

Cover Page

Order ID : P4464

Project ID : Transfer Station-SPDES

Client : Tully Environmental, Inc

Lab Sample Number

P4464-01
P4464-02

Client Sample Number

001-WILLETS-PT-BLVD(SEP)
002-35TH-AVE(SEP)

I certify that the data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed above. Release of the data contained in this hard copy data package has been authorized by the laboratory manager or his designee, as verified by the following signature.

Signature : _____

Date: 10/24/2024

NYDOH CERTIFICATION NO - 11376

NJDEP CERTIFICATION NO - 20012

DATA REPORTING QUALIFIERS- ORGANIC

For reporting results, the following “ Results Qualifiers” are used:

Value	If the result is a value greater than or equal to the detection limit, report the value
U	Indicates the compound was analyzed for but was not detected. Report the minimum detection limit for the sample with the U, i.e. “10 U”. This is not necessarily the instrument detection limit attainable for this particular sample based on any concentration or dilution that may have been required.
ND	Indicates the analyte was analyzed for, but not detected
J	Indicates an estimated value. This flag is used: (1) When estimating a concentration for a tentatively identified compound (library search hits, where a 1:1 response is assumed.) (2) When the mass spectral data indicated the identification, however the result was less than the specified detection limit greater than zero. If the detection limit was 10ug/L and a concentration of 3 ug/L was calculated report as 3 J. This flag is used when similar situation arise on any organic parameter i.e. Pest, PCB and others.
B	Indicates the analyte was found in the blank as well as the sample report as “12 B”.
E	Indicates the analyte ‘s concentration exceeds the calibrated range of the instrument for that specific analysis.
D	This flag identifies all compounds identified in an analysis at a secondary dilution factor.
P	This flag is used for Pesticide/PCB target analyte when there is >25% difference for detected concentrations between the two GC columns. The lower of the two values is reported on Form 1 and flagged with a “P”.
N	This flag indicates presumptive evidence of a compound. This is only used for tentatively identified compounds (TICs), where the identification is based on a mass spectral library search. It applies to all TIC results. For generic characterization of a TIC, such as chlorinated hydrocarbon, the flag is not used.
A	This flag indicates that a Tentatively Identified Compound is a suspected aldol-condensation product.
Q	Indicates the LCS did not meet the control limits requirements

APPENDIX A

QA REVIEW GENERAL DOCUMENTATION

Project #: P4464

Completed

For thorough review, the report must have the following:

GENERAL:

Are all original paperwork present (chain of custody, record of communication,airbill, sample management lab chronicle, login page)

✓

Check chain-of-custody for proper relinquish/return of samples

✓

Is the chain of custody signed and complete

✓

Check internal chain-of-custody for proper relinquish/return of samples /sample extracts

✓

Collect information for each project id from server. Were all requirements followed

✓

COVER PAGE:

Do numbers of samples correspond to the number of samples in the Chain of Custody on login page

✓

Do lab numbers and client Ids on cover page agree with the Chain of Custody

✓

CHAIN OF CUSTODY:

Do requested analyses on Chain of Custody agree with form I results

✓

Do requested analyses on Chain of Custody agree with the log-in page

✓

Were the correct method log-in for analysis according to the Analytical Request and Chain of Castody

✓

Were the samples received within hold time

✓

Were any problems found with the samples at arrival recorded in the Sample Management Laboratory Chronicle

✓

ANALYTICAL:

Was method requirement followed?

✓

Was client requirement followed?

✓

Does the case narrative summarize all QC failure?

✓

All runlogs and manual integration are reviewed for requirements

✓

All manual calculations and /or hand notations verified

✓

QA Review Signature: PRADIP PRAJAPATI

Date: 10/24/2024

LAB CHRONICLE

OrderID:	P4464	OrderDate:	10/21/2024 11:41:00 AM
Client:	Tully Environmental, Inc	Project:	Transfer Station-SPDES
Contact:	Dean Devoe	Location:	K41,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P4464-01	001-WILLETS-PT-BLV D(SEP)	Water	VOC-BTEX	624.1	10/17/24		10/23/24	10/21/24



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Fax : 908 789 8922

Hit Summary Sheet
SW-846

SDG No.: P4464
Client: Tully Environmental, Inc

Sample ID	Client ID	Matrix	Parameter	Concentration	C	MDL	RDL	Units
Client ID:	001-WILLETS-PT-BLVD(SEP)							
P4464-01	001-WILLETS-PT-1	Water	Toluene	110		0.72	5.00	ug/L
			Total Voc :		110			
			Total Concentration:		110			



QC SUMMARY

Surrogate Summary

SDG No.: **P4464**

Client: **Tully Environmental, Inc**

Analytical Method: **SW624.1**

Lab Sample ID	Client ID	Parameter	Spike	Result	RecoveryQual	Limits	
						Low	High
P4464-01	001-WILLETS-PT-BLVD(SEP)	1,2-Dichloroethane-d4	30	30.3	101	91	110
		Toluene-d8	30	29.0	97	91	112
		4-Bromofluorobenzene	30	25.7	86	63	112
VN1023WBL01	VN1023WBL01	1,2-Dichloroethane-d4	30	30.3	101	91	110
		Toluene-d8	30	28.8	96	91	112
		4-Bromofluorobenzene	30	24.4	81	63	112
VN1023WBS01	VN1023WBS01	1,2-Dichloroethane-d4	30	30.1	100	91	110
		Toluene-d8	30	31.1	104	91	112
		4-Bromofluorobenzene	30	30.9	103	63	112
VN1023WBSD0	VN1023WBSD01	1,2-Dichloroethane-d4	30	30.1	100	91	110
		Toluene-d8	30	31.1	104	91	112
		4-Bromofluorobenzene	30	30.9	103	63	112

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: P4464

Client: Tully Environmental, Inc

Analytical Method: SW624.1

Datafile : VN084470.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits	RPD
									High	
VN1023WBS01	Benzene	20	19.0	ug/L	95			65	135	
	Toluene	20	19.4	ug/L	97			70	130	
	Ethyl Benzene	20	18.1	ug/L	91			60	140	
	m/p-Xylenes	40	38.2	ug/L	96			87	111	
	o-Xylene	20	18.2	ug/L	91			87	111	

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: P4464

Client: Tully Environmental, Inc

Analytical Method: SW624.1

Datafile : VN084471.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits	RPD
									High	
VN1023WBSD01	Benzene	20	19.8	ug/L	99	4		65	135	20
	Toluene	20	19.5	ug/L	98	1		70	130	20
	Ethyl Benzene	20	18.8	ug/L	94	3		60	140	20
	m/p-Xylenes	40	37.8	ug/L	95	1		87	111	20
	o-Xylene	20	18.8	ug/L	94	3		87	111	20

VOLATILE METHOD BLANK SUMMARY

EPA SAMPLE NO.

VN1023WBL01

Lab Name: CHEMTECH

Contract: TULL01

Lab Code: CHEM Case No.: P4464

SAS No.: P4464 SDG NO.: P4464

Lab File ID: VN084472.D

Lab Sample ID: VN1023WBL01

Date Analyzed: 10/23/2024

Time Analyzed: 15:02

GC Column: RXI-624 ID: 0.25 (mm)

Heated Purge: (Y/N) N

Instrument ID: MSVOA_N

THIS METHOD BLANK APPLIES TO THE FOLLOWING SAMPLES, MS AND MSD:

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
VN1023WBS01	VN1023WBS01	VN084470.D	10/23/2024
VN1023WBSD01	VN1023WBSD01	VN084471.D	10/23/2024
001-WILLETS-PT-BLVD (SEP)	P4464-01	VN084473.D	10/23/2024

COMMENTS: _____



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VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: CHEMTECH Contract: TULL01
Lab Code: CHEM Case No.: P4464 SAS No.: P4464 SDG NO.: P4464
Lab File ID: VN084336.D BFB Injection Date: 10/08/2024
Instrument ID: MSVOA_N BFB Injection Time: 09:08
GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: Y/N N

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	19
75	30.0 - 60.0% of mass 95	51.1
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.8
173	Less than 2.0% of mass 174	0.8 (1) 1
174	50.0 - 100.0% of mass 95	73.7
175	5.0 - 9.0% of mass 174	5.5 (7.5) 1
176	95.0 - 101.0% of mass 174	70.3 (95.4) 1
177	5.0 - 9.0% of mass 176	4.4 (6.3) 2

1-Value is % mass 174

2-Value is % mass 176

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDICC150	VSTDICC150	VN084337.D	10/08/2024	09:43
VSTDICC100	VSTDICC100	VN084338.D	10/08/2024	10:07
VSTDICC050	VSTDICC050	VN084339.D	10/08/2024	10:31
VSTDICCC020	VSTDICCC020	VN084340.D	10/08/2024	10:55
VSTDICC005	VSTDICC005	VN084341.D	10/08/2024	11:19



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VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: CHEMTECH Contract: TULL01
Lab Code: CHEM Case No.: P4464 SAS No.: P4464 SDG NO.: P4464
Lab File ID: VN084468.D BFB Injection Date: 10/23/2024
Instrument ID: MSVOA_N BFB Injection Time: 12:39
GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: Y/N N

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	19.2
75	30.0 - 60.0% of mass 95	51.9
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.6
173	Less than 2.0% of mass 174	0.7 (0.9) 1
174	50.0 - 100.0% of mass 95	74.8
175	5.0 - 9.0% of mass 174	5.6 (7.5) 1
176	95.0 - 101.0% of mass 174	72 (96.3) 1
177	5.0 - 9.0% of mass 176	4.9 (6.8) 2

1-Value is % mass 174

2-Value is % mass 176

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDCCC020	VSTDCCC020	VN084469.D	10/23/2024	13:26
VN1023WBS01	VN1023WBS01	VN084470.D	10/23/2024	13:50
VN1023WBSD01	VN1023WBSD01	VN084471.D	10/23/2024	14:14
VN1023WBL01	VN1023WBL01	VN084472.D	10/23/2024	15:02
001-WILLETS-PT-BLVD (SEP)	P4464-01	VN084473.D	10/23/2024	15:26

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name: CHEMTECH Contract: TULL01
 Lab Code: CHEM Case No.: P4464 SAS No.: P4464 SDG NO.: P4464
 Lab File ID: VN084469.D Date Analyzed: 10/23/2024
 Instrument ID: MSVOA_N Time Analyzed: 13:26
 GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: (Y/N) N

	IS1 AREA #	RT #	IS2 AREA #	RT #	IS3 AREA #	RT #
12 HOUR STD	34138	7.81	175440	9.10	166908	11.87
UPPER LIMIT	68276	8.312	350880	9.6	333816	12.365
LOWER LIMIT	17069	7.312	87720	8.6	83454	11.365
EPA SAMPLE NO.						
001-WILLETS-PT-BLVD (SEP)	30612	7.81	143930	9.10	140820	11.87
VN1023WBL01	29639	7.82	140547	9.10	131687	11.87
VN1023WBS01	34001	7.81	177325	9.10	165233	11.87
VN1023WBSD01	31512	7.82	161510	9.10	152709	11.87

IS1 = Bromochloromethane
 IS2 = 1,4-Difluorobenzene
 IS3 = Chlorobenzene-d5

AREA UPPER LIMIT = +100% of internal standard area
 AREA LOWER LIMIT = -50% of internal standard area
 RT UPPER LIMIT = +0.50 minutes of internal standard RT
 RT LOWER LIMIT = -0.50 minutes of internal standard RT

Column used to flag values outside QC limits with an asterisk.
 * Values outside of QC limits.



SAMPLE DATA

Report of Analysis

Client:	Tully Environmental, Inc	Date Collected:	10/17/24
Project:	Transfer Station-SPDES	Date Received:	10/21/24
Client Sample ID:	001-WILLETS-PT-BLVD(SEP)	SDG No.:	P4464
Lab Sample ID:	P4464-01	Matrix:	Water
Analytical Method:	E624.1	% Solid:	0
Sample Wt/Vol:	5 Units: mL	Final Vol:	5000 uL
Soil Aliquot Vol:	uL	Test:	VOC-BTEX
GC Column:	RXI-624 ID : 0.25	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VN084473.D	1		10/23/24 15:26	VN102324

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
71-43-2	Benzene	0.69	U	0.69	5.00	ug/L
108-88-3	Toluene	110		0.72	5.00	ug/L
100-41-4	Ethyl Benzene	0.73	U	0.73	5.00	ug/L
179601-23-1	m/p-Xylenes	1.70	U	1.70	10.0	ug/L
95-47-6	o-Xylene	0.82	U	0.82	5.00	ug/L
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	30.3		91 - 110	101%	SPK: 30
2037-26-5	Toluene-d8	29.0		91 - 112	97%	SPK: 30
460-00-4	4-Bromofluorobenzene	25.7		63 - 112	86%	SPK: 30
INTERNAL STANDARDS						
74-97-5	Bromochloromethane	30600	7.812			
540-36-3	1,4-Difluorobenzene	144000	9.1			
3114-55-4	Chlorobenzene-d5	141000	11.865			

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

E = Value Exceeds Calibration Range

Q = indicates LCS control criteria did not meet requirements

M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

N = Presumptive Evidence of a Compound

* = Values outside of QC limits

D = Dilution

() = Laboratory InHouse Limit

A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084473.D
 Acq On : 23 Oct 2024 15:26
 Operator : JC\MD
 Sample : P4464-01
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 001-WILLETS-PT-BLVD(SEP)

Quant Time: Oct 23 15:48:04 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

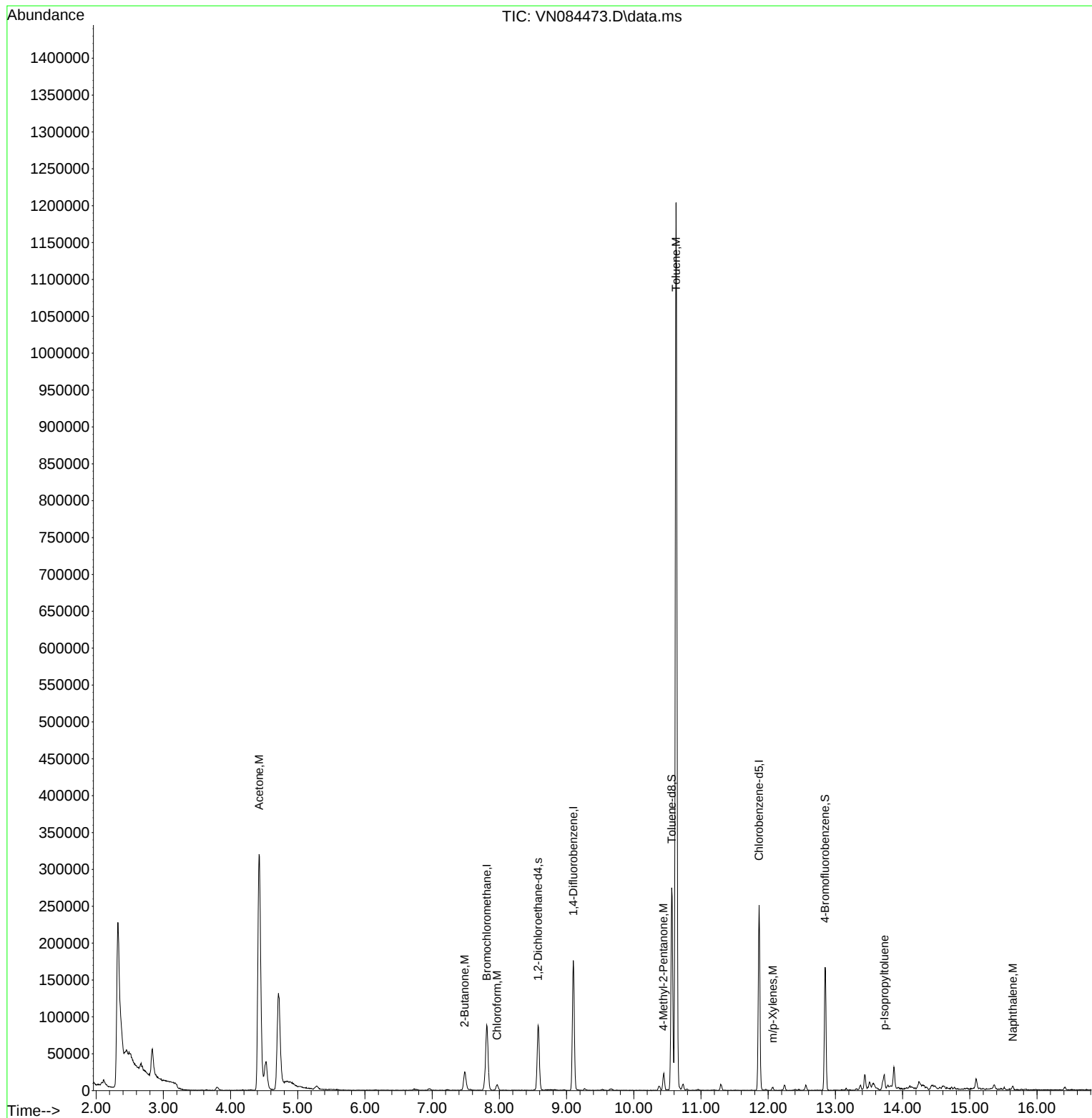
Internal Standards						
1) Bromochloromethane	7.812	128	30612	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	143930	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	140820	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.577	65	74713	30.315	ug/l	0.00
Spiked Amount	30.000	Range	91 - 110	Recovery	=	101.067%
60) 4-Bromofluorobenzene	12.847	95	59657	25.669	ug/l	0.00
Spiked Amount	30.000	Range	63 - 112	Recovery	=	85.567%
63) Toluene-d8	10.565	98	189009	28.973	ug/l	0.00
Spiked Amount	30.000	Range	91 - 112	Recovery	=	96.567%
Target Compounds						
					Qvalue	
15) Acetone	4.424	58	195025	636.832	ug/l	93
25) Chloroform	7.965	83	7599	1.968	ug/l	84
30) 2-Butanone	7.483	43	40993	32.587	ug/l	99
58) 4-Methyl-2-Pentanone	10.441	43	16207	6.178	ug/l	95
62) Toluene	10.629	91	911396	110.554	ug/l	98
67) m/p-Xylenes	12.070	106	1380	0.406	ug/l	98
82) p-Isopropyltoluene	13.729	119	9378	1.348	ug/l	98
91) Naphthalene	15.641	128	4984	0.777	ug/l	96

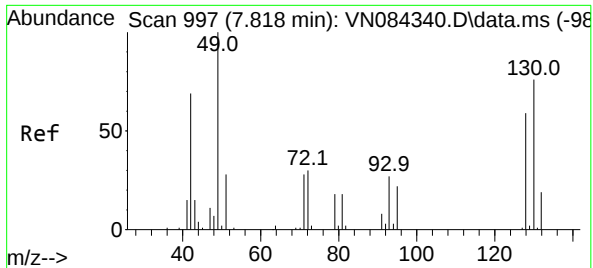
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
Data File : VN084473.D
Acq On : 23 Oct 2024 15:26
Operator : JC\MD
Sample : P4464-01
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
001-WILLETS-PT-BLVD(SEP)

Quant Time: Oct 23 15:48:04 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:22:28 2024
Response via : Initial Calibration

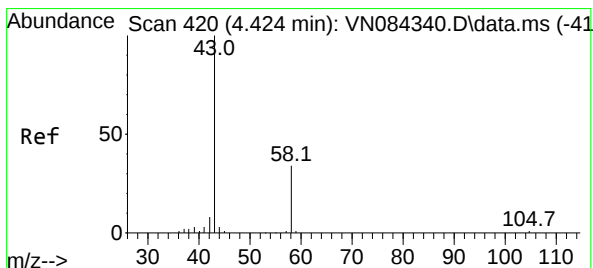
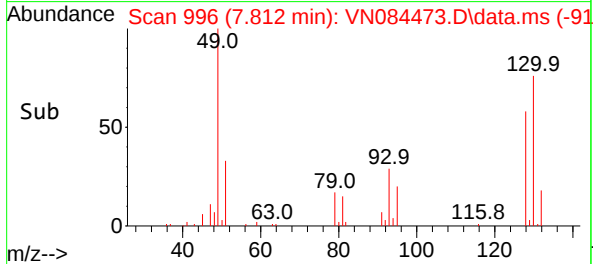
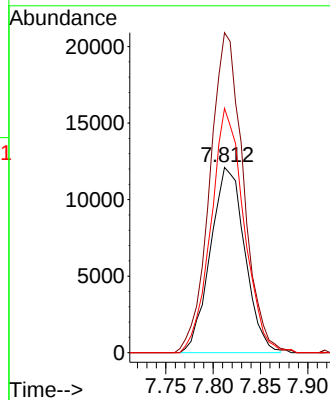
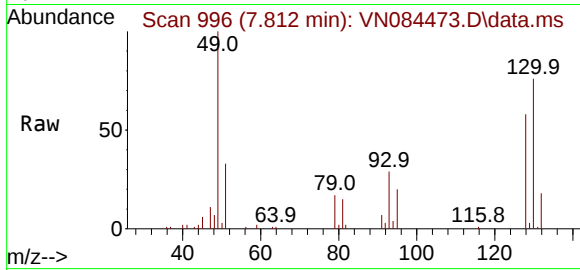




#1
Bromochloromethane
Concen: 30.000 ug/l
RT: 7.812 min Scan# 997
Delta R.T. -0.006 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

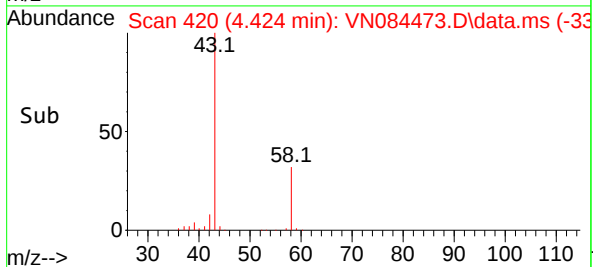
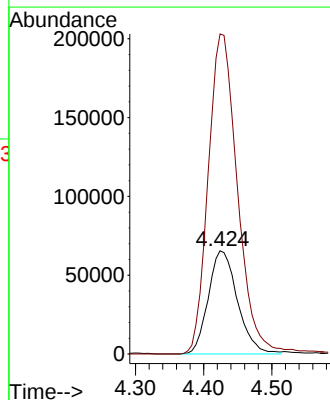
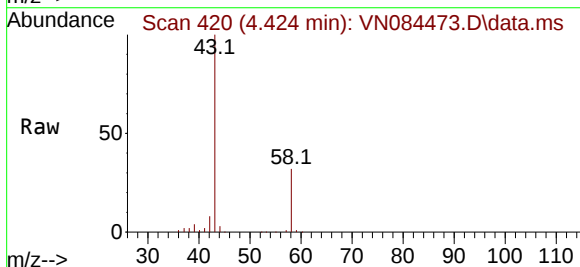
Instrument :
MSVOA_N
ClientSampleId :
001-WILLETS-PT-BLVD(SEP)

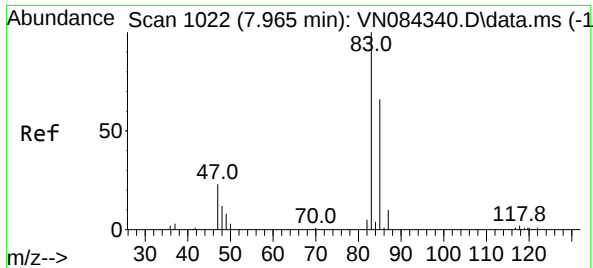
Tgt Ion:128 Resp: 30612
Ion Ratio Lower Upper
128 100
49 167.8 0.0 430.0
130 126.4 0.0 329.8



#15
Acetone
Concen: 636.832 ug/l
RT: 4.424 min Scan# 420
Delta R.T. 0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

Tgt Ion: 58 Resp: 195025
Ion Ratio Lower Upper
58 100
43 310.3 237.5 356.3





#25

Chloroform

Concen: 1.968 ug/l

RT: 7.965 min Scan# 110

Delta R.T. 0.000 min

Lab File: VN084473.D

Acq: 23 Oct 2024 15:26

Instrument :

MSVOA_N

ClientSampleId :

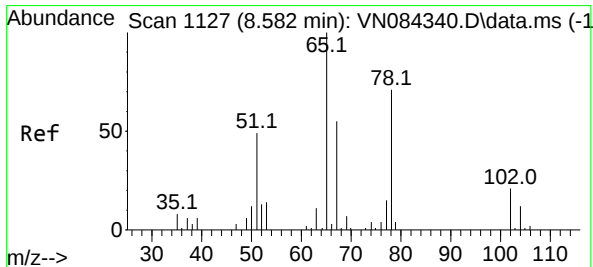
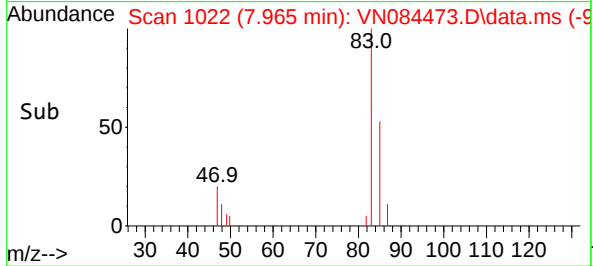
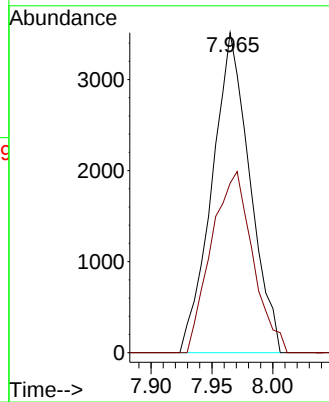
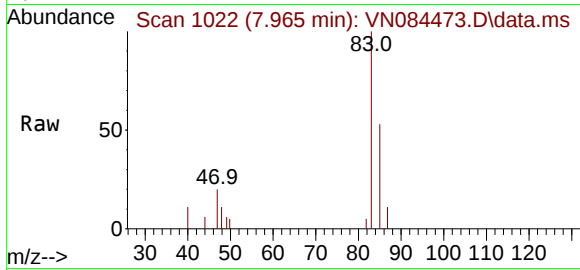
001-WILLETS-PT-BLVD(SEP)

Tgt Ion: 83 Resp: 7599

Ion Ratio Lower Upper

83 100

85 53.0 52.4 78.6



#27

1,2-Dichloroethane-d4

Concen: 30.315 ug/l

RT: 8.577 min Scan# 1126

Delta R.T. -0.006 min

Lab File: VN084473.D

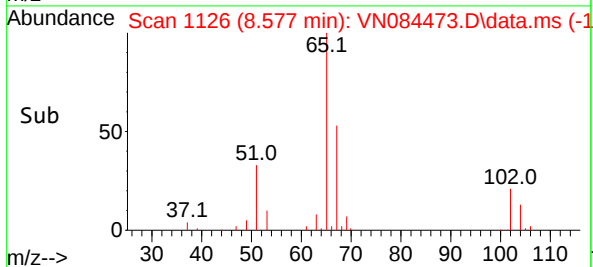
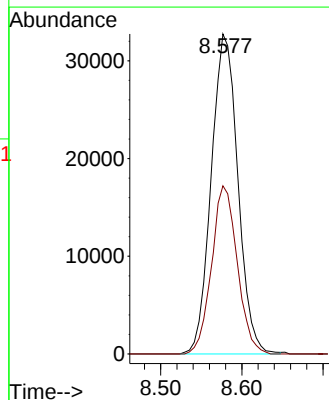
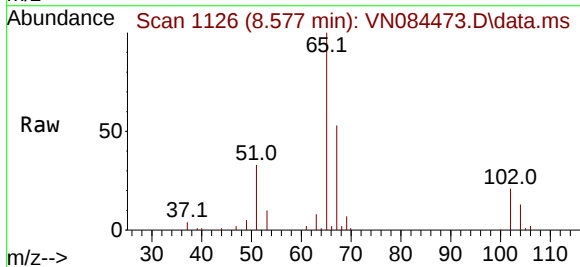
Acq: 23 Oct 2024 15:26

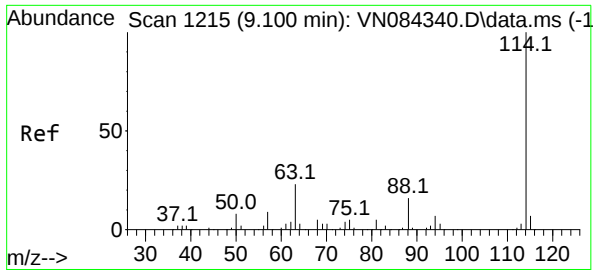
Tgt Ion: 65 Resp: 74713

Ion Ratio Lower Upper

65 100

67 50.6 41.5 62.3





#28

1,4-Difluorobenzene

Concen: 30.000 ug/l

RT: 9.100 min Scan# 11

Delta R.T. 0.000 min

Lab File: VN084473.D

Acq: 23 Oct 2024 15:26

Instrument :

MSVOA_N

ClientSampleId :

001-WILLETS-PT-BLVD(SEP)

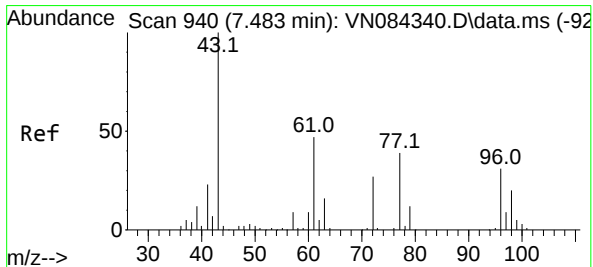
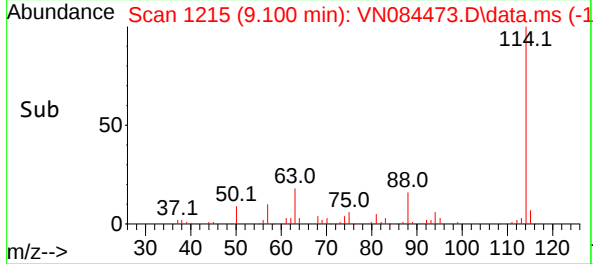
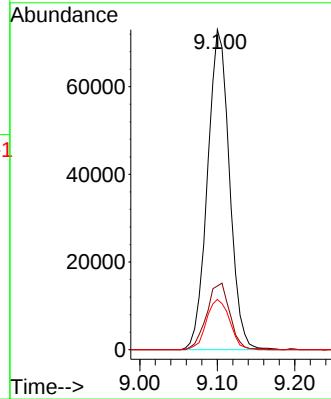
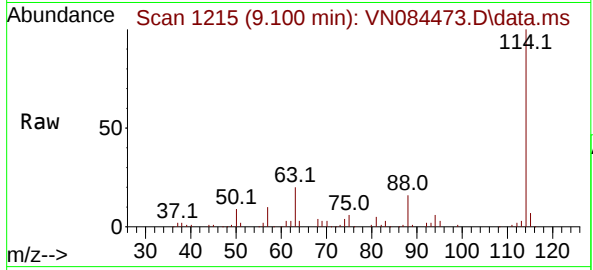
Tgt Ion:114 Resp: 143930

Ion Ratio Lower Upper

114 100

63 21.9 17.4 26.0

88 16.6 13.2 19.8



#30

2-Butanone

Concen: 32.587 ug/l

RT: 7.483 min Scan# 940

Delta R.T. -0.000 min

Lab File: VN084473.D

Acq: 23 Oct 2024 15:26

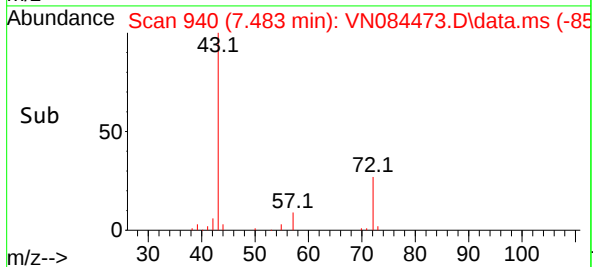
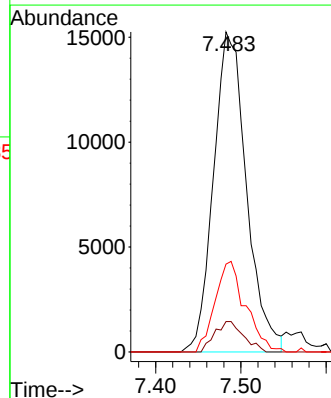
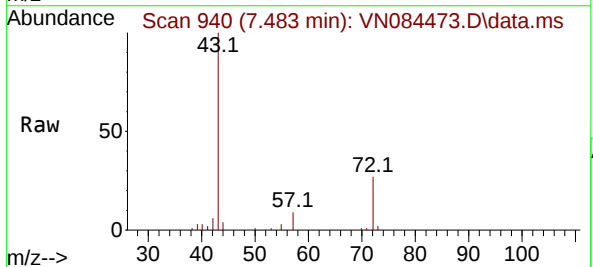
Tgt Ion: 43 Resp: 40993

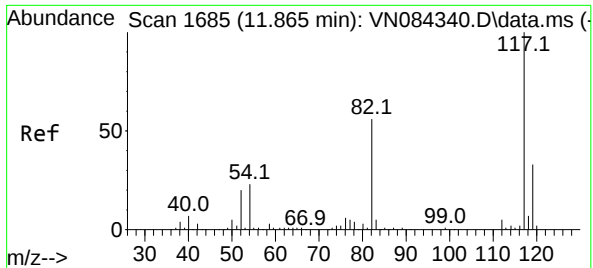
Ion Ratio Lower Upper

43 100

57 8.3 6.6 9.8

72 26.0 21.3 31.9

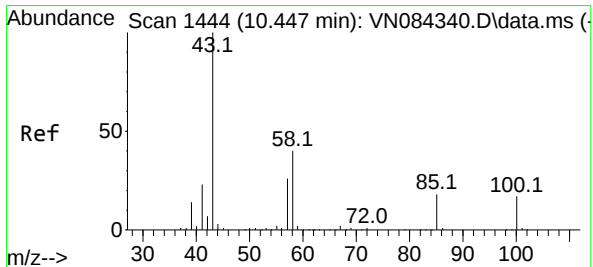
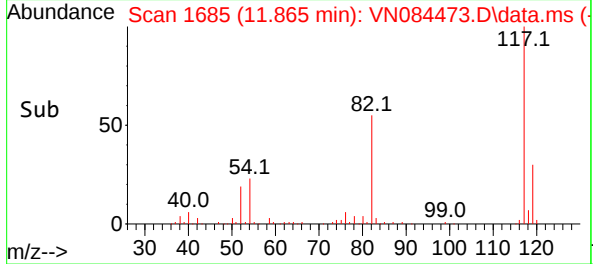
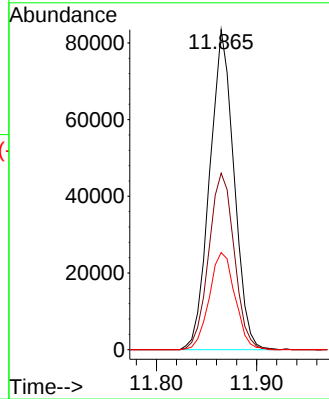
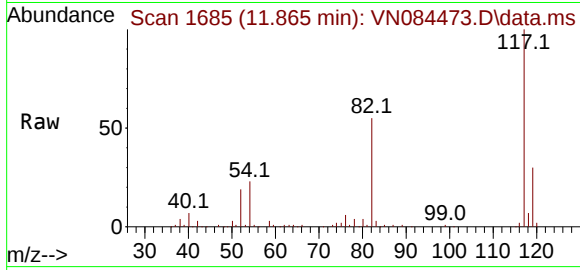




#57
Chlorobenzene-d5
Concen: 30.000 ug/l
RT: 11.865 min Scan# 117
Delta R.T. -0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

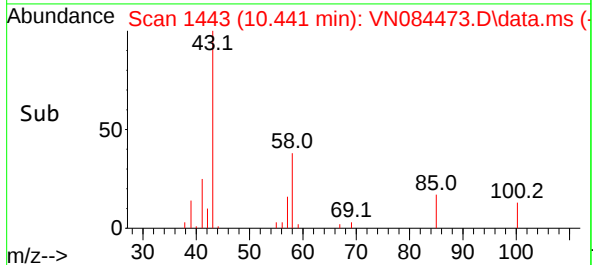
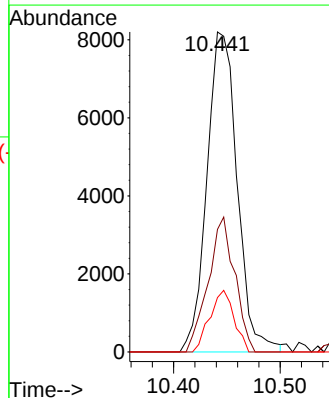
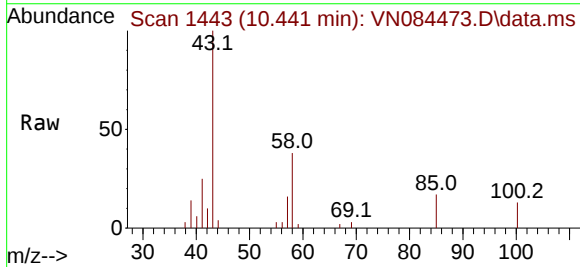
Instrument :
MSVOA_N
ClientSampleId :
001-WILLETS-PT-BLVD(SEP)

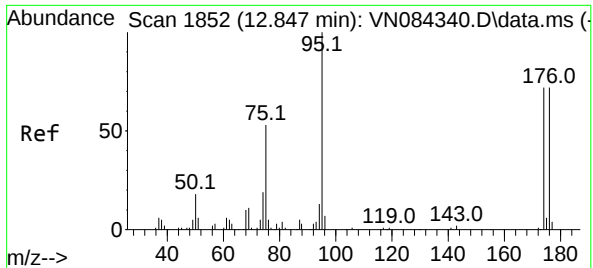
Tgt Ion:117 Resp: 140820
Ion Ratio Lower Upper
117 100
82 57.9 46.2 69.4
119 32.1 25.4 38.2



#58
4-Methyl-2-Pentanone
Concen: 6.178 ug/l
RT: 10.441 min Scan# 1443
Delta R.T. -0.006 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

Tgt Ion: 43 Resp: 16207
Ion Ratio Lower Upper
43 100
58 36.9 31.9 47.9
85 15.4 14.6 22.0

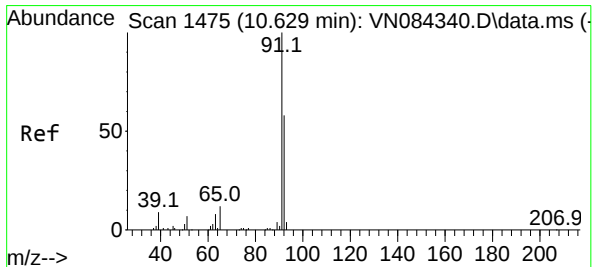
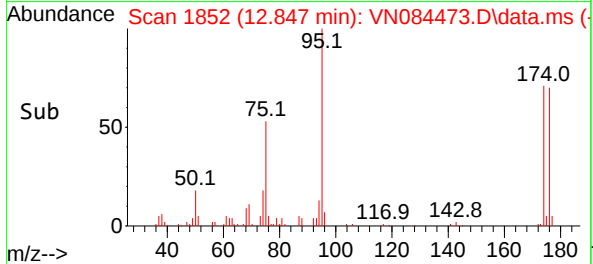
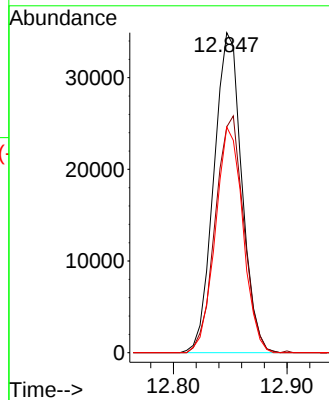
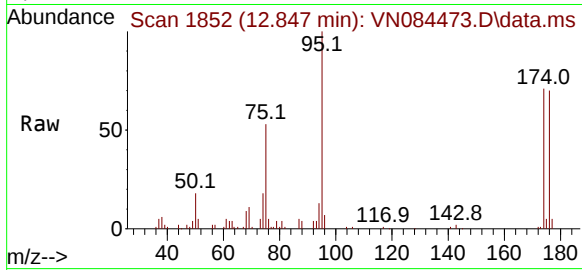




#60
4-Bromofluorobenzene
Concen: 25.669 ug/l
RT: 12.847 min Scan# 1852
Delta R.T. 0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

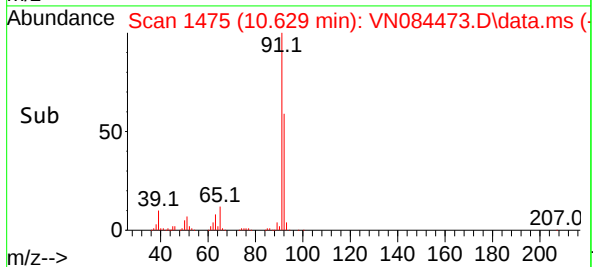
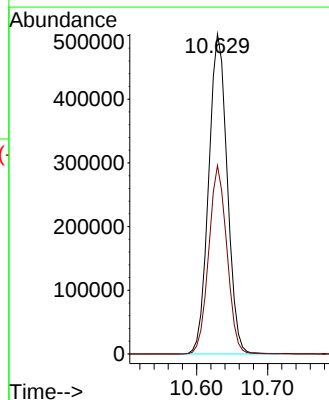
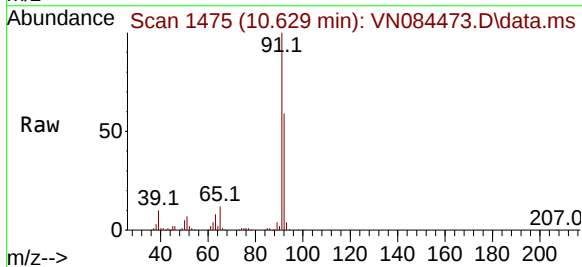
Instrument :
MSVOA_N
ClientSampleId :
001-WILLETS-PT-BLVD(SEP)

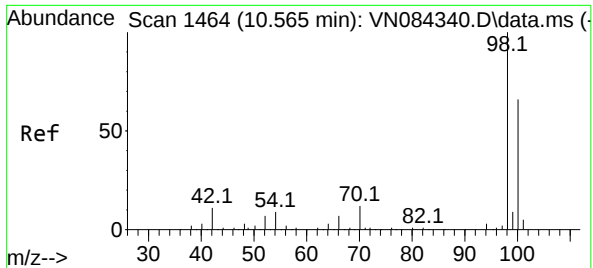
Tgt Ion: 95 Resp: 59657
Ion Ratio Lower Upper
95 100
174 75.2 58.2 87.2
176 69.8 56.4 84.6



#62
Toluene
Concen: 110.554 ug/l
RT: 10.629 min Scan# 1475
Delta R.T. 0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

Tgt Ion: 91 Resp: 911396
Ion Ratio Lower Upper
91 100
92 57.5 47.2 70.8

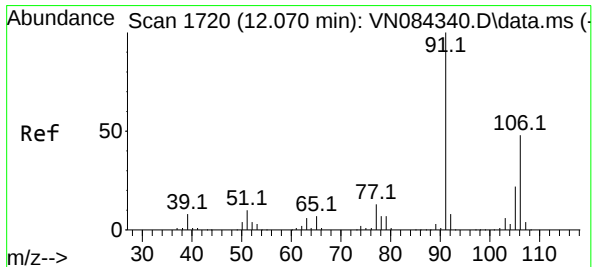
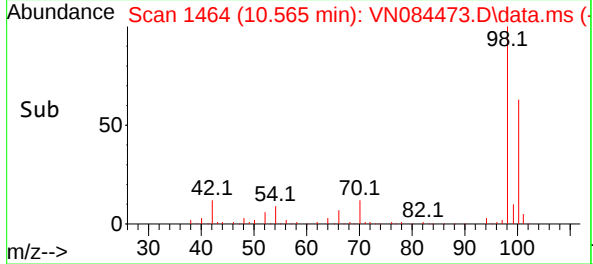
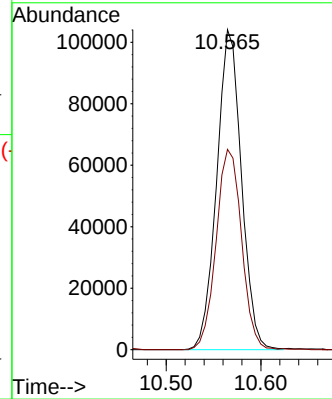
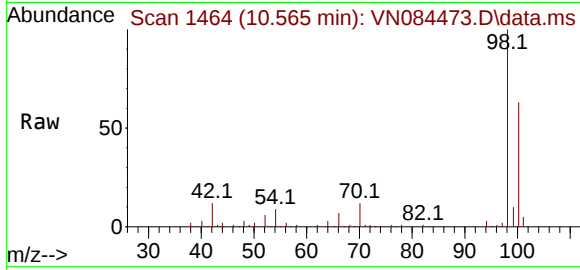




#63
Toluene-d8
Concen: 28.973 ug/l
RT: 10.565 min Scan# 1464
Delta R.T. 0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

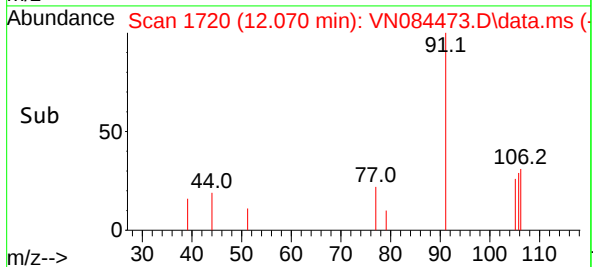
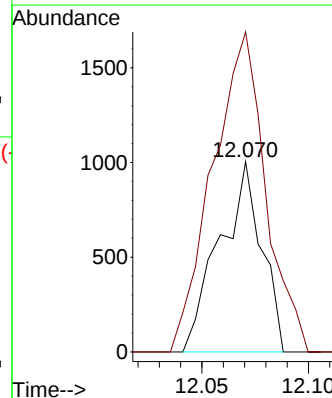
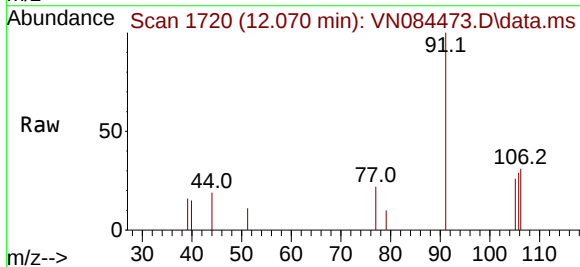
Instrument :
MSVOA_N
ClientSampleId :
001-WILLETS-PT-BLVD(SEP)

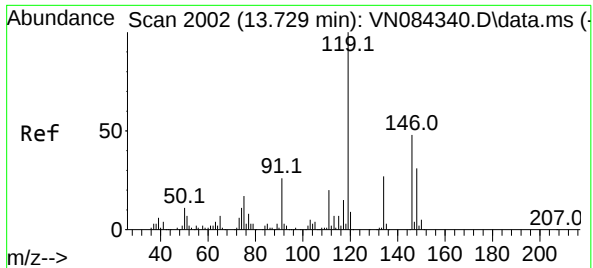
Tgt Ion: 98 Resp: 189009
Ion Ratio Lower Upper
98 100
100 64.3 52.5 78.7



#67
m/p-Xylenes
Concen: 0.406 ug/l
RT: 12.070 min Scan# 1720
Delta R.T. 0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

Tgt Ion:106 Resp: 1380
Ion Ratio Lower Upper
106 100
91 211.5 166.7 250.1

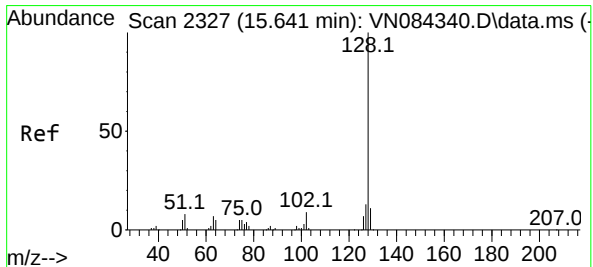
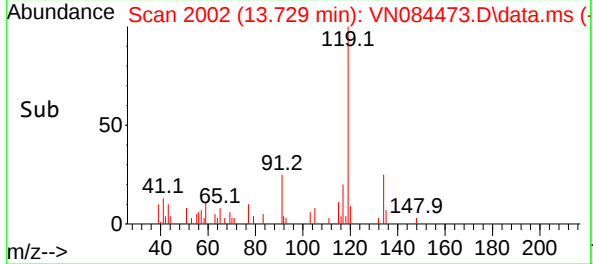
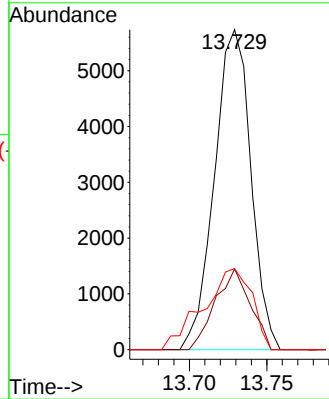
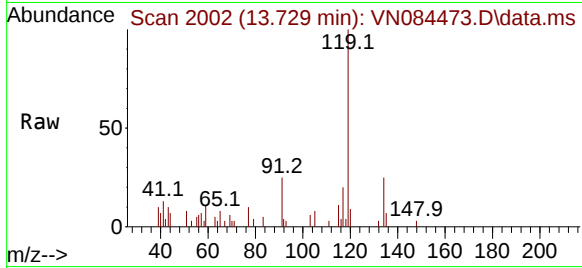




#82
p-Isopropyltoluene
Concen: 1.348 ug/l
RT: 13.729 min Scan# 2002
Delta R.T. 0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

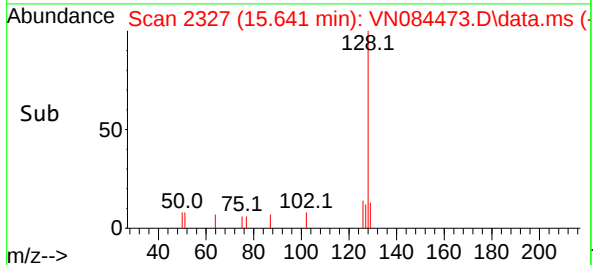
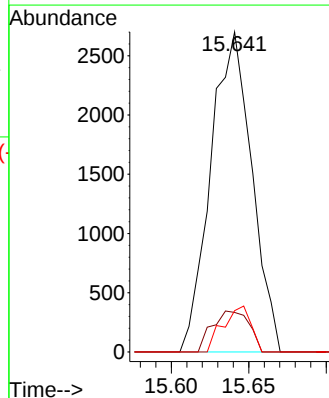
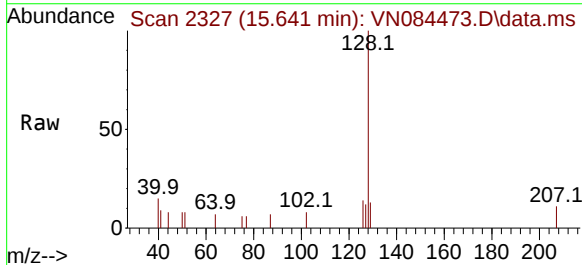
Instrument :
MSVOA_N
ClientSampleId :
001-WILLETS-PT-BLVD(SEP)

Tgt Ion:	119	Resp:	9378
Ion	Ratio	Lower	Upper
119	100		
134	24.3	0.0	50.2
91	26.9	0.0	50.6



#91
Naphthalene
Concen: 0.777 ug/l
RT: 15.641 min Scan# 2327
Delta R.T. 0.000 min
Lab File: VN084473.D
Acq: 23 Oct 2024 15:26

Tgt Ion:	128	Resp:	4984
Ion	Ratio	Lower	Upper
128	100		
127	11.5	10.3	15.5
129	9.7	8.8	13.2





CALIBRATION SUMMARY



284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

VOLATILE ORGANICS INITIAL CALIBRATION DATA

Lab Name: CHEMTECH Contract: TULL01
 Lab Code: CHEM Case No.: P4464 SAS No.: P4464 SDG No.: P4464
 Instrument ID: MSVOA_N Calibration Date(s): 10/08/2024 10/08/2024
 Heated Purge: (Y/N) N Calibration Time(s): 09:43 11:19
 GC Column: RXI-624 ID: 0.25 (mm)

LAB FILE ID:		RRF150 = VN084337.D		RRF100 = VN084338.D		RRF050 = VN084339.D		
		RRF020 = VN084340.D		RRF005 = VN084341.D		RRF =		
COMPOUND	RRF150	RRF100	RRF050	RRF020	RRF005	RRF	RRF	% RSD
Benzene	1.571	1.514	1.511	1.557	1.555		1.542	1.8
Toluene	1.775	1.732	1.746	1.761	1.767		1.756	1
Ethyl Benzene	2.037	1.969	1.930	1.889	1.715		1.908	6.3
m/p-Xylenes	0.768	0.732	0.740	0.725	0.654		0.724	5.9
o-Xylene	0.738	0.710	0.708	0.692	0.641		0.698	5.2
1,2-Dichloroethane-d4	2.393	2.419	2.371	2.467	2.428		2.415	1.5
Toluene-d8	1.397	1.374	1.378	1.395	1.404		1.390	0.9
4-Bromofluorobenzene	0.514	0.506	0.498	0.492	0.465		0.495	3.8

* Compounds with required minimum RRF and maximum %RSD values.
 All other compounds must meet a minimum RRF of 0.010.
 RRF of 1,4-Dioxane = Value should be divide by 1000.

Method Path : Z:\voasrv\HPCHEM1\MSVOA_N\methods\
 Method File : 624N100824W.M
 Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 Last Update : Wed Oct 09 02:22:28 2024
 Response Via : Initial Calibration

Calibration Files

5 =VN084341.D 20 =VN084340.D 50 =VN084339.D 100 =VN084338.D 150 =VN084337.D

	Compound	5	20	50	100	150	Avg	%RSD
1) I	Bromochloromethane	-----ISTD-----						
2) M	Dichlorodifluoro...	1.918	1.931	1.768	1.757	1.784	1.832	4.66
3) M	Chloromethane	2.148	2.146	2.024	2.037	2.067	2.084	2.85
4) M	Vinyl Chloride	2.113	2.098	2.005	1.986	2.018	2.044	2.81
5) M	Bromomethane	1.635	1.418	1.249	1.234	1.236	1.354	12.91
6) M	Chloroethane	1.607	1.396	1.228	1.205	1.264	1.340	12.44
7) M	Trichlorofluorom...	3.505	3.403	3.256	3.246	3.237	3.329	3.60
8) T	Diethyl Ether	1.232	1.232	1.226	1.207	1.223	1.224	0.85
9)	1,1,2-Trichlorot...	1.981	1.891	1.799	1.829	1.861	1.872	3.73
10) M	1,1-Dichloroethene	1.971	1.834	1.870	1.832	1.833	1.868	3.20
11)	Methyl Iodide	2.378	2.469	2.473	2.450	2.503	2.455	1.90
12)	Methyl Acetate	2.221	2.287	2.435	2.367	2.383	2.339	3.62
13) M	Acrolein	0.449	0.402	0.431	0.450	0.440	0.434	4.50
14) M	Acrylonitrile	1.024	1.069	1.064	1.026	1.069	1.051	2.23
15) M	Acetone	0.265	0.286	0.306	0.315	0.329	0.300	8.31
16) M	Carbon Disulfide	6.106	5.704	5.346	5.270	5.386	5.562	6.23
17)	Allyl chloride	2.962	3.091	3.040	3.017	3.030	3.028	1.53
18) M	Methylene Chloride	2.203	2.147	2.090	2.014	2.067	2.104	3.47
19) M	trans-1,2-Dichlo...	2.055	2.012	1.947	1.923	1.948	1.977	2.76
20) T	Diisopropyl ether	6.257	6.655	6.558	6.487	6.595	6.510	2.37
21) M	1,1-Dichloroethane	3.908	3.837	3.659	3.601	3.674	3.736	3.49
22) M	cis-1,2-Dichloro...	2.284	2.364	2.294	2.240	2.321	2.300	2.00
23) M	tert-Butyl Alcohol	0.402	0.399	0.413	0.406	0.394	0.403	1.71
24) M	Methyl tert-Buty...	6.019	6.312	6.286	6.268	6.327	6.242	2.04
25) M	Chloroform	3.812	3.901	3.795	3.650	3.759	3.783	2.41
26)	Cyclohexane	2.941	3.291	3.090	3.107	3.193	3.124	4.15
27) s	1,2-Dichloroetha...	2.428	2.467	2.370	2.419	2.393	2.415	1.51
28) I	1,4-Difluorobenzene	-----ISTD-----						
29)	1,1-Dichloropropene	0.482	0.493	0.487	0.493	0.508	0.492	2.00
30) M	2-Butanone	0.242	0.257	0.268	0.269	0.275	0.262	5.01
31)	2,2-Dichloropropane	0.560	0.576	0.569	0.583	0.605	0.579	2.98
32) M	1,1,1-Trichloroe...	0.621	0.648	0.619	0.629	0.630	0.629	1.79
33) M	Carbon Tetrachlo...	0.547	0.544	0.531	0.548	0.556	0.545	1.63
34) M	Benzene	1.555	1.557	1.511	1.514	1.571	1.542	1.77
35)	Methacrylonitrile	0.231	0.273	0.289	0.297	0.308	0.280	10.66
36) M	1,2-Dichloroethane	0.515	0.522	0.508	0.505	0.520	0.514	1.42
37) M	Trichloroethene	0.353	0.366	0.345	0.353	0.358	0.355	2.13
38)	Methylcyclohexane	0.491	0.519	0.535	0.566	0.593	0.541	7.36
39) M	1,2-Dichloropropane	0.375	0.386	0.363	0.371	0.384	0.376	2.49
40)	Dibromomethane	0.269	0.263	0.257	0.257	0.268	0.263	2.12
41) M	Bromodichloromet...	0.559	0.559	0.550	0.552	0.568	0.558	1.30
42) M	Vinyl Acetate	0.837	0.888	0.930	0.945	0.960	0.912	5.46
43)	Ethyl Acetate	0.495	0.509	0.517	0.532	0.534	0.517	3.14
44)	Isopropyl Acetate	0.766	0.840	0.862	0.872	0.891	0.846	5.75
45) T	1,4-Dioxane	0.007	0.007	0.008	0.008	0.008	0.008	7.69
46)	Methyl methacrylate	0.369	0.404	0.420	0.420	0.431	0.409	5.91
47)	n-amyl Acetate	0.630	0.740	0.769	0.796	0.829	0.753	10.09
48) M	t-1,3-Dichloropr...	0.564	0.561	0.573	0.581	0.603	0.576	2.90
49) T	cis-1,3-Dichloro...	0.551	0.613	0.603	0.616	0.637	0.604	5.34
50) M	1,1,2-Trichloroe...	0.358	0.354	0.350	0.349	0.356	0.353	1.10
51)	Ethyl methacrylate	0.479	0.575	0.606	0.616	0.641	0.583	10.77
52)	1,3-Dichloropropane	0.619	0.625	0.607	0.610	0.627	0.617	1.47
53) M	Dibromochloromet...	0.407	0.416	0.416	0.417	0.431	0.417	2.04
54) M	1,2-Dibromoethane	0.352	0.370	0.361	0.363	0.371	0.364	2.09
55) M	2-Chloroethyl vi...	0.224	0.250	0.269	0.286	0.294	0.265	10.65
56) M	Bromoform	0.261	0.264	0.276	0.287	0.295	0.277	5.22

Method Path : Z:\voasrv\HPCHEM1\MSVOA_N\methods\
 Method File : 624N100824W.M

57) I	Chlorobenzene-d5	-----ISTD-----						
58) M	4-Methyl-2-Penta...	0.517	0.559	0.573	0.565	0.580	0.559	4.39
59) M	2-Hexanone	0.367	0.408	0.434	0.428	0.440	0.415	7.19
60) S	4-Bromofluoroben...	0.465	0.492	0.498	0.506	0.514	0.495	3.80
61) M	Tetrachloroethene	0.357	0.342	0.332	0.328	0.338	0.339	3.37
62) M	Toluene	1.767	1.761	1.746	1.732	1.775	1.756	0.99
63) S	Toluene-d8	1.404	1.395	1.378	1.374	1.397	1.390	0.94
64) M	Chlorobenzene	1.136	1.086	1.072	1.069	1.102	1.093	2.53
65)	1,1,1,2-Tetrachl...	0.377	0.383	0.380	0.374	0.386	0.380	1.24
66) M	Ethyl Benzene	1.715	1.889	1.930	1.969	2.036	1.908	6.33
67) M	m/p-Xylenes	0.654	0.725	0.740	0.732	0.768	0.724	5.87
68) M	o-Xylene	0.641	0.692	0.708	0.710	0.738	0.698	5.15
69) M	Styrene	1.059	1.183	1.226	1.232	1.289	1.198	7.20
70)	Isopropylbenzene	1.587	1.786	1.813	1.828	1.892	1.781	6.47
71) M	1,1,2,2-Tetrachl...	0.543	0.549	0.557	0.544	0.562	0.551	1.49
72)	1,2,3-Trichlorop...	0.452	0.466	0.479	0.471	0.492	0.472	3.15
73)	Bromobenzene	0.416	0.428	0.435	0.431	0.446	0.431	2.52
74)	n-propylbenzene	1.881	2.107	2.158	2.177	2.289	2.123	7.09
75)	2-Chlorotoluene	1.233	1.322	1.315	1.329	1.396	1.319	4.42
76)	1,3,5-Trimethylb...	1.323	1.488	1.532	1.543	1.614	1.500	7.26
77)	t-1,4-Dichloro-2...	0.171	0.187	0.211	0.213	0.225	0.202	10.84
78)	4-Chlorotoluene	1.248	1.323	1.352	1.353	1.428	1.341	4.84
79)	tert-butylbenzene	1.122	1.260	1.309	1.330	1.376	1.279	7.63
80)	1,2,4-Trimethylb...	1.347	1.502	1.550	1.567	1.642	1.522	7.21
81)	sec-Butylbenzene	1.522	1.746	1.794	1.831	1.913	1.762	8.34
82)	p-Isopropyltoluene	1.286	1.439	1.499	1.549	1.641	1.483	8.95
83) M	1,3-Dichlorobenzene	0.750	0.790	0.808	0.811	0.851	0.802	4.57
84) M	1,4-Dichlorobenzene	0.786	0.761	0.788	0.805	0.842	0.796	3.77
85)	n-Butylbenzene	1.065	1.199	1.302	1.371	1.484	1.284	12.49
86) T	Hexachloroethane	0.276	0.279	0.282	0.289	0.302	0.286	3.59
87) M	1,2-Dichlorobenzene	0.748	0.756	0.780	0.783	0.811	0.775	3.21
88)	1,2-Dibromo-3-Ch...	0.098	0.110	0.119	0.116	0.120	0.113	8.01
89)	1,2,4-Trichlorob...	0.372	0.381	0.410	0.416	0.436	0.403	6.49
90)	Hexachlorobutadiene	0.220	0.173	0.179	0.177	0.183	0.187	10.28
91) M	Naphthalene	1.093	1.285	1.420	1.481	1.554	1.366	13.33
92)	1,2,3-Trichlorob...	0.372	0.381	0.410	0.416	0.436	0.403	6.49

(#) = Out of Range

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084337.D
 Acq On : 08 Oct 2024 09:43
 Operator : JC\MD
 Sample : VSTDICC150
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VSTDICC150

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:05:45 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:04:33 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.818	128	33784	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	181536	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	171821	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.576	65	80830	29.718	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery =	99.067%		
60) 4-Bromofluorobenzene	12.847	95	88349	31.155	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery =	103.867%		
63) Toluene-d8	10.565	98	240116	30.166	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery =	100.567%		
Target Compounds					Qvalue	
2) Dichlorodifluoromethane	2.124	85	301403	146.123	ug/l	96
3) Chloromethane	2.359	50	349225	148.780	ug/l	99
4) Vinyl Chloride	2.512	62	340879	148.089	ug/l	97
5) Bromomethane	2.924	94	208863	136.955	ug/l	99
6) Chloroethane	3.100	64	213547	141.510	ug/l	95
7) Trichlorofluoromethane	3.489	101	546712	145.812	ug/l	99
8) Diethyl Ether	3.959	74	206608	149.881	ug/l	99
9) 1,1,2-Trichlorotrifluo...	4.365	101	314320	149.095	ug/l	98
10) 1,1-Dichloroethene	4.330	96	309616	147.186	ug/l	92
11) Methyl Iodide	4.583	142	422778	152.937	ug/l	99
12) Methyl Acetate	5.018	43	402489	152.836	ug/l	99
13) Acrolein	4.177	56	371221	758.829	ug/l	100
14) Acrylonitrile	5.718	53	902986	763.216	ug/l	99
15) Acetone	4.424	58	277575	821.289	ug/l	95
16) Carbon Disulfide	4.706	76	909776	145.236	ug/l	100
17) Allyl chloride	5.018	41	511759	150.078	ug/l	95
18) Methylene Chloride	5.271	84	349106	147.322	ug/l	98
19) trans-1,2-Dichloroethene	5.783	96	329107	147.827	ug/l	97
20) Diisopropyl ether	6.671	45	1114091	151.956	ug/l	96
21) 1,1-Dichloroethane	6.571	63	620566	147.512	ug/l	97
22) cis-1,2-Dichloroethene	7.482	96	392124	151.363	ug/l	98
23) tert-Butyl Alcohol	5.524	59	333149	734.096	ug/l #	100
24) Methyl tert-Butyl Ether	5.794	73	1068810	152.038	ug/l #	85
25) Chloroform	7.965	83	634973	149.030	ug/l	99
26) Cyclohexane	8.253	56	539286	153.272	ug/l #	97
29) 1,1-Dichloropropene	8.371	75	461334	154.807	ug/l	100
30) 2-Butanone	7.482	43	1249418	787.459	ug/l	99
31) 2,2-Dichloropropane	7.488	77	549477	156.907	ug/l #	80
32) 1,1,1-Trichloroethane	8.165	97	571549	150.045	ug/l	99
33) Carbon Tetrachloride	8.359	117	504637	152.921	ug/l	97
34) Benzene	8.606	78	1425580	152.821	ug/l	96
35) Methacrylonitrile	7.777	41	279509	165.128	ug/l	99
36) 1,2-Dichloroethane	8.671	62	471651	151.686	ug/l	100
37) Trichloroethene	9.353	130	324930	151.266	ug/l	95
38) Methylcyclohexane	9.600	83	538684	164.564	ug/l	99
39) 1,2-Dichloropropane	9.618	63	348207	153.071	ug/l	97
40) Dibromomethane	9.706	93	243118	152.917	ug/l	98
41) Bromodichloromethane	9.888	83	515968	152.872	ug/l	94
42) Vinyl Acetate	6.600	43	4357419	789.646	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084337.D
 Acq On : 08 Oct 2024 09:43
 Operator : JC\MD
 Sample : VSTDICC150
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VSTDICC150

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:05:45 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:04:33 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.559	43	484255	154.753	ug/l	100
44) Isopropyl Acetate	8.688	43	808933	157.943	ug/l	99
45) 1,4-Dioxane	9.694	88	147762	3200.393	ug/l	98
46) Methyl methacrylate	9.676	41	391545	158.224	ug/l	100
47) n-amyl Acetate	12.494	43	752246	165.124	ug/l	97
48) t-1,3-Dichloropropene	10.835	75	547316	156.926	ug/l	97
49) cis-1,3-Dichloropropene	10.312	75	578523	158.273	ug/l	98
50) 1,1,2-Trichloroethane	11.018	97	323065	151.179	ug/l	96
51) Ethyl methacrylate	10.870	69	581930	164.863	ug/l	95
52) 1,3-Dichloropropane	11.165	76	568999	152.279	ug/l	99
53) Dibromochloromethane	11.359	129	390970	154.875	ug/l	100
54) 1,2-Dibromoethane	11.470	107	336624	153.033	ug/l	98
55) 2-Chloroethyl vinyl ether	10.159	63	1333727	833.093	ug/l	99
56) Bromoform	12.576	173	268044	160.094	ug/l	99
58) 4-Methyl-2-Pentanone	10.447	43	2491181	778.311	ug/l	99
59) 2-Hexanone	11.194	43	1891152	795.133	ug/l	99
61) Tetrachloroethene	11.106	164	290573	149.507	ug/l	97
62) Toluene	10.629	91	1525116	151.621	ug/l	99
64) Chlorobenzene	11.894	112	946501	151.211	ug/l	100
65) 1,1,1,2-Tetrachloroethane	11.959	131	331211	152.311	ug/l	99
66) Ethyl Benzene	11.964	91	1749567	160.094	ug/l	99
67) m/p-Xylenes	12.070	106	1319448	318.270	ug/l	100
68) o-Xylene	12.394	106	633813	158.611	ug/l	99
69) Styrene	12.412	104	1107376	161.432	ug/l	99
70) Isopropylbenzene	12.694	105	1625283	159.320	ug/l	98
71) 1,1,2,2-Tetrachloroethane	12.935	83	483003	153.053	ug/l	99
72) 1,2,3-Trichloropropane	12.994	75	422311m	156.469	ug/l	
73) Bromobenzene	12.982	156	383306	155.148	ug/l	100
74) n-propylbenzene	13.035	91	1966655	161.778	ug/l	99
75) 2-Chlorotoluene	13.123	91	1199693	158.816	ug/l	99
76) 1,3,5-Trimethylbenzene	13.170	105	1386742	161.447	ug/l	100
77) t-1,4-Dichloro-2-butene	12.735	75	193413	167.468	ug/l	98
78) 4-Chlorotoluene	13.223	91	1227049	159.769	ug/l	100
79) tert-butylbenzene	13.435	119	1182498	161.368	ug/l	99
80) 1,2,4-Trimethylbenzene	13.482	105	1410559	161.849	ug/l	100
81) sec-Butylbenzene	13.617	105	1643555	162.908	ug/l	99
82) p-Isopropyltoluene	13.729	119	1409541	165.992	ug/l	100
83) 1,3-Dichlorobenzene	13.735	146	731253	159.183	ug/l	99
84) 1,4-Dichlorobenzene	13.811	146	723724	158.652	ug/l	99
85) n-Butylbenzene	14.053	91	1274832	173.335	ug/l	98
86) Hexachloroethane	14.335	117	259393	158.553	ug/l	99
87) 1,2-Dichlorobenzene	14.106	146	696639	156.847	ug/l	99
88) 1,2-Dibromo-3-Chloropr...	14.717	75	102940	159.510	ug/l	97
89) 1,2,4-Trichlorobenzene	15.841	180	374861	162.329	ug/l	99
90) Hexachlorobutadiene	15.500	225	157242	147.184	ug/l	97
91) Naphthalene	15.641	128	1334733	170.565	ug/l	99
92) 1,2,3-Trichlorobenzene	15.841	180	374861	162.329	ug/l	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
Data File : VN084337.D
Acq On : 08 Oct 2024 09:43
Operator : JC\MD
Sample : VSTDICC150
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 2 Sample Multiplier: 1

Instrument :

MSVOA_N

ClientSampleId :

VSTDICC150

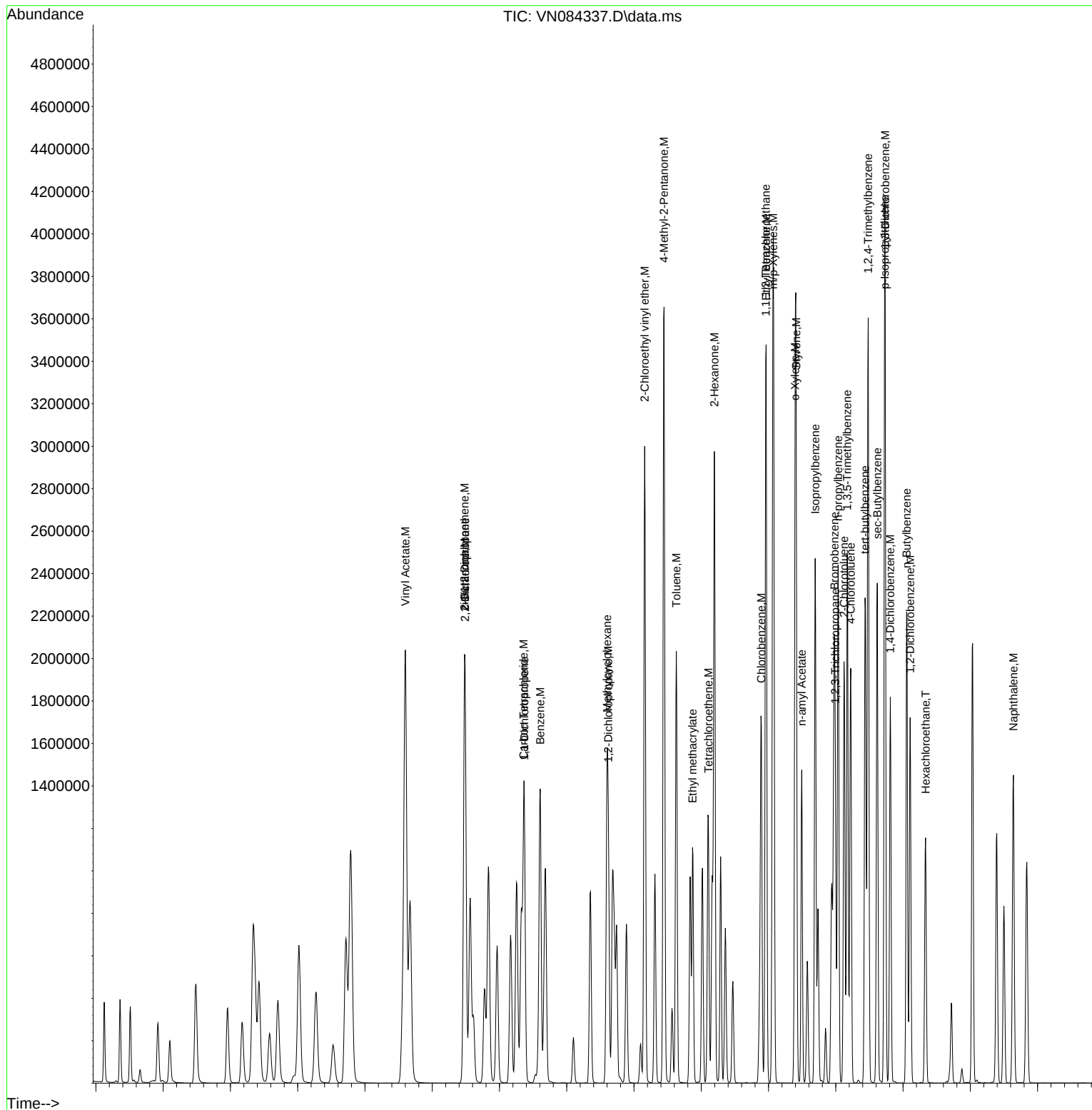
Manual Integrations

APPROVED

Reviewed By :John Carlone 10/09/2024

Supervised By :Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:05:45 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:04:33 2024
Response via : Initial Calibration



Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084338.D
 Acq On : 08 Oct 2024 10:07
 Operator : JC\MD
 Sample : VSTDICC100
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VSTDICC100

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:06:44 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:04:33 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.812	128	35068	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	190456	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	179975	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.577	65	84835	30.048	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery = 100.167%			
60) 4-Bromofluorobenzene	12.847	95	91083	30.664	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery = 102.200%			
63) Toluene-d8	10.565	98	247263	29.656	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery = 98.867%			
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	2.124	85	205380	95.924	ug/l	97
3) Chloromethane	2.359	50	238067	97.710	ug/l	99
4) Vinyl Chloride	2.512	62	232167	97.168	ug/l	98
5) Bromomethane	2.930	94	144198	91.091	ug/l	97
6) Chloroethane	3.106	64	140802	89.888	ug/l	97
7) Trichlorofluoromethane	3.489	101	379462	97.500	ug/l	92
8) Diethyl Ether	3.959	74	141064	98.586	ug/l	99
9) 1,1,2-Trichlorotrifluo...	4.365	101	213828	97.714	ug/l	99
10) 1,1-Dichloroethene	4.336	96	214197	98.097	ug/l	93
11) Methyl Iodide	4.583	142	286385	99.804	ug/l	99
12) Methyl Acetate	5.024	43	276654	101.206	ug/l	100
13) Acrolein	4.177	56	263202	518.323	ug/l	99
14) Acrylonitrile	5.712	53	599763	488.367	ug/l	98
15) Acetone	4.424	58	184044	524.611	ug/l	93
16) Carbon Disulfide	4.706	76	615999	94.737	ug/l	100
17) Allyl chloride	5.018	41	352646	99.630	ug/l	93
18) Methylene Chloride	5.271	84	235470	95.730	ug/l	96
19) trans-1,2-Dichloroethene	5.783	96	224774	97.266	ug/l	93
20) Diisopropyl ether	6.671	45	758291	99.640	ug/l	97
21) 1,1-Dichloroethane	6.565	63	420888	96.384	ug/l	97
22) cis-1,2-Dichloroethene	7.483	96	261797	97.356	ug/l	98
23) tert-Butyl Alcohol	5.524	59	237527	504.229	ug/l #	100
24) Methyl tert-Butyl Ether	5.795	73	732699	100.410	ug/l #	85
25) Chloroform	7.965	83	426680	96.476	ug/l	99
26) Cyclohexane	8.253	56	363184	99.442	ug/l #	94
29) 1,1-Dichloropropene	8.371	75	312760	100.036	ug/l	99
30) 2-Butanone	7.483	43	852543	512.158	ug/l	99
31) 2,2-Dichloropropane	7.489	77	370236	100.772	ug/l #	80
32) 1,1,1-Trichloroethane	8.165	97	399456	99.955	ug/l	99
33) Carbon Tetrachloride	8.359	117	347588	100.397	ug/l	97
34) Benzene	8.606	78	960915	98.185	ug/l	97
35) Methacrylonitrile	7.777	41	188397	106.088	ug/l	97
36) 1,2-Dichloroethane	8.671	62	320751	98.324	ug/l	100
37) Trichloroethene	9.353	130	224110	99.445	ug/l	93
38) Methylcyclohexane	9.600	83	359108	104.567	ug/l	99
39) 1,2-Dichloropropane	9.618	63	235798	98.802	ug/l	98
40) Dibromomethane	9.706	93	163396	97.960	ug/l	98
41) Bromodichloromethane	9.888	83	350730	99.048	ug/l	92
42) Vinyl Acetate	6.600	43	2998867	517.998	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084338.D
 Acq On : 08 Oct 2024 10:07
 Operator : JC\MD
 Sample : VSTDICC100
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 3 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VSTDICC100

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:06:44 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:04:33 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.559	43	337577	102.827	ug/l	97
44) Isopropyl Acetate	8.688	43	553772	103.059	ug/l	99
45) 1,4-Dioxane	9.694	88	102529	2116.681	ug/l	95
46) Methyl methacrylate	9.677	41	266510	102.653	ug/l	99
47) n-amyl Acetate	12.494	43	505509	105.767	ug/l	97
48) t-1,3-Dichloropropene	10.835	75	368556	100.723	ug/l	99
49) cis-1,3-Dichloropropene	10.312	75	391167	102.004	ug/l	95
50) 1,1,2-Trichloroethane	11.012	97	221414	98.758	ug/l	98
51) Ethyl methacrylate	10.871	69	391063	105.601	ug/l	92
52) 1,3-Dichloropropane	11.159	76	387077	98.740	ug/l	100
53) Dibromochloromethane	11.359	129	264647	99.925	ug/l	99
54) 1,2-Dibromoethane	11.465	107	230529	99.892	ug/l	99
55) 2-Chloroethyl vinyl ether	10.159	63	906371	539.636	ug/l	99
56) Bromoform	12.576	173	181985	103.603	ug/l	99
58) 4-Methyl-2-Pentanone	10.441	43	1693999	505.272	ug/l	100
59) 2-Hexanone	11.194	43	1283238	515.092	ug/l	99
61) Tetrachloroethene	11.100	164	196676	96.610	ug/l	96
62) Toluene	10.629	91	1038960	98.609	ug/l	99
64) Chlorobenzene	11.888	112	641078	97.777	ug/l	100
65) 1,1,1,2-Tetrachloroethane	11.959	131	224096	98.384	ug/l	99
66) Ethyl Benzene	11.965	91	1181271	103.195	ug/l	100
67) m/p-Xylenes	12.071	106	878405	202.285	ug/l	99
68) o-Xylene	12.400	106	426068	101.792	ug/l	99
69) Styrene	12.412	104	739030	102.854	ug/l	99
70) Isopropylbenzene	12.694	105	1096352	102.602	ug/l	98
71) 1,1,2,2-Tetrachloroethane	12.935	83	326404	98.744	ug/l	99
72) 1,2,3-Trichloropropane	12.994	75	282274m	99.846	ug/l	
73) Bromobenzene	12.976	156	258761	99.991	ug/l	99
74) n-propylbenzene	13.035	91	1306104	102.573	ug/l	99
75) 2-Chlorotoluene	13.123	91	797168	100.748	ug/l	100
76) 1,3,5-Trimethylbenzene	13.170	105	925442	102.861	ug/l	99
77) t-1,4-Dichloro-2-butene	12.735	75	128080	105.874	ug/l	99
78) 4-Chlorotoluene	13.218	91	811956	100.932	ug/l	99
79) tert-butylbenzene	13.435	119	797890	103.950	ug/l	99
80) 1,2,4-Trimethylbenzene	13.482	105	940023	102.973	ug/l	99
81) sec-Butylbenzene	13.618	105	1098551	103.955	ug/l	99
82) p-Isopropyltoluene	13.729	119	929312	104.480	ug/l	99
83) 1,3-Dichlorobenzene	13.735	146	486367	101.078	ug/l	99
84) 1,4-Dichlorobenzene	13.812	146	482980	101.080	ug/l	99
85) n-Butylbenzene	14.053	91	822416	106.755	ug/l	97
86) Hexachloroethane	14.335	117	173285	101.121	ug/l	100
87) 1,2-Dichlorobenzene	14.106	146	469667	100.954	ug/l	99
88) 1,2-Dibromo-3-Chloropr...	14.717	75	69709	103.123	ug/l	98
89) 1,2,4-Trichlorobenzene	15.841	180	249678	103.221	ug/l	96
90) Hexachlorobutadiene	15.500	225	106287	94.981	ug/l	98
91) Naphthalene	15.641	128	888428	108.388	ug/l	99
92) 1,2,3-Trichlorobenzene	15.841	180	249678	103.221	ug/l	96

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
Data File : VN084338.D
Acq On : 08 Oct 2024 10:07
Operator : JC\MD
Sample : VSTDICC100
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 3 Sample Multiplier: 1

Instrument :

MSVOA_N

ClientSampleId :

VSTDICC100

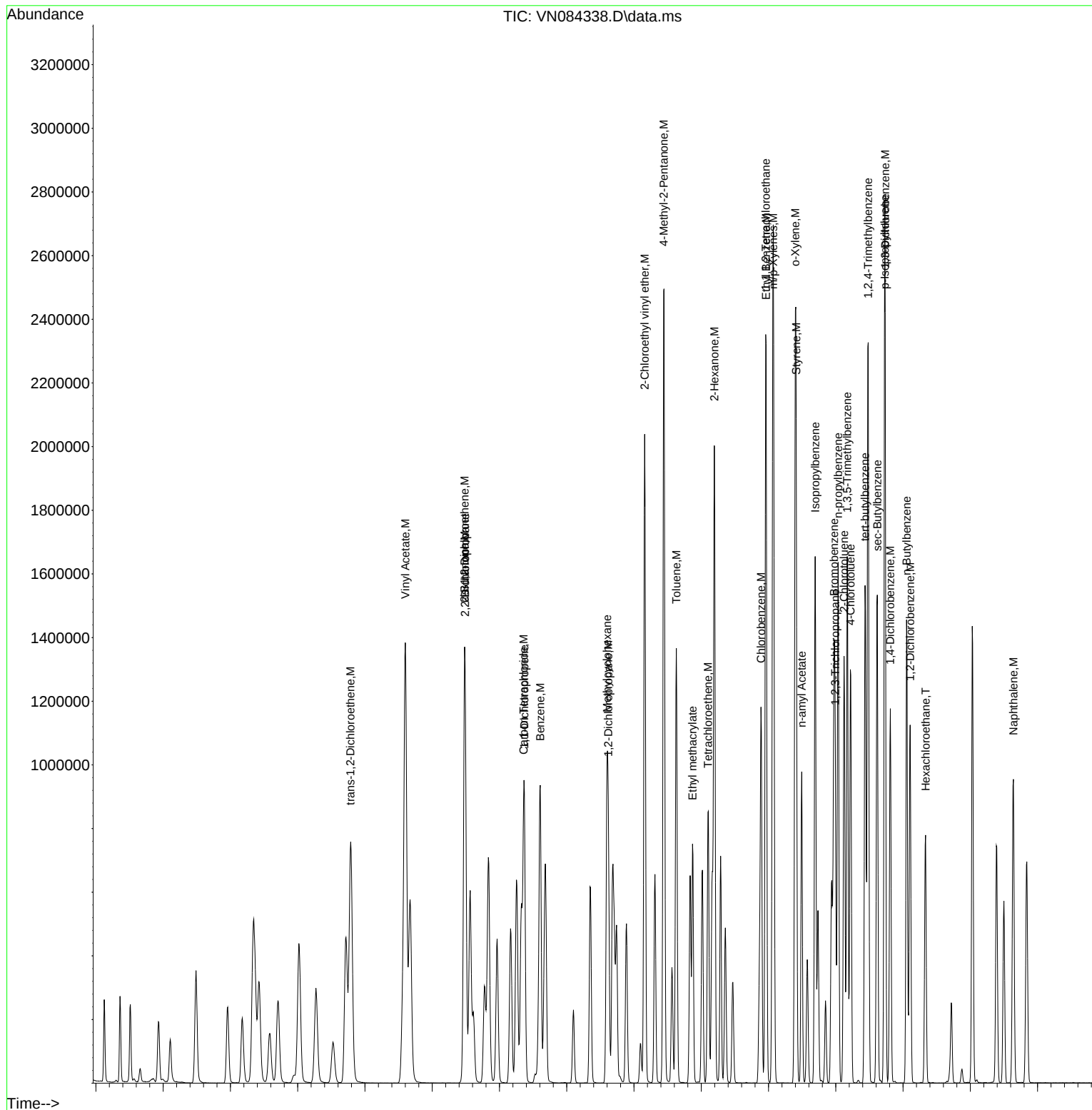
Manual Integrations

APPROVED

Reviewed By :John Carlone 10/09/2024

Supervised By :Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:06:44 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:04:33 2024
Response via : Initial Calibration



Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084339.D
 Acq On : 08 Oct 2024 10:31
 Operator : JC\MD
 Sample : VSTDICC050
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 4 Sample Multiplier: 1

Instrument :

MSVOA_N

ClientSampleId :

VSTDICC050

Manual Integrations

APPROVED

Reviewed By :John Carlone 10/09/2024

Supervised By :Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:07:41 2024

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M

Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS

QLast Update : Wed Oct 09 02:04:33 2024

Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.812	128	35466	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	196182	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	180971	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.577	65	84072	29.444	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery =	98.133%		
60) 4-Bromofluorobenzene	12.847	95	90206	30.202	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery =	100.667%		
63) Toluene-d8	10.565	98	249414	29.750	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery =	99.167%		
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	2.124	85	104507	48.263	ug/l	96
3) Chloromethane	2.359	50	119618	48.544	ug/l	99
4) Vinyl Chloride	2.512	62	118532	49.052	ug/l	93
5) Bromomethane	2.947	94	73816	46.107	ug/l	98
6) Chloroethane	3.118	64	72586	45.819	ug/l	95
7) Trichlorofluoromethane	3.495	101	192447	48.893	ug/l	94
8) Diethyl Ether	3.959	74	72484	50.089	ug/l	97
9) 1,1,2-Trichlorotrifluo...	4.365	101	106319	48.040	ug/l	98
10) 1,1-Dichloroethene	4.342	96	110533	50.053	ug/l	89
11) Methyl Iodide	4.589	142	146194	50.376	ug/l	97
12) Methyl Acetate	5.024	43	143947	52.068	ug/l	95
13) Acrolein	4.177	56	127301	247.880	ug/l	99
14) Acrylonitrile	5.718	53	314551	253.254	ug/l	98
15) Acetone	4.430	58	90377	254.725	ug/l	96
16) Carbon Disulfide	4.712	76	316013	48.056	ug/l	98
17) Allyl chloride	5.024	41	179722	50.205	ug/l	93
18) Methylene Chloride	5.277	84	123536	49.660	ug/l	97
19) trans-1,2-Dichloroethene	5.783	96	115099	49.248	ug/l	89
20) Diisopropyl ether	6.671	45	387668	50.368	ug/l	96
21) 1,1-Dichloroethane	6.571	63	216289	48.975	ug/l	96
22) cis-1,2-Dichloroethene	7.488	96	135603	49.862	ug/l	100
23) tert-Butyl Alcohol	5.524	59	121932	255.936	ug/l #	100
24) Methyl tert-Butyl Ether	5.800	73	371557m	50.347	ug/l	
25) Chloroform	7.965	83	224326	50.153	ug/l	99
26) Cyclohexane	8.259	56	182672	49.456	ug/l #	97
29) 1,1-Dichloropropene	8.371	75	159132	49.412	ug/l	99
30) 2-Butanone	7.482	43	438443	255.703	ug/l	99
31) 2,2-Dichloropropane	7.488	77	186163	49.191	ug/l	99
32) 1,1,1-Trichloroethane	8.165	97	202531	49.200	ug/l	99
33) Carbon Tetrachloride	8.359	117	173775	48.728	ug/l	94
34) Benzene	8.606	78	494102	49.013	ug/l	96
35) Methacrylonitrile	7.777	41	94562	51.695	ug/l	96
36) 1,2-Dichloroethane	8.671	62	165947	49.385	ug/l	100
37) Trichloroethene	9.353	130	112853	48.615	ug/l	98
38) Methylcyclohexane	9.600	83	175023	49.477	ug/l	99
39) 1,2-Dichloropropane	9.618	63	118717	48.292	ug/l	98
40) Dibromomethane	9.706	93	84017	48.900	ug/l	98
41) Bromodichloromethane	9.888	83	179758	49.283	ug/l	92
42) Vinyl Acetate	6.606	43	1520354	254.948	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084339.D
 Acq On : 08 Oct 2024 10:31
 Operator : JC\MD
 Sample : VSTDICC050
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 4 Sample Multiplier: 1

Instrument :

MSVOA_N

ClientSampleId :

VSTDICC050

Manual Integrations

APPROVED

Reviewed By :John Carlone 10/09/2024

Supervised By :Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:07:41 2024

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M

Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS

QLast Update : Wed Oct 09 02:04:33 2024

Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.559	43	168929	49.954	ug/l	94
44) Isopropyl Acetate	8.688	43	281915	50.934	ug/l	99
45) 1,4-Dioxane	9.694	88	51791	1038.003	ug/l	95
46) Methyl methacrylate	9.682	41	137372	51.368	ug/l	98
47) n-amyl Acetate	12.494	43	251442	51.073	ug/l	99
48) t-1,3-Dichloropropene	10.835	75	187402	49.721	ug/l	100
49) cis-1,3-Dichloropropene	10.312	75	197144	49.908	ug/l	96
50) 1,1,2-Trichloroethane	11.018	97	114315	49.500	ug/l	98
51) Ethyl methacrylate	10.871	69	198002	51.907	ug/l	96
52) 1,3-Dichloropropane	11.165	76	198343	49.119	ug/l	99
53) Dibromochloromethane	11.359	129	135901	49.816	ug/l	99
54) 1,2-Dibromoethane	11.470	107	118129	49.693	ug/l	99
55) 2-Chloroethyl vinyl ether	10.159	63	439901	254.264	ug/l	99
56) Bromoform	12.576	173	90199	49.851	ug/l	98
58) 4-Methyl-2-Pentanone	10.441	43	864518	256.442	ug/l	100
59) 2-Hexanone	11.194	43	654698	261.350	ug/l	100
61) Tetrachloroethene	11.100	164	100050	48.875	ug/l	97
62) Toluene	10.629	91	526619	49.707	ug/l	99
64) Chlorobenzene	11.888	112	323202	49.023	ug/l	100
65) 1,1,1,2-Tetrachloroethane	11.959	131	114617	50.043	ug/l	99
66) Ethyl Benzene	11.965	91	582229	50.583	ug/l	99
67) m/p-Xylenes	12.070	106	446529	102.264	ug/l	99
68) o-Xylene	12.400	106	213661	50.765	ug/l	99
69) Styrene	12.412	104	369695	51.169	ug/l	99
70) Isopropylbenzene	12.694	105	546834	50.894	ug/l	98
71) 1,1,2,2-Tetrachloroethane	12.935	83	167855	50.500	ug/l	100
72) 1,2,3-Trichloropropane	12.994	75	144614m	50.872	ug/l	
73) Bromobenzene	12.982	156	131272	50.447	ug/l	98
74) n-propylbenzene	13.035	91	650890	50.836	ug/l	99
75) 2-Chlorotoluene	13.123	91	396493	49.834	ug/l	100
76) 1,3,5-Trimethylbenzene	13.170	105	461964	51.064	ug/l	99
77) t-1,4-Dichloro-2-butene	12.735	75	63656	52.330	ug/l	96
78) 4-Chlorotoluene	13.223	91	407771	50.410	ug/l	99
79) tert-butylbenzene	13.435	119	394929	51.169	ug/l	98
80) 1,2,4-Trimethylbenzene	13.482	105	467589	50.939	ug/l	100
81) sec-Butylbenzene	13.617	105	541224	50.934	ug/l	99
82) p-Isopropyltoluene	13.729	119	451993	50.537	ug/l	99
83) 1,3-Dichlorobenzene	13.729	146	243731	50.374	ug/l	99
84) 1,4-Dichlorobenzene	13.812	146	237600	49.452	ug/l	99
85) n-Butylbenzene	14.053	91	392578	50.679	ug/l	98
86) Hexachloroethane	14.335	117	85140	49.410	ug/l	100
87) 1,2-Dichlorobenzene	14.106	146	235213	50.280	ug/l	98
88) 1,2-Dibromo-3-Chloropr...	14.717	75	35951	52.891	ug/l	98
89) 1,2,4-Trichlorobenzene	15.841	180	123597	50.816	ug/l	97
90) Hexachlorobutadiene	15.500	225	53904	47.905	ug/l	99
91) Naphthalene	15.641	128	428263	51.960	ug/l	100
92) 1,2,3-Trichlorobenzene	15.841	180	123597	50.816	ug/l	97

(#) = qualifier out of range (m) = manual integration (+) = signals summed

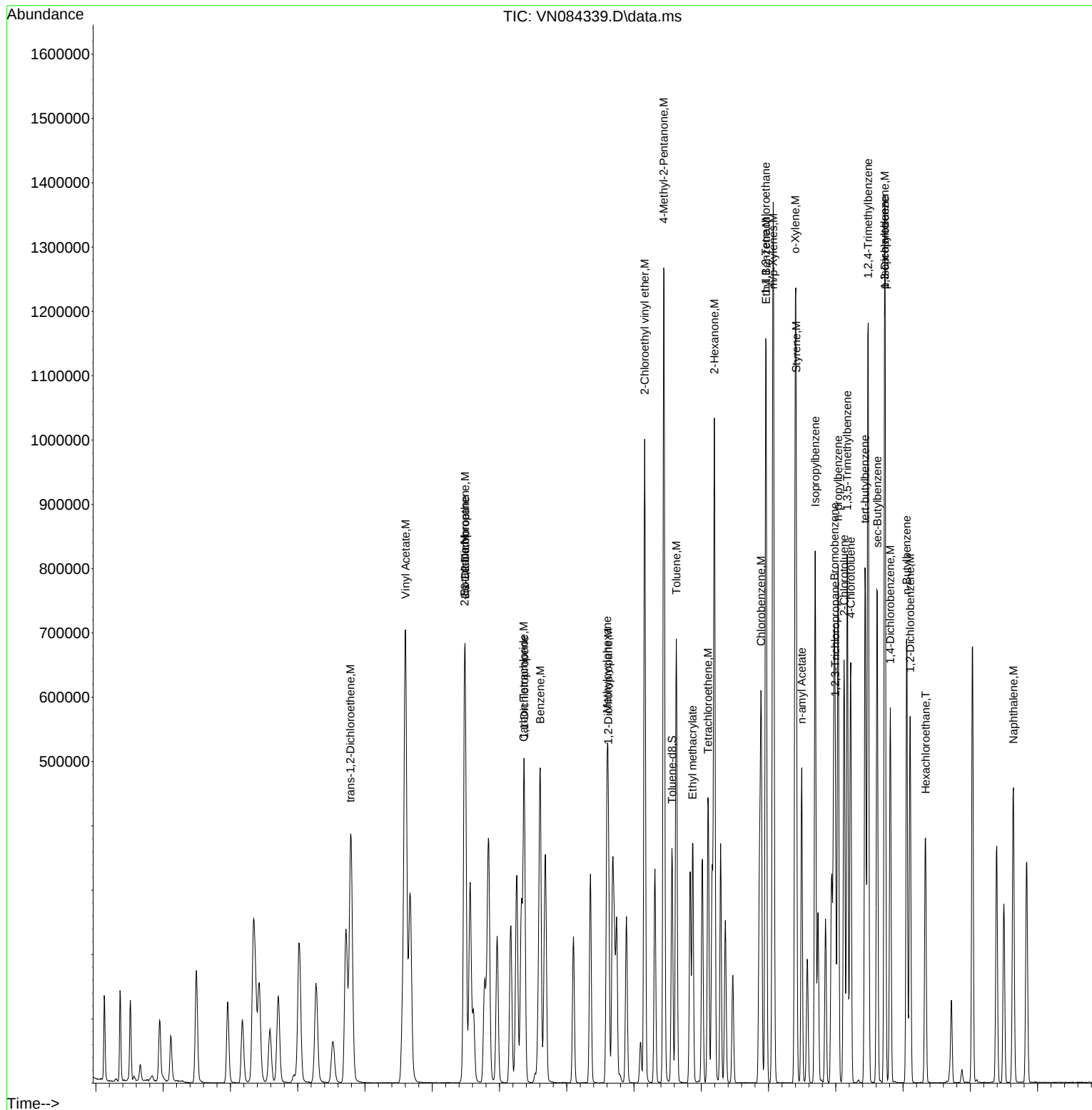
Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
Data File : VN084339.D
Acq On : 08 Oct 2024 10:31
Operator : JC\MD
Sample : VSTDIC050
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 4 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
VSTDIC050

Manual Integrations
APPROVED

Reviewed By : John Carlone 10/09/2024
Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:07:41 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:04:33 2024
Response via : Initial Calibration



Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084340.D
 Acq On : 08 Oct 2024 10:55
 Operator : JC\MD
 Sample : VSTDICCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 5 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VSTDICCC020

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:08:40 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:04:33 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.818	128	34673	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	193364	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	180372	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.582	65	85525	30.638	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery = 102.133%			
60) 4-Bromofluorobenzene	12.847	95	88736	29.808	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery = 99.367%			
63) Toluene-d8	10.565	98	251690	30.121	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery = 100.400%			
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	2.124	85	44634	21.084	ug/l	100
3) Chloromethane	2.359	50	49609	20.593	ug/l	100
4) Vinyl Chloride	2.512	62	48486	20.524	ug/l	100
5) Bromomethane	2.959	94	32772	20.938	ug/l	100
6) Chloroethane	3.118	64	32274	20.839	ug/l	100
7) Trichlorofluoromethane	3.495	101	78670	20.444	ug/l	100
8) Diethyl Ether	3.965	74	28475	20.127	ug/l	100
9) 1,1,2-Trichlorotrifluo...	4.365	101	43710	20.202	ug/l	100
10) 1,1-Dichloroethene	4.342	96	42386	19.633	ug/l	100
11) Methyl Iodide	4.594	142	57080	20.119	ug/l	100
12) Methyl Acetate	5.030	43	52868	19.561	ug/l	100
13) Acrolein	4.183	56	46516	92.647	ug/l	100
14) Acrylonitrile	5.718	53	123604	101.793	ug/l	100
15) Acetone	4.424	58	33083	95.376	ug/l	100
16) Carbon Disulfide	4.706	76	131855	20.510	ug/l	100
17) Allyl chloride	5.024	41	71450	20.416	ug/l	100
18) Methylene Chloride	5.277	84	49627	20.406	ug/l	100
19) trans-1,2-Dichloroethene	5.789	96	46499	20.351	ug/l	100
20) Diisopropyl ether	6.671	45	153833	20.444	ug/l	100
21) 1,1-Dichloroethane	6.571	63	88689	20.541	ug/l	100
22) cis-1,2-Dichloroethene	7.488	96	54636	20.549	ug/l	100
23) tert-Butyl Alcohol	5.524	59	46138	99.059	ug/l #	100
24) Methyl tert-Butyl Ether	5.800	73	145915	20.224	ug/l	100
25) Chloroform	7.965	83	90176	20.622	ug/l	100
26) Cyclohexane	8.253	56	76065	21.064	ug/l #	100
29) 1,1-Dichloropropene	8.371	75	63494	20.003	ug/l	100
30) 2-Butanone	7.483	43	165771	98.088	ug/l	100
31) 2,2-Dichloropropane	7.488	77	74258	19.908	ug/l	100
32) 1,1,1-Trichloroethane	8.171	97	83522	20.585	ug/l	100
33) Carbon Tetrachloride	8.365	117	70174	19.964	ug/l	100
34) Benzene	8.606	78	200730	20.202	ug/l	100
35) Methacrylonitrile	7.783	41	35246	19.549	ug/l	100
36) 1,2-Dichloroethane	8.671	62	67270	20.311	ug/l	100
37) Trichloroethene	9.347	130	47143	20.604	ug/l	100
38) Methylcyclohexane	9.600	83	66905	19.189	ug/l	100
39) 1,2-Dichloropropane	9.624	63	49785	20.547	ug/l	100
40) Dibromomethane	9.706	93	33881	20.007	ug/l	100
41) Bromodichloromethane	9.888	83	72106	20.057	ug/l	100
42) Vinyl Acetate	6.600	43	572205	97.351	ug/l	100

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084340.D
 Acq On : 08 Oct 2024 10:55
 Operator : JC\MD
 Sample : VSTDICCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 5 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VSTDICCC020

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:08:40 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:04:33 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.559	43	65636	19.692	ug/l	100
44) Isopropyl Acetate	8.688	43	108346	19.860	ug/l	100
45) 1,4-Dioxane	9.700	88	18510	376.387	ug/l	100
46) Methyl methacrylate	9.682	41	52087	19.761	ug/l	100
47) n-amyl Acetate	12.494	43	95368	19.654	ug/l	100
48) t-1,3-Dichloropropene	10.835	75	72331	19.470	ug/l	100
49) cis-1,3-Dichloropropene	10.312	75	79003	20.292	ug/l	100
50) 1,1,2-Trichloroethane	11.018	97	45599	20.033	ug/l	100
51) Ethyl methacrylate	10.876	69	74070	19.701	ug/l	100
52) 1,3-Dichloropropane	11.165	76	80622	20.257	ug/l	100
53) Dibromochloromethane	11.359	129	53563	19.920	ug/l	100
54) 1,2-Dibromoethane	11.470	107	47708	20.362	ug/l	100
55) 2-Chloroethyl vinyl ether	10.159	63	161430	94.667	ug/l	100
56) Bromoform	12.576	173	34047	19.091	ug/l	100
58) 4-Methyl-2-Pentanone	10.447	43	336052	100.014	ug/l	100
59) 2-Hexanone	11.194	43	245030	98.139	ug/l	100
61) Tetrachloroethene	11.100	164	41072	20.131	ug/l	100
62) Toluene	10.629	91	211795	20.058	ug/l	100
64) Chlorobenzene	11.888	112	130620	19.878	ug/l	100
65) 1,1,1,2-Tetrachloroethane	11.959	131	46005	20.153	ug/l	100
66) Ethyl Benzene	11.965	91	227198	19.804	ug/l	100
67) m/p-Xylenes	12.070	106	174434	40.081	ug/l	100
68) o-Xylene	12.400	106	83154	19.823	ug/l	100
69) Styrene	12.412	104	142239	19.752	ug/l	100
70) Isopropylbenzene	12.694	105	214822	20.060	ug/l	100
71) 1,1,2,2-Tetrachloroethane	12.935	83	66030	19.931	ug/l	100
72) 1,2,3-Trichloropropane	12.988	75	56046m	19.781	ug/l	
73) Bromobenzene	12.982	156	51441	19.834	ug/l	100
74) n-propylbenzene	13.035	91	253393	19.856	ug/l	100
75) 2-Chlorotoluene	13.123	91	158981	20.048	ug/l	100
76) 1,3,5-Trimethylbenzene	13.170	105	178878	19.838	ug/l	100
77) t-1,4-Dichloro-2-butene	12.735	75	22530	18.583	ug/l	100
78) 4-Chlorotoluene	13.217	91	159107	19.735	ug/l	100
79) tert-butylbenzene	13.435	119	151487	19.692	ug/l	100
80) 1,2,4-Trimethylbenzene	13.482	105	180628	19.743	ug/l	100
81) sec-Butylbenzene	13.617	105	210010	19.829	ug/l	100
82) p-Isopropyltoluene	13.729	119	173074	19.415	ug/l	100
83) 1,3-Dichlorobenzene	13.735	146	95054	19.711	ug/l	100
84) 1,4-Dichlorobenzene	13.812	146	91564	19.121	ug/l	100
85) n-Butylbenzene	14.053	91	144192	18.676	ug/l	100
86) Hexachloroethane	14.335	117	33531	19.524	ug/l	100
87) 1,2-Dichlorobenzene	14.106	146	90933	19.503	ug/l	100
88) 1,2-Dibromo-3-Chloropr...	14.723	75	13240	19.543	ug/l	100
89) 1,2,4-Trichlorobenzene	15.841	180	45853	18.915	ug/l	100
90) Hexachlorobutadiene	15.500	225	20860	18.600	ug/l	100
91) Naphthalene	15.641	128	154471	18.804	ug/l	100
92) 1,2,3-Trichlorobenzene	15.841	180	45853	18.915	ug/l	100

(#) = qualifier out of range (m) = manual integration (+) = signals summed

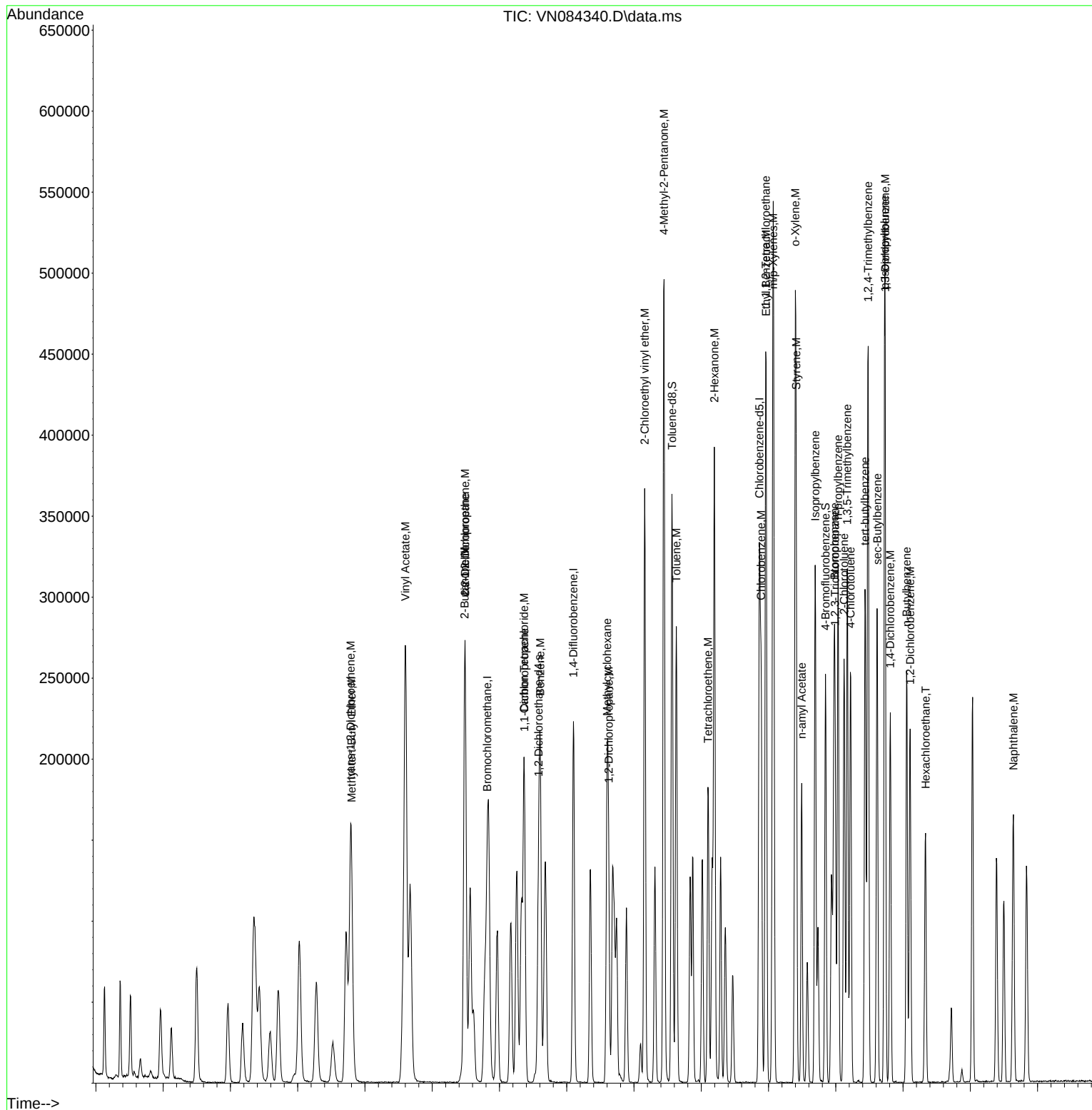
Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
Data File : VN084340.D
Acq On : 08 Oct 2024 10:55
Operator : JC\MD
Sample : VSTDICCC020
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 5 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
VSTDICCC020

Manual Integrations
APPROVED

Reviewed By : John Carlone 10/09/2024
Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:08:40 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:04:33 2024
Response via : Initial Calibration



Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084341.D
 Acq On : 08 Oct 2024 11:19
 Operator : JC\MD
 Sample : VSTDICC005
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 6 Sample Multiplier: 1

Instrument :

MSVOA_N

ClientSampleId :

VSTDICC005

Manual Integrations

APPROVED

Reviewed By :John Carlone 10/09/2024

Supervised By :Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:09:40 2024

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M

Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS

QLast Update : Wed Oct 09 02:04:33 2024

Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.812	128	33135	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	182092	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	168912	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.577	65	80437	30.153	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery = 100.500%			
60) 4-Bromofluorobenzene	12.847	95	78531	28.170	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery = 93.900%			
63) Toluene-d8	10.565	98	237159	30.307	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery = 101.033%			
Target Compounds					Qvalue	
2) Dichlorodifluoromethane	2.130	85	10592	5.236	ug/l	94
3) Chloromethane	2.359	50	11862	5.153	ug/l	93
4) Vinyl Chloride	2.512	62	11670	5.169	ug/l	90
5) Bromomethane	2.953	94	9027	6.035	ug/l	96
6) Chloroethane	3.118	64	8876	5.997	ug/l	92
7) Trichlorofluoromethane	3.500	101	19359	5.264	ug/l	91
8) Diethyl Ether	3.959	74	6806m	5.034	ug/l	
9) 1,1,2-Trichlorotrifluoro...	4.377	101	10938	5.290	ug/l	70
10) 1,1-Dichloroethene	4.342	96	10884	5.275	ug/l	97
11) Methyl Iodide	4.595	142	13135	4.845	ug/l	98
12) Methyl Acetate	5.030	43	12264	4.748	ug/l	97
13) Acrolein	4.183	56	12398	25.840	ug/l	93
14) Acrylonitrile	5.730	53	28276m	24.367	ug/l	
15) Acetone	4.436	58	7318	22.077	ug/l	94
16) Carbon Disulfide	4.706	76	33723	5.489	ug/l	98
17) Allyl chloride	5.030	41	16359	4.891	ug/l	97
18) Methylene Chloride	5.277	84	12168m	5.235	ug/l	
19) trans-1,2-Dichloroethene	5.783	96	11347	5.197	ug/l	86
20) Diisopropyl ether	6.677	45	34552	4.805	ug/l #	93
21) 1,1-Dichloroethane	6.571	63	21583	5.231	ug/l	93
22) cis-1,2-Dichloroethene	7.483	96	12611	4.963	ug/l	96
23) tert-Butyl Alcohol	5.524	59	11110	24.960	ug/l #	100
24) Methyl tert-Butyl Ether	5.800	73	33238	4.821	ug/l #	91
25) Chloroform	7.971	83	21052	5.038	ug/l	92
26) Cyclohexane	8.259	56	16244	4.707	ug/l #	96
29) 1,1-Dichloropropene	8.371	75	14635	4.896	ug/l	99
30) 2-Butanone	7.488	43	36686	23.051	ug/l #	98
31) 2,2-Dichloropropane	7.494	77	16984	4.835	ug/l #	78
32) 1,1,1-Trichloroethane	8.159	97	18852m	4.934	ug/l	
33) Carbon Tetrachloride	8.365	117	16613	5.019	ug/l	91
34) Benzene	8.600	78	47206	5.045	ug/l #	80
35) Methacrylonitrile	7.771	41	7020m	4.135	ug/l	
36) 1,2-Dichloroethane	8.671	62	15630	5.011	ug/l	100
37) Trichloroethene	9.353	130	10715	4.973	ug/l	96
38) Methylcyclohexane	9.600	83	14911	4.541	ug/l	92
39) 1,2-Dichloropropane	9.618	63	11390	4.992	ug/l	90
40) Dibromomethane	9.706	93	8154	5.113	ug/l	98
41) Bromodichloromethane	9.882	83	16959	5.009	ug/l	93
42) Vinyl Acetate	6.606	43	127008	22.946	ug/l	98

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084341.D
 Acq On : 08 Oct 2024 11:19
 Operator : JC\MD
 Sample : VSTDICC005
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 6 Sample Multiplier: 1

Instrument :

MSVOA_N

ClientSampleId :

VSTDICC005

Manual Integrations

APPROVED

Reviewed By : John Carlone 10/09/2024

Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:09:40 2024

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M

Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS

QLast Update : Wed Oct 09 02:04:33 2024

Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.565	43	15009m	4.782	ug/l	
44) Isopropyl Acetate	8.694	43	23240	4.524	ug/l	100
45) 1,4-Dioxane	9.694	88	4149	89.589	ug/l	97
46) Methyl methacrylate	9.682	41	11210	4.516	ug/l	88
47) n-amyl Acetate	12.494	43	19132	4.187	ug/l	98
48) t-1,3-Dichloropropene	10.841	75	17119	4.893	ug/l	92
49) cis-1,3-Dichloropropene	10.312	75	16720	4.560	ug/l #	86
50) 1,1,2-Trichloroethane	11.018	97	10856	5.065	ug/l	92
51) Ethyl methacrylate	10.871	69	14547	4.109	ug/l	90
52) 1,3-Dichloropropane	11.165	76	18781	5.011	ug/l	98
53) Dibromochloromethane	11.353	129	12356	4.880	ug/l	99
54) 1,2-Dibromoethane	11.471	107	10689	4.844	ug/l	98
55) 2-Chloroethyl vinyl ether	10.159	63	33972	21.155	ug/l	97
56) Bromoform	12.576	173	7936	4.725	ug/l #	92
58) 4-Methyl-2-Pentanone	10.447	43	72827	23.145	ug/l	97
59) 2-Hexanone	11.194	43	51606	22.071	ug/l	97
61) Tetrachloroethene	11.100	164	10061	5.266	ug/l	93
62) Toluene	10.629	91	49743	5.030	ug/l	97
64) Chlorobenzene	11.888	112	31991	5.199	ug/l	99
65) 1,1,1,2-Tetrachloroethane	11.965	131	10606	4.961	ug/l	98
66) Ethyl Benzene	11.965	91	48285	4.494	ug/l	99
67) m/p-Xylenes	12.070	106	36802	9.030	ug/l	99
68) o-Xylene	12.400	106	18036	4.591	ug/l	94
69) Styrene	12.412	104	29815	4.421	ug/l	97
70) Isopropylbenzene	12.694	105	44677	4.455	ug/l	98
71) 1,1,2,2-Tetrachloroethane	12.935	83	15289	4.928	ug/l	99
72) 1,2,3-Trichloropropane	12.988	75	12720m	4.794	ug/l	
73) Bromobenzene	12.982	156	11720	4.826	ug/l	97
74) n-propylbenzene	13.035	91	52955	4.431	ug/l	98
75) 2-Chlorotoluene	13.123	91	34704	4.673	ug/l	98
76) 1,3,5-Trimethylbenzene	13.176	105	37234	4.410	ug/l	100
77) t-1,4-Dichloro-2-butene	12.735	75	4820	4.245	ug/l	83
78) 4-Chlorotoluene	13.217	91	35132	4.653	ug/l	97
79) tert-butylbenzene	13.435	119	31579	4.384	ug/l	98
80) 1,2,4-Trimethylbenzene	13.482	105	37927	4.427	ug/l	95
81) sec-Butylbenzene	13.612	105	42859	4.321	ug/l	99
82) p-Isopropyltoluene	13.729	119	36191	4.335	ug/l	100
83) 1,3-Dichlorobenzene	13.735	146	21112	4.675	ug/l	95
84) 1,4-Dichlorobenzene	13.812	146	22118	4.932	ug/l	97
85) n-Butylbenzene	14.053	91	29988	4.148	ug/l	98
86) Hexachloroethane	14.335	117	7779	4.837	ug/l	98
87) 1,2-Dichlorobenzene	14.106	146	21047	4.820	ug/l	99
88) 1,2-Dibromo-3-Chloropr...	14.717	75	2761	4.352	ug/l	94
89) 1,2,4-Trichlorobenzene	15.841	180	10483	4.618	ug/l	99
90) Hexachlorobutadiene	15.500	225	6201	5.904	ug/l	98
91) Naphthalene	15.641	128	30757	3.998	ug/l	99
92) 1,2,3-Trichlorobenzene	15.841	180	10483	4.618	ug/l	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

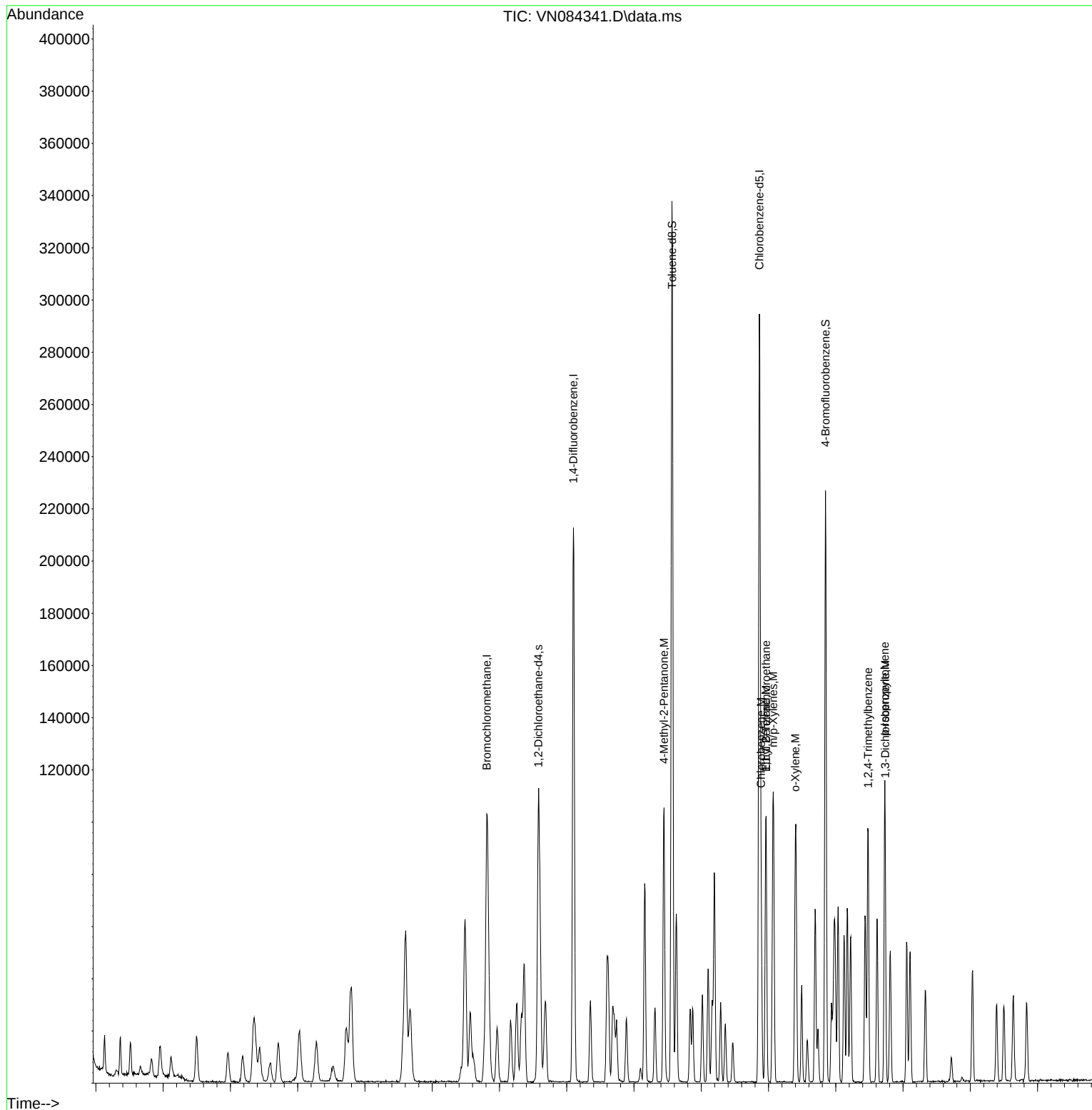
Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
Data File : VN084341.D
Acq On : 08 Oct 2024 11:19
Operator : JC\MD
Sample : VSTDICC005
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 6 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
VSTDICC005

Manual Integrations
APPROVED

Reviewed By : John Carlone 10/09/2024
Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:09:40 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:04:33 2024
Response via : Initial Calibration



Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084343.D
 Acq On : 08 Oct 2024 12:09
 Operator : JC\MD
 Sample : VSTDICV020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 ICVVN100824

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:27:08 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:21:08 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.818	128	35827	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	193781	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	180191	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.582	65	86558	30.009	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery = 100.033%			
60) 4-Bromofluorobenzene	12.847	95	91549	30.784	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery = 102.600%			
63) Toluene-d8	10.565	98	253573	30.377	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery = 101.267%			
Target Compounds					Qvalue	
2) Dichlorodifluoromethane	2.124	85	43254	19.774	ug/l	99
3) Chloromethane	2.365	50	49667	19.953	ug/l	98
4) Vinyl Chloride	2.512	62	49435	20.252	ug/l	99
5) Bromomethane	2.959	94	31882	19.713	ug/l	93
6) Chloroethane	3.118	64	32723	20.448	ug/l	92
7) Trichlorofluoromethane	3.500	101	77185	19.412	ug/l	91
8) Diethyl Ether	3.965	74	28565	19.540	ug/l	98
9) 1,1,2-Trichlorotrifluo...	4.377	101	45902	20.532	ug/l	98
10) 1,1-Dichloroethene	4.342	96	43131	19.334	ug/l	84
11) Methyl Iodide	4.594	142	56446	19.255	ug/l	99
12) Methyl Acetate	5.030	43	52991	18.975	ug/l	99
13) Acrolein	4.183	56	48906	94.270	ug/l	99
14) Acrylonitrile	5.718	53	116456	92.817	ug/l	98
15) Acetone	4.430	58	39824	111.112	ug/l	100
16) Carbon Disulfide	4.712	76	126253	19.006	ug/l	99
17) Allyl chloride	5.024	41	68924	19.060	ug/l	86
18) Methylene Chloride	5.271	84	50598	20.135	ug/l	97
19) trans-1,2-Dichloroethene	5.789	96	45883	19.434	ug/l	98
20) Diisopropyl ether	6.677	45	158301	20.360	ug/l	97
21) 1,1-Dichloroethane	6.565	63	88993	19.948	ug/l	98
22) cis-1,2-Dichloroethene	7.483	96	54789	19.943	ug/l	100
23) tert-Butyl Alcohol	5.524	59	43150	89.659	ug/l #	100
24) Methyl tert-Butyl Ether	5.800	73	146831	19.696	ug/l #	86
25) Chloroform	7.965	83	91875	20.334	ug/l	98
26) Cyclohexane	8.253	56	70636	18.931	ug/l #	92
29) 1,1-Dichloropropene	8.371	75	63709	20.028	ug/l	99
30) 2-Butanone	7.483	43	170510	100.675	ug/l	99
31) 2,2-Dichloropropane	7.488	77	78528	21.007	ug/l #	82
32) 1,1,1-Trichloroethane	8.165	97	83527	20.543	ug/l	99
33) Carbon Tetrachloride	8.365	117	70593	20.040	ug/l	97
34) Benzene	8.606	78	201095	20.195	ug/l	98
35) Methacrylonitrile	7.782	41	35261	19.515	ug/l	99
36) 1,2-Dichloroethane	8.671	62	67448	20.321	ug/l	99
37) Trichloroethene	9.353	130	46466	20.265	ug/l	92
38) Methylcyclohexane	9.600	83	69219	19.810	ug/l	98
39) 1,2-Dichloropropane	9.618	63	49546	20.404	ug/l	94
40) Dibromomethane	9.706	93	34353	20.242	ug/l	98
41) Bromodichloromethane	9.888	83	72371	20.087	ug/l	92
42) Vinyl Acetate	6.606	43	581959	98.798	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084343.D
 Acq On : 08 Oct 2024 12:09
 Operator : JC\MD
 Sample : VSTDICV020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 ICVVN100824

Manual Integrations
 APPROVED

Reviewed By : John Carlone 10/09/2024
 Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:27:08 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:21:08 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.559	43	63334m	18.961	ug/l	
44) Isopropyl Acetate	8.688	43	106167	19.419	ug/l	100
45) 1,4-Dioxane	9.700	88	17788	360.927	ug/l	96
46) Methyl methacrylate	9.682	41	51122	19.353	ug/l	97
47) n-amyl Acetate	12.494	43	94442	19.421	ug/l	99
48) t-1,3-Dichloropropene	10.835	75	74857	20.107	ug/l	98
49) cis-1,3-Dichloropropene	10.312	75	80340	20.591	ug/l	95
50) 1,1,2-Trichloroethane	11.012	97	45700	20.034	ug/l	99
51) Ethyl methacrylate	10.871	69	73999	19.639	ug/l	97
52) 1,3-Dichloropropane	11.159	76	80053	20.070	ug/l	100
53) Dibromochloromethane	11.359	129	54490	20.221	ug/l	99
54) 1,2-Dibromoethane	11.470	107	45857	19.530	ug/l	95
55) 2-Chloroethyl vinyl ether	10.159	63	150677	88.171	ug/l	99
56) Bromoform	12.576	173	35946	20.113	ug/l	97
58) 4-Methyl-2-Pentanone	10.441	43	326914	97.392	ug/l	99
59) 2-Hexanone	11.194	43	248144	99.486	ug/l	99
61) Tetrachloroethene	11.100	164	41736	20.477	ug/l	95
62) Toluene	10.629	91	216792	20.551	ug/l	98
64) Chlorobenzene	11.894	112	131028	19.960	ug/l	98
65) 1,1,1,2-Tetrachloroethane	11.959	131	45996	20.169	ug/l	100
66) Ethyl Benzene	11.965	91	229654	20.038	ug/l	95
67) m/p-Xylenes	12.070	106	179863	41.370	ug/l	98
68) o-Xylene	12.394	106	84107	20.070	ug/l	99
69) Styrene	12.412	104	144766	20.124	ug/l	100
70) Isopropylbenzene	12.694	105	213142	19.923	ug/l	98
71) 1,1,2,2-Tetrachloroethane	12.935	83	65966	19.932	ug/l	99
72) 1,2,3-Trichloropropane	12.994	75	63849m	22.527	ug/l	
73) Bromobenzene	12.976	156	51798	19.992	ug/l	98
74) n-propylbenzene	13.035	91	260928	20.467	ug/l	100
75) 2-Chlorotoluene	13.123	91	158449	20.001	ug/l	99
76) 1,3,5-Trimethylbenzene	13.170	105	181926	20.196	ug/l	99
77) t-1,4-Dichloro-2-butene	12.735	75	22878	18.889	ug/l	98
78) 4-Chlorotoluene	13.217	91	161150	20.008	ug/l	99
79) tert-butylbenzene	13.435	119	155215	20.197	ug/l	99
80) 1,2,4-Trimethylbenzene	13.482	105	186446	20.399	ug/l	99
81) sec-Butylbenzene	13.617	105	212421	20.077	ug/l	99
82) p-Isopropyltoluene	13.729	119	178265	20.018	ug/l	99
83) 1,3-Dichlorobenzene	13.729	146	96137	19.955	ug/l	98
84) 1,4-Dichlorobenzene	13.812	146	92714	19.380	ug/l	98
85) n-Butylbenzene	14.053	91	148207	19.215	ug/l	99
86) Hexachloroethane	14.335	117	34925	20.356	ug/l	98
87) 1,2-Dichlorobenzene	14.106	146	91342	19.610	ug/l	98
88) 1,2-Dibromo-3-Chloropr...	14.717	75	12734	18.815	ug/l	97
89) 1,2,4-Trichlorobenzene	15.835	180	43683	18.038	ug/l	99
90) Hexachlorobutadiene	15.500	225	21663	19.335	ug/l	98
91) Naphthalene	15.641	128	137791	16.790	ug/l	100
92) 1,2,3-Trichlorobenzene	15.835	180	43683	18.038	ug/l	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

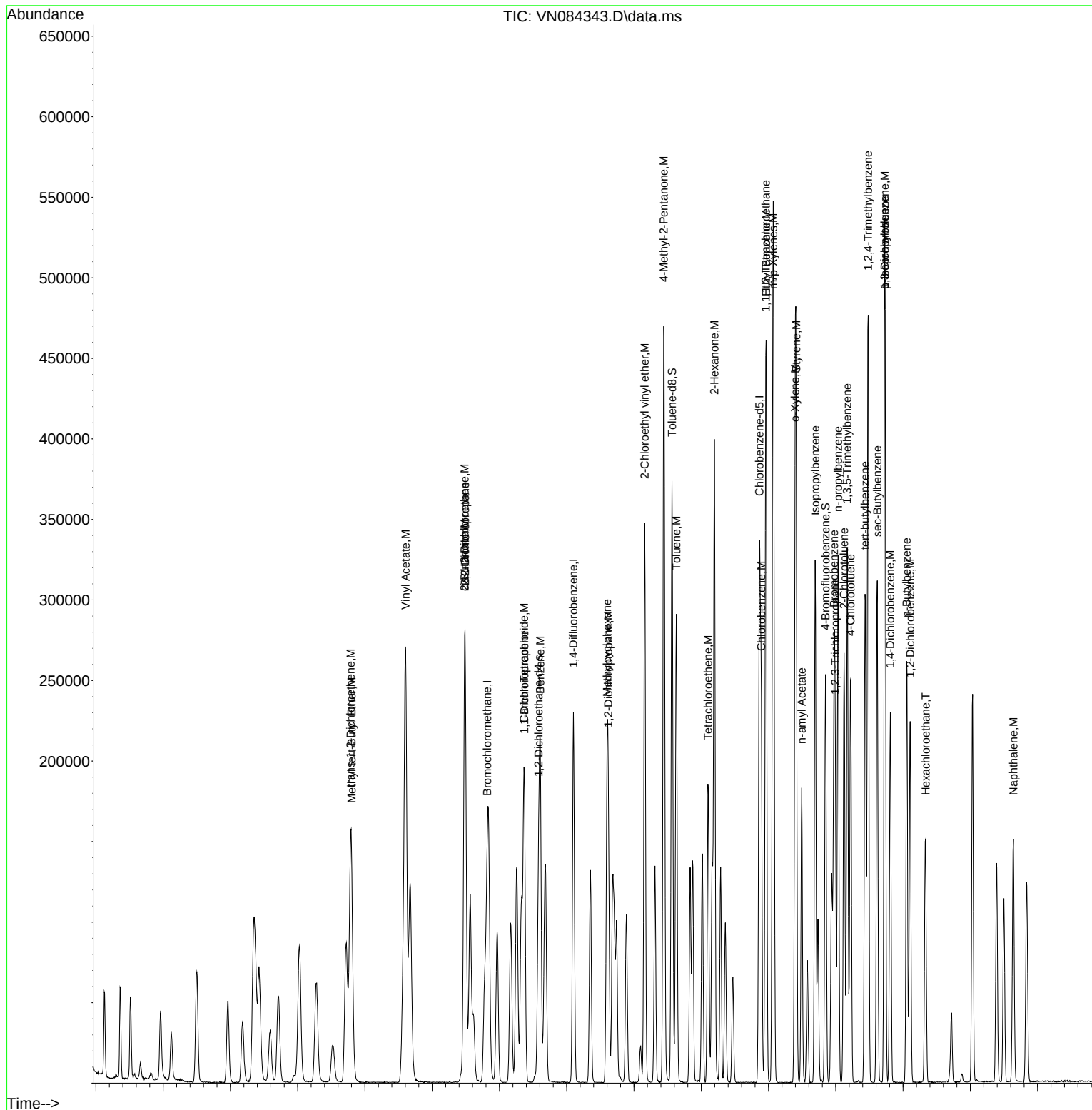
Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
Data File : VN084343.D
Acq On : 08 Oct 2024 12:09
Operator : JC\MD
Sample : VSTDICV020
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 8 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
ICVVN100824

Manual Integrations
APPROVED

Reviewed By : John Carlone 10/09/2024
Supervised By : Mahesh Dadoda 10/09/2024

Quant Time: Oct 09 02:27:08 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:21:08 2024
Response via : Initial Calibration



Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084343.D
 Acq On : 08 Oct 2024 12:09
 Operator : JC\MD
 Sample : VSTDICV020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 ICVVN100824

Quant Time: Oct 09 02:27:08 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:21:08 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	Bromochloromethane	1.000	1.000	0.0	103	0.00
2 M	Dichlorodifluoromethane	1.832	1.811	1.1	97	0.00
3 M	Chloromethane	2.084	2.079	0.2	100	0.00
4 M	Vinyl Chloride	2.044	2.070	-1.3	102	0.00
5 M	Bromomethane	1.354	1.335	1.4	97	0.00
6 M	Chloroethane	1.340	1.370	-2.2	101	0.00
7 M	Trichlorofluoromethane	3.329	3.232	2.9	98	0.00
8 T	Diethyl Ether	1.224	1.196	2.3	100	0.00
9	1,1,2-Trichlorotrifluoroeth	1.872	1.922	-2.7	105	0.01
10 M	1,1-Dichloroethene	1.868	1.806	3.3	102	0.00
11	Methyl Iodide	2.455	2.363	3.7	99	0.00
12	Methyl Acetate	2.339	2.219	5.1	100	0.00
13 M	Acrolein	0.434	0.410	5.5	105	0.00
14 M	Acrylonitrile	1.051	0.975	7.2	94	0.00
15 M	Acetone	0.300	0.333	-11.0	120	0.00
16 M	Carbon Disulfide	5.562	5.286	5.0	96	0.00
17	Allyl chloride	3.028	2.886	4.7	96	0.00
18 M	Methylene Chloride	2.104	2.118	-0.7	102	0.00
19 M	trans-1,2-Dichloroethene	1.977	1.921	2.8	99	0.00
20 T	Diisopropyl ether	6.510	6.628	-1.8	103	0.00
21 M	1,1-Dichloroethane	3.736	3.726	0.3	100	0.00
22 M	cis-1,2-Dichloroethene	2.300	2.294	0.3	100	0.00
23 M	tert-Butyl Alcohol	0.403	0.361	10.4	94	0.00
24 M	Methyl tert-Butyl Ether	6.242	6.148	1.5	101	0.00
25 M	Chloroform	3.783	3.847	-1.7	102	0.00
26	Cyclohexane	3.124	2.957	5.3	93	0.00
27 s	1,2-Dichloroethane-d4	2.415	2.416	-0.0	101	0.00
28 I	1,4-Difluorobenzene	1.000	1.000	0.0	100	0.00
29	1,1-Dichloropropene	0.492	0.493	-0.2	100	0.00
30 M	2-Butanone	0.262	0.264	-0.8	103	0.00
31	2,2-Dichloropropane	0.579	0.608	-5.0	106	0.00
32 M	1,1,1-Trichloroethane	0.629	0.647	-2.9	100	0.00
33 M	Carbon Tetrachloride	0.545	0.546	-0.2	101	0.00
34 M	Benzene	1.542	1.557	-1.0	100	0.00
35	Methacrylonitrile	0.280	0.273	2.5	100	0.00
36 M	1,2-Dichloroethane	0.514	0.522	-1.6	100	0.00
37 M	Trichloroethene	0.355	0.360	-1.4	99	0.00
38	Methylcyclohexane	0.541	0.536	0.9	103	0.00
39 M	1,2-Dichloropropane	0.376	0.384	-2.1	100	0.00
40	Dibromomethane	0.263	0.266	-1.1	101	0.00
41 M	Bromodichloromethane	0.558	0.560	-0.4	100	0.00
42 M	Vinyl Acetate	0.912	0.901	1.2	102	0.00
43	Ethyl Acetate	0.517	0.490	5.2	96	0.00
44	Isopropyl Acetate	0.846	0.822	2.8	98	0.00
45 T	1,4-Dioxane	0.008	0.007	12.5	96	0.00
46	Methyl methacrylate	0.409	0.396	3.2	98	0.00
47	n-amyl Acetate	0.753	0.731	2.9	99	0.00
48 M	t-1,3-Dichloropropene	0.576	0.579	-0.5	103	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084343.D
 Acq On : 08 Oct 2024 12:09
 Operator : JC\MD
 Sample : VSTDICV020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 ICVVN100824

Quant Time: Oct 09 02:27:08 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:21:08 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
49 T	cis-1,3-Dichloropropene	0.604	0.622	-3.0	102	0.00
50 M	1,1,2-Trichloroethane	0.353	0.354	-0.3	100	0.00
51	Ethyl methacrylate	0.583	0.573	1.7	100	0.00
52	1,3-Dichloropropane	0.617	0.620	-0.5	99	0.00
53 M	Dibromochloromethane	0.417	0.422	-1.2	102	0.00
54 M	1,2-Dibromoethane	0.364	0.355	2.5	96	0.00
55 M	2-Chloroethyl vinyl ether	0.265	0.233	12.1	93	0.00
56 M	Bromoform	0.277	0.278	-0.4	106	0.00
57 I	Chlorobenzene-d5	1.000	1.000	0.0	100	0.00
58 M	4-Methyl-2-Pentanone	0.559	0.544	2.7	97	0.00
59 M	2-Hexanone	0.415	0.413	0.5	101	0.00
60 S	4-Bromofluorobenzene	0.495	0.508	-2.6	103	0.00
61 M	Tetrachloroethene	0.339	0.347	-2.4	102	0.00
62 M	Toluene	1.756	1.805	-2.8	102	0.00
63 S	Toluene-d8	1.390	1.407	-1.2	101	0.00
64 M	Chlorobenzene	1.093	1.091	0.2	100	0.00
65	1,1,1,2-Tetrachloroethane	0.380	0.383	-0.8	100	0.00
66 M	Ethyl Benzene	1.908	1.912	-0.2	101	0.00
67 M	m/p-Xylenes	0.724	0.749	-3.5	103	0.00
68 M	o-Xylene	0.698	0.700	-0.3	101	0.00
69 M	Styrene	1.198	1.205	-0.6	102	0.00
70	Isopropylbenzene	1.781	1.774	0.4	99	0.00
71 M	1,1,2,2-Tetrachloroethane	0.551	0.549	0.4	100	0.00
72	1,2,3-Trichloropropane	0.472	0.532	-12.7	114	0.00
73	Bromobenzene	0.431	0.431	0.0	101	0.00
74	n-propylbenzene	2.123	2.172	-2.3	103	0.00
75	2-Chlorotoluene	1.319	1.319	0.0	100	0.00
76	1,3,5-Trimethylbenzene	1.500	1.514	-0.9	102	0.00
77	t-1,4-Dichloro-2-butene	0.202	0.190	5.9	102	0.00
78	4-Chlorotoluene	1.341	1.341	0.0	101	0.00
79	tert-butylbenzene	1.279	1.292	-1.0	102	0.00
80	1,2,4-Trimethylbenzene	1.522	1.552	-2.0	103	0.00
81	sec-Butylbenzene	1.762	1.768	-0.3	101	0.00
82	p-Isopropyltoluene	1.483	1.484	-0.1	103	0.00
83 M	1,3-Dichlorobenzene	0.802	0.800	0.2	101	0.00
84 M	1,4-Dichlorobenzene	0.796	0.772	3.0	101	0.00
85	n-Butylbenzene	1.284	1.234	3.9	103	0.00
86 T	Hexachloroethane	0.286	0.291	-1.7	104	0.00
87 M	1,2-Dichlorobenzene	0.775	0.760	1.9	100	0.00
88	1,2-Dibromo-3-Chloropropane	0.113	0.106	6.2	96	0.00
89	1,2,4-Trichlorobenzene	0.403	0.364	9.7	95	0.00
90	Hexachlorobutadiene	0.187	0.180	3.7	104	0.00
91 M	Naphthalene	1.366	1.147	16.0	89	0.00
92	1,2,3-Trichlorobenzene	0.403	0.364	9.7	95	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084343.D
 Acq On : 08 Oct 2024 12:09
 Operator : JC\MD
 Sample : VSTDICV020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 ICVVN100824

Quant Time: Oct 09 02:27:08 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:21:08 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1 I	Bromochloromethane	30.000	30.000	0.0	103	0.00
2 M	Dichlorodifluoromethane	20.000	19.774	1.1	97	0.00
3 M	Chloromethane	20.000	19.953	0.2	100	0.00
4 M	Vinyl Chloride	20.000	20.252	-1.3	102	0.00
5 M	Bromomethane	20.000	19.713	1.4	97	0.00
6 M	Chloroethane	20.000	20.448	-2.2	101	0.00
7 M	Trichlorofluoromethane	20.000	19.412	2.9	98	0.00
8 T	Diethyl Ether	20.000	19.540	2.3	100	0.00
9	1,1,2-Trichlorotrifluoroeth	20.000	20.532	-2.7	105	0.01
10 M	1,1-Dichloroethene	20.000	19.334	3.3	102	0.00
11	Methyl Iodide	20.000	19.255	3.7	99	0.00
12	Methyl Acetate	20.000	18.975	5.1	100	0.00
13 M	Acrolein	100.000	94.270	5.7	105	0.00
14 M	Acrylonitrile	100.000	92.817	7.2	94	0.00
15 M	Acetone	100.000	111.112	-11.1	120	0.00
16 M	Carbon Disulfide	20.000	19.006	5.0	96	0.00
17	Allyl chloride	20.000	19.060	4.7	96	0.00
18 M	Methylene Chloride	20.000	20.135	-0.7	102	0.00
19 M	trans-1,2-Dichloroethene	20.000	19.434	2.8	99	0.00
20 T	Diisopropyl ether	20.000	20.360	-1.8	103	0.00
21 M	1,1-Dichloroethane	20.000	19.948	0.3	100	0.00
22 M	cis-1,2-Dichloroethene	20.000	19.943	0.3	100	0.00
23 M	tert-Butyl Alcohol	100.000	89.659	10.3	94	0.00
24 M	Methyl tert-Butyl Ether	20.000	19.696	1.5	101	0.00
25 M	Chloroform	20.000	20.334	-1.7	102	0.00
26	Cyclohexane	20.000	18.931	5.3	93	0.00
27 s	1,2-Dichloroethane-d4	30.000	30.009	-0.0	101	0.00
28 I	1,4-Difluorobenzene	30.000	30.000	0.0	100	0.00
29	1,1-Dichloropropene	20.000	20.028	-0.1	100	0.00
30 M	2-Butanone	100.000	100.675	-0.7	103	0.00
31	2,2-Dichloropropane	20.000	21.007	-5.0	106	0.00
32 M	1,1,1-Trichloroethane	20.000	20.543	-2.7	100	0.00
33 M	Carbon Tetrachloride	20.000	20.040	-0.2	101	0.00
34 M	Benzene	20.000	20.195	-1.0	100	0.00
35	Methacrylonitrile	20.000	19.515	2.4	100	0.00
36 M	1,2-Dichloroethane	20.000	20.321	-1.6	100	0.00
37 M	Trichloroethene	20.000	20.265	-1.3	99	0.00
38	Methylcyclohexane	20.000	19.810	1.0	103	0.00
39 M	1,2-Dichloropropane	20.000	20.404	-2.0	100	0.00
40	Dibromomethane	20.000	20.242	-1.2	101	0.00
41 M	Bromodichloromethane	20.000	20.087	-0.4	100	0.00
42 M	Vinyl Acetate	100.000	98.798	1.2	102	0.00
43	Ethyl Acetate	20.000	18.961	5.2	96	0.00
44	Isopropyl Acetate	20.000	19.419	2.9	98	0.00
45 T	1,4-Dioxane	400.000	360.927	9.8	96	0.00
46	Methyl methacrylate	20.000	19.353	3.2	98	0.00
47	n-amyl Acetate	20.000	19.421	2.9	99	0.00
48 M	t-1,3-Dichloropropene	20.000	20.107	-0.5	103	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
 Data File : VN084343.D
 Acq On : 08 Oct 2024 12:09
 Operator : JC\MD
 Sample : VSTDICV020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 8 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 ICVVN100824

Quant Time: Oct 09 02:27:08 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:21:08 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
49 T	cis-1,3-Dichloropropene	20.000	20.591	-3.0	102	0.00
50 M	1,1,2-Trichloroethane	20.000	20.034	-0.2	100	0.00
51	Ethyl methacrylate	20.000	19.639	1.8	100	0.00
52	1,3-Dichloropropane	20.000	20.070	-0.4	99	0.00
53 M	Dibromochloromethane	20.000	20.221	-1.1	102	0.00
54 M	1,2-Dibromoethane	20.000	19.530	2.3	96	0.00
55 M	2-Chloroethyl vinyl ether	100.000	88.171	11.8	93	0.00
56 M	Bromoform	20.000	20.113	-0.6	106	0.00
57 I	Chlorobenzene-d5	30.000	30.000	0.0	100	0.00
58 M	4-Methyl-2-Pentanone	100.000	97.392	2.6	97	0.00
59 M	2-Hexanone	100.000	99.486	0.5	101	0.00
60 S	4-Bromofluorobenzene	30.000	30.784	-2.6	103	0.00
61 M	Tetrachloroethene	20.000	20.477	-2.4	102	0.00
62 M	Toluene	20.000	20.551	-2.8	102	0.00
63 S	Toluene-d8	30.000	30.377	-1.3	101	0.00
64 M	Chlorobenzene	20.000	19.960	0.2	100	0.00
65	1,1,1,2-Tetrachloroethane	20.000	20.169	-0.8	100	0.00
66 M	Ethyl Benzene	20.000	20.038	-0.2	101	0.00
67 M	m/p-Xylenes	40.000	41.370	-3.4	103	0.00
68 M	o-Xylene	20.000	20.070	-0.4	101	0.00
69 M	Styrene	20.000	20.124	-0.6	102	0.00
70	Isopropylbenzene	20.000	19.923	0.4	99	0.00
71 M	1,1,2,2-Tetrachloroethane	20.000	19.932	0.3	100	0.00
72	1,2,3-Trichloropropane	20.000	22.527	-12.6	114	0.00
73	Bromobenzene	20.000	19.992	0.0	101	0.00
74	n-propylbenzene	20.000	20.467	-2.3	103	0.00
75	2-Chlorotoluene	20.000	20.001	-0.0	100	0.00
76	1,3,5-Trimethylbenzene	20.000	20.196	-1.0	102	0.00
77	t-1,4-Dichloro-2-butene	20.000	18.889	5.6	102	0.00
78	4-Chlorotoluene	20.000	20.008	-0.0	101	0.00
79	tert-butylbenzene	20.000	20.197	-1.0	102	0.00
80	1,2,4-Trimethylbenzene	20.000	20.399	-2.0	103	0.00
81	sec-Butylbenzene	20.000	20.077	-0.4	101	0.00
82	p-Isopropyltoluene	20.000	20.018	-0.1	103	0.00
83 M	1,3-Dichlorobenzene	20.000	19.955	0.2	101	0.00
84 M	1,4-Dichlorobenzene	20.000	19.380	3.1	101	0.00
85	n-Butylbenzene	20.000	19.215	3.9	103	0.00
86 T	Hexachloroethane	20.000	20.356	-1.8	104	0.00
87 M	1,2-Dichlorobenzene	20.000	19.610	2.0	100	0.00
88	1,2-Dibromo-3-Chloropropane	20.000	18.815	5.9	96	0.00
89	1,2,4-Trichlorobenzene	20.000	18.038	9.8	95	0.00
90	Hexachlorobutadiene	20.000	19.335	3.3	104	0.00
91 M	Naphthalene	20.000	16.790	16.1	89	0.00
92	1,2,3-Trichlorobenzene	20.000	18.038	9.8	95	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0



284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: CHEMTECH Contract: TULL01

Lab Code: CHEM Case No.: P4464 SAS No.: P4464 SDG No.: P4464

Instrument ID: MSVOA_N Calibration Date/Time: 10/23/2024 13:26

Lab File ID: VN084469.D Init. Calib. Date(s): 10/08/2024 10/08/2024

Heated Purge: (Y/N) N Init. Calib. Time(s): 09:43 11:19

GC Column: RXI-624 ID: 0.25 (mm)

COMPOUND	RRF	RRF020	MIN RRF	%D	MAX%D
Benzene	1.542	1.545	0.5	0.19	
Toluene	1.756	1.718	0.4	-2.16	
Ethyl Benzene	1.908	1.782	0.1	-6.6	
m/p-Xylenes	0.724	0.700	0.3	-3.32	
o-Xylene	0.698	0.653	0.3	-6.45	
1,2-Dichloroethane-d4	2.415	2.435	0.01	0.83	
Toluene-d8	1.390	1.458	0.01	4.89	
4-Bromofluorobenzene	0.495	0.505	0.2	2.02	

All other compounds must meet a minimum RRF of 0.010.
RRF of 1,4-Dioxane = Value should be divide by 1000.

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084469.D
 Acq On : 23 Oct 2024 13:26
 Operator : JC\MD
 Sample : VSTDCCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VSTDCCC020

Manual Integrations
 APPROVED

Reviewed By :Semsettin Yesilyurt 10/24/2024
 Supervised By :Mahesh Dadoda 10/24/2024

Quant Time: Oct 24 04:04:50 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.812	128	34138	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	175440	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	166908	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.577	65	83115	30.241	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery = 100.800%			
60) 4-Bromofluorobenzene	12.847	95	84319	30.609	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery = 102.033%			
63) Toluene-d8	10.565	98	243331	31.470	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery = 104.900%			
Target Compounds						Qvalue
2) Dichlorodifluoromethane	2.130	85	37255	17.874	ug/l	92
3) Chloromethane	2.365	50	41398	17.454	ug/l	99
4) Vinyl Chloride	2.512	62	42149	18.121	ug/l	99
5) Bromomethane	2.965	94	26716	17.336	ug/l	99
6) Chloroethane	3.124	64	27644	18.129	ug/l	94
7) Trichlorofluoromethane	3.501	101	71436	18.855	ug/l	96
8) Diethyl Ether	3.959	74	22048	15.829	ug/l	97
9) 1,1,2-Trichlorotrifluo...	4.371	101	41346	19.409	ug/l	98
10) 1,1-Dichloroethene	4.336	96	37150	17.477	ug/l	87
11) Methyl Iodide	4.589	142	47067	16.850	ug/l	95
12) Methyl Acetate	5.030	43	49154	18.472	ug/l	100
13) Acrolein	4.183	56	27443	55.516	ug/l	99
14) Acrylonitrile	5.724	53	98418	82.322	ug/l	99
15) Acetone	4.430	58	32398	94.865	ug/l	94
16) Carbon Disulfide	4.712	76	105376	16.648	ug/l	99
17) Allyl chloride	5.030	41	54481	15.811	ug/l	97
18) Methylene Chloride	5.277	84	44931	18.764	ug/l	97
19) trans-1,2-Dichloroethene	5.794	96	39500	17.558	ug/l	91
20) Diisopropyl ether	6.671	45	138664	18.717	ug/l #	97
21) 1,1-Dichloroethane	6.571	63	79550	18.713	ug/l	97
22) cis-1,2-Dichloroethene	7.488	96	47830	18.271	ug/l	98
23) tert-Butyl Alcohol	5.524	59	34588	75.425	ug/l #	100
24) Methyl tert-Butyl Ether	5.794	73	121896	17.160	ug/l	97
25) Chloroform	7.965	83	84407	19.605	ug/l	96
26) Cyclohexane	8.259	56	58297	16.397	ug/l #	93
29) 1,1-Dichloropropene	8.371	75	54218	18.826	ug/l	97
30) 2-Butanone	7.483	43	137392	89.602	ug/l	100
31) 2,2-Dichloropropane	7.494	77	69693	20.593	ug/l #	83
32) 1,1,1-Trichloroethane	8.171	97	73706	20.022	ug/l	98
33) Carbon Tetrachloride	8.359	117	64520	20.231	ug/l	96
34) Benzene	8.606	78	180734	20.048	ug/l	99
35) Methacrylonitrile	7.783	41	30271	18.505	ug/l	96
36) 1,2-Dichloroethane	8.671	62	60289	20.063	ug/l	98
37) Trichloroethene	9.353	130	40374	19.449	ug/l	99
38) Methylcyclohexane	9.600	83	54803	17.324	ug/l	99
39) 1,2-Dichloropropane	9.618	63	44518	20.250	ug/l	98
40) Dibromomethane	9.706	93	31515	20.511	ug/l	97
41) Bromodichloromethane	9.888	83	67492	20.692	ug/l	95
42) Vinyl Acetate	6.606	43	435550	81.672	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084469.D
 Acq On : 23 Oct 2024 13:26
 Operator : JC\MD
 Sample : VSTDCCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :

MSVOA_N

ClientSampleId :

VSTDCCC020

Manual Integrations

APPROVED

Reviewed By :Semsettin Yesilyurt 10/24/2024

Supervised By :Mahesh Dadoda 10/24/2024

Quant Time: Oct 24 04:04:50 2024

Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M

Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS

QLast Update : Wed Oct 09 02:22:28 2024

Response via : Initial Calibration

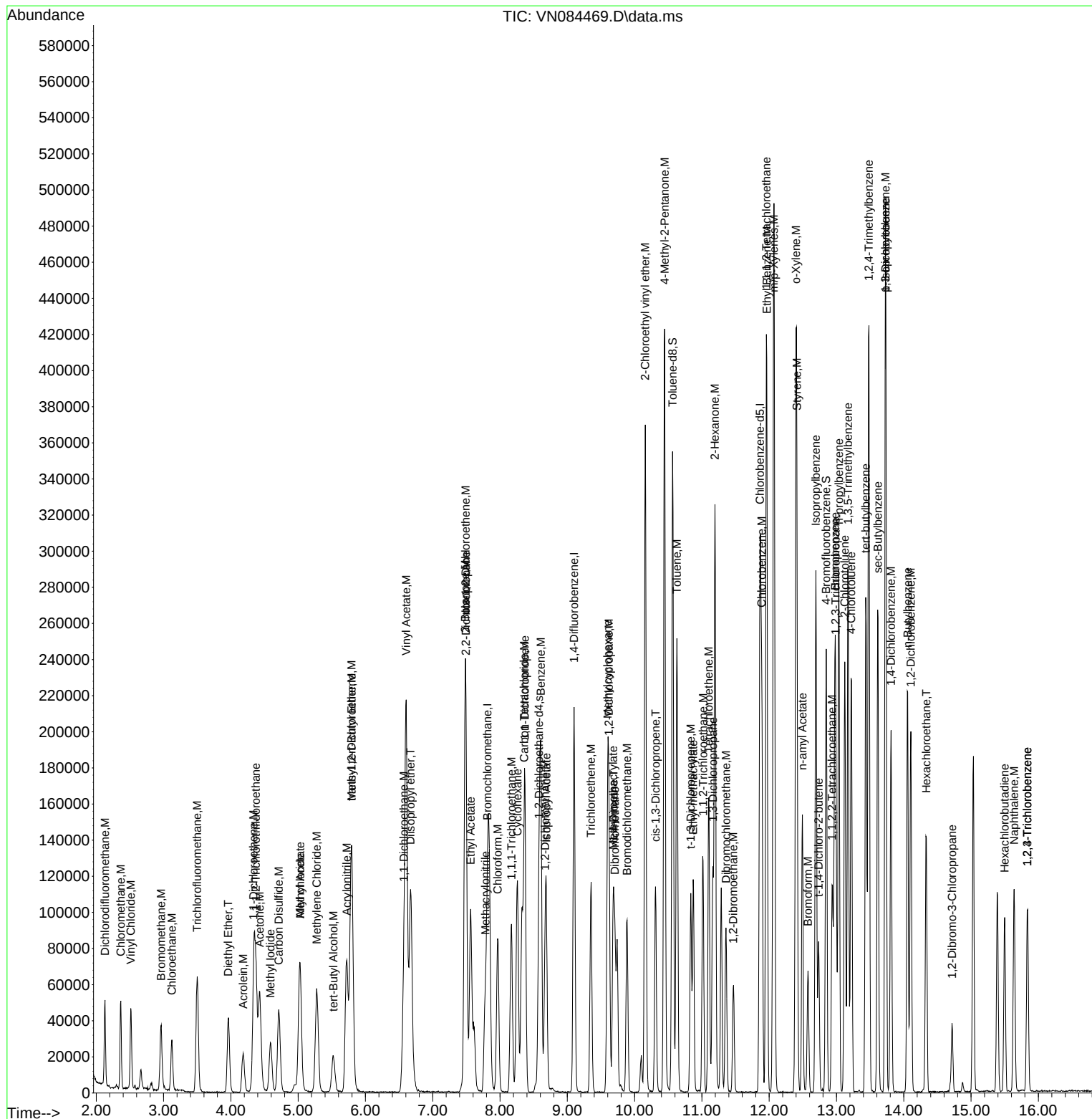
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.565	43	54041	17.870	ug/l	98
44) Isopropyl Acetate	8.688	43	88405	17.861	ug/l	99
45) 1,4-Dioxane	9.688	88	16447	368.605	ug/l	96
46) Methyl methacrylate	9.682	41	41083	17.179	ug/l	94
47) n-amyl Acetate	12.494	43	77378	17.575	ug/l	97
48) t-1,3-Dichloropropene	10.835	75	61764	18.324	ug/l	97
49) cis-1,3-Dichloropropene	10.312	75	67468	19.099	ug/l	95
50) 1,1,2-Trichloroethane	11.018	97	42922	20.783	ug/l	98
51) Ethyl methacrylate	10.871	69	59699	17.501	ug/l	96
52) 1,3-Dichloropropane	11.165	76	71481	19.795	ug/l	98
53) Dibromochloromethane	11.359	129	49210	20.171	ug/l	97
54) 1,2-Dibromoethane	11.465	107	41272	19.415	ug/l	98
55) 2-Chloroethyl vinyl ether	10.159	63	157274	101.652	ug/l	98
56) Bromoform	12.576	173	31876	19.700	ug/l	98
58) 4-Methyl-2-Pentanone	10.447	43	277527	89.259	ug/l	99
59) 2-Hexanone	11.194	43	204406	88.472	ug/l	98
61) Tetrachloroethene	11.100	164	37616	19.924	ug/l	97
62) Toluene	10.629	91	191153	19.563	ug/l	100
64) Chlorobenzene	11.888	112	115407	18.980	ug/l	99
65) 1,1,1,2-Tetrachloroethane	11.959	131	43197	20.449	ug/l	98
66) Ethyl Benzene	11.965	91	198241	18.674	ug/l	98
67) m/p-Xylenes	12.071	106	155839	38.697	ug/l	99
68) o-Xylene	12.400	106	72636	18.712	ug/l	99
69) Styrene	12.412	104	126935	19.049	ug/l	99
70) Isopropylbenzene	12.694	105	183946	18.562	ug/l	98
71) 1,1,2,2-Tetrachloroethane	12.935	83	59990	19.569	ug/l	98
72) 1,2,3-Trichloropropane	12.988	75	48710m	18.553	ug/l	
73) Bromobenzene	12.982	156	45610	19.005	ug/l	98
74) n-propylbenzene	13.035	91	224542	19.015	ug/l	100
75) 2-Chlorotoluene	13.123	91	138485	18.872	ug/l	98
76) 1,3,5-Trimethylbenzene	13.170	105	160452	19.230	ug/l	100
77) t-1,4-Dichloro-2-butene	12.735	75	19182	17.098	ug/l	96
78) 4-Chlorotoluene	13.218	91	143904	19.289	ug/l	99
79) tert-butylbenzene	13.435	119	131827	18.519	ug/l	100
80) 1,2,4-Trimethylbenzene	13.482	105	161851	19.118	ug/l	99
81) sec-Butylbenzene	13.617	105	184458	18.822	ug/l	100
82) p-Isopropyltoluene	13.729	119	151922	18.417	ug/l	99
83) 1,3-Dichlorobenzene	13.729	146	87202	19.541	ug/l	99
84) 1,4-Dichlorobenzene	13.812	146	83778	18.906	ug/l	98
85) n-Butylbenzene	14.059	91	120971	16.932	ug/l	100
86) Hexachloroethane	14.335	117	30310	19.072	ug/l	99
87) 1,2-Dichlorobenzene	14.106	146	83265	19.299	ug/l	98
88) 1,2-Dibromo-3-Chloropr...	14.717	75	10457	16.680	ug/l	100
89) 1,2,4-Trichlorobenzene	15.835	180	36031	16.062	ug/l	99
90) Hexachlorobutadiene	15.500	225	17891	17.240	ug/l	98
91) Naphthalene	15.641	128	104973	13.809	ug/l	99
92) 1,2,3-Trichlorobenzene	15.835	180	36031	16.062	ug/l	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

Instrument :
MSVOA_N
ClientSampleId :
VSTDCCC020

Manual Integrations APPROVED

Reviewed By :Semsettin Yesilyurt 10/24/2024
Supervised By :Mahesh Dadoda 10/24/2024



Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084469.D
 Acq On : 23 Oct 2024 13:26
 Operator : JC\MD
 Sample : VSTDCCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 LabSampleId :
 VSTDCCC020

Quant Time: Oct 24 04:04:50 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	Bromochloromethane	1.000	1.000	0.0	98	0.00
2 M	Dichlorodifluoromethane	1.832	1.637	10.6	83	0.00
3 M	Chloromethane	2.084	1.819	12.7	83	0.00
4 M	Vinyl Chloride	2.044	1.852	9.4	87	0.00
5 M	Bromomethane	1.354	1.174	13.3	82	0.00
6 M	Chloroethane	1.340	1.215	9.3	86	0.00
7 M	Trichlorofluoromethane	3.329	3.139	5.7	91	0.00
8 T	Diethyl Ether	1.224	0.969	20.8	77	0.00
9	1,1,2-Trichlorotrifluoroeth	1.872	1.817	2.9	95	0.00
10 M	1,1-Dichloroethene	1.868	1.632	12.6	88	0.00
11	Methyl Iodide	2.455	2.068	15.8	82	0.00
12	Methyl Acetate	2.339	2.160	7.7	93	0.00
13 M	Acrolein	0.434	0.241	44.5#	59	0.00
14 M	Acrylonitrile	1.051	0.865	17.7	80	0.00
15 M	Acetone	0.300	0.285	5.0	98	0.00
16 M	Carbon Disulfide	5.562	4.630	16.8	80	0.00
17	Allyl chloride	3.028	2.394	20.9	76	0.00
18 M	Methylene Chloride	2.104	1.974	6.2	91	0.00
19 M	trans-1,2-Dichloroethene	1.977	1.736	12.2	85	0.00
20 T	Diisopropyl ether	6.510	6.093	6.4	90	0.00
21 M	1,1-Dichloroethane	3.736	3.495	6.5	90	0.00
22 M	cis-1,2-Dichloroethene	2.300	2.102	8.6	88	0.00
23 M	tert-Butyl Alcohol	0.403	0.304	24.6	75	0.00
24 M	Methyl tert-Butyl Ether	6.242	5.356	14.2	84	0.00
25 M	Chloroform	3.783	3.709	2.0	94	0.00
26	Cyclohexane	3.124	2.562	18.0	77	0.00
27 s	1,2-Dichloroethane-d4	2.415	2.435	-0.8	97	0.00
28 I	1,4-Difluorobenzene	1.000	1.000	0.0	91	0.00
29	1,1-Dichloropropene	0.492	0.464	5.7	85	0.00
30 M	2-Butanone	0.262	0.235	10.3	83	0.00
31	2,2-Dichloropropane	0.579	0.596	-2.9	94	0.00
32 M	1,1,1-Trichloroethane	0.629	0.630	-0.2	88	0.00
33 M	Carbon Tetrachloride	0.545	0.552	-1.3	92	0.00
34 M	Benzene	1.542	1.545	-0.2	90	0.00
35	Methacrylonitrile	0.280	0.259	7.5	86	0.00
36 M	1,2-Dichloroethane	0.514	0.515	-0.2	90	0.00
37 M	Trichloroethene	0.355	0.345	2.8	86	0.00
38	Methylcyclohexane	0.541	0.469	13.3	82	0.00
39 M	1,2-Dichloropropane	0.376	0.381	-1.3	89	0.00
40	Dibromomethane	0.263	0.269	-2.3	93	0.00
41 M	Bromodichloromethane	0.558	0.577	-3.4	94	0.00
42 M	Vinyl Acetate	0.912	0.745	18.3	76	0.00
43	Ethyl Acetate	0.517	0.462	10.6	82	0.00
44	Isopropyl Acetate	0.846	0.756	10.6	82	0.00
45 T	1,4-Dioxane	0.008	0.007	12.5	89	-0.01
46	Methyl methacrylate	0.409	0.351	14.2	79	0.00
47	n-amyl Acetate	0.753	0.662	12.1	81	0.00
48 M	t-1,3-Dichloropropene	0.576	0.528	8.3	85	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084469.D
 Acq On : 23 Oct 2024 13:26
 Operator : JC\MD
 Sample : VSTDCCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 LabSampleId :
 VSTDCCC020

Quant Time: Oct 24 04:04:50 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
49 T	cis-1,3-Dichloropropene	0.604	0.577	4.5	85	0.00
50 M	1,1,2-Trichloroethane	0.353	0.367	-4.0	94	0.00
51	Ethyl methacrylate	0.583	0.510	12.5	81	0.00
52	1,3-Dichloropropane	0.617	0.611	1.0	89	0.00
53 M	Dibromochloromethane	0.417	0.421	-1.0	92	0.00
54 M	1,2-Dibromoethane	0.364	0.353	3.0	87	0.00
55 M	2-Chloroethyl vinyl ether	0.265	0.269	-1.5	97	0.00
56 M	Bromoform	0.277	0.273	1.4	94	0.00
57 I	Chlorobenzene-d5	1.000	1.000	0.0	93	0.00
58 M	4-Methyl-2-Pentanone	0.559	0.499	10.7	83	0.00
59 M	2-Hexanone	0.415	0.367	11.6	83	0.00
60 S	4-Bromofluorobenzene	0.495	0.505	-2.0	95	0.00
61 M	Tetrachloroethene	0.339	0.338	0.3	92	0.00
62 M	Toluene	1.756	1.718	2.2	90	0.00
63 S	Toluene-d8	1.390	1.458	-4.9	97	0.00
64 M	Chlorobenzene	1.093	1.037	5.1	88	0.00
65	1,1,1,2-Tetrachloroethane	0.380	0.388	-2.1	94	0.00
66 M	Ethyl Benzene	1.908	1.782	6.6	87	0.00
67 M	m/p-Xylenes	0.724	0.700	3.3	89	0.00
68 M	o-Xylene	0.698	0.653	6.4	87	0.00
69 M	Styrene	1.198	1.141	4.8	89	0.00
70	Isopropylbenzene	1.781	1.653	7.2	86	0.00
71 M	1,1,2,2-Tetrachloroethane	0.551	0.539	2.2	91	0.00
72	1,2,3-Trichloropropane	0.472	0.438	7.2	87	0.00
73	Bromobenzene	0.431	0.410	4.9	89	0.00
74	n-propylbenzene	2.123	2.018	4.9	89	0.00
75	2-Chlorotoluene	1.319	1.245	5.6	87	0.00
76	1,3,5-Trimethylbenzene	1.500	1.442	3.9	90	0.00
77	t-1,4-Dichloro-2-butene	0.202	0.172	14.9	85	0.00
78	4-Chlorotoluene	1.341	1.293	3.6	90	0.00
79	tert-butylbenzene	1.279	1.185	7.3	87	0.00
80	1,2,4-Trimethylbenzene	1.522	1.455	4.4	90	0.00
81	sec-Butylbenzene	1.762	1.658	5.9	88	0.00
82	p-Isopropyltoluene	1.483	1.365	8.0	88	0.00
83 M	1,3-Dichlorobenzene	0.802	0.784	2.2	92	0.00
84 M	1,4-Dichlorobenzene	0.796	0.753	5.4	91	0.00
85	n-Butylbenzene	1.284	1.087	15.3	84	0.00
86 T	Hexachloroethane	0.286	0.272	4.9	90	0.00
87 M	1,2-Dichlorobenzene	0.775	0.748	3.5	92	0.00
88	1,2-Dibromo-3-Chloropropane	0.113	0.094	16.8	79	0.00
89	1,2,4-Trichlorobenzene	0.403	0.324	19.6	79	0.00
90	Hexachlorobutadiene	0.187	0.161	13.9	86	0.00
91 M	Naphthalene	1.366	0.943	31.0#	68	0.00
92	1,2,3-Trichlorobenzene	0.403	0.324	19.6	79	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084469.D
 Acq On : 23 Oct 2024 13:26
 Operator : JC\MD
 Sample : VSTDCCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 LabSampleId :
 VSTDCCC020

Quant Time: Oct 24 04:04:50 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1 I	Bromochloromethane	30.000	30.000	0.0	98	0.00
2 M	Dichlorodifluoromethane	20.000	17.874	10.6	83	0.00
3 M	Chloromethane	20.000	17.454	12.7	83	0.00
4 M	Vinyl Chloride	20.000	18.121	9.4	87	0.00
5 M	Bromomethane	20.000	17.336	13.3	82	0.00
6 M	Chloroethane	20.000	18.129	9.4	86	0.00
7 M	Trichlorofluoromethane	20.000	18.855	5.7	91	0.00
8 T	Diethyl Ether	20.000	15.829	20.9	77	0.00
9	1,1,2-Trichlorotrifluoroeth	20.000	19.409	3.0	95	0.00
10 M	1,1-Dichloroethene	20.000	17.477	12.6	88	0.00
11	Methyl Iodide	20.000	16.850	15.7	82	0.00
12	Methyl Acetate	20.000	18.472	7.6	93	0.00
13 M	Acrolein	100.000	55.516	44.5#	59	0.00
14 M	Acrylonitrile	100.000	82.322	17.7	80	0.00
15 M	Acetone	100.000	94.865	5.1	98	0.00
16 M	Carbon Disulfide	20.000	16.648	16.8	80	0.00
17	Allyl chloride	20.000	15.811	20.9	76	0.00
18 M	Methylene Chloride	20.000	18.764	6.2	91	0.00
19 M	trans-1,2-Dichloroethene	20.000	17.558	12.2	85	0.00
20 T	Diisopropyl ether	20.000	18.717	6.4	90	0.00
21 M	1,1-Dichloroethane	20.000	18.713	6.4	90	0.00
22 M	cis-1,2-Dichloroethene	20.000	18.271	8.6	88	0.00
23 M	tert-Butyl Alcohol	100.000	75.425	24.6	75	0.00
24 M	Methyl tert-Butyl Ether	20.000	17.160	14.2	84	0.00
25 M	Chloroform	20.000	19.605	2.0	94	0.00
26	Cyclohexane	20.000	16.397	18.0	77	0.00
27 s	1,2-Dichloroethane-d4	30.000	30.241	-0.8	97	0.00
28 I	1,4-Difluorobenzene	30.000	30.000	0.0	91	0.00
29	1,1-Dichloropropene	20.000	18.826	5.9	85	0.00
30 M	2-Butanone	100.000	89.602	10.4	83	0.00
31	2,2-Dichloropropane	20.000	20.593	-3.0	94	0.00
32 M	1,1,1-Trichloroethane	20.000	20.022	-0.1	88	0.00
33 M	Carbon Tetrachloride	20.000	20.231	-1.2	92	0.00
34 M	Benzene	20.000	20.048	-0.2	90	0.00
35	Methacrylonitrile	20.000	18.505	7.5	86	0.00
36 M	1,2-Dichloroethane	20.000	20.063	-0.3	90	0.00
37 M	Trichloroethene	20.000	19.449	2.8	86	0.00
38	Methylcyclohexane	20.000	17.324	13.4	82	0.00
39 M	1,2-Dichloropropane	20.000	20.250	-1.3	89	0.00
40	Dibromomethane	20.000	20.511	-2.6	93	0.00
41 M	Bromodichloromethane	20.000	20.692	-3.5	94	0.00
42 M	Vinyl Acetate	100.000	81.672	18.3	76	0.00
43	Ethyl Acetate	20.000	17.870	10.6	82	0.00
44	Isopropyl Acetate	20.000	17.861	10.7	82	0.00
45 T	1,4-Dioxane	400.000	368.605	7.8	89	-0.01
46	Methyl methacrylate	20.000	17.179	14.1	79	0.00
47	n-amyl Acetate	20.000	17.575	12.1	81	0.00
48 M	t-1,3-Dichloropropene	20.000	18.324	8.4	85	0.00

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084469.D
 Acq On : 23 Oct 2024 13:26
 Operator : JC\MD
 Sample : VSTDCCC020
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 LabSampleId :
 VSTDCCC020

Quant Time: Oct 24 04:04:50 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 50% Max. R.T. Dev 0.50min
 Max. RRF Dev : 25% Max. Rel. Area : 150%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
49 T	cis-1,3-Dichloropropene	20.000	19.099	4.5	85	0.00
50 M	1,1,2-Trichloroethane	20.000	20.783	-3.9	94	0.00
51	Ethyl methacrylate	20.000	17.501	12.5	81	0.00
52	1,3-Dichloropropane	20.000	19.795	1.0	89	0.00
53 M	Dibromochloromethane	20.000	20.171	-0.9	92	0.00
54 M	1,2-Dibromoethane	20.000	19.415	2.9	87	0.00
55 M	2-Chloroethyl vinyl ether	100.000	101.652	-1.7	97	0.00
56 M	Bromoform	20.000	19.700	1.5	94	0.00
57 I	Chlorobenzene-d5	30.000	30.000	0.0	93	0.00
58 M	4-Methyl-2-Pentanone	100.000	89.259	10.7	83	0.00
59 M	2-Hexanone	100.000	88.472	11.5	83	0.00
60 S	4-Bromofluorobenzene	30.000	30.609	-2.0	95	0.00
61 M	Tetrachloroethene	20.000	19.924	0.4	92	0.00
62 M	Toluene	20.000	19.563	2.2	90	0.00
63 S	Toluene-d8	30.000	31.470	-4.9	97	0.00
64 M	Chlorobenzene	20.000	18.980	5.1	88	0.00
65	1,1,1,2-Tetrachloroethane	20.000	20.449	-2.2	94	0.00
66 M	Ethyl Benzene	20.000	18.674	6.6	87	0.00
67 M	m/p-Xylenes	40.000	38.697	3.3	89	0.00
68 M	o-Xylene	20.000	18.712	6.4	87	0.00
69 M	Styrene	20.000	19.049	4.8	89	0.00
70	Isopropylbenzene	20.000	18.562	7.2	86	0.00
71 M	1,1,2,2-Tetrachloroethane	20.000	19.569	2.2	91	0.00
72	1,2,3-Trichloropropane	20.000	18.553	7.2	87	0.00
73	Bromobenzene	20.000	19.005	5.0	89	0.00
74	n-propylbenzene	20.000	19.015	4.9	89	0.00
75	2-Chlorotoluene	20.000	18.872	5.6	87	0.00
76	1,3,5-Trimethylbenzene	20.000	19.230	3.8	90	0.00
77	t-1,4-Dichloro-2-butene	20.000	17.098	14.5	85	0.00
78	4-Chlorotoluene	20.000	19.289	3.6	90	0.00
79	tert-butylbenzene	20.000	18.519	7.4	87	0.00
80	1,2,4-Trimethylbenzene	20.000	19.118	4.4	90	0.00
81	sec-Butylbenzene	20.000	18.822	5.9	88	0.00
82	p-Isopropyltoluene	20.000	18.417	7.9	88	0.00
83 M	1,3-Dichlorobenzene	20.000	19.541	2.3	92	0.00
84 M	1,4-Dichlorobenzene	20.000	18.906	5.5	91	0.00
85	n-Butylbenzene	20.000	16.932	15.3	84	0.00
86 T	Hexachloroethane	20.000	19.072	4.6	90	0.00
87 M	1,2-Dichlorobenzene	20.000	19.299	3.5	92	0.00
88	1,2-Dibromo-3-Chloropropane	20.000	16.680	16.6	79	0.00
89	1,2,4-Trichlorobenzene	20.000	16.062	19.7	79	0.00
90	Hexachlorobutadiene	20.000	17.240	13.8	86	0.00
91 M	Naphthalene	20.000	13.809	31.0#	68	0.00
92	1,2,3-Trichlorobenzene	20.000	16.062	19.7	79	0.00

(#) = Out of Range

SPCC's out = 0 CCC's out = 0



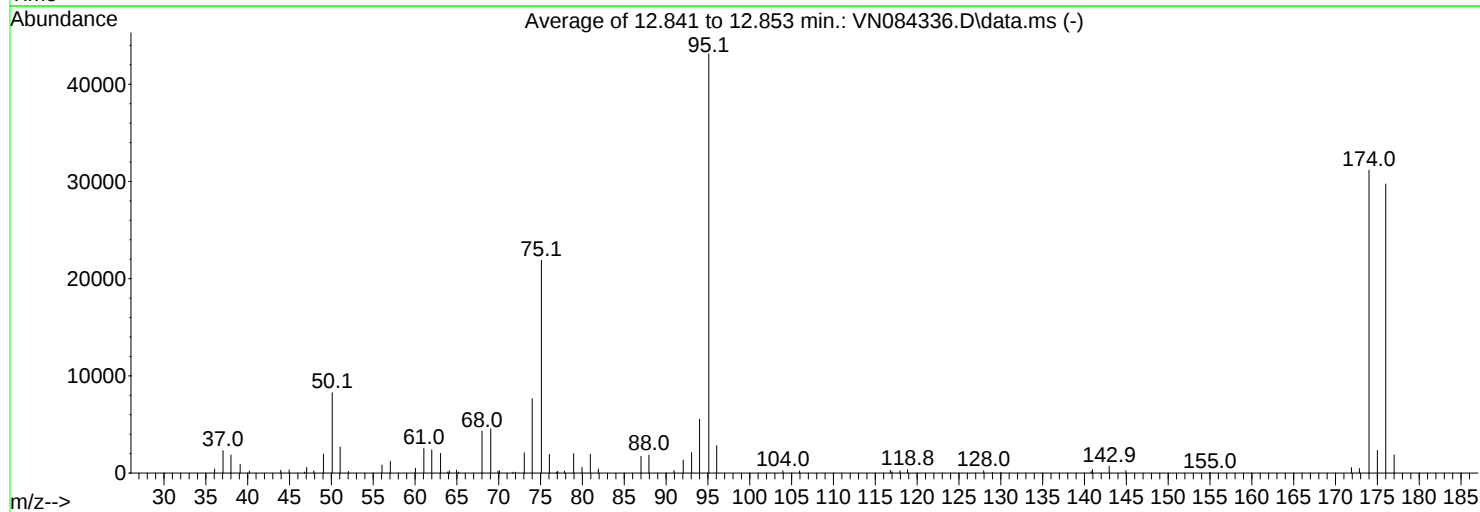
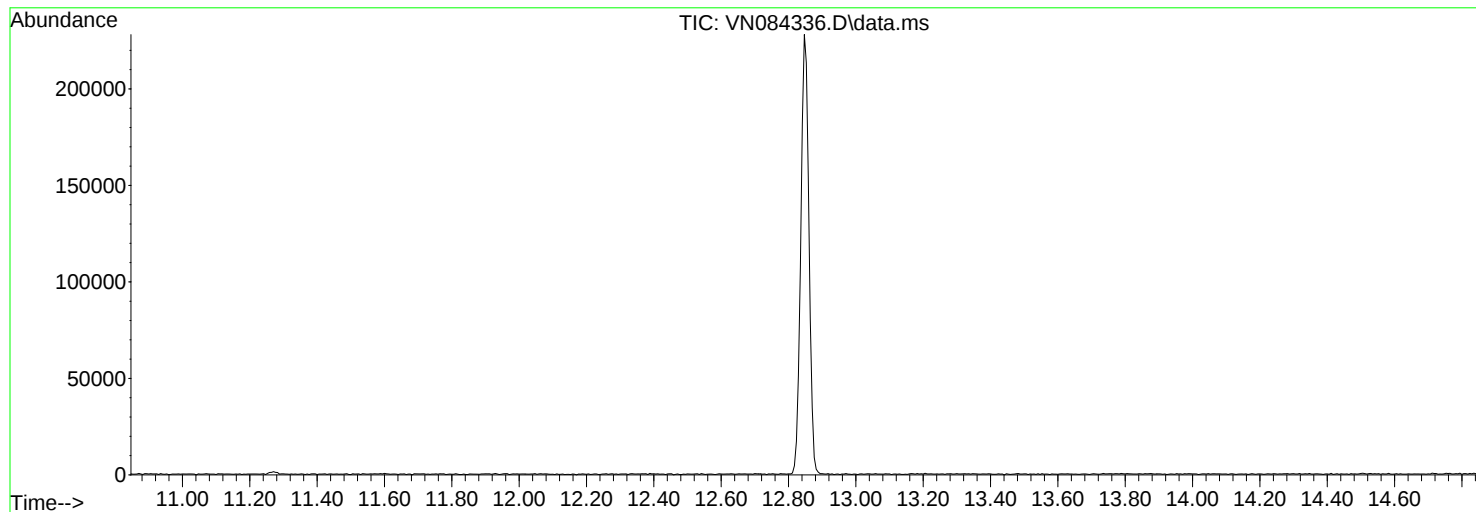
QC SAMPLE DATA

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN100824\
Data File : VN084336.D
Acq On : 08 Oct 2024 09:08
Operator : JC\MD
Sample : BFB
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 1 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
BFB

Integration File: RTEINT3.P

Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
Last Update : Wed Oct 09 02:22:28 2024



AutoFind: Scans 1851, 1852, 1853; Background Corrected with Scan 1844

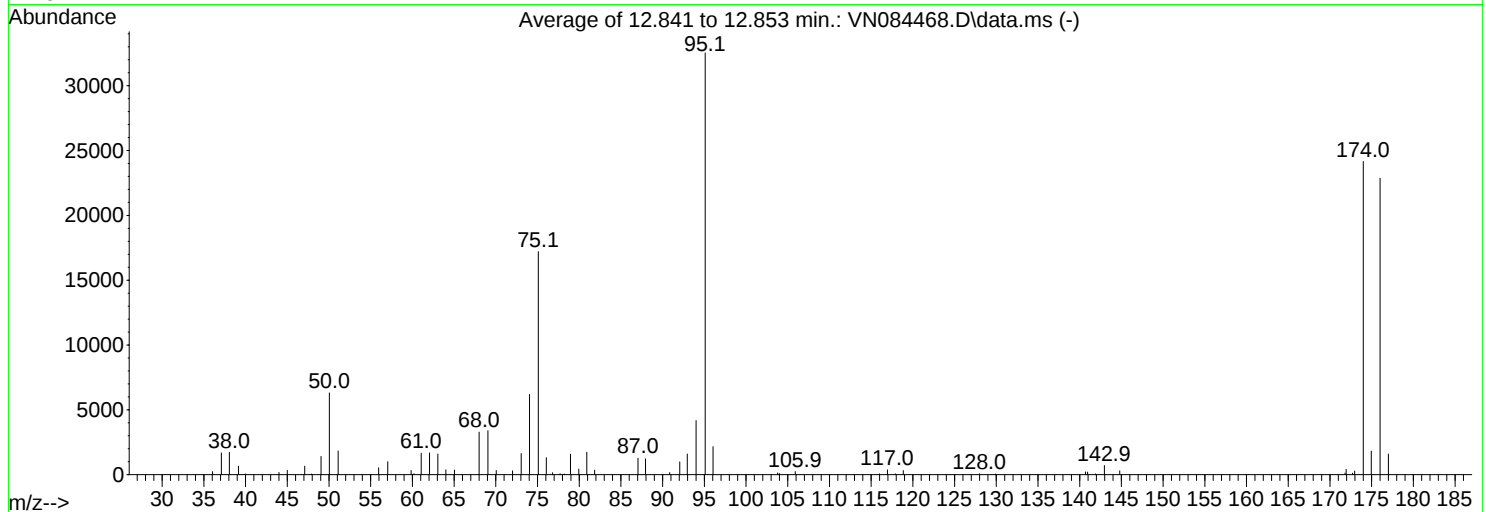
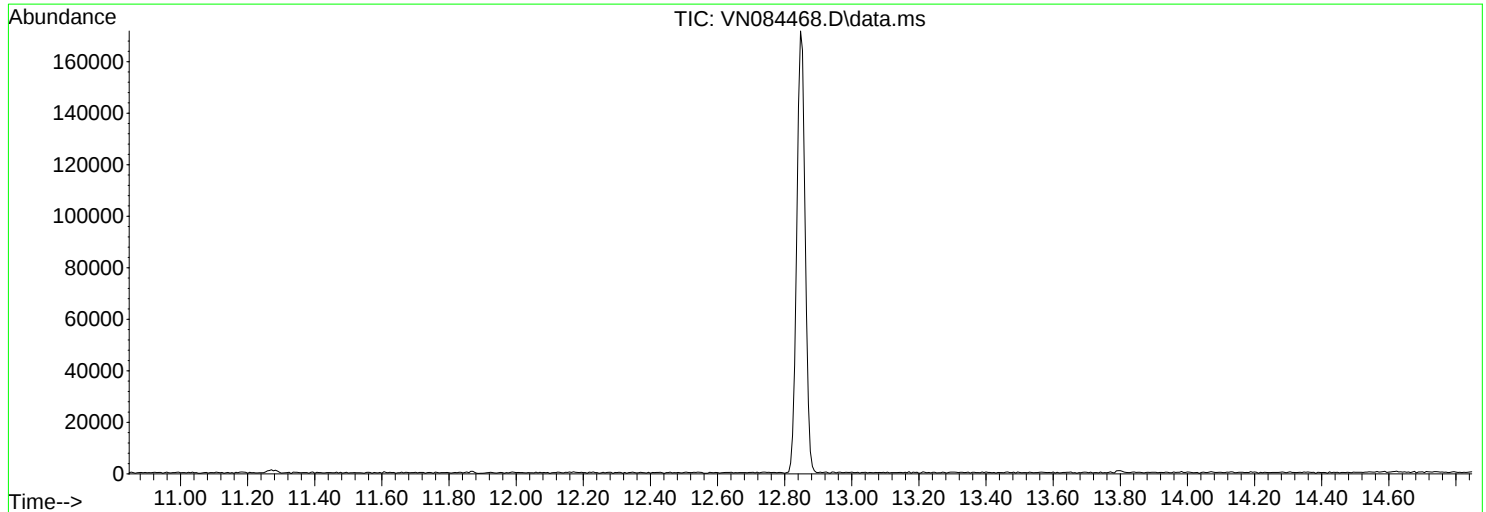
Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.2	8273	PASS
75	95	30	60	50.8	21899	PASS
95	95	100	100	100.0	43144	PASS
96	95	5	9	6.5	2825	PASS
173	174	0.00	2	1.5	464	PASS
174	95	50	100	72.2	31163	PASS
175	174	5	9	7.5	2328	PASS
176	174	95	101	95.4	29744	PASS
177	176	5	9	6.3	1873	PASS

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
Data File : VN084468.D
Acq On : 23 Oct 2024 12:39
Operator : JC\MD
Sample : BFB
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
BFB

Integration File: RTEINT3.P

Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
Last Update : Wed Oct 09 02:22:28 2024



AutoFind: Scans 1851, 1852, 1853; Background Corrected with Scan 1845

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	15	40	19.4	6313	PASS
75	95	30	60	52.9	17204	PASS
95	95	100	100	100.0	32536	PASS
96	95	5	9	6.6	2161	PASS
173	174	0.00	2	1.1	270	PASS
174	95	50	100	74.2	24149	PASS
175	174	5	9	7.5	1817	PASS
176	174	95	101	94.7	22875	FAIL*
177	176	5	9	7.0	1598	PASS

Report of Analysis

Client:	Tully Environmental, Inc	Date Collected:	
Project:	Transfer Station-SPDES	Date Received:	
Client Sample ID:	VN1023WBL01	SDG No.:	P4464
Lab Sample ID:	VN1023WBL01	Matrix:	Water
Analytical Method:	E624.1	% Solid:	0
Sample Wt/Vol:	5 Units: mL	Final Vol:	5000 uL
Soil Aliquot Vol:	uL	Test:	VOC-BTEX
GC Column:	RXI-624 ID : 0.25	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VN084472.D	1		10/23/24 15:02	VN102324

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
71-43-2	Benzene	0.69	U	0.69	5.00	ug/L
108-88-3	Toluene	0.72	U	0.72	5.00	ug/L
100-41-4	Ethyl Benzene	0.73	U	0.73	5.00	ug/L
179601-23-1	m/p-Xylenes	1.70	U	1.70	10.0	ug/L
95-47-6	o-Xylene	0.82	U	0.82	5.00	ug/L
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	30.3		91 - 110	101%	SPK: 30
2037-26-5	Toluene-d8	28.8		91 - 112	96%	SPK: 30
460-00-4	4-Bromofluorobenzene	24.4		63 - 112	81%	SPK: 30
INTERNAL STANDARDS						
74-97-5	Bromochloromethane	29600	7.818			
540-36-3	1,4-Difluorobenzene	141000	9.1			
3114-55-4	Chlorobenzene-d5	132000	11.865			

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

E = Value Exceeds Calibration Range

Q = indicates LCS control criteria did not meet requirements

M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

N = Presumptive Evidence of a Compound

* = Values outside of QC limits

D = Dilution

() = Laboratory InHouse Limit

A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
Data File : VN084472.D
Acq On : 23 Oct 2024 15:02
Operator : JC\MD
Sample : VN1023WBL01
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
VN1023WBL01

Quant Time: Oct 24 04:07:48 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:22:28 2024
Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.818	128	29639	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	140547	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	131687	30.000	ug/l	0.00

System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.577	65	72202	30.258	ug/l	0.00
Spiked Amount	30.000	Range	91 - 110	Recovery	=	100.867%
60) 4-Bromofluorobenzene	12.847	95	53125	24.444	ug/l	0.00
Spiked Amount	30.000	Range	63 - 112	Recovery	=	81.467%
63) Toluene-d8	10.565	98	175663	28.794	ug/l	0.00
Spiked Amount	30.000	Range	91 - 112	Recovery	=	95.967%

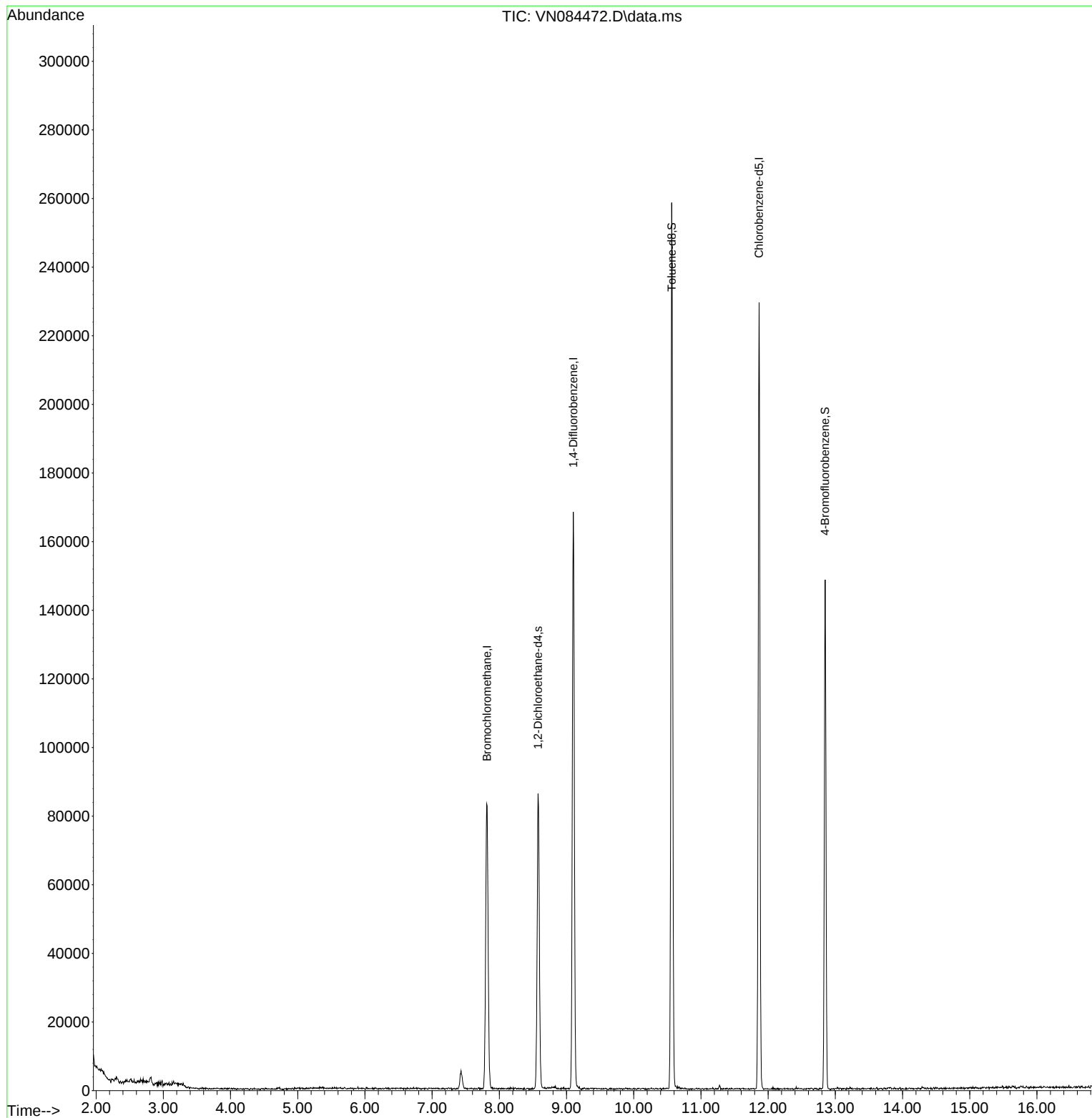
Target Compounds	Qvalue

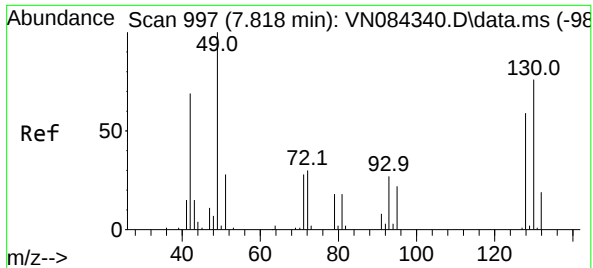
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
Data File : VN084472.D
Acq On : 23 Oct 2024 15:02
Operator : JC\MD
Sample : VN1023WBL01
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
VN1023WBL01

Quant Time: Oct 24 04:07:48 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:22:28 2024
Response via : Initial Calibration

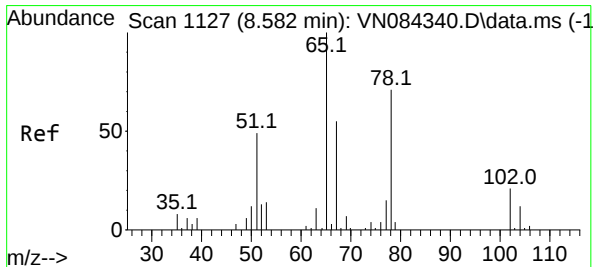
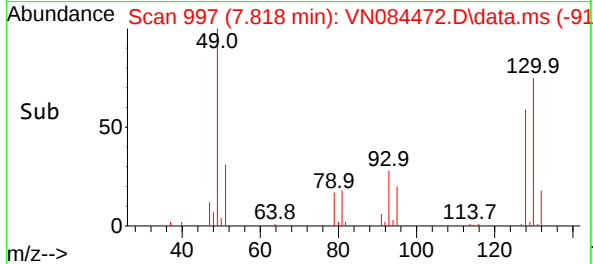
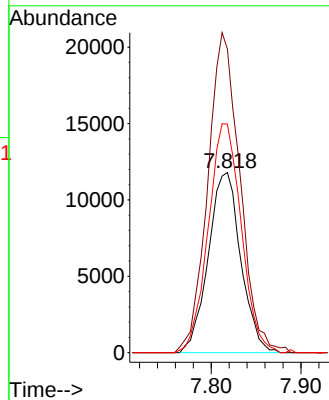
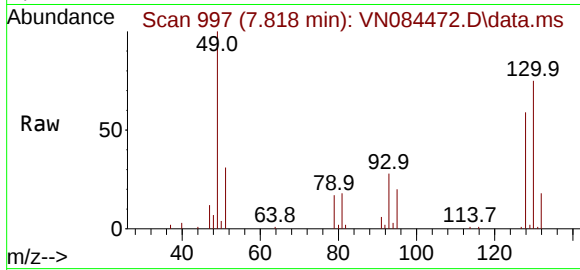




#1
Bromochloromethane
Concen: 30.000 ug/l
RT: 7.818 min Scan# 997
Delta R.T. 0.000 min
Lab File: VN084472.D
Acq: 23 Oct 2024 15:02

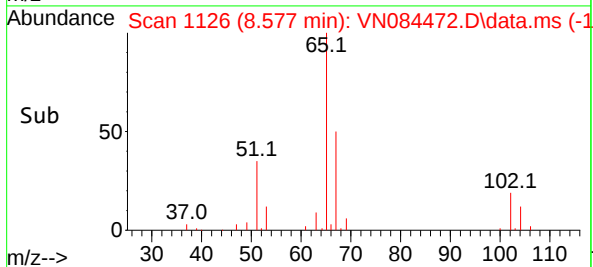
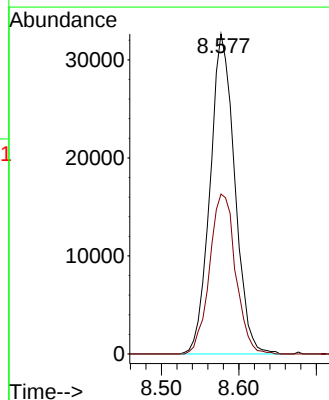
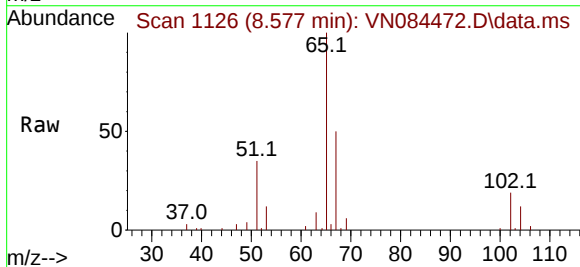
Instrument :
MSVOA_N
ClientSampleId :
VN1023WBL01

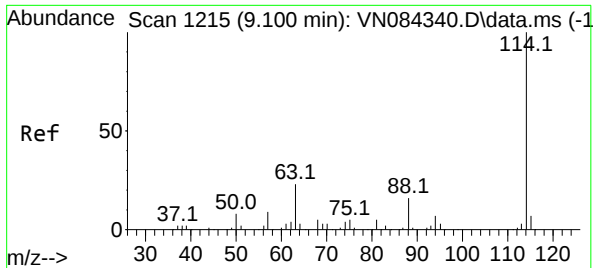
Tgt Ion:128 Resp: 29639
Ion Ratio Lower Upper
128 100
49 175.9 0.0 430.0
130 129.1 0.0 329.8



#27
1,2-Dichloroethane-d4
Concen: 30.258 ug/l
RT: 8.577 min Scan# 1126
Delta R.T. -0.006 min
Lab File: VN084472.D
Acq: 23 Oct 2024 15:02

Tgt Ion: 65 Resp: 72202
Ion Ratio Lower Upper
65 100
67 52.6 41.5 62.3





#28

1,4-Difluorobenzene

Concen: 30.000 ug/l

RT: 9.100 min Scan# 1

Delta R.T. 0.000 min

Lab File: VN084472.D

Acq: 23 Oct 2024 15:02

Instrument :

MSVOA_N

ClientSampleId :

VN1023WBL01

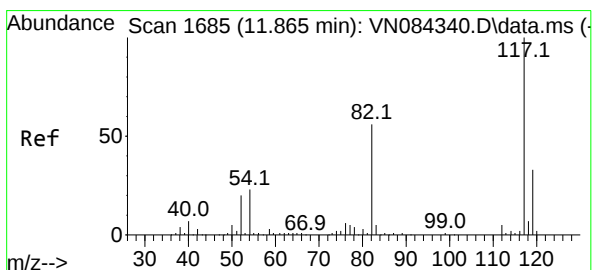
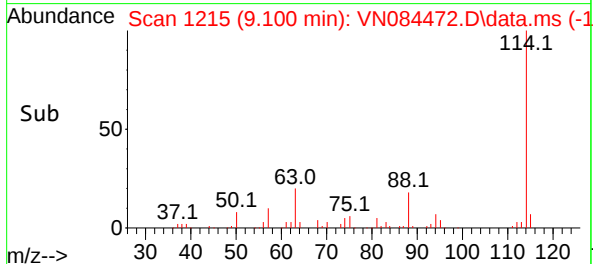
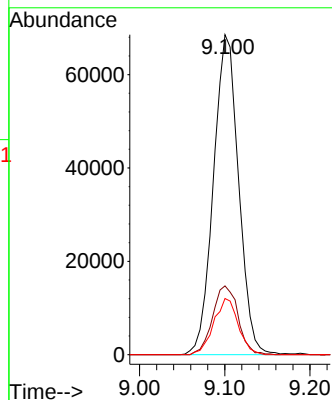
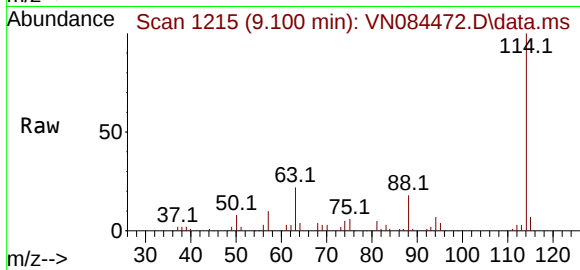
Tgt Ion:114 Resp: 140547

Ion Ratio Lower Upper

114 100

63 21.7 17.4 26.0

88 17.1 13.2 19.8



#57

Chlorobenzene-d5

Concen: 30.000 ug/l

RT: 11.865 min Scan# 1685

Delta R.T. 0.000 min

Lab File: VN084472.D

Acq: 23 Oct 2024 15:02

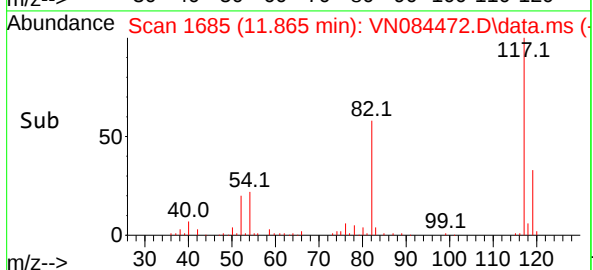
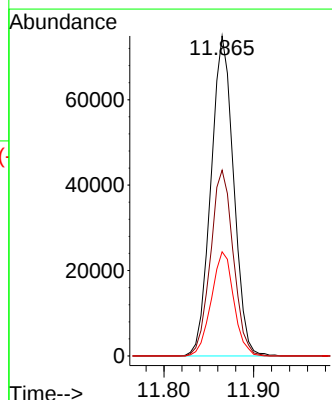
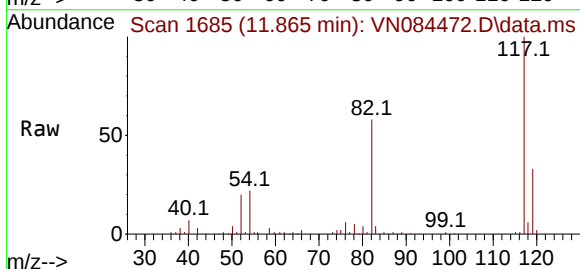
Tgt Ion:117 Resp: 131687

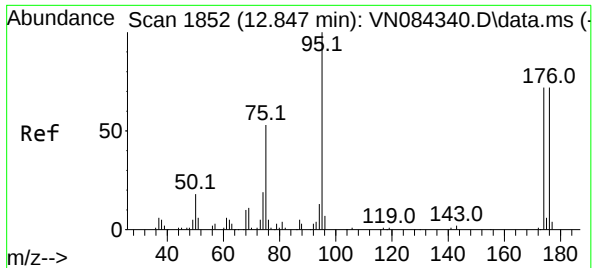
Ion Ratio Lower Upper

117 100

82 58.4 46.2 69.4

119 32.2 25.4 38.2

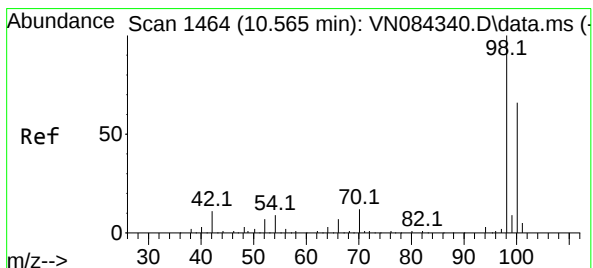
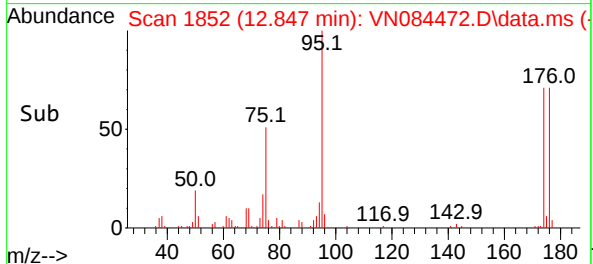
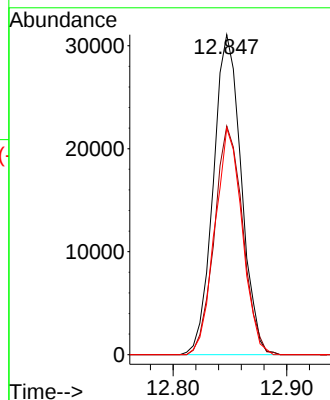
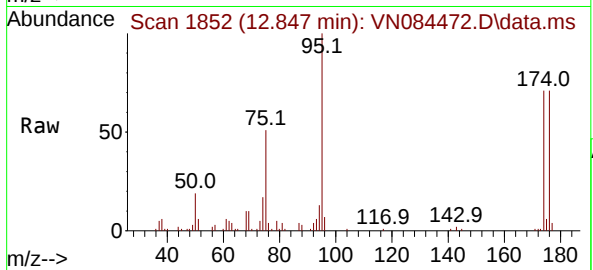




#60
4-Bromofluorobenzene
Concen: 24.444 ug/l
RT: 12.847 min Scan# 11
Delta R.T. 0.000 min
Lab File: VN084472.D
Acq: 23 Oct 2024 15:02

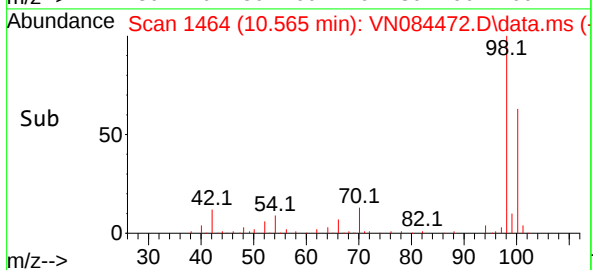
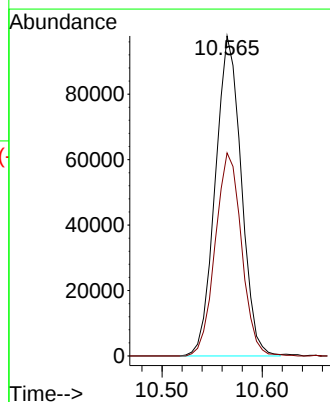
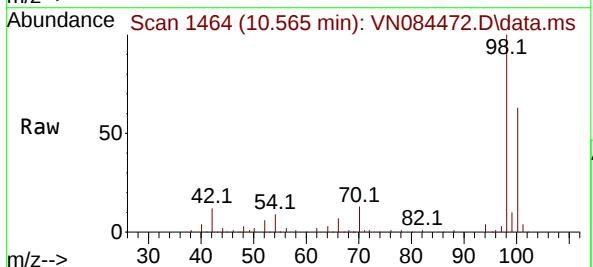
Instrument :
MSVOA_N
ClientSampleId :
VN1023WBL01

Tgt Ion: 95 Resp: 53125
Ion Ratio Lower Upper
95 100
174 72.4 58.2 87.2
176 69.3 56.4 84.6



#63
Toluene-d8
Concen: 28.794 ug/l
RT: 10.565 min Scan# 1464
Delta R.T. 0.000 min
Lab File: VN084472.D
Acq: 23 Oct 2024 15:02

Tgt Ion: 98 Resp: 175663
Ion Ratio Lower Upper
98 100
100 64.4 52.5 78.7



Report of Analysis

Client:	Tully Environmental, Inc	Date Collected:	
Project:	Transfer Station-SPDES	Date Received:	
Client Sample ID:	VN1023WBS01	SDG No.:	P4464
Lab Sample ID:	VN1023WBS01	Matrix:	Water
Analytical Method:	E624.1	% Solid:	0
Sample Wt/Vol:	5 Units: mL	Final Vol:	5000 uL
Soil Aliquot Vol:	uL	Test:	VOC-BTEX
GC Column:	RXI-624 ID : 0.25	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VN084470.D	1		10/23/24 13:50	VN102324

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
71-43-2	Benzene	19.0		0.69	5.00	ug/L
108-88-3	Toluene	19.4		0.72	5.00	ug/L
100-41-4	Ethyl Benzene	18.1		0.73	5.00	ug/L
179601-23-1	m/p-Xylenes	38.2		1.70	10.0	ug/L
95-47-6	o-Xylene	18.2		0.82	5.00	ug/L
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	30.1		91 - 110	100%	SPK: 30
2037-26-5	Toluene-d8	31.1		91 - 112	104%	SPK: 30
460-00-4	4-Bromofluorobenzene	30.9		63 - 112	103%	SPK: 30
INTERNAL STANDARDS						
74-97-5	Bromochloromethane	34000	7.812			
540-36-3	1,4-Difluorobenzene	177000	9.1			
3114-55-4	Chlorobenzene-d5	165000	11.865			

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

E = Value Exceeds Calibration Range

Q = indicates LCS control criteria did not meet requirements

M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

N = Presumptive Evidence of a Compound

* = Values outside of QC limits

D = Dilution

() = Laboratory InHouse Limit

A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084470.D
 Acq On : 23 Oct 2024 13:50
 Operator : JC\MD
 Sample : VN1023WBS01
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VN1023WBS01

Manual Integrations
 APPROVED

Reviewed By :Semsettin Yesilyurt 10/24/2024
 Supervised By :Mahesh Dadoda 10/24/2024

Quant Time: Oct 24 04:05:48 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.812	128	34001	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	177325	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	165233	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.583	65	82461	30.124	ug/l	0.00
Spiked Amount 30.000	Range 91 - 110		Recovery = 100.400%			
60) 4-Bromofluorobenzene	12.847	95	84246	30.893	ug/l	0.00
Spiked Amount 30.000	Range 63 - 112		Recovery = 102.967%			
63) Toluene-d8	10.565	98	237970	31.088	ug/l	0.00
Spiked Amount 30.000	Range 91 - 112		Recovery = 103.633%			
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	2.130	85	37025	17.835	ug/l	96
3) Chloromethane	2.365	50	40531	17.157	ug/l	97
4) Vinyl Chloride	2.512	62	40659	17.551	ug/l	96
5) Bromomethane	2.959	94	26827	17.479	ug/l	100
6) Chloroethane	3.124	64	27493	18.102	ug/l	100
7) Trichlorofluoromethane	3.501	101	68457	18.141	ug/l	93
8) Diethyl Ether	3.971	74	23002m	16.580	ug/l	
9) 1,1,2-Trichlorotrifluo...	4.371	101	40387	19.035	ug/l	98
10) 1,1-Dichloroethene	4.348	96	36589	17.283	ug/l	88
11) Methyl Iodide	4.583	142	48349	17.378	ug/l	97
12) Methyl Acetate	5.030	43	49164	18.550	ug/l	99
13) Acrolein	4.177	56	29290	59.491	ug/l	97
14) Acrylonitrile	5.718	53	100125	84.087	ug/l	99
15) Acetone	4.430	58	30183	88.735	ug/l	93
16) Carbon Disulfide	4.712	76	102588	16.273	ug/l	100
17) Allyl chloride	5.018	41	56207	16.378	ug/l	99
18) Methylene Chloride	5.277	84	43646	18.301	ug/l	91
19) trans-1,2-Dichloroethene	5.795	96	38759	17.299	ug/l	98
20) Diisopropyl ether	6.665	45	134694	18.254	ug/l	99
21) 1,1-Dichloroethane	6.565	63	79123	18.688	ug/l	98
22) cis-1,2-Dichloroethene	7.489	96	47253	18.124	ug/l	98
23) tert-Butyl Alcohol	5.530	59	35585	77.911	ug/l #	100
24) Methyl tert-Butyl Ether	5.795	73	121557	17.181	ug/l	97
25) Chloroform	7.965	83	81856	19.089	ug/l	99
26) Cyclohexane	8.259	56	56839	16.051	ug/l #	94
29) 1,1-Dichloropropene	8.371	75	52320	17.974	ug/l	98
30) 2-Butanone	7.483	43	137167	88.504	ug/l	100
31) 2,2-Dichloropropane	7.494	77	66903	19.558	ug/l #	82
32) 1,1,1-Trichloroethane	8.165	97	72549	19.498	ug/l	99
33) Carbon Tetrachloride	8.359	117	61838	19.184	ug/l	98
34) Benzene	8.606	78	173224	19.010	ug/l	97
35) Methacrylonitrile	7.783	41	30017	18.155	ug/l	93
36) 1,2-Dichloroethane	8.671	62	59718	19.662	ug/l	98
37) Trichloroethene	9.353	130	40164	19.142	ug/l	96
38) Methylcyclohexane	9.600	83	52560	16.438	ug/l	98
39) 1,2-Dichloropropane	9.618	63	43933	19.771	ug/l	99
40) Dibromomethane	9.706	93	29668	19.104	ug/l	98
41) Bromodichloromethane	9.888	83	64492	19.562	ug/l	88
42) Vinyl Acetate	6.606	43	450918	83.655	ug/l	99

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084470.D
 Acq On : 23 Oct 2024 13:50
 Operator : JC\MD
 Sample : VN1023WBS01
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VN1023WBS01

Manual Integrations
 APPROVED

Reviewed By : Semsettin Yesilyurt 10/24/2024
 Supervised By : Mahesh Dadoda 10/24/2024

Quant Time: Oct 24 04:05:48 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
43) Ethyl Acetate	7.559	43	53348	17.453	ug/l	98
44) Isopropyl Acetate	8.688	43	89341	17.858	ug/l	99
45) 1,4-Dioxane	9.694	88	16341	362.336	ug/l	98
46) Methyl methacrylate	9.682	41	41257	17.068	ug/l	94
47) n-amyl Acetate	12.494	43	75634	16.997	ug/l	97
48) t-1,3-Dichloropropene	10.835	75	59729	17.532	ug/l	99
49) cis-1,3-Dichloropropene	10.312	75	66904	18.738	ug/l	95
50) 1,1,2-Trichloroethane	11.018	97	41047	19.664	ug/l	93
51) Ethyl methacrylate	10.871	69	59712	17.318	ug/l	94
52) 1,3-Dichloropropane	11.159	76	70538	19.326	ug/l	99
53) Dibromochloromethane	11.359	129	47396	19.221	ug/l	99
54) 1,2-Dibromoethane	11.471	107	40909	19.039	ug/l	99
55) 2-Chloroethyl vinyl ether	10.159	63	152968	97.818	ug/l	99
56) Bromoform	12.576	173	29746	18.188	ug/l	99
58) 4-Methyl-2-Pentanone	10.441	43	277662	90.208	ug/l	99
59) 2-Hexanone	11.194	43	200370	87.604	ug/l	99
61) Tetrachloroethene	11.100	164	36230	19.384	ug/l	97
62) Toluene	10.629	91	188110	19.447	ug/l	99
64) Chlorobenzene	11.888	112	111258	18.483	ug/l	99
65) 1,1,1,2-Tetrachloroethane	11.959	131	40149	19.199	ug/l	98
66) Ethyl Benzene	11.965	91	190201	18.098	ug/l	96
67) m/p-Xylenes	12.071	106	152211	38.179	ug/l	97
68) o-Xylene	12.400	106	69948	18.202	ug/l	98
69) Styrene	12.412	104	121662	18.443	ug/l	99
70) Isopropylbenzene	12.694	105	176630	18.005	ug/l	99
71) 1,1,2,2-Tetrachloroethane	12.935	83	58209	19.181	ug/l	98
72) 1,2,3-Trichloropropane	12.994	75	56721m	21.823	ug/l	
73) Bromobenzene	12.976	156	43449	18.288	ug/l	97
74) n-propylbenzene	13.035	91	216941	18.557	ug/l	99
75) 2-Chlorotoluene	13.123	91	135697	18.680	ug/l	100
76) 1,3,5-Trimethylbenzene	13.170	105	156119	18.900	ug/l	99
77) t-1,4-Dichloro-2-butene	12.735	75	18441	16.604	ug/l	88
78) 4-Chlorotoluene	13.218	91	136930	18.540	ug/l	100
79) tert-butylbenzene	13.441	119	130298	18.490	ug/l	99
80) 1,2,4-Trimethylbenzene	13.482	105	157315	18.770	ug/l	99
81) sec-Butylbenzene	13.612	105	179427	18.494	ug/l	100
82) p-Isopropyltoluene	13.729	119	147235	18.030	ug/l	98
83) 1,3-Dichlorobenzene	13.735	146	82908	18.767	ug/l	98
84) 1,4-Dichlorobenzene	13.812	146	80121	18.264	ug/l	98
85) n-Butylbenzene	14.053	91	118760	16.791	ug/l	99
86) Hexachloroethane	14.335	117	28610	18.185	ug/l	100
87) 1,2-Dichlorobenzene	14.106	146	81281	19.030	ug/l	98
88) 1,2-Dibromo-3-Chloropr...	14.717	75	10856	17.492	ug/l	97
89) 1,2,4-Trichlorobenzene	15.835	180	36364	16.375	ug/l	99
90) Hexachlorobutadiene	15.494	225	18382	17.892	ug/l	98
91) Naphthalene	15.641	128	107186	14.243	ug/l	99
92) 1,2,3-Trichlorobenzene	15.835	180	36364	16.375	ug/l	99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

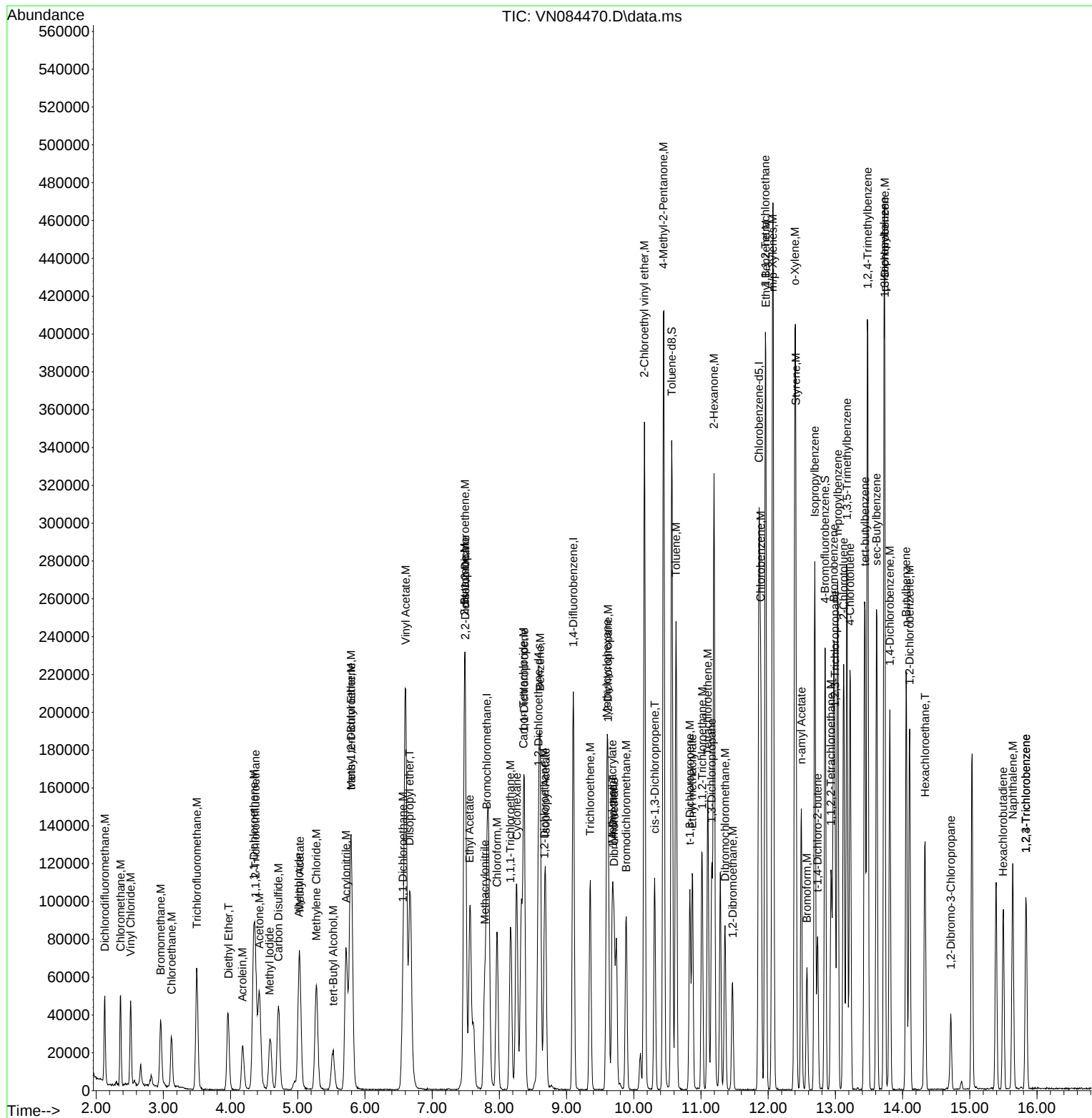
Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
Data File : VN084470.D
Acq On : 23 Oct 2024 13:50
Operator : JC\MD
Sample : VN1023WBS01
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
VN1023WBS01

Manual Integrations

Reviewed By :Semsettin Yesilyurt 10/24/2024
Supervised By :Mahesh Dadoda 10/24/2024

Quant Time: Oct 24 04:05:48 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:22:28 2024
Response via : Initial Calibration



Report of Analysis

Client:	Tully Environmental, Inc			Date Collected:	
Project:	Transfer Station-SPDES			Date Received:	
Client Sample ID:	VN1023WBSD01			SDG No.:	P4464
Lab Sample ID:	VN1023WBSD01			Matrix:	Water
Analytical Method:	E624.1			% Solid:	0
Sample Wt/Vol:	5	Units:	mL	Final Vol:	5000 uL
Soil Aliquot Vol:			uL	Test:	VOC-BTEX
GC Column:	RXI-624	ID :	0.25	Level :	LOW
Prep Method :					

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VN084471.D	1		10/23/24 14:14	VN102324

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
71-43-2	Benzene	19.8		0.69	5.00	ug/L
108-88-3	Toluene	19.5		0.72	5.00	ug/L
100-41-4	Ethyl Benzene	18.8		0.73	5.00	ug/L
179601-23-1	m/p-Xylenes	37.8		1.70	10.0	ug/L
95-47-6	o-Xylene	18.8		0.82	5.00	ug/L
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	30.1		91 - 110	100%	SPK: 30
2037-26-5	Toluene-d8	31.1		91 - 112	104%	SPK: 30
460-00-4	4-Bromofluorobenzene	30.9		63 - 112	103%	SPK: 30
INTERNAL STANDARDS						
74-97-5	Bromochloromethane	31500	7.818			
540-36-3	1,4-Difluorobenzene	162000	9.1			
3114-55-4	Chlorobenzene-d5	153000	11.865			

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

E = Value Exceeds Calibration Range

Q = indicates LCS control criteria did not meet requirements

M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

N = Presumptive Evidence of a Compound

* = Values outside of QC limits

D = Dilution

() = Laboratory InHouse Limit

A = Aldol-Condensation Reaction Products

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084471.D
 Acq On : 23 Oct 2024 14:14
 Operator : JC\MD
 Sample : VN1023WBSD01
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VN1023WBSD01

Manual Integrations
 APPROVED

Reviewed By : Semsettin
 Yesilyurt

Quant Time: Oct 24 04:06:48 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

Internal Standards						
1) Bromochloromethane	7.818	128	31512	30.000	ug/l	0.00
28) 1,4-Difluorobenzene	9.100	114	161510	30.000	ug/l	0.00
57) Chlorobenzene-d5	11.865	117	152709	30.000	ug/l	0.00
System Monitoring Compounds						
27) 1,2-Dichloroethane-d4	8.577	65	76359	30.098	ug/l	0.00
Spiked Amount	30.000	Range	91 - 110	Recovery	=	100.333%
60) 4-Bromofluorobenzene	12.847	95	77986	30.943	ug/l	0.00
Spiked Amount	30.000	Range	63 - 112	Recovery	=	103.133%
63) Toluene-d8	10.565	98	220327	31.144	ug/l	0.00
Spiked Amount	30.000	Range	91 - 112	Recovery	=	103.800%
Target Compounds						
					Qvalue	
2) Dichlorodifluoromethane	2.130	85	34076	17.711	ug/l	99
3) Chloromethane	2.360	50	38427	17.551	ug/l	99
4) Vinyl Chloride	2.512	62	39090	18.206	ug/l	98
5) Bromomethane	2.959	94	25287	17.777	ug/l	87
6) Chloroethane	3.124	64	25502	18.118	ug/l	88
7) Trichlorofluoromethane	3.501	101	64542	18.455	ug/l	93
8) Diethyl Ether	3.959	74	22027	17.131	ug/l	98
9) 1,1,2-Trichlorotrifluo...	4.365	101	36776	18.702	ug/l	89
10) 1,1-Dichloroethene	4.342	96	34477	17.571	ug/l	91
11) Methyl Iodide	4.589	142	45177	17.521	ug/l	97
12) Methyl Acetate	5.030	43	49758	20.257	ug/l	96
13) Acrolein	4.177	56	28253	61.917	ug/l	98
14) Acrylonitrile	5.718	53	94617	85.738	ug/l	95
15) Acetone	4.436	58	29702	94.219	ug/l	97
16) Carbon Disulfide	4.712	76	96575	16.529	ug/l	98
17) Allyl chloride	5.024	41	53409	16.792	ug/l	94
18) Methylene Chloride	5.283	84	41289	18.680	ug/l	98
19) trans-1,2-Dichloroethene	5.783	96	36658	17.653	ug/l	87
20) Diisopropyl ether	6.677	45	129364	18.917	ug/l	96
21) 1,1-Dichloroethane	6.571	63	73012	18.607	ug/l	94
22) cis-1,2-Dichloroethene	7.489	96	43628	18.055	ug/l	97
23) tert-Butyl Alcohol	5.530	59	34071	80.489	ug/l #	100
24) Methyl tert-Butyl Ether	5.800	73	115249	17.576	ug/l #	66
25) Chloroform	7.965	83	76290	19.196	ug/l	99
26) Cyclohexane	8.253	56	54642	16.650	ug/l #	99
29) 1,1-Dichloropropene	8.371	75	49144	18.536	ug/l	98
30) 2-Butanone	7.483	43	130730	92.610	ug/l	99
31) 2,2-Dichloropropane	7.494	77	62117	19.937	ug/l #	81
32) 1,1,1-Trichloroethane	8.165	97	67203	19.830	ug/l	99
33) Carbon Tetrachloride	8.359	117	57319	19.523	ug/l	96
34) Benzene	8.606	78	164212	19.786	ug/l	95
35) Methacrylonitrile	7.777	41	28651	19.025	ug/l	94
36) 1,2-Dichloroethane	8.671	62	55630	20.109	ug/l #	91
37) Trichloroethene	9.347	130	36972	19.346	ug/l	90
38) Methylcyclohexane	9.600	83	50028	17.178	ug/l	97
39) 1,2-Dichloropropane	9.624	63	39820	19.675	ug/l	92
40) Dibromomethane	9.706	93	28353	20.045	ug/l	97
41) Bromodichloromethane	9.888	83	59716	19.887	ug/l	98
42) Vinyl Acetate	6.606	43	432283	88.051	ug/l	100

10/24/2024
 Supervised By : Mahesh
 Kadoda

10/24/2024

Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
 Data File : VN084471.D
 Acq On : 23 Oct 2024 14:14
 Operator : JC\MD
 Sample : VN1023WBSD01
 Misc : 5.0mL/MSVOA_N/WATER
 ALS Vial : 2 Sample Multiplier: 1

Instrument :
 MSVOA_N
 ClientSampleId :
 VN1023WBSD01

Manual Integrations
 APPROVED

Reviewed By : Semsettin
 Yesilyurt

Quant Time: Oct 24 04:06:48 2024
 Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
 Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
 QLast Update : Wed Oct 09 02:22:28 2024
 Response via : Initial Calibration

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)	
43) Ethyl Acetate	7.559	43	48124	17.286	ug/l	#	92
44) Isopropyl Acetate	8.689	43	83471	18.318	ug/l		100
45) 1,4-Dioxane	9.694	88	14981	364.708	ug/l		97
46) Methyl methacrylate	9.683	41	39002	17.715	ug/l		97
47) n-amyl Acetate	12.494	43	71774	17.709	ug/l		97
48) t-1,3-Dichloropropene	10.835	75	58105	18.726	ug/l		100
49) cis-1,3-Dichloropropene	10.312	75	63643	19.570	ug/l		97
50) 1,1,2-Trichloroethane	11.018	97	38750	20.381	ug/l		94
51) Ethyl methacrylate	10.877	69	56919	18.125	ug/l		92
52) 1,3-Dichloropropane	11.159	76	66746	20.078	ug/l		99
53) Dibromochloromethane	11.359	129	45709	20.352	ug/l		100
54) 1,2-Dibromoethane	11.465	107	37646	19.236	ug/l		98
55) 2-Chloroethyl vinyl ether	10.159	63	142205	99.840	ug/l		98
56) Bromoform	12.576	173	29411	19.744	ug/l		98
58) 4-Methyl-2-Pentanone	10.441	43	264399	92.944	ug/l		99
59) 2-Hexanone	11.194	43	196306	92.866	ug/l		99
61) Tetrachloroethene	11.100	164	33700	19.510	ug/l		96
62) Toluene	10.630	91	174063	19.470	ug/l		98
64) Chlorobenzene	11.888	112	107152	19.261	ug/l		100
65) 1,1,1,2-Tetrachloroethane	11.959	131	39261	20.314	ug/l		100
66) Ethyl Benzene	11.965	91	182522	18.792	ug/l		94
67) m/p-Xylenes	12.071	106	139326	37.814	ug/l		99
68) o-Xylene	12.400	106	66918	18.842	ug/l		95
69) Styrene	12.412	104	114012	18.701	ug/l		99
70) Isopropylbenzene	12.694	105	169315	18.674	ug/l		98
71) 1,1,2,2-Tetrachloroethane	12.935	83	55246	19.697	ug/l		99
72) 1,2,3-Trichloropropane	12.988	75	51719m	21.531	ug/l		
73) Bromobenzene	12.976	156	43155	19.654	ug/l		97
74) n-propylbenzene	13.035	91	203220	18.809	ug/l		100
75) 2-Chlorotoluene	13.124	91	125904	18.753	ug/l		99
76) 1,3,5-Trimethylbenzene	13.171	105	143937	18.855	ug/l		99
77) t-1,4-Dichloro-2-butene	12.735	75	17416	16.967	ug/l		89
78) 4-Chlorotoluene	13.218	91	130195	19.074	ug/l		100
79) tert-butylbenzene	13.435	119	121202	18.610	ug/l		99
80) 1,2,4-Trimethylbenzene	13.482	105	146241	18.880	ug/l		100
81) sec-Butylbenzene	13.618	105	164314	18.325	ug/l		100
82) p-Isopropyltoluene	13.729	119	137306	18.193	ug/l		99
83) 1,3-Dichlorobenzene	13.729	146	79515	19.476	ug/l		100
84) 1,4-Dichlorobenzene	13.812	146	74716	18.429	ug/l		99
85) n-Butylbenzene	14.053	91	111813	17.106	ug/l		99
86) Hexachloroethane	14.329	117	27667	19.028	ug/l		99
87) 1,2-Dichlorobenzene	14.106	146	74361	18.838	ug/l		97
88) 1,2-Dibromo-3-Chloropr...	14.718	75	10888	18.983	ug/l		94
89) 1,2,4-Trichlorobenzene	15.835	180	34767	16.940	ug/l		99
90) Hexachlorobutadiene	15.500	225	16828	17.723	ug/l		99
91) Naphthalene	15.641	128	105014	15.099	ug/l		99
92) 1,2,3-Trichlorobenzene	15.835	180	34767	16.940	ug/l		99

(#) = qualifier out of range (m) = manual integration (+) = signals summed

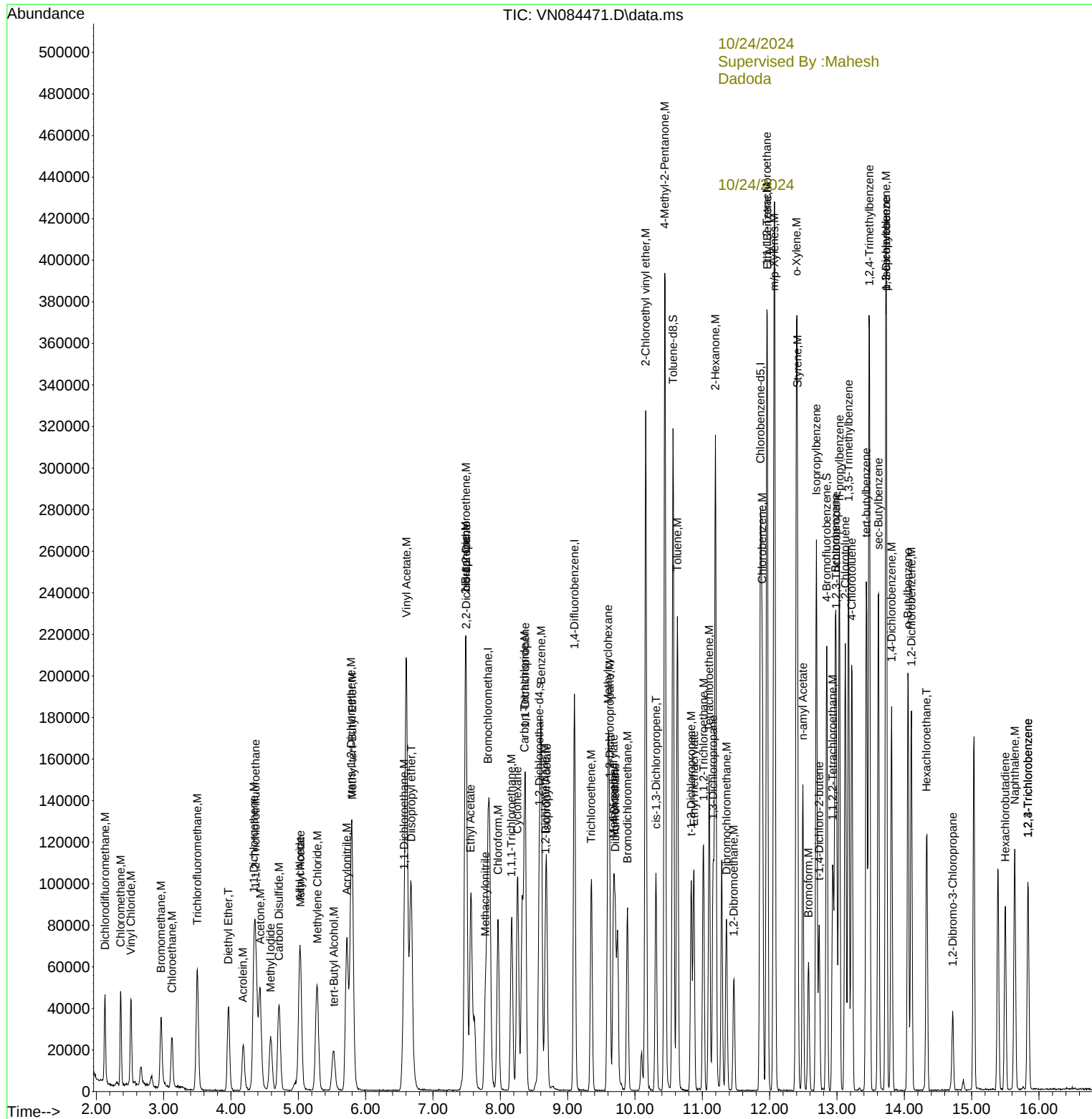
Data Path : Z:\voasrv\HPCHEM1\MSVOA_N\Data\VN102324\
Data File : VN084471.D
Acq On : 23 Oct 2024 14:14
Operator : JC\MD
Sample : VN1023WBSD01
Misc : 5.0mL/MSVOA_N/WATER
ALS Vial : 2 Sample Multiplier: 1

Instrument :
MSVOA_N
ClientSampleId :
VN1023WBSD01

Manual Integrations

Reviewed By :Semsettin
Yesilyurt

Quant Time: Oct 24 04:06:48 2024
Quant Method : Z:\voasrv\HPCHEM1\MSVOA_N\methods\624N100824W.M
Quant Title : METHOD 624 VOLATILE ORGANIC ANALYSIS
QLast Update : Wed Oct 09 02:22:28 2024
Response via : Initial Calibration



Manual Integration Report

Sequence:	vn100824	Instrument	MSVOA_n
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Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDICC150	VN084337.D	1,2,3-Trichloropropane	JOHN	10/9/2024 9:43:58 AM	MMDadoda	10/9/2024 8:55:19 PM	Peak Integrated by Software
VSTDICC100	VN084338.D	1,2,3-Trichloropropane	JOHN	10/9/2024 9:44:02 AM	MMDadoda	10/9/2024 8:55:22 PM	Peak Integrated by Software
VSTDICC050	VN084339.D	1,2,3-Trichloropropane	JOHN	10/9/2024 9:44:07 AM	MMDadoda	10/9/2024 8:55:25 PM	Peak Integrated by Software
VSTDICC050	VN084339.D	Methyl tert-Butyl Ether	JOHN	10/9/2024 9:44:07 AM	MMDadoda	10/9/2024 8:55:25 PM	Peak Integrated by Software
VSTDICCC020	VN084340.D	1,2,3-Trichloropropane	JOHN	10/9/2024 9:44:11 AM	MMDadoda	10/9/2024 8:55:28 PM	Peak Integrated by Software
VSTDICC005	VN084341.D	1,1,1-Trichloroethane	JOHN	10/9/2024 9:44:15 AM	MMDadoda	10/9/2024 8:55:31 PM	Peak Integrated by Software
VSTDICC005	VN084341.D	1,2,3-Trichloropropane	JOHN	10/9/2024 9:44:15 AM	MMDadoda	10/9/2024 8:55:31 PM	Peak Integrated by Software
VSTDICC005	VN084341.D	Acrylonitrile	JOHN	10/9/2024 9:44:15 AM	MMDadoda	10/9/2024 8:55:31 PM	Peak Integrated by Software
VSTDICC005	VN084341.D	Diethyl Ether	JOHN	10/9/2024 9:44:15 AM	MMDadoda	10/9/2024 8:55:31 PM	Peak Integrated by Software
VSTDICC005	VN084341.D	Ethyl Acetate	JOHN	10/9/2024 9:44:15 AM	MMDadoda	10/9/2024 8:55:31 PM	Peak Integrated by Software
VSTDICC005	VN084341.D	Methacrylonitrile	JOHN	10/9/2024 9:44:15 AM	MMDadoda	10/9/2024 8:55:31 PM	Peak Integrated by Software
VSTDICC005	VN084341.D	Methylene Chloride	JOHN	10/9/2024 9:44:15 AM	MMDadoda	10/9/2024 8:55:31 PM	Peak Integrated by Software
VSTDICV020	VN084343.D	1,2,3-Trichloropropane	JOHN	10/9/2024 9:44:19 AM	MMDadoda	10/9/2024 8:55:36 PM	Peak Integrated by Software



Manual Integration Report

Sequence:	vn100824	Instrument	MSVOA_n
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Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDICV020	VN084343.D	Ethyl Acetate	JOHN	10/9/2024 9:44:19 AM	MMDadoda	10/9/2024 8:55:36 PM	Peak Integrated by Software
VSTDCCC020	VN084355.D	1,2,3-Trichloropropane	JOHN	10/9/2024 9:44:52 AM	MMDadoda	10/9/2024 8:55:52 PM	Peak Integrated by Software

Manual Integration Report

Sequence:	vn102324	Instrument	MSVOA_n
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Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
VSTDCCC020	VN084469.D	1,2,3-Trichloropropane	SAM	10/24/2024 9:10:10 AM	MMDadoda	10/24/2024 2:47:04 PM	Peak Integrated by Software
VN1023WBS01	VN084470.D	1,2,3-Trichloropropane	SAM	10/24/2024 9:10:17 AM	MMDadoda	10/24/2024 2:47:06 PM	Peak Integrated by Software
VN1023WBS01	VN084470.D	Diethyl Ether	SAM	10/24/2024 9:10:17 AM	MMDadoda	10/24/2024 2:47:06 PM	Peak Integrated by Software
VN1023WBSD0 1	VN084471.D	1,2,3-Trichloropropane	SAM	10/24/2024 9:10:23 AM	MMDadoda	10/24/2024 2:47:07 PM	Peak Integrated by Software
VSTDCCC020	VN084474.D	1,2,3-Trichloropropane	SAM	10/24/2024 9:10:28 AM	MMDadoda	10/24/2024 2:47:09 PM	Peak Integrated by Software
VSTDCCC020	VN084474.D	Methyl Acetate	SAM	10/24/2024 9:10:28 AM	MMDadoda	10/24/2024 2:47:09 PM	Peak Integrated by Software

Instrument ID: **MSVOA_N**

Daily Analysis Runlog For Sequence/QC Batch ID # VN100824

Review By	John Carlone	Review On	10/9/2024 9:46:14 AM
Supervise By	Mahesh Dadoda	Supervise On	10/9/2024 8:56:13 PM
SubDirectory	VN100824	HP Acquire Method	HP Processing Method 624N100824W.M
STD. NAME	STD REF.#		
Tune/Reschk	VP130714		
Initial Calibration Stds	VP130724,VP130725,VP130726,VP130727,VP130728		
CCC	VP130715		
Internal Standard/PEM			
ICV/I.BLK	VP130729		
Surrogate Standard			
MS/MSD Standard			
LCS Standard			

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	BFB	VN084336.D	08 Oct 2024 09:08	JC\MD	Ok
2	VSTDICC150	VN084337.D	08 Oct 2024 09:43	JC\MD	Ok,M
3	VSTDICC100	VN084338.D	08 Oct 2024 10:07	JC\MD	Ok,M
4	VSTDICC050	VN084339.D	08 Oct 2024 10:31	JC\MD	Ok,M
5	VSTDICCC020	VN084340.D	08 Oct 2024 10:55	JC\MD	Ok,M
6	VSTDICC005	VN084341.D	08 Oct 2024 11:19	JC\MD	Ok,M
7	IBLK	VN084342.D	08 Oct 2024 11:43	JC\MD	Ok
8	VSTDICV020	VN084343.D	08 Oct 2024 12:09	JC\MD	Ok,M
9	VN1008WBS01	VN084344.D	08 Oct 2024 12:46	JC\MD	Ok,M
10	VN1008WBSD01	VN084345.D	08 Oct 2024 13:21	JC\MD	Ok,M
11	VN1008WBL01	VN084346.D	08 Oct 2024 13:45	JC\MD	Ok
12	P4271-01	VN084347.D	08 Oct 2024 14:11	JC\MD	Ok
13	P4334-01	VN084348.D	08 Oct 2024 14:53	JC\MD	Ok,M
14	P4334-02	VN084349.D	08 Oct 2024 15:17	JC\MD	Ok
15	P4337-01	VN084350.D	08 Oct 2024 15:41	JC\MD	Ok
16	P4337-02	VN084351.D	08 Oct 2024 16:05	JC\MD	Ok
17	P4289-01	VN084352.D	08 Oct 2024 16:29	JC\MD	Ok,M
18	IBLK	VN084353.D	08 Oct 2024 16:53	JC\MD	Ok,M
19	IBLK	VN084354.D	08 Oct 2024 17:16	JC\MD	Ok,M
20	VSTDCCC020	VN084355.D	08 Oct 2024 17:40	JC\MD	Ok,M

M : Manual Integration

Instrument ID: **MSVOA_N**

Daily Analysis Runlog For Sequence/QC Batch ID # VN102324

Review By	Semsettin Yesilyurt	Review On	10/24/2024 9:12:55 AM		
Supervise By	Maresh Dadoda	Supervise On	10/24/2024 2:47:12 PM		
SubDirectory	VN102324	HP Acquire Method	MSVOA_N	HP Processing Method	624N100824W.M
STD. NAME		STD REF.#			
Tune/Reschk Initial Calibration Stds		VP131051			
CCC Internal Standard/PEM ICV/I.BLK Surrogate Standard MS/MSD Standard LCS Standard		VP131052,VP131053			

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	BFB	VN084465.D	23 Oct 2024 09:13	JC\MD	Not Ok
2	VSTDCCC050	VN084466.D	23 Oct 2024 10:01	JC\MD	Not Ok
3	VN1023MBL01	VN084467.D	23 Oct 2024 11:24	JC\MD	Not Ok
4	BFB	VN084468.D	23 Oct 2024 12:39	JC\MD	Ok
5	VSTDCCC020	VN084469.D	23 Oct 2024 13:26	JC\MD	Ok,M
6	VN1023WBS01	VN084470.D	23 Oct 2024 13:50	JC\MD	Ok,M
7	VN1023WBSD01	VN084471.D	23 Oct 2024 14:14	JC\MD	Ok,M
8	VN1023WBL01	VN084472.D	23 Oct 2024 15:02	JC\MD	Ok
9	P4464-01	VN084473.D	23 Oct 2024 15:26	JC\MD	Ok
10	VSTDCCC020	VN084474.D	23 Oct 2024 16:10	JC\MD	Not Ok

M : Manual Integration

Instrument ID: MSVOA_N

Daily Analysis Runlog For Sequence/QC Batch ID # VN100824

Review By	John Carlone	Review On	10/9/2024 9:46:14 AM
Supervise By	Maresh Dadoda	Supervise On	10/9/2024 8:56:13 PM
SubDirectory	VN100824	HP Acquire Method	HP Processing Method 624N100824W.M
STD. NAME	STD REF.#		
Tune/Reschk	VP130714		
Initial Calibration Stds	VP130724,VP130725,VP130726,VP130727,VP130728		
CCC	VP130715		
Internal Standard/PEM			
ICV/I.BLK	VP130729		
Surrogate Standard			
MS/MSD Standard			
LCS Standard			

Sr#	SampleID	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	BFB	BFB	VN084336.D	08 Oct 2024 09:08		JC\MD	Ok
2	VSTDICC150	VSTDICC150	VN084337.D	08 Oct 2024 09:43	V13516	JC\MD	Ok,M
3	VSTDICC100	VSTDICC100	VN084338.D	08 Oct 2024 10:07		JC\MD	Ok,M
4	VSTDICC050	VSTDICC050	VN084339.D	08 Oct 2024 10:31		JC\MD	Ok,M
5	VSTDICCC020	VSTDICCC020	VN084340.D	08 Oct 2024 10:55		JC\MD	Ok,M
6	VSTDICC005	VSTDICC005	VN084341.D	08 Oct 2024 11:19		JC\MD	Ok,M
7	IBLK	IBLK	VN084342.D	08 Oct 2024 11:43		JC\MD	Ok
8	VSTDICV020	ICVVN100824	VN084343.D	08 Oct 2024 12:09		JC\MD	Ok,M
9	VN1008WBS01	VN1008WBS01	VN084344.D	08 Oct 2024 12:46		JC\MD	Ok,M
10	VN1008WBSD01	VN1008WBSD01	VN084345.D	08 Oct 2024 13:21		JC\MD	Ok,M
11	VN1008WBL01	VN1008WBL01	VN084346.D	08 Oct 2024 13:45		JC\MD	Ok
12	P4271-01	14B-1	VN084347.D	08 Oct 2024 14:11	vial B pH#6.0	JC\MD	Ok
13	P4334-01	001-WILLETS-PT-BLVD	VN084348.D	08 Oct 2024 14:53	vial A pH<2	JC\MD	Ok,M
14	P4334-02	002-35TH-AVE(SEP)	VN084349.D	08 Oct 2024 15:17	vial A pH<2	JC\MD	Ok
15	P4337-01	001-WILLETS-PT-BLVD	VN084350.D	08 Oct 2024 15:41	vial A pH<2	JC\MD	Ok
16	P4337-02	002-35TH-AVE(OCT)	VN084351.D	08 Oct 2024 16:05	vial A pH<2	JC\MD	Ok
17	P4289-01	EFF-Waste Water	VN084352.D	08 Oct 2024 16:29	vial B pH<2	JC\MD	Ok,M
18	IBLK	IBLK	VN084353.D	08 Oct 2024 16:53		JC\MD	Ok,M

Instrument ID: MSVOA_N

Daily Analysis Runlog For Sequence/QC Batch ID # VN100824

Review By	John Carlone	Review On	10/9/2024 9:46:14 AM
Supervise By	Mahesh Dadoda	Supervise On	10/9/2024 8:56:13 PM
SubDirectory	VN100824	HP Acquire Method	HP Processing Method 624N100824W.M
STD. NAME	STD REF.#		
Tune/Reschk	VP130714		
Initial Calibration Stds	VP130724,VP130725,VP130726,VP130727,VP130728		
CCC	VP130715		
Internal Standard/PEM			
ICV/I.BLK	VP130729		
Surrogate Standard			
MS/MSD Standard			
LCS Standard			

19	IBLK	IBLK	VN084354.D	08 Oct 2024 17:16		JC\MD	Ok,M
20	VSTDCCC020	VSTDCCC020EC	VN084355.D	08 Oct 2024 17:40		JC\MD	Ok,M

M : Manual Integration

Instrument ID: MSVOA_N

Daily Analysis Runlog For Sequence/QC Batch ID # VN102324

Review By	Semsettin Yesilyurt	Review On	10/24/2024 9:12:55 AM
Supervise By	Mahesh Dadoda	Supervise On	10/24/2024 2:47:12 PM
SubDirectory	VN102324	HP Acquire Method	MSVOA_N HP Processing Method 624N100824W.M

STD. NAME	STD REF.#
Tune/Reschk Initial Calibration Stds	VP131051
CCC Internal Standard/PEM ICV/I.BLK Surrogate Standard MS/MSD Standard LCS Standard	VP131052,VP131053

Sr#	SampleID	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	BFB	BFB	VN084465.D	23 Oct 2024 09:13	Not used	JC\MD	Not Ok
2	VSTDCCC050	VSTDCCC050	VN084466.D	23 Oct 2024 10:01	Not used	JC\MD	Not Ok
3	VN1023MBL01	VN1023MBL01	VN084467.D	23 Oct 2024 11:24	Not used	JC\MD	Not Ok
4	BFB	BFB	VN084468.D	23 Oct 2024 12:39		JC\MD	Ok
5	VSTDCCC020	VSTDCCC020	VN084469.D	23 Oct 2024 13:26		JC\MD	Ok,M
6	VN1023WBS01	VN1023WBS01	VN084470.D	23 Oct 2024 13:50		JC\MD	Ok,M
7	VN1023WBSD01	VN1023WBSD01	VN084471.D	23 Oct 2024 14:14		JC\MD	Ok,M
8	VN1023WBL01	VN1023WBL01	VN084472.D	23 Oct 2024 15:02		JC\MD	Ok
9	P4464-01	001-WILLETS-PT-BLVD	VN084473.D	23 Oct 2024 15:26	pH#1.0 A	JC\MD	Ok
10	VSTDCCC020	VSTDCCC020EC	VN084474.D	23 Oct 2024 16:10	Bad purge	JC\MD	Not Ok

M : Manual Integration



SHIPPING DOCUMENTS

CHEMTECH

CHAIN OF CUSTODY RECORD

284 Sheffield Street, Mountainside, NJ 07092
(908) 789-8900 • Fax (908) 789-8922
www.chemtech.net

CHEMTECH PROJECT NO.

QUOTE NO.

COC Number 2042056

P4464/65

CLIENT INFORMATION

REPORT TO BE SENT TO:
COMPANY: Tully Environmental Inc
ADDRESS: 87-Seaview Blvd
CITY: Pt Washington STATE: NY ZIP: 11850
ATTENTION: D Dene
PHONE: 718 446 7000 FAX: 718 458 5199

CLIENT PROJECT INFORMATION

PROJECT NAME: Transfer Station SITES
PROJECT NO.: 242113 LOCATION:
PROJECT MANAGER:
e-mail:
PHONE: FAX:

CLIENT BILLING INFORMATION

BILL TO: Same PO#:
ADDRESS:
CITY STATE: ZIP:
ATTENTION: PHONE:

ANALYSIS

DATA TURNAROUND INFORMATION

FAX (RUSH) RUSH DAYS*
HARDCOPY (DATA PACKAGE): DAYS*
EDD: DAYS*
*TO BE APPROVED BY CHEMTECH
STANDARD HARDCOPY TURNAROUND TIME IS 10 BUSINESS DAYS

DATA DELIVERABLE INFORMATION

☐ Level 1 (Results Only) ☐ Level 4 (QC + Full Raw Data)
☐ Level 2 (Results + QC) ☐ NJ Reduced ☐ US EPA CLP
☐ Level 3 (Results + QC) ☐ NYS ASP A ☐ NYS ASP B
+ Raw Data ☐ Other
☐ EDD FORMAT

1	2	3	4	5	6	7	8	9
Cu	Fe	Pb	TSS	Hg	1631LL	BTGX		

PRESERVATIVES

COMMENTS

CHEMTECH SAMPLE ID	PROJECT SAMPLE IDENTIFICATION	SAMPLE MATRIX	SAMPLE TYPE		SAMPLE COLLECTION		# OF BOTTLES										COMMENTS ← Specify Preservatives A-HCl B-HNO3 C-H2SO4 D-NaOH E-ICE F-OTHER
			COMP	GRAB	DATE	TIME		1	2	3	4	5	6	7	8	9	
1.	001 Willets Pt Blvd (sep)	W		X	10/17	1pm	4	X	X		X						
2.	002 35th Ave (sep)	W		X	10/17	1pm	4	X	X	X							
3.																	
4.																	
5.																	
6.																	
7.																	
8.																	
9.																	
10.																	

SAMPLE CUSTODY MUST BE DOCUMENTED BELOW EACH TIME SAMPLES CHANGE POSSESSION INCLUDING COURIER DELIVERY

RELINQUISHED BY SAMPLER: 1. D Dene	DATE/TIME: 10/17/24	RECEIVED BY: 1. [Signature]	Conditions of bottles or coolers at receipt: ☐ COMPLIANT ☐ NON COMPLIANT ☐ COOLER TEMP 5.3°C Comments:
RELINQUISHED BY SAMPLER: 2. FedEx	DATE/TIME: 10/21/24 1130	RECEIVED BY: 2. [Signature]	
RELINQUISHED BY SAMPLER: 3.	DATE/TIME:	RECEIVED BY: 3.	

Page ____ of ____
 CLIENT: ☐ Hand Delivered ☐ Other
 CHEMTECH: ☐ Picked Up ☐ Field Sampling

Shipment Complete
☐ YES ☐ NO



284 Sheffield Street, Mountainside NJ 07092 (908)-789-8900 Fax : 908 789 8922

Laboratory Certification

Certified By	License No.
CAS EPA CLP Contract	68HERH20D0011
Connecticut	PH-0830
DOD ELAP (L-A-B)	L2219
Maine	2024021
Maryland	296
New Hampshire	255423
New Jersey	20012
New York	11376
Pennsylvania	68-00548
Soil Permit	525-24-234-08441
Texas	T104704488



284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
Fax : 908 789 8922

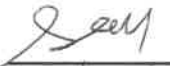
LOGIN REPORT/SAMPLE TRANSFER

Order ID : P4464	TULL01	Order Date : 10/21/2024 11:41:00 AM	Project Mgr :
Client Name : Tully Environmental, Inc		Project Name : Transfer Station-SPDES	Report Type : Results Only
Client Contact : Dean Devoe		Receive DateTime : 10/21/2024 11:30:00 AM	EDD Type : EXCEL NOCLEANUP
Invoice Name : Tully Environmental, Inc		Purchase Order :	Hard Copy Date :
Invoice Contact : Dean Devoe			Date Signoff :

LAB ID	CLIENT ID	MATRIX	SAMPLE DATE	SAMPLE TIME	TEST	TEST GROUP	METHOD	FAX DATE	DUE DATES
P4464-01	001-WILLETS-PT-BLVD(SEP)	Water	10/17/2024	13:00	VOC-BTEX		624.1		5 Bus. Days

Relinquished By : 

Date / Time : 10/21/24 1230

Received By : 

Date / Time : 10/21/24 12:30 

Storage Area : VOA Refridgerator Room