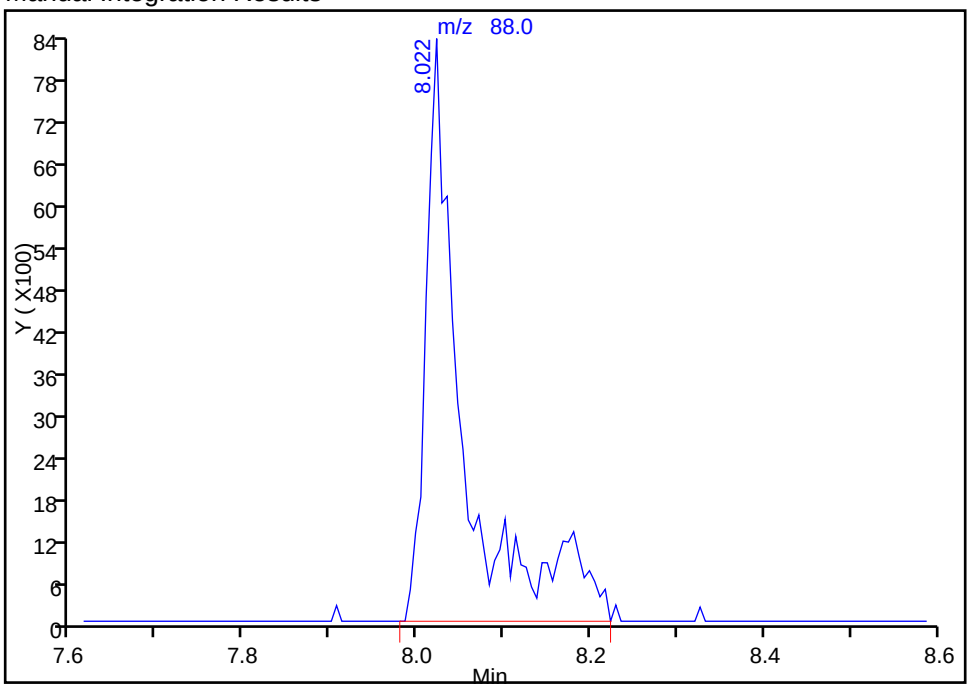
Processing Integration Results

RT: 8.02
Area: 22211
Amount: 1311.0733
Amount Units: ng



Manual Integration Results

RT: 8.02
Area: 25174
Amount: 1432.2371
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:04:50

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928008.D
Lims ID: IC VSTD20
Client ID:
Sample Type: IC Calib Level: 5
Inject. Date: 28-Sep-2016 15:39:30 ALS Bottle#: 8 Worklist Smp#: 8
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-008
Misc. Info.: IC VSTD20
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 11:06:04 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 11:06:03

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.275	4.275	0.000	0	158838	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.274	7.280	-0.006	98	428033	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.377	10.376	0.001	89	98023	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.719	12.725	-0.006	95	104365	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.551	6.556	-0.005	93	183477	100.0	95.1	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.928	6.927	0.001	0	239641	100.0	91.4	
$ 7 Toluene-d8 (Surr)	98	8.923	8.922	0.001	94	701950	100.0	91.0	
$ 8 4-Bromofluorobenzene (Surr	95	11.563	11.563	0.000	84	264099	100.0	92.7	
11 Dichlorodifluoromethane	85	1.617	1.616	0.001	99	286586	100.0	101.7	
12 Chloromethane	50	1.763	1.756	0.007	99	319936	100.0	97.9	
13 Vinyl chloride	62	1.903	1.896	0.007	98	259398	100.0	97.7	
14 Butadiene	39	1.939	1.926	0.013	97	294630	100.0	98.5	
15 Bromomethane	94	2.262	2.249	0.013	92	103284	100.0	89.7	
16 Chloroethane	64	2.389	2.377	0.012	99	154860	100.0	93.0	
17 Dichlorofluoromethane	67	2.657	2.657	0.001	97	333435	100.0	95.0	
18 Trichlorofluoromethane	101	2.681	2.669	0.012	95	243151	100.0	96.9	
20 Ethyl ether	59	3.046	3.046	0.000	95	220471	100.0	101.5	
21 Acrolein	56	3.229	3.222	0.007	99	98265	200.0	196.9	
22 1,1-Dichloroethene	96	3.326	3.338	-0.012	96	238772	100.0	98.4	
23 1,1,2-Trichloro-1,2,2-trif	101	3.405	3.393	0.012	94	246005	100.0	100.7	
24 Acetone	43	3.448	3.441	0.007	99	163522	200.0	194.8	
25 Iodomethane	142	3.527	3.533	-0.006	99	331996	100.0	95.6	
26 Carbon disulfide	76	3.618	3.624	-0.006	100	636790	100.0	97.5	
28 3-Chloro-1-propene	76	3.910	3.916	-0.006	89	158003	100.0	99.0	
30 Methyl acetate	43	3.935	3.934	0.001	98	989286	500.0	478.9	
31 Methylene Chloride	84	4.129	4.135	-0.006	97	248945	100.0	88.4	
32 2-Methyl-2-propanol	59	4.409	4.402	0.007	96	175170	1000.0	985.9	
33 Acrylonitrile	53	4.519	4.518	0.001	100	984865	1000.0	983.2	
34 trans-1,2-Dichloroethene	96	4.549	4.555	-0.006	96	242614	100.0	97.7	
35 Methyl tert-butyl ether	73	4.573	4.573	0.000	99	668767	100.0	96.1	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.975	4.974	0.001	95	382026	100.0	97.3	
37 1,1-Dichloroethane	63	5.188	5.187	0.001	97	463249	100.0	94.6	
38 Vinyl acetate	43	5.243	5.242	0.001	97	482877	100.0	97.2	
44 2,2-Dichloropropane	77	5.930	5.935	-0.005	85	283273	100.0	97.0	M
45 cis-1,2-Dichloroethene	96	5.936	5.942	-0.006	85	270490	100.0	96.5	
46 2-Butanone (MEK)	43	5.954	5.960	-0.006	99	243152	200.0	194.0	
49 Chlorobromomethane	128	6.228	6.221	0.007	95	108079	100.0	93.6	
51 Tetrahydrofuran	42	6.246	6.246	0.000	89	162987	200.0	192.1	
52 Chloroform	83	6.368	6.374	-0.006	96	418252	100.0	95.9	
53 1,1,1-Trichloroethane	97	6.526	6.526	0.000	98	333856	100.0	96.0	
54 Cyclohexane	56	6.599	6.599	0.000	96	499925	100.0	97.3	
56 Carbon tetrachloride	117	6.697	6.702	-0.005	95	279676	100.0	99.4	
55 1,1-Dichloropropene	75	6.715	6.714	0.001	91	339413	100.0	97.5	
57 Isobutyl alcohol	41	6.928	6.927	0.001	81	155112	2500.0	2501.8	
58 Benzene	78	6.934	6.933	0.001	97	935681	100.0	95.2	
59 1,2-Dichloroethane	62	7.013	7.012	0.001	98	329629	100.0	95.6	
62 n-Heptane	43	7.293	7.292	0.001	95	321049	100.0	98.5	
64 Trichloroethene	130	7.664	7.663	0.001	97	233451	100.0	97.0	
66 Methylcyclohexane	83	7.901	7.900	0.001	94	423059	100.0	99.8	
67 1,2-Dichloropropane	63	7.938	7.937	0.001	93	240411	100.0	95.5	
70 1,4-Dioxane	88	8.023	8.022	0.001	39	35757	2000.0	2026.4	
68 Dibromomethane	93	8.029	8.028	0.001	96	128114	100.0	97.8	
71 Dichlorobromomethane	83	8.217	8.223	-0.006	98	269493	100.0	97.9	
73 2-Chloroethyl vinyl ether	63	8.522	8.521	0.001	94	252919	200.0	191.4	
74 cis-1,3-Dichloropropene	75	8.661	8.667	-0.006	91	341854	100.0	96.1	
75 4-Methyl-2-pentanone (MIBK	43	8.820	8.819	0.001	97	480094	200.0	191.4	
76 Toluene	91	8.990	8.989	0.001	98	950725	100.0	96.1	
77 trans-1,3-Dichloropropene	75	9.239	9.239	0.000	99	299065	100.0	97.2	
78 Ethyl methacrylate	69	9.300	9.300	0.000	91	289004	100.0	95.4	
79 1,1,2-Trichloroethane	97	9.440	9.433	0.007	93	174528	100.0	95.0	
80 Tetrachloroethene	164	9.507	9.506	0.001	94	174830	100.0	96.7	
81 1,3-Dichloropropane	76	9.592	9.592	0.000	98	327449	100.0	94.5	
82 2-Hexanone	43	9.653	9.652	0.001	98	390723	200.0	196.6	
84 Chlorodibromomethane	129	9.805	9.811	-0.006	91	163509	100.0	96.6	
85 Ethylene Dibromide	107	9.921	9.920	0.001	99	177281	100.0	95.4	
86 3-Chlorobenzotrifluoride	180	10.377	10.383	-0.005	94	325187	100.0	100.3	
87 Chlorobenzene	112	10.407	10.407	0.000	92	573529	100.0	96.2	
88 4-Chlorobenzotrifluoride	180	10.468	10.468	0.000	97	302880	100.0	99.7	
89 1,1,1,2-Tetrachloroethane	131	10.499	10.498	0.001	92	184241	100.0	99.4	
90 Ethylbenzene	106	10.505	10.504	0.001	99	338139	100.0	97.5	
91 m-Xylene & p-Xylene	106	10.639	10.638	0.001	0	410611	100.0	96.9	
92 o-Xylene	106	11.016	11.015	0.001	97	386886	100.0	98.8	
93 Styrene	104	11.040	11.040	0.000	95	640914	100.0	98.0	
94 Bromoform	173	11.223	11.228	-0.005	95	98575	100.0	99.6	
96 2-Chlorobenzotrifluoride	180	11.290	11.289	0.001	95	298914	100.0	101.3	
97 Isopropylbenzene	105	11.387	11.386	0.001	97	965945	100.0	100.9	
100 Bromobenzene	156	11.697	11.703	-0.006	97	210327	100.0	94.9	
99 1,1,2,2-Tetrachloroethane	83	11.703	11.703	0.000	95	214426	100.0	98.0	
102 trans-1,4-Dichloro-2-buten	53	11.740	11.733	0.007	74	82182	100.0	97.6	
101 1,2,3-Trichloropropane	110	11.758	11.757	0.001	86	73005	100.0	96.0	
103 N-Propylbenzene	120	11.801	11.806	-0.005	99	260318	100.0	98.5	
104 2-Chlorotoluene	126	11.892	11.891	0.001	95	214825	100.0	98.0	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.959	11.958	0.001	96	228591	100.0	97.3	
106 1,3,5-Trimethylbenzene	105	11.989	11.989	0.000	94	689771	100.0	98.5	
107 4-Chlorotoluene	126	12.013	12.013	0.000	99	217267	100.0	94.8	
108 tert-Butylbenzene	119	12.299	12.299	0.000	93	576505	100.0	97.9	
110 1,2,4-Trimethylbenzene	105	12.360	12.360	0.000	99	687986	100.0	98.8	
111 1,2-dichloro-4-(trifluorom	214	12.403	12.402	0.001	97	191586	100.0	99.9	
112 sec-Butylbenzene	105	12.524	12.524	0.000	95	801000	100.0	98.7	
113 1,3-Dichlorobenzene	146	12.640	12.639	0.001	96	344274	100.0	96.7	
114 4-Isopropyltoluene	119	12.683	12.682	0.001	97	633830	100.0	99.2	
115 1,4-Dichlorobenzene	146	12.744	12.749	-0.005	93	335734	100.0	94.9	
116 2,4-Dichloro-1-(triflourom	214	12.774	12.773	0.001	96	165788	100.0	101.7	
118 2,5-Dichlorobenzotrifluori	214	12.817	12.816	0.000	0	185607	100.0	98.8	
120 n-Butylbenzene	91	13.090	13.090	0.000	99	532308	100.0	99.6	
121 1,2-Dichlorobenzene	146	13.102	13.102	0.000	95	286425	100.0	96.1	
122 1,2-Dibromo-3-Chloropropan	75	13.893	13.899	-0.006	76	28259	100.0	94.4	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.033	14.033	0.000	0	544542	300.0	284.0	
125 2,3- & 3,4- Dichlorotoluen	125	14.453	14.452	0.001	0	344803	200.0	184.2	
126 1,2,4-Trichlorobenzene	180	14.721	14.720	0.001	92	110342	100.0	84.1	
127 Hexachlorobutadiene	225	14.861	14.866	-0.005	96	55279	100.0	86.6	
128 Naphthalene	128	14.982	14.982	0.000	98	340708	100.0	89.0	
129 1,2,3-Trichlorobenzene	180	15.207	15.207	0.000	94	95882	100.0	81.3	
131 2,4,5-Trichlorotoluene	159	15.986	15.985	0.001	0	84846	100.0	89.5	
130 2,3,6-Trichlorotoluene	159	16.083	16.083	0.000	94	76660	100.0	81.1	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		200.0	195.6	
S 134 1,2-Dichloroethene, Total	96				0		200.0	194.2	
S 135 1,3-Dichloropropene, Total	1				0		200.0	193.3	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWVA1stRest_00008	Amount Added:	4.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	4.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	4.00	Units: uL	
voaW2CLEReste_00001	Amount Added:	4.00	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	4.00	Units: uL	
VOA8260SURR_00059	Amount Added:	4.00	Units: uL	
voaWAcro1stRe_00008	Amount Added:	8.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

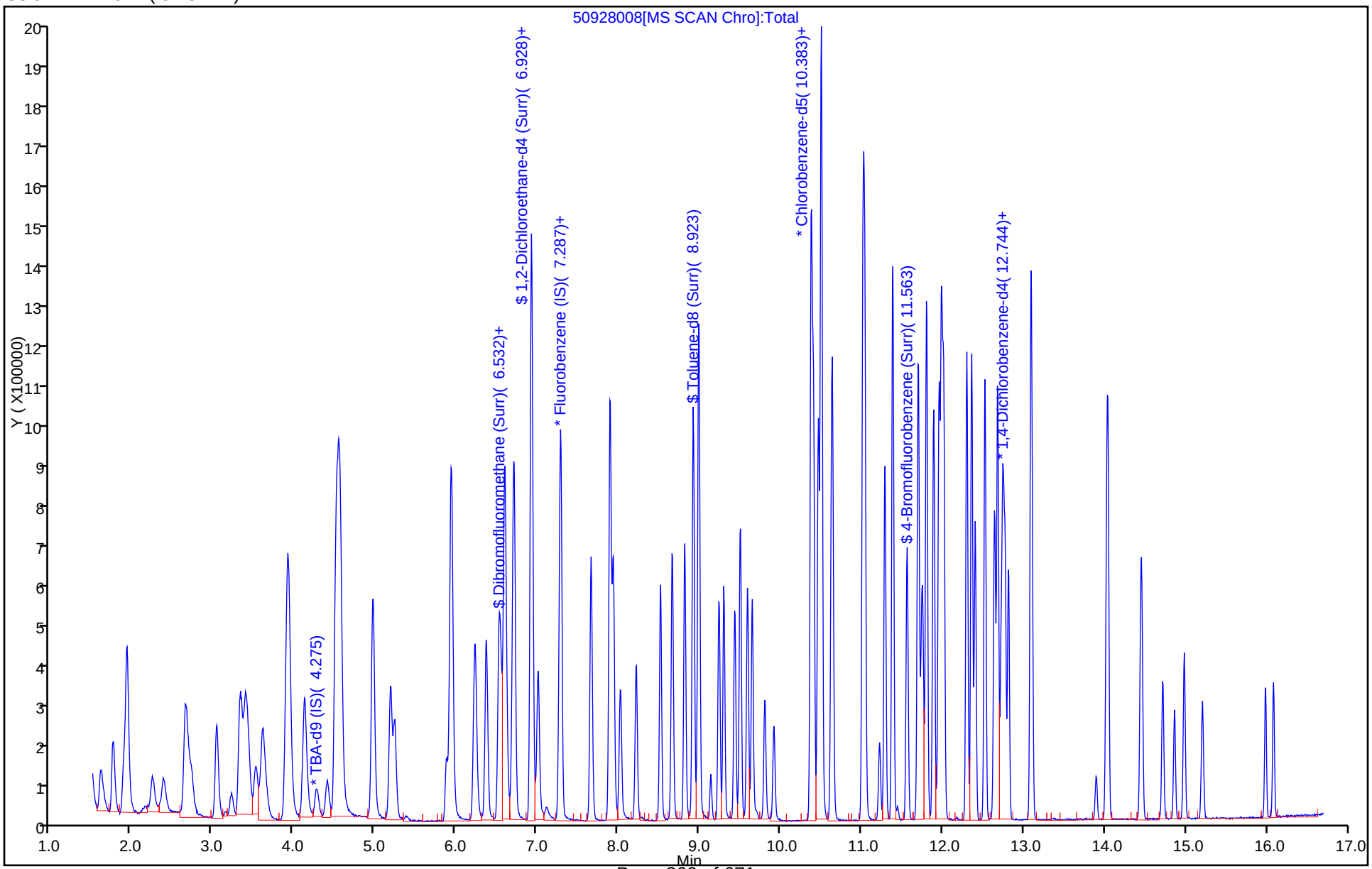
Report Date: 29-Sep-2016 11:06:06 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928008.D

Injection Date:	28-Sep-2016 15:39:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	IC VSTD20			Worklist Smp#:	8
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	8
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

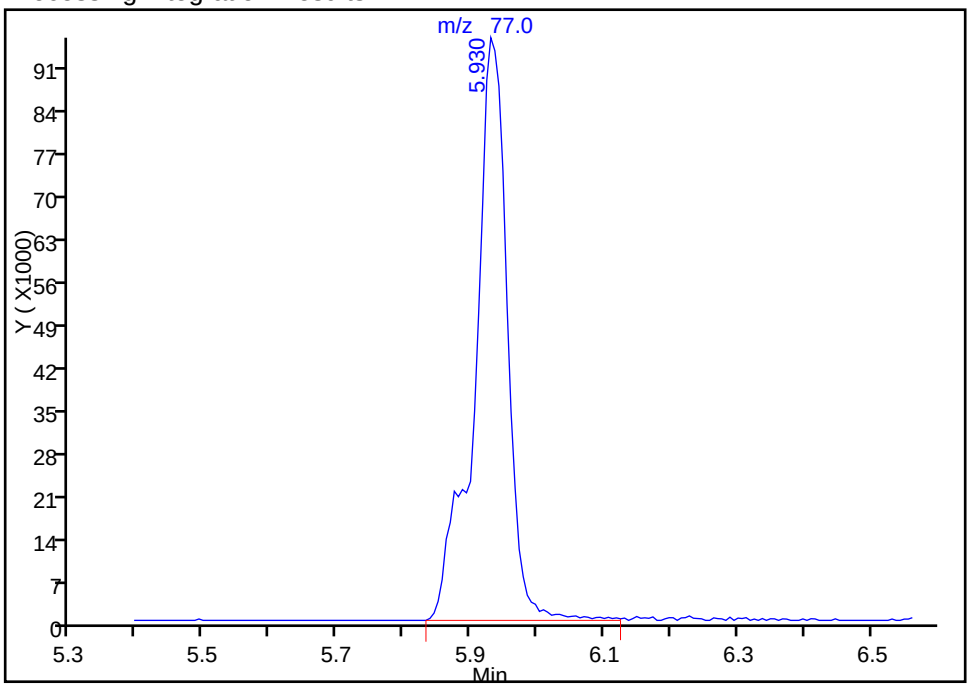
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928008.D				
Injection Date:	28-Sep-2016 15:39:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD20				
Client ID:					
Operator ID:	001562	ALS Bottle#:	8	Worklist Smp#:	8
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

44 2,2-Dichloropropane, CAS: 594-20-7

Signal: 1

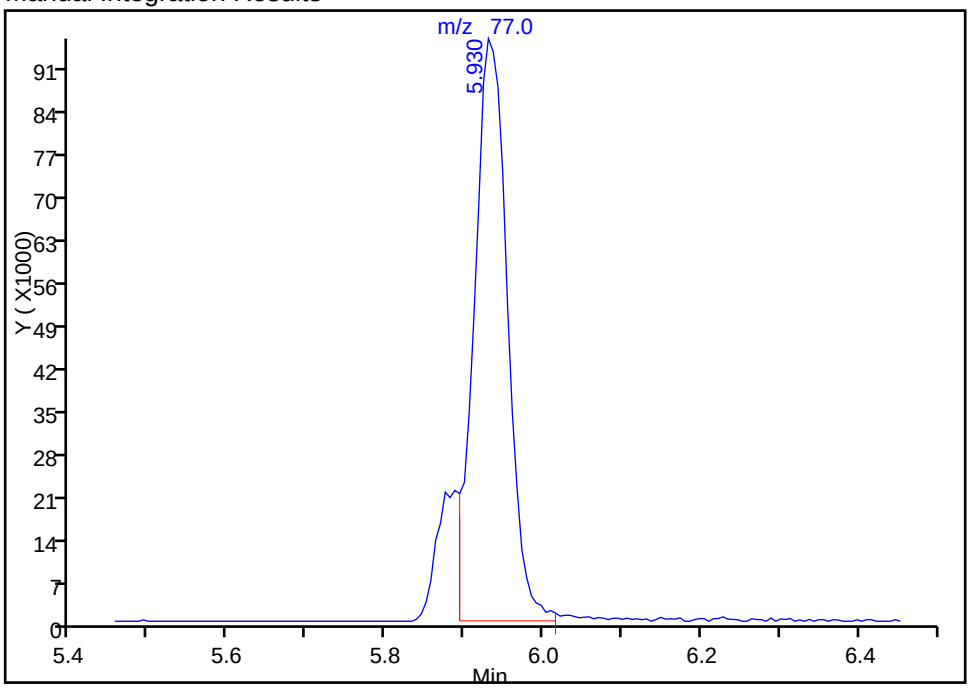
Processing Integration Results

RT: 5.93
Area: 325272
Amount: 106.7705
Amount Units: ng



Manual Integration Results

RT: 5.93
Area: 283273
Amount: 97.047937
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:09:58

Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928009.D
Lims ID: IC VSTD35
Client ID:
Sample Type: IC Calib Level: 6
Inject. Date: 28-Sep-2016 16:03:30 ALS Bottle#: 9 Worklist Smp#: 9
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-009
Misc. Info.: IC VSTD35
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 11:06:20 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 09:13:12

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.286	4.275	0.011	0	115235	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.273	7.280	-0.007	98	394371	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.376	10.376	0.000	88	91530	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.718	12.725	-0.007	94	90645	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.555	6.556	-0.001	93	305502	175.0	171.9	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.926	6.927	-0.001	0	411914	175.0	170.4	
$ 7 Toluene-d8 (Surr)	98	8.928	8.922	0.006	94	1131749	175.0	157.1	
$ 8 4-Bromofluorobenzene (Surr	95	11.562	11.563	-0.001	84	415635	175.0	156.2	
11 Dichlorodifluoromethane	85	1.622	1.616	0.006	99	458360	175.0	176.6	
12 Chloromethane	50	1.768	1.756	0.012	99	529035	175.0	175.8	
13 Vinyl chloride	62	1.908	1.896	0.012	98	430527	175.0	176.0	
14 Butadiene	39	1.938	1.926	0.012	98	483690	175.0	175.5	
15 Bromomethane	94	2.254	2.249	0.005	90	179335	175.0	169.0	
16 Chloroethane	64	2.388	2.377	0.011	99	262204	175.0	170.9	
17 Dichlorofluoromethane	67	2.662	2.657	0.006	98	559873	175.0	173.2	
18 Trichlorofluoromethane	101	2.686	2.669	0.017	96	403311	175.0	174.5	
20 Ethyl ether	59	3.045	3.046	-0.001	95	355655	175.0	177.7	
21 Acrolein	56	3.222	3.222	0.000	97	104587	225.0	227.5	
22 1,1-Dichloroethene	96	3.343	3.338	0.005	96	397280	175.0	177.7	
23 1,1,2-Trichloro-1,2,2-trif	101	3.398	3.393	0.005	94	399231	175.0	177.4	
24 Acetone	43	3.447	3.441	0.006	98	251763	350.0	325.5	
25 Iodomethane	142	3.538	3.533	0.005	99	556019	175.0	173.9	
26 Carbon disulfide	76	3.623	3.624	-0.001	100	1065277	175.0	177.0	
28 3-Chloro-1-propene	76	3.909	3.916	-0.007	89	258155	175.0	175.6	
30 Methyl acetate	43	3.939	3.934	0.005	98	1649696	875.0	866.8	
31 Methylene Chloride	84	4.134	4.135	-0.001	98	426263	175.0	164.2	
32 2-Methyl-2-propanol	59	4.414	4.402	0.012	97	226412	1750.0	1756.4	
33 Acrylonitrile	53	4.523	4.518	0.005	98	1595619	1750.0	1728.9	
34 trans-1,2-Dichloroethene	96	4.554	4.555	-0.001	96	399345	175.0	174.6	
35 Methyl tert-butyl ether	73	4.578	4.573	0.005	99	1137208	175.0	177.4	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.974	4.974	0.000	95	641372	175.0	177.3	
37 1,1-Dichloroethane	63	5.193	5.187	0.006	97	791340	175.0	175.4	
38 Vinyl acetate	43	5.241	5.242	-0.001	97	813773	175.0	177.7	
44 2,2-Dichloropropane	77	5.935	5.935	0.000	89	460557	175.0	171.3	M
45 cis-1,2-Dichloroethene	96	5.941	5.942	-0.001	85	458996	175.0	177.7	
46 2-Butanone (MEK)	43	5.959	5.960	-0.001	100	405849	350.0	351.5	
49 Chlorobromomethane	128	6.227	6.221	0.006	95	187177	175.0	175.9	
51 Tetrahydrofuran	42	6.245	6.246	-0.001	89	252879	350.0	323.5	
52 Chloroform	83	6.373	6.374	-0.001	95	701553	175.0	174.6	
53 1,1,1-Trichloroethane	97	6.531	6.526	0.005	97	551963	175.0	172.3	
54 Cyclohexane	56	6.598	6.599	-0.001	96	825734	175.0	174.5	
56 Carbon tetrachloride	117	6.701	6.702	-0.001	94	464285	175.0	179.1	
55 1,1-Dichloropropene	75	6.714	6.714	0.000	91	565138	175.0	176.1	
57 Isobutyl alcohol	41	6.926	6.927	-0.001	74	229140	4375.0	4011.2	
58 Benzene	78	6.933	6.933	-0.001	99	1572726	175.0	173.6	
59 1,2-Dichloroethane	62	7.012	7.012	0.000	97	563911	175.0	177.5	
62 n-Heptane	43	7.291	7.292	-0.001	94	538032	175.0	179.2	
64 Trichloroethene	130	7.663	7.663	0.000	97	391355	175.0	176.6	
66 Methylcyclohexane	83	7.900	7.900	0.000	95	690668	175.0	176.8	
67 1,2-Dichloropropane	63	7.936	7.937	-0.001	94	413907	175.0	178.4	
70 1,4-Dioxane	88	8.021	8.022	-0.001	38	57759	3500.0	3552.7	M
68 Dibromomethane	93	8.028	8.028	0.000	96	222830	175.0	184.6	
71 Dichlorobromomethane	83	8.222	8.223	-0.001	98	469062	175.0	184.9	
73 2-Chloroethyl vinyl ether	63	8.520	8.521	-0.001	94	448780	350.0	368.6	
74 cis-1,3-Dichloropropene	75	8.666	8.667	-0.001	91	602623	175.0	183.9	
75 4-Methyl-2-pentanone (MIBK	43	8.818	8.819	-0.001	98	797589	350.0	340.5	
76 Toluene	91	8.995	8.989	0.006	98	1540826	175.0	166.9	
77 trans-1,3-Dichloropropene	75	9.244	9.239	0.005	99	512837	175.0	178.5	
78 Ethyl methacrylate	69	9.305	9.300	0.005	92	498267	175.0	176.1	
79 1,1,2-Trichloroethane	97	9.439	9.433	0.006	93	296021	175.0	172.6	
80 Tetrachloroethene	164	9.506	9.506	0.000	94	286294	175.0	169.6	
81 1,3-Dichloropropane	76	9.597	9.592	0.005	97	557979	175.0	172.4	
82 2-Hexanone	43	9.652	9.652	0.000	98	641023	350.0	345.4	
84 Chlorodibromomethane	129	9.804	9.811	-0.007	91	284965	175.0	180.2	
85 Ethylene Dibromide	107	9.919	9.920	-0.001	98	302382	175.0	174.3	
86 3-Chlorobenzotrifluoride	180	10.382	10.383	0.000	94	501052	175.0	165.5	
87 Chlorobenzene	112	10.406	10.407	-0.001	91	935674	175.0	168.0	
88 4-Chlorobenzotrifluoride	180	10.467	10.468	-0.001	97	474811	175.0	167.4	
89 1,1,1,2-Tetrachloroethane	131	10.497	10.498	-0.001	94	301837	175.0	174.4	
90 Ethylbenzene	106	10.504	10.504	0.000	99	535707	175.0	165.4	
91 m-Xylene & p-Xylene	106	10.637	10.638	-0.001	0	660431	175.0	166.9	
92 o-Xylene	106	11.021	11.015	0.006	96	606481	175.0	165.8	
93 Styrene	104	11.039	11.040	-0.001	94	1024166	175.0	167.7	
94 Bromoform	173	11.221	11.228	-0.007	95	173705	175.0	188.0	
96 2-Chlorobenzotrifluoride	180	11.288	11.289	-0.001	95	445699	175.0	161.7	
97 Isopropylbenzene	105	11.386	11.386	0.000	97	1438617	175.0	160.9	
100 Bromobenzene	156	11.702	11.703	-0.001	97	335108	175.0	174.0	
99 1,1,2,2-Tetrachloroethane	83	11.702	11.703	-0.001	94	350916	175.0	171.8	
102 trans-1,4-Dichloro-2-buten	53	11.738	11.733	0.005	84	142073	175.0	194.3	
101 1,2,3-Trichloropropane	110	11.757	11.757	0.000	86	120795	175.0	182.8	
103 N-Propylbenzene	120	11.805	11.806	-0.001	98	391139	175.0	170.3	
104 2-Chlorotoluene	126	11.891	11.891	0.000	95	328722	175.0	172.6	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.957	11.958	-0.001	96	347023	175.0	170.1	
106 1,3,5-Trimethylbenzene	105	11.988	11.989	-0.001	96	1031283	175.0	169.6	
107 4-Chlorotoluene	126	12.012	12.013	-0.001	99	341659	175.0	171.6	
108 tert-Butylbenzene	119	12.298	12.299	-0.001	93	848792	175.0	166.0	
110 1,2,4-Trimethylbenzene	105	12.359	12.360	-0.001	99	1025893	175.0	169.6	
111 1,2-dichloro-4-(trifluorom	214	12.402	12.402	0.000	97	275283	175.0	165.4	
112 sec-Butylbenzene	105	12.523	12.524	-0.001	95	1164794	175.0	165.2	
113 1,3-Dichlorobenzene	146	12.645	12.639	0.006	96	527038	175.0	170.4	
114 4-Isopropyltoluene	119	12.681	12.682	-0.001	96	922428	175.0	166.2	
115 1,4-Dichlorobenzene	146	12.748	12.749	-0.001	94	532535	175.0	173.2	
116 2,4-Dichloro-1-(triflourom	214	12.773	12.773	0.000	96	236466	175.0	167.0	
118 2,5-Dichlorobenzotrifluori	214	12.815	12.816	-0.001	0	275343	175.0	168.7	
120 n-Butylbenzene	91	13.089	13.090	-0.001	97	799943	175.0	172.4	
121 1,2-Dichlorobenzene	146	13.101	13.102	-0.001	96	439306	175.0	169.8	
122 1,2-Dibromo-3-Chloropropan	75	13.892	13.899	-0.007	77	51968	175.0	200.0	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.032	14.033	-0.001	0	895681	525.0	537.9	
125 2,3- & 3,4- Dichlorotoluen	125	14.452	14.452	0.000	0	612541	350.0	376.7	
126 1,2,4-Trichlorobenzene	180	14.719	14.720	-0.001	94	224849	175.0	197.3	
127 Hexachlorobutadiene	225	14.865	14.866	-0.001	95	108209	175.0	195.3	
128 Naphthalene	128	14.981	14.982	-0.001	98	673501	175.0	202.7	
129 1,2,3-Trichlorobenzene	180	15.206	15.207	-0.001	93	213098	175.0	208.1	
131 2,4,5-Trichlorotoluene	159	15.985	15.985	0.000	0	181305	175.0	179.2	
130 2,3,6-Trichlorotoluene	159	16.082	16.083	-0.001	95	160030	175.0	194.8	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
S 134 1,2-Dichloroethene, Total	96				0		350.0	352.3	
S 133 Xylenes, Total	106				0		350.0	332.7	
S 135 1,3-Dichloropropene, Total	1				0		350.0	362.4	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWAcro1stRe_00008	Amount Added:	9.00	Units: uL	
VOA8260SURR_00059	Amount Added:	7.00	Units: uL	
voaWVA1stRest_00008	Amount Added:	7.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	7.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	7.00	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	7.00	Units: uL	
voaW2CLEReste_00001	Amount Added:	7.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

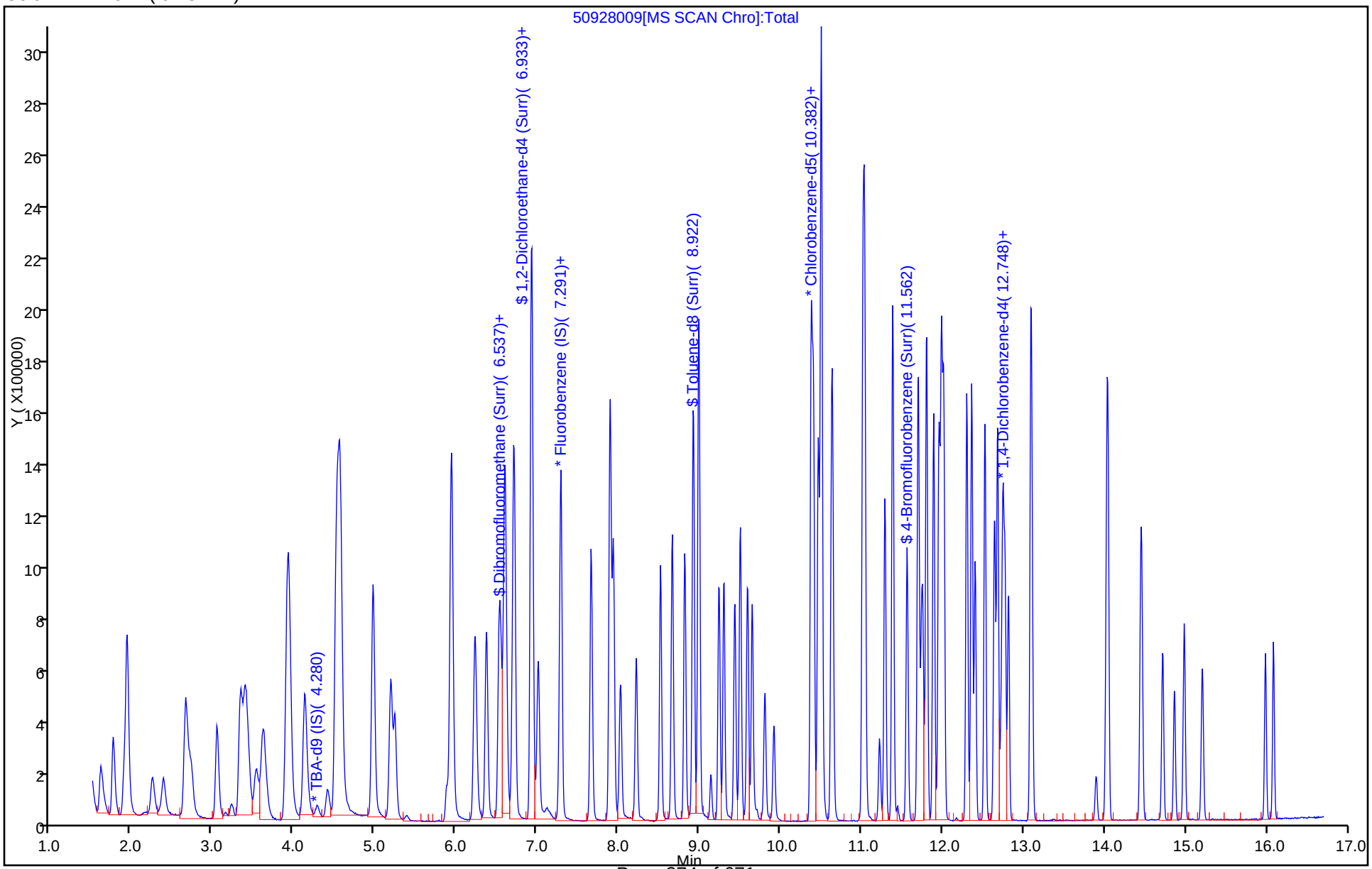
Report Date: 29-Sep-2016 11:06:22 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928009.D

Injection Date:	28-Sep-2016 16:03:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	IC VSTD35			Worklist Smp#:	9
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	9
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

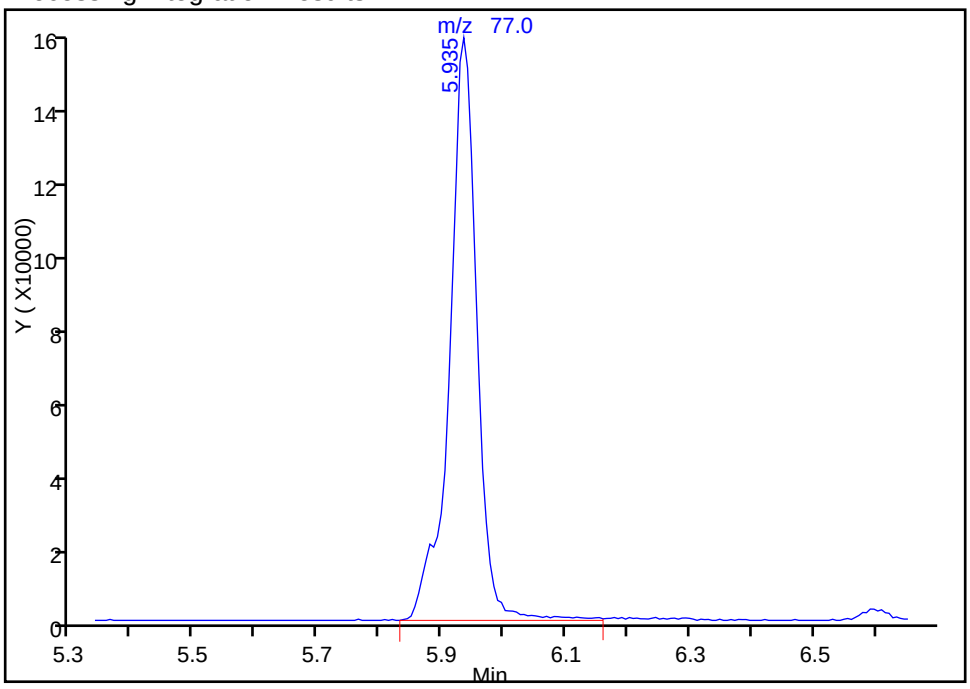
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928009.D				
Injection Date:	28-Sep-2016 16:03:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD35				
Client ID:					
Operator ID:	001562	ALS Bottle#:	9	Worklist Smp#:	9
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

44 2,2-Dichloropropane, CAS: 594-20-7

Signal: 1

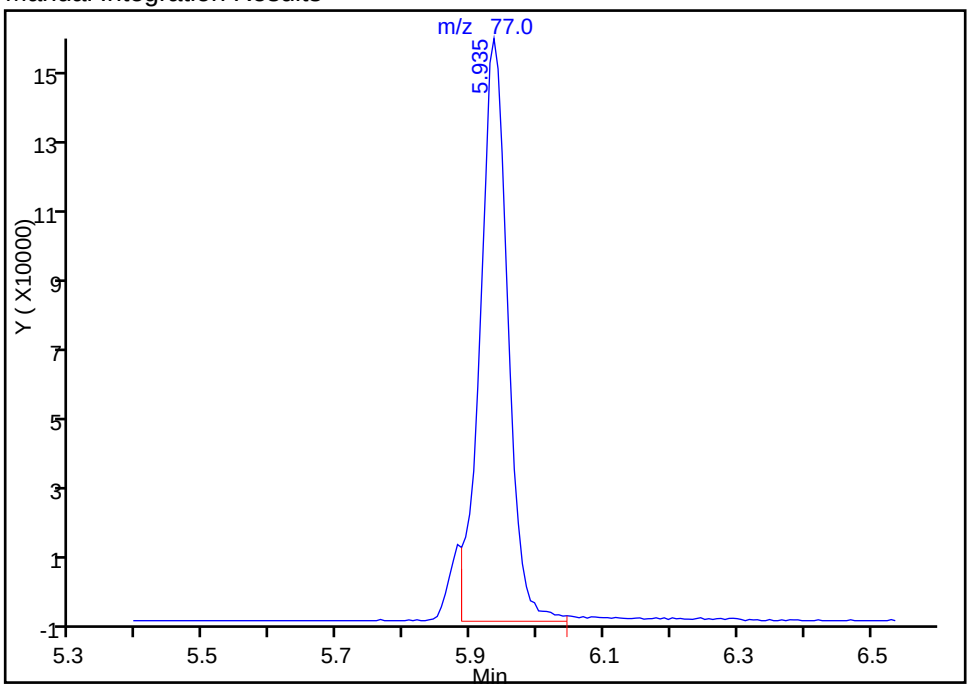
Processing Integration Results

RT: 5.93
Area: 487339
Amount: 177.1115
Amount Units: ng



Manual Integration Results

RT: 5.93
Area: 460557
Amount: 171.2525
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:13:12

Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

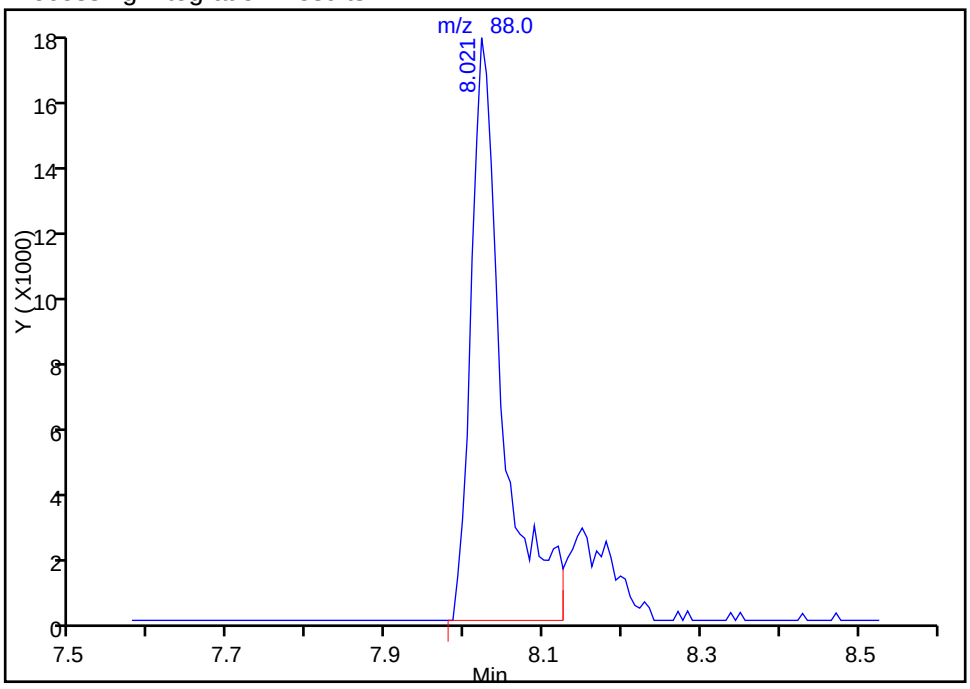
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928009.D				
Injection Date:	28-Sep-2016 16:03:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD35				
Client ID:					
Operator ID:	001562	ALS Bottle#:	9	Worklist Smp#:	9
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

70 1,4-Dioxane, CAS: 123-91-1

Signal: 1

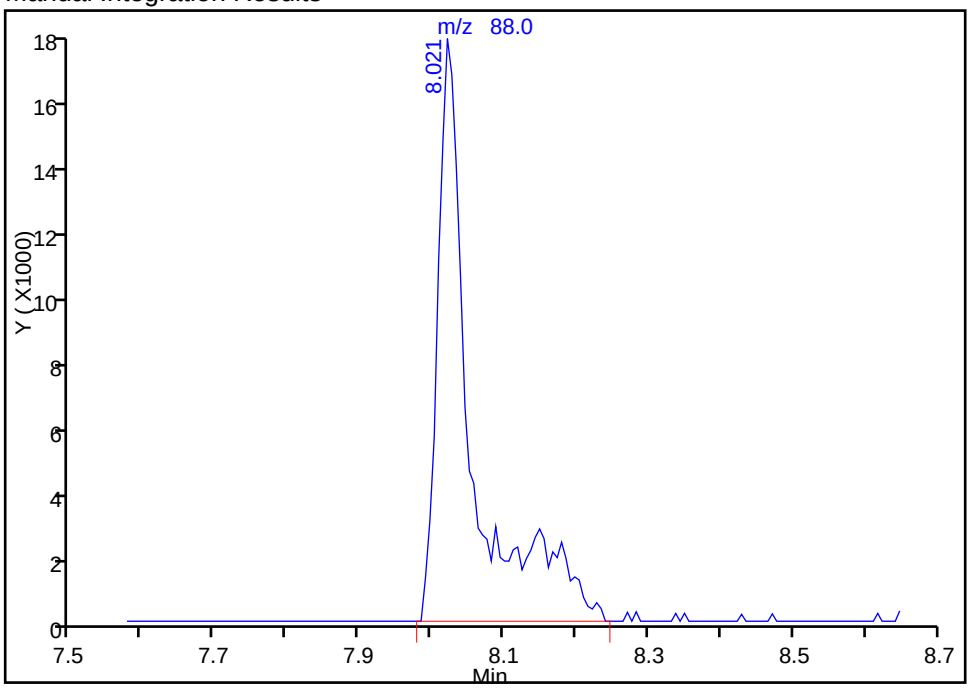
Processing Integration Results

RT: 8.02
Area: 47692
Amount: 2999.8030
Amount Units: ng



Manual Integration Results

RT: 8.02
Area: 57759
Amount: 3552.6700
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:13:12

Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928010.D
Lims ID: IC VSTD40
Client ID:
Sample Type: IC Calib Level: 7
Inject. Date: 28-Sep-2016 16:27:30 ALS Bottle#: 10 Worklist Smp#: 10
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-010
Misc. Info.: IC VSTD40
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 11:06:36 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 09:21:50

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.287	4.275	0.012	0	115427	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.274	7.280	-0.006	93	384826	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.376	10.376	0.000	88	90262	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.718	12.725	-0.007	92	91683	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.550	6.556	-0.006	93	352514	200.0	203.2	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.927	6.927	0.000	0	469162	200.0	198.9	
$ 7 Toluene-d8 (Surr)	98	8.922	8.922	0.000	94	1278630	200.0	180.0	
$ 8 4-Bromofluorobenzene (Surr	95	11.563	11.563	0.000	84	474859	200.0	181.0	
11 Dichlorodifluoromethane	85	1.616	1.616	0.000	98	517273	200.0	204.2	
12 Chloromethane	50	1.768	1.756	0.012	100	602464	200.0	205.1	
13 Vinyl chloride	62	1.914	1.896	0.018	99	487261	200.0	204.1	
14 Butadiene	39	1.945	1.926	0.019	96	543545	200.0	202.1	
15 Bromomethane	94	2.249	2.249	0.000	89	201143	200.0	194.2	
16 Chloroethane	64	2.389	2.377	0.012	99	307056	200.0	205.1	
17 Dichlorofluoromethane	67	2.662	2.657	0.006	98	650922	200.0	206.4	
18 Trichlorofluoromethane	101	2.687	2.669	0.018	98	466981	200.0	207.0	
20 Ethyl ether	59	3.052	3.046	0.006	95	392719	200.0	201.0	
21 Acrolein	56	3.228	3.222	0.006	99	111599	250.0	248.8	
22 1,1-Dichloroethene	96	3.332	3.338	-0.006	98	448034	200.0	205.3	
23 1,1,2-Trichloro-1,2,2-trif	101	3.411	3.393	0.018	95	452132	200.0	205.9	
24 Acetone	43	3.447	3.441	0.006	99	275016	400.0	364.4	
25 Iodomethane	142	3.532	3.533	-0.001	99	631551	200.0	202.4	
26 Carbon disulfide	76	3.624	3.624	0.000	100	1197032	200.0	203.8	
28 3-Chloro-1-propene	76	3.916	3.916	0.000	88	290699	200.0	202.7	
30 Methyl acetate	43	3.940	3.934	0.006	98	1845387	1000.0	993.7	
31 Methylene Chloride	84	4.129	4.135	-0.006	98	486344	200.0	192.0	
32 2-Methyl-2-propanol	59	4.421	4.402	0.019	97	248639	2000.0	1925.7	
33 Acrylonitrile	53	4.524	4.518	0.006	98	1785952	2000.0	1983.1	
34 trans-1,2-Dichloroethene	96	4.548	4.555	-0.007	96	453303	200.0	203.1	
35 Methyl tert-butyl ether	73	4.579	4.573	0.006	99	1277687	200.0	204.3	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.974	4.974	0.000	96	730587	200.0	206.9	
37 1,1-Dichloroethane	63	5.193	5.187	0.006	96	892754	200.0	202.8	
38 Vinyl acetate	43	5.242	5.242	0.000	98	920108	200.0	205.9	
44 2,2-Dichloropropane	77	5.935	5.935	0.000	90	514868	200.0	196.2	M
45 cis-1,2-Dichloroethene	96	5.941	5.942	-0.001	84	515559	200.0	204.5	
46 2-Butanone (MEK)	43	5.960	5.960	0.000	99	433920	400.0	385.1	
49 Chlorobromomethane	128	6.227	6.221	0.006	94	214350	200.0	206.5	
51 Tetrahydrofuran	42	6.246	6.246	0.000	89	292739	400.0	383.8	
52 Chloroform	83	6.373	6.374	-0.001	95	794529	200.0	202.7	
53 1,1,1-Trichloroethane	97	6.532	6.526	0.006	98	637944	200.0	204.1	
54 Cyclohexane	56	6.598	6.599	-0.001	96	940533	200.0	203.7	
56 Carbon tetrachloride	117	6.702	6.702	0.000	94	540246	200.0	213.6	
55 1,1-Dichloropropene	75	6.714	6.714	0.000	91	643461	200.0	205.5	
57 Isobutyl alcohol	41	6.927	6.927	0.000	87	259634	5000.0	4657.7	M
58 Benzene	78	6.933	6.933	0.000	99	1757741	200.0	198.9	
59 1,2-Dichloroethane	62	7.012	7.012	0.000	97	645294	200.0	208.2	
62 n-Heptane	43	7.292	7.292	0.000	95	596259	200.0	203.5	
64 Trichloroethene	130	7.663	7.663	0.000	97	442295	200.0	204.5	
66 Methylcyclohexane	83	7.900	7.900	0.000	95	783449	200.0	205.5	
67 1,2-Dichloropropane	63	7.937	7.937	0.000	95	459878	200.0	203.2	
70 1,4-Dioxane	88	8.028	8.022	0.006	39	68092	4000.0	4292.1	
68 Dibromomethane	93	8.028	8.028	0.000	97	246884	200.0	209.6	
71 Dichlorobromomethane	83	8.223	8.223	0.000	98	528051	200.0	213.3	
73 2-Chloroethyl vinyl ether	63	8.521	8.521	0.000	93	489958	400.0	412.4	
74 cis-1,3-Dichloropropene	75	8.667	8.667	0.000	91	663457	200.0	207.5	
75 4-Methyl-2-pentanone (MIBK	43	8.819	8.819	0.000	98	926821	400.0	401.2	
76 Toluene	91	8.995	8.989	0.006	97	1682347	200.0	184.7	
77 trans-1,3-Dichloropropene	75	9.245	9.239	0.006	99	584449	200.0	206.2	
78 Ethyl methacrylate	69	9.300	9.300	0.000	92	545625	200.0	195.6	
79 1,1,2-Trichloroethane	97	9.439	9.433	0.006	94	325970	200.0	192.8	
80 Tetrachloroethene	164	9.506	9.506	0.000	94	322489	200.0	193.7	
81 1,3-Dichloropropane	76	9.598	9.592	0.006	97	615623	200.0	192.9	
82 2-Hexanone	43	9.652	9.652	0.000	98	727168	400.0	397.4	
84 Chlorodibromomethane	129	9.804	9.811	-0.007	90	322398	200.0	206.8	
85 Ethylene Dibromide	107	9.920	9.920	0.000	98	336816	200.0	196.9	
86 3-Chlorobenzotrifluoride	180	10.382	10.383	0.000	93	568861	200.0	190.6	
87 Chlorobenzene	112	10.407	10.407	0.000	91	1038308	200.0	189.0	
88 4-Chlorobenzotrifluoride	180	10.468	10.468	0.000	97	535427	200.0	191.5	
89 1,1,1,2-Tetrachloroethane	131	10.498	10.498	0.000	91	339798	200.0	199.1	
90 Ethylbenzene	106	10.504	10.504	0.000	99	588956	200.0	184.3	
91 m-Xylene & p-Xylene	106	10.638	10.638	0.000	0	732214	200.0	187.6	
92 o-Xylene	106	11.015	11.015	0.000	97	669468	200.0	185.6	
93 Styrene	104	11.039	11.040	-0.001	95	1137392	200.0	188.8	
94 Bromoform	173	11.222	11.228	-0.006	95	196974	200.0	216.2	
96 2-Chlorobenzotrifluoride	180	11.289	11.289	0.000	94	515937	200.0	189.9	
97 Isopropylbenzene	105	11.386	11.386	0.000	97	1601919	200.0	181.7	
100 Bromobenzene	156	11.703	11.703	0.000	97	372499	200.0	191.3	
99 1,1,2,2-Tetrachloroethane	83	11.703	11.703	0.000	95	388860	200.0	193.0	
102 trans-1,4-Dichloro-2-buten	53	11.739	11.733	0.006	84	162235	200.0	219.4	
101 1,2,3-Trichloropropane	110	11.757	11.757	0.000	87	135370	200.0	202.6	
103 N-Propylbenzene	120	11.806	11.806	0.000	98	449479	200.0	193.5	
104 2-Chlorotoluene	126	11.891	11.891	0.000	95	366676	200.0	190.3	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.958	11.958	0.000	96	407541	200.0	197.4	
106 1,3,5-Trimethylbenzene	105	11.988	11.989	-0.001	97	1170104	200.0	190.3	
107 4-Chlorotoluene	126	12.013	12.013	0.000	99	388183	200.0	192.7	
108 tert-Butylbenzene	119	12.299	12.299	0.000	93	976167	200.0	188.7	
110 1,2,4-Trimethylbenzene	105	12.360	12.360	0.000	99	1182727	200.0	193.3	
111 1,2-dichloro-4-(trifluorom	214	12.402	12.402	0.000	97	332649	200.0	197.5	
112 sec-Butylbenzene	105	12.524	12.524	0.000	96	1346555	200.0	188.9	
113 1,3-Dichlorobenzene	146	12.639	12.639	0.000	96	617701	200.0	197.5	
114 4-Isopropyltoluene	119	12.682	12.682	0.000	96	1081141	200.0	192.6	
115 1,4-Dichlorobenzene	146	12.743	12.749	-0.006	94	619510	200.0	199.2	
116 2,4-Dichloro-1-(triflourom	214	12.773	12.773	0.000	97	288217	200.0	201.3	
118 2,5-Dichlorobenzotrifluori	214	12.816	12.816	0.000	0	325609	200.0	197.2	
120 n-Butylbenzene	91	13.090	13.090	0.000	98	954056	200.0	203.3	
121 1,2-Dichlorobenzene	146	13.102	13.102	0.000	94	526341	200.0	201.1	
122 1,2-Dibromo-3-Chloropropan	75	13.893	13.899	-0.006	78	59793	200.0	227.5	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.032	14.033	-0.001	0	1134530	600.0	673.6	
125 2,3- & 3,4- Dichlorotoluen	125	14.452	14.452	0.000	0	781028	400.0	474.9	
126 1,2,4-Trichlorobenzene	180	14.714	14.720	-0.006	94	283129	200.0	245.6	
127 Hexachlorobutadiene	225	14.860	14.866	-0.006	97	128089	200.0	228.6	
128 Naphthalene	128	14.982	14.982	0.000	98	818645	200.0	243.5	
129 1,2,3-Trichlorobenzene	180	15.207	15.207	0.000	94	262521	200.0	253.5	
131 2,4,5-Trichlorotoluene	159	15.985	15.985	0.000	0	211177	200.0	198.4	
130 2,3,6-Trichlorotoluene	159	16.083	16.083	0.000	94	197483	200.0	237.7	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		400.0	373.2	
S 134 1,2-Dichloroethene, Total	96				0		400.0	407.7	
S 135 1,3-Dichloropropene, Total	1				0		400.0	413.7	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaW2CLEReste_00001	Amount Added:	8.00	Units: uL	
VOA8260SURR_00059	Amount Added:	8.00	Units: uL	
voaWVA1stRest_00008	Amount Added:	8.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	8.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	8.00	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	8.00	Units: uL	
voaWAcro1stRe_00008	Amount Added:	10.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

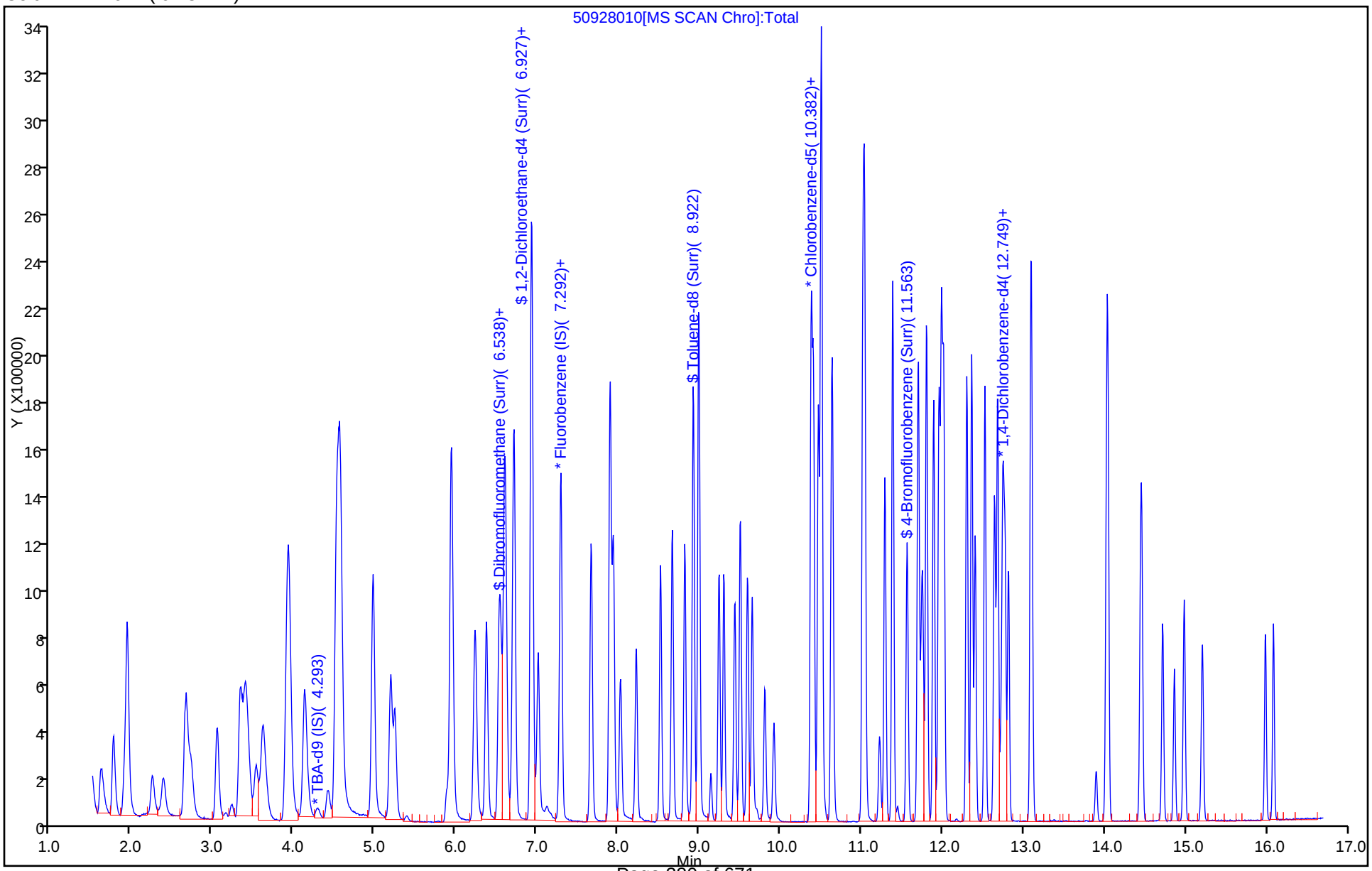
Report Date: 29-Sep-2016 11:06:38 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928010.D

Injection Date:	28-Sep-2016 16:27:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	IC VSTD40			Worklist Smp#:	10
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	10
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

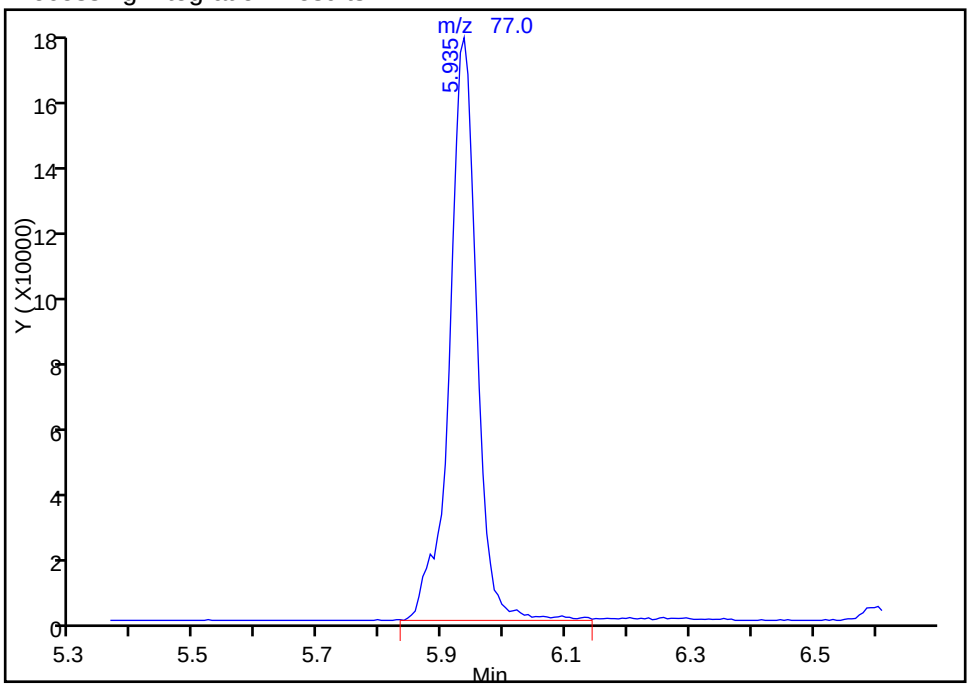
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928010.D				
Injection Date:	28-Sep-2016 16:27:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD40				
Client ID:					
Operator ID:	001562	ALS Bottle#:	10	Worklist Smp#:	10
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

44 2,2-Dichloropropane, CAS: 594-20-7

Signal: 1

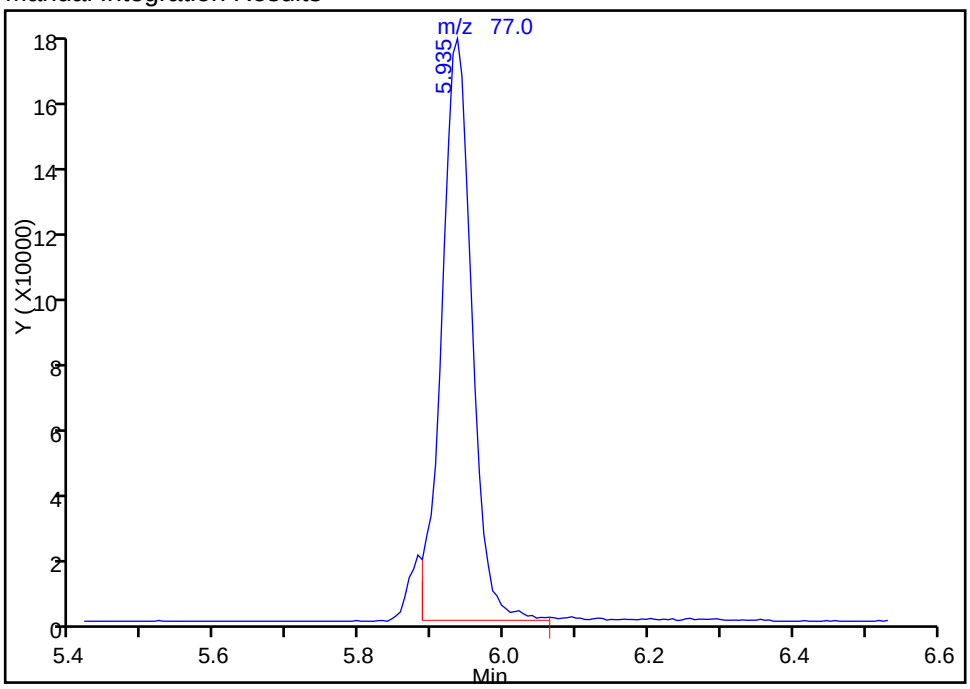
Processing Integration Results

RT: 5.94
Area: 544561
Amount: 204.4406
Amount Units: ng



Manual Integration Results

RT: 5.94
Area: 514868
Amount: 196.1959
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:21:50

Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

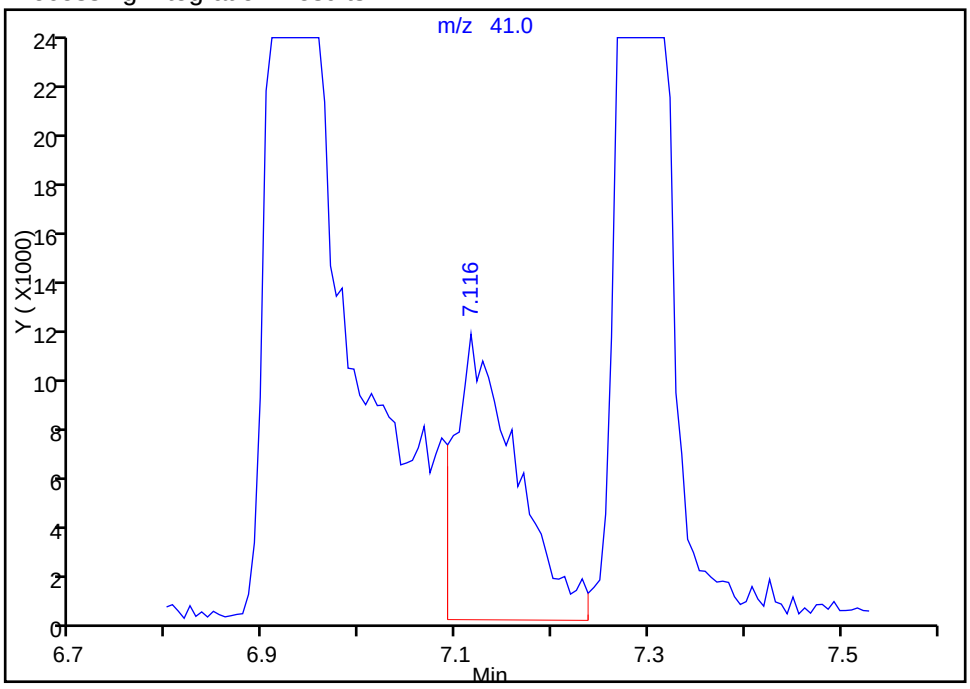
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928010.D				
Injection Date:	28-Sep-2016 16:27:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD40				
Client ID:					
Operator ID:	001562	ALS Bottle#:	10	Worklist Smp#:	10
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

57 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

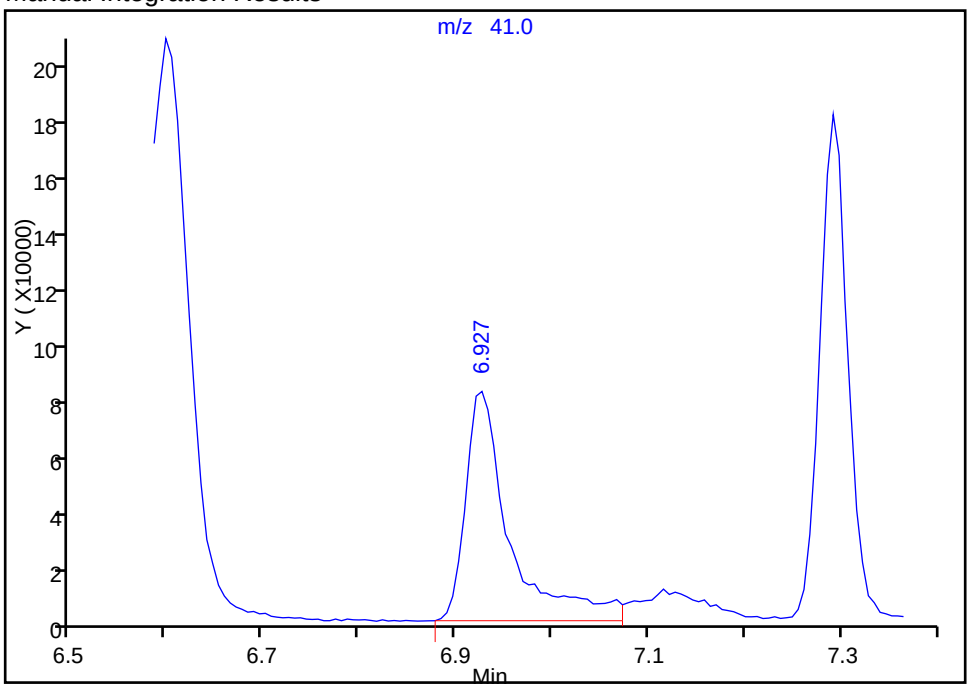
Processing Integration Results

RT: 7.12
Area: 50877
Amount: 1247.5195
Amount Units: ng



Manual Integration Results

RT: 6.93
Area: 259634
Amount: 4657.7498
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:21:50

Audit Action: Assigned Compound ID Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

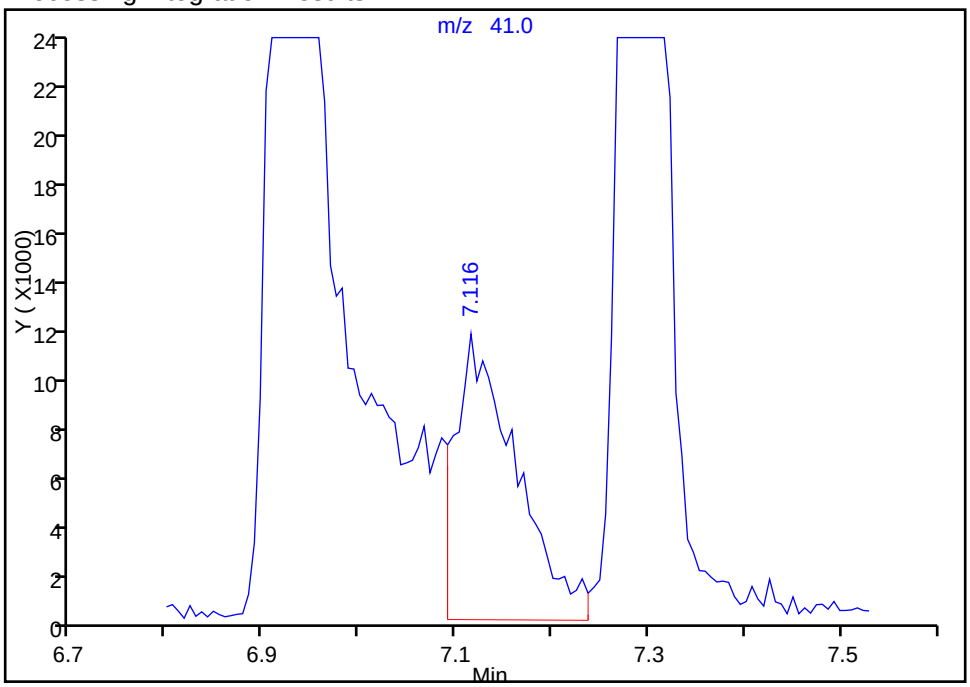
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928010.D
Injection Date: 28-Sep-2016 16:27:30 Instrument ID: CHHP5
Lims ID: IC VSTD40
Client ID:
Operator ID: 001562 ALS Bottle#: 10 Worklist Smp#: 10
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

57 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

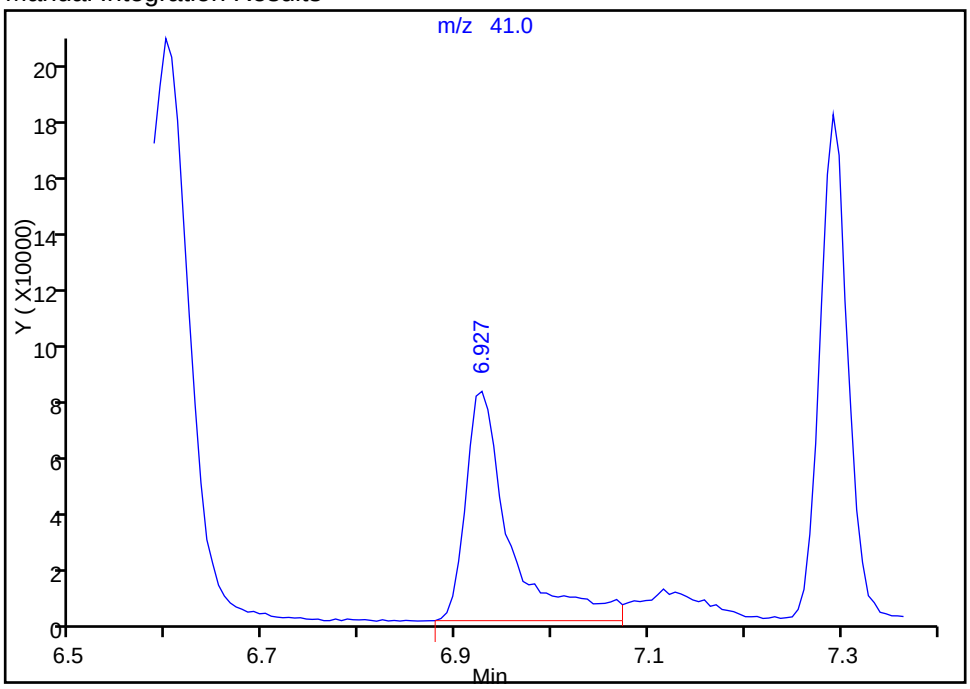
Processing Integration Results

RT: 7.12
Area: 50877
Amount: 1247.5195
Amount Units: ng



Manual Integration Results

RT: 6.93
Area: 259634
Amount: 4657.7498
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:21:50
Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928011.D
Lims ID: IC VSTD50
Client ID:
Sample Type: IC Calib Level: 8
Inject. Date: 28-Sep-2016 16:51:30 ALS Bottle#: 11 Worklist Smp#: 11
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-011
Misc. Info.: IC VSTD50
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 11:08:31 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 11:08:31

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.287	4.275	0.012	0	145693	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.274	7.280	-0.006	98	377302	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.376	10.376	0.000	88	88135	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.724	12.725	-0.001	89	81195	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.550	6.556	-0.006	93	439137	250.0	258.2	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.921	6.927	-0.006	0	601271	250.0	260.1	
$ 7 Toluene-d8 (Surr)	98	8.922	8.922	0.000	94	1570018	250.0	226.4	
$ 8 4-Bromofluorobenzene (Surr	95	11.563	11.563	-0.001	87	575151	250.0	224.5	
11 Dichlorodifluoromethane	85	1.616	1.616	0.000	99	594622	250.0	239.4	
12 Chloromethane	50	1.768	1.756	0.012	99	715799	250.0	248.6	
13 Vinyl chloride	62	1.908	1.896	0.012	98	574513	250.0	245.4	
14 Butadiene	39	1.932	1.926	0.006	97	645769	250.0	244.9	
15 Bromomethane	94	2.243	2.249	-0.006	91	249057	250.0	245.3	
16 Chloroethane	64	2.376	2.377	-0.001	100	369458	250.0	251.7	
17 Dichlorofluoromethane	67	2.656	2.657	0.000	97	778608	250.0	251.8	
18 Trichlorofluoromethane	101	2.687	2.669	0.018	98	557326	250.0	252.0	
20 Ethyl ether	59	3.046	3.046	0.000	95	532822	250.0	278.2	
21 Acrolein	56	3.234	3.222	0.012	98	135147	275.0	307.3	
22 1,1-Dichloroethene	96	3.332	3.338	-0.006	96	536898	250.0	251.0	
23 1,1,2-Trichloro-1,2,2-trif	101	3.398	3.393	0.005	94	531712	250.0	247.0	
24 Acetone	43	3.441	3.441	0.000	99	429187	500.0	580.0	
25 Iodomethane	142	3.526	3.533	-0.007	100	779677	250.0	254.8	
26 Carbon disulfide	76	3.611	3.624	-0.013	100	1448012	250.0	251.5	
28 3-Chloro-1-propene	76	3.903	3.916	-0.013	88	361279	250.0	256.9	
30 Methyl acetate	43	3.934	3.934	0.000	98	2483416	1250.0	1363.9	
31 Methylene Chloride	84	4.129	4.135	-0.007	98	601264	250.0	242.1	
32 2-Methyl-2-propanol	59	4.421	4.402	0.018	97	424180	2500.0	2602.7	
33 Acrylonitrile	53	4.518	4.518	0.000	97	2398340	2500.0	2716.2	
34 trans-1,2-Dichloroethene	96	4.548	4.555	-0.007	96	546321	250.0	249.7	
35 Methyl tert-butyl ether	73	4.573	4.573	0.000	99	1599850	250.0	260.9	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.968	4.974	-0.006	96	863925	250.0	249.6	
37 1,1-Dichloroethane	63	5.187	5.187	0.000	96	1097957	250.0	254.4	
38 Vinyl acetate	43	5.242	5.242	0.000	98	1167757	250.0	266.5	
44 2,2-Dichloropropane	77	5.935	5.935	0.000	89	613165	250.0	238.3	M
45 cis-1,2-Dichloroethene	96	5.935	5.942	-0.007	85	638803	250.0	258.5	
46 2-Butanone (MEK)	43	5.960	5.960	0.000	100	602303	500.0	545.2	
49 Chlorobromomethane	128	6.221	6.221	0.000	94	269656	250.0	264.9	
51 Tetrahydrofuran	42	6.246	6.246	0.000	90	406653	500.0	543.8	
52 Chloroform	83	6.373	6.374	-0.001	95	983614	250.0	255.9	
53 1,1,1-Trichloroethane	97	6.525	6.526	-0.001	97	765914	250.0	249.9	
54 Cyclohexane	56	6.592	6.599	-0.007	96	1090502	250.0	240.9	
56 Carbon tetrachloride	117	6.702	6.702	0.000	94	647100	250.0	260.9	
55 1,1-Dichloropropene	75	6.714	6.714	0.000	91	767529	250.0	250.0	
57 Isobutyl alcohol	41	6.927	6.927	0.000	94	379056	6250.0	6935.7	
58 Benzene	78	6.933	6.933	0.000	98	2148048	250.0	247.9	
59 1,2-Dichloroethane	62	7.012	7.012	0.000	97	815576	250.0	268.3	
62 n-Heptane	43	7.292	7.292	0.000	94	733636	250.0	255.4	
64 Trichloroethene	130	7.663	7.663	0.000	97	555599	250.0	262.0	
66 Methylcyclohexane	83	7.894	7.900	-0.006	95	916346	250.0	245.2	
67 1,2-Dichloropropane	63	7.937	7.937	0.000	94	584173	250.0	263.2	
70 1,4-Dioxane	88	8.022	8.022	0.000	71	91056	5000.0	5854.1	
68 Dibromomethane	93	8.028	8.028	0.000	96	319168	250.0	276.4	
71 Dichlorobromomethane	83	8.223	8.223	0.000	98	666672	250.0	274.7	
73 2-Chloroethyl vinyl ether	63	8.521	8.521	0.000	93	639029	500.0	548.6	
74 cis-1,3-Dichloropropene	75	8.667	8.667	0.000	91	857554	250.0	273.6	
75 4-Methyl-2-pentanone (MIBK	43	8.819	8.819	0.000	97	1178935	500.0	522.7	M
76 Toluene	91	8.989	8.989	0.000	97	2059034	250.0	231.6	
77 trans-1,3-Dichloropropene	75	9.239	9.239	0.000	99	755849	250.0	273.1	
78 Ethyl methacrylate	69	9.299	9.300	-0.001	92	715550	250.0	262.6	
79 1,1,2-Trichloroethane	97	9.433	9.433	0.000	94	421462	250.0	255.2	
80 Tetrachloroethene	164	9.506	9.506	0.000	94	390254	250.0	240.1	
81 1,3-Dichloropropane	76	9.591	9.592	-0.001	97	796390	250.0	255.6	
82 2-Hexanone	43	9.652	9.652	0.000	97	940605	500.0	526.4	
84 Chlorodibromomethane	129	9.810	9.811	-0.001	90	421891	250.0	277.1	
85 Ethylene Dibromide	107	9.920	9.920	0.000	99	433724	250.0	259.6	
86 3-Chlorobenzotrifluoride	180	10.382	10.383	0.000	93	674810	250.0	231.5	
87 Chlorobenzene	112	10.407	10.407	0.000	91	1283875	250.0	239.4	
88 4-Chlorobenzotrifluoride	180	10.467	10.468	-0.001	97	634675	250.0	232.4	
89 1,1,1,2-Tetrachloroethane	131	10.504	10.498	0.006	92	431610	250.0	258.9	
90 Ethylbenzene	106	10.504	10.504	0.000	99	724283	250.0	232.2	
91 m-Xylene & p-Xylene	106	10.638	10.638	0.000	0	894138	250.0	234.6	
92 o-Xylene	106	11.015	11.015	0.000	97	820686	250.0	233.0	
93 Styrene	104	11.039	11.040	-0.001	94	1373671	250.0	233.6	
94 Bromoform	173	11.222	11.228	-0.006	95	250642	250.0	281.7	
96 2-Chlorobenzotrifluoride	180	11.289	11.289	0.000	95	601185	250.0	226.6	
97 Isopropylbenzene	105	11.386	11.386	0.000	98	1856126	250.0	215.6	
100 Bromobenzene	156	11.696	11.703	-0.007	98	457221	250.0	265.1	
99 1,1,2,2-Tetrachloroethane	83	11.702	11.703	-0.001	94	478532	250.0	243.3	
102 trans-1,4-Dichloro-2-buten	53	11.739	11.733	0.006	86	199562	250.0	304.7	
101 1,2,3-Trichloropropane	110	11.757	11.757	0.000	87	167416	250.0	282.9	
103 N-Propylbenzene	120	11.800	11.806	-0.006	98	520622	250.0	253.1	
104 2-Chlorotoluene	126	11.891	11.891	0.000	95	433970	250.0	254.4	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.952	11.958	-0.006	96	476276	250.0	260.6	
106 1,3,5-Trimethylbenzene	105	11.988	11.989	-0.001	96	1331948	250.0	244.6	
107 4-Chlorotoluene	126	12.013	12.013	0.000	99	451546	250.0	253.2	
108 tert-Butylbenzene	119	12.299	12.299	0.000	93	1105106	250.0	241.3	
110 1,2,4-Trimethylbenzene	105	12.359	12.360	-0.001	99	1331907	250.0	245.9	
111 1,2-dichloro-4-(trifluorom	214	12.402	12.402	0.000	97	363317	250.0	243.6	
112 sec-Butylbenzene	105	12.524	12.524	0.000	96	1495442	250.0	236.9	
113 1,3-Dichlorobenzene	146	12.639	12.639	0.000	96	701021	250.0	253.1	
114 4-Isopropyltoluene	119	12.676	12.682	-0.006	96	1189271	250.0	239.2	
115 1,4-Dichlorobenzene	146	12.743	12.749	-0.006	91	697625	250.0	253.3	
116 2,4-Dichloro-1-(triflourom	214	12.773	12.773	0.000	95	308481	250.0	243.3	
118 2,5-Dichlorobenzotrifluori	214	12.816	12.816	0.000	0	353135	250.0	241.6	
120 n-Butylbenzene	91	13.089	13.090	-0.001	97	1020867	250.0	245.6	
121 1,2-Dichlorobenzene	146	13.102	13.102	0.000	93	574668	250.0	247.9	
122 1,2-Dibromo-3-Chloropropan	75	13.892	13.899	-0.007	82	65712	250.0	282.3	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.032	14.033	-0.001	0	1083822	750.0	726.7	
125 2,3- & 3,4- Dichlorotoluen	125	14.446	14.452	-0.006	0	731951	500.0	502.5	
126 1,2,4-Trichlorobenzene	180	14.720	14.720	0.000	94	270525	250.0	265.0	
127 Hexachlorobutadiene	225	14.860	14.866	-0.006	97	124544	250.0	250.9	
128 Naphthalene	128	14.981	14.982	-0.001	98	816381	250.0	274.2	
129 1,2,3-Trichlorobenzene	180	15.207	15.207	-0.001	94	253424	250.0	276.3	
131 2,4,5-Trichlorotoluene	159	15.985	15.985	0.000	0	259688	250.0	249.8	
130 2,3,6-Trichlorotoluene	159	16.083	16.083	0.000	94	236633	250.0	321.6	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		500.0	467.7	
S 134 1,2-Dichloroethene, Total	96				0		500.0	508.2	
S 135 1,3-Dichloropropene, Total	1				0		500.0	546.7	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWAcro1stRe_00008	Amount Added:	11.00	Units: uL	
VOA8260SURR_00059	Amount Added:	10.00	Units: uL	
voaWVA1stRest_00008	Amount Added:	10.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	10.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	10.00	Units: uL	
voaW2CLEReste_00001	Amount Added:	10.00	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	10.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

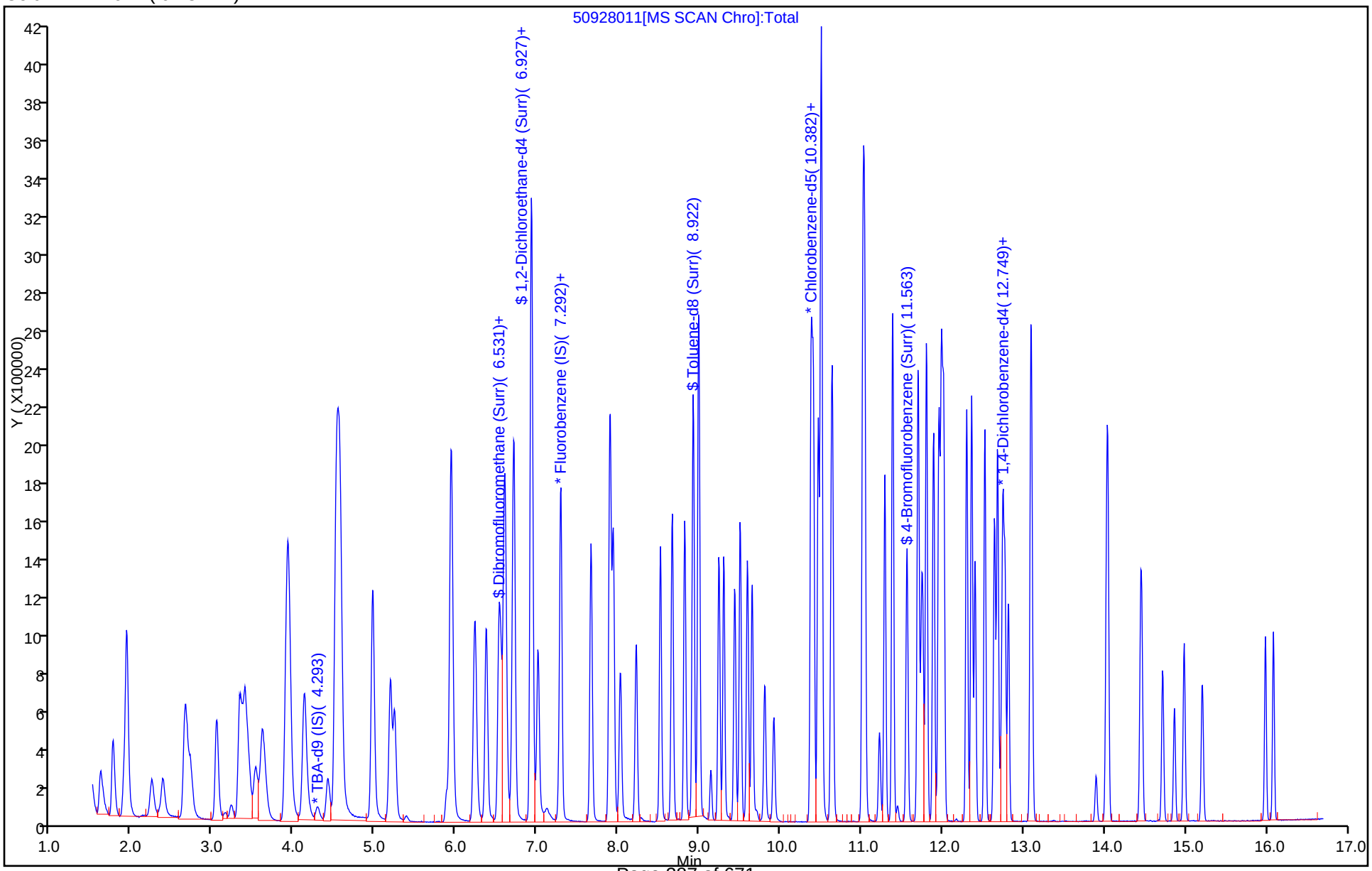
Report Date: 29-Sep-2016 11:08:32 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928011.D

Injection Date:	28-Sep-2016 16:51:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	IC VSTD50			Worklist Smp#:	11
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	11
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

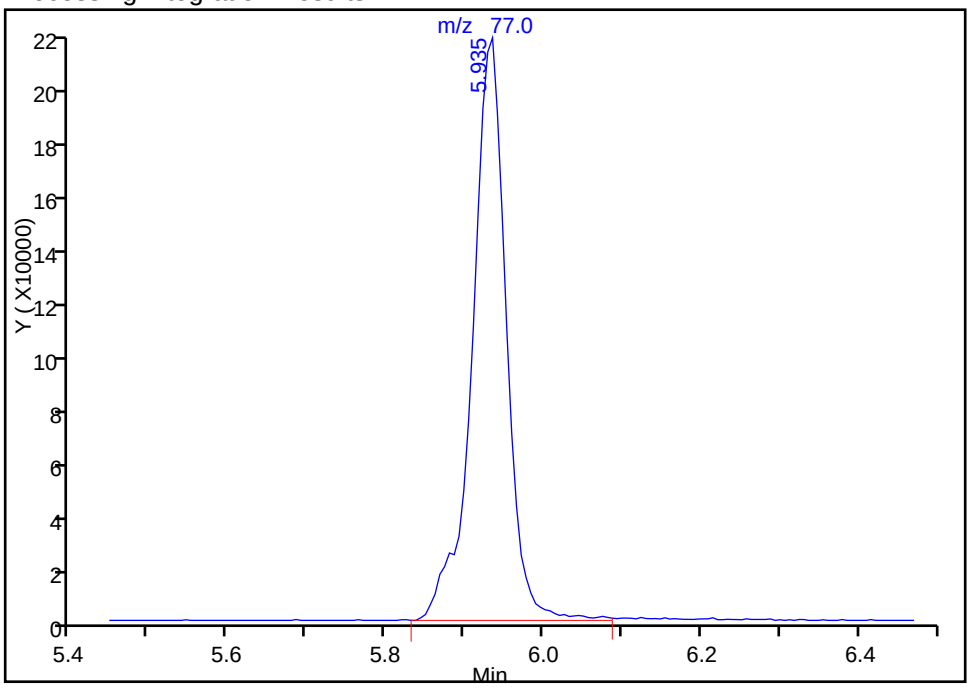
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928011.D
Injection Date: 28-Sep-2016 16:51:30 Instrument ID: CHHP5
Lims ID: IC VSTD50
Client ID:
Operator ID: 001562 ALS Bottle#: 11 Worklist Smp#: 11
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

44 2,2-Dichloropropane, CAS: 594-20-7

Signal: 1

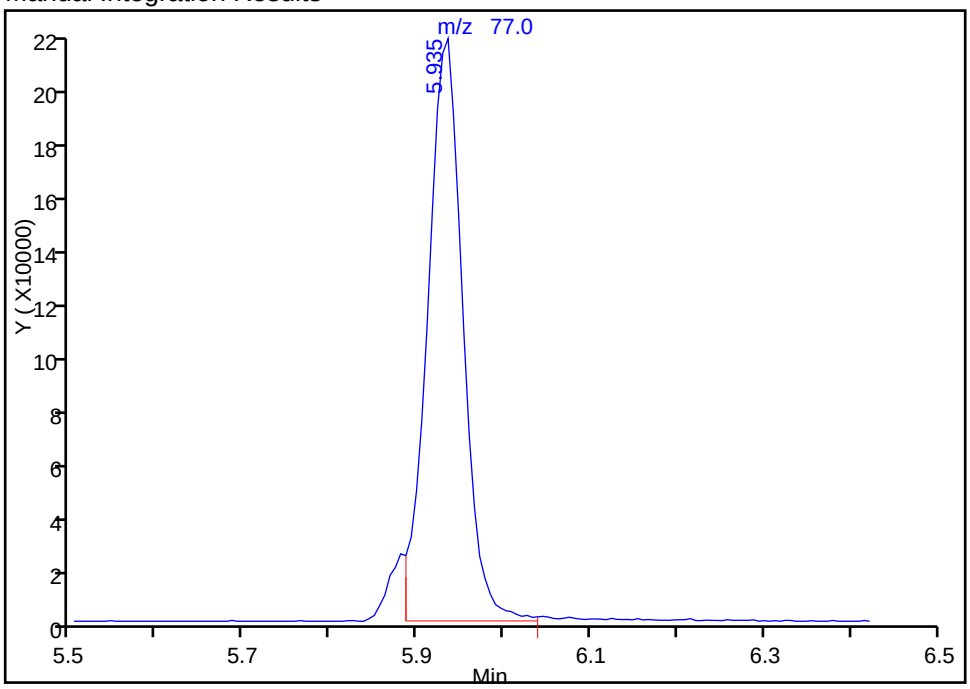
Processing Integration Results

RT: 5.94
Area: 647220
Amount: 249.8157
Amount Units: ng



Manual Integration Results

RT: 5.94
Area: 613165
Amount: 238.3124
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:23:01
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

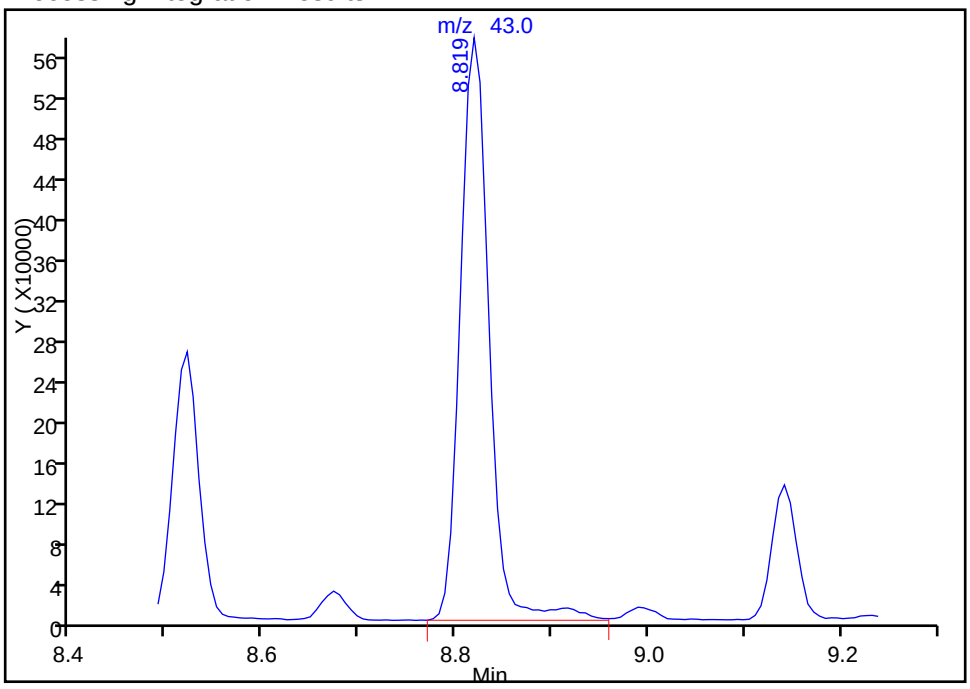
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928011.D
Injection Date: 28-Sep-2016 16:51:30 Instrument ID: CHHP5
Lims ID: IC VSTD50
Client ID:
Operator ID: 001562 ALS Bottle#: 11 Worklist Smp#: 11
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

75 4-Methyl-2-pentanone (MIBK), CAS: 108-10-1

Signal: 1

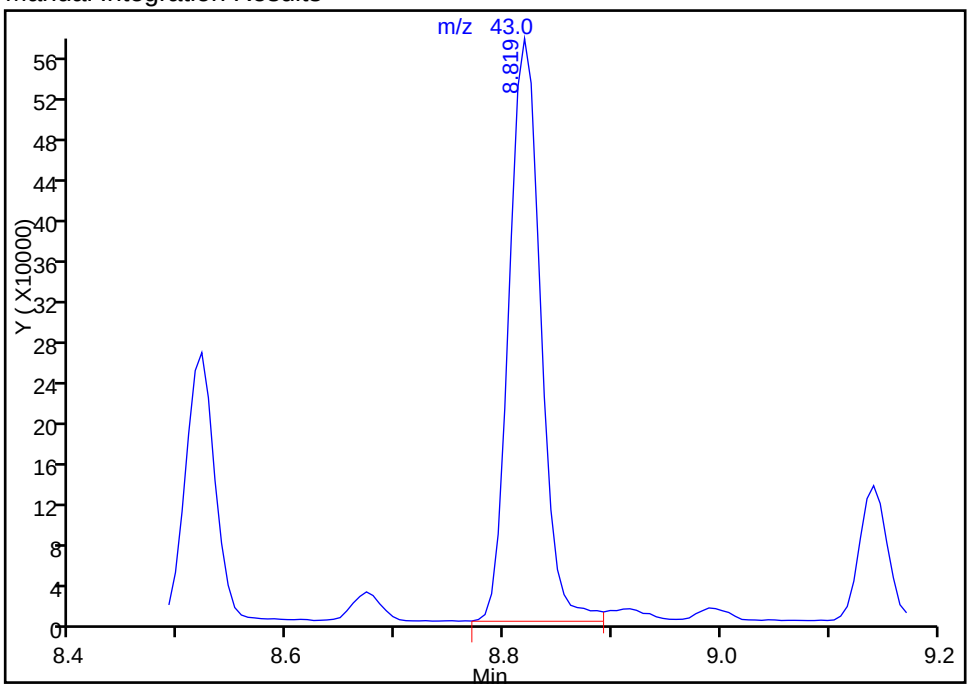
Processing Integration Results

RT: 8.82
Area: 1206643
Amount: 533.3288
Amount Units: ng



Manual Integration Results

RT: 8.82
Area: 1178935
Amount: 522.6824
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 09:28:18
Audit Action: Manually Integrated Audit Reason: Peak Tail

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D
Lims ID: IC VSTD1
Client ID:
Sample Type: IC Calib Level: 1
Inject. Date: 28-Sep-2016 18:27:30 ALS Bottle#: 15 Worklist Smp#: 15
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013640-015
Misc. Info.: IC VSTD1
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 29-Sep-2016 11:03:20 Calib Date: 28-Sep-2016 18:27:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK034

First Level Reviewer: fergusond Date: 29-Sep-2016 11:02:40

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.280	4.275	0.005	0	127717	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.273	7.280	-0.007	98	375512	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.376	10.376	0.000	89	82249	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.718	12.725	-0.007	97	88134	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.555	6.556	-0.001	91	9367	5.00	5.53	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.926	6.927	-0.001	0	14000	5.00	6.08	
$ 7 Toluene-d8 (Surr)	98	8.922	8.922	0.000	94	39324	5.00	6.08	
$ 8 4-Bromofluorobenzene (Surr	95	11.562	11.563	-0.001	86	15772	5.00	6.60	
11 Dichlorodifluoromethane	85	1.616	1.616	0.000	96	10690	5.00	4.32	
12 Chloromethane	50	1.762	1.756	0.006	98	14896	5.00	5.20	
13 Vinyl chloride	62	1.889	1.896	-0.007	69	11131	5.00	4.78	
14 Butadiene	39	1.938	1.926	0.012	96	11630	5.00	4.43	
15 Bromomethane	94	2.242	2.249	-0.007	85	6425	5.00	6.36	
16 Chloroethane	64	2.388	2.377	0.011	94	8482	5.00	5.81	
17 Dichlorofluoromethane	67	2.656	2.657	0.000	96	17168	5.00	5.58	
18 Trichlorofluoromethane	101	2.674	2.669	0.005	55	10067	5.00	4.57	
20 Ethyl ether	59	3.039	3.046	-0.007	92	9992	5.00	5.24	
21 Acrolein	56	3.234	3.222	0.012	97	44990	100.0	102.8	
22 1,1-Dichloroethene	96	3.325	3.338	-0.013	96	10276	5.00	4.83	
23 1,1,2-Trichloro-1,2,2-trif	101	3.386	3.393	-0.007	72	9603	5.00	4.48	
24 Acetone	43	3.453	3.441	0.012	99	17917	25.0	24.3	
25 Iodomethane	142	3.538	3.533	0.005	84	15834	5.00	5.20	
26 Carbon disulfide	76	3.629	3.624	0.005	99	27165	5.00	4.74	
28 3-Chloro-1-propene	76	3.909	3.916	-0.007	90	7357	5.00	5.26	
30 Methyl acetate	43	3.939	3.934	0.005	97	52192	25.0	28.8	
31 Methylene Chloride	84	4.128	4.135	-0.007	98	17634	5.00	7.13	
32 2-Methyl-2-propanol	59	4.402	4.402	0.000	33	7031	50.0	49.2	
33 Acrylonitrile	53	4.523	4.518	0.005	100	47134	50.0	53.6	
34 trans-1,2-Dichloroethene	96	4.548	4.555	-0.007	97	10848	5.00	4.98	
35 Methyl tert-butyl ether	73	4.578	4.573	0.005	98	32782	5.00	5.37	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.974	4.974	0.000	94	17173	5.00	4.99	
37 1,1-Dichloroethane	63	5.187	5.187	0.000	95	22688	5.00	5.28	
38 Vinyl acetate	43	5.235	5.242	-0.007	97	22224	5.00	5.10	
44 2,2-Dichloropropane	77	5.935	5.935	0.000	0	12860	5.00	5.02	M
45 cis-1,2-Dichloroethene	96	5.947	5.942	0.005	84	12859	5.00	5.23	
46 2-Butanone (MEK)	43	5.959	5.960	-0.001	99	29322	25.0	26.7	
49 Chlorobromomethane	128	6.227	6.221	0.006	94	5510	5.00	5.44	
51 Tetrahydrofuran	42	6.251	6.246	0.005	75	10096	10.0	13.6	
52 Chloroform	83	6.367	6.374	-0.007	94	21166	5.00	5.53	
53 1,1,1-Trichloroethane	97	6.531	6.526	0.005	97	15282	5.00	5.01	
54 Cyclohexane	56	6.598	6.599	-0.001	93	22381	5.00	4.97	
56 Carbon tetrachloride	117	6.707	6.702	0.005	96	10784	5.00	4.37	
55 1,1-Dichloropropene	75	6.707	6.714	-0.007	90	15189	5.00	4.97	
57 Isobutyl alcohol	41	6.926	6.927	-0.001	84	8501	125.0	156.3	M
58 Benzene	78	6.933	6.933	0.000	97	46937	5.00	5.44	
59 1,2-Dichloroethane	62	7.012	7.012	0.000	96	16526	5.00	5.46	
62 n-Heptane	43	7.291	7.292	-0.001	91	13473	5.00	4.71	
64 Trichloroethene	130	7.669	7.663	0.006	97	10635	5.00	5.04	
66 Methylcyclohexane	83	7.900	7.900	0.000	92	16654	5.00	4.48	
67 1,2-Dichloropropane	63	7.930	7.937	-0.007	90	12079	5.00	5.47	
70 1,4-Dioxane	88	8.040	8.022	0.018	38	1385	100.0	89.5	
68 Dibromomethane	93	8.021	8.028	-0.007	91	5718	5.00	4.98	
71 Dichlorobromomethane	83	8.216	8.223	-0.007	97	11721	5.00	4.85	
73 2-Chloroethyl vinyl ether	63	8.520	8.521	-0.001	92	11777	10.0	10.2	
74 cis-1,3-Dichloropropene	75	8.660	8.667	-0.007	89	15312	5.00	4.91	
75 4-Methyl-2-pentanone (MIBK	43	8.818	8.819	-0.001	99	54694	25.0	26.0	
76 Toluene	91	8.995	8.989	0.006	97	45382	5.00	5.47	
77 trans-1,3-Dichloropropene	75	9.244	9.239	0.005	96	12118	5.00	4.69	
78 Ethyl methacrylate	69	9.299	9.300	-0.001	88	13431	5.00	5.28	
79 1,1,2-Trichloroethane	97	9.433	9.433	0.000	90	8474	5.00	5.50	
80 Tetrachloroethene	164	9.506	9.506	0.000	94	7305	5.00	4.82	
81 1,3-Dichloropropane	76	9.591	9.592	-0.001	94	16097	5.00	5.54	
82 2-Hexanone	43	9.652	9.652	0.000	98	40910	25.0	24.5	
84 Chlorodibromomethane	129	9.810	9.811	-0.001	87	6748	5.00	4.75	
85 Ethylene Dibromide	107	9.913	9.920	-0.007	98	7864	5.00	5.04	
86 3-Chlorobenzotrifluoride	180	10.382	10.383	0.000	56	13837	5.00	5.09	
87 Chlorobenzene	112	10.400	10.407	-0.007	88	26456	5.00	5.29	
88 4-Chlorobenzotrifluoride	180	10.467	10.468	-0.001	95	12658	5.00	4.97	
89 1,1,1,2-Tetrachloroethane	131	10.497	10.498	-0.001	41	7397	5.00	4.76	
90 Ethylbenzene	106	10.504	10.504	0.000	98	16069	5.00	5.52	
91 m-Xylene & p-Xylene	106	10.637	10.638	-0.001	0	19703	5.00	5.54	
92 o-Xylene	106	11.021	11.015	0.006	96	17636	5.00	5.37	
93 Styrene	104	11.039	11.040	-0.001	95	29999	5.00	5.47	
94 Bromoform	173	11.221	11.228	-0.007	91	3716	5.00	4.48	
96 2-Chlorobenzotrifluoride	180	11.288	11.289	-0.001	93	12925	5.00	5.22	
97 Isopropylbenzene	105	11.386	11.386	0.000	96	42152	5.00	5.25	
100 Bromobenzene	156	11.696	11.703	-0.007	96	10402	5.00	5.56	
99 1,1,2,2-Tetrachloroethane	83	11.702	11.703	-0.001	72	9429	5.00	5.14	
102 trans-1,4-Dichloro-2-buten	53	11.738	11.733	0.005	65	2747	5.00	3.86	
101 1,2,3-Trichloropropane	110	11.751	11.757	-0.006	85	3025	5.00	4.71	
103 N-Propylbenzene	120	11.799	11.806	-0.007	99	11655	5.00	5.22	
104 2-Chlorotoluene	126	11.891	11.891	0.000	95	10182	5.00	5.50	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.957	11.958	-0.001	97	9964	5.00	5.02	
106 1,3,5-Trimethylbenzene	105	11.988	11.989	-0.001	92	29123	5.00	4.93	
107 4-Chlorotoluene	126	12.018	12.013	0.005	98	10396	5.00	5.37	
108 tert-Butylbenzene	119	12.298	12.299	-0.001	94	25244	5.00	5.08	
110 1,2,4-Trimethylbenzene	105	12.359	12.360	-0.001	98	29985	5.00	5.10	
111 1,2-dichloro-4-(trifluorom	214	12.402	12.402	0.000	97	8464	5.00	5.23	
112 sec-Butylbenzene	105	12.523	12.524	-0.001	94	34789	5.00	5.08	
113 1,3-Dichlorobenzene	146	12.639	12.639	0.000	97	16420	5.00	5.46	
114 4-Isopropyltoluene	119	12.681	12.682	-0.001	95	26302	5.00	4.87	
115 1,4-Dichlorobenzene	146	12.748	12.749	-0.001	91	16558	5.00	5.54	
116 2,4-Dichloro-1-(triflourom	214	12.773	12.773	0.000	51	6308	5.00	4.58	
118 2,5-Dichlorobenzotrifluori	214	12.809	12.816	-0.007	0	9059	5.00	5.71	
120 n-Butylbenzene	91	13.089	13.090	-0.001	97	20495	5.00	4.54	
121 1,2-Dichlorobenzene	146	13.095	13.102	-0.007	95	13956	5.00	5.55	
122 1,2-Dibromo-3-Chloropropan	75	13.904	13.899	0.005	73	1024	5.00	4.05	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.032	14.033	-0.001	0	23542	15.0	14.5	
125 2,3- & 3,4- Dichlorotoluen	125	14.452	14.452	0.000	0	14548	10.0	9.20	
126 1,2,4-Trichlorobenzene	180	14.713	14.720	-0.007	93	5366	5.00	4.84	
127 Hexachlorobutadiene	225	14.865	14.866	-0.001	88	2527	5.00	4.69	
128 Naphthalene	128	14.981	14.982	-0.001	97	13972	5.00	4.32	
129 1,2,3-Trichlorobenzene	180	15.200	15.207	-0.007	93	4178	5.00	4.20	
131 2,4,5-Trichlorotoluene	159	15.985	15.985	0.000	0	3426	5.00	5.33	
130 2,3,6-Trichlorotoluene	159	16.076	16.083	-0.007	84	3673	5.00	4.60	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		10.0	10.9	
S 134 1,2-Dichloroethene, Total	96				0		10.0	10.2	
S 135 1,3-Dichloropropene, Total	1				0		10.0	9.60	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWAcro1stRe_00008	Amount Added:	4.00	Units: uL	
voaWVA1stRest_00008	Amount Added:	0.20	Units: uL	
voaWKetPriRes_00002	Amount Added:	0.80	Units: uL	
voaWEEmixRest_00001	Amount Added:	0.20	Units: uL	
VOA8260SURR_00059	Amount Added:	0.20	Units: uL	
VOA8260VOAPRI_00213	Amount Added:	0.20	Units: uL	
voaW2CLEReste_00001	Amount Added:	0.20	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent

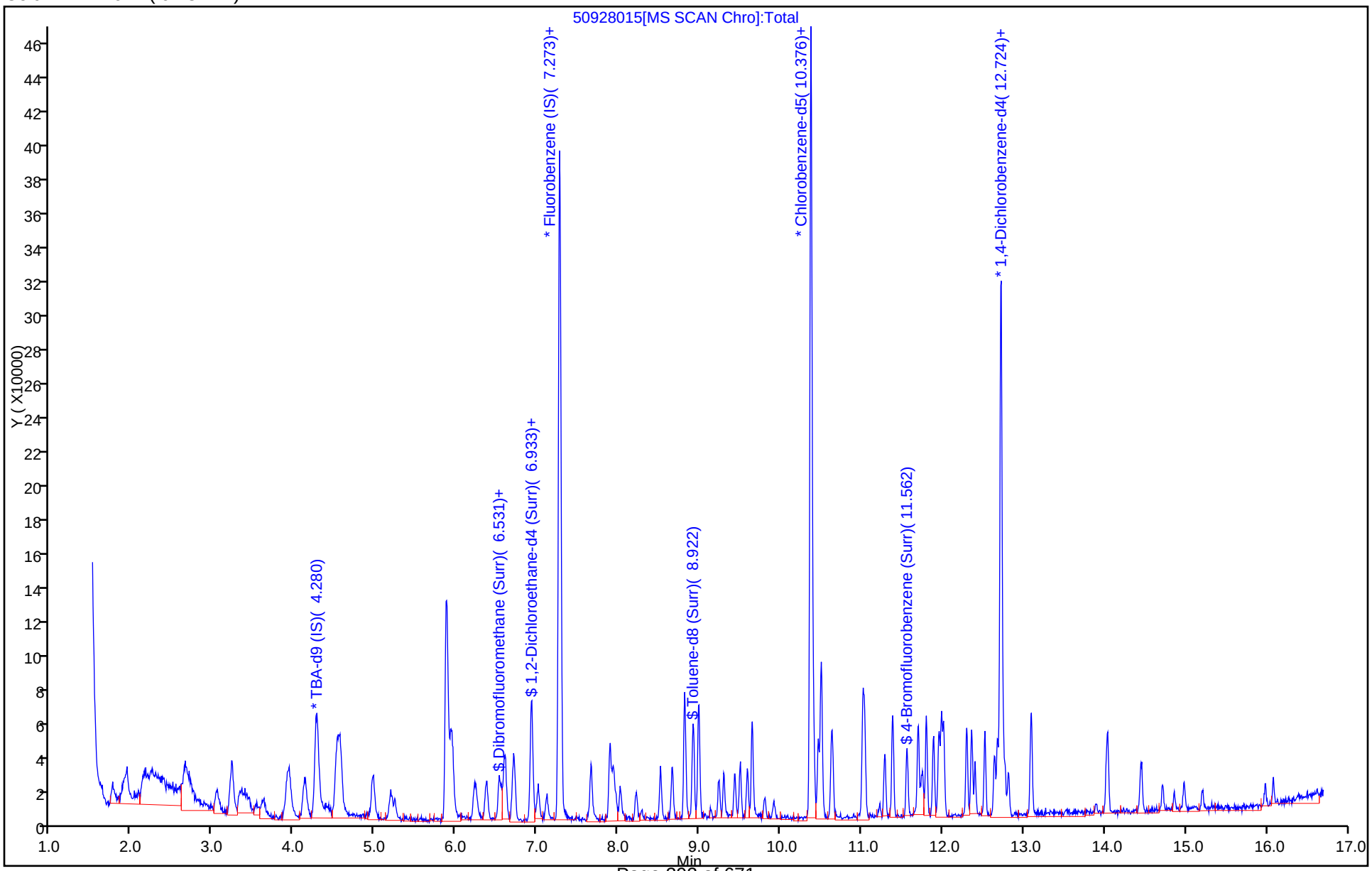
Report Date: 29-Sep-2016 11:03:21 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D

Injection Date:	28-Sep-2016 18:27:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	IC VSTD1			Worklist Smp#:	15
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	15
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

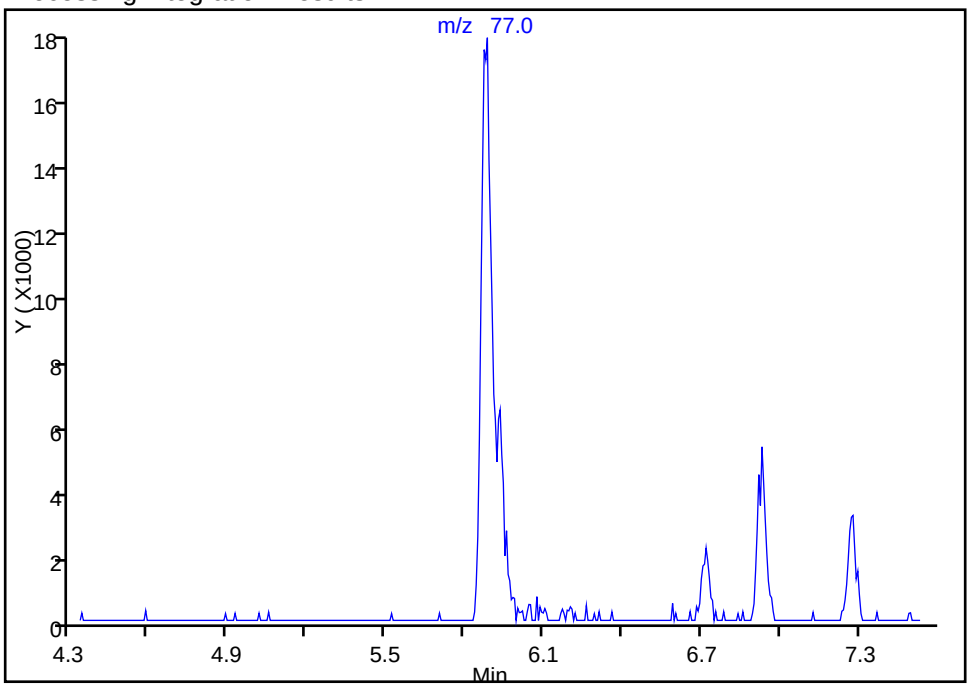
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D				
Injection Date:	28-Sep-2016 18:27:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD1				
Client ID:					
Operator ID:	001562	ALS Bottle#:	15	Worklist Smp#:	15
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

44 2,2-Dichloropropane, CAS: 594-20-7

Signal: 1

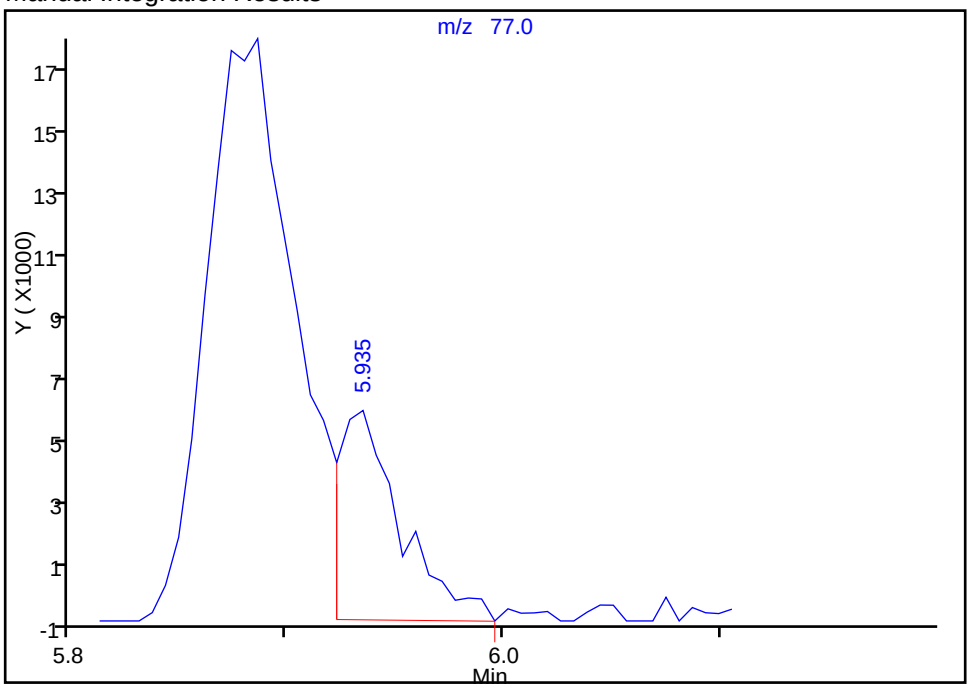
Not Detected
Expected RT: 5.94

Processing Integration Results



Manual Integration Results

RT: 5.93
Area: 12860
Amount: 5.021986
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 11:02:40
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

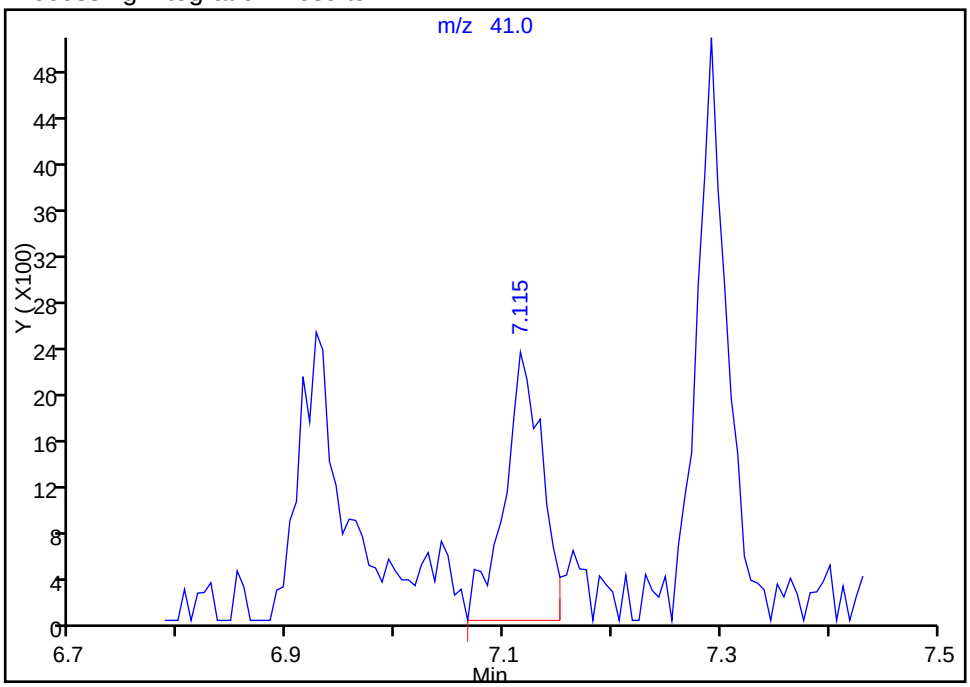
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D				
Injection Date:	28-Sep-2016 18:27:30	Instrument ID:	CHHP5		
Lims ID:	IC VSTD1				
Client ID:					
Operator ID:	001562	ALS Bottle#:	15	Worklist Smp#:	15
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

57 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

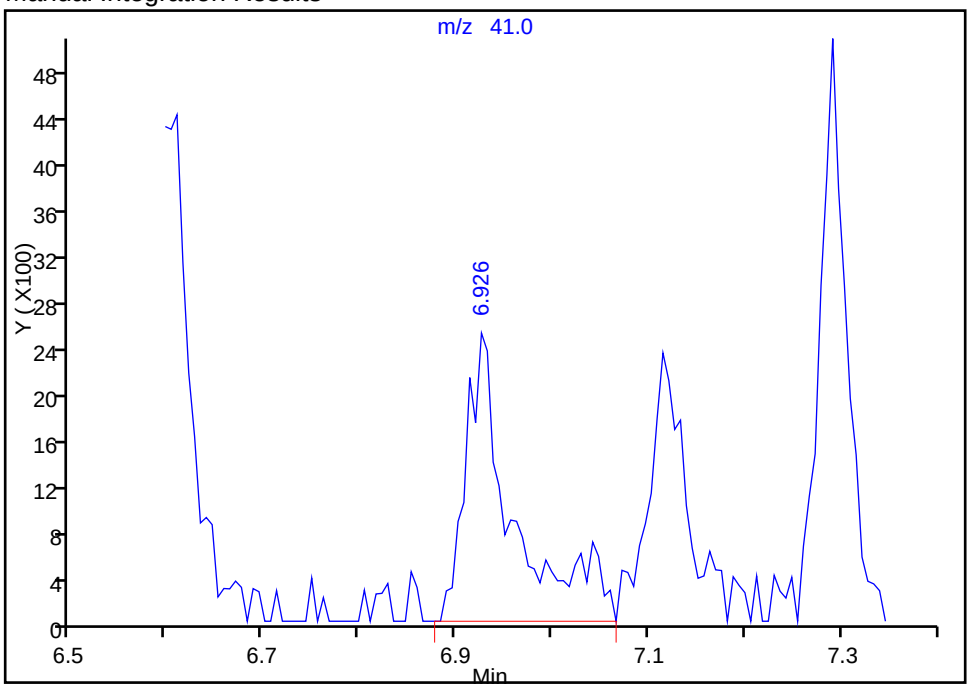
Processing Integration Results

RT: 7.12
Area: 5610
Amount: 108.9273
Amount Units: ng



Manual Integration Results

RT: 6.93
Area: 8501
Amount: 156.2878
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 11:02:40
Audit Action: Assigned Compound ID Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

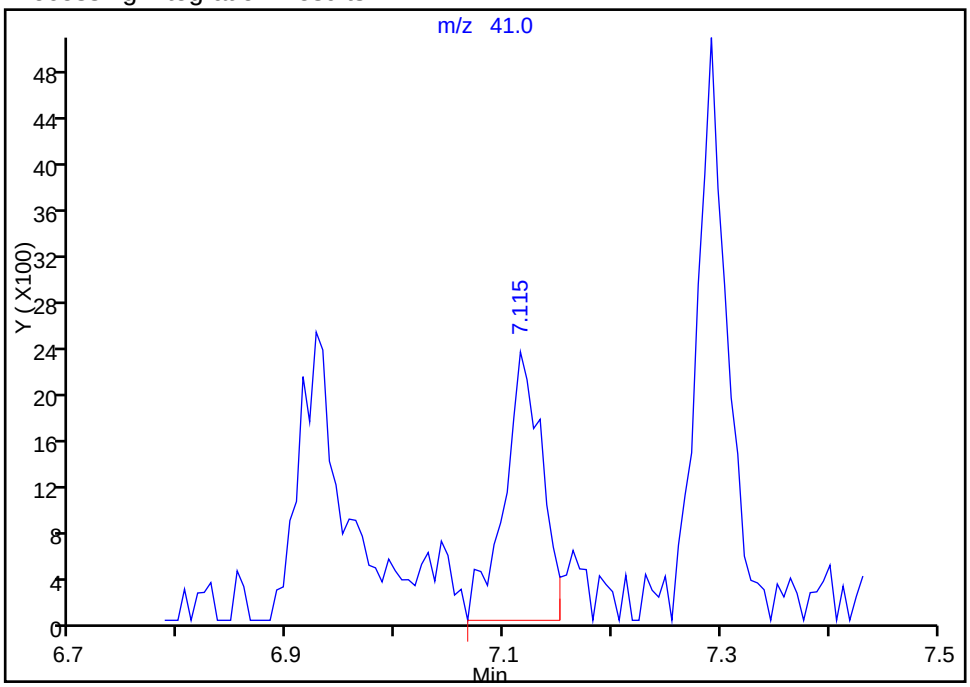
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D
Injection Date: 28-Sep-2016 18:27:30 Instrument ID: CHHP5
Lims ID: IC VSTD1
Client ID:
Operator ID: 001562 ALS Bottle#: 15 Worklist Smp#: 15
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

57 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

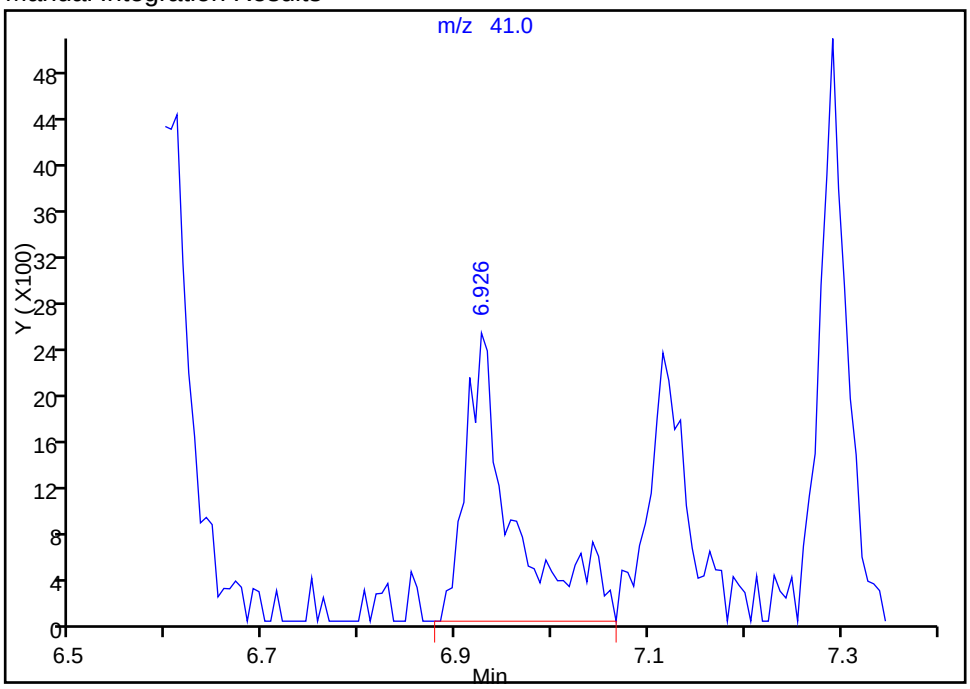
Processing Integration Results

RT: 7.12
Area: 5610
Amount: 108.9273
Amount Units: ng



Manual Integration Results

RT: 6.93
Area: 8501
Amount: 156.2878
Amount Units: ng



Reviewer: fergusond, 29-Sep-2016 11:02:40
Audit Action: Manually Integrated Audit Reason: Poor chromatography

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-191498/6	61017006.D
Level 2	IC 180-191498/7	61017007.D
Level 3	ICIS 180-191498/8	61017008.D
Level 4	IC 180-191498/9	61017009.D
Level 5	IC 180-191498/10	61017010.D
Level 6	IC 180-191498/12	61017012.D
Level 7	IC 180-191498/13	61017013.D

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5		B	M1	M2								
Dichlorodifluoromethane	0.2681 0.2202	0.2286 0.1980	0.2287	0.2284	0.2209	Ave		0.2275			0.1000	9.2		20.0			
Chloromethane	0.3335 0.2861	0.2996 0.2658	0.2921	0.2838	0.2815	Ave		0.2918			0.1000	7.2		20.0			
Vinyl chloride	0.3246 0.2481	0.2559 0.2341	0.2751	0.2678	0.2597	Ave		0.2665			0.1000	10.8		20.0			
1,3-Butadiene	0.3415 0.2583	0.2804 0.2426	0.2763	0.2772	0.2758	Ave		0.2789			0.0100	11.0		20.0			
Bromomethane	0.1771 0.1061	0.1259 0.0956	0.1277	0.1225	0.1151	Lin2	0.3447	0.1099			0.0500				0.9920		0.9900
Chloroethane	0.2042 0.1647	0.1652 0.1507	0.1724	0.1649	0.1594	Ave		0.1688			0.0500	10.1		20.0			
Dichlorofluoromethane	0.4257 0.3763	0.3997 0.3580	0.3905	0.3812	0.3714	Ave		0.3861			0.0100	5.7		20.0			
Trichlorofluoromethane	0.3699 0.2945	0.3255 0.2693	0.3323	0.3277	0.3174	Ave		0.3195			0.1000	9.9		20.0			
Ethyl ether	0.3358 0.2471	0.2692 0.2249	0.2592	0.2367	0.2514	Ave		0.2606			0.0100	13.9		20.0			
Acrolein	0.0563 0.0582	0.0528 0.0593	0.0548	0.0533	0.0551	Ave		0.0557			0.0100	4.4		20.0			
1,1-Dichloroethene	0.2620 0.2469	0.2471 0.2385	0.2423	0.2443	0.2390	Ave		0.2457			0.1000	3.2		20.0			
1,1,2-Trichloro-1,2,2-trifluoroethane	0.2798 0.2387	0.2484 0.2317	0.2493	0.2479	0.2461	Ave		0.2488			0.1000	6.1		20.0			
Acetone	0.0736 0.0621	0.0541 0.0638	0.0562	0.0528	0.0551	Ave		0.0597			0.0500	12.4		20.0			
Iodomethane	0.3999 0.3713	0.3583 0.3745	0.3614	0.3557	0.3586	Ave		0.3685			0.0100	4.2		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5		B	M1	M2								
Carbon disulfide	0.5066 0.6216	0.4418 0.6202	0.5076	0.5513	0.5815	Ave		0.5472			0.1000	12.1		20.0			
Allyl chloride	0.1369 0.1524	0.1088 0.1583	0.1244	0.1347	0.1396	Ave		0.1364			0.0100	12.2		20.0			
Methyl acetate	0.2442 0.2130	0.1975 0.2090	0.2018	0.1928	0.1986	Ave		0.2081			0.1000	8.3		20.0			
Methylene Chloride	0.5207 0.3122	0.3346 0.3084	0.3001	0.2928	0.3005	Lin2	1.1385	0.2909			0.1000				0.9980		0.9900
tert-Butyl alcohol	1.1241 1.0355	0.8468 1.0052	0.9798	1.1145	1.0055	Ave		1.0159			0.0100	9.2		20.0			
Acrylonitrile	0.1189 0.1136	0.1067 0.1098	0.1107	0.1057	0.1076	Ave		0.1104			0.0100	4.2		20.0			
trans-1,2-Dichloroethene	0.3071 0.2781	0.2595 0.2668	0.2766	0.2726	0.2722	Ave		0.2761			0.1000	5.4		20.0			
Methyl tert-butyl ether	0.5683 0.6103	0.4810 0.5967	0.5390	0.5640	0.5604	Ave		0.5600			0.1000	7.5		20.0			
Hexane	0.4445 0.3967	0.3878 0.3817	0.4039	0.4022	0.3930	Ave		0.4014			0.0100	5.1		20.0			
1,1-Dichloroethane	0.4889 0.4748	0.4306 0.4683	0.4554	0.4583	0.4504	Ave		0.4610			0.2000	4.1		20.0			
Vinyl acetate	0.3613 0.4941	0.3549 0.5076	0.3865	0.4029	0.4401	Ave		0.4211			0.0100	14.6		20.0			
2,2-Dichloropropane	0.0441 0.0510	0.0439 0.0532	0.0458	0.0503	0.0477	Ave		0.0480			0.0100	7.5		20.0			
cis-1,2-Dichloroethene	0.3233 0.3146	0.3023 0.3118	0.3058	0.3012	0.3040	Ave		0.3090			0.1000	2.6		20.0			
2-Butanone (MEK)	0.1226 0.1162	0.1185 0.1150	0.1126	0.1021	0.1065	Ave		0.1134			0.0500	6.2		20.0			
Bromochloromethane	0.1451 0.1458	0.1324 0.1460	0.1336	0.1302	0.1384	Ave		0.1388			0.0100	4.9		20.0			
Tetrahydrofuran	0.1095 0.0939	0.0804 0.0890	0.0839	0.0780	0.0815	Ave		0.0880			0.0100	12.4		20.0			
Chloroform	0.4595 0.4312	0.4224 0.4247	0.4217	0.4168	0.4188	Ave		0.4279			0.2000	3.4		20.0			
1,1,1-Trichloroethane	0.2478 0.2737	0.2385 0.2759	0.2420	0.2688	0.2598	Ave		0.2581			0.1000	6.0		20.0			
Cyclohexane	0.4818 0.4786	0.4604 0.4478	0.4762	0.4796	0.4731	Ave		0.4711			0.1000	2.6		20.0			
Carbon tetrachloride	0.1579 0.1960	0.1428 0.1982	0.1589	0.1755	0.1775	Ave		0.1724			0.1000	11.9		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5		B	M1	M2								
1,1-Dichloropropene	0.3527 0.3480	0.3391 0.3413	0.3463	0.3500	0.3472	Ave		0.3464			0.0100	1.4		20.0			
Isobutyl alcohol	0.0057 0.0072	0.0048 0.0074	0.0052	0.0051	0.0058	Ave		0.0059		*	0.0100	17.3		20.0			
Benzene	1.2471 1.0724	1.1399 1.0104	1.1407	1.0936	1.0802	Ave		1.1120			0.5000	6.7		20.0			
1,2-Dichloroethane	0.3902 0.3621	0.3505 0.3626	0.3368	0.3359	0.3409	Ave		0.3541			0.1000	5.5		20.0			
n-Heptane	0.3504 0.3342	0.3271 0.3097	0.3378	0.3210	0.3223	Ave		0.3289			0.0100	4.0		20.0			
Trichloroethene	0.2924 0.2753	0.2671 0.2661	0.2678	0.2631	0.2671	Ave		0.2713			0.2000	3.7		20.0			
Methylcyclohexane	0.4614 0.4576	0.4445 0.4287	0.4596	0.4607	0.4537	Ave		0.4523			0.1000	2.6		20.0			
1,2-Dichloropropane	0.3326 0.3085	0.2853 0.2977	0.2798	0.2803	0.2802	Ave		0.2949			0.1000	6.7		20.0			
Dibromomethane	0.1454 0.1678	0.1522 0.1705	0.1562	0.1537	0.1532	Ave		0.1570			0.0100	5.7		20.0			
1,4-Dioxane	0.0031 0.0032	0.0028 0.0032	0.0028	0.0026	0.0028	Ave		0.0029		*	0.0100	8.9		20.0			
Bromodichloromethane	0.2208 0.2761	0.2017 0.2823	0.2104	0.2239	0.2407	Ave		0.2366			0.2000	13.3		20.0			
2-Chloroethyl vinyl ether	0.1583 0.2016	0.1617 0.1965	0.1751	0.1696	0.1750	Ave		0.1768			0.0100	9.3		20.0			
cis-1,3-Dichloropropene	0.2455 0.4014	0.2645 0.4020	0.3133	0.3145	0.3522	Ave		0.3276			0.2000	18.8		20.0			
4-Methyl-2-pentanone (MIBK)	0.8392 0.9788	0.9022 0.9621	0.9163	0.9349	0.9577	Ave		0.9273			0.1000	5.1		20.0			
Toluene	5.1370 4.0927	4.7300 3.7373	4.6378	4.6342	4.4520	Ave		4.4887			0.4000	10.1		20.0			
trans-1,3-Dichloropropene	0.8011 1.2632	0.7860 1.2770	0.9261	1.0392	1.0947	Ave		1.0268			0.1000	19.6		20.0			
Ethyl methacrylate	0.9136 1.4494	1.0256 1.4190	1.1656	1.2514	1.3478	Ave		1.2246			0.0100	16.5		20.0			
1,1,2-Trichloroethane	0.9877 0.9617	0.9736 0.9269	0.9510	0.9513	0.9633	Ave		0.9594			0.1000	2.0		20.0			
Tetrachloroethene	1.0486 0.7960	0.8803 0.7482	0.8553	0.8728	0.8422	Ave		0.8633			0.2000	10.9		20.0			
1,3-Dichloropropane	1.9771 1.7485	1.8144 1.6832	1.7611	1.7518	1.7553	Ave		1.7845			0.0100	5.2		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5		B	M1	M2								
2-Hexanone	0.5145 0.6138	0.5237 0.5893	0.5321	0.5625	0.5518	Ave		0.5554			0.1000	6.5		20.0			
Dibromochloromethane	0.5176 0.7080	0.5017 0.7375	0.5379	0.5915	0.6414	Ave		0.6051			0.1000	15.5		20.0			
1,2-Dibromoethane (EDB)	0.7699 0.9218	0.7847 0.9108	0.8740	0.8816	0.8989	Ave		0.8631			0.1000	7.1		20.0			
3-Chlorobenzotrifluoride	1.7650 1.4116	1.4848 1.2370	1.5102	1.5098	1.4973	Ave		1.4879			0.0100	10.5		20.0			
Chlorobenzene	3.4285 2.8316	3.1420 2.6302	3.1660	3.1199	3.0008	Ave		3.0456			0.5000	8.4		20.0			
4-Chlorobenzotrifluoride	1.5797 1.3438	1.3528 1.1996	1.4114	1.4297	1.4049	Ave		1.3888			0.0100	8.2		20.0			
1,1,1,2-Tetrachloroethane	0.5329 0.7899	0.5610 0.7876	0.6216	0.7219	0.7301	Ave		0.6779			0.0100	15.6		20.0			
Ethylbenzene	1.7419 1.5742	1.6499 1.4801	1.6743	1.7079	1.6529	Ave		1.6402			0.1000	5.4		20.0			
m-Xylene & p-Xylene	1.9335 1.9470	2.0492 1.8233	2.0184	2.1172	2.0570	Ave		1.9922			0.1000	4.9		20.0			
o-Xylene	1.7869 1.9142	1.9990 1.7680	1.9410	2.0583	2.0066	Ave		1.9249			0.3000	5.8		20.0			
Styrene	2.8763 3.1787	3.2121 2.9476	3.3478	3.4002	3.3884	Ave		3.1930			0.3000	6.6		20.0			
Bromoform	0.2242 0.3991	0.2635 0.4177	0.2793	0.3169	0.3415	Qua	-1.185	0.3002	0.0004992		0.1000				1.0000		0.9900
2-Chlorobenzotrifluoride	1.5167 1.4249	1.4211 1.2603	1.4515	1.5239	1.4516	Ave		1.4357			0.0100	6.1		20.0			
Isopropylbenzene	4.8945 4.2499	4.7219 3.8043	4.8433	4.9164	4.7024	Ave		4.5904			0.1000	9.0		20.0			
Bromobenzene	0.8180 0.8523	0.8070 0.8119	0.7686	0.7952	0.8121	Ave		0.8093			0.0100	3.1		20.0			
1,1,2,2-Tetrachloroethane	1.2378 1.2310	1.2021 1.1841	1.1773	1.2357	1.2149	Ave		1.2118			0.3000	2.0		20.0			
trans-1,4-Dichloro-2-butene	0.1861 0.2439	0.1822 0.2480	0.2022	0.1970	0.2089	Ave		0.2098			0.0100	12.6		20.0			
1,2,3-Trichloropropane	0.2640 0.2975	0.2569 0.2837	0.2702	0.2605	0.2707	Ave		0.2719			0.0100	5.2		20.0			
N-Propylbenzene	0.9079 0.9802	0.9053 0.9190	0.9322	0.9729	0.9564	Ave		0.9391			0.0100	3.3		20.0			
2-Chlorotoluene	0.7984 0.8682	0.7791 0.8063	0.8309	0.8171	0.8430	Ave		0.8204			0.0100	3.6		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5		B	M1	M2								
3-Chlorotoluene	0.8966 0.9518	0.8273 0.8461	0.9140	0.8899	0.8978	Ave		0.8891			0.0100	4.7		20.0			
1,3,5-Trimethylbenzene	2.5598 2.5745	2.6068 2.3608	2.6685	2.6867	2.6433	Ave		2.5858			0.0100	4.2		20.0			
4-Chlorotoluene	0.9068 0.9238	0.9075 0.8739	0.8667	0.8806	0.9074	Ave		0.8952			0.0100	2.4		20.0			
tert-Butylbenzene	2.1581 2.1848	2.1711 2.0435	2.2512	2.2750	2.2546	Ave		2.1912			0.0100	3.6		20.0			
1,2,4-Trimethylbenzene	2.6136 2.6966	2.6989 2.4952	2.8071	2.7564	2.7309	Ave		2.6855			0.0100	3.8		20.0			
3,4-Dichlorobenzotrifluoride	0.8111 0.7770	0.7496 0.6990	0.7584	0.7580	0.7561	Ave		0.7585			0.0100	4.4		20.0			
sec-Butylbenzene	3.2584 3.0576	3.2718 2.8097	3.3325	3.3528	3.2515	Ave		3.1906			0.0100	6.1		20.0			
1,3-Dichlorobenzene	1.7325 1.5798	1.5216 1.4914	1.5651	1.5476	1.5633	Ave		1.5716			0.6000	4.9		20.0			
4-Isopropyltoluene	2.6824 2.6796	2.7056 2.4747	2.8379	2.8387	2.7436	Ave		2.7089			0.0100	4.5		20.0			
1,4-Dichlorobenzene	1.8655 1.6428	1.6142 1.5429	1.6293	1.6221	1.6048	Ave		1.6460			0.5000	6.2		20.0			
2,4-Dichlorobenzotrifluoride	0.8404 0.7630	0.7257 0.6770	0.7288	0.7078	0.7430	Ave		0.7408			0.0100	7.0		20.0			
2,5-Dichlorobenzotrifluoride	1.0089 0.8499	0.8213 0.7769	0.8092	0.8558	0.8237	Ave		0.8494			0.0100	8.8		20.0			
n-Butylbenzene	2.5358 2.4272	2.3921 2.2289	2.5000	2.5613	2.5069	Ave		2.4503			0.0100	4.7		20.0			
1,2-Dichlorobenzene	1.6872 1.5457	1.5663 1.4359	1.5338	1.5208	1.5299	Ave		1.5457			0.4000	4.8		20.0			
1,2-Dibromo-3-Chloropropane	0.0793 +++++	0.0694 +++++	0.0648	0.0768	0.0849	Ave		0.0751			0.0500	10.6		20.0			
2,4- & 2,5- & 2,6- Dichlorotoluene	1.2262 1.2297	1.2264 1.1097	1.2587	1.2514	1.2460	Ave		1.2212			0.0100	4.2		20.0			
2,3- & 3,4- Dichlorotoluene	1.3155 1.3877	1.3023 1.2848	1.3855	1.3675	1.3765	Ave		1.3457			0.0100	3.2		20.0			
1,2,4-Trichlorobenzene	1.0513 1.1139	0.9769 1.0574	1.0267	1.0400	1.0503	Ave		1.0452			0.2000	3.9		20.0			
Hexachlorobutadiene	0.3954 0.3662	0.3309 0.3567	0.3472	0.3554	0.3418	Ave		0.3562			0.0100	5.8		20.0			
Naphthalene	2.2156 2.6832	2.3053 2.5324	2.5274	2.5620	2.6081	Ave		2.4906			0.0100	6.7		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5		B	M1	M2								
1,2,3-Trichlorobenzene	0.8808 0.9752	0.8736 0.9587	0.8985	0.9172	0.9287	Ave		0.9190			0.0100	4.2		20.0			
2,4,5-Trichlorotoluene	0.3495 0.4988	0.3459 0.4824	0.4355	0.4287	0.4833	Ave		0.4320			0.0100	14.6		20.0			
2,3,6-Trichlorotoluene	0.3628 0.4532	0.3385 0.4374	0.3877	0.4077	0.4310	Ave		0.4026			0.0100	10.4		20.0			
Dibromofluoromethane (Surr)	0.2325 0.2182	0.2142 0.2070	0.2196	0.1974	0.2056	Ave		0.2135				5.4		20.0			
1,2-Dichloroethane-d4 (Surr)	0.3297 0.2837	0.3003 0.2788	0.2953	0.2634	0.2711	Ave		0.2889				7.6		20.0			
Toluene-d8 (Surr)	4.3877 3.3068	3.9706 2.8945	3.9346	3.4918	3.6155	Ave		3.6573				13.4		20.0			
4-Bromofluorobenzene (Surr)	1.4457 1.3680	1.3543 1.2495	1.4506	1.3490	1.4201	Ave		1.3767				5.1		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-191498/6	61017006.D
Level 2	IC 180-191498/7	61017007.D
Level 3	ICIS 180-191498/8	61017008.D
Level 4	IC 180-191498/9	61017009.D
Level 5	IC 180-191498/10	61017010.D
Level 6	IC 180-191498/12	61017012.D
Level 7	IC 180-191498/13	61017013.D

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5
Dichlorodifluoromethane	FB	Ave	10818 378244	48460 437808	100117	155219	199392	5.00 200	25.0 250	50.0	75.0	100
Chloromethane	FB	Ave	13459 491486	63508 587869	127917	192863	254110	5.00 200	25.0 250	50.0	75.0	100
Vinyl chloride	FB	Ave	13101 426204	54262 517628	120442	182050	234479	5.00 200	25.0 250	50.0	75.0	100
1,3-Butadiene	FB	Ave	13781 443777	59455 536408	120959	188411	249033	5.00 200	25.0 250	50.0	75.0	100
Bromomethane	FB	Lin2	7149 182317	26701 211399	55898	83276	103957	5.00 200	25.0 250	50.0	75.0	100
Chloroethane	FB	Ave	8242 282905	35030 333168	75481	112107	143903	5.00 200	25.0 250	50.0	75.0	100
Dichlorofluoromethane	FB	Ave	17179 646552	84730 791623	170966	259098	335318	5.00 200	25.0 250	50.0	75.0	100
Trichlorofluoromethane	FB	Ave	14928 505956	69000 595629	145521	222716	286516	5.00 200	25.0 250	50.0	75.0	100
Ethyl ether	FB	Ave	13550 424510	57079 497445	113477	160856	226945	5.00 200	25.0 250	50.0	75.0	100
Acrolein	FB	Ave	45478 124997	55967 144221	71951	84463	99424	100 250	125 275	150	175	200
1,1-Dichloroethene	FB	Ave	10573 424212	52383 527379	106083	166080	215759	5.00 200	25.0 250	50.0	75.0	100
1,1,2-Trichloro-1,2,2-trifluoroetha ne	FB	Ave	11291 410013	52668 512442	109175	168464	222211	5.00 200	25.0 250	50.0	75.0	100
Acetone	FB	Ave	14853 213338	22945 282151	49176	71745	99571	25.0 400	50.0 500	100	150	200
Iodomethane	FB	Ave	16137 637925	75958 828161	158249	241740	323779	5.00 200	25.0 250	50.0	75.0	100
Carbon disulfide	FB	Ave	20445 1067872	93668 1371596	222248	374705	525000	5.00 200	25.0 250	50.0	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5
Allyl chloride	FB	Ave	5524 261792	23057 350147	54473	91556	126033	5.00 200	25.0 250	50.0	75.0	100
Methyl acetate	FB	Ave	49270 1829691	209350 2310919	441720	655356	896631	25.0 1000	125 1250	250	375	500
Methylene Chloride	FB	Lin2	21013 536396	70928 682055	131380	199037	271253	5.00 200	25.0 250	50.0	75.0	100
tert-Butyl alcohol	TBAd9	Ave	5964 301487	26121 393228	59253	100509	139826	50.0 2000	250 2500	500	750	1000
Acrylonitrile	FB	Ave	47987 1951122	226233 2428773	484811	718162	971547	50.0 2000	250 2500	500	750	1000
trans-1,2-Dichloroethene	FB	Ave	12392 477780	55007 590066	121103	185288	245768	5.00 200	25.0 250	50.0	75.0	100
Methyl tert-butyl ether	FB	Ave	22934 1048549	101976 1319612	235982	383369	505912	5.00 200	25.0 250	50.0	75.0	100
Hexane	FB	Ave	17937 681626	82220 844165	176837	273365	354786	5.00 200	25.0 250	50.0	75.0	100
1,1-Dichloroethane	FB	Ave	19730 815765	91288 1035587	199401	311510	406664	5.00 200	25.0 250	50.0	75.0	100
Vinyl acetate	FB	Ave	14579 848933	75241 1122396	169247	273838	397309	5.00 200	25.0 250	50.0	75.0	100
2,2-Dichloropropane	FB	Ave	1778 87561	9317 117742	20074	34180	43091	5.00 200	25.0 250	50.0	75.0	100
cis-1,2-Dichloroethene	FB	Ave	13048 540467	64079 689543	133878	204711	274481	5.00 200	25.0 250	50.0	75.0	100
2-Butanone (MEK)	FB	Ave	24730 399161	50228 508836	98637	138742	192377	25.0 400	50.0 500	100	150	200
Bromochloromethane	FB	Ave	5856 250455	28077 322793	58511	88514	124956	5.00 200	25.0 250	50.0	75.0	100
Tetrahydrofuran	FB	Ave	8841 322508	34090 393583	73436	106077	147123	10.0 400	50.0 500	100	150	200
Chloroform	FB	Ave	18543 740796	89560 939276	184655	283319	378117	5.00 200	25.0 250	50.0	75.0	100
1,1,1-Trichloroethane	FB	Ave	10002 470282	50565 610188	105969	182669	234557	5.00 200	25.0 250	50.0	75.0	100
Cyclohexane	FB	Ave	19444 822246	97597 990348	208511	325971	427162	5.00 200	25.0 250	50.0	75.0	100
Carbon tetrachloride	FB	Ave	6374 336776	30269 438205	69572	119292	160232	5.00 200	25.0 250	50.0	75.0	100
1,1-Dichloropropene	FB	Ave	14232 597892	71901 754822	151638	237861	313440	5.00 200	25.0 250	50.0	75.0	100
Isobutyl alcohol	FB	Ave	5799 307377	25495 410540	56651	87228	130717	125 5000	625 6250	1250	1875	2500

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5
Benzene	FB	Ave	50329 1842451	241667 2234343	499441	743305	975189	5.00 200	25.0 250	50.0	75.0	100
1,2-Dichloroethane	FB	Ave	15748 622020	74303 801768	147481	228341	307797	5.00 200	25.0 250	50.0	75.0	100
n-Heptane	FB	Ave	14142 574146	69355 684814	147894	218210	290989	5.00 200	25.0 250	50.0	75.0	100
Trichloroethene	FB	Ave	11801 472890	56636 588427	117267	178793	241168	5.00 200	25.0 250	50.0	75.0	100
Methylcyclohexane	FB	Ave	18620 786142	94227 947928	201240	313111	409562	5.00 200	25.0 250	50.0	75.0	100
1,2-Dichloropropane	FB	Ave	13422 530080	60485 658421	122498	190484	253000	5.00 200	25.0 250	50.0	75.0	100
Dibromomethane	FB	Ave	5867 288225	32261 377143	68394	104463	138282	5.00 200	25.0 250	50.0	75.0	100
1,4-Dioxane	FB	Ave	2539 110995	11953 143535	24213	35340	49945	100 4000	500 5000	1000	1500	2000
Bromodichloromethane	FB	Ave	8911 474319	42759 624230	92125	152191	217329	5.00 200	25.0 250	50.0	75.0	100
2-Chloroethyl vinyl ether	FB	Ave	12773 692602	68565 868925	153301	230498	316024	10.0 400	50.0 500	100	150	200
cis-1,3-Dichloropropene	FB	Ave	9906 689681	56067 888989	137183	213785	317933	5.00 200	25.0 250	50.0	75.0	100
4-Methyl-2-pentanone (MIBK)	CBNZ d5	Ave	40945 917167	93433 1182012	203212	312902	437594	25.0 400	50.0 500	100	150	200
Toluene	CBNZ d5	Ave	50125 1917420	244909 2295736	514268	775485	1017095	5.00 200	25.0 250	50.0	75.0	100
trans-1,3-Dichloropropene	CBNZ d5	Ave	7817 591828	40698 784438	102686	173904	250101	5.00 200	25.0 250	50.0	75.0	100
Ethyl methacrylate	CBNZ d5	Ave	8915 679063	53103 871674	129247	209411	307910	5.00 200	25.0 250	50.0	75.0	100
1,1,2-Trichloroethane	CBNZ d5	Ave	9638 450576	50412 569382	105449	159194	220068	5.00 200	25.0 250	50.0	75.0	100
Tetrachloroethene	CBNZ d5	Ave	10232 372914	45578 459589	94839	146050	192418	5.00 200	25.0 250	50.0	75.0	100
1,3-Dichloropropane	CBNZ d5	Ave	19292 819178	93947 1033930	195279	293152	401017	5.00 200	25.0 250	50.0	75.0	100
2-Hexanone	CBNZ d5	Ave	25103 575173	54228 723957	118005	188267	252132	25.0 400	50.0 500	100	150	200
Dibromochloromethane	CBNZ d5	Ave	5051 331692	25976 453002	59642	98975	146523	5.00 200	25.0 250	50.0	75.0	100
1,2-Dibromoethane (EDB)	CBNZ d5	Ave	7512 431843	40628 559480	96912	147522	205355	5.00 200	25.0 250	50.0	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5
3-Chlorobenzotrifluoride	CBNZ d5	Ave	17222 661345	76878 759861	167458	252642	342084	5.00 200	25.0 250	50.0	75.0	100
Chlorobenzene	CBNZ d5	Ave	33454 1326603	162687 1615675	351065	522084	685552	5.00 200	25.0 250	50.0	75.0	100
4-Chlorobenzotrifluoride	CBNZ d5	Ave	15414 629550	70044 736864	156509	239254	320957	5.00 200	25.0 250	50.0	75.0	100
1,1,1,2-Tetrachloroethane	CBNZ d5	Ave	5200 370091	29046 483803	68924	120798	166796	5.00 200	25.0 250	50.0	75.0	100
Ethylbenzene	CBNZ d5	Ave	16997 737491	85428 909219	185657	285802	377626	5.00 200	25.0 250	50.0	75.0	100
m-Xylene & p-Xylene	CBNZ d5	Ave	18866 912180	106102 1120035	223813	354287	469943	5.00 200	25.0 250	50.0	75.0	100
o-Xylene	CBNZ d5	Ave	17436 896798	103504 1086046	215235	344432	458418	5.00 200	25.0 250	50.0	75.0	100
Styrene	CBNZ d5	Ave	28066 1489206	166314 1810645	371224	568991	774114	5.00 200	25.0 250	50.0	75.0	100
Bromoform	CBNZ d5	Qua	2188 186999	13641 256599	30972	53037	78027	5.00 200	25.0 250	50.0	75.0	100
2-Chlorobenzotrifluoride	CBNZ d5	Ave	14799 667562	73584 774175	160946	255008	331627	5.00 200	25.0 250	50.0	75.0	100
Isopropylbenzene	CBNZ d5	Ave	47759 1991060	244492 2336935	537055	822705	1074317	5.00 200	25.0 250	50.0	75.0	100
Bromobenzene	DCBd 4	Ave	11826 557168	64111 687578	129517	203563	278887	5.00 200	25.0 250	50.0	75.0	100
1,1,2,2-Tetrachloroethane	CBNZ d5	Ave	12078 576728	62244 727352	130544	206777	277556	5.00 200	25.0 250	50.0	75.0	100
trans-1,4-Dichloro-2-butene	DCBd 4	Ave	2690 159455	14475 210068	34064	50425	71740	5.00 200	25.0 250	50.0	75.0	100
1,2,3-Trichloropropane	DCBd 4	Ave	3816 194495	20409 240309	45534	66695	92976	5.00 200	25.0 250	50.0	75.0	100
N-Propylbenzene	DCBd 4	Ave	13125 640794	71921 778345	157081	249041	328458	5.00 200	25.0 250	50.0	75.0	100
2-Chlorotoluene	DCBd 4	Ave	11542 567599	61895 682833	140007	209155	289491	5.00 200	25.0 250	50.0	75.0	100
3-Chlorotoluene	DCBd 4	Ave	12962 622267	65719 716597	154015	227793	308307	5.00 200	25.0 250	50.0	75.0	100
1,3,5-Trimethylbenzene	DCBd 4	Ave	37007 1683074	207086 1999367	449655	687756	907748	5.00 200	25.0 250	50.0	75.0	100
4-Chlorotoluene	DCBd 4	Ave	13109 603912	72096 740089	146040	225430	311605	5.00 200	25.0 250	50.0	75.0	100
tert-Butylbenzene	DCBd 4	Ave	31200 1428342	172473 1730663	379337	582378	774274	5.00 200	25.0 250	50.0	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5
1,2,4-Trimethylbenzene	DCBd 4	Ave	37784 1762909	214402 2113255	473012	705609	937826	5.00 200	25.0 250	50.0	75.0	100
3,4-Dichlorobenzotrifluoride	DCBd 4	Ave	11726 507998	59549 592020	127792	194039	259663	5.00 200	25.0 250	50.0	75.0	100
sec-Butylbenzene	DCBd 4	Ave	47106 1998910	259914 2379583	561548	858280	1116611	5.00 200	25.0 250	50.0	75.0	100
1,3-Dichlorobenzene	DCBd 4	Ave	25047 1032823	120874 1263061	263725	396160	536874	5.00 200	25.0 250	50.0	75.0	100
4-Isopropyltoluene	DCBd 4	Ave	38779 1751779	214936 2095851	478196	726665	942198	5.00 200	25.0 250	50.0	75.0	100
1,4-Dichlorobenzene	DCBd 4	Ave	26969 1074021	128236 1306720	274551	415232	551119	5.00 200	25.0 250	50.0	75.0	100
2,4-Dichlorobenzotrifluoride	DCBd 4	Ave	12149 498793	57652 573367	122814	181186	255147	5.00 200	25.0 250	50.0	75.0	100
2,5-Dichlorobenzotrifluoride	DCBd 4	Ave	14585 555657	65243 657948	136355	219078	282871	5.00 200	25.0 250	50.0	75.0	100
n-Butylbenzene	DCBd 4	Ave	36660 1586792	190031 1887735	421270	655671	860909	5.00 200	25.0 250	50.0	75.0	100
1,2-Dichlorobenzene	DCBd 4	Ave	24392 1010481	124427 1216119	258446	389316	525389	5.00 200	25.0 250	50.0	75.0	100
1,2-Dibromo-3-Chloropropane	DCBd 4	Ave	1147 +++++	5517 +++++	10924	19664	29140	5.00 +++++	25.0 +++++	50.0	75.0	100
2,4- & 2,5- & 2,6- Dichlorotoluene	DCBd 4	Ave	53182 2411828	292268 2819474	636315	961021	1283654	15.0 600	75.0 750	150	225	300
2,3- & 3,4- Dichlorotoluene	DCBd 4	Ave	38035 1814435	206911 2176172	466935	700132	945407	10.0 400	50.0 500	100	150	200
1,2,4-Trichlorobenzene	DCBd 4	Ave	15198 728230	77607 895565	173002	266234	360686	5.00 200	25.0 250	50.0	75.0	100
Hexachlorobutadiene	DCBd 4	Ave	5716 239421	26287 302126	58500	90990	117388	5.00 200	25.0 250	50.0	75.0	100
Naphthalene	DCBd 4	Ave	32031 1754190	183134 2144730	425875	655837	895652	5.00 200	25.0 250	50.0	75.0	100
1,2,3-Trichlorobenzene	DCBd 4	Ave	12734 637531	69399 811942	151403	234780	318943	5.00 200	25.0 250	50.0	75.0	100
2,4,5-Trichlorotoluene	DCBd 4	Ave	5053 326073	27475 408566	73389	109739	165986	5.00 200	25.0 250	50.0	75.0	100
2,3,6-Trichlorotoluene	DCBd 4	Ave	5245 296296	26892 370449	65323	104364	148017	5.00 200	25.0 250	50.0	75.0	100
Dibromofluoromethane (Surr)	FB	Ave	9384 374833	45418 457863	96169	134162	185587	5.00 200	25.0 250	50.0	75.0	100
1,2-Dichloroethane-d4 (Surr)	FB	Ave	13304 487373	63663 616626	129293	179010	244733	5.00 200	25.0 250	50.0	75.0	100

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3	LVL 4	LVL 5
Toluene-d8 (Surr)	CBNZ d5	Ave	42813 1549248	205588 1778033	436290	584326	825990	5.00 200	25.0 250	50.0	75.0	100
4-Bromofluorobenzene (Surr)	CBNZ d5	Ave	14107 640890	70121 767526	160853	225747	324431	5.00 200	25.0 250	50.0	75.0	100

Curve Type Legend:

Ave = Average ISTD
Lin2 = Linear 1/conc^2 ISTD
Qua = Quadratic ISTD

FORM VI
GC/MS VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
READBACK PERCENT ERROR

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 191498

SDG No.:

Instrument ID: CHHP6 GC Column: DB-624 ID: 0.18(mm) Heated Purge: (Y/N) N

Calibration Start Date: 10/17/2016 14:23 Calibration End Date: 10/17/2016 17:13 Calibration ID: 33286

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-191498/6	61017006.D
Level 2	IC 180-191498/7	61017007.D
Level 3	ICIS 180-191498/8	61017008.D
Level 4	IC 180-191498/9	61017009.D
Level 5	IC 180-191498/10	61017010.D
Level 6	IC 180-191498/12	61017012.D
Level 7	IC 180-191498/13	61017013.D

ANALYTE	PERCENT ERROR						PERCENT ERROR LIMIT					
	LVL 1 # LVL 7 #	LVL 2 #	LVL 3 #	LVL 4 #	LVL 5 #	LVL 6 #	LVL 1 LVL 7	LVL 2	LVL 3	LVL 4	LVL 5	LVL 6
Bromomethane	-1.6 -14.3	2.0	9.9	7.3	1.6	-5.0	40 40	40	40	40	40	40
Methylene Chloride	0.7 4.5	-0.7	-4.7	-4.6	-0.6	5.4	40 40	40	40	40	40	40
Bromoform	51.8 -0.5	-0.5	-6.3	-1.3	0.8	1.0	70 70	70	70	70	70	70

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017006.D
Lims ID: IC VSTD1
Client ID:
Sample Type: IC Calib Level: 1
Inject. Date: 17-Oct-2016 14:23:30 ALS Bottle#: 6 Worklist Smp#: 6
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-006
Misc. Info.: IC VSTD1
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:22:35 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 09:24:01

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.151	4.150	0.001	88	106110	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.180	7.180	0.000	99	403562	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.289	10.294	-0.005	85	97576	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.637	12.630	0.007	96	144569	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.450	6.449	0.001	46	9384	5.00	5.45	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.828	6.821	0.007	53	13304	5.00	5.71	
$ 7 Toluene-d8 (Surr)	98	8.835	8.834	0.001	94	42813	5.00	6.00	
$ 8 4-Bromofluorobenzene (Surr	95	11.475	11.474	0.001	90	14107	5.00	5.25	
11 Dichlorodifluoromethane	85	1.541	1.546	-0.005	86	10818	5.00	5.89	
12 Chloromethane	50	1.705	1.698	0.007	98	13459	5.00	5.72	
13 Vinyl chloride	62	1.839	1.838	0.001	97	13101	5.00	6.09	
14 Butadiene	39	1.870	1.869	0.001	93	13781	5.00	6.12	
15 Bromomethane	94	2.168	2.167	0.001	67	7149	5.00	4.92	
16 Chloroethane	64	2.326	2.301	0.025	67	8242	5.00	6.05	
17 Dichlorofluoromethane	67	2.587	2.568	0.019	88	17179	5.00	5.51	M
18 Trichlorofluoromethane	101	2.594	2.586	0.008	69	14928	5.00	5.79	
20 Ethyl ether	59	2.959	2.945	0.014	94	13550	5.00	6.44	
21 Acrolein	56	3.129	3.122	0.007	98	45478	100.0	101.2	
22 1,1-Dichloroethene	96	3.238	3.231	0.007	94	10573	5.00	5.33	
23 1,1,2-Trichloro-1,2,2-trif	101	3.293	3.298	-0.005	68	11291	5.00	5.62	
24 Acetone	43	3.348	3.335	0.013	99	14853	25.0	30.8	
25 Iodomethane	142	3.421	3.420	0.001	98	16137	5.00	5.43	
26 Carbon disulfide	76	3.500	3.499	0.001	100	20445	5.00	4.63	
29 3-Chloro-1-propene	76	3.798	3.785	0.013	74	5524	5.00	5.02	M
30 Methyl acetate	43	3.816	3.809	0.007	96	49270	25.0	29.3	
31 Methylene Chloride	84	4.005	3.998	0.007	97	21013	5.00	5.04	
32 2-Methyl-2-propanol	59	4.291	4.290	0.001	65	5964	50.0	55.3	
33 Acrylonitrile	53	4.400	4.399	0.001	99	47987	50.0	53.8	
34 trans-1,2-Dichloroethene	96	4.443	4.424	0.019	95	12392	5.00	5.56	
35 Methyl tert-butyl ether	73	4.443	4.454	-0.011	84	22934	5.00	5.07	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.863	4.856	0.007	90	17937	5.00	5.54	
37 1,1-Dichloroethane	63	5.076	5.081	-0.005	96	19730	5.00	5.30	
38 Vinyl acetate	43	5.118	5.129	-0.011	98	14579	5.00	4.29	M
42 2,2-Dichloropropane	97	5.824	5.835	-0.011	52	1778	5.00	4.59	
43 cis-1,2-Dichloroethene	96	5.842	5.835	0.007	77	13048	5.00	5.23	
44 2-Butanone (MEK)	43	5.848	5.841	0.007	99	24730	25.0	27.0	
48 Chlorobromomethane	128	6.116	6.121	-0.005	96	5856	5.00	5.23	
49 Tetrahydrofuran	42	6.140	6.139	0.001	71	8841	10.0	12.4	
50 Chloroform	83	6.274	6.267	0.007	94	18543	5.00	5.37	
51 1,1,1-Trichloroethane	97	6.426	6.425	0.001	95	10002	5.00	4.80	
52 Cyclohexane	56	6.493	6.498	-0.005	94	19444	5.00	5.11	
53 Carbon tetrachloride	117	6.603	6.595	0.008	50	6374	5.00	4.58	
54 1,1-Dichloropropene	75	6.615	6.614	0.001	96	14232	5.00	5.09	
55 Isobutyl alcohol	41	6.822	6.827	-0.005	37	5799	125.0	122.0	
56 Benzene	78	6.834	6.833	0.001	96	50329	5.00	5.61	
57 1,2-Dichloroethane	62	6.913	6.912	0.001	97	15748	5.00	5.51	
59 n-Heptane	43	7.205	7.198	0.007	88	14142	5.00	5.33	
61 Trichloroethene	130	7.576	7.569	0.007	98	11801	5.00	5.39	
63 Methylcyclohexane	83	7.801	7.806	-0.005	86	18620	5.00	5.10	
64 1,2-Dichloropropane	63	7.837	7.843	-0.006	89	13422	5.00	5.64	M
67 Dibromomethane	93	7.935	7.928	0.007	94	5867	5.00	4.63	
65 1,4-Dioxane	88	7.935	7.934	0.001	47	2539	100.0	107.0	M
68 Dichlorobromomethane	83	8.123	8.129	-0.006	95	8911	5.00	4.67	
70 2-Chloroethyl vinyl ether	63	8.434	8.433	0.001	92	12773	10.0	8.95	
71 cis-1,3-Dichloropropene	75	8.574	8.579	-0.005	92	9906	5.00	3.75	
72 4-Methyl-2-pentanone (MIBK	43	8.732	8.731	0.001	95	40945	25.0	22.6	
73 Toluene	91	8.902	8.907	-0.005	98	50125	5.00	5.72	
74 trans-1,3-Dichloropropene	75	9.158	9.157	0.001	94	7817	5.00	3.90	
75 Ethyl methacrylate	69	9.224	9.217	0.007	87	8915	5.00	3.73	
76 1,1,2-Trichloroethane	97	9.352	9.345	0.007	89	9638	5.00	5.15	
77 Tetrachloroethene	164	9.419	9.418	0.001	94	10232	5.00	6.07	
78 1,3-Dichloropropane	76	9.504	9.509	-0.005	89	19292	5.00	5.54	
79 2-Hexanone	43	9.565	9.570	-0.005	95	25103	25.0	23.2	
81 Chlorodibromomethane	129	9.723	9.722	0.001	90	5051	5.00	4.28	
82 Ethylene Dibromide	107	9.833	9.832	0.001	97	7512	5.00	4.46	
83 3-Chlorobenzotrifluoride	180	10.301	10.300	0.001	58	17222	5.00	5.93	
84 Chlorobenzene	112	10.320	10.319	0.001	95	33454	5.00	5.63	
85 4-Chlorobenzotrifluoride	180	10.393	10.386	0.007	96	15414	5.00	5.69	
86 1,1,1,2-Tetrachloroethane	131	10.411	10.416	-0.005	40	5200	5.00	3.93	
87 Ethylbenzene	106	10.423	10.422	0.001	98	16997	5.00	5.31	
88 m-Xylene & p-Xylene	106	10.557	10.556	0.001	98	18866	5.00	4.85	
89 o-Xylene	106	10.934	10.933	0.001	96	17436	5.00	4.64	
90 Styrene	104	10.958	10.957	0.001	95	28066	5.00	4.50	
91 Bromoform	173	11.135	11.134	0.001	56	2188	5.00	7.59	
92 2-Chlorobenzotrifluoride	180	11.208	11.207	0.001	95	14799	5.00	5.28	
93 Isopropylbenzene	105	11.305	11.304	0.001	95	47759	5.00	5.33	
95 Bromobenzene	156	11.609	11.614	-0.005	94	11826	5.00	5.05	
96 1,1,2,2-Tetrachloroethane	83	11.621	11.614	0.007	76	12078	5.00	5.11	
97 trans-1,4-Dichloro-2-buten	53	11.646	11.651	-0.005	69	2690	5.00	4.44	
98 1,2,3-Trichloropropane	110	11.670	11.669	0.001	85	3816	5.00	4.85	
99 N-Propylbenzene	120	11.719	11.718	0.001	98	13125	5.00	4.83	
100 2-Chlorotoluene	126	11.804	11.803	0.001	96	11542	5.00	4.87	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.871	11.870	0.001	95	12962	5.00	5.04	
102 1,3,5-Trimethylbenzene	105	11.901	11.906	-0.005	96	37007	5.00	4.95	
103 4-Chlorotoluene	126	11.932	11.931	0.001	98	13109	5.00	5.06	
104 tert-Butylbenzene	119	12.211	12.217	-0.006	93	31200	5.00	4.92	
106 1,2,4-Trimethylbenzene	105	12.278	12.277	0.001	96	37784	5.00	4.87	
107 1,2-dichloro-4-(trifluorom	214	12.321	12.320	0.001	96	11726	5.00	5.35	
108 sec-Butylbenzene	105	12.437	12.436	0.001	94	47106	5.00	5.11	
109 1,3-Dichlorobenzene	146	12.552	12.551	0.001	97	25047	5.00	5.51	
110 4-Isopropyltoluene	119	12.595	12.594	0.001	95	38779	5.00	4.95	
111 1,4-Dichlorobenzene	146	12.662	12.661	0.001	93	26969	5.00	5.67	
113 2,4-Dichloro-1-(triflourom	214	12.686	12.691	-0.005	89	12149	5.00	5.67	
114 2,5-Dichlorobenzotrifluori	214	12.735	12.728	0.007	95	14585	5.00	5.94	
116 n-Butylbenzene	91	13.008	13.001	0.007	97	36660	5.00	5.17	
117 1,2-Dichlorobenzene	146	13.021	13.014	0.007	95	24392	5.00	5.46	
118 1,2-Dibromo-3-Chloropropan	75	13.793	13.804	-0.011	1	1147	5.00	5.29	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.939	13.944	-0.005	97	53182	15.0	15.1	
121 2,3- & 3,4- Dichlorotoluen	125	14.365	14.358	0.007	97	38035	10.0	9.78	
122 1,2,4-Trichlorobenzene	180	14.627	14.626	0.001	92	15198	5.00	5.03	
123 Hexachlorobutadiene	225	14.773	14.778	-0.005	93	5716	5.00	5.55	
124 Naphthalene	128	14.888	14.893	-0.005	95	32031	5.00	4.45	
125 1,2,3-Trichlorobenzene	180	15.113	15.112	0.001	92	12734	5.00	4.79	
126 2,4,5-Trichlorotoluene	159	15.898	15.897	0.001	0	5053	5.00	4.05	
127 2,3,6-Trichlorotoluene	159	16.008	16.001	0.007	93	5245	5.00	4.51	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
S 130 1,2-Dichloroethene, Total	96				0		10.0	10.8	
S 131 Xylenes, Total	106				0		10.0	9.49	
S 132 1,3-Dichloropropene, Total	1				0		10.0	7.65	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

VOA8260SURR_00060	Amount Added:	0.20	Units: uL	
VOA8260VOAPRI_00216	Amount Added:	0.20	Units: uL	
voaWEEmixRest_00001	Amount Added:	0.20	Units: uL	
voaWva2ndRest_00007	Amount Added:	0.20	Units: uL	
voaW2cleveRes_00002	Amount Added:	0.20	Units: uL	
voaWKetPriRes_00002	Amount Added:	0.80	Units: uL	
voaWacro2ndRe_00007	Amount Added:	4.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent

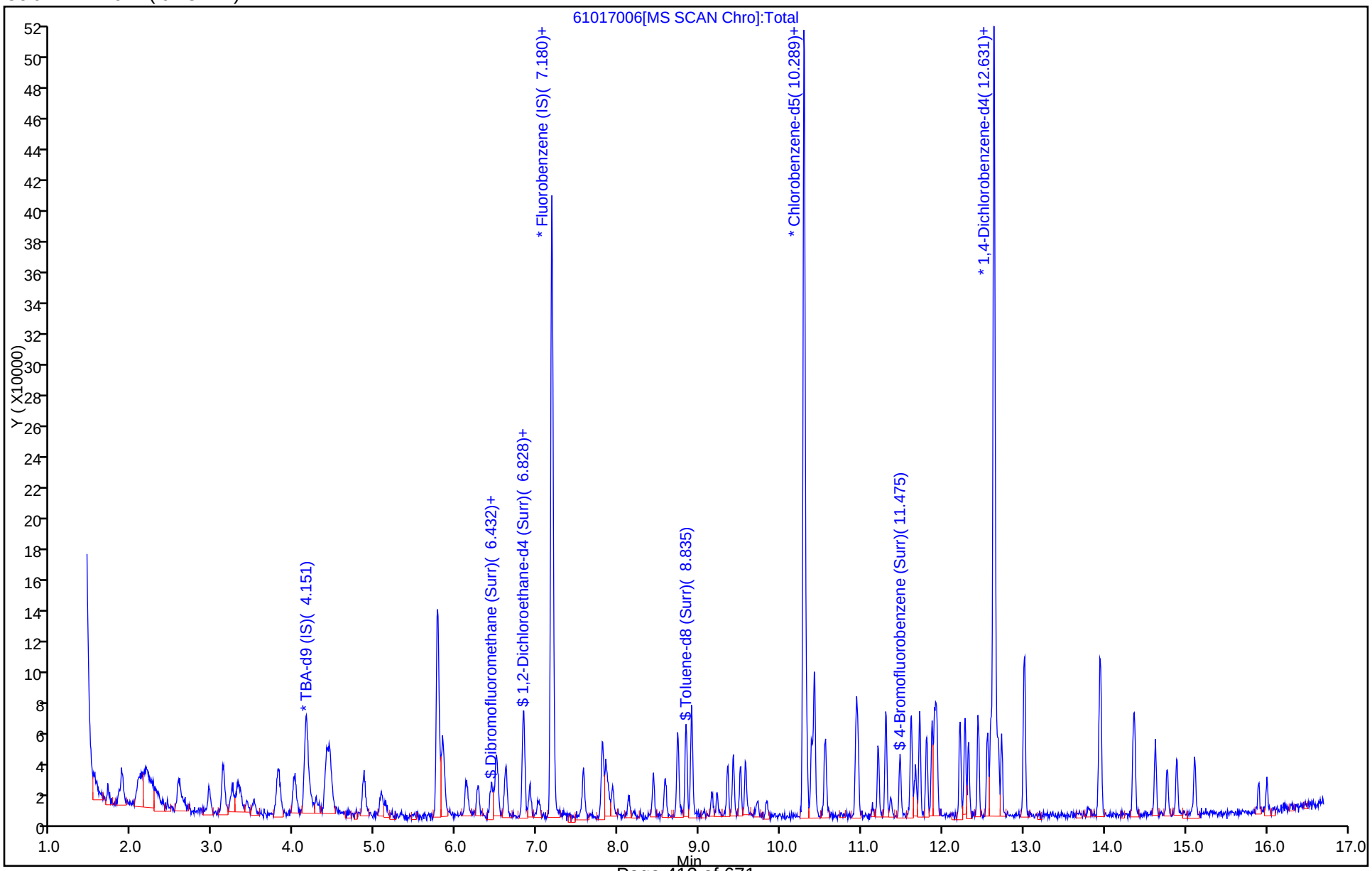
Report Date: 18-Oct-2016 11:22:39 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017006.D

Injection Date:	17-Oct-2016 14:23:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	IC VSTD1			Worklist Smp#:	6
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	6
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh

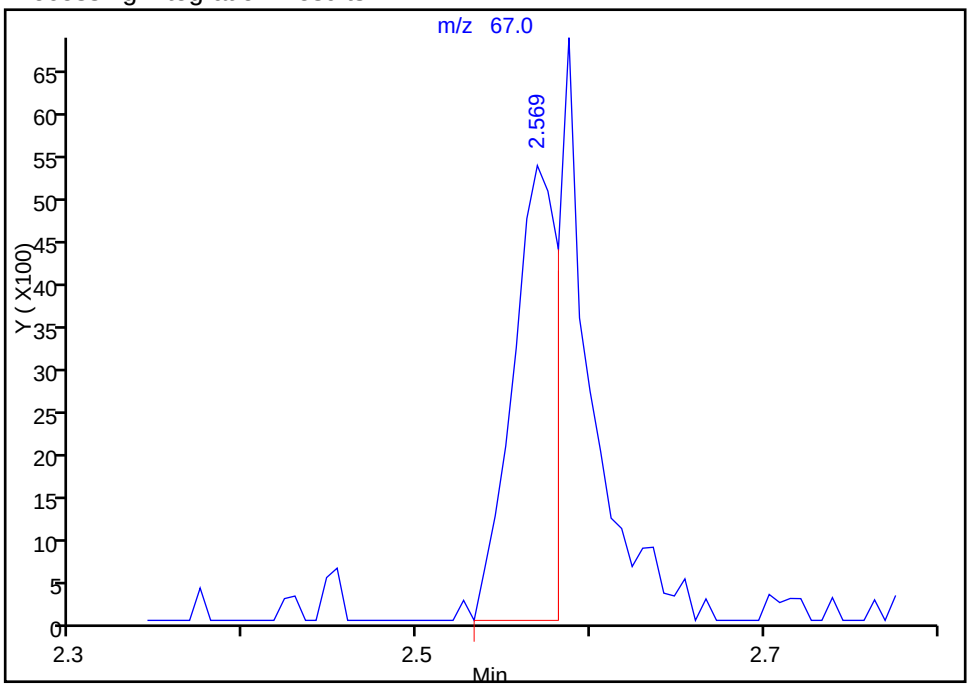
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017006.D				
Injection Date:	17-Oct-2016 14:23:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD1				
Client ID:					
Operator ID:	001562	ALS Bottle#:	6	Worklist Smp#:	6
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

17 Dichlorofluoromethane, CAS: 75-43-4

Signal: 1

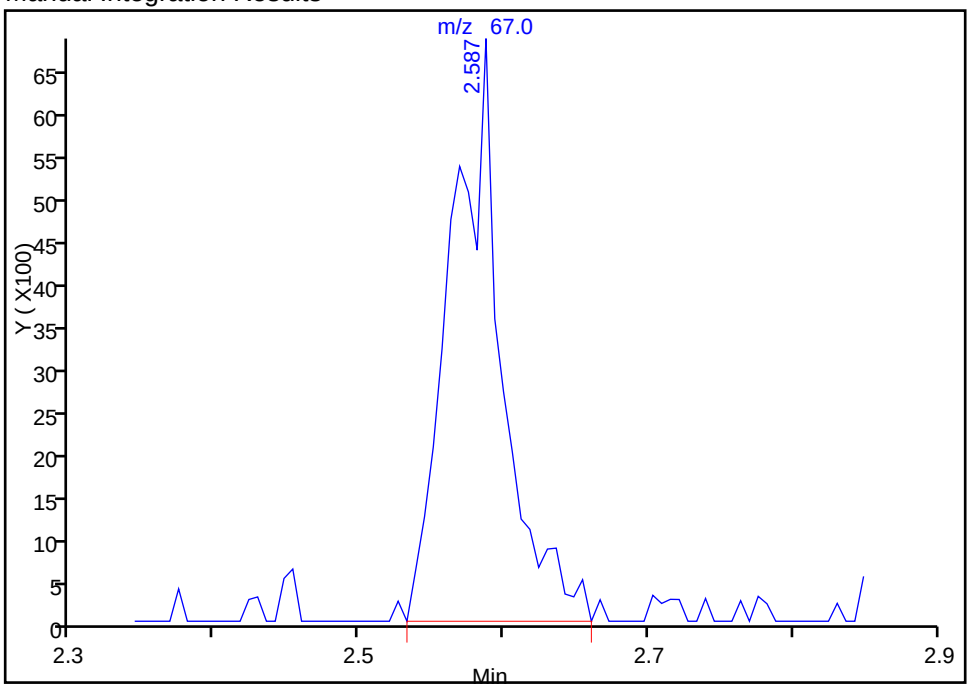
Processing Integration Results

RT: 2.57
Area: 9633
Amount: 4.895355
Amount Units: ng



Manual Integration Results

RT: 2.59
Area: 17179
Amount: 5.512545
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 09:55:22
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

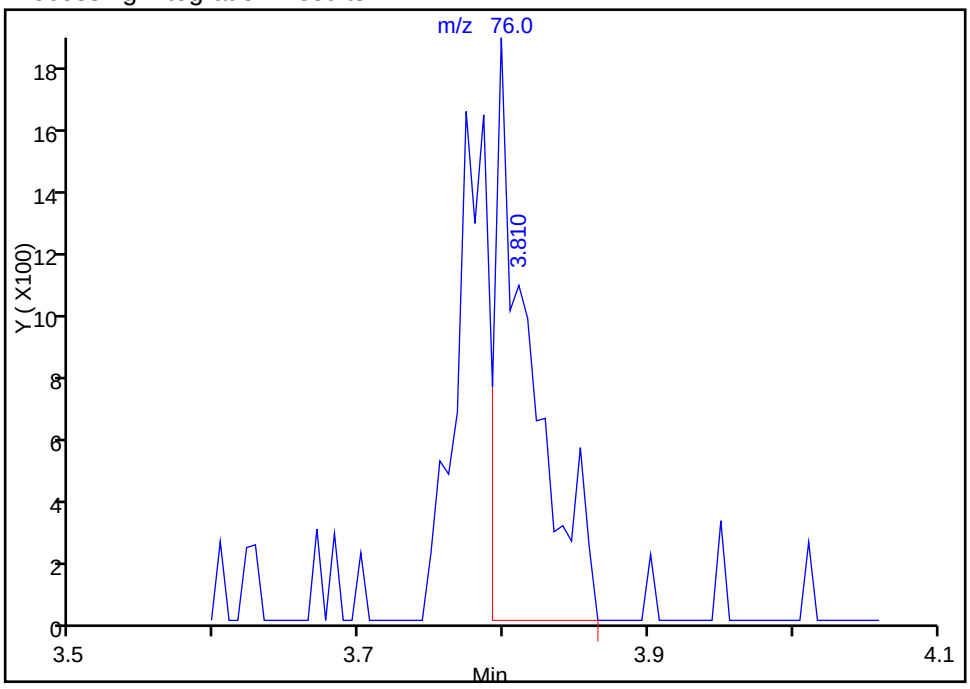
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017006.D				
Injection Date:	17-Oct-2016 14:23:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD1				
Client ID:					
Operator ID:	001562	ALS Bottle#:	6	Worklist Smp#:	6
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

29 3-Chloro-1-propene, CAS: 107-05-1

Signal: 1

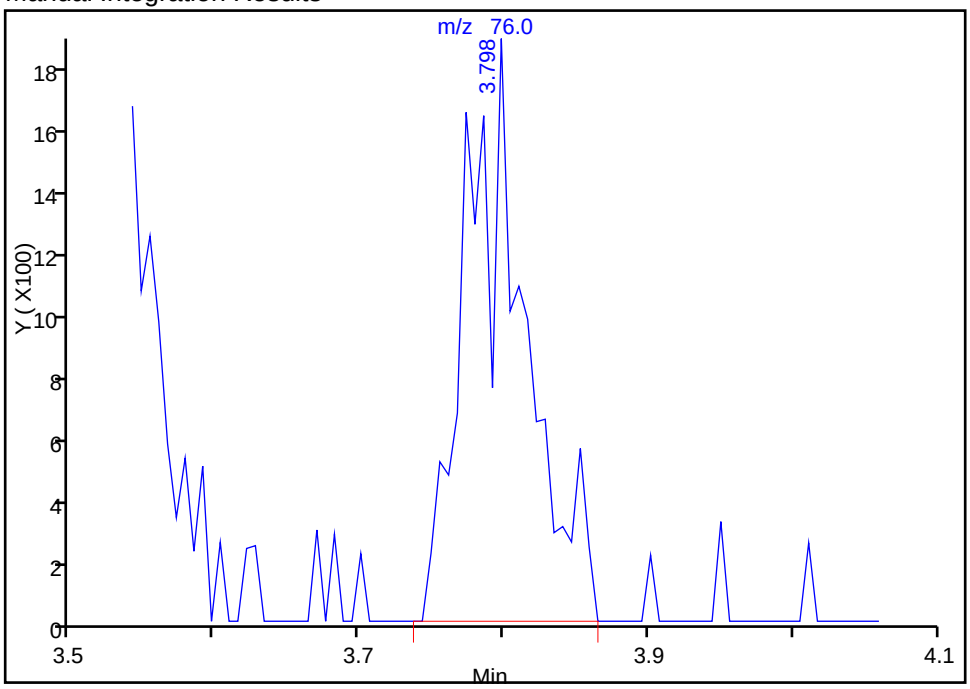
Processing Integration Results

RT: 3.81
Area: 3165
Amount: 5.163002
Amount Units: ng



Manual Integration Results

RT: 3.80
Area: 5524
Amount: 5.016222
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 09:55:22

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

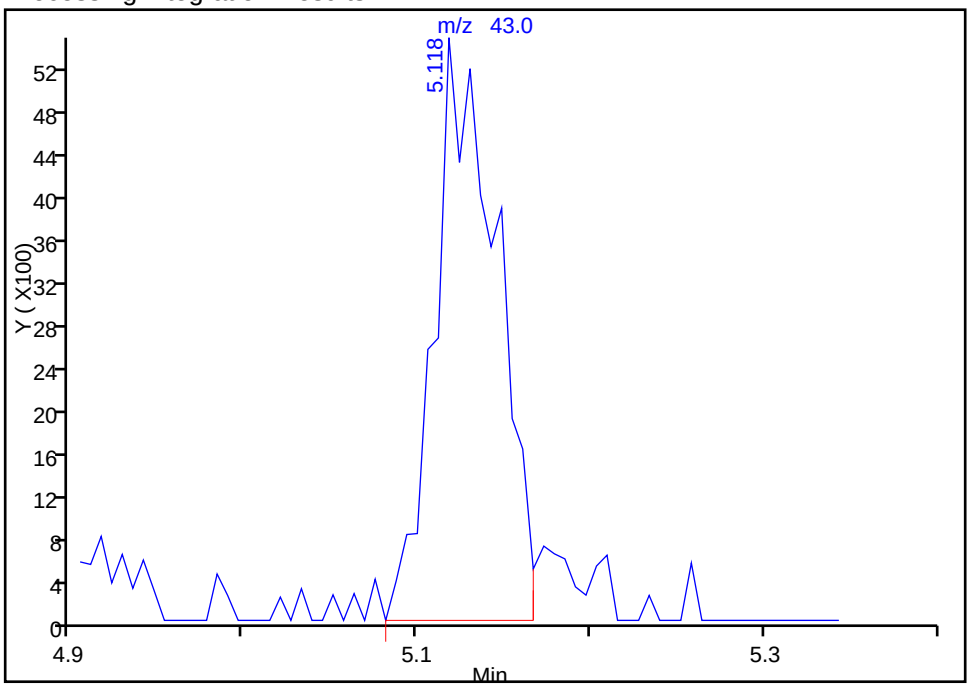
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017006.D				
Injection Date:	17-Oct-2016 14:23:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD1				
Client ID:					
Operator ID:	001562	ALS Bottle#:	6	Worklist Smp#:	6
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

38 Vinyl acetate, CAS: 108-05-4

Signal: 1

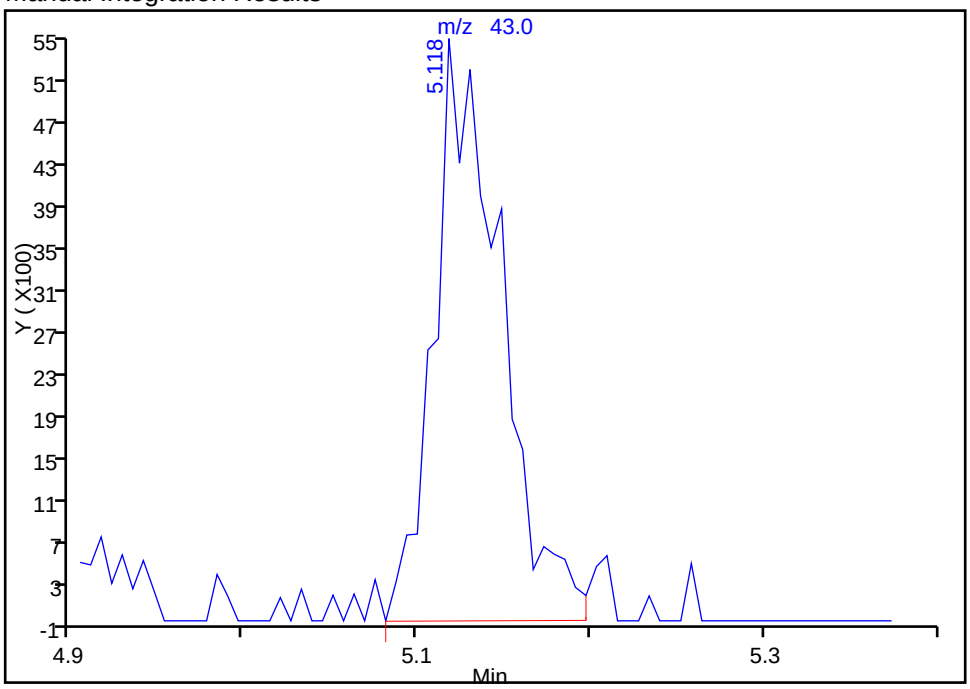
Processing Integration Results

RT: 5.12
Area: 13683
Amount: 6.753948
Amount Units: ng



Manual Integration Results

RT: 5.12
Area: 14579
Amount: 4.289962
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 09:55:22

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

TestAmerica Pittsburgh

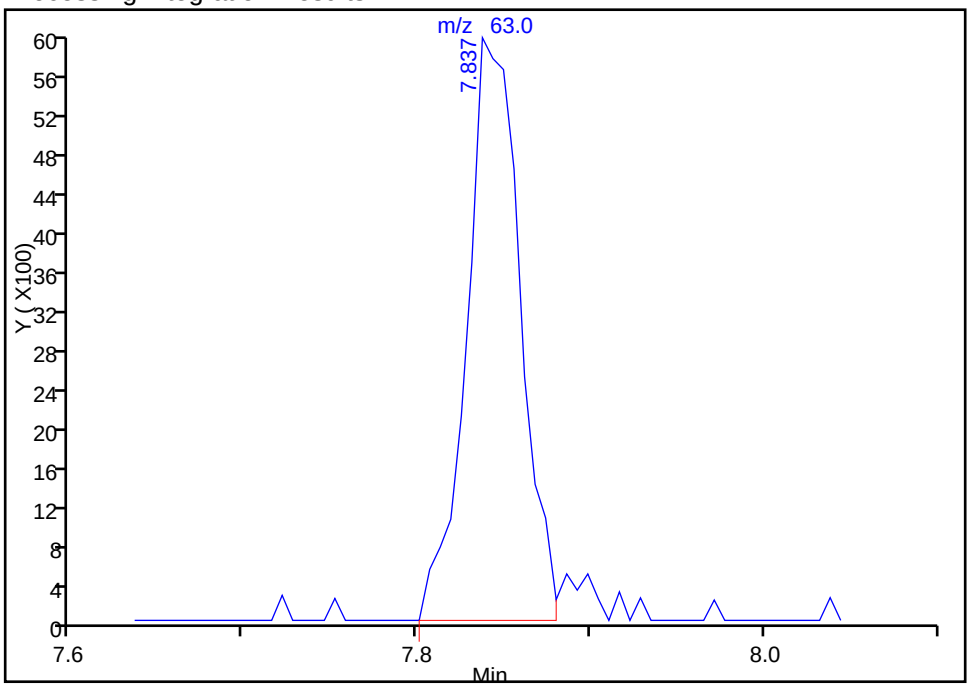
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017006.D
Injection Date: 17-Oct-2016 14:23:30 Instrument ID: CHHP6
Lims ID: IC VSTD1
Client ID:
Operator ID: 001562 ALS Bottle#: 6 Worklist Smp#: 6
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP6 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

64 1,2-Dichloropropane, CAS: 78-87-5

Signal: 1

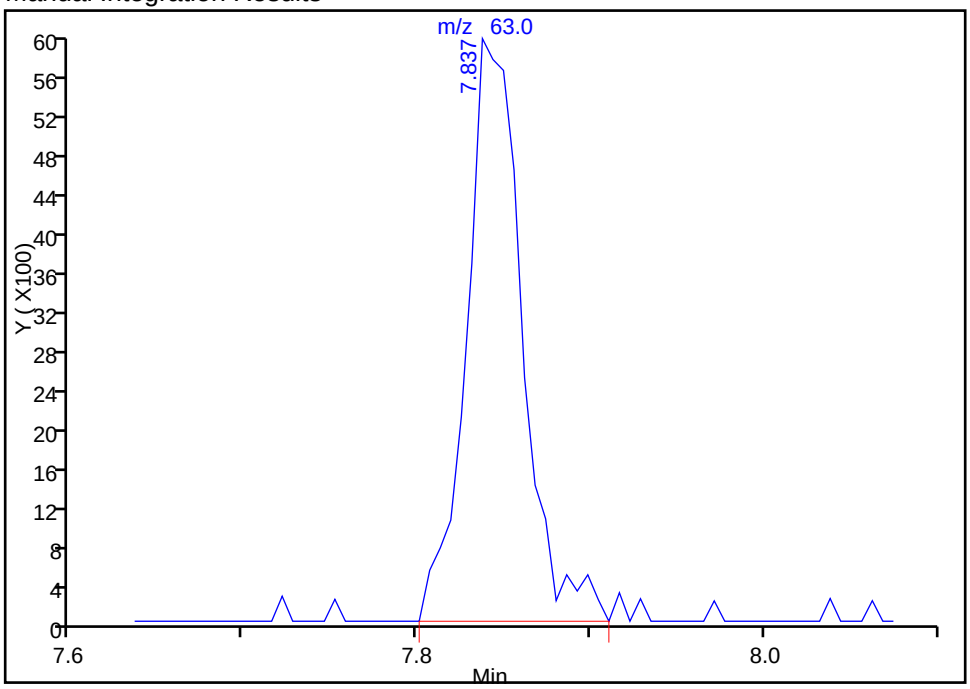
Processing Integration Results

RT: 7.84
Area: 12880
Amount: 5.446389
Amount Units: ng



Manual Integration Results

RT: 7.84
Area: 13422
Amount: 5.638654
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 09:55:22
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

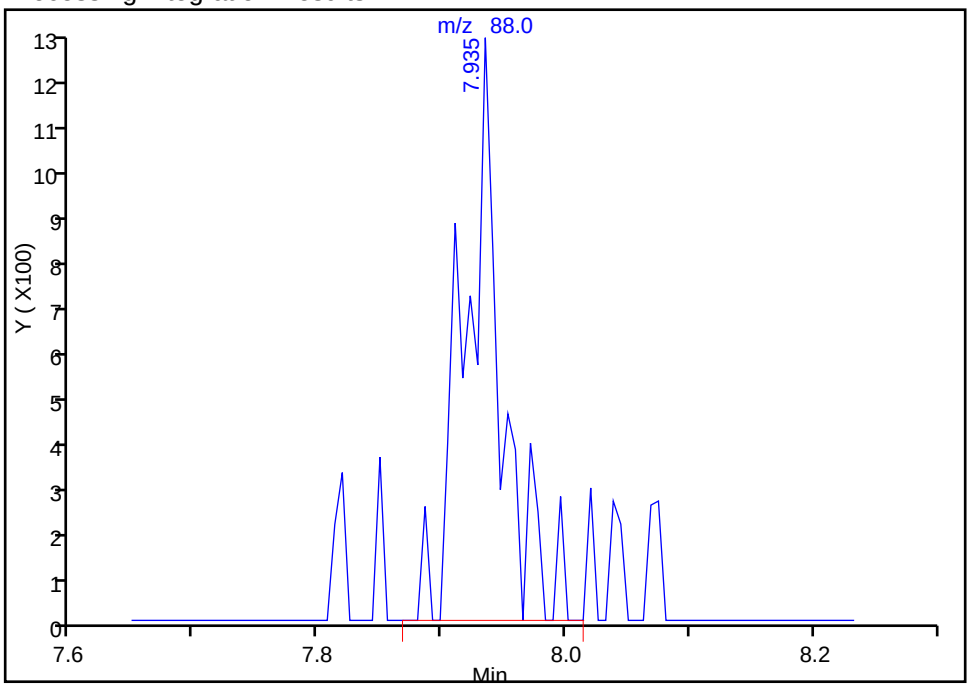
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017006.D				
Injection Date:	17-Oct-2016 14:23:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD1				
Client ID:					
Operator ID:	001562	ALS Bottle#:	6	Worklist Smp#:	6
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

65 1,4-Dioxane, CAS: 123-91-1

Signal: 1

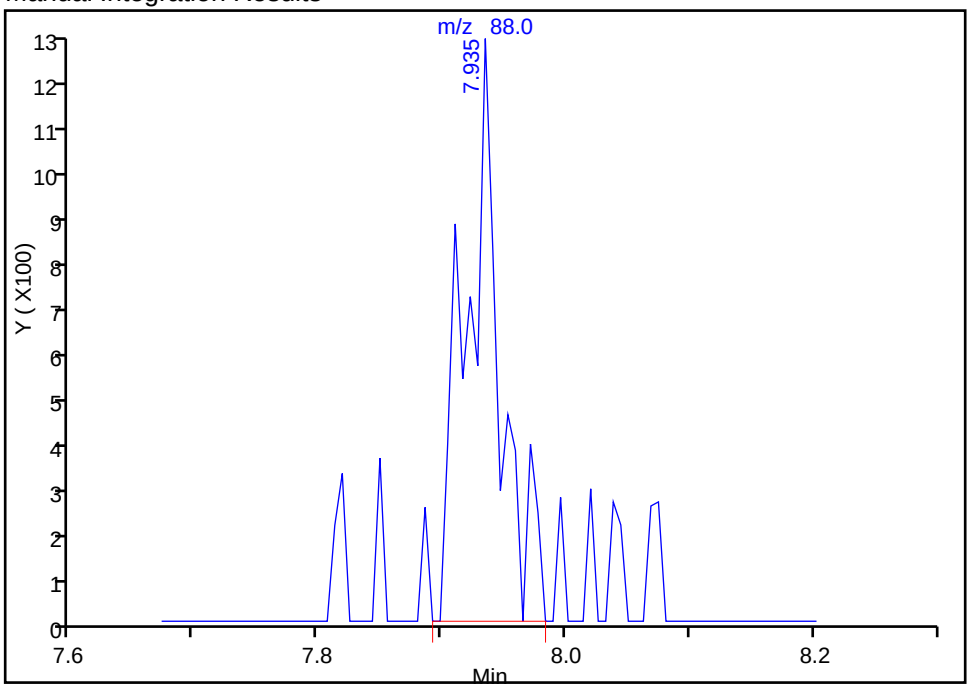
Processing Integration Results

RT: 7.93
Area: 2731
Amount: 137.7546
Amount Units: ng



Manual Integration Results

RT: 7.93
Area: 2539
Amount: 107.0435
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 09:55:22

Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017007.D
Lims ID: IC VSTD5
Client ID:
Sample Type: IC Calib Level: 2
Inject. Date: 17-Oct-2016 14:48:30 ALS Bottle#: 7 Worklist Smp#: 7
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-007
Misc. Info.: IC VSTD5
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:22:43 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 10:03:31

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.139	4.150	-0.011	89	123386	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.181	7.180	0.001	98	424012	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.290	10.294	-0.004	86	103556	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.632	12.630	0.002	96	158882	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.451	6.449	0.002	93	45418	25.0	25.1	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.822	6.821	0.001	77	63663	25.0	26.0	
$ 7 Toluene-d8 (Surr)	98	8.836	8.834	0.002	93	205588	25.0	27.1	
$ 8 4-Bromofluorobenzene (Surr	95	11.476	11.474	0.002	89	70121	25.0	24.6	
11 Dichlorodifluoromethane	85	1.536	1.546	-0.010	93	48460	25.0	25.1	M
12 Chloromethane	50	1.706	1.698	0.008	99	63508	25.0	25.7	
13 Vinyl chloride	62	1.834	1.838	-0.004	99	54262	25.0	24.0	
14 Butadiene	39	1.870	1.869	0.001	94	59455	25.0	25.1	
15 Bromomethane	94	2.168	2.167	0.001	94	26701	25.0	25.5	
16 Chloroethane	64	2.308	2.301	0.007	99	35030	25.0	24.5	
17 Dichlorofluoromethane	67	2.576	2.568	0.008	94	84730	25.0	25.9	
18 Trichlorofluoromethane	101	2.588	2.586	0.002	65	69000	25.0	25.5	
20 Ethyl ether	59	2.947	2.945	0.002	89	57079	25.0	25.8	
21 Acrolein	56	3.123	3.122	0.001	99	55967	125.0	118.5	
22 1,1-Dichloroethene	96	3.233	3.231	0.002	99	52383	25.0	25.1	
23 1,1,2-Trichloro-1,2,2-trif	101	3.294	3.298	-0.004	94	52668	25.0	25.0	
24 Acetone	43	3.318	3.335	-0.017	99	22945	50.0	45.3	
25 Iodomethane	142	3.421	3.420	0.001	96	75958	25.0	24.3	
26 Carbon disulfide	76	3.500	3.499	0.001	99	93668	25.0	20.2	
29 3-Chloro-1-propene	76	3.786	3.785	0.001	82	23057	25.0	19.9	
30 Methyl acetate	43	3.805	3.809	-0.004	97	209350	125.0	118.6	
31 Methylene Chloride	84	3.999	3.998	0.001	94	70928	25.0	24.8	
32 2-Methyl-2-propanol	59	4.273	4.290	-0.017	91	26121	250.0	208.4	
33 Acrylonitrile	53	4.395	4.399	-0.004	99	226233	250.0	241.6	
34 trans-1,2-Dichloroethene	96	4.425	4.424	0.001	98	55007	25.0	23.5	
35 Methyl tert-butyl ether	73	4.443	4.454	-0.011	96	101976	25.0	21.5	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.857	4.856	0.001	96	82220	25.0	24.2	
37 1,1-Dichloroethane	63	5.082	5.081	0.001	96	91288	25.0	23.4	
38 Vinyl acetate	43	5.125	5.129	-0.004	98	75241	25.0	21.1	
42 2,2-Dichloropropane	97	5.830	5.835	-0.005	52	9317	25.0	22.9	
43 cis-1,2-Dichloroethene	96	5.830	5.835	-0.005	82	64079	25.0	24.5	
44 2-Butanone (MEK)	43	5.849	5.841	0.008	92	50228	50.0	52.3	
48 Chlorobromomethane	128	6.116	6.121	-0.005	97	28077	25.0	23.9	
49 Tetrahydrofuran	42	6.129	6.139	-0.010	82	34090	50.0	45.7	
50 Chloroform	83	6.268	6.267	0.001	93	89560	25.0	24.7	
51 1,1,1-Trichloroethane	97	6.427	6.425	0.002	97	50565	25.0	23.1	
52 Cyclohexane	56	6.500	6.498	0.002	93	97597	25.0	24.4	
53 Carbon tetrachloride	117	6.597	6.595	0.002	94	30269	25.0	20.7	
54 1,1-Dichloropropene	75	6.615	6.614	0.001	97	71901	25.0	24.5	
55 Isobutyl alcohol	41	6.822	6.827	-0.005	84	25495	625.0	510.3	M
56 Benzene	78	6.828	6.833	-0.005	97	241667	25.0	25.6	
57 1,2-Dichloroethane	62	6.907	6.912	-0.005	97	74303	25.0	24.7	
59 n-Heptane	43	7.199	7.198	0.001	92	69355	25.0	24.9	
61 Trichloroethene	130	7.570	7.569	0.001	98	56636	25.0	24.6	
63 Methylcyclohexane	83	7.801	7.806	-0.005	88	94227	25.0	24.6	
64 1,2-Dichloropropane	63	7.844	7.843	0.001	95	60485	25.0	24.2	
67 Dibromomethane	93	7.929	7.928	0.001	94	32261	25.0	24.2	
65 1,4-Dioxane	88	7.929	7.934	-0.005	42	11953	500.0	479.6	M
68 Dichlorobromomethane	83	8.130	8.129	0.001	97	42759	25.0	21.3	
70 2-Chloroethyl vinyl ether	63	8.434	8.433	0.001	92	68565	50.0	45.7	
71 cis-1,3-Dichloropropene	75	8.574	8.579	-0.005	94	56067	25.0	20.2	
72 4-Methyl-2-pentanone (MIBK	43	8.732	8.731	0.001	97	93433	50.0	48.6	
73 Toluene	91	8.903	8.907	-0.004	99	244909	25.0	26.3	
74 trans-1,3-Dichloropropene	75	9.152	9.157	-0.005	95	40698	25.0	19.1	
75 Ethyl methacrylate	69	9.219	9.217	0.002	91	53103	25.0	20.9	
76 1,1,2-Trichloroethane	97	9.347	9.345	0.002	91	50412	25.0	25.4	
77 Tetrachloroethene	164	9.414	9.418	-0.004	95	45578	25.0	25.5	
78 1,3-Dichloropropane	76	9.505	9.509	-0.004	91	93947	25.0	25.4	
79 2-Hexanone	43	9.566	9.570	-0.004	95	54228	50.0	47.1	
81 Chlorodibromomethane	129	9.718	9.722	-0.004	88	25976	25.0	20.7	
82 Ethylene Dibromide	107	9.827	9.832	-0.005	100	40628	25.0	22.7	
83 3-Chlorobenzotrifluoride	180	10.296	10.300	-0.004	93	76878	25.0	24.9	
84 Chlorobenzene	112	10.320	10.319	0.001	95	162687	25.0	25.8	
85 4-Chlorobenzotrifluoride	180	10.387	10.386	0.001	96	70044	25.0	24.4	
86 1,1,1,2-Tetrachloroethane	131	10.411	10.416	-0.005	80	29046	25.0	20.7	
87 Ethylbenzene	106	10.423	10.422	0.001	98	85428	25.0	25.1	
88 m-Xylene & p-Xylene	106	10.551	10.556	-0.005	99	106102	25.0	25.7	
89 o-Xylene	106	10.934	10.933	0.001	95	103504	25.0	26.0	
90 Styrene	104	10.953	10.957	-0.004	96	166314	25.0	25.1	
91 Bromoform	173	11.141	11.134	0.007	95	13641	25.0	24.9	
92 2-Chlorobenzotrifluoride	180	11.208	11.207	0.001	95	73584	25.0	24.7	
93 Isopropylbenzene	105	11.306	11.304	0.002	96	244492	25.0	25.7	
95 Bromobenzene	156	11.616	11.614	0.002	94	64111	25.0	24.9	
96 1,1,2,2-Tetrachloroethane	83	11.616	11.614	0.002	77	62244	25.0	24.8	
97 trans-1,4-Dichloro-2-buten	53	11.646	11.651	-0.005	61	14475	25.0	21.7	
98 1,2,3-Trichloropropane	110	11.677	11.669	0.008	86	20409	25.0	23.6	
99 N-Propylbenzene	120	11.719	11.718	0.001	99	71921	25.0	24.1	
100 2-Chlorotoluene	126	11.804	11.803	0.001	96	61895	25.0	23.7	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.871	11.870	0.001	95	65719	25.0	23.3	
102 1,3,5-Trimethylbenzene	105	11.902	11.906	-0.004	96	207086	25.0	25.2	
103 4-Chlorotoluene	126	11.926	11.931	-0.005	97	72096	25.0	25.3	
104 tert-Butylbenzene	119	12.218	12.217	0.001	93	172473	25.0	24.8	
106 1,2,4-Trimethylbenzene	105	12.279	12.277	0.002	97	214402	25.0	25.1	
107 1,2-dichloro-4-(trifluorom	214	12.322	12.320	0.002	97	59549	25.0	24.7	
108 sec-Butylbenzene	105	12.437	12.436	0.001	94	259914	25.0	25.6	
109 1,3-Dichlorobenzene	146	12.553	12.551	0.002	96	120874	25.0	24.2	
110 4-Isopropyltoluene	119	12.595	12.594	0.001	97	214936	25.0	25.0	
111 1,4-Dichlorobenzene	146	12.656	12.661	-0.005	96	128236	25.0	24.5	
113 2,4-Dichloro-1-(triflourom	214	12.687	12.691	-0.005	95	57652	25.0	24.5	
114 2,5-Dichlorobenzotrifluori	214	12.729	12.728	0.001	96	65243	25.0	24.2	
116 n-Butylbenzene	91	13.003	13.001	0.002	97	190031	25.0	24.4	
117 1,2-Dichlorobenzene	146	13.015	13.014	0.001	98	124427	25.0	25.3	
118 1,2-Dibromo-3-Chloropropan	75	13.806	13.804	0.002	73	5517	25.0	23.1	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.946	13.944	0.002	98	292268	75.0	75.3	
121 2,3- & 3,4- Dichlorotoluen	125	14.366	14.358	0.008	97	206911	50.0	48.4	
122 1,2,4-Trichlorobenzene	180	14.621	14.626	-0.005	91	77607	25.0	23.4	
123 Hexachlorobutadiene	225	14.773	14.778	-0.005	96	26287	25.0	23.2	
124 Naphthalene	128	14.889	14.893	-0.004	97	183134	25.0	23.1	
125 1,2,3-Trichlorobenzene	180	15.108	15.112	-0.004	96	69399	25.0	23.8	
126 2,4,5-Trichlorotoluene	159	15.899	15.897	0.002	0	27475	25.0	20.0	
127 2,3,6-Trichlorotoluene	159	16.002	16.001	0.001	95	26892	25.0	21.0	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
S 130 1,2-Dichloroethene, Total	96				0		50.0	47.9	
S 131 Xylenes, Total	106				0		50.0	51.7	
S 132 1,3-Dichloropropene, Total	1				0		50.0	39.3	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWacro2ndRe_00007	Amount Added:	5.00	Units: uL	
VOA8260VOAPRI_00216	Amount Added:	1.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	1.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	1.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	1.00	Units: uL	
voaW2cleveRes_00002	Amount Added:	1.00	Units: uL	
VOA8260SURR_00060	Amount Added:	1.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent

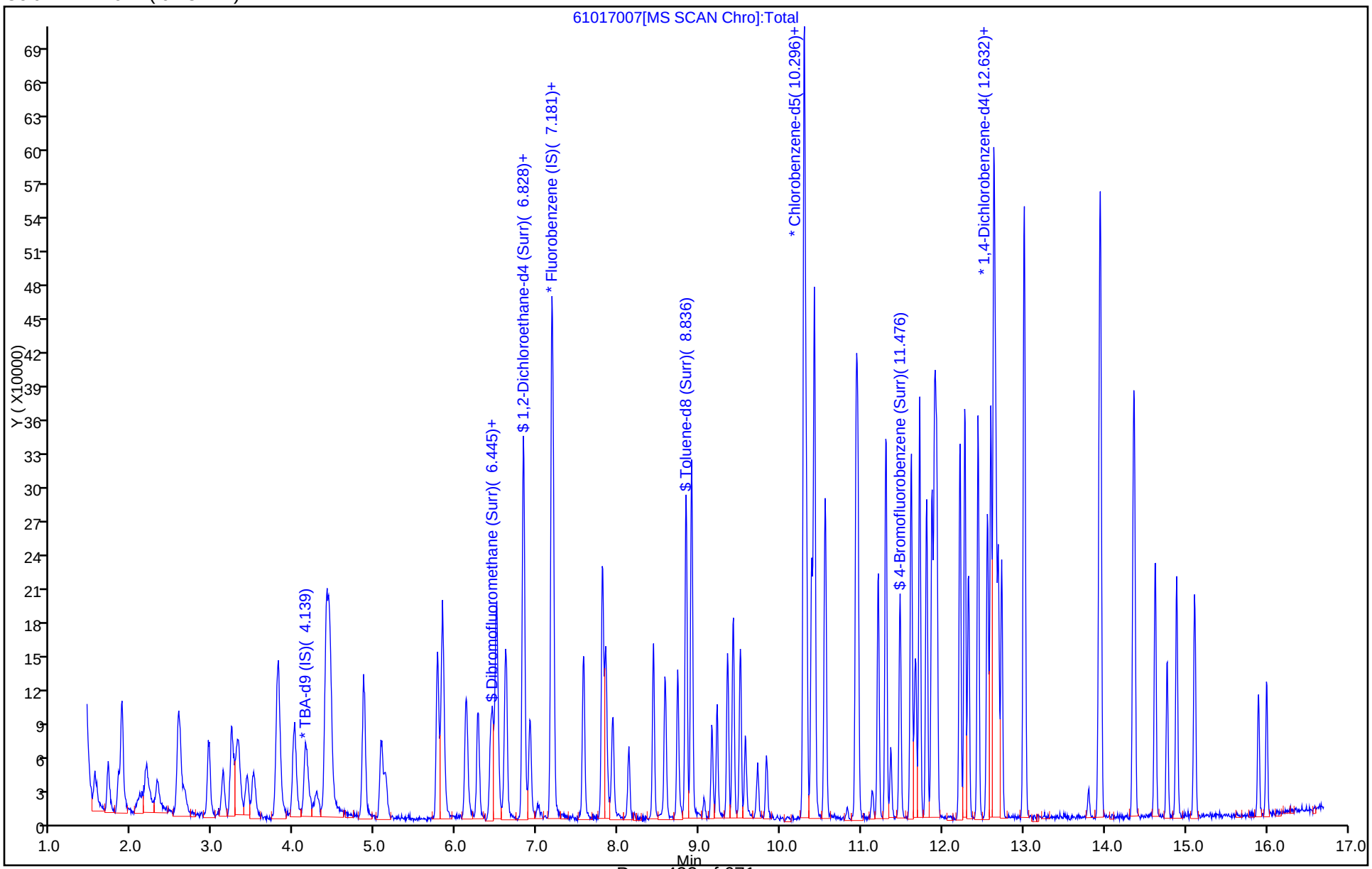
Report Date: 18-Oct-2016 11:22:45 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017007.D

Injection Date:	17-Oct-2016 14:48:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	IC VSTD5			Worklist Smp#:	7
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	7
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh

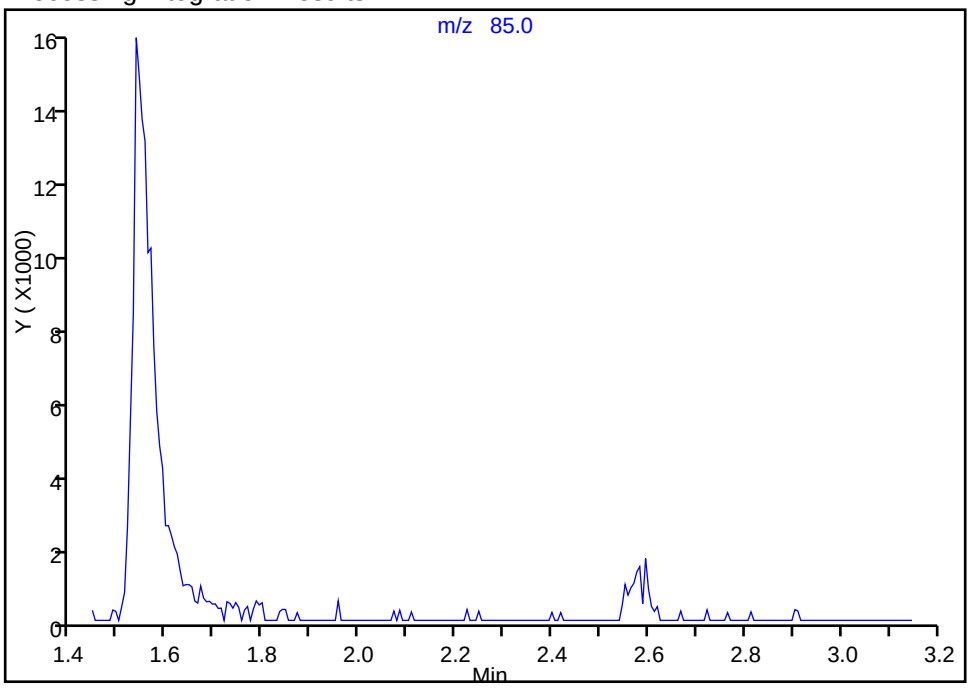
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017007.D				
Injection Date:	17-Oct-2016 14:48:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD5				
Client ID:					
Operator ID:	001562	ALS Bottle#:	7	Worklist Smp#:	7
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

11 Dichlorodifluoromethane, CAS: 75-71-8

Signal: 1

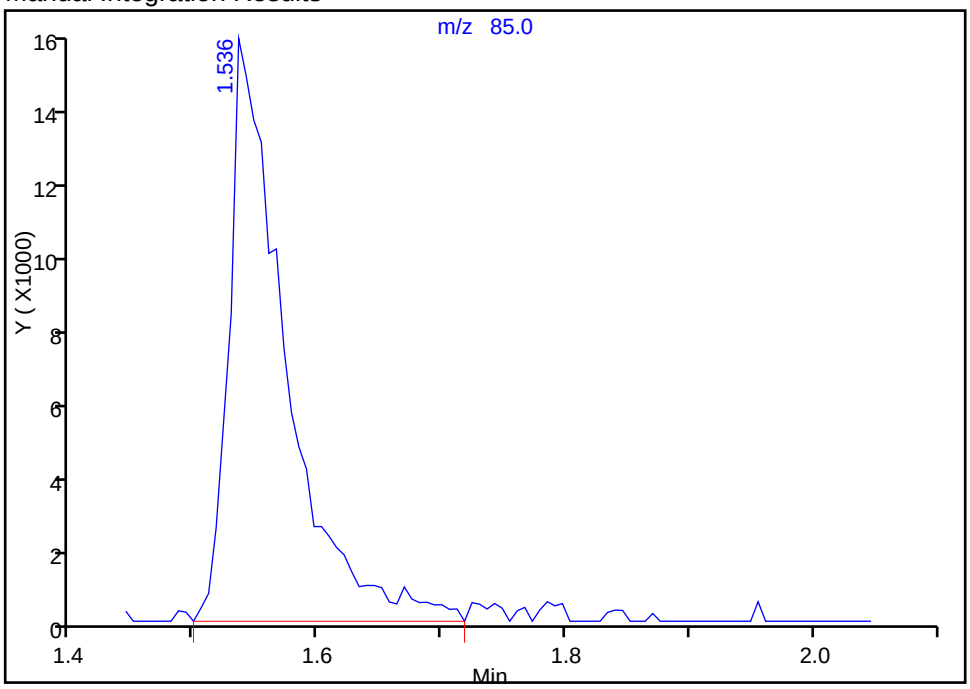
Not Detected
Expected RT: 1.55

Processing Integration Results



Manual Integration Results

RT: 1.54
Area: 48460
Amount: 25.115952
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:03:31
Audit Action: Assigned Compound ID Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

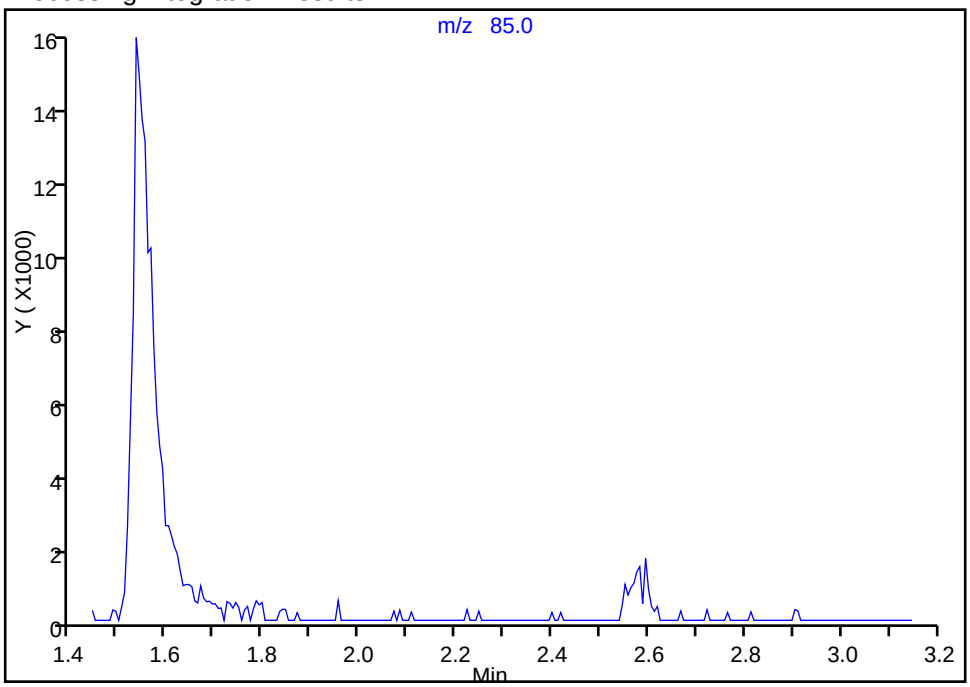
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017007.D				
Injection Date:	17-Oct-2016 14:48:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD5				
Client ID:					
Operator ID:	001562	ALS Bottle#:	7	Worklist Smp#:	7
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

11 Dichlorodifluoromethane, CAS: 75-71-8

Signal: 1

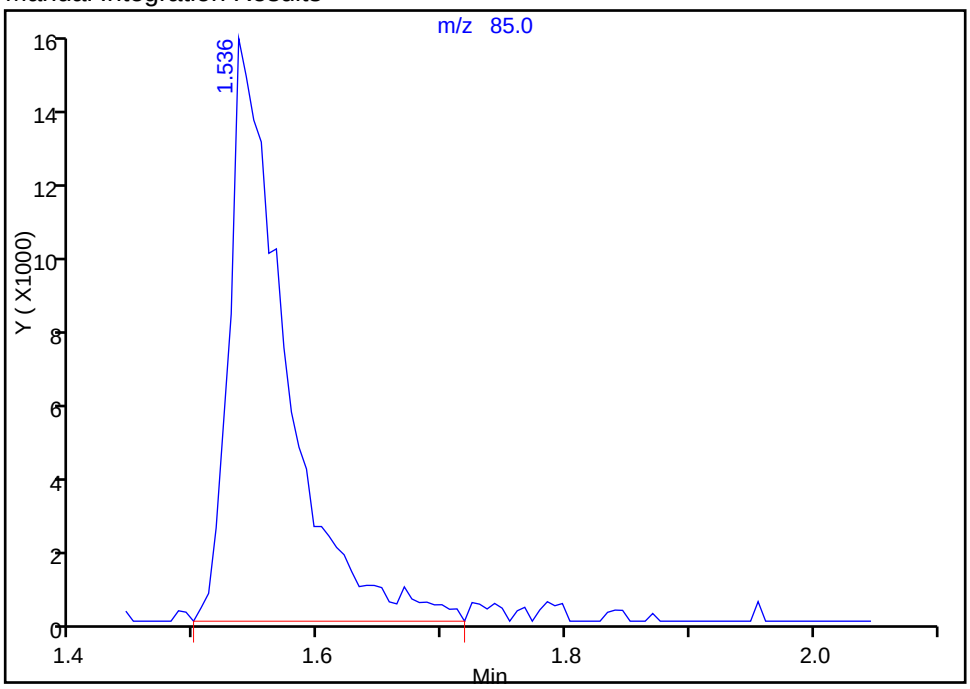
Processing Integration Results

Not Detected
Expected RT: 1.55



Manual Integration Results

RT: 1.54
Area: 48460
Amount: 25.115952
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:03:31
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

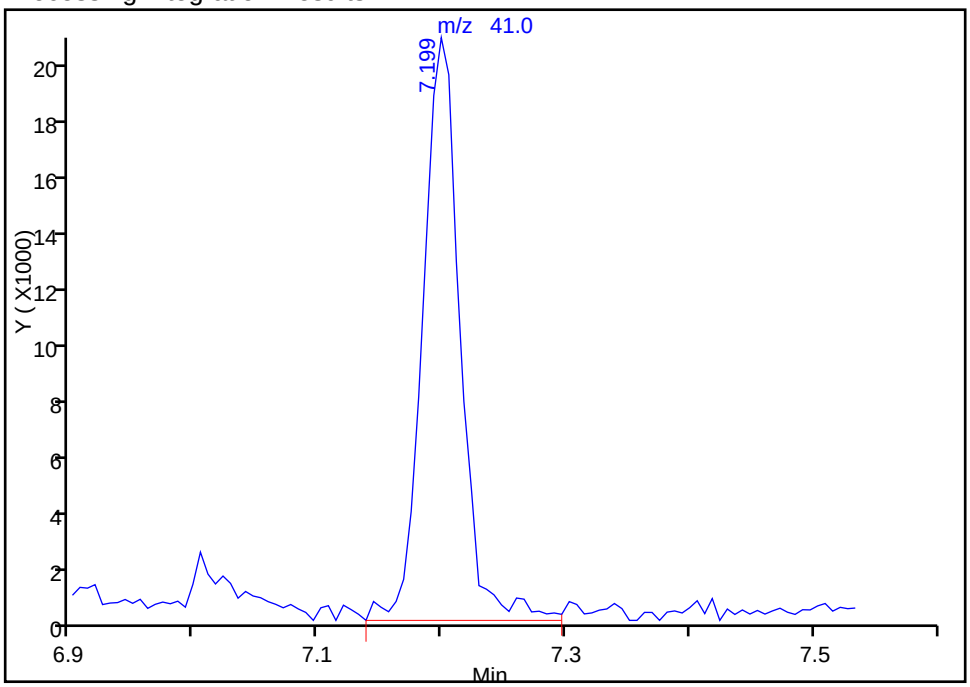
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017007.D				
Injection Date:	17-Oct-2016 14:48:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD5				
Client ID:					
Operator ID:	001562	ALS Bottle#:	7	Worklist Smp#:	7
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

55 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

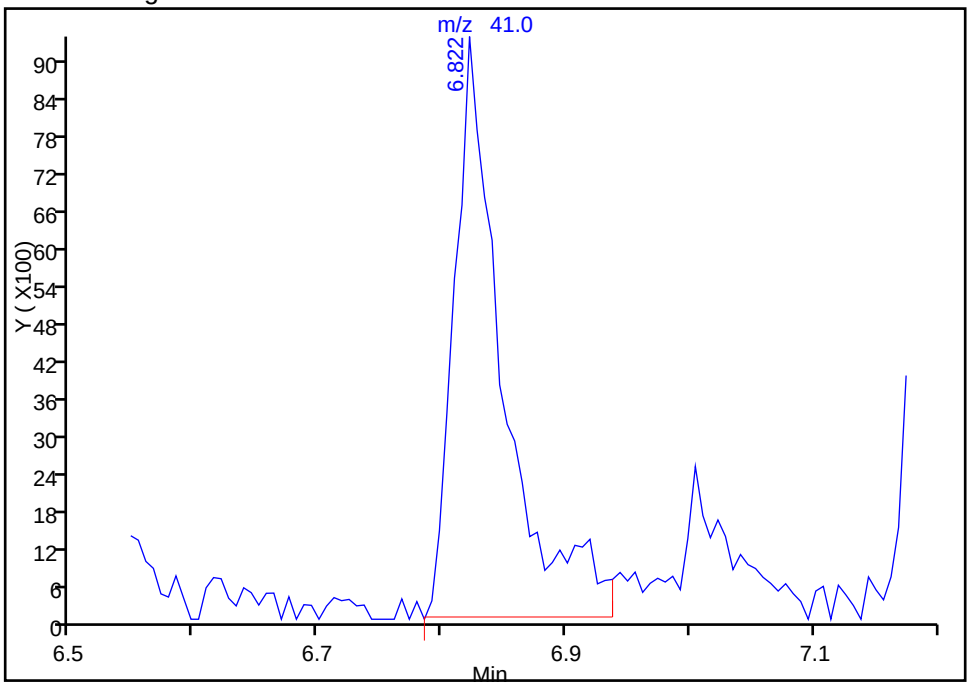
Processing Integration Results

RT: 7.20
Area: 44045
Amount: 865.8293
Amount Units: ng



Manual Integration Results

RT: 6.82
Area: 25495
Amount: 510.2903
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:03:31

Audit Action: Assigned Compound ID Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

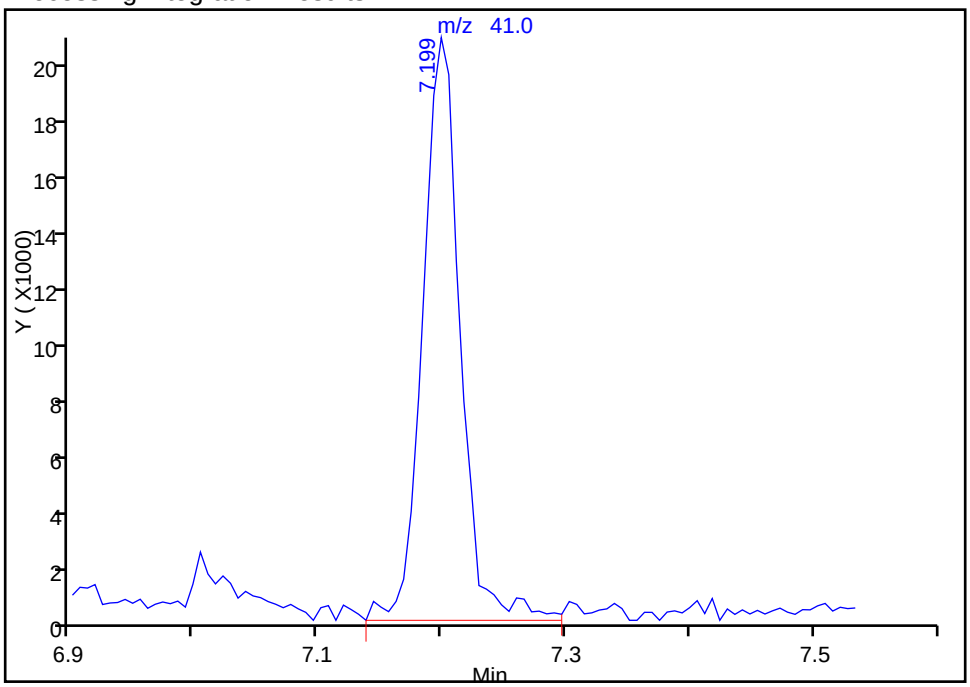
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017007.D
Injection Date: 17-Oct-2016 14:48:30 Instrument ID: CHHP6
Lims ID: IC VSTD5
Client ID:
Operator ID: 001562 ALS Bottle#: 7 Worklist Smp#: 7
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP6 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

55 Isobutyl alcohol, CAS: 78-83-1

Signal: 1

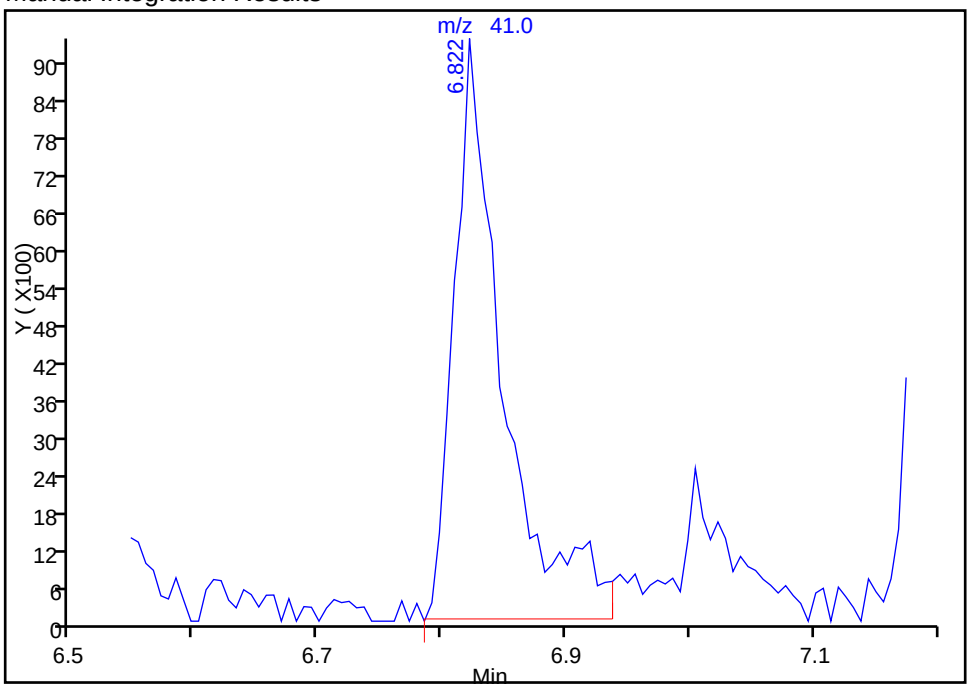
Processing Integration Results

RT: 7.20
Area: 44045
Amount: 865.8293
Amount Units: ng



Manual Integration Results

RT: 6.82
Area: 25495
Amount: 510.2903
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:03:31
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

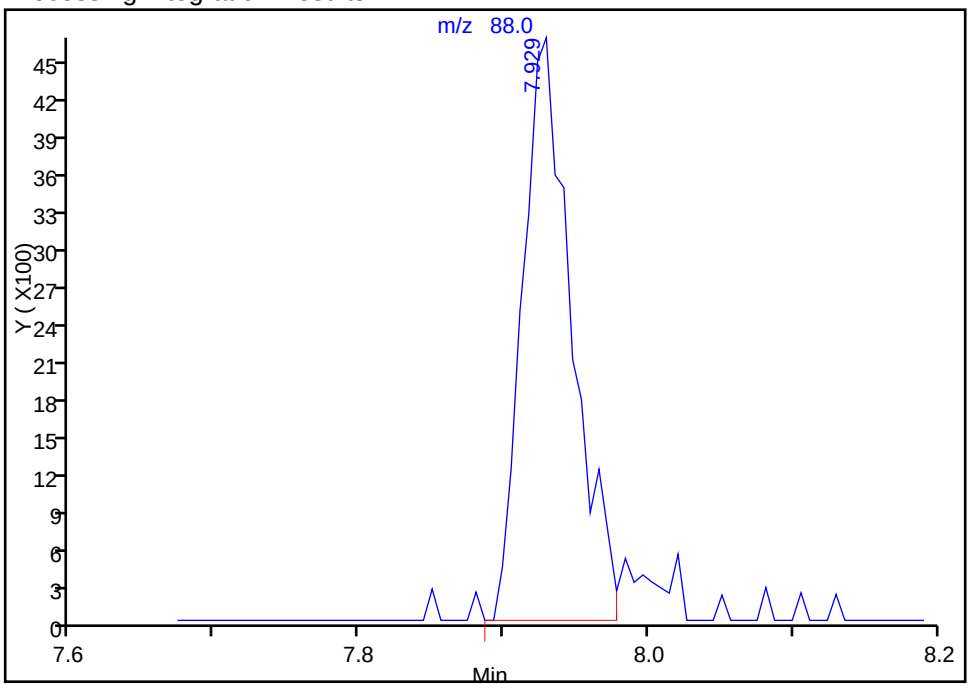
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017007.D				
Injection Date:	17-Oct-2016 14:48:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD5				
Client ID:					
Operator ID:	001562	ALS Bottle#:	7	Worklist Smp#:	7
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

65 1,4-Dioxane, CAS: 123-91-1

Signal: 1

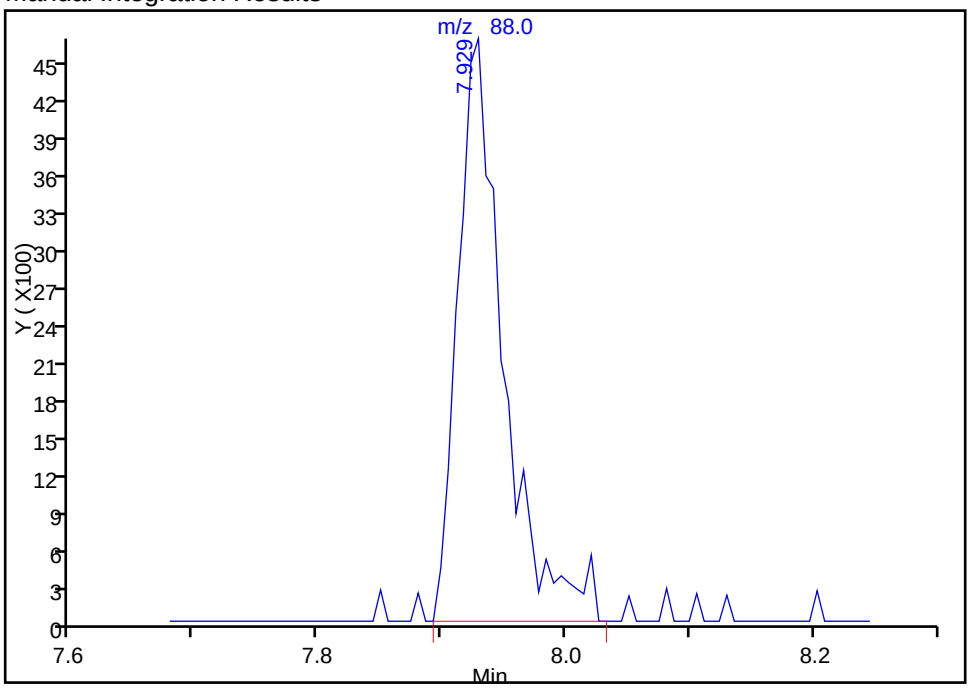
Processing Integration Results

RT: 7.93
Area: 11051
Amount: 537.9833
Amount Units: ng



Manual Integration Results

RT: 7.93
Area: 11953
Amount: 479.6305
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:03:31

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017008.D
Lims ID: ICIS VSTD10
Client ID:
Sample Type: ICIS Calib Level: 3
Inject. Date: 17-Oct-2016 15:12:30 ALS Bottle#: 8 Worklist Smp#: 8
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-008
Misc. Info.: ICIS VSTD10
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:27:01 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 11:22:25

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.150	4.150	0.000	88	120951	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.180	7.180	0.000	98	437855	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.294	10.294	0.000	84	110886	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.630	12.630	0.000	92	168505	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.449	6.449	0.000	58	96169	50.0	51.4	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.821	6.821	0.000	54	129293	50.0	51.1	
$ 7 Toluene-d8 (Surr)	98	8.834	8.834	0.000	92	436290	50.0	53.8	
$ 8 4-Bromofluorobenzene (Surr	95	11.474	11.474	0.000	87	160853	50.0	52.7	
11 Dichlorodifluoromethane	85	1.546	1.546	0.000	67	100117	50.0	50.2	
12 Chloromethane	50	1.698	1.698	0.000	99	127917	50.0	50.1	
13 Vinyl chloride	62	1.838	1.838	0.000	81	120442	50.0	51.6	
14 Butadiene	39	1.869	1.869	0.000	95	120959	50.0	49.5	
15 Bromomethane	94	2.167	2.167	0.000	92	55898	50.0	54.9	
16 Chloroethane	64	2.301	2.301	0.000	90	75481	50.0	51.1	
17 Dichlorofluoromethane	67	2.568	2.568	0.000	79	170966	50.0	50.6	
18 Trichlorofluoromethane	101	2.586	2.586	0.000	86	145521	50.0	52.0	
20 Ethyl ether	59	2.945	2.945	0.000	90	113477	50.0	49.7	
21 Acrolein	56	3.122	3.122	0.000	86	71951	150.0	147.6	
22 1,1-Dichloroethene	96	3.231	3.231	0.000	89	106083	50.0	49.3	
23 1,1,2-Trichloro-1,2,2-trif	101	3.298	3.298	0.000	92	109175	50.0	50.1	
24 Acetone	43	3.335	3.335	0.000	97	49176	100.0	94.1	
25 Iodomethane	142	3.420	3.420	0.000	98	158249	50.0	49.0	
26 Carbon disulfide	76	3.499	3.499	0.000	98	222248	50.0	46.4	
29 3-Chloro-1-propene	76	3.785	3.785	0.000	86	54473	50.0	45.6	
30 Methyl acetate	43	3.809	3.809	0.000	97	441720	250.0	242.4	
31 Methylene Chloride	84	3.998	3.998	0.000	88	131380	50.0	47.7	
32 2-Methyl-2-propanol	59	4.290	4.290	0.000	91	59253	500.0	482.2	
33 Acrylonitrile	53	4.399	4.399	0.000	98	484811	500.0	501.3	
34 trans-1,2-Dichloroethene	96	4.424	4.424	0.000	77	121103	50.0	50.1	
35 Methyl tert-butyl ether	73	4.454	4.454	0.000	90	235982	50.0	48.1	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.856	4.856	0.000	90	176837	50.0	50.3	
37 1,1-Dichloroethane	63	5.081	5.081	0.000	85	199401	50.0	49.4	
38 Vinyl acetate	43	5.129	5.129	0.000	97	169247	50.0	45.9	
42 2,2-Dichloropropane	97	5.835	5.835	0.000	49	20074	50.0	47.7	
43 cis-1,2-Dichloroethene	96	5.835	5.835	0.000	68	133878	50.0	49.5	
44 2-Butanone (MEK)	43	5.841	5.841	0.000	65	98637	100.0	99.4	
48 Chlorobromomethane	128	6.121	6.121	0.000	93	58511	50.0	48.1	
49 Tetrahydrofuran	42	6.139	6.139	0.000	92	73436	100.0	95.3	
50 Chloroform	83	6.267	6.267	0.000	79	184655	50.0	49.3	
51 1,1,1-Trichloroethane	97	6.425	6.425	0.000	92	105969	50.0	46.9	
52 Cyclohexane	56	6.498	6.498	0.000	92	208511	50.0	50.5	
53 Carbon tetrachloride	117	6.595	6.595	0.000	83	69572	50.0	46.1	
54 1,1-Dichloropropene	75	6.614	6.614	0.000	95	151638	50.0	50.0	
55 Isobutyl alcohol	41	6.827	6.827	0.000	40	56651	1250.0	1098.0	
56 Benzene	78	6.833	6.833	0.000	97	499441	50.0	51.3	
57 1,2-Dichloroethane	62	6.912	6.912	0.000	96	147481	50.0	47.6	
59 n-Heptane	43	7.198	7.198	0.000	86	147894	50.0	51.3	
61 Trichloroethene	130	7.569	7.569	0.000	93	117267	50.0	49.4	
63 Methylcyclohexane	83	7.806	7.806	0.000	89	201240	50.0	50.8	
64 1,2-Dichloropropane	63	7.843	7.843	0.000	93	122498	50.0	47.4	
67 Dibromomethane	93	7.928	7.928	0.000	94	68394	50.0	49.7	
65 1,4-Dioxane	88	7.934	7.934	0.000	33	24213	1000.0	940.9	
68 Dichlorobromomethane	83	8.129	8.129	0.000	92	92125	50.0	44.5	
70 2-Chloroethyl vinyl ether	63	8.433	8.433	0.000	92	153301	100.0	99.0	
71 cis-1,3-Dichloropropene	75	8.579	8.579	0.000	90	137183	50.0	47.8	
72 4-Methyl-2-pentanone (MIBK	43	8.731	8.731	0.000	70	203212	100.0	98.8	
73 Toluene	91	8.907	8.907	0.000	99	514268	50.0	51.7	
74 trans-1,3-Dichloropropene	75	9.157	9.157	0.000	83	102686	50.0	45.1	
75 Ethyl methacrylate	69	9.217	9.217	0.000	88	129247	50.0	47.6	
76 1,1,2-Trichloroethane	97	9.345	9.345	0.000	85	105449	50.0	49.6	
77 Tetrachloroethene	164	9.418	9.418	0.000	98	94839	50.0	49.5	
78 1,3-Dichloropropane	76	9.509	9.509	0.000	90	195279	50.0	49.3	
79 2-Hexanone	43	9.570	9.570	0.000	93	118005	100.0	95.8	
81 Chlorodibromomethane	129	9.722	9.722	0.000	86	59642	50.0	44.4	
82 Ethylene Dibromide	107	9.832	9.832	0.000	97	96912	50.0	50.6	
83 3-Chlorobenzotrifluoride	180	10.300	10.300	0.000	90	167458	50.0	50.7	
84 Chlorobenzene	112	10.319	10.319	0.000	91	351065	50.0	52.0	
85 4-Chlorobenzotrifluoride	180	10.386	10.386	0.000	96	156509	50.0	50.8	
86 1,1,1,2-Tetrachloroethane	131	10.416	10.416	0.000	36	68924	50.0	45.8	
87 Ethylbenzene	106	10.422	10.422	0.000	98	185657	50.0	51.0	
88 m-Xylene & p-Xylene	106	10.556	10.556	0.000	98	223813	50.0	50.7	
89 o-Xylene	106	10.933	10.933	0.000	96	215235	50.0	50.4	
90 Styrene	104	10.957	10.957	0.000	95	371224	50.0	52.4	
91 Bromoform	173	11.134	11.134	0.000	93	30972	50.0	46.8	
92 2-Chlorobenzotrifluoride	180	11.207	11.207	0.000	94	160946	50.0	50.5	
93 Isopropylbenzene	105	11.304	11.304	0.000	96	537055	50.0	52.8	
95 Bromobenzene	156	11.614	11.614	0.000	72	129517	50.0	47.5	
96 1,1,2,2-Tetrachloroethane	83	11.614	11.614	0.000	63	130544	50.0	48.6	
97 trans-1,4-Dichloro-2-buten	53	11.651	11.651	0.000	39	34064	50.0	48.2	
98 1,2,3-Trichloropropane	110	11.669	11.669	0.000	57	45534	50.0	49.7	
99 N-Propylbenzene	120	11.718	11.718	0.000	83	157081	50.0	49.6	
100 2-Chlorotoluene	126	11.803	11.803	0.000	96	140007	50.0	50.6	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.870	11.870	0.000	72	154015	50.0	51.4	
102 1,3,5-Trimethylbenzene	105	11.906	11.906	0.000	93	449655	50.0	51.6	
103 4-Chlorotoluene	126	11.931	11.931	0.000	97	146040	50.0	48.4	
104 tert-Butylbenzene	119	12.217	12.217	0.000	79	379337	50.0	51.4	
106 1,2,4-Trimethylbenzene	105	12.277	12.277	0.000	97	473012	50.0	52.3	
107 1,2-dichloro-4-(trifluorom	214	12.320	12.320	0.000	97	127792	50.0	50.0	
108 sec-Butylbenzene	105	12.436	12.436	0.000	94	561548	50.0	52.2	
109 1,3-Dichlorobenzene	146	12.551	12.551	0.000	87	263725	50.0	49.8	
110 4-Isopropyltoluene	119	12.594	12.594	0.000	79	478196	50.0	52.4	
111 1,4-Dichlorobenzene	146	12.661	12.661	0.000	95	274551	50.0	49.5	
113 2,4-Dichloro-1-(triflourom	214	12.691	12.691	0.000	88	122814	50.0	49.2	
114 2,5-Dichlorobenzotrifluori	214	12.728	12.728	0.000	97	136355	50.0	47.6	
116 n-Butylbenzene	91	13.001	13.001	0.000	98	421270	50.0	51.0	
117 1,2-Dichlorobenzene	146	13.014	13.014	0.000	91	258446	50.0	49.6	
118 1,2-Dibromo-3-Chloropropan	75	13.804	13.804	0.000	60	10924	50.0	43.2	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.944	13.944	0.000	98	636315	150.0	154.6	
121 2,3- & 3,4- Dichlorotoluen	125	14.358	14.358	0.000	98	466935	100.0	103.0	
122 1,2,4-Trichlorobenzene	180	14.626	14.626	0.000	92	173002	50.0	49.1	
123 Hexachlorobutadiene	225	14.778	14.778	0.000	91	58500	50.0	48.7	
124 Naphthalene	128	14.893	14.893	0.000	97	425875	50.0	50.7	
125 1,2,3-Trichlorobenzene	180	15.112	15.112	0.000	93	151403	50.0	48.9	
126 2,4,5-Trichlorotoluene	159	15.897	15.897	0.000	0	73389	50.0	50.4	
127 2,3,6-Trichlorotoluene	159	16.001	16.001	0.000	94	65323	50.0	48.1	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
S 130 1,2-Dichloroethene, Total	96				0		100.0	99.6	
S 131 Xylenes, Total	106				0		100.0	101.1	
S 132 1,3-Dichloropropene, Total	1				0		100.0	92.9	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Reagents:

VOA8260VOAPRI_00216	Amount Added:	2.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	2.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	2.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	2.00	Units: uL	
voaW2cleveRes_00002	Amount Added:	2.00	Units: uL	
voaWacro2ndRe_00007	Amount Added:	6.00	Units: uL	
VOA8260SURR_00060	Amount Added:	2.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent

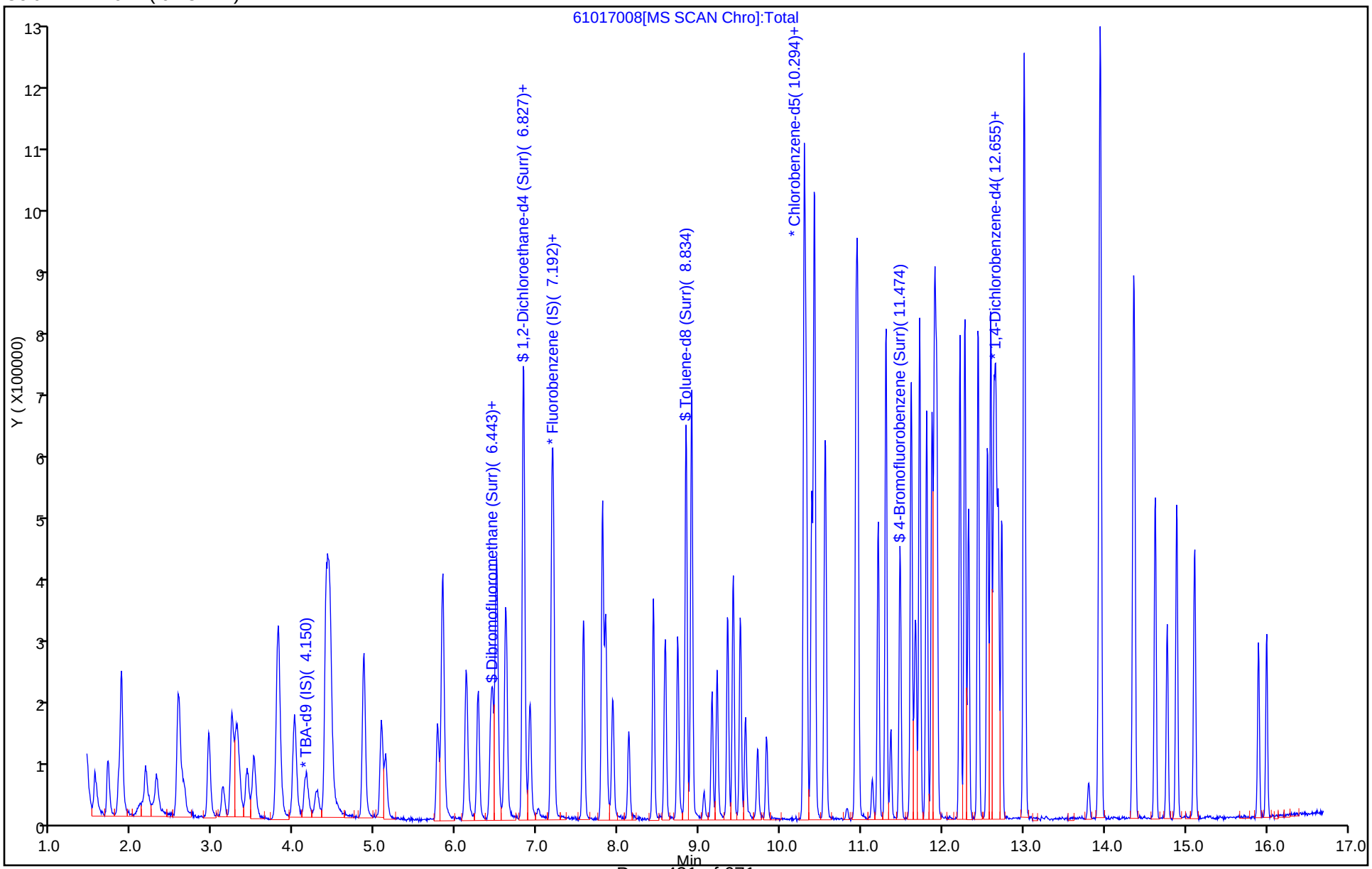
Report Date: 18-Oct-2016 11:27:03 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017008.D

Injection Date:	17-Oct-2016 15:12:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	ICIS VSTD10			Worklist Smp#:	8
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	8
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017009.D
Lims ID: IC VSTD15
Client ID:
Sample Type: IC Calib Level: 4
Inject. Date: 17-Oct-2016 15:36:30 ALS Bottle#: 9 Worklist Smp#: 9
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-009
Misc. Info.: IC VSTD15
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:23:24 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 10:04:37

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.148	4.148	0.000	90	120240	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.177	7.177	0.000	99	453127	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.292	10.292	0.000	86	111560	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.634	12.634	0.000	93	170658	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.453	6.453	0.000	93	134162	75.0	69.3	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.824	6.824	0.000	79	179010	75.0	68.4	
$ 7 Toluene-d8 (Surr)	98	8.838	8.838	0.000	92	584326	75.0	71.6	
$ 8 4-Bromofluorobenzene (Surr	95	11.478	11.478	0.000	89	225747	75.0	73.5	
11 Dichlorodifluoromethane	85	1.544	1.544	0.000	97	155219	75.0	75.3	
12 Chloromethane	50	1.702	1.702	0.000	99	192863	75.0	72.9	
13 Vinyl chloride	62	1.842	1.842	0.000	98	182050	75.0	75.4	
14 Butadiene	39	1.866	1.866	0.000	95	188411	75.0	74.6	
15 Bromomethane	94	2.170	2.170	0.000	92	83276	75.0	80.5	
16 Chloroethane	64	2.304	2.304	0.000	99	112107	75.0	73.3	
17 Dichlorofluoromethane	67	2.566	2.566	0.000	95	259098	75.0	74.0	
18 Trichlorofluoromethane	101	2.578	2.578	0.000	71	222716	75.0	76.9	
20 Ethyl ether	59	2.949	2.949	0.000	92	160856	75.0	68.1	
21 Acrolein	56	3.119	3.119	0.000	99	84463	175.0	167.4	
22 1,1-Dichloroethene	96	3.229	3.229	0.000	98	166080	75.0	74.6	
23 1,1,2-Trichloro-1,2,2-trif	101	3.284	3.284	0.000	94	168464	75.0	74.7	
24 Acetone	43	3.332	3.332	0.000	99	71745	150.0	132.7	
25 Iodomethane	142	3.418	3.418	0.000	97	241740	75.0	72.4	
26 Carbon disulfide	76	3.503	3.503	0.000	99	374705	75.0	75.6	
29 3-Chloro-1-propene	76	3.783	3.783	0.000	91	91556	75.0	74.0	
30 Methyl acetate	43	3.813	3.813	0.000	97	655356	375.0	347.5	
31 Methylene Chloride	84	4.008	4.008	0.000	94	199037	75.0	71.6	
32 2-Methyl-2-propanol	59	4.275	4.275	0.000	91	100509	750.0	822.8	
33 Acrylonitrile	53	4.397	4.397	0.000	99	718162	750.0	717.6	
34 trans-1,2-Dichloroethene	96	4.433	4.433	0.000	98	185288	75.0	74.0	
35 Methyl tert-butyl ether	73	4.446	4.446	0.000	97	383369	75.0	75.5	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.859	4.859	0.000	93	273365	75.0	75.1	
37 1,1-Dichloroethane	63	5.078	5.078	0.000	96	311510	75.0	74.6	
38 Vinyl acetate	43	5.133	5.133	0.000	97	273838	75.0	71.8	
42 2,2-Dichloropropane	97	5.833	5.833	0.000	52	34180	75.0	78.6	
43 cis-1,2-Dichloroethene	96	5.833	5.833	0.000	84	204711	75.0	73.1	
44 2-Butanone (MEK)	43	5.845	5.845	0.000	69	138742	150.0	135.1	
48 Chlorobromomethane	128	6.119	6.119	0.000	97	88514	75.0	70.4	
49 Tetrahydrofuran	42	6.131	6.131	0.000	90	106077	150.0	133.0	
50 Chloroform	83	6.265	6.265	0.000	94	283319	75.0	73.1	
51 1,1,1-Trichloroethane	97	6.429	6.429	0.000	99	182669	75.0	78.1	
52 Cyclohexane	56	6.496	6.496	0.000	92	325971	75.0	76.4	
53 Carbon tetrachloride	117	6.599	6.599	0.000	95	119292	75.0	76.4	
54 1,1-Dichloropropene	75	6.617	6.617	0.000	96	237861	75.0	75.8	
55 Isobutyl alcohol	41	6.824	6.824	0.000	52	87228	1875.0	1633.7	
56 Benzene	78	6.830	6.830	0.000	97	743305	75.0	73.8	
57 1,2-Dichloroethane	62	6.909	6.909	0.000	97	228341	75.0	71.1	
59 n-Heptane	43	7.195	7.195	0.000	91	218210	75.0	73.2	
61 Trichloroethene	130	7.573	7.573	0.000	96	178793	75.0	72.7	
63 Methylcyclohexane	83	7.804	7.804	0.000	89	313111	75.0	76.4	
64 1,2-Dichloropropane	63	7.846	7.846	0.000	95	190484	75.0	71.3	
67 Dibromomethane	93	7.931	7.931	0.000	97	104463	75.0	73.4	
65 1,4-Dioxane	88	7.931	7.931	0.000	44	35340	1500.0	1327.0	
68 Dichlorobromomethane	83	8.132	8.132	0.000	99	152191	75.0	71.0	
70 2-Chloroethyl vinyl ether	63	8.430	8.430	0.000	92	230498	150.0	143.9	
71 cis-1,3-Dichloropropene	75	8.576	8.576	0.000	95	213785	75.0	72.0	
72 4-Methyl-2-pentanone (MIBK	43	8.735	8.735	0.000	96	312902	150.0	151.2	
73 Toluene	91	8.905	8.905	0.000	99	775485	75.0	77.4	
74 trans-1,3-Dichloropropene	75	9.154	9.154	0.000	95	173904	75.0	75.9	
75 Ethyl methacrylate	69	9.215	9.215	0.000	89	209411	75.0	76.6	
76 1,1,2-Trichloroethane	97	9.349	9.349	0.000	91	159194	75.0	74.4	
77 Tetrachloroethene	164	9.416	9.416	0.000	98	146050	75.0	75.8	
78 1,3-Dichloropropane	76	9.507	9.507	0.000	92	293152	75.0	73.6	
79 2-Hexanone	43	9.568	9.568	0.000	95	188267	150.0	151.9	
81 Chlorodibromomethane	129	9.720	9.720	0.000	91	98975	75.0	73.3	
82 Ethylene Dibromide	107	9.830	9.830	0.000	97	147522	75.0	76.6	
83 3-Chlorobenzotrifluoride	180	10.298	10.298	0.000	93	252642	75.0	76.1	
84 Chlorobenzene	112	10.322	10.322	0.000	95	522084	75.0	76.8	
85 4-Chlorobenzotrifluoride	180	10.383	10.383	0.000	97	239254	75.0	77.2	
86 1,1,1,2-Tetrachloroethane	131	10.414	10.414	0.000	86	120798	75.0	79.9	
87 Ethylbenzene	106	10.420	10.420	0.000	98	285802	75.0	78.1	
88 m-Xylene & p-Xylene	106	10.553	10.553	0.000	98	354287	75.0	79.7	
89 o-Xylene	106	10.931	10.931	0.000	96	344432	75.0	80.2	
90 Styrene	104	10.955	10.955	0.000	96	568991	75.0	79.9	
91 Bromoform	173	11.131	11.131	0.000	96	53037	75.0	74.0	
92 2-Chlorobenzotrifluoride	180	11.210	11.210	0.000	97	255008	75.0	79.6	
93 Isopropylbenzene	105	11.302	11.302	0.000	96	822705	75.0	80.3	
95 Bromobenzene	156	11.612	11.612	0.000	96	203563	75.0	73.7	
96 1,1,2,2-Tetrachloroethane	83	11.618	11.618	0.000	94	206777	75.0	76.5	
97 trans-1,4-Dichloro-2-buten	53	11.655	11.655	0.000	69	50425	75.0	70.4	
98 1,2,3-Trichloropropane	110	11.673	11.673	0.000	89	66695	75.0	71.9	
99 N-Propylbenzene	120	11.721	11.721	0.000	98	249041	75.0	77.7	
100 2-Chlorotoluene	126	11.807	11.807	0.000	97	209155	75.0	74.7	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.867	11.867	0.000	94	227793	75.0	75.1	
102 1,3,5-Trimethylbenzene	105	11.904	11.904	0.000	97	687756	75.0	77.9	
103 4-Chlorotoluene	126	11.928	11.928	0.000	98	225430	75.0	73.8	
104 tert-Butylbenzene	119	12.214	12.214	0.000	93	582378	75.0	77.9	
106 1,2,4-Trimethylbenzene	105	12.275	12.275	0.000	97	705609	75.0	77.0	
107 1,2-dichloro-4-(trifluorom	214	12.324	12.324	0.000	98	194039	75.0	75.0	
108 sec-Butylbenzene	105	12.439	12.439	0.000	94	858280	75.0	78.8	
109 1,3-Dichlorobenzene	146	12.555	12.555	0.000	97	396160	75.0	73.9	
110 4-Isopropyltoluene	119	12.598	12.598	0.000	96	726665	75.0	78.6	
111 1,4-Dichlorobenzene	146	12.658	12.658	0.000	96	415232	75.0	73.9	
113 2,4-Dichloro-1-(triflourom	214	12.689	12.689	0.000	96	181186	75.0	71.7	
114 2,5-Dichlorobenzotrifluori	214	12.731	12.731	0.000	97	219078	75.0	75.6	
116 n-Butylbenzene	91	13.005	13.005	0.000	97	655671	75.0	78.4	
117 1,2-Dichlorobenzene	146	13.011	13.011	0.000	96	389316	75.0	73.8	
118 1,2-Dibromo-3-Chloropropan	75	13.802	13.808	-0.006	77	19664	75.0	76.8	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.948	13.948	0.000	99	961021	225.0	230.6	
121 2,3- & 3,4- Dichlorotoluen	125	14.362	14.362	0.000	98	700132	150.0	152.4	
122 1,2,4-Trichlorobenzene	180	14.623	14.623	0.000	94	266234	75.0	74.6	
123 Hexachlorobutadiene	225	14.775	14.775	0.000	97	90990	75.0	74.8	
124 Naphthalene	128	14.891	14.891	0.000	97	655837	75.0	77.2	
125 1,2,3-Trichlorobenzene	180	15.110	15.110	0.000	96	234780	75.0	74.9	
126 2,4,5-Trichlorotoluene	159	15.901	15.901	0.000	0	109739	75.0	74.4	
127 2,3,6-Trichlorotoluene	159	15.998	15.998	0.000	94	104364	75.0	75.9	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
S 130 1,2-Dichloroethene, Total	96				0		150.0	147.1	
S 131 Xylenes, Total	106				0		150.0	159.9	
S 132 1,3-Dichloropropene, Total	1				0		150.0	147.9	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Reagents:

VOA8260SURR_00060	Amount Added:	3.00	Units: uL	
VOA8260VOAPRI_00216	Amount Added:	3.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	3.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	3.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	3.00	Units: uL	
voaW2cleveRes_00002	Amount Added:	3.00	Units: uL	
voaWacro2ndRe_00007	Amount Added:	7.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent

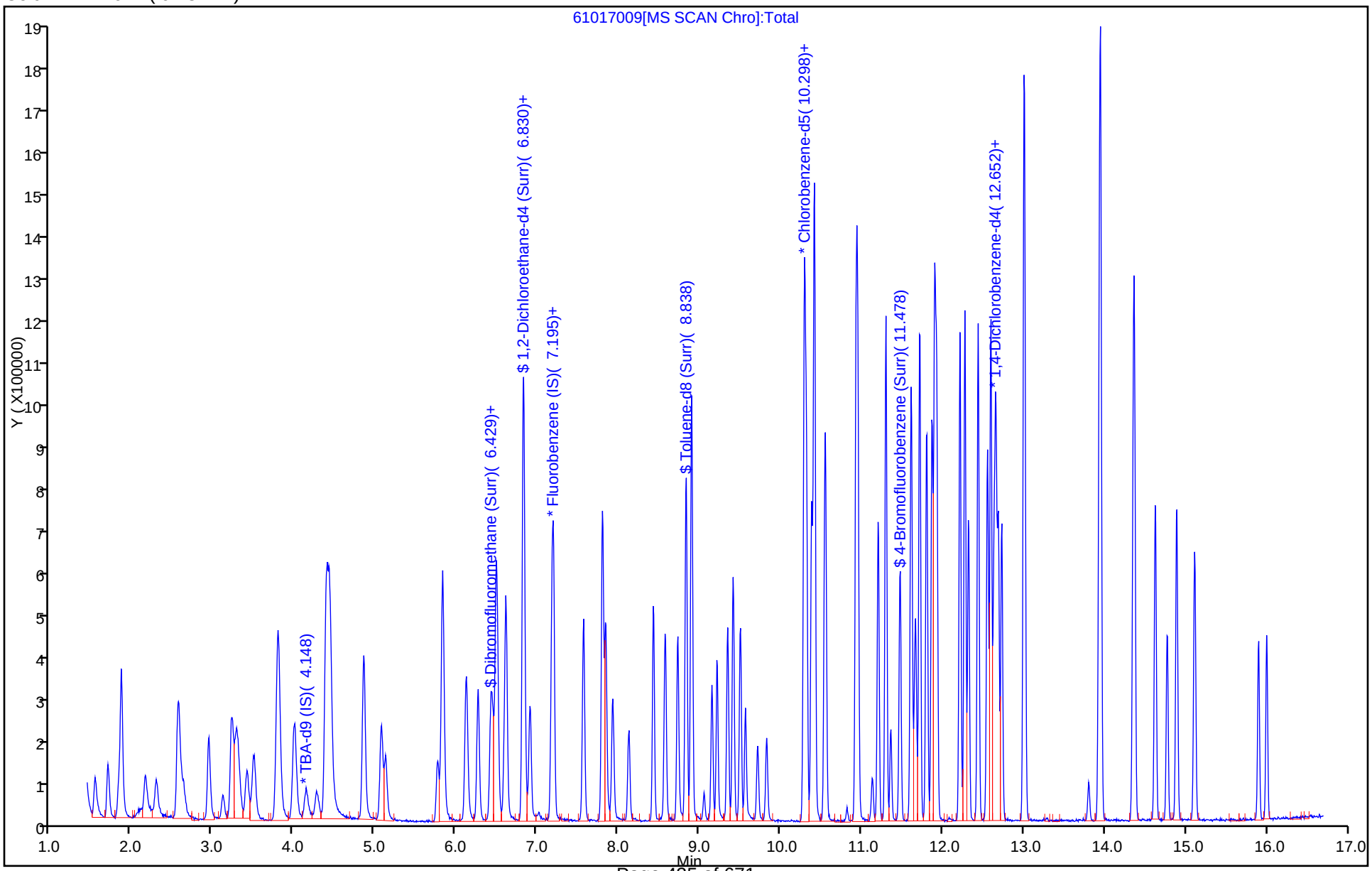
Report Date: 18-Oct-2016 11:23:28 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017009.D

Injection Date:	17-Oct-2016 15:36:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	IC VSTD15			Worklist Smp#:	9
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	9
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017010.D
Lims ID: IC VSTD20
Client ID:
Sample Type: IC Calib Level: 5
Inject. Date: 17-Oct-2016 16:01:30 ALS Bottle#: 10 Worklist Smp#: 10
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-010
Misc. Info.: IC VSTD20
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:23:31 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 10:05:08

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.150	4.148	0.002	92	139066	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.180	7.177	0.003	99	451403	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.294	10.292	0.002	87	114230	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.637	12.634	0.003	94	171707	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.450	6.453	-0.003	92	185587	100.0	96.3	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.821	6.824	-0.003	77	244733	100.0	93.8	
$ 7 Toluene-d8 (Surr)	98	8.834	8.838	-0.004	93	825990	100.0	98.9	
$ 8 4-Bromofluorobenzene (Surr	95	11.475	11.478	-0.003	88	324431	100.0	103.1	
11 Dichlorodifluoromethane	85	1.540	1.544	-0.004	99	199392	100.0	97.1	
12 Chloromethane	50	1.699	1.702	-0.004	99	254110	100.0	96.5	
13 Vinyl chloride	62	1.838	1.842	-0.004	99	234479	100.0	97.5	
14 Butadiene	39	1.869	1.866	0.003	92	249033	100.0	98.9	
15 Bromomethane	94	2.161	2.170	-0.009	91	103957	100.0	101.6	
16 Chloroethane	64	2.295	2.304	-0.009	98	143903	100.0	94.4	
17 Dichlorofluoromethane	67	2.562	2.566	-0.004	95	335318	100.0	96.2	
18 Trichlorofluoromethane	101	2.568	2.578	-0.010	83	286516	100.0	99.3	
20 Ethyl ether	59	2.940	2.949	-0.009	93	226945	100.0	96.5	
21 Acrolein	56	3.116	3.119	-0.003	98	99424	200.0	197.8	
22 1,1-Dichloroethene	96	3.225	3.229	-0.004	97	215759	100.0	97.3	
23 1,1,2-Trichloro-1,2,2-trif	101	3.286	3.284	0.002	94	222211	100.0	98.9	
24 Acetone	43	3.329	3.332	-0.003	100	99571	200.0	184.8	
25 Iodomethane	142	3.414	3.418	-0.004	98	323779	100.0	97.3	
26 Carbon disulfide	76	3.499	3.503	-0.004	99	525000	100.0	106.3	
29 3-Chloro-1-propene	76	3.785	3.783	0.002	92	126033	100.0	102.3	
30 Methyl acetate	43	3.809	3.813	-0.004	97	896631	500.0	477.2	
31 Methylene Chloride	84	4.004	4.008	-0.004	93	271253	100.0	99.4	
32 2-Methyl-2-propanol	59	4.272	4.275	-0.003	91	139826	1000.0	989.7	
33 Acrylonitrile	53	4.393	4.397	-0.004	99	971547	1000.0	974.5	
34 trans-1,2-Dichloroethene	96	4.430	4.433	-0.003	99	245768	100.0	98.6	
35 Methyl tert-butyl ether	73	4.442	4.446	-0.004	97	505912	100.0	100.1	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.856	4.859	-0.003	91	354786	100.0	97.9	
37 1,1-Dichloroethane	63	5.075	5.078	-0.003	96	406664	100.0	97.7	
38 Vinyl acetate	43	5.130	5.133	-0.003	97	397309	100.0	104.5	
42 2,2-Dichloropropane	97	5.829	5.833	-0.004	54	43091	100.0	99.4	
43 cis-1,2-Dichloroethene	96	5.835	5.833	0.002	80	274481	100.0	98.4	
44 2-Butanone (MEK)	43	5.847	5.845	0.002	100	192377	200.0	188.0	
48 Chlorobromomethane	128	6.115	6.119	-0.004	98	124956	100.0	99.7	
49 Tetrahydrofuran	42	6.133	6.131	0.002	89	147123	200.0	185.1	
50 Chloroform	83	6.267	6.265	0.002	94	378117	100.0	97.9	
51 1,1,1-Trichloroethane	97	6.425	6.429	-0.004	97	234557	100.0	100.7	
52 Cyclohexane	56	6.492	6.496	-0.004	92	427162	100.0	100.4	
53 Carbon tetrachloride	117	6.596	6.599	-0.003	96	160232	100.0	102.9	
54 1,1-Dichloropropene	75	6.614	6.617	-0.003	97	313440	100.0	100.2	
55 Isobutyl alcohol	41	6.827	6.824	0.003	44	130717	2500.0	2457.6	
56 Benzene	78	6.833	6.830	0.003	97	975189	100.0	97.1	
57 1,2-Dichloroethane	62	6.912	6.909	0.003	97	307797	100.0	96.3	
59 n-Heptane	43	7.198	7.195	0.003	91	290989	100.0	98.0	
61 Trichloroethene	130	7.569	7.573	-0.004	98	241168	100.0	98.5	
63 Methylcyclohexane	83	7.806	7.804	0.002	88	409562	100.0	100.3	
64 1,2-Dichloropropane	63	7.843	7.846	-0.003	94	253000	100.0	95.0	
67 Dibromomethane	93	7.928	7.931	-0.003	98	138282	100.0	97.6	
65 1,4-Dioxane	88	7.928	7.931	-0.003	43	49945	2000.0	1882.5	M
68 Dichlorobromomethane	83	8.129	8.132	-0.003	99	217329	100.0	101.8	
70 2-Chloroethyl vinyl ether	63	8.433	8.430	0.003	91	316024	200.0	198.0	
71 cis-1,3-Dichloropropene	75	8.573	8.576	-0.003	95	317933	100.0	107.5	
72 4-Methyl-2-pentanone (MIBK	43	8.731	8.735	-0.003	96	437594	200.0	206.5	
73 Toluene	91	8.901	8.905	-0.004	98	1017095	100.0	99.2	
74 trans-1,3-Dichloropropene	75	9.157	9.154	0.003	95	250101	100.0	106.6	
75 Ethyl methacrylate	69	9.218	9.215	0.003	89	307910	100.0	110.1	
76 1,1,2-Trichloroethane	97	9.352	9.349	0.003	91	220068	100.0	100.4	
77 Tetrachloroethene	164	9.412	9.416	-0.004	99	192418	100.0	97.6	
78 1,3-Dichloropropane	76	9.504	9.507	-0.003	91	401017	100.0	98.4	
79 2-Hexanone	43	9.564	9.568	-0.004	95	252132	200.0	198.7	
81 Chlorodibromomethane	129	9.717	9.720	-0.004	90	146523	100.0	106.0	
82 Ethylene Dibromide	107	9.832	9.830	0.002	98	205355	100.0	104.1	
83 3-Chlorobenzotrifluoride	180	10.301	10.298	0.003	94	342084	100.0	100.6	
84 Chlorobenzene	112	10.319	10.322	-0.003	95	685552	100.0	98.5	
85 4-Chlorobenzotrifluoride	180	10.386	10.383	0.003	97	320957	100.0	101.2	
86 1,1,1,2-Tetrachloroethane	131	10.416	10.414	0.002	88	166796	100.0	107.7	
87 Ethylbenzene	106	10.422	10.420	0.002	98	377626	100.0	100.8	
88 m-Xylene & p-Xylene	106	10.550	10.553	-0.003	98	469943	100.0	103.3	
89 o-Xylene	106	10.933	10.931	0.002	95	458418	100.0	104.2	
90 Styrene	104	10.958	10.955	0.003	96	774114	100.0	106.1	
91 Bromoform	173	11.134	11.131	0.003	95	78027	100.0	100.8	
92 2-Chlorobenzotrifluoride	180	11.207	11.210	-0.003	96	331627	100.0	101.1	
93 Isopropylbenzene	105	11.304	11.302	0.002	96	1074317	100.0	102.4	
95 Bromobenzene	156	11.615	11.612	0.003	97	278887	100.0	100.3	
96 1,1,2,2-Tetrachloroethane	83	11.615	11.618	-0.003	95	277556	100.0	100.3	
97 trans-1,4-Dichloro-2-buten	53	11.651	11.655	-0.004	74	71740	100.0	99.6	
98 1,2,3-Trichloropropane	110	11.669	11.673	-0.004	87	92976	100.0	99.6	
99 N-Propylbenzene	120	11.718	11.721	-0.003	98	328458	100.0	101.8	
100 2-Chlorotoluene	126	11.803	11.807	-0.004	97	289491	100.0	102.8	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.870	11.867	0.003	95	308307	100.0	101.0	
102 1,3,5-Trimethylbenzene	105	11.900	11.904	-0.004	95	907748	100.0	102.2	
103 4-Chlorotoluene	126	11.931	11.928	0.003	97	311605	100.0	101.4	
104 tert-Butylbenzene	119	12.217	12.214	0.003	93	774274	100.0	102.9	
106 1,2,4-Trimethylbenzene	105	12.278	12.275	0.003	97	937826	100.0	101.7	
107 1,2-dichloro-4-(trifluorom	214	12.320	12.324	-0.004	98	259663	100.0	99.7	
108 sec-Butylbenzene	105	12.442	12.439	0.003	94	1116611	100.0	101.9	
109 1,3-Dichlorobenzene	146	12.557	12.555	0.002	97	536874	100.0	99.5	
110 4-Isopropyltoluene	119	12.594	12.598	-0.004	96	942198	100.0	101.3	
111 1,4-Dichlorobenzene	146	12.661	12.658	0.003	94	551119	100.0	97.5	
113 2,4-Dichloro-1-(triflourom	214	12.691	12.689	0.002	96	255147	100.0	100.3	
114 2,5-Dichlorobenzotrifluori	214	12.734	12.731	0.003	98	282871	100.0	97.0	
116 n-Butylbenzene	91	13.002	13.005	-0.003	97	860909	100.0	102.3	
117 1,2-Dichlorobenzene	146	13.014	13.011	0.003	96	525389	100.0	99.0	
118 1,2-Dibromo-3-Chloropropan	75	13.805	13.808	-0.003	78	29140	100.0	113.1	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.945	13.948	-0.004	98	1283654	300.0	306.1	
121 2,3- & 3,4- Dichlorotoluen	125	14.364	14.362	0.002	98	945407	200.0	204.6	
122 1,2,4-Trichlorobenzene	180	14.626	14.623	0.003	94	360686	100.0	100.5	
123 Hexachlorobutadiene	225	14.772	14.775	-0.003	98	117388	100.0	96.0	
124 Naphthalene	128	14.887	14.891	-0.004	97	895652	100.0	104.7	
125 1,2,3-Trichlorobenzene	180	15.113	15.110	0.003	95	318943	100.0	101.1	
126 2,4,5-Trichlorotoluene	159	15.897	15.901	-0.004	0	165986	100.0	111.9	
127 2,3,6-Trichlorotoluene	159	16.001	15.998	0.003	94	148017	100.0	107.1	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
S 130 1,2-Dichloroethene, Total	96				0		200.0	197.0	
S 131 Xylenes, Total	106				0		200.0	207.5	
S 132 1,3-Dichloropropene, Total	1				0		200.0	214.1	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWacro2ndRe_00007	Amount Added:	8.00	Units: uL	
VOA8260SURR_00060	Amount Added:	4.00	Units: uL	
VOA8260VOAPRI_00216	Amount Added:	4.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	4.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	4.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	4.00	Units: uL	
voaW2cleveRes_00002	Amount Added:	4.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent

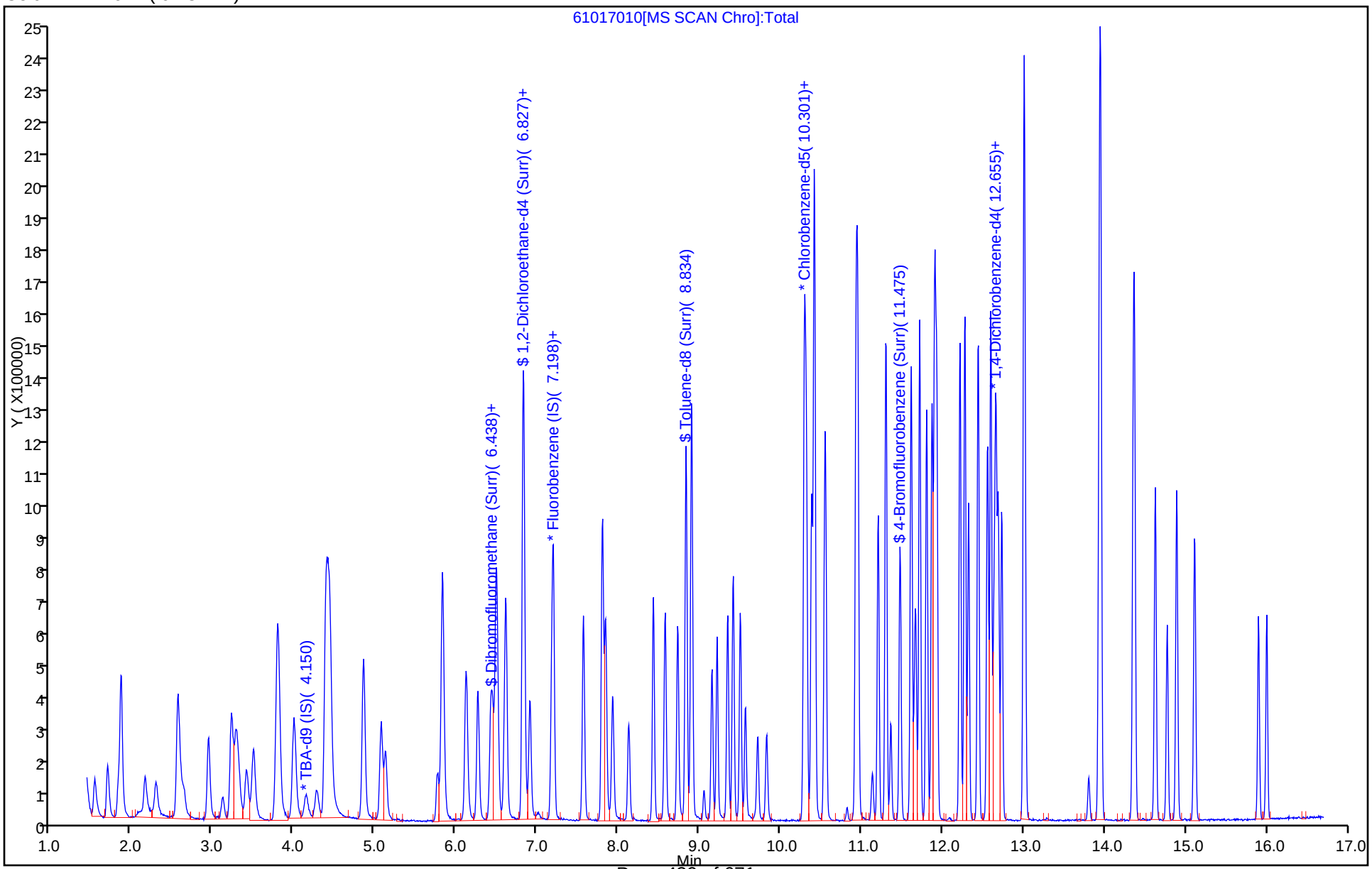
Report Date: 18-Oct-2016 11:23:34 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017010.D

Injection Date:	17-Oct-2016 16:01:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	IC VSTD20			Worklist Smp#:	10
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	10
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

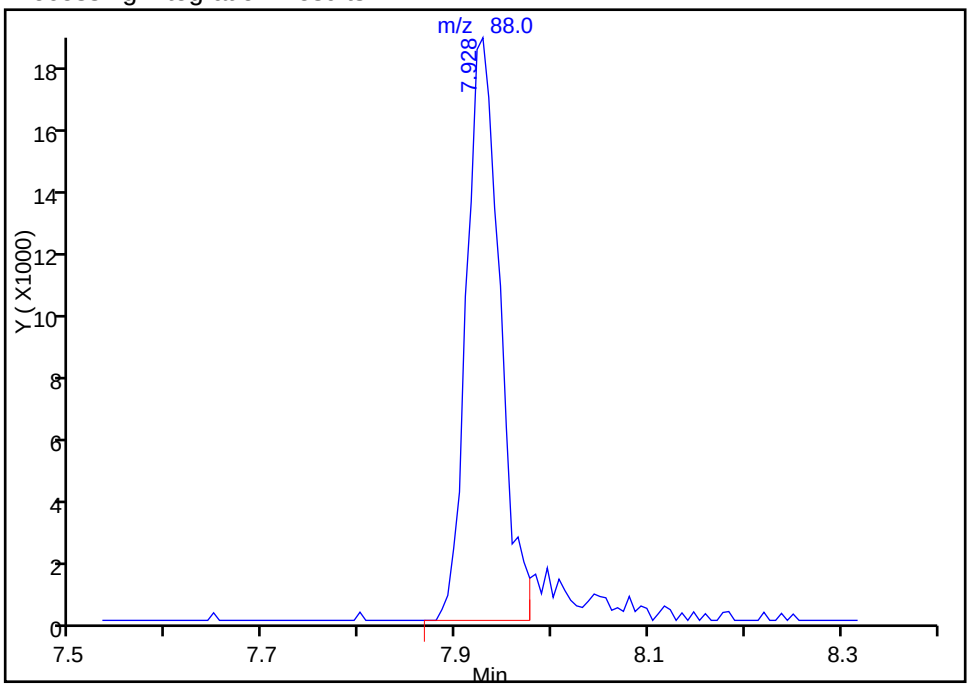
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017010.D				
Injection Date:	17-Oct-2016 16:01:30	Instrument ID:	CHHP6		
Lims ID:	IC VSTD20				
Client ID:					
Operator ID:	001562	ALS Bottle#:	10	Worklist Smp#:	10
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

65 1,4-Dioxane, CAS: 123-91-1

Signal: 1

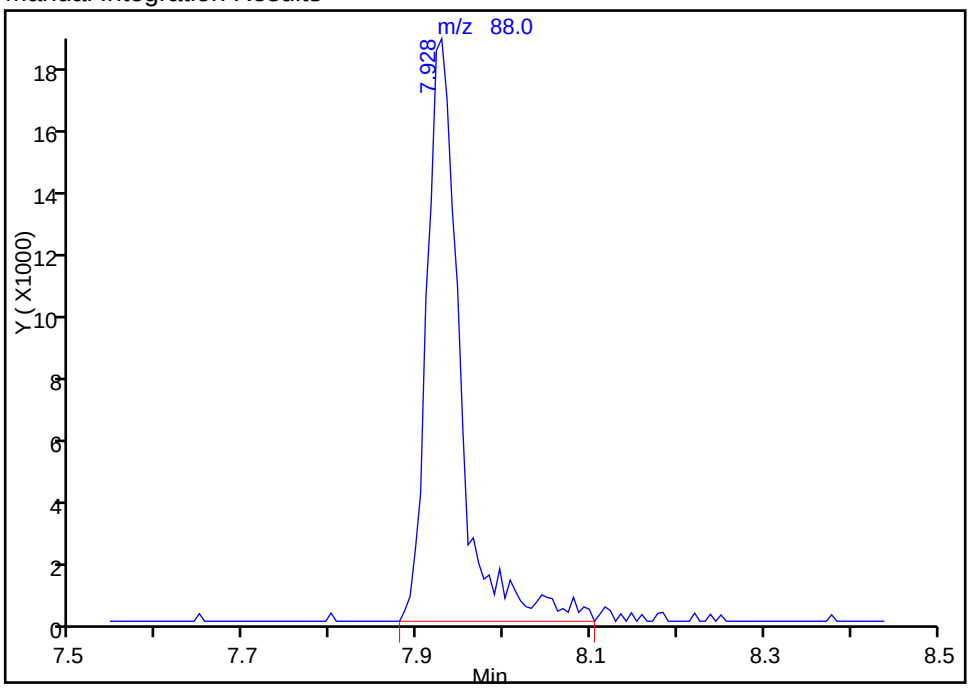
Processing Integration Results

RT: 7.93
Area: 44725
Amount: 2019.8377
Amount Units: ng



Manual Integration Results

RT: 7.93
Area: 49945
Amount: 1882.5028
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:09:53

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017012.D
Lims ID: IC VSTD40
Client ID:
Sample Type: IC Calib Level: 7
Inject. Date: 17-Oct-2016 16:49:30 ALS Bottle#: 12 Worklist Smp#: 12
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-012
Misc. Info.: IC VSTD40
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:23:38 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 09:28:33

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.151	4.148	0.003	90	145569	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.180	7.177	0.003	99	429506	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.289	10.292	-0.003	84	117125	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.631	12.634	-0.003	93	163439	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.450	6.453	-0.003	93	374833	200.0	204.4	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.821	6.824	-0.003	77	487373	200.0	196.4	
$ 7 Toluene-d8 (Surr)	98	8.835	8.838	-0.003	93	1549248	200.0	180.8	
$ 8 4-Bromofluorobenzene (Surr	95	11.475	11.478	-0.003	87	640890	200.0	198.7	
11 Dichlorodifluoromethane	85	1.541	1.544	-0.003	99	378244	200.0	193.5	
12 Chloromethane	50	1.705	1.702	0.003	99	491486	200.0	196.1	
13 Vinyl chloride	62	1.845	1.842	0.003	99	426204	200.0	186.2	
14 Butadiene	39	1.869	1.866	0.003	93	443777	200.0	185.3	
15 Bromomethane	94	2.161	2.170	-0.009	92	182317	200.0	190.0	
16 Chloroethane	64	2.301	2.304	-0.003	99	282905	200.0	195.1	
17 Dichlorofluoromethane	67	2.575	2.566	0.009	96	646552	200.0	194.9	
18 Trichlorofluoromethane	101	2.581	2.578	0.003	73	505956	200.0	184.3	
20 Ethyl ether	59	2.946	2.949	-0.003	93	424510	200.0	189.6	
21 Acrolein	56	3.117	3.119	-0.002	99	124997	250.0	261.4	
22 1,1-Dichloroethene	96	3.220	3.229	-0.009	98	424212	200.0	201.0	
23 1,1,2-Trichloro-1,2,2-trif	101	3.305	3.284	0.021	93	410013	200.0	191.8	
24 Acetone	43	3.330	3.332	-0.002	99	213338	400.0	416.2	
25 Iodomethane	142	3.409	3.418	-0.009	97	637925	200.0	201.5	
26 Carbon disulfide	76	3.494	3.503	-0.009	100	1067872	200.0	227.2	
29 3-Chloro-1-propene	76	3.780	3.783	-0.003	92	261792	200.0	223.4	
30 Methyl acetate	43	3.810	3.813	-0.003	97	1829691	1000.0	1023.4	
31 Methylene Chloride	84	3.999	4.008	-0.009	94	536396	200.0	210.7	
32 2-Methyl-2-propanol	59	4.285	4.275	0.010	92	301487	2000.0	2038.6	
33 Acrylonitrile	53	4.394	4.397	-0.003	99	1951122	2000.0	2056.8	
34 trans-1,2-Dichloroethene	96	4.425	4.433	-0.008	99	477780	200.0	201.4	
35 Methyl tert-butyl ether	73	4.449	4.446	0.003	98	1048549	200.0	218.0	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.856	4.859	-0.003	91	681626	200.0	197.7	
37 1,1-Dichloroethane	63	5.075	5.078	-0.003	96	815765	200.0	206.0	
38 Vinyl acetate	43	5.130	5.133	-0.003	97	848933	200.0	234.7	
42 2,2-Dichloropropane	97	5.830	5.833	-0.003	84	87561	200.0	212.3	
43 cis-1,2-Dichloroethene	96	5.830	5.833	-0.003	81	540467	200.0	203.6	
44 2-Butanone (MEK)	43	5.848	5.845	0.003	99	399161	400.0	409.9	
48 Chlorobromomethane	128	6.122	6.119	0.003	97	250455	200.0	210.1	
49 Tetrahydrofuran	42	6.128	6.131	-0.003	91	322508	400.0	426.5	
50 Chloroform	83	6.268	6.265	0.003	94	740796	200.0	201.5	
51 1,1,1-Trichloroethane	97	6.426	6.429	-0.003	98	470282	200.0	212.1	
52 Cyclohexane	56	6.493	6.496	-0.003	92	822246	200.0	203.2	
53 Carbon tetrachloride	117	6.596	6.599	-0.003	96	336776	200.0	227.4	
54 1,1-Dichloropropene	75	6.615	6.617	-0.002	95	597892	200.0	200.9	
55 Isobutyl alcohol	41	6.828	6.824	0.004	87	307377	5000.0	6073.5	
56 Benzene	78	6.834	6.830	0.004	98	1842451	200.0	192.9	
57 1,2-Dichloroethane	62	6.907	6.909	-0.002	96	622020	200.0	204.5	
59 n-Heptane	43	7.199	7.195	0.004	90	574146	200.0	203.2	
61 Trichloroethene	130	7.570	7.573	-0.003	97	472890	200.0	202.9	
63 Methylcyclohexane	83	7.801	7.804	-0.003	88	786142	200.0	202.3	
64 1,2-Dichloropropane	63	7.843	7.846	-0.003	95	530080	200.0	209.2	
67 Dibromomethane	93	7.929	7.931	-0.002	97	288225	200.0	213.7	
65 1,4-Dioxane	88	7.929	7.931	-0.002	57	110995	4000.0	4396.9	M
68 Dichlorobromomethane	83	8.129	8.132	-0.003	99	474319	200.0	233.4	
70 2-Chloroethyl vinyl ether	63	8.434	8.430	0.004	92	692602	400.0	456.0	
71 cis-1,3-Dichloropropene	75	8.573	8.576	-0.003	95	689681	200.0	245.1	
72 4-Methyl-2-pentanone (MIBK	43	8.732	8.735	-0.002	95	917167	400.0	422.2	
73 Toluene	91	8.902	8.905	-0.003	97	1917420	200.0	182.4	
74 trans-1,3-Dichloropropene	75	9.157	9.154	0.003	95	591828	200.0	246.1	
75 Ethyl methacrylate	69	9.218	9.215	0.003	89	679063	200.0	236.7	
76 1,1,2-Trichloroethane	97	9.346	9.349	-0.003	92	450576	200.0	200.5	
77 Tetrachloroethene	164	9.419	9.416	0.003	96	372914	200.0	184.4	
78 1,3-Dichloropropane	76	9.504	9.507	-0.003	91	819178	200.0	196.0	
79 2-Hexanone	43	9.565	9.568	-0.003	96	575173	400.0	442.1	
81 Chlorodibromomethane	129	9.717	9.720	-0.003	91	331692	200.0	234.0	
82 Ethylene Dibromide	107	9.833	9.830	0.003	99	431843	200.0	213.6	
83 3-Chlorobenzotrifluoride	180	10.301	10.298	0.003	94	661345	200.0	189.7	
84 Chlorobenzene	112	10.319	10.322	-0.003	93	1326603	200.0	185.9	
85 4-Chlorobenzotrifluoride	180	10.386	10.383	0.003	96	629550	200.0	193.5	
86 1,1,1,2-Tetrachloroethane	131	10.417	10.414	0.003	91	370091	200.0	233.1	
87 Ethylbenzene	106	10.423	10.420	0.003	97	737491	200.0	191.9	
88 m-Xylene & p-Xylene	106	10.551	10.553	-0.002	97	912180	200.0	195.5	
89 o-Xylene	106	10.934	10.931	0.003	96	896798	200.0	198.9	
90 Styrene	104	10.952	10.955	-0.003	95	1489206	200.0	199.1	
91 Bromoform	173	11.135	11.131	0.004	95	186999	200.0	202.0	
92 2-Chlorobenzotrifluoride	180	11.208	11.210	-0.002	97	667562	200.0	198.5	
93 Isopropylbenzene	105	11.299	11.302	-0.003	97	1991060	200.0	185.2	
95 Bromobenzene	156	11.615	11.612	0.003	98	557168	200.0	210.6	
96 1,1,2,2-Tetrachloroethane	83	11.615	11.618	-0.003	94	576728	200.0	203.2	
97 trans-1,4-Dichloro-2-buten	53	11.652	11.655	-0.003	81	159455	200.0	232.6	
98 1,2,3-Trichloropropane	110	11.670	11.673	-0.003	88	194495	200.0	218.8	
99 N-Propylbenzene	120	11.719	11.721	-0.002	97	640794	200.0	208.7	
100 2-Chlorotoluene	126	11.804	11.807	-0.003	97	567599	200.0	211.7	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.871	11.867	0.004	94	622267	200.0	214.1	
102 1,3,5-Trimethylbenzene	105	11.901	11.904	-0.003	97	1683074	200.0	199.1	
103 4-Chlorotoluene	126	11.925	11.928	-0.003	97	603912	200.0	206.4	
104 tert-Butylbenzene	119	12.217	12.214	0.003	93	1428342	200.0	199.4	
106 1,2,4-Trimethylbenzene	105	12.278	12.275	0.003	97	1762909	200.0	200.8	
107 1,2-dichloro-4-(trifluorom	214	12.321	12.324	-0.003	97	507998	200.0	204.9	
108 sec-Butylbenzene	105	12.436	12.439	-0.003	95	1998910	200.0	191.7	
109 1,3-Dichlorobenzene	146	12.552	12.555	-0.003	96	1032823	200.0	201.0	
110 4-Isopropyltoluene	119	12.595	12.598	-0.003	95	1751779	200.0	197.8	
111 1,4-Dichlorobenzene	146	12.662	12.658	0.004	92	1074021	200.0	199.6	
113 2,4-Dichloro-1-(triflourom	214	12.692	12.689	0.003	96	498793	200.0	206.0	
114 2,5-Dichlorobenzotrifluori	214	12.735	12.731	0.004	98	555657	200.0	200.1	
116 n-Butylbenzene	91	13.002	13.005	-0.003	96	1586792	200.0	198.1	
117 1,2-Dichlorobenzene	146	13.014	13.011	0.003	94	1010481	200.0	200.0	
118 1,2-Dibromo-3-Chloropropan	75	13.805	13.808	-0.003	81	71842	200.0	292.8	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.945	13.948	-0.003	98	2411828	600.0	604.2	
121 2,3- & 3,4- Dichlorotoluen	125	14.365	14.362	0.003	97	1814435	400.0	412.5	
122 1,2,4-Trichlorobenzene	180	14.627	14.623	0.003	94	728230	200.0	213.1	
123 Hexachlorobutadiene	225	14.773	14.775	-0.003	97	239421	200.0	205.6	
124 Naphthalene	128	14.888	14.891	-0.003	98	1754190	200.0	215.5	
125 1,2,3-Trichlorobenzene	180	15.113	15.110	0.003	97	637531	200.0	212.2	
126 2,4,5-Trichlorotoluene	159	15.898	15.901	-0.003	0	326073	200.0	230.9	
127 2,3,6-Trichlorotoluene	159	16.001	15.998	0.003	94	296296	200.0	225.1	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
S 130 1,2-Dichloroethene, Total	96				0		400.0	405.1	
S 131 Xylenes, Total	106				0		400.0	394.4	
S 132 1,3-Dichloropropene, Total	1				0		400.0	491.1	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

voaWacro2ndRe_00007	Amount Added:	10.00	Units: uL	
VOA8260SURR_00060	Amount Added:	8.00	Units: uL	
VOA8260VOAPRI_00216	Amount Added:	8.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	8.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	8.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	8.00	Units: uL	
voaW2cleveRes_00002	Amount Added:	8.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent

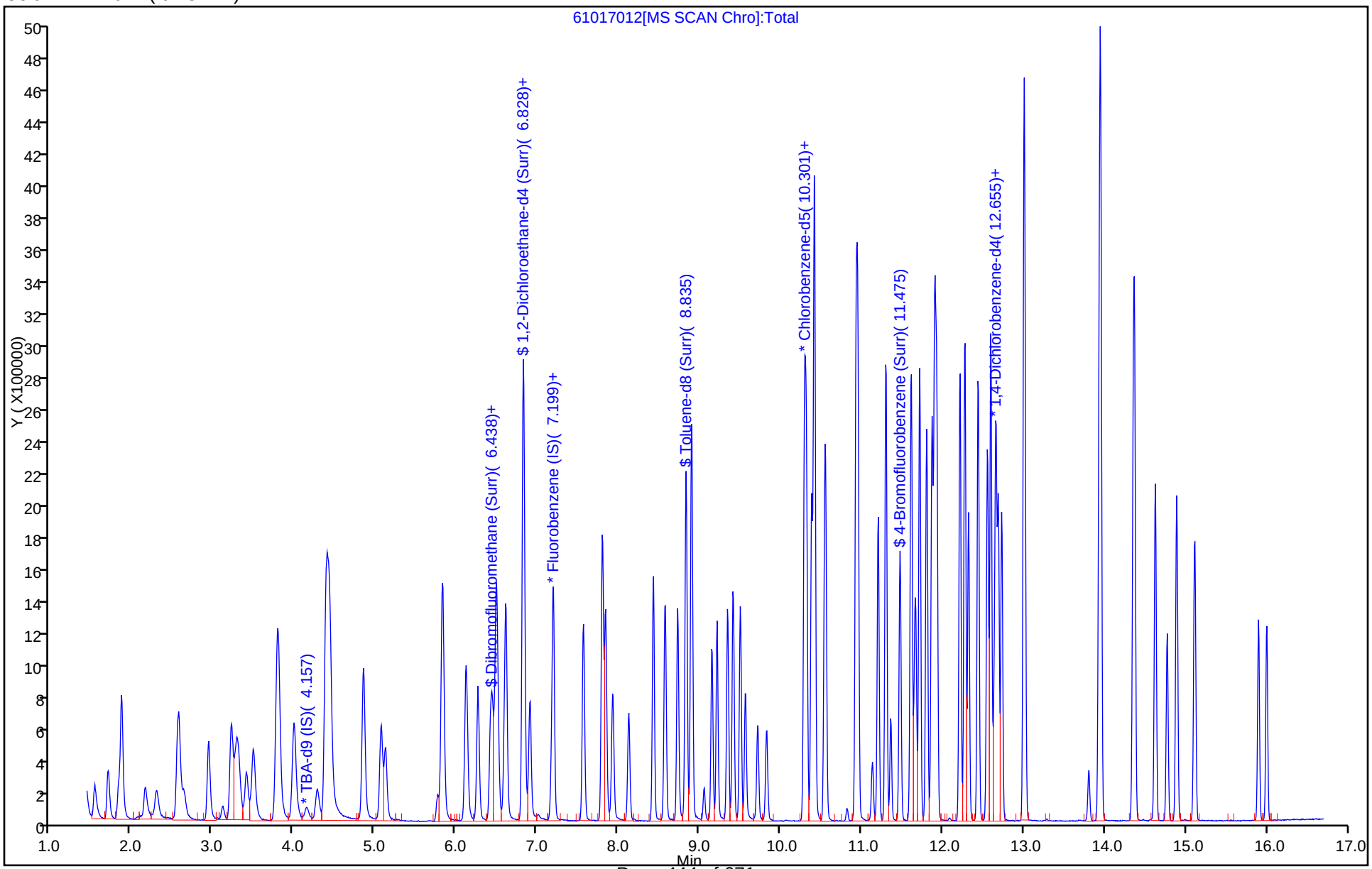
Report Date: 18-Oct-2016 11:23:40 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017012.D

Injection Date:	17-Oct-2016 16:49:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	IC VSTD40			Worklist Smp#:	12
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	12
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

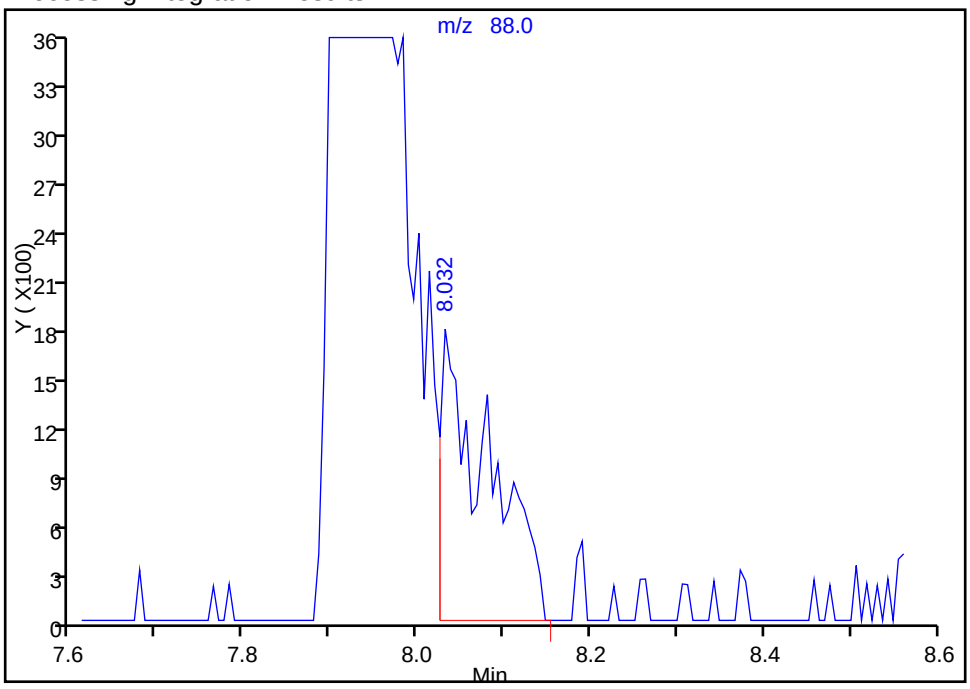
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017012.D
Injection Date: 17-Oct-2016 16:49:30 Instrument ID: CHHP6
Lims ID: IC VSTD40
Client ID:
Operator ID: 001562 ALS Bottle#: 12 Worklist Smp#: 12
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP6 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

65 1,4-Dioxane, CAS: 123-91-1

Signal: 1

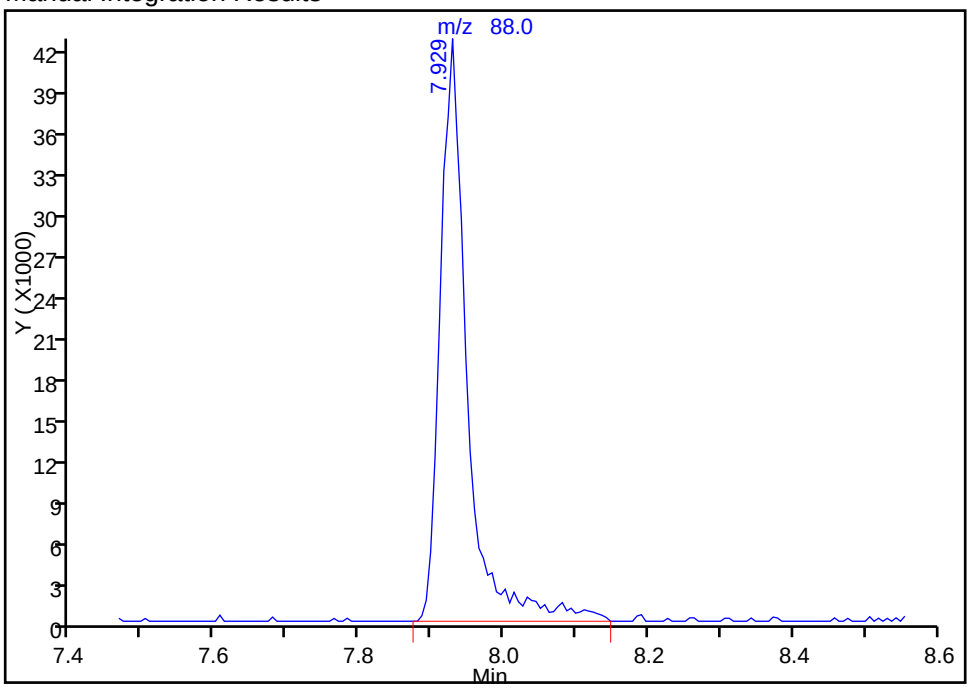
Processing Integration Results

RT: 8.03
Area: 6665
Amount: 311.1067
Amount Units: ng



Manual Integration Results

RT: 7.93
Area: 110995
Amount: 4396.8559
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:15:32
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D
Lims ID: IC VSTD50
Client ID:
Sample Type: IC Calib Level: 8
Inject. Date: 17-Oct-2016 17:13:30 ALS Bottle#: 13 Worklist Smp#: 13
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-013
Misc. Info.: IC VSTD50
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:26:58 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 09:29:37

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.168	4.150	0.018	92	156482	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.179	7.180	-0.001	99	442275	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.288	10.294	-0.006	85	122856	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.636	12.630	0.006	90	169384	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.449	6.449	0.000	94	457863	250.0	242.4	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.820	6.821	-0.001	68	616626	250.0	241.3	
$ 7 Toluene-d8 (Surr)	98	8.834	8.834	0.000	93	1778033	250.0	197.9	
$ 8 4-Bromofluorobenzene (Surr	95	11.474	11.474	0.000	87	767526	250.0	226.9	
11 Dichlorodifluoromethane	85	1.540	1.546	-0.006	99	437808	250.0	217.5	
12 Chloromethane	50	1.704	1.698	0.006	99	587869	250.0	227.8	
13 Vinyl chloride	62	1.838	1.838	0.000	99	517628	250.0	219.6	
14 Butadiene	39	1.869	1.869	0.000	93	536408	250.0	217.5	
15 Bromomethane	94	2.161	2.167	-0.006	93	211399	250.0	214.3	
16 Chloroethane	64	2.300	2.301	-0.001	100	333168	250.0	223.2	
17 Dichlorofluoromethane	67	2.562	2.568	-0.006	98	791623	250.0	231.8	
18 Trichlorofluoromethane	101	2.574	2.586	-0.012	98	595629	250.0	210.7	
20 Ethyl ether	59	2.945	2.945	0.000	93	497445	250.0	215.8	
21 Acrolein	56	3.122	3.122	0.000	98	144221	275.0	292.8	
22 1,1-Dichloroethene	96	3.219	3.231	-0.012	98	527379	250.0	242.6	
23 1,1,2-Trichloro-1,2,2-trif	101	3.286	3.298	-0.012	94	512442	250.0	232.8	
24 Acetone	43	3.329	3.335	-0.006	100	282151	500.0	534.6	
25 Iodomethane	142	3.408	3.420	-0.012	97	828161	250.0	254.1	
26 Carbon disulfide	76	3.493	3.499	-0.006	100	1371596	250.0	283.4	
29 3-Chloro-1-propene	76	3.785	3.785	0.000	92	350147	250.0	290.1	
30 Methyl acetate	43	3.809	3.809	0.000	96	2310919	1250.0	1255.2	
31 Methylene Chloride	84	3.998	3.998	0.000	93	682055	250.0	261.1	
32 2-Methyl-2-propanol	59	4.290	4.290	0.000	92	393228	2500.0	2473.6	
33 Acrylonitrile	53	4.393	4.399	-0.006	98	2428773	2500.0	2486.4	
34 trans-1,2-Dichloroethene	96	4.430	4.424	0.006	99	590066	250.0	241.6	
35 Methyl tert-butyl ether	73	4.448	4.454	-0.006	97	1319612	250.0	266.4	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.856	4.856	0.000	92	844165	250.0	237.8	
37 1,1-Dichloroethane	63	5.075	5.081	-0.007	96	1035587	250.0	254.0	
38 Vinyl acetate	43	5.129	5.129	0.000	97	1122396	250.0	301.4	
43 cis-1,2-Dichloroethene	96	5.829	5.835	-0.006	80	689543	250.0	252.3	
42 2,2-Dichloropropane	97	5.829	5.835	-0.006	54	117742	250.0	277.2	
44 2-Butanone (MEK)	43	5.847	5.841	0.006	99	508836	500.0	507.5	
48 Chlorobromomethane	128	6.121	6.121	0.000	98	322793	250.0	262.9	
49 Tetrahydrofuran	42	6.133	6.139	-0.006	87	393583	500.0	505.5	
50 Chloroform	83	6.267	6.267	0.000	96	939276	250.0	248.2	
51 1,1,1-Trichloroethane	97	6.425	6.425	0.000	98	610188	250.0	267.3	
52 Cyclohexane	56	6.492	6.498	-0.006	92	990348	250.0	237.7	
53 Carbon tetrachloride	117	6.595	6.595	0.000	95	438205	250.0	287.4	
54 1,1-Dichloropropene	75	6.614	6.614	0.000	95	754822	250.0	246.4	
55 Isobutyl alcohol	41	6.833	6.827	0.006	49	410540	6250.0	7877.8	
56 Benzene	78	6.833	6.833	0.000	98	2234343	250.0	227.1	
57 1,2-Dichloroethane	62	6.912	6.912	0.000	96	801768	250.0	255.9	
59 n-Heptane	43	7.198	7.198	0.000	91	684814	250.0	235.4	
61 Trichloroethene	130	7.569	7.569	0.000	97	588427	250.0	245.2	
63 Methylcyclohexane	83	7.806	7.806	0.000	89	947928	250.0	236.9	
64 1,2-Dichloropropane	63	7.842	7.843	-0.001	95	658421	250.0	252.4	
65 1,4-Dioxane	88	7.928	7.934	-0.006	88	143535	5000.0	5521.7	M
67 Dibromomethane	93	7.928	7.928	0.000	97	377143	250.0	271.6	
68 Dichlorobromomethane	83	8.128	8.129	-0.001	98	624230	250.0	298.3	
70 2-Chloroethyl vinyl ether	63	8.433	8.433	0.000	92	868925	500.0	555.6	
71 cis-1,3-Dichloropropene	75	8.573	8.579	-0.007	94	888989	250.0	306.8	
72 4-Methyl-2-pentanone (MIBK	43	8.731	8.731	0.000	95	1182012	500.0	518.7	
73 Toluene	91	8.901	8.907	-0.006	97	2295736	250.0	208.1	
74 trans-1,3-Dichloropropene	75	9.157	9.157	0.000	95	784438	250.0	310.9	
75 Ethyl methacrylate	69	9.217	9.217	0.000	89	871674	250.0	289.7	
76 1,1,2-Trichloroethane	97	9.351	9.345	0.006	92	569382	250.0	241.5	
77 Tetrachloroethene	164	9.418	9.418	0.000	97	459589	250.0	216.7	
78 1,3-Dichloropropane	76	9.503	9.509	-0.006	92	1033930	250.0	235.8	
79 2-Hexanone	43	9.564	9.570	-0.006	94	723957	500.0	530.5	
81 Chlorodibromomethane	129	9.716	9.722	-0.006	90	453002	250.0	304.7	
82 Ethylene Dibromide	107	9.832	9.832	0.000	98	559480	250.0	263.8	
83 3-Chlorobenzotrifluoride	180	10.300	10.300	0.000	94	759861	250.0	207.8	
84 Chlorobenzene	112	10.318	10.319	-0.001	96	1615675	250.0	215.9	
85 4-Chlorobenzotrifluoride	180	10.385	10.386	-0.001	96	736864	250.0	215.9	
86 1,1,1,2-Tetrachloroethane	131	10.416	10.416	0.000	92	483803	250.0	290.5	
87 Ethylbenzene	106	10.422	10.422	0.000	97	909219	250.0	225.6	
88 m-Xylene & p-Xylene	106	10.556	10.556	0.000	96	1120035	250.0	228.8	
89 o-Xylene	106	10.933	10.933	0.000	93	1086046	250.0	229.6	
90 Styrene	104	10.957	10.957	0.000	94	1810645	250.0	230.8	
91 Bromoform	173	11.134	11.134	0.000	95	256599	250.0	248.9	
92 2-Chlorobenzotrifluoride	180	11.207	11.207	0.000	95	774175	250.0	219.5	
93 Isopropylbenzene	105	11.304	11.304	0.000	97	2336935	250.0	207.2	
95 Bromobenzene	156	11.614	11.614	0.000	98	687578	250.0	250.8	
96 1,1,2,2-Tetrachloroethane	83	11.614	11.614	0.000	97	727352	250.0	244.3	
97 trans-1,4-Dichloro-2-buten	53	11.651	11.651	0.000	79	210068	250.0	295.6	
98 1,2,3-Trichloropropane	110	11.669	11.669	0.000	88	240309	250.0	260.8	
99 N-Propylbenzene	120	11.718	11.718	0.000	96	778345	250.0	244.6	
100 2-Chlorotoluene	126	11.803	11.803	0.000	96	682833	250.0	245.7	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.870	11.870	0.000	93	716597	250.0	237.9	
102 1,3,5-Trimethylbenzene	105	11.906	11.906	0.000	97	1999367	250.0	228.2	
103 4-Chlorotoluene	126	11.931	11.931	0.000	97	740089	250.0	244.0	
104 tert-Butylbenzene	119	12.216	12.217	-0.001	93	1730663	250.0	233.1	
106 1,2,4-Trimethylbenzene	105	12.277	12.277	0.000	97	2113255	250.0	232.3	
107 1,2-dichloro-4-(trifluorom	214	12.320	12.320	0.000	96	592020	250.0	230.4	
108 sec-Butylbenzene	105	12.442	12.436	0.006	95	2379583	250.0	220.2	
109 1,3-Dichlorobenzene	146	12.557	12.551	0.006	95	1263061	250.0	237.2	
110 4-Isopropyltoluene	119	12.594	12.594	0.000	94	2095851	250.0	228.4	
111 1,4-Dichlorobenzene	146	12.661	12.661	0.000	92	1306720	250.0	234.3	
113 2,4-Dichloro-1-(triflourom	214	12.691	12.691	0.000	94	573367	250.0	228.5	
114 2,5-Dichlorobenzotrifluori	214	12.734	12.728	0.006	99	657948	250.0	228.7	
116 n-Butylbenzene	91	13.001	13.001	0.000	95	1887735	250.0	227.4	
117 1,2-Dichlorobenzene	146	13.013	13.014	-0.001	94	1216119	250.0	232.3	
118 1,2-Dibromo-3-Chloropropan	75	13.804	13.804	0.000	79	100207	250.0	394.1	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.944	13.944	0.000	96	2819474	750.0	681.5	
121 2,3- & 3,4- Dichlorotoluen	125	14.364	14.358	0.006	97	2176172	500.0	477.4	
122 1,2,4-Trichlorobenzene	180	14.626	14.626	0.000	95	895565	250.0	252.9	
123 Hexachlorobutadiene	225	14.772	14.778	-0.006	97	302126	250.0	250.3	
124 Naphthalene	128	14.887	14.893	-0.006	99	2144730	250.0	254.2	
125 1,2,3-Trichlorobenzene	180	15.112	15.112	0.000	95	811942	250.0	260.8	
126 2,4,5-Trichlorotoluene	159	15.897	15.897	0.000	0	408566	250.0	279.2	
127 2,3,6-Trichlorotoluene	159	16.000	16.001	-0.001	93	370449	250.0	271.6	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
S 131 Xylenes, Total	106				0		500.0	458.4	
S 130 1,2-Dichloroethene, Total	96				0		500.0	493.9	
S 132 1,3-Dichloropropene, Total	1				0		500.0	617.7	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

VOA8260SURR_00060	Amount Added:	10.00	Units: uL	
VOA8260VOAPRI_00216	Amount Added:	10.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	10.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	10.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	10.00	Units: uL	
voaW2cleveRes_00002	Amount Added:	10.00	Units: uL	
voaWacro2ndRe_00007	Amount Added:	11.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent

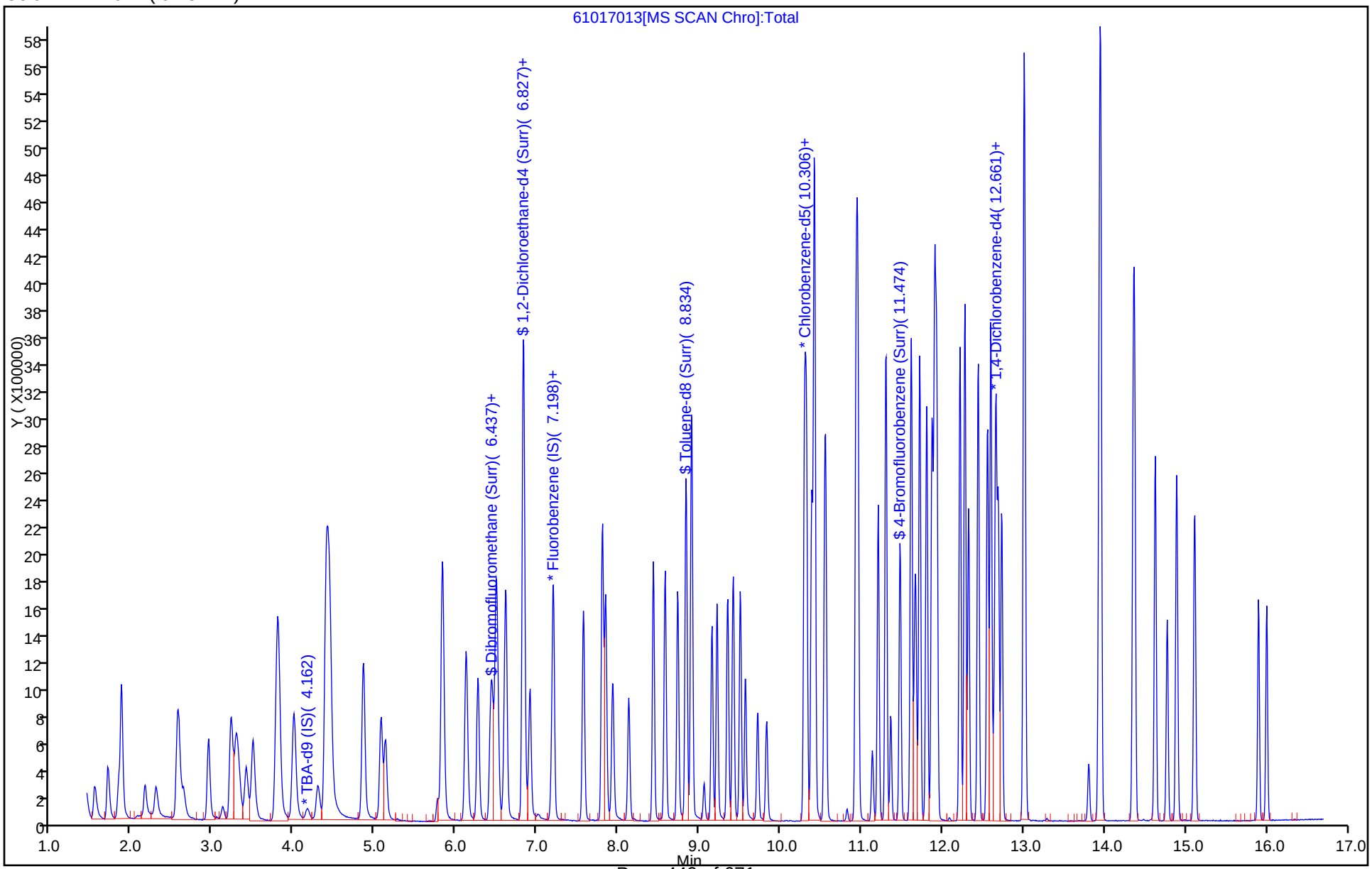
Report Date: 18-Oct-2016 11:27:00 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Injection Date:	17-Oct-2016 17:13:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	IC VSTD50			Worklist Smp#:	13
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	13
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

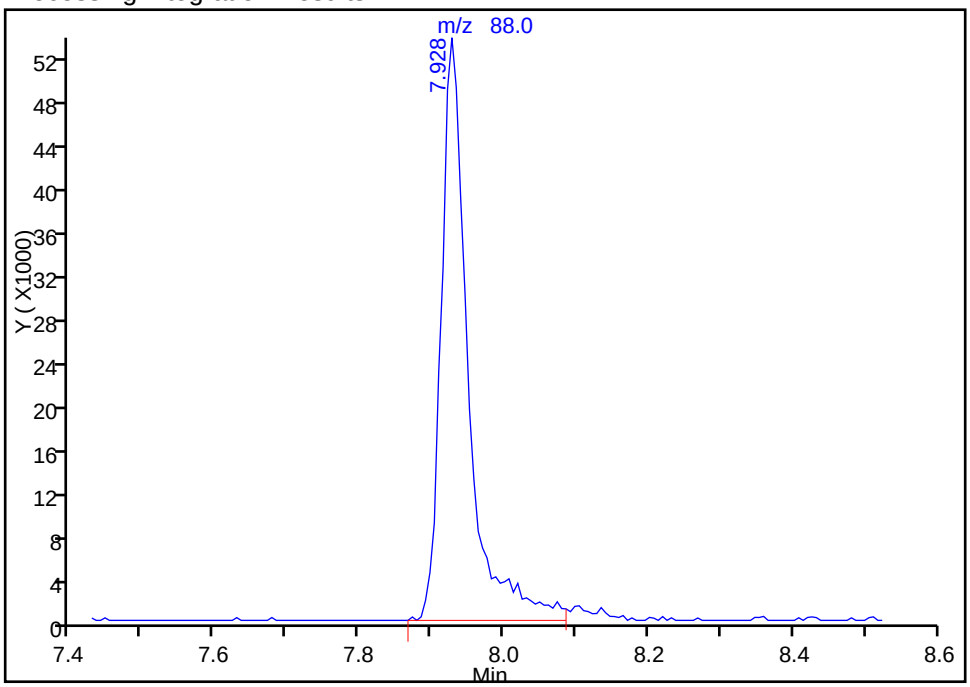
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D
Injection Date: 17-Oct-2016 17:13:30 Instrument ID: CHHP6
Lims ID: IC VSTD50
Client ID:
Operator ID: 001562 ALS Bottle#: 13 Worklist Smp#: 13
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP6 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

65 1,4-Dioxane, CAS: 123-91-1

Signal: 1

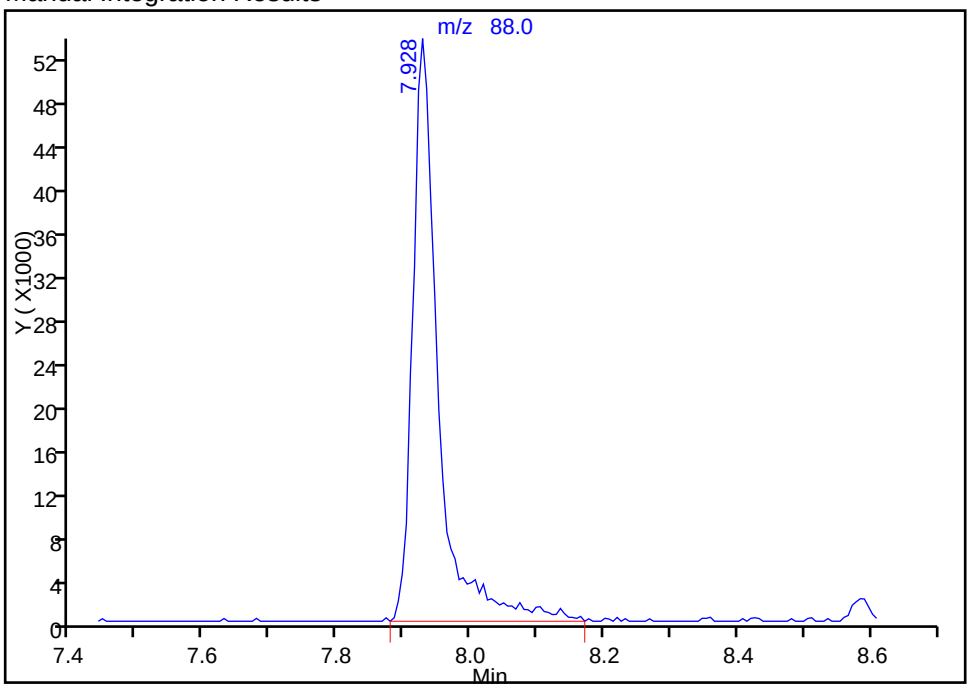
Processing Integration Results

RT: 7.93
Area: 140126
Amount: 5410.8402
Amount Units: ng



Manual Integration Results

RT: 7.93
Area: 143535
Amount: 5521.7085
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 10:20:11
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191289/2 Calibration Date: 10/15/2016 13:43

Instrument ID: CHHP5 Calib Start Date: 09/28/2016 14:27

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 09/28/2016 18:27

Lab File ID: 51015002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
Dichlorodifluoromethane	Ave	0.3291	0.2793	0.1000	8.48	10.0	-15.2	20.0
Chloromethane	Ave	0.3816	0.4556	0.1000	11.9	10.0	19.4	20.0
Vinyl chloride	Ave	0.3102	0.3617	0.1000	11.7	10.0	16.6	20.0
1,3-Butadiene	Ave	0.3494	0.5531	0.0100	15.8	10.0	58.3*	20.0
Bromomethane	Ave	0.1345	0.1405	0.0500	10.4	10.0	4.4	20.0
Chloroethane	Ave	0.1945	0.2047	0.0500	10.5	10.0	5.3	20.0
Dichlorofluoromethane	Ave	0.4098	0.4042	0.0100	9.86	10.0	-1.4	20.0
Trichlorofluoromethane	Ave	0.2931	0.2857	0.1000	9.75	10.0	-2.5	20.0
Ethyl ether	Ave	0.2538	0.3195	0.0100	12.6	10.0	25.9*	20.0
Acrolein	Ave	0.0583	0.0600	0.0100	30.9	30.0	2.9	20.0
1,1-Dichloroethene	Ave	0.2835	0.2620	0.1000	9.24	10.0	-7.6	20.0
1,1,2-Trichloro-1,2,2-trifluoroethane	Ave	0.2853	0.2709	0.1000	9.49	10.0	-5.1	20.0
Acetone	Ave	0.0981	0.1127	0.0500	23.0	20.0	14.9	20.0
Iodomethane	Ave	0.4055	0.3720	0.0100	9.17	10.0	-8.3	20.0
Carbon disulfide	Ave	0.7630	0.6472	0.1000	8.48	10.0	-15.2	20.0
Allyl chloride	Ave	0.1864	0.1326	0.0100	7.12	10.0	-28.8*	20.0
Methyl acetate	Ave	0.2413	0.3072	0.1000	63.6	50.0	27.3*	20.0
Methylene Chloride	Ave	0.3291	0.3158	0.1000	9.59	10.0	-4.1	20.0
tert-Butyl alcohol	Ave	1.119	1.212	0.0100	108	100	8.4	20.0
Acrylonitrile	Ave	0.1170	0.1470	0.0100	126	100	25.6*	20.0
trans-1,2-Dichloroethene	Ave	0.2899	0.2851	0.1000	9.83	10.0	-1.7	20.0
Methyl tert-butyl ether	Ave	0.8126	0.7249	0.1000	8.92	10.0	-10.8	20.0
Hexane	Ave	0.4587	0.5040	0.0100	11.0	10.0	9.9	20.0
1,1-Dichloroethane	Ave	0.5719	0.6026	0.2000	10.5	10.0	5.4	20.0
Vinyl acetate	Ave	0.5806	0.5197	0.0100	8.95	10.0	-10.5	20.0
2,2-Dichloropropane	Ave	0.3410	0.2026	0.0100	5.94	10.0	-40.6*	20.0
cis-1,2-Dichloroethene	Ave	0.3275	0.3133	0.1000	9.57	10.0	-4.3	20.0
2-Butanone (MEK)	Ave	0.1464	0.1492	0.0500	20.4	20.0	1.9	20.0
Bromochloromethane	Ave	0.1349	0.1247	0.0100	9.25	10.0	-7.5	20.0
Tetrahydrofuran	Ave	0.0991	0.1160	0.0100	23.4	20.0	17.0	20.0
Chloroform	Ave	0.5094	0.5101	0.2000	10.0	10.0	0.1	20.0
1,1,1-Trichloroethane	Ave	0.4062	0.3345	0.1000	8.24	10.0	-17.6	20.0
Cyclohexane	Ave	0.5999	0.6686	0.1000	11.1	10.0	11.5	20.0
Carbon tetrachloride	Ave	0.3287	0.2517	0.1000	7.66	10.0	-23.4*	20.0
1,1-Dichloropropene	Ave	0.4068	0.4171	0.0100	10.3	10.0	2.5	20.0
Isobutyl alcohol	Ave	0.0072	0.0068*	0.0100	236	250	-5.8	20.0
Benzene	Ave	1.148	1.175	0.5000	10.2	10.0	2.3	20.0
1,2-Dichloroethane	Ave	0.4028	0.4481	0.1000	11.1	10.0	11.2	20.0
n-Heptane	Ave	0.3806	0.4891	0.0100	12.8	10.0	28.5*	20.0
Trichloroethene	Ave	0.2810	0.2556	0.2000	9.10	10.0	-9.0	20.0

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191289/2 Calibration Date: 10/15/2016 13:43

Instrument ID: CHHP5 Calib Start Date: 09/28/2016 14:27

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 09/28/2016 18:27

Lab File ID: 51015002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
Methylcyclohexane	Ave	0.4952	0.4882	0.1000	9.86	10.0	-1.4	20.0
1,2-Dichloropropane	Ave	0.2941	0.3053	0.1000	10.4	10.0	3.8	20.0
1,4-Dioxane	Ave	0.0021	0.0023*	0.0100	218	200	9.2	20.0
Dibromomethane	Ave	0.1530	0.1564	0.0100	10.2	10.0	2.2	20.0
Bromodichloromethane	Ave	0.3217	0.2955	0.2000	9.19	10.0	-8.1	20.0
cis-1,3-Dichloropropene	Ave	0.4154	0.2945	0.2000	7.09	10.0	-29.1*	20.0
4-Methyl-2-pentanone (MIBK)	Ave	1.280	1.135	0.1000	17.7	20.0	-11.3	20.0
Toluene	Ave	5.044	5.344	0.4000	10.6	10.0	5.9	20.0
trans-1,3-Dichloropropene	Ave	1.570	1.088	0.1000	6.93	10.0	-30.7*	20.0
Ethyl methacrylate	Ave	1.546	1.314	0.0100	8.50	10.0	-15.0	20.0
1,1,2-Trichloroethane	Ave	0.9368	0.9948	0.1000	10.6	10.0	6.2	20.0
Tetrachloroethene	Ave	0.9221	0.9757	0.2000	10.6	10.0	5.8	20.0
1,3-Dichloropropane	Ave	1.768	1.914	0.0100	10.8	10.0	8.3	20.0
2-Hexanone	Ave	1.014	0.8977	0.1000	17.7	20.0	-11.4	20.0
Dibromochloromethane	Ave	0.8636	0.6783	0.1000	7.85	10.0	-21.5*	20.0
1,2-Dibromoethane (EDB)	Ave	0.9478	0.9028	0.1000	9.53	10.0	-4.7	20.0
3-Chlorobenzotrifluoride	Ave	1.654	1.781	0.0100	10.8	10.0	7.7	20.0
Chlorobenzene	Ave	3.043	3.321	0.5000	10.9	10.0	9.1	20.0
4-Chlorobenzotrifluoride	Ave	1.549	1.720	0.0100	11.1	10.0	11.1	20.0
1,1,1,2-Tetrachloroethane	Ave	0.9456	0.8434	0.0100	8.92	10.0	-10.8	20.0
Ethylbenzene	Ave	1.770	1.864	0.1000	10.5	10.0	5.3	20.0
m-Xylene & p-Xylene	Ave	2.162	2.291	0.1000	10.6	10.0	6.0	20.0
o-Xylene	Ave	1.998	2.134	0.3000	10.7	10.0	6.8	20.0
Styrene	Ave	3.337	3.630	0.3000	10.9	10.0	8.8	20.0
Bromoform	Ave	0.5048	0.3169	0.1000	6.28	10.0	-37.2*	20.0
2-Chlorobenzotrifluoride	Ave	1.505	1.648	0.0100	10.9	10.0	9.5	20.0
Isopropylbenzene	Ave	4.883	5.286	0.1000	10.8	10.0	8.3	20.0
1,1,2,2-Tetrachloroethane	Ave	1.116	1.204	0.3000	10.8	10.0	7.9	20.0
Bromobenzene	Ave	1.062	0.9876	0.0100	9.30	10.0	-7.0	20.0
trans-1,4-Dichloro-2-butene	Ave	0.4033	0.1874	0.0100	4.65	10.0	-53.5*	20.0
1,2,3-Trichloropropane	Ave	0.3644	0.3477	0.0100	9.54	10.0	-4.6	20.0
N-Propylbenzene	Ave	1.267	1.139	0.0100	9.00	10.0	-10.0	20.0
2-Chlorotoluene	Ave	1.051	0.9616	0.0100	9.15	10.0	-8.5	20.0
3-Chlorotoluene	Ave	1.126	1.022	0.0100	9.08	10.0	-9.2	20.0
1,3,5-Trimethylbenzene	Ave	3.353	3.368	0.0100	10.0	10.0	0.4	20.0
4-Chlorotoluene	Ave	1.098	1.057	0.0100	9.62	10.0	-3.8	20.0
tert-Butylbenzene	Ave	2.821	2.603	0.0100	9.23	10.0	-7.7	20.0
1,2,4-Trimethylbenzene	Ave	3.336	3.253	0.0100	9.75	10.0	-2.5	20.0
3,4-Dichlorobenzotrifluoride	Ave	0.9183	0.8623	0.0100	9.39	10.0	-6.1	20.0
sec-Butylbenzene	Ave	3.888	3.672	0.0100	9.45	10.0	-5.5	20.0
1,3-Dichlorobenzene	Ave	1.706	1.585	0.6000	9.29	10.0	-7.1	20.0

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191289/2 Calibration Date: 10/15/2016 13:43

Instrument ID: CHHP5 Calib Start Date: 09/28/2016 14:27

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 09/28/2016 18:27

Lab File ID: 51015002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
4-Isopropyltoluene	Ave	3.062	2.872	0.0100	9.38	10.0	-6.2	20.0
1,4-Dichlorobenzene	Ave	1.696	1.609	0.5000	9.49	10.0	-5.1	20.0
2,4-Dichlorobenzotrifluoride	Ave	0.7809	0.7113	0.0100	9.11	10.0	-8.9	20.0
2,5-Dichlorobenzotrifluoride	Ave	0.9002	0.8319	0.0100	9.24	10.0	-7.6	20.0
n-Butylbenzene	Ave	2.559	2.377	0.0100	9.29	10.0	-7.1	20.0
1,2-Dichlorobenzene	Ave	1.427	1.317	0.4000	9.23	10.0	-7.7	20.0
1,2-Dibromo-3-Chloropropane	Ave	0.1433	0.0865	0.0500	6.03	10.0	-39.7*	20.0
2,4- & 2,5- & 2,6-Dichlorotoluene	Ave	0.9185	0.7418	0.0100	24.2	30.0	-19.2	20.0
2,3- & 3,4- Dichlorotoluene	Ave	0.8969	0.6768	0.0100	15.1	20.0	-24.5*	20.0
1,2,4-Trichlorobenzene	Ave	0.6287	0.4102	0.2000	6.52	10.0	-34.8*	20.0
Hexachlorobutadiene	Ave	0.3056	0.2029	0.0100	6.64	10.0	-33.6*	20.0
Naphthalene	Ave	1.833	1.102	0.0100	6.01	10.0	-39.9*	20.0
1,2,3-Trichlorobenzene	Ave	0.5647	0.3436	0.0100	6.08	10.0	-39.2*	20.0
2,4,5-Trichlorotoluene	Qua		0.1769	0.0100	4.67	10.0	-53.3*	20.0
2,3,6-Trichlorotoluene	Ave	0.4531	0.1789	0.0100	3.95	10.0	-60.5*	20.0
Dibromofluoromethane (Surr)	Ave	0.2254	0.2206		9.79	10.0	-2.1	20.0
1,2-Dichloroethane-d4 (Surr)	Ave	0.3064	0.3299		10.8	10.0	7.7	20.0
Toluene-d8 (Surr)	Ave	3.934	4.179		10.6	10.0	6.2	20.0
4-Bromofluorobenzene (Surr)	Ave	1.454	1.525		10.5	10.0	4.9	20.0

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015002.D
Lims ID: CCVIS
Client ID:
Sample Type: CCVIS
Inject. Date: 15-Oct-2016 13:43:30 ALS Bottle#: 2 Worklist Smp#: 2
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-002
Misc. Info.: CCVIS
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 15-Oct-2016 15:19:30 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK011

First Level Reviewer: fergusond Date: 15-Oct-2016 14:41:43

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.278	4.278	0.000	0	103841	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.271	7.271	0.000	96	391254	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.373	10.373	0.000	92	84605	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.722	12.722	0.000	94	97009	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.547	6.547	0.000	93	86308	50.0	48.9	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.918	6.918	0.000	0	129063	50.0	53.8	
$ 7 Toluene-d8 (Surr)	98	8.919	8.919	0.000	95	353548	50.0	53.1	
$ 8 4-Bromofluorobenzene (Surr	95	11.560	11.560	0.000	83	129037	50.0	52.5	
11 Dichlorodifluoromethane	85	1.625	1.625	0.000	97	109257	50.0	42.4	
12 Chloromethane	50	1.771	1.771	0.000	99	178264	50.0	59.7	
13 Vinyl chloride	62	1.905	1.905	0.000	98	141500	50.0	58.3	
14 Butadiene	39	1.942	1.942	0.000	99	216409	50.0	79.2	
15 Bromomethane	94	2.240	2.240	0.000	92	54966	50.0	52.2	
16 Chloroethane	64	2.392	2.392	0.000	99	80105	50.0	52.6	
17 Dichlorofluoromethane	67	2.659	2.659	0.000	97	158124	50.0	49.3	
18 Trichlorofluoromethane	101	2.672	2.672	0.000	95	111767	50.0	48.7	
20 Ethyl ether	59	3.049	3.049	0.000	97	125018	50.0	62.9	
21 Acrolein	56	3.237	3.237	0.000	99	70386	150.0	154.3	
22 1,1-Dichloroethene	96	3.341	3.341	0.000	92	102504	50.0	46.2	
23 1,1,2-Trichloro-1,2,2-trif	101	3.402	3.402	0.000	95	105973	50.0	47.5	
24 Acetone	43	3.450	3.450	0.000	97	88196	100.0	114.9	
25 Iodomethane	142	3.529	3.529	0.000	100	145536	50.0	45.9	
26 Carbon disulfide	76	3.621	3.621	0.000	99	253216	50.0	42.4	
28 3-Chloro-1-propene	76	3.913	3.913	0.000	86	51897	50.0	35.6	
30 Methyl acetate	43	3.937	3.937	0.000	100	600880	250.0	318.2	
31 Methylene Chloride	84	4.132	4.132	0.000	94	123558	50.0	48.0	
32 2-Methyl-2-propanol	59	4.405	4.405	0.000	85	62942	500.0	541.9	
33 Acrylonitrile	53	4.515	4.515	0.000	97	575219	500.0	628.2	
34 trans-1,2-Dichloroethene	96	4.551	4.551	0.000	85	111549	50.0	49.2	
35 Methyl tert-butyl ether	73	4.570	4.570	0.000	95	283614	50.0	44.6	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.971	4.971	0.000	96	197203	50.0	54.9	
37 1,1-Dichloroethane	63	5.190	5.190	0.000	97	235776	50.0	52.7	
38 Vinyl acetate	43	5.239	5.239	0.000	98	203331	50.0	44.8	
44 2,2-Dichloropropane	77	5.932	5.932	0.000	57	79283	50.0	29.7	
45 cis-1,2-Dichloroethene	96	5.938	5.938	0.000	88	122564	50.0	47.8	
46 2-Butanone (MEK)	43	5.951	5.951	0.000	98	116749	100.0	101.9	
49 Chlorobromomethane	128	6.218	6.218	0.000	86	48806	50.0	46.2	
51 Tetrahydrofuran	42	6.237	6.237	0.000	93	90738	100.0	117.0	
52 Chloroform	83	6.364	6.364	0.000	97	199577	50.0	50.1	
53 1,1,1-Trichloroethane	97	6.522	6.522	0.000	94	130883	50.0	41.2	
54 Cyclohexane	56	6.595	6.595	0.000	98	261601	50.0	55.7	
56 Carbon tetrachloride	117	6.693	6.693	0.000	92	98461	50.0	38.3	
55 1,1-Dichloropropene	75	6.711	6.711	0.000	89	163173	50.0	51.3	
57 Isobutyl alcohol	41	6.918	6.918	0.000	46	66757	1250.0	1177.9	
58 Benzene	78	6.924	6.924	0.000	98	459806	50.0	51.2	
59 1,2-Dichloroethane	62	7.003	7.003	0.000	97	175315	50.0	55.6	
62 n-Heptane	43	7.289	7.289	0.000	97	191347	50.0	64.2	
64 Trichloroethene	130	7.660	7.660	0.000	94	100013	50.0	45.5	
66 Methylcyclohexane	83	7.897	7.897	0.000	97	191015	50.0	49.3	
67 1,2-Dichloropropane	63	7.934	7.934	0.000	95	119429	50.0	51.9	
70 1,4-Dioxane	88	8.019	8.019	0.000	43	17619	1000.0	1092.4	
68 Dibromomethane	93	8.025	8.025	0.000	95	61207	50.0	51.1	
71 Dichlorobromomethane	83	8.220	8.220	0.000	97	115622	50.0	45.9	
74 cis-1,3-Dichloropropene	75	8.664	8.664	0.000	86	115226	50.0	35.4	
75 4-Methyl-2-pentanone (MIBK	43	8.816	8.816	0.000	99	192010	100.0	88.7	
76 Toluene	91	8.986	8.986	0.000	97	452107	50.0	53.0	
77 trans-1,3-Dichloropropene	75	9.242	9.242	0.000	97	92033	50.0	34.6	
78 Ethyl methacrylate	69	9.303	9.303	0.000	95	111182	50.0	42.5	
79 1,1,2-Trichloroethane	97	9.436	9.436	0.000	94	84168	50.0	53.1	
80 Tetrachloroethene	164	9.503	9.503	0.000	93	82548	50.0	52.9	
81 1,3-Dichloropropane	76	9.589	9.589	0.000	95	161972	50.0	54.2	
82 2-Hexanone	43	9.649	9.649	0.000	98	151892	100.0	88.6	
84 Chlorodibromomethane	129	9.801	9.801	0.000	91	57385	50.0	39.3	
85 Ethylene Dibromide	107	9.917	9.917	0.000	97	76382	50.0	47.6	
86 3-Chlorobenzotrifluoride	180	10.379	10.379	0.000	90	150686	50.0	53.9	
87 Chlorobenzene	112	10.404	10.404	0.000	89	280938	50.0	54.6	
88 4-Chlorobenzotrifluoride	180	10.465	10.465	0.000	96	145559	50.0	55.5	
90 Ethylbenzene	106	10.501	10.501	0.000	99	157738	50.0	52.7	
89 1,1,1,2-Tetrachloroethane	131	10.501	10.501	0.000	86	71352	50.0	44.6	
91 m-Xylene & p-Xylene	106	10.635	10.635	0.000	0	193823	50.0	53.0	
92 o-Xylene	106	11.018	11.018	0.000	97	180531	50.0	53.4	
93 Styrene	104	11.036	11.036	0.000	92	307079	50.0	54.4	
94 Bromoform	173	11.225	11.225	0.000	94	26811	50.0	31.4	
96 2-Chlorobenzotrifluoride	180	11.292	11.292	0.000	96	139442	50.0	54.7	
97 Isopropylbenzene	105	11.383	11.383	0.000	98	447248	50.0	54.1	
99 1,1,2,2-Tetrachloroethane	83	11.700	11.700	0.000	72	101840	50.0	53.9	
100 Bromobenzene	156	11.700	11.700	0.000	96	95802	50.0	46.5	
102 trans-1,4-Dichloro-2-buten	53	11.736	11.736	0.000	65	18183	50.0	23.2	
101 1,2,3-Trichloropropane	110	11.754	11.754	0.000	92	33731	50.0	47.7	
103 N-Propylbenzene	120	11.803	11.803	0.000	99	110529	50.0	45.0	
104 2-Chlorotoluene	126	11.888	11.888	0.000	94	93279	50.0	45.8	
105 3-Chlorotoluene	126	11.955	11.955	0.000	97	99171	50.0	45.4	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
106 1,3,5-Trimethylbenzene	105	11.985	11.985	0.000	94	326749	50.0	50.2	
107 4-Chlorotoluene	126	12.016	12.016	0.000	99	102527	50.0	48.1	
108 tert-Butylbenzene	119	12.296	12.296	0.000	94	252545	50.0	46.1	
110 1,2,4-Trimethylbenzene	105	12.357	12.357	0.000	98	315599	50.0	48.8	
111 1,2-dichloro-4-(trifluorom	214	12.399	12.399	0.000	97	83650	50.0	46.9	
112 sec-Butylbenzene	105	12.521	12.521	0.000	96	356247	50.0	47.2	
113 1,3-Dichlorobenzene	146	12.642	12.642	0.000	96	153773	50.0	46.5	
114 4-Isopropyltoluene	119	12.679	12.679	0.000	97	278609	50.0	46.9	
115 1,4-Dichlorobenzene	146	12.746	12.746	0.000	92	156066	50.0	47.4	
116 2,4-Dichloro-1-(triflourom	214	12.770	12.770	0.000	95	69002	50.0	45.5	
118 2,5-Dichlorobenzotrifluori	214	12.813	12.813	0.000	0	80702	50.0	46.2	
120 n-Butylbenzene	91	13.087	13.087	0.000	98	230546	50.0	46.4	
121 1,2-Dichlorobenzene	146	13.099	13.099	0.000	94	127806	50.0	46.1	
122 1,2-Dibromo-3-Chloropropan	75	13.896	13.896	0.000	68	8389	50.0	30.2	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.036	14.036	0.000	0	215875	150.0	121.1	
125 2,3- & 3,4- Dichlorotoluen	125	14.455	14.455	0.000	0	131319	100.0	75.5	
126 1,2,4-Trichlorobenzene	180	14.717	14.717	0.000	93	39790	50.0	32.6	
127 Hexachlorobutadiene	225	14.863	14.863	0.000	95	19678	50.0	33.2	
128 Naphthalene	128	14.978	14.978	0.000	98	106872	50.0	30.0	
129 1,2,3-Trichlorobenzene	180	15.204	15.204	0.000	94	33333	50.0	30.4	
131 2,4,5-Trichlorotoluene	159	15.982	15.982	0.000	0	17160	50.0	23.3	
130 2,3,6-Trichlorotoluene	159	16.086	16.086	0.000	96	17350	50.0	19.7	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		100.0	106.4	
S 134 1,2-Dichloroethene, Total	96				0		100.0	97.0	
S 135 1,3-Dichloropropene, Total	1				0		100.0	70.1	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Reagents:

VOA8260VOAPRI_00216	Amount Added:	2.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	2.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	2.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	2.00	Units: uL	
voaWacro2ndRe_00007	Amount Added:	6.00	Units: uL	
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

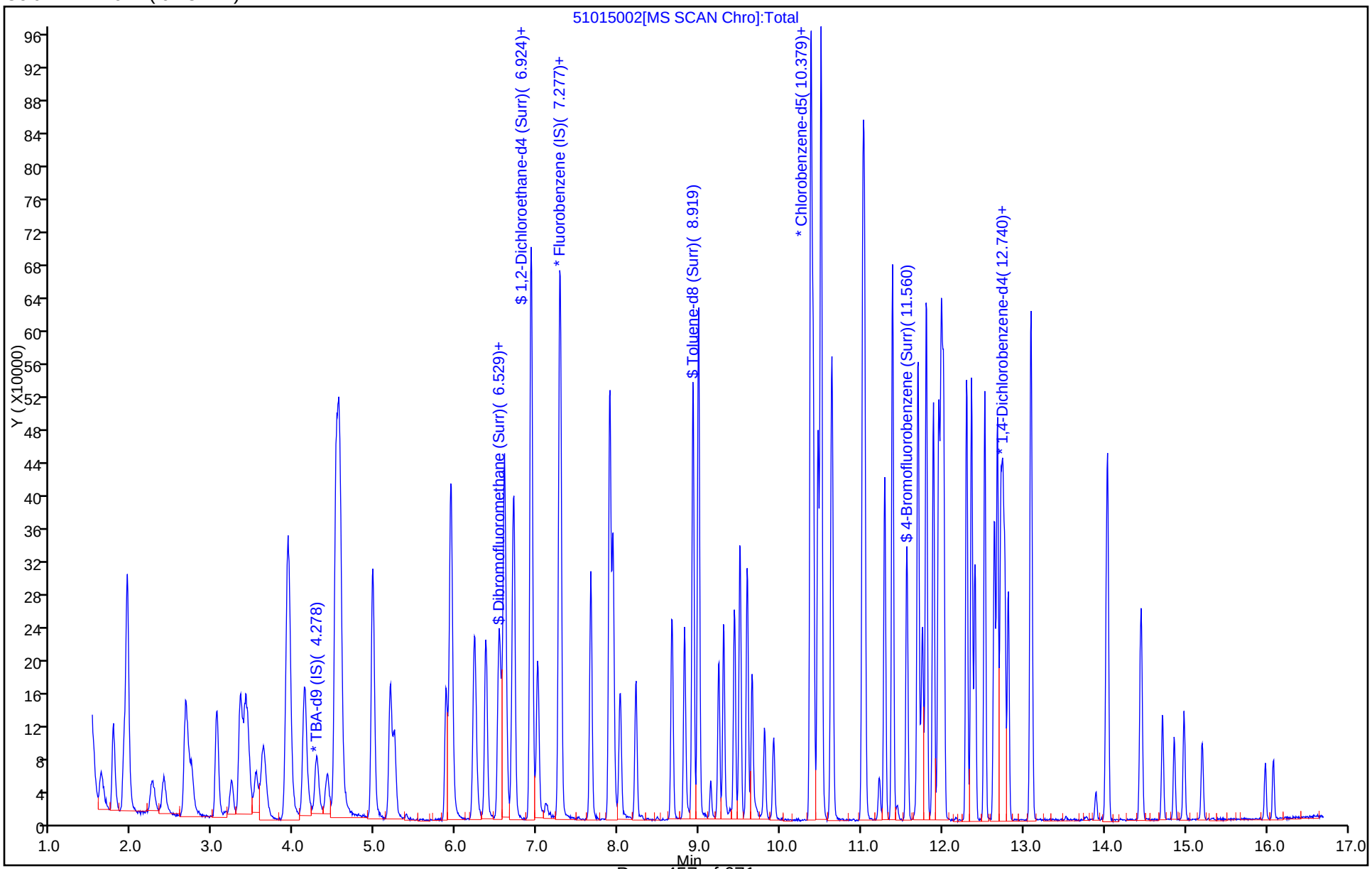
Report Date: 15-Oct-2016 15:19:37 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015002.D

Injection Date:	15-Oct-2016 13:43:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	CCVIS			Worklist Smp#:	2
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	2
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191520/2 Calibration Date: 10/18/2016 12:14

Instrument ID: CHHP5 Calib Start Date: 09/28/2016 14:27

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 09/28/2016 18:27

Lab File ID: 51018002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
Dichlorodifluoromethane	Ave	0.3291	0.2800	0.1000	8.51	10.0	-14.9	20.0
Chloromethane	Ave	0.3816	0.4937	0.1000	12.9	10.0	29.4*	20.0
Vinyl chloride	Ave	0.3102	0.3682	0.1000	11.9	10.0	18.7	20.0
1,3-Butadiene	Ave	0.3494	0.5464	0.0100	15.6	10.0	56.4*	20.0
Bromomethane	Ave	0.1345	0.1024	0.0500	7.61	10.0	-23.9*	20.0
Chloroethane	Ave	0.1945	0.2160	0.0500	11.1	10.0	11.1	20.0
Dichlorofluoromethane	Ave	0.4098	0.4213	0.0100	10.3	10.0	2.8	20.0
Trichlorofluoromethane	Ave	0.2931	0.2973	0.1000	10.1	10.0	1.4	20.0
Ethyl ether	Ave	0.2538	0.3205	0.0100	12.6	10.0	26.3*	20.0
Acrolein	Ave	0.0583	0.0646	0.0100	33.3	30.0	10.8	20.0
1,1-Dichloroethene	Ave	0.2835	0.2878	0.1000	10.2	10.0	1.5	20.0
1,1,2-Trichloro-1,2,2-trifluoroethane	Ave	0.2853	0.2816	0.1000	9.87	10.0	-1.3	20.0
Acetone	Ave	0.0981	0.0928	0.0500	18.9	20.0	-5.4	20.0
Iodomethane	Ave	0.4055	0.3762	0.0100	9.28	10.0	-7.2	20.0
Carbon disulfide	Ave	0.7630	0.7521	0.1000	9.86	10.0	-1.4	20.0
Allyl chloride	Ave	0.1864	0.1697	0.0100	9.10	10.0	-9.0	20.0
Methyl acetate	Ave	0.2413	0.2933	0.1000	60.8	50.0	21.6*	20.0
Methylene Chloride	Ave	0.3291	0.3325	0.1000	10.1	10.0	1.0	20.0
tert-Butyl alcohol	Ave	1.119	1.100	0.0100	98.3	100	-1.7	20.0
Acrylonitrile	Ave	0.1170	0.1443	0.0100	123	100	23.3*	20.0
trans-1,2-Dichloroethene	Ave	0.2899	0.2742	0.1000	9.46	10.0	-5.4	20.0
Methyl tert-butyl ether	Ave	0.8126	0.7281	0.1000	8.96	10.0	-10.4	20.0
Hexane	Ave	0.4587	0.5320	0.0100	11.6	10.0	16.0	20.0
1,1-Dichloroethane	Ave	0.5719	0.6116	0.2000	10.7	10.0	6.9	20.0
Vinyl acetate	Ave	0.5806	0.6298	0.0100	10.8	10.0	8.5	20.0
2,2-Dichloropropane	Ave	0.3410	0.2343	0.0100	6.87	10.0	-31.3*	20.0
cis-1,2-Dichloroethene	Ave	0.3275	0.3206	0.1000	9.79	10.0	-2.1	20.0
2-Butanone (MEK)	Ave	0.1464	0.1416	0.0500	19.3	20.0	-3.3	20.0
Bromochloromethane	Ave	0.1349	0.1197	0.0100	8.87	10.0	-11.3	20.0
Tetrahydrofuran	Ave	0.0991	0.1246	0.0100	25.1	20.0	25.7*	20.0
Chloroform	Ave	0.5094	0.5205	0.2000	10.2	10.0	2.2	20.0
1,1,1-Trichloroethane	Ave	0.4062	0.3740	0.1000	9.21	10.0	-7.9	20.0
Cyclohexane	Ave	0.5999	0.7005	0.1000	11.7	10.0	16.8	20.0
Carbon tetrachloride	Ave	0.3287	0.3169	0.1000	9.64	10.0	-3.6	20.0
1,1-Dichloropropene	Ave	0.4068	0.4234	0.0100	10.4	10.0	4.1	20.0
Isobutyl alcohol	Ave	0.0072	0.0082*	0.0100	283	250	13.3	20.0
Benzene	Ave	1.148	1.205	0.5000	10.5	10.0	5.0	20.0
1,2-Dichloroethane	Ave	0.4028	0.4360	0.1000	10.8	10.0	8.2	20.0
n-Heptane	Ave	0.3806	0.5172	0.0100	13.6	10.0	35.9*	20.0
Trichloroethene	Ave	0.2810	0.2590	0.2000	9.22	10.0	-7.8	20.0

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191520/2 Calibration Date: 10/18/2016 12:14

Instrument ID: CHHP5 Calib Start Date: 09/28/2016 14:27

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 09/28/2016 18:27

Lab File ID: 51018002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
Methylcyclohexane	Ave	0.4952	0.5232	0.1000	10.6	10.0	5.7	20.0
1,2-Dichloropropane	Ave	0.2941	0.3196	0.1000	10.9	10.0	8.7	20.0
1,4-Dioxane	Ave	0.0021	0.0025*	0.0100	239	200	19.4	20.0
Dibromomethane	Ave	0.1530	0.1589	0.0100	10.4	10.0	3.9	20.0
Bromodichloromethane	Ave	0.3217	0.3421	0.2000	10.6	10.0	6.4	20.0
2-Chloroethyl vinyl ether	Ave	0.1544	0.1629	0.0100	21.1	20.0	5.5	20.0
cis-1,3-Dichloropropene	Ave	0.4154	0.3806	0.2000	9.16	10.0	-8.4	20.0
4-Methyl-2-pentanone (MIBK)	Ave	1.280	1.192	0.1000	18.6	20.0	-6.8	20.0
Toluene	Ave	5.044	5.216	0.4000	10.3	10.0	3.4	20.0
trans-1,3-Dichloropropene	Ave	1.570	1.303	0.1000	8.30	10.0	-17.0	20.0
Ethyl methacrylate	Ave	1.546	1.370	0.0100	8.86	10.0	-11.4	20.0
1,1,2-Trichloroethane	Ave	0.9368	0.9506	0.1000	10.1	10.0	1.5	20.0
Tetrachloroethene	Ave	0.9221	0.9854	0.2000	10.7	10.0	6.9	20.0
1,3-Dichloropropane	Ave	1.768	1.868	0.0100	10.6	10.0	5.7	20.0
2-Hexanone	Ave	1.014	0.9161	0.1000	18.1	20.0	-9.6	20.0
Dibromochloromethane	Ave	0.8636	0.8613	0.1000	9.97	10.0	-0.3	20.0
1,2-Dibromoethane (EDB)	Ave	0.9478	0.9204	0.1000	9.71	10.0	-2.9	20.0
3-Chlorobenzotrifluoride	Ave	1.654	1.779	0.0100	10.8	10.0	7.6	20.0
Chlorobenzene	Ave	3.043	3.180	0.5000	10.5	10.0	4.5	20.0
4-Chlorobenzotrifluoride	Ave	1.549	1.658	0.0100	10.7	10.0	7.0	20.0
1,1,1,2-Tetrachloroethane	Ave	0.9456	0.9694	0.0100	10.3	10.0	2.5	20.0
Ethylbenzene	Ave	1.770	1.831	0.1000	10.3	10.0	3.4	20.0
m-Xylene & p-Xylene	Ave	2.162	2.273	0.1000	10.5	10.0	5.2	20.0
o-Xylene	Ave	1.998	2.175	0.3000	10.9	10.0	8.9	20.0
Styrene	Ave	3.337	3.773	0.3000	11.3	10.0	13.1	20.0
Bromoform	Ave	0.5048	0.5072	0.1000	10.0	10.0	0.5	20.0
2-Chlorobenzotrifluoride	Ave	1.505	1.696	0.0100	11.3	10.0	12.6	20.0
Isopropylbenzene	Ave	4.883	5.715	0.1000	11.7	10.0	17.0	20.0
Bromobenzene	Ave	1.062	0.9257	0.0100	8.72	10.0	-12.8	20.0
1,1,2,2-Tetrachloroethane	Ave	1.116	1.315	0.3000	11.8	10.0	17.9	20.0
trans-1,4-Dichloro-2-butene	Ave	0.4033	0.3177	0.0100	7.88	10.0	-21.2*	20.0
1,2,3-Trichloropropane	Ave	0.3644	0.3268	0.0100	8.97	10.0	-10.3	20.0
N-Propylbenzene	Ave	1.267	1.139	0.0100	8.99	10.0	-10.1	20.0
2-Chlorotoluene	Ave	1.051	0.9206	0.0100	8.76	10.0	-12.4	20.0
3-Chlorotoluene	Ave	1.126	0.9232	0.0100	8.20	10.0	-18.0	20.0
1,3,5-Trimethylbenzene	Ave	3.353	3.319	0.0100	9.90	10.0	-1.0	20.0
4-Chlorotoluene	Ave	1.098	0.9876	0.0100	8.99	10.0	-10.1	20.0
tert-Butylbenzene	Ave	2.821	2.643	0.0100	9.37	10.0	-6.3	20.0
1,2,4-Trimethylbenzene	Ave	3.336	3.327	0.0100	9.97	10.0	-0.3	20.0
3,4-Dichlorobenzotrifluoride	Ave	0.9183	0.8685	0.0100	9.46	10.0	-5.4	20.0
sec-Butylbenzene	Ave	3.888	3.894	0.0100	10.0	10.0	0.2	20.0

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191520/2 Calibration Date: 10/18/2016 12:14

Instrument ID: CHHP5 Calib Start Date: 09/28/2016 14:27

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 09/28/2016 18:27

Lab File ID: 51018002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
1,3-Dichlorobenzene	Ave	1.706	1.635	0.6000	9.59	10.0	-4.1	20.0
4-Isopropyltoluene	Ave	3.062	3.074	0.0100	10.0	10.0	0.4	20.0
1,4-Dichlorobenzene	Ave	1.696	1.639	0.5000	9.67	10.0	-3.3	20.0
2,4-Dichlorobenzotrifluoride	Ave	0.7809	0.7828	0.0100	10.0	10.0	0.2	20.0
2,5-Dichlorobenzotrifluoride	Ave	0.9002	0.8598	0.0100	9.55	10.0	-4.5	20.0
n-Butylbenzene	Ave	2.559	2.631	0.0100	10.3	10.0	2.8	20.0
1,2-Dichlorobenzene	Ave	1.427	1.422	0.4000	9.96	10.0	-0.4	20.0
1,2-Dibromo-3-Chloropropane	Ave	0.1433	0.1275	0.0500	8.90	10.0	-11.0	20.0
2,4- & 2,5- & 2,6-Dichlorotoluene	Ave	0.9185	0.8494	0.0100	27.7	30.0	-7.5	20.0
2,3- & 3,4- Dichlorotoluene	Ave	0.8969	0.7823	0.0100	17.4	20.0	-12.8	20.0
1,2,4-Trichlorobenzene	Ave	0.6287	0.5525	0.2000	8.79	10.0	-12.1	20.0
Hexachlorobutadiene	Ave	0.3056	0.2448	0.0100	8.01	10.0	-19.9	20.0
Naphthalene	Ave	1.833	1.334	0.0100	7.27	10.0	-27.3*	20.0
1,2,3-Trichlorobenzene	Ave	0.5647	0.3996	0.0100	7.08	10.0	-29.2*	20.0
2,4,5-Trichlorotoluene	Qua		0.1771	0.0100	4.67	10.0	-53.3*	20.0
2,3,6-Trichlorotoluene	Ave	0.4531	0.1582	0.0100	3.49	10.0	-65.1*	20.0
Dibromofluoromethane (Surr)	Ave	0.2254	0.2229		9.89	10.0	-1.1	20.0
1,2-Dichloroethane-d4 (Surr)	Ave	0.3064	0.3343		10.9	10.0	9.1	20.0
Toluene-d8 (Surr)	Ave	3.934	3.984		10.1	10.0	1.3	20.0
4-Bromofluorobenzene (Surr)	Ave	1.454	1.576		10.8	10.0	8.4	20.0

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018002.D
Lims ID: CCVIS
Client ID:
Sample Type: CCVIS
Inject. Date: 18-Oct-2016 12:14:30 ALS Bottle#: 2 Worklist Smp#: 2
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-002
Misc. Info.: CCVIS
Operator ID: 001562 Instrument ID: CHHP5
Sublist: chrom-MSVOA_LL_CHHP5*sub12

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 14:26:21 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 13:14:00

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.273	4.273	0.000	0	118181	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.266	7.266	0.000	97	373749	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.375	10.375	0.000	92	86775	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.717	12.717	0.000	94	114965	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.542	6.542	0.000	93	83293	50.0	49.4	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.913	6.913	0.000	0	124925	50.0	54.5	
$ 7 Toluene-d8 (Surr)	98	8.921	8.921	0.000	95	345696	50.0	50.6	
$ 8 4-Bromofluorobenzene (Surr	95	11.561	11.561	0.000	85	136737	50.0	54.2	
11 Dichlorodifluoromethane	85	1.608	1.608	0.000	98	104663	50.0	42.5	
12 Chloromethane	50	1.760	1.760	0.000	100	184512	50.0	64.7	
13 Vinyl chloride	62	1.906	1.906	0.000	98	137617	50.0	59.3	
14 Butadiene	39	1.931	1.931	0.000	97	204216	50.0	78.2	
15 Bromomethane	94	2.235	2.235	0.000	89	38258	50.0	38.0	
16 Chloroethane	64	2.369	2.369	0.000	99	80735	50.0	55.5	
17 Dichlorofluoromethane	67	2.655	2.655	0.000	96	157464	50.0	51.4	
18 Trichlorofluoromethane	101	2.679	2.679	0.000	96	111130	50.0	50.7	M
20 Ethyl ether	59	3.032	3.032	0.000	98	119797	50.0	63.1	
21 Acrolein	56	3.214	3.214	0.000	99	72441	150.0	166.3	
22 1,1-Dichloroethene	96	3.336	3.336	0.000	95	107563	50.0	50.8	
23 1,1,2-Trichloro-1,2,2-trif	101	3.397	3.397	0.000	93	105258	50.0	49.4	
24 Acetone	43	3.439	3.439	0.000	98	69330	100.0	94.6	
25 Iodomethane	142	3.518	3.518	0.000	98	140599	50.0	46.4	
26 Carbon disulfide	76	3.616	3.616	0.000	100	281103	50.0	49.3	
28 3-Chloro-1-propene	76	3.902	3.902	0.000	87	63405	50.0	45.5	
30 Methyl acetate	43	3.926	3.926	0.000	100	548152	250.0	303.9	
31 Methylene Chloride	84	4.121	4.121	0.000	93	124264	50.0	50.5	
32 2-Methyl-2-propanol	59	4.413	4.413	0.000	85	64996	500.0	491.6	
33 Acrylonitrile	53	4.510	4.510	0.000	97	539387	500.0	616.7	
34 trans-1,2-Dichloroethene	96	4.540	4.540	0.000	91	102496	50.0	47.3	
35 Methyl tert-butyl ether	73	4.559	4.559	0.000	98	272118	50.0	44.8	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.966	4.966	0.000	96	198835	50.0	58.0	
37 1,1-Dichloroethane	63	5.179	5.179	0.000	97	228575	50.0	53.5	
38 Vinyl acetate	43	5.234	5.234	0.000	97	235391	50.0	54.2	
44 2,2-Dichloropropane	77	5.921	5.921	0.000	60	87565	50.0	34.4	
45 cis-1,2-Dichloroethene	96	5.927	5.927	0.000	85	119830	50.0	48.9	
46 2-Butanone (MEK)	43	5.946	5.946	0.000	68	105859	100.0	96.7	
49 Chlorobromomethane	128	6.213	6.213	0.000	87	44736	50.0	44.4	
51 Tetrahydrofuran	42	6.238	6.238	0.000	94	93133	100.0	125.7	
52 Chloroform	83	6.359	6.359	0.000	97	194548	50.0	51.1	
53 1,1,1-Trichloroethane	97	6.524	6.524	0.000	95	139777	50.0	46.0	
54 Cyclohexane	56	6.591	6.591	0.000	98	261815	50.0	58.4	
56 Carbon tetrachloride	117	6.694	6.694	0.000	86	118425	50.0	48.2	
55 1,1-Dichloropropene	75	6.706	6.706	0.000	88	158240	50.0	52.0	
57 Isobutyl alcohol	41	6.919	6.919	0.000	63	76686	1250.0	1416.5	
58 Benzene	78	6.925	6.925	0.000	95	450512	50.0	52.5	
59 1,2-Dichloroethane	62	7.004	7.004	0.000	96	162960	50.0	54.1	
62 n-Heptane	43	7.284	7.284	0.000	97	193295	50.0	67.9	
64 Trichloroethene	130	7.655	7.655	0.000	95	96817	50.0	46.1	
66 Methylcyclohexane	83	7.892	7.892	0.000	98	195557	50.0	52.8	
67 1,2-Dichloropropane	63	7.929	7.929	0.000	95	119460	50.0	54.3	
70 1,4-Dioxane	88	8.014	8.014	0.000	47	18390	1000.0	1193.6	M
68 Dibromomethane	93	8.014	8.014	0.000	95	59401	50.0	51.9	
71 Dichlorobromomethane	83	8.215	8.215	0.000	97	127868	50.0	53.2	
73 2-Chloroethyl vinyl ether	63	8.513	8.513	0.000	89	121786	100.0	105.5	
74 cis-1,3-Dichloropropene	75	8.659	8.659	0.000	86	142263	50.0	45.8	
75 4-Methyl-2-pentanone (MIBK	43	8.811	8.811	0.000	98	206946	100.0	93.2	
76 Toluene	91	8.987	8.987	0.000	97	452577	50.0	51.7	
77 trans-1,3-Dichloropropene	75	9.237	9.237	0.000	95	113054	50.0	41.5	
78 Ethyl methacrylate	69	9.298	9.298	0.000	93	118862	50.0	44.3	
79 1,1,2-Trichloroethane	97	9.432	9.432	0.000	94	82490	50.0	50.7	
80 Tetrachloroethene	164	9.498	9.498	0.000	94	85510	50.0	53.4	
81 1,3-Dichloropropane	76	9.590	9.590	0.000	97	162136	50.0	52.9	
82 2-Hexanone	43	9.644	9.644	0.000	100	158993	100.0	90.4	
84 Chlorodibromomethane	129	9.803	9.803	0.000	90	74743	50.0	49.9	
85 Ethylene Dibromide	107	9.912	9.912	0.000	100	79870	50.0	48.6	
86 3-Chlorobenzotrifluoride	180	10.375	10.375	0.000	91	154385	50.0	53.8	
87 Chlorobenzene	112	10.405	10.405	0.000	89	275975	50.0	52.3	
88 4-Chlorobenzotrifluoride	180	10.466	10.466	0.000	96	143855	50.0	53.5	
89 1,1,1,2-Tetrachloroethane	131	10.496	10.496	0.000	86	84121	50.0	51.3	
90 Ethylbenzene	106	10.502	10.502	0.000	99	158848	50.0	51.7	
91 m-Xylene & p-Xylene	106	10.636	10.636	0.000	0	197280	50.0	52.6	
92 o-Xylene	106	11.013	11.013	0.000	99	188739	50.0	54.4	
93 Styrene	104	11.038	11.038	0.000	94	327365	50.0	56.5	
94 Bromoform	173	11.220	11.220	0.000	95	44014	50.0	50.2	
96 2-Chlorobenzotrifluoride	180	11.287	11.287	0.000	95	147133	50.0	56.3	
97 Isopropylbenzene	105	11.384	11.384	0.000	98	495954	50.0	58.5	
100 Bromobenzene	156	11.695	11.695	0.000	97	106422	50.0	43.6	
99 1,1,2,2-Tetrachloroethane	83	11.701	11.701	0.000	93	114136	50.0	58.9	
102 trans-1,4-Dichloro-2-buten	53	11.737	11.737	0.000	73	36525	50.0	39.4	
101 1,2,3-Trichloropropane	110	11.755	11.755	0.000	90	37567	50.0	44.8	
103 N-Propylbenzene	120	11.798	11.798	0.000	99	130910	50.0	45.0	
104 2-Chlorotoluene	126	11.889	11.889	0.000	94	105835	50.0	43.8	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
105 3-Chlorotoluene	126	11.956	11.956	0.000	97	106135	50.0	41.0	
106 1,3,5-Trimethylbenzene	105	11.987	11.987	0.000	95	381545	50.0	49.5	
107 4-Chlorotoluene	126	12.011	12.011	0.000	99	113543	50.0	45.0	
108 tert-Butylbenzene	119	12.297	12.297	0.000	94	303894	50.0	46.9	
110 1,2,4-Trimethylbenzene	105	12.358	12.358	0.000	98	382487	50.0	49.9	
111 1,2-dichloro-4-(trifluorom	214	12.400	12.400	0.000	97	99843	50.0	47.3	
112 sec-Butylbenzene	105	12.522	12.522	0.000	96	447682	50.0	50.1	
113 1,3-Dichlorobenzene	146	12.638	12.638	0.000	96	188021	50.0	47.9	
114 4-Isopropyltoluene	119	12.674	12.674	0.000	97	353455	50.0	50.2	
115 1,4-Dichlorobenzene	146	12.741	12.741	0.000	93	188450	50.0	48.3	
116 2,4-Dichloro-1-(triflourom	214	12.765	12.765	0.000	95	89993	50.0	50.1	
118 2,5-Dichlorobenzotrifluori	214	12.808	12.808	0.000	0	98847	50.0	47.8	
120 n-Butylbenzene	91	13.088	13.088	0.000	98	302454	50.0	51.4	
121 1,2-Dichlorobenzene	146	13.100	13.100	0.000	93	163430	50.0	49.8	
122 1,2-Dibromo-3-Chloropropan	75	13.891	13.891	0.000	71	14660	50.0	44.5	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.031	14.031	0.000	0	292952	150.0	138.7	
125 2,3- & 3,4- Dichlorotoluen	125	14.450	14.450	0.000	0	179876	100.0	87.2	
126 1,2,4-Trichlorobenzene	180	14.712	14.712	0.000	91	63522	50.0	43.9	
127 Hexachlorobutadiene	225	14.858	14.858	0.000	96	28140	50.0	40.0	
128 Naphthalene	128	14.980	14.980	0.000	98	153315	50.0	36.4	
129 1,2,3-Trichlorobenzene	180	15.205	15.205	0.000	91	45938	50.0	35.4	
131 2,4,5-Trichlorotoluene	159	15.983	15.983	0.000	0	20358	50.0	23.4	
130 2,3,6-Trichlorotoluene	159	16.081	16.081	0.000	93	18190	50.0	17.5	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
S 134 1,2-Dichloroethene, Total	96				0		100.0	96.2	
S 133 Xylenes, Total	106				0		100.0	107.0	
S 135 1,3-Dichloropropene, Total	1				0		100.0	87.3	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

VOA8260VOAPRI_00216	Amount Added:	2.00	Units: uL		
voaWKetPriRes_00002	Amount Added:	2.00	Units: uL		
voaWEEmixRest_00001	Amount Added:	2.00	Units: uL		
voaWva2ndRest_00007	Amount Added:	2.00	Units: uL		
voaWacro2ndRe_00007	Amount Added:	6.00	Units: uL		
voaW2cleveRes_00002	Amount Added:	2.00	Units: uL		
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent	
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent	

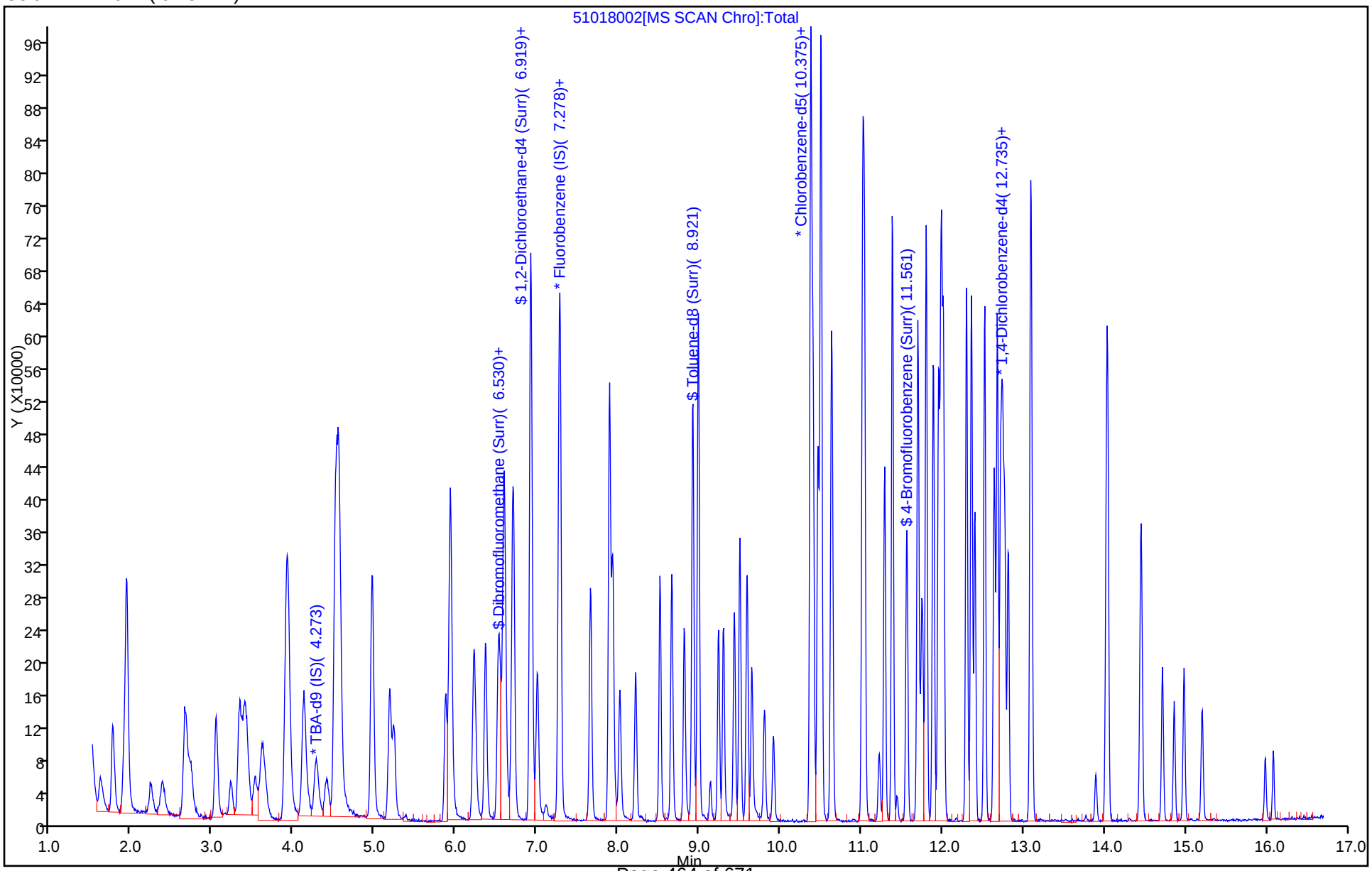
Report Date: 18-Oct-2016 14:26:22 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018002.D

Injection Date:	18-Oct-2016 12:14:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	CCVIS			Worklist Smp#:	2
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	2
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh

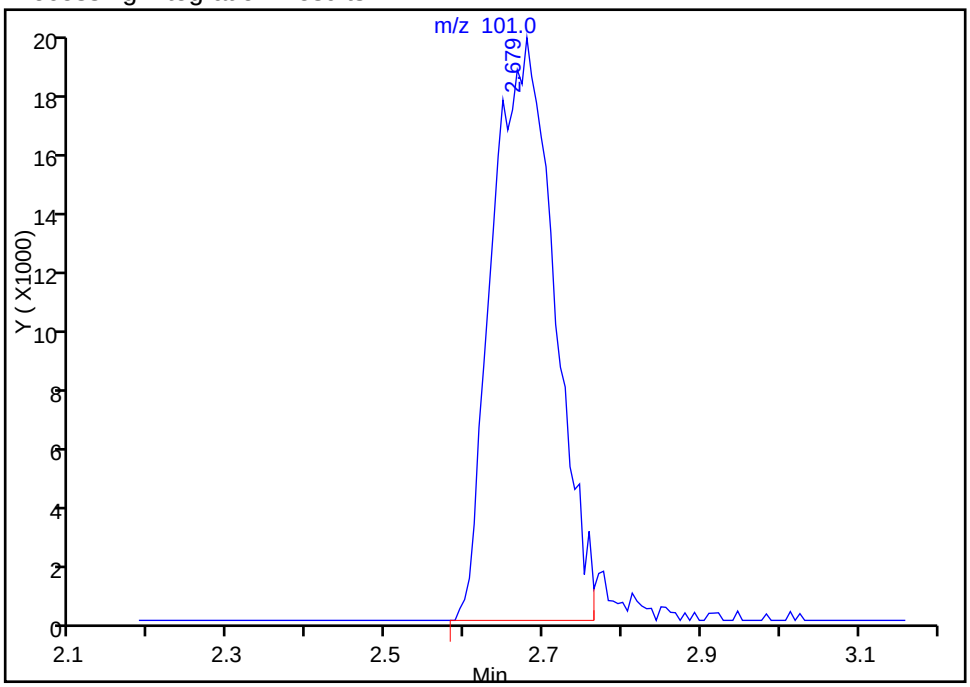
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018002.D				
Injection Date:	18-Oct-2016 12:14:30	Instrument ID:	CHHP5		
Lims ID:	CCVIS				
Client ID:					
Operator ID:	001562	ALS Bottle#:	2	Worklist Smp#:	2
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

18 Trichlorofluoromethane, CAS: 75-69-4

Signal: 1

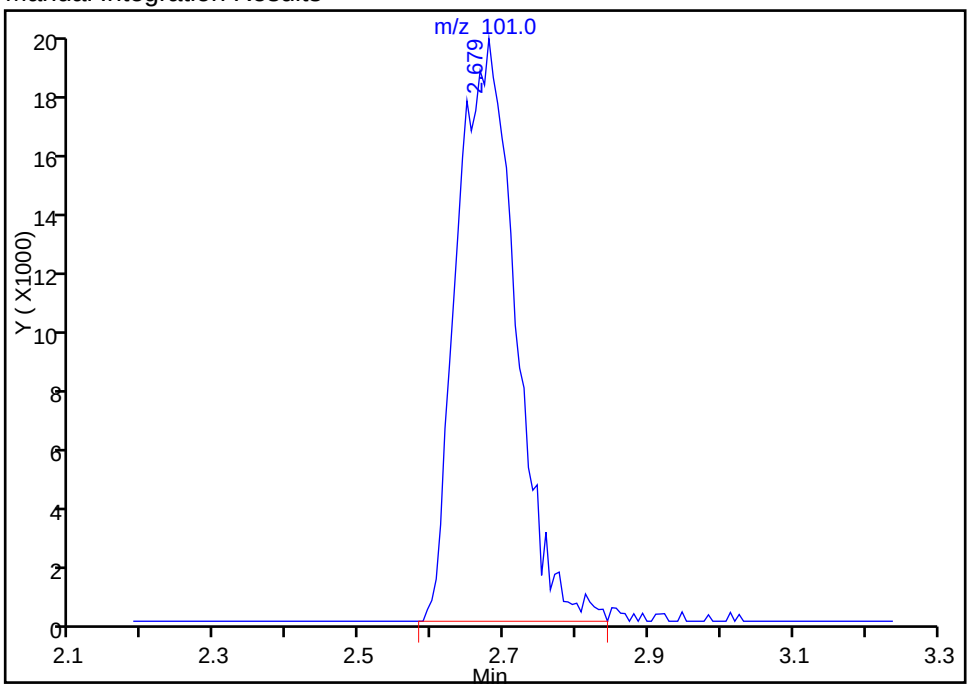
Processing Integration Results

RT: 2.68
Area: 107868
Amount: 49.232314
Amount Units: ng



Manual Integration Results

RT: 2.68
Area: 111130
Amount: 50.721132
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 13:14:00
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

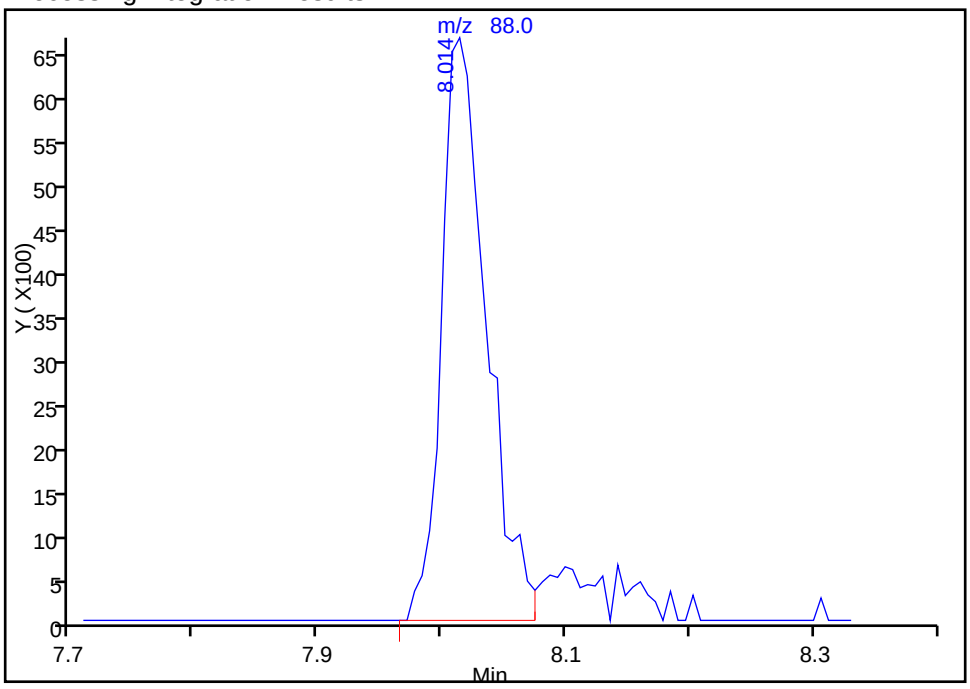
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018002.D				
Injection Date:	18-Oct-2016 12:14:30	Instrument ID:	CHHP5		
Lims ID:	CCVIS				
Client ID:					
Operator ID:	001562	ALS Bottle#:	2	Worklist Smp#:	2
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

70 1,4-Dioxane, CAS: 123-91-1

Signal: 1

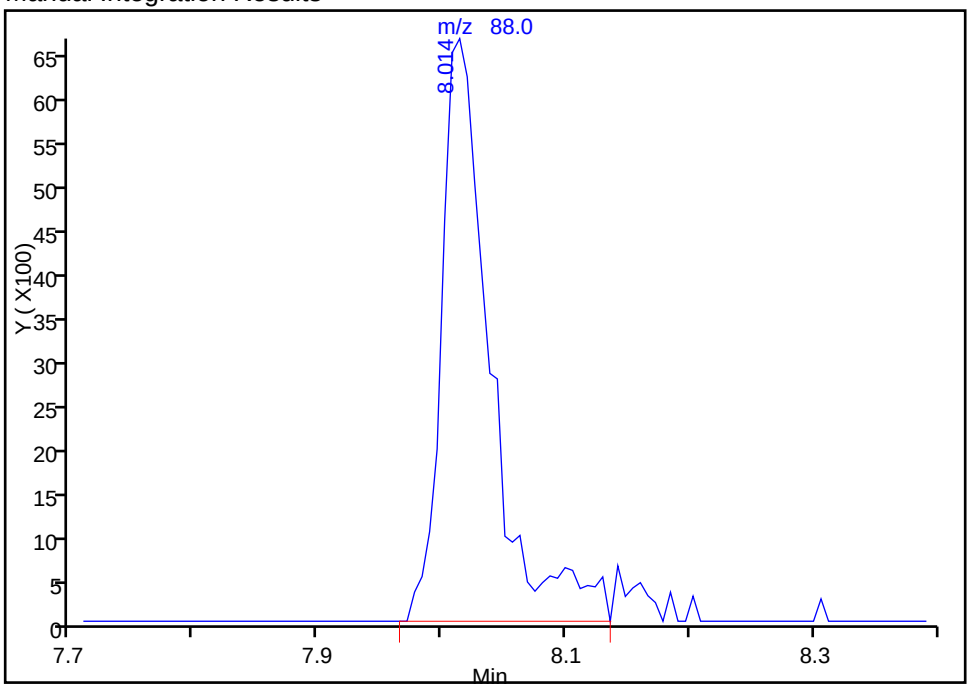
Processing Integration Results

RT: 8.01
Area: 16808
Amount: 1090.8780
Amount Units: ng



Manual Integration Results

RT: 8.01
Area: 18390
Amount: 1193.5534
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 13:14:00

Audit Action: Manually Integrated Audit Reason: Incomplete Integration

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191652/2 Calibration Date: 10/19/2016 10:44

Instrument ID: CHHP6 Calib Start Date: 10/17/2016 14:23

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 10/17/2016 17:13

Lab File ID: 61019002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
Dichlorodifluoromethane	Ave	0.2275	0.2269	0.1000	9.97	10.0	-0.3	20.0
Chloromethane	Ave	0.2918	0.2747	0.1000	9.42	10.0	-5.8	20.0
Vinyl chloride	Ave	0.2665	0.2566	0.1000	9.63	10.0	-3.7	20.0
1,3-Butadiene	Ave	0.2789	0.2802	0.0100	10.0	10.0	0.5	20.0
Bromomethane	Lin2		0.1234	0.0500	10.6	10.0	6.0	20.0
Chloroethane	Ave	0.1688	0.1551	0.0500	9.19	10.0	-8.1	20.0
Dichlorofluoromethane	Ave	0.3861	0.3718	0.0100	9.63	10.0	-3.7	20.0
Trichlorofluoromethane	Ave	0.3195	0.3288	0.1000	10.3	10.0	2.9	20.0
Ethyl ether	Ave	0.2606	0.2517	0.0100	9.66	10.0	-3.4	20.0
Acrolein	Ave	0.0557	0.0517	0.0100	27.9	30.0	-7.1	20.0
1,1-Dichloroethene	Ave	0.2457	0.2401	0.1000	9.77	10.0	-2.3	20.0
1,1,2-Trichloro-1,2,2-trifluoroethane	Ave	0.2488	0.2498	0.1000	10.0	10.0	0.4	20.0
Acetone	Ave	0.0597	0.0557	0.0500	18.7	20.0	-6.6	20.0
Iodomethane	Ave	0.3685	0.3568	0.0100	9.68	10.0	-3.2	20.0
Carbon disulfide	Ave	0.5472	0.5550	0.1000	10.1	10.0	1.4	20.0
Allyl chloride	Ave	0.1364	0.1347	0.0100	9.87	10.0	-1.3	20.0
Methyl acetate	Ave	0.2081	0.1933	0.1000	46.4	50.0	-7.1	20.0
Methylene Chloride	Lin2		0.3000	0.1000	9.53	10.0	-4.7	20.0
tert-Butyl alcohol	Ave	1.016	1.055	0.0100	104	100	3.9	20.0
Acrylonitrile	Ave	0.1104	0.1064	0.0100	96.3	100	-3.7	20.0
trans-1,2-Dichloroethene	Ave	0.2761	0.2659	0.1000	9.63	10.0	-3.7	20.0
Methyl tert-butyl ether	Ave	0.5600	0.5283	0.1000	9.43	10.0	-5.7	20.0
Hexane	Ave	0.4014	0.3787	0.0100	9.43	10.0	-5.7	20.0
1,1-Dichloroethane	Ave	0.4610	0.4586	0.2000	9.95	10.0	-0.5	20.0
Vinyl acetate	Ave	0.4211	0.3958	0.0100	9.40	10.0	-6.0	20.0
2,2-Dichloropropane	Ave	0.0480	0.0498	0.0100	10.4	10.0	3.6	20.0
cis-1,2-Dichloroethene	Ave	0.3090	0.2982	0.1000	9.65	10.0	-3.5	20.0
2-Butanone (MEK)	Ave	0.1134	0.0988	0.0500	17.4	20.0	-12.9	20.0
Bromochloromethane	Ave	0.1388	0.1296	0.0100	9.33	10.0	-6.7	20.0
Tetrahydrofuran	Ave	0.0880	0.0818	0.0100	18.6	20.0	-7.1	20.0
Chloroform	Ave	0.4279	0.4029	0.2000	9.42	10.0	-5.8	20.0
1,1,1-Trichloroethane	Ave	0.2581	0.2728	0.1000	10.6	10.0	5.7	20.0
Cyclohexane	Ave	0.4711	0.4582	0.1000	9.73	10.0	-2.7	20.0
Carbon tetrachloride	Ave	0.1724	0.1882	0.1000	10.9	10.0	9.2	20.0
1,1-Dichloropropene	Ave	0.3464	0.3391	0.0100	9.79	10.0	-2.1	20.0
Isobutyl alcohol	Ave	0.0059	0.0056*	0.0100	236	250	-5.7	20.0
Benzene	Ave	1.112	1.099	0.5000	9.88	10.0	-1.2	20.0
1,2-Dichloroethane	Ave	0.3541	0.3324	0.1000	9.39	10.0	-6.1	20.0
n-Heptane	Ave	0.3289	0.3274	0.0100	9.95	10.0	-0.5	20.0
Trichloroethene	Ave	0.2713	0.2670	0.2000	9.84	10.0	-1.6	20.0

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191652/2 Calibration Date: 10/19/2016 10:44

Instrument ID: CHHP6 Calib Start Date: 10/17/2016 14:23

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 10/17/2016 17:13

Lab File ID: 61019002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
Methylcyclohexane	Ave	0.4523	0.4517	0.1000	9.99	10.0	-0.1	20.0
1,2-Dichloropropane	Ave	0.2949	0.2790	0.1000	9.46	10.0	-5.4	20.0
1,4-Dioxane	Ave	0.0029	0.0026*	0.0100	177	200	-11.4	20.0
Dibromomethane	Ave	0.1570	0.1542	0.0100	9.82	10.0	-1.8	20.0
Bromodichloromethane	Ave	0.2366	0.2421	0.2000	10.2	10.0	2.3	20.0
2-Chloroethyl vinyl ether	Ave	0.1768	0.1664	0.0100	18.8	20.0	-5.9	20.0
cis-1,3-Dichloropropene	Ave	0.3276	0.3354	0.2000	10.2	10.0	2.4	20.0
4-Methyl-2-pentanone (MIBK)	Ave	0.9273	0.9088	0.1000	19.6	20.0	-2.0	20.0
Toluene	Ave	4.489	4.695	0.4000	10.5	10.0	4.6	20.0
trans-1,3-Dichloropropene	Ave	1.027	1.077	0.1000	10.5	10.0	4.9	20.0
Ethyl methacrylate	Ave	1.225	1.247	0.0100	10.2	10.0	1.8	20.0
1,1,2-Trichloroethane	Ave	0.9594	0.9642	0.1000	10.1	10.0	0.5	20.0
Tetrachloroethene	Ave	0.8633	0.8627	0.2000	9.99	10.0	-0.0	20.0
1,3-Dichloropropane	Ave	1.784	1.781	0.0100	9.98	10.0	-0.2	20.0
2-Hexanone	Ave	0.5554	0.4995	0.1000	18.0	20.0	-10.1	20.0
Dibromochloromethane	Ave	0.6051	0.6441	0.1000	10.6	10.0	6.5	20.0
1,2-Dibromoethane (EDB)	Ave	0.8631	0.8929	0.1000	10.3	10.0	3.5	20.0
3-Chlorobenzotrifluoride	Ave	1.488	1.511	0.0100	10.2	10.0	1.5	20.0
Chlorobenzene	Ave	3.046	3.051	0.5000	10.0	10.0	0.2	20.0
4-Chlorobenzotrifluoride	Ave	1.389	1.442	0.0100	10.4	10.0	3.8	20.0
1,1,1,2-Tetrachloroethane	Ave	0.6779	0.7432	0.0100	11.0	10.0	9.6	20.0
Ethylbenzene	Ave	1.640	1.705	0.1000	10.4	10.0	4.0	20.0
m-Xylene & p-Xylene	Ave	1.992	2.078	0.1000	10.4	10.0	4.3	20.0
o-Xylene	Ave	1.925	2.003	0.3000	10.4	10.0	4.1	20.0
Styrene	Ave	3.193	3.416	0.3000	10.7	10.0	7.0	20.0
Bromoform	Qua		0.3564	0.1000	11.6	10.0	15.5	20.0
2-Chlorobenzotrifluoride	Ave	1.436	1.476	0.0100	10.3	10.0	2.8	20.0
Isopropylbenzene	Ave	4.590	4.952	0.1000	10.8	10.0	7.9	20.0
Bromobenzene	Ave	0.8093	0.7772	0.0100	9.60	10.0	-4.0	20.0
1,1,2,2-Tetrachloroethane	Ave	1.212	1.254	0.3000	10.3	10.0	3.5	20.0
trans-1,4-Dichloro-2-butene	Ave	0.2098	0.2053	0.0100	9.79	10.0	-2.1	20.0
1,2,3-Trichloropropane	Ave	0.2719	0.2722	0.0100	10.0	10.0	0.1	20.0
N-Propylbenzene	Ave	0.9391	0.9403	0.0100	10.0	10.0	0.1	20.0
2-Chlorotoluene	Ave	0.8204	0.7903	0.0100	9.63	10.0	-3.7	20.0
3-Chlorotoluene	Ave	0.8891	0.8854	0.0100	9.96	10.0	-0.4	20.0
1,3,5-Trimethylbenzene	Ave	2.586	2.707	0.0100	10.5	10.0	4.7	20.0
4-Chlorotoluene	Ave	0.8952	0.8908	0.0100	9.95	10.0	-0.5	20.0
tert-Butylbenzene	Ave	2.191	2.250	0.0100	10.3	10.0	2.7	20.0
1,2,4-Trimethylbenzene	Ave	2.686	2.759	0.0100	10.3	10.0	2.7	20.0
3,4-Dichlorobenzotrifluoride	Ave	0.7585	0.7444	0.0100	9.82	10.0	-1.8	20.0
sec-Butylbenzene	Ave	3.191	3.324	0.0100	10.4	10.0	4.2	20.0

FORM VII
GC/MS VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191652/2 Calibration Date: 10/19/2016 10:44

Instrument ID: CHHP6 Calib Start Date: 10/17/2016 14:23

GC Column: DB-624 ID: 0.18(mm) Calib End Date: 10/17/2016 17:13

Lab File ID: 61019002.D Conc. Units: ug/L Heated Purge: (Y/N) N

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
1,3-Dichlorobenzene	Ave	1.572	1.555	0.6000	9.90	10.0	-1.0	20.0
4-Isopropyltoluene	Ave	2.709	2.814	0.0100	10.4	10.0	3.9	20.0
1,4-Dichlorobenzene	Ave	1.646	1.638	0.5000	9.95	10.0	-0.5	20.0
2,4-Dichlorobenzotrifluoride	Ave	0.7408	0.7610	0.0100	10.3	10.0	2.7	20.0
2,5-Dichlorobenzotrifluoride	Ave	0.8494	0.8204	0.0100	9.66	10.0	-3.4	20.0
n-Butylbenzene	Ave	2.450	2.522	0.0100	10.3	10.0	2.9	20.0
1,2-Dichlorobenzene	Ave	1.546	1.535	0.4000	9.93	10.0	-0.7	20.0
1,2-Dibromo-3-Chloropropane	Ave	0.0751	0.0881	0.0500	11.7	10.0	17.4	20.0
2,4- & 2,5- & 2,6-Dichlorotoluene	Ave	1.221	1.210	0.0100	29.7	30.0	-0.9	20.0
2,3- & 3,4- Dichlorotoluene	Ave	1.346	1.315	0.0100	19.6	20.0	-2.2	20.0
1,2,4-Trichlorobenzene	Ave	1.045	1.031	0.2000	9.87	10.0	-1.3	20.0
Hexachlorobutadiene	Ave	0.3562	0.3618	0.0100	10.2	10.0	1.5	20.0
Naphthalene	Ave	2.491	2.501	0.0100	10.0	10.0	0.4	20.0
1,2,3-Trichlorobenzene	Ave	0.9190	0.9087	0.0100	9.89	10.0	-1.1	20.0
2,4,5-Trichlorotoluene	Ave	0.4320	0.4064	0.0100	9.41	10.0	-5.9	20.0
2,3,6-Trichlorotoluene	Ave	0.4026	0.3841	0.0100	9.54	10.0	-4.6	20.0
Dibromofluoromethane (Surr)	Ave	0.2135	0.1954		9.15	10.0	-8.5	20.0
1,2-Dichloroethane-d4 (Surr)	Ave	0.2889	0.2576		8.92	10.0	-10.8	20.0
Toluene-d8 (Surr)	Ave	3.657	3.802		10.4	10.0	4.0	20.0
4-Bromofluorobenzene (Surr)	Ave	1.377	1.402		10.2	10.0	1.9	20.0

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019002.D
Lims ID: CCVIS
Client ID:
Sample Type: CCVIS
Inject. Date: 19-Oct-2016 10:44:30 ALS Bottle#: 2 Worklist Smp#: 2
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013943-002
Misc. Info.: CCVIS
Operator ID: 001562 Instrument ID: CHHP6
Sublist: chrom-MSVOA_LL_CHHP6*sub10

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 12:47:55 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 11:08:51

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.139	4.139	0.000	93	125265	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.181	7.181	0.000	99	472576	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.289	10.289	0.000	85	116257	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.631	12.631	0.000	96	178681	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.451	6.451	0.000	93	92325	50.0	45.8	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.822	6.822	0.000	83	121753	50.0	44.6	
$ 7 Toluene-d8 (Surr)	98	8.835	8.835	0.000	93	442053	50.0	52.0	
$ 8 4-Bromofluorobenzene (Surr	95	11.476	11.476	0.000	89	163031	50.0	50.9	
11 Dichlorodifluoromethane	85	1.547	1.547	0.000	100	107211	50.0	49.9	
12 Chloromethane	50	1.699	1.699	0.000	99	129836	50.0	47.1	
13 Vinyl chloride	62	1.839	1.839	0.000	97	121266	50.0	48.1	
14 Butadiene	39	1.870	1.870	0.000	93	132413	50.0	50.2	
15 Bromomethane	94	2.162	2.162	0.000	92	58292	50.0	53.0	
16 Chloroethane	64	2.296	2.296	0.000	99	73317	50.0	46.0	
17 Dichlorofluoromethane	67	2.563	2.563	0.000	97	175687	50.0	48.1	
18 Trichlorofluoromethane	101	2.594	2.594	0.000	83	155376	50.0	51.5	M
20 Ethyl ether	59	2.947	2.947	0.000	92	118944	50.0	48.3	
21 Acrolein	56	3.117	3.117	0.000	98	73320	150.0	139.3	
22 1,1-Dichloroethene	96	3.226	3.226	0.000	98	113446	50.0	48.8	
23 1,1,2-Trichloro-1,2,2-trif	101	3.287	3.287	0.000	94	118061	50.0	50.2	
24 Acetone	43	3.324	3.324	0.000	99	52647	100.0	93.4	
25 Iodomethane	142	3.415	3.415	0.000	97	168612	50.0	48.4	
26 Carbon disulfide	76	3.500	3.500	0.000	99	262282	50.0	50.7	
29 3-Chloro-1-propene	76	3.780	3.780	0.000	92	63630	50.0	49.3	
30 Methyl acetate	43	3.804	3.804	0.000	97	456805	250.0	232.2	
31 Methylene Chloride	84	4.005	4.005	0.000	93	141783	50.0	47.7	
32 2-Methyl-2-propanol	59	4.279	4.279	0.000	90	66087	500.0	519.3	
33 Acrylonitrile	53	4.394	4.394	0.000	100	502582	500.0	481.5	
34 trans-1,2-Dichloroethene	96	4.425	4.425	0.000	99	125653	50.0	48.1	
35 Methyl tert-butyl ether	73	4.443	4.443	0.000	97	249669	50.0	47.2	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 Hexane	57	4.857	4.857	0.000	91	178968	50.0	47.2	
37 1,1-Dichloroethane	63	5.070	5.070	0.000	97	216717	50.0	49.7	
38 Vinyl acetate	43	5.124	5.124	0.000	98	187023	50.0	47.0	
42 2,2-Dichloropropane	97	5.824	5.824	0.000	56	23515	50.0	51.8	
43 cis-1,2-Dichloroethene	96	5.830	5.830	0.000	81	140930	50.0	48.3	
44 2-Butanone (MEK)	43	5.842	5.842	0.000	100	93354	100.0	87.1	
48 Chlorobromomethane	128	6.116	6.116	0.000	98	61223	50.0	46.7	
49 Tetrahydrofuran	42	6.128	6.128	0.000	89	77264	100.0	92.9	
50 Chloroform	83	6.268	6.268	0.000	96	190399	50.0	47.1	
51 1,1,1-Trichloroethane	97	6.420	6.420	0.000	98	128897	50.0	52.8	
52 Cyclohexane	56	6.487	6.487	0.000	92	216527	50.0	48.6	
53 Carbon tetrachloride	117	6.597	6.597	0.000	95	88959	50.0	54.6	
54 1,1-Dichloropropene	75	6.609	6.609	0.000	95	160233	50.0	48.9	
55 Isobutyl alcohol	41	6.822	6.822	0.000	59	65611	1250.0	1178.3	
56 Benzene	78	6.828	6.828	0.000	97	519326	50.0	49.4	
57 1,2-Dichloroethane	62	6.907	6.907	0.000	96	157092	50.0	46.9	
59 n-Heptane	43	7.199	7.199	0.000	91	154734	50.0	49.8	
61 Trichloroethene	130	7.570	7.570	0.000	98	126160	50.0	49.2	
63 Methylcyclohexane	83	7.801	7.801	0.000	88	213465	50.0	49.9	
64 1,2-Dichloropropane	63	7.838	7.838	0.000	95	131853	50.0	47.3	
67 Dibromomethane	93	7.929	7.929	0.000	96	72858	50.0	49.1	
65 1,4-Dioxane	88	7.929	7.929	0.000	46	24608	1000.0	886.0	
68 Dichlorobromomethane	83	8.124	8.124	0.000	98	114387	50.0	51.2	
70 2-Chloroethyl vinyl ether	63	8.434	8.434	0.000	92	157266	100.0	94.1	
71 cis-1,3-Dichloropropene	75	8.574	8.574	0.000	95	158498	50.0	51.2	
72 4-Methyl-2-pentanone (MIBK	43	8.732	8.732	0.000	96	211297	100.0	98.0	
73 Toluene	91	8.902	8.902	0.000	99	545866	50.0	52.3	
74 trans-1,3-Dichloropropene	75	9.152	9.152	0.000	94	125169	50.0	52.4	
75 Ethyl methacrylate	69	9.219	9.219	0.000	89	144928	50.0	50.9	
76 1,1,2-Trichloroethane	97	9.346	9.346	0.000	91	112096	50.0	50.3	
77 Tetrachloroethene	164	9.413	9.413	0.000	97	100290	50.0	50.0	
78 1,3-Dichloropropane	76	9.505	9.505	0.000	91	207042	50.0	49.9	
79 2-Hexanone	43	9.565	9.565	0.000	96	116148	100.0	89.9	
81 Chlorodibromomethane	129	9.717	9.717	0.000	91	74886	50.0	53.2	
82 Ethylene Dibromide	107	9.827	9.827	0.000	99	103810	50.0	51.7	
83 3-Chlorobenzotrifluoride	180	10.295	10.295	0.000	95	175632	50.0	50.8	
84 Chlorobenzene	112	10.320	10.320	0.000	94	354703	50.0	50.1	
85 4-Chlorobenzotrifluoride	180	10.387	10.387	0.000	95	167676	50.0	51.9	
87 Ethylbenzene	106	10.417	10.417	0.000	98	198216	50.0	52.0	
86 1,1,1,2-Tetrachloroethane	131	10.417	10.417	0.000	91	86401	50.0	54.8	
88 m-Xylene & p-Xylene	106	10.551	10.551	0.000	99	241527	50.0	52.1	
89 o-Xylene	106	10.934	10.934	0.000	95	232859	50.0	52.0	
90 Styrene	104	10.952	10.952	0.000	96	397100	50.0	53.5	
91 Bromoform	173	11.135	11.135	0.000	95	41434	50.0	57.8	
92 2-Chlorobenzotrifluoride	180	11.208	11.208	0.000	98	171574	50.0	51.4	
93 Isopropylbenzene	105	11.299	11.299	0.000	96	575664	50.0	53.9	
95 Bromobenzene	156	11.609	11.609	0.000	96	138876	50.0	48.0	
96 1,1,2,2-Tetrachloroethane	83	11.615	11.615	0.000	93	145778	50.0	51.7	
97 trans-1,4-Dichloro-2-buten	53	11.652	11.652	0.000	75	36677	50.0	48.9	
98 1,2,3-Trichloropropane	110	11.670	11.670	0.000	86	48641	50.0	50.1	
99 N-Propylbenzene	120	11.719	11.719	0.000	98	168012	50.0	50.1	
100 2-Chlorotoluene	126	11.804	11.804	0.000	97	141213	50.0	48.2	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
101 3-Chlorotoluene	126	11.871	11.871	0.000	95	158198	50.0	49.8	
102 1,3,5-Trimethylbenzene	105	11.901	11.901	0.000	96	483606	50.0	52.3	
103 4-Chlorotoluene	126	11.926	11.926	0.000	98	159177	50.0	49.8	
104 tert-Butylbenzene	119	12.212	12.212	0.000	93	401987	50.0	51.3	
106 1,2,4-Trimethylbenzene	105	12.273	12.273	0.000	97	492922	50.0	51.4	
107 1,2-dichloro-4-(trifluorom	214	12.321	12.321	0.000	97	133017	50.0	49.1	
108 sec-Butylbenzene	105	12.437	12.437	0.000	94	593979	50.0	52.1	
109 1,3-Dichlorobenzene	146	12.552	12.552	0.000	98	277892	50.0	49.5	
110 4-Isopropyltoluene	119	12.595	12.595	0.000	97	502727	50.0	51.9	
111 1,4-Dichlorobenzene	146	12.656	12.656	0.000	96	292763	50.0	49.8	
113 2,4-Dichloro-1-(triflourom	214	12.686	12.686	0.000	96	135979	50.0	51.4	
114 2,5-Dichlorobenzotrifluori	214	12.735	12.735	0.000	97	146597	50.0	48.3	
116 n-Butylbenzene	91	13.003	13.003	0.000	97	450593	50.0	51.5	
117 1,2-Dichlorobenzene	146	13.015	13.015	0.000	97	274244	50.0	49.6	
118 1,2-Dibromo-3-Chloropropan	75	13.799	13.806	-0.007	77	15749	50.0	58.7	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.945	13.945	0.000	98	648408	150.0	148.6	
121 2,3- & 3,4- Dichlorotoluen	125	14.365	14.365	0.000	98	470092	100.0	97.8	
122 1,2,4-Trichlorobenzene	180	14.627	14.627	0.000	94	184270	50.0	49.3	
123 Hexachlorobutadiene	225	14.773	14.773	0.000	96	64638	50.0	50.8	
124 Naphthalene	128	14.888	14.888	0.000	97	446906	50.0	50.2	
125 1,2,3-Trichlorobenzene	180	15.113	15.113	0.000	94	162360	50.0	49.4	
126 2,4,5-Trichlorotoluene	159	15.898	15.898	0.000	0	72607	50.0	47.0	
127 2,3,6-Trichlorotoluene	159	16.002	16.002	0.000	94	68639	50.0	47.7	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
S 130 1,2-Dichloroethene, Total	96				0		100.0	96.4	
S 131 Xylenes, Total	106				0		100.0	104.2	
S 132 1,3-Dichloropropene, Total	1				0		100.0	103.6	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Review Flags

M - Manually Integrated

Reagents:

VOA8260VOAPRI_00216	Amount Added:	2.00	Units: uL	
voaWEEmixRest_00001	Amount Added:	2.00	Units: uL	
voaWva2ndRest_00007	Amount Added:	2.00	Units: uL	
voaW2cleveRes_00002	Amount Added:	2.00	Units: uL	
voaWKetPriRes_00002	Amount Added:	2.00	Units: uL	
voaWacro2ndRe_00007	Amount Added:	6.00	Units: uL	
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00060	Amount Added:	2.00	Units: uL	Run Reagent

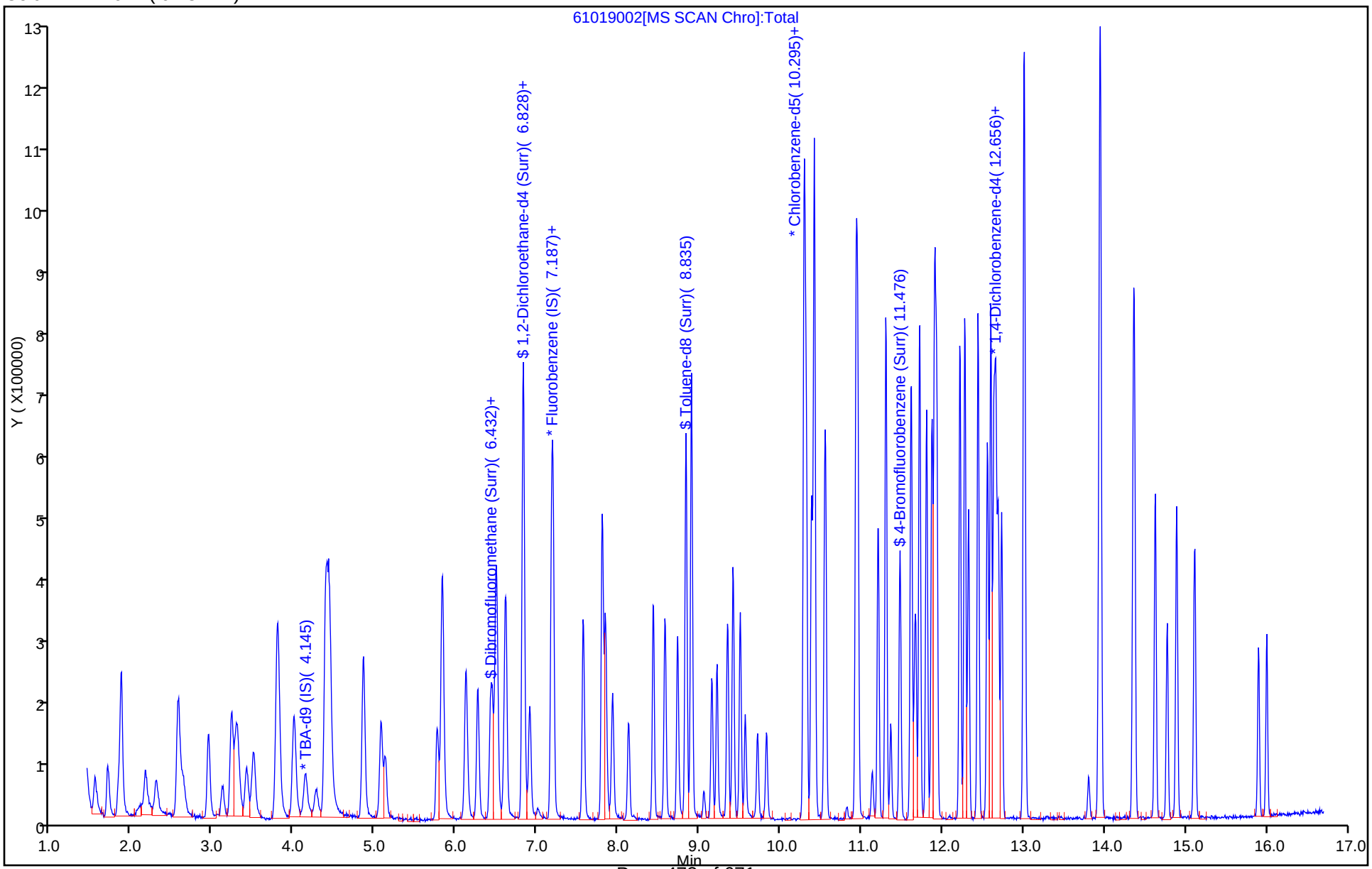
Report Date: 19-Oct-2016 12:47:57 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019002.D

Injection Date:	19-Oct-2016 10:44:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	CCVIS			Worklist Smp#:	2
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	2
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh

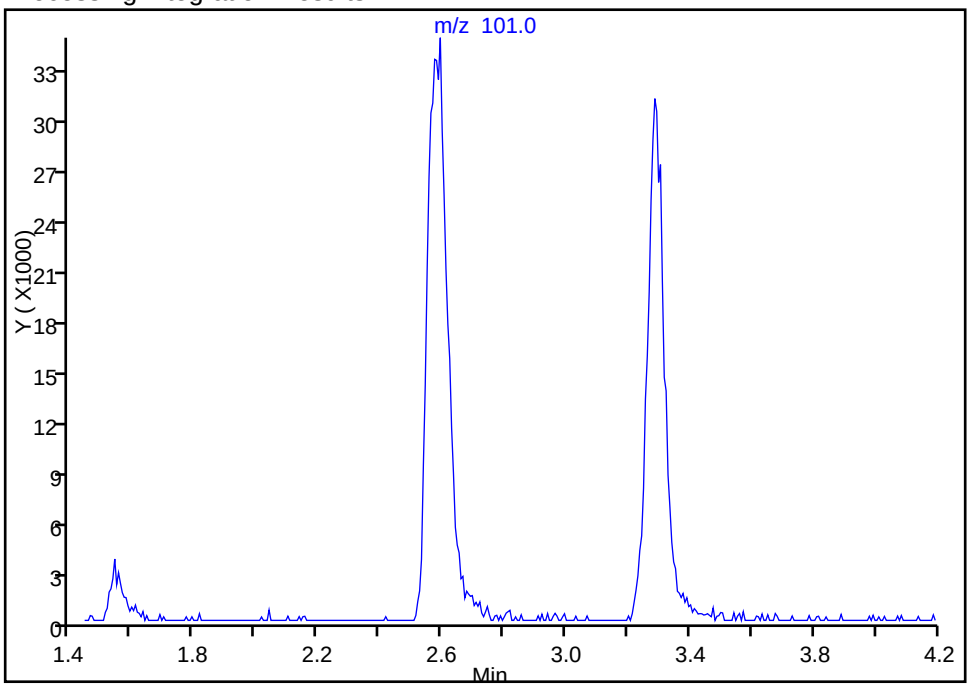
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019002.D				
Injection Date:	19-Oct-2016 10:44:30	Instrument ID:	CHHP6		
Lims ID:	CCVIS				
Client ID:					
Operator ID:	001562	ALS Bottle#:	2	Worklist Smp#:	2
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

18 Trichlorofluoromethane, CAS: 75-69-4

Signal: 1

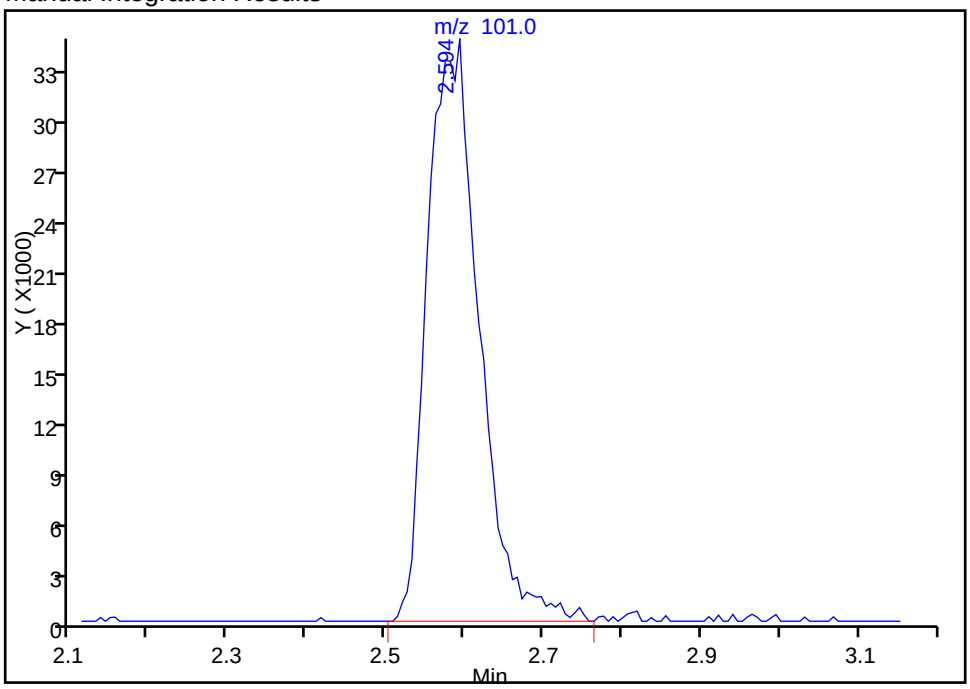
Processing Integration Results

Not Detected
Expected RT: 2.59



Manual Integration Results

RT: 2.59
Area: 155376
Amount: 51.450804
Amount Units: ng



Reviewer: fergusond, 19-Oct-2016 11:08:51
Audit Action: Assigned Compound ID Audit Reason: Incomplete Integration

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

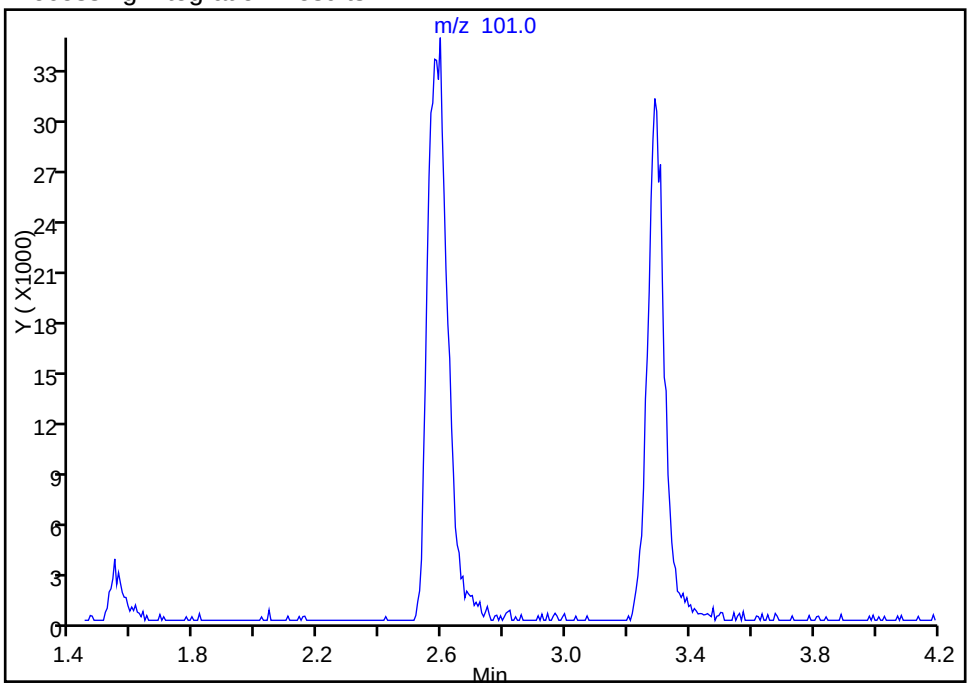
Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019002.D				
Injection Date:	19-Oct-2016 10:44:30	Instrument ID:	CHHP6		
Lims ID:	CCVIS				
Client ID:					
Operator ID:	001562	ALS Bottle#:	2	Worklist Smp#:	2
Purge Vol:	5.000 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		
Column:	DB-624 (0.18 mm)	Detector	MS SCAN		

18 Trichlorofluoromethane, CAS: 75-69-4

Signal: 1

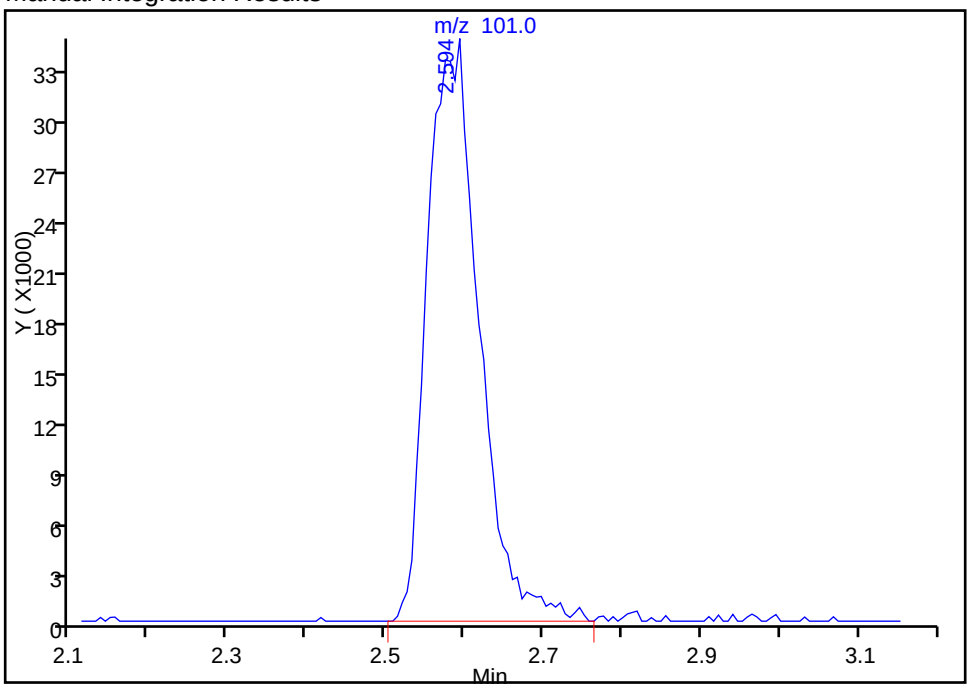
Not Detected
Expected RT: 2.59

Processing Integration Results



Manual Integration Results

RT: 2.59
Area: 155376
Amount: 51.450804
Amount Units: ng



Reviewer: fergusond, 19-Oct-2016 11:08:51
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928002.D				
Lims ID:	BFB				
Client ID:					
Sample Type:	BFB				
Inject. Date:	28-Sep-2016 12:00:30	ALS Bottle#:	2	Worklist Smp#:	2
Injection Vol:	5.0 mL	Dil. Factor:	1.0000		
Sample Info:	180-0013640-002				
Misc. Info.:	BFB				
Operator ID:	001562	Instrument ID:	CHHP5		
Method:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\MSVOA_LL_CHHP5.m				
Limit Group:	VOA 8260C ICAL				
Last Update:	29-Sep-2016 09:37:17	Calib Date:	28-Sep-2016 18:27:30		
Integrator:	RTE	ID Type:	Deconvolution ID		
Quant Method:	Internal Standard	Quant By:	Initial Calibration		
Last ICal File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928015.D				
Column 1 :	DB-624 (0.18 mm)		Det: MS SCAN		
Process Host:	XAWRK034				
First Level Reviewer: fergusond		Date:	28-Sep-2016 12:24:05		

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
$ 10 BFB	95	8.365	8.365	0.000	0	77450	NR	NR	

QC Flag Legend

Processing Flags

NR - Missing Quant Standard

Reagents:

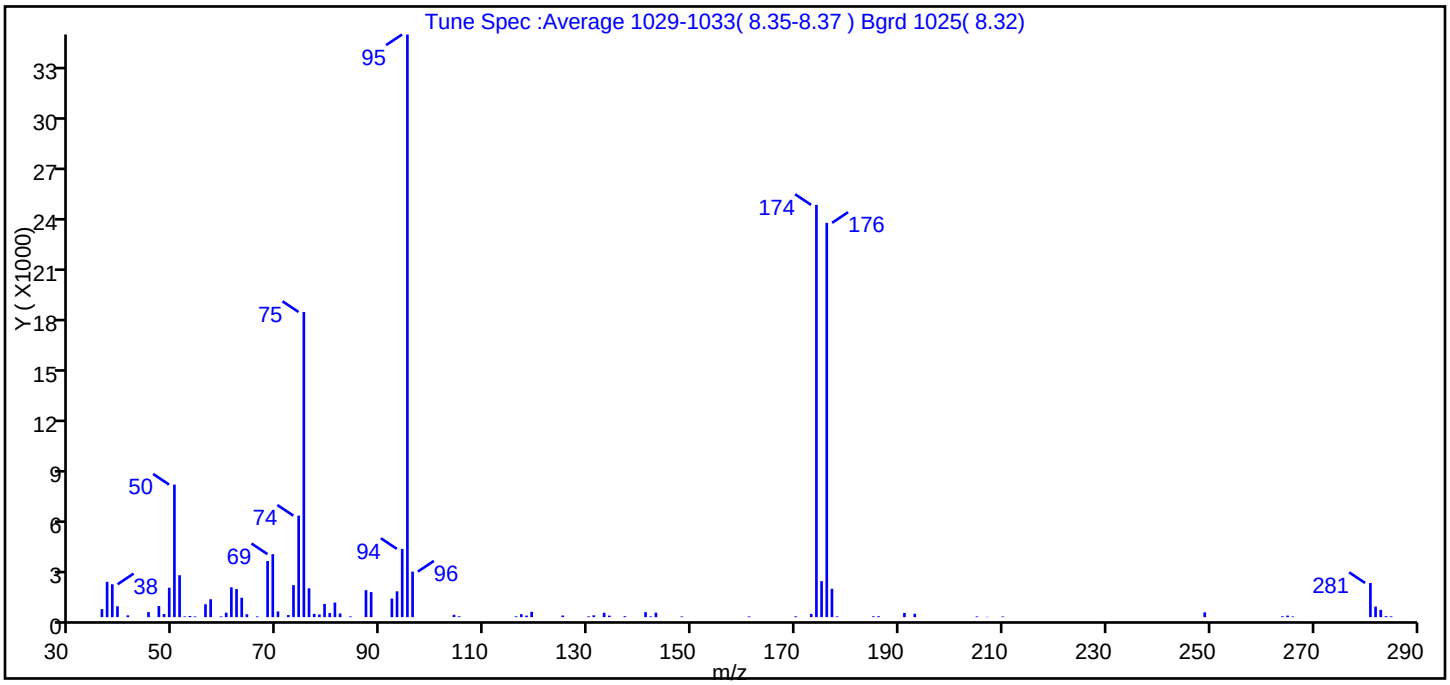
VOABFB25_00079 Amount Added: 1.00 Units: uL

MS Tune Report

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928002.D				
Injection Date:	28-Sep-2016 12:00:30	Instrument ID:	CHHP5		
Lims ID:	BFB				
Client ID:					
Operator ID:	001562	ALS Bottle#:	2	Worklist Smp#:	2
Injection Vol:	5.0 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Tune Method:	BFB Method 8260				

$ 10 BFB



m/z	Ion Abundance Criteria	% Relative Abundance
95	Base peak, 100% relative abundance	100.0
50	15 to 40% of m/z 95	22.7
75	30 to 60% of m/z 95	52.4
96	5 to 9% of m/z 95	7.8
173	Less than 2% of m/z 174	0.6 (0.8)
174	50 to 120% of m/z 95	70.8
175	5 to 9% of m/z 174	6.2 (8.7)
176	Greater than 95% but less than 101% of m/z 174	67.7 (95.6)
177	5 to 9% of m/z 176	4.9 (7.2)

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928002.D\MSVOA_LL_CHHP5.rslt\spect
Injection Date: 28-Sep-2016 12:00:30
Spectrum: Tune Spec :Average 1029-1033(8.35-8.37) Bgrd 1025(8.32)
Base Peak: 95.00
Minimum % Base Peak: 0
Number of Points: 85

m/z	Y	m/z	Y	m/z	Y	m/z	Y
36.00	475	66.00	46	96.00	2699	176.00	23360
37.00	2093	68.00	3325	104.00	139	177.00	1681
38.00	1948	69.00	3732	105.00	51	178.00	43
39.00	644	70.00	339	116.00	50	185.00	48
41.00	108	72.00	124	117.00	176	186.00	53
45.00	296	73.00	1898	118.00	91	191.00	249
47.00	658	74.00	6013	119.00	315	193.00	202
48.00	188	75.00	18080	125.00	97	205.00	45
49.00	1745	76.00	1707	130.00	45	207.00	18
50.00	7853	77.00	193	131.00	107	210.00	40
51.00	2483	78.00	154	133.00	257	249.00	284
52.00	41	79.00	783	134.00	89	264.00	50
53.00	68	80.00	240	137.00	56	265.00	92
54.00	43	81.00	864	141.00	296	266.00	40
56.00	763	82.00	214	142.00	45	281.00	2024
57.00	1063	84.00	45	143.00	266	282.00	622
59.00	46	87.00	1598	148.00	42	283.00	431
60.00	264	88.00	1484	161.00	44	284.00	59
61.00	1767	92.00	1101	170.00	50	285.00	47
62.00	1662	93.00	1529	173.00	192		
63.00	1150	94.00	4042	174.00	24424		
64.00	170	95.00	34520	175.00	2134		

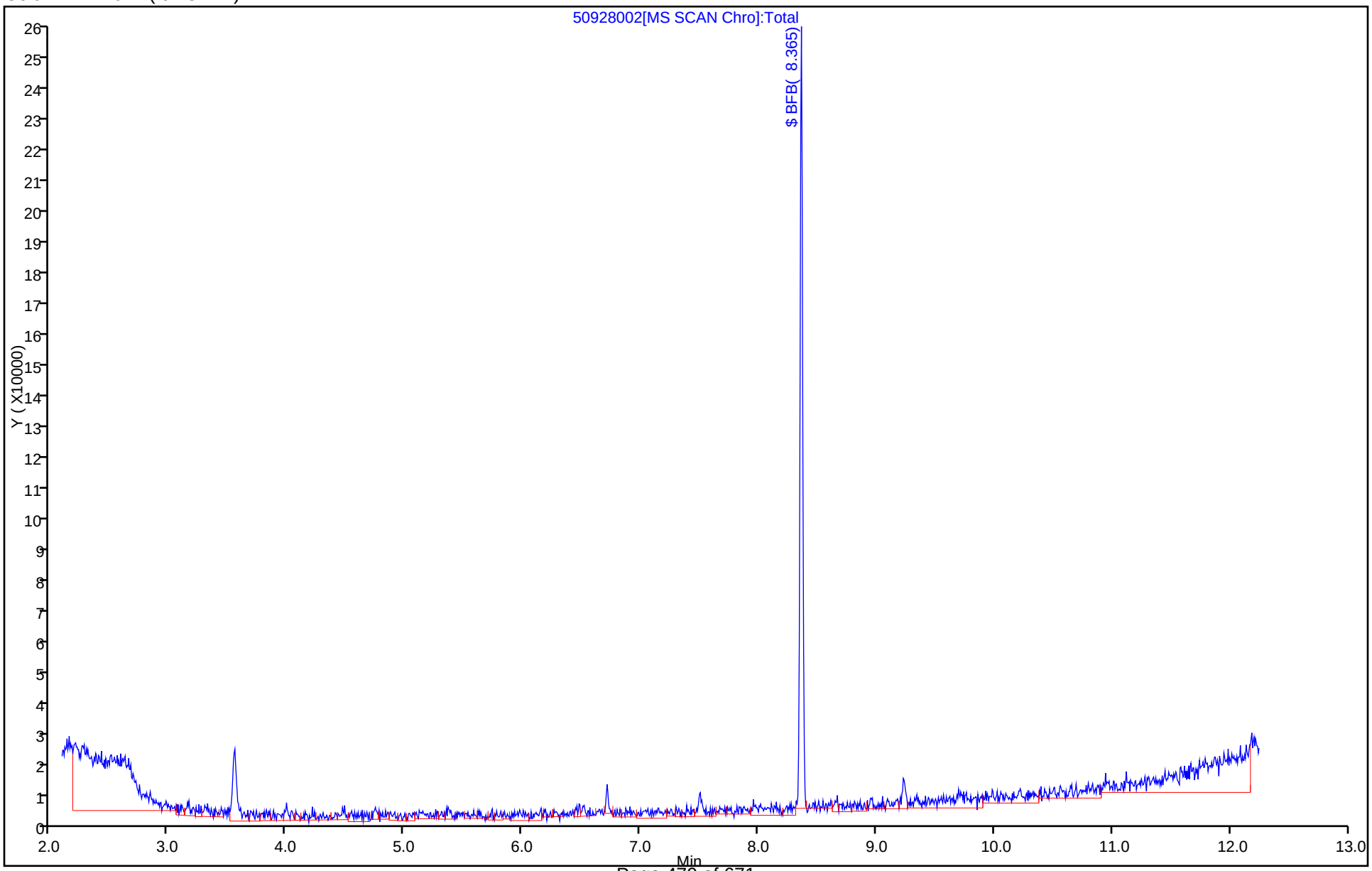
Report Date: 29-Sep-2016 09:37:18 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20160928-13640.b\50928002.D

Injection Date:	28-Sep-2016 12:00:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	BFB			Worklist Smp#:	2
Client ID:					
Injection Vol:	5.0 mL	Dil. Factor:	1.0000	ALS Bottle#:	2
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015005.D				
Lims ID:	BFB				
Client ID:					
Sample Type:	BFB				
Inject. Date:	15-Oct-2016 13:06:30	ALS Bottle#:	1	Worklist Smp#:	5
Injection Vol:	5.0 mL	Dil. Factor:	1.0000		
Sample Info:	180-0013887-005				
Misc. Info.:	BFB				
Operator ID:	001562	Instrument ID:	CHHP5		
Method:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m				
Limit Group:	VOA 8260C ICAL				
Last Update:	15-Oct-2016 15:19:18	Calib Date:	04-Oct-2016 16:03:30		
Integrator:	RTE	ID Type:	Deconvolution ID		
Quant Method:	Internal Standard	Quant By:	Initial Calibration		
Last ICal File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D				
Column 1 :	DB-624 (0.18 mm)		Det: MS SCAN		
Process Host:	XAWRK011				
First Level Reviewer: fergusond		Date:	15-Oct-2016 13:40:35		

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
$ 10 BFB	95	8.354	8.354	0.000	0	136031	NR	NR	

QC Flag Legend

Processing Flags
NR - Missing Quant Standard

Reagents:

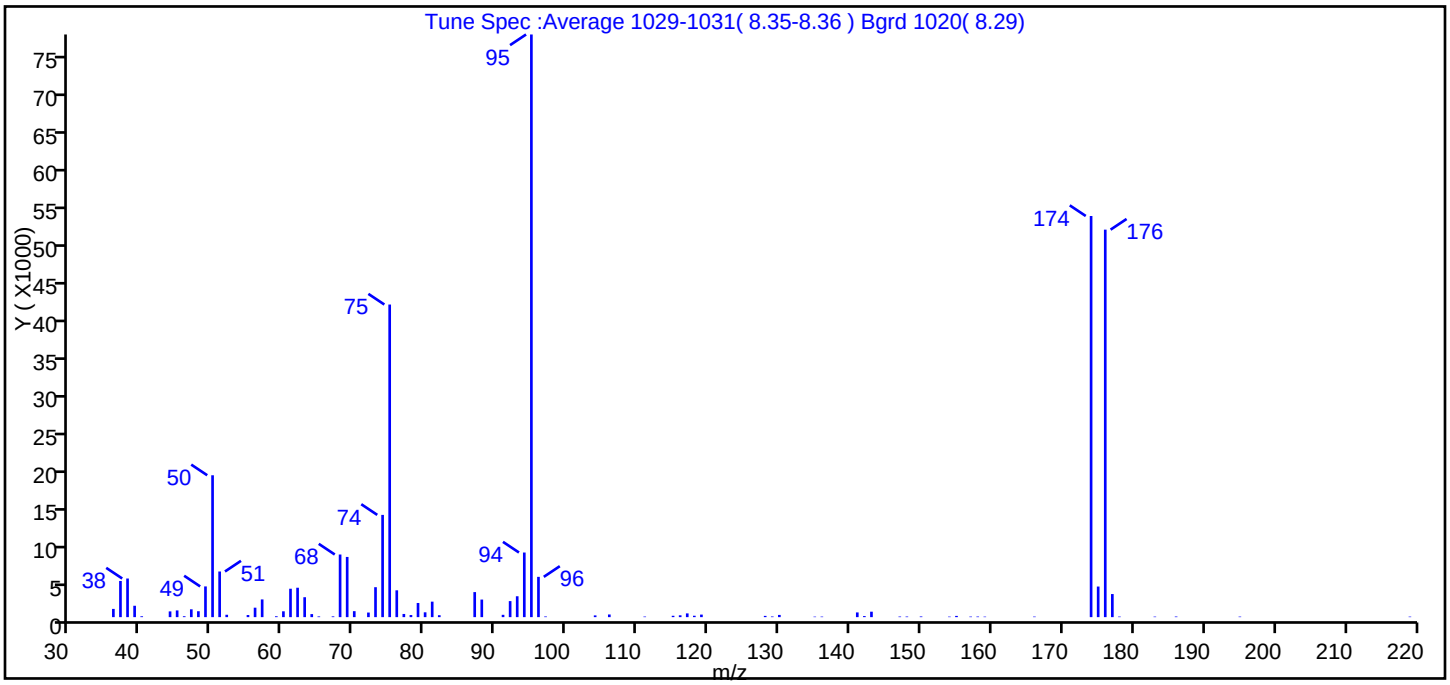
VOABFB25_00080 Amount Added: 1.00 Units: uL

MS Tune Report

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015005.D
Injection Date: 15-Oct-2016 13:06:30 Instrument ID: CHHP5
Lims ID: BFB
Client ID:
Operator ID: 001562 ALS Bottle#: 1 Worklist Smp#: 5
Injection Vol: 5.0 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Tune Method: BFB Method 8260

$ 10 BFB



m/z	Ion Abundance Criteria	% Relative Abundance
95	Base peak, 100% relative abundance	100.0
50	15 to 40% of m/z 95	24.4
75	30 to 60% of m/z 95	53.7
96	5 to 9% of m/z 95	6.9
173	Less than 2% of m/z 174	0.0 (0.0)
174	50 to 120% of m/z 95	68.8
175	5 to 9% of m/z 174	5.3 (7.6)
176	Greater than 95% but less than 101% of m/z 174	66.5 (96.6)
177	5 to 9% of m/z 176	4.0 (6.0)

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015005.D\MSVOA_LL_CHHP5.rslt\spect
Injection Date: 15-Oct-2016 13:06:30
Spectrum: Tune Spec :Average 1029-1031(8.35-8.36) Bgrd 1020(8.29)
Base Peak: 95.00
Minimum % Base Peak: 0
Number of Points: 82

m/z	Y	m/z	Y	m/z	Y	m/z	Y
36.00	1092	63.00	2641	92.00	2126	143.00	723
37.00	4796	64.00	404	93.00	2769	147.00	81
38.00	5121	65.00	94	94.00	8567	148.00	81
39.00	1509	67.00	101	95.00	77240	150.00	91
40.00	114	68.00	8303	96.00	5342	154.00	70
44.00	762	69.00	7981	97.00	90	155.00	164
45.00	891	70.00	792	104.00	231	157.00	75
46.00	119	72.00	609	106.00	353	158.00	80
47.00	1039	73.00	3970	111.00	77	159.00	67
48.00	784	74.00	13555	115.00	181	166.00	73
49.00	4073	75.00	41440	116.00	244	174.00	53176
50.00	18808	76.00	3557	117.00	497	175.00	4057
51.00	6051	77.00	422	118.00	186	176.00	51368
52.00	316	78.00	278	119.00	339	177.00	3061
55.00	280	79.00	1877	128.00	167	178.00	74
56.00	1254	80.00	641	129.00	86	183.00	70
57.00	2350	81.00	2054	130.00	295	186.00	82
59.00	116	82.00	256	135.00	67	195.00	72
60.00	775	87.00	3320	136.00	72	219.00	69
61.00	3767	88.00	2331	141.00	625		
62.00	3899	91.00	309	142.00	140		

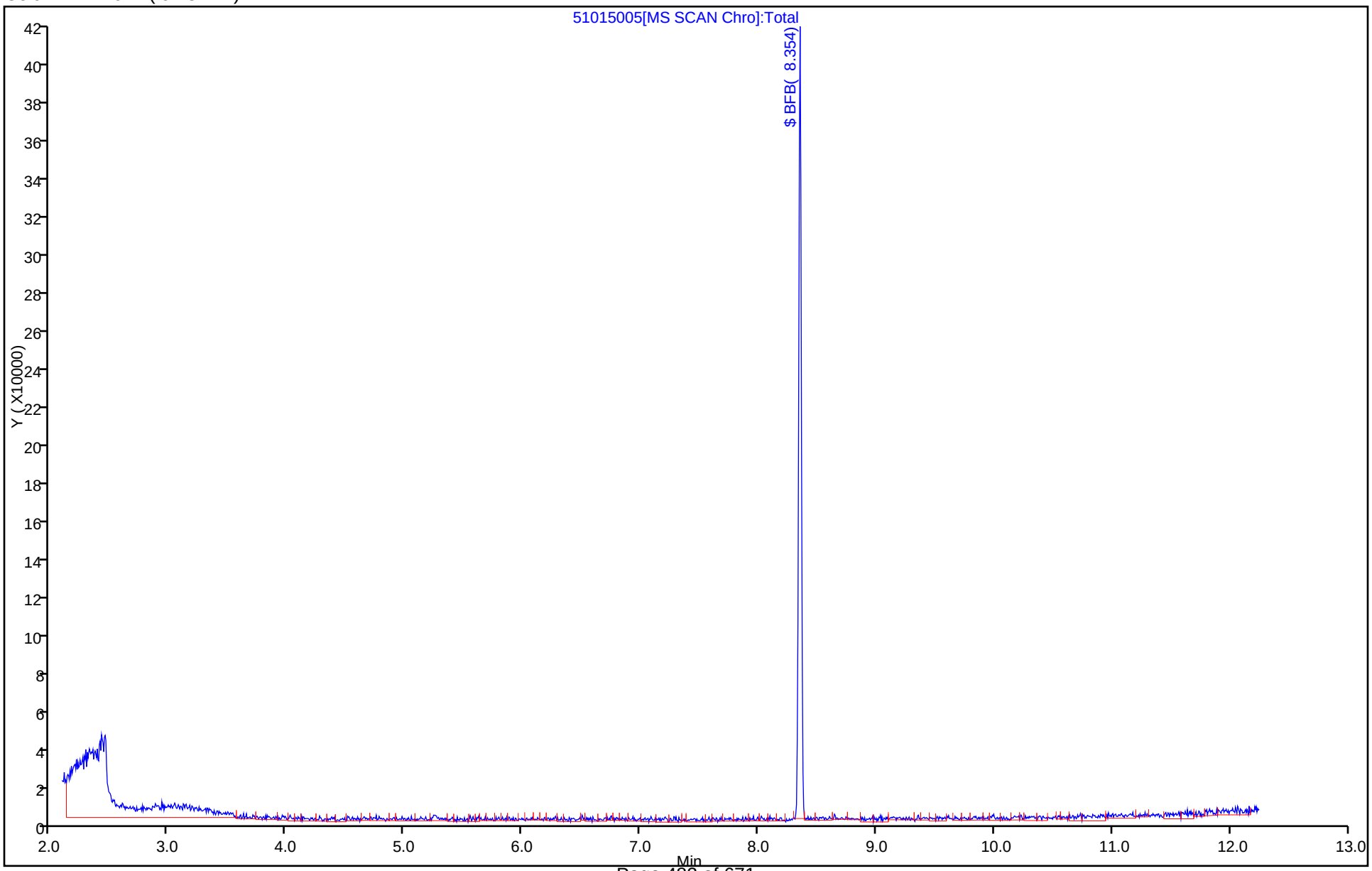
Report Date: 15-Oct-2016 15:19:20 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015005.D

Injection Date:	15-Oct-2016 13:06:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	BFB			Worklist Smp#:	5
Client ID:					
Injection Vol:	5.0 mL	Dil. Factor:	1.0000	ALS Bottle#:	1
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018001.D
Lims ID: BFB
Client ID:
Sample Type: BFB
Inject. Date: 18-Oct-2016 11:36:30 ALS Bottle#: 1 Worklist Smp#: 1
Injection Vol: 5.0 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-001
Misc. Info.: BFB
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 14:26:17 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 11:52:51

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
$ 10 BFB	95	8.360	8.360	0.000	0	54550	NR	NR	

QC Flag Legend

Processing Flags
NR - Missing Quant Standard

Reagents:

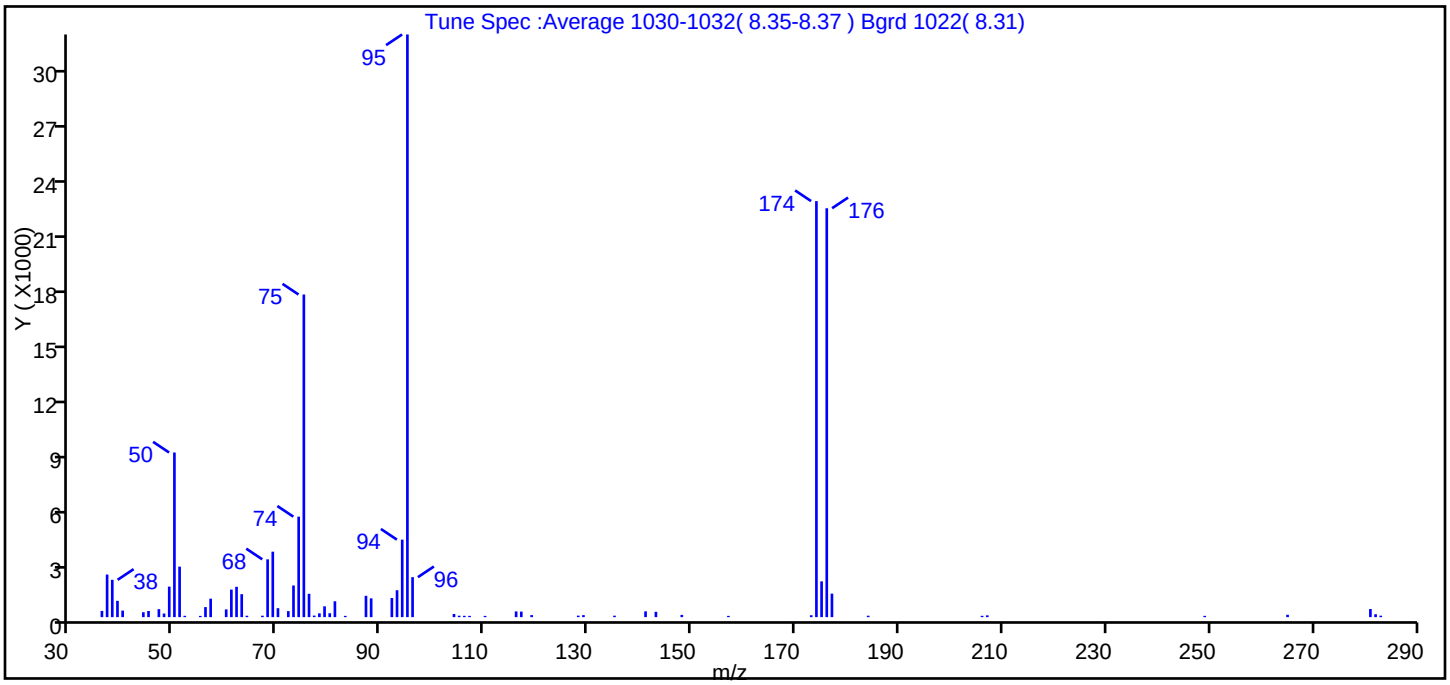
VOABFB25_00080 Amount Added: 1.00 Units: uL

MS Tune Report

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018001.D				
Injection Date:	18-Oct-2016 11:36:30	Instrument ID:	CHHP5		
Lims ID:	BFB				
Client ID:					
Operator ID:	001562	ALS Bottle#:	1	Worklist Smp#:	1
Injection Vol:	5.0 mL	Dil. Factor:	1.0000		
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		
Tune Method:	BFB Method 8260				

$ 10 BFB



m/z	Ion Abundance Criteria	% Relative Abundance
95	Base peak, 100% relative abundance	100.0
50	15 to 40% of m/z 95	28.3
75	30 to 60% of m/z 95	55.4
96	5 to 9% of m/z 95	6.9
173	Less than 2% of m/z 174	0.3 (0.5)
174	50 to 120% of m/z 95	71.4
175	5 to 9% of m/z 174	6.1 (8.6)
176	Greater than 95% but less than 101% of m/z 174	70.2 (98.3)
177	5 to 9% of m/z 176	4.0 (5.7)

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018001.D\MSVOA_LL_CHHP5.rslt\spect
Injection Date: 18-Oct-2016 11:36:30
Spectrum: Tune Spec :Average 1030-1032(8.35-8.37) Bgrd 1022(8.31)
Base Peak: 95.00
Minimum % Base Peak: 0
Number of Points: 71

m/z	Y	m/z	Y	m/z	Y	m/z	Y
36.00	335	62.00	1628	87.00	1145	141.00	312
37.00	2287	63.00	1234	88.00	1010	143.00	287
38.00	2004	64.00	76	92.00	1026	148.00	120
39.00	876	67.00	77	93.00	1445	157.00	68
40.00	352	68.00	3103	94.00	4161	173.00	102
44.00	264	69.00	3515	95.00	31280	174.00	22336
45.00	330	70.00	481	96.00	2146	175.00	1922
47.00	429	72.00	323	104.00	170	176.00	21952
48.00	194	73.00	1699	105.00	77	177.00	1262
49.00	1639	74.00	5394	106.00	71	184.00	77
50.00	8838	75.00	17320	107.00	69	206.00	72
51.00	2711	76.00	1254	110.00	68	207.00	96
52.00	72	77.00	84	116.00	308	249.00	69
55.00	67	78.00	205	117.00	298	265.00	127
56.00	540	79.00	581	119.00	110	281.00	437
57.00	991	80.00	209	128.00	81	282.00	156
60.00	417	81.00	853	129.00	108	283.00	79
61.00	1479	83.00	69	135.00	78		

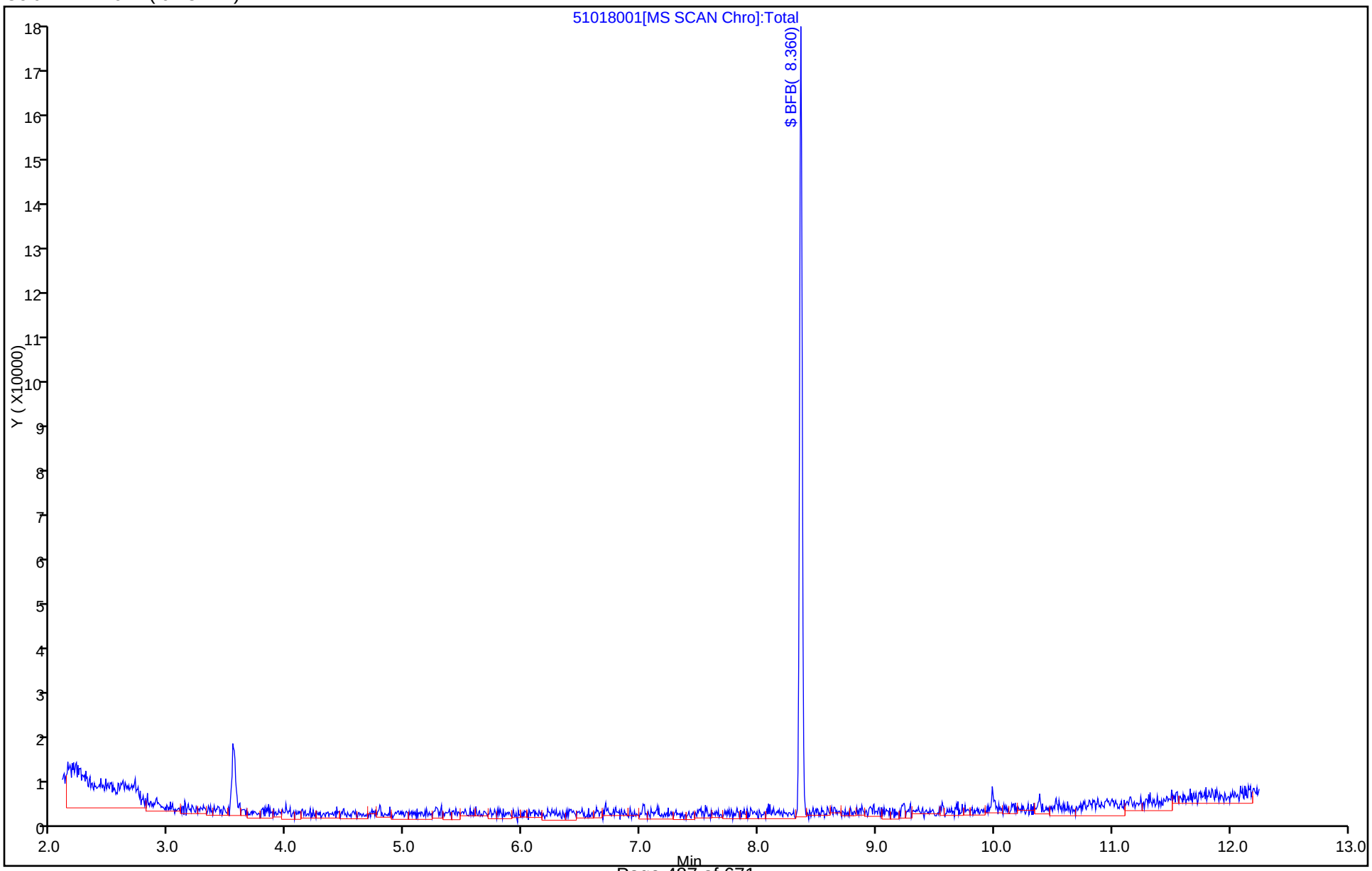
Report Date: 18-Oct-2016 14:26:18 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018001.D

Injection Date:	18-Oct-2016 11:36:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	BFB			Worklist Smp#:	1
Client ID:					
Injection Vol:	5.0 mL	Dil. Factor:	1.0000	ALS Bottle#:	1
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017001.D
Lims ID: BFB
Client ID:
Sample Type: BFB
Inject. Date: 17-Oct-2016 11:29:30 ALS Bottle#: 1 Worklist Smp#: 1
Injection Vol: 5.0 mL Dil. Factor: 1.0000
Sample Info: 180-0013909-001
Misc. Info.: BFB
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 11:22:48 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
$ 10 BFB	95	8.289	7.564	0.725	0	56183	NR	NR	

QC Flag Legend

Processing Flags
NR - Missing Quant Standard

Reagents:

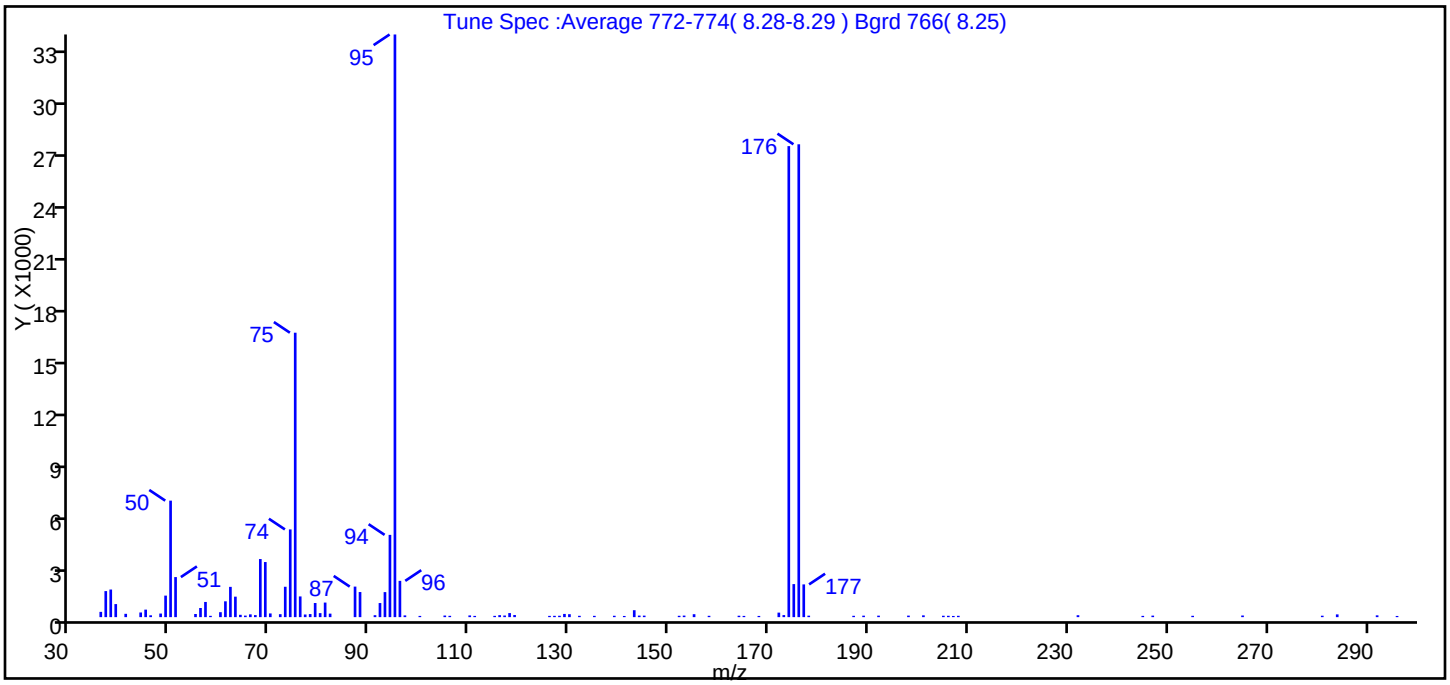
VOABFB25_00080 Amount Added: 1.00 Units: uL

MS Tune Report

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017001.D
Injection Date: 17-Oct-2016 11:29:30 Instrument ID: CHHP6
Lims ID: BFB
Client ID:
Operator ID: 001562 ALS Bottle#: 1 Worklist Smp#: 1
Injection Vol: 5.0 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP6 Limit Group: VOA 8260C ICAL
Tune Method: BFB Method 8260

$ 10 BFB



m/z	Ion Abundance Criteria	% Relative Abundance
95	Base peak, 100% relative abundance	100.0
50	15 to 40% of m/z 95	20.0
75	30 to 60% of m/z 95	48.8
96	5 to 9% of m/z 95	6.2
173	Less than 2% of m/z 174	0.4 (0.4)
174	50 to 120% of m/z 95	80.8
175	5 to 9% of m/z 174	5.7 (7.0)
176	Greater than 95% but less than 101% of m/z 174	81.2 (100.4)
177	5 to 9% of m/z 176	5.6 (6.9)

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017001.D\MSVOA_LL_CHHP6.rslt\spect
Injection Date: 17-Oct-2016 11:29:30
Spectrum: Tune Spec :Average 772-774(8.28-8.29) Bgrd 766(8.25)
Base Peak: 95.00
Minimum % Base Peak: 0
Number of Points: 101

m/z	Y	m/z	Y	m/z	Y	m/z	Y
36.00	299	70.00	210	115.00	73	174.00	26696
37.00	1476	72.00	168	116.00	113	175.00	1873
38.00	1565	73.00	1722	117.00	92	176.00	26800
39.00	740	74.00	4972	118.00	231	177.00	1856
41.00	188	75.00	16121	119.00	120	178.00	84
44.00	264	76.00	1174	126.00	72	187.00	76
45.00	426	77.00	150	127.00	75	189.00	84
46.00	104	78.00	174	128.00	79	192.00	85
48.00	204	79.00	801	129.00	182	198.00	87
49.00	1220	80.00	228	130.00	167	201.00	102
50.00	6603	81.00	826	132.00	76	205.00	79
51.00	2271	82.00	199	135.00	74	206.00	77
55.00	178	87.00	1731	139.00	78	207.00	67
56.00	518	88.00	1423	141.00	67	208.00	76
57.00	861	91.00	111	143.00	393	232.00	109
58.00	75	92.00	799	144.00	88	245.00	72
60.00	281	93.00	1419	145.00	86	247.00	86
61.00	897	94.00	4663	152.00	77	255.00	76
62.00	1716	95.00	33024	153.00	88	265.00	92
63.00	1161	96.00	2057	155.00	167	281.00	81
64.00	132	97.00	99	158.00	76	284.00	156
65.00	88	100.00	70	164.00	80	292.00	102
66.00	158	105.00	91	165.00	70	296.00	67
67.00	116	106.00	75	168.00	69		
68.00	3293	110.00	97	172.00	256		
69.00	3123	111.00	71	173.00	117		

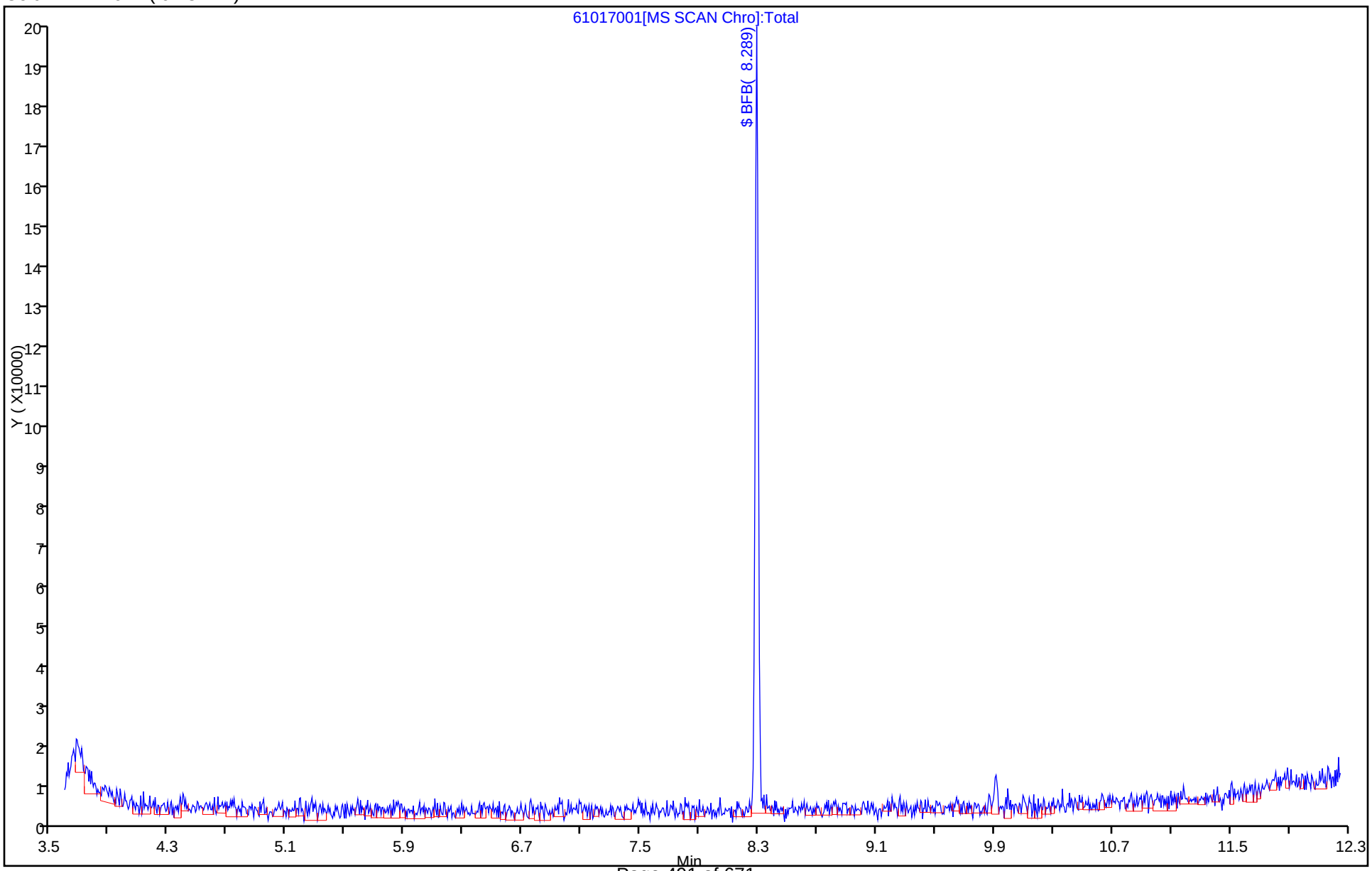
Report Date: 18-Oct-2016 11:22:50 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017001.D

Injection Date:	17-Oct-2016 11:29:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	BFB			Worklist Smp#:	1
Client ID:					
Injection Vol:	5.0 mL	Dil. Factor:	1.0000	ALS Bottle#:	1
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019001.D
Lims ID: BFB
Client ID:
Sample Type: BFB
Inject. Date: 19-Oct-2016 10:04:30 ALS Bottle#: 1 Worklist Smp#: 1
Injection Vol: 5.0 mL Dil. Factor: 1.0000
Sample Info: 180-0013943-001
Misc. Info.: BFB
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 12:47:49 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 10:29:48

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
$ 10 BFB	95	8.290	8.290	0.000	0	65619	NR	NR	

QC Flag Legend

Processing Flags
NR - Missing Quant Standard

Reagents:

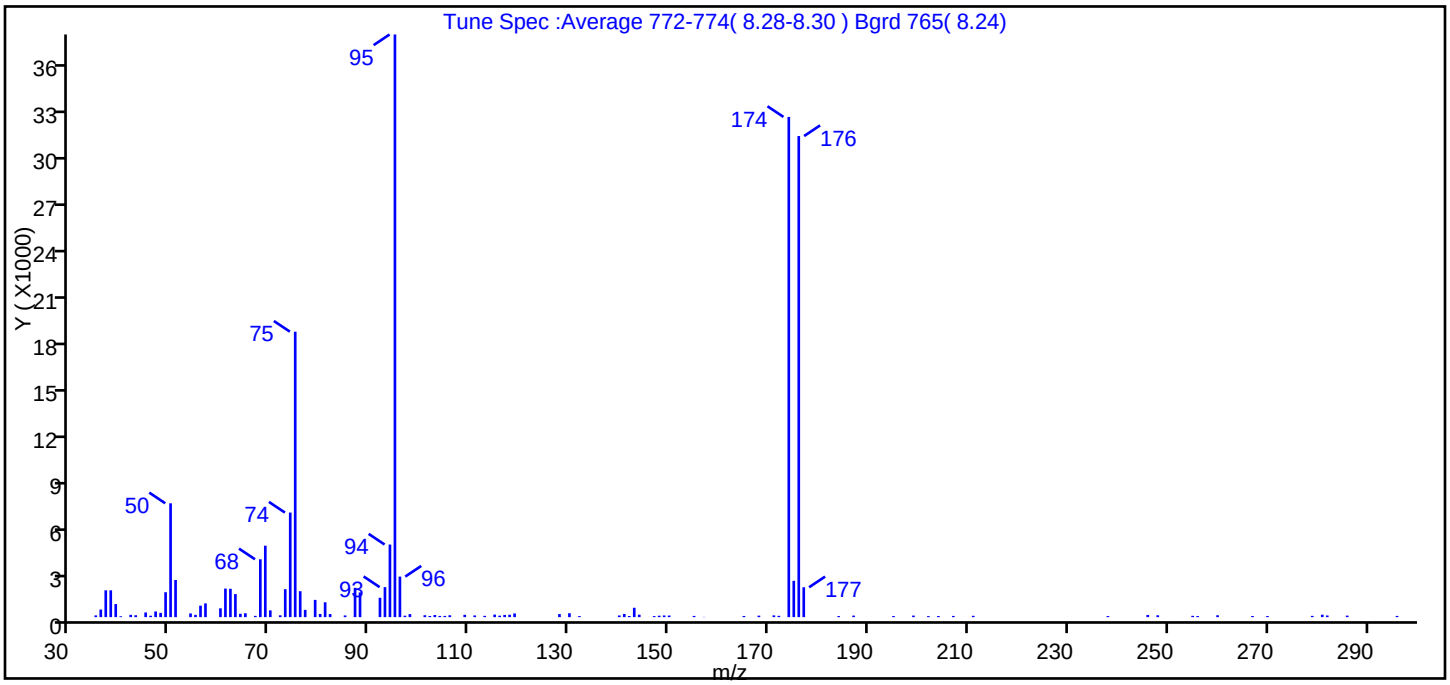
VOABFB25_00080 Amount Added: 1.00 Units: uL

MS Tune Report

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019001.D
Injection Date: 19-Oct-2016 10:04:30 Instrument ID: CHHP6
Lims ID: BFB
Client ID:
Operator ID: 001562 ALS Bottle#: 1 Worklist Smp#: 1
Injection Vol: 5.0 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP6 Limit Group: VOA 8260C ICAL
Tune Method: BFB Method 8260

$ 10 BFB



m/z	Ion Abundance Criteria	% Relative Abundance
95	Base peak, 100% relative abundance	100.0
50	15 to 40% of m/z 95	19.5
75	30 to 60% of m/z 95	49.0
96	5 to 9% of m/z 95	7.0
173	Less than 2% of m/z 174	0.0 (0.0)
174	50 to 120% of m/z 95	85.9
175	5 to 9% of m/z 174	6.2 (7.3)
176	Greater than 95% but less than 101% of m/z 174	82.6 (96.2)
177	5 to 9% of m/z 176	5.1 (6.2)

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019001.D\MSVOA_LL_CHHP6.rslt\spect
Injection Date: 19-Oct-2016 10:04:30
Spectrum: Tune Spec :Average 772-774(8.28-8.30) Bgrd 765(8.24)
Base Peak: 95.00
Minimum % Base Peak: 0
Number of Points: 106

m/z	Y	m/z	Y	m/z	Y	m/z	Y
35.00	114	69.00	4630	106.00	121	174.00	32424
36.00	492	70.00	439	109.00	151	175.00	2354
37.00	1740	72.00	118	111.00	110	176.00	31184
38.00	1739	73.00	1813	113.00	84	177.00	1937
39.00	847	74.00	6779	115.00	165	184.00	68
40.00	56	75.00	18504	116.00	96	187.00	101
42.00	151	76.00	1682	117.00	143	195.00	72
43.00	123	77.00	473	118.00	156	199.00	101
45.00	304	79.00	1118	119.00	240	202.00	67
46.00	90	80.00	207	128.00	198	204.00	72
47.00	367	81.00	963	130.00	253	207.00	79
48.00	277	82.00	200	132.00	67	211.00	86
49.00	1615	85.00	111	140.00	109	238.00	70
50.00	7380	87.00	1900	141.00	207	246.00	143
51.00	2409	88.00	1601	142.00	74	248.00	121
54.00	242	92.00	1257	143.00	607	255.00	85
55.00	148	93.00	1946	144.00	158	256.00	69
56.00	743	94.00	4706	147.00	68	260.00	122
57.00	893	95.00	37768	148.00	93	267.00	76
60.00	571	96.00	2629	149.00	108	270.00	71
61.00	1851	97.00	94	150.00	105	279.00	83
62.00	1838	98.00	198	155.00	79	281.00	158
63.00	1494	101.00	125	157.00	14	282.00	108
64.00	218	102.00	74	165.00	77	286.00	99
65.00	252	103.00	138	168.00	97	296.00	79
67.00	83	104.00	79	171.00	114		
68.00	3751	105.00	82	172.00	86		

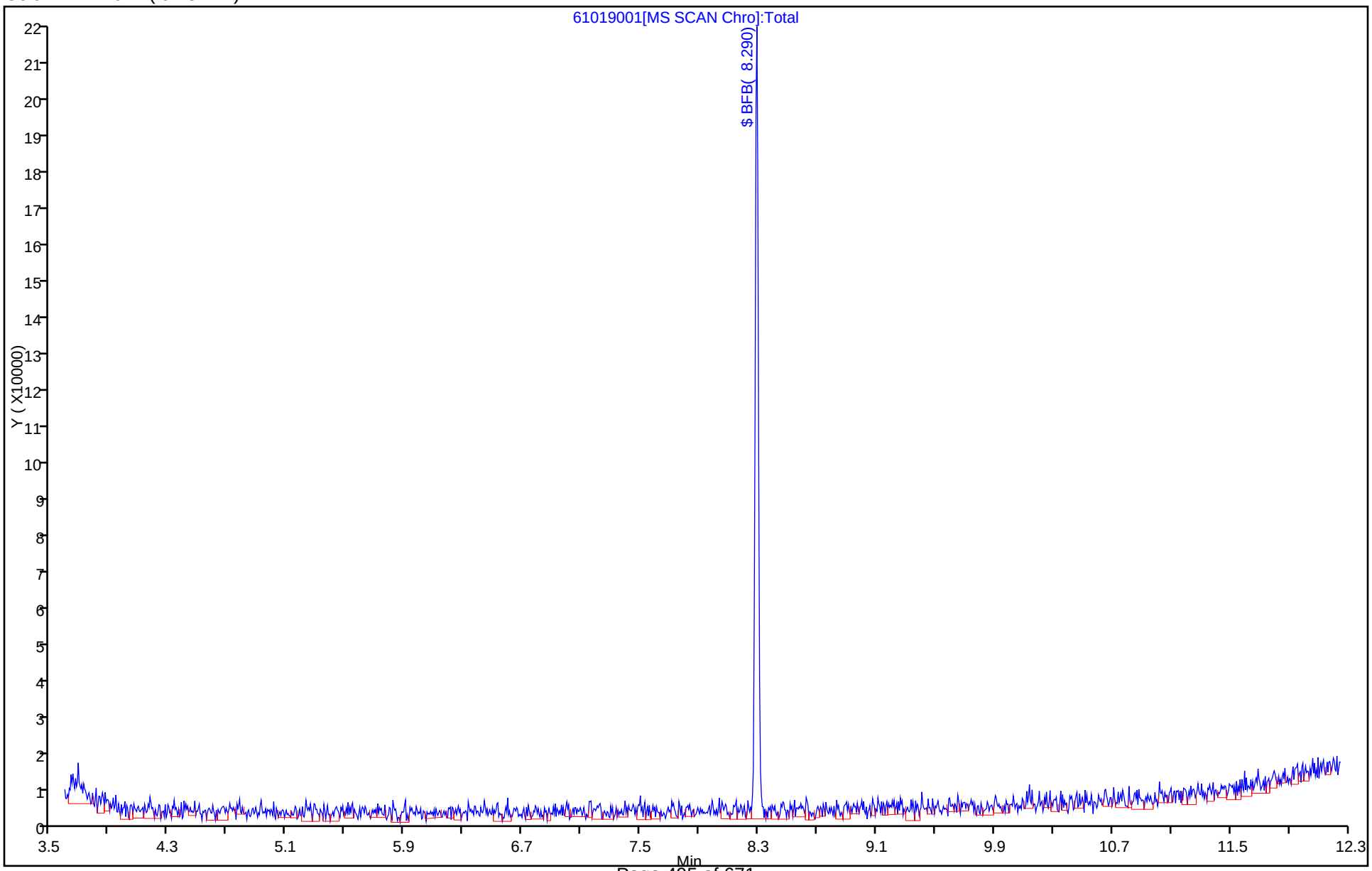
Report Date: 19-Oct-2016 12:47:51 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019001.D

Injection Date:	19-Oct-2016 10:04:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	BFB			Worklist Smp#:	1
Client ID:					
Injection Vol:	5.0 mL	Dil. Factor:	1.0000	ALS Bottle#:	1
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: MB 180-191289/6

Matrix: Water | Lab File ID: 51015006.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 14:46

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	1.0	U	1.0	0.23
75-01-4	Vinyl chloride	1.0	U	1.0	0.32
74-83-9	Bromomethane	1.0	U	1.0	0.36
75-00-3	Chloroethane	1.0	U	1.0	0.26
75-35-4	1,1-Dichloroethene	1.0	U	1.0	0.29
67-64-1	Acetone	5.0	U	5.0	2.5
75-15-0	Carbon disulfide	1.0	U	1.0	0.18
75-09-2	Methylene Chloride	1.0	U	1.0	0.36
156-60-5	trans-1,2-Dichloroethene	1.0	U	1.0	0.29
1634-04-4	Methyl tert-butyl ether	1.0	U	1.0	0.24
75-34-3	1,1-Dichloroethane	1.0	U	1.0	0.24
156-59-2	cis-1,2-Dichloroethene	1.0	U	1.0	0.29
74-97-5	Bromochloromethane	1.0	U	1.0	0.38
78-93-3	2-Butanone (MEK)	5.0	U	5.0	1.2
67-66-3	Chloroform	1.0	U	1.0	0.27
71-55-6	1,1,1-Trichloroethane	1.0	U	1.0	0.22
56-23-5	Carbon tetrachloride	1.0	U	1.0	0.24
71-43-2	Benzene	1.0	U	1.0	0.26
107-06-2	1,2-Dichloroethane	1.0	U	1.0	0.25
79-01-6	Trichloroethene	1.0	U	1.0	0.26
78-87-5	1,2-Dichloropropane	1.0	U	1.0	0.23
75-27-4	Bromodichloromethane	1.0	U	1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	1.0	U	1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59
108-88-3	Toluene	1.0	U	1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	1.0	U	1.0	0.24
79-00-5	1,1,2-Trichloroethane	1.0	U	1.0	0.35
127-18-4	Tetrachloroethene	1.0	U	1.0	0.27
591-78-6	2-Hexanone	5.0	U	5.0	0.74
124-48-1	Dibromochloromethane	1.0	U	1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29
108-90-7	Chlorobenzene	1.0	U	1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20
100-41-4	Ethylbenzene	1.0	U	1.0	0.27
1330-20-7	Xylenes, Total	2.0	U	2.0	0.48
100-42-5	Styrene	1.0	U	1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Client Sample ID: Lab Sample ID: MB 180-191289/6

Matrix: Water Lab File ID: 51015006.D

Analysis Method: 8260C Date Collected:

Sample wt/vol: 5(mL) Date Analyzed: 10/15/2016 14:46

Soil Aliquot Vol: Dilution Factor: 1

Soil Extract Vol.: GC Column: DB-624 ID: 0.18(mm)

% Moisture: Level: (low/med) Low

Analysis Batch No.: 191289 Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	1.0	U	1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35
107-13-1	Acrylonitrile	20	U	20	2.8
123-91-1	1,4-Dioxane	200	U	200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	120		72-134
2037-26-5	Toluene-d8 (Surr)	104		80-120
460-00-4	4-Bromofluorobenzene (Surr)	105		72-120
1868-53-7	Dibromofluoromethane (Surr)	102		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015006.D
Lims ID: MB
Client ID:
Sample Type: MB
Inject. Date: 15-Oct-2016 14:46:30 ALS Bottle#: 4 Worklist Smp#: 6
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-006
Misc. Info.: MB
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 15-Oct-2016 15:25:23 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK011

First Level Reviewer: fergusond Date: 15-Oct-2016 15:25:23

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.269	4.278	-0.009	0	109368	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.274	7.271	0.003	97	367034	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.371	10.373	-0.002	93	79469	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.719	12.722	-0.003	97	91693	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.550	6.547	0.003	92	84546	50.0	51.1	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.921	6.918	0.003	0	135119	50.0	60.1	
$ 7 Toluene-d8 (Surr)	98	8.923	8.919	0.004	96	326198	50.0	52.2	
$ 8 4-Bromofluorobenzene (Surr	95	11.557	11.560	-0.003	83	121137	50.0	52.4	
11 Dichlorodifluoromethane	85		1.625					ND	
12 Chloromethane	50		1.771					ND	
13 Vinyl chloride	62		1.905					ND	
14 Butadiene	39		1.942					ND	
15 Bromomethane	94		2.240					ND	
16 Chloroethane	64		2.392					ND	
17 Dichlorofluoromethane	67		2.659					ND	
18 Trichlorofluoromethane	101		2.672					ND	
19 Ethanol	45		2.954					ND	
20 Ethyl ether	59		3.049					ND	
21 Acrolein	56		3.237					ND	
22 1,1-Dichloroethene	96		3.341					ND	
23 1,1,2-Trichloro-1,2,2-trif	101		3.402					ND	
24 Acetone	43		3.450					ND	
25 Iodomethane	142		3.529					ND	
26 Carbon disulfide	76		3.621					ND	
27 Isopropyl alcohol	45		3.721					ND	
29 Acetonitrile	41		3.873					ND	
28 3-Chloro-1-propene	76		3.913					ND	
30 Methyl acetate	43		3.937					ND	
31 Methylene Chloride	84	4.141	4.132	0.009	43	1897		0.7851	
32 2-Methyl-2-propanol	59		4.405					ND	
33 Acrylonitrile	53		4.515					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
34 trans-1,2-Dichloroethene	96		4.551					ND	
35 Methyl tert-butyl ether	73		4.570					ND	
36 Hexane	57		4.971					ND	
37 1,1-Dichloroethane	63		5.190					ND	
38 Vinyl acetate	43		5.239					ND	
39 2-Chloro-1,3-butadiene	53		5.284					ND	
41 Isopropyl ether	45		5.290					ND	
40 Isopropyl ether TIC	45		5.410					ND	
42 Tert-butyl ethyl ether	59		5.759					ND	
44 2,2-Dichloropropane	77		5.932					ND	
45 cis-1,2-Dichloroethene	96		5.938					ND	
46 2-Butanone (MEK)	43		5.951					ND	
43 Tert-butyl ethyl ether (TI	59		5.961					ND	
47 Propionitrile	54		6.020					ND	
48 Ethyl acetate	43		6.026					ND	
50 Methacrylonitrile	41		6.203					ND	
49 Chlorobromomethane	128		6.218					ND	
51 Tetrahydrofuran	42		6.237					ND	
52 Chloroform	83		6.364					ND	
53 1,1,1-Trichloroethane	97		6.522					ND	
54 Cyclohexane	56		6.595					ND	
56 Carbon tetrachloride	117		6.693					ND	
55 1,1-Dichloropropene	75		6.711					ND	
57 Isobutyl alcohol	41		6.918					ND	
58 Benzene	78		6.924					ND	
59 1,2-Dichloroethane	62		7.003					ND	
151 Isooctane	57		7.085					ND	
61 Tert-amyl methyl ether	73		7.109					ND	
60 Tert-amyl methyl ether (TI	73		7.262					ND	
62 n-Heptane	43		7.289					ND	
63 n-Butanol	56		7.632					ND	
64 Trichloroethene	130		7.660					ND	
65 Ethyl acrylate	55		7.785					ND	
66 Methylcyclohexane	83		7.897					ND	
67 1,2-Dichloropropane	63		7.934					ND	
70 1,4-Dioxane	88		8.019					ND	
69 Methyl methacrylate	69		8.022					ND	
68 Dibromomethane	93		8.025					ND	
71 Dichlorobromomethane	83		8.220					ND	
72 2-Nitropropane	41		8.448					ND	
73 2-Chloroethyl vinyl ether	63		8.514					ND	
74 cis-1,3-Dichloropropene	75		8.664					ND	
75 4-Methyl-2-pentanone (MIBK	43		8.816					ND	
76 Toluene	91		8.986					ND	
77 trans-1,3-Dichloropropene	75		9.242					ND	
78 Ethyl methacrylate	69		9.303					ND	
79 1,1,2-Trichloroethane	97		9.436					ND	
80 Tetrachloroethene	164		9.503					ND	
81 1,3-Dichloropropane	76		9.589					ND	
82 2-Hexanone	43		9.649					ND	
83 n-Butyl acetate	43		9.774					ND	
84 Chlorodibromomethane	129		9.801					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
85 Ethylene Dibromide	107		9.917					ND	
86 3-Chlorobenzotrifluoride	180		10.379					ND	
87 Chlorobenzene	112		10.404					ND	
88 4-Chlorobenzotrifluoride	180		10.465					ND	
90 Ethylbenzene	106		10.501					ND	
89 1,1,1,2-Tetrachloroethane	131		10.501					ND	
91 m-Xylene & p-Xylene	106		10.635					ND	
92 o-Xylene	106		11.018					ND	
93 Styrene	104		11.036					ND	
94 Bromoform	173		11.225					ND	
96 2-Chlorobenzotrifluoride	180		11.292					ND	
95 Cyclohexanol	57		11.374					ND	
97 Isopropylbenzene	105		11.383					ND	
98 Cyclohexanone	55		11.477					ND	
99 1,1,2,2-Tetrachloroethane	83		11.700					ND	
100 Bromobenzene	156		11.700					ND	
102 trans-1,4-Dichloro-2-buten	53		11.736					ND	
101 1,2,3-Trichloropropane	110		11.754					ND	
103 N-Propylbenzene	120		11.803					ND	
104 2-Chlorotoluene	126		11.888					ND	
105 3-Chlorotoluene	126		11.955					ND	
106 1,3,5-Trimethylbenzene	105		11.985					ND	
107 4-Chlorotoluene	126		12.016					ND	
108 tert-Butylbenzene	119		12.296					ND	
110 1,2,4-Trimethylbenzene	105		12.357					ND	
111 1,2-dichloro-4-(trifluorom	214		12.399					ND	
109 Pentachloroethane	167		12.402					ND	
112 sec-Butylbenzene	105		12.521					ND	
113 1,3-Dichlorobenzene	146		12.642					ND	
114 4-Isopropyltoluene	119		12.679					ND	
115 1,4-Dichlorobenzene	146		12.746					ND	
117 1,2,3-Trimethylbenzene	105		12.767					ND	
116 2,4-Dichloro-1-(triflourom	214		12.770					ND	
118 2,5-Dichlorobenzotrifluori	214		12.813					ND	
119 Benzyl chloride	91		12.864					ND	
120 n-Butylbenzene	91		13.087					ND	
121 1,2-Dichlorobenzene	146		13.099					ND	
122 1,2-Dibromo-3-Chloropropan	75		13.896					ND	
123 2,4- & 2,5- & 2,6- Dichlor	125		14.036					ND	
124 1,3,5-Trichlorobenzene	180		14.081					ND	
125 2,3- & 3,4- Dichlorotoluen	125		14.455					ND	
126 1,2,4-Trichlorobenzene	180		14.717					ND	
127 Hexachlorobutadiene	225		14.863					ND	
128 Naphthalene	128		14.978					ND	
129 1,2,3-Trichlorobenzene	180		15.204					ND	
131 2,4,5-Trichlorotoluene	159		15.982					ND	
130 2,3,6-Trichlorotoluene	159		16.086					ND	
132 2-Methylnaphthalene	142		16.098					ND	
150 2,6-Dichlorotoluene	1		0.000					ND	
152 Formaldehyde TIC	1		0.000					ND	
149 3,4-Dichlorotoluene	1		0.000					ND	
146 2,5-Dichlorotoluene	1		0.000					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
147 2,4-Dichlorotoluene	1		0.000					ND	
148 2,3-Dichlorotoluene	1		0.000					ND	
S 133 Xylenes, Total	106		1.000					ND	
S 134 1,2-Dichloroethene, Total	96		1.000					ND	
S 135 1,3-Dichloropropene, Total	1		0.000					ND	
T 136 Mesityl oxide TIC	83		0.000					ND	
T 138 Methyl n-amyl ketone TIC	43		0.000					ND	
T 137 Tetrahydrofuran TIC	42		6.253					ND	
T 153 1,2 Epoxybutane TIC	42		6.253					ND	

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

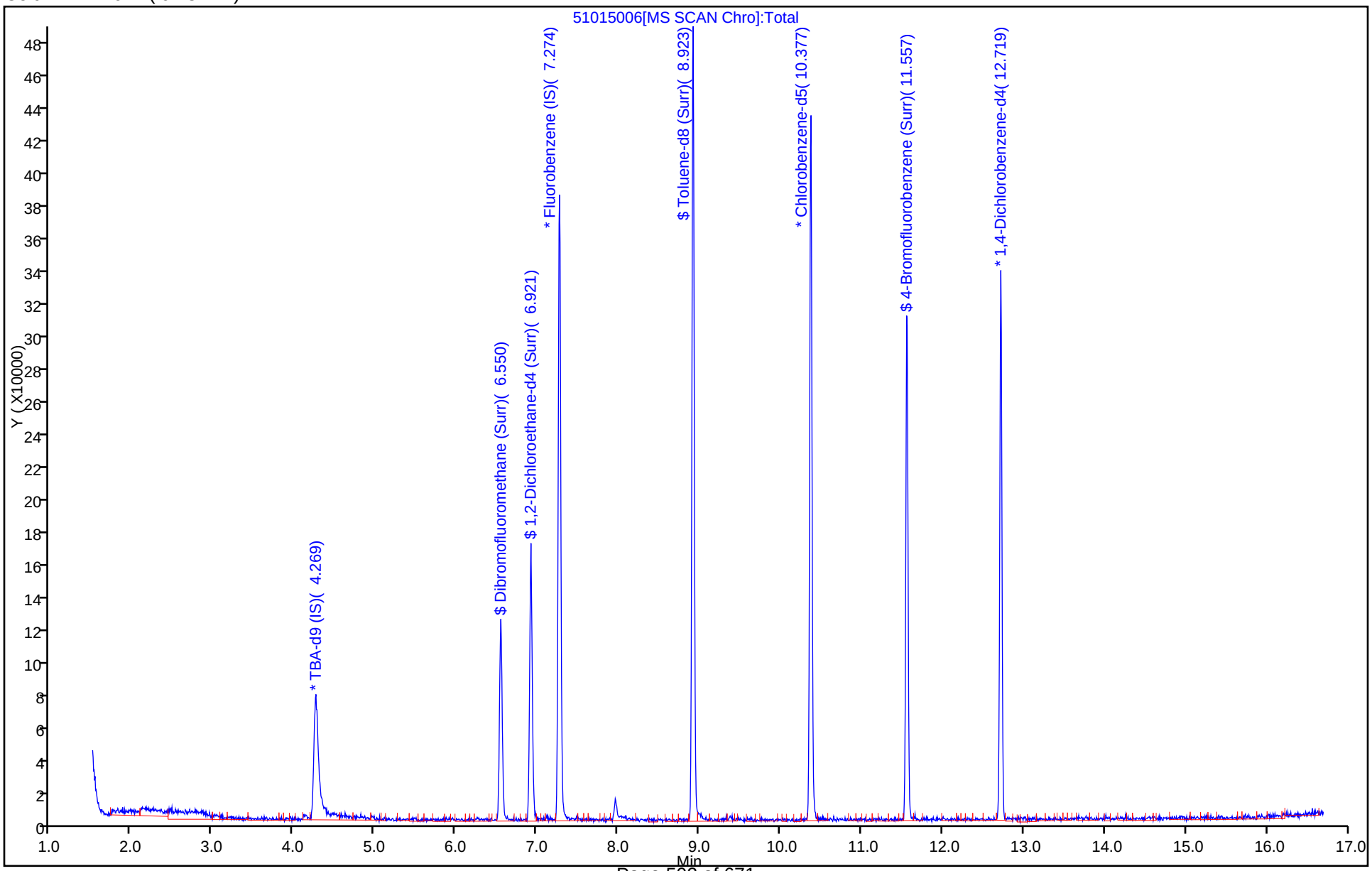
Report Date: 15-Oct-2016 15:25:24 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015006.D

Injection Date:	15-Oct-2016 14:46:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	MB			Worklist Smp#:	6
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	4
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015006.D
Lims ID: MB
Client ID:
Sample Type: MB
Inject. Date: 15-Oct-2016 14:46:30 ALS Bottle#: 4 Worklist Smp#: 6
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-006
Misc. Info.: MB
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 15-Oct-2016 15:25:23 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK011

First Level Reviewer: fergusond Date: 15-Oct-2016 15:25:23

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	51.1	102.21
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	60.1	120.15
$ 7 Toluene-d8 (Surr)	50.0	52.2	104.34
$ 8 4-Bromofluorobenzene (Surr)	50.0	52.4	104.86

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: MB 180-191520/4

Matrix: Water | Lab File ID: 51018004.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/18/2016 13:17

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191520 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	1.0	U	1.0	0.23
75-01-4	Vinyl chloride	1.0	U	1.0	0.32
74-83-9	Bromomethane	1.0	U	1.0	0.36
75-00-3	Chloroethane	1.0	U	1.0	0.26
75-35-4	1,1-Dichloroethene	1.0	U	1.0	0.29
67-64-1	Acetone	5.0	U	5.0	2.5
75-15-0	Carbon disulfide	1.0	U	1.0	0.18
75-09-2	Methylene Chloride	1.0	U	1.0	0.36
156-60-5	trans-1,2-Dichloroethene	1.0	U	1.0	0.29
1634-04-4	Methyl tert-butyl ether	1.0	U	1.0	0.24
75-34-3	1,1-Dichloroethane	1.0	U	1.0	0.24
156-59-2	cis-1,2-Dichloroethene	1.0	U	1.0	0.29
74-97-5	Bromochloromethane	1.0	U	1.0	0.38
78-93-3	2-Butanone (MEK)	5.0	U	5.0	1.2
67-66-3	Chloroform	1.0	U	1.0	0.27
71-55-6	1,1,1-Trichloroethane	1.0	U	1.0	0.22
56-23-5	Carbon tetrachloride	1.0	U	1.0	0.24
71-43-2	Benzene	1.0	U	1.0	0.26
107-06-2	1,2-Dichloroethane	1.0	U	1.0	0.25
79-01-6	Trichloroethene	1.0	U	1.0	0.26
78-87-5	1,2-Dichloropropane	1.0	U	1.0	0.23
75-27-4	Bromodichloromethane	1.0	U	1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	1.0	U	1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59
108-88-3	Toluene	1.0	U	1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	1.0	U	1.0	0.24
79-00-5	1,1,2-Trichloroethane	1.0	U	1.0	0.35
127-18-4	Tetrachloroethene	1.0	U	1.0	0.27
591-78-6	2-Hexanone	5.0	U	5.0	0.74
124-48-1	Dibromochloromethane	1.0	U	1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29
108-90-7	Chlorobenzene	1.0	U	1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20
100-41-4	Ethylbenzene	1.0	U	1.0	0.27
1330-20-7	Xylenes, Total	2.0	U	2.0	0.48
100-42-5	Styrene	1.0	U	1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Client Sample ID: Lab Sample ID: MB 180-191520/4

Matrix: Water Lab File ID: 51018004.D

Analysis Method: 8260C Date Collected:

Sample wt/vol: 5(mL) Date Analyzed: 10/18/2016 13:17

Soil Aliquot Vol: Dilution Factor: 1

Soil Extract Vol.: GC Column: DB-624 ID: 0.18(mm)

% Moisture: Level: (low/med) Low

Analysis Batch No.: 191520 Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	1.0	U	1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35
107-13-1	Acrylonitrile	20	U	20	2.8
123-91-1	1,4-Dioxane	200	U	200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	114		72-134
2037-26-5	Toluene-d8 (Surr)	104		80-120
460-00-4	4-Bromofluorobenzene (Surr)	114		72-120
1868-53-7	Dibromofluoromethane (Surr)	100		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018004.D
Lims ID: MB
Client ID:
Sample Type: MB
Inject. Date: 18-Oct-2016 13:17:30 ALS Bottle#: 4 Worklist Smp#: 4
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-004
Misc. Info.: MB
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 15:11:45 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 15:11:45

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.266	4.273	-0.007	0	119767	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.271	7.266	0.005	97	368452	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.374	10.375	0.000	93	84437	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.722	12.717	0.005	97	118218	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.541	6.542	-0.001	91	82673	50.0	49.8	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.918	6.913	0.005	0	129156	50.0	57.2	
$ 7 Toluene-d8 (Surr)	98	8.920	8.921	-0.001	95	345311	50.0	52.0	
$ 8 4-Bromofluorobenzene (Surr	95	11.560	11.561	-0.001	82	139679	50.0	56.9	
11 Dichlorodifluoromethane	85		1.608					ND	
12 Chloromethane	50		1.760					ND	
13 Vinyl chloride	62		1.906					ND	
14 Butadiene	39		1.931					ND	
15 Bromomethane	94		2.235					ND	
16 Chloroethane	64		2.369					ND	
17 Dichlorofluoromethane	67		2.655					ND	
18 Trichlorofluoromethane	101		2.679					ND	
19 Ethanol	45		2.954					ND	
20 Ethyl ether	59		3.032					ND	
21 Acrolein	56		3.214					ND	
22 1,1-Dichloroethene	96		3.336					ND	
23 1,1,2-Trichloro-1,2,2-trif	101		3.397					ND	
24 Acetone	43		3.439					ND	
25 Iodomethane	142		3.518					ND	
26 Carbon disulfide	76		3.616					ND	
27 Isopropyl alcohol	45		3.721					ND	
29 Acetonitrile	41		3.873					ND	
28 3-Chloro-1-propene	76		3.902					ND	
30 Methyl acetate	43		3.926					ND	
31 Methylene Chloride	84	4.132	4.121	0.011	7	2340		0.9648	M
32 2-Methyl-2-propanol	59		4.413					ND	
33 Acrylonitrile	53		4.510					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
34 trans-1,2-Dichloroethene	96		4.540					ND	
35 Methyl tert-butyl ether	73		4.559					ND	
36 Hexane	57		4.966					ND	
37 1,1-Dichloroethane	63		5.179					ND	
38 Vinyl acetate	43		5.234					ND	
39 2-Chloro-1,3-butadiene	53		5.284					ND	
41 Isopropyl ether	45		5.290					ND	
40 Isopropyl ether TIC	45		5.410					ND	
42 Tert-butyl ethyl ether	59		5.759					ND	
44 2,2-Dichloropropane	77		5.921					ND	
45 cis-1,2-Dichloroethene	96		5.927					ND	
46 2-Butanone (MEK)	43		5.946					ND	
43 Tert-butyl ethyl ether (TI	59		5.961					ND	
47 Propionitrile	54		6.020					ND	
48 Ethyl acetate	43		6.026					ND	
50 Methacrylonitrile	41		6.203					ND	
49 Chlorobromomethane	128		6.213					ND	
51 Tetrahydrofuran	42		6.238					ND	
52 Chloroform	83		6.359					ND	
53 1,1,1-Trichloroethane	97		6.524					ND	
54 Cyclohexane	56		6.591					ND	
56 Carbon tetrachloride	117		6.694					ND	
55 1,1-Dichloropropene	75		6.706					ND	
57 Isobutyl alcohol	41		6.919					ND	
58 Benzene	78		6.925					ND	
59 1,2-Dichloroethane	62		7.004					ND	
151 Isooctane	57		7.085					ND	
61 Tert-amyl methyl ether	73		7.109					ND	
60 Tert-amyl methyl ether (TI	73		7.262					ND	
62 n-Heptane	43		7.284					ND	
63 n-Butanol	56		7.632					ND	
64 Trichloroethene	130		7.655					ND	
65 Ethyl acrylate	55		7.785					ND	
66 Methylcyclohexane	83		7.892					ND	
67 1,2-Dichloropropane	63		7.929					ND	
68 Dibromomethane	93		8.014					ND	
70 1,4-Dioxane	88		8.014					ND	
69 Methyl methacrylate	69		8.022					ND	
71 Dichlorobromomethane	83		8.215					ND	
72 2-Nitropropane	41		8.448					ND	
73 2-Chloroethyl vinyl ether	63		8.513					ND	
74 cis-1,3-Dichloropropene	75		8.659					ND	
75 4-Methyl-2-pentanone (MIBK	43		8.811					ND	
76 Toluene	91		8.987					ND	
77 trans-1,3-Dichloropropene	75		9.237					ND	
78 Ethyl methacrylate	69		9.298					ND	
79 1,1,2-Trichloroethane	97		9.432					ND	
80 Tetrachloroethene	164		9.498					ND	
81 1,3-Dichloropropane	76		9.590					ND	
82 2-Hexanone	43		9.644					ND	
83 n-Butyl acetate	43		9.774					ND	
84 Chlorodibromomethane	129		9.803					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
85 Ethylene Dibromide	107		9.912					ND	
86 3-Chlorobenzotrifluoride	180		10.375					ND	
87 Chlorobenzene	112		10.405					ND	
88 4-Chlorobenzotrifluoride	180		10.466					ND	
89 1,1,1,2-Tetrachloroethane	131		10.496					ND	
90 Ethylbenzene	106		10.502					ND	
91 m-Xylene & p-Xylene	106		10.636					ND	
92 o-Xylene	106		11.013					ND	
93 Styrene	104		11.038					ND	
94 Bromoform	173		11.220					ND	
95 Cyclohexanol	57		11.244					ND	
96 2-Chlorobenzotrifluoride	180		11.287					ND	
97 Isopropylbenzene	105		11.384					ND	
98 Cyclohexanone	55		11.477					ND	
100 Bromobenzene	156		11.695					ND	
99 1,1,2,2-Tetrachloroethane	83		11.701					ND	
102 trans-1,4-Dichloro-2-buten	53		11.737					ND	
101 1,2,3-Trichloropropane	110		11.755					ND	
103 N-Propylbenzene	120		11.798					ND	
104 2-Chlorotoluene	126		11.889					ND	
105 3-Chlorotoluene	126		11.956					ND	
106 1,3,5-Trimethylbenzene	105		11.987					ND	
107 4-Chlorotoluene	126		12.011					ND	
108 tert-Butylbenzene	119		12.297					ND	
110 1,2,4-Trimethylbenzene	105		12.358					ND	
111 1,2-dichloro-4-(trifluorom	214		12.400					ND	
109 Pentachloroethane	167		12.402					ND	
112 sec-Butylbenzene	105		12.522					ND	
113 1,3-Dichlorobenzene	146		12.638					ND	
114 4-Isopropyltoluene	119		12.674					ND	
115 1,4-Dichlorobenzene	146		12.741					ND	
116 2,4-Dichloro-1-(triflourom	214		12.765					ND	
117 1,2,3-Trimethylbenzene	105		12.767					ND	
118 2,5-Dichlorobenzotrifluori	214		12.808					ND	
119 Benzyl chloride	91		12.864					ND	
120 n-Butylbenzene	91		13.088					ND	
121 1,2-Dichlorobenzene	146		13.100					ND	
122 1,2-Dibromo-3-Chloropropan	75		13.891					ND	
123 2,4- & 2,5- & 2,6- Dichlor	125		14.031					ND	
124 1,3,5-Trichlorobenzene	180		14.081					ND	
125 2,3- & 3,4- Dichlorotoluen	125		14.450					ND	
126 1,2,4-Trichlorobenzene	180		14.712					ND	
127 Hexachlorobutadiene	225		14.858					ND	
128 Naphthalene	128		14.980					ND	
129 1,2,3-Trichlorobenzene	180		15.205					ND	
131 2,4,5-Trichlorotoluene	159		15.983					ND	
130 2,3,6-Trichlorotoluene	159		16.081					ND	
132 2-Methylnaphthalene	142		16.098					ND	
150 2,6-Dichlorotoluene	1		0.000					ND	
152 Formaldehyde TIC	1		0.000					ND	
149 3,4-Dichlorotoluene	1		0.000					ND	
146 2,5-Dichlorotoluene	1		0.000					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
147 2,4-Dichlorotoluene	1		0.000					ND	
148 2,3-Dichlorotoluene	1		0.000					ND	
S 133 Xylenes, Total	106		1.000					ND	
S 134 1,2-Dichloroethene, Total	96		1.000					ND	
S 135 1,3-Dichloropropene, Total	1		0.000					ND	
T 136 Mesityl oxide TIC	83		0.000					ND	
T 138 Methyl n-amyl ketone TIC	43		0.000					ND	
T 137 Tetrahydrofuran TIC	42	6.237	6.253	-0.016	1	404			0
T 153 1,2 Epoxybutane TIC	42		6.253					ND	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent

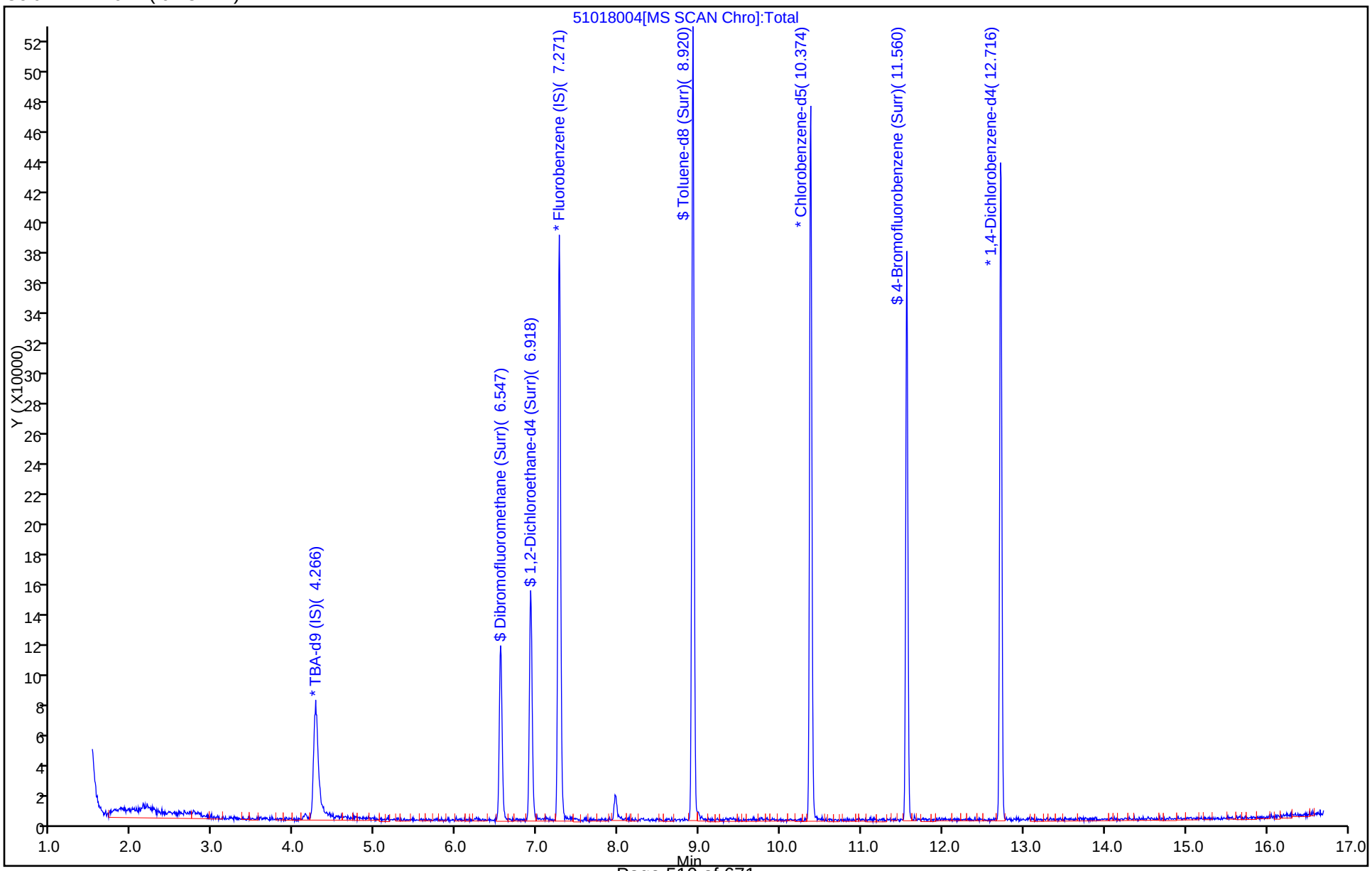
Report Date: 18-Oct-2016 15:11:46 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018004.D

Injection Date:	18-Oct-2016 13:17:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	MB			Worklist Smp#:	4
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	4
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018004.D
Lims ID: MB
Client ID:
Sample Type: MB
Inject. Date: 18-Oct-2016 13:17:30 ALS Bottle#: 4 Worklist Smp#: 4
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-004
Misc. Info.: MB
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 15:11:45 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 15:11:45

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	49.8	99.56
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	57.2	114.41
$ 7 Toluene-d8 (Surr)	50.0	52.0	103.95
$ 8 4-Bromofluorobenzene (Surr)	50.0	56.9	113.80

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

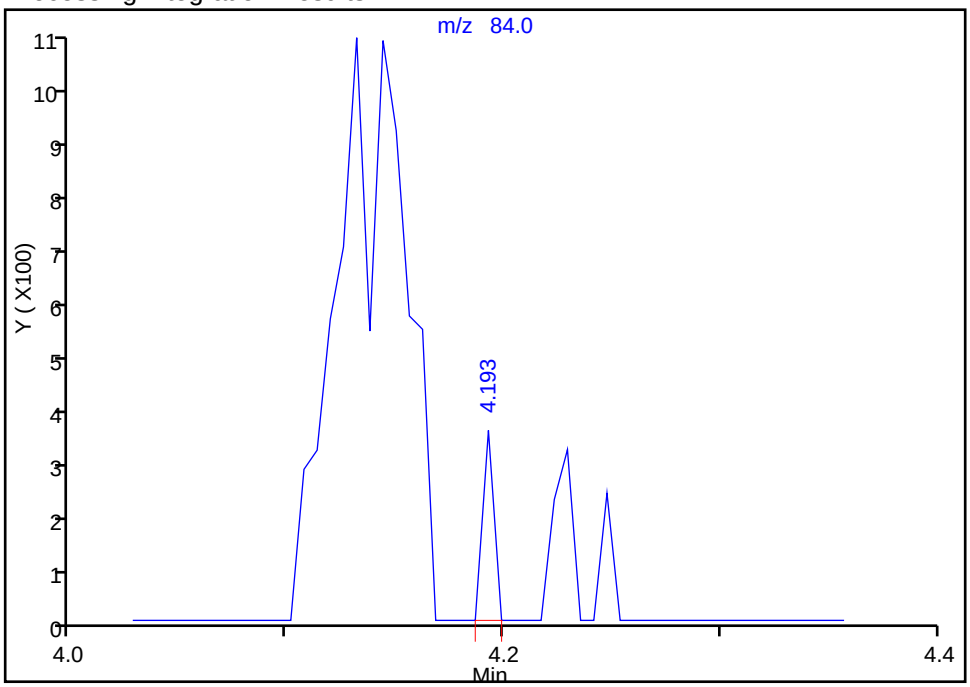
Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018004.D
Injection Date: 18-Oct-2016 13:17:30 Instrument ID: CHHP5
Lims ID: MB
Client ID:
Operator ID: 001562 ALS Bottle#: 4 Worklist Smp#: 4
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Method: MSVOA_LL_CHHP5 Limit Group: VOA 8260C ICAL
Column: DB-624 (0.18 mm) Detector MS SCAN

31 Methylene Chloride, CAS: 75-09-2

Signal: 1

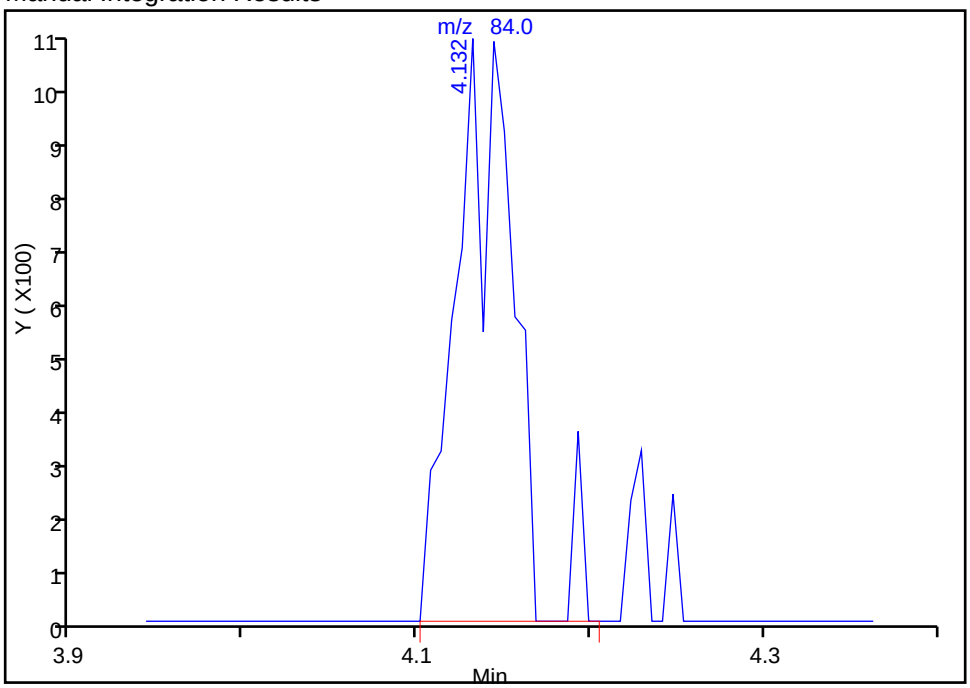
Processing Integration Results

RT: 4.19
Area: 119
Amount: 0.049063
Amount Units: ng



Manual Integration Results

RT: 4.13
Area: 2340
Amount: 0.964766
Amount Units: ng



Reviewer: fergusond, 18-Oct-2016 13:39:42
Audit Action: Manually Integrated Audit Reason: Incomplete Integration

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: MB 180-191652/4

Matrix: Water | Lab File ID: 61019004.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/19/2016 11:51

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191652 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	1.0	U	1.0	0.23
75-01-4	Vinyl chloride	1.0	U	1.0	0.32
74-83-9	Bromomethane	1.0	U	1.0	0.36
75-00-3	Chloroethane	1.0	U	1.0	0.26
75-35-4	1,1-Dichloroethene	1.0	U	1.0	0.29
67-64-1	Acetone	5.0	U	5.0	2.5
75-15-0	Carbon disulfide	1.0	U	1.0	0.18
75-09-2	Methylene Chloride	1.0	U	1.0	0.36
156-60-5	trans-1,2-Dichloroethene	1.0	U	1.0	0.29
1634-04-4	Methyl tert-butyl ether	1.0	U	1.0	0.24
75-34-3	1,1-Dichloroethane	1.0	U	1.0	0.24
156-59-2	cis-1,2-Dichloroethene	1.0	U	1.0	0.29
74-97-5	Bromochloromethane	1.0	U	1.0	0.38
78-93-3	2-Butanone (MEK)	5.0	U	5.0	1.2
67-66-3	Chloroform	1.0	U	1.0	0.27
71-55-6	1,1,1-Trichloroethane	1.0	U	1.0	0.22
56-23-5	Carbon tetrachloride	1.0	U	1.0	0.24
71-43-2	Benzene	1.0	U	1.0	0.26
107-06-2	1,2-Dichloroethane	1.0	U	1.0	0.25
79-01-6	Trichloroethene	1.0	U	1.0	0.26
78-87-5	1,2-Dichloropropane	1.0	U	1.0	0.23
75-27-4	Bromodichloromethane	1.0	U	1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	1.0	U	1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	5.0	U	5.0	0.59
108-88-3	Toluene	1.0	U	1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	1.0	U	1.0	0.24
79-00-5	1,1,2-Trichloroethane	1.0	U	1.0	0.35
127-18-4	Tetrachloroethene	1.0	U	1.0	0.27
591-78-6	2-Hexanone	5.0	U	5.0	0.74
124-48-1	Dibromochloromethane	1.0	U	1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	1.0	U	1.0	0.29
108-90-7	Chlorobenzene	1.0	U	1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	1.0	U	1.0	0.20
100-41-4	Ethylbenzene	1.0	U	1.0	0.27
1330-20-7	Xylenes, Total	2.0	U	2.0	0.48
100-42-5	Styrene	1.0	U	1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Client Sample ID: Lab Sample ID: MB 180-191652/4

Matrix: Water Lab File ID: 61019004.D

Analysis Method: 8260C Date Collected:

Sample wt/vol: 5(mL) Date Analyzed: 10/19/2016 11:51

Soil Aliquot Vol: Dilution Factor: 1

Soil Extract Vol.: GC Column: DB-624 ID: 0.18(mm)

% Moisture: Level: (low/med) Low

Analysis Batch No.: 191652 Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	1.0	U	1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	1.0	U	1.0	0.35
107-13-1	Acrylonitrile	20	U	20	2.8
123-91-1	1,4-Dioxane	200	U	200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	91		72-134
2037-26-5	Toluene-d8 (Surr)	103		80-120
460-00-4	4-Bromofluorobenzene (Surr)	97		72-120
1868-53-7	Dibromofluoromethane (Surr)	93		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019004.D
Lims ID: MB
Client ID:
Sample Type: MB
Inject. Date: 19-Oct-2016 11:51:30 ALS Bottle#: 4 Worklist Smp#: 4
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013943-004
Misc. Info.: MB
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 12:53:03 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 12:53:03

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.129	4.139	-0.010	89	110754	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.183	7.181	0.002	99	412428	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.292	10.289	0.003	86	102982	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.634	12.631	0.003	96	154261	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.447	6.451	-0.004	92	81912	50.0	46.5	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.824	6.822	0.002	69	108359	50.0	45.5	
$ 7 Toluene-d8 (Surr)	98	8.838	8.835	0.003	93	388082	50.0	51.5	
$ 8 4-Bromofluorobenzene (Surr	95	11.478	11.476	0.002	90	137386	50.0	48.5	
11 Dichlorodifluoromethane	85		1.547					ND	
12 Chloromethane	50		1.699					ND	
13 Vinyl chloride	62		1.839					ND	
14 Butadiene	39		1.870					ND	
15 Bromomethane	94		2.162					ND	
16 Chloroethane	64		2.296					ND	
17 Dichlorofluoromethane	67		2.563					ND	
18 Trichlorofluoromethane	101		2.594					ND	
19 Ethanol	45	2.779	2.819	-0.040	51	464			NC
20 Ethyl ether	59		2.947					ND	
21 Acrolein	56		3.117					ND	
22 1,1-Dichloroethene	96		3.226					ND	
23 1,1,2-Trichloro-1,2,2-trif	101		3.287					ND	
24 Acetone	43		3.324					ND	
25 Iodomethane	142		3.415					ND	
26 Carbon disulfide	76		3.500					ND	
27 Isopropyl alcohol	45	3.655	3.609	0.046	1	238			NC
28 Acetonitrile	40	3.764	3.774	-0.010	38	435			NC
29 3-Chloro-1-propene	76		3.780					ND	
30 Methyl acetate	43		3.804					ND	
31 Methylene Chloride	84		4.005					ND	
32 2-Methyl-2-propanol	59		4.279					ND	
33 Acrylonitrile	53		4.394					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
34 trans-1,2-Dichloroethene	96		4.425					ND	
35 Methyl tert-butyl ether	73		4.443					ND	
36 Hexane	57		4.857					ND	
37 1,1-Dichloroethane	63		5.070					ND	
39 2-Chloro-1,3-butadiene	53		5.093					ND	
40 Isopropyl ether	45		5.094					ND	
38 Vinyl acetate	43		5.124					ND	
41 Tert-butyl ethyl ether	59		5.580					ND	
42 2,2-Dichloropropane	97		5.824					ND	
43 cis-1,2-Dichloroethene	96		5.830					ND	
46 Ethyl acetate	43	5.857	5.842	0.015	1	174			NC
44 2-Butanone (MEK)	43		5.842					ND	
45 Propionitrile	54		5.848					ND	
47 Methacrylonitrile	41		6.079					ND	
48 Chlorobromomethane	128		6.116					ND	
49 Tetrahydrofuran	42		6.128					ND	
50 Chloroform	83		6.268					ND	
51 1,1,1-Trichloroethane	97		6.420					ND	
52 Cyclohexane	56		6.487					ND	
53 Carbon tetrachloride	117		6.597					ND	
54 1,1-Dichloropropene	75		6.609					ND	
55 Isobutyl alcohol	41		6.822					ND	
56 Benzene	78		6.828					ND	
148 Isooctane	57		6.907					ND	
57 1,2-Dichloroethane	62		6.907					ND	
58 Tert-amyl methyl ether	73	7.177	7.132	0.045	37	4890			NC
59 n-Heptane	43		7.199					ND	
60 n-Butanol	56		7.436					ND	
61 Trichloroethene	130		7.570					ND	
66 Methyl methacrylate	69		7.801					ND	
62 Ethyl acrylate	55		7.801					ND	
63 Methylcyclohexane	83		7.801					ND	
64 1,2-Dichloropropane	63		7.838					ND	
65 1,4-Dioxane	88		7.929					ND	
67 Dibromomethane	93		7.929					ND	
68 Dichlorobromomethane	83		8.124					ND	
69 2-Nitropropane	41		8.367					ND	
70 2-Chloroethyl vinyl ether	63		8.434					ND	
71 cis-1,3-Dichloropropene	75		8.574					ND	
72 4-Methyl-2-pentanone (MIBK	43		8.732					ND	
73 Toluene	91		8.902					ND	
74 trans-1,3-Dichloropropene	75		9.152					ND	
75 Ethyl methacrylate	69		9.219					ND	
76 1,1,2-Trichloroethane	97		9.346					ND	
77 Tetrachloroethene	164		9.413					ND	
78 1,3-Dichloropropane	76		9.505					ND	
80 n-Butyl acetate	43	9.696	9.565	0.131	1	420			NC
79 2-Hexanone	43		9.565					ND	
81 Chlorodibromomethane	129		9.717					ND	
82 Ethylene Dibromide	107		9.827					ND	
83 3-Chlorobenzotrifluoride	180		10.295					ND	
84 Chlorobenzene	112		10.320					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
85 4-Chlorobenzotrifluoride	180		10.387					ND	
86 1,1,1,2-Tetrachloroethane	131		10.417					ND	
87 Ethylbenzene	106		10.417					ND	
88 m-Xylene & p-Xylene	106		10.551					ND	
89 o-Xylene	106		10.934					ND	
90 Styrene	104		10.952					ND	
91 Bromoform	173		11.135					ND	
129 Cyclohexanol	57		11.153					ND	
92 2-Chlorobenzotrifluoride	180		11.208					ND	
93 Isopropylbenzene	105		11.299					ND	
94 Cyclohexanone	55	11.314	11.360	-0.046	1	74			NC
95 Bromobenzene	156		11.609					ND	
96 1,1,2,2-Tetrachloroethane	83		11.615					ND	
97 trans-1,4-Dichloro-2-buten	53		11.652					ND	
98 1,2,3-Trichloropropane	110		11.670					ND	
99 N-Propylbenzene	120		11.719					ND	
100 2-Chlorotoluene	126		11.804					ND	
101 3-Chlorotoluene	126		11.871					ND	
102 1,3,5-Trimethylbenzene	105		11.901					ND	
103 4-Chlorotoluene	126		11.926					ND	
104 tert-Butylbenzene	119		12.212					ND	
106 1,2,4-Trimethylbenzene	105		12.273					ND	
105 Pentachloroethane	167		12.321					ND	
107 1,2-dichloro-4-(trifluorom	214		12.321					ND	
112 1,2,3-Trimethylbenzene	105	12.439	12.437	0.002	1	327			NC
108 sec-Butylbenzene	105		12.437					ND	
109 1,3-Dichlorobenzene	146		12.552					ND	
110 4-Isopropyltoluene	119		12.595					ND	
111 1,4-Dichlorobenzene	146		12.656					ND	
113 2,4-Dichloro-1-(triflourom	214		12.686					ND	
115 Benzyl chloride	91		12.729					ND	
114 2,5-Dichlorobenzotrifluori	214		12.735					ND	
116 n-Butylbenzene	91		13.003					ND	
117 1,2-Dichlorobenzene	146		13.015					ND	
118 1,2-Dibromo-3-Chloropropan	75		13.806					ND	
119 2,4- & 2,5- & 2,6- Dichlor	125		13.945					ND	
120 1,3,5-Trichlorobenzene	180		13.948					ND	
121 2,3- & 3,4- Dichlorotoluen	125		14.365					ND	
122 1,2,4-Trichlorobenzene	180		14.627					ND	
123 Hexachlorobutadiene	225		14.773					ND	
124 Naphthalene	128		14.888					ND	
125 1,2,3-Trichlorobenzene	180		15.113					ND	
126 2,4,5-Trichlorotoluene	159		15.898					ND	
128 2-Methylnaphthalene	142		15.983					ND	
127 2,3,6-Trichlorotoluene	159		16.002					ND	
146 3,4-Dichlorotoluene	1		0.000					ND	
153 1,2 Epoxybutane TIC	1		0.000					ND	
151 Tert-amyl methyl ether (TI	1		0.000					ND	
152 Formaldehyde TIC	1		0.000					ND	
150 Tert-butyl ethyl ether (TI	1		0.000					ND	
143 2,5-Dichlorotoluene	1		0.000					ND	
147 2,6-Dichlorotoluene	1		0.000					ND	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
145 2,3-Dichlorotoluene	1		0.000					ND	
144 2,4-Dichlorotoluene	1		0.000					ND	
149 Isopropyl ether TIC	1		0.000					ND	
S 131 Xylenes, Total	106		1.000					ND	
S 130 1,2-Dichloroethene, Total	96		1.000					ND	
S 132 1,3-Dichloropropene, Total	1		0.000					ND	
T 135 Mesityl oxide TIC	83		0.000					ND	
T 134 Methyl n-amyl ketone TIC	43		0.000					ND	
T 133 Tetrahydrofuran TIC	42		0.000					ND	

QC Flag Legend

Processing Flags

NC - Not Calibrated

Reagents:

VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent
VOA8260SURR_00060	Amount Added:	2.00	Units: uL	Run Reagent

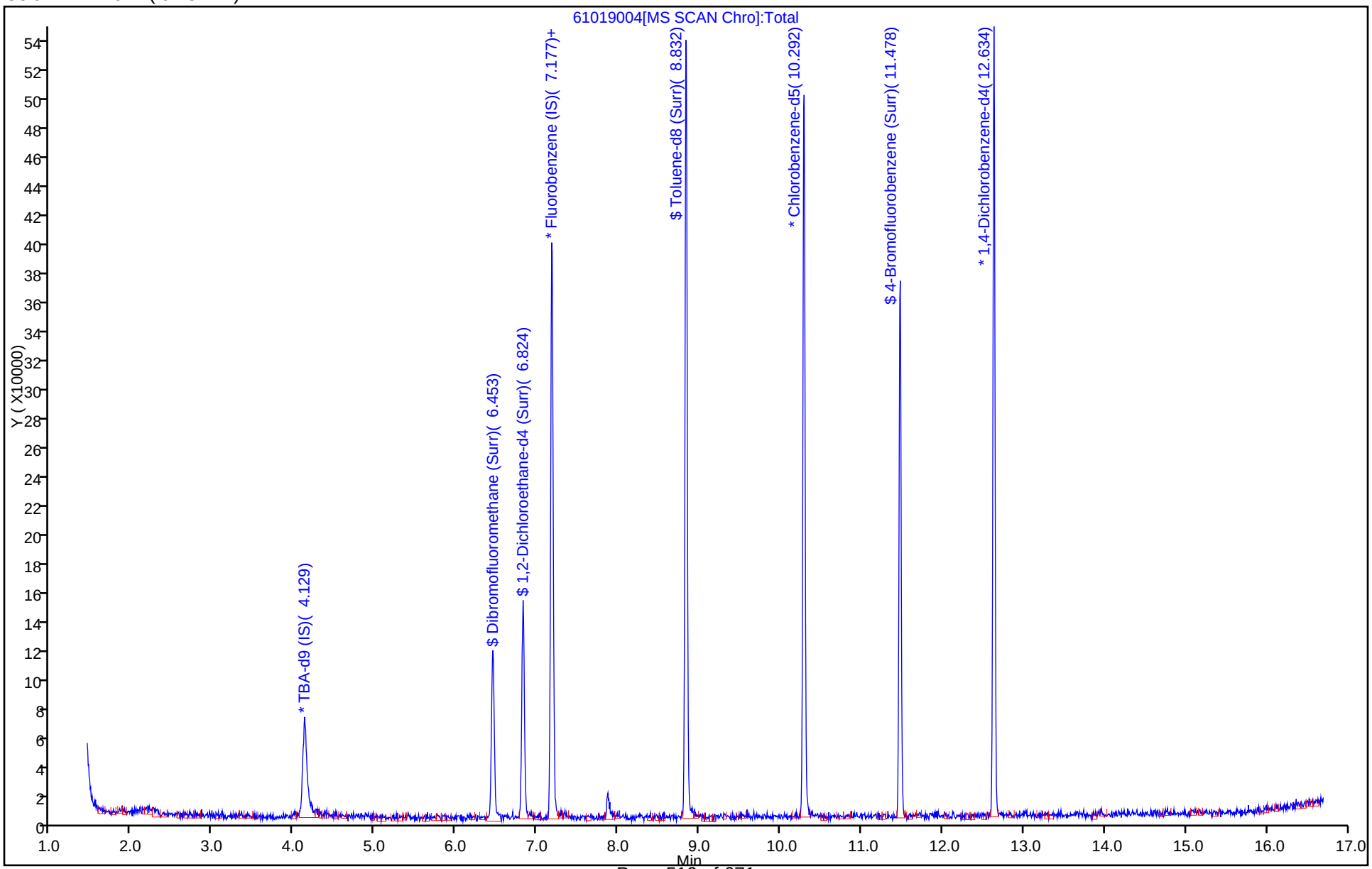
Report Date: 19-Oct-2016 12:53:04 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019004.D

Injection Date:	19-Oct-2016 11:51:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	MB			Worklist Smp#:	4
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	4
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019004.D
Lims ID: MB
Client ID:
Sample Type: MB
Inject. Date: 19-Oct-2016 11:51:30 ALS Bottle#: 4 Worklist Smp#: 4
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013943-004
Misc. Info.: MB
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 12:53:03 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 12:53:03

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	46.5	93.02
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	45.5	90.95
$ 7 Toluene-d8 (Surr)	50.0	51.5	103.04
$ 8 4-Bromofluorobenzene (Surr)	50.0	48.5	96.90

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: LCS 180-191289/9

Matrix: Water | Lab File ID: 51015009.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/15/2016 16:10

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191289 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	12.8		1.0	0.23
75-01-4	Vinyl chloride	12.2		1.0	0.32
74-83-9	Bromomethane	8.43		1.0	0.36
75-00-3	Chloroethane	11.2		1.0	0.26
75-35-4	1,1-Dichloroethene	9.86		1.0	0.29
67-64-1	Acetone	20.9		5.0	2.5
75-15-0	Carbon disulfide	9.35		1.0	0.18
75-09-2	Methylene Chloride	9.86		1.0	0.36
156-60-5	trans-1,2-Dichloroethene	10.4		1.0	0.29
1634-04-4	Methyl tert-butyl ether	9.23		1.0	0.24
75-34-3	1,1-Dichloroethane	11.0		1.0	0.24
156-59-2	cis-1,2-Dichloroethene	10.1		1.0	0.29
74-97-5	Bromochloromethane	9.24		1.0	0.38
78-93-3	2-Butanone (MEK)	19.8		5.0	1.2
67-66-3	Chloroform	10.7		1.0	0.27
71-55-6	1,1,1-Trichloroethane	9.42		1.0	0.22
56-23-5	Carbon tetrachloride	9.13		1.0	0.24
71-43-2	Benzene	10.7		1.0	0.26
107-06-2	1,2-Dichloroethane	11.7		1.0	0.25
79-01-6	Trichloroethene	9.45		1.0	0.26
78-87-5	1,2-Dichloropropane	11.2		1.0	0.23
75-27-4	Bromodichloromethane	10.2		1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	8.00		1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	17.6		5.0	0.59
108-88-3	Toluene	10.9		1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	7.52		1.0	0.24
79-00-5	1,1,2-Trichloroethane	10.8		1.0	0.35
127-18-4	Tetrachloroethene	11.2		1.0	0.27
591-78-6	2-Hexanone	15.7		5.0	0.74
124-48-1	Dibromochloromethane	9.15		1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	10.0		1.0	0.29
108-90-7	Chlorobenzene	11.4		1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	10.2		1.0	0.20
100-41-4	Ethylbenzene	11.0		1.0	0.27
1330-20-7	Xylenes, Total	22.9		2.0	0.48
100-42-5	Styrene	12.0		1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Client Sample ID: Lab Sample ID: LCS 180-191289/9

Matrix: Water Lab File ID: 51015009.D

Analysis Method: 8260C Date Collected:

Sample wt/vol: 5(mL) Date Analyzed: 10/15/2016 16:10

Soil Aliquot Vol: Dilution Factor: 1

Soil Extract Vol.: GC Column: DB-624 ID: 0.18(mm)

% Moisture: Level: (low/med) Low

Analysis Batch No.: 191289 Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	8.31		1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	12.2		1.0	0.35
107-13-1	Acrylonitrile	130		20	2.8
123-91-1	1,4-Dioxane	230		200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	113		72-134
2037-26-5	Toluene-d8 (Surr)	104		80-120
460-00-4	4-Bromofluorobenzene (Surr)	112		72-120
1868-53-7	Dibromofluoromethane (Surr)	103		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015009.D
Lims ID: LCS
Client ID:
Sample Type: LCS
Inject. Date: 15-Oct-2016 16:10:30 ALS Bottle#: 7 Worklist Smp#: 9
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-009
Misc. Info.: LCS
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 15-Oct-2016 16:38:37 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK011

First Level Reviewer: fergusond Date: 15-Oct-2016 16:38:36

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.281	4.278	0.003	0	106442	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.274	7.271	0.003	97	356610	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.371	10.373	-0.002	93	79471	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.719	12.722	-0.003	95	108535	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.544	6.547	-0.003	92	82497	50.0	51.3	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.922	6.918	0.004	0	123760	50.0	56.6	
$ 7 Toluene-d8 (Surr)	98	8.923	8.919	0.004	95	324393	50.0	51.9	
$ 8 4-Bromofluorobenzene (Surr	95	11.557	11.560	-0.003	82	129730	50.0	56.1	
11 Dichlorodifluoromethane	85	1.617	1.625	-0.008	98	112259	50.0	47.8	
12 Chloromethane	50	1.769	1.771	-0.002	99	174335	50.0	64.0	
13 Vinyl chloride	62	1.903	1.905	-0.002	97	134508	50.0	60.8	
14 Butadiene	39	1.945	1.942	0.003	98	214101	50.0	85.9	
15 Bromomethane	94	2.237	2.240	-0.003	88	40426	50.0	42.1	
16 Chloroethane	64	2.389	2.392	-0.003	98	78032	50.0	56.2	
17 Dichlorofluoromethane	67	2.663	2.659	0.004	96	155719	50.0	53.3	
18 Trichlorofluoromethane	101	2.681	2.672	0.009	57	105205	50.0	50.3	
20 Ethyl ether	59	3.040	3.049	-0.009	97	115591	50.0	63.9	
21 Acrolein	56	3.229	3.237	-0.008	98	68073	150.0	163.8	
22 1,1-Dichloroethene	96	3.338	3.341	-0.003	93	99696	50.0	49.3	
23 1,1,2-Trichloro-1,2,2-trif	101	3.405	3.402	0.003	93	105971	50.0	52.1	
24 Acetone	43	3.448	3.450	-0.002	96	73242	100.0	104.7	
25 Iodomethane	142	3.533	3.529	0.004	99	141290	50.0	48.9	
26 Carbon disulfide	76	3.618	3.621	-0.003	100	254325	50.0	46.7	
28 3-Chloro-1-propene	76	3.910	3.913	-0.003	86	59132	50.0	44.5	
30 Methyl acetate	43	3.935	3.937	-0.002	100	557202	250.0	323.8	
31 Methylene Chloride	84	4.129	4.132	-0.003	94	115747	50.0	49.3	
32 2-Methyl-2-propanol	59	4.415	4.405	0.010	85	68619	500.0	576.3	
33 Acrylonitrile	53	4.519	4.515	0.004	97	540639	500.0	647.8	
34 trans-1,2-Dichloroethene	96	4.549	4.551	-0.002	91	107671	50.0	52.1	
35 Methyl tert-butyl ether	73	4.567	4.570	-0.003	95	267394	50.0	46.1	
36 Hexane	57	4.969	4.971	-0.002	96	186813	50.0	57.1	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
37 1,1-Dichloroethane	63	5.188	5.190	-0.002	96	223819	50.0	54.9	
38 Vinyl acetate	43	5.236	5.239	-0.003	97	211378	50.0	51.0	
44 2,2-Dichloropropane	77	5.930	5.932	-0.002	61	83273	50.0	34.2	
45 cis-1,2-Dichloroethene	96	5.936	5.938	-0.002	86	117449	50.0	50.3	
46 2-Butanone (MEK)	43	5.948	5.951	-0.003	98	103418	100.0	99.1	
49 Chlorobromomethane	128	6.228	6.218	0.010	86	44469	50.0	46.2	
51 Tetrahydrofuran	42	6.240	6.237	0.003	94	83415	100.0	118.0	
52 Chloroform	83	6.368	6.364	0.004	97	194471	50.0	53.5	
53 1,1,1-Trichloroethane	97	6.520	6.522	-0.002	94	136385	50.0	47.1	
54 Cyclohexane	56	6.593	6.595	-0.002	98	251824	50.0	58.9	
56 Carbon tetrachloride	117	6.696	6.693	0.003	92	107013	50.0	45.7	
55 1,1-Dichloropropene	75	6.709	6.711	-0.002	87	154411	50.0	53.2	
57 Isobutyl alcohol	41	6.922	6.918	0.004	53	74196	1250.0	1436.4	
58 Benzene	78	6.928	6.924	0.004	97	439633	50.0	53.7	
59 1,2-Dichloroethane	62	7.007	7.003	0.004	96	168482	50.0	58.6	
62 n-Heptane	43	7.287	7.289	-0.002	97	182925	50.0	67.4	
64 Trichloroethene	130	7.664	7.660	0.004	93	94744	50.0	47.3	
66 Methylcyclohexane	83	7.895	7.897	-0.002	98	185846	50.0	52.6	
67 1,2-Dichloropropane	63	7.931	7.934	-0.003	93	117691	50.0	56.1	
70 1,4-Dioxane	88	8.029	8.019	0.010	45	16928	1000.0	1151.5	
68 Dibromomethane	93	8.023	8.025	-0.002	93	58094	50.0	53.2	
71 Dichlorobromomethane	83	8.217	8.220	-0.003	96	116756	50.0	50.9	
74 cis-1,3-Dichloropropene	75	8.661	8.664	-0.003	86	118462	50.0	40.0	
75 4-Methyl-2-pentanone (MIBK	43	8.820	8.816	0.004	98	178804	100.0	87.9	
76 Toluene	91	8.990	8.986	0.004	97	437099	50.0	54.5	
77 trans-1,3-Dichloropropene	75	9.239	9.242	-0.003	96	93854	50.0	37.6	
78 Ethyl methacrylate	69	9.300	9.303	-0.003	95	111617	50.0	45.4	
79 1,1,2-Trichloroethane	97	9.434	9.436	-0.002	95	80298	50.0	53.9	
80 Tetrachloroethene	164	9.501	9.503	-0.002	93	81821	50.0	55.8	
81 1,3-Dichloropropane	76	9.592	9.589	0.003	95	155024	50.0	55.2	
82 2-Hexanone	43	9.647	9.649	-0.002	98	126487	100.0	78.5	
84 Chlorodibromomethane	129	9.799	9.801	-0.002	90	62787	50.0	45.7	
85 Ethylene Dibromide	107	9.915	9.917	-0.002	97	75512	50.0	50.1	
86 3-Chlorobenzotrifluoride	180	10.377	10.379	-0.002	89	134462	50.0	51.2	
87 Chlorobenzene	112	10.401	10.404	-0.003	89	274681	50.0	56.8	
88 4-Chlorobenzotrifluoride	180	10.462	10.465	-0.003	96	131384	50.0	53.4	
90 Ethylbenzene	106	10.499	10.501	-0.002	100	154026	50.0	54.8	
89 1,1,1,2-Tetrachloroethane	131	10.499	10.501	-0.002	87	77022	50.0	51.2	
91 m-Xylene & p-Xylene	106	10.632	10.635	-0.003	0	193013	50.0	56.2	
92 o-Xylene	106	11.016	11.018	-0.002	98	186223	50.0	58.6	
93 Styrene	104	11.040	11.036	0.004	94	318790	50.0	60.1	
94 Bromoform	173	11.223	11.225	-0.002	93	33326	50.0	41.5	
96 2-Chlorobenzotrifluoride	180	11.283	11.292	-0.009	94	136652	50.0	57.1	
97 Isopropylbenzene	105	11.381	11.383	-0.002	98	484362	50.0	62.4	
99 1,1,2,2-Tetrachloroethane	83	11.697	11.700	-0.003	96	108281	50.0	61.0	
100 Bromobenzene	156	11.697	11.700	-0.003	96	102831	50.0	44.6	
102 trans-1,4-Dichloro-2-buten	53	11.734	11.736	-0.002	65	15822	50.0	18.1	
101 1,2,3-Trichloropropane	110	11.758	11.754	0.004	88	35833	50.0	45.3	
103 N-Propylbenzene	120	11.800	11.803	-0.003	99	122307	50.0	44.5	
104 2-Chlorotoluene	126	11.886	11.888	-0.002	94	103651	50.0	45.5	
105 3-Chlorotoluene	126	11.953	11.955	-0.002	98	102858	50.0	42.1	
106 1,3,5-Trimethylbenzene	105	11.983	11.985	-0.002	94	380355	50.0	52.3	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
107 4-Chlorotoluene	126	12.007	12.016	-0.009	99	108961	50.0	45.7	
108 tert-Butylbenzene	119	12.299	12.296	0.003	94	296044	50.0	48.4	
110 1,2,4-Trimethylbenzene	105	12.354	12.357	-0.002	99	373914	50.0	51.6	
111 1,2-dichloro-4-(trifluorom	214	12.397	12.399	-0.002	96	89627	50.0	45.0	
112 sec-Butylbenzene	105	12.518	12.521	-0.003	96	421196	50.0	49.9	
113 1,3-Dichlorobenzene	146	12.640	12.642	-0.002	96	181554	50.0	49.0	
114 4-Isopropyltoluene	119	12.677	12.679	-0.003	97	331944	50.0	49.9	
115 1,4-Dichlorobenzene	146	12.743	12.746	-0.003	93	180240	50.0	49.0	
116 2,4-Dichloro-1-(triflourom	214	12.768	12.770	-0.002	96	75319	50.0	44.4	
118 2,5-Dichlorobenzotrifluori	214	12.810	12.813	-0.003	0	89048	50.0	45.6	
120 n-Butylbenzene	91	13.084	13.087	-0.003	98	288575	50.0	51.9	
121 1,2-Dichlorobenzene	146	13.096	13.099	-0.003	93	155557	50.0	50.2	
122 1,2-Dibromo-3-Chloropropan	75	13.887	13.896	-0.009	67	11643	50.0	37.4	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.027	14.036	-0.009	0	247761	150.0	124.3	
125 2,3- & 3,4- Dichlorotoluen	125	14.447	14.455	-0.008	0	148275	100.0	76.2	
126 1,2,4-Trichlorobenzene	180	14.714	14.717	-0.003	92	48907	50.0	35.8	
127 Hexachlorobutadiene	225	14.860	14.863	-0.003	95	22820	50.0	34.4	
128 Naphthalene	128	14.976	14.978	-0.002	98	121567	50.0	30.6	
129 1,2,3-Trichlorobenzene	180	15.207	15.204	0.003	96	36384	50.0	29.7	
131 2,4,5-Trichlorotoluene	159	15.986	15.982	0.004	0	15168	50.0	18.7	
130 2,3,6-Trichlorotoluene	159	16.077	16.086	-0.009	91	13403	50.0	13.6	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
S 133 Xylenes, Total	106				0		100.0	114.8	
S 134 1,2-Dichloroethene, Total	96				0		100.0	102.4	
S 135 1,3-Dichloropropene, Total	1				0		100.0	77.6	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Reagents:

VOA8260VOA2ND_00209	Amount Added:	2.00	Units: uL		
voaWva2ndRest_00007	Amount Added:	2.00	Units: uL		
voaWee2ndRest_00009	Amount Added:	2.00	Units: uL		
voaWket2ndRes_00013	Amount Added:	2.00	Units: uL		
voaWacro2ndRe_00007	Amount Added:	6.00	Units: uL		
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent	
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent	

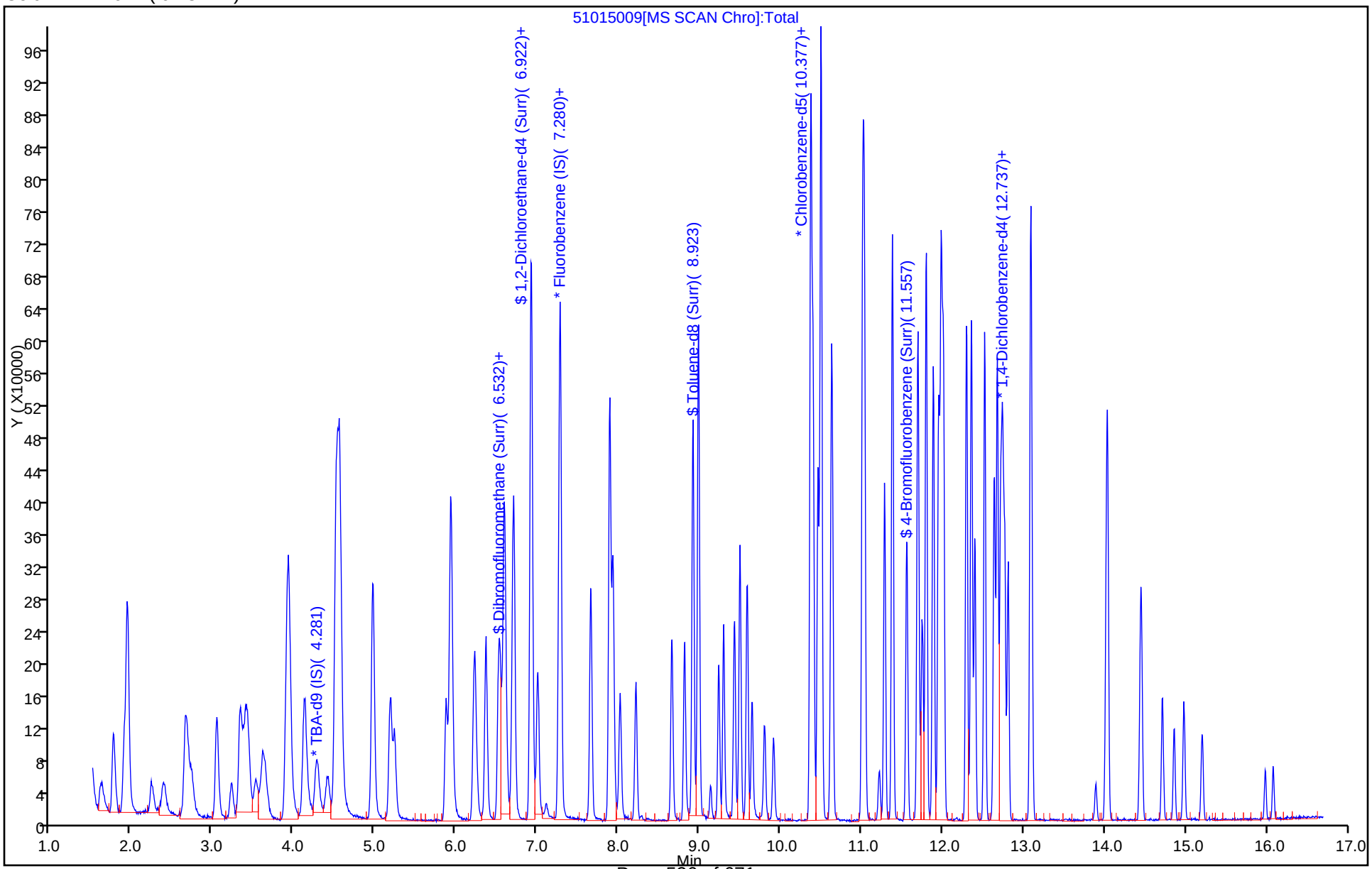
Report Date: 15-Oct-2016 16:38:37 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015009.D

Injection Date:	15-Oct-2016 16:10:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	LCS			Worklist Smp#:	9
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	7
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\51015009.D
Lims ID: LCS
Client ID:
Sample Type: LCS
Inject. Date: 15-Oct-2016 16:10:30 ALS Bottle#: 7 Worklist Smp#: 9
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013887-009
Misc. Info.: LCS
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161015-13887.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 15-Oct-2016 16:38:37 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK011

First Level Reviewer: fergusond Date: 15-Oct-2016 16:38:36

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	51.3	102.64
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	56.6	113.27
$ 7 Toluene-d8 (Surr)	50.0	51.9	103.76
$ 8 4-Bromofluorobenzene (Surr)	50.0	56.1	112.30

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: LCS 180-191520/9

Matrix: Water | Lab File ID: 51018009.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/18/2016 15:44

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191520 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	11.6		1.0	0.23
75-01-4	Vinyl chloride	10.7		1.0	0.32
74-83-9	Bromomethane	8.21		1.0	0.36
75-00-3	Chloroethane	9.82		1.0	0.26
75-35-4	1,1-Dichloroethene	8.85		1.0	0.29
67-64-1	Acetone	19.5		5.0	2.5
75-15-0	Carbon disulfide	8.62		1.0	0.18
75-09-2	Methylene Chloride	9.96		1.0	0.36
156-60-5	trans-1,2-Dichloroethene	9.07		1.0	0.29
1634-04-4	Methyl tert-butyl ether	9.05		1.0	0.24
75-34-3	1,1-Dichloroethane	10.2		1.0	0.24
156-59-2	cis-1,2-Dichloroethene	9.53		1.0	0.29
74-97-5	Bromochloromethane	9.24		1.0	0.38
78-93-3	2-Butanone (MEK)	21.4		5.0	1.2
67-66-3	Chloroform	9.83		1.0	0.27
71-55-6	1,1,1-Trichloroethane	8.46		1.0	0.22
56-23-5	Carbon tetrachloride	8.05		1.0	0.24
71-43-2	Benzene	10.2		1.0	0.26
107-06-2	1,2-Dichloroethane	10.8		1.0	0.25
79-01-6	Trichloroethene	9.13		1.0	0.26
78-87-5	1,2-Dichloropropane	10.9		1.0	0.23
75-27-4	Bromodichloromethane	10.2		1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	8.64		1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	18.1		5.0	0.59
108-88-3	Toluene	9.93		1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	7.79		1.0	0.24
79-00-5	1,1,2-Trichloroethane	10.1		1.0	0.35
127-18-4	Tetrachloroethene	9.66		1.0	0.27
591-78-6	2-Hexanone	15.8		5.0	0.74
124-48-1	Dibromochloromethane	9.06		1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	10.1		1.0	0.29
108-90-7	Chlorobenzene	10.5		1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	9.51		1.0	0.20
100-41-4	Ethylbenzene	10.1		1.0	0.27
1330-20-7	Xylenes, Total	21.3		2.0	0.48
100-42-5	Styrene	10.9		1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: LCS 180-191520/9

Matrix: Water | Lab File ID: 51018009.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/18/2016 15:44

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191520 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	9.14		1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	11.7		1.0	0.35
107-13-1	Acrylonitrile	129		20	2.8
123-91-1	1,4-Dioxane	231		200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	107		72-134
2037-26-5	Toluene-d8 (Surr)	97		80-120
460-00-4	4-Bromofluorobenzene (Surr)	103		72-120
1868-53-7	Dibromofluoromethane (Surr)	95		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018009.D
Lims ID: LCS
Client ID:
Sample Type: LCS
Inject. Date: 18-Oct-2016 15:44:30 ALS Bottle#: 9 Worklist Smp#: 9
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-009
Misc. Info.: LCS
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 16:15:54 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 16:15:53

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.263	4.273	-0.010	0	135362	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.268	7.266	0.002	96	388682	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.371	10.375	-0.003	91	91259	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.719	12.717	0.002	97	121446	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.544	6.542	0.002	93	82834	50.0	47.3	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.915	6.913	0.002	0	127051	50.0	53.3	
$ 7 Toluene-d8 (Surr)	98	8.923	8.921	0.002	95	348092	50.0	48.5	
$ 8 4-Bromofluorobenzene (Surr	95	11.557	11.561	-0.004	83	136011	50.0	51.3	
11 Dichlorodifluoromethane	85	1.610	1.608	0.002	99	94290	50.0	36.9	
12 Chloromethane	50	1.763	1.760	0.003	98	171651	50.0	57.9	
13 Vinyl chloride	62	1.909	1.906	0.003	83	128583	50.0	53.3	
14 Butadiene	39	1.939	1.931	0.008	98	185634	50.0	68.3	
15 Bromomethane	94	2.237	2.235	0.002	88	42950	50.0	41.1	
16 Chloroethane	64	2.383	2.369	0.014	99	74277	50.0	49.1	
17 Dichlorofluoromethane	67	2.663	2.655	0.008	96	155189	50.0	48.7	
18 Trichlorofluoromethane	101	2.657	2.679	-0.022	53	106870	50.0	46.9	
20 Ethyl ether	59	3.040	3.032	0.008	97	121792	50.0	61.7	
21 Acrolein	56	3.223	3.214	0.009	99	85930	150.0	189.7	
22 1,1-Dichloroethene	96	3.332	3.336	-0.004	92	97560	50.0	44.3	
23 1,1,2-Trichloro-1,2,2-trif	101	3.393	3.397	-0.004	94	99043	50.0	44.7	
24 Acetone	43	3.442	3.439	0.003	98	74278	100.0	97.4	
25 Iodomethane	142	3.521	3.518	0.003	98	137873	50.0	43.7	
26 Carbon disulfide	76	3.624	3.616	0.008	100	255777	50.0	43.1	
28 3-Chloro-1-propene	76	3.910	3.902	0.008	87	60446	50.0	41.7	
30 Methyl acetate	43	3.928	3.926	0.002	100	604552	250.0	322.3	
31 Methylene Chloride	84	4.129	4.121	0.008	95	127411	50.0	49.8	
32 2-Methyl-2-propanol	59	4.403	4.413	-0.010	85	80532	500.0	531.8	
33 Acrylonitrile	53	4.512	4.510	0.002	98	584895	500.0	643.0	
34 trans-1,2-Dichloroethene	96	4.549	4.540	0.009	92	102185	50.0	45.3	
35 Methyl tert-butyl ether	73	4.561	4.559	0.002	96	285819	50.0	45.2	
36 Hexane	57	4.962	4.966	-0.004	95	186367	50.0	52.3	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
37 1,1-Dichloroethane	63	5.188	5.179	0.009	96	227362	50.0	51.1	
38 Vinyl acetate	43	5.236	5.234	0.002	97	250983	50.0	55.6	
44 2,2-Dichloropropane	77	5.930	5.921	0.009	55	87264	50.0	32.9	
45 cis-1,2-Dichloroethene	96	5.930	5.927	0.003	88	121316	50.0	47.7	
46 2-Butanone (MEK)	43	5.948	5.946	0.002	98	121522	100.0	106.8	
49 Chlorobromomethane	128	6.222	6.213	0.009	87	48426	50.0	46.2	
51 Tetrahydrofuran	42	6.240	6.238	0.002	94	99268	100.0	128.9	
52 Chloroform	83	6.362	6.359	0.003	97	194720	50.0	49.2	
53 1,1,1-Trichloroethane	97	6.520	6.524	-0.004	95	133486	50.0	42.3	
54 Cyclohexane	56	6.593	6.591	0.002	97	245884	50.0	52.7	
56 Carbon tetrachloride	117	6.690	6.694	-0.004	97	102792	50.0	40.2	
55 1,1-Dichloropropene	75	6.708	6.706	0.002	88	154386	50.0	48.8	
57 Isobutyl alcohol	41	6.921	6.919	0.002	53	78714	1250.0	1398.1	
58 Benzene	78	6.921	6.925	-0.004	95	453249	50.0	50.8	
59 1,2-Dichloroethane	62	7.007	7.004	0.002	96	168814	50.0	53.9	
62 n-Heptane	43	7.286	7.284	0.002	97	182140	50.0	61.6	
64 Trichloroethene	130	7.657	7.655	0.002	95	99769	50.0	45.7	
66 Methylcyclohexane	83	7.895	7.892	0.003	98	184392	50.0	47.9	
67 1,2-Dichloropropane	63	7.931	7.929	0.002	94	124767	50.0	54.6	
70 1,4-Dioxane	88	8.016	8.014	0.002	46	18522	1000.0	1155.9	
68 Dibromomethane	93	8.022	8.014	0.008	96	58980	50.0	49.6	
71 Dichlorobromomethane	83	8.217	8.215	0.002	98	127126	50.0	50.8	
73 2-Chloroethyl vinyl ether	63	8.515	8.513	0.002	89	135287	100.0	112.7	
74 cis-1,3-Dichloropropene	75	8.661	8.659	0.002	87	139583	50.0	43.2	
75 4-Methyl-2-pentanone (MIBK	43	8.813	8.811	0.002	99	210877	100.0	90.3	
76 Toluene	91	8.990	8.987	0.003	97	457242	50.0	49.7	
77 trans-1,3-Dichloropropene	75	9.239	9.237	0.002	97	111612	50.0	39.0	
78 Ethyl methacrylate	69	9.300	9.298	0.002	95	126485	50.0	44.8	
79 1,1,2-Trichloroethane	97	9.434	9.432	0.002	94	86217	50.0	50.4	
80 Tetrachloroethene	164	9.501	9.498	0.003	94	81262	50.0	48.3	
81 1,3-Dichloropropane	76	9.586	9.590	-0.004	96	171586	50.0	53.2	
82 2-Hexanone	43	9.647	9.644	0.003	99	146602	100.0	79.2	
84 Chlorodibromomethane	129	9.805	9.803	0.002	90	71379	50.0	45.3	
85 Ethylene Dibromide	107	9.914	9.912	0.002	97	86932	50.0	50.3	
86 3-Chlorobenzotrifluoride	180	10.377	10.375	0.003	92	150836	50.0	50.0	
87 Chlorobenzene	112	10.401	10.405	-0.004	90	290504	50.0	52.3	
88 4-Chlorobenzotrifluoride	180	10.462	10.466	-0.004	96	145065	50.0	51.3	
89 1,1,1,2-Tetrachloroethane	131	10.498	10.496	0.002	89	82030	50.0	47.5	
90 Ethylbenzene	106	10.498	10.502	-0.004	99	162415	50.0	50.3	
91 m-Xylene & p-Xylene	106	10.632	10.636	-0.004	0	204760	50.0	51.9	
92 o-Xylene	106	11.016	11.013	0.003	98	198245	50.0	54.4	
93 Styrene	104	11.034	11.038	-0.004	94	330582	50.0	54.3	
94 Bromoform	173	11.222	11.220	0.002	94	42119	50.0	45.7	
96 2-Chlorobenzotrifluoride	180	11.283	11.287	-0.004	95	148622	50.0	54.1	
97 Isopropylbenzene	105	11.381	11.384	-0.004	98	490913	50.0	55.1	
100 Bromobenzene	156	11.697	11.695	0.002	98	112240	50.0	43.5	
99 1,1,2,2-Tetrachloroethane	83	11.697	11.701	-0.004	74	119657	50.0	58.7	
102 trans-1,4-Dichloro-2-buten	53	11.733	11.737	-0.004	72	29504	50.0	30.1	
101 1,2,3-Trichloropropane	110	11.752	11.755	-0.003	89	37084	50.0	41.9	
103 N-Propylbenzene	120	11.800	11.798	0.002	99	124559	50.0	40.5	
104 2-Chlorotoluene	126	11.885	11.889	-0.004	94	106468	50.0	41.7	
105 3-Chlorotoluene	126	11.952	11.956	-0.004	97	118655	50.0	43.4	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
106 1,3,5-Trimethylbenzene	105	11.983	11.987	-0.004	94	392726	50.0	48.2	
107 4-Chlorotoluene	126	12.013	12.011	0.002	99	115455	50.0	43.3	
108 tert-Butylbenzene	119	12.299	12.297	0.002	95	306643	50.0	44.8	
110 1,2,4-Trimethylbenzene	105	12.354	12.358	-0.004	99	391840	50.0	48.4	
111 1,2-dichloro-4-(trifluorom	214	12.403	12.400	0.003	96	99051	50.0	44.4	
112 sec-Butylbenzene	105	12.518	12.522	-0.004	96	438256	50.0	46.4	
113 1,3-Dichlorobenzene	146	12.640	12.638	0.002	95	192420	50.0	46.4	
114 4-Isopropyltoluene	119	12.676	12.674	0.002	97	339127	50.0	45.6	
115 1,4-Dichlorobenzene	146	12.743	12.741	0.002	93	195350	50.0	47.4	
116 2,4-Dichloro-1-(triflourom	214	12.768	12.765	0.003	96	94395	50.0	49.8	
118 2,5-Dichlorobenzotrifluori	214	12.810	12.808	0.002	0	94940	50.0	43.4	
120 n-Butylbenzene	91	13.084	13.088	-0.004	99	302074	50.0	48.6	
121 1,2-Dichlorobenzene	146	13.102	13.100	0.002	94	172427	50.0	49.7	
122 1,2-Dibromo-3-Chloropropan	75	13.887	13.891	-0.004	70	15392	50.0	44.2	
123 2,4- & 2,5- & 2,6- Dichlor	125	14.033	14.031	0.002	0	314675	150.0	141.1	
125 2,3- & 3,4- Dichlorotoluen	125	14.447	14.450	-0.003	0	193768	100.0	88.9	
126 1,2,4-Trichlorobenzene	180	14.714	14.712	0.002	93	68345	50.0	44.8	
127 Hexachlorobutadiene	225	14.860	14.858	0.002	95	28917	50.0	39.0	
128 Naphthalene	128	14.976	14.980	-0.004	98	178585	50.0	40.1	
129 1,2,3-Trichlorobenzene	180	15.201	15.205	-0.004	95	52384	50.0	38.2	
131 2,4,5-Trichlorotoluene	159	15.980	15.983	-0.003	0	20726	50.0	22.6	
130 2,3,6-Trichlorotoluene	159	16.077	16.081	-0.004	87	17737	50.0	16.1	
147 2,4-Dichlorotoluene	1		0.000				ND	ND	
146 2,5-Dichlorotoluene	1		0.000				ND	ND	
148 2,3-Dichlorotoluene	1		0.000				ND	ND	
150 2,6-Dichlorotoluene	1		0.000				ND	ND	
149 3,4-Dichlorotoluene	1		0.000				ND	ND	
S 134 1,2-Dichloroethene, Total	96				0		100.0	93.0	
S 133 Xylenes, Total	106				0		100.0	106.3	
S 135 1,3-Dichloropropene, Total	1				0		100.0	82.2	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Reagents:

voaW2cleveRes_00002	Amount Added:	2.00	Units: uL		
VOA8260VOA2ND_00209	Amount Added:	2.00	Units: uL		
voaWee2ndRest_00009	Amount Added:	2.00	Units: uL		
voaWket2ndRes_00013	Amount Added:	2.00	Units: uL		
voaWva2ndRest_00007	Amount Added:	2.00	Units: uL		
voaWacro2ndRe_00007	Amount Added:	6.00	Units: uL		
VOA8260INT_00061	Amount Added:	2.00	Units: uL	Run Reagent	
VOA8260SURR_00059	Amount Added:	2.00	Units: uL	Run Reagent	

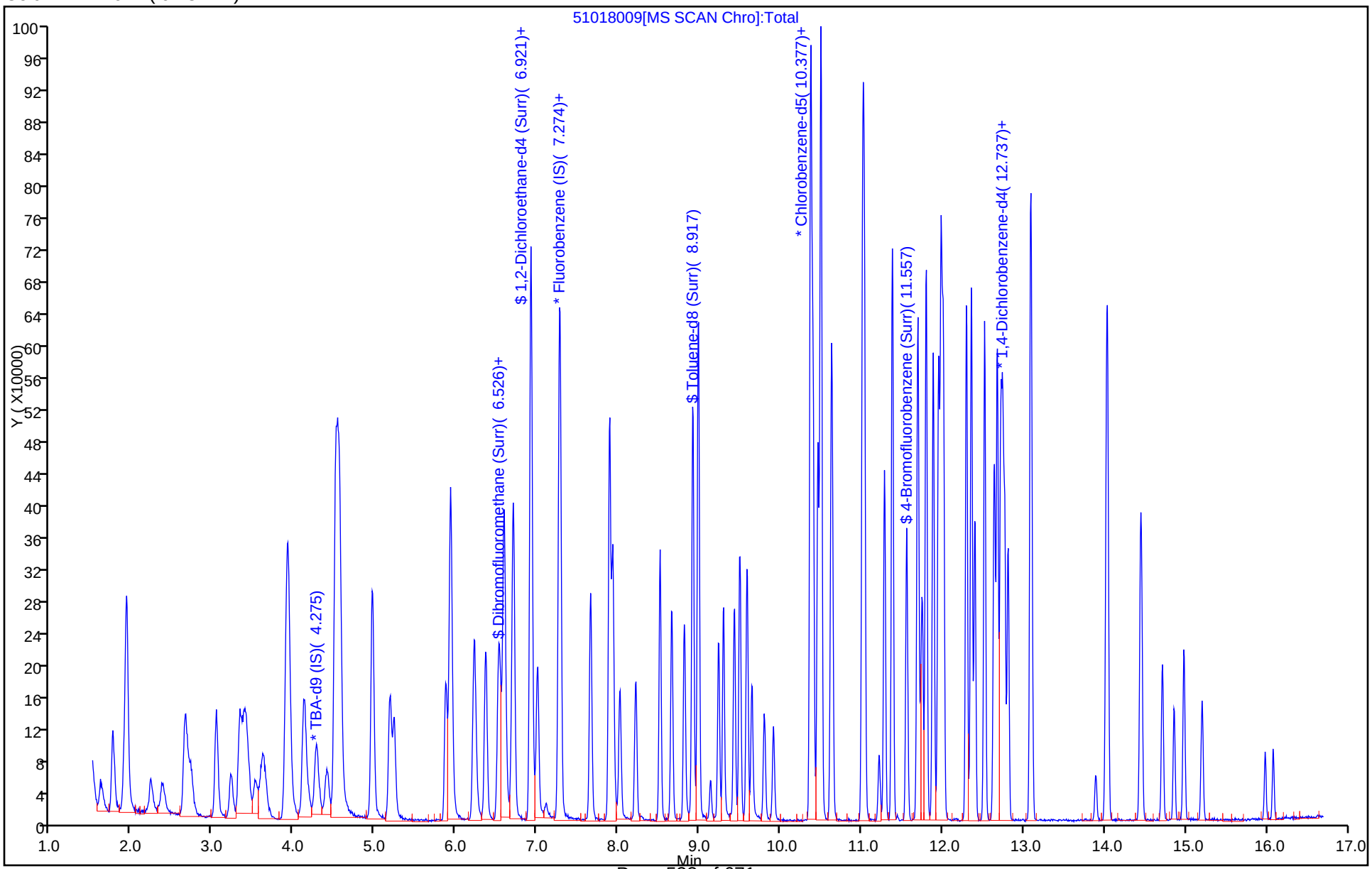
Report Date: 18-Oct-2016 16:15:56 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018009.D

Injection Date:	18-Oct-2016 15:44:30	Instrument ID:	CHHP5	Operator ID:	001562
Lims ID:	LCS			Worklist Smp#:	9
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	9
Method:	MSVOA_LL_CHHP5	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\51018009.D
Lims ID: LCS
Client ID:
Sample Type: LCS
Inject. Date: 18-Oct-2016 15:44:30 ALS Bottle#: 9 Worklist Smp#: 9
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013928-009
Misc. Info.: LCS
Operator ID: 001562 Instrument ID: CHHP5

Method: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161018-13928.b\MSVOA_LL_CHHP5.m
Limit Group: VOA 8260C ICAL
Last Update: 18-Oct-2016 16:15:54 Calib Date: 04-Oct-2016 16:03:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP5\20161004-13721.b\51004011.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK008

First Level Reviewer: fergusond Date: 18-Oct-2016 16:15:53

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	47.3	94.56
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	53.3	106.68
$ 7 Toluene-d8 (Surr)	50.0	48.5	96.96
$ 8 4-Bromofluorobenzene (Surr)	50.0	51.3	102.53

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: LCS 180-191652/7

Matrix: Water | Lab File ID: 61019007.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/19/2016 13:15

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191652 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
74-87-3	Chloromethane	11.0		1.0	0.23
75-01-4	Vinyl chloride	10.7		1.0	0.32
74-83-9	Bromomethane	11.5		1.0	0.36
75-00-3	Chloroethane	9.70		1.0	0.26
75-35-4	1,1-Dichloroethene	9.78		1.0	0.29
67-64-1	Acetone	25.4		5.0	2.5
75-15-0	Carbon disulfide	9.96		1.0	0.18
75-09-2	Methylene Chloride	10.3		1.0	0.36
156-60-5	trans-1,2-Dichloroethene	10.1		1.0	0.29
1634-04-4	Methyl tert-butyl ether	10.0		1.0	0.24
75-34-3	1,1-Dichloroethane	9.90		1.0	0.24
156-59-2	cis-1,2-Dichloroethene	10.0		1.0	0.29
74-97-5	Bromochloromethane	9.56		1.0	0.38
78-93-3	2-Butanone (MEK)	22.7		5.0	1.2
67-66-3	Chloroform	9.86		1.0	0.27
71-55-6	1,1,1-Trichloroethane	9.95		1.0	0.22
56-23-5	Carbon tetrachloride	10.4		1.0	0.24
71-43-2	Benzene	10.2		1.0	0.26
107-06-2	1,2-Dichloroethane	9.44		1.0	0.25
79-01-6	Trichloroethene	10.1		1.0	0.26
78-87-5	1,2-Dichloropropane	9.61		1.0	0.23
75-27-4	Bromodichloromethane	9.80		1.0	0.23
10061-01-5	cis-1,3-Dichloropropene	9.97		1.0	0.21
108-10-1	4-Methyl-2-pentanone (MIBK)	20.7		5.0	0.59
108-88-3	Toluene	10.8		1.0	0.28
10061-02-6	trans-1,3-Dichloropropene	9.49		1.0	0.24
79-00-5	1,1,2-Trichloroethane	10.4		1.0	0.35
127-18-4	Tetrachloroethene	10.6		1.0	0.27
591-78-6	2-Hexanone	24.4		5.0	0.74
124-48-1	Dibromochloromethane	9.88		1.0	0.40
106-93-4	1,2-Dibromoethane (EDB)	10.6		1.0	0.29
108-90-7	Chlorobenzene	10.8		1.0	0.31
630-20-6	1,1,1,2-Tetrachloroethane	10.7		1.0	0.20
100-41-4	Ethylbenzene	11.1		1.0	0.27
1330-20-7	Xylenes, Total	22.0		2.0	0.48
100-42-5	Styrene	10.8		1.0	0.26

FORM I
GC/MS VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: LCS 180-191652/7

Matrix: Water | Lab File ID: 61019007.D

Analysis Method: 8260C | Date Collected:

Sample wt/vol: 5(mL) | Date Analyzed: 10/19/2016 13:15

Soil Aliquot Vol: | Dilution Factor: 1

Soil Extract Vol.: | GC Column: DB-624 ID: 0.18(mm)

% Moisture: | Level: (low/med) Low

Analysis Batch No.: 191652 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
75-25-2	Bromoform	10.2		1.0	0.29
79-34-5	1,1,2,2-Tetrachloroethane	10.6		1.0	0.35
107-13-1	Acrylonitrile	96.7		20	2.8
123-91-1	1,4-Dioxane	148	J	200	7.5

CAS NO.	SURROGATE	%REC	Q	LIMITS
17060-07-0	1,2-Dichloroethane-d4 (Surr)	91		72-134
2037-26-5	Toluene-d8 (Surr)	105		80-120
460-00-4	4-Bromofluorobenzene (Surr)	103		72-120
1868-53-7	Dibromofluoromethane (Surr)	99		77-127

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019007.D
Lims ID: LCS
Client ID:
Sample Type: LCS
Inject. Date: 19-Oct-2016 13:15:30 ALS Bottle#: 7 Worklist Smp#: 7
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013943-007
Misc. Info.: LCS
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 13:38:53 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 13:38:53

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 TBA-d9 (IS)	65	4.141	4.139	0.002	92	114457	1000.0	1000.0	
* 2 Fluorobenzene (IS)	96	7.177	7.181	-0.004	99	440334	50.0	50.0	
* 3 Chlorobenzene-d5	119	10.291	10.289	0.002	86	105718	50.0	50.0	
* 4 1,4-Dichlorobenzene-d4	152	12.634	12.631	0.003	93	171312	50.0	50.0	
$ 5 Dibromofluoromethane (Surr	113	6.453	6.451	0.002	93	93483	50.0	49.7	
$ 6 1,2-Dichloroethane-d4 (Sur	65	6.824	6.822	0.002	63	116039	50.0	45.6	
$ 7 Toluene-d8 (Surr)	98	8.831	8.835	-0.004	93	405661	50.0	52.5	
$ 8 4-Bromofluorobenzene (Surr	95	11.478	11.476	0.002	88	149800	50.0	51.5	
11 Dichlorodifluoromethane	85	1.543	1.547	-0.004	100	108436	50.0	54.1	
12 Chloromethane	50	1.702	1.699	0.003	99	141551	50.0	55.1	
13 Vinyl chloride	62	1.842	1.839	0.003	98	125289	50.0	53.4	
14 Butadiene	39	1.872	1.870	0.002	91	114967	50.0	46.8	
15 Bromomethane	94	2.164	2.162	0.002	92	58498	50.0	57.3	
16 Chloroethane	64	2.310	2.296	0.014	98	72100	50.0	48.5	
17 Dichlorofluoromethane	67	2.565	2.563	0.002	96	170870	50.0	50.3	
18 Trichlorofluoromethane	101	2.584	2.594	-0.010	73	162065	50.0	57.6	
20 Ethyl ether	59	2.949	2.947	0.002	91	110572	50.0	48.2	
21 Acrolein	56	3.125	3.117	0.008	98	75906	150.0	154.8	
22 1,1-Dichloroethene	96	3.235	3.226	0.009	98	105848	50.0	48.9	
23 1,1,2-Trichloro-1,2,2-trif	101	3.289	3.287	0.002	94	106380	50.0	48.5	
24 Acetone	43	3.326	3.324	0.002	100	66634	100.0	126.8	
25 Iodomethane	142	3.417	3.415	0.002	98	155984	50.0	48.1	
26 Carbon disulfide	76	3.508	3.500	0.008	99	240108	50.0	49.8	
29 3-Chloro-1-propene	76	3.794	3.780	0.014	91	59651	50.0	49.6	
30 Methyl acetate	43	3.807	3.804	0.003	98	423987	250.0	231.3	
31 Methylene Chloride	84	4.007	4.005	0.002	94	142373	50.0	51.7	
32 2-Methyl-2-propanol	59	4.269	4.279	-0.010	92	57950	500.0	498.4	
33 Acrylonitrile	53	4.397	4.394	0.003	99	470363	500.0	483.6	
34 trans-1,2-Dichloroethene	96	4.433	4.425	0.008	99	122981	50.0	50.6	
35 Methyl tert-butyl ether	73	4.451	4.443	0.008	97	247620	50.0	50.2	
36 Hexane	57	4.865	4.857	0.008	91	174992	50.0	49.5	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
37 1,1-Dichloroethane	63	5.078	5.070	0.008	96	200873	50.0	49.5	
38 Vinyl acetate	43	5.127	5.124	0.003	97	183127	50.0	49.4	
42 2,2-Dichloropropane	97	5.826	5.824	0.002	57	21745	50.0	51.4	
43 cis-1,2-Dichloroethene	96	5.832	5.830	0.002	83	136292	50.0	50.1	
44 2-Butanone (MEK)	43	5.844	5.842	0.002	81	113491	100.0	113.7	
48 Chlorobromomethane	128	6.118	6.116	0.002	96	58439	50.0	47.8	
49 Tetrahydrofuran	42	6.130	6.128	0.002	86	71748	100.0	92.6	
50 Chloroform	83	6.270	6.268	0.002	94	185727	50.0	49.3	
51 1,1,1-Trichloroethane	97	6.422	6.420	0.002	97	113125	50.0	49.8	
52 Cyclohexane	56	6.495	6.487	0.008	90	209218	50.0	50.4	
53 Carbon tetrachloride	117	6.593	6.597	-0.004	96	79059	50.0	52.1	
54 1,1-Dichloropropene	75	6.611	6.609	0.002	97	154054	50.0	50.5	
55 Isobutyl alcohol	41	6.830	6.822	0.008	46	57583	1250.0	1109.8	
56 Benzene	78	6.836	6.828	0.008	97	498942	50.0	50.9	
57 1,2-Dichloroethane	62	6.909	6.907	0.002	96	147219	50.0	47.2	
59 n-Heptane	43	7.195	7.199	-0.004	89	140191	50.0	48.4	
61 Trichloroethene	130	7.566	7.570	-0.004	98	120796	50.0	50.6	
63 Methylcyclohexane	83	7.803	7.801	0.002	88	198065	50.0	49.7	
64 1,2-Dichloropropane	63	7.846	7.838	0.008	95	124798	50.0	48.1	
65 1,4-Dioxane	88	7.931	7.929	0.002	40	19199	1000.0	741.8	
67 Dibromomethane	93	7.931	7.929	0.002	97	66463	50.0	48.1	
68 Dichlorobromomethane	83	8.126	8.124	0.002	99	102041	50.0	49.0	
70 2-Chloroethyl vinyl ether	63	8.430	8.434	-0.004	92	141628	100.0	91.0	
71 cis-1,3-Dichloropropene	75	8.576	8.574	0.002	96	143802	50.0	49.8	
72 4-Methyl-2-pentanone (MIBK	43	8.728	8.732	-0.004	96	203170	100.0	103.6	
73 Toluene	91	8.904	8.902	0.002	99	512460	50.0	54.0	
74 trans-1,3-Dichloropropene	75	9.154	9.152	0.002	95	103034	50.0	47.5	
75 Ethyl methacrylate	69	9.215	9.219	-0.004	89	130080	50.0	50.2	
76 1,1,2-Trichloroethane	97	9.349	9.346	0.003	91	105923	50.0	52.2	
77 Tetrachloroethene	164	9.415	9.413	0.002	99	96841	50.0	53.1	
78 1,3-Dichloropropane	76	9.507	9.505	0.002	90	195493	50.0	51.8	
79 2-Hexanone	43	9.568	9.565	0.003	95	143267	100.0	122.0	
81 Chlorodibromomethane	129	9.720	9.717	0.003	90	63181	50.0	49.4	
82 Ethylene Dibromide	107	9.829	9.827	0.002	99	96411	50.0	52.8	
83 3-Chlorobenzotrifluoride	180	10.298	10.295	0.003	94	166142	50.0	52.8	
84 Chlorobenzene	112	10.322	10.320	0.002	95	348854	50.0	54.2	
85 4-Chlorobenzotrifluoride	180	10.383	10.387	-0.004	95	152408	50.0	51.9	
86 1,1,1,2-Tetrachloroethane	131	10.413	10.417	-0.004	85	77034	50.0	53.7	
87 Ethylbenzene	106	10.419	10.417	0.002	98	192240	50.0	55.4	
88 m-Xylene & p-Xylene	106	10.553	10.551	0.002	98	232022	50.0	55.1	
89 o-Xylene	106	10.936	10.934	0.002	95	223471	50.0	54.9	
90 Styrene	104	10.955	10.952	0.003	96	365898	50.0	54.2	
91 Bromoform	173	11.137	11.135	0.002	95	32484	50.0	50.8	
92 2-Chlorobenzotrifluoride	180	11.204	11.208	-0.004	98	162668	50.0	53.6	
93 Isopropylbenzene	105	11.301	11.299	0.002	96	543092	50.0	56.0	
95 Bromobenzene	156	11.612	11.609	0.003	96	133689	50.0	48.2	
96 1,1,2,2-Tetrachloroethane	83	11.618	11.615	0.003	94	136236	50.0	53.2	
97 trans-1,4-Dichloro-2-buten	53	11.654	11.652	0.002	72	32068	50.0	44.6	
98 1,2,3-Trichloropropane	110	11.666	11.670	-0.004	87	45744	50.0	49.1	
99 N-Propylbenzene	120	11.715	11.719	-0.004	98	162929	50.0	50.6	
100 2-Chlorotoluene	126	11.806	11.804	0.002	97	141246	50.0	50.2	
101 3-Chlorotoluene	126	11.873	11.871	0.002	94	149883	50.0	49.2	

Compound	Sig	RT (min.)	Exp RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
102 1,3,5-Trimethylbenzene	105	11.904	11.901	0.003	94	456633	50.0	51.5	
103 4-Chlorotoluene	126	11.928	11.926	0.002	97	153612	50.0	50.1	
104 tert-Butylbenzene	119	12.214	12.212	0.002	94	380857	50.0	50.7	
106 1,2,4-Trimethylbenzene	105	12.275	12.273	0.003	97	471553	50.0	51.2	
107 1,2-dichloro-4-(trifluorom	214	12.323	12.321	0.002	98	128236	50.0	49.3	
108 sec-Butylbenzene	105	12.439	12.437	0.002	94	571116	50.0	52.2	
109 1,3-Dichlorobenzene	146	12.555	12.552	0.003	98	264196	50.0	49.1	
110 4-Isopropyltoluene	119	12.597	12.595	0.002	96	478886	50.0	51.6	
111 1,4-Dichlorobenzene	146	12.658	12.656	0.002	95	275489	50.0	48.9	
113 2,4-Dichloro-1-(triflourom	214	12.688	12.686	0.002	96	120330	50.0	47.4	
114 2,5-Dichlorobenzotrifluori	214	12.731	12.735	-0.004	97	142053	50.0	48.8	
116 n-Butylbenzene	91	13.005	13.003	0.002	97	424764	50.0	50.6	
117 1,2-Dichlorobenzene	146	13.011	13.015	-0.004	97	262851	50.0	49.6	
118 1,2-Dibromo-3-Chloropropan	75	13.802	13.806	-0.004	76	12982	50.0	50.5	
119 2,4- & 2,5- & 2,6- Dichlor	125	13.948	13.945	0.003	98	636280	150.0	152.1	
121 2,3- & 3,4- Dichlorotoluen	125	14.361	14.365	-0.004	98	458647	100.0	99.5	
122 1,2,4-Trichlorobenzene	180	14.623	14.627	-0.004	94	172360	50.0	48.1	
123 Hexachlorobutadiene	225	14.769	14.773	-0.004	97	61867	50.0	50.7	
124 Naphthalene	128	14.891	14.888	0.003	97	428534	50.0	50.2	
125 1,2,3-Trichlorobenzene	180	15.110	15.113	-0.003	96	158777	50.0	50.4	
126 2,4,5-Trichlorotoluene	159	15.900	15.898	0.002	0	71819	50.0	48.5	
127 2,3,6-Trichlorotoluene	159	15.998	16.002	-0.004	92	66934	50.0	48.5	
143 2,5-Dichlorotoluene	1		0.000				ND	ND	
144 2,4-Dichlorotoluene	1		0.000				ND	ND	
147 2,6-Dichlorotoluene	1		0.000				ND	ND	
146 3,4-Dichlorotoluene	1		0.000				ND	ND	
145 2,3-Dichlorotoluene	1		0.000				ND	ND	
S 131 Xylenes, Total	106				0		100.0	110.0	
S 130 1,2-Dichloroethene, Total	96				0		100.0	100.7	
S 132 1,3-Dichloropropene, Total	1				0		100.0	97.3	

QC Flag Legend

Processing Flags

ND - Not Detected or Marked ND

Reagents:

voaWEEmixRest_00001	Amount Added:	2.00	Units: uL		
voaW2cleveRes_00002	Amount Added:	2.00	Units: uL		
voaWket2ndRes_00013	Amount Added:	2.00	Units: uL		
VOA8260VOA2ND_00209	Amount Added:	2.00	Units: uL		
voaWVA1stRest_00009	Amount Added:	2.00	Units: uL		
VOAACROPRI_00007	Amount Added:	6.00	Units: uL		
VOA8260INT_00062	Amount Added:	2.00	Units: uL	Run Reagent	
VOA8260SURR_00060	Amount Added:	2.00	Units: uL	Run Reagent	

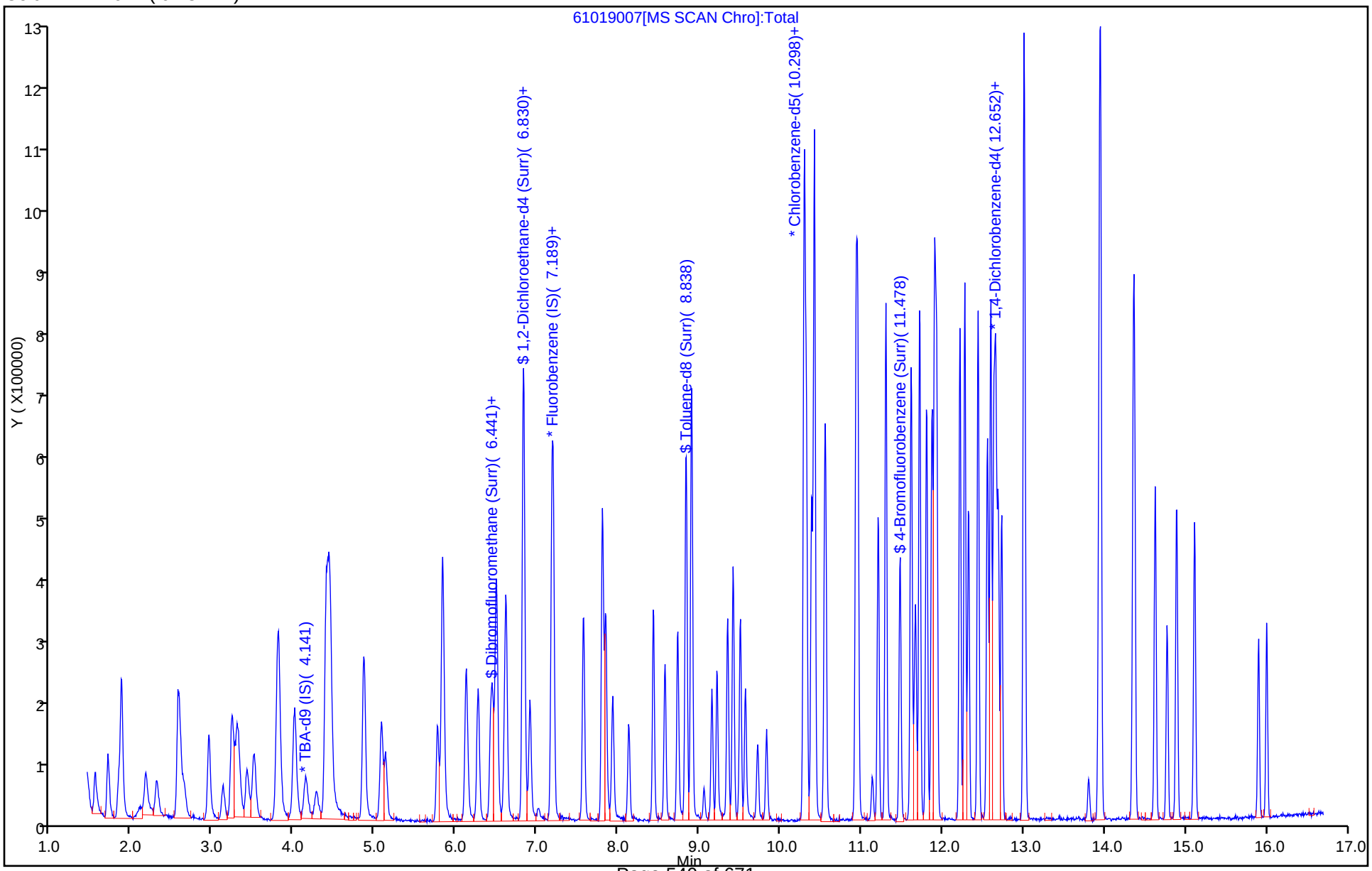
Report Date: 19-Oct-2016 13:38:54 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019007.D

Injection Date:	19-Oct-2016 13:15:30	Instrument ID:	CHHP6	Operator ID:	001562
Lims ID:	LCS			Worklist Smp#:	7
Client ID:					
Purge Vol:	5.000 mL	Dil. Factor:	1.0000	ALS Bottle#:	7
Method:	MSVOA_LL_CHHP6	Limit Group:	VOA 8260C ICAL		

Column: DB-624 (0.18 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\61019007.D
Lims ID: LCS
Client ID:
Sample Type: LCS
Inject. Date: 19-Oct-2016 13:15:30 ALS Bottle#: 7 Worklist Smp#: 7
Purge Vol: 5.000 mL Dil. Factor: 1.0000
Sample Info: 180-0013943-007
Misc. Info.: LCS
Operator ID: 001562 Instrument ID: CHHP6

Method: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161019-13943.b\MSVOA_LL_CHHP6.m
Limit Group: VOA 8260C ICAL
Last Update: 19-Oct-2016 13:38:53 Calib Date: 17-Oct-2016 17:13:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CHHP6\20161018-13923.b\61017013.D

Column 1 : DB-624 (0.18 mm) Det: MS SCAN
Process Host: XAWRK017

First Level Reviewer: fergusond Date: 19-Oct-2016 13:38:53

Compound	Amount Added	Amount Recovered	% Rec.
$ 5 Dibromofluoromethane (Surr)	50.0	49.7	99.43
$ 6 1,2-Dichloroethane-d4 (Surr)	50.0	45.6	91.22
$ 7 Toluene-d8 (Surr)	50.0	52.5	104.92
$ 8 4-Bromofluorobenzene (Surr)	50.0	51.5	102.92

GC/MS VOA ANALYSIS RUN LOG

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP5 Start Date: 09/28/2016 12:00

Analysis Batch Number: 189445 End Date: 09/28/2016 18:27

LAB SAMPLE ID	CLIENT SAMPLE ID	DATE ANALYZED	DILUTION FACTOR	LAB FILE ID	COLUMN ID
BFB 180-189445/2		09/28/2016 12:00	1	50928002.D	DB-624 0.18(mm)
IC 180-189445/5		09/28/2016 14:27	1	50928005.D	DB-624 0.18(mm)
ICIS 180-189445/6		09/28/2016 14:51	1	50928006.D	DB-624 0.18(mm)
IC 180-189445/7		09/28/2016 15:15	1	50928007.D	DB-624 0.18(mm)
IC 180-189445/8		09/28/2016 15:39	1	50928008.D	DB-624 0.18(mm)
IC 180-189445/9		09/28/2016 16:03	1	50928009.D	DB-624 0.18(mm)
IC 180-189445/10		09/28/2016 16:27	1	50928010.D	DB-624 0.18(mm)
IC 180-189445/11		09/28/2016 16:51	1	50928011.D	DB-624 0.18(mm)
IC 180-189445/15		09/28/2016 18:27	1	50928015.D	DB-624 0.18(mm)

GC/MS VOA ANALYSIS RUN LOG

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP5 Start Date: 10/15/2016 13:06

Analysis Batch Number: 191289 End Date: 10/16/2016 00:57

LAB SAMPLE ID	CLIENT SAMPLE ID	DATE ANALYZED	DILUTION FACTOR	LAB FILE ID	COLUMN ID
BFB 180-191289/5		10/15/2016 13:06	1	51015005.D	DB-624 0.18(mm)
CCVIS 180-191289/2		10/15/2016 13:43	1	51015002.D	DB-624 0.18(mm)
ZZZZZ		10/15/2016 14:22	1		DB-624 0.18(mm)
MB 180-191289/6		10/15/2016 14:46	1	51015006.D	DB-624 0.18(mm)
ZZZZZ		10/15/2016 15:22	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 15:45	1		DB-624 0.18(mm)
LCS 180-191289/9		10/15/2016 16:10	1	51015009.D	DB-624 0.18(mm)
ZZZZZ		10/15/2016 16:33	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 16:57	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 18:33	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 18:57	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 19:21	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 19:45	50		DB-624 0.18(mm)
ZZZZZ		10/15/2016 20:09	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 20:33	10		DB-624 0.18(mm)
ZZZZZ		10/15/2016 21:45	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 22:09	1		DB-624 0.18(mm)
ZZZZZ		10/15/2016 22:33	1		DB-624 0.18(mm)
180-59749-1		10/15/2016 22:57	1	51015026.D	DB-624 0.18(mm)
180-59749-2		10/15/2016 23:21	1	51015027.D	DB-624 0.18(mm)
180-59749-3		10/15/2016 23:45	10	51015028.D	DB-624 0.18(mm)
180-59749-4		10/16/2016 00:33	10	51015030.D	DB-624 0.18(mm)
180-59749-5		10/16/2016 00:57	10	51015031.D	DB-624 0.18(mm)

GC/MS VOA ANALYSIS RUN LOG

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP6 Start Date: 10/17/2016 11:29

Analysis Batch Number: 191498 End Date: 10/17/2016 17:13

LAB SAMPLE ID	CLIENT SAMPLE ID	DATE ANALYZED	DILUTION FACTOR	LAB FILE ID	COLUMN ID
BFB 180-191498/1		10/17/2016 11:29	1	61017001.D	DB-624 0.18(mm)
IC 180-191498/6		10/17/2016 14:23	1	61017006.D	DB-624 0.18(mm)
IC 180-191498/7		10/17/2016 14:48	1	61017007.D	DB-624 0.18(mm)
ICIS 180-191498/8		10/17/2016 15:12	1	61017008.D	DB-624 0.18(mm)
IC 180-191498/9		10/17/2016 15:36	1	61017009.D	DB-624 0.18(mm)
IC 180-191498/10		10/17/2016 16:01	1	61017010.D	DB-624 0.18(mm)
IC 180-191498/12		10/17/2016 16:49	1	61017012.D	DB-624 0.18(mm)
IC 180-191498/13		10/17/2016 17:13	1	61017013.D	DB-624 0.18(mm)

GC/MS VOA ANALYSIS RUN LOG

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP5 Start Date: 10/18/2016 11:36

Analysis Batch Number: 191520 End Date: 10/18/2016 21:30

LAB SAMPLE ID	CLIENT SAMPLE ID	DATE ANALYZED	DILUTION FACTOR	LAB FILE ID	COLUMN ID
BFB 180-191520/1		10/18/2016 11:36	1	51018001.D	DB-624 0.18(mm)
CCVIS 180-191520/2		10/18/2016 12:14	1	51018002.D	DB-624 0.18(mm)
ZZZZZ		10/18/2016 12:14	1		DB-624 0.18(mm)
ZZZZZ		10/18/2016 12:53	1		DB-624 0.18(mm)
MB 180-191520/4		10/18/2016 13:17	1	51018004.D	DB-624 0.18(mm)
LCS 180-191520/9		10/18/2016 15:44	1	51018009.D	DB-624 0.18(mm)
ZZZZZ		10/18/2016 16:40	5		DB-624 0.18(mm)
ZZZZZ		10/18/2016 17:04	1		DB-624 0.18(mm)
ZZZZZ		10/18/2016 17:52	1		DB-624 0.18(mm)
180-59749-3 DL		10/18/2016 18:40	250	51018016.D	DB-624 0.18(mm)
180-59749-6		10/18/2016 19:05	1	51018017.D	DB-624 0.18(mm)
ZZZZZ		10/18/2016 20:41	1		DB-624 0.18(mm)
ZZZZZ		10/18/2016 21:06	1		DB-624 0.18(mm)
ZZZZZ		10/18/2016 21:30	1		DB-624 0.18(mm)

GC/MS VOA ANALYSIS RUN LOG

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CHHP6 Start Date: 10/19/2016 10:04

Analysis Batch Number: 191652 End Date: 10/19/2016 21:46

LAB SAMPLE ID	CLIENT SAMPLE ID	DATE ANALYZED	DILUTION FACTOR	LAB FILE ID	COLUMN ID
BFB 180-191652/1		10/19/2016 10:04	1	61019001.D	DB-624 0.18(mm)
CCVIS 180-191652/2		10/19/2016 10:44	1	61019002.D	DB-624 0.18(mm)
ZZZZZ		10/19/2016 10:44	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 11:21	1		DB-624 0.18(mm)
MB 180-191652/4		10/19/2016 11:51	1	61019004.D	DB-624 0.18(mm)
ZZZZZ		10/19/2016 12:26	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 12:51	1		DB-624 0.18(mm)
LCS 180-191652/7		10/19/2016 13:15	1	61019007.D	DB-624 0.18(mm)
ZZZZZ		10/19/2016 13:39	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 14:04	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 14:53	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 15:17	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 15:42	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 16:06	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 16:30	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 16:54	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 17:19	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 18:07	400		DB-624 0.18(mm)
ZZZZZ		10/19/2016 18:32	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 18:56	400		DB-624 0.18(mm)
ZZZZZ		10/19/2016 19:20	500		DB-624 0.18(mm)
ZZZZZ		10/19/2016 20:08	1		DB-624 0.18(mm)
ZZZZZ		10/19/2016 20:33	2		DB-624 0.18(mm)
ZZZZZ		10/19/2016 20:57	2		DB-624 0.18(mm)
180-59749-6 DL		10/19/2016 21:22	2	61019027.D	DB-624 0.18(mm)
180-59749-7		10/19/2016 21:46	3	61019028.D	DB-624 0.18(mm)

Method 8270D Low Level

Semivolatile Organic Compounds (GC/MS) Low Level by Method 8270D

FORM II
GC/MS SEMI VOA SURROGATE RECOVERY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Matrix: Water Level: Low

GC Column (1): Rxi-5SilMS ID: 0.32(mm)

Client Sample ID	Lab Sample ID	2FP #	PHL #	NBZ #	FBP #	TBP #	TPHL #
HD-MW-127-0/1-0	180-59749-4	44	50	46	46	58	47
HD-MW-87-0/1-0	180-59749-5	43	45	50	43	62	35
	MB 180-191579/1-A	61	60	59	56	63	56
	LCS 180-191579/2-A	67	64	62	56	64	59
	LCSD 180-191579/3-A	67	64	62	58	65	60

	QC LIMITS
2FP = 2-Fluorophenol (Surr)	20-100
PHL = Phenol-d5 (Surr)	21-100
NBZ = Nitrobenzene-d5 (Surr)	25-105
FBP = 2-Fluorobiphenyl	24-100
TBP = 2,4,6-Tribromophenol (Surr)	22-118
TPHL = Terphenyl-d14 (Surr)	20-124

Column to be used to flag recovery values

FORM II 8270D LL

FORM III
GC/MS SEMI VOA LAB CONTROL SAMPLE RECOVERY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Matrix: Water Level: Low Lab File ID: D10210005.D

Lab ID: LCS 180-191579/2-A Client ID:

COMPOUND	SPIKE ADDED (ug/L)	LCS CONCENTRATION (ug/L)	LCS % REC	QC LIMITS REC	#
1,4-Dioxane	20.0	13.1	65	25-106	

Column to be used to flag recovery and RPD values

FORM III 8270D LL

FORM III
GC/MS SEMI VOA LAB CONTROL SAMPLE DUPLICATE RECOVERY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Matrix: Water Level: Low Lab File ID: D10210006.D

Lab ID: LCSD 180-191579/3-A Client ID:

COMPOUND	SPIKE ADDED (ug/L)	LCSD CONCENTRATION (ug/L)	LCSD % REC	% RPD	QC LIMITS RPD	QC LIMITS REC	#
1,4-Dioxane	20.0	13.0	65	1	16	25-106	

Column to be used to flag recovery and RPD values

FORM III 8270D LL

FORM IV
GC/MS SEMI VOA METHOD BLANK SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: D10210004.D Lab Sample ID: MB 180-191579/1-A

Matrix: Water Date Extracted: 10/18/2016 16:04

Instrument ID: CH732 Date Analyzed: 10/21/2016 12:17

Level:(Low/Med) Low

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
	LCS 180-191579/2-A	D10210005.D	10/21/2016 12:44
	LCSD 180-191579/3-A	D10210006.D	10/21/2016 13:11
HD-MW-127-0/1-0	180-59749-4	D10210021.D	10/21/2016 19:28
HD-MW-87-0/1-0	180-59749-5	D10210022.D	10/21/2016 19:51

FORM V
GC/MS SEMI VOA INSTRUMENT PERFORMANCE CHECK
DECAFLUOROTRIPHENYLPHOSPHINE (DFTPP)

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: D09280002.D DFTPP Injection Date: 09/28/2016

Instrument ID: CH732 DFTPP Injection Time: 05:12

Analysis Batch No.: 189377

M/E	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE	
51	30.0 - 60.0 % of mass 198	36.2	
68	Less than 2.0 % of mass 69	0.4	(1.2) 1
69	Mass 69 relative abundance	35.5	
70	Less than 2.0 % of mass 69	0.3	(0.7) 1
127	40.0 - 60.0 % of mass 198	45.2	
197	Less than 1.0 % of mass 198	0.0	
198	Base Peak, 100 % relative abundance	100.0	
199	5.0- 9.0 % of mass 198	6.8	
275	10.0 - 30.0 % of mass 198	20.2	
365	Greater than 1.0 % of mass 198	1.8	
441	Present but less than mass 443	6.6	(75.3) 3
442	Greater than 40.0 % of mass 198	44.5	
443	17.0 - 23.0 % of mass 442	8.8	(19.8) 2

1-Value is % mass 69 2-Value is % mass 442 3-Value is % mass 443

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS AND STANDARDS:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
	IC 180-189377/3	D09280003.D	09/28/2016	05:28
	IC 180-189377/4	D09280004.D	09/28/2016	05:55
	IC 180-189377/5	D09280005.D	09/28/2016	06:22
	ICIS 180-189377/6	D09280006.D	09/28/2016	06:49
	IC 180-189377/7	D09280007.D	09/28/2016	07:17
	IC 180-189377/8	D09280008.D	09/28/2016	07:44
	IC 180-189377/9	D09280009.D	09/28/2016	08:11
	IC 180-189377/10	D09280010.D	09/28/2016	08:39

FORM V
GC/MS SEMI VOA INSTRUMENT PERFORMANCE CHECK
DECAFLUOROTRIPHENYLPHOSPHINE (DFTPP)

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab File ID: D10210002.D DFTPP Injection Date: 10/21/2016

Instrument ID: CH732 DFTPP Injection Time: 11:34

Analysis Batch No.: 191892

M/E	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE	
51	30.0 - 60.0 % of mass 198	37.1	
68	Less than 2.0 % of mass 69	0.2	(0.6) 1
69	Mass 69 relative abundance	36.2	
70	Less than 2.0 % of mass 69	0.2	(0.5) 1
127	40.0 - 60.0 % of mass 198	45.9	
197	Less than 1.0 % of mass 198	0.0	
198	Base Peak, 100 % relative abundance	100.0	
199	5.0- 9.0 % of mass 198	6.9	
275	10.0 - 30.0 % of mass 198	21.0	
365	Greater than 1.0 % of mass 198	1.6	
441	Present but less than mass 443	7.3	(76.9) 3
442	Greater than 40.0 % of mass 198	48.1	
443	17.0 - 23.0 % of mass 442	9.5	(19.7) 2

1-Value is % mass 69 2-Value is % mass 442 3-Value is % mass 443

THIS CHECK APPLIES TO THE FOLLOWING SAMPLES, MS, MSD, BLANKS AND STANDARDS:

CLIENT SAMPLE ID	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
	CCVIS 180-191892/3	D10210003.D	10/21/2016	11:50
	MB 180-191579/1-A	D10210004.D	10/21/2016	12:17
	LCS 180-191579/2-A	D10210005.D	10/21/2016	12:44
	LCSD 180-191579/3-A	D10210006.D	10/21/2016	13:11
HD-MW-127-0/1-0	180-59749-4	D10210021.D	10/21/2016	19:28
HD-MW-87-0/1-0	180-59749-5	D10210022.D	10/21/2016	19:51

FORM VIII
GC/MS SEMI VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191892/3 Date Analyzed: 10/21/2016 11:50

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm)

Lab File ID (Standard): D10210003.D Heated Purge: (Y/N) N

Calibration ID: 32988

		DCBd4		NPT		ANT	
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		109561	6.20	480957	7.49	326108	9.19
UPPER LIMIT		219122	6.70	961914	7.99	652216	9.69
LOWER LIMIT		54781	5.70	240479	6.99	163054	8.69
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191579/1-A		115387	6.20	523491	7.48	358140	9.19
LCS 180-191579/2-A		117154	6.20	530083	7.48	366177	9.19
LCSD 180-191579/3-A		108165	6.19	482387	7.48	327155	9.19
180-59749-4	HD-MW-127-0/1-0	117589	6.20	530868	7.49	360107	9.19
180-59749-5	HD-MW-87-0/1-0	117356	6.20	515303	7.49	351195	9.19

DCBd4 = 1,4-Dichlorobenzene-d4
NPT = Naphthalene-d8
ANT = Acenaphthene-d10

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8270D LL

FORM VIII
GC/MS SEMI VOA INTERNAL STANDARD AREA AND RETENTION TIME SUMMARY

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Sample No.: CCVIS 180-191892/3 Date Analyzed: 10/21/2016 11:50

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm)

Lab File ID (Standard): D10210003.D Heated Purge: (Y/N) N

Calibration ID: 32988

		PHN		CRY		PRY	
		AREA #	RT #	AREA #	RT #	AREA #	RT #
12/24 HOUR STD		631553	10.63	608013	14.40	523077	17.28
UPPER LIMIT		1263106	11.13	1216026	14.90	1046154	17.78
LOWER LIMIT		315777	10.13	304007	13.90	261539	16.78
LAB SAMPLE ID	CLIENT SAMPLE ID						
MB 180-191579/1-A		694379	10.63	666075	14.39	549456	17.28
LCS 180-191579/2-A		690469	10.63	622483	14.40	545737	17.29
LCSD 180-191579/3-A		624724	10.63	580845	14.39	522524	17.28
180-59749-4	HD-MW-127-0/1-0	679523	10.63	673744	14.41	562233	17.30
180-59749-5	HD-MW-87-0/1-0	662649	10.63	641942	14.41	529942	17.30

PHN = Phenanthrene-d10
CRY = Chrysene-d12
PRY = Perylene-d12

Area Limit = 50%-200% of internal standard area
RT Limit = ± 0.5 minutes of internal standard RT

Column used to flag values outside QC limits

FORM VIII 8270D LL

FORM I
GC/MS SEMI VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-127-0/1-0 | Lab Sample ID: 180-59749-4

Matrix: Water | Lab File ID: D10210021.D

Analysis Method: 8270D LL | Date Collected: 10/12/2016 09:55

Extract. Method: 3520C | Date Extracted: 10/18/2016 16:04

Sample wt/vol: 270(mL) | Date Analyzed: 10/21/2016 19:28

Con. Extract Vol.: 0.25(mL) | Dilution Factor: 1

Injection Volume: 2(uL) | Level: (low/med) Low

% Moisture: | GPC Cleanup:(Y/N) N

Analysis Batch No.: 191892 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
123-91-1	1,4-Dioxane	3.1		1.9	0.049

CAS NO.	SURROGATE	%REC	Q	LIMITS
321-60-8	2-Fluorobiphenyl	46		24-100
367-12-4	2-Fluorophenol (Surr)	44		20-100
118-79-6	2,4,6-Tribromophenol (Surr)	58		22-118
4165-60-0	Nitrobenzene-d5 (Surr)	46		25-105
4165-62-2	Phenol-d5 (Surr)	50		21-100
1718-51-0	Terphenyl-d14 (Surr)	47		20-124

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210021.D
Lims ID: 180-59749-D-4-A
Client ID: HD-MW-127-0/1-0
Sample Type: Client
Inject. Date: 21-Oct-2016 19:28:30 ALS Bottle#: 20 Worklist Smp#: 21
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-021
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 22-Oct-2016 05:51:59

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.204	6.204	0.000	96	117589	8.00	
* 2 Naphthalene-d8	136	7.486	7.486	0.000	99	530868	8.00	
* 3 Acenaphthene-d10	164	9.190	9.190	0.000	92	360107	8.00	
* 4 Phenanthrene-d10	188	10.632	10.632	0.000	97	679523	8.00	
* 5 Chrysene-d12	240	14.409	14.399	0.010	97	673744	8.00	
* 6 Perylene-d12	264	17.299	17.283	0.016	96	562233	8.00	
$ 7 2-Fluorophenol	112	4.756	4.761	-0.005	93	129399	8.86	
$ 8 Phenol-d5	99	5.819	5.819	0.000	98	222337	10.0	
$ 9 Nitrobenzene-d5	82	6.759	6.759	0.000	89	198218	9.29	
$ 10 2-Fluorobiphenyl	172	8.522	8.522	0.000	99	517134	9.27	
$ 11 2,4,6-Tribromophenol	330	9.943	9.943	0.000	89	65274	11.5	
$ 12 Terphenyl-d14	244	12.566	12.555	0.011	99	652218	9.43	
13 1,4-Dioxane	88	1.609	1.625	-0.016	94	29279	6.75	

Reagents:

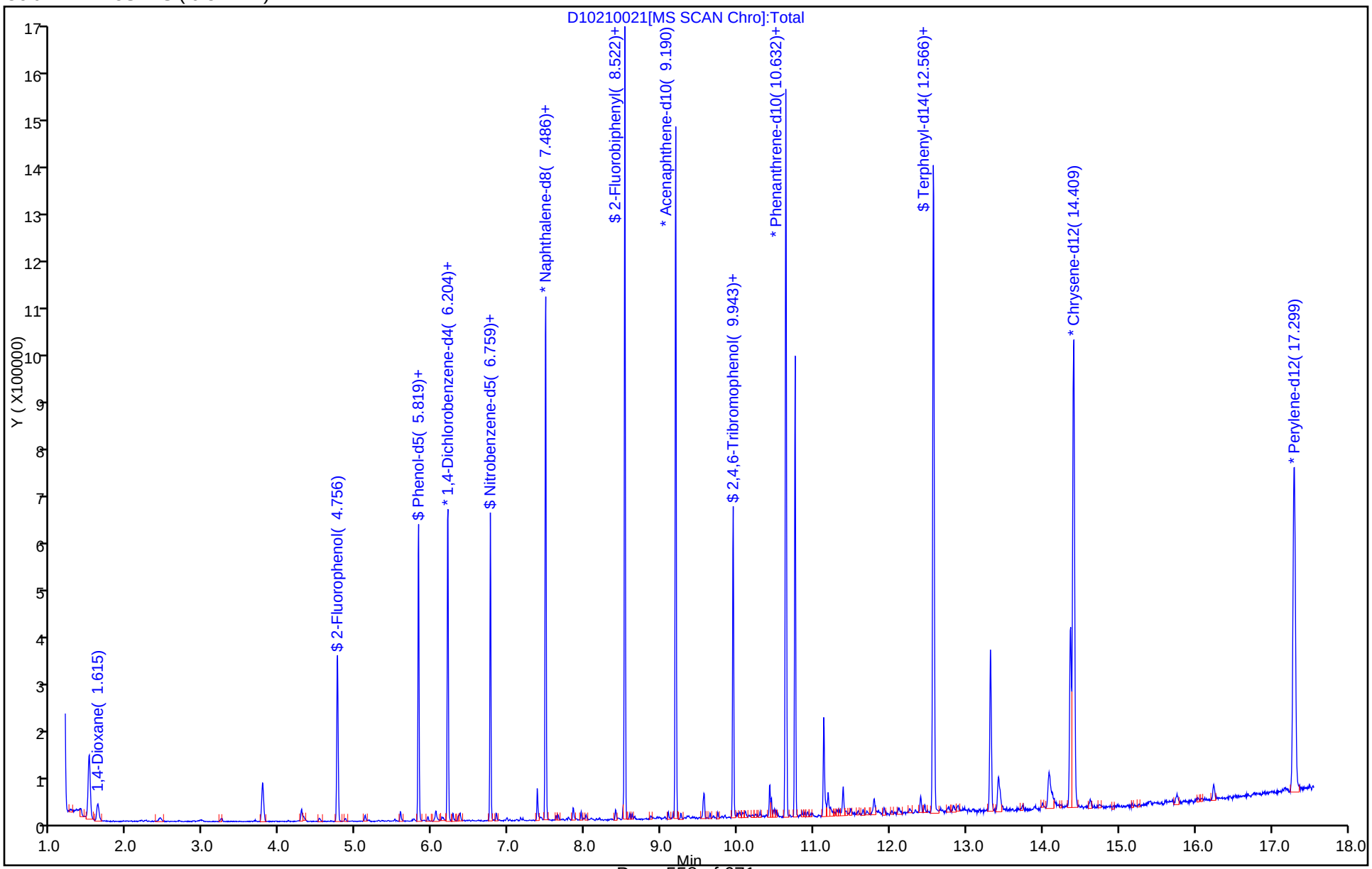
SVTAPITINTRNi_00012 Amount Added: 1.00 Units: uL Run Reagent

Report Date: 22-Oct-2016 06:00:16 Chrom Revision: 2.2 17-Oct-2016 09:27:18

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210021.D				
Injection Date:	21-Oct-2016 19:28:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	180-59749-D-4-A	Lab Sample ID:	180-59749-4	Worklist Smp#:	21
Client ID:	HD-MW-127-0/1-0				
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	20
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210021.D
Lims ID: 180-59749-D-4-A
Client ID: HD-MW-127-0/1-0
Sample Type: Client
Inject. Date: 21-Oct-2016 19:28:30 ALS Bottle#: 20 Worklist Smp#: 21
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-021
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 22-Oct-2016 05:51:59

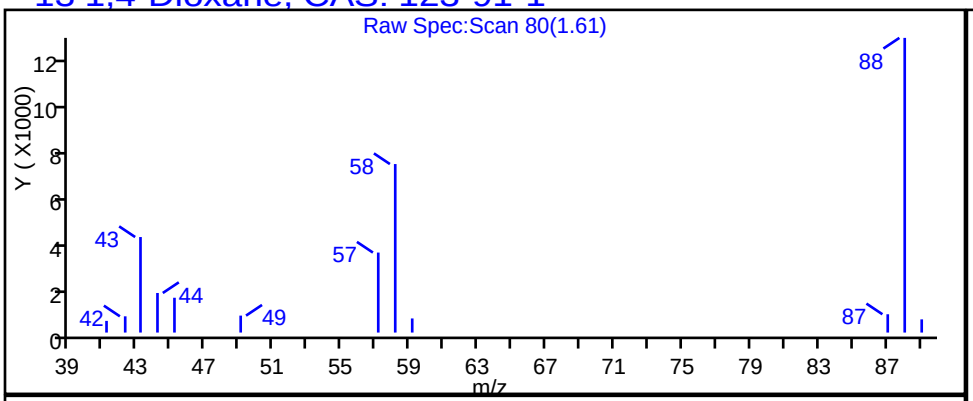
Compound	Amount Added	Amount Recovered	% Rec.
$ 7 2-Fluorophenol	40.0	8.86	22.14
$ 8 Phenol-d5	40.0	10.0	25.09
$ 9 Nitrobenzene-d5	40.0	9.29	23.22
$ 10 2-Fluorobiphenyl	40.0	9.27	23.16
$ 11 2,4,6-Tribromophenol	40.0	11.5	28.82
$ 12 Terphenyl-d14	40.0	9.43	23.57

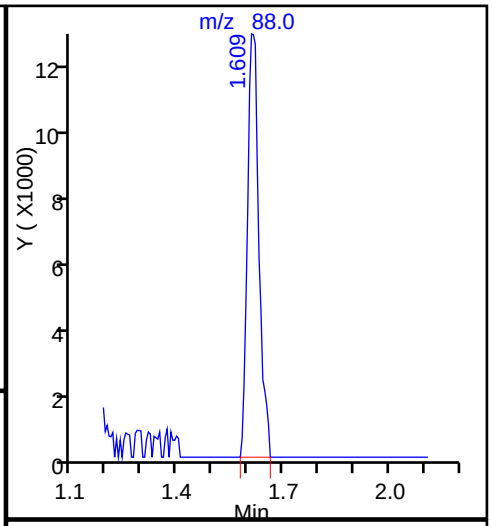
Report Date: 22-Oct-2016 06:00:16 Chrom Revision: 2.2 17-Oct-2016 09:27:18

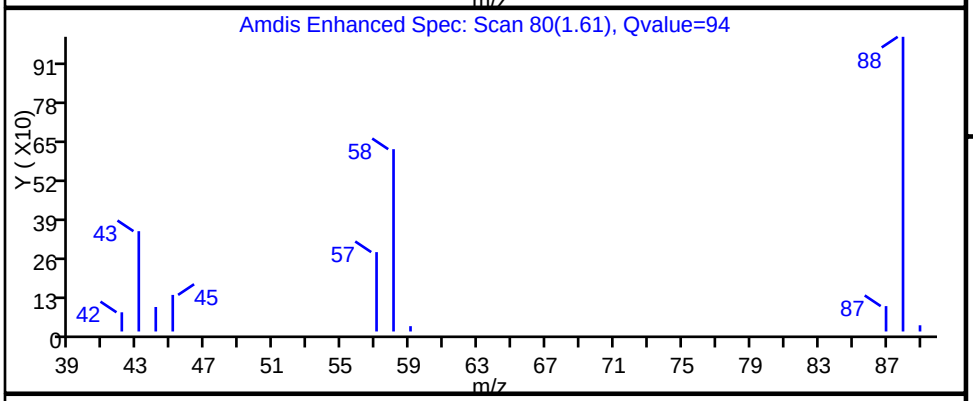
TestAmerica Pittsburgh

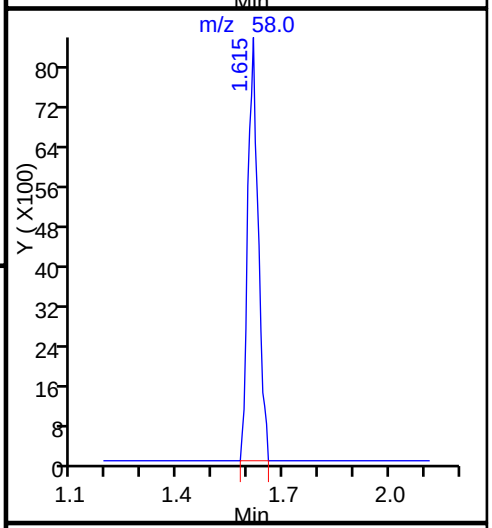
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210021.D				
Injection Date:	21-Oct-2016 19:28:30	Instrument ID:	CH732		
Lims ID:	180-59749-D-4-A	Lab Sample ID:	180-59749-4		
Client ID:	HD-MW-127-0/1-0				
Operator ID:	003200	ALS Bottle#:	20	Worklist Smp#:	21
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

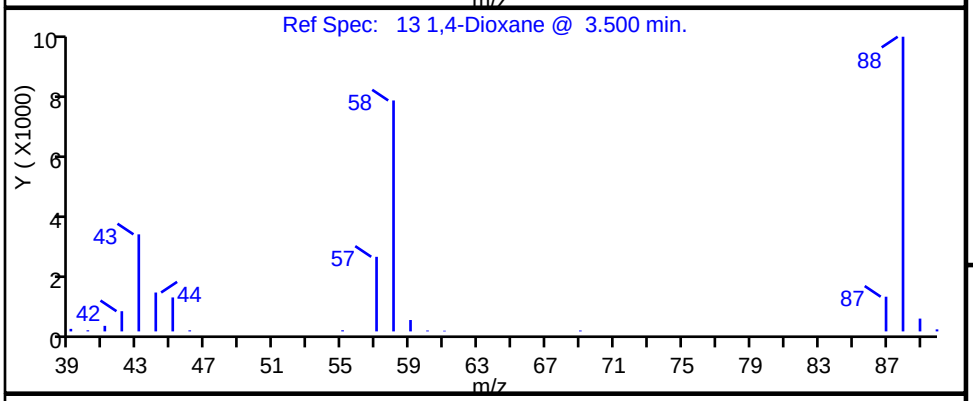
13 1,4-Dioxane, CAS: 123-91-1

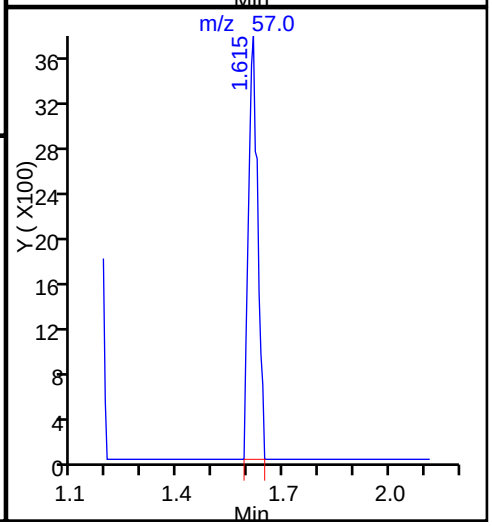


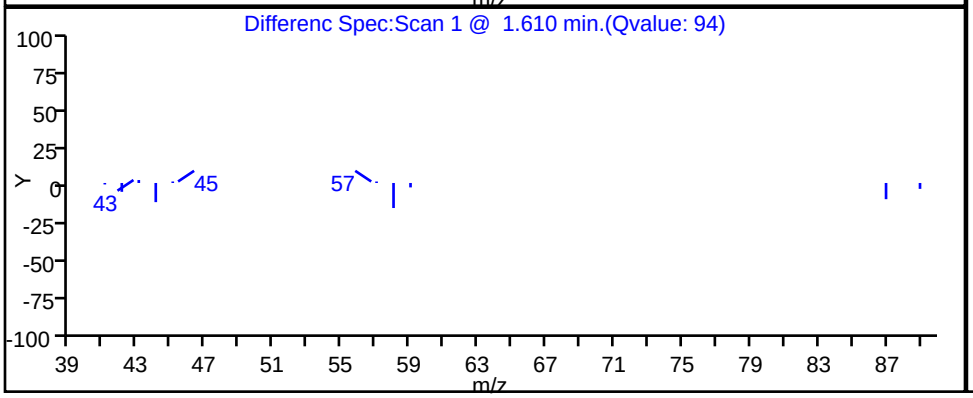












FORM I
GC/MS SEMI VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: HD-MW-87-0/1-0 | Lab Sample ID: 180-59749-5

Matrix: Water | Lab File ID: D10210022.D

Analysis Method: 8270D LL | Date Collected: 10/12/2016 11:50

Extract. Method: 3520C | Date Extracted: 10/18/2016 16:04

Sample wt/vol: 270(mL) | Date Analyzed: 10/21/2016 19:51

Con. Extract Vol.: 0.25(mL) | Dilution Factor: 1

Injection Volume: 2(uL) | Level: (low/med) Low

% Moisture: | GPC Cleanup:(Y/N) N

Analysis Batch No.: 191892 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
123-91-1	1,4-Dioxane	6.9		1.9	0.049

CAS NO.	SURROGATE	%REC	Q	LIMITS
321-60-8	2-Fluorobiphenyl	43		24-100
367-12-4	2-Fluorophenol (Surr)	43		20-100
118-79-6	2,4,6-Tribromophenol (Surr)	62		22-118
4165-60-0	Nitrobenzene-d5 (Surr)	50		25-105
4165-62-2	Phenol-d5 (Surr)	45		21-100
1718-51-0	Terphenyl-d14 (Surr)	35		20-124

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210022.D
Lims ID: 180-59749-D-5-A
Client ID: HD-MW-87-0/1-0
Sample Type: Client
Inject. Date: 21-Oct-2016 19:51:30 ALS Bottle#: 21 Worklist Smp#: 22
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-022
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 22-Oct-2016 05:52:05

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.204	6.204	0.000	96	117356	8.00	
* 2 Naphthalene-d8	136	7.486	7.486	0.000	99	515303	8.00	
* 3 Acenaphthene-d10	164	9.190	9.190	0.000	92	351195	8.00	
* 4 Phenanthrene-d10	188	10.632	10.632	0.000	97	662649	8.00	
* 5 Chrysene-d12	240	14.409	14.399	0.010	97	641942	8.00	
* 6 Perylene-d12	264	17.299	17.283	0.016	96	529942	8.00	
$ 7 2-Fluorophenol	112	4.756	4.761	-0.005	93	248594	17.0	
$ 8 Phenol-d5	99	5.819	5.819	0.000	98	396554	17.9	
$ 9 Nitrobenzene-d5	82	6.759	6.759	0.000	88	413656	20.0	
$ 10 2-Fluorobiphenyl	172	8.522	8.522	0.000	100	928044	17.0	
$ 11 2,4,6-Tribromophenol	330	9.943	9.943	0.000	90	136423	24.7	
$ 12 Terphenyl-d14	244	12.566	12.555	0.011	99	934605	14.2	
13 1,4-Dioxane	88	1.609	1.625	-0.016	91	64892	15.0	

Reagents:

SVTAPITINTRNi_00012 Amount Added: 1.00 Units: uL Run Reagent

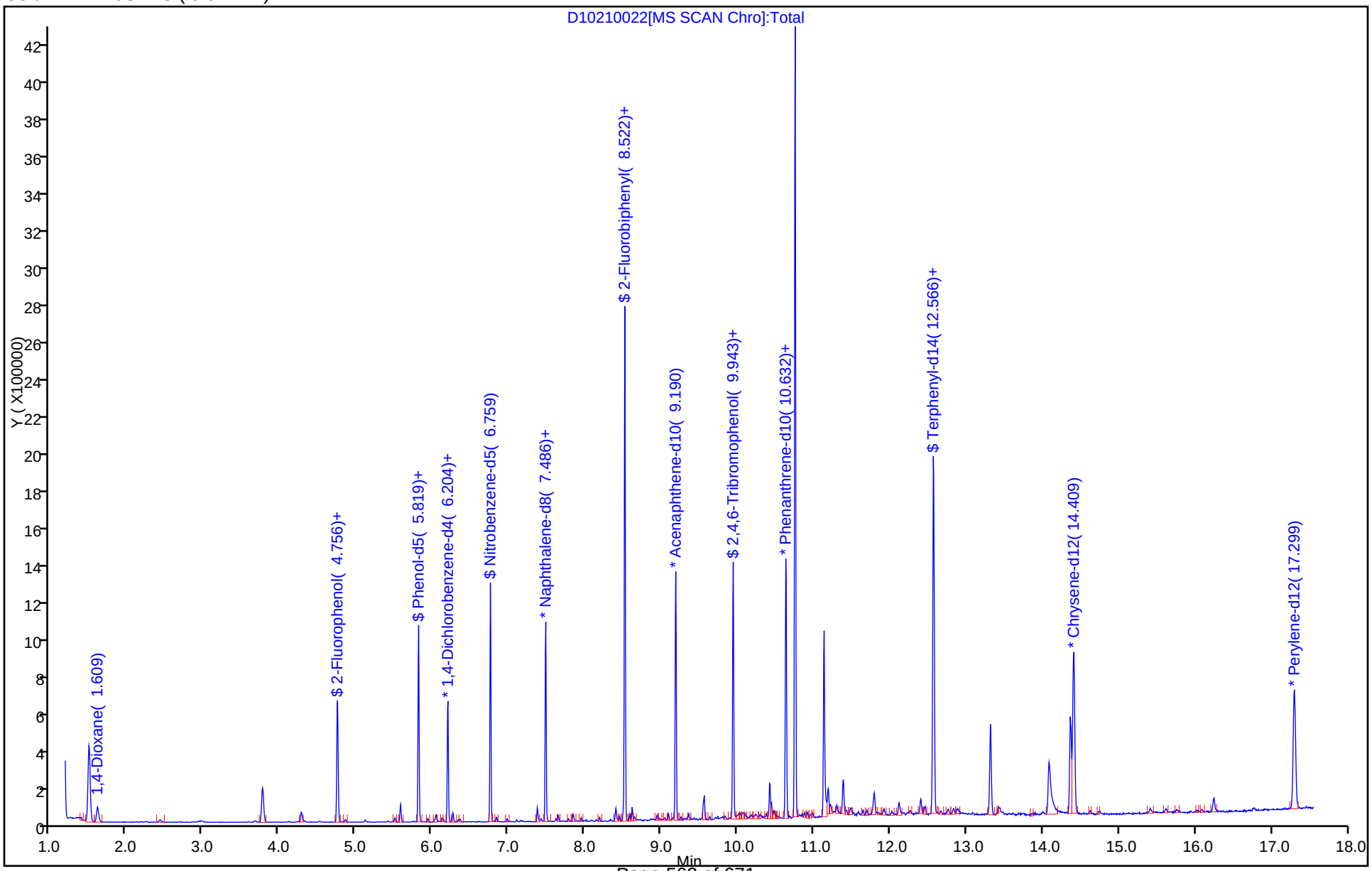
Report Date: 22-Oct-2016 06:00:19 Chrom Revision: 2.2 17-Oct-2016 09:27:18

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210022.D

Injection Date:	21-Oct-2016 19:51:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	180-59749-D-5-A	Lab Sample ID:	180-59749-5	Worklist Smp#:	22
Client ID:	HD-MW-87-0/1-0				
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	21
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210022.D
Lims ID: 180-59749-D-5-A
Client ID: HD-MW-87-0/1-0
Sample Type: Client
Inject. Date: 21-Oct-2016 19:51:30 ALS Bottle#: 21 Worklist Smp#: 22
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-022
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 22-Oct-2016 05:52:05

Compound	Amount Added	Amount Recovered	% Rec.
$ 7 2-Fluorophenol	40.0	17.0	42.62
$ 8 Phenol-d5	40.0	17.9	44.83
$ 9 Nitrobenzene-d5	40.0	20.0	49.92
$ 10 2-Fluorobiphenyl	40.0	17.0	42.62
$ 11 2,4,6-Tribromophenol	40.0	24.7	61.77
$ 12 Terphenyl-d14	40.0	14.2	35.44

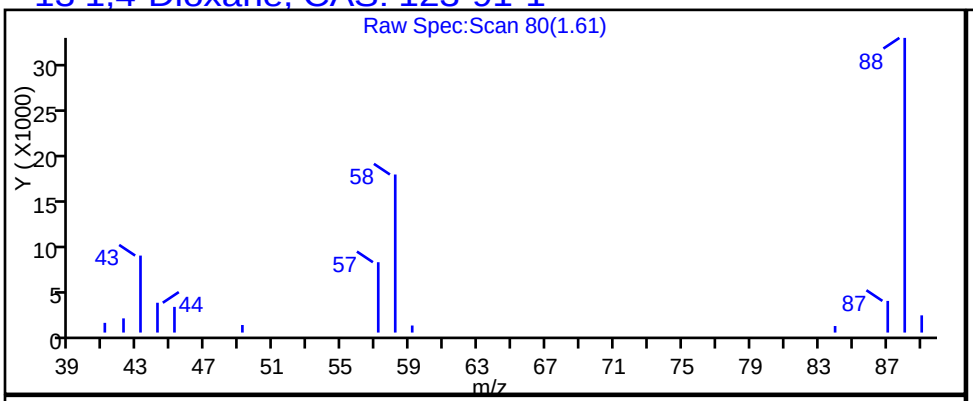
Report Date: 22-Oct-2016 06:00:19 Chrom Revision: 2.2 17-Oct-2016 09:27:18

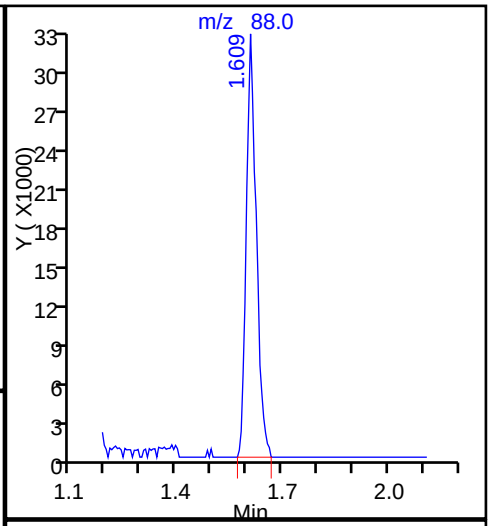
TestAmerica Pittsburgh

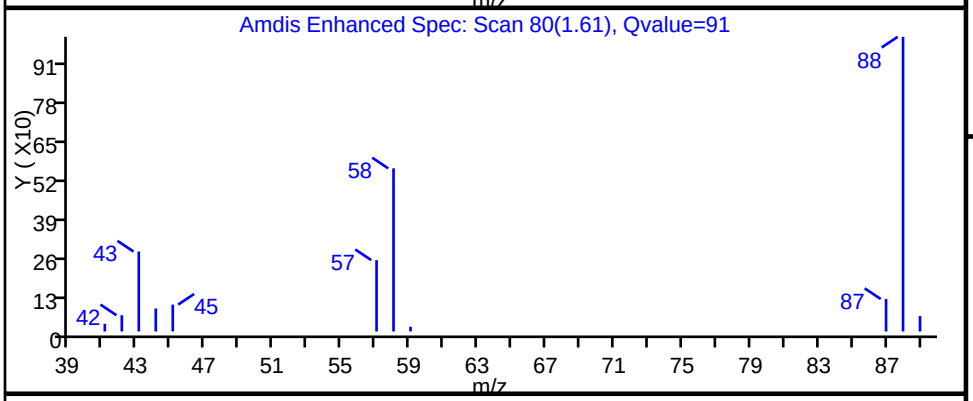
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210022.D

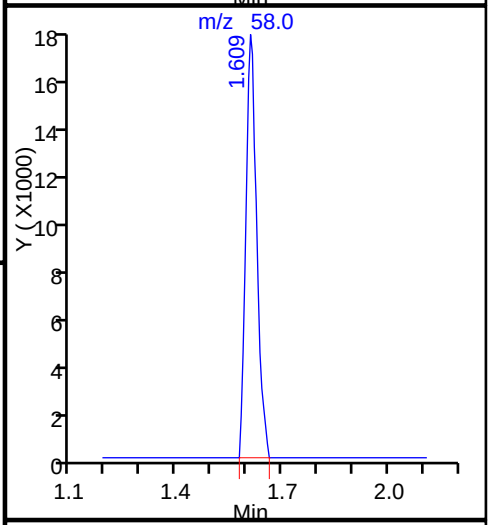
Injection Date:	21-Oct-2016 19:51:30	Instrument ID:	CH732		
Lims ID:	180-59749-D-5-A	Lab Sample ID:	180-59749-5		
Client ID:	HD-MW-87-0/1-0				
Operator ID:	003200	ALS Bottle#:	21	Worklist Smp#:	22
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

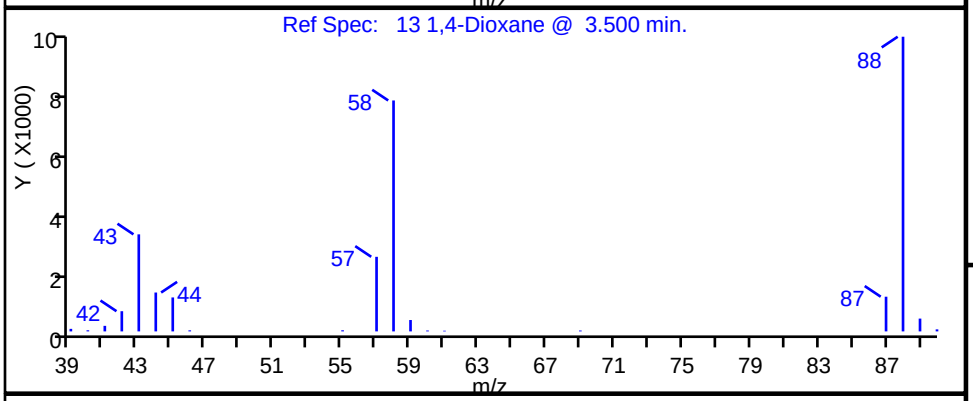
13 1,4-Dioxane, CAS: 123-91-1

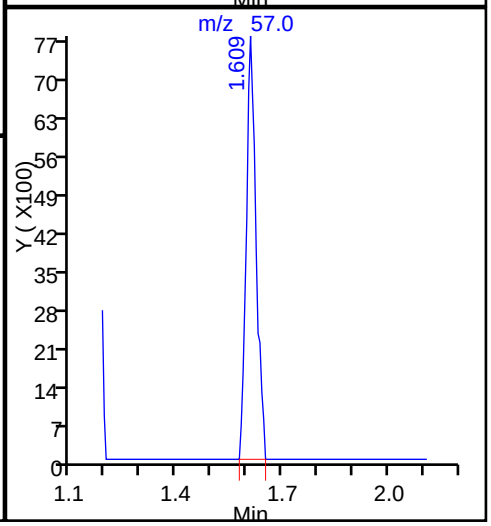


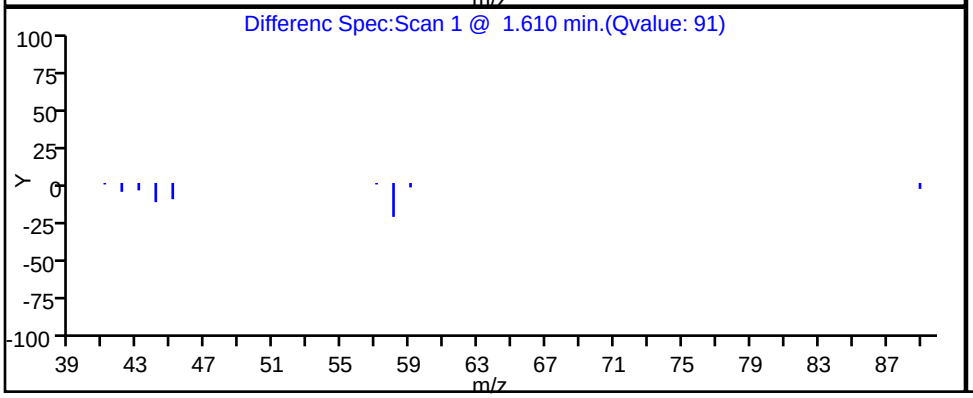












FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-189377/3	D09280003.D
Level 2	IC 180-189377/4	D09280004.D
Level 3	IC 180-189377/5	D09280005.D
Level 4	ICIS 180-189377/6	D09280006.D
Level 5	IC 180-189377/7	D09280007.D
Level 6	IC 180-189377/8	D09280008.D
Level 7	IC 180-189377/9	D09280009.D
Level 8	IC 180-189377/10	D09280010.D

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
1,4-Dioxane	0.2567 0.3081	0.2907 0.2942	0.3074 0.2996	0.2927	0.3118	Ave		0.2951			0.0100	5.9		20.0			
N-Nitrosodimethylamine	+++++ 0.4262	0.1826 0.4132	0.4197 0.4251	0.4098	0.4231	Lin1	-0.318	0.4291			0.0100				0.9980		0.9900
Pyridine	+++++ 0.7959	0.6579 0.7578	0.7466 0.7951	0.7871	0.8020	Ave		0.7632			0.0100	6.7		20.0			
Methyl methanesulfonate	0.4284 0.5721	0.5020 0.5614	0.5633 0.5607	0.5742	0.5866	Ave		0.5436			0.0100	9.7		20.0			
Benzaldehyde	0.8549 0.8794	0.8480 0.7308	0.8386 0.6725	0.8479	1.0002	Ave		0.8340			0.0100	11.8		20.0			
Phenol	1.5731 1.6075	1.7496 1.5183	1.8034 1.4450	1.7092	1.7428	Ave		1.6436			0.8000	7.7		20.0			
Aniline	1.4562 1.7227	1.7200 1.6368	1.8451 1.5449	1.7583	1.8435	Ave		1.6910			0.0100	8.1		20.0			
Bis(2-chloroethyl)ether	1.1813 1.2197	1.2825 1.1640	1.3243 1.1513	1.2775	1.2646	Ave		1.2332			0.7000	5.1		20.0			
2-Chlorophenol	1.2655 1.2706	1.3416 1.2172	1.3799 1.2153	1.3082	1.3277	Ave		1.2908			0.8000	4.6		20.0			
n-Decane	1.4367 1.1971	1.3604 1.1009	1.3802 1.0593	1.3111	1.2895	Ave		1.2669				10.7		20.0			
1,3-Dichlorobenzene	1.5705 1.5109	1.5497 1.4092	1.6464 1.3966	1.5854	1.5752	Ave		1.5305			0.0100	5.7		20.0			
1,4-Dichlorobenzene	1.5739 1.5117	1.6444 1.4279	1.6613 1.4024	1.5901	1.5879	Ave		1.5500			0.0100	6.1		20.0			
Benzyl alcohol	0.7025 0.8428	0.8434 0.8119	0.8521 0.8095	0.8825	0.8703	Ave		0.8269			0.0100	6.8		20.0			
1,2-Dichlorobenzene	1.5183 1.4775	1.5934 1.3997	1.6413 1.3565	1.5483	1.5511	Ave		1.5108			0.0100	6.3		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
2-Methylphenol	1.1670 1.1356	1.2353 1.0577	1.2991 1.0022	1.2157	1.2284	Ave		1.1676			0.7000	8.5		20.0			
Indene	2.4338 2.1677	2.5074 1.9967	2.5634 1.8933	2.3893	2.3724	Ave		2.2905			0.0100	10.7		20.0			
2,2'-oxybis[1-chloropropane]	1.8274 1.6486	1.8969 1.5271	1.9239 1.4535	1.7915	1.7382	Ave		1.7259			0.0100	9.9		20.0			
N-Nitrosopyrrolidine	0.5311 0.6380	0.5868 0.6237	0.6466 0.6201	0.5918	0.6375	Ave		0.6094			0.0100	6.3		20.0			
Acetophenone	1.7794 1.5919	1.9171 1.4702	1.9543 1.3756	1.8117	1.8203	Ave		1.7151			0.0100	12.3		20.0			
Methylphenol, 3 & 4	1.2274 1.1051	1.3513 1.0024	1.3604 0.9851	1.2579	1.2530	Ave		1.1928			0.6000	12.2		20.0			
N-Nitrosodi-n-propylamine	0.9477 0.7787	0.9383 0.6994	0.9677 0.6670	0.8819	0.8958	Ave		0.8471			0.5000	13.8		20.0			
Hexachloroethane	0.7125 0.6449	0.6703 0.6136	0.6783 0.5915	0.6524	0.6786	Ave		0.6553			0.3000	5.9		20.0			
Nitrobenzene	0.3258 0.3093	0.3241 0.3053	0.3461 0.2932	0.3301	0.3264	Ave		0.3200			0.2000	5.2		20.0			
Isophorone	0.5723 0.5929	0.6252 0.5817	0.6354 0.5566	0.6191	0.6207	Ave		0.6005			0.4000	4.8		20.0			
2-Nitrophenol	+++++ 0.1706	0.1608 0.1693	0.1637 0.1683	0.1682	0.1774	Ave		0.1683			0.1000	3.1		20.0			
2,4-Dimethylphenol	0.2874 0.2972	0.3219 0.2884	0.3314 0.2774	0.3200	0.3170	Ave		0.3051			0.2000	6.5		20.0			
Benzoic acid	0.1861 0.1712	0.1675 0.1755	0.1438 0.1850	0.1489	0.1677	Ave		0.1682			0.0100	9.1		20.0			
Bis(2-chloroethoxy)methane	0.3913 0.3745	0.4196 0.3598	0.4265 0.3421	0.4175	0.4052	Ave		0.3921			0.3000	7.8		20.0			
2,4-Dichlorophenol	0.2624 0.2765	0.2771 0.2704	0.2913 0.2607	0.2975	0.2893	Ave		0.2782			0.2000	4.9		20.0			
1,2,4-Trichlorobenzene	0.3489 0.3215	0.3397 0.3071	0.3635 0.2932	0.3520	0.3331	Ave		0.3324			0.0100	7.2		20.0			
Naphthalene	1.0288 0.9363	1.0802 0.9125	1.0950 0.8641	1.0516	1.0061	Ave		0.9968			0.7000	8.4		20.0			
4-Chloroaniline	0.3894 0.3992	0.4322 0.3970	0.4438 0.3778	0.4446	0.4285	Ave		0.4141			0.0100	6.3		20.0			
2,6-Dichlorophenol	0.2606 0.2623	0.2898 0.2571	0.3040 0.2425	0.2872	0.2785	Ave		0.2727			0.0100	7.5		20.0			
Hexachlorobutadiene	0.1859 0.1821	0.1937 0.1787	0.2021 0.1731	0.1963	0.1897	Ave		0.1877			0.0100	5.1		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
Caprolactam	+++++ 0.0998	0.0779 0.1068	0.0879 0.1028	0.0986	0.1022	Ave		0.0966			0.0100	10.5		20.0			
4-Chloro-3-methylphenol	0.2618 0.2804	0.2719 0.2769	0.2941 0.2670	0.2891	0.2934	Ave		0.2793			0.2000	4.4		20.0			
2-Methylnaphthalene	0.7166 0.6583	0.7245 0.6401	0.7564 0.6026	0.7180	0.7057	Ave		0.6903			0.4000	7.4		20.0			
1-Methylnaphthalene	0.6834 0.6153	0.6940 0.6001	0.7241 0.5695	0.6808	0.6686	Ave		0.6545			0.0100	8.1		20.0			
Hexachlorocyclopentadiene	0.2446 0.3014	0.3089 0.2873	0.3236 0.2760	0.3205	0.3078	Ave		0.2963			0.0500	8.8		20.0			
1,2,4,5-Tetrachlorobenzene	0.5804 0.4822	0.5888 0.4567	0.5806 0.4293	0.5498	0.5175	Ave		0.5232			0.0100	11.8		20.0			
2,4,6-Trichlorophenol	0.3077 0.3497	0.3471 0.3329	0.3621 0.3277	0.3580	0.3535	Ave		0.3424			0.2000	5.3		20.0			
2,4,5-Trichlorophenol	0.3182 0.3504	0.3732 0.3456	0.3642 0.3361	0.3631	0.3664	Ave		0.3521			0.2000	5.2		20.0			
1,1'-Biphenyl	1.3970 1.2574	1.4128 1.1870	1.4381 1.1271	1.3915	1.3354	Ave		1.3183			0.0100	8.7		20.0			
2-Chloronaphthalene	1.0938 1.0166	1.1813 0.9476	1.1865 0.9131	1.1318	1.0714	Ave		1.0678			0.8000	9.5		20.0			
2-Nitroaniline	0.2356 0.2980	0.2865 0.2942	0.3044 0.2880	0.3118	0.3109	Ave		0.2912			0.0100	8.4		20.0			
Dimethyl phthalate	1.0733 1.1229	1.1773 1.0949	1.2229 1.0555	1.1939	1.1667	Ave		1.1384			0.0100	5.3		20.0			
1,3-Dinitrobenzene	+++++ 0.1859	0.1433 0.1877	0.1617 0.1857	0.1788	0.1854	Ave		0.1755			0.0100	9.6		20.0			
2,6-Dinitrotoluene	+++++ 0.2622	0.2589 0.2608	0.2688 0.2542	0.2742	0.2752	Ave		0.2649			0.2000	3.0		20.0			
Acenaphthylene	1.5511 1.5666	1.7170 1.4926	1.7591 1.4191	1.7124	1.6547	Ave		1.6091			0.9000	7.5		20.0			
3-Nitroaniline	0.2333 0.3114	0.2945 0.3108	0.3065 0.3051	0.3081	0.3181	Ave		0.2985			0.0100	9.1		20.0			
Acenaphthene	1.1276 0.9566	1.1453 +++++	1.1427 +++++	1.1081	1.0403	Ave		1.0868			0.9000	6.9		20.0			
2,4-Dinitrophenol	0.0942 0.1589	0.1062 0.1620	0.1133 0.1554	0.1323	0.1522	Ave		0.1343			0.0100	19.8		20.0			
4-Nitrophenol	0.0931 0.1311	0.1244 0.1352	0.1257 0.1310	0.1333	0.1364	Ave		0.1263			0.0100	11.1		20.0			
2,4-Dinitrotoluene	+++++ 0.3596	0.3073 0.3626	0.3484 0.3551	0.3606	0.3682	Ave		0.3517			0.2000	5.8		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
Dibenzofuran	1.4990 1.4716	1.6546 1.3926	1.6705 1.3257	1.6087	1.5700	Ave		1.5241			0.8000	8.1		20.0			
2,3,5,6-Tetrachlorophenol	0.2643 0.3028	0.2955 0.3079	0.3002 0.2998	0.2987	0.3055	Ave		0.2968			0.0100	4.6		20.0			
2,3,4,6-Tetrachlorophenol	0.2621 0.2990	0.2901 0.2956	0.2995 0.2962	0.3017	0.2842	Ave		0.2911			0.0100	4.5		20.0			
2-Naphthylamine	0.9761 1.0903	1.2069 1.0496	1.2228 0.9957	1.1980	1.1669	Ave		1.1133			0.0100	8.9		20.0			
Diethyl phthalate	1.0487 1.0072	1.1885 0.9610	1.1725 0.8922	1.1354	1.1071	Ave		1.0641			0.0100	9.9		20.0			
Hexadecane	0.5545 0.4701	0.5987 0.4192	0.6123 +++++	0.5739	0.5452	Ave		0.5391				13.0		20.0			
4-Chlorophenyl phenyl ether	0.6226 0.6048	0.6626 0.5885	0.6569 0.5641	0.6442	0.6284	Ave		0.6215			0.4000	5.5		20.0			
4-Nitroaniline	0.2530 0.2919	0.2946 0.2806	0.3154 0.2622	0.3231	0.3191	Ave		0.2925			0.0100	8.9		20.0			
Fluorene	1.1984 1.1477	1.3429 1.0924	1.3394 1.0319	1.2884	1.2217	Ave		1.2078			0.9000	9.4		20.0			
4,6-Dinitro-2-methylphenol	+++++ 0.1273	0.0864 0.1271	0.0944 0.1253	0.1138	0.1220	Ave		0.1138			0.0100	14.7		20.0			
N-Nitrosodiphenylamine	0.5205 0.5209	0.5632 0.5095	0.5655 0.4817	0.5632	0.5290	Ave		0.5317			0.0100	5.7		20.0			
1,2-Diphenylhydrazine(as Azobenzene)	0.7757 0.7205	0.8205 0.6882	0.8071 0.6323	0.7972	0.7424	Ave		0.7480			0.0100	8.7		20.0			
4-Bromophenyl phenyl ether	0.1960 0.1956	0.2039 0.1924	0.2091 0.1836	0.2049	0.1977	Ave		0.1979			0.1000	4.1		20.0			
Hexachlorobenzene	0.2000 0.1805	0.2031 0.1745	0.1923 0.1679	0.1877	0.1830	Ave		0.1861			0.1000	6.5		20.0			
Atrazine	0.1679 0.1864	0.1918 0.1808	0.1984 0.1679	0.1964	0.1930	Ave		0.1853			0.0100	6.5		20.0			
Pentachlorophenol	0.1395 0.1137	0.1088 0.1126	0.0940 0.1055	0.1068	0.1114	Ave		0.1115			0.0500	11.5		20.0			
n-Octadecane	2.6298 2.3380	2.6749 2.1265	2.8563 1.9127	2.6934	2.7264	Ave		2.4948				13.3		20.0			
Phenanthrene	1.0349 1.0070	1.0849 0.9916	1.0847 0.9248	1.0669	1.0397	Ave		1.0293			0.7000	5.3		20.0			
Anthracene	1.0387 1.0506	1.1382 1.0388	1.1233 0.9594	1.1240	1.0861	Ave		1.0699			0.7000	5.6		20.0			
Carbazole	0.9481 0.9755	1.0258 0.9672	1.0457 0.9016	1.0420	1.0228	Ave		0.9911			0.0100	5.2		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
Di-n-butyl phthalate	1.0326 1.1070	1.1251 1.1112	1.1364 1.0300	1.1574	1.1461	Ave		1.1057			0.0100	4.4		20.0			
Fluoranthene	1.0802 1.1184	1.1673 1.1262	1.1690 1.0519	1.1680	1.1567	Ave		1.1297			0.6000	3.9		20.0			
Benzidine	0.4706 0.6730	0.5053 0.6231	0.5506 0.5833	0.6069	0.7118	Ave		0.5906			0.0100	13.7		20.0			
Pyrene	1.3367 1.3162	1.3352 1.2606	1.3903 1.2099	1.3498	1.3039	Ave		1.3128			0.6000	4.3		20.0			
Butyl benzyl phthalate	0.5604 0.5295	0.5027 0.5205	0.5136 0.5079	0.5292	0.5256	Ave		0.5237			0.0100	3.4		20.0			
3,3'-Dichlorobenzidine	0.3325 0.4148	0.3716 0.4216	0.3710 0.4147	0.3788	0.4043	Ave		0.3887			0.0100	7.9		20.0			
Bis(2-ethylhexyl) phthalate	0.6626 0.6796	0.6831 0.6635	0.6807 0.6374	0.6956	0.6803	Ave		0.6729			0.0100	2.7		20.0			
Benzo[a]anthracene	1.1720 1.1307	1.1727 1.1038	1.1765 1.0819	1.1650	1.1362	Ave		1.1424			0.8000	3.1		20.0			
Chrysene	1.0328 1.0949	1.0834 1.1123	1.1307 1.0691	1.1005	1.1023	Ave		1.0907			0.7000	2.7		20.0			
Di-n-octyl phthalate	+++++ 1.4226	1.9698 1.4183	1.4117 1.4109	1.3853	1.3823	Ave		1.4858			0.0100	14.4		20.0			
7,12-Dimethylbenz(a)anthracene	0.6088 0.6185	0.6044 0.6145	0.6217 0.6027	0.6185	0.5982	Ave		0.6109			0.0100	1.4		20.0			
Benzo[b]fluoranthene	1.3632 1.2931	1.2706 1.3037	1.3266 1.2703	1.3280	1.3112	Ave		1.3083			0.7000	2.4		20.0			
Benzo[k]fluoranthene	1.2849 1.3110	1.2946 1.2778	1.3353 1.2880	1.2767	1.2380	Ave		1.2883			0.7000	2.2		20.0			
Benzo[e]pyrene	1.2449 1.2123	1.1954 1.2057	1.2349 1.2043	1.2054	1.1908	Ave		1.2117			0.0100	1.6		20.0			
Benzo[a]pyrene	1.2829 1.2010	1.2380 1.2143	1.2510 1.2067	1.1903	1.1793	Ave		1.2204			0.7000	2.8		20.0			
Indeno[1,2,3-cd]pyrene	1.2030 1.2219	1.1899 1.2291	1.2145 1.1975	1.1801	1.1906	Ave		1.2033			0.5000	1.4		20.0			
Dibenz(a,h)anthracene	1.0140 1.0138	0.9889 1.0467	0.9932 1.0190	0.9848	0.9936	Ave		1.0068			0.4000	2.1		20.0			
Benzo[g,h,i]perylene	1.0025 1.0400	1.0233 1.0653	1.0412 1.0360	1.0200	1.0189	Ave		1.0309			0.5000	1.8		20.0			
2-Fluorophenol (Surr)	0.9146 1.0113	1.0094 0.9634	1.0137 0.9779	1.0256	1.0370	Ave		0.9941				4.0		20.0			
Phenol-d5 (Surr)	1.4088 1.5184	1.5462 1.4494	1.6172 1.3979	1.5419	1.5789	Ave		1.5073				5.3		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
CURVE EVALUATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	RRF					CURVE TYPE	COEFFICIENT			#	MIN RRF	%RSD	#	MAX %RSD	R^2 OR COD	#	MIN R^2 OR COD
	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5		B	M1	M2								
Nitrobenzene-d5 (Surr)	0.3071 0.3162	0.3377 0.3112	0.3378 0.3019	0.3306	0.3305	Ave		0.3216				4.4		20.0			
2-Fluorobiphenyl	1.2854 1.1821	1.3463 1.1119	1.3777 1.0617	1.3004	1.2544	Ave		1.2400				9.0		20.0			
2,4,6-Tribromophenol (Surr)	0.0582 0.0710	0.0657 0.0707	0.0638 0.0690	0.0675	0.0674	Ave		0.0667			0.0100	6.3		20.0			
Terphenyl-d14 (Surr)	0.7793 0.8336	0.8344 0.8172	0.8502 0.7936	0.8447	0.8194	Ave		0.8216				3.0		20.0			

Note: The m1 coefficient is the same as Ave RRF for an Ave curve type.

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-189377/3	D09280003.D
Level 2	IC 180-189377/4	D09280004.D
Level 3	IC 180-189377/5	D09280005.D
Level 4	ICIS 180-189377/6	D09280006.D
Level 5	IC 180-189377/7	D09280007.D
Level 6	IC 180-189377/8	D09280008.D
Level 7	IC 180-189377/9	D09280009.D
Level 8	IC 180-189377/10	D09280010.D

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
1,4-Dioxane	DCBd 4	Ave	1804 177975	10268 238886	20954 320687	46953	87992	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
N-Nitrosodimethylamine	DCBd 4	Lin1	+++++ 246244	6451 335523	28605 455105	65752	119394	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Pyridine	DCBd 4	Ave	+++++ 459788	23238 615341	50890 851149	126276	226325	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Methyl methanesulfonate	DCBd 4	Ave	3010 330525	17733 455848	38395 600212	92122	165534	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzaldehyde	DCBd 4	Ave	6007 508058	29953 593416	57162 719944	136029	282236	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Phenol	DCBd 4	Ave	11053 928718	61800 1232805	122921 1546910	274210	491796	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Aniline	DCBd 4	Ave	10232 995284	60755 1329090	125767 1653840	282090	520205	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Bis(2-chloroethyl)ether	DCBd 4	Ave	8300 704659	45303 945161	90269 1232482	204955	356860	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2-Chlorophenol	DCBd 4	Ave	8892 734084	47389 988359	94053 1301010	209873	374674	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
n-Decane	DCBd 4	Ave	10095 691593	48055 893879	94075 1133970	210342	363877	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,3-Dichlorobenzene	DCBd 4	Ave	11035 872905	54740 1144254	112220 1495129	254339	444498	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,4-Dichlorobenzene	DCBd 4	Ave	11059 873373	58086 1159419	113238 1501271	255107	448092	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzyl alcohol	DCBd 4	Ave	4936 486939	29791 659275	58077 866556	141573	245600	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,2-Dichlorobenzene	DCBd 4	Ave	10668 853579	56283 1136577	111876 1452194	248400	437697	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2-Methylphenol	DCBd 4	Ave	8200 656069	43634 858828	88550 1072835	195029	346649	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
Indene	DCBd 4	Ave	17101 1252339	88570 1621310	174727 2026843	383323	669456	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,2'-oxybis[1-chloropropane]	DCBd 4	Ave	12840 952455	67005 1239959	131135 1556035	287411	490508	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
N-Nitrosopyrrolidine	DCBd 4	Ave	3732 368570	20728 506440	44073 663798	94946	179881	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Acetophenone	DCBd 4	Ave	12503 919675	67719 1193748	133204 1472600	290647	513670	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Methylphenol, 3 & 4	DCBd 4	Ave	8624 638471	47734 813972	92727 1054569	201807	353574	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
N-Nitrosodi-n-propylamine	DCBd 4	Ave	6659 449851	33143 567938	65959 714007	141485	252791	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Hexachloroethane	DCBd 4	Ave	5006 372592	23676 498264	46231 633175	104658	191505	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Nitrobenzene	NPT	Ave	9987 818116	50731 1107918	104095 1423510	235468	425606	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Isophorone	NPT	Ave	17544 1568316	97868 2111014	191078 2702671	441561	809441	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2-Nitrophenol	NPT	Ave	+++++ 451268	25173 614434	49239 817219	119986	231332	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,4-Dimethylphenol	NPT	Ave	8810 786202	50397 1046610	99657 1346849	228239	413329	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzoic acid	NPT	Ave	5703 452924	26215 637010	43240 898095	106202	218741	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Bis(2-chloroethoxy)methane	NPT	Ave	11994 990771	65684 1305705	128253 1661027	297798	528360	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,4-Dichlorophenol	NPT	Ave	8042 731402	43381 981341	87596 1265954	212217	377301	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,2,4-Trichlorobenzene	NPT	Ave	10696 850400	53177 1114551	109322 1423856	251035	434324	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Naphthalene	NPT	Ave	31535 2476726	169107 3311597	329300 4195638	750023	1311957	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
4-Chloroaniline	NPT	Ave	11935 1055895	67655 1441021	133478 1834688	317114	558706	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,6-Dichlorophenol	NPT	Ave	7988 693781	45373 933013	91434 1177279	204858	363143	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Hexachlorobutadiene	NPT	Ave	5697 481802	30319 648712	60769 840675	140029	247402	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Caprolactam	NPT	Ave	+++++ 264023	12193 387679	26426 499273	70348	133277	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
4-Chloro-3-methylphenol	NPT	Ave	8024 741845	42566 1005130	88446 1296273	206220	382578	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
2-Methylnaphthalene	NPT	Ave	21966 1741541	113422 2323111	227495 2926046	512081	920186	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1-Methylnaphthalene	NPT	Ave	20948 1627674	108647 2177899	217773 2765477	485595	871867	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Hexachlorocyclopentadiene	ANT	Ave	4820 519466	30631 704128	63003 900121	146754	267310	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,2,4,5-Tetrachlorobenzene	ANT	Ave	11437 831013	58375 1119068	113052 1400122	251786	449373	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,4,6-Trichlorophenol	ANT	Ave	6062 602693	34417 815899	70500 1068974	163943	307011	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,4,5-Trichlorophenol	ANT	Ave	6269 603837	36998 847004	70906 1096275	166297	318147	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,1'-Biphenyl	ANT	Ave	27527 2167016	140078 2908847	280001 3676144	637189	1159722	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2-Chloronaphthalene	ANT	Ave	21553 1752043	117125 2322222	231016 2978253	518303	930395	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2-Nitroaniline	ANT	Ave	4642 513568	28406 720959	59269 939450	142788	269950	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Dimethyl phthalate	ANT	Ave	21148 1935335	116723 2683067	238099 3442526	546717	1013178	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,3-Dinitrobenzene	ANT	Ave	+++++ 320443	14205 459982	31474 605737	81894	161037	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,6-Dinitrotoluene	ANT	Ave	+++++ 451904	25667 639209	52327 829004	125572	239024	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Acenaphthylene	ANT	Ave	30563 2699988	170237 3657793	342511 4628682	784147	1436982	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
3-Nitroaniline	ANT	Ave	4597 536724	29195 761531	59668 995213	141090	276225	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Acenaphthene	ANT	Ave	22219 1648654	113548 +++++	222488 +++++	507451	903383	0.380 40.0	2.00 +++++	4.00 +++++	10.0	20.0
2,4-Dinitrophenol	ANT	Ave	3714 547604	21063 794024	44126 1013407	121149	264371	0.760 80.0	4.00 120	8.00 160	20.0	40.0
4-Nitrophenol	ANT	Ave	3668 451808	24673 662771	48952 854537	122061	236982	0.760 80.0	4.00 120	8.00 160	20.0	40.0
2,4-Dinitrotoluene	ANT	Ave	+++++ 619758	30470 888551	67836 1158279	165144	319710	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Dibenzofuran	ANT	Ave	29536 2536147	164045 3412591	325244 4324011	736673	1363437	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,3,5,6-Tetrachlorophenol	ANT	Ave	5207 521851	29299 754574	58450 977797	136801	265328	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,3,4,6-Tetrachlorophenol	ANT	Ave	5164 515304	28761 724464	58308 966231	138162	246804	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
2-Naphthylamine	ANT	Ave	19232 1879136	119661 2572013	238089 3247703	548580	1013338	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Diethyl phthalate	ANT	Ave	20664 1735803	117835 2354938	228292 2910101	519948	961406	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Hexadecane	NPT	Ave	16998 1243624	93728 1521552	184145 +++++	409300	710963	0.380 40.0	2.00 60.0	4.00 +++++	10.0	20.0
4-Chlorophenyl phenyl ether	ANT	Ave	12267 1042268	65693 1442080	127910 1839824	294998	545713	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
4-Nitroaniline	ANT	Ave	4986 503011	29211 687696	61401 855264	147958	277082	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Fluorene	ANT	Ave	23613 1978080	133140 2677009	260781 3365563	590015	1060916	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
4,6-Dinitro-2-methylphenol	PHN	Ave	+++++ 773164	29802 1114076	64368 1487532	182107	383685	+++++ 80.0	4.00 120	8.00 160	20.0	40.0
N-Nitrosodiphenylamine	PHN	Ave	17356 1581935	97110 2232895	192756 2859188	450727	831562	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
1,2-Diphenylhydrazine(as Azobenzene)	PHN	Ave	25866 2188172	141468 3016301	275099 3753343	637959	1166974	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
4-Bromophenyl phenyl ether	PHN	Ave	6536 594089	35165 843341	71270 1089543	163949	310708	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Hexachlorobenzene	PHN	Ave	6668 548219	35016 764591	65543 996723	150173	287611	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Atrazine	PHN	Ave	5599 566267	33069 792270	67638 996796	157189	303419	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Pentachlorophenol	PHN	Ave	9301 690467	37514 987066	64047 1252437	171012	350304	0.760 80.0	4.00 120	8.00 160	20.0	40.0
n-Octadecane	DCBd 4	Ave	18478 1350707	94487 1726719	194687 2047551	432107	769369	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Phenanthrene	PHN	Ave	34509 3058407	187058 4345835	369708 5489584	853767	1634313	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Anthracene	PHN	Ave	34637 3190835	196252 4552533	382844 5694856	899465	1707259	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Carbazole	PHN	Ave	31616 2962799	176861 4239011	356423 5351682	833865	1607817	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Di-n-butyl phthalate	PHN	Ave	34434 3362298	193993 4869978	387335 6113667	926207	1801628	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Fluoranthene	PHN	Ave	36022 3396708	201269 4935871	398419 6243665	934748	1818370	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzidine	CRY	Ave	13117 1771302	76695 2492957	160115 3061966	424711	1007188	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Pyrene	CRY	Ave	37259 3464304	202646 5043358	404308 6350780	944650	1845141	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

ANALYTE	IS REF	CURVE TYPE	RESPONSE					CONCENTRATION (NG)				
			LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5	LVL 1 LVL 6	LVL 2 LVL 7	LVL 3 LVL 8	LVL 4	LVL 5
Butyl benzyl phthalate	CRY	Ave	15619 1393596	76298 2082516	149362 2666094	370353	743784	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
3,3'-Dichlorobenzidine	CRY	Ave	9269 1091724	56393 1686601	107874 2176920	265129	572173	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Bis(2-ethylhexyl) phthalate	CRY	Ave	18469 1788805	103672 2654467	197946 3345932	486813	962663	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzo[a]anthracene	CRY	Ave	32668 2975905	177985 4415957	342130 5679084	815354	1607815	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Chrysene	CRY	Ave	28787 2881623	164427 4449818	328818 5611426	770227	1559829	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Di-n-octyl phthalate	PRY	Ave	+++++ 3143808	243367 4867828	331169 6269452	798049	1649080	+++++ 40.0	2.00 60.0	4.00 80.0	10.0	20.0
7,12-Dimethylbenz(a)anthracene	PRY	Ave	13590 1366843	74677 2109082	145844 2678227	356283	713638	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzo[b]fluoranthene	PRY	Ave	30432 2857774	156982 4474369	311204 5644866	765003	1564351	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzo[k]fluoranthene	PRY	Ave	28683 2897157	159946 4385602	313254 5723698	735493	1476959	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzo[e]pyrene	PRY	Ave	27791 2679039	147684 4137863	289699 5351502	694376	1420622	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzo[a]pyrene	PRY	Ave	28638 2654259	152956 4167589	293485 5362195	685688	1406956	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Indeno[1,2,3-cd]pyrene	PRY	Ave	26855 2700448	147003 4218376	284911 5321311	679804	1420467	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Dibenz(a,h)anthracene	PRY	Ave	22635 2240452	122173 3592365	233000 4528365	567321	1185430	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Benzo[g,h,i]perylene	PRY	Ave	22380 2298339	126424 3656329	244253 4603726	587576	1215621	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2-Fluorophenol (Surr)	DCBd 4	Ave	6426 584279	35655 782287	69096 1046877	164529	292626	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Phenol-d5 (Surr)	DCBd 4	Ave	9899 877232	54618 1176888	110231 1496463	247374	445543	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Nitrobenzene-d5 (Surr)	NPT	Ave	9413 836375	52861 1129531	101577 1466092	235812	430975	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2-Fluorobiphenyl	ANT	Ave	25327 2037297	133480 2724827	268238 3462753	595508	1089314	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
2,4,6-Tribromophenol (Surr)	PHN	Ave	1940 215624	11324 310002	21740 409478	54053	105932	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0
Terphenyl-d14 (Surr)	CRY	Ave	21722 2194036	126646 3269300	247241 4165441	591144	1159568	0.380 40.0	2.00 60.0	4.00 80.0	10.0	20.0

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
RESPONSE AND CONCENTRATION

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

Curve Type Legend:

Ave = Average ISTD
Lin1 = Linear 1/conc ISTD

FORM VI
GC/MS SEMI VOA BY INTERNAL STANDARD - INITIAL CALIBRATION DATA
READBACK PERCENT ERROR

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1 Analy Batch No.: 189377

SDG No.:

Instrument ID: CH732 GC Column: Rxi-5SilMS ID: 0.32(mm) Heated Purge: (Y/N) N

Calibration Start Date: 09/28/2016 05:28 Calibration End Date: 09/28/2016 08:39 Calibration ID: 32988

Calibration Files:

LEVEL:	LAB SAMPLE ID:	LAB FILE ID:
Level 1	IC 180-189377/3	D09280003.D
Level 2	IC 180-189377/4	D09280004.D
Level 3	IC 180-189377/5	D09280005.D
Level 4	ICIS 180-189377/6	D09280006.D
Level 5	IC 180-189377/7	D09280007.D
Level 6	IC 180-189377/8	D09280008.D
Level 7	IC 180-189377/9	D09280009.D
Level 8	IC 180-189377/10	D09280010.D

ANALYTE	PERCENT ERROR						PERCENT ERROR LIMIT					
	LVL 1 # LVL 7 #	LVL 2 # LVL 8 #	LVL 3 #	LVL 4 #	LVL 5 #	LVL 6 #	LVL 1 LVL 7	LVL 2 LVL 8	LVL 3	LVL 4	LVL 5	LVL 6
N-Nitrosodimethylamine	+++++ -2.5	-20.3 0.0	16.4	2.9	2.3	1.2	30	30 30	30	30	30	30

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D
Lims ID: IC
Client ID:
Sample Type: IC Calib Level: 1
Inject. Date: 28-Sep-2016 05:28:30 ALS Bottle#: 2 Worklist Smp#: 3
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-003
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:33:25 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 06:56:43

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.155	6.155	0.000	95	147924	8.00	8.00	
* 2 Naphthalene-d8	136	7.438	7.438	0.000	99	645323	8.00	8.00	
* 3 Acenaphthene-d10	164	9.136	9.136	0.000	93	414818	8.00	8.00	
* 4 Phenanthrene-d10	188	10.568	10.568	0.000	97	702026	8.00	8.00	
* 5 Chrysene-d12	240	14.297	14.297	0.000	97	586799	8.00	8.00	
* 6 Perylene-d12	264	17.166	17.166	0.000	95	469965	8.00	8.00	
$ 7 2-Fluorophenol	112	4.713	4.713	0.000	89	6426	0.3800	0.3496	
$ 8 Phenol-d5	99	5.776	5.776	0.000	96	9899	0.3800	0.3552	
$ 9 Nitrobenzene-d5	82	6.716	6.716	0.000	89	9413	0.3800	0.3628	
$ 10 2-Fluorobiphenyl	172	8.474	8.474	0.000	99	25327	0.3800	0.3939	
$ 11 2,4,6-Tribromophenol	330	9.890	9.890	0.000	82	1940	0.3800	0.3316	
$ 12 Terphenyl-d14	244	12.481	12.481	0.000	98	21722	0.3800	0.3605	
13 1,4-Dioxane	88	1.566	1.566	0.000	1	1804	0.3800	0.3306	M
14 N-Nitrosodimethylamine	74	2.186	2.186	0.000	91	1879	0.3800	0.9790	M
15 Pyridine	79	2.309	2.309	0.000	0	290	0.3800	0.0206	M
21 Methyl methanesulfonate	80	4.489	4.489	0.000	0	3010	0.3800	0.2995	M
25 Benzaldehyde	77	5.696	5.696	0.000	92	6007	0.3800	0.3895	
26 Phenol	94	5.787	5.787	0.000	98	11053	0.3800	0.3637	
27 Aniline	93	5.814	5.814	0.000	94	10232	0.3800	0.3273	
29 Bis(2-chloroethyl)ether	93	5.878	5.878	0.000	93	8300	0.3800	0.3640	
30 2-Chlorophenol	128	5.936	5.936	0.000	94	8892	0.3800	0.3726	
31 n-Decane	43	6.001	6.001	0.000	91	10095	0.3800	0.4309	
32 1,3-Dichlorobenzene	146	6.097	6.097	0.000	96	11035	0.3800	0.3899	
33 1,4-Dichlorobenzene	146	6.177	6.177	0.000	34	11059	0.3800	0.3859	
34 Benzyl alcohol	108	6.300	6.300	0.000	83	4936	0.3800	0.3228	
35 1,2-Dichlorobenzene	146	6.332	6.332	0.000	95	10668	0.3800	0.3819	
36 2-Methylphenol	108	6.412	6.412	0.000	92	8200	0.3800	0.3798	
37 Indene	116	6.423	6.423	0.000	92	17101	0.3800	0.4038	
38 2,2'-oxybis[1-chloropropan	45	6.439	6.439	0.000	95	12840	0.3800	0.4023	
39 N-Nitrosopyrrolidine	100	6.540	6.540	0.000	80	3732	0.3800	0.3312	
40 Acetophenone	105	6.561	6.561	0.000	86	12503	0.3800	0.3943	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.561	6.561	0.000	66	8624	0.3800	0.3910	
41 N-Nitrosodi-n-propylamine	70	6.567	6.567	0.000	82	6659	0.3800	0.4252	
45 Hexachloroethane	117	6.684	6.684	0.000	93	5006	0.3800	0.4132	
46 Nitrobenzene	77	6.732	6.732	0.000	87	9987	0.3800	0.3869	
48 Isophorone	82	6.978	6.978	0.000	99	17544	0.3800	0.3622	
49 2-Nitrophenol	139	7.058	7.058	0.000	89	4091	0.3800	0.3013	
50 2,4-Dimethylphenol	107	7.090	7.090	0.000	92	8810	0.3800	0.3580	
52 Benzoic acid	122	7.117	7.117	0.000	85	5703	0.3800	0.4203	
53 Bis(2-chloroethoxy)methane	93	7.181	7.181	0.000	96	11994	0.3800	0.3793	
54 2,4-Dichlorophenol	162	7.293	7.293	0.000	90	8042	0.3800	0.3584	
56 1,2,4-Trichlorobenzene	180	7.379	7.379	0.000	93	10696	0.3800	0.3989	
58 Naphthalene	128	7.459	7.459	0.000	95	31535	0.3800	0.3922	
59 4-Chloroaniline	127	7.502	7.502	0.000	96	11935	0.3800	0.3573	
60 2,6-Dichlorophenol	162	7.512	7.512	0.000	97	7988	0.3800	0.3631	
62 Hexachlorobutadiene	225	7.582	7.582	0.000	93	5697	0.3800	0.3763	
64 Caprolactam	113	7.828	7.828	0.000	67	956	0.3800	0.1227	
67 4-Chloro-3-methylphenol	107	7.950	7.950	0.000	95	8024	0.3800	0.3561	
69 2-Methylnaphthalene	142	8.127	8.127	0.000	92	21966	0.3800	0.3945	
71 1-Methylnaphthalene	142	8.228	8.228	0.000	94	20948	0.3800	0.3968	
72 Hexachlorocyclopentadiene	237	8.287	8.287	0.000	90	4820	0.3800	0.3138	
73 1,2,4,5-Tetrachlorobenzene	216	8.292	8.292	0.000	95	11437	0.3800	0.4216	
74 2,4,6-Trichlorophenol	196	8.394	8.394	0.000	87	6062	0.3800	0.3415	
75 2,4,5-Trichlorophenol	196	8.431	8.431	0.000	94	6269	0.3800	0.3433	
76 1,1'-Biphenyl	154	8.570	8.570	0.000	95	27527	0.3800	0.4027	
77 2-Chloronaphthalene	162	8.602	8.602	0.000	96	21553	0.3800	0.3893	
79 2-Nitroaniline	65	8.682	8.682	0.000	78	4642	0.3800	0.3075	
82 Dimethyl phthalate	163	8.843	8.843	0.000	98	21148	0.3800	0.3583	
83 1,3-Dinitrobenzene	168	8.875	8.875	0.000	77	2095	0.3800	0.2302	
84 2,6-Dinitrotoluene	165	8.901	8.901	0.000	88	3277	0.3800	0.2386	
85 Acenaphthylene	152	9.003	9.003	0.000	99	30563	0.3800	0.3663	
86 3-Nitroaniline	138	9.067	9.067	0.000	92	4597	0.3800	0.2970	
87 2,4-Dinitrophenol	184	9.168	9.168	0.000	61	3714	0.7600	0.5333	
88 Acenaphthene	153	9.168	9.168	0.000	94	22219	0.3800	0.3943	
89 4-Nitrophenol	109	9.201	9.201	0.000	90	3668	0.7600	0.5602	
91 2,4-Dinitrotoluene	165	9.291	9.291	0.000	90	3997	0.3800	0.2192	
93 Dibenzofuran	168	9.329	9.329	0.000	97	29536	0.3800	0.3737	
95 2,3,5,6-Tetrachlorophenol	232	9.398	9.398	0.000	85	5207	0.3800	0.3383	
96 2,3,4,6-Tetrachlorophenol	232	9.441	9.441	0.000	67	5164	0.3800	0.3422	
97 2-Naphthylamine	143	9.473	9.473	0.000	95	19232	0.3800	0.3332	
98 Diethyl phthalate	149	9.505	9.505	0.000	98	20664	0.3800	0.3745	
99 Hexadecane	57	9.516	9.516	0.000	90	16998	0.3800	0.3908	
100 4-Chlorophenyl phenyl ethe	204	9.639	9.639	0.000	91	12267	0.3800	0.3807	
101 4-Nitroaniline	138	9.649	9.649	0.000	85	4986	0.3800	0.3288	
103 Fluorene	166	9.660	9.660	0.000	92	23613	0.3800	0.3770	
104 4,6-Dinitro-2-methylphenol	198	9.687	9.687	0.000	2	3452	0.7600	0.3458	
105 N-Nitrosodiphenylamine	169	9.745	9.745	0.000	61	17356	0.3800	0.3720	
90 1,2-Diphenylhydrazine	77	9.794	9.794	0.000	97	25866	0.3800	0.3941	
57 Azobenzene	77	9.794	9.794	0.000	97	25866	0.3800	0.3941	
110 4-Bromophenyl phenyl ether	248	10.109	10.109	0.000	66	6536	0.3800	0.3764	
112 Hexachlorobenzene	284	10.194	10.194	0.000	89	6668	0.3800	0.4083	
113 Atrazine	200	10.226	10.226	0.000	89	5599	0.3800	0.3442	
116 Pentachlorophenol	266	10.370	10.370	0.000	90	9301	0.7600	0.9503	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.381	10.381	0.000	91	18478	0.3800	0.4006	
121 Phenanthrene	178	10.595	10.595	0.000	95	34509	0.3800	0.3821	
122 Anthracene	178	10.648	10.648	0.000	97	34637	0.3800	0.3689	
124 Carbazole	167	10.793	10.793	0.000	95	31616	0.3800	0.3635	
126 Di-n-butyl phthalate	149	11.124	11.124	0.000	99	34434	0.3800	0.3549	
131 Fluoranthene	202	11.984	11.984	0.000	98	36022	0.3800	0.3634	
132 Benzidine	184	12.117	12.117	0.000	97	13117	0.3800	0.3028	
133 Pyrene	202	12.304	12.304	0.000	97	37259	0.3800	0.3869	
138 Butyl benzyl phthalate	149	13.223	13.223	0.000	96	15619	0.3800	0.4066	
144 3,3'-Dichlorobenzidine	252	14.206	14.206	0.000	74	9269	0.3800	0.3251	
145 Bis(2-ethylhexyl) phthalat	149	14.265	14.265	0.000	77	18469	0.3800	0.3742	
146 Benzo[a]anthracene	228	14.281	14.281	0.000	90	32668	0.3800	0.3899	
147 Chrysene	228	14.345	14.345	0.000	56	28787	0.3800	0.3598	
150 Di-n-octyl phthalate	149	15.563	15.563	0.000	98	68627	0.3800	0.7862	
151 7,12-Dimethylbenz(a)anthra	256	16.381	16.381	0.000	79	13590	0.3800	0.3787	
152 Benzo[b]fluoranthene	252	16.397	16.397	0.000	96	30432	0.3800	0.3959	
153 Benzo[k]fluoranthene	252	16.450	16.450	0.000	97	28683	0.3800	0.3790	
219 Benzo[e]pyrene	252	16.957	16.957	0.000	0	27791	0.3800	0.3904	
154 Benzo[a]pyrene	252	17.054	17.054	0.000	81	28638	0.3800	0.3994	
157 Indeno[1,2,3-cd]pyrene	276	19.495	19.495	0.000	72	26855	0.3800	0.3799	
158 Dibenz(a,h)anthracene	278	19.527	19.527	0.000	47	22635	0.3800	0.3827	M
159 Benzo[g,h,i]perylene	276	20.152	20.152	0.000	0	22380	0.3800	0.3695	M
S 197 Methyl Phenols,Total	108				0		0.7600	0.7708	
S 199 Total Cresols	108				0		0.7600	0.7708	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

SVTAPSTD0.38i_00001 Amount Added: 1.00 Units: mL

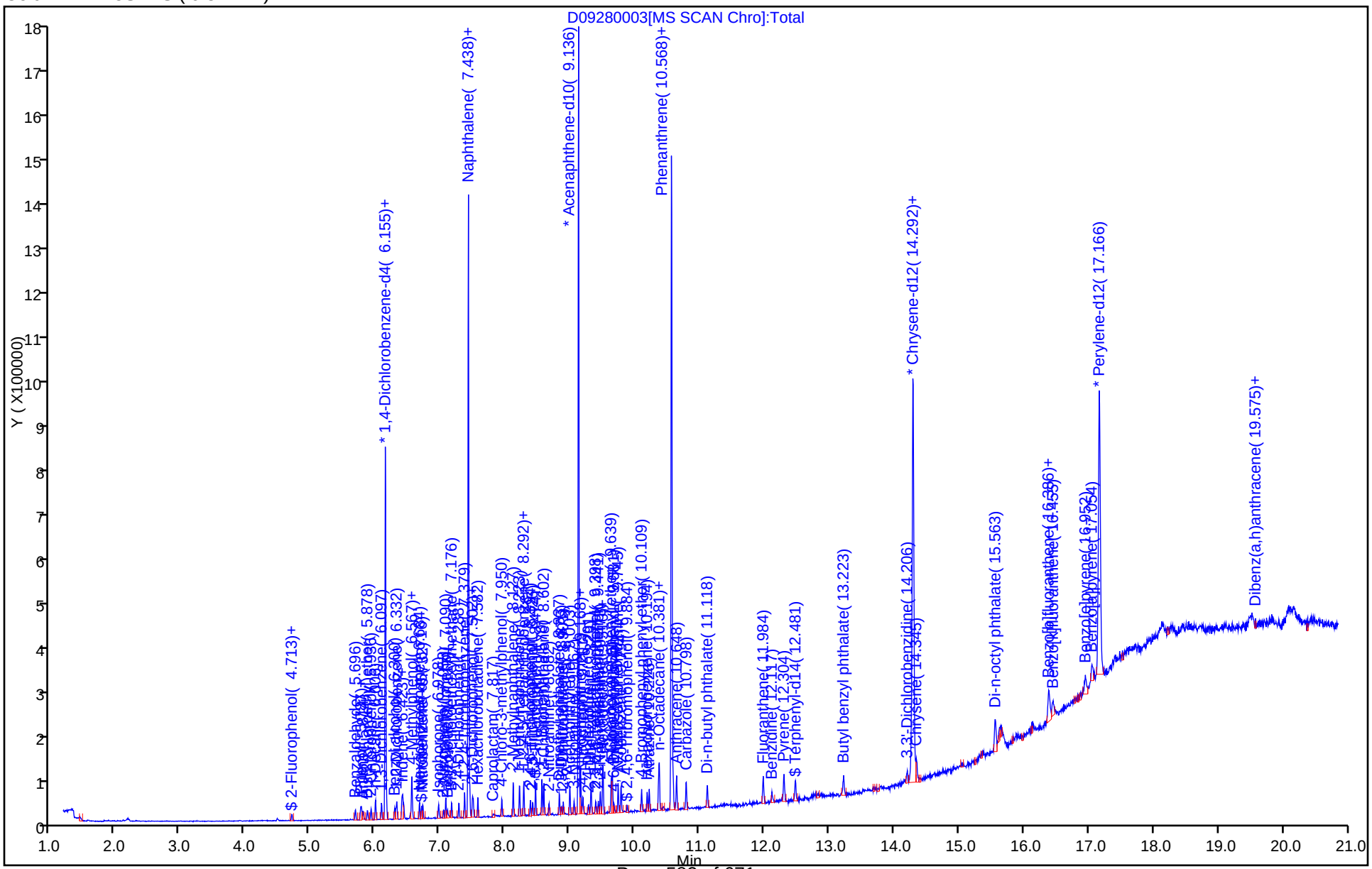
Report Date: 28-Sep-2016 10:33:26 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D

Injection Date:	28-Sep-2016 05:28:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	IC			Worklist Smp#:	3
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	2
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

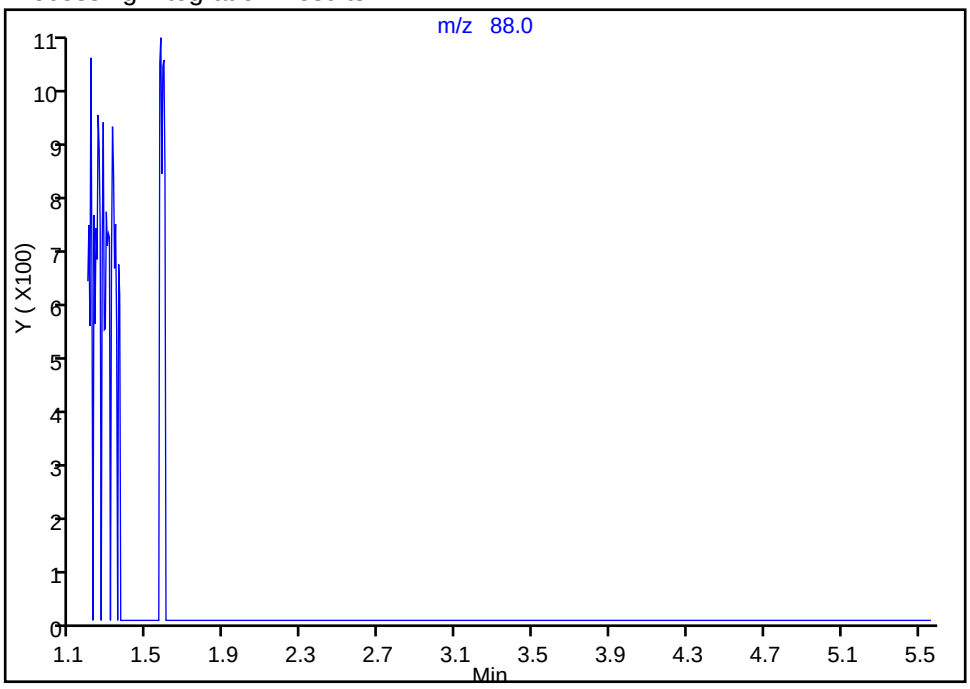
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D
Injection Date: 28-Sep-2016 05:28:30 Instrument ID: CH732
Lims ID: IC
Client ID:
Operator ID: 003200 ALS Bottle#: 2 Worklist Smp#: 3
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL
Column: Rxi-5SilMS (0.32 mm) Detector MS SCAN

13 1,4-Dioxane, CAS: 123-91-1

Signal: 1

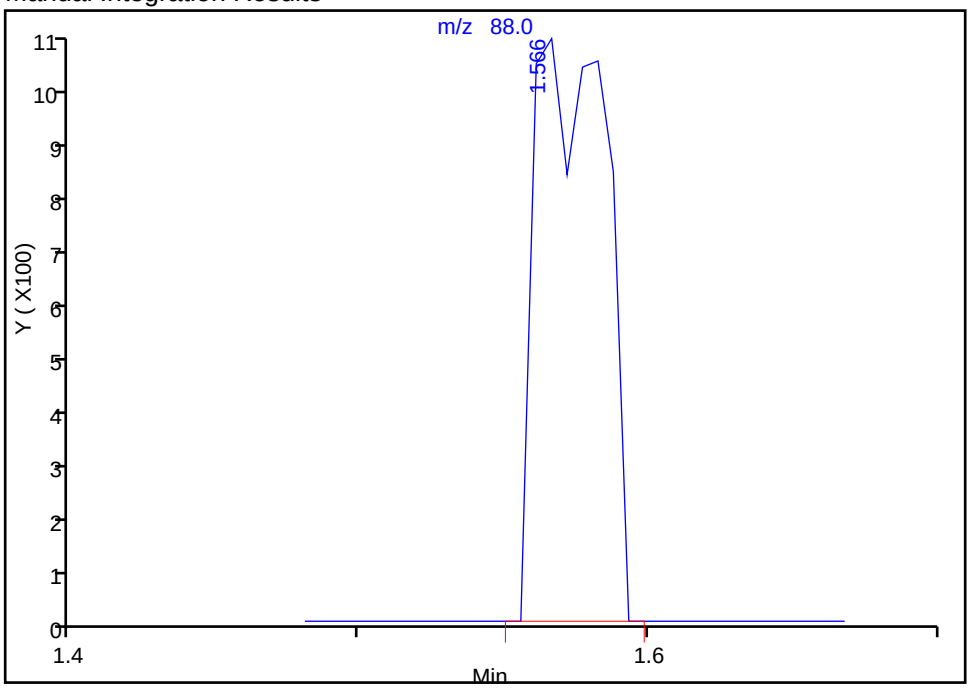
Not Detected
Expected RT: 1.57

Processing Integration Results



Manual Integration Results

RT: 1.57
Area: 1804
Amount: 0.330562
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 06:56:43
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

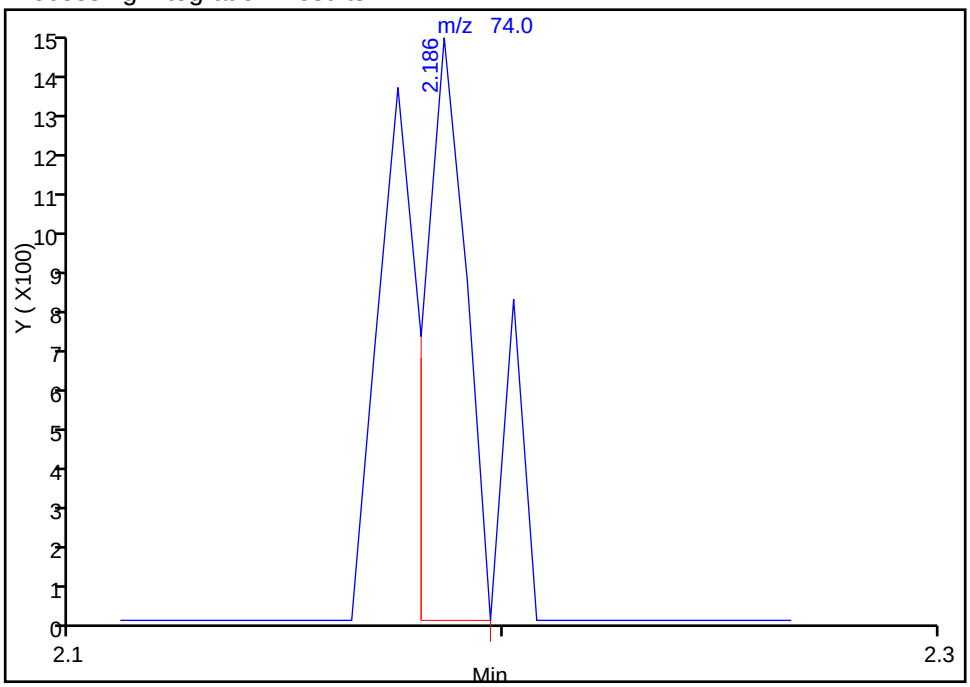
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D				
Injection Date:	28-Sep-2016 05:28:30	Instrument ID:	CH732		
Lims ID:	IC				
Client ID:					
Operator ID:	003200	ALS Bottle#:	2	Worklist Smp#:	3
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

14 N-Nitrosodimethylamine, CAS: 62-75-9

Signal: 1

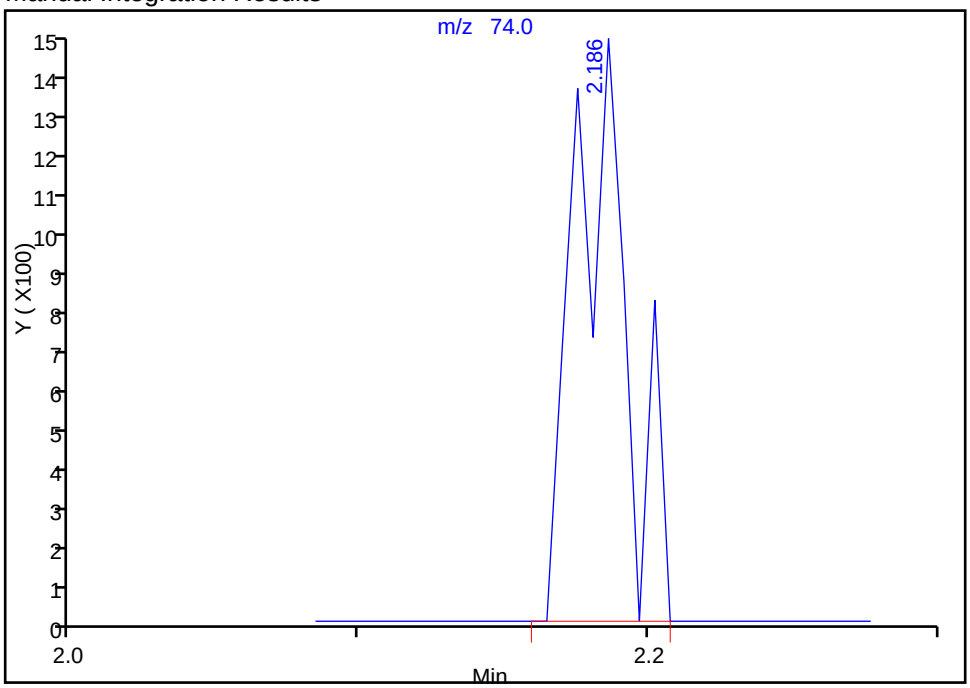
Processing Integration Results

RT: 2.19
Area: 970
Amount: 0.212574
Amount Units: ng



Manual Integration Results

RT: 2.19
Area: 1879
Amount: 0.979032
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 06:56:43

Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

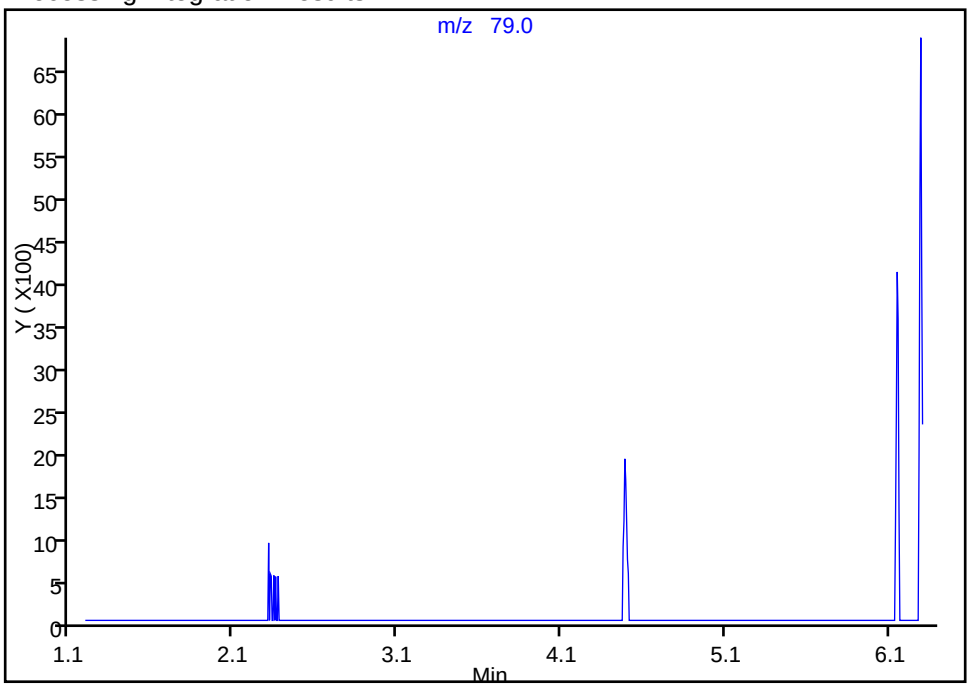
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D				
Injection Date:	28-Sep-2016 05:28:30	Instrument ID:	CH732		
Lims ID:	IC				
Client ID:					
Operator ID:	003200	ALS Bottle#:	2	Worklist Smp#:	3
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

15 Pyridine, CAS: 110-86-1

Signal: 1

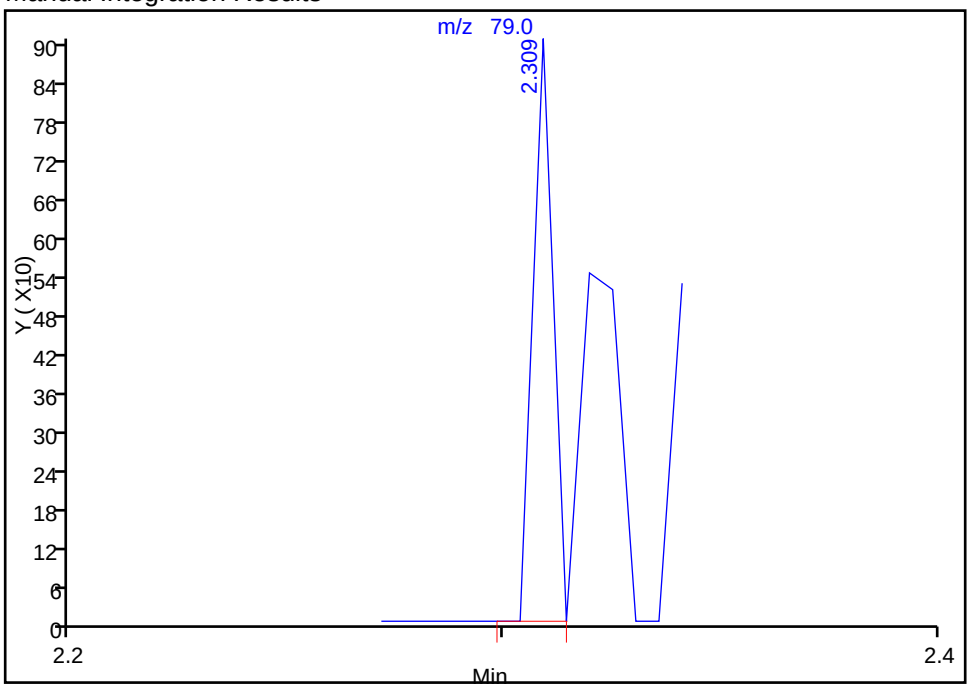
Not Detected
Expected RT: 2.31

Processing Integration Results



Manual Integration Results

RT: 2.31
Area: 290
Amount: 0.020550
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 06:56:43
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

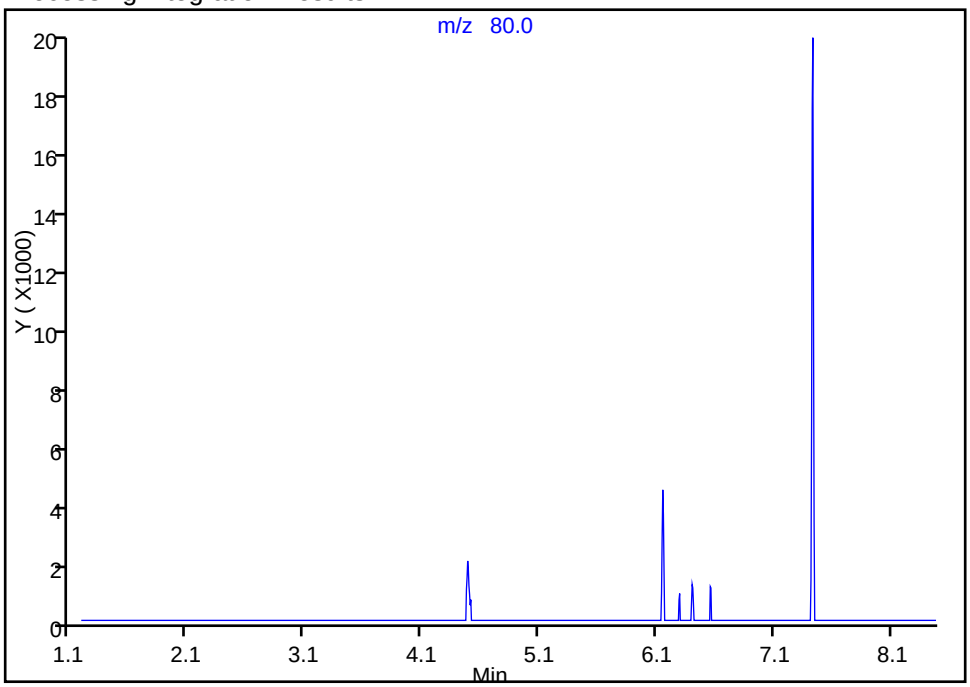
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D				
Injection Date:	28-Sep-2016 05:28:30	Instrument ID:	CH732		
Lims ID:	IC				
Client ID:					
Operator ID:	003200	ALS Bottle#:	2	Worklist Smp#:	3
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

21 Methyl methanesulfonate, CAS: 66-27-3

Signal: 1

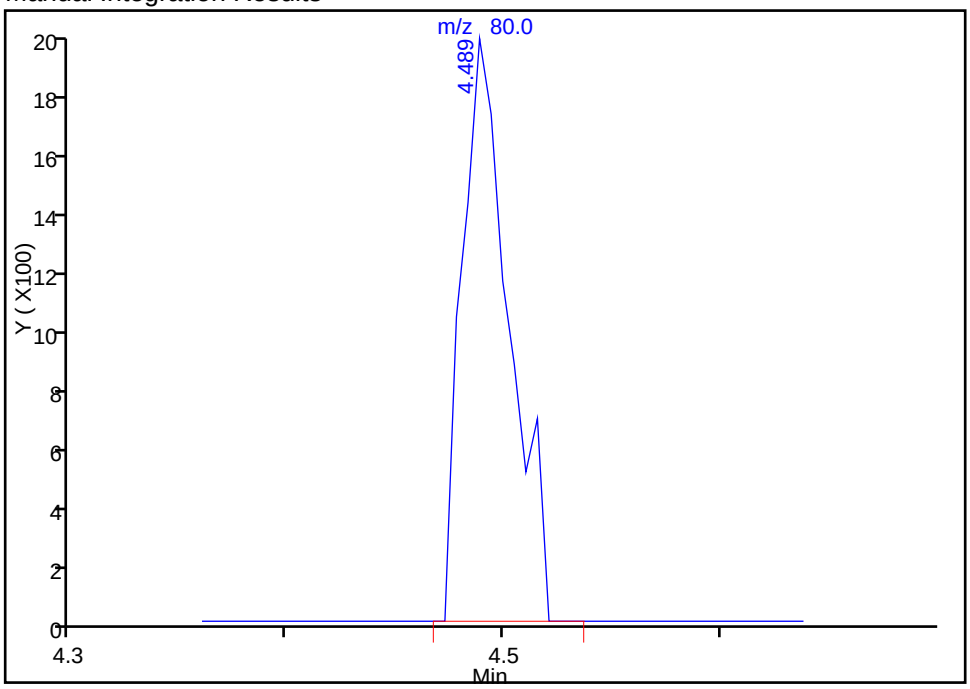
Processing Integration Results

Not Detected
Expected RT: 4.49



Manual Integration Results

RT: 4.49
Area: 3010
Amount: 0.299466
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 06:56:43
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

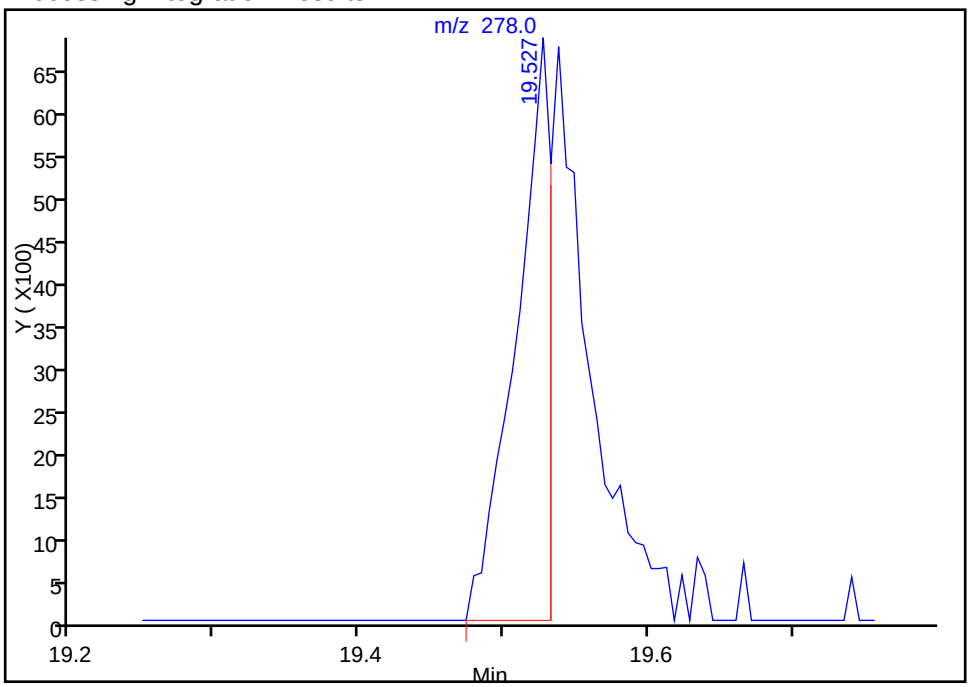
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D
Injection Date: 28-Sep-2016 05:28:30 Instrument ID: CH732
Lims ID: IC
Client ID:
Operator ID: 003200 ALS Bottle#: 2 Worklist Smp#: 3
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL
Column: Rxi-5SilMS (0.32 mm) Detector MS SCAN

158 Dibenz(a,h)anthracene, CAS: 53-70-3

Signal: 1

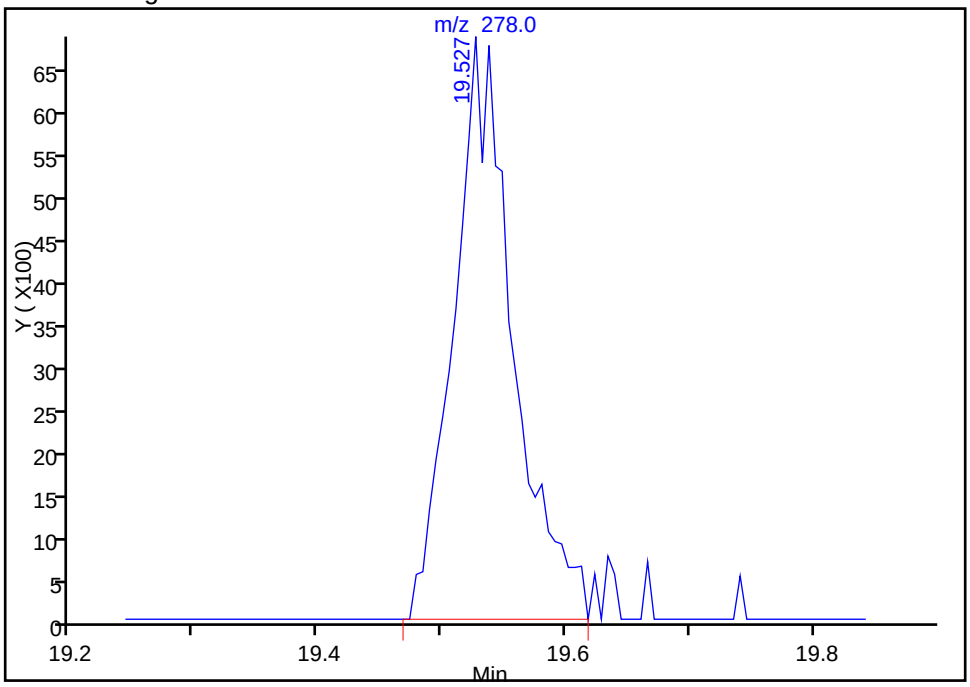
Processing Integration Results

RT: 19.53
Area: 11373
Amount: 0.233104
Amount Units: ng



Manual Integration Results

RT: 19.53
Area: 22635
Amount: 0.382720
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 06:56:43
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

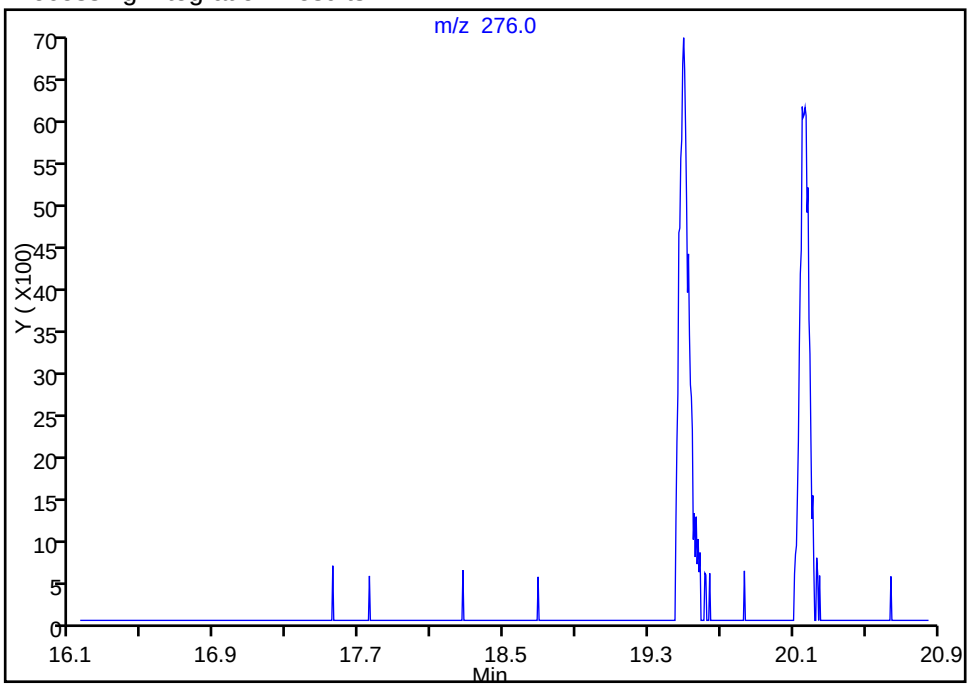
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280003.D				
Injection Date:	28-Sep-2016 05:28:30	Instrument ID:	CH732		
Lims ID:	IC				
Client ID:					
Operator ID:	003200	ALS Bottle#:	2	Worklist Smp#:	3
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

159 Benzo[g,h,i]perylene, CAS: 191-24-2

Signal: 1

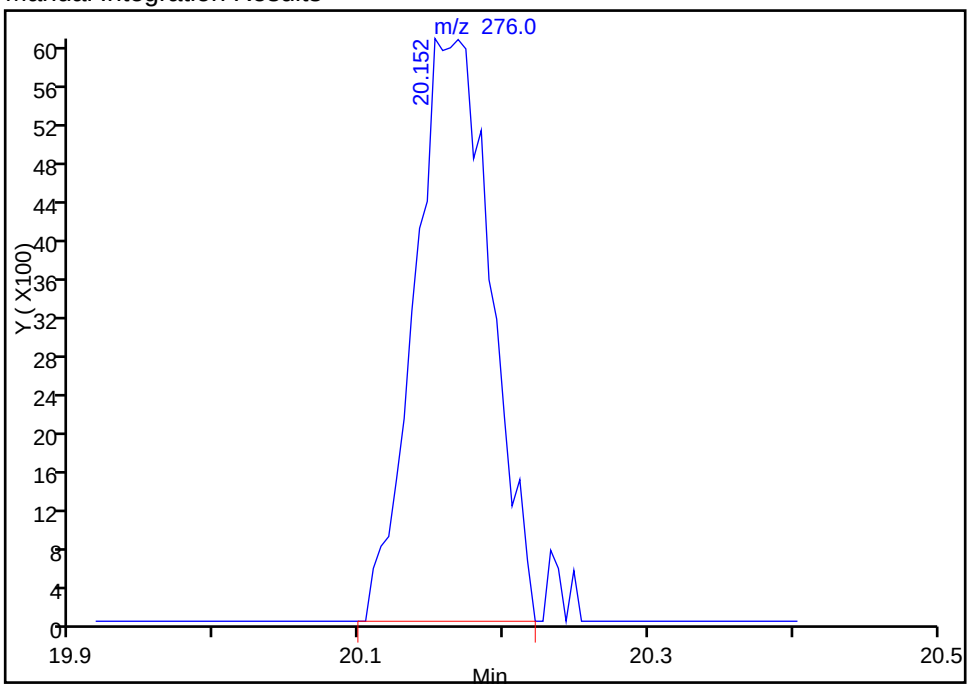
Not Detected
Expected RT: 20.15

Processing Integration Results



Manual Integration Results

RT: 20.15
Area: 22380
Amount: 0.369543
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 06:56:43
Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280004.D
Lims ID: IC
Client ID:
Sample Type: IC Calib Level: 2
Inject. Date: 28-Sep-2016 05:55:30 ALS Bottle#: 3 Worklist Smp#: 4
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-004
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:33:34 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 07:01:51

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.161	6.155	0.006	95	141293	8.00	8.00	
* 2 Naphthalene-d8	136	7.443	7.438	0.005	99	626181	8.00	8.00	
* 3 Acenaphthene-d10	164	9.147	9.136	0.011	92	396584	8.00	8.00	
* 4 Phenanthrene-d10	188	10.584	10.568	0.016	97	689682	8.00	8.00	
* 5 Chrysene-d12	240	14.319	14.297	0.022	96	607105	8.00	8.00	
* 6 Perylene-d12	264	17.198	17.166	0.032	95	494188	8.00	8.00	
$ 7 2-Fluorophenol	112	4.713	4.713	0.000	91	35655	2.00	2.03	
$ 8 Phenol-d5	99	5.776	5.776	0.000	99	54618	2.00	2.05	
$ 9 Nitrobenzene-d5	82	6.722	6.716	0.006	88	52861	2.00	2.10	
$ 10 2-Fluorobiphenyl	172	8.480	8.474	0.006	99	133480	2.00	2.17	
$ 11 2,4,6-Tribromophenol	330	9.901	9.890	0.011	87	11324	2.00	1.97	
$ 12 Terphenyl-d14	244	12.497	12.481	0.016	99	126646	2.00	2.03	
13 1,4-Dioxane	88	1.551	1.566	-0.015	90	10268	2.00	1.97	
14 N-Nitrosodimethylamine	74	2.149	2.186	-0.037	72	6451	2.00	1.59	
15 Pyridine	79	2.234	2.309	-0.075	97	23238	2.00	1.72	M
21 Methyl methanesulfonate	80	4.478	4.489	-0.011	88	17733	2.00	1.85	
25 Benzaldehyde	77	5.696	5.696	0.000	94	29953	2.00	2.03	
26 Phenol	94	5.792	5.787	0.005	94	61800	2.00	2.13	
27 Aniline	93	5.814	5.814	0.000	97	60755	2.00	2.03	
29 Bis(2-chloroethyl)ether	93	5.883	5.878	0.005	95	45303	2.00	2.08	
30 2-Chlorophenol	128	5.942	5.936	0.006	95	47389	2.00	2.08	
31 n-Decane	43	6.011	6.001	0.010	91	48055	2.00	2.15	
32 1,3-Dichlorobenzene	146	6.102	6.097	0.005	98	54740	2.00	2.03	
33 1,4-Dichlorobenzene	146	6.177	6.177	0.000	96	58086	2.00	2.12	
34 Benzyl alcohol	108	6.300	6.300	0.000	94	29791	2.00	2.04	
35 1,2-Dichlorobenzene	146	6.337	6.332	0.005	97	56283	2.00	2.11	
36 2-Methylphenol	108	6.412	6.412	0.000	94	43634	2.00	2.12	
37 Indene	116	6.428	6.423	0.005	90	88570	2.00	2.19	
38 2,2'-oxybis[1-chloropropan	45	6.444	6.439	0.005	95	67005	2.00	2.20	
39 N-Nitrosopyrrolidine	100	6.535	6.540	-0.005	93	20728	2.00	1.93	
40 Acetophenone	105	6.567	6.561	0.006	90	67719	2.00	2.24	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.567	6.561	0.006	72	47734	2.00	2.27	
41 N-Nitrosodi-n-propylamine	70	6.567	6.567	0.000	83	33143	2.00	2.22	
45 Hexachloroethane	117	6.690	6.684	0.006	94	23676	2.00	2.05	
46 Nitrobenzene	77	6.738	6.732	0.006	87	50731	2.00	2.03	
48 Isophorone	82	6.978	6.978	0.000	99	97868	2.00	2.08	
49 2-Nitrophenol	139	7.064	7.058	0.006	91	25173	2.00	1.91	
50 2,4-Dimethylphenol	107	7.096	7.090	0.006	95	50397	2.00	2.11	
52 Benzoic acid	122	7.123	7.117	0.006	87	26215	2.00	1.99	
53 Bis(2-chloroethoxy)methane	93	7.187	7.181	0.006	99	65684	2.00	2.14	
54 2,4-Dichlorophenol	162	7.294	7.293	0.001	93	43381	2.00	1.99	
56 1,2,4-Trichlorobenzene	180	7.384	7.379	0.005	93	53177	2.00	2.04	
58 Naphthalene	128	7.465	7.459	0.005	97	169107	2.00	2.17	
59 4-Chloroaniline	127	7.507	7.502	0.005	97	67655	2.00	2.09	
60 2,6-Dichlorophenol	162	7.518	7.512	0.006	98	45373	2.00	2.13	
62 Hexachlorobutadiene	225	7.587	7.582	0.005	96	30319	2.00	2.06	
64 Caprolactam	113	7.806	7.828	-0.022	81	12193	2.00	1.61	
67 4-Chloro-3-methylphenol	107	7.961	7.950	0.011	95	42566	2.00	1.95	
69 2-Methylnaphthalene	142	8.138	8.127	0.011	92	113422	2.00	2.10	
71 1-Methylnaphthalene	142	8.234	8.228	0.006	93	108647	2.00	2.12	
72 Hexachlorocyclopentadiene	237	8.298	8.287	0.011	95	30631	2.00	2.09	
73 1,2,4,5-Tetrachlorobenzene	216	8.303	8.292	0.011	96	58375	2.00	2.25	
74 2,4,6-Trichlorophenol	196	8.399	8.394	0.005	91	34417	2.00	2.03	
75 2,4,5-Trichlorophenol	196	8.437	8.431	0.006	96	36998	2.00	2.12	
76 1,1'-Biphenyl	154	8.581	8.570	0.011	95	140078	2.00	2.14	
77 2-Chloronaphthalene	162	8.608	8.602	0.006	95	117125	2.00	2.21	
79 2-Nitroaniline	65	8.688	8.682	0.006	84	28406	2.00	1.97	
82 Dimethyl phthalate	163	8.848	8.843	0.005	99	116723	2.00	2.07	
83 1,3-Dinitrobenzene	168	8.880	8.875	0.005	86	14205	2.00	1.63	
84 2,6-Dinitrotoluene	165	8.912	8.901	0.011	96	25667	2.00	1.95	
85 Acenaphthylene	152	9.008	9.003	0.005	99	170237	2.00	2.13	
86 3-Nitroaniline	138	9.078	9.067	0.011	94	29195	2.00	1.97	
87 2,4-Dinitrophenol	184	9.174	9.168	0.006	61	21063	4.00	3.16	
88 Acenaphthene	153	9.174	9.168	0.006	93	113548	2.00	2.11	
89 4-Nitrophenol	109	9.211	9.201	0.010	88	24673	4.00	3.94	
91 2,4-Dinitrotoluene	165	9.297	9.291	0.006	93	30470	2.00	1.75	
93 Dibenzofuran	168	9.340	9.329	0.011	98	164045	2.00	2.17	
95 2,3,5,6-Tetrachlorophenol	232	9.414	9.398	0.016	93	29299	2.00	1.99	
96 2,3,4,6-Tetrachlorophenol	232	9.452	9.441	0.011	72	28761	2.00	1.99	
97 2-Naphthylamine	143	9.479	9.473	0.006	97	119661	2.00	2.17	
98 Diethyl phthalate	149	9.516	9.505	0.011	99	117835	2.00	2.23	
99 Hexadecane	57	9.521	9.516	0.005	91	93728	2.00	2.22	
100 4-Chlorophenyl phenyl ethe	204	9.649	9.639	0.010	89	65693	2.00	2.13	
101 4-Nitroaniline	138	9.660	9.649	0.011	85	29211	2.00	2.01	
103 Fluorene	166	9.671	9.660	0.011	94	133140	2.00	2.22	
104 4,6-Dinitro-2-methylphenol	198	9.692	9.687	0.005	90	29802	4.00	3.04	
105 N-Nitrosodiphenylamine	169	9.756	9.745	0.011	61	97110	2.00	2.12	
90 1,2-Diphenylhydrazine	77	9.799	9.794	0.005	98	141468	2.00	2.19	
57 Azobenzene	77	9.799	9.794	0.005	98	141468	2.00	2.19	
110 4-Bromophenyl phenyl ether	248	10.120	10.109	0.011	67	35165	2.00	2.06	
112 Hexachlorobenzene	284	10.205	10.194	0.011	93	35016	2.00	2.18	
113 Atrazine	200	10.237	10.226	0.011	91	33069	2.00	2.07	
116 Pentachlorophenol	266	10.381	10.370	0.011	91	37514	4.00	3.90	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.392	10.381	0.011	95	94487	2.00	2.14	
121 Phenanthrene	178	10.606	10.595	0.011	97	187058	2.00	2.11	
122 Anthracene	178	10.659	10.648	0.011	97	196252	2.00	2.13	
124 Carbazole	167	10.809	10.793	0.016	95	176861	2.00	2.07	
126 Di-n-butyl phthalate	149	11.135	11.124	0.011	100	193993	2.00	2.04	
131 Fluoranthene	202	12.005	11.984	0.021	98	201269	2.00	2.07	
132 Benzidine	184	12.144	12.117	0.027	100	76695	2.00	1.71	
133 Pyrene	202	12.321	12.304	0.017	97	202646	2.00	2.03	
138 Butyl benzyl phthalate	149	13.245	13.223	0.022	97	76298	2.00	1.92	
144 3,3'-Dichlorobenzidine	252	14.228	14.206	0.022	75	56393	2.00	1.91	
145 Bis(2-ethylhexyl) phthalat	149	14.287	14.265	0.022	97	103672	2.00	2.03	
146 Benzo[a]anthracene	228	14.297	14.281	0.016	99	177985	2.00	2.05	
147 Chrysene	228	14.367	14.345	0.022	98	164427	2.00	1.99	
150 Di-n-octyl phthalate	149	15.585	15.563	0.022	99	243367	2.00	2.65	
151 7,12-Dimethylbenz(a)anthra	256	16.407	16.381	0.026	93	74677	2.00	1.98	
152 Benzo[b]fluoranthene	252	16.423	16.397	0.026	98	156982	2.00	1.94	
153 Benzo[k]fluoranthene	252	16.482	16.450	0.032	99	159946	2.00	2.01	
219 Benzo[e]pyrene	252	16.984	16.957	0.027	0	147684	2.00	1.97	
154 Benzo[a]pyrene	252	17.086	17.054	0.032	79	152956	2.00	2.03	
157 Indeno[1,2,3-cd]pyrene	276	19.533	19.495	0.038	95	147003	2.00	1.98	
158 Dibenz(a,h)anthracene	278	19.581	19.527	0.054	90	122173	2.00	1.96	
159 Benzo[g,h,i]perylene	276	20.206	20.152	0.054	94	126424	2.00	1.99	
S 197 Methyl Phenols,Total	108				0		4.00	4.38	
S 199 Total Cresols	108				0		4.00	4.38	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

SVTAPSTD2.0i_00011 Amount Added: 1.00 Units: mL

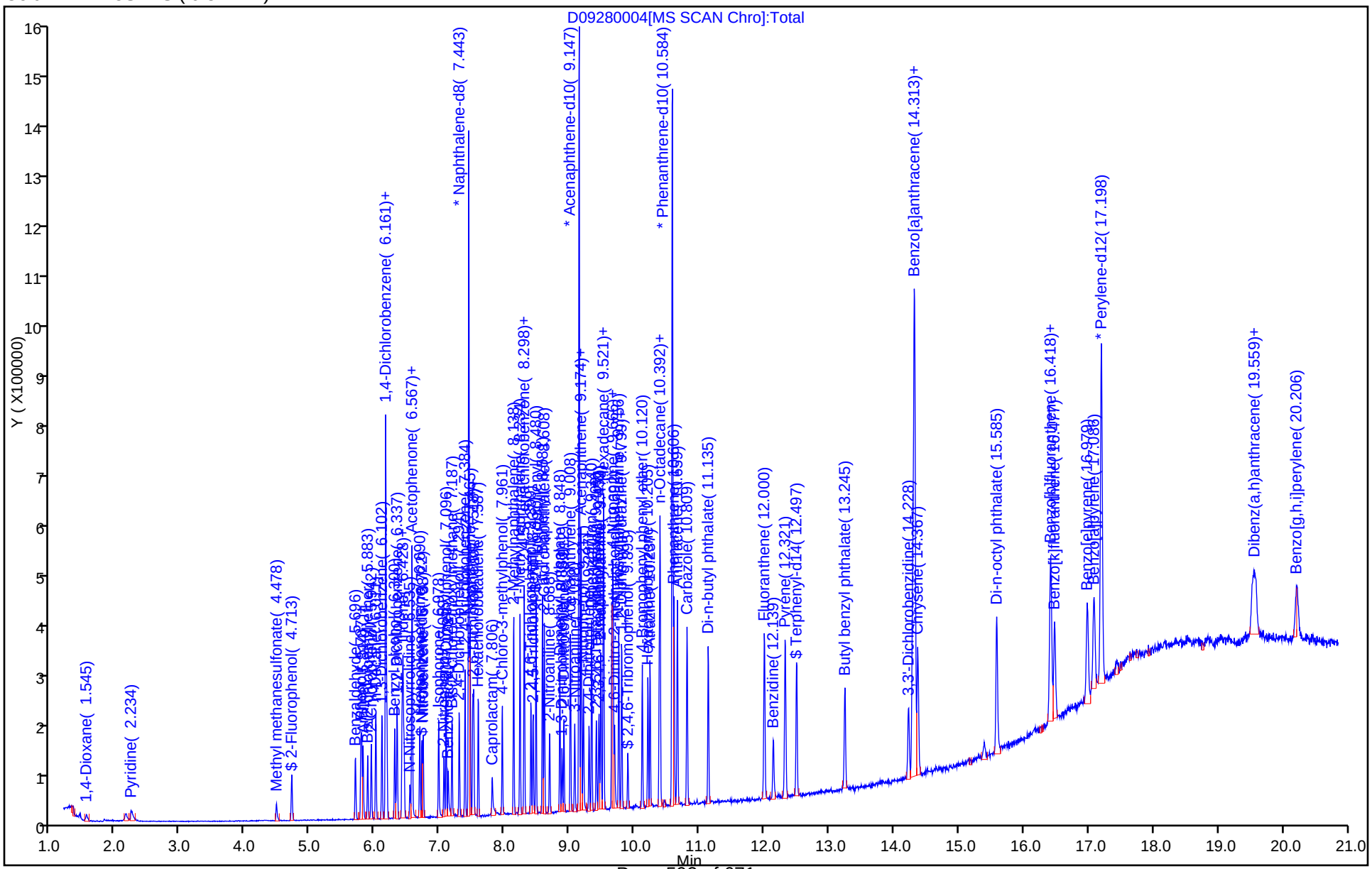
Report Date: 28-Sep-2016 10:33:35 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280004.D

Injection Date:	28-Sep-2016 05:55:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	IC			Worklist Smp#:	4
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	3
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

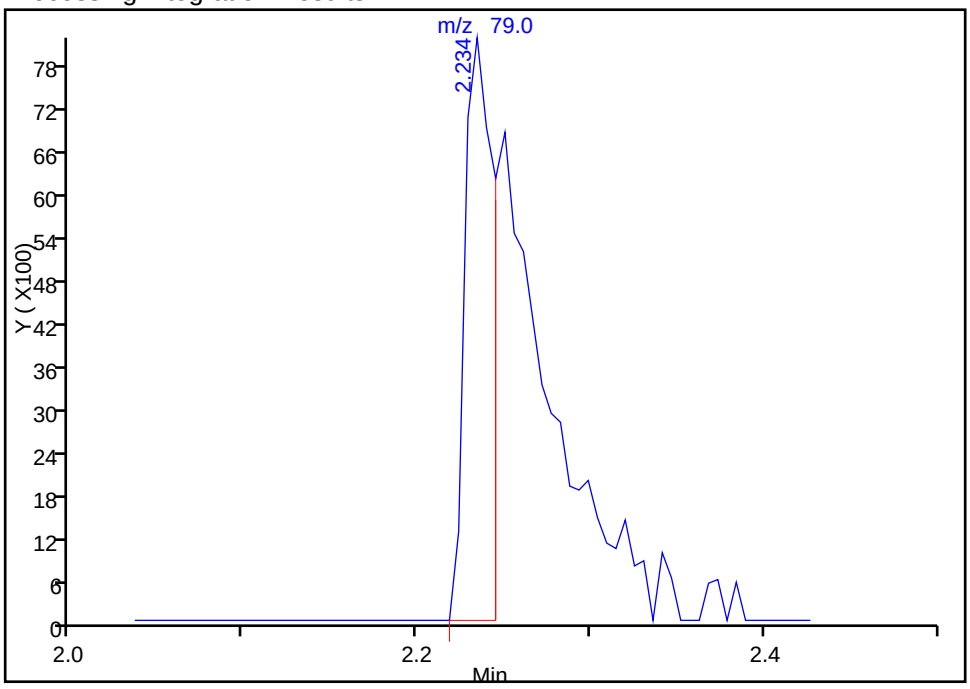
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280004.D				
Injection Date:	28-Sep-2016 05:55:30	Instrument ID:	CH732		
Lims ID:	IC				
Client ID:					
Operator ID:	003200	ALS Bottle#:	3	Worklist Smp#:	4
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

15 Pyridine, CAS: 110-86-1

Signal: 1

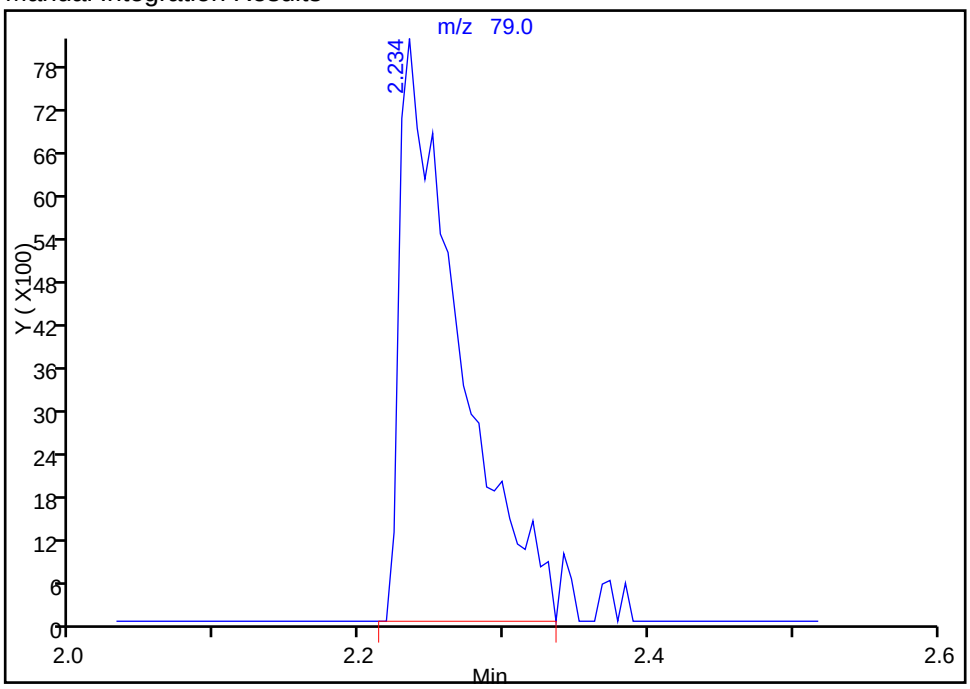
Processing Integration Results

RT: 2.23
Area: 9484
Amount: 1.057985
Amount Units: ng



Manual Integration Results

RT: 2.23
Area: 23238
Amount: 1.723978
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 07:01:51

Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280005.D
Lims ID: IC
Client ID:
Sample Type: IC Calib Level: 3
Inject. Date: 28-Sep-2016 06:22:30 ALS Bottle#: 4 Worklist Smp#: 5
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-005
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:33:40 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 07:03:18

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.161	6.155	0.006	95	136322	8.00	8.00	
* 2 Naphthalene-d8	136	7.443	7.438	0.005	99	601481	8.00	8.00	
* 3 Acenaphthene-d10	164	9.147	9.136	0.011	92	389407	8.00	8.00	
* 4 Phenanthrene-d10	188	10.584	10.568	0.016	97	681664	8.00	8.00	
* 5 Chrysene-d12	240	14.318	14.297	0.021	97	581600	8.00	8.00	
* 6 Perylene-d12	264	17.198	17.166	0.032	97	469182	8.00	8.00	
$ 7 2-Fluorophenol	112	4.713	4.713	0.000	92	69096	4.00	4.08	
$ 8 Phenol-d5	99	5.776	5.776	0.000	97	110231	4.00	4.29	
$ 9 Nitrobenzene-d5	82	6.722	6.716	0.006	86	101577	4.00	4.20	
$ 10 2-Fluorobiphenyl	172	8.479	8.474	0.005	100	268238	4.00	4.44	
$ 11 2,4,6-Tribromophenol	330	9.900	9.890	0.010	88	21740	4.00	3.83	
$ 12 Terphenyl-d14	244	12.502	12.481	0.021	99	247241	4.00	4.14	
13 1,4-Dioxane	88	1.551	1.566	-0.015	91	20954	4.00	4.17	
14 N-Nitrosodimethylamine	74	2.149	2.186	-0.037	95	28605	4.00	4.65	
15 Pyridine	79	2.224	2.309	-0.085	97	50890	4.00	3.91	
21 Methyl methanesulfonate	80	4.473	4.489	-0.016	87	38395	4.00	4.15	
25 Benzaldehyde	77	5.691	5.696	-0.005	94	57162	4.00	4.02	
26 Phenol	94	5.792	5.787	0.005	96	122921	4.00	4.39	
27 Aniline	93	5.808	5.814	-0.006	97	125767	4.00	4.36	
29 Bis(2-chloroethyl)ether	93	5.883	5.878	0.005	96	90269	4.00	4.30	
30 2-Chlorophenol	128	5.937	5.936	0.000	96	94053	4.00	4.28	
31 n-Decane	43	6.006	6.001	0.005	90	94075	4.00	4.36	
32 1,3-Dichlorobenzene	146	6.102	6.097	0.005	98	112220	4.00	4.30	
33 1,4-Dichlorobenzene	146	6.177	6.177	0.000	95	113238	4.00	4.29	
34 Benzyl alcohol	108	6.300	6.300	0.000	93	58077	4.00	4.12	
35 1,2-Dichlorobenzene	146	6.337	6.332	0.005	98	111876	4.00	4.35	
36 2-Methylphenol	108	6.412	6.412	0.000	94	88550	4.00	4.45	
37 Indene	116	6.428	6.423	0.005	91	174727	4.00	4.48	
38 2,2'-oxybis[1-chloropropan	45	6.444	6.439	0.005	95	131135	4.00	4.46	
39 N-Nitrosopyrrolidine	100	6.535	6.540	-0.005	95	44073	4.00	4.24	
40 Acetophenone	105	6.567	6.561	0.006	86	133204	4.00	4.56	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.567	6.561	0.006	70	92727	4.00	4.56	
41 N-Nitrosodi-n-propylamine	70	6.567	6.567	0.000	69	65959	4.00	4.57	
45 Hexachloroethane	117	6.684	6.684	0.000	95	46231	4.00	4.14	
46 Nitrobenzene	77	6.738	6.732	0.006	86	104095	4.00	4.33	
48 Isophorone	82	6.978	6.978	0.000	99	191078	4.00	4.23	
49 2-Nitrophenol	139	7.058	7.058	0.000	94	49239	4.00	3.89	
50 2,4-Dimethylphenol	107	7.090	7.090	0.000	95	99657	4.00	4.34	
52 Benzoic acid	122	7.128	7.117	0.011	87	43240	4.00	3.42	M
53 Bis(2-chloroethoxy)methane	93	7.181	7.181	0.000	98	128253	4.00	4.35	
54 2,4-Dichlorophenol	162	7.293	7.293	0.000	94	87596	4.00	4.19	
56 1,2,4-Trichlorobenzene	180	7.384	7.379	0.005	94	109322	4.00	4.37	
58 Naphthalene	128	7.464	7.459	0.005	97	329300	4.00	4.39	
59 4-Chloroaniline	127	7.502	7.502	0.000	97	133478	4.00	4.29	
60 2,6-Dichlorophenol	162	7.518	7.512	0.006	98	91434	4.00	4.46	
62 Hexachlorobutadiene	225	7.587	7.582	0.005	95	60769	4.00	4.31	
64 Caprolactam	113	7.801	7.828	-0.027	82	26426	4.00	3.64	
67 4-Chloro-3-methylphenol	107	7.961	7.950	0.011	96	88446	4.00	4.21	
69 2-Methylnaphthalene	142	8.132	8.127	0.005	93	227495	4.00	4.38	
71 1-Methylnaphthalene	142	8.234	8.228	0.006	94	217773	4.00	4.43	
72 Hexachlorocyclopentadiene	237	8.292	8.287	0.005	94	63003	4.00	4.37	
73 1,2,4,5-Tetrachlorobenzene	216	8.303	8.292	0.011	96	113052	4.00	4.44	
74 2,4,6-Trichlorophenol	196	8.399	8.394	0.005	92	70500	4.00	4.23	
75 2,4,5-Trichlorophenol	196	8.437	8.431	0.006	95	70906	4.00	4.14	
76 1,1'-Biphenyl	154	8.581	8.570	0.011	95	280001	4.00	4.36	
77 2-Chloronaphthalene	162	8.608	8.602	0.006	95	231016	4.00	4.44	
79 2-Nitroaniline	65	8.688	8.682	0.006	85	59269	4.00	4.18	
82 Dimethyl phthalate	163	8.848	8.843	0.005	99	238099	4.00	4.30	
83 1,3-Dinitrobenzene	168	8.880	8.875	0.005	85	31474	4.00	3.68	
84 2,6-Dinitrotoluene	165	8.912	8.901	0.011	96	52327	4.00	4.06	
85 Acenaphthylene	152	9.008	9.003	0.005	99	342511	4.00	4.37	
86 3-Nitroaniline	138	9.078	9.067	0.011	97	59668	4.00	4.11	
88 Acenaphthene	153	9.174	9.168	0.006	93	222488	4.00	4.21	
87 2,4-Dinitrophenol	184	9.174	9.168	0.006	71	44126	8.00	6.75	
89 4-Nitrophenol	109	9.211	9.201	0.010	87	48952	8.00	7.96	
91 2,4-Dinitrotoluene	165	9.297	9.291	0.006	95	67836	4.00	3.96	
93 Dibenzofuran	168	9.340	9.329	0.011	98	325244	4.00	4.38	
95 2,3,5,6-Tetrachlorophenol	232	9.409	9.398	0.011	93	58450	4.00	4.05	
96 2,3,4,6-Tetrachlorophenol	232	9.452	9.441	0.011	72	58308	4.00	4.12	
97 2-Naphthylamine	143	9.478	9.473	0.005	97	238089	4.00	4.39	
98 Diethyl phthalate	149	9.516	9.505	0.011	98	228292	4.00	4.41	
99 Hexadecane	57	9.526	9.516	0.010	91	184145	4.00	4.54	
100 4-Chlorophenyl phenyl ethe	204	9.649	9.639	0.010	91	127910	4.00	4.23	
101 4-Nitroaniline	138	9.660	9.649	0.011	88	61401	4.00	4.31	
103 Fluorene	166	9.671	9.660	0.011	94	260781	4.00	4.44	
104 4,6-Dinitro-2-methylphenol	198	9.692	9.687	0.005	90	64368	8.00	6.64	
105 N-Nitrosodiphenylamine	169	9.756	9.745	0.011	61	192756	4.00	4.25	
90 1,2-Diphenylhydrazine	77	9.799	9.794	0.005	97	275099	4.00	4.32	
57 Azobenzene	77	9.799	9.794	0.005	97	275099	4.00	4.32	
110 4-Bromophenyl phenyl ether	248	10.119	10.109	0.010	66	71270	4.00	4.23	
112 Hexachlorobenzene	284	10.205	10.194	0.011	93	65543	4.00	4.13	
113 Atrazine	200	10.242	10.226	0.016	93	67638	4.00	4.28	
116 Pentachlorophenol	266	10.381	10.370	0.011	91	64047	8.00	6.74	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.392	10.381	0.011	93	194687	4.00	4.58	
121 Phenanthrene	178	10.606	10.595	0.011	97	369708	4.00	4.22	
122 Anthracene	178	10.659	10.648	0.011	98	382844	4.00	4.20	
124 Carbazole	167	10.809	10.793	0.016	95	356423	4.00	4.22	
126 Di-n-butyl phthalate	149	11.140	11.124	0.016	100	387335	4.00	4.11	
131 Fluoranthene	202	12.000	11.984	0.016	98	398419	4.00	4.14	
132 Benzidine	184	12.139	12.117	0.022	100	160115	4.00	3.73	
133 Pyrene	202	12.326	12.304	0.022	97	404308	4.00	4.24	
138 Butyl benzyl phthalate	149	13.245	13.223	0.022	98	149362	4.00	3.92	
144 3,3'-Dichlorobenzidine	252	14.228	14.206	0.022	75	107874	4.00	3.82	
145 Bis(2-ethylhexyl) phthalat	149	14.286	14.265	0.021	98	197946	4.00	4.05	
146 Benzo[a]anthracene	228	14.302	14.281	0.021	99	342130	4.00	4.12	
147 Chrysene	228	14.372	14.345	0.027	98	328818	4.00	4.15	
150 Di-n-octyl phthalate	149	15.590	15.563	0.027	99	331169	4.00	3.80	
151 7,12-Dimethylbenz(a)anthra	256	16.413	16.381	0.032	91	145844	4.00	4.07	
152 Benzo[b]fluoranthene	252	16.423	16.397	0.026	98	311204	4.00	4.06	
153 Benzo[k]fluoranthene	252	16.487	16.450	0.037	98	313254	4.00	4.15	
219 Benzo[e]pyrene	252	16.990	16.957	0.033	0	289699	4.00	4.08	
154 Benzo[a]pyrene	252	17.086	17.054	0.032	80	293485	4.00	4.10	
157 Indeno[1,2,3-cd]pyrene	276	19.549	19.495	0.054	96	284911	4.00	4.04	
158 Dibenz(a,h)anthracene	278	19.575	19.527	0.048	92	233000	4.00	3.95	
159 Benzo[g,h,i]perylene	276	20.211	20.152	0.059	94	244253	4.00	4.04	
S 197 Methyl Phenols,Total	108				0		8.00	9.01	
S 199 Total Cresols	108				0		8.00	9.01	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

SVTAPSTD4.0i_00011 Amount Added: 1.00 Units: mL

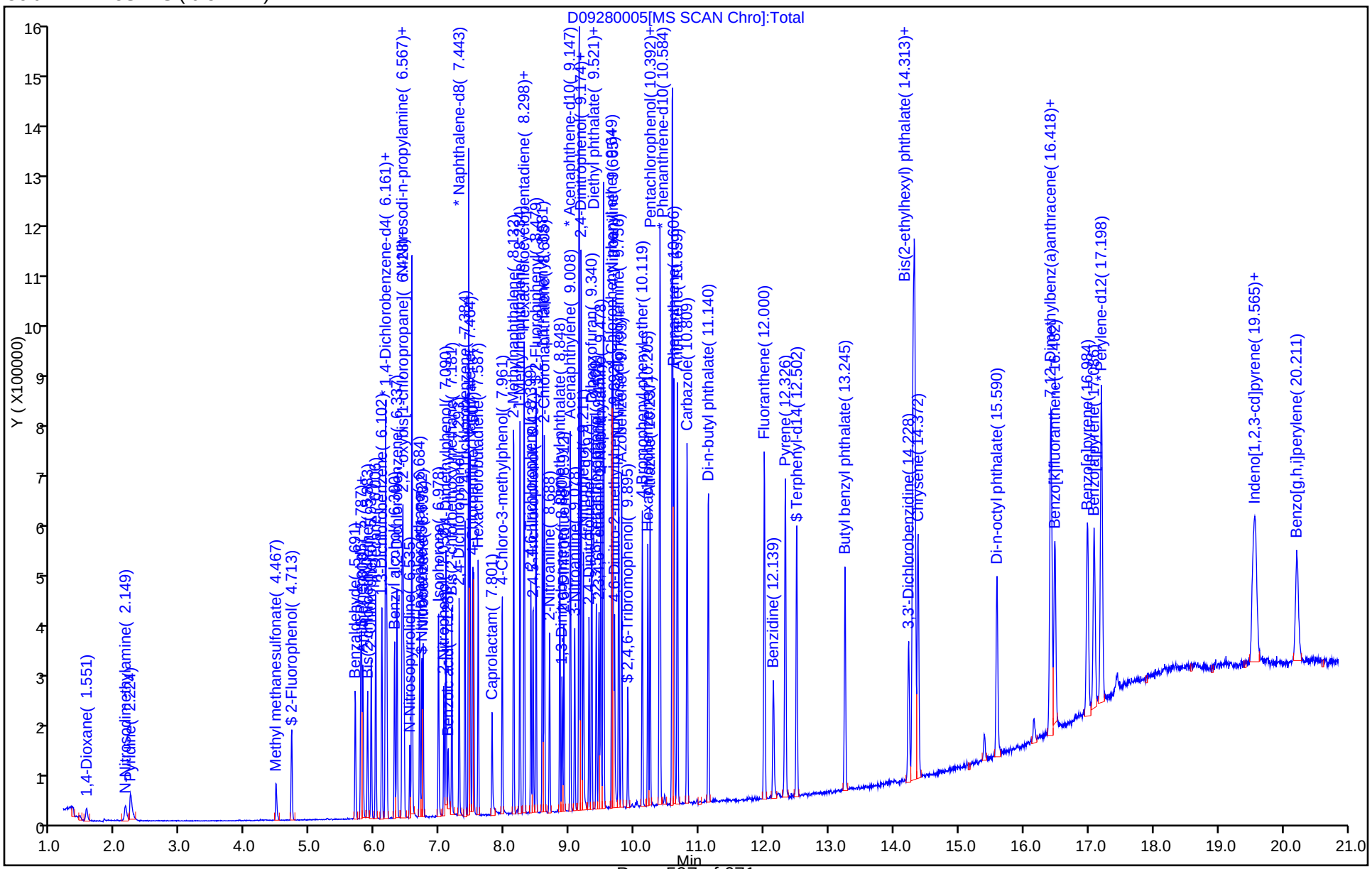
Report Date: 28-Sep-2016 10:33:41 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280005.D

Injection Date:	28-Sep-2016 06:22:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	IC			Worklist Smp#:	5
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	4
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

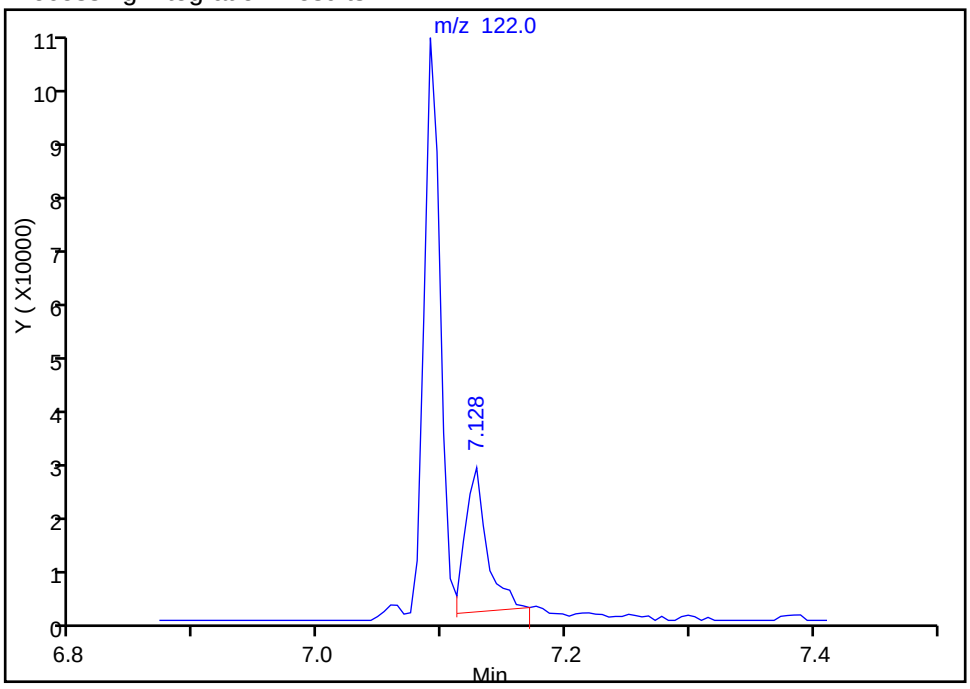
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280005.D				
Injection Date:	28-Sep-2016 06:22:30	Instrument ID:	CH732		
Lims ID:	IC				
Client ID:					
Operator ID:	003200	ALS Bottle#:	4	Worklist Smp#:	5
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

52 Benzoic acid, CAS: 65-85-0

Signal: 1

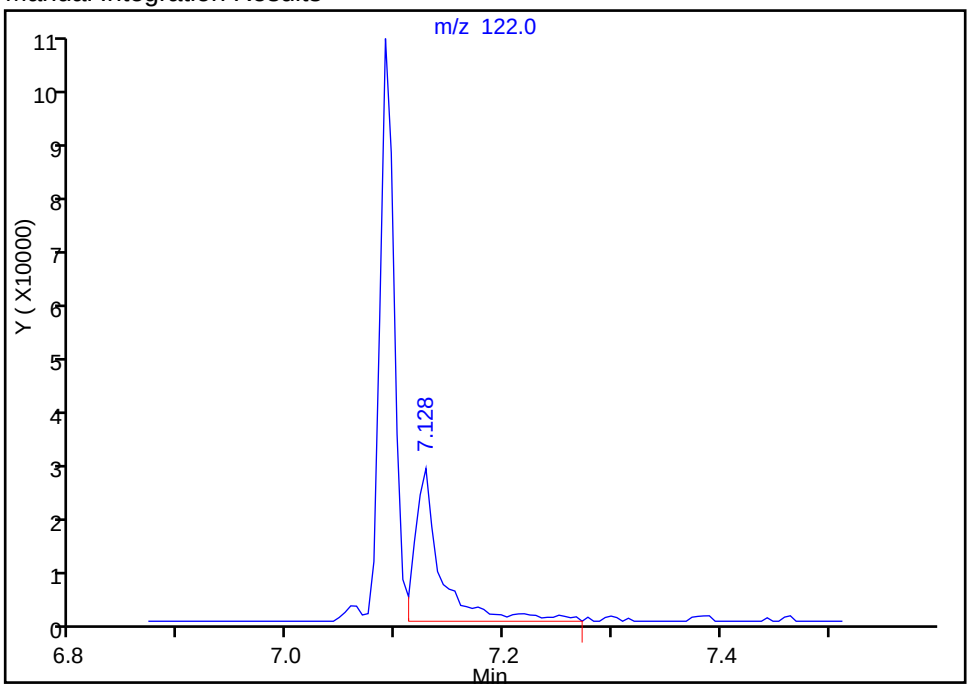
Processing Integration Results

RT: 7.13
Area: 30410
Amount: 2.669007
Amount Units: ng



Manual Integration Results

RT: 7.13
Area: 43240
Amount: 3.419150
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 07:03:18

Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280006.D
Lims ID: ICIS
Client ID:
Sample Type: ICIS Calib Level: 4
Inject. Date: 28-Sep-2016 06:49:30 ALS Bottle#: 5 Worklist Smp#: 6
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-006
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:33:45 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 08:11:13

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.161	6.161	0.000	95	128344	8.00	8.00	
* 2 Naphthalene-d8	136	7.443	7.443	0.000	99	570590	8.00	8.00	
* 3 Acenaphthene-d10	164	9.147	9.147	0.000	92	366344	8.00	8.00	
* 4 Phenanthrene-d10	188	10.584	10.584	0.000	97	640212	8.00	8.00	
* 5 Chrysene-d12	240	14.324	14.324	0.000	96	559888	8.00	8.00	
* 6 Perylene-d12	264	17.209	17.209	0.000	95	460860	8.00	8.00	
$ 7 2-Fluorophenol	112	4.713	4.713	0.000	92	164529	10.0	10.3	
$ 8 Phenol-d5	99	5.776	5.776	0.000	98	247374	10.0	10.2	
$ 9 Nitrobenzene-d5	82	6.722	6.722	0.000	87	235812	10.0	10.3	
$ 10 2-Fluorobiphenyl	172	8.485	8.485	0.000	99	595508	10.0	10.5	
$ 11 2,4,6-Tribromophenol	330	9.901	9.901	0.000	89	54053	10.0	10.1	
$ 12 Terphenyl-d14	244	12.508	12.508	0.000	99	591144	10.0	10.3	
13 1,4-Dioxane	88	1.545	1.545	0.000	95	46953	10.0	9.92	
14 N-Nitrosodimethylamine	74	2.138	2.138	0.000	94	65752	10.0	10.3	
15 Pyridine	79	2.213	2.213	0.000	98	126276	10.0	10.3	
21 Methyl methanesulfonate	80	4.468	4.468	0.000	87	92122	10.0	10.6	
25 Benzaldehyde	77	5.691	5.691	0.000	95	136029	10.0	10.2	
26 Phenol	94	5.792	5.792	0.000	98	274210	10.0	10.4	
27 Aniline	93	5.814	5.814	0.000	97	282090	10.0	10.4	
29 Bis(2-chloroethyl)ether	93	5.883	5.883	0.000	95	204955	10.0	10.4	
30 2-Chlorophenol	128	5.942	5.942	0.000	96	209873	10.0	10.1	
31 n-Decane	43	6.011	6.011	0.000	91	210342	10.0	10.3	
32 1,3-Dichlorobenzene	146	6.102	6.102	0.000	98	254339	10.0	10.4	
33 1,4-Dichlorobenzene	146	6.182	6.182	0.000	95	255107	10.0	10.3	
34 Benzyl alcohol	108	6.300	6.300	0.000	93	141573	10.0	10.7	
35 1,2-Dichlorobenzene	146	6.337	6.337	0.000	98	248400	10.0	10.2	
36 2-Methylphenol	108	6.417	6.417	0.000	94	195029	10.0	10.4	
37 Indene	116	6.428	6.428	0.000	90	383323	10.0	10.4	
38 2,2'-oxybis[1-chloropropan	45	6.444	6.444	0.000	95	287411	10.0	10.4	
39 N-Nitrosopyrrolidine	100	6.535	6.535	0.000	93	94946	10.0	9.71	
40 Acetophenone	105	6.567	6.567	0.000	83	290647	10.0	10.6	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.567	6.567	0.000	69	201807	10.0	10.5	
41 N-Nitrosodi-n-propylamine	70	6.567	6.567	0.000	67	141485	10.0	10.4	
45 Hexachloroethane	117	6.690	6.690	0.000	95	104658	10.0	9.96	
46 Nitrobenzene	77	6.743	6.743	0.000	86	235468	10.0	10.3	
48 Isophorone	82	6.978	6.978	0.000	99	441561	10.0	10.3	
49 2-Nitrophenol	139	7.064	7.064	0.000	93	119986	10.0	10.0	
50 2,4-Dimethylphenol	107	7.096	7.096	0.000	94	228239	10.0	10.5	
52 Benzoic acid	122	7.139	7.139	0.000	89	106202	10.0	8.85	
53 Bis(2-chloroethoxy)methane	93	7.187	7.187	0.000	99	297798	10.0	10.6	
54 2,4-Dichlorophenol	162	7.299	7.299	0.000	92	212217	10.0	10.7	
56 1,2,4-Trichlorobenzene	180	7.390	7.390	0.000	94	251035	10.0	10.6	
58 Naphthalene	128	7.465	7.465	0.000	97	750023	10.0	10.5	
59 4-Chloroaniline	127	7.507	7.507	0.000	97	317114	10.0	10.7	
60 2,6-Dichlorophenol	162	7.518	7.518	0.000	98	204858	10.0	10.5	
62 Hexachlorobutadiene	225	7.593	7.593	0.000	95	140029	10.0	10.5	
64 Caprolactam	113	7.806	7.806	0.000	81	70348	10.0	10.2	
67 4-Chloro-3-methylphenol	107	7.961	7.961	0.000	96	206220	10.0	10.4	
69 2-Methylnaphthalene	142	8.138	8.138	0.000	93	512081	10.0	10.4	
71 1-Methylnaphthalene	142	8.234	8.234	0.000	94	485595	10.0	10.4	
72 Hexachlorocyclopentadiene	237	8.298	8.298	0.000	94	146754	10.0	10.8	
73 1,2,4,5-Tetrachlorobenzene	216	8.303	8.303	0.000	96	251786	10.0	10.5	
74 2,4,6-Trichlorophenol	196	8.405	8.405	0.000	92	163943	10.0	10.5	
75 2,4,5-Trichlorophenol	196	8.437	8.437	0.000	96	166297	10.0	10.3	
76 1,1'-Biphenyl	154	8.581	8.581	0.000	95	637189	10.0	10.6	
77 2-Chloronaphthalene	162	8.613	8.613	0.000	95	518303	10.0	10.6	
79 2-Nitroaniline	65	8.693	8.693	0.000	87	142788	10.0	10.7	
82 Dimethyl phthalate	163	8.854	8.854	0.000	99	546717	10.0	10.5	
83 1,3-Dinitrobenzene	168	8.886	8.886	0.000	87	81894	10.0	10.2	
84 2,6-Dinitrotoluene	165	8.912	8.912	0.000	95	125572	10.0	10.4	
85 Acenaphthylene	152	9.014	9.014	0.000	99	784147	10.0	10.6	
86 3-Nitroaniline	138	9.078	9.078	0.000	96	141090	10.0	10.3	
88 Acenaphthene	153	9.179	9.179	0.000	93	507451	10.0	10.2	
87 2,4-Dinitrophenol	184	9.179	9.179	0.000	64	121149	20.0	19.7	
89 4-Nitrophenol	109	9.217	9.217	0.000	88	122061	20.0	21.1	
91 2,4-Dinitrotoluene	165	9.302	9.302	0.000	95	165144	10.0	10.3	
93 Dibenzofuran	168	9.340	9.340	0.000	98	736673	10.0	10.6	
95 2,3,5,6-Tetrachlorophenol	232	9.414	9.414	0.000	94	136801	10.0	10.1	
96 2,3,4,6-Tetrachlorophenol	232	9.452	9.452	0.000	71	138162	10.0	10.4	
97 2-Naphthylamine	143	9.484	9.484	0.000	97	548580	10.0	10.8	
98 Diethyl phthalate	149	9.516	9.516	0.000	98	519948	10.0	10.7	
99 Hexadecane	57	9.527	9.527	0.000	90	409300	10.0	10.6	
100 4-Chlorophenyl phenyl ethe	204	9.655	9.655	0.000	89	294998	10.0	10.4	
101 4-Nitroaniline	138	9.666	9.666	0.000	90	147958	10.0	11.0	
103 Fluorene	166	9.671	9.671	0.000	94	590015	10.0	10.7	
104 4,6-Dinitro-2-methylphenol	198	9.698	9.698	0.000	90	182107	20.0	20.0	
105 N-Nitrosodiphenylamine	169	9.762	9.762	0.000	60	450727	10.0	10.6	
90 1,2-Diphenylhydrazine	77	9.804	9.804	0.000	97	637959	10.0	10.7	
57 Azobenzene	77	9.804	9.804	0.000	97	637959	10.0	10.7	
110 4-Bromophenyl phenyl ether	248	10.125	10.125	0.000	66	163949	10.0	10.4	
112 Hexachlorobenzene	284	10.210	10.210	0.000	93	150173	10.0	10.1	
113 Atrazine	200	10.243	10.243	0.000	92	157189	10.0	10.6	
116 Pentachlorophenol	266	10.381	10.381	0.000	92	171012	20.0	19.2	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.397	10.397	0.000	94	432107	10.0	10.8	
121 Phenanthrene	178	10.611	10.611	0.000	97	853767	10.0	10.4	
122 Anthracene	178	10.665	10.665	0.000	98	899465	10.0	10.5	
124 Carbazole	167	10.814	10.814	0.000	95	833865	10.0	10.5	
126 Di-n-butyl phthalate	149	11.140	11.140	0.000	100	926207	10.0	10.5	
131 Fluoranthene	202	12.005	12.005	0.000	98	934748	10.0	10.3	
132 Benzidine	184	12.150	12.150	0.000	100	424711	10.0	10.3	
133 Pyrene	202	12.331	12.331	0.000	97	944650	10.0	10.3	
138 Butyl benzyl phthalate	149	13.250	13.250	0.000	98	370353	10.0	10.1	
144 3,3'-Dichlorobenzidine	252	14.233	14.233	0.000	75	265129	10.0	9.75	
145 Bis(2-ethylhexyl) phthalat	149	14.297	14.297	0.000	97	486813	10.0	10.3	
146 Benzo[a]anthracene	228	14.308	14.308	0.000	99	815354	10.0	10.2	
147 Chrysene	228	14.377	14.377	0.000	98	770227	10.0	10.1	
150 Di-n-octyl phthalate	149	15.595	15.595	0.000	99	798049	10.0	9.32	
151 7,12-Dimethylbenz(a)anthra	256	16.423	16.423	0.000	91	356283	10.0	10.1	
152 Benzo[b]fluoranthene	252	16.440	16.440	0.000	99	765003	10.0	10.1	
153 Benzo[k]fluoranthene	252	16.493	16.493	0.000	99	735493	10.0	9.91	
219 Benzo[e]pyrene	252	16.995	16.995	0.000	0	694376	10.0	9.95	
154 Benzo[a]pyrene	252	17.097	17.097	0.000	80	685688	10.0	9.75	
157 Indeno[1,2,3-cd]pyrene	276	19.549	19.549	0.000	96	679804	10.0	9.81	
158 Dibenz(a,h)anthracene	278	19.591	19.591	0.000	90	567321	10.0	9.78	
159 Benzo[g,h,i]perylene	276	20.233	20.233	0.000	96	587576	10.0	9.89	
S 197 Methyl Phenols,Total	108				0		20.0	21.0	
S 199 Total Cresols	108				0		20.0	21.0	

Reagents:

SVTAPSTD10i_00187 Amount Added: 1.00 Units: mL

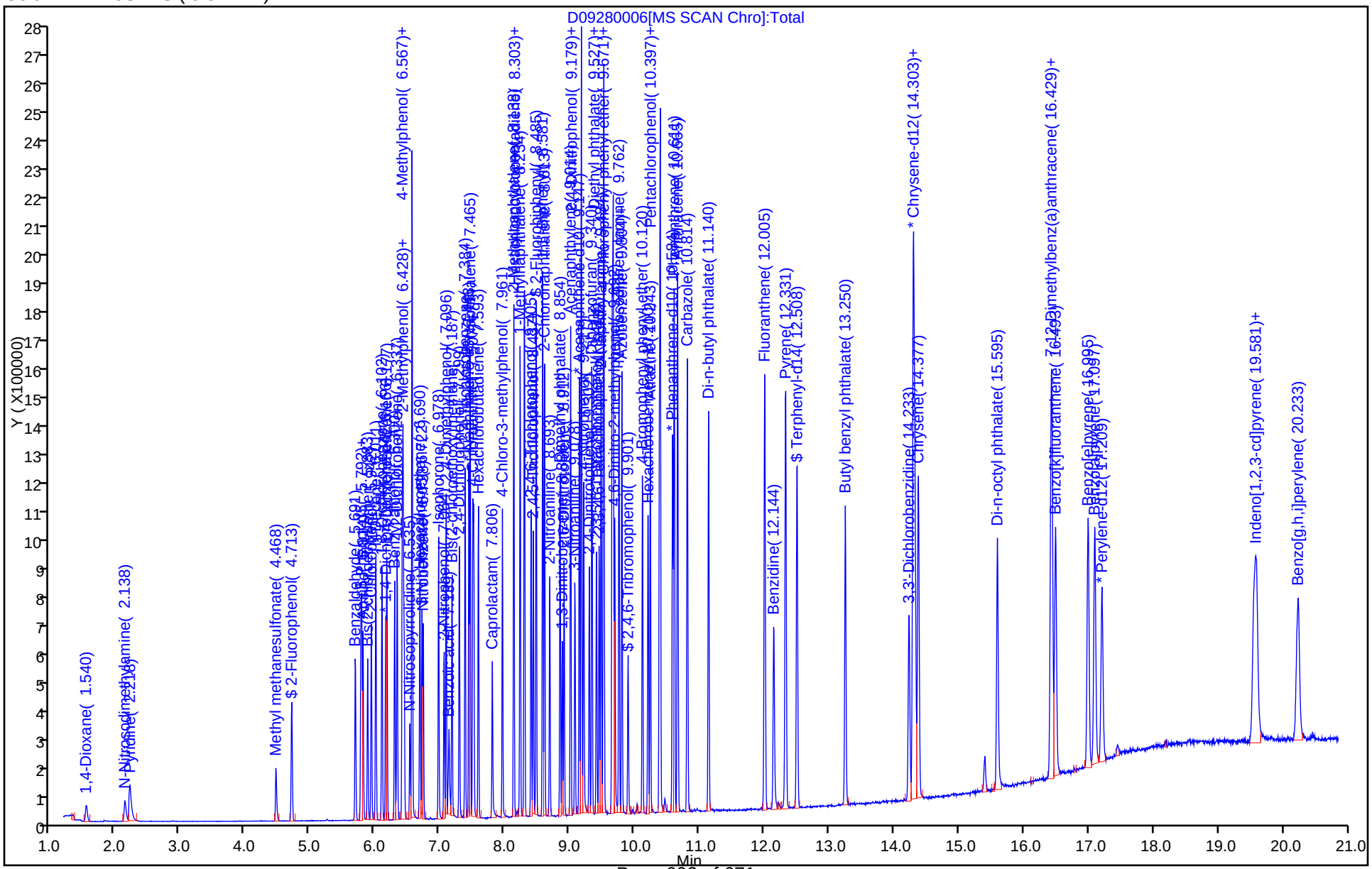
Report Date: 28-Sep-2016 10:33:46 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280006.D

Injection Date:	28-Sep-2016 06:49:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	ICIS			Worklist Smp#:	6
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	5
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280007.D
Lims ID: IC
Client ID:
Sample Type: IC Calib Level: 5
Inject. Date: 28-Sep-2016 07:17:30 ALS Bottle#: 6 Worklist Smp#: 7
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-007
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:33:51 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 08:11:48

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.161	6.161	0.000	96	112875	8.00	8.00	
* 2 Naphthalene-d8	136	7.443	7.443	0.000	99	521601	8.00	8.00	
* 3 Acenaphthene-d10	164	9.147	9.147	0.000	91	347366	8.00	8.00	
* 4 Phenanthrene-d10	188	10.584	10.584	0.000	97	628786	8.00	8.00	
* 5 Chrysene-d12	240	14.329	14.324	0.005	97	566023	8.00	8.00	
* 6 Perylene-d12	264	17.209	17.209	0.000	95	477215	8.00	8.00	
$ 7 2-Fluorophenol	112	4.713	4.713	0.000	92	292626	20.0	20.9	
$ 8 Phenol-d5	99	5.782	5.776	0.006	98	445543	20.0	20.9	
$ 9 Nitrobenzene-d5	82	6.722	6.722	0.000	87	430975	20.0	20.6	
$ 10 2-Fluorobiphenyl	172	8.485	8.485	0.000	99	1089314	20.0	20.2	
$ 11 2,4,6-Tribromophenol	330	9.900	9.901	-0.001	90	105932	20.0	20.2	
$ 12 Terphenyl-d14	244	12.508	12.508	0.000	99	1159568	20.0	19.9	
13 1,4-Dioxane	88	1.545	1.545	0.000	91	87992	20.0	21.1	
14 N-Nitrosodimethylamine	74	2.138	2.138	0.000	93	119394	20.0	20.5	
15 Pyridine	79	2.213	2.213	0.000	98	226325	20.0	21.0	
21 Methyl methanesulfonate	80	4.467	4.468	-0.001	87	165534	20.0	21.6	
25 Benzaldehyde	77	5.696	5.691	0.005	96	282236	20.0	24.0	
26 Phenol	94	5.792	5.792	0.000	98	491796	20.0	21.2	
27 Aniline	93	5.814	5.814	0.000	98	520205	20.0	21.8	
29 Bis(2-chloroethyl)ether	93	5.883	5.883	0.000	96	356860	20.0	20.5	
30 2-Chlorophenol	128	5.942	5.942	0.000	97	374674	20.0	20.6	
31 n-Decane	43	6.011	6.011	0.000	91	363877	20.0	20.4	
32 1,3-Dichlorobenzene	146	6.108	6.102	0.006	98	444498	20.0	20.6	
33 1,4-Dichlorobenzene	146	6.182	6.182	0.000	95	448092	20.0	20.5	
34 Benzyl alcohol	108	6.300	6.300	0.000	93	245600	20.0	21.1	
35 1,2-Dichlorobenzene	146	6.337	6.337	0.000	98	437697	20.0	20.5	
36 2-Methylphenol	108	6.417	6.417	0.000	95	346649	20.0	21.0	
37 Indene	116	6.428	6.428	0.000	91	669456	20.0	20.7	
38 2,2'-oxybis[1-chloropropan	45	6.449	6.444	0.005	94	490508	20.0	20.1	
39 N-Nitrosopyrrolidine	100	6.535	6.535	0.000	94	179881	20.0	20.9	
40 Acetophenone	105	6.567	6.567	0.000	84	513670	20.0	21.2	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.572	6.567	0.005	71	353574	20.0	21.0	
41 N-Nitrosodi-n-propylamine	70	6.567	6.567	0.000	70	252791	20.0	21.2	
45 Hexachloroethane	117	6.690	6.690	0.000	96	191505	20.0	20.7	
46 Nitrobenzene	77	6.743	6.743	0.000	86	425606	20.0	20.4	
48 Isophorone	82	6.978	6.978	0.000	99	809441	20.0	20.7	
49 2-Nitrophenol	139	7.064	7.064	0.000	91	231332	20.0	21.1	
50 2,4-Dimethylphenol	107	7.096	7.096	0.000	94	413329	20.0	20.8	
52 Benzoic acid	122	7.155	7.139	0.016	87	218741	20.0	19.9	
53 Bis(2-chloroethoxy)methane	93	7.187	7.187	0.000	99	528360	20.0	20.7	
54 2,4-Dichlorophenol	162	7.299	7.299	0.000	92	377301	20.0	20.8	
56 1,2,4-Trichlorobenzene	180	7.390	7.390	0.000	94	434324	20.0	20.0	
58 Naphthalene	128	7.464	7.465	-0.001	97	1311957	20.0	20.2	
59 4-Chloroaniline	127	7.507	7.507	0.000	97	558706	20.0	20.7	
60 2,6-Dichlorophenol	162	7.523	7.518	0.005	98	363143	20.0	20.4	
62 Hexachlorobutadiene	225	7.593	7.593	0.000	95	247402	20.0	20.2	
64 Caprolactam	113	7.812	7.806	0.006	80	133277	20.0	21.2	
67 4-Chloro-3-methylphenol	107	7.961	7.961	0.000	96	382578	20.0	21.0	
69 2-Methylnaphthalene	142	8.138	8.138	0.000	94	920186	20.0	20.4	
71 1-Methylnaphthalene	142	8.234	8.234	0.000	94	871867	20.0	20.4	
72 Hexachlorocyclopentadiene	237	8.298	8.298	0.000	95	267310	20.0	20.8	
73 1,2,4,5-Tetrachlorobenzene	216	8.303	8.303	0.000	96	449373	20.0	19.8	
74 2,4,6-Trichlorophenol	196	8.405	8.405	0.000	91	307011	20.0	20.7	
75 2,4,5-Trichlorophenol	196	8.437	8.437	0.000	96	318147	20.0	20.8	
76 1,1'-Biphenyl	154	8.581	8.581	0.000	94	1159722	20.0	20.3	
77 2-Chloronaphthalene	162	8.613	8.613	0.000	95	930395	20.0	20.1	
79 2-Nitroaniline	65	8.693	8.693	0.000	86	269950	20.0	21.4	
82 Dimethyl phthalate	163	8.853	8.854	-0.001	99	1013178	20.0	20.5	
83 1,3-Dinitrobenzene	168	8.885	8.886	-0.001	88	161037	20.0	21.1	
84 2,6-Dinitrotoluene	165	8.912	8.912	0.000	95	239024	20.0	20.8	
85 Acenaphthylene	152	9.014	9.014	0.000	99	1436982	20.0	20.6	
86 3-Nitroaniline	138	9.078	9.078	0.000	96	276225	20.0	21.3	
88 Acenaphthene	153	9.179	9.179	0.000	90	903383	20.0	19.1	
87 2,4-Dinitrophenol	184	9.179	9.179	0.000	66	264371	40.0	45.3	
89 4-Nitrophenol	109	9.217	9.217	0.000	86	236982	40.0	43.2	
91 2,4-Dinitrotoluene	165	9.302	9.302	0.000	95	319710	20.0	20.9	
93 Dibenzofuran	168	9.340	9.340	0.000	98	1363437	20.0	20.6	
95 2,3,5,6-Tetrachlorophenol	232	9.414	9.414	0.000	93	265328	20.0	20.6	
96 2,3,4,6-Tetrachlorophenol	232	9.452	9.452	0.000	72	246804	20.0	19.5	
97 2-Naphthylamine	143	9.484	9.484	0.000	97	1013338	20.0	21.0	
98 Diethyl phthalate	149	9.516	9.516	0.000	98	961406	20.0	20.8	
99 Hexadecane	57	9.527	9.527	0.000	91	710963	20.0	20.2	
100 4-Chlorophenyl phenyl ethe	204	9.655	9.655	0.000	88	545713	20.0	20.2	
101 4-Nitroaniline	138	9.665	9.666	-0.001	89	277082	20.0	21.8	
103 Fluorene	166	9.671	9.671	0.000	94	1060916	20.0	20.2	
104 4,6-Dinitro-2-methylphenol	198	9.697	9.698	-0.001	91	383685	40.0	42.9	
105 N-Nitrosodiphenylamine	169	9.762	9.762	0.000	60	831562	20.0	19.9	
90 1,2-Diphenylhydrazine	77	9.804	9.804	0.000	97	1166974	20.0	19.8	
57 Azobenzene	77	9.804	9.804	0.000	97	1166974	20.0	19.8	
110 4-Bromophenyl phenyl ether	248	10.120	10.125	-0.005	66	310708	20.0	20.0	
112 Hexachlorobenzene	284	10.210	10.210	0.000	94	287611	20.0	19.7	
113 Atrazine	200	10.242	10.243	0.000	93	303419	20.0	20.8	
116 Pentachlorophenol	266	10.381	10.381	0.000	92	350304	40.0	40.0	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.397	10.397	0.000	93	769369	20.0	21.9	
121 Phenanthrene	178	10.611	10.611	0.000	97	1634313	20.0	20.2	
122 Anthracene	178	10.664	10.665	-0.001	97	1707259	20.0	20.3	
124 Carbazole	167	10.814	10.814	0.000	95	1607817	20.0	20.6	
126 Di-n-butyl phthalate	149	11.140	11.140	0.000	100	1801628	20.0	20.7	
131 Fluoranthene	202	12.005	12.005	0.000	98	1818370	20.0	20.5	
132 Benzidine	184	12.144	12.150	-0.006	100	1007188	20.0	24.1	
133 Pyrene	202	12.331	12.331	0.000	97	1845141	20.0	19.9	
138 Butyl benzyl phthalate	149	13.250	13.250	0.000	98	743784	20.0	20.1	
144 3,3'-Dichlorobenzidine	252	14.233	14.233	0.000	74	572173	20.0	20.8	
145 Bis(2-ethylhexyl) phthalat	149	14.292	14.297	-0.005	97	962663	20.0	20.2	
146 Benzo[a]anthracene	228	14.308	14.308	0.000	99	1607815	20.0	19.9	
147 Chrysene	228	14.377	14.377	0.000	98	1559829	20.0	20.2	
150 Di-n-octyl phthalate	149	15.595	15.595	0.000	99	1649080	20.0	18.6	
151 7,12-Dimethylbenz(a)anthra	256	16.423	16.423	0.000	94	713638	20.0	19.6	
152 Benzo[b]fluoranthene	252	16.439	16.440	-0.001	98	1564351	20.0	20.0	
153 Benzo[k]fluoranthene	252	16.493	16.493	0.000	99	1476959	20.0	19.2	
219 Benzo[e]pyrene	252	16.995	16.995	0.000	0	1420622	20.0	19.7	
154 Benzo[a]pyrene	252	17.096	17.097	-0.001	79	1406956	20.0	19.3	
157 Indeno[1,2,3-cd]pyrene	276	19.554	19.549	0.005	97	1420467	20.0	19.8	
158 Dibenz(a,h)anthracene	278	19.591	19.591	0.000	88	1185430	20.0	19.7	
159 Benzo[g,h,i]perylene	276	20.232	20.233	0.000	94	1215621	20.0	19.8	
S 197 Methyl Phenols,Total	108				0		40.0	42.0	
S 199 Total Cresols	108				0		40.0	42.0	

Reagents:

SVTAPSTD20i_00010 Amount Added: 1.00 Units: mL

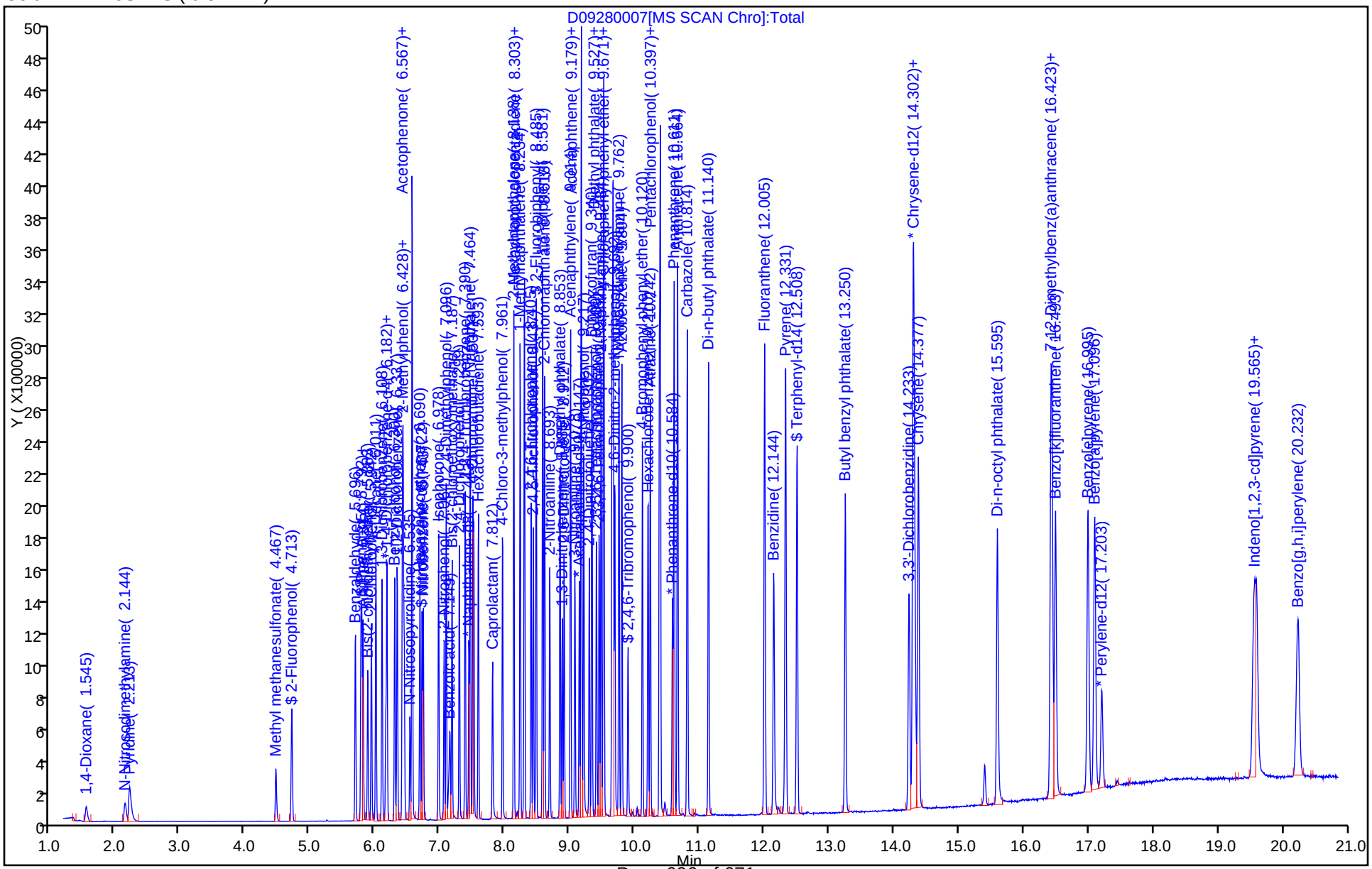
Report Date: 28-Sep-2016 10:33:52 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280007.D

Injection Date:	28-Sep-2016 07:17:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	IC			Worklist Smp#:	7
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	6
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280008.D
Lims ID: IC
Client ID:
Sample Type: IC Calib Level: 6
Inject. Date: 28-Sep-2016 07:44:30 ALS Bottle#: 7 Worklist Smp#: 8
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-008
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:33:57 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 08:13:05

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.161	6.161	0.000	95	115546	8.00	8.00	
* 2 Naphthalene-d8	136	7.448	7.443	0.005	99	529063	8.00	8.00	
* 3 Acenaphthene-d10	164	9.147	9.147	0.000	91	344689	8.00	8.00	
* 4 Phenanthrene-d10	188	10.590	10.584	0.006	97	607440	8.00	8.00	
* 5 Chrysene-d12	240	14.334	14.324	0.010	96	526395	8.00	8.00	
* 6 Perylene-d12	264	17.214	17.209	0.005	95	441993	8.00	8.00	
$ 7 2-Fluorophenol	112	4.713	4.713	0.000	91	584279	40.0	40.7	
$ 8 Phenol-d5	99	5.782	5.776	0.006	99	877232	40.0	40.3	
$ 9 Nitrobenzene-d5	82	6.722	6.722	0.000	87	836375	40.0	39.3	
$ 10 2-Fluorobiphenyl	172	8.485	8.485	0.000	100	2037297	40.0	38.1	
$ 11 2,4,6-Tribromophenol	330	9.906	9.901	0.005	92	215624	40.0	42.6	
$ 12 Terphenyl-d14	244	12.507	12.508	-0.001	99	2194036	40.0	40.6	
13 1,4-Dioxane	88	1.540	1.545	-0.005	91	177975	40.0	41.8	
14 N-Nitrosodimethylamine	74	2.138	2.138	0.000	94	246244	40.0	40.5	
15 Pyridine	79	2.208	2.213	-0.005	98	459788	40.0	41.7	
21 Methyl methanesulfonate	80	4.467	4.468	-0.001	87	330525	40.0	42.1	
25 Benzaldehyde	77	5.691	5.691	0.000	97	508058	40.0	42.2	
26 Phenol	94	5.798	5.792	0.006	97	928718	40.0	39.1	
27 Aniline	93	5.814	5.814	0.000	98	995284	40.0	40.8	
29 Bis(2-chloroethyl)ether	93	5.883	5.883	0.000	96	704659	40.0	39.6	
30 2-Chlorophenol	128	5.942	5.942	0.000	97	734084	40.0	39.4	
31 n-Decane	43	6.011	6.011	0.000	90	691593	40.0	37.8	
32 1,3-Dichlorobenzene	146	6.107	6.102	0.005	98	872905	40.0	39.5	
33 1,4-Dichlorobenzene	146	6.182	6.182	0.000	95	873373	40.0	39.0	
34 Benzyl alcohol	108	6.300	6.300	0.000	93	486939	40.0	40.8	
35 1,2-Dichlorobenzene	146	6.337	6.337	0.000	98	853579	40.0	39.1	
36 2-Methylphenol	108	6.423	6.417	0.006	95	656069	40.0	38.9	
37 Indene	116	6.428	6.428	0.000	91	1252339	40.0	37.9	
38 2,2'-oxybis[1-chloropropan	45	6.449	6.444	0.005	95	952455	40.0	38.2	
39 N-Nitrosopyrrolidine	100	6.540	6.535	0.005	96	368570	40.0	41.9	
40 Acetophenone	105	6.572	6.567	0.005	83	919675	40.0	37.1	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.572	6.567	0.005	71	638471	40.0	37.1	
41 N-Nitrosodi-n-propylamine	70	6.572	6.567	0.005	67	449851	40.0	36.8	
45 Hexachloroethane	117	6.690	6.690	0.000	96	372592	40.0	39.4	
46 Nitrobenzene	77	6.743	6.743	0.000	86	818116	40.0	38.7	
48 Isophorone	82	6.978	6.978	0.000	99	1568316	40.0	39.5	
49 2-Nitrophenol	139	7.064	7.064	0.000	92	451268	40.0	40.5	
50 2,4-Dimethylphenol	107	7.096	7.096	0.000	94	786202	40.0	39.0	
52 Benzoic acid	122	7.171	7.139	0.032	88	452924	40.0	40.7	
53 Bis(2-chloroethoxy)methane	93	7.187	7.187	0.000	98	990771	40.0	38.2	
54 2,4-Dichlorophenol	162	7.299	7.299	0.000	92	731402	40.0	39.8	
56 1,2,4-Trichlorobenzene	180	7.390	7.390	0.000	94	850400	40.0	38.7	
58 Naphthalene	128	7.464	7.465	-0.001	97	2476726	40.0	37.6	
59 4-Chloroaniline	127	7.507	7.507	0.000	97	1055895	40.0	38.6	
60 2,6-Dichlorophenol	162	7.523	7.518	0.005	98	693781	40.0	38.5	
62 Hexachlorobutadiene	225	7.593	7.593	0.000	95	481802	40.0	38.8	
64 Caprolactam	113	7.817	7.806	0.011	81	264023	40.0	41.3	
67 4-Chloro-3-methylphenol	107	7.967	7.961	0.006	96	741845	40.0	40.2	
69 2-Methylnaphthalene	142	8.137	8.138	-0.001	93	1741541	40.0	38.1	
71 1-Methylnaphthalene	142	8.239	8.234	0.005	94	1627674	40.0	37.6	
72 Hexachlorocyclopentadiene	237	8.298	8.298	0.000	95	519466	40.0	40.7	
73 1,2,4,5-Tetrachlorobenzene	216	8.303	8.303	0.000	96	831013	40.0	36.9	
74 2,4,6-Trichlorophenol	196	8.405	8.405	0.000	91	602693	40.0	40.9	
75 2,4,5-Trichlorophenol	196	8.442	8.437	0.005	96	603837	40.0	39.8	
76 1,1'-Biphenyl	154	8.581	8.581	0.000	94	2167016	40.0	38.2	
77 2-Chloronaphthalene	162	8.613	8.613	0.000	95	1752043	40.0	38.1	
79 2-Nitroaniline	65	8.693	8.693	0.000	88	513568	40.0	40.9	
82 Dimethyl phthalate	163	8.853	8.854	-0.001	99	1935335	40.0	39.5	
83 1,3-Dinitrobenzene	168	8.885	8.886	-0.001	88	320443	40.0	42.4	
84 2,6-Dinitrotoluene	165	8.917	8.912	0.005	96	451904	40.0	39.6	
85 Acenaphthylene	152	9.014	9.014	0.000	98	2699988	40.0	38.9	
86 3-Nitroaniline	138	9.083	9.078	0.005	97	536724	40.0	41.7	
87 2,4-Dinitrophenol	184	9.179	9.179	0.000	67	547604	80.0	94.6	
88 Acenaphthene	153	9.179	9.179	0.000	89	1648654	40.0	35.2	
89 4-Nitrophenol	109	9.222	9.217	0.005	87	451808	80.0	83.0	
91 2,4-Dinitrotoluene	165	9.302	9.302	0.000	95	619758	40.0	40.9	
93 Dibenzofuran	168	9.345	9.340	0.005	98	2536147	40.0	38.6	
95 2,3,5,6-Tetrachlorophenol	232	9.414	9.414	0.000	93	521851	40.0	40.8	
96 2,3,4,6-Tetrachlorophenol	232	9.457	9.452	0.005	71	515304	40.0	41.1	
97 2-Naphthylamine	143	9.489	9.484	0.005	97	1879136	40.0	39.2	
98 Diethyl phthalate	149	9.521	9.516	0.005	99	1735803	40.0	37.9	
99 Hexadecane	57	9.526	9.527	-0.001	91	1243624	40.0	34.9	
100 4-Chlorophenyl phenyl ethe	204	9.655	9.655	0.000	89	1042268	40.0	38.9	
101 4-Nitroaniline	138	9.665	9.666	-0.001	89	503011	40.0	39.9	
103 Fluorene	166	9.676	9.671	0.005	95	1978080	40.0	38.0	
104 4,6-Dinitro-2-methylphenol	198	9.697	9.698	-0.001	92	773164	80.0	89.5	
105 N-Nitrosodiphenylamine	169	9.762	9.762	0.000	66	1581935	40.0	39.2	
90 1,2-Diphenylhydrazine	77	9.804	9.804	0.000	98	2188172	40.0	38.5	
57 Azobenzene	77	9.804	9.804	0.000	98	2188172	40.0	38.5	
110 4-Bromophenyl phenyl ether	248	10.125	10.125	0.000	65	594089	40.0	39.5	
112 Hexachlorobenzene	284	10.210	10.210	0.000	94	548219	40.0	38.8	
113 Atrazine	200	10.248	10.243	0.006	94	566267	40.0	40.2	
116 Pentachlorophenol	266	10.387	10.381	0.006	93	690467	80.0	81.5	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.397	10.397	0.000	94	1350707	40.0	37.5	
121 Phenanthrene	178	10.616	10.611	0.005	97	3058407	40.0	39.1	
122 Anthracene	178	10.664	10.665	-0.001	97	3190835	40.0	39.3	
124 Carbazole	167	10.814	10.814	0.000	95	2962799	40.0	39.4	
126 Di-n-butyl phthalate	149	11.145	11.140	0.005	100	3362298	40.0	40.0	
131 Fluoranthene	202	12.011	12.005	0.006	98	3396708	40.0	39.6	
132 Benzidine	184	12.150	12.150	0.000	100	1771302	40.0	45.6	
133 Pyrene	202	12.331	12.331	0.000	97	3464304	40.0	40.1	
138 Butyl benzyl phthalate	149	13.255	13.250	0.005	98	1393596	40.0	40.4	
144 3,3'-Dichlorobenzidine	252	14.238	14.233	0.005	74	1091724	40.0	42.7	
145 Bis(2-ethylhexyl) phthalat	149	14.297	14.297	0.000	97	1788805	40.0	40.4	
146 Benzo[a]anthracene	228	14.313	14.308	0.005	99	2975905	40.0	39.6	
147 Chrysene	228	14.383	14.377	0.006	98	2881623	40.0	40.2	
150 Di-n-octyl phthalate	149	15.601	15.595	0.006	99	3143808	40.0	38.3	
151 7,12-Dimethylbenz(a)anthra	256	16.429	16.423	0.006	93	1366843	40.0	40.5	
152 Benzo[b]fluoranthene	252	16.450	16.440	0.010	99	2857774	40.0	39.5	
153 Benzo[k]fluoranthene	252	16.503	16.493	0.010	99	2897157	40.0	40.7	
219 Benzo[e]pyrene	252	17.000	16.995	0.005	0	2679039	40.0	40.0	
154 Benzo[a]pyrene	252	17.102	17.097	0.005	81	2654259	40.0	39.4	
157 Indeno[1,2,3-cd]pyrene	276	19.570	19.549	0.021	93	2700448	40.0	40.6	M
158 Dibenz(a,h)anthracene	278	19.602	19.591	0.011	91	2240452	40.0	40.3	
159 Benzo[g,h,i]perylene	276	20.248	20.233	0.016	95	2298339	40.0	40.4	
S 197 Methyl Phenols,Total	108				0		80.0	76.0	
S 199 Total Cresols	108				0		80.0	76.0	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

SVTAPSTD40i_00010 Amount Added: 1.00 Units: mL

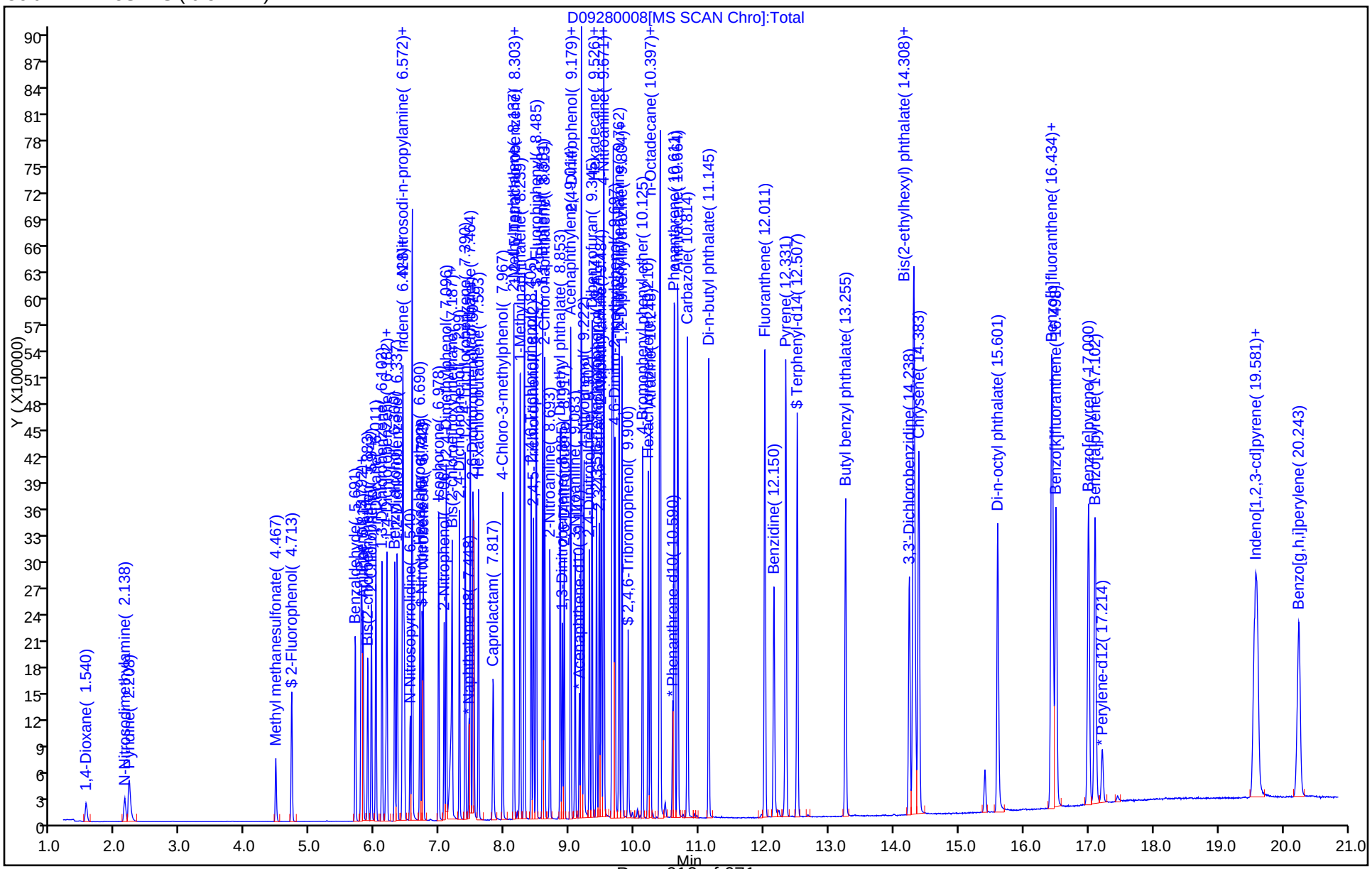
Report Date: 28-Sep-2016 10:33:58 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280008.D

Injection Date:	28-Sep-2016 07:44:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	IC			Worklist Smp#:	8
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	7
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

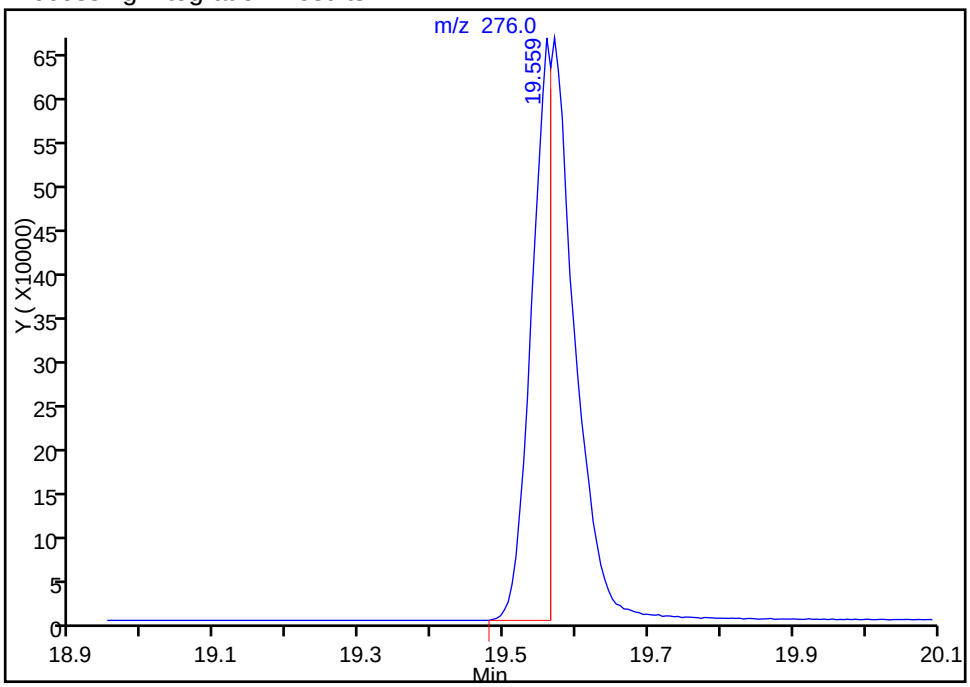
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280008.D				
Injection Date:	28-Sep-2016 07:44:30	Instrument ID:	CH732		
Lims ID:	IC				
Client ID:					
Operator ID:	003200	ALS Bottle#:	7	Worklist Smp#:	8
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

157 Indeno[1,2,3-cd]pyrene, CAS: 193-39-5

Signal: 1

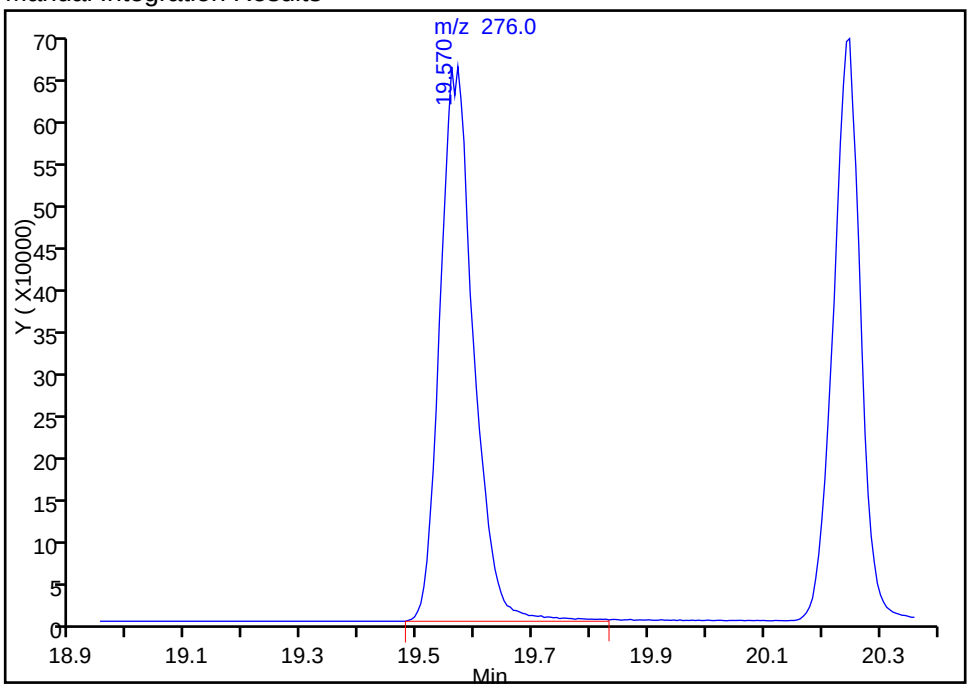
Processing Integration Results

RT: 19.56
Area: 1261695
Amount: 20.922223
Amount Units: ng



Manual Integration Results

RT: 19.57
Area: 2700448
Amount: 40.618878
Amount Units: ng



Reviewer: piccolinov, 28-Sep-2016 08:13:05

Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280009.D
Lims ID: IC
Client ID:
Sample Type: IC Calib Level: 7
Inject. Date: 28-Sep-2016 08:11:30 ALS Bottle#: 8 Worklist Smp#: 9
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-009
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:34:04 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 09:07:44

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.166	6.161	0.005	93	108265	8.00	8.00	
* 2 Naphthalene-d8	136	7.448	7.443	0.005	99	483910	8.00	8.00	
* 3 Acenaphthene-d10	164	9.153	9.147	0.005	92	326742	8.00	8.00	
* 4 Phenanthrene-d10	188	10.590	10.584	0.006	97	584354	8.00	8.00	
* 5 Chrysene-d12	240	14.345	14.324	0.021	96	533424	8.00	8.00	
* 6 Perylene-d12	264	17.219	17.209	0.010	95	457606	8.00	8.00	
$ 7 2-Fluorophenol	112	4.713	4.713	0.000	91	782287	60.0	58.1	
$ 8 Phenol-d5	99	5.782	5.776	0.006	99	1176888	60.0	57.7	
$ 9 Nitrobenzene-d5	82	6.727	6.722	0.005	87	1129531	60.0	58.1	
$ 10 2-Fluorobiphenyl	172	8.485	8.485	0.000	100	2724827	60.0	53.8	
$ 11 2,4,6-Tribromophenol	330	9.906	9.901	0.005	91	310002	60.0	63.7	
$ 12 Terphenyl-d14	244	12.513	12.508	0.005	98	3269300	60.0	59.7	
13 1,4-Dioxane	88	1.534	1.545	-0.011	91	238886	60.0	59.8	
14 N-Nitrosodimethylamine	74	2.138	2.138	0.000	94	335523	60.0	58.5	
15 Pyridine	79	2.197	2.213	-0.016	97	615341	60.0	59.6	
21 Methyl methanesulfonate	80	4.467	4.468	-0.001	87	455848	60.0	62.0	
25 Benzaldehyde	77	5.696	5.691	0.005	95	593416	60.0	52.6	
26 Phenol	94	5.798	5.792	0.006	98	1232805	60.0	55.4	
27 Aniline	93	5.814	5.814	0.000	91	1329090	60.0	58.1	
29 Bis(2-chloroethyl)ether	93	5.883	5.883	0.000	96	945161	60.0	56.6	
30 2-Chlorophenol	128	5.942	5.942	0.000	96	988359	60.0	56.6	
31 n-Decane	43	6.011	6.011	0.000	89	893879	60.0	52.1	
32 1,3-Dichlorobenzene	146	6.107	6.102	0.005	98	1144254	60.0	55.2	
33 1,4-Dichlorobenzene	146	6.182	6.182	0.000	94	1159419	60.0	55.3	
34 Benzyl alcohol	108	6.305	6.300	0.005	93	659275	60.0	58.9	
35 1,2-Dichlorobenzene	146	6.342	6.337	0.005	98	1136577	60.0	55.6	
36 2-Methylphenol	108	6.423	6.417	0.006	95	858828	60.0	54.4	
37 Indene	116	6.433	6.428	0.005	91	1621310	60.0	52.3	
38 2,2'-oxybis[1-chloropropan	45	6.449	6.444	0.005	95	1239959	60.0	53.1	
39 N-Nitrosopyrrolidine	100	6.545	6.535	0.010	94	506440	60.0	61.4	
40 Acetophenone	105	6.572	6.567	0.005	93	1193748	60.0	51.4	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.572	6.567	0.005	79	813972	60.0	50.4	
41 N-Nitrosodi-n-propylamine	70	6.572	6.567	0.005	79	567938	60.0	49.5	
45 Hexachloroethane	117	6.690	6.690	0.000	96	498264	60.0	56.2	
46 Nitrobenzene	77	6.743	6.743	0.000	86	1107918	60.0	57.2	
48 Isophorone	82	6.978	6.978	0.000	99	2111014	60.0	58.1	
49 2-Nitrophenol	139	7.064	7.064	0.000	92	614434	60.0	60.3	
50 2,4-Dimethylphenol	107	7.096	7.096	0.000	95	1046610	60.0	56.7	
52 Benzoic acid	122	7.181	7.139	0.042	89	637010	60.0	62.6	
53 Bis(2-chloroethoxy)methane	93	7.187	7.187	0.000	99	1305705	60.0	55.1	
54 2,4-Dichlorophenol	162	7.299	7.299	0.000	93	981341	60.0	58.3	
56 1,2,4-Trichlorobenzene	180	7.390	7.390	0.000	93	1114551	60.0	55.4	
58 Naphthalene	128	7.470	7.465	0.005	97	3311597	60.0	54.9	
59 4-Chloroaniline	127	7.512	7.507	0.005	97	1441021	60.0	57.5	
60 2,6-Dichlorophenol	162	7.523	7.518	0.005	97	933013	60.0	56.6	
62 Hexachlorobutadiene	225	7.593	7.593	0.000	95	648712	60.0	57.1	
64 Caprolactam	113	7.828	7.806	0.022	81	387679	60.0	66.4	
67 4-Chloro-3-methylphenol	107	7.972	7.961	0.011	96	1005130	60.0	59.5	
69 2-Methylnaphthalene	142	8.143	8.138	0.005	94	2323111	60.0	55.6	
71 1-Methylnaphthalene	142	8.239	8.234	0.005	94	2177899	60.0	55.0	
72 Hexachlorocyclopentadiene	237	8.298	8.298	0.000	95	704128	60.0	58.2	
73 1,2,4,5-Tetrachlorobenzene	216	8.308	8.303	0.005	96	1119068	60.0	52.4	
74 2,4,6-Trichlorophenol	196	8.410	8.405	0.005	91	815899	60.0	58.4	
75 2,4,5-Trichlorophenol	196	8.442	8.437	0.005	96	847004	60.0	58.9	
76 1,1'-Biphenyl	154	8.586	8.581	0.005	94	2908847	60.0	54.0	
77 2-Chloronaphthalene	162	8.618	8.613	0.005	94	2322222	60.0	53.2	
79 2-Nitroaniline	65	8.698	8.693	0.005	87	720959	60.0	60.6	
82 Dimethyl phthalate	163	8.859	8.854	0.005	99	2683067	60.0	57.7	
83 1,3-Dinitrobenzene	168	8.891	8.886	0.005	87	459982	60.0	64.2	
84 2,6-Dinitrotoluene	165	8.917	8.912	0.005	97	639209	60.0	59.1	
85 Acenaphthylene	152	9.019	9.014	0.005	99	3657793	60.0	55.7	
86 3-Nitroaniline	138	9.088	9.078	0.010	97	761531	60.0	62.5	
87 2,4-Dinitrophenol	184	9.185	9.179	0.006	68	794024	120.0	144.7	
88 Acenaphthene	153	9.185	9.179	0.006	88	2155050	60.0	48.6	
89 4-Nitrophenol	109	9.227	9.217	0.010	86	662771	120.0	128.5	
91 2,4-Dinitrotoluene	165	9.307	9.302	0.005	96	888551	60.0	61.9	
93 Dibenzofuran	168	9.345	9.340	0.005	97	3412591	60.0	54.8	
95 2,3,5,6-Tetrachlorophenol	232	9.420	9.414	0.006	92	754574	60.0	62.2	
96 2,3,4,6-Tetrachlorophenol	232	9.457	9.452	0.005	71	724464	60.0	60.9	
97 2-Naphthylamine	143	9.489	9.484	0.005	97	2572013	60.0	56.6	
98 Diethyl phthalate	149	9.526	9.516	0.010	99	2354938	60.0	54.2	
99 Hexadecane	57	9.532	9.527	0.005	91	1521552	60.0	46.7	
100 4-Chlorophenyl phenyl ethe	204	9.655	9.655	0.000	90	1442080	60.0	56.8	
101 4-Nitroaniline	138	9.671	9.666	0.005	88	687696	60.0	57.6	
103 Fluorene	166	9.676	9.671	0.005	95	2677009	60.0	54.3	
104 4,6-Dinitro-2-methylphenol	198	9.703	9.698	0.005	92	1114076	120.0	134.1	
105 N-Nitrosodiphenylamine	169	9.767	9.762	0.005	59	2232895	60.0	57.5	
90 1,2-Diphenylhydrazine	77	9.810	9.804	0.006	97	3016301	60.0	55.2	
57 Azobenzene	77	9.810	9.804	0.006	97	3016301	60.0	55.2	
110 4-Bromophenyl phenyl ether	248	10.125	10.125	0.000	64	843341	60.0	58.3	
112 Hexachlorobenzene	284	10.216	10.210	0.006	94	764591	60.0	56.2	
113 Atrazine	200	10.253	10.243	0.011	94	792270	60.0	58.5	
116 Pentachlorophenol	266	10.392	10.381	0.011	93	987066	120.0	121.2	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.403	10.397	0.006	94	1726719	60.0	51.1	
121 Phenanthrene	178	10.616	10.611	0.005	97	4345835	60.0	57.8	
122 Anthracene	178	10.670	10.665	0.005	97	4552533	60.0	58.3	
124 Carbazole	167	10.819	10.814	0.005	95	4239011	60.0	58.6	
126 Di-n-butyl phthalate	149	11.145	11.140	0.005	100	4869978	60.0	60.3	
131 Fluoranthene	202	12.016	12.005	0.011	98	4935871	60.0	59.8	
132 Benzidine	184	12.155	12.150	0.005	99	2492957	60.0	63.3	
133 Pyrene	202	12.336	12.331	0.005	97	5043358	60.0	57.6	
138 Butyl benzyl phthalate	149	13.261	13.250	0.011	97	2082516	60.0	59.6	
144 3,3'-Dichlorobenzidine	252	14.249	14.233	0.016	67	1686601	60.0	65.1	
145 Bis(2-ethylhexyl) phthalat	149	14.308	14.297	0.011	95	2654467	60.0	59.2	
146 Benzo[a]anthracene	228	14.324	14.308	0.016	98	4415957	60.0	58.0	
147 Chrysene	228	14.393	14.377	0.016	95	4449818	60.0	61.2	
150 Di-n-octyl phthalate	149	15.611	15.595	0.016	99	4867828	60.0	57.3	
151 7,12-Dimethylbenz(a)anthra	256	16.445	16.423	0.022	74	2109082	60.0	60.4	
152 Benzo[b]fluoranthene	252	16.461	16.440	0.021	95	4474369	60.0	59.8	
153 Benzo[k]fluoranthene	252	16.514	16.493	0.021	95	4385602	60.0	59.5	
219 Benzo[e]pyrene	252	17.016	16.995	0.021	0	4137863	60.0	59.7	
154 Benzo[a]pyrene	252	17.123	17.097	0.026	75	4167589	60.0	59.7	
157 Indeno[1,2,3-cd]pyrene	276	19.591	19.549	0.042	91	4218376	60.0	61.3	
158 Dibenz(a,h)anthracene	278	19.623	19.591	0.032	73	3592365	60.0	62.4	
159 Benzo[g,h,i]perylene	276	20.264	20.233	0.032	94	3656329	60.0	62.0	
S 197 Methyl Phenols,Total	108				0		120.0	104.8	
S 199 Total Cresols	108				0		120.0	104.8	

Reagents:

SVTAPSTD60i_00010 Amount Added: 1.00 Units: mL

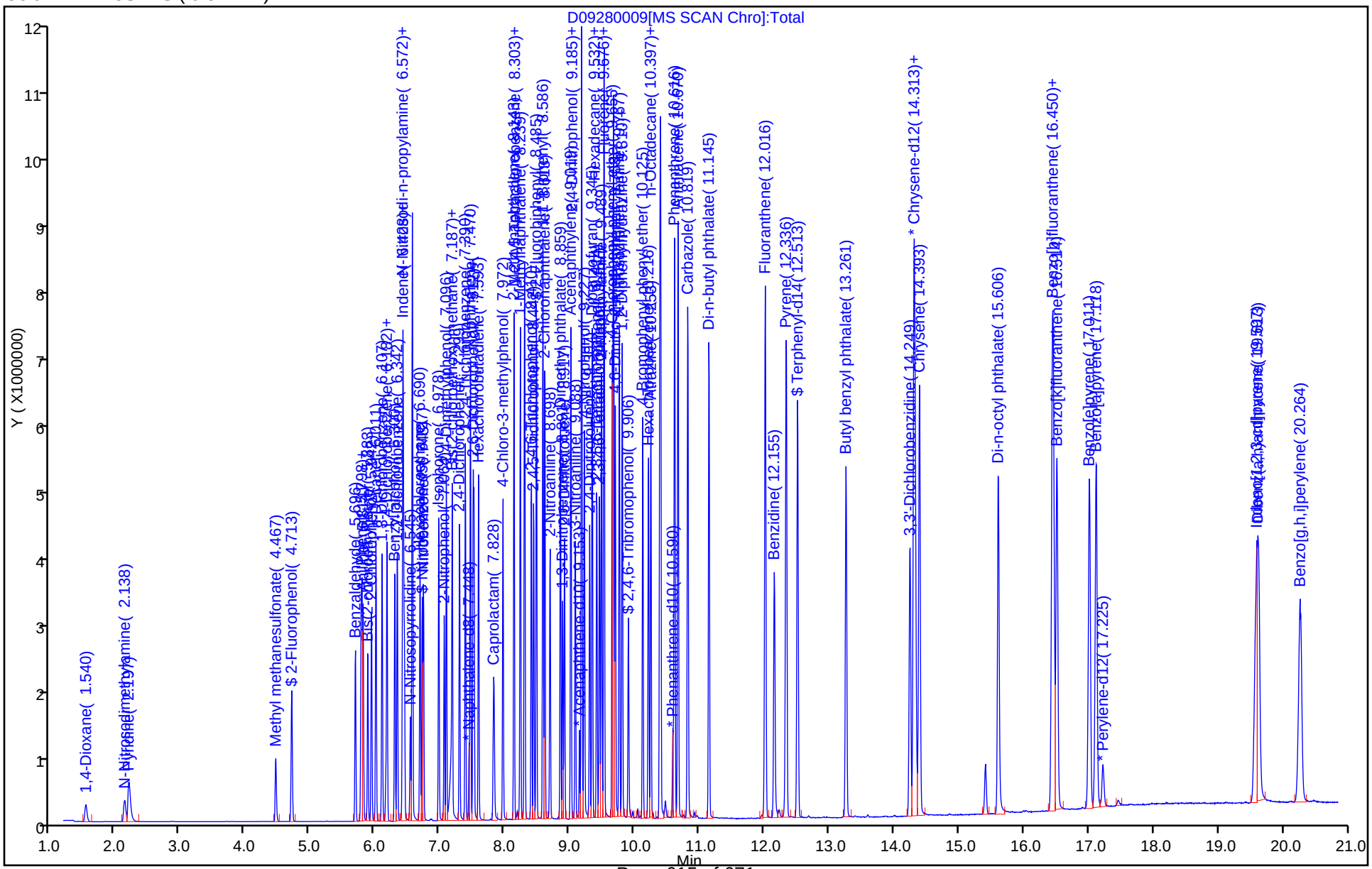
Report Date: 28-Sep-2016 10:34:05 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280009.D

Injection Date:	28-Sep-2016 08:11:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	IC			Worklist Smp#:	9
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	8
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D
Lims ID: IC
Client ID:
Sample Type: IC Calib Level: 8
Inject. Date: 28-Sep-2016 08:39:30 ALS Bottle#: 9 Worklist Smp#: 10
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-010
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:34:12 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 09:06:04

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.166	6.161	0.005	95	107053	8.00	8.00	
* 2 Naphthalene-d8	136	7.448	7.443	0.005	99	485566	8.00	8.00	
* 3 Acenaphthene-d10	164	9.153	9.147	0.006	92	326159	8.00	8.00	
* 4 Phenanthrene-d10	188	10.595	10.584	0.011	97	593579	8.00	8.00	
* 5 Chrysene-d12	240	14.345	14.324	0.021	97	524894	8.00	8.00	
* 6 Perylene-d12	264	17.230	17.209	0.021	95	444374	8.00	8.00	
$ 7 2-Fluorophenol	112	4.708	4.713	-0.005	92	1046877	80.0	78.7	
$ 8 Phenol-d5	99	5.782	5.776	0.006	99	1496463	80.0	74.2	
$ 9 Nitrobenzene-d5	82	6.727	6.722	0.005	87	1466092	80.0	75.1	
$ 10 2-Fluorobiphenyl	172	8.490	8.485	0.005	99	3462753	80.0	68.5	
$ 11 2,4,6-Tribromophenol	330	9.911	9.901	0.010	92	409478	80.0	82.8	
$ 12 Terphenyl-d14	244	12.518	12.508	0.010	99	4165441	80.0	77.3	
13 1,4-Dioxane	88	1.529	1.545	-0.016	91	320687	80.0	81.2	
14 N-Nitrosodimethylamine	74	2.128	2.138	-0.010	93	455105	80.0	80.0	
15 Pyridine	79	2.192	2.213	-0.021	98	851149	80.0	83.3	
21 Methyl methanesulfonate	80	4.468	4.468	0.000	87	600212	80.0	82.5	
25 Benzaldehyde	77	5.691	5.691	0.000	96	719944	80.0	64.5	
26 Phenol	94	5.798	5.792	0.006	98	1546910	80.0	70.3	
27 Aniline	93	5.814	5.814	0.000	98	1653840	80.0	73.1	
29 Bis(2-chloroethyl)ether	93	5.889	5.883	0.006	97	1232482	80.0	74.7	
30 2-Chlorophenol	128	5.942	5.942	0.000	96	1301010	80.0	75.3	
31 n-Decane	43	6.011	6.011	0.000	89	1133970	80.0	66.9	
32 1,3-Dichlorobenzene	146	6.108	6.102	0.006	98	1495129	80.0	73.0	
33 1,4-Dichlorobenzene	146	6.182	6.182	0.000	95	1501271	80.0	72.4	
34 Benzyl alcohol	108	6.305	6.300	0.005	94	866556	80.0	78.3	
35 1,2-Dichlorobenzene	146	6.343	6.337	0.006	98	1452194	80.0	71.8	
36 2-Methylphenol	108	6.428	6.417	0.011	92	1072835	80.0	68.7	
37 Indene	116	6.433	6.428	0.005	91	2026843	80.0	66.1	
38 2,2'-oxybis[1-chloropropan	45	6.449	6.444	0.005	95	1556035	80.0	67.4	
39 N-Nitrosopyrrolidine	100	6.546	6.535	0.011	94	663798	80.0	81.4	
40 Acetophenone	105	6.572	6.567	0.005	85	1472600	80.0	64.2	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
42 4-Methylphenol	108	6.578	6.567	0.011	74	1054569	80.0	66.1	
41 N-Nitrosodi-n-propylamine	70	6.578	6.567	0.011	63	714007	80.0	63.0	
45 Hexachloroethane	117	6.690	6.690	0.000	96	633175	80.0	72.2	
46 Nitrobenzene	77	6.749	6.743	0.006	86	1423510	80.0	73.3	
48 Isophorone	82	6.984	6.978	0.006	99	2702671	80.0	74.2	
49 2-Nitrophenol	139	7.064	7.064	0.000	93	817219	80.0	80.0	
50 2,4-Dimethylphenol	107	7.101	7.096	0.005	94	1346849	80.0	72.7	
52 Benzoic acid	122	7.197	7.139	0.058	88	898095	80.0	88.0	
53 Bis(2-chloroethoxy)methane	93	7.192	7.187	0.005	99	1661027	80.0	69.8	
54 2,4-Dichlorophenol	162	7.304	7.299	0.005	92	1265954	80.0	75.0	
56 1,2,4-Trichlorobenzene	180	7.390	7.390	0.000	94	1423856	80.0	70.6	
58 Naphthalene	128	7.470	7.465	0.005	97	4195638	80.0	69.3	
59 4-Chloroaniline	127	7.513	7.507	0.006	97	1834688	80.0	73.0	
60 2,6-Dichlorophenol	162	7.529	7.518	0.011	98	1177279	80.0	71.1	
62 Hexachlorobutadiene	225	7.593	7.593	0.000	95	840675	80.0	73.8	
64 Caprolactam	113	7.838	7.806	0.032	82	499273	80.0	85.2	
67 4-Chloro-3-methylphenol	107	7.972	7.961	0.011	96	1296273	80.0	76.5	
69 2-Methylnaphthalene	142	8.143	8.138	0.005	93	2926046	80.0	69.8	
71 1-Methylnaphthalene	142	8.239	8.234	0.005	94	2765477	80.0	69.6	
72 Hexachlorocyclopentadiene	237	8.303	8.298	0.005	94	900121	80.0	74.5	
73 1,2,4,5-Tetrachlorobenzene	216	8.309	8.303	0.006	96	1400122	80.0	65.6	
74 2,4,6-Trichlorophenol	196	8.410	8.405	0.005	91	1068974	80.0	76.6	
75 2,4,5-Trichlorophenol	196	8.447	8.437	0.010	95	1096275	80.0	76.4	
76 1,1'-Biphenyl	154	8.586	8.581	0.005	94	3676144	80.0	68.4	
77 2-Chloronaphthalene	162	8.618	8.613	0.005	95	2978253	80.0	68.4	
79 2-Nitroaniline	65	8.699	8.693	0.006	87	939450	80.0	79.1	
82 Dimethyl phthalate	163	8.859	8.854	0.005	100	3442526	80.0	74.2	
83 1,3-Dinitrobenzene	168	8.896	8.886	0.010	89	605737	80.0	84.7	
84 2,6-Dinitrotoluene	165	8.923	8.912	0.011	96	829004	80.0	76.8	
85 Acenaphthylene	152	9.019	9.014	0.005	99	4628682	80.0	70.6	
86 3-Nitroaniline	138	9.089	9.078	0.011	97	995213	80.0	81.8	
87 2,4-Dinitrophenol	184	9.190	9.179	0.011	84	1013407	160.0	185.1	
88 Acenaphthene	153	9.185	9.179	0.006	92	2681240	80.0	60.5	
89 4-Nitrophenol	109	9.227	9.217	0.010	86	854537	160.0	166.0	
91 2,4-Dinitrotoluene	165	9.313	9.302	0.011	96	1158279	80.0	80.8	
93 Dibenzofuran	168	9.350	9.340	0.010	97	4324011	80.0	69.6	
95 2,3,5,6-Tetrachlorophenol	232	9.420	9.414	0.006	92	977797	80.0	80.8	
96 2,3,4,6-Tetrachlorophenol	232	9.462	9.452	0.010	70	966231	80.0	81.4	
97 2-Naphthylamine	143	9.495	9.484	0.011	97	3247703	80.0	71.6	
98 Diethyl phthalate	149	9.527	9.516	0.011	99	2910101	80.0	67.1	
99 Hexadecane	57	9.537	9.527	0.010	91	1808651	80.0	55.3	
100 4-Chlorophenyl phenyl ethe	204	9.660	9.655	0.005	87	1839824	80.0	72.6	
101 4-Nitroaniline	138	9.676	9.666	0.010	78	855264	80.0	71.7	
103 Fluorene	166	9.676	9.671	0.005	95	3365563	80.0	68.3	
104 4,6-Dinitro-2-methylphenol	198	9.708	9.698	0.010	93	1487532	160.0	176.2	
105 N-Nitrosodiphenylamine	169	9.767	9.762	0.005	59	2859188	80.0	72.5	
90 1,2-Diphenylhydrazine	77	9.810	9.804	0.006	97	3753343	80.0	67.6	
57 Azobenzene	77	9.810	9.804	0.006	97	3753343	80.0	67.6	
110 4-Bromophenyl phenyl ether	248	10.130	10.125	0.005	63	1089543	80.0	74.2	
112 Hexachlorobenzene	284	10.216	10.210	0.006	94	996723	80.0	72.2	
113 Atrazine	200	10.253	10.243	0.011	95	996796	80.0	72.5	
116 Pentachlorophenol	266	10.392	10.381	0.011	93	1252437	160.0	151.3	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.403	10.397	0.006	94	2047551	80.0	61.3	
121 Phenanthrene	178	10.622	10.611	0.011	97	5489584	80.0	71.9	
122 Anthracene	178	10.675	10.665	0.010	97	5694856	80.0	71.7	
124 Carbazole	167	10.825	10.814	0.011	95	5351682	80.0	72.8	
126 Di-n-butyl phthalate	149	11.151	11.140	0.011	100	6113667	80.0	74.5	
131 Fluoranthene	202	12.016	12.005	0.011	98	6243665	80.0	74.5	
132 Benzidine	184	12.160	12.150	0.010	99	3061966	80.0	79.0	
133 Pyrene	202	12.342	12.331	0.011	97	6350780	80.0	73.7	
138 Butyl benzyl phthalate	149	13.266	13.250	0.016	97	2666094	80.0	77.6	
144 3,3'-Dichlorobenzidine	252	14.254	14.233	0.021	66	2176920	80.0	85.4	
145 Bis(2-ethylhexyl) phthalat	149	14.308	14.297	0.011	95	3345932	80.0	75.8	
146 Benzo[a]anthracene	228	14.329	14.308	0.021	96	5679084	80.0	75.8	
147 Chrysene	228	14.399	14.377	0.022	94	5611426	80.0	78.4	
150 Di-n-octyl phthalate	149	15.617	15.595	0.022	99	6269452	80.0	76.0	
151 7,12-Dimethylbenz(a)anthra	256	16.450	16.423	0.027	75	2678227	80.0	78.9	
152 Benzo[b]fluoranthene	252	16.472	16.440	0.032	94	5644866	80.0	77.7	
153 Benzo[k]fluoranthene	252	16.520	16.493	0.027	94	5723698	80.0	80.0	
219 Benzo[e]pyrene	252	17.022	16.995	0.027	0	5351502	80.0	79.5	
154 Benzo[a]pyrene	252	17.129	17.097	0.032	73	5362195	80.0	79.1	
157 Indeno[1,2,3-cd]pyrene	276	19.602	19.549	0.053	95	5321311	80.0	79.6	
158 Dibenz(a,h)anthracene	278	19.629	19.591	0.038	71	4528365	80.0	81.0	
159 Benzo[g,h,i]perylene	276	20.281	20.233	0.049	93	4603726	80.0	80.4	
S 197 Methyl Phenols,Total	108				0		160.0	134.7	
S 199 Total Cresols	108				0		160.0	134.7	

Reagents:

SVTAPSTD80i_00010 Amount Added: 1.00 Units: mL

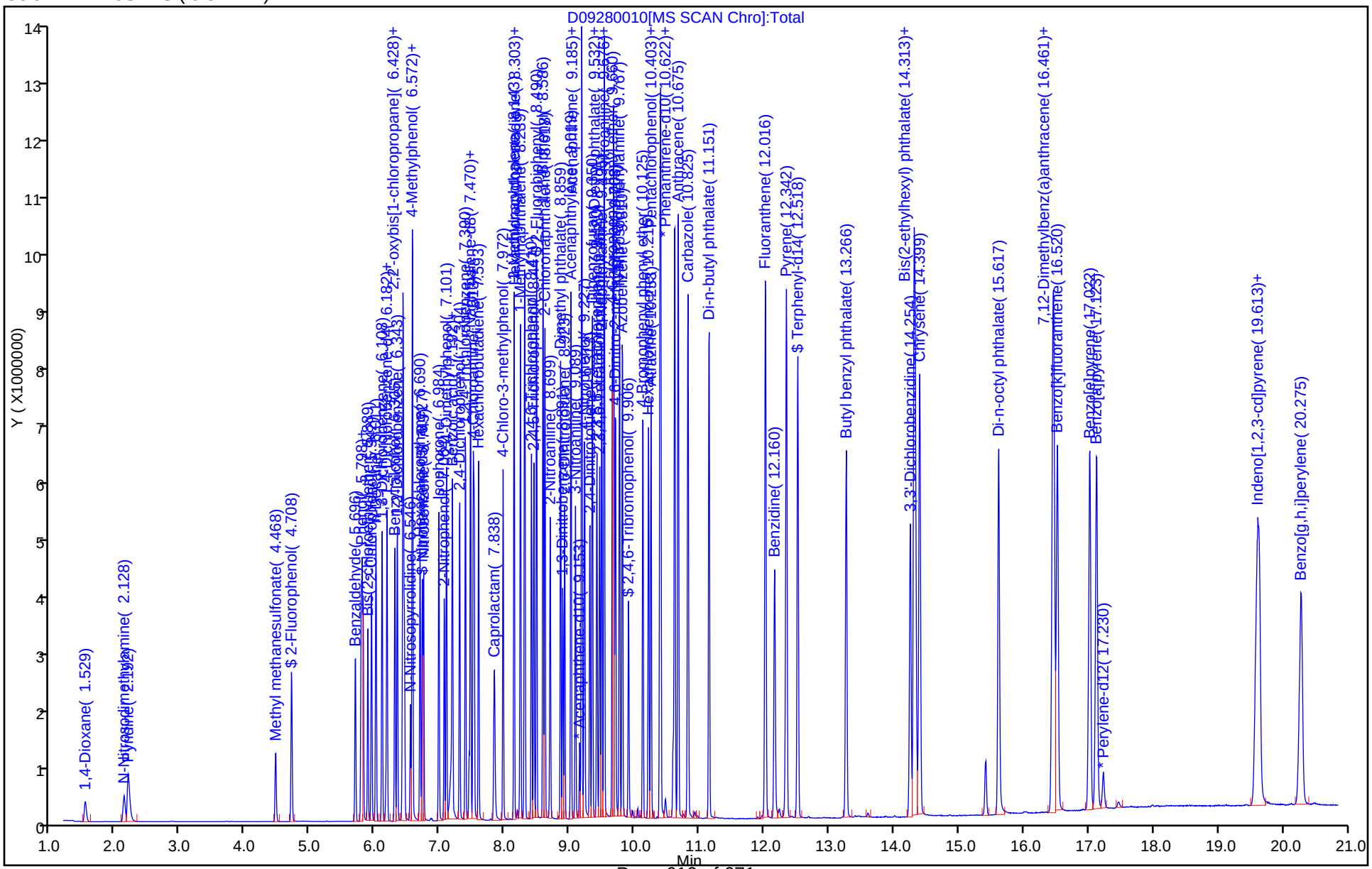
Report Date: 28-Sep-2016 10:34:13 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Injection Date:	28-Sep-2016 08:39:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	IC			Worklist Smp#:	10
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	9
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



FORM VII
GC/MS SEMI VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191892/3 Calibration Date: 10/21/2016 11:50

Instrument ID: CH732 Calib Start Date: 09/28/2016 05:28

GC Column: Rxi-5SilMS ID: 0.32(mm) Calib End Date: 09/28/2016 08:39

Lab File ID: D10210003.D Conc. Units: ng/uL

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
1,4-Dioxane	Ave	0.2951	0.3403	0.0100	5.76	5.00	15.3	20.0
N-Nitrosodimethylamine	Lin1		0.4792	0.0100	5.96	5.00	19.1	20.0
Pyridine	Ave	0.7632	0.8778	0.0100	5.75	5.00	15.0	20.0
Methyl methanesulfonate	Ave	0.5436	0.6071	0.0100	5.58	5.00	11.7	20.0
Benzaldehyde	Ave	0.8340	0.9483	0.0100	5.68	5.00	13.7	20.0
Phenol	Ave	1.644	1.770	0.8000	5.38	5.00	7.7	20.0
Aniline	Ave	1.691	2.001	0.0100	5.92	5.00	18.4	20.0
Bis(2-chloroethyl)ether	Ave	1.233	1.243	0.7000	5.04	5.00	0.8	20.0
2-Chlorophenol	Ave	1.291	1.311	0.8000	5.08	5.00	1.6	20.0
n-Decane	Ave	1.267	1.352		5.34	5.00	6.7	20.0
1,3-Dichlorobenzene	Ave	1.530	1.562	0.0100	5.10	5.00	2.1	20.0
1,4-Dichlorobenzene	Ave	1.550	1.543	0.0100	4.98	5.00	-0.5	20.0
Benzyl alcohol	Ave	0.8269	0.8299	0.0100	5.02	5.00	0.4	20.0
1,2-Dichlorobenzene	Ave	1.511	1.521	0.0100	5.03	5.00	0.7	20.0
2-Methylphenol	Ave	1.168	1.219	0.7000	5.22	5.00	4.4	20.0
Indene	Ave	2.291	2.330	0.0100	5.09	5.00	1.7	20.0
2,2'-oxybis[1-chloropropane]	Ave	1.726	1.945	0.0100	5.64	5.00	12.7	20.0
N-Nitrosopyrrolidine	Ave	0.6094	0.5779	0.0100	4.74	5.00	-5.2	20.0
Methylphenol, 3 & 4	Ave	1.193	1.256	0.6000	5.27	5.00	5.3	20.0
Acetophenone	Ave	1.715	1.817	0.0100	5.30	5.00	5.9	20.0
N-Nitrosodi-n-propylamine	Ave	0.8471	0.9191	0.5000	5.43	5.00	8.5	20.0
Hexachloroethane	Ave	0.6553	0.6247	0.3000	4.77	5.00	-4.7	20.0
Nitrobenzene	Ave	0.3200	0.3374	0.2000	5.27	5.00	5.4	20.0
Isophorone	Ave	0.6005	0.6175	0.4000	5.14	5.00	2.8	20.0
2-Nitrophenol	Ave	0.1683	0.1733	0.1000	5.15	5.00	3.0	20.0
2,4-Dimethylphenol	Ave	0.3051	0.3266	0.2000	5.35	5.00	7.1	20.0
Benzoic acid	Ave	0.1682	0.2185	0.0100	6.50	5.00	29.9*	20.0
Bis(2-chloroethoxy)methane	Ave	0.3921	0.3822	0.3000	4.87	5.00	-2.5	20.0
2,4-Dichlorophenol	Ave	0.2782	0.2874	0.2000	5.17	5.00	3.3	20.0
1,2,4-Trichlorobenzene	Ave	0.3324	0.3398	0.0100	5.11	5.00	2.2	20.0
Naphthalene	Ave	0.997	0.9876	0.7000	4.95	5.00	-0.9	20.0
4-Chloroaniline	Ave	0.4141	0.4165	0.0100	5.03	5.00	0.6	20.0
2,6-Dichlorophenol	Ave	0.2727	0.2791	0.0100	5.12	5.00	2.3	20.0
Hexachlorobutadiene	Ave	0.1877	0.1981	0.0100	5.28	5.00	5.5	20.0
Caprolactam	Ave	0.0966	0.1081	0.0100	5.60	5.00	12.0	20.0
4-Chloro-3-methylphenol	Ave	0.2793	0.2948	0.2000	5.28	5.00	5.5	20.0
2-Methylnaphthalene	Ave	0.6903	0.7016	0.4000	5.08	5.00	1.6	20.0
1-Methylnaphthalene	Ave	0.6545	0.6562	0.0100	5.01	5.00	0.3	20.0
Hexachlorocyclopentadiene	Ave	0.2963	0.3167	0.0500	5.34	5.00	6.9	20.0
1,2,4,5-Tetrachlorobenzene	Ave	0.5232	0.5162	0.0100	4.93	5.00	-1.3	20.0
2,4,6-Trichlorophenol	Ave	0.3424	0.3535	0.2000	5.16	5.00	3.3	20.0

FORM VII
GC/MS SEMI VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191892/3 Calibration Date: 10/21/2016 11:50

Instrument ID: CH732 Calib Start Date: 09/28/2016 05:28

GC Column: Rxi-5SilMS ID: 0.32(mm) Calib End Date: 09/28/2016 08:39

Lab File ID: D10210003.D Conc. Units: ng/uL

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
2,4,5-Trichlorophenol	Ave	0.3521	0.3608	0.2000	5.12	5.00	2.5	20.0
1,1'-Biphenyl	Ave	1.318	1.304	0.0100	4.95	5.00	-1.1	20.0
2-Chloronaphthalene	Ave	1.068	1.037	0.8000	4.85	5.00	-2.9	20.0
2-Nitroaniline	Ave	0.2912	0.3010	0.0100	5.17	5.00	3.4	20.0
Dimethyl phthalate	Ave	1.138	1.166	0.0100	5.12	5.00	2.4	20.0
1,3-Dinitrobenzene	Ave	0.1755	0.1761	0.0100	5.02	5.00	0.3	20.0
2,6-Dinitrotoluene	Ave	0.2649	0.2656	0.2000	5.01	5.00	0.3	20.0
Acenaphthylene	Ave	1.609	1.622	0.9000	5.04	5.00	0.8	20.0
3-Nitroaniline	Ave	0.2985	0.2970	0.0100	4.98	5.00	-0.5	20.0
2,4-Dinitrophenol	Ave	0.1343	0.1542	0.0100	11.5	10.0	14.8	20.0
Acenaphthene	Ave	1.087	1.040	0.9000	4.79	5.00	-4.3	20.0
4-Nitrophenol	Ave	0.1263	0.1441	0.0100	11.4	10.0	14.1	20.0
2,4-Dinitrotoluene	Ave	0.3517	0.3667	0.2000	5.21	5.00	4.3	20.0
Dibenzofuran	Ave	1.524	1.549	0.8000	5.08	5.00	1.7	20.0
2,3,5,6-Tetrachlorophenol	Ave	0.2968	0.3087	0.0100	5.20	5.00	4.0	20.0
2,3,4,6-Tetrachlorophenol	Ave	0.2911	0.3037	0.0100	5.22	5.00	4.4	20.0
2-Naphthylamine	Ave	1.113	1.134	0.0100	5.10	5.00	1.9	20.0
Diethyl phthalate	Ave	1.064	1.139	0.0100	5.35	5.00	7.0	20.0
Hexadecane	Ave	0.5391	0.5587		5.18	5.00	3.6	20.0
4-Chlorophenyl phenyl ether	Ave	0.6215	0.6309	0.4000	5.08	5.00	1.5	20.0
4-Nitroaniline	Ave	0.2925	0.3133	0.0100	5.36	5.00	7.1	20.0
Fluorene	Ave	1.208	1.252	0.9000	5.18	5.00	3.6	20.0
4,6-Dinitro-2-methylphenol	Ave	0.1138	0.1141	0.0100	10.0	10.0	0.3	20.0
N-Nitrosodiphenylamine	Ave	0.5317	0.4968	0.0100	4.67	5.00	-6.6	20.0
1,2-Diphenylhydrazine(as Azobenzene)	Ave	0.7480	0.8059	0.0100	5.39	5.00	7.7	20.0
4-Bromophenyl phenyl ether	Ave	0.1979	0.1901	0.1000	4.80	5.00	-3.9	20.0
Hexachlorobenzene	Ave	0.1861	0.1756	0.1000	4.72	5.00	-5.7	20.0
Atrazine	Ave	0.1853	0.1957	0.0100	5.28	5.00	5.6	20.0
Pentachlorophenol	Ave	0.1115	0.1141	0.0500	10.2	10.0	2.3	20.0
n-Octadecane	Ave	2.495	2.706		5.42	5.00	8.5	20.0
Phenanthrene	Ave	1.029	0.998	0.7000	4.85	5.00	-3.0	20.0
Anthracene	Ave	1.070	1.035	0.7000	4.84	5.00	-3.3	20.0
Carbazole	Ave	0.9911	0.9598	0.0100	4.84	5.00	-3.2	20.0
Di-n-butyl phthalate	Ave	1.106	1.135	0.0100	5.13	5.00	2.7	20.0
Fluoranthene	Ave	1.130	1.171	0.6000	5.18	5.00	3.7	20.0
Benzidine	Ave	0.5906	0.5992	0.0100	5.07	5.00	1.5	20.0
Pyrene	Ave	1.313	1.230	0.6000	4.68	5.00	-6.3	20.0
Butyl benzyl phthalate	Ave	0.5237	0.5079	0.0100	4.85	5.00	-3.0	20.0
3,3'-Dichlorobenzidine	Ave	0.3887	0.3893	0.0100	5.01	5.00	0.2	20.0
Bis(2-ethylhexyl) phthalate	Ave	0.6729	0.6779	0.0100	5.04	5.00	0.7	20.0

FORM VII
GC/MS SEMI VOA CONTINUING CALIBRATION DATA

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Lab Sample ID: CCVIS 180-191892/3 Calibration Date: 10/21/2016 11:50

Instrument ID: CH732 Calib Start Date: 09/28/2016 05:28

GC Column: Rxi-5SilMS ID: 0.32(mm) Calib End Date: 09/28/2016 08:39

Lab File ID: D10210003.D Conc. Units: ng/uL

ANALYTE	CURVE TYPE	AVE RRF	RRF	MIN RRF	CALC AMOUNT	SPIKE AMOUNT	%D	MAX %D
Benzo[a]anthracene	Ave	1.142	1.089	0.8000	4.76	5.00	-4.7	20.0
Chrysene	Ave	1.091	1.049	0.7000	4.81	5.00	-3.9	20.0
Di-n-octyl phthalate	Ave	1.486	1.335	0.0100	4.49	5.00	-10.2	20.0
7,12-Dimethylbenz(a)anthracene	Ave	0.6109	0.5535	0.0100	4.53	5.00	-9.4	20.0
Benzo[b]fluoranthene	Ave	1.308	1.221	0.7000	4.66	5.00	-6.7	20.0
Benzo[k]fluoranthene	Ave	1.288	1.209	0.7000	4.69	5.00	-6.1	20.0
Benzo[e]pyrene	Ave	1.212	1.135	0.0100	4.68	5.00	-6.4	20.0
Benzo[a]pyrene	Ave	1.220	1.157	0.7000	4.74	5.00	-5.2	20.0
Indeno[1,2,3-cd]pyrene	Ave	1.203	1.149	0.5000	4.77	5.00	-4.5	20.0
Dibenz(a,h)anthracene	Ave	1.007	0.9465	0.4000	4.70	5.00	-6.0	20.0
Benzo[g,h,i]perylene	Ave	1.031	0.9921	0.5000	4.81	5.00	-3.8	20.0
2-Fluorophenol (Surr)	Ave	0.9941	1.097		5.52	5.00	10.3	20.0
Phenol-d5 (Surr)	Ave	1.507	1.626		5.39	5.00	7.8	20.0
Nitrobenzene-d5 (Surr)	Ave	0.3216	0.3387		5.27	5.00	5.3	20.0
2-Fluorobiphenyl	Ave	1.240	1.247		5.03	5.00	0.5	20.0
2,4,6-Tribromophenol (Surr)	Ave	0.0667	0.0683	0.0100	5.12	5.00	2.4	20.0
Terphenyl-d14 (Surr)	Ave	0.8216	0.7687		4.68	5.00	-6.4	20.0

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210003.D
Lims ID: CCVIS
Client ID:
Sample Type: CCVIS
Inject. Date: 21-Oct-2016 11:50:30 ALS Bottle#: 2 Worklist Smp#: 3
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-003
Operator ID: 003200 Instrument ID: CH732
Sublist: chrom-BNA_CH732*sub4

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 12:15:12

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.204	6.204	0.000	96	109561	8.00	8.00	
* 2 Naphthalene-d8	136	7.486	7.486	0.000	99	480957	8.00	8.00	
* 3 Acenaphthene-d10	164	9.190	9.190	0.000	92	326108	8.00	8.00	
* 4 Phenanthrene-d10	188	10.632	10.632	0.000	97	631553	8.00	8.00	
* 5 Chrysene-d12	240	14.399	14.399	0.000	97	608013	8.00	8.00	
* 6 Perylene-d12	264	17.283	17.283	0.000	96	523077	8.00	8.00	
$ 7 2-Fluorophenol	112	4.761	4.761	0.000	93	150232	10.0	11.0	
$ 8 Phenol-d5	99	5.819	5.819	0.000	98	222622	10.0	10.8	
$ 9 Nitrobenzene-d5	82	6.759	6.759	0.000	89	203633	10.0	10.5	
$ 10 2-Fluorobiphenyl	172	8.522	8.522	0.000	100	508156	10.0	10.1	
$ 11 2,4,6-Tribromophenol	330	9.943	9.943	0.000	89	53889	10.0	10.2	
$ 12 Terphenyl-d14	244	12.555	12.555	0.000	99	584235	10.0	9.36	
13 1,4-Dioxane	88	1.625	1.625	0.000	93	46600	10.0	11.5	
14 N-Nitrosodimethylamine	74	2.240	2.240	0.000	92	65629	10.0	11.9	
15 Pyridine	79	2.314	2.314	0.000	97	120220	10.0	11.5	
21 Methyl methanesulfonate	80	4.521	4.521	0.000	87	83146	10.0	11.2	
25 Benzaldehyde	77	5.739	5.739	0.000	95	129867	10.0	11.4	
26 Phenol	94	5.835	5.835	0.000	99	242359	10.0	10.8	
27 Aniline	93	5.856	5.856	0.000	98	274099	10.0	11.8	
29 Bis(2-chloroethyl)ether	93	5.926	5.926	0.000	96	170265	10.0	10.1	
30 2-Chlorophenol	128	5.985	5.985	0.000	97	179522	10.0	10.2	
31 n-Decane	43	6.049	6.049	0.000	90	185187	10.0	10.7	
32 1,3-Dichlorobenzene	146	6.145	6.145	0.000	99	213900	10.0	10.2	
33 1,4-Dichlorobenzene	146	6.225	6.225	0.000	95	211265	10.0	9.95	
34 Benzyl alcohol	108	6.342	6.342	0.000	92	113660	10.0	10.0	
35 1,2-Dichlorobenzene	146	6.380	6.380	0.000	97	208270	10.0	10.1	
36 2-Methylphenol	108	6.455	6.455	0.000	97	166932	10.0	10.4	
37 Indene	116	6.471	6.471	0.000	91	319157	10.0	10.2	
38 2,2'-oxybis[1-chloropropan	45	6.487	6.487	0.000	92	266423	10.0	11.3	
39 N-Nitrosopyrrolidine	100	6.578	6.578	0.000	90	79137	10.0	9.48	
42 4-Methylphenol	108	6.604	6.604	0.000	67	172021	10.0	10.5	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
40 Acetophenone	105	6.610	6.610	0.000	81	248830	10.0	10.6	
41 N-Nitrosodi-n-propylamine	70	6.610	6.610	0.000	70	125873	10.0	10.9	
45 Hexachloroethane	117	6.727	6.727	0.000	96	85559	10.0	9.53	
46 Nitrobenzene	77	6.781	6.781	0.000	88	202814	10.0	10.5	
48 Isophorone	82	7.016	7.016	0.000	100	371255	10.0	10.3	
49 2-Nitrophenol	139	7.101	7.101	0.000	95	104203	10.0	10.3	
50 2,4-Dimethylphenol	107	7.133	7.133	0.000	96	196370	10.0	10.7	
52 Benzoic acid	122	7.187	7.187	0.000	89	131362	10.0	13.0	
53 Bis(2-chloroethoxy)methane	93	7.224	7.224	0.000	98	229773	10.0	9.75	
54 2,4-Dichlorophenol	162	7.336	7.336	0.000	94	172788	10.0	10.3	
56 1,2,4-Trichlorobenzene	180	7.427	7.427	0.000	94	204291	10.0	10.2	
58 Naphthalene	128	7.507	7.507	0.000	97	593732	10.0	9.91	
59 4-Chloroaniline	127	7.544	7.544	0.000	96	250415	10.0	10.1	
60 2,6-Dichlorophenol	162	7.555	7.555	0.000	98	167762	10.0	10.2	
62 Hexachlorobutadiene	225	7.630	7.630	0.000	95	119071	10.0	10.6	
64 Caprolactam	113	7.849	7.849	0.000	78	65012	10.0	11.2	
67 4-Chloro-3-methylphenol	107	7.999	7.999	0.000	97	177248	10.0	10.6	
69 2-Methylnaphthalene	142	8.175	8.175	0.000	92	421775	10.0	10.2	
71 1-Methylnaphthalene	142	8.271	8.271	0.000	93	394528	10.0	10.0	
72 Hexachlorocyclopentadiene	237	8.335	8.335	0.000	95	129088	10.0	10.7	
73 1,2,4,5-Tetrachlorobenzene	216	8.340	8.340	0.000	97	210437	10.0	9.87	
74 2,4,6-Trichlorophenol	196	8.442	8.442	0.000	92	144107	10.0	10.3	
75 2,4,5-Trichlorophenol	196	8.474	8.474	0.000	95	147079	10.0	10.2	
76 1,1'-Biphenyl	154	8.618	8.618	0.000	95	531486	10.0	9.89	
77 2-Chloronaphthalene	162	8.650	8.650	0.000	96	422541	10.0	9.71	
79 2-Nitroaniline	65	8.730	8.730	0.000	84	122688	10.0	10.3	
82 Dimethyl phthalate	163	8.891	8.891	0.000	99	475234	10.0	10.2	
83 1,3-Dinitrobenzene	168	8.923	8.923	0.000	85	71763	10.0	10.0	
84 2,6-Dinitrotoluene	165	8.955	8.955	0.000	97	108257	10.0	10.0	
85 Acenaphthylene	152	9.056	9.056	0.000	98	661126	10.0	10.1	
86 3-Nitroaniline	138	9.120	9.120	0.000	94	121065	10.0	9.95	
87 2,4-Dinitrophenol	184	9.217	9.217	0.000	66	125678	20.0	23.0	
88 Acenaphthene	153	9.217	9.217	0.000	90	424040	10.0	9.57	
89 4-Nitrophenol	109	9.254	9.254	0.000	91	117438	20.0	22.8	
91 2,4-Dinitrotoluene	165	9.339	9.339	0.000	94	149485	10.0	10.4	
93 Dibenzofuran	168	9.382	9.382	0.000	97	631535	10.0	10.2	
95 2,3,5,6-Tetrachlorophenol	232	9.452	9.452	0.000	94	125826	10.0	10.4	
96 2,3,4,6-Tetrachlorophenol	232	9.494	9.494	0.000	72	123813	10.0	10.4	
97 2-Naphthylamine	143	9.526	9.526	0.000	96	462437	10.0	10.2	
98 Diethyl phthalate	149	9.558	9.558	0.000	98	464264	10.0	10.7	
99 Hexadecane	57	9.564	9.564	0.000	92	335885	10.0	10.4	
100 4-Chlorophenyl phenyl ethe	204	9.692	9.692	0.000	91	257167	10.0	10.2	
101 4-Nitroaniline	138	9.703	9.703	0.000	89	127707	10.0	10.7	
103 Fluorene	166	9.713	9.713	0.000	94	510287	10.0	10.4	
104 4,6-Dinitro-2-methylphenol	198	9.735	9.735	0.000	89	180116	20.0	20.1	
105 N-Nitrosodiphenylamine	169	9.799	9.799	0.000	60	392155	10.0	9.34	
57 Azobenzene	77	9.842	9.842	0.000	98	636243	10.0	10.8	
90 1,2-Diphenylhydrazine	77	9.842	9.842	0.000	98	636243	10.0	10.8	
110 4-Bromophenyl phenyl ether	248	10.162	10.162	0.000	65	150061	10.0	9.61	
112 Hexachlorobenzene	284	10.253	10.253	0.000	93	138590	10.0	9.43	
113 Atrazine	200	10.280	10.280	0.000	93	154460	10.0	10.6	
116 Pentachlorophenol	266	10.424	10.424	0.000	91	180193	20.0	20.5	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
115 n-Octadecane	57	10.429	10.429	0.000	94	370656	10.0	10.8	
121 Phenanthrene	178	10.654	10.654	0.000	97	787962	10.0	9.70	
122 Anthracene	178	10.707	10.707	0.000	97	816792	10.0	9.67	
124 Carbazole	167	10.857	10.857	0.000	95	757722	10.0	9.68	
126 Di-n-butyl phthalate	149	11.183	11.183	0.000	100	896185	10.0	10.3	
131 Fluoranthene	202	12.059	12.059	0.000	98	924656	10.0	10.4	
132 Benzidine	184	12.198	12.198	0.000	100	455372	10.0	10.1	
133 Pyrene	202	12.385	12.385	0.000	98	934720	10.0	9.37	
138 Butyl benzyl phthalate	149	13.303	13.303	0.000	98	385996	10.0	9.70	
144 3,3'-Dichlorobenzidine	252	14.297	14.297	0.000	74	295878	10.0	10.0	
145 Bis(2-ethylhexyl) phthalat	149	14.350	14.350	0.000	96	515192	10.0	10.1	
146 Benzo[a]anthracene	228	14.372	14.372	0.000	99	827405	10.0	9.53	
147 Chrysene	228	14.441	14.441	0.000	97	797039	10.0	9.61	
150 Di-n-octyl phthalate	149	15.654	15.654	0.000	99	872734	10.0	8.98	
151 7,12-Dimethylbenz(a)anthra	256	16.487	16.487	0.000	91	361932	10.0	9.06	
152 Benzo[b]fluoranthene	252	16.509	16.509	0.000	98	798089	10.0	9.33	
153 Benzo[k]fluoranthene	252	16.562	16.562	0.000	99	790646	10.0	9.39	
219 Benzo[e]pyrene	252	17.064	17.064	0.000	0	741848	10.0	9.36	
154 Benzo[a]pyrene	252	17.166	17.166	0.000	86	756389	10.0	9.48	
157 Indeno[1,2,3-cd]pyrene	276	19.661	19.661	0.000	96	751306	10.0	9.55	M
158 Dibenz(a,h)anthracene	278	19.687	19.687	0.000	92	618830	10.0	9.40	
159 Benzo[g,h,i]perylene	276	20.350	20.350	0.000	99	648659	10.0	9.62	M
S 197 Methyl Phenols,Total	108				0		20.0	21.0	
S 199 Total Cresols	108				0		20.0	21.0	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

SVTAPSTD10i_00192 Amount Added: 1.00 Units: mL

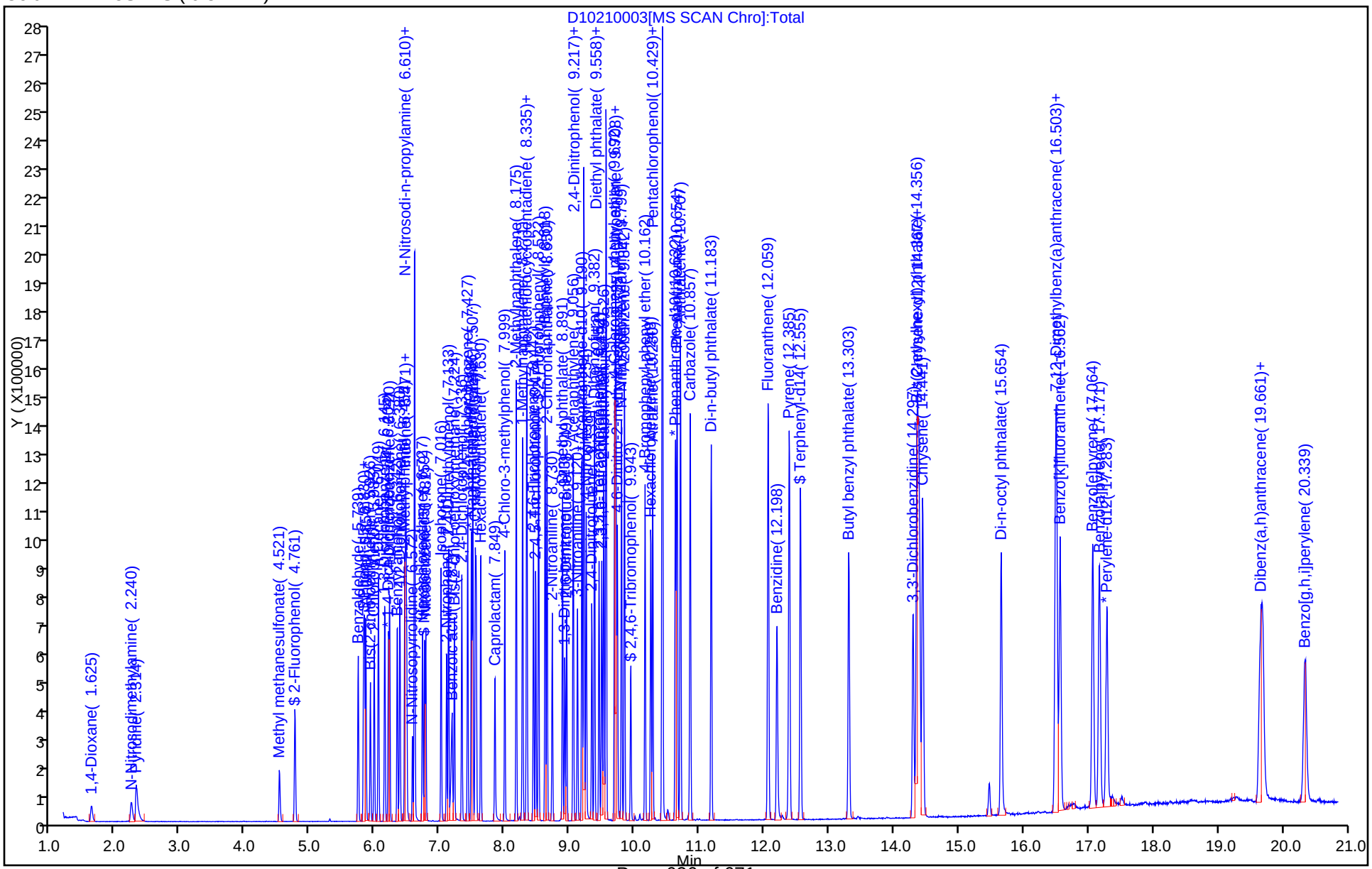
Report Date: 22-Oct-2016 05:59:42 Chrom Revision: 2.2 17-Oct-2016 09:27:18

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210003.D

Injection Date:	21-Oct-2016 11:50:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	CCVIS			Worklist Smp#:	3
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	2
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

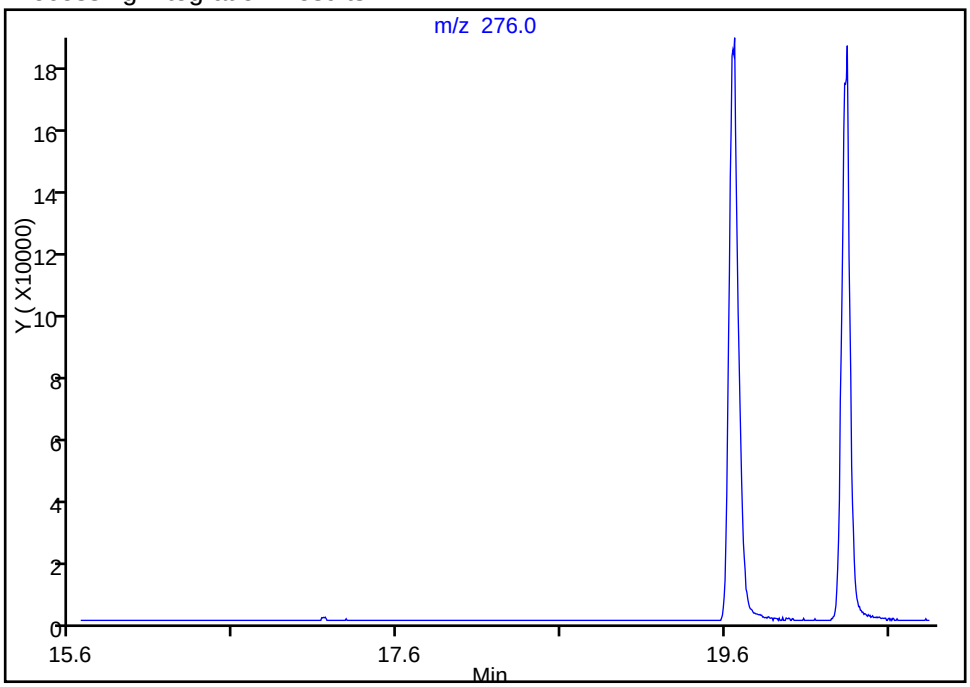
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210003.D				
Injection Date:	21-Oct-2016 11:50:30	Instrument ID:	CH732		
Lims ID:	CCVIS				
Client ID:					
Operator ID:	003200	ALS Bottle#:	2	Worklist Smp#:	3
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

157 Indeno[1,2,3-cd]pyrene, CAS: 193-39-5

Signal: 1

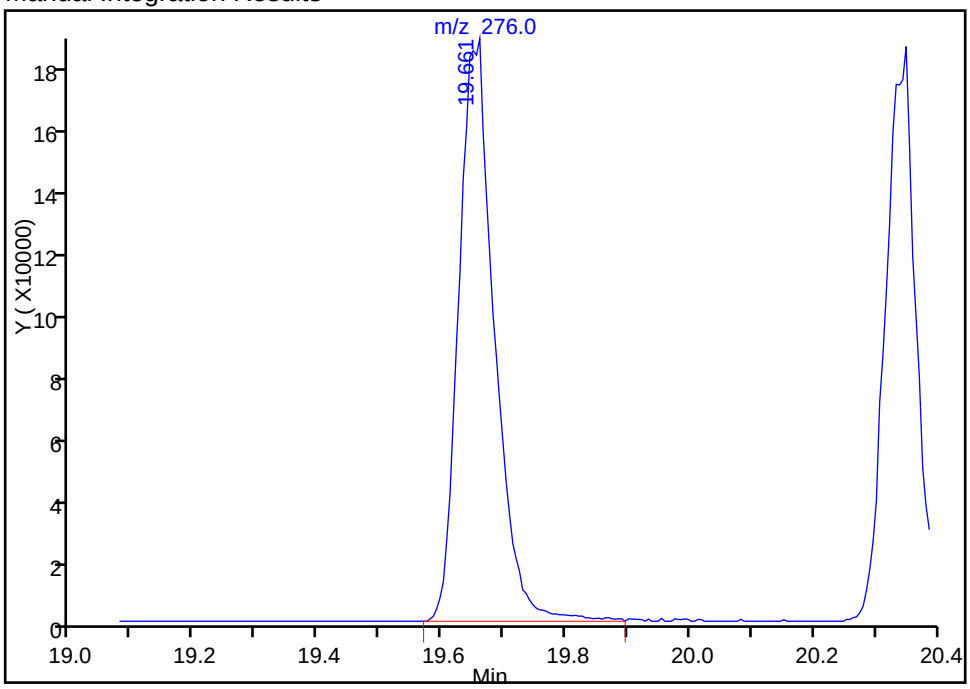
Not Detected
Expected RT: 19.66

Processing Integration Results



Manual Integration Results

RT: 19.66
Area: 751306
Amount: 9.549018
Amount Units: ng



Reviewer: piccolinov, 21-Oct-2016 12:15:12
Audit Action: Manually Integrated Audit Reason: Poor chromatography

Manual Integration/User Assign Peak Report

TestAmerica Pittsburgh

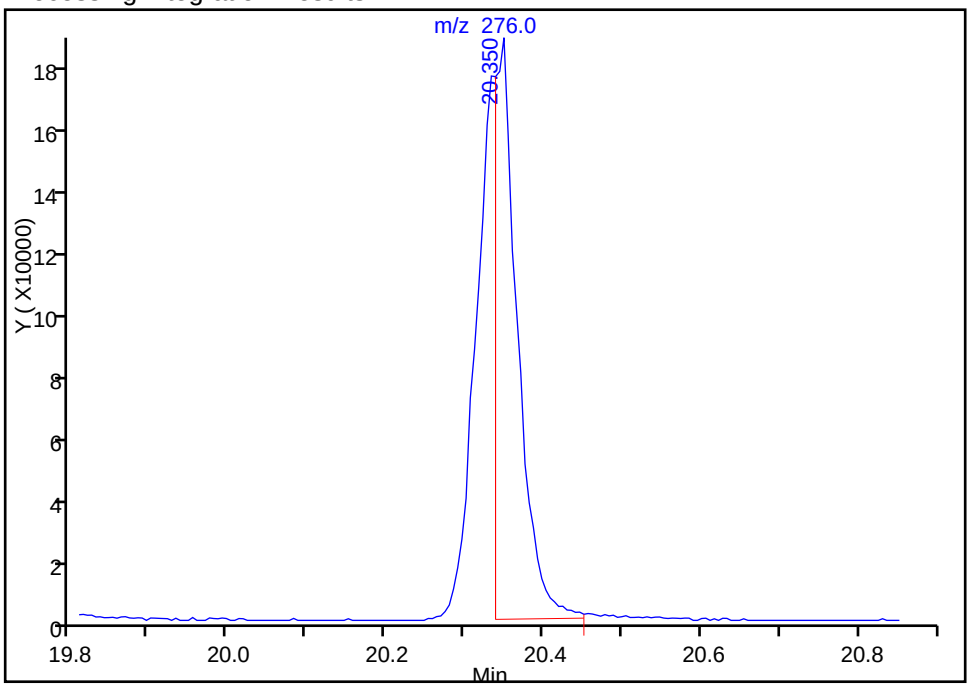
Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210003.D				
Injection Date:	21-Oct-2016 11:50:30	Instrument ID:	CH732		
Lims ID:	CCVIS				
Client ID:					
Operator ID:	003200	ALS Bottle#:	2	Worklist Smp#:	3
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		
Column:	Rxi-5SilMS (0.32 mm)	Detector	MS SCAN		

159 Benzo[g,h,i]perylene, CAS: 191-24-2

Signal: 1

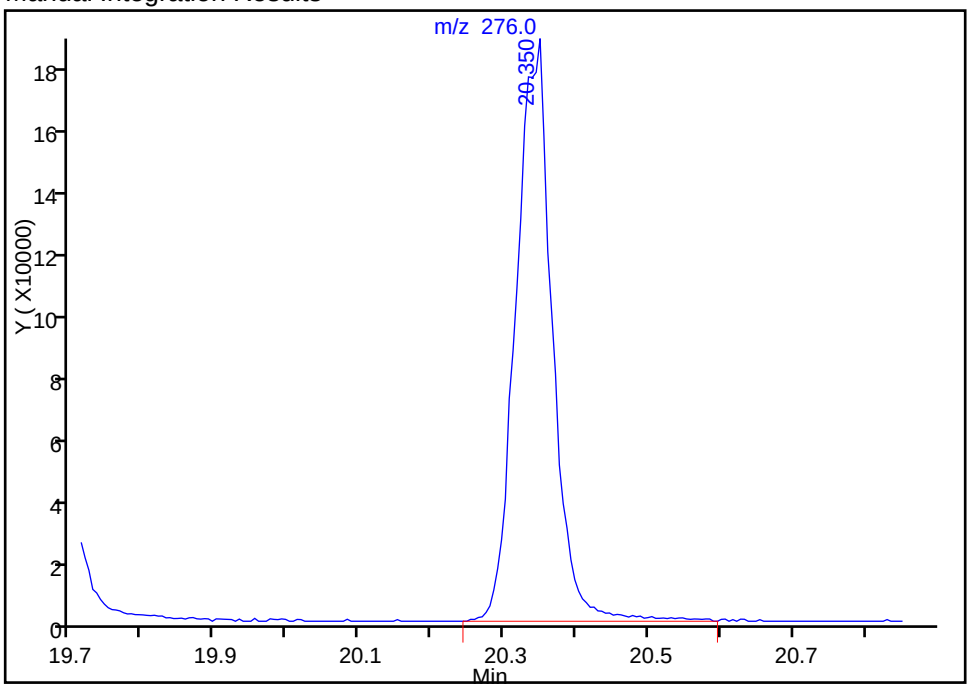
Processing Integration Results

RT: 20.35
Area: 372419
Amount: 5.525062
Amount Units: ng



Manual Integration Results

RT: 20.35
Area: 648659
Amount: 9.623251
Amount Units: ng



Reviewer: piccolinov, 21-Oct-2016 12:15:12

Audit Action: Manually Integrated Audit Reason: Poor chromatography

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D
Lims ID: DFTPP
Client ID:
Sample Type: DFTPP
Inject. Date: 28-Sep-2016 05:12:30 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013626-002
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 28-Sep-2016 10:33:21 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK025

First Level Reviewer: piccolinov Date: 28-Sep-2016 05:50:18

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
189 Pentachlorophenol_T	266	5.469	5.469	0.000	93	645592	NR	NR	
190 DFTPP									
191 Benzidine_T	184	8.129	8.129	0.000	100	5033671	NR	NR	
192 4,4'-DDE	246		8.600					ND	
193 4,4'-DDD	235		9.326					ND	
194 4,4'-DDT	235	9.785	9.785	0.000	99	1975081	NR	NR	

QC Flag Legend

Processing Flags
NR - Missing Quant Standard

Reagents:

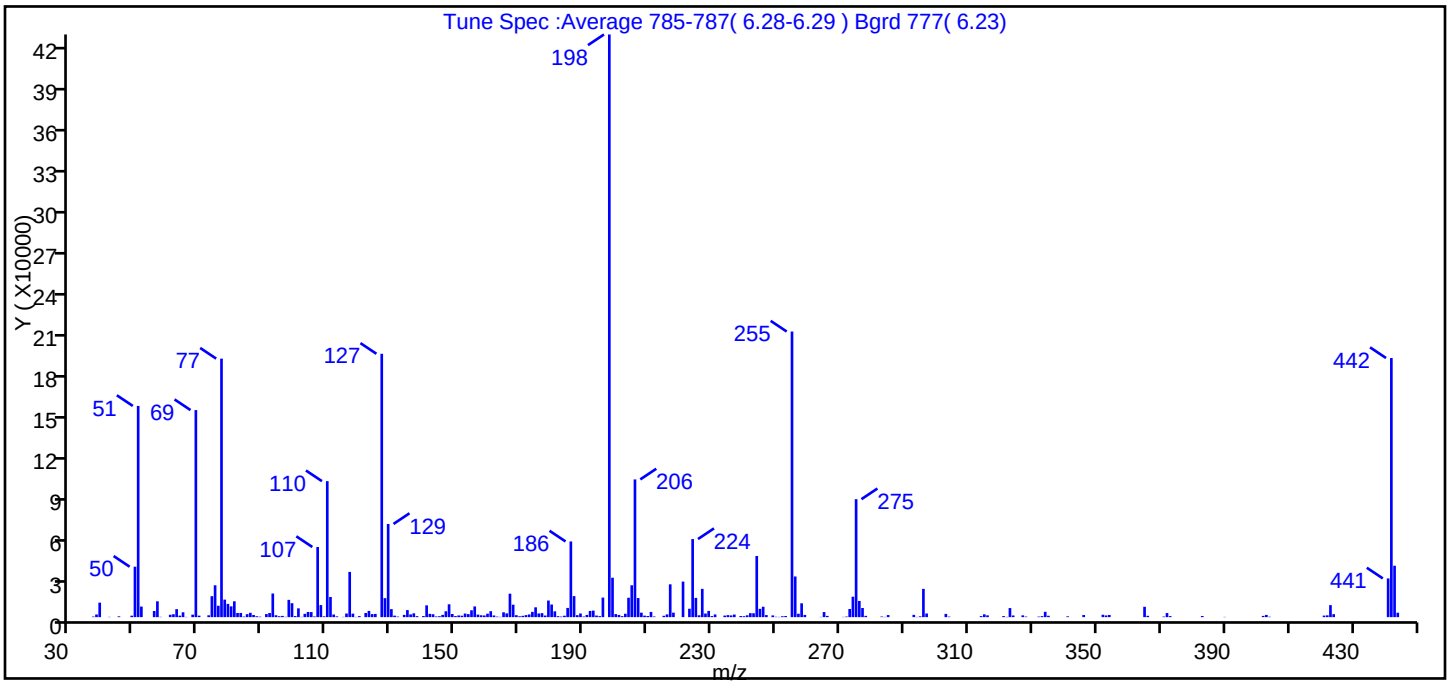
SVDFTPP50i_00025 Amount Added: 1.00 Units: mL

MS Tune Report

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D
Injection Date: 28-Sep-2016 05:12:30 Instrument ID: CH732
Lims ID: DFTPP
Client ID:
Operator ID: 003200 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL
Tune Method: DFTPP Method 8270

190 DFTPP



m/z	Ion Abundance Criteria	% Relative Abundance
198	Base peak, 100% relative abundance	100.0
51	30-60% of mass 198	36.2
68	<2% of mass 69	0.4 (1.2)
69	Present	35.5
70	<2% of mass 69	0.3 (0.7)
127	40-60% of mass 198	45.2
197	<1% of mass 198	0.0
199	5-9% of mass 198	6.8
275	10-30% of mass 198	20.2
365	>1% of mass 198	1.8
441	Present but less than mass 443	6.6 (75.3)
442	>40% of mass 198	44.5
443	17-23% of mass 442	8.8 (19.8)

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D\BNA_CH732.rslt\spectra.d
Injection Date: 28-Sep-2016 05:12:30
Spectrum: Tune Spec :Average 785-787(6.28-6.29) Bgrd 777(6.23)
Base Peak: 198.00
Minimum % Base Peak: 0
Number of Points: 248

m/z	Y	m/z	Y	m/z	Y	m/z	Y
37.00	425	116.00	2646	182.00	704	255.00	207808
38.00	1942	117.00	32904	183.00	397	256.00	29584
39.00	10541	118.00	2550	184.00	1033	257.00	2479
42.00	191	119.00	168	185.00	6708	258.00	10075
45.00	596	120.00	759	186.00	55080	259.00	1618
49.00	1063	122.00	3028	187.00	15308	264.00	181
50.00	36696	123.00	4542	188.00	1448	265.00	3709
51.00	153664	124.00	2207	189.00	2671	266.00	898
52.00	7690	125.00	2345	190.00	413	271.00	173
56.00	4457	127.00	191616	191.00	1609	272.00	418
57.00	11528	128.00	13836	192.00	4499	273.00	5935
58.00	210	129.00	67808	193.00	4743	274.00	14866
61.00	1751	130.00	5838	194.00	1164	275.00	85832
62.00	2136	131.00	1089	195.00	735	276.00	11787
63.00	5826	132.00	407	196.00	14228	277.00	6645
64.00	1090	134.00	1649	198.00	423936	278.00	932
65.00	3539	135.00	5150	199.00	28680	283.00	443
66.00	167	136.00	1992	200.00	2218	284.00	178
68.00	1804	137.00	2781	201.00	1593	285.00	1522
69.00	150656	138.00	719	202.00	739	293.00	1649
70.00	1089	140.00	796	203.00	2480	294.00	173
73.00	1337	141.00	8580	204.00	14107	295.00	555
74.00	15260	142.00	2393	205.00	23184	296.00	20560
75.00	23176	143.00	2105	206.00	100208	297.00	2656
76.00	8290	144.00	486	207.00	13907	303.00	2368
77.00	188096	145.00	682	208.00	3249	304.00	392
78.00	12763	146.00	1652	209.00	1081	314.00	758
79.00	9641	147.00	4282	210.00	832	315.00	2043
80.00	7855	148.00	9350	211.00	3795	316.00	1287
81.00	11524	149.00	2278	212.00	461	321.00	771
82.00	3030	150.00	773	215.00	975	322.00	189
83.00	3054	151.00	1224	216.00	1979	323.00	6614
84.00	416	152.00	1059	217.00	23888	324.00	1209

Report Date: 28-Sep-2016 10:33:22 Chrom Revision: 2.2 08-Sep-2016 14:45:52
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D\BNA_CH732.rslt\spectra.d
Injection Date: 28-Sep-2016 05:12:30
Spectrum: Tune Spec :Average 785-787(6.28-6.29) Bgrd 777(6.23)
Base Peak: 198.00
Minimum % Base Peak: 0
Number of Points: 248

m/z	Y	m/z	Y	m/z	Y	m/z	Y
85.00	2169	153.00	2618	218.00	3269	327.00	1307
86.00	3143	154.00	2198	221.00	25872	328.00	398
87.00	1566	155.00	5002	223.00	6115	332.00	389
88.00	649	156.00	7795	224.00	56816	333.00	722
89.00	341	157.00	1854	225.00	14020	334.00	3891
91.00	2250	158.00	1361	226.00	1351	335.00	1024
92.00	2988	159.00	1214	227.00	20560	341.00	585
93.00	17192	160.00	2505	228.00	2645	346.00	1540
94.00	1376	161.00	4321	229.00	4512	352.00	1742
95.00	683	162.00	1208	230.00	768	353.00	1238
96.00	916	163.00	383	231.00	1949	354.00	1581
97.00	225	164.00	194	234.00	1125	365.00	7533
98.00	12575	165.00	3524	235.00	1470	366.00	965
99.00	10150	166.00	2744	236.00	1255	371.00	423
100.00	780	167.00	17064	237.00	1898	372.00	2967
101.00	6399	168.00	9062	239.00	799	373.00	745
102.00	207	169.00	1435	240.00	671	383.00	852
103.00	2412	170.00	636	241.00	1333	390.00	173
104.00	3771	171.00	968	242.00	2896	402.00	921
105.00	3684	172.00	1478	243.00	2823	403.00	1598
106.00	485	173.00	1947	244.00	44504	404.00	309
107.00	51040	174.00	3834	245.00	6043	421.00	1130
108.00	8777	175.00	7158	246.00	7565	422.00	1311
109.00	588	176.00	2668	247.00	1503	423.00	8742
110.00	98944	177.00	2905	249.00	1255	424.00	2155
111.00	14677	178.00	1172	250.00	262	441.00	28176
112.00	1915	179.00	12076	251.00	181	442.00	188544
113.00	566	180.00	9188	252.00	653	443.00	37408
115.00	187	181.00	4217	253.00	841	444.00	3222

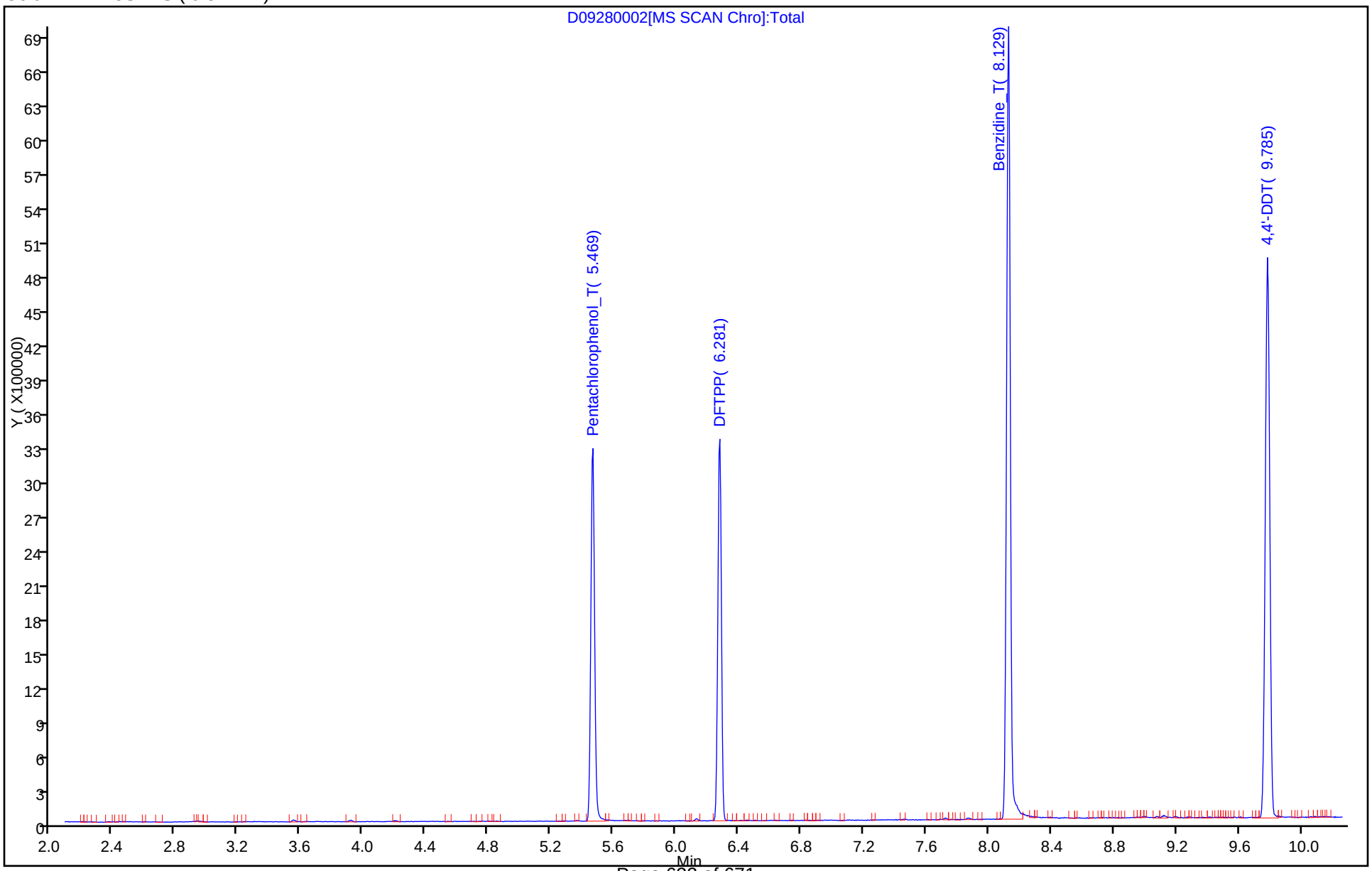
Report Date: 28-Sep-2016 10:33:22 Chrom Revision: 2.2 08-Sep-2016 14:45:52

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D

Injection Date:	28-Sep-2016 05:12:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	DFTPP			Worklist Smp#:	2
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	1
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)

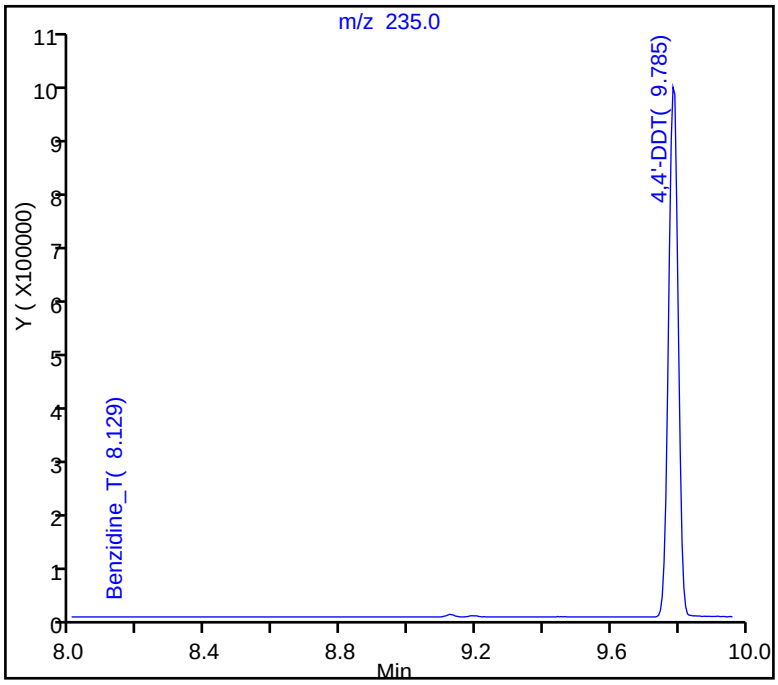


Breakdown Report

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D				
Injection Date:	28-Sep-2016 05:12:30	Instrument ID:	CH732		
Lims ID:	DFTPP				
Client ID:					
Operator ID:	003200	ALS Bottle#:	1	Worklist Smp#:	2
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

194 4,4'-DDT, Detector: MS SCAN



SW-846 Method

%Breakdown =
(Area Breakdown Cpnds/
Total Area Breakdown Cpnds) * 100

194 4,4'-DDT, Area = 1975081
192 4,4'-DDE, Area = 0
193 4,4'-DDD, Area = 0

%Breakdown: 0.00%, Max Limit: 20.00%
Passed

Peak Tailing Report

TestAmerica Pittsburgh

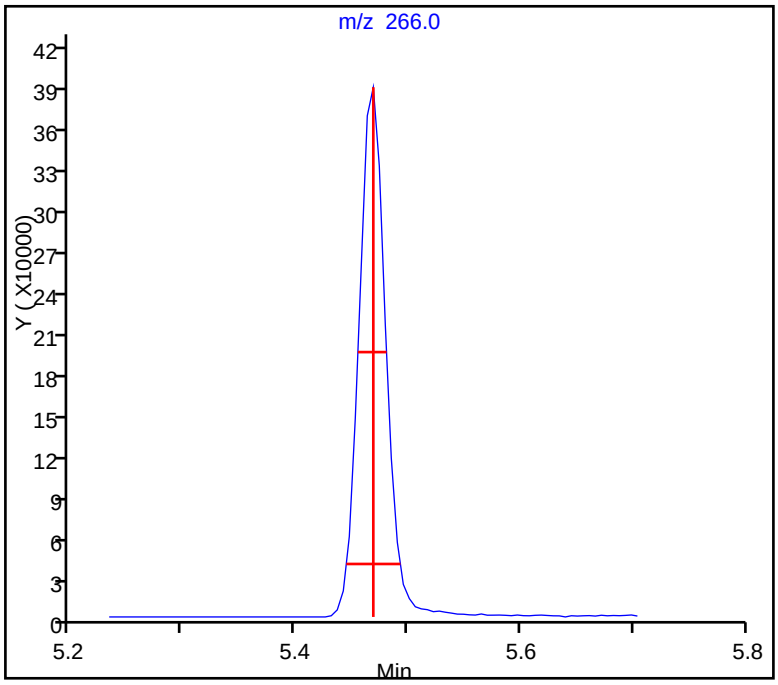
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D
Injection Date: 28-Sep-2016 05:12:30 Instrument ID: CH732
Lims ID: DFTPP
Client ID:
Operator ID: 003200 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL

189 Pentachlorophenol_T, Detector: MS SCAN

Peak Tailing Factor =
BackWidth/FrontWidth @ 10% Peak Height

Back Width = 0.024 (min.)
Front Width = 0.024 (min.)

Tailing Factor = 1.0, Max. Tailing < 2.00
Passed



Peak Tailing Report

TestAmerica Pittsburgh

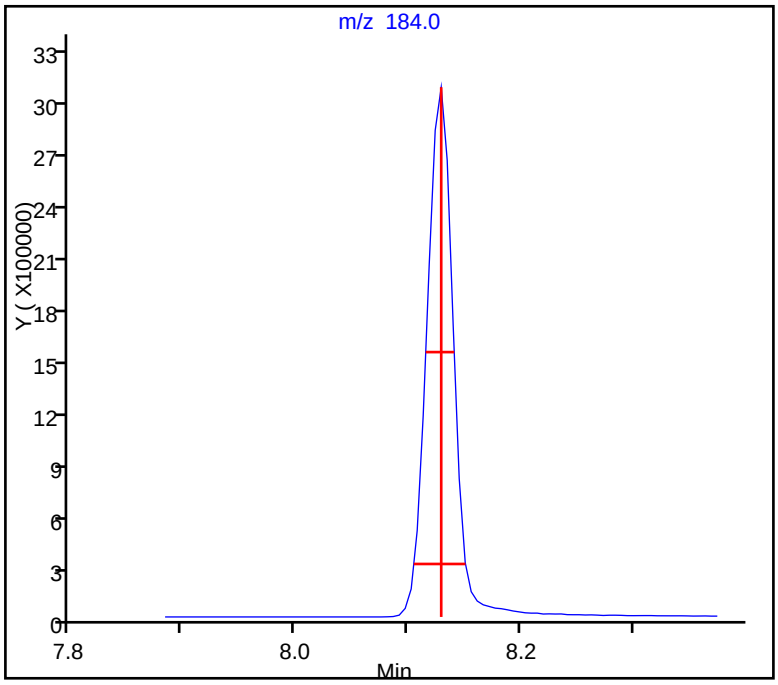
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280002.D
Injection Date: 28-Sep-2016 05:12:30 Instrument ID: CH732
Lims ID: DFTPP
Client ID:
Operator ID: 003200 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL

191 Benzidine_T, Detector: MS SCAN

Peak Tailing Factor =
BackWidth/FrontWidth @ 10% Peak Height

Back Width = 0.022 (min.)
Front Width = 0.024 (min.)

Tailing Factor = 0.9, Max. Tailing < 2.00
Passed



TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D
Lims ID: DFTPP
Client ID:
Sample Type: DFTPP
Inject. Date: 21-Oct-2016 11:34:30 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-002
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:38 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 12:50:14

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
189 Pentachlorophenol_T	266	5.586	5.586	0.000	93	413395	NR	NR	
190 DFTPP									
191 Benzidine_T	184	8.242	8.242	0.000	100	3351418	NR	NR	
192 4,4'-DDE	246		8.573					ND	
194 4,4'-DDT	235	9.326	9.326	0.000	86	1954	NR	NR	
193 4,4'-DDD	235	9.924	9.924	0.000	98	1415679		NR	

QC Flag Legend

Processing Flags
NR - Missing Quant Standard

Reagents:

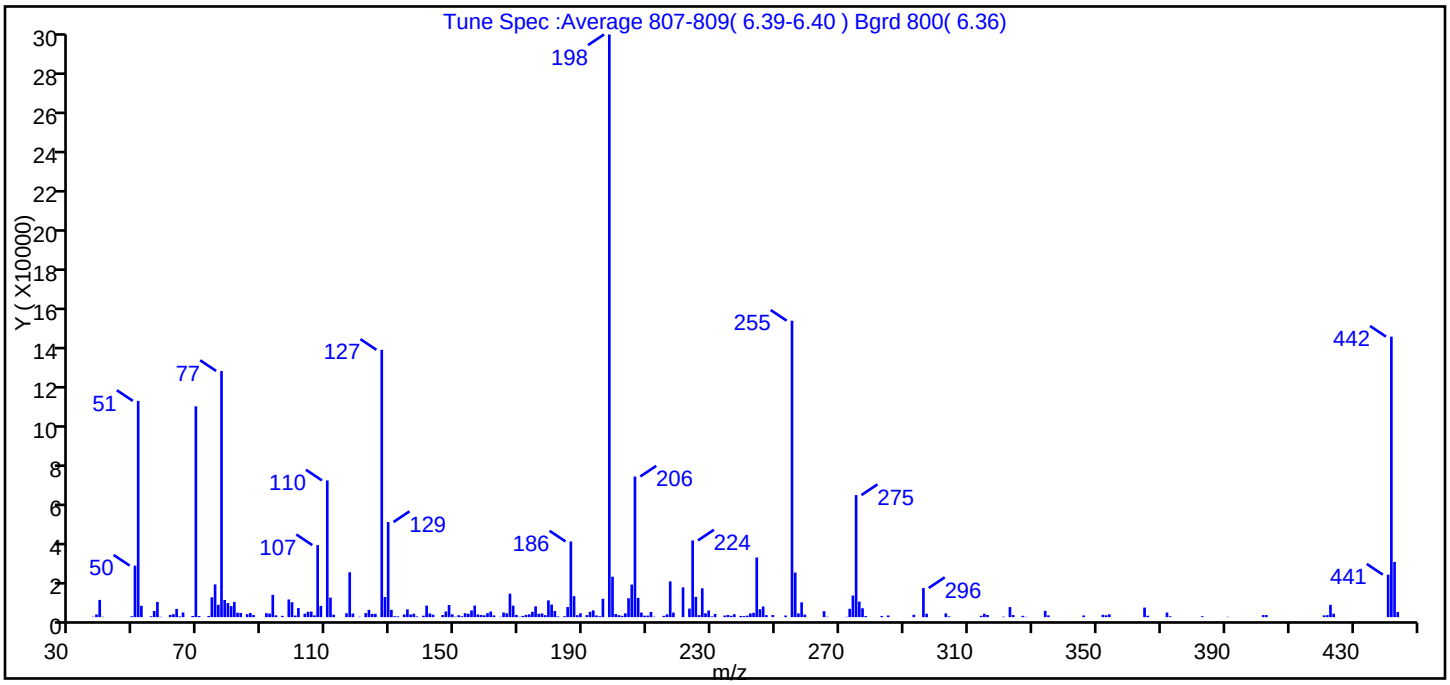
SVDFTPP50i_00025 Amount Added: 1.00 Units: mL

MS Tune Report

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D
Injection Date: 21-Oct-2016 11:34:30 Instrument ID: CH732
Lims ID: DFTPP
Client ID:
Operator ID: 003200 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL
Tune Method: DFTPP Method 8270

190 DFTPP



m/z	Ion Abundance Criteria	% Relative Abundance
198	Base peak, 100% relative abundance	100.0
51	30-60% of mass 198	37.1
68	<2% of mass 69	0.2 (0.6)
69	Present	36.2
70	<2% of mass 69	0.2 (0.5)
127	40-60% of mass 198	45.9
197	<1% of mass 198	0.0
199	5-9% of mass 198	6.9
275	10-30% of mass 198	21.0
365	>1% of mass 198	1.6
441	Present but less than mass 443	7.3 (76.9)
442	>40% of mass 198	48.1
443	17-23% of mass 442	9.5 (19.7)

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D\BNA_CH732.rslt\spectra.d
Injection Date: 21-Oct-2016 11:34:30
Spectrum: Tune Spec :Average 807-809(6.39-6.40) Bgrd 800(6.36)
Base Peak: 198.00
Minimum % Base Peak: 0
Number of Points: 218

m/z	Y	m/z	Y	m/z	Y	m/z	Y
37.00	196	120.00	196	182.00	358	249.00	1067
38.00	1347	122.00	2041	184.00	462	253.00	830
39.00	8705	123.00	3701	185.00	5103	255.00	149760
40.00	183	124.00	1615	186.00	38232	256.00	22520
49.00	459	125.00	1684	187.00	10601	257.00	1879
50.00	26032	127.00	135040	188.00	985	258.00	7499
51.00	109240	128.00	10186	189.00	1923	259.00	1308
52.00	5716	129.00	48056	191.00	1049	265.00	2998
55.00	412	130.00	3680	192.00	2722	266.00	213
56.00	3121	131.00	475	193.00	3413	272.00	166
57.00	7682	132.00	419	194.00	850	273.00	4230
58.00	169	134.00	1354	195.00	461	274.00	10903
61.00	1126	135.00	3931	196.00	9265	275.00	61664
62.00	1497	136.00	1372	198.00	294336	276.00	7846
63.00	4160	137.00	1746	199.00	20424	277.00	4491
64.00	361	138.00	349	200.00	1575	278.00	564
65.00	2344	140.00	740	201.00	991	283.00	601
68.00	586	141.00	5818	202.00	697	285.00	859
69.00	106488	142.00	1873	203.00	1911	293.00	1190
70.00	548	143.00	1248	204.00	9554	296.00	14732
73.00	634	146.00	1060	205.00	16464	297.00	1729
74.00	10022	147.00	2877	206.00	71048	303.00	1880
75.00	16544	148.00	6126	207.00	9742	304.00	376
76.00	6222	149.00	1424	208.00	2311	314.00	671
77.00	124352	150.00	194	209.00	737	315.00	1700
78.00	8665	151.00	949	210.00	774	316.00	1105
79.00	7106	152.00	475	211.00	2615	321.00	246
80.00	5548	153.00	2018	212.00	217	323.00	5086
81.00	7706	154.00	1696	215.00	663	324.00	1071
82.00	2233	155.00	3396	216.00	1385	327.00	655
83.00	2134	156.00	5837	217.00	18056	328.00	168
85.00	1516	157.00	1335	218.00	2304	334.00	3171
86.00	2104	158.00	1098	221.00	15034	335.00	888

Report Date: 22-Oct-2016 05:59:39 Chrom Revision: 2.2 17-Oct-2016 09:27:18
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D\BNA_CH732.rslt\spectra.d
Injection Date: 21-Oct-2016 11:34:30
Spectrum: Tune Spec :Average 807-809(6.39-6.40) Bgrd 800(6.36)
Base Peak: 198.00
Minimum % Base Peak: 0
Number of Points: 218

m/z	Y	m/z	Y	m/z	Y	m/z	Y
87.00	1054	159.00	925	223.00	4328	346.00	853
91.00	2015	160.00	2034	224.00	38760	352.00	1198
92.00	1822	161.00	2844	225.00	10230	353.00	946
93.00	11248	162.00	870	226.00	1016	354.00	1435
94.00	911	164.00	185	227.00	14564	365.00	4813
96.00	665	165.00	2356	228.00	1934	366.00	702
98.00	8916	166.00	1960	229.00	3338	372.00	2317
99.00	7531	167.00	11858	230.00	368	373.00	425
100.00	797	168.00	5793	231.00	1591	383.00	462
101.00	4580	169.00	1108	234.00	811	391.00	175
103.00	1731	170.00	196	235.00	1136	402.00	1039
104.00	2709	171.00	637	236.00	719	403.00	1042
105.00	2813	172.00	1156	237.00	1487	421.00	907
106.00	890	173.00	1417	239.00	626	422.00	978
107.00	36384	174.00	2690	240.00	544	423.00	6209
108.00	5673	175.00	5466	241.00	764	424.00	1709
110.00	69072	176.00	1682	242.00	1879	441.00	21464
111.00	9855	177.00	1883	243.00	2186	442.00	141696
112.00	1228	178.00	1006	244.00	30128	443.00	27904
116.00	1953	179.00	8483	245.00	3990	444.00	2644
117.00	22664	180.00	6352	246.00	5391		
118.00	1806	181.00	3157	247.00	1000		

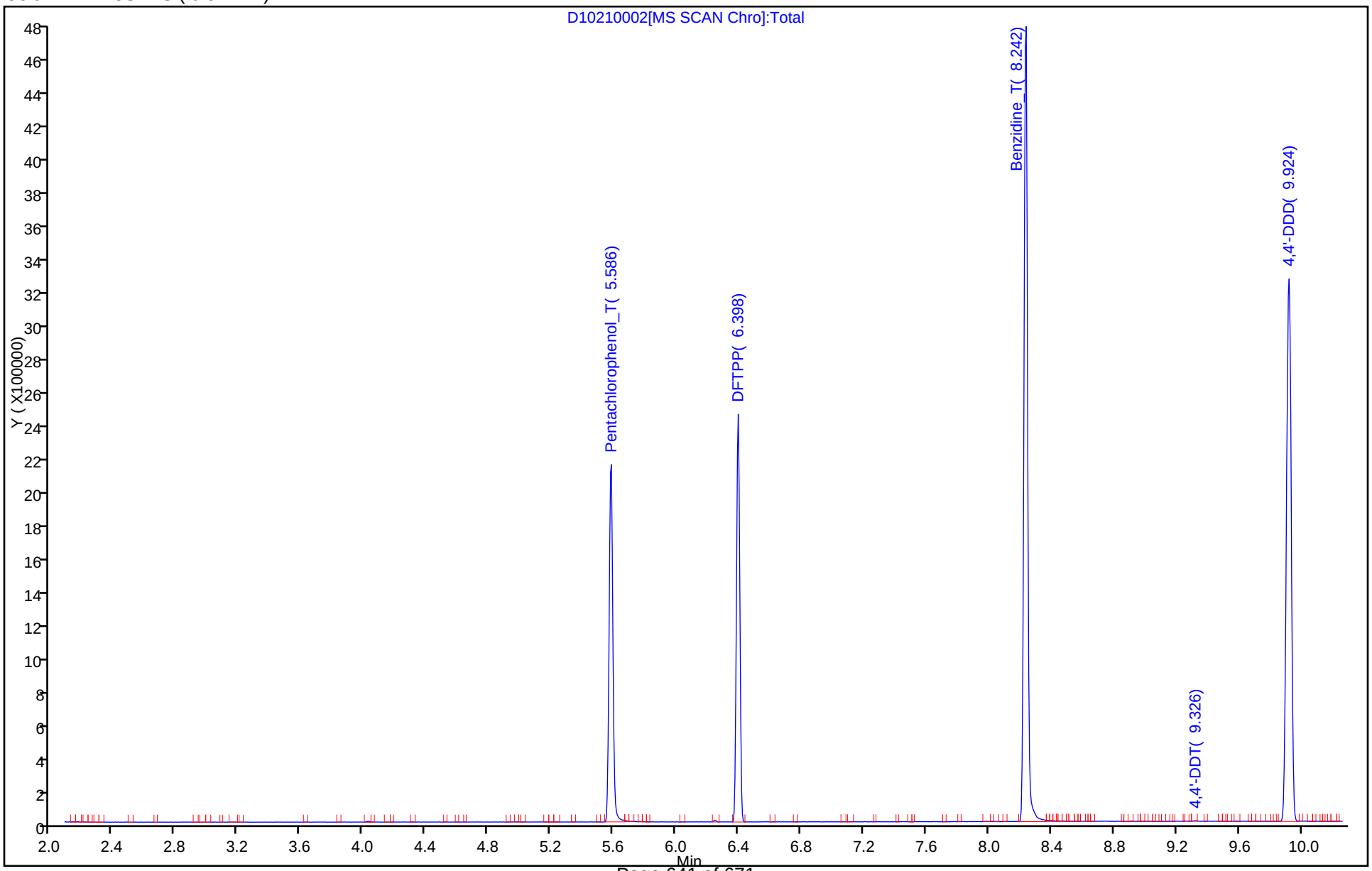
Report Date: 22-Oct-2016 05:59:39 Chrom Revision: 2.2 17-Oct-2016 09:27:18

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D

Injection Date:	21-Oct-2016 11:34:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	DFTPP			Worklist Smp#:	2
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	1
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)

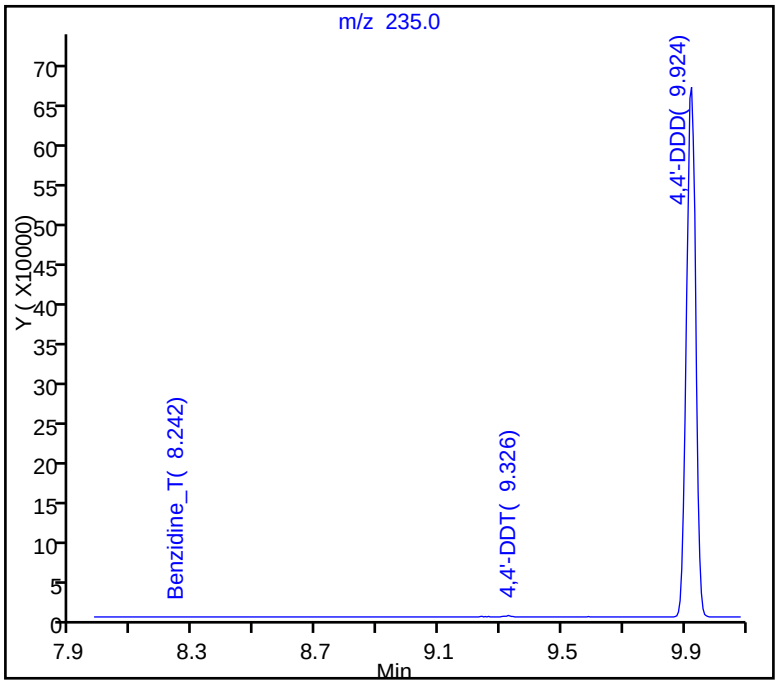


Breakdown Report

TestAmerica Pittsburgh

Data File:	\\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D				
Injection Date:	21-Oct-2016 11:34:30	Instrument ID:	CH732		
Lims ID:	DFTPP				
Client ID:					
Operator ID:	003200	ALS Bottle#:	1	Worklist Smp#:	2
Injection Vol:	2.0 ul	Dil. Factor:	1.0000		
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

194 4,4'-DDT, Detector: MS SCAN



SW-846 Method

%Breakdown =
(Area Breakdown Cpnds/
Total Area Breakdown Cpnds) * 100

194 4,4'-DDT, Area = 1954
192 4,4'-DDE, Area = 0
193 4,4'-DDD, Area = 1415679

%Breakdown:* 99.86%, Max Limit: 20.00%
Failed

Peak Tailing Report

TestAmerica Pittsburgh

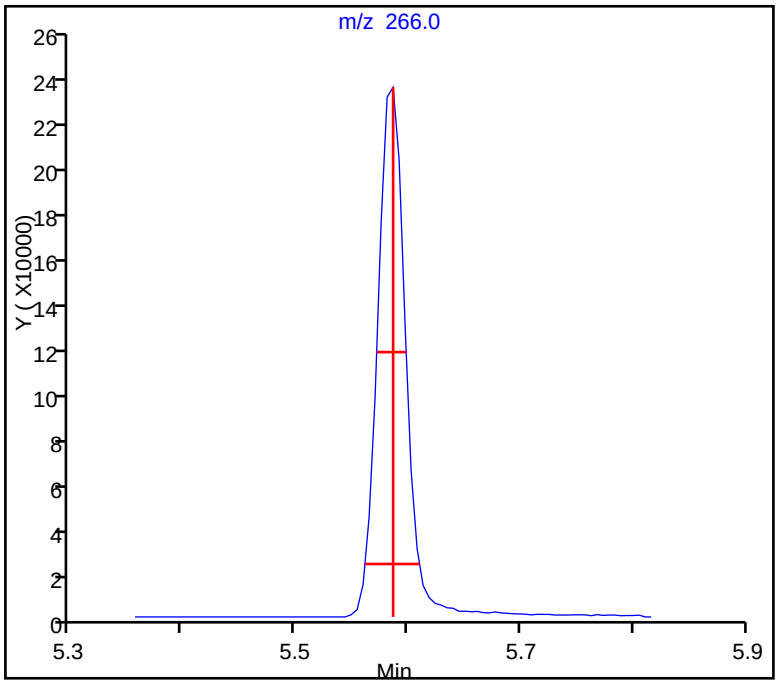
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D
Injection Date: 21-Oct-2016 11:34:30 Instrument ID: CH732
Lims ID: DFTPP
Client ID:
Operator ID: 003200 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL

189 Pentachlorophenol_T, Detector: MS SCAN

Peak Tailing Factor =
BackWidth/FrontWidth @ 10% Peak Height

Back Width = 0.024 (min.)
Front Width = 0.025 (min.)

Tailing Factor = 0.9, Max. Tailing < 2.00
Passed



Peak Tailing Report

TestAmerica Pittsburgh

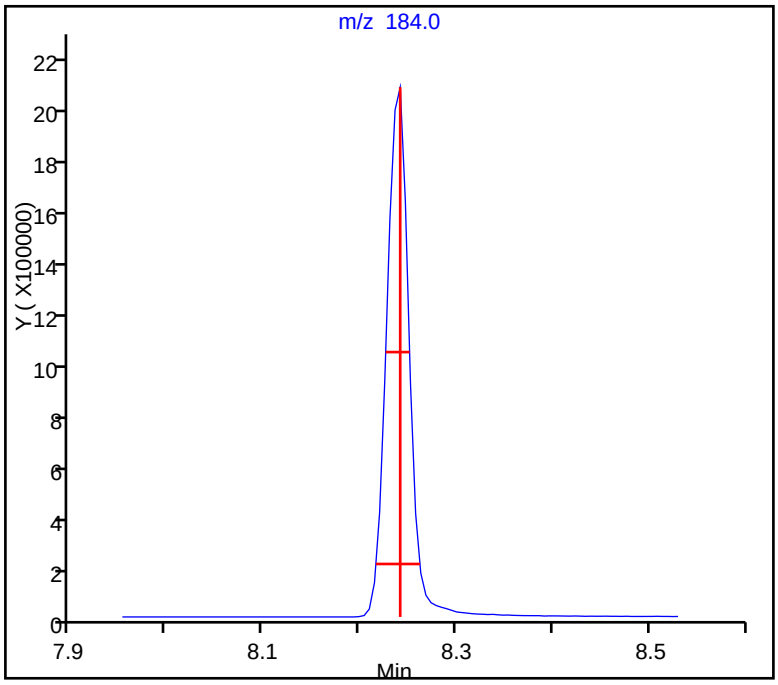
Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210002.D
Injection Date: 21-Oct-2016 11:34:30 Instrument ID: CH732
Lims ID: DFTPP
Client ID:
Operator ID: 003200 ALS Bottle#: 1 Worklist Smp#: 2
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Method: BNA_CH732 Limit Group: BNA 8270D ICAL

191 Benzidine_T, Detector: MS SCAN

Peak Tailing Factor =
BackWidth/FrontWidth @ 10% Peak Height

Back Width = 0.021 (min.)
Front Width = 0.025 (min.)

Tailing Factor = 0.8, Max. Tailing < 2.00
Passed



FORM I
GC/MS SEMI VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: MB 180-191579/1-A

Matrix: Water | Lab File ID: D10210004.D

Analysis Method: 8270D LL | Date Collected:

Extract. Method: 3520C | Date Extracted: 10/18/2016 16:04

Sample wt/vol: 250(mL) | Date Analyzed: 10/21/2016 12:17

Con. Extract Vol.: 0.25(mL) | Dilution Factor: 1

Injection Volume: 2(uL) | Level: (low/med) Low

% Moisture: | GPC Cleanup:(Y/N) N

Analysis Batch No.: 191892 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
123-91-1	1,4-Dioxane	2.0	U	2.0	0.052

CAS NO.	SURROGATE	%REC	Q	LIMITS
321-60-8	2-Fluorobiphenyl	56		24-100
367-12-4	2-Fluorophenol (Surr)	61		20-100
118-79-6	2,4,6-Tribromophenol (Surr)	63		22-118
4165-60-0	Nitrobenzene-d5 (Surr)	59		25-105
4165-62-2	Phenol-d5 (Surr)	60		21-100
1718-51-0	Terphenyl-d14 (Surr)	56		20-124

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210004.D
Lims ID: MB 180-191579/1-A
Client ID:
Sample Type: MB
Inject. Date: 21-Oct-2016 12:17:30 ALS Bottle#: 3 Worklist Smp#: 4
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-004
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 12:50:02

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.198	6.204	-0.006	96	115387	8.00	8.00	
* 2 Naphthalene-d8	136	7.480	7.486	-0.006	99	523491	8.00	8.00	
* 3 Acenaphthene-d10	164	9.185	9.190	-0.005	93	358140	8.00	8.00	
* 4 Phenanthrene-d10	188	10.627	10.632	-0.005	97	694379	8.00	8.00	
* 5 Chrysene-d12	240	14.388	14.399	-0.011	97	666075	8.00	8.00	
* 6 Perylene-d12	264	17.278	17.283	-0.005	96	549456	8.00	8.00	
$ 7 2-Fluorophenol	112	4.756	4.761	-0.005	92	348915	40.0	24.3	
$ 8 Phenol-d5	99	5.814	5.819	-0.005	98	517688	40.0	23.8	
$ 9 Nitrobenzene-d5	82	6.754	6.759	-0.005	89	493497	40.0	23.4	
$ 10 2-Fluorobiphenyl	172	8.517	8.522	-0.005	100	1249990	40.0	22.5	
$ 11 2,4,6-Tribromophenol	330	9.938	9.943	-0.005	91	145983	40.0	25.2	
$ 12 Terphenyl-d14	244	12.556	12.555	0.001	99	1520974	40.0	22.2	
13 1,4-Dioxane	88		1.625					ND	
14 N-Nitrosodimethylamine	74		2.240					ND	
15 Pyridine	79		2.314					ND	
18 2-Picoline	93		4.030					ND	
19 N-Nitrosomethylethylamine	88		4.233					ND	
21 Methyl methanesulfonate	80		4.521					ND	
20 Acrylamide	71	4.756	4.689	0.067	26	1167			NC
23 N-Nitrosodiethylamine	102		5.115					ND	
24 Ethyl methanesulfonate	79		5.256					ND	
25 Benzaldehyde	77		5.739					ND	
28 Pentachloroethane	167		5.806					ND	
26 Phenol	94		5.835					ND	
27 Aniline	93		5.856					ND	
29 Bis(2-chloroethyl)ether	93		5.926					ND	
30 2-Chlorophenol	128		5.985					ND	
31 n-Decane	43		6.049					ND	
32 1,3-Dichlorobenzene	146		6.145					ND	
33 1,4-Dichlorobenzene	146		6.225					ND	
34 Benzyl alcohol	108		6.342					ND	
35 1,2-Dichlorobenzene	146		6.380					ND	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
36 2-Methylphenol	108		6.455					ND	
37 Indene	116		6.471					ND	
38 2,2'-oxybis[1-chloropropan	45		6.487					ND	
39 N-Nitrosopyrrolidine	100		6.578					ND	
42 4-Methylphenol	108		6.604					ND	
40 Acetophenone	105		6.610					ND	
41 N-Nitrosodi-n-propylamine	70		6.610					ND	
43 N-Nitrosomorpholine	116		6.632					ND	
44 2-Toluidine	106		6.664					ND	
45 Hexachloroethane	117		6.727					ND	
46 Nitrobenzene	77		6.781					ND	
47 N-Nitrosopiperidine	114		6.926					ND	
48 Isophorone	82		7.016					ND	
49 2-Nitrophenol	139		7.101					ND	
50 2,4-Dimethylphenol	107		7.133					ND	
51 o,o',o''-Triethylphosphoro	198		7.182					ND	
52 Benzoic acid	122		7.187					ND	
53 Bis(2-chloroethoxy)methane	93		7.224					ND	
54 2,4-Dichlorophenol	162		7.336					ND	
56 1,2,4-Trichlorobenzene	180		7.427					ND	
66 p-Phenylene diamine	108	7.480	7.435	0.045	48	51894			NC
55 alpha,alpha-Dimethyl phene	58		7.435					ND	
58 Naphthalene	128		7.507					ND	
61 Hexachloropropene	213		7.526					ND	
59 4-Chloroaniline	127		7.544					ND	
60 2,6-Dichlorophenol	162		7.555					ND	
62 Hexachlorobutadiene	225		7.630					ND	
63 Quinoline	129		7.786					ND	
65 N-Nitrosodi-n-butylamine	84		7.818					ND	
64 Caprolactam	113		7.849					ND	
67 4-Chloro-3-methylphenol	107		7.999					ND	
68 Safrole, Total	162		8.026					ND	
69 2-Methylnaphthalene	142		8.175					ND	
71 1-Methylnaphthalene	142		8.271					ND	
72 Hexachlorocyclopentadiene	237		8.335					ND	
73 1,2,4,5-Tetrachlorobenzene	216		8.340					ND	
74 2,4,6-Trichlorophenol	196		8.442					ND	
75 2,4,5-Trichlorophenol	196		8.474					ND	
81 1,4-Dinitrobenzene	168	8.517	8.477	0.040	30	15132			NC
80 1,4-Naphthoquinone	158	8.511	8.477	0.034	44	2072			NC
180 Isosafrole	162		8.514					ND	
78 1-Chloronaphthalene	162		8.616					ND	
76 1,1'-Biphenyl	154		8.618					ND	
77 2-Chloronaphthalene	162		8.650					ND	
79 2-Nitroaniline	65		8.730					ND	
82 Dimethyl phthalate	163		8.891					ND	
83 1,3-Dinitrobenzene	168		8.923					ND	
84 2,6-Dinitrotoluene	165		8.955					ND	
85 Acenaphthylene	152		9.056					ND	
86 3-Nitroaniline	138		9.120					ND	
87 2,4-Dinitrophenol	184		9.217					ND	
88 Acenaphthene	153		9.217					ND	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
89 4-Nitrophenol	109		9.254					ND	
92 Pentachlorobenzene	250		9.294					ND	
91 2,4-Dinitrotoluene	165		9.339					ND	
94 1-Naphthylamine	143		9.340					ND	
93 Dibenzofuran	168		9.382					ND	
95 2,3,5,6-Tetrachlorophenol	232		9.452					ND	
96 2,3,4,6-Tetrachlorophenol	232		9.494					ND	
97 2-Naphthylamine	143		9.526					ND	
98 Diethyl phthalate	149		9.558					ND	
99 Hexadecane	57		9.564					ND	
100 4-Chlorophenyl phenyl ethe	204		9.692					ND	
101 4-Nitroaniline	138		9.703					ND	
103 Fluorene	166		9.713					ND	
104 4,6-Dinitro-2-methylphenol	198		9.735					ND	
105 N-Nitrosodiphenylamine	169		9.799					ND	
57 Azobenzene	77		9.842					ND	
90 1,2-Diphenylhydrazine	77		9.842					ND	
107 1,3,5-Trinitrobenzene	213		9.896					ND	
114 4-Aminobiphenyl	169	9.938	9.898	0.040	57	6890			NC
117 Pronamide	173	9.933	9.898	0.034	56	2958			NC
102 N-Nitro-o-toluidine	152	9.933	9.898	0.034	40	2805			NC
108 Phenacetin	108		9.939					ND	
109 Phorate	121		9.944					ND	
111 Dimethoate	87		10.099					ND	
110 4-Bromophenyl phenyl ether	248		10.162					ND	
112 Hexachlorobenzene	284		10.253					ND	
113 Atrazine	200		10.280					ND	
118 Pentachloronitrobenzene	237		10.302					ND	
119 Disulfoton	88		10.419					ND	
116 Pentachlorophenol	266		10.424					ND	
115 n-Octadecane	57		10.429					ND	
120 Dinoseb	211		10.545					ND	
123 Hexachlorophene TIC	198		10.600					ND	
121 Phenanthrene	178		10.654					ND	
122 Anthracene	178		10.707					ND	
125 Methyl parathion	109		10.793					ND	
124 Carbazole	167		10.857					ND	
126 Di-n-butyl phthalate	149		11.183					ND	
127 Ethyl Parathion	109		11.189					ND	
128 4-Nitroquinoline-1-oxide	190		11.263					ND	
129 Methapyrilene	58		11.317					ND	
70 Diphenamid	167		11.471					ND	
106 Diphenylamine	167		11.620					ND	
130 Isodrin	193		11.821					ND	
131 Fluoranthene	202		12.059					ND	
132 Benzidine	184		12.198					ND	
133 Pyrene	202		12.385					ND	
134 1,2,3,4 -Tetrachlorobenzen	216		12.511					ND	
139 3,3'-Dimethylbenzidine	212	12.556	12.511	0.045	56	104162			NC
135 p-Dimethylamino azobenzene	225	12.556	12.516	0.040	48	8981			NC
136 Chlorobenzilate	139		12.783					ND	
137 Famphur	218		12.850					ND	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
140 Kepone	272		13.030					ND	
138 Butyl benzyl phthalate	149		13.303					ND	
141 2-Acetylaminofluorene	181		13.363					ND	
142 Thionazin	97		13.789					ND	
143 4,4'-Methylene bis(2-chlor	231		13.881					ND	
144 3,3'-Dichlorobenzidine	252		14.297					ND	
145 Bis(2-ethylhexyl) phthalat	149		14.350					ND	
146 Benzo[a]anthracene	228		14.372					ND	
147 Chrysene	228		14.441					ND	
148 Sulfotepp	97		14.530					ND	
149 6-Methylchrysene	242		14.907					ND	
150 Di-n-octyl phthalate	149		15.654					ND	
151 7,12-Dimethylbenz(a)anthra	256		16.487					ND	
152 Benzo[b]fluoranthene	252		16.509					ND	
153 Benzo[k]fluoranthene	252		16.562					ND	
219 Benzo[e]pyrene	252		17.064					ND	
154 Benzo[a]pyrene	252		17.166					ND	
155 3-Methylcholanthrene	268		17.524					ND	
156 Dibenz[a,h]acridine	279		18.636					ND	
220 Dibenz[a,j]acridine	279		19.247					ND	
157 Indeno[1,2,3-cd]pyrene	276		19.661					ND	
158 Dibenz(a,h)anthracene	278		19.687					ND	
159 Benzo[g,h,i]perylene	276		20.350					ND	
179 2,5-Dichlorophenol	162		0.000					ND	
185 4-Nitrobiphenyl	199		0.000					ND	
188 2-Bromonaphthalene	127		0.000					ND	
160 n,n'-Dimethylaniline	120		0.000					ND	
162 3-Chlorobenzoic Acid	139		0.000					ND	
212 2,3,7,8-TCDD TIC	1		0.000					ND	
170 4-tert-Octylphenol	135		0.000					ND	
169 Octachlorostyrene	308		0.000					ND	
218 Benzotrichloride TIC	1		0.000					ND	
173 Octachlorocyclopentene	307		0.000					ND	
167 Phthalic anhydride	104		0.000					ND	
187 1,2-Dibromo-3-Chloropropan	157		0.000					ND	
181 4-Chlorobenzoic Acid	139		0.000					ND	
175 1,2,3-Trimethylbenzene	105		0.000					ND	
163 Diallate Peak 2	86		0.000					ND	
172 Carbaryl	144		0.000					ND	
164 Aramite Peak 2	185		0.000					ND	
184 Diallate Peak 1	86		0.000					ND	
166 4-Chloro-3-nitro-alpha,alp	179		0.000					ND	
171 4-Methyl-1-cyclohexanemeth	97		0.000					ND	
168 Aramite Peak 1	185		0.000					ND	
186 o-Phenylphenol	1		0.000					ND	
165 Benzotrichloride	159		0.000					ND	
174 2-Chlorobenzoic Acid	139		0.000					ND	
161 4-Methyl-1-cyclohexanemeth	97		0.000					ND	
177 1,2,3,4-Tetrahydronaphthal	104		0.000					ND	
178 Trifluralin	306		0.000					ND	
215 1-Phenyl-1-(2,4-dimethylph	1		0.000					ND	
176 Dimethylformamide	73		0.000					ND	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
182 4-Chlorophenol	128		0.000					ND	
214 1-Phenyl-1-(4-methylphenyl	1		0.000					ND	
222 2-Butoxyethanol	1		0.000					ND	
213 3-Methylphenol	1		0.000					ND	
223 2,6-Dichlorotoluene	1		0.000					ND	
183 2,3-Dichlorophenol	162		0.000					ND	
189 Pentachlorophenol_T	266		5.586					ND	
191 Benzidine_T	184		8.242					ND	
192 4,4'-DDE	246		8.573					ND	
194 4,4'-DDT	235		9.326					ND	
193 4,4'-DDD	235		9.924					ND	
S 195 Aramite, Total	185		1.000					ND	
S 196 4-Methyl-1-cyclohexanemeth	97		0.000					ND	
S 197 Methyl Phenols,Total	108		0.000					ND	
S 198 Diallate	86		0.000					ND	
S 199 Total Cresols	108		0.000					ND	
T 216 1-Phenyl-1-(2,4-dimethylph	195		9.600					ND	
T 217 1-Phenyl-1-(4-methylphenyl	181		9.700					ND	
T 221 Phenyl ether TIC	170	9.938	11.500	-1.562	0	21253		0.4747	
T 200 Quinoline TIC	129		0.000					ND	

QC Flag Legend

Processing Flags

NC - Not Calibrated

Reagents:

SVTAPITINTRNi_00012 Amount Added: 1.00 Units: uL Run Reagent

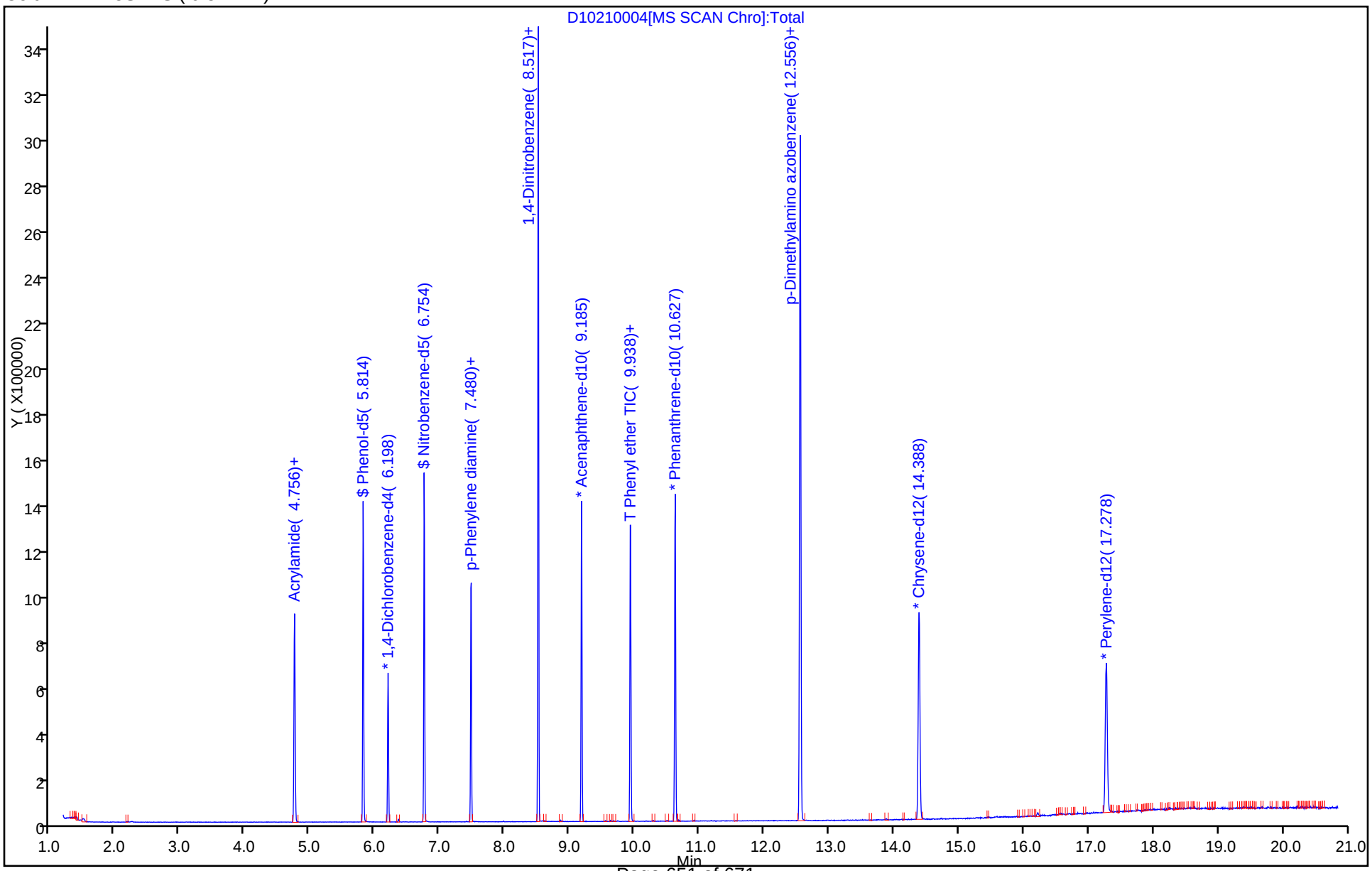
Report Date: 22-Oct-2016 05:59:45 Chrom Revision: 2.2 17-Oct-2016 09:27:18

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210004.D

Injection Date:	21-Oct-2016 12:17:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	MB 180-191579/1-A			Worklist Smp#:	4
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	3
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210004.D
Lims ID: MB 180-191579/1-A
Client ID:
Sample Type: MB
Inject. Date: 21-Oct-2016 12:17:30 ALS Bottle#: 3 Worklist Smp#: 4
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-004
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 12:50:02

Compound	Amount Added	Amount Recovered	% Rec.
$ 7 2-Fluorophenol	40.0	24.3	60.84
$ 8 Phenol-d5	40.0	23.8	59.53
$ 9 Nitrobenzene-d5	40.0	23.4	58.62
$ 10 2-Fluorobiphenyl	40.0	22.5	56.29
$ 11 2,4,6-Tribromophenol	40.0	25.2	63.08
$ 12 Terphenyl-d14	40.0	22.2	55.59

FORM I
GC/MS SEMI VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: LCS 180-191579/2-A

Matrix: Water | Lab File ID: D10210005.D

Analysis Method: 8270D LL | Date Collected:

Extract. Method: 3520C | Date Extracted: 10/18/2016 16:04

Sample wt/vol: 250(mL) | Date Analyzed: 10/21/2016 12:44

Con. Extract Vol.: 0.25(mL) | Dilution Factor: 1

Injection Volume: 2(uL) | Level: (low/med) Low

% Moisture: | GPC Cleanup:(Y/N) N

Analysis Batch No.: 191892 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
123-91-1	1,4-Dioxane	13.1		2.0	0.052

CAS NO.	SURROGATE	%REC	Q	LIMITS
321-60-8	2-Fluorobiphenyl	56		24-100
367-12-4	2-Fluorophenol (Surr)	67		20-100
118-79-6	2,4,6-Tribromophenol (Surr)	64		22-118
4165-60-0	Nitrobenzene-d5 (Surr)	62		25-105
4165-62-2	Phenol-d5 (Surr)	64		21-100
1718-51-0	Terphenyl-d14 (Surr)	59		20-124

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210005.D
Lims ID: LCS 180-191579/2-A
Client ID:
Sample Type: LCS
Inject. Date: 21-Oct-2016 12:44:30 ALS Bottle#: 4 Worklist Smp#: 5
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-005
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 13:43:15

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.204	6.204	0.000	96	117154	8.00	8.00	
* 2 Naphthalene-d8	136	7.480	7.486	-0.006	99	530083	8.00	8.00	
* 3 Acenaphthene-d10	164	9.185	9.190	-0.005	91	366177	8.00	8.00	
* 4 Phenanthrene-d10	188	10.632	10.632	0.000	97	690469	8.00	8.00	
* 5 Chrysene-d12	240	14.399	14.399	0.000	97	622483	8.00	8.00	
* 6 Perylene-d12	264	17.289	17.283	0.006	96	545737	8.00	8.00	
$ 7 2-Fluorophenol	112	4.756	4.761	-0.005	93	392472	40.0	27.0	
$ 8 Phenol-d5	99	5.819	5.819	0.000	98	568953	40.0	25.8	
$ 9 Nitrobenzene-d5	82	6.759	6.759	0.000	88	526726	40.0	24.7	
$ 10 2-Fluorobiphenyl	172	8.517	8.522	-0.005	99	1280196	40.0	22.6	
$ 11 2,4,6-Tribromophenol	330	9.943	9.943	0.000	91	146651	40.0	25.5	
$ 12 Terphenyl-d14	244	12.561	12.555	0.006	99	1519232	40.0	23.8	
13 1,4-Dioxane	88	1.620	1.625	-0.005	92	112834	40.0	26.1	
14 N-Nitrosodimethylamine	74	2.224	2.240	-0.016	93	173408	40.0	28.3	
15 Pyridine	79	2.293	2.314	-0.021	97	323618	40.0	29.0	
25 Benzaldehyde	77	5.734	5.739	-0.005	96	452812	40.0	37.1	
26 Phenol	94	5.830	5.835	-0.005	99	607925	40.0	25.3	
27 Aniline	93	5.851	5.856	-0.005	97	633144	40.0	25.6	
29 Bis(2-chloroethyl)ether	93	5.920	5.926	-0.006	96	426586	40.0	23.6	
30 2-Chlorophenol	128	5.979	5.985	-0.006	97	456730	40.0	24.2	
31 n-Decane	43	6.043	6.049	-0.006	90	405427	40.0	21.9	
32 1,3-Dichlorobenzene	146	6.145	6.145	0.000	98	508329	40.0	22.7	
33 1,4-Dichlorobenzene	146	6.220	6.225	-0.005	94	512173	40.0	22.6	
34 Benzyl alcohol	108	6.337	6.342	-0.005	92	288103	40.0	23.8	
35 1,2-Dichlorobenzene	146	6.375	6.380	-0.005	97	500698	40.0	22.6	
36 2-Methylphenol	108	6.455	6.455	0.000	96	421218	40.0	24.6	
37 Indene	116	6.465	6.471	-0.006	90	770902	40.0	23.0	
38 2,2'-oxybis[1-chloropropan	45	6.481	6.487	-0.006	94	599036	40.0	23.7	
42 4-Methylphenol	108	6.604	6.604	0.000	72	426167	40.0	24.4	
40 Acetophenone	105	6.604	6.610	-0.006	80	535360	40.0	21.3	
41 N-Nitrosodi-n-propylamine	70	6.604	6.610	-0.006	73	308519	40.0	24.9	
45 Hexachloroethane	117	6.727	6.727	0.000	95	212110	40.0	22.1	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
46 Nitrobenzene	77	6.781	6.781	0.000	88	514719	40.0	24.3	
48 Isophorone	82	7.016	7.016	0.000	100	951019	40.0	23.9	
49 2-Nitrophenol	139	7.101	7.101	0.000	95	276682	40.0	24.8	
50 2,4-Dimethylphenol	107	7.128	7.133	-0.005	96	499333	40.0	24.7	
52 Benzoic acid	122	7.203	7.187	0.016	87	334126	40.0	30.0	
53 Bis(2-chloroethoxy)methane	93	7.219	7.224	-0.005	98	591056	40.0	22.8	
54 2,4-Dichlorophenol	162	7.336	7.336	0.000	93	460154	40.0	25.0	
56 1,2,4-Trichlorobenzene	180	7.422	7.427	-0.005	94	501207	40.0	22.8	
58 Naphthalene	128	7.502	7.507	-0.005	97	1516254	40.0	23.0	
59 4-Chloroaniline	127	7.545	7.544	0.001	97	610990	40.0	22.3	
60 2,6-Dichlorophenol	162	7.555	7.555	0.000	98	434750	40.0	24.1	
62 Hexachlorobutadiene	225	7.625	7.630	-0.005	95	296919	40.0	23.9	
64 Caprolactam	113	7.854	7.849	0.005	79	154204	40.0	24.1	
67 4-Chloro-3-methylphenol	107	7.999	7.999	0.000	97	474823	40.0	25.7	
69 2-Methylnaphthalene	142	8.175	8.175	0.000	93	1060288	40.0	23.2	
71 1-Methylnaphthalene	142	8.271	8.271	0.000	93	980234	40.0	22.6	
72 Hexachlorocyclopentadiene	237	8.330	8.335	-0.005	95	339174	40.0	25.0	
73 1,2,4,5-Tetrachlorobenzene	216	8.341	8.340	0.001	97	520311	40.0	21.7	
74 2,4,6-Trichlorophenol	196	8.442	8.442	0.000	92	373752	40.0	23.9	
75 2,4,5-Trichlorophenol	196	8.474	8.474	0.000	95	383600	40.0	23.8	
76 1,1'-Biphenyl	154	8.618	8.618	0.000	94	1338168	40.0	22.2	
77 2-Chloronaphthalene	162	8.650	8.650	0.000	95	1053113	40.0	21.5	
79 2-Nitroaniline	65	8.731	8.730	0.000	85	334800	40.0	25.1	
82 Dimethyl phthalate	163	8.885	8.891	-0.006	99	1244236	40.0	23.9	
83 1,3-Dinitrobenzene	168	8.923	8.923	0.000	86	198701	40.0	24.7	
84 2,6-Dinitrotoluene	165	8.950	8.955	-0.005	95	288872	40.0	23.8	
85 Acenaphthylene	152	9.051	9.056	-0.005	98	1718429	40.0	23.3	
86 3-Nitroaniline	138	9.120	9.120	0.000	95	326796	40.0	23.9	
87 2,4-Dinitrophenol	184	9.217	9.217	0.000	68	361202	80.0	58.8	
88 Acenaphthene	153	9.217	9.217	0.000	88	1027582	40.0	20.7	
89 4-Nitrophenol	109	9.254	9.254	0.000	91	315472	80.0	54.6	
91 2,4-Dinitrotoluene	165	9.340	9.339	0.001	95	402316	40.0	25.0	
93 Dibenzofuran	168	9.382	9.382	0.000	97	1588051	40.0	22.8	
96 2,3,4,6-Tetrachlorophenol	232	9.494	9.494	0.000	72	336313	40.0	25.2	
98 Diethyl phthalate	149	9.559	9.558	0.001	98	1158392	40.0	23.8	
99 Hexadecane	57	9.564	9.564	0.000	91	805564	40.0	22.5	
100 4-Chlorophenyl phenyl ethe	204	9.692	9.692	0.000	90	657545	40.0	23.1	
101 4-Nitroaniline	138	9.703	9.703	0.000	86	307813	40.0	23.0	
103 Fluorene	166	9.713	9.713	0.000	94	1246720	40.0	22.6	
104 4,6-Dinitro-2-methylphenol	198	9.735	9.735	0.000	90	496331	80.0	50.5	
105 N-Nitrosodiphenylamine	169	9.799	9.799	0.000	60	998133	40.0	21.8	
57 Azobenzene	77	9.842	9.842	0.000	98	1335659	40.0	20.7	
90 1,2-Diphenylhydrazine	77	9.842	9.842	0.000	98	1335659	40.0	20.7	
110 4-Bromophenyl phenyl ether	248	10.162	10.162	0.000	66	389644	40.0	22.8	
112 Hexachlorobenzene	284	10.248	10.253	-0.005	93	358190	40.0	22.3	
113 Atrazine	200	10.280	10.280	0.000	93	238564	40.0	14.9	
116 Pentachlorophenol	266	10.424	10.424	0.000	91	446939	80.0	46.4	
115 n-Octadecane	57	10.429	10.429	0.000	94	876943	40.0	24.0	
121 Phenanthrene	178	10.654	10.654	0.000	97	1990439	40.0	22.4	
122 Anthracene	178	10.707	10.707	0.000	97	2059377	40.0	22.3	
124 Carbazole	167	10.857	10.857	0.000	95	1902166	40.0	22.2	
126 Di-n-butyl phthalate	149	11.183	11.183	0.000	100	2307658	40.0	24.2	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
131 Fluoranthene	202	12.059	12.059	0.000	97	2333191	40.0	23.9	
132 Benzidine	184	12.198	12.198	0.000	100	745020	40.0	16.2	
133 Pyrene	202	12.385	12.385	0.000	98	2318156	40.0	22.7	
138 Butyl benzyl phthalate	149	13.309	13.303	0.006	97	995093	40.0	24.4	
144 3,3'-Dichlorobenzidine	252	14.302	14.297	0.005	74	737749	40.0	24.4	
145 Bis(2-ethylhexyl) phthalat	149	14.351	14.350	0.001	97	1316398	40.0	25.1	
146 Benzo[a]anthracene	228	14.377	14.372	0.005	98	2011425	40.0	22.6	
147 Chrysene	228	14.447	14.441	0.006	97	1944958	40.0	22.9	
150 Di-n-octyl phthalate	149	15.659	15.654	0.005	99	2258928	40.0	22.3	
152 Benzo[b]fluoranthene	252	16.514	16.509	0.005	98	1904467	40.0	21.3	
153 Benzo[k]fluoranthene	252	16.568	16.562	0.006	99	1940185	40.0	22.1	
154 Benzo[a]pyrene	252	17.182	17.166	0.016	78	1838189	40.0	22.1	
157 Indeno[1,2,3-cd]pyrene	276	19.666	19.661	0.005	98	1833603	40.0	22.3	M
158 Dibenz(a,h)anthracene	278	19.703	19.687	0.016	91	1529351	40.0	22.3	
159 Benzo[g,h,i]perylene	276	20.361	20.350	0.011	90	1573238	40.0	22.4	M
S 197 Methyl Phenols,Total	108				0		80.0	49.0	
S 199 Total Cresols	108				0		80.0	49.0	

QC Flag Legend

Review Flags

M - Manually Integrated

Reagents:

SVTAPITINTRNi_00012 Amount Added: 1.00 Units: uL Run Reagent

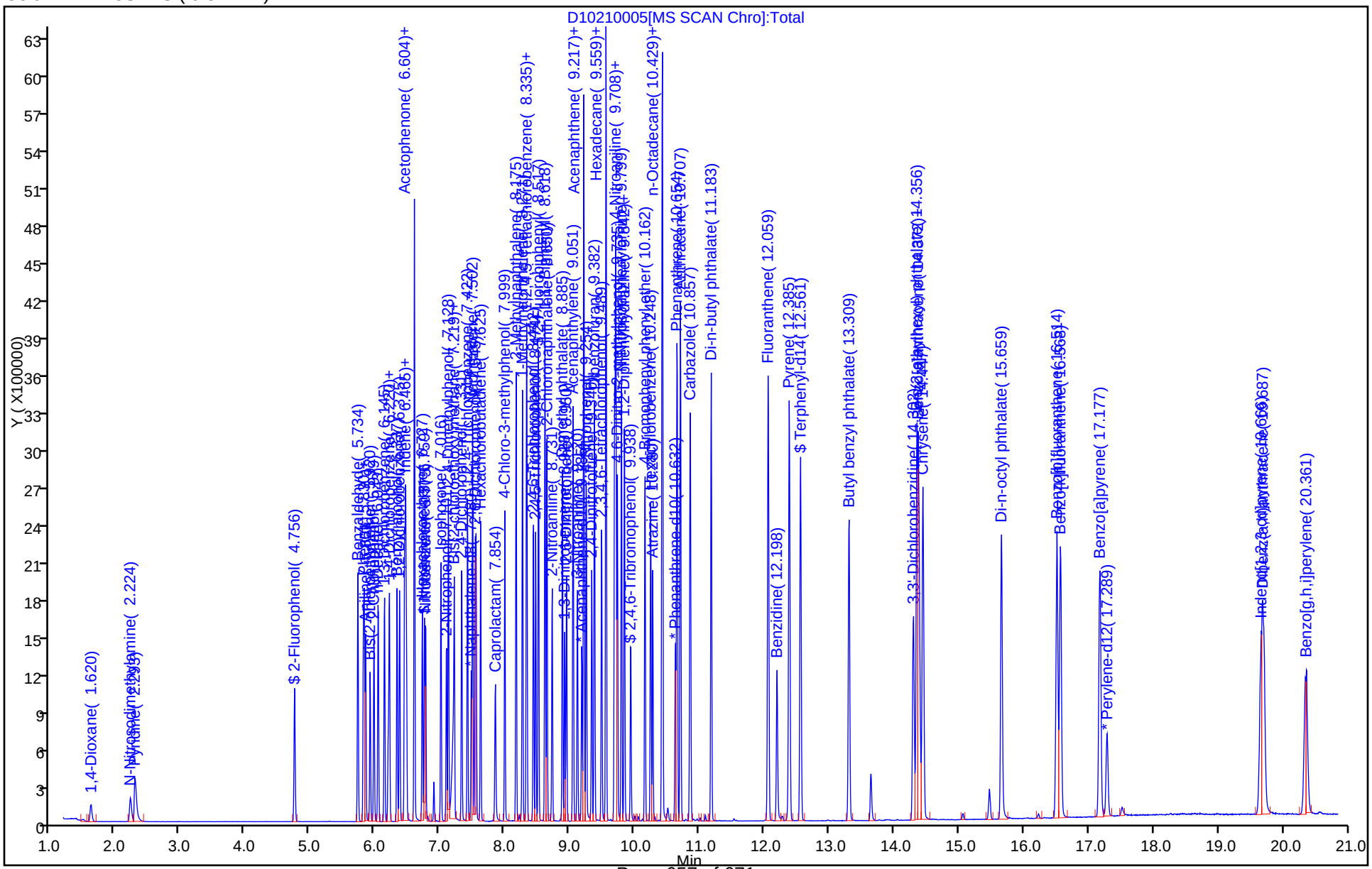
Report Date: 22-Oct-2016 05:59:48 Chrom Revision: 2.2 17-Oct-2016 09:27:18

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210005.D

Injection Date:	21-Oct-2016 12:44:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	LCS 180-191579/2-A			Worklist Smp#:	5
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	4
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210005.D
Lims ID: LCS 180-191579/2-A
Client ID:
Sample Type: LCS
Inject. Date: 21-Oct-2016 12:44:30 ALS Bottle#: 4 Worklist Smp#: 5
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-005
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 13:43:15

Compound	Amount Added	Amount Recovered	% Rec.
$ 7 2-Fluorophenol	40.0	27.0	67.40
$ 8 Phenol-d5	40.0	25.8	64.44
$ 9 Nitrobenzene-d5	40.0	24.7	61.79
$ 10 2-Fluorobiphenyl	40.0	22.6	56.39
$ 11 2,4,6-Tribromophenol	40.0	25.5	63.72
$ 12 Terphenyl-d14	40.0	23.8	59.41

FORM I
GC/MS SEMI VOA ORGANICS ANALYSIS DATA SHEET

Lab Name: TestAmerica Pittsburgh | Job No.: 180-59749-1

SDG No.:

Client Sample ID: | Lab Sample ID: LCSD 180-191579/3-A

Matrix: Water | Lab File ID: D10210006.D

Analysis Method: 8270D LL | Date Collected:

Extract. Method: 3520C | Date Extracted: 10/18/2016 16:04

Sample wt/vol: 250(mL) | Date Analyzed: 10/21/2016 13:11

Con. Extract Vol.: 0.25(mL) | Dilution Factor: 1

Injection Volume: 2(uL) | Level: (low/med) Low

% Moisture: | GPC Cleanup:(Y/N) N

Analysis Batch No.: 191892 | Units: ug/L

CAS NO.	COMPOUND NAME	RESULT	Q	RL	MDL
123-91-1	1,4-Dioxane	13.0		2.0	0.052

CAS NO.	SURROGATE	%REC	Q	LIMITS
321-60-8	2-Fluorobiphenyl	58		24-100
367-12-4	2-Fluorophenol (Surr)	67		20-100
118-79-6	2,4,6-Tribromophenol (Surr)	65		22-118
4165-60-0	Nitrobenzene-d5 (Surr)	62		25-105
4165-62-2	Phenol-d5 (Surr)	64		21-100
1718-51-0	Terphenyl-d14 (Surr)	60		20-124

TestAmerica Pittsburgh
Target Compound Quantitation Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210006.D
Lims ID: LCSD 180-191579/3-A
Client ID:
Sample Type: LCSD
Inject. Date: 21-Oct-2016 13:11:30 ALS Bottle#: 5 Worklist Smp#: 6
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-006
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 14:15:55

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
* 1 1,4-Dichlorobenzene-d4	152	6.193	6.204	-0.011	96	108165	8.00	8.00	
* 2 Naphthalene-d8	136	7.475	7.486	-0.011	100	482387	8.00	8.00	
* 3 Acenaphthene-d10	164	9.185	9.190	-0.005	92	327155	8.00	8.00	
* 4 Phenanthrene-d10	188	10.627	10.632	-0.005	97	624724	8.00	8.00	
* 5 Chrysene-d12	240	14.393	14.399	-0.006	97	580845	8.00	8.00	
* 6 Perylene-d12	264	17.283	17.283	0.000	97	522524	8.00	8.00	
$ 7 2-Fluorophenol	112	4.751	4.761	-0.010	92	362301	40.0	27.0	
$ 8 Phenol-d5	99	5.814	5.819	-0.005	97	520127	40.0	25.5	
$ 9 Nitrobenzene-d5	82	6.754	6.759	-0.005	88	478363	40.0	24.7	
$ 10 2-Fluorobiphenyl	172	8.517	8.522	-0.005	100	1186555	40.0	23.4	
$ 11 2,4,6-Tribromophenol	330	9.938	9.943	-0.005	89	136185	40.0	26.2	
$ 12 Terphenyl-d14	244	12.556	12.555	0.001	100	1443088	40.0	24.2	
13 1,4-Dioxane	88	1.609	1.625	-0.016	93	103518	40.0	25.9	
14 N-Nitrosodimethylamine	74	2.213	2.240	-0.027	93	162111	40.0	28.7	
15 Pyridine	79	2.288	2.314	-0.026	97	299174	40.0	29.0	
25 Benzaldehyde	77	5.728	5.739	-0.011	96	404637	40.0	35.9	
26 Phenol	94	5.824	5.835	-0.011	99	557013	40.0	25.1	
27 Aniline	93	5.846	5.856	-0.010	97	579962	40.0	25.4	
29 Bis(2-chloroethyl)ether	93	5.915	5.926	-0.011	96	396372	40.0	23.8	
30 2-Chlorophenol	128	5.974	5.985	-0.011	97	421564	40.0	24.2	
31 n-Decane	43	6.038	6.049	-0.011	90	371723	40.0	21.7	
32 1,3-Dichlorobenzene	146	6.140	6.145	-0.005	98	468573	40.0	22.6	
33 1,4-Dichlorobenzene	146	6.214	6.225	-0.011	95	480226	40.0	22.9	
34 Benzyl alcohol	108	6.332	6.342	-0.010	92	268208	40.0	24.0	
35 1,2-Dichlorobenzene	146	6.369	6.380	-0.011	98	461387	40.0	22.6	
36 2-Methylphenol	108	6.449	6.455	-0.006	96	394085	40.0	25.0	
37 Indene	116	6.460	6.471	-0.011	89	715301	40.0	23.1	
38 2,2'-oxybis[1-chloropropan	45	6.476	6.487	-0.011	93	551624	40.0	23.6	
42 4-Methylphenol	108	6.599	6.604	-0.005	78	400959	40.0	24.9	
40 Acetophenone	105	6.599	6.610	-0.011	82	492364	40.0	21.2	
41 N-Nitrosodi-n-propylamine	70	6.599	6.610	-0.011	76	285194	40.0	24.9	
45 Hexachloroethane	117	6.722	6.727	-0.005	95	195878	40.0	22.1	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
46 Nitrobenzene	77	6.775	6.781	-0.006	87	477901	40.0	24.8	
48 Isophorone	82	7.010	7.016	-0.006	100	883350	40.0	24.4	
49 2-Nitrophenol	139	7.096	7.101	-0.005	94	256593	40.0	25.3	
50 2,4-Dimethylphenol	107	7.123	7.133	-0.010	96	476483	40.0	25.9	
52 Benzoic acid	122	7.197	7.187	0.010	91	306841	40.0	30.3	
53 Bis(2-chloroethoxy)methane	93	7.213	7.224	-0.011	98	546193	40.0	23.1	
54 2,4-Dichlorophenol	162	7.331	7.336	-0.005	94	413278	40.0	24.6	
56 1,2,4-Trichlorobenzene	180	7.416	7.427	-0.011	94	469799	40.0	23.4	
58 Naphthalene	128	7.496	7.507	-0.011	97	1396447	40.0	23.2	
59 4-Chloroaniline	127	7.539	7.544	-0.005	97	568978	40.0	22.8	
60 2,6-Dichlorophenol	162	7.550	7.555	-0.005	98	400835	40.0	24.4	
62 Hexachlorobutadiene	225	7.619	7.630	-0.011	95	275546	40.0	24.3	
64 Caprolactam	113	7.849	7.849	0.000	79	146365	40.0	25.1	
67 4-Chloro-3-methylphenol	107	7.993	7.999	-0.006	97	441226	40.0	26.2	
69 2-Methylnaphthalene	142	8.170	8.175	-0.005	92	985240	40.0	23.7	
71 1-Methylnaphthalene	142	8.266	8.271	-0.005	94	934201	40.0	23.7	
72 Hexachlorocyclopentadiene	237	8.330	8.335	-0.005	95	314012	40.0	25.9	
73 1,2,4,5-Tetrachlorobenzene	216	8.335	8.340	-0.005	97	483530	40.0	22.6	
74 2,4,6-Trichlorophenol	196	8.437	8.442	-0.005	92	341299	40.0	24.4	
75 2,4,5-Trichlorophenol	196	8.469	8.474	-0.005	95	363375	40.0	25.2	
76 1,1'-Biphenyl	154	8.613	8.618	-0.005	95	1247120	40.0	23.1	
77 2-Chloronaphthalene	162	8.645	8.650	-0.005	95	984601	40.0	22.5	
79 2-Nitroaniline	65	8.725	8.730	-0.005	84	312467	40.0	26.2	
82 Dimethyl phthalate	163	8.885	8.891	-0.006	99	1154498	40.0	24.8	
83 1,3-Dinitrobenzene	168	8.918	8.923	-0.005	87	188302	40.0	26.2	
84 2,6-Dinitrotoluene	165	8.950	8.955	-0.005	96	265695	40.0	24.5	
85 Acenaphthylene	152	9.046	9.056	-0.010	98	1575800	40.0	23.9	
86 3-Nitroaniline	138	9.115	9.120	-0.005	95	300267	40.0	24.6	
87 2,4-Dinitrophenol	184	9.211	9.217	-0.006	68	342574	80.0	62.4	
88 Acenaphthene	153	9.217	9.217	0.000	89	959299	40.0	21.6	
89 4-Nitrophenol	109	9.254	9.254	0.000	90	287373	80.0	55.6	
91 2,4-Dinitrotoluene	165	9.334	9.339	-0.005	95	373734	40.0	26.0	
93 Dibenzofuran	168	9.377	9.382	-0.005	97	1483457	40.0	23.8	
96 2,3,4,6-Tetrachlorophenol	232	9.489	9.494	-0.005	73	310331	40.0	26.1	
98 Diethyl phthalate	149	9.553	9.558	-0.005	98	1097091	40.0	25.2	
99 Hexadecane	57	9.559	9.564	-0.005	91	753535	40.0	23.2	
100 4-Chlorophenyl phenyl ethe	204	9.687	9.692	-0.005	91	630671	40.0	24.8	
101 4-Nitroaniline	138	9.703	9.703	0.000	88	291362	40.0	24.4	
103 Fluorene	166	9.708	9.713	-0.005	94	1162544	40.0	23.5	
104 4,6-Dinitro-2-methylphenol	198	9.730	9.735	-0.005	90	468774	80.0	52.8	
105 N-Nitrosodiphenylamine	169	9.794	9.799	-0.005	60	944880	40.0	22.8	
57 Azobenzene	77	9.842	9.842	0.000	98	1251816	40.0	21.4	
90 1,2-Diphenylhydrazine	77	9.842	9.842	0.000	98	1251816	40.0	21.4	
110 4-Bromophenyl phenyl ether	248	10.157	10.162	-0.005	66	372122	40.0	24.1	
112 Hexachlorobenzene	284	10.248	10.253	-0.005	94	340972	40.0	23.5	
113 Atrazine	200	10.274	10.280	-0.006	94	223443	40.0	15.4	
116 Pentachlorophenol	266	10.419	10.424	-0.005	92	417309	80.0	47.9	
115 n-Octadecane	57	10.429	10.429	0.000	95	820828	40.0	24.3	
121 Phenanthrene	178	10.654	10.654	0.000	97	1888199	40.0	23.5	
122 Anthracene	178	10.702	10.707	-0.005	97	1931540	40.0	23.1	
124 Carbazole	167	10.851	10.857	-0.006	95	1802265	40.0	23.3	
126 Di-n-butyl phthalate	149	11.177	11.183	-0.006	100	2156506	40.0	25.0	

Compound	Sig	RT (min.)	Adj RT (min.)	Dlt RT (min.)	Q	Response	Cal Amt ng	OnCol Amt ng	Flags
131 Fluoranthene	202	12.059	12.059	0.000	98	2199814	40.0	24.9	
132 Benzidine	184	12.192	12.198	-0.006	100	688940	40.0	16.1	
133 Pyrene	202	12.385	12.385	0.000	98	2217931	40.0	23.3	
138 Butyl benzyl phthalate	149	13.303	13.303	0.000	97	948700	40.0	25.0	
144 3,3'-Dichlorobenzidine	252	14.297	14.297	0.000	74	708939	40.0	25.1	
145 Bis(2-ethylhexyl) phthalat	149	14.351	14.350	0.001	96	1226734	40.0	25.1	
146 Benzo[a]anthracene	228	14.377	14.372	0.005	99	1899546	40.0	22.9	
147 Chrysene	228	14.441	14.441	0.000	97	1852098	40.0	23.4	
150 Di-n-octyl phthalate	149	15.654	15.654	0.000	99	2180334	40.0	22.5	
152 Benzo[b]fluoranthene	252	16.509	16.509	0.000	98	1838944	40.0	21.5	
153 Benzo[k]fluoranthene	252	16.562	16.562	0.000	99	1926666	40.0	22.9	
154 Benzo[a]pyrene	252	17.171	17.166	0.005	83	1822825	40.0	22.9	
157 Indeno[1,2,3-cd]pyrene	276	19.655	19.661	-0.006	98	1788082	40.0	22.8	
158 Dibenz(a,h)anthracene	278	19.698	19.687	0.011	89	1498520	40.0	22.8	
159 Benzo[g,h,i]perylene	276	20.350	20.350	0.000	97	1543095	40.0	22.9	
S 197 Methyl Phenols,Total	108				0		80.0	49.8	
S 199 Total Cresols	108				0		80.0	49.8	

Reagents:

SVTAPITINTRNi_00012 Amount Added: 1.00 Units: uL Run Reagent

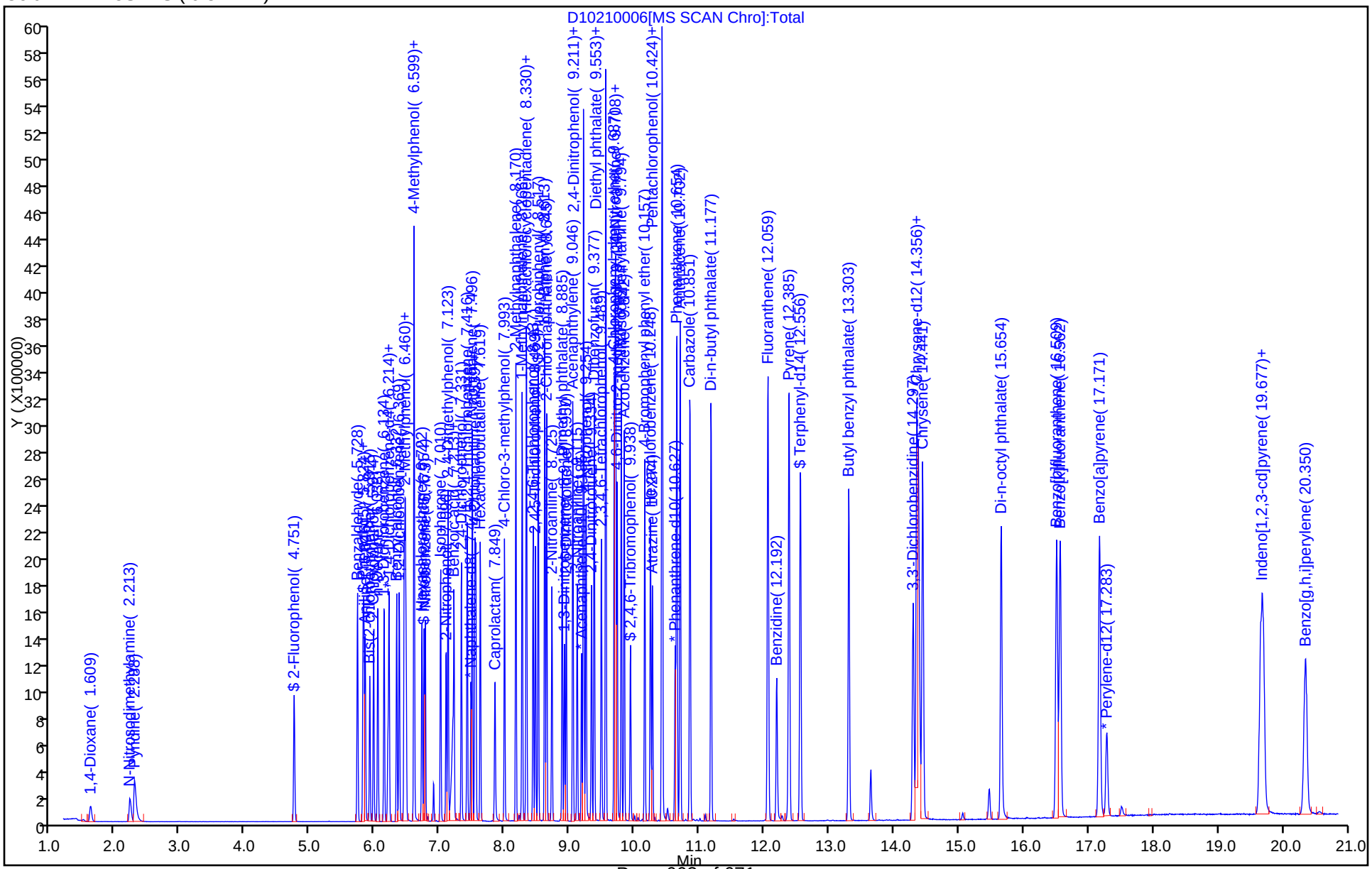
Report Date: 22-Oct-2016 05:59:49 Chrom Revision: 2.2 17-Oct-2016 09:27:18

TestAmerica Pittsburgh

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210006.D

Injection Date:	21-Oct-2016 13:11:30	Instrument ID:	CH732	Operator ID:	003200
Lims ID:	LCSD 180-191579/3-A			Worklist Smp#:	6
Client ID:					
Injection Vol:	2.0 ul	Dil. Factor:	1.0000	ALS Bottle#:	5
Method:	BNA_CH732	Limit Group:	BNA 8270D ICAL		

Column: Rxi-5SilMS (0.32 mm)



TestAmerica Pittsburgh
Recovery Report

Data File: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\D10210006.D
Lims ID: LCSD 180-191579/3-A
Client ID:
Sample Type: LCSD
Inject. Date: 21-Oct-2016 13:11:30 ALS Bottle#: 5 Worklist Smp#: 6
Injection Vol: 2.0 ul Dil. Factor: 1.0000
Sample Info: 180-0013973-006
Operator ID: 003200 Instrument ID: CH732

Method: \\ChromNA\Pittsburgh\ChromData\CH732\20161021-13973.b\BNA_CH732.m
Limit Group: BNA 8270D ICAL
Last Update: 22-Oct-2016 05:59:41 Calib Date: 28-Sep-2016 08:39:30
Integrator: RTE ID Type: Deconvolution ID
Quant Method: Internal Standard Quant By: Initial Calibration
Last ICal File: \\ChromNA\Pittsburgh\ChromData\CH732\20160928-13626.b\D09280010.D

Column 1 : Rxi-5SilMS (0.32 mm) Det: MS SCAN
Process Host: XAWRK005

First Level Reviewer: piccolinov Date: 21-Oct-2016 14:15:55

Compound	Amount Added	Amount Recovered	% Rec.
$ 7 2-Fluorophenol	40.0	27.0	67.39
$ 8 Phenol-d5	40.0	25.5	63.80
$ 9 Nitrobenzene-d5	40.0	24.7	61.67
$ 10 2-Fluorobiphenyl	40.0	23.4	58.50
$ 11 2,4,6-Tribromophenol	40.0	26.2	65.40
$ 12 Terphenyl-d14	40.0	24.2	60.48

GC/MS SEMI VOA ANALYSIS RUN LOG

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CH732 Start Date: 09/28/2016 05:12

Analysis Batch Number: 189377 End Date: 09/28/2016 09:33

LAB SAMPLE ID	CLIENT SAMPLE ID	DATE ANALYZED	DILUTION FACTOR	LAB FILE ID	COLUMN ID
DFTPP 180-189377/2		09/28/2016 05:12	1	D09280002.D	Rxi-5SilMS 0.32(mm)
IC 180-189377/3		09/28/2016 05:28	1	D09280003.D	Rxi-5SilMS 0.32(mm)
IC 180-189377/4		09/28/2016 05:55	1	D09280004.D	Rxi-5SilMS 0.32(mm)
IC 180-189377/5		09/28/2016 06:22	1	D09280005.D	Rxi-5SilMS 0.32(mm)
ICIS 180-189377/6		09/28/2016 06:49	1	D09280006.D	Rxi-5SilMS 0.32(mm)
IC 180-189377/7		09/28/2016 07:17	1	D09280007.D	Rxi-5SilMS 0.32(mm)
IC 180-189377/8		09/28/2016 07:44	1	D09280008.D	Rxi-5SilMS 0.32(mm)
IC 180-189377/9		09/28/2016 08:11	1	D09280009.D	Rxi-5SilMS 0.32(mm)
IC 180-189377/10		09/28/2016 08:39	1	D09280010.D	Rxi-5SilMS 0.32(mm)
ICV 180-189377/11		09/28/2016 09:06	1		Rxi-5SilMS 0.32(mm)
ICV 180-189377/12		09/28/2016 09:33	1		Rxi-5SilMS 0.32(mm)

GC/MS SEMI VOA ANALYSIS RUN LOG

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Instrument ID: CH732 Start Date: 10/21/2016 11:34

Analysis Batch Number: 191892 End Date: 10/21/2016 20:15

LAB SAMPLE ID	CLIENT SAMPLE ID	DATE ANALYZED	DILUTION FACTOR	LAB FILE ID	COLUMN ID
DFTPP 180-191892/2		10/21/2016 11:34	1	D10210002.D	Rxi-5SilMS 0.32(mm)
CCVIS 180-191892/3		10/21/2016 11:50	1	D10210003.D	Rxi-5SilMS 0.32(mm)
MB 180-191579/1-A		10/21/2016 12:17	1	D10210004.D	Rxi-5SilMS 0.32(mm)
LCS 180-191579/2-A		10/21/2016 12:44	1	D10210005.D	Rxi-5SilMS 0.32(mm)
LCSD 180-191579/3-A		10/21/2016 13:11	1	D10210006.D	Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 14:05	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 14:32	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 14:59	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 15:26	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 15:53	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 16:21	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 16:44	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 17:08	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 17:31	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 17:54	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 18:18	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 18:41	1		Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 19:04	1		Rxi-5SilMS 0.32(mm)
180-59749-4		10/21/2016 19:28	1	D10210021.D	Rxi-5SilMS 0.32(mm)
180-59749-5		10/21/2016 19:51	1	D10210022.D	Rxi-5SilMS 0.32(mm)
ZZZZZ		10/21/2016 20:15	1		Rxi-5SilMS 0.32(mm)

GC/MS SEMI VOA BATCH WORKSHEET

Lab Name: TestAmerica Pittsburgh Job No.: 180-59749-1

SDG No.:

Batch Number: 191579 Batch Start Date: 10/18/16 16:05 Batch Analyst: Trout, Bill

Batch Method: 3520C Batch End Date: 10/19/16 10:45

Lab Sample ID	Client Sample ID	Method Chain	Basis	Initial pH	InitialAmount	FinalAmount	FirstAdjustpH	OPLVISPKMIX1i 00052	OPQL8270SURi 00048
MB 180-191579/1		3520C, 8270D LL		5 SU	250 mL	0.25 mL	2 SU		25 uL
LCS 180-191579/2		3520C, 8270D LL		5 SU	250 mL	0.25 mL	2 SU	25 uL	25 uL
LCSD 180-191579/3		3520C, 8270D LL		5 SU	250 mL	0.25 mL	2 SU	25 uL	25 uL
180-59749-D-4	HD-MW-127-0/1-0	3520C, 8270D LL	T	7 SU	270 mL	0.25 mL	2		12.5 uL
180-59749-D-5	HD-MW-87-0/1-0	3520C, 8270D LL	T	7 SU	270 mL	0.25 mL	2		25 uL

Batch Notes	
Acid used for pH adjustment	1:1 Sulfuric acid
Acid Used for pH Adjustment ID	2091553
Analyst ID - Concentration	cdm
Extraction 1 End Time	1045
Extraction 1 Start Time	1605
N-evap ID	1
Na2SO4 ID	1998534
pH Paper ID	Ph paper HC581117
Prep Solvent ID	2101876
Prep Solvent Name	Methylene chloride
Prep Solvent Volume Used	100 mL
Person's name who did the prep	BT
Sufficient volume for MS/MSD?	Yes
Uncorrected N-evap Temperature	26 Degrees C
Uncorrected Temperature	75 Degrees C

Basis	Basis Description
T	Total/NA

The pound sign (#) in the amount added field denotes that the reagent was used undiluted. All calculations are performed using the stated concentration for this reagent.

Shipping and Receiving Documents

TestAmerica Pittsburgh
301 Alpha Drive
Pittsburgh, PA 15238
phone 412.963.7058 fax 412.963.2470

Chain of Custody Record

TestAmerica
THE LEADER IN ENVIRONMENTAL TESTING

TestAmerica Laboratories, Inc.

Client Contact	Project Manager: Christopher D. O'neil	Site Contact: ~~Jennifer S. Reese~~ CDO	DateSubmitted: 10/12/16	COC No: TAP2016 10201
Groundwater Sciences Corporation	Tel/Fax: 717-901-8176 / (717) 657-1611	Lab Contact: Carrie Gamber	Carrier: FEDEX	1 of 1 COCs
2601 Market Place St. Suite 310	Analysis Turnaround Time			Job No. 10012.30
Harrisburg, PA 17110	Calendar (C) or Work Days (W)			
(717) 901-8180 Phone	TAT if different from Below: Standard			Container No. 1
(717) 657-1611 FAX	■ 2 weeks			SDG No.
Project Name: 2016 Comprehensive Event	☐ 1 week			
Site: Harley-Davidson, York PA	☐ 5 days			
Quote # 18000557	☐ 1 day			

Sample Identification	Sample Date	Sample Time	Sample Type	Matrix	# of Cont.	VOCs (8260C)	Select List Total Metals by ICP MS (SW846 6020/SW846 7470A)	Select List Dissolved Metals by ICP MS (SW846 6020/SW846 7470A)	1,4-Dioxane (SW846 8270D LL)	Sample Specific Notes:
HD-QC6-0/1-2	10/12/16	1200	trip blank	W	2	X				
HD-MW-57-0/1-0	10/12/16	0915	GW	W	3	X				
HD-MW-129-0/1-0	10/12/16	1020	GW	W	3	X				
HD-MW-127-0/1-0	10/12/16	0955	GW	W	5	X			X	
HD-MW-87-0/1-0	10/12/16	1150	GW	W	5	X			X	
HD-MW-88-0/1-0	10/12/16	1352	GW	W	3	X				
HD-MW-12-0/1-0	10/12/16	1145	GW	W	3	X				

180-59749 Chain of Custody

Number of Containers	3	1	1	2
Preservation Used: 1= Ice, 2= HCl; 3= H2SO4; 4=HNO3; 5=NaOH; 6= Unpreserved 7=Zinc Acetate & NaOH	2	1	1	1
Field Filter	N	N	Y	N

Possible Hazard Identification
■ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ■ Disposal By Lab ☐ Archive For _____ Months

Special Instructions/QC Requirements & Comments: **CLP Like Deliverables**

Relinquished by (Print and Sign):	Company: GSC	Date/Time: 10/12/16 1530	Received by:	Company:	Date/Time: 10/13/16 900
Relinquished by:	Company:	Date/Time:	Received by:	Company:	Date/Time:
Relinquished by:	Company:	Date/Time:	Received by:	Company:	Date/Time:

ORIGIN ID:THVA (717) 652-6832
GROUNDWATER SCIENCES CORP
2601 MARKET PL STE 310
HARRISBURG, PA 171109340
UNITED STATES US

SHIP DATE: 12OCT16
ACTWGT: 32.00 LB MAN
CAD: /POS1722
DIMS: 24x14x13 IN
BILL SENDER

Part # 156297-435 RIT2 12/15

TO **SAMPLE RECEIVING**
TEST AMERICA
301 ALPHA DR
RIDC PARK
PITTSBURGH PA 15238
(412) 963-7058 REF:
INV: DEPT:
PO:

033

-6832

Dept/Floor/Suite/Room

-9340

-7058

Weekday
cation address
D. **NOT available for**
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Saturday
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Available ONLY for
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-2507

0246

FedEx Express

TRK# 0215 **8996 8118 2033**

THU - 13 OCT 10:30A
PRIORITY OVERNIGHT

EV AGCA

15238
PA-US PIT

Uncorrected temp 1.6/1.1 °C
Thermometer ID 9
CF -0.5 Initials TB
PT-WI-SR-001 effective 7/26/13

7 Payment *Bill to:* Enter FedEx Acct. No. or Credit Card No. below. Obtain recip. Acct. No.
Sender Acct. No. in Section 1 will be billed. Recipient Third Party Credit Card Cash/Check

Total Packages 1 Total Weight 32 lbs. Credit Card Auth.

Our liability is limited to $100 unless you declare a higher value. See the current FedEx Service Guide for details.

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180-59749 Waybill

ALIGN OPEN END OF FEDEX AIRBILL POUCH HERE

Login Sample Receipt Checklist

Client: Groundwater Sciences Corporation

Job Number: 180-59749-1

Login Number: 59749
List Number: 1
Creator: Kovitch, Christina M

List Source: TestAmerica Pittsburgh

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	True	
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	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	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	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	