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Alpha Analytical

Laboratory Code: 11148

SDG Number: L2153634

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Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153634
Report Date: 10/08/21

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L2153634-01	134_LSV-21	SOIL_VAPOR	STATEN ISLAND, NY	10/01/21 14:30	10/01/21
L2153634-02	135_SVDUP01_100121	SOIL_VAPOR	STATEN ISLAND, NY	10/01/21 14:30	10/01/21
L2153634-03	136_LSV-22	SOIL_VAPOR	STATEN ISLAND, NY	10/01/21 12:35	10/01/21
L2153634-04	137_AMBIENT-1	AIR	STATEN ISLAND, NY	10/01/21 14:45	10/01/21
L2153634-05	UNUSED CAN #3261	AIR	STATEN ISLAND, NY		10/01/21
L2153634-06	UNUSED CAN #2883	AIR	STATEN ISLAND, NY		10/01/21

Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153634
Report Date: 10/08/21

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153634
Report Date: 10/08/21

Case Narrative (continued)

Volatile Organics in Air

Canisters were released from the laboratory on September 1, 2021. The canister certification results are provided as an addendum.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature: 

Report Date: 10/08/21

Title: Technical Director/Representative

GLOSSARY

Acronyms

DL	- Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the limit of quantitation (LOQ). The DL includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
EDL	- Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).
EMPC	- Estimated Maximum Possible Concentration: The concentration that results from the signal present at the retention time of an analyte when the ions meet all of the identification criteria except the ion abundance ratio criteria. An EMPC is a worst-case estimate of the concentration.
EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LOD	- Limit of Detection: This value represents the level to which a target analyte can reliably be detected for a specific analyte in a specific matrix by a specific method. The LOD includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
LOQ	- Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.) Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available. For Method 332.0, the spike recovery is calculated using the native concentration, including estimated values.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NDPA/DPA	- N-Nitrosodiphenylamine/Diphenylamine.
NI	- Not Ignitable.
NP	- Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.
NR	- No Results: Term is utilized when 'No Target Compounds Requested' is reported for the analysis of Volatile or Semivolatile Organic TIC only requests.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.
STLP	- Semi-dynamic Tank Leaching Procedure per EPA Method 1315.
TEF	- Toxic Equivalency Factors: The values assigned to each dioxin and furan to evaluate their toxicity relative to 2,3,7,8-TCDD.
TEQ	- Toxic Equivalent: The measure of a sample's toxicity derived by multiplying each dioxin and furan by its corresponding TEF and then summing the resulting values.
TIC	- Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.

Report Format: Data Usability Report



Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153634
Report Date: 10/08/21

Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Difference: With respect to Total Oxidizable Precursor (TOP) Assay analysis, the difference is defined as the Post-Treatment value minus the Pre-Treatment value.

Final pH: As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

Frozen Date/Time: With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

Initial pH: As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

PAH Total: With respect to Alkylated PAH analyses, the 'PAHs, Total' result is defined as the summation of results for all or a subset of the following compounds: Naphthalene, C1-C4 Naphthalenes, 2-Methylnaphthalene, 1-Methylnaphthalene, Biphenyl, Acenaphthylene, Acenaphthene, Fluorene, C1-C3 Fluorenes, Phenanthrene, C1-C4 Phenanthrenes/Anthracenes, Anthracene, Fluoranthene, Pyrene, C1-C4 Fluoranthenes/Pyrenes, Benz(a)anthracene, Chrysene, C1-C4 Chrysenes, Benzo(b)fluoranthene, Benzo(j)(k)fluoranthene, Benzo(e)pyrene, Benzo(a)pyrene, Perylene, Indeno(1,2,3-cd)pyrene, Dibenz(ah)+(ac)anthracene, Benzo(g,h,i)perylene. If a 'Total' result is requested, the results of its individual components will also be reported.

PFAS Total: With respect to PFAS analyses, the 'PFAS, Total (5)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA and PFOS. In addition, the 'PFAS, Total (6)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA, PFDA and PFOS. For MassDEP DW compliance analysis only, the 'PFAS, Total (6)' result is defined as the summation of results at or above the RL. Note: If a 'Total' result is requested, the results of its individual components will also be reported.

The target compound Chlordane (CAS No. 57-74-9) is reported for GC ECD analyses. Per EPA, this compound "refers to a mixture of chlordane isomers, other chlorinated hydrocarbons and numerous other components." (Reference: USEPA Toxicological Review of Chlordane, In Support of Summary Information on the Integrated Risk Information System (IRIS), December 1997.)

Total: With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

Data Qualifiers

- A** - Spectra identified as "Aldol Condensates" are byproducts of the extraction/concentration procedures when acetone is introduced in the process.
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).
- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- F** - The ratio of quantifier ion response to qualifier ion response falls outside of the laboratory criteria. Results are considered to be an estimated maximum concentration.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.

Report Format: Data Usability Report



Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153634
Report Date: 10/08/21

Data Qualifiers

- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- V** - The surrogate associated with this target analyte has a recovery outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)
- Z** - The batch matrix spike and/or duplicate associated with this target analyte has a recovery/RPD outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)
- ND** - Not detected at the reporting limit (RL) for the sample.



Volatile Organics Instruments

Volatile Organics:

Instrument: Agilent 7890 GC/5975C MSD
 Trap: Supelco K Trap (VOACARB 3000)
 Concentrator: EST Encon (or equivalent)
 Autosampler: EST Centurion (or equivalent)
 Purge time: 11 min

Columns (length x ID x df):
 RTX-VMS 20m x 0.18mm x 1um
 RTX-VMS 30m x 0.25mm x 1.4um
 RTX-502.2 40m x 0.18mm x 1um

Volatile Organics: VPH

Instrument: Agilent 6890 (or equivalent)
 Trap: Supelco K Trap (VOACARB 3000)
 Concentrator: EST Encon (or equivalent)
 Autosampler: EST Centurion (or equivalent)

Column Type: Restek RTX 502.2
 Column Length: 105 Meters
 df: 3.00 um
 ID: 0.53mm

Volatile Organics: PIANO

Instrument: Agilent 7890 GC/5975C MSD
 Trap: Supelco K Trap (VOACARB 3000)
 Concentrator: Tekmar Velocity / EST Encon
 Autosampler: Varian Archon / EST Centurion
 Purge time: 11 min

Column Type: DB-VRX
 Column Length: 60 Meters
 df: 1.40 um
 ID: 0.25 mm
 Desorb: 1 min

Volatile Organics: Dissolved Gas

Instrument: Agilent 7890 (or equivalent) with FID/TCD

Column Type: Haysep S Column
 Column Length: 2 Meters packed
 (100/200 mesh)

Autosampler: LEAP Headspace

Purge time: 0.6 min

Volatile Organics in Air Instruments

Volatile Organics in Air:

Instruments: Agilent 6890 GC / 5975 MSD Shimadzu QP2010-SE / QP2020

Concentrator: Entech 7100A or 7200
 Autosampler: Entech 7016CA or 7016D

Column Type: Restek RTX-1
 Column Length: 60 Meters
 df: 1.00 um
 ID: 0.25 mm or 0.32 mm

Trap 1: Glass Bead: manufacturer-Entech: 20 cm packing material

Trap 2: Tenax: manufacturer-Entech: 20 cm packing material



Semivolatile Organics Instruments - Westborough

Semivolatile Organics (Acid/Base/Neutral Extractables):

Instrument: Agilent 5973N MSD	Injection volume: 1 μ L; 2 μ L LVI
Column Type: Restek RXI-5SILMS	df: 0.32 μ m
Column Length: 30 Meters	ID: 0.25 mm

Polynuclear Aromatic Hydrocarbons by 8270 SIM:

Instrument: Agilent 5973 MSD	Injection volume: 1 μ L; 2 μ L LVI
Column Type: Restek RXI-5SILMS	df: 0.25 μ m
Column Length: 30 Meters	ID: 0.25 mm

Pesticides/PCB/Herbicides:

Instrument: Agilent 6890 w/Dual Micro ECDs	Injection Volume: 1 μ L
Column A: Restek RTX-CL/STX-CL	df: 0.32
Column B: Restek RTX/STX-CLP Pesticide II	df: 0.25
Column Length: 30 Meters	ID: 0.32 mm

Petroleum/EPH:

Instrument: Agilent 6890 w/FID / HP 5890 w/ FID	Injection Volume: 1 μ L
Column: Restek RTX 5	df: 0.25
Column Length: 30 Meters	
ID: 0.32 mm	



Semivolatile Organic Instruments - Mansfield

Semivolatile Organics (ALK-PAH Extractables):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 1 ul
Column Type: ZB-5	df: 0.25 um
Column Length: 60 Meters	ID: 0.25 mm

Semivolatile Organics (8270):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 2 ul
Column Type: ZB-Semivolatiles	df: 0.25 um
Column Length: 30 Meters	ID: 0.25 mm

Semivolatile Organics (8270 SIM):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 3 ul
Column Type: ZB-5	df: 0.25 um
Column Length: 30 Meters	ID: 0.25 mm

Semivolatile Organics (1,4-Dioxane):

Instrument: Agilent 5973N / 5975 / 5977 MSD	Injection volume: 3 ul
Column Type: RTX-5	df: 0.25um, 0.18 um
Column Length: 30 Meters	ID: 0.25um, 0.18 mm

Semivolatile Organics (209 Congener):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 3 ul
Column Type: RTX-5, RTX-PCB	df: 0.25um, 0.18 um
Column Length: 60 Meters	ID: 0.25um, 0.18 mm

Semivolatile Organics (8081):

Instrument: Agilent 6890 / 7890	Injection volume: 1 ul
Column Type: RTX-5 / RTX-CLP II	df: 0.25 um
Column Length: 60 Meters	ID: 0.25 mm

Semivolatile Organics (8082):

Instrument: Agilent 6890 w/Dual Micro ECDs	Injection Volume: 1uL
Column A: Restek RTX-CL/STX-CL	df: 0.32
Column B: Restek RTX/STX-CLPPesticide II	df: 0.25
Column Length: 30 Meters	ID: 0.32 mm

Semivolatile Organics (SHC Extractables):

Instrument: Agilent 6890	Injection volume: 1 ul
Column Type: RTX-5	df: 0.25 um
Column Length: 60 Meters	ID: 0.25 mm



Sample Delivery Group Summary

Alpha Job Number : L2153634

Received : 01-OCT-2021

Reviewer : Jennifer Jerome

Account Name : Langan Engineering & Environmental

Project Number : 100849501

Project Name : 990 ROSSVILLE AVENUE

Delivery Information

Samples Delivered By : Alpha Courier

Chain of Custody : Present

Cooler Information

Cooler	Seal/Seal#	Preservation	Temperature(°C)	Additional Information
NA	Absent/			

Condition Information

1) All samples on COC received?	YES
2) Extra samples received?	NO
3) Are there any sample container discrepancies?	NO
4) Are there any discrepancies between sample labels & COC?	NO
5) Are samples in appropriate containers for requested analysis?	YES
6) Are samples properly preserved for requested analysis?	YES
7) Are samples within holding time for requested analysis?	YES
8) All sampling equipment returned?	YES

Volatile Organics/VPH

1) Reagent Water Vials Frozen by Client?	NA

ALPHA ANALYTICAL LABORATORIES, INC.
LOGIN CHAIN OF CUSTODY REPORT
Oct 08 2021, 10:19 am

Login Number: L2153634

Account: LANGAN-NJ Langan Engineering & Environmental Project: 100849501

Received: 01OCT21 Due Date: 08OCT21

Sample # Client ID Mat PR Collected

L2153634-01 134_LSV-21 11 S0 01OCT21 14:30

40 compound list applied ASP-B Package Due Date: 10/08/21

ASP-B, CAN-RENT, FLOW-RENT, T015-LL

L2153634-02 135_SVDUP01_100121 11 S0 01OCT21 14:30

40 compound list applied Package Due Date: 10/08/21

CAN-RENT, FLOW-RENT, T015-LL

L2153634-03 136_LSV-22 11 S0 01OCT21 12:35

40 compound list applied Package Due Date: 10/08/21

CAN-RENT, FLOW-RENT, T015-LL

L2153634-04 137_AMBIENT-1 10 S0 01OCT21 14:45

40 compound list applied Package Due Date: 10/08/21

CAN-RENT, FLOW-RENT, T015-LL

L2153634-05 UNUSED CAN #3261 10 S0

40 compound list applied Package Due Date: 10/08/21

CAN-RENT, CLEAN-FEE, FLOW-RENT

L2153634-06 UNUSED CAN #2883 10 S0

40 compound list applied Package Due Date: 10/08/21

CAN-RENT, CLEAN-FEE, FLOW-RENT

Page 1

Logged By: Kim L. Bailey



CHAIN OF CUSTODY

320 Forbes Blvd, Mansfield, MA 02048
TEL: 508-822-9300 FAX: 508-822-3288

Client Information

Client: Langan
Address: 300 Kimball Dr.
Parsippany, NJ 07054
Phone: 973-560-4900
Fax:
Email: breiner@langan.com

AIR ANALYSIS

PAGE 1 OF 1

Project Information

Project Name: 990 Rossville Avenue
Project Location: Staten Island, NY
Project #: 100849501
Project Manager: Ben Rac
ALPHA Quote #:

Turn-Around Time

☒ Standard ☐ RUSH (only confirmed if pre-approved)

Date Due: Time:

Date Rec'd in Lab: 10/2/21

Report Information - Data Deliverables

☐ FAX
☒ ADEX
Criteria Checker:
(Default based on Regulatory Criteria Indicated)
Other Formats:
☒ EMAIL (standard pdf report)
☒ Additional Deliverables:
ASP-B
Report to: (if different than Project Manager)

ALPHA Job #: L2153634

Billing Information

☒ Same as Client info PO #:

Regulatory Requirements/Report Limits

State/Fed Program Res / Comm

ANALYSIS

☐ TO-15
☐ TO-15 SIM
☐ APH
☐ Fixed Gases
☐ Sulfides & Mercaptans by TO-15

All Columns Below Must Be Filled Out

ALPHA Lab ID (Lab Use Only)	Sample ID	COLLECTION						Sample Matrix*	Sampler's Initials	Can Size	ID Can	ID - Flow Controller	TO-15	TO-15 SIM	APH	Fixed Gases	Sulfides & Mercaptans by TO-15	Sample Comments (i.e. PID)
		End Date	Start Time	End Time	Initial Vacuum	Final Vacuum												
<u>53634-01</u>	<u>134-LSV-21</u>	<u>10/1/21</u>	<u>11:00</u>	<u>14:30</u>	<u>-31.66</u>	<u>-10.5</u>	<u>SV</u>	<u>mm</u>	<u>6L</u>	<u>1608</u>	<u>648</u>	<u>X</u>						
<u>-02</u>	<u>135-DUP-1</u>	<u>10/1/21</u>	<u>11:00</u>	<u>14:30</u>	<u>-30.15</u>	<u>-8.99</u>	<u>SV</u>	<u>mm</u>	<u>6L</u>	<u>1651</u>	<u>1109</u>	<u>X</u>						
<u>-03</u>	<u>136-LSV-22</u>	<u>10/1/21</u>	<u>10:30</u>	<u>12:35</u>	<u>-30.58</u>	<u>-4.46</u>	<u>SV</u>	<u>mm</u>	<u>6L</u>	<u>1791</u>	<u>575</u>	<u>X</u>						
<u>-04</u>	<u>137-AMBIENT-1</u>	<u>10/1/21</u>	<u>0700</u>	<u>1445</u>	<u>-30.85</u>	<u>-8.52</u>	<u>AA</u>	<u>mm</u>	<u>6L</u>	<u>689</u>	<u>2082</u>	<u>X</u>						

*SAMPLE MATRIX CODES

AA = Ambient Air (Indoor/Outdoor)
SV = Soil Vapor/Landfill Gas/SVE
Other = Please Specify

Container Type

Relinquished By:

Date/Time

Received By:

Date/Time:

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Supporting Documentation

Project Name: 990 ROSSVILLE AVENUE

Lab Number: L2153634

Project Number: 100849501

Report Date: 10/08/21

Canister and Flow Controller Information

Samplenum	Client ID	Media ID	Media Type	Date Prepared	Bottle Order	Cleaning Batch ID	Can Leak Check	Initial Pressure (in. Hg)	Pressure on Receipt (in. Hg)	Flow Controller Leak Chk	Flow Out mL/min	Flow In mL/min	% RPD
L2153634-01	134_LSV-21	0648	Flow 2	10/01/21	365676		-	-	-	Pass	40.0	19.2	70
L2153634-01	134_LSV-21	1608	6.0L Can	10/01/21	365676	L2150763-03	Pass	-28.9	-9.6	-	-	-	-
L2153634-02	135_SVDUP01_100121	01109	Flow 5	10/01/21	365676		-	-	-	Pass	39.2	0.0	200
L2153634-02	135_SVDUP01_100121	1651	6.0L Can	10/01/21	365676	L2150763-03	Pass	-29.1	-7.0	-	-	-	-
L2153634-03	136_LSV-22	0575	Flow 4	10/01/21	365676		-	-	-	Pass	40.0	41.0	2
L2153634-03	136_LSV-22	1791	6.0L Can	10/01/21	365676	L2151076-05	Pass	-29.5	-5.3	-	-	-	-
L2153634-04	137_AMBIENT-1	02082	Flow 5	10/01/21	365676		-	-	-	Pass	9.9	9.2	7
L2153634-04	137_AMBIENT-1	689	6.0L Can	10/01/21	365676	L2150763-03	Pass	-29.6	-8.6	-	-	-	-
L2153634-05	UNUSED CAN #3261	0561	Flow 3	10/01/21	365676		-	-	-	Pass	40.0	40.1	0
L2153634-05	UNUSED CAN #3261	3261	6.0L Can	10/01/21	365676	L2150763-03	Pass	-29.6	-29.6	-	-	-	-
L2153634-06	UNUSED CAN #2883	0623	Flow 2	10/01/21	365676		-	-	-	Pass	40.0	42.7	7
L2153634-06	UNUSED CAN #2883	2883	6.0L Can	10/01/21	365676	L2151076-02	Pass	-29.5	-29.7	-	-	-	-

Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
 Client ID: CAN 2671 SHELF 30
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15
 Analytical Date: 09/21/21 18:23
 Analyst: TS

Date Collected: 09/20/21 16:00
 Date Received: 09/21/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Chlorodifluoromethane	ND	0.200	--	ND	0.707	--		1
Propylene	ND	0.500	--	ND	0.861	--		1
Propane	ND	0.500	--	ND	0.902	--		1
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.200	--	ND	1.40	--		1
Methanol	ND	5.00	--	ND	6.55	--		1
Vinyl chloride	ND	0.200	--	ND	0.511	--		1
1,3-Butadiene	ND	0.200	--	ND	0.442	--		1
Butane	ND	0.200	--	ND	0.475	--		1
Bromomethane	ND	0.200	--	ND	0.777	--		1
Chloroethane	ND	0.200	--	ND	0.528	--		1
Ethanol	ND	5.00	--	ND	9.42	--		1
Dichlorofluoromethane	ND	0.200	--	ND	0.842	--		1
Vinyl bromide	ND	0.200	--	ND	0.874	--		1
Acrolein	ND	0.500	--	ND	1.15	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Acetonitrile	ND	0.200	--	ND	0.336	--		1
Trichlorofluoromethane	ND	0.200	--	ND	1.12	--		1
Isopropanol	ND	0.500	--	ND	1.23	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
Pentane	ND	0.200	--	ND	0.590	--		1
Ethyl ether	ND	0.200	--	ND	0.606	--		1
1,1-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Tertiary butyl Alcohol	ND	0.500	--	ND	1.52	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
 Client ID: CAN 2671 SHELF 30
 Sample Location:

Date Collected: 09/20/21 16:00
 Date Received: 09/21/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Methylene chloride	ND	0.500	--	ND	1.74	--		1
3-Chloropropene	ND	0.200	--	ND	0.626	--		1
Carbon disulfide	ND	0.200	--	ND	0.623	--		1
Freon-113	ND	0.200	--	ND	1.53	--		1
trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
1,1-Dichloroethane	ND	0.200	--	ND	0.809	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
Vinyl acetate	ND	1.00	--	ND	3.52	--		1
Xylenes, total	ND	0.600	--	ND	0.869	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Ethyl Acetate	ND	0.500	--	ND	1.80	--		1
Chloroform	ND	0.200	--	ND	0.977	--		1
Tetrahydrofuran	ND	0.500	--	ND	1.47	--		1
2,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1
1,2-Dichloroethane	ND	0.200	--	ND	0.809	--		1
n-Hexane	ND	0.200	--	ND	0.705	--		1
Diisopropyl ether	ND	0.200	--	ND	0.836	--		1
tert-Butyl Ethyl Ether	ND	0.200	--	ND	0.836	--		1
1,2-Dichloroethene (total)	ND	1.00	--	ND	1.00	--		1
1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--		1
1,1-Dichloropropene	ND	0.200	--	ND	0.908	--		1
Benzene	ND	0.200	--	ND	0.639	--		1
Carbon tetrachloride	ND	0.200	--	ND	1.26	--		1
Cyclohexane	ND	0.200	--	ND	0.688	--		1
tert-Amyl Methyl Ether	ND	0.200	--	ND	0.836	--		1
Dibromomethane	ND	0.200	--	ND	1.42	--		1
1,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
 Client ID: CAN 2671 SHELF 30
 Sample Location:

Date Collected: 09/20/21 16:00
 Date Received: 09/21/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Bromodichloromethane	ND	0.200	--	ND	1.34	--		1
1,4-Dioxane	ND	0.200	--	ND	0.721	--		1
Trichloroethene	ND	0.200	--	ND	1.07	--		1
2,2,4-Trimethylpentane	ND	0.200	--	ND	0.934	--		1
Methyl Methacrylate	ND	0.500	--	ND	2.05	--		1
Heptane	ND	0.200	--	ND	0.820	--		1
cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--		1
Toluene	ND	0.200	--	ND	0.754	--		1
1,3-Dichloropropane	ND	0.200	--	ND	0.924	--		1
2-Hexanone	ND	0.200	--	ND	0.820	--		1
Dibromochloromethane	ND	0.200	--	ND	1.70	--		1
1,2-Dibromoethane	ND	0.200	--	ND	1.54	--		1
Butyl acetate	ND	0.500	--	ND	2.38	--		1
Octane	ND	0.200	--	ND	0.934	--		1
Tetrachloroethene	ND	0.200	--	ND	1.36	--		1
1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
Chlorobenzene	ND	0.200	--	ND	0.921	--		1
Ethylbenzene	ND	0.200	--	ND	0.869	--		1
p/m-Xylene	ND	0.400	--	ND	1.74	--		1
Bromoform	ND	0.200	--	ND	2.07	--		1
Styrene	ND	0.200	--	ND	0.852	--		1
1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
o-Xylene	ND	0.200	--	ND	0.869	--		1
1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--		1
Nonane	ND	0.200	--	ND	1.05	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
 Client ID: CAN 2671 SHELF 30
 Sample Location:

Date Collected: 09/20/21 16:00
 Date Received: 09/21/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
Bromobenzene	ND	0.200	--	ND	0.793	--		1
2-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
n-Propylbenzene	ND	0.200	--	ND	0.983	--		1
4-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
4-Ethyltoluene	ND	0.200	--	ND	0.983	--		1
1,3,5-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
tert-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
Decane	ND	0.200	--	ND	1.16	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1
1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--		1
Undecane	ND	0.200	--	ND	1.28	--		1
Dodecane	ND	0.200	--	ND	1.39	--		1
1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Naphthalene	ND	0.200	--	ND	1.05	--		1
1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Hexachlorobutadiene	ND	0.200	--	ND	2.13	--		1

Results	Qualifier	Units	RDL	Dilution Factor
Tentatively Identified Compounds				

No Tentatively Identified Compounds



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
Client ID: CAN 2671 SHELF 30
Sample Location:

Date Collected: 09/20/21 16:00
Date Received: 09/21/21
Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-Difluorobenzene	92		60-140
Bromochloromethane	92		60-140
chlorobenzene-d5	91		60-140



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
 Client ID: CAN 2671 SHELF 30
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15-SIM
 Analytical Date: 09/21/21 18:23
 Analyst: TS

Date Collected: 09/20/21 16:00
 Date Received: 09/21/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.050	--	ND	0.349	--		1
Vinyl chloride	ND	0.020	--	ND	0.051	--		1
1,3-Butadiene	ND	0.020	--	ND	0.044	--		1
Bromomethane	ND	0.020	--	ND	0.078	--		1
Chloroethane	ND	0.100	--	ND	0.264	--		1
Acrolein	ND	0.050	--	ND	0.115	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Trichlorofluoromethane	ND	0.050	--	ND	0.281	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
1,1-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Methylene chloride	ND	0.500	--	ND	1.74	--		1
Freon-113	ND	0.050	--	ND	0.383	--		1
trans-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
1,1-Dichloroethane	ND	0.020	--	ND	0.081	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Chloroform	ND	0.020	--	ND	0.098	--		1
1,2-Dichloroethane	ND	0.020	--	ND	0.081	--		1
1,1,1-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Benzene	ND	0.100	--	ND	0.319	--		1
Carbon tetrachloride	ND	0.020	--	ND	0.126	--		1
1,2-Dichloropropane	ND	0.020	--	ND	0.092	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
 Client ID: CAN 2671 SHELF 30
 Sample Location:

Date Collected: 09/20/21 16:00
 Date Received: 09/21/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Bromodichloromethane	ND	0.020	--	ND	0.134	--		1
1,4-Dioxane	ND	0.100	--	ND	0.360	--		1
Trichloroethene	ND	0.020	--	ND	0.107	--		1
cis-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
1,1,2-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Toluene	ND	0.100	--	ND	0.377	--		1
Dibromochloromethane	ND	0.020	--	ND	0.170	--		1
1,2-Dibromoethane	ND	0.020	--	ND	0.154	--		1
Tetrachloroethene	ND	0.020	--	ND	0.136	--		1
1,1,1,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
Chlorobenzene	ND	0.100	--	ND	0.461	--		1
Ethylbenzene	ND	0.020	--	ND	0.087	--		1
p/m-Xylene	ND	0.040	--	ND	0.174	--		1
Bromoform	ND	0.020	--	ND	0.207	--		1
Styrene	ND	0.020	--	ND	0.085	--		1
1,1,2,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
o-Xylene	ND	0.020	--	ND	0.087	--		1
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
4-Ethyltoluene	ND	0.020	--	ND	0.098	--		1
1,3,5-Trimethybenzene	ND	0.020	--	ND	0.098	--		1
1,2,4-Trimethylbenzene	ND	0.020	--	ND	0.098	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
1,4-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2150763
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2150763-03
Client ID: CAN 2671 SHELF 30
Sample Location:

Date Collected: 09/20/21 16:00
Date Received: 09/21/21
Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
1,2-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Naphthalene	ND	0.050	--	ND	0.262	--		1
1,2,3-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Hexachlorobutadiene	ND	0.050	--	ND	0.533	--		1

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-difluorobenzene	85		60-140
bromochloromethane	86		60-140
chlorobenzene-d5	88		60-140



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02
 Client ID: CAN 2642 SHELF 38
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15
 Analytical Date: 09/22/21 18:45
 Analyst: TS

Date Collected: 09/21/21 16:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Chlorodifluoromethane	ND	0.200	--	ND	0.707	--		1
Propylene	ND	0.500	--	ND	0.861	--		1
Propane	ND	0.500	--	ND	0.902	--		1
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.200	--	ND	1.40	--		1
Methanol	ND	5.00	--	ND	6.55	--		1
Vinyl chloride	ND	0.200	--	ND	0.511	--		1
1,3-Butadiene	ND	0.200	--	ND	0.442	--		1
Butane	ND	0.200	--	ND	0.475	--		1
Bromomethane	ND	0.200	--	ND	0.777	--		1
Chloroethane	ND	0.200	--	ND	0.528	--		1
Ethanol	ND	5.00	--	ND	9.42	--		1
Dichlorofluoromethane	ND	0.200	--	ND	0.842	--		1
Vinyl bromide	ND	0.200	--	ND	0.874	--		1
Acrolein	ND	0.500	--	ND	1.15	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Acetonitrile	ND	0.200	--	ND	0.336	--		1
Trichlorofluoromethane	ND	0.200	--	ND	1.12	--		1
Isopropanol	ND	0.500	--	ND	1.23	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
Pentane	ND	0.200	--	ND	0.590	--		1
Ethyl ether	ND	0.200	--	ND	0.606	--		1
1,1-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Tertiary butyl Alcohol	ND	0.500	--	ND	1.52	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02
 Client ID: CAN 2642 SHELF 38
 Sample Location:

Date Collected: 09/21/21 16:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Methylene chloride	ND	0.500	--	ND	1.74	--		1
3-Chloropropene	ND	0.200	--	ND	0.626	--		1
Carbon disulfide	ND	0.200	--	ND	0.623	--		1
Freon-113	ND	0.200	--	ND	1.53	--		1
trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
1,1-Dichloroethane	ND	0.200	--	ND	0.809	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
Vinyl acetate	ND	1.00	--	ND	3.52	--		1
Xylenes, total	ND	0.600	--	ND	0.869	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Ethyl Acetate	ND	0.500	--	ND	1.80	--		1
Chloroform	ND	0.200	--	ND	0.977	--		1
Tetrahydrofuran	ND	0.500	--	ND	1.47	--		1
2,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1
1,2-Dichloroethane	ND	0.200	--	ND	0.809	--		1
n-Hexane	ND	0.200	--	ND	0.705	--		1
Diisopropyl ether	ND	0.200	--	ND	0.836	--		1
tert-Butyl Ethyl Ether	ND	0.200	--	ND	0.836	--		1
1,2-Dichloroethene (total)	ND	1.00	--	ND	1.00	--		1
1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--		1
1,1-Dichloropropene	ND	0.200	--	ND	0.908	--		1
Benzene	ND	0.200	--	ND	0.639	--		1
Carbon tetrachloride	ND	0.200	--	ND	1.26	--		1
Cyclohexane	ND	0.200	--	ND	0.688	--		1
tert-Amyl Methyl Ether	ND	0.200	--	ND	0.836	--		1
Dibromomethane	ND	0.200	--	ND	1.42	--		1
1,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02
 Client ID: CAN 2642 SHELF 38
 Sample Location:

Date Collected: 09/21/21 16:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Bromodichloromethane	ND	0.200	--	ND	1.34	--		1
1,4-Dioxane	ND	0.200	--	ND	0.721	--		1
Trichloroethene	ND	0.200	--	ND	1.07	--		1
2,2,4-Trimethylpentane	ND	0.200	--	ND	0.934	--		1
Methyl Methacrylate	ND	0.500	--	ND	2.05	--		1
Heptane	ND	0.200	--	ND	0.820	--		1
cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--		1
Toluene	ND	0.200	--	ND	0.754	--		1
1,3-Dichloropropane	ND	0.200	--	ND	0.924	--		1
2-Hexanone	ND	0.200	--	ND	0.820	--		1
Dibromochloromethane	ND	0.200	--	ND	1.70	--		1
1,2-Dibromoethane	ND	0.200	--	ND	1.54	--		1
Butyl acetate	ND	0.500	--	ND	2.38	--		1
Octane	ND	0.200	--	ND	0.934	--		1
Tetrachloroethene	ND	0.200	--	ND	1.36	--		1
1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
Chlorobenzene	ND	0.200	--	ND	0.921	--		1
Ethylbenzene	ND	0.200	--	ND	0.869	--		1
p/m-Xylene	ND	0.400	--	ND	1.74	--		1
Bromoform	ND	0.200	--	ND	2.07	--		1
Styrene	ND	0.200	--	ND	0.852	--		1
1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
o-Xylene	ND	0.200	--	ND	0.869	--		1
1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--		1
Nonane	ND	0.200	--	ND	1.05	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02
 Client ID: CAN 2642 SHELF 38
 Sample Location:

Date Collected: 09/21/21 16:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
Bromobenzene	ND	0.200	--	ND	0.793	--		1
2-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
n-Propylbenzene	ND	0.200	--	ND	0.983	--		1
4-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
4-Ethyltoluene	ND	0.200	--	ND	0.983	--		1
1,3,5-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
tert-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
Decane	ND	0.200	--	ND	1.16	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1
1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--		1
Undecane	ND	0.200	--	ND	1.28	--		1
Dodecane	ND	0.200	--	ND	1.39	--		1
1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Naphthalene	ND	0.200	--	ND	1.05	--		1
1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Hexachlorobutadiene	ND	0.200	--	ND	2.13	--		1

Results	Qualifier	Units	RDL	Dilution Factor
Tentatively Identified Compounds				

No Tentatively Identified Compounds



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02 Date Collected: 09/21/21 16:00
 Client ID: CAN 2642 SHELF 38 Date Received: 09/22/21
 Sample Location: Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-Difluorobenzene	90		60-140
Bromochloromethane	90		60-140
chlorobenzene-d5	89		60-140



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02
 Client ID: CAN 2642 SHELF 38
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15-SIM
 Analytical Date: 09/22/21 18:45
 Analyst: TS

Date Collected: 09/21/21 16:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.050	--	ND	0.349	--		1
Vinyl chloride	ND	0.020	--	ND	0.051	--		1
1,3-Butadiene	ND	0.020	--	ND	0.044	--		1
Bromomethane	ND	0.020	--	ND	0.078	--		1
Chloroethane	ND	0.100	--	ND	0.264	--		1
Acrolein	ND	0.050	--	ND	0.115	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Trichlorofluoromethane	ND	0.050	--	ND	0.281	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
1,1-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Methylene chloride	ND	0.500	--	ND	1.74	--		1
Freon-113	ND	0.050	--	ND	0.383	--		1
trans-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
1,1-Dichloroethane	ND	0.020	--	ND	0.081	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Chloroform	ND	0.020	--	ND	0.098	--		1
1,2-Dichloroethane	ND	0.020	--	ND	0.081	--		1
1,1,1-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Benzene	ND	0.100	--	ND	0.319	--		1
Carbon tetrachloride	ND	0.020	--	ND	0.126	--		1
1,2-Dichloropropane	ND	0.020	--	ND	0.092	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02
 Client ID: CAN 2642 SHELF 38
 Sample Location:

Date Collected: 09/21/21 16:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Bromodichloromethane	ND	0.020	--	ND	0.134	--		1
1,4-Dioxane	ND	0.100	--	ND	0.360	--		1
Trichloroethene	ND	0.020	--	ND	0.107	--		1
cis-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
1,1,2-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Toluene	ND	0.100	--	ND	0.377	--		1
Dibromochloromethane	ND	0.020	--	ND	0.170	--		1
1,2-Dibromoethane	ND	0.020	--	ND	0.154	--		1
Tetrachloroethene	ND	0.020	--	ND	0.136	--		1
1,1,1,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
Chlorobenzene	ND	0.100	--	ND	0.461	--		1
Ethylbenzene	ND	0.020	--	ND	0.087	--		1
p/m-Xylene	ND	0.040	--	ND	0.174	--		1
Bromoform	ND	0.020	--	ND	0.207	--		1
Styrene	ND	0.020	--	ND	0.085	--		1
1,1,2,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
o-Xylene	ND	0.020	--	ND	0.087	--		1
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
4-Ethyltoluene	ND	0.020	--	ND	0.098	--		1
1,3,5-Trimethybenzene	ND	0.020	--	ND	0.098	--		1
1,2,4-Trimethylbenzene	ND	0.020	--	ND	0.098	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
1,4-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-02
 Client ID: CAN 2642 SHELF 38
 Sample Location:

Date Collected: 09/21/21 16:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
1,2-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Naphthalene	ND	0.050	--	ND	0.262	--		1
1,2,3-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Hexachlorobutadiene	ND	0.050	--	ND	0.533	--		1

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-difluorobenzene	90		60-140
bromochloromethane	91		60-140
chlorobenzene-d5	90		60-140



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
 Client ID: CAN 950 SHELF 35
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15
 Analytical Date: 09/22/21 20:44
 Analyst: TS

Date Collected: 09/22/21 09:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Chlorodifluoromethane	ND	0.200	--	ND	0.707	--		1
Propylene	ND	0.500	--	ND	0.861	--		1
Propane	ND	0.500	--	ND	0.902	--		1
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.200	--	ND	1.40	--		1
Methanol	ND	5.00	--	ND	6.55	--		1
Vinyl chloride	ND	0.200	--	ND	0.511	--		1
1,3-Butadiene	ND	0.200	--	ND	0.442	--		1
Butane	ND	0.200	--	ND	0.475	--		1
Bromomethane	ND	0.200	--	ND	0.777	--		1
Chloroethane	ND	0.200	--	ND	0.528	--		1
Ethanol	ND	5.00	--	ND	9.42	--		1
Dichlorofluoromethane	ND	0.200	--	ND	0.842	--		1
Vinyl bromide	ND	0.200	--	ND	0.874	--		1
Acrolein	ND	0.500	--	ND	1.15	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Acetonitrile	ND	0.200	--	ND	0.336	--		1
Trichlorofluoromethane	ND	0.200	--	ND	1.12	--		1
Isopropanol	ND	0.500	--	ND	1.23	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
Pentane	ND	0.200	--	ND	0.590	--		1
Ethyl ether	ND	0.200	--	ND	0.606	--		1
1,1-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Tertiary butyl Alcohol	ND	0.500	--	ND	1.52	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
 Client ID: CAN 950 SHELF 35
 Sample Location:

Date Collected: 09/22/21 09:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Methylene chloride	ND	0.500	--	ND	1.74	--		1
3-Chloropropene	ND	0.200	--	ND	0.626	--		1
Carbon disulfide	ND	0.200	--	ND	0.623	--		1
Freon-113	ND	0.200	--	ND	1.53	--		1
trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
1,1-Dichloroethane	ND	0.200	--	ND	0.809	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
Vinyl acetate	ND	1.00	--	ND	3.52	--		1
Xylenes, total	ND	0.600	--	ND	0.869	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Ethyl Acetate	ND	0.500	--	ND	1.80	--		1
Chloroform	ND	0.200	--	ND	0.977	--		1
Tetrahydrofuran	ND	0.500	--	ND	1.47	--		1
2,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1
1,2-Dichloroethane	ND	0.200	--	ND	0.809	--		1
n-Hexane	ND	0.200	--	ND	0.705	--		1
Diisopropyl ether	ND	0.200	--	ND	0.836	--		1
tert-Butyl Ethyl Ether	ND	0.200	--	ND	0.836	--		1
1,2-Dichloroethene (total)	ND	1.00	--	ND	1.00	--		1
1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--		1
1,1-Dichloropropene	ND	0.200	--	ND	0.908	--		1
Benzene	ND	0.200	--	ND	0.639	--		1
Carbon tetrachloride	ND	0.200	--	ND	1.26	--		1
Cyclohexane	ND	0.200	--	ND	0.688	--		1
tert-Amyl Methyl Ether	ND	0.200	--	ND	0.836	--		1
Dibromomethane	ND	0.200	--	ND	1.42	--		1
1,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
 Client ID: CAN 950 SHELF 35
 Sample Location:

Date Collected: 09/22/21 09:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Bromodichloromethane	ND	0.200	--	ND	1.34	--		1
1,4-Dioxane	ND	0.200	--	ND	0.721	--		1
Trichloroethene	ND	0.200	--	ND	1.07	--		1
2,2,4-Trimethylpentane	ND	0.200	--	ND	0.934	--		1
Methyl Methacrylate	ND	0.500	--	ND	2.05	--		1
Heptane	ND	0.200	--	ND	0.820	--		1
cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--		1
Toluene	ND	0.200	--	ND	0.754	--		1
1,3-Dichloropropane	ND	0.200	--	ND	0.924	--		1
2-Hexanone	ND	0.200	--	ND	0.820	--		1
Dibromochloromethane	ND	0.200	--	ND	1.70	--		1
1,2-Dibromoethane	ND	0.200	--	ND	1.54	--		1
Butyl acetate	ND	0.500	--	ND	2.38	--		1
Octane	ND	0.200	--	ND	0.934	--		1
Tetrachloroethene	ND	0.200	--	ND	1.36	--		1
1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
Chlorobenzene	ND	0.200	--	ND	0.921	--		1
Ethylbenzene	ND	0.200	--	ND	0.869	--		1
p/m-Xylene	ND	0.400	--	ND	1.74	--		1
Bromoform	ND	0.200	--	ND	2.07	--		1
Styrene	ND	0.200	--	ND	0.852	--		1
1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
o-Xylene	ND	0.200	--	ND	0.869	--		1
1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--		1
Nonane	ND	0.200	--	ND	1.05	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
 Client ID: CAN 950 SHELF 35
 Sample Location:

Date Collected: 09/22/21 09:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
Bromobenzene	ND	0.200	--	ND	0.793	--		1
2-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
n-Propylbenzene	ND	0.200	--	ND	0.983	--		1
4-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
4-Ethyltoluene	ND	0.200	--	ND	0.983	--		1
1,3,5-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
tert-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
Decane	ND	0.200	--	ND	1.16	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1
1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--		1
Undecane	ND	0.200	--	ND	1.28	--		1
Dodecane	ND	0.200	--	ND	1.39	--		1
1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Naphthalene	ND	0.200	--	ND	1.05	--		1
1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Hexachlorobutadiene	ND	0.200	--	ND	2.13	--		1

Results	Qualifier	Units	RDL	Dilution Factor
Tentatively Identified Compounds				

No Tentatively Identified Compounds



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
Client ID: CAN 950 SHELF 35
Sample Location:

Date Collected: 09/22/21 09:00
Date Received: 09/22/21
Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-Difluorobenzene	88		60-140
Bromochloromethane	89		60-140
chlorobenzene-d5	89		60-140



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
 Client ID: CAN 950 SHELF 35
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15-SIM
 Analytical Date: 09/22/21 20:44
 Analyst: TS

Date Collected: 09/22/21 09:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.050	--	ND	0.349	--		1
Vinyl chloride	ND	0.020	--	ND	0.051	--		1
1,3-Butadiene	ND	0.020	--	ND	0.044	--		1
Bromomethane	ND	0.020	--	ND	0.078	--		1
Chloroethane	ND	0.100	--	ND	0.264	--		1
Acrolein	ND	0.050	--	ND	0.115	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Trichlorofluoromethane	ND	0.050	--	ND	0.281	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
1,1-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Methylene chloride	ND	0.500	--	ND	1.74	--		1
Freon-113	ND	0.050	--	ND	0.383	--		1
trans-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
1,1-Dichloroethane	ND	0.020	--	ND	0.081	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Chloroform	ND	0.020	--	ND	0.098	--		1
1,2-Dichloroethane	ND	0.020	--	ND	0.081	--		1
1,1,1-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Benzene	ND	0.100	--	ND	0.319	--		1
Carbon tetrachloride	ND	0.020	--	ND	0.126	--		1
1,2-Dichloropropane	ND	0.020	--	ND	0.092	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
 Client ID: CAN 950 SHELF 35
 Sample Location:

Date Collected: 09/22/21 09:00
 Date Received: 09/22/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Bromodichloromethane	ND	0.020	--	ND	0.134	--		1
1,4-Dioxane	ND	0.100	--	ND	0.360	--		1
Trichloroethene	ND	0.020	--	ND	0.107	--		1
cis-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
1,1,2-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Toluene	ND	0.100	--	ND	0.377	--		1
Dibromochloromethane	ND	0.020	--	ND	0.170	--		1
1,2-Dibromoethane	ND	0.020	--	ND	0.154	--		1
Tetrachloroethene	ND	0.020	--	ND	0.136	--		1
1,1,1,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
Chlorobenzene	ND	0.100	--	ND	0.461	--		1
Ethylbenzene	ND	0.020	--	ND	0.087	--		1
p/m-Xylene	ND	0.040	--	ND	0.174	--		1
Bromoform	ND	0.020	--	ND	0.207	--		1
Styrene	ND	0.020	--	ND	0.085	--		1
1,1,2,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
o-Xylene	ND	0.020	--	ND	0.087	--		1
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
4-Ethyltoluene	ND	0.020	--	ND	0.098	--		1
1,3,5-Trimethybenzene	ND	0.020	--	ND	0.098	--		1
1,2,4-Trimethylbenzene	ND	0.020	--	ND	0.098	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
1,4-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2151076
Report Date: 10/08/21

Air Canister Certification Results

Lab ID: L2151076-05
Client ID: CAN 950 SHELF 35
Sample Location:

Date Collected: 09/22/21 09:00
Date Received: 09/22/21
Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
1,2-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Naphthalene	ND	0.050	--	ND	0.262	--		1
1,2,3-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Hexachlorobutadiene	ND	0.050	--	ND	0.533	--		1

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-difluorobenzene	90		60-140
bromochloromethane	90		60-140
chlorobenzene-d5	91		60-140



Organics

Volatile Organics in Air TO-15 Low Level

Volatiles QC Summary

Lab Duplicate Sample Summary

Form 3

Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153634
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Client Sample ID	: 136_LSV-22	Matrix	: AIR
Lab Sample ID	: L2153634-03	Analysis Date	: 10/06/21 23:31
Lab File ID	: R1626868	DUP File ID	: r1626869
Dup Sample ID	: WG1555287-5	DUP Analysis Date	: 10/07/21 00:09

Parameter	Sample Concentration (ppbV)	Duplicate Concentration (ppbV)	RPD	RPD Limit
Dichlorodifluoromethane	0.406	0.407	0	25
Chloromethane	ND	ND	NC	25
Vinyl chloride	ND	ND	NC	25
Chloroethane	ND	ND	NC	25
Trichlorofluoromethane	ND	ND	NC	25
1,1-Dichloroethene	ND	ND	NC	25
Methylene chloride	ND	ND	NC	25
Freon-113	ND	ND	NC	25
trans-1,2-Dichloroethene	ND	ND	NC	25
1,1-Dichloroethane	ND	ND	NC	25
cis-1,2-Dichloroethene	ND	ND	NC	25
Chloroform	1.42	1.44	1	25
2,2-Dichloropropane	ND	ND	NC	25
1,2-Dichloroethane	ND	ND	NC	25
1,1,1-Trichloroethane	ND	ND	NC	25
1,1-Dichloropropene	ND	ND	NC	25
Carbon tetrachloride	ND	ND	NC	25
1,2-Dichloropropane	ND	ND	NC	25
Bromodichloromethane	ND	ND	NC	25
Trichloroethene	ND	ND	NC	25
cis-1,3-Dichloropropene	ND	ND	NC	25
trans-1,3-Dichloropropene	ND	ND	NC	25
1,1,2-Trichloroethane	ND	ND	NC	25
1,3-Dichloropropane	ND	ND	NC	25
Dibromochloromethane	ND	ND	NC	25

Lab Duplicate Sample Summary

Form 3

Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153634
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Client Sample ID	: 136_LSV-22	Matrix	: AIR
Lab Sample ID	: L2153634-03	Analysis Date	: 10/06/21 23:31
Lab File ID	: R1626868	DUP File ID	: r1626869
Dup Sample ID	: WG1555287-5	DUP Analysis Date	: 10/07/21 00:09

Parameter	Sample Concentration (ppbV)	Duplicate Concentration (ppbV)	RPD	RPD Limit
Tetrachloroethene	0.755	0.769	2	25
1,1,1,2-Tetrachloroethane	ND	ND	NC	25
Chlorobenzene	ND	ND	NC	25
1,1,2,2-Tetrachloroethane	ND	ND	NC	25
1,2,3-Trichloropropane	ND	ND	NC	25
2-Chlorotoluene	ND	ND	NC	25
4-Chlorotoluene	ND	ND	NC	25
1,3-Dichlorobenzene	ND	ND	NC	25
1,4-Dichlorobenzene	ND	ND	NC	25
1,2-Dichlorobenzene	ND	ND	NC	25
1,2-Dibromo-3-chloropropane	ND	ND	NC	25
1,2,4-Trichlorobenzene	ND	ND	NC	25
1,2,3-Trichlorobenzene	ND	ND	NC	25
Hexachlorobutadiene	ND	ND	NC	25
1,3-Dichloropropene, Total	ND	ND	NC	25

Laboratory Control Sample Summary

Form 3

Air Volatiles

Client : Langan Engineering & Environmental Lab Number : L2153634
 Project Name : 990 ROSSVILLE AVENUE Project Number : 100849501
 Matrix : AIR
 LCS Sample ID : WG1555287-3 Analysis Date : 10/06/21 12:31 File ID : r1626854
 LCSD Sample ID : Analysis Date : File ID :

Parameter	Laboratory Control Sample			Laboratory Control Duplicate			RPD	Recovery Limits	RPD Limit
	True (ppbV)	Found (ppbV)	%R	True (ppbV)	Found (ppbV)	%R			
Dichlorodifluoromethane	10	9.51	95				-	70-130	-
Chloromethane	10	7.39	74				-	70-130	-
Vinyl chloride	10	9.05	90				-	70-130	-
Chloroethane	10	8.97	90				-	70-130	-
Trichlorofluoromethane	10	9.81	98				-	70-130	-
1,1-Dichloroethene	10	9.37	94				-	70-130	-
Methylene chloride	10	7.40	74				-	70-130	-
Freon-113	10	7.59	76				-	70-130	-
trans-1,2-Dichloroethene	10	9.93	99				-	70-130	-
1,1-Dichloroethane	10	9.74	97				-	70-130	-
cis-1,2-Dichloroethene	10	10.3	103				-	70-130	-
Chloroform	10	10.8	108				-	70-130	-
2,2-Dichloropropane	10	9.90	99				-	70-130	-
1,2-Dichloroethane	10	10.4	104				-	70-130	-
1,1,1-Trichloroethane	10	10.5	105				-	70-130	-
1,1-Dichloropropene	10	9.90	99				-	70-130	-
Carbon tetrachloride	10	11.1	111				-	70-130	-
1,2-Dichloropropane	10	9.66	97				-	70-130	-
Bromodichloromethane	10	11.4	114				-	70-130	-
Trichloroethene	10	10.4	104				-	70-130	-
cis-1,3-Dichloropropene	10	10.9	109				-	70-130	-
trans-1,3-Dichloropropene	10	9.53	95				-	70-130	-
1,1,2-Trichloroethane	10	10.1	101				-	70-130	-
1,3-Dichloropropane	10	9.43	94				-	70-130	-
Dibromochloromethane	10	11.8	118				-	70-130	-
Tetrachloroethene	10	10.3	103				-	70-130	-



Laboratory Control Sample Summary

Form 3

Air Volatiles

Client : Langan Engineering & Environmental Lab Number : L2153634
 Project Name : 990 ROSSVILLE AVENUE Project Number : 100849501
 Matrix : AIR
 LCS Sample ID : WG1555287-3 Analysis Date : 10/06/21 12:31 File ID : r1626854
 LCSD Sample ID : Analysis Date : File ID :

Parameter	Laboratory Control Sample			Laboratory Control Duplicate			RPD	Recovery Limits	RPD Limit
	True (ppbV)	Found (ppbV)	%R	True (ppbV)	Found (ppbV)	%R			
1,1,1,2-Tetrachloroethane	10	10.2	102				-	70-130	-
Chlorobenzene	10	10.3	103				-	70-130	-
1,1,2,2-Tetrachloroethane	10	11.3	113				-	70-130	-
1,2,3-Trichloropropane	10	10.0	100				-	70-130	-
2-Chlorotoluene	10	10.4	104				-	70-130	-
4-Chlorotoluene	10	10.5	105				-	70-130	-
1,3-Dichlorobenzene	10	11.2	112				-	70-130	-
1,4-Dichlorobenzene	10	11.1	111				-	70-130	-
1,2-Dichlorobenzene	10	11.1	111				-	70-130	-
1,2-Dibromo-3-chloropropane	10	10.9	109				-	70-130	-
1,2,4-Trichlorobenzene	10	11.6	116				-	70-130	-
1,2,3-Trichlorobenzene	10	11.2	112				-	70-130	-
Hexachlorobutadiene	10	11.6	116				-	70-130	-

Method Blank Summary
Form 4
Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153634
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Lab Sample ID	: WG1555287-4	Lab File ID	: r1626856
Instrument ID	: AIRLAB16		
Matrix	: AIR	Analysis Date	: 10/06/21 14:52

Client Sample No.	Lab Sample ID	Analysis Date
WG1555287-3LCS	WG1555287-3	10/06/21 12:31
137_AMBIENT-1	L2153634-04	10/06/21 17:01
134_LSV-21	L2153634-01	10/06/21 22:13
135_SVDUP01_100121	L2153634-02	10/06/21 22:52
136_LSV-22	L2153634-03	10/06/21 23:31
136_LSV-22DUP	WG1555287-5	10/07/21 00:09

Instrument Performance Check (Tune) Summary

Form 5

Air Volatiles

Bromofluorobenzene (BFB)

Client	: Langan Engineering & Environmental	Lab Number	: L2153634
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Instrument ID	: AIRLAB16	Analysis Date	: 08/29/21 17:51
Tune Standard	: WG1540703-1	Tune File ID	: r1626181_tune

m/e	Ion Abundance Criteria	%Relative Abundance
50	8.0 - 40.0% of mass 95	15.1
75	30.0 - 66.0% of mass 95	38.4
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.5
173	Less than 2.0% of mass 174	0.4 (.6)1
174	50.0 - 120.0% of mass 95	67
175	4.0 - 9.0% of mass 174	4.6 (6.9)1
176	93.0 - 101% of mass 174	65.9 (98.3)1
177	5.0 - 9.0% of mass 176	4.1 (6.2)2

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

This Check Applies to the following Samples, MS, MSD, Blanks, and Standards:

Client Sample ID	Lab Sample ID	File ID	Analysis Date/Time
STD0.2	R1473039-1	R1626185	08/29/21 20:26
STD0.5	R1473039-2	R1626186	08/29/21 21:05
STD1.0	R1473039-3	R1626187	08/29/21 21:46
STD5.0	R1473039-4	R1626188	08/29/21 22:25
STD010	R1473039-5	R1626189	08/29/21 23:06
STD020	R1473039-7	R1626190	08/29/21 23:44
STD050	R1473039-6	R1626191	08/30/21 00:22
STD100	R1473039-8	R1626192	08/30/21 01:03
ICV Quant	R1473039-9	R1626195	08/30/21 07:39

Instrument Performance Check (Tune) Summary

Form 5

Air Volatiles

Bromofluorobenzene (BFB)

Client : Langan Engineering & Environmental	Lab Number : L2153634
Project Name : 990 ROSSVILLE AVENUE	Project Number : 100849501
Instrument ID : AIRLAB16	Analysis Date : 10/06/21 11:09
Tune Standard : WG1555287-1	Tune File ID : r1626852_tune

m/e	Ion Abundance Criteria	%Relative Abundance
50	8.0 - 40.0% of mass 95	16
75	30.0 - 66.0% of mass 95	39.7
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.7
173	Less than 2.0% of mass 174	0.5 (.7)1
174	50.0 - 120.0% of mass 95	73.5
175	4.0 - 9.0% of mass 174	5.1 (6.9)1
176	93.0 - 101% of mass 174	69.1 (94)1
177	5.0 - 9.0% of mass 176	4.6 (6.7)2

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

This Check Applies to the following Samples, MS, MSD, Blanks, and Standards:

Client Sample ID	Lab Sample ID	File ID	Analysis Date/Time
WG1555287-2CCAL	WG1555287-2	R1626853	10/06/21 11:50
WG1555287-3LCS	WG1555287-3	R1626854	10/06/21 12:31
WG1555287-4BLANK	WG1555287-4	R1626856	10/06/21 14:52
137_AMBIENT-1	L2153634-04	R1626858	10/06/21 17:01
134_LSV-21	L2153634-01	R1626866	10/06/21 22:13
135_SVDUP01_100121	L2153634-02	R1626867	10/06/21 22:52
136_LSV-22	L2153634-03	R1626868	10/06/21 23:31
WG1555287-5DUP	WG1555287-5	R1626869	10/07/21 00:09

Internal Standard Area and RT Summary

Form 8a

Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153634
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Instrument ID	: AIRLAB16	Analysis Date	: 10/06/21 11:50:00
Sample No	: WG1555287-2	Lab File ID	: R1626853

	Bromochloromethane		1,4-Difluorobenzene		Chlorobenzene-d5	
	Area	RT	Area	RT	Area	RT
WG1555287-2	357950	9.38	923831	11.65	146691	16.38
Upper Limit	501130	9.71	1293363	11.98	205367	16.71
Lower Limit	214770	9.05	554299	11.32	88015	16.05
Sample ID						
WG1555287-3 LCS	354747	9.38	924363	11.65	145245	16.38
WG1555287-4 BLANK	346259	9.38	872255	11.65	132477	16.38
137_AMBIENT-1	350623	9.38	865880	11.65	138189	16.38
134_LSV-21	337244	9.38	878732	11.65	146115	16.38
135_SVDUP01_100121	342699	9.39	895534	11.65	151291	16.38
136_LSV-22	346421	9.38	888900	11.66	147536	16.38
136_LSV-22 DUP	343181	9.38	871039	11.66	146027	16.38

Area Upper Limit = +40% of internal standard area
Area Lower Limit = - 40% of internal standard area

RT Upper Limit = +0.33 minutes of internal standard RT
RT Lower Limit = -0.33 minutes of internal standard RT

* Values outside of QC limits





Date Created: 02/01/21
Created By: Jason Hebert
File: PM10116-1
Page: 1

Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
1,1,1-Trichloroethane	71-55-6	0.2	0.0501	ppbV	70-130			25	25			
1,1,2,2-Tetrachloroethane	79-34-5	0.2	0.0614	ppbV	70-130			25	25			
1,1,2-Trichloroethane	79-00-5	0.2	0.067	ppbV	70-130			25	25			
1,1-Dichloroethane	75-34-3	0.2	0.0628	ppbV	70-130			25	25			
1,1-Dichloroethene	75-35-4	0.2	0.0643	ppbV	70-130			25	25			
1,2,3-Trimethylbenzene	526-73-8	0.2	0.0576	ppbV	70-130			25	25			
1,2,4-Trichlorobenzene	120-82-1	0.2	0.0674	ppbV	70-130			25	25			
1,2,4-Trimethylbenzene	95-63-6	0.2	0.0368	ppbV	70-130			25	25			
1,2,4,5-Tetramethylbenzene	95-93-2	0.2	0.0604	ppbV	70-130			25	25			
1,2-Dibromoethane	106-93-4	0.2	0.0561	ppbV	70-130			25	25			
1,2-Dichlorobenzene	95-50-1	0.2	0.0628	ppbV	70-130			25	25			
1,2-Dichloroethane	107-06-2	0.2	0.0602	ppbV	70-130			25	25			
1,2-Dichloropropane	78-87-5	0.2	0.061	ppbV	70-130			25	25			
1,3,5-Trimethylbenzene	108-67-8	0.2	0.0675	ppbV	70-130			25	25			
1,3-Butadiene	106-99-0	0.2	0.067	ppbV	70-130			25	25			
1,3-Dichlorobenzene	541-73-1	0.2	0.0627	ppbV	70-130			25	25			
1,4-Dichlorobenzene	106-46-7	0.2	0.0636	ppbV	70-130			25	25			
1,4-Dioxane	123-91-1	0.2	0.0805	ppbV	70-130			25	25			
2,2,4-Trimethylpentane	540-84-1	0.2	0.0361	ppbV	70-130			25	25			
2-Butanone	78-93-3	0.5	0.0482	ppbV	70-130			25	25			
2-Hexanone	591-78-6	0.2	0.0648	ppbV	70-130			25	25			
2-Methylthiophene	554-14-3	0.2	0.0524	ppbV	70-130			25	25			
3-Methylthiophene	616-44-4	0.2	0.0393	ppbV	70-130			25	25			
3-Chloropropene	107-05-1	0.2	0.0585	ppbV	70-130			25	25			
2-Ethylthiophene	872-55-9	0.2	0.0407	ppbV	70-130			25	25			
4-Ethyltoluene	622-96-8	0.2	0.037	ppbV	70-130			25	25			
Acetone	67-64-1	1	0.689	ppbV	40-160			25	25			
Benzene	71-43-2	0.2	0.0487	ppbV	70-130			25	25			
Benzyl chloride	100-44-7	0.2	0.0482	ppbV	70-130			25	25			
Benzothiophene	95-15-8	0.5	0.077	ppbV	70-130			25	25			
Bromodichloromethane	75-27-4	0.2	0.0504	ppbV	70-130			25	25			
Bromoform	75-25-2	0.2	0.0641	ppbV	70-130			25	25			
Bromomethane	74-83-9	0.2	0.0773	ppbV	70-130			25	25			
Carbon disulfide	75-15-0	0.2	0.0559	ppbV	70-130			25	25			
Carbon tetrachloride	56-23-5	0.2	0.0499	ppbV	70-130			25	25			
Chlorobenzene	108-90-7	0.2	0.0624	ppbV	70-130			25	25			
Chloroethane	75-00-3	0.2	0.0805	ppbV	70-130			25	25			
Chloroform	67-66-3	0.2	0.0633	ppbV	70-130			25	25			
Chloromethane	74-87-3	0.2	0.0689	ppbV	70-130			25	25			
cis-1,2-Dichloroethene	156-59-2	0.2	0.117	ppbV	70-130			25	25			
cis-1,3-Dichloropropene	10061-01-5	0.2	0.0409	ppbV	70-130			25	25			
Cyclohexane	110-82-7	0.2	0.0368	ppbV	70-130			25	25			

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Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
Dibromochloromethane	124-48-1	0.2	0.0614	ppbV	70-130			25	25			
Dichlorodifluoromethane	75-71-8	0.2	0.0583	ppbV	70-130			25	25			
Diethyl carbonate	105-58-8	20	20	ppbV	70-130			25	25			
Dimethyl carbonate	616-38-6	20	20	ppbV	70-130			25	25			
Ethyl Alcohol	64-17-5	5	0.733	ppbV	40-160			25	25			
Ethyl Acetate	141-78-6	0.5	0.122	ppbV	70-130			25	25			
Ethylbenzene	100-41-4	0.2	0.0432	ppbV	70-130			25	25			
Ethyl methyl carbonate	623-53-0	20	20	ppbV	70-130			25	25			
1,1,2-Trichloro-1,2,2-Trifluoroethane	76-13-1	0.2	0.0656	ppbV	70-130			25	25			
1,2-Dichloro-1,1,2,2-tetrafluoroethane	76-14-2	0.2	0.0591	ppbV	70-130			25	25			
Hexachlorobutadiene	87-68-3	0.2	0.0529	ppbV	70-130			25	25			
iso-Propyl Alcohol	67-63-0	0.5	0.478	ppbV	40-160			25	25			
Methylene chloride	75-09-2	0.5	0.134	ppbV	70-130			25	25			
4-Methyl-2-pentanone	108-10-1	0.5	0.0421	ppbV	70-130			25	25			
Methyl tert butyl ether	1634-04-4	0.2	0.0525	ppbV	70-130			25	25			
Methyl Methacrylate	80-62-6	0.5	0.0697	ppbV	40-160			25	25			
p/m-Xylene	179601-23-1	0.4	0.091	ppbV	70-130			25	25			
o-Xylene	95-47-6	0.2	0.0453	ppbV	70-130			25	25			
Xylene (Total)	1330-20-7	0.2	0.0453	ppbV				25	25			
Heptane	142-82-5	0.2	0.047	ppbV	70-130			25	25			
n-Heptane	142-82-5	0.2	0.047	ppbV	70-130			25	25			
n-Hexane	110-54-3	0.2	0.0364	ppbV	70-130			25	25			
Propylene	115-07-1	0.5	0.0599	ppbV	70-130			25	25			
Styrene	100-42-5	0.2	0.0434	ppbV	70-130			25	25			
Tetrachloroethene	127-18-4	0.2	0.0655	ppbV	70-130			25	25			
Thiophene	110-02-1	0.2	0.0389	ppbV	70-130			25	25			
Tetrahydrofuran	109-99-9	0.5	0.0568	ppbV	70-130			25	25			
Toluene	108-88-3	0.2	0.052	ppbV	70-130			25	25			
trans-1,2-Dichloroethene	156-60-5	0.2	0.0643	ppbV	70-130			25	25			
1,2-Dichloroethene (total)	540-59-0	0.2	0.0643	ppbV				25	25			
trans-1,3-Dichloropropene	10061-02-6	0.2	0.0436	ppbV	70-130			25	25			
1,3-Dichloropropene, Total	542-75-6	0.2	0.0409	ppbV				25	25			
Trichloroethene	79-01-6	0.2	0.0505	ppbV	70-130			25	25			
Trichlorofluoromethane	75-69-4	0.2	0.0686	ppbV	70-130			25	25			
Vinyl acetate	108-05-4	1	0.0479	ppbV	70-130			25	25			
Vinyl bromide	593-60-2	0.2	0.0717	ppbV	70-130			25	25			
Vinyl chloride	75-01-4	0.2	0.0627	ppbV	70-130			25	25			
Naphthalene	91-20-3	0.2	0.0885	ppbV	70-130			25	25			
Total HC As Hexane	NONE	10	0.0364	ppbV	70-130			25	25			
Total VOCs As Toluene	NONE	10	0.052	ppbV	70-130			25	25			
Propane	74-98-6	0.5	0.132	ppbV	70-130			25	25			
Acrylonitrile	107-13-1	0.5	0.0555	ppbV	70-130			25	25			

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Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
Acrolein	107-02-8	0.5	0.0596	ppbV	60-113			25	25			
1,1,1,2-Tetrachloroethane	630-20-6	0.2	0.0561	ppbV	70-130			25	25			
Isopropylbenzene	98-82-8	0.2	0.0491	ppbV	70-130			25	25			
1,2,3-Trichloropropane	96-18-4	0.2	0.061	ppbV	70-130			25	25			
Acetonitrile	75-05-8	0.2	0.082	ppbV	70-130			25	25			
Bromobenzene	108-86-1	0.2	0.0613	ppbV	70-130			25	25			
Chlorodifluoromethane	75-45-6	0.2	0.0584	ppbV	70-130			25	25			
Dichlorofluoromethane	75-43-4	0.2	0.0807	ppbV	70-130			25	25			
Dibromomethane	74-95-3	0.2	0.0563	ppbV	70-130			25	25			
Pentane	109-66-0	0.2	0.0659	ppbV	70-130			25	25			
Octane	111-65-9	0.2	0.0445	ppbV	70-130			25	25			
Tertiary-Amyl Methyl Ether	994-05-8	0.2	0.0476	ppbV	70-130			25	25			
o-Chlorotoluene	95-49-8	0.2	0.0486	ppbV	70-130			25	25			
p-Chlorotoluene	106-43-4	0.2	0.056	ppbV	70-130			25	25			
2,2-Dichloropropane	594-20-7	0.2	0.0458	ppbV	70-130			25	25			
1,1-Dichloropropene	563-58-6	0.2	0.0457	ppbV	70-130			25	25			
Isopropyl Ether	108-20-3	0.2	0.0621	ppbV	70-130			25	25			
Ethyl-Tert-Butyl Ether	637-92-3	0.2	0.0422	ppbV	70-130			25	25			
1,2,3-Trichlorobenzene	87-61-6	0.2	0.0715	ppbV	70-130			25	25			
Ethyl ether	60-29-7	0.2	0.0737	ppbV	70-130			25	25			
n-Butylbenzene	104-51-8	0.2	0.044	ppbV	70-130			25	25			
sec-Butylbenzene	135-98-8	0.2	0.0429	ppbV	70-130			25	25			
tert-Butylbenzene	98-06-6	0.2	0.042	ppbV	70-130			25	25			
1,2-Dibromo-3-chloropropane	96-12-8	0.2	0.0495	ppbV	70-130			25	25			
p-Isopropyltoluene	99-87-6	0.2	0.052	ppbV	70-130			25	25			
n-Propylbenzene	103-65-1	0.2	0.0419	ppbV	70-130			25	25			
1,3-Dichloropropane	142-28-9	0.2	0.106	ppbV	70-130			25	25			
Methanol	67-56-1	5	1.84	ppbV	70-130			25	25			
Acetaldehyde	75-07-0	2.5	0.444	ppbV	70-130			25	25			
Butane	106-97-8	0.2	0.0646	ppbV	70-130			25	25			
Nonane (C9)	111-84-2	0.2	0.0463	ppbV	70-130			25	25			
Decane (C10)	124-18-5	0.2	0.0404	ppbV	70-130			25	25			
Undecane	1120-21-4	0.2	0.0427	ppbV	70-130			25	25			
Indane	496-11-7	0.2	0.0507	ppbV	70-130			25	25			
Indene	95-13-6	0.2	0.0433	ppbV	70-130			25	25			
1-Methylnaphthalene	90-12-0	1	0.466	ppbV	70-130			25	25			
Dodecane (C12)	112-40-3	0.2	0.0658	ppbV	70-130			25	25			
Butyl Acetate	123-86-4	0.5	0.126	ppbV	70-130			25	25			
tert-Butyl Alcohol	75-65-0	0.5	0.0466	ppbV	70-130			25	25			
2-Methylnaphthalene	91-57-6	1	0.393	ppbV	70-130			25	25			
1,2-Dichloroethane-d4	17060-07-0										70-130	
Toluene-d8	2037-26-5										70-130	

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Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

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Please Note that the RL information provided in this table is calculated using a 100% Solids factor. (Sol/Solids only)
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Volatiles Sample Data

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-01
 Client ID : 134_LSV-21
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R1626866
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 14:30
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 22:13
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	0.433	0.200	--	2.14	0.989	--	
74-87-3	Chloromethane	0.321	0.200	--	0.663	0.413	--	
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	0.219	0.200	--	1.23	1.12	--	
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	0.314	0.200	--	1.24	0.793	--	
67-66-3	Chloroform	0.535	0.200	--	2.61	0.977	--	
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-01
 Client ID : 134_LSV-21
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R1626866
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 14:30
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 22:13
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
127-18-4	Tetrachloroethene	1.08	0.200	--	7.32	1.36	--	
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-02
 Client ID : 135_SVDUP01_100121
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R1626867
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 14:30
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 22:52
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	0.486	0.200	--	2.40	0.989	--	
74-87-3	Chloromethane	0.350	0.200	--	0.723	0.413	--	
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	0.233	0.200	--	1.31	1.12	--	
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	0.285	0.200	--	1.13	0.793	--	
67-66-3	Chloroform	0.498	0.200	--	2.43	0.977	--	
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	0.647	0.200	--	3.48	1.07	--	
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-02
 Client ID : 135_SVDUP01_100121
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R1626867
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 14:30
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 22:52
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
127-18-4	Tetrachloroethene	1.22	0.200	--	8.27	1.36	--	
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-03
 Client ID : 136_LSV-22
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R1626868
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 12:35
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 23:31
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	0.406	0.200	--	2.01	0.989	--	
74-87-3	Chloromethane	ND	0.200	--	ND	0.413	--	U
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	ND	0.200	--	ND	1.12	--	U
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
67-66-3	Chloroform	1.42	0.200	--	6.93	0.977	--	
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U



Results Summary Form 1 Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-03
 Client ID : 136_LSV-22
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R1626868
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 12:35
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 23:31
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
127-18-4	Tetrachloroethene	0.755	0.200	--	5.12	1.36	--	
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U

Results Summary Form 1 Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-04
 Client ID : 137_AMBIENT-1
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R1626858
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 14:45
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 17:01
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	0.464	0.200	--	2.29	0.989	--	
74-87-3	Chloromethane	0.389	0.200	--	0.803	0.413	--	
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	0.236	0.200	--	1.33	1.12	--	
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
67-66-3	Chloroform	ND	0.200	--	ND	0.977	--	U
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153634-04
 Client ID : 137_AMBIENT-1
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R1626858
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 14:45
 Date Received : 10/01/21
 Date Analyzed : 10/06/21 17:01
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
127-18-4	Tetrachloroethene	ND	0.200	--	ND	1.36	--	U
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : WG1555287-4
 Client ID : WG1555287-4BLANK
 Sample Location :
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R1626856
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : NA
 Date Received : NA
 Date Analyzed : 10/06/21 14:52
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--	U
74-87-3	Chloromethane	ND	0.200	--	ND	0.413	--	U
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	ND	0.200	--	ND	1.12	--	U
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
67-66-3	Chloroform	ND	0.200	--	ND	0.977	--	U
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : WG1555287-4
 Client ID : WG1555287-4BLANK
 Sample Location :
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R1626856
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : NA
 Date Received : NA
 Date Analyzed : 10/06/21 14:52
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
127-18-4	Tetrachloroethene	ND	0.200	--	ND	1.36	--	U
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : WG1555287-5
 Client ID : 136_LSV-22DUP
 Sample Location :
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R1626869
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 12:35
 Date Received : 10/01/21
 Date Analyzed : 10/07/21 00:09
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	0.407	0.200	--	2.01	0.989	--	
74-87-3	Chloromethane	ND	0.200	--	ND	0.413	--	U
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	ND	0.200	--	ND	1.12	--	U
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
67-66-3	Chloroform	1.44	0.200	--	7.03	0.977	--	
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U
127-18-4	Tetrachloroethene	0.769	0.200	--	5.21	1.36	--	



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : WG1555287-5
 Client ID : 136_LSV-22DUP
 Sample Location :
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R1626869
 Sample Amount : 250 ml

Lab Number : L2153634
 Project Number : 100849501
 Date Collected : 10/01/21 12:35
 Date Received : 10/01/21
 Date Analyzed : 10/07/21 00:09
 Dilution Factor : 1
 Analyst : TS
 Instrument ID : AIRLAB16
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626858.D
 Acq On : 6 Oct 2021 5:01 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-04,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:26:03 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.383	49	350623	10.000	ppbV	-0.03
Standard Area = 357950			Recovery =		97.95%	
43) 1,4-difluorobenzene	11.653	114	865880	10.000	ppbV	-0.03
Standard Area = 923831			Recovery =		93.73%	
67) chlorobenzene-D5	16.383	54	138189	10.000	ppbV	-0.02
Standard Area = 146691			Recovery =		94.20%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.874	85	15889	0.464	ppbV	94
6) chloromethane	4.048	50	5990	0.389	ppbV	92
9) vinyl chloride	0.000		0	N.D.		
14) chloroethane	0.000		0	N.D.		
21) trichlorofluoromethane	5.910	101	6241	0.236	ppbV	94
26) 1,1-dichloroethene	0.000		0	N.D.		
28) methylene chloride	6.844	49	3383	0.156	ppbV	100
31) Freon 113	7.174	101	2449	0.069	ppbV	96
32) trans-1,2-dichloroethene	0.000		0	N.D.		
33) 1,1-dichloroethane	0.000		0	N.D.		
37) cis-1,2-dichloroethene	0.000		0	N.D.		
39) chloroform	9.542		0	N.D.		
41) 2,2-dichloropropane	0.000		0	N.D.		
42) 1,2-dichloroethane	0.000		0	N.D.		
48) 1,1,1-trichloroethane	0.000		0	N.D.		
49) 1,1-dichloropropene	0.000		0	N.D.		
52) carbon tetrachloride	11.387	117	1793	0.072	ppbV	97
56) 1,2-dichloropropane	0.000		0	N.D.		
57) bromodichloromethane	0.000		0	N.D.		
59) trichloroethene	12.453		0	N.D.		
63) cis-1,3-dichloropropene	0.000		0	N.D.		
65) trans-1,3-dichloropropene	0.000		0	N.D.		
66) 1,1,2-trichloroethane	0.000		0	N.D.		
71) 1,3-dichloropropane	0.000		0	N.D.		
74) dibromochloromethane	0.000		0	N.D.		
78) tetrachloroethene	15.792		0	N.D.		
79) 1,1,1,2-tetrachloroethane	0.000		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626858.D
 Acq On : 6 Oct 2021 5:01 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-04,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:26:03 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	16.433		0		N.D.	
86) 1,1,2,2-tetrachloroethane	0.000		0		N.D.	
88) 1,2,3-trichloropropane	0.000		0		N.D.	
93) 2-chlorotoluene	0.000		0		N.D.	
95) 4-chlorotoluene	0.000		0		N.D.	
102) 1,3-dichlorobenzene	0.000		0		N.D.	
103) 1,4-dichlorobenzene	0.000		0		N.D.	
107) 1,2-dichlorobenzene	0.000		0		N.D.	
111) 1,2-dibromo-3-chloropr...	0.000		0		N.D.	
115) 1,2,4-trichlorobenzene	0.000		0		N.D.	
117) 1,2,3-trichlorobenzene	0.000		0		N.D.	
119) hexachlorobutadiene	0.000		0		N.D.	

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

Sub List : Default-LCS-AP2 - All compounds listed6T\r1626853.D

Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\

Data File : r1626858.D

Acq On : 6 Oct 2021 5:01 PM

Operator : AIRLAB16:TS

Sample : L2153634-04,3,250,250

Misc : WG1555287,ICAL18260

ALS Vial : 0 Sample Multiplier: 1

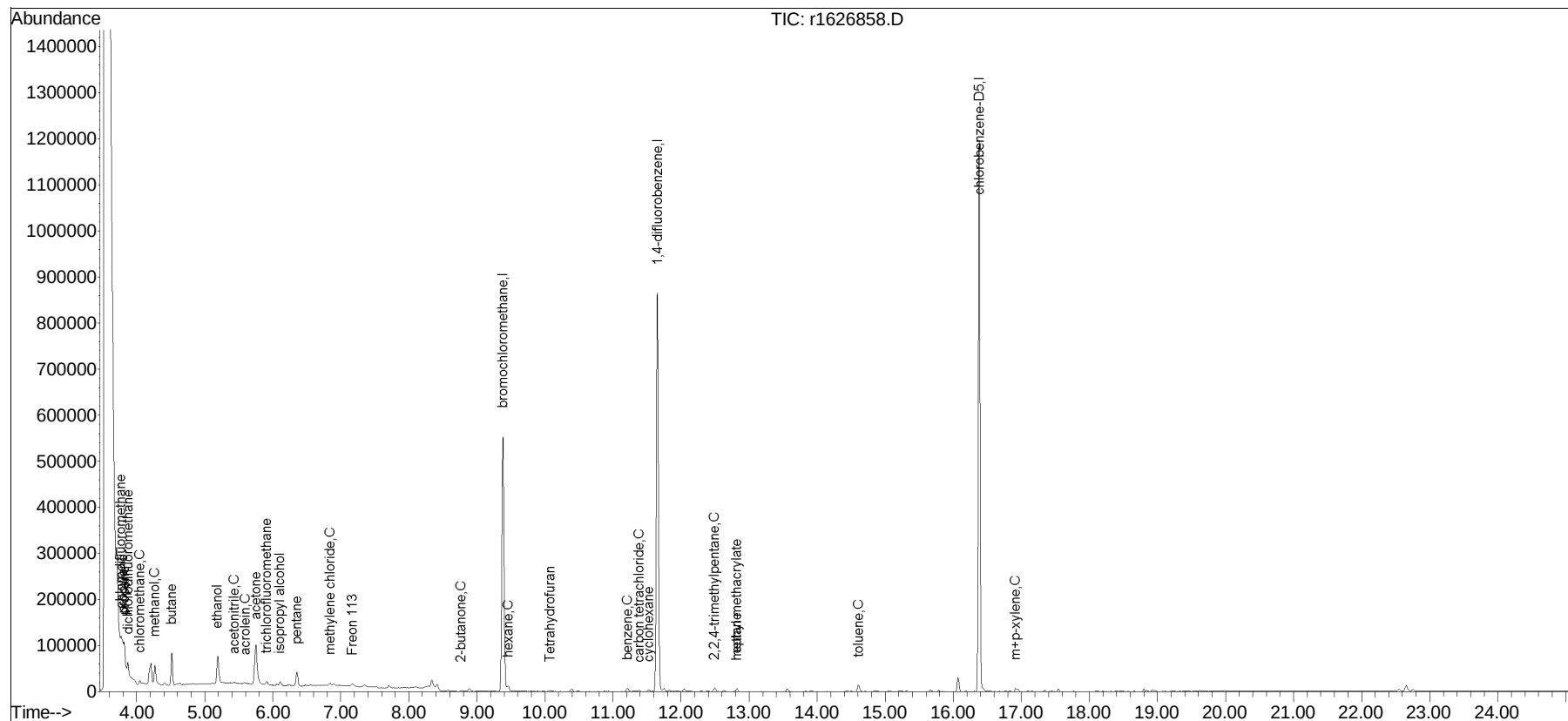
Quant Time: Oct 07 16:26:03 2021

Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M

Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

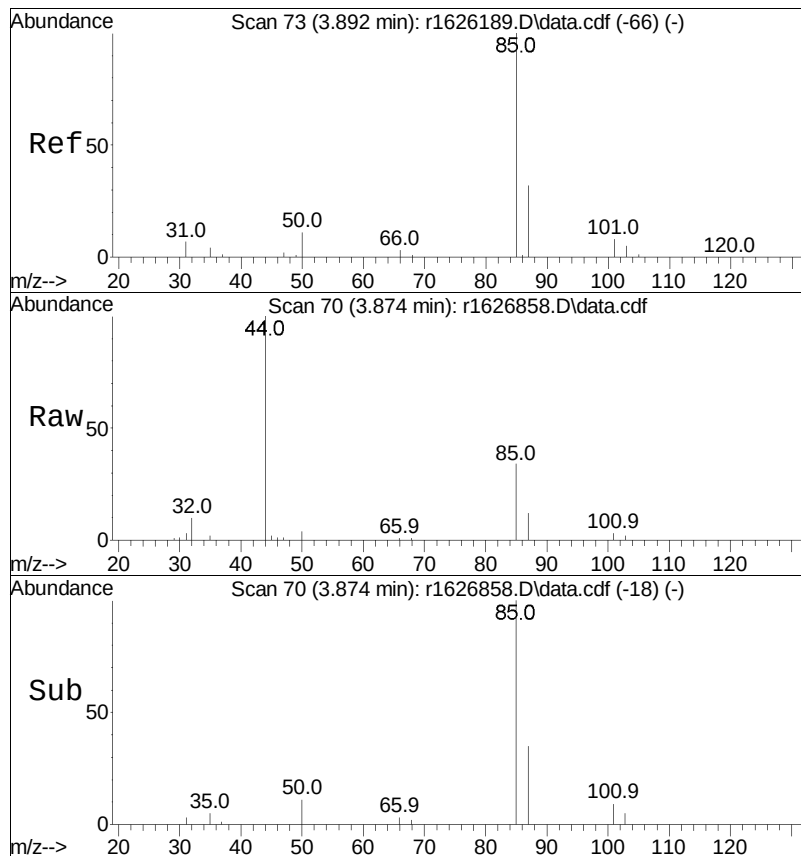
QLast Update : Mon Aug 30 06:00:53 2021

Response via : Initial Calibration



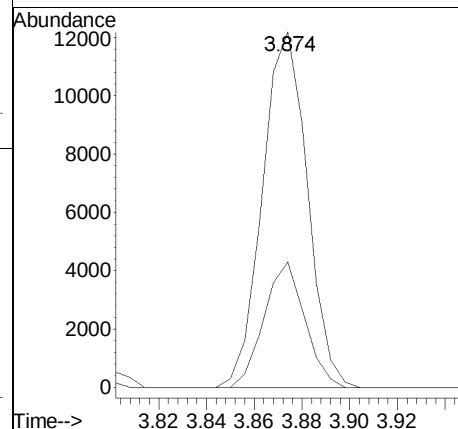
TFS16_210829.M Thu Oct 07 16:29:20 2021

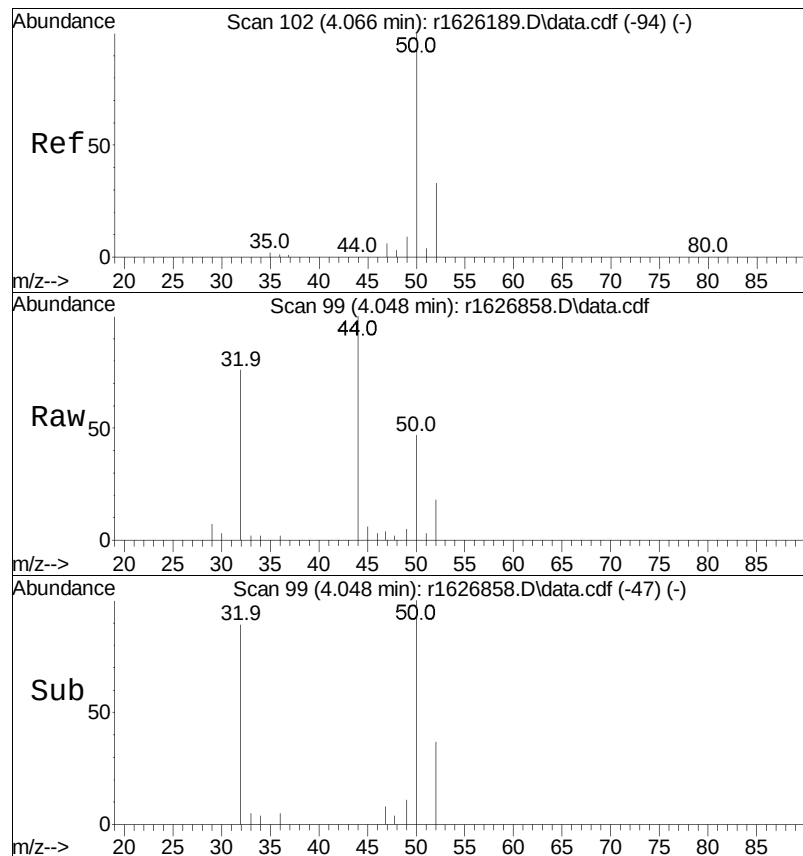
Page: 4



#5
 dichlorodifluoromethane
 Concen: 0.46 ppbV
 RT: 3.874 min Scan# 70
 Delta R.T. -0.018 min
 Lab File: r1626858.D
 Acq: 6 Oct 2021 5:01 PM

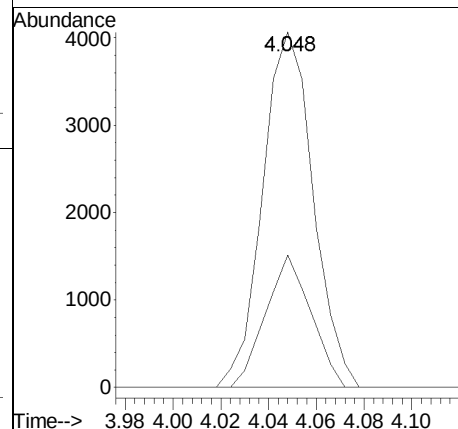
Tgt Ion:	85	Resp:	15889
Ion Ratio	Lower	Upper	
85	100		
87	35.3	25.5	38.3

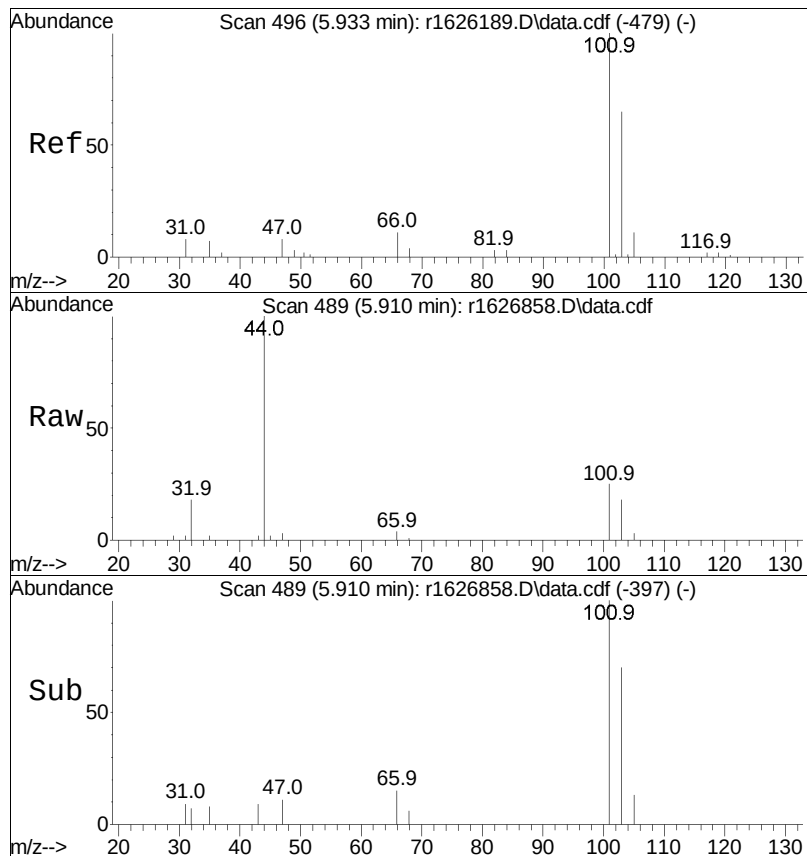




#6
 chloromethane
 Concen: 0.39 ppbV
 RT: 4.048 min Scan# 99
 Delta R.T. -0.018 min
 Lab File: r1626858.D
 Acq: 6 Oct 2021 5:01 PM

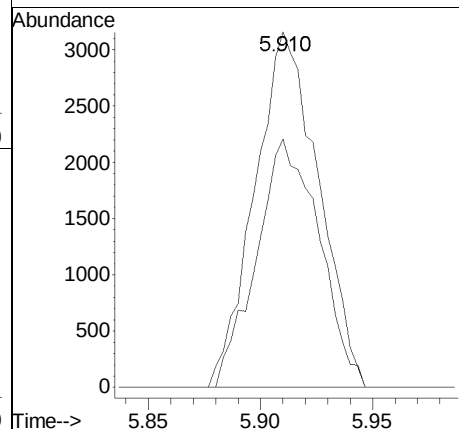
Tgt Ion	Ratio	Lower	Upper
50	100		
52	37.2	26.1	39.1

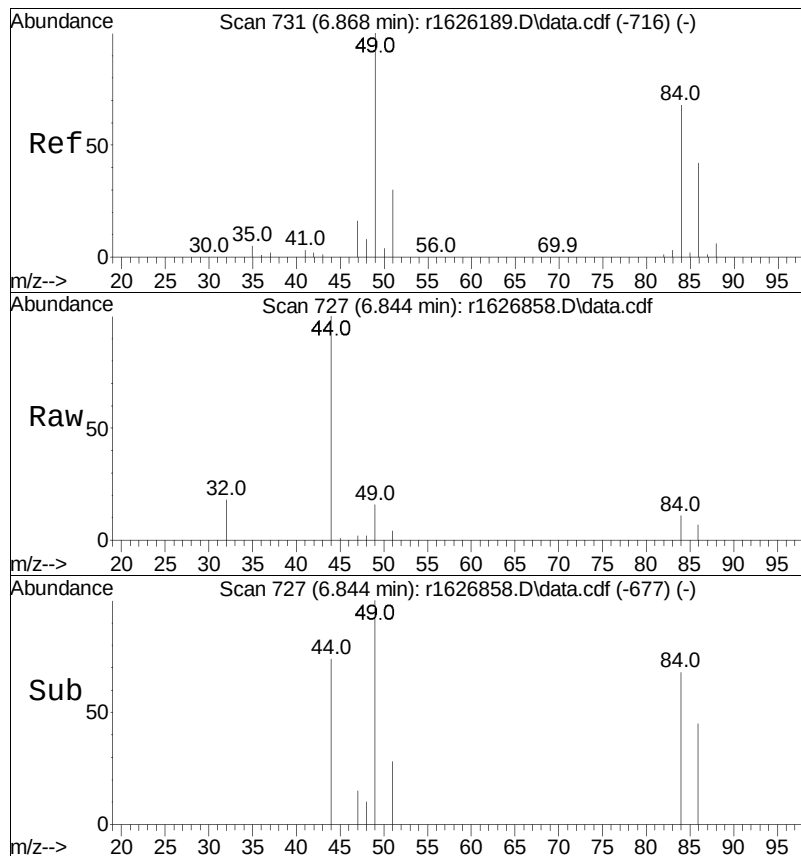




#21
trichlorofluoromethane
Concen: 0.24 ppbV
RT: 5.910 min Scan# 489
Delta R.T. -0.023 min
Lab File: r1626858.D
Acq: 6 Oct 2021 5:01 PM

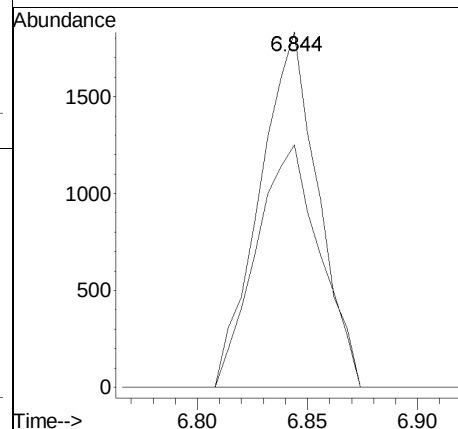
Tgt	Ion	Ratio	Lower	Upper
101	101	100		
103	69.9	52.0	52.0	78.0

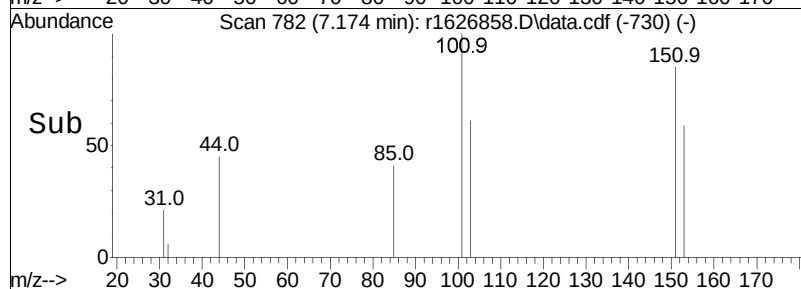
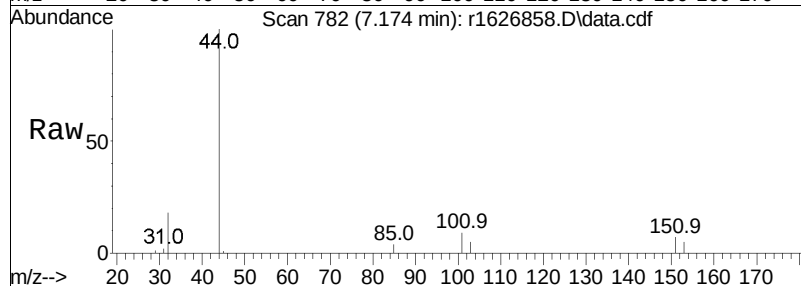
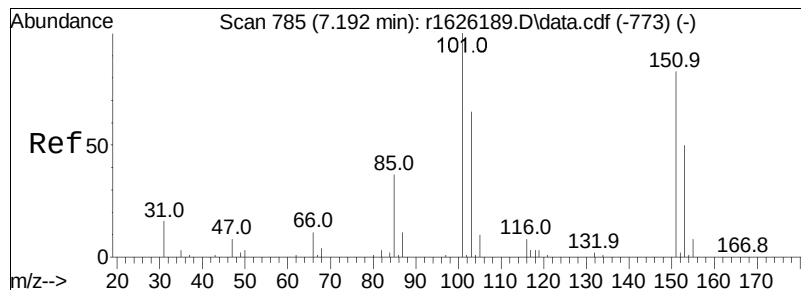




#28
 methylene chloride
 Concen: 0.16 ppbV
 RT: 6.844 min Scan# 727
 Delta R.T. -0.024 min
 Lab File: r1626858.D
 Acq: 6 Oct 2021 5:01 PM

Tgt	Ion	Resp	Lower	Upper
49	100			
84	68.2	54.6	81.8	





#31

Freon 113

Concen: 0.07 ppbV

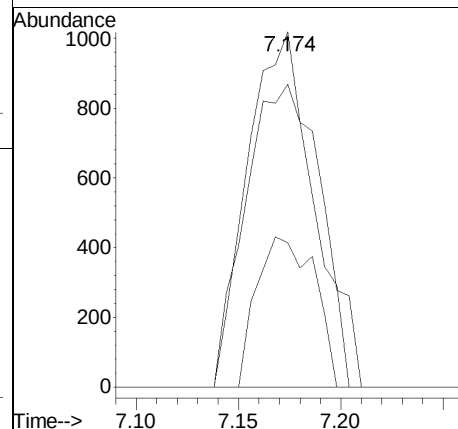
RT: 7.174 min Scan# 782

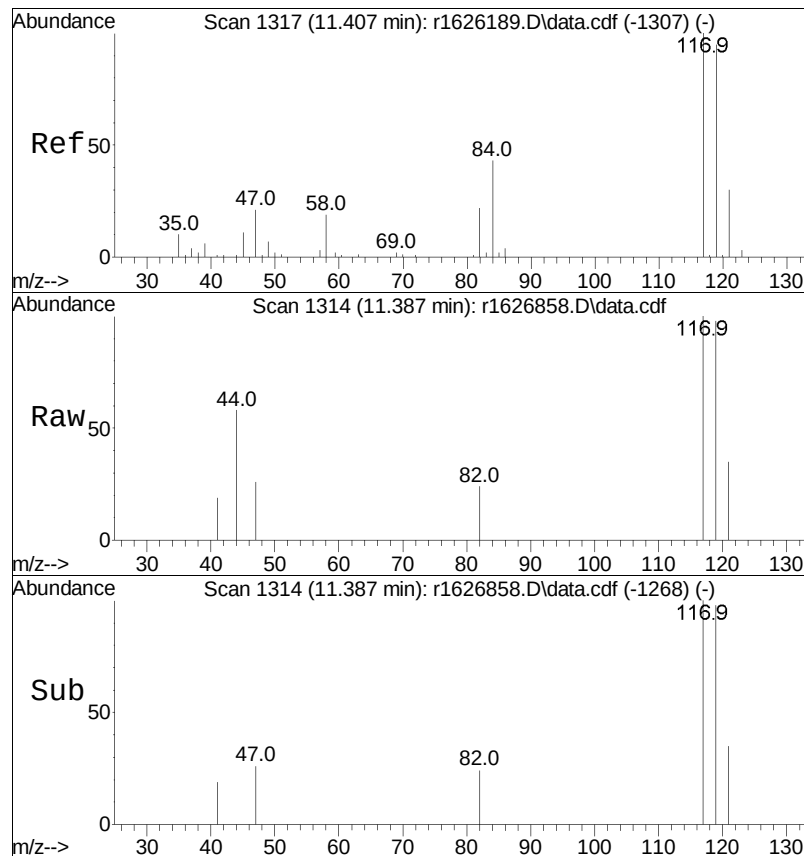
Delta R.T. -0.018 min

Lab File: r1626858.D

Acq: 6 Oct 2021 5:01 PM

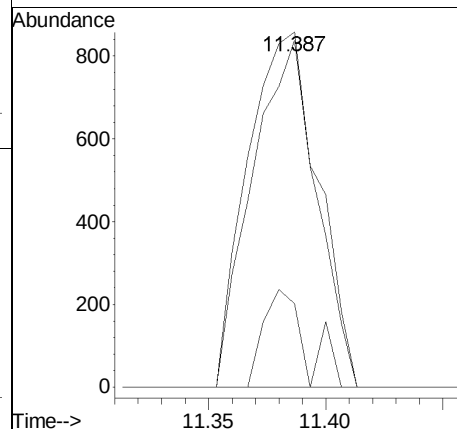
Tgt Ion:	101	Resp:	2449
Ion Ratio	Lower	Upper	
101	100		
85	40.7	29.7	44.5
151	85.3	66.2	99.4





#52
 carbon tetrachloride
 Concen: 0.07 ppbV
 RT: 11.387 min Scan# 1314
 Delta R.T. -0.020 min
 Lab File: r1626858.D
 Acq: 6 Oct 2021 5:01 PM

Tgt Ion:	117	Resp:	1793
Ion Ratio	Lower	Upper	
117	100		
119	97.7	76.0	114.0
82	23.5	17.9	26.9



Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626866.D
 Acq On : 6 Oct 2021 10:13 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-01,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:27:08 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) bromochloromethane	9.383	49	337244	10.000	ppbV	-0.03
Standard Area = 357950			Recovery =		94.22%	
43) 1,4-difluorobenzene	11.653	114	878732	10.000	ppbV	-0.03
Standard Area = 923831			Recovery =		95.12%	
67) chlorobenzene-D5	16.375	54	146115	10.000	ppbV	-0.02
Standard Area = 146691			Recovery =		99.61%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.862	85	14278	0.433	ppbV	100
6) chloromethane	4.036	50	4753	0.321	ppbV	99
9) vinyl chloride	0.000		0	N.D.		
14) chloroethane	0.000		0	N.D.		
21) trichlorofluoromethane	5.907	101	5577	0.219	ppbV	99
26) 1,1-dichloroethene	6.622		0	N.D.		
28) methylene chloride	6.844	49	6645	0.319	ppbV	99
31) Freon 113	7.162	101	2298	0.067	ppbV	90
32) trans-1,2-dichloroethene	0.000		0	N.D.		
33) 1,1-dichloroethane	0.000		0	N.D.	d	
37) cis-1,2-dichloroethene	9.192	61	6874	0.314	ppbV	94
39) chloroform	9.550	83	16540	0.535	ppbV	99
41) 2,2-dichloropropane	9.600		0	N.D.		
42) 1,2-dichloroethane	0.000		0	N.D.		
48) 1,1,1-trichloroethane	0.000		0	N.D.		
49) 1,1-dichloropropene	11.040		0	N.D.		
52) carbon tetrachloride	11.373	117	1622	0.064	ppbV #	83
56) 1,2-dichloropropane	12.167		0	N.D.		
57) bromodichloromethane	12.400	83	2724	0.083	ppbV #	94
59) trichloroethene	12.447	130	3376	0.129	ppbV	97
63) cis-1,3-dichloropropene	13.433		0	N.D.		
65) trans-1,3-dichloropropene	14.183		0	N.D.		
66) 1,1,2-trichloroethane	14.433		0	N.D.		
71) 1,3-dichloropropane	14.608		0	N.D.		
74) dibromochloromethane	15.058		0	N.D.		
78) tetrachloroethene	15.775	166	35496	1.082	ppbV	99
79) 1,1,1,2-tetrachloroethane	0.000		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626866.D
 Acq On : 6 Oct 2021 10:13 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-01,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:27:08 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	16.433		0		N.D.	
86) 1,1,2,2-tetrachloroethane	0.000		0		N.D.	d
88) 1,2,3-trichloropropane	17.475		0		N.D.	
93) 2-chlorotoluene	0.000		0		N.D.	
95) 4-chlorotoluene	18.483		0		N.D.	
102) 1,3-dichlorobenzene	18.975		0		N.D.	
103) 1,4-dichlorobenzene	19.042		0		N.D.	
107) 1,2-dichlorobenzene	0.000		0		N.D.	
111) 1,2-dibromo-3-chloropr...	19.725		0		N.D.	
115) 1,2,4-trichlorobenzene	0.000		0		N.D.	
117) 1,2,3-trichlorobenzene	0.000		0		N.D.	
119) hexachlorobutadiene	0.000		0		N.D.	

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

Sub List : Default-LCS-AP2 - All compounds listed6T\r1626853.D

Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\

Data File : r1626866.D

Acq On : 6 Oct 2021 10:13 PM

Operator : AIRLAB16:TS

Sample : L2153634-01,3,250,250

Misc : WG1555287,ICAL18260

ALS Vial : 0 Sample Multiplier: 1

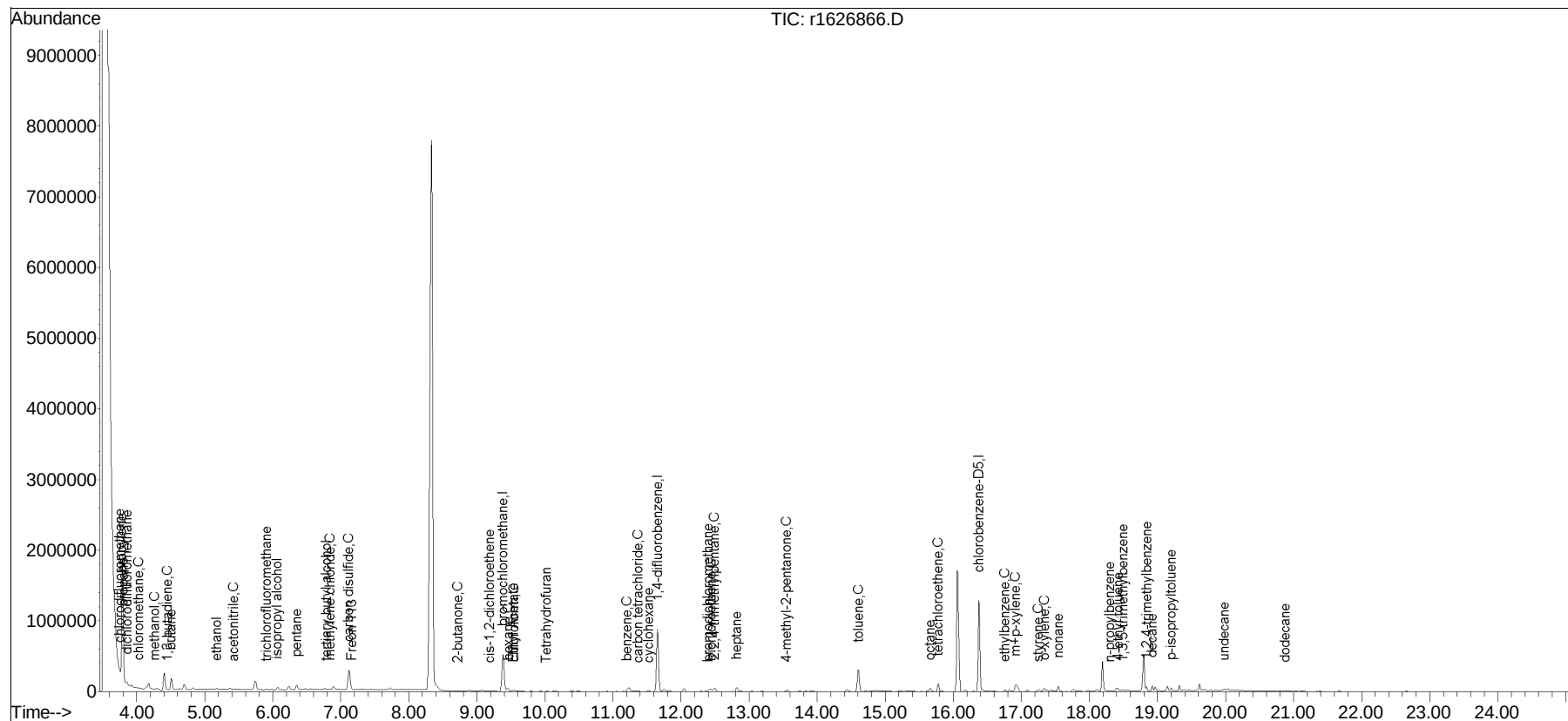
Quant Time: Oct 07 16:27:08 2021

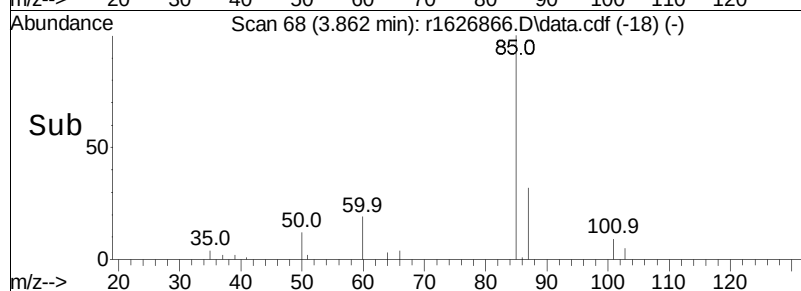
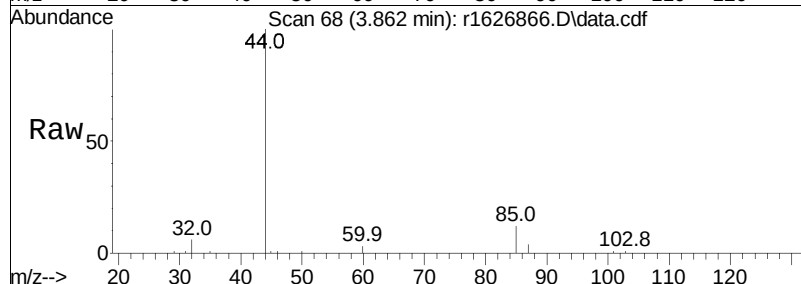
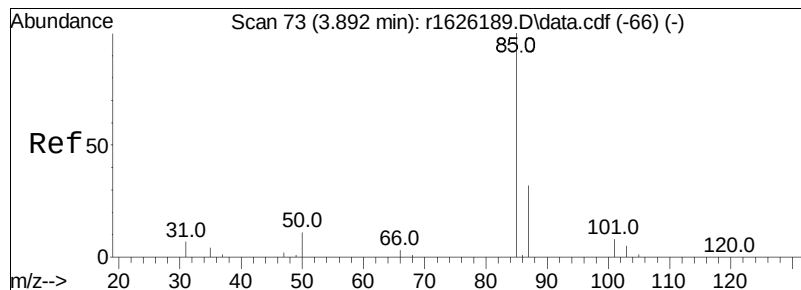
Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M

Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

QLast Update : Mon Aug 30 06:00:53 2021

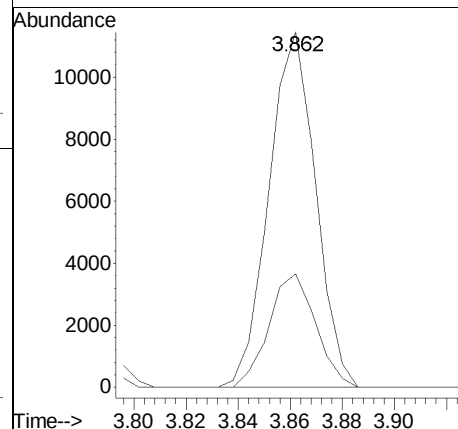
Response via : Initial Calibration

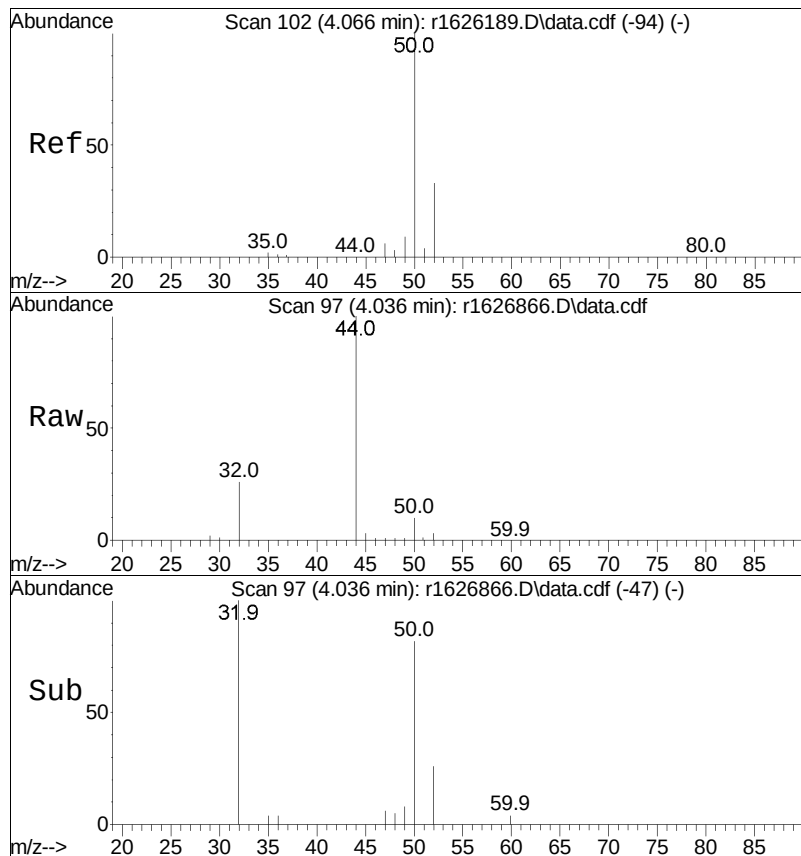




#5
dichlorodifluoromethane
Concen: 0.43 ppbV
RT: 3.862 min Scan# 68
Delta R.T. -0.030 min
Lab File: r1626866.D
Acq: 6 Oct 2021 10:13 PM

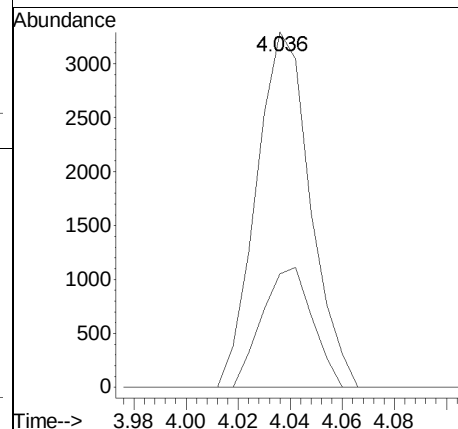
Tgt Ion	Ratio	Lower	Upper
85	100		
87	32.0	25.5	38.3

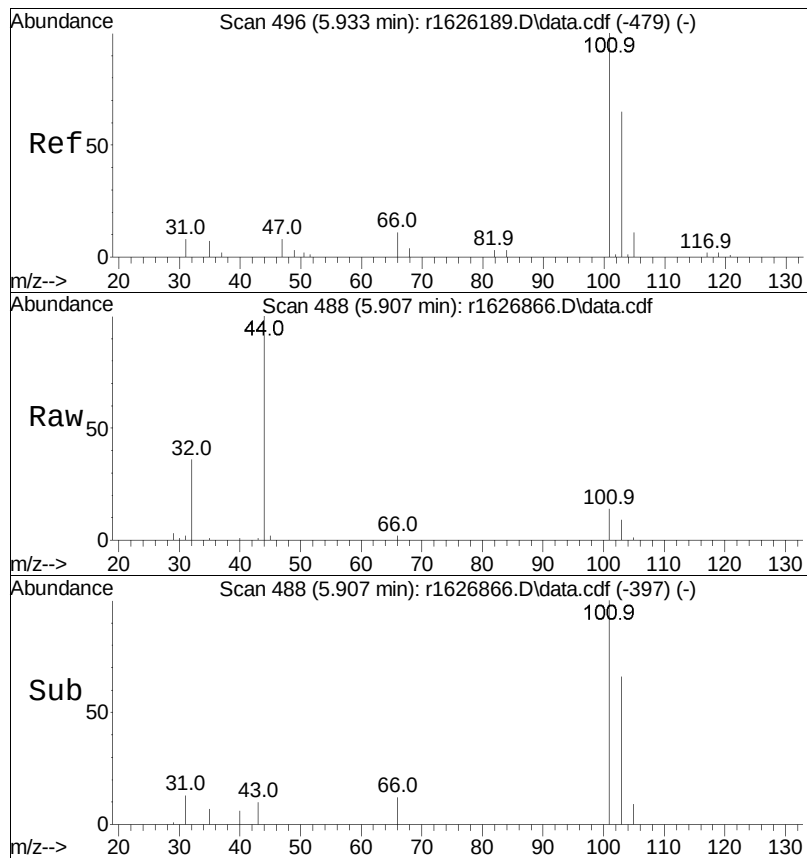




#6
 chloromethane
 Concen: 0.32 ppbV
 RT: 4.036 min Scan# 97
 Delta R.T. -0.030 min
 Lab File: r1626866.D
 Acq: 6 Oct 2021 10:13 PM

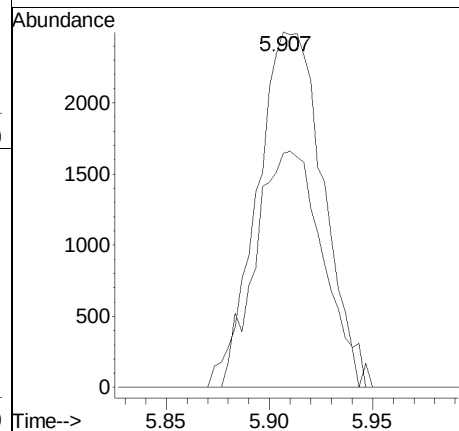
Tgt	Ion	Resp	Lower	Upper
50	100	4753		
52	32.0	26.1	39.1	

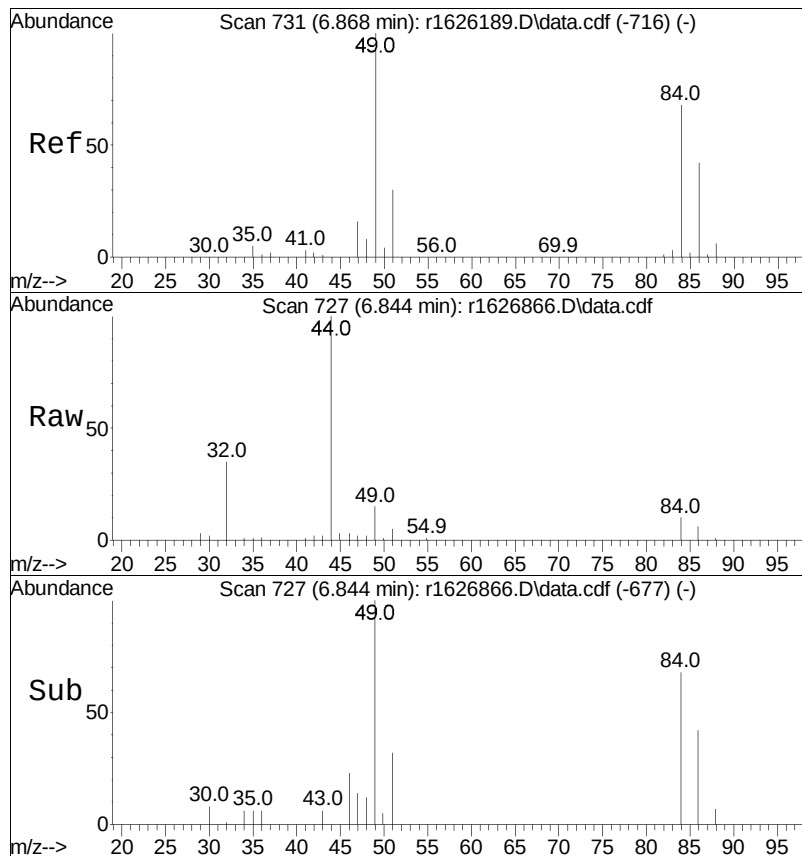




#21
trichlorofluoromethane
Concen: 0.22 ppbV
RT: 5.907 min Scan# 488
Delta R.T. -0.027 min
Lab File: r1626866.D
Acq: 6 Oct 2021 10:13 PM

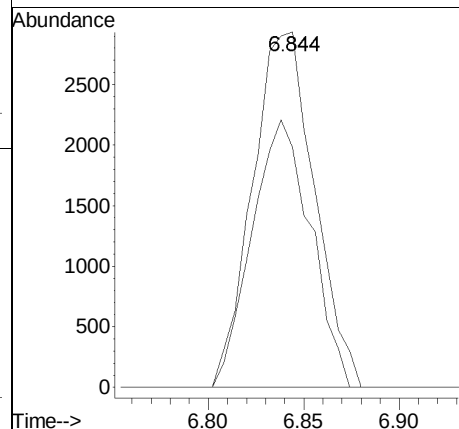
Tgt	Ion	Ratio	Resp	Lower	Upper
101	100		5577		
103	65.9	52.0		78.0	

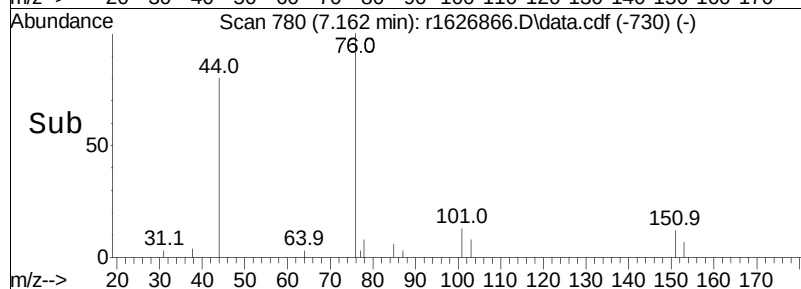
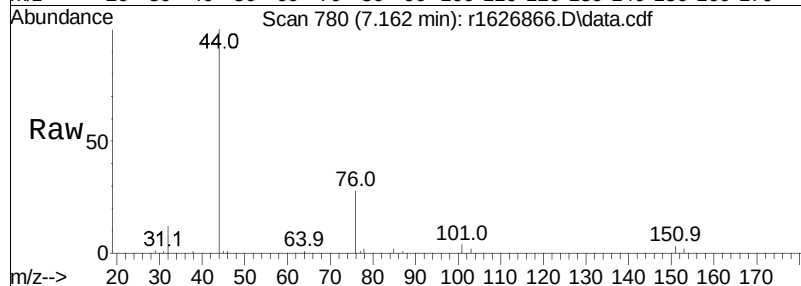
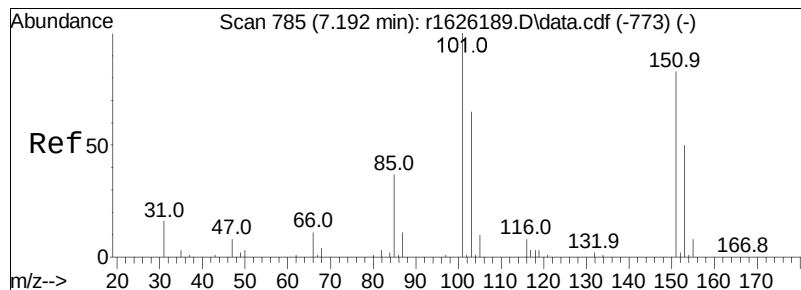




#28
 methylene chloride
 Concen: 0.32 ppbV
 RT: 6.844 min Scan# 727
 Delta R.T. -0.024 min
 Lab File: r1626866.D
 Acq: 6 Oct 2021 10:13 PM

Tgt Ion:	49	Resp:	6645
Ion Ratio	Lower	Upper	
49	100		
84	67.6	54.6	81.8





#31

Freon 113

Concen: 0.07 ppbV

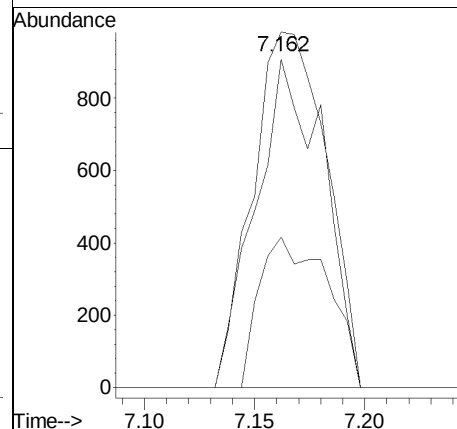
RT: 7.162 min Scan# 780

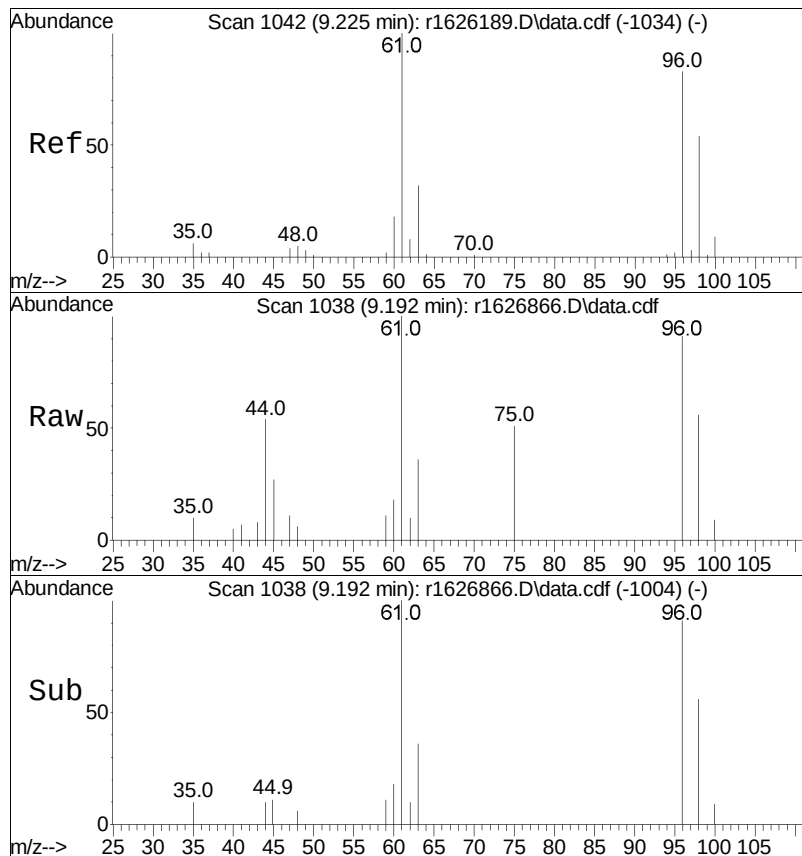
Delta R.T. -0.030 min

Lab File: r1626866.D

Acq: 6 Oct 2021 10:13 PM

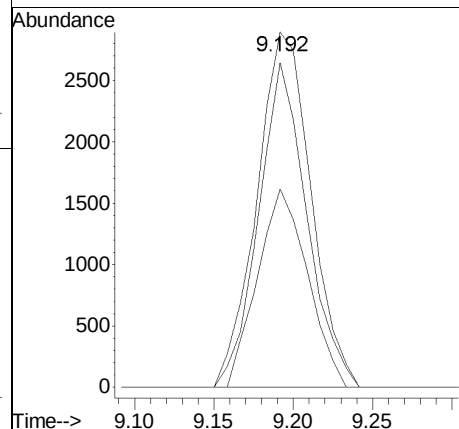
Tgt Ion:	101	Resp:	2298
Ion Ratio	Lower	Upper	
101	100		
85	42.3	29.7	44.5
151	92.3	66.2	99.4

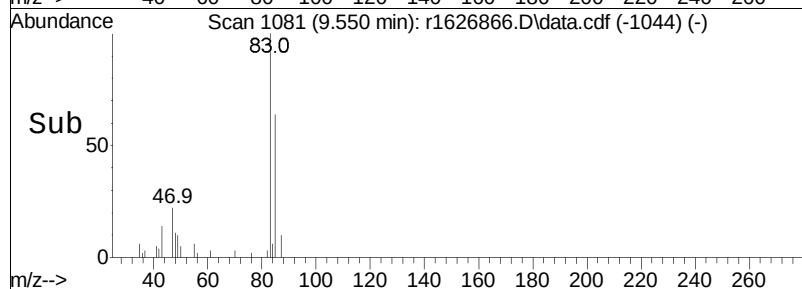
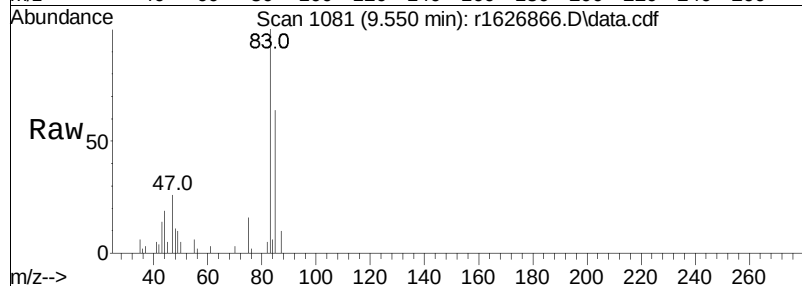
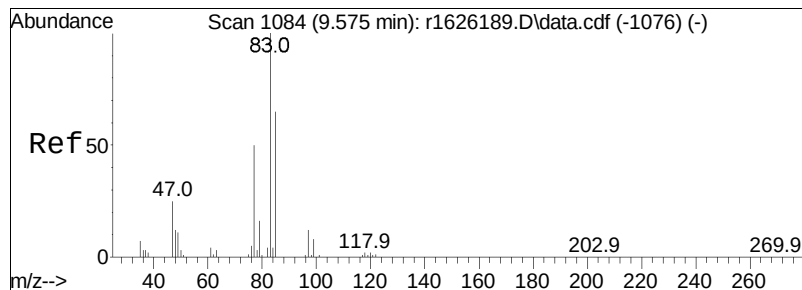




#37
 cis-1,2-dichloroethene
 Concen: 0.31 ppbV
 RT: 9.192 min Scan# 1038
 Delta R.T. -0.033 min
 Lab File: r1626866.D
 Acq: 6 Oct 2021 10:13 PM

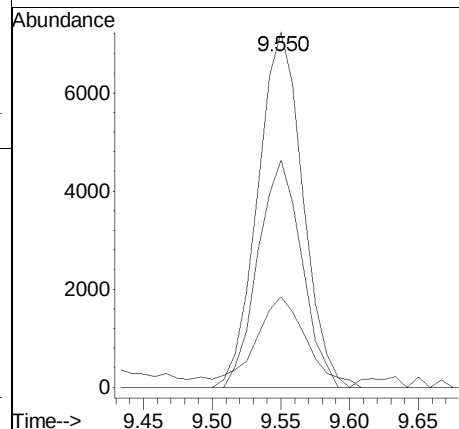
Tgt Ion:	61	Resp:	6874
Ion Ratio	Lower	Upper	
61	100		
96	91.4	66.6	100.0
98	55.8	43.3	64.9

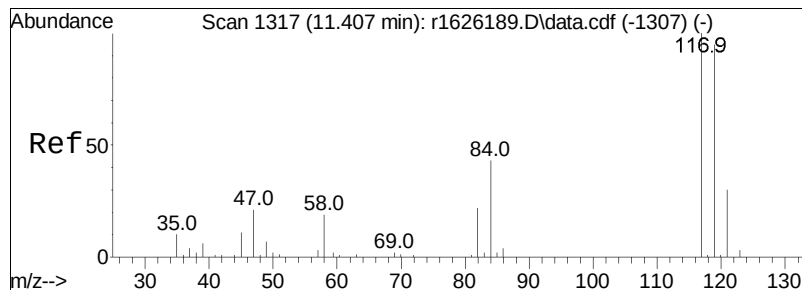




#39
chloroform
Concen: 0.53 ppbV
RT: 9.550 min Scan# 1081
Delta R.T. -0.025 min
Lab File: r1626866.D
Acq: 6 Oct 2021 10:13 PM

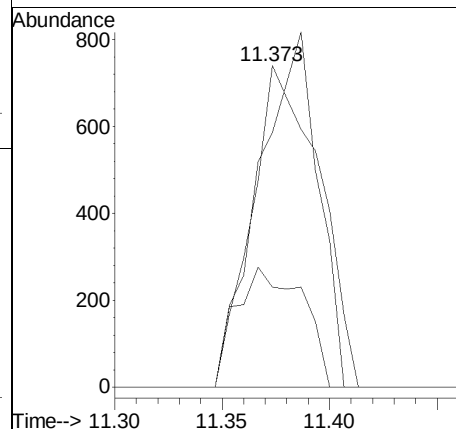
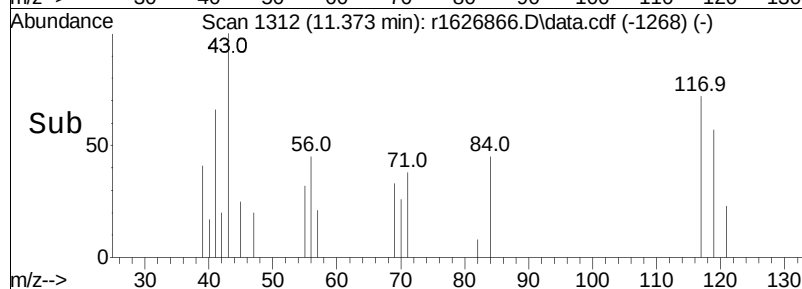
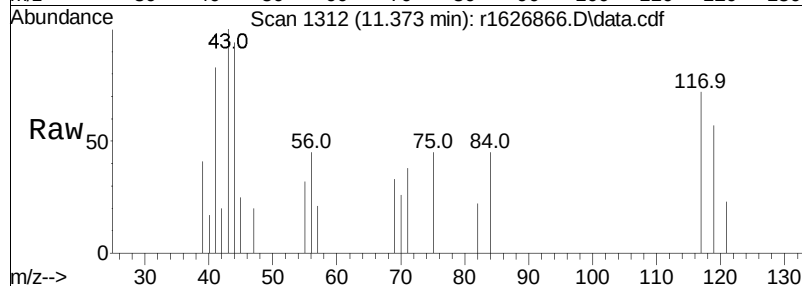
Tgt Ion	Ratio	Lower	Upper
83	100		
85	64.0	52.3	78.5
47	25.6	20.6	31.0

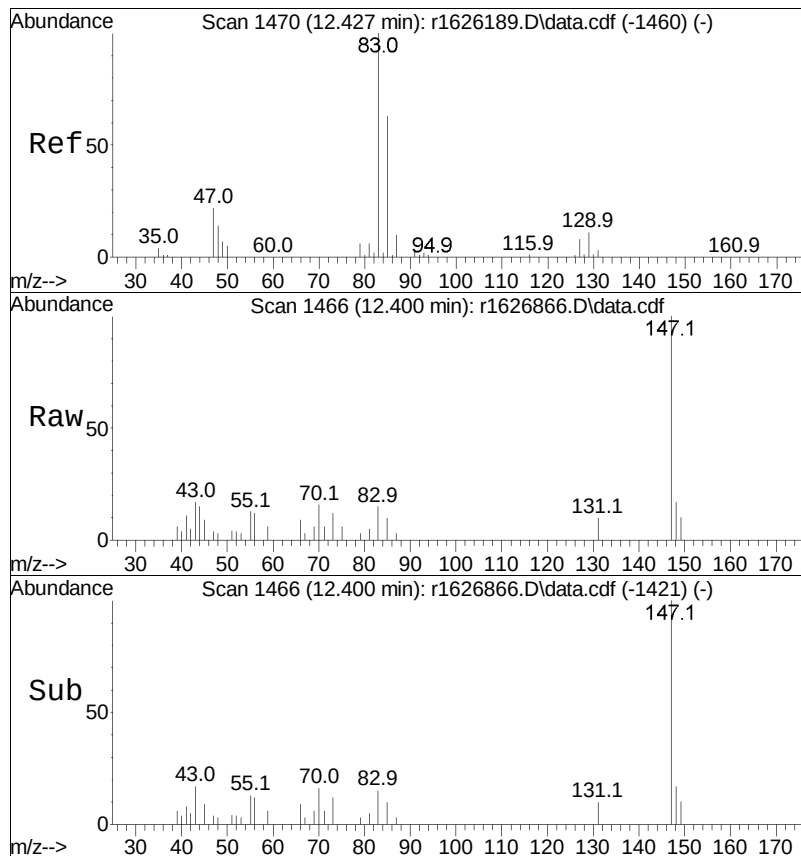




#52
 carbon tetrachloride
 Concen: 0.06 ppbV
 RT: 11.373 min Scan# 1312
 Delta R.T. -0.033 min
 Lab File: r1626866.D
 Acq: 6 Oct 2021 10:13 PM

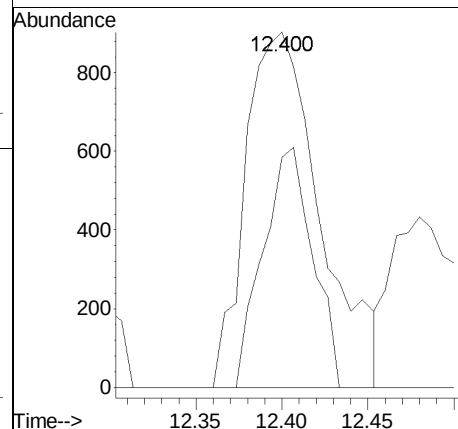
Tgt Ion	Ratio	Lower	Upper
117	100		
119	79.2	76.0	114.0
82	31.1	17.9	26.9

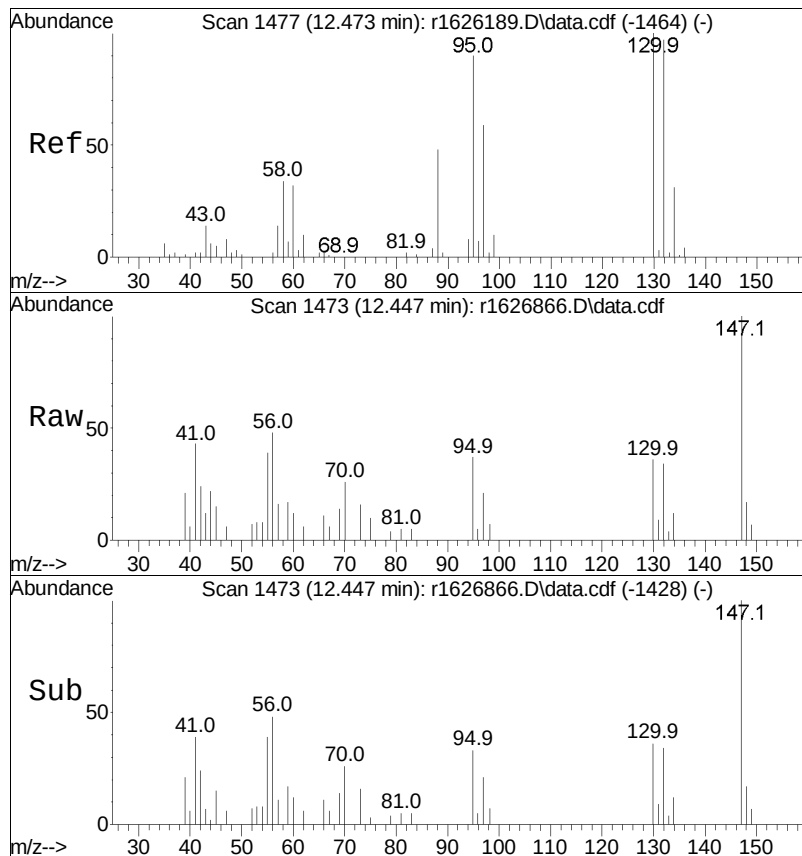




#57
 bromodichloromethane
 Concen: 0.08 ppbV
 RT: 12.400 min Scan# 1466
 Delta R.T. -0.027 min
 Lab File: r1626866.D
 Acq: 6 Oct 2021 10:13 PM

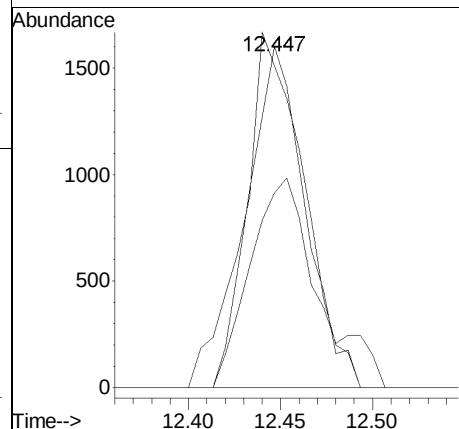
Tgt Ion: 83	Resp: 2724
Ion Ratio	Lower Upper
83 100	
85 64.8	50.5 75.7
129 0.0	8.8 13.2#

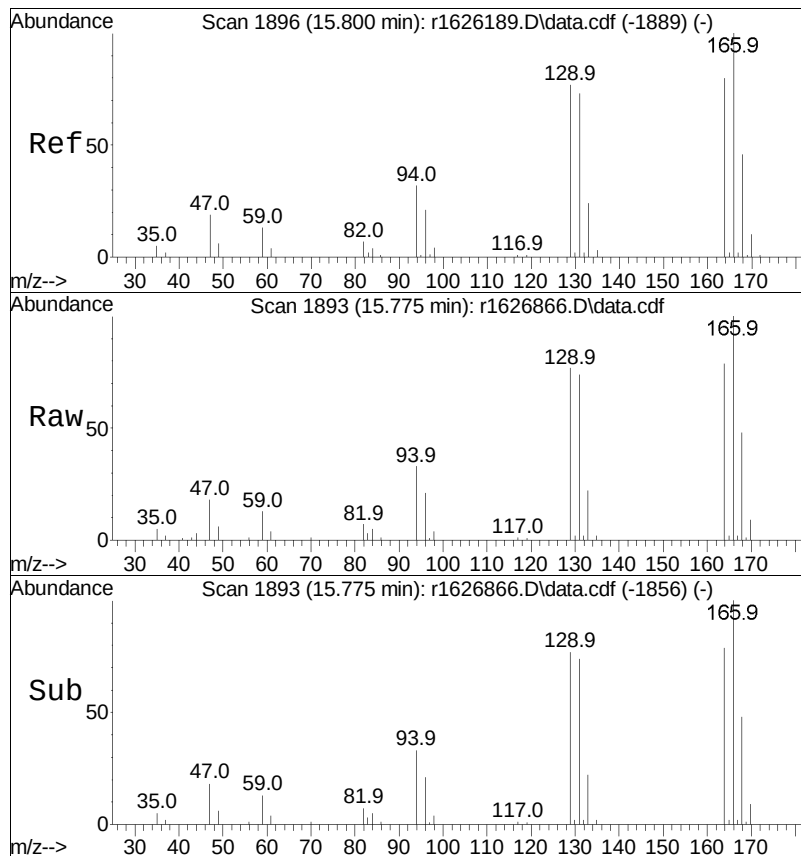




#59
trichloroethene
Concen: 0.13 ppbV
RT: 12.447 min Scan# 1473
Delta R.T. -0.027 min
Lab File: r1626866.D
Acq: 6 Oct 2021 10:13 PM

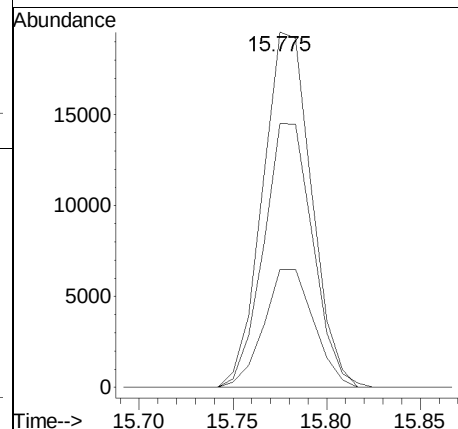
Tgt	Ion	Ratio	Resp	Lower	Upper
130	100		3376		
132	94.3	77.5		116.3	
97	57.1	47.3		70.9	





#78
 tetrachloroethene
 Concen: 1.08 ppbV
 RT: 15.775 min Scan# 1893
 Delta R.T. -0.025 min
 Lab File: r1626866.D
 Acq: 6 Oct 2021 10:13 PM

Tgt	Ion:166	Resp:	35496
Ion	Ratio	Lower	Upper
166	100		
131	74.3	58.7	88.1
94	33.2	25.9	38.9



Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626867.D
 Acq On : 6 Oct 2021 10:52 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-02,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:27:54 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.392	49	342699	10.000	ppbV	-0.02
Standard Area = 357950			Recovery =	95.74%		
43) 1,4-difluorobenzene	11.653	114	895534	10.000	ppbV	-0.03
Standard Area = 923831			Recovery =	96.94%		
67) chlorobenzene-D5	16.375	54	151291	10.000	ppbV	-0.02
Standard Area = 146691			Recovery =	103.14%		

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.862	85	16275	0.486	ppbV	97
6) chloromethane	4.036	50	5268	0.350	ppbV	96
9) vinyl chloride	0.000		0	N.D.		
14) chloroethane	4.972		0	N.D.		
21) trichlorofluoromethane	5.917	101	6035	0.233	ppbV	97
26) 1,1-dichloroethene	6.616		0	N.D.		
28) methylene chloride	6.862	49	3984	0.188	ppbV	92
31) Freon 113	7.174	101	2384	0.069	ppbV #	85
32) trans-1,2-dichloroethene	0.000		0	N.D.		
33) 1,1-dichloroethane	0.000		0	N.D.	d	
37) cis-1,2-dichloroethene	9.208	61	6338	0.285	ppbV	95
39) chloroform	9.558	83	15650	0.498	ppbV	100
41) 2,2-dichloropropane	9.667		0	N.D.		
42) 1,2-dichloroethane	0.000		0	N.D.		
48) 1,1,1-trichloroethane	0.000		0	N.D.		
49) 1,1-dichloropropene	11.107		0	N.D.		
52) carbon tetrachloride	11.387	117	1774	0.068	ppbV #	84
56) 1,2-dichloropropane	12.167		0	N.D.		
57) bromodichloromethane	12.400	83	2698	0.080	ppbV #	91
59) trichloroethene	12.447	130	17279	0.647	ppbV	92
63) cis-1,3-dichloropropene	13.483		0	N.D.		
65) trans-1,3-dichloropropene	14.092		0	N.D.		
66) 1,1,2-trichloroethane	14.433		0	N.D.		
71) 1,3-dichloropropane	14.608		0	N.D.		
74) dibromochloromethane	15.058		0	N.D.		
78) tetrachloroethene	15.775	166	41642	1.225	ppbV	97
79) 1,1,1,2-tetrachloroethane	0.000		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626867.D
 Acq On : 6 Oct 2021 10:52 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-02,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:27:54 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

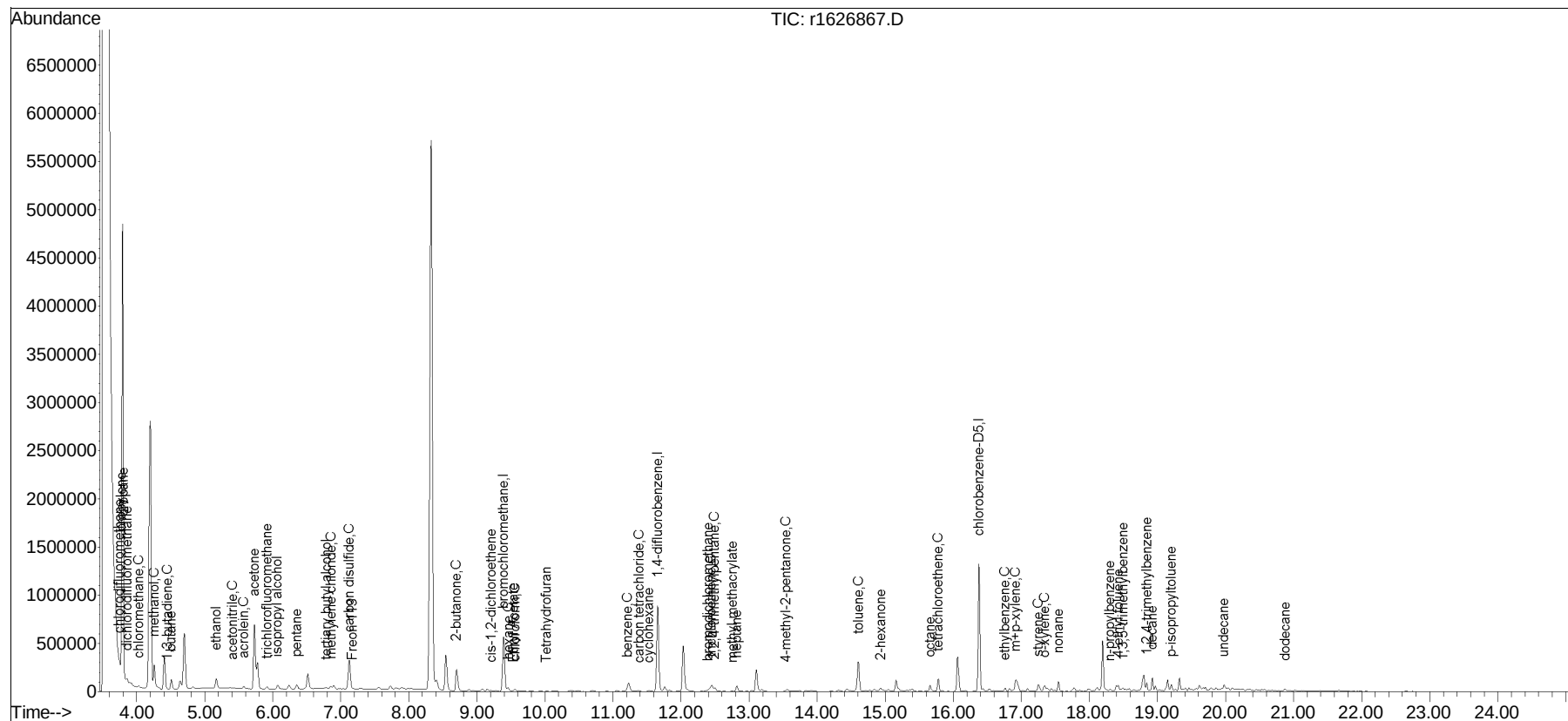
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

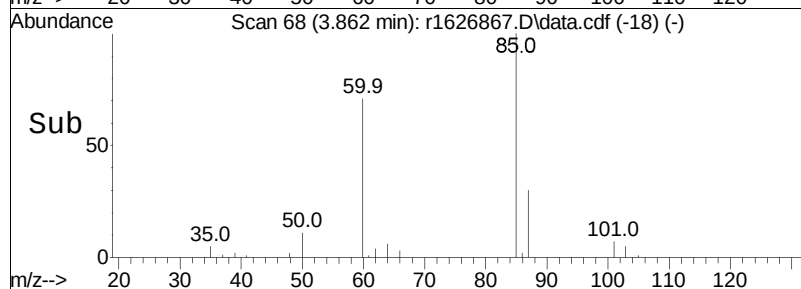
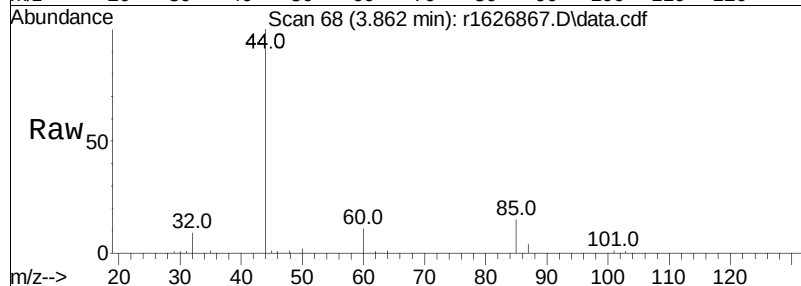
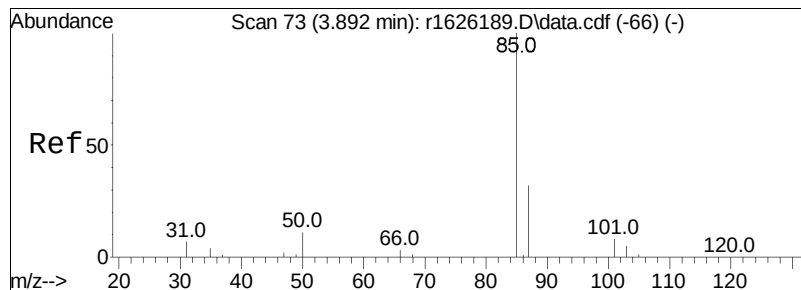
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	0.000		0	N.D.	d	
86) 1,1,2,2-tetrachloroethane	0.000		0	N.D.	d	
88) 1,2,3-trichloropropane	17.483		0	N.D.		
93) 2-chlorotoluene	0.000		0	N.D.		
95) 4-chlorotoluene	18.475		0	N.D.		
102) 1,3-dichlorobenzene	18.992		0	N.D.		
103) 1,4-dichlorobenzene	19.033		0	N.D.		
107) 1,2-dichlorobenzene	19.325		0	N.D.		
111) 1,2-dibromo-3-chloropr...	19.700		0	N.D.		
115) 1,2,4-trichlorobenzene	0.000		0	N.D.		
117) 1,2,3-trichlorobenzene	21.175		0	N.D.		
119) hexachlorobutadiene	21.233		0	N.D.		

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

```
Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\
Data File : r1626867.D
Acq On    : 6 Oct 2021 10:52 PM
Operator  : AIRLAB16:TS
Sample    : L2153634-02,3,250,250
Misc      : WG1555287,ICAL18260
ALS Vial  : 0 Sample Multiplier: 1
```

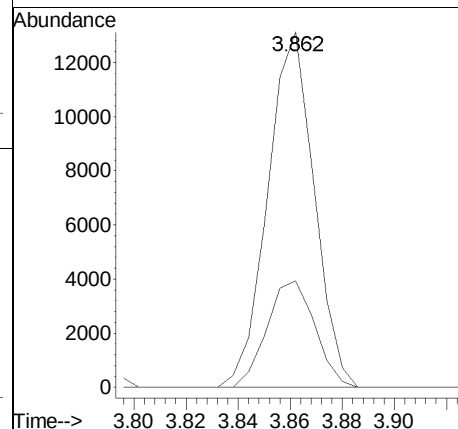
Quant Time: Oct 07 16:27:54 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 06:00:53 2021
Response via : Initial Calibration

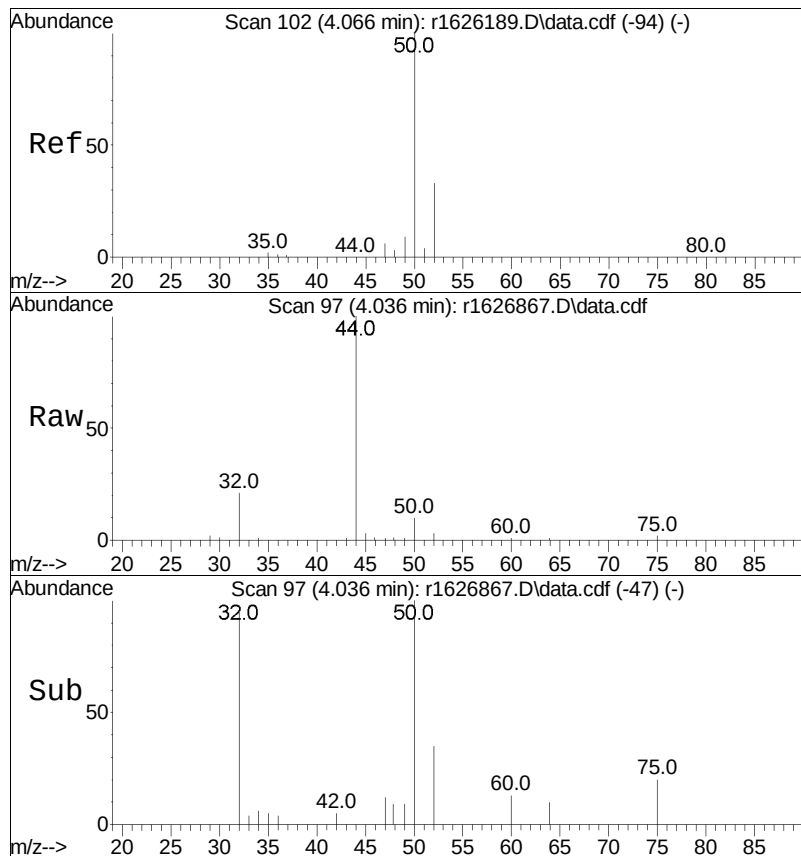




#5
dichlorodifluoromethane
Concen: 0.49 ppbV
RT: 3.862 min Scan# 68
Delta R.T. -0.030 min
Lab File: r1626867.D
Acq: 6 Oct 2021 10:52 PM

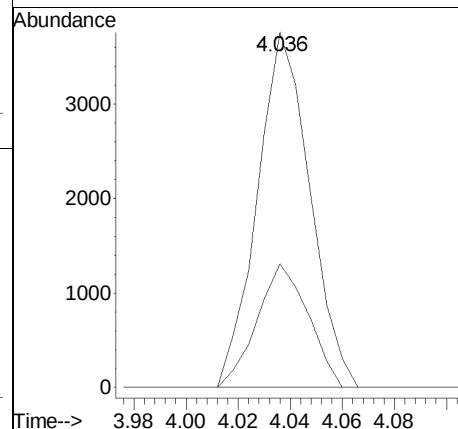
Tgt Ion	Ratio	Lower	Upper
85	100		
87	30.0	25.5	38.3

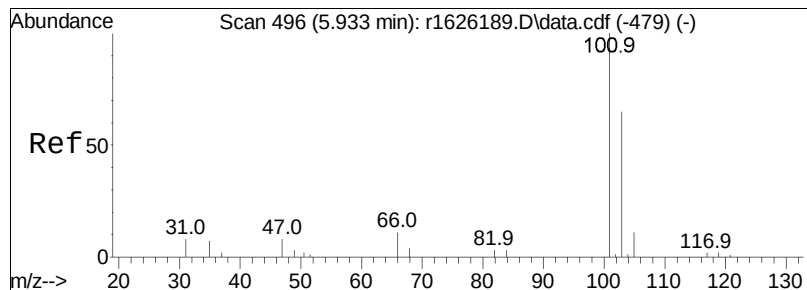




#6
 chloromethane
 Concen: 0.35 ppbV
 RT: 4.036 min Scan# 97
 Delta R.T. -0.030 min
 Lab File: r1626867.D
 Acq: 6 Oct 2021 10:52 PM

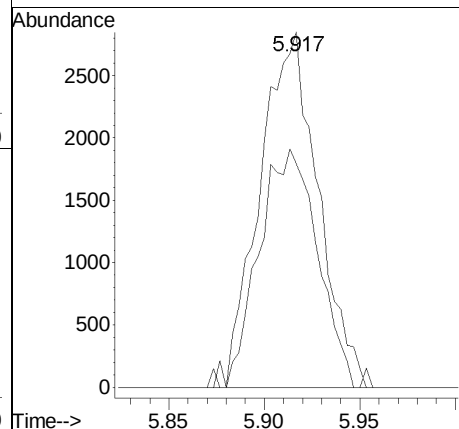
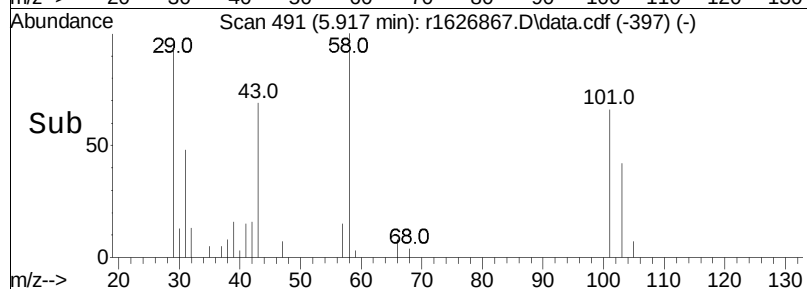
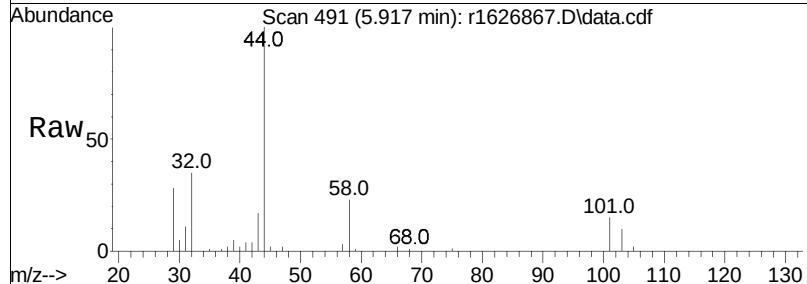
Tgt	Ion	Resp	Lower	Upper
50	100	5268		
52	34.8	26.1	39.1	

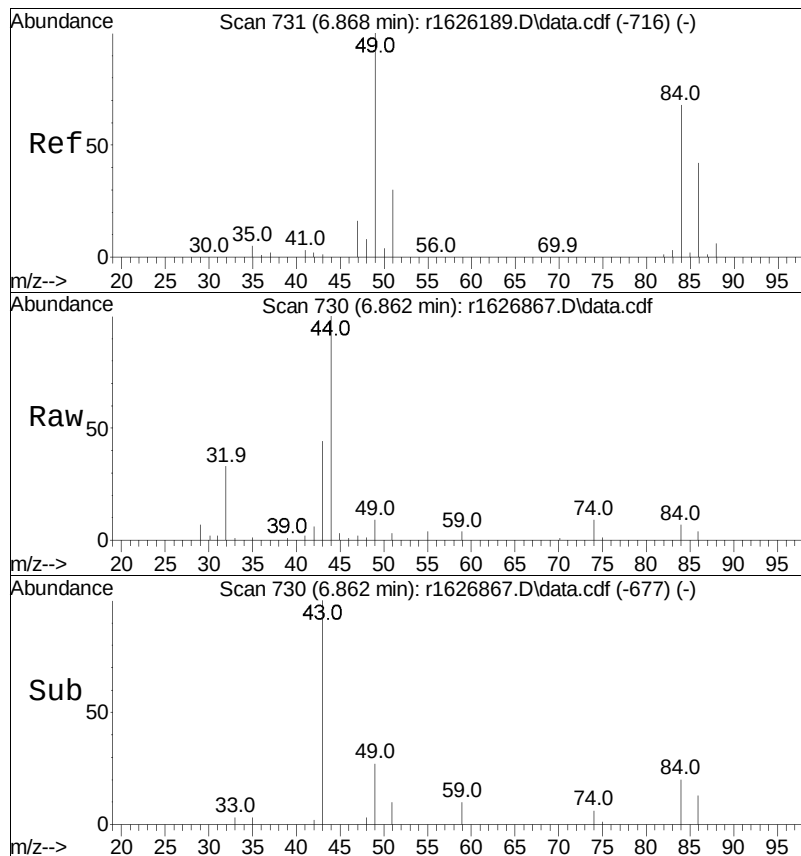




#21
trichlorofluoromethane
Concen: 0.23 ppbV
RT: 5.917 min Scan# 491
Delta R.T. -0.017 min
Lab File: r1626867.D
Acq: 6 Oct 2021 10:52 PM

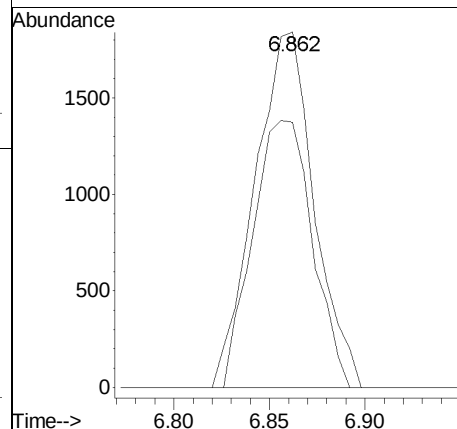
Tgt Ion	Ratio	Lower	Upper
101	100		
103	63.0	52.0	78.0

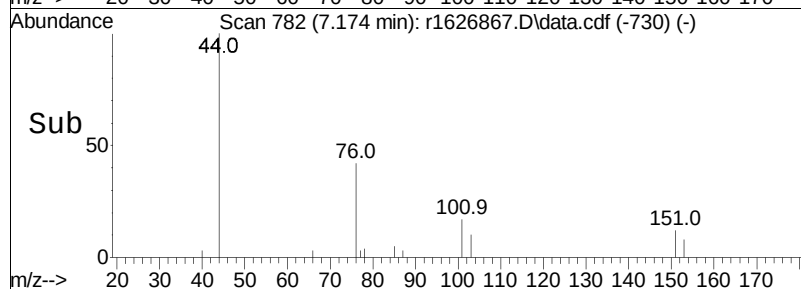
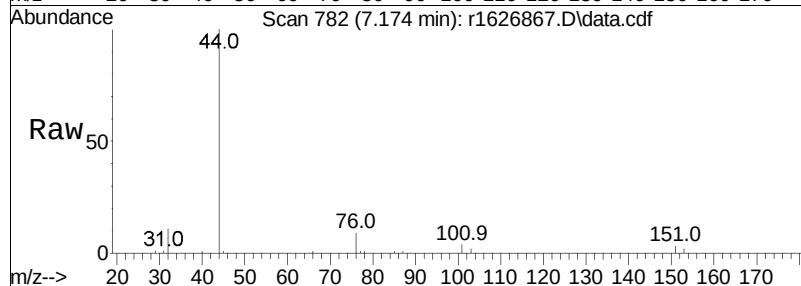
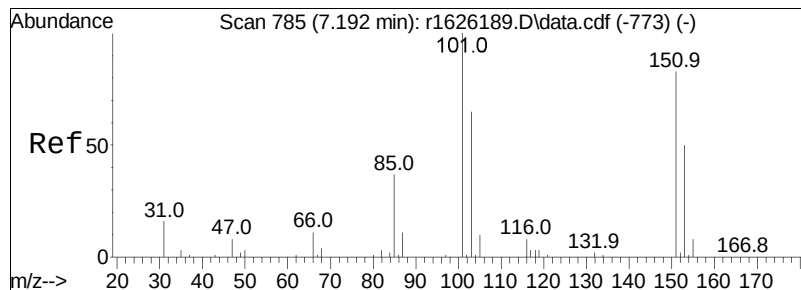




#28
 methylene chloride
 Concen: 0.19 ppbV
 RT: 6.862 min Scan# 730
 Delta R.T. -0.006 min
 Lab File: r1626867.D
 Acq: 6 Oct 2021 10:52 PM

Tgt Ion:	49	84	Ratio	100	74.6	Resp:	3984	Lower	Upper
								54.6	81.8





#31

Freon 113

Concen: 0.07 ppbV

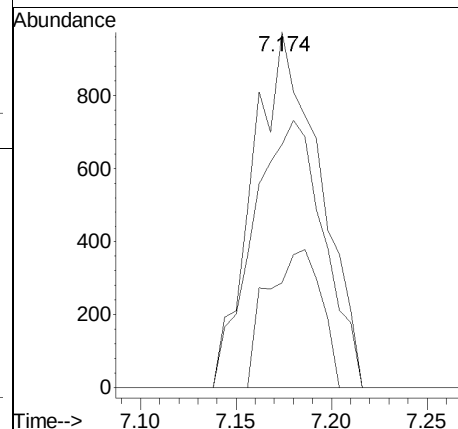
RT: 7.174 min Scan# 782

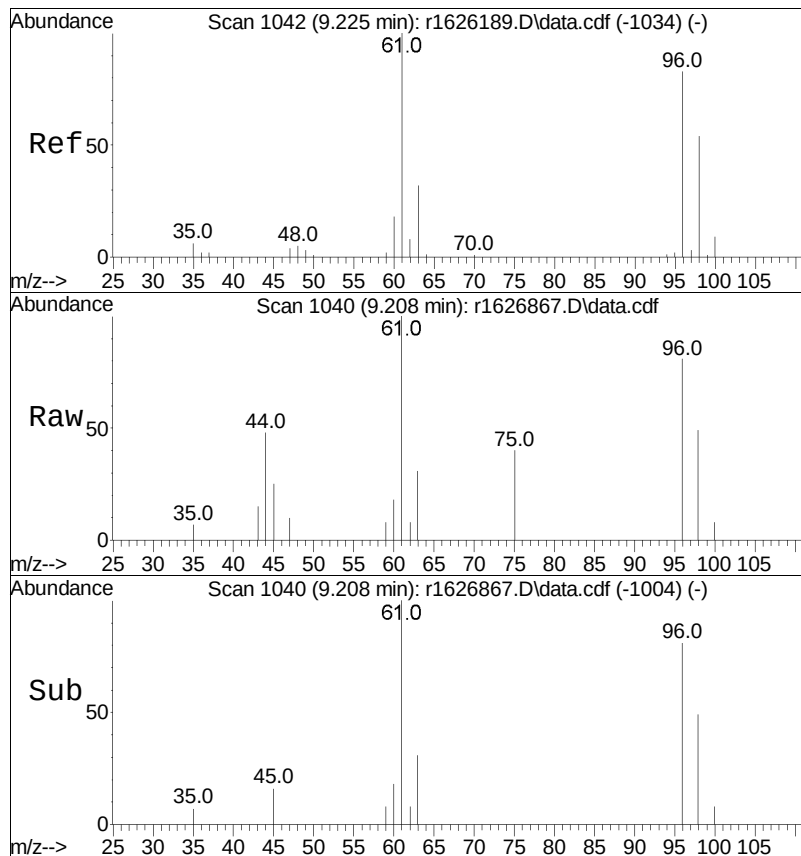
Delta R.T. -0.018 min

Lab File: r1626867.D

Acq: 6 Oct 2021 10:52 PM

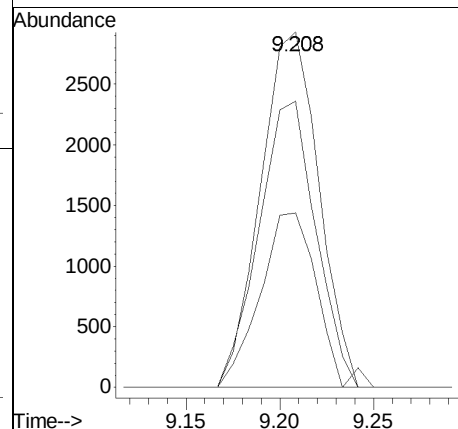
Tgt Ion:	101	Resp:	2384
Ion Ratio	Lower	Upper	
101	100		
85	29.5	29.7	44.5#
151	68.4	66.2	99.4

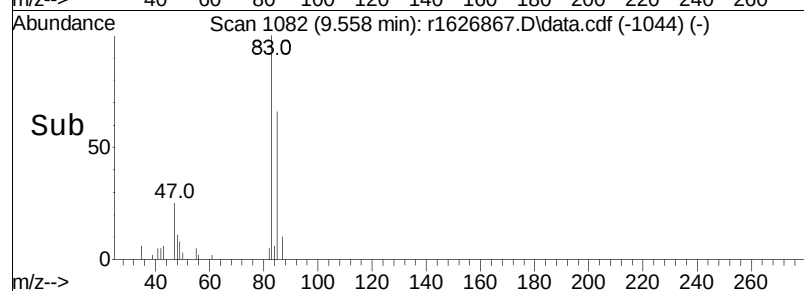
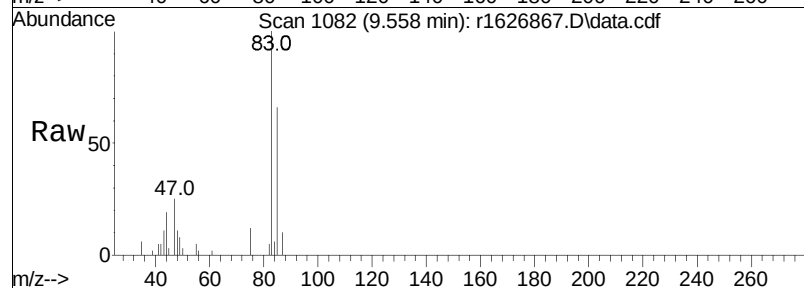
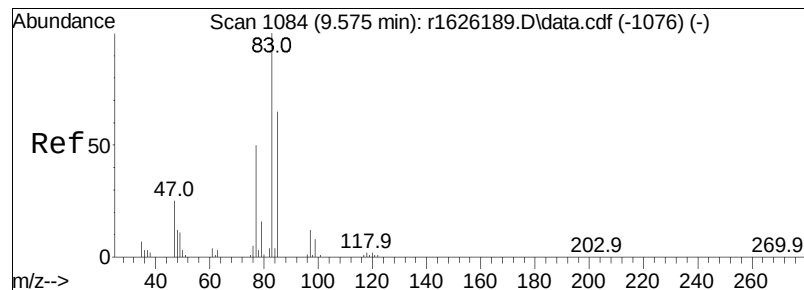




#37
 cis-1,2-dichloroethene
 Concen: 0.29 ppbV
 RT: 9.208 min Scan# 1040
 Delta R.T. -0.017 min
 Lab File: r1626867.D
 Acq: 6 Oct 2021 10:52 PM

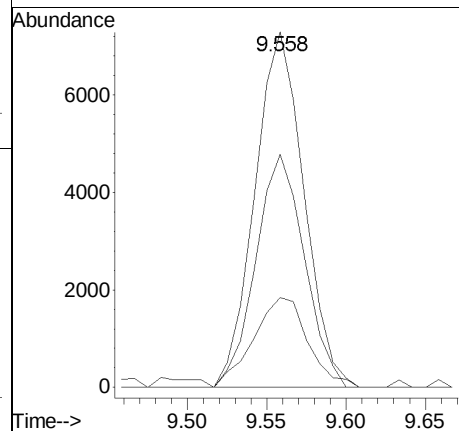
Tgt Ion: 61	Resp: 6338
Ion Ratio	Lower Upper
61 100	
96 80.5	66.6 100.0
98 49.1	43.3 64.9

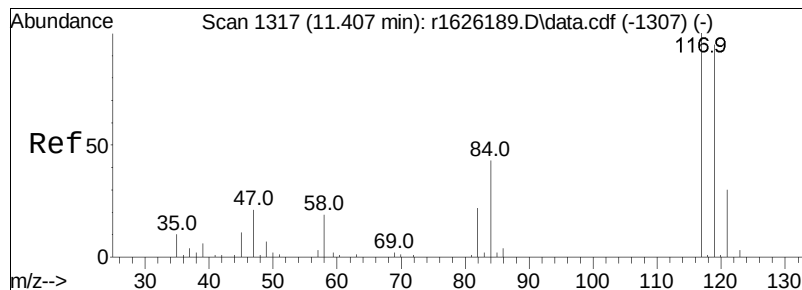




#39
chloroform
Concen: 0.50 ppbV
RT: 9.558 min Scan# 1082
Delta R.T. -0.017 min
Lab File: r1626867.D
Acq: 6 Oct 2021 10:52 PM

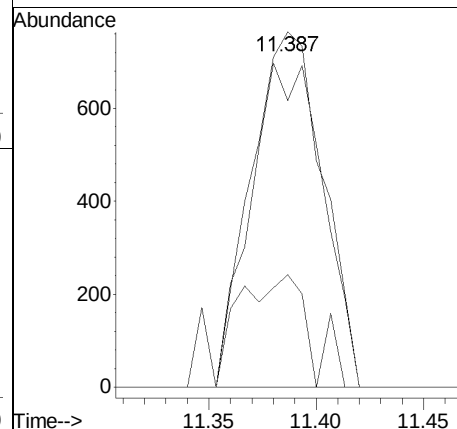
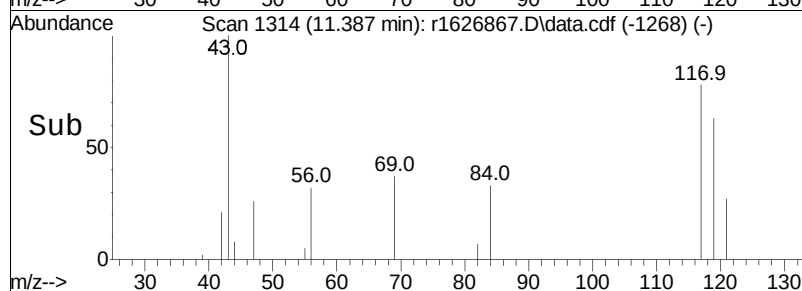
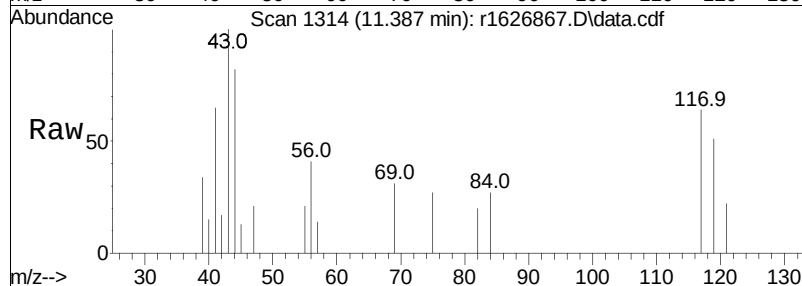
Tgt Ion	Ratio	Resp	Lower	Upper
83	100	15650		
85	65.6		52.3	78.5
47	25.3		20.6	31.0

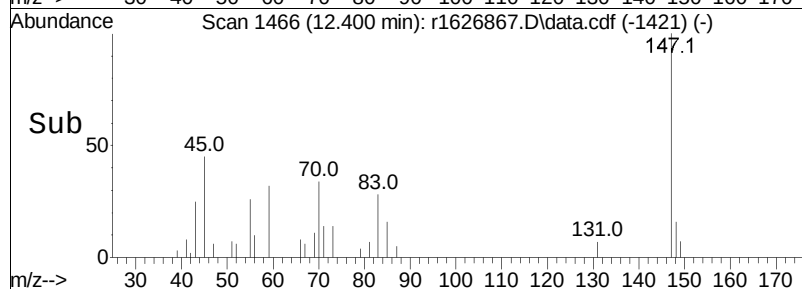
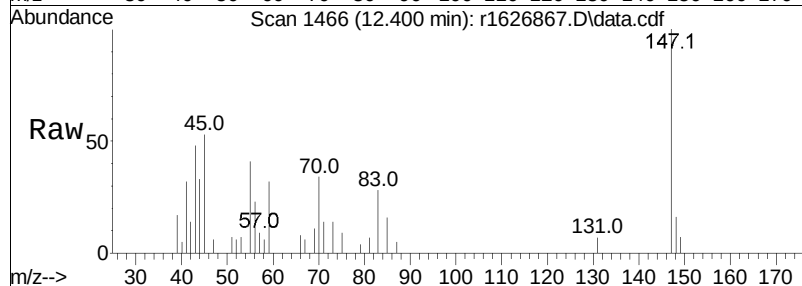
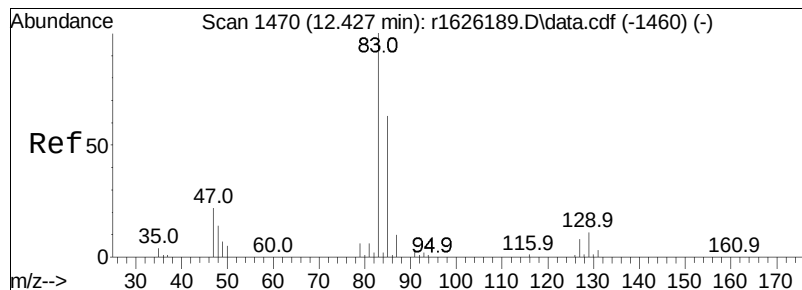




#52
 carbon tetrachloride
 Concen: 0.07 ppbV
 RT: 11.387 min Scan# 1314
 Delta R.T. -0.020 min
 Lab File: r1626867.D
 Acq: 6 Oct 2021 10:52 PM

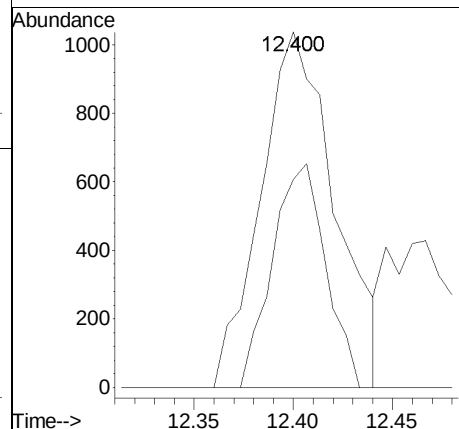
Tgt Ion	Ratio	Lower	Upper
117	100		
119	80.8	76.0	114.0
82	31.7	17.9	26.9#

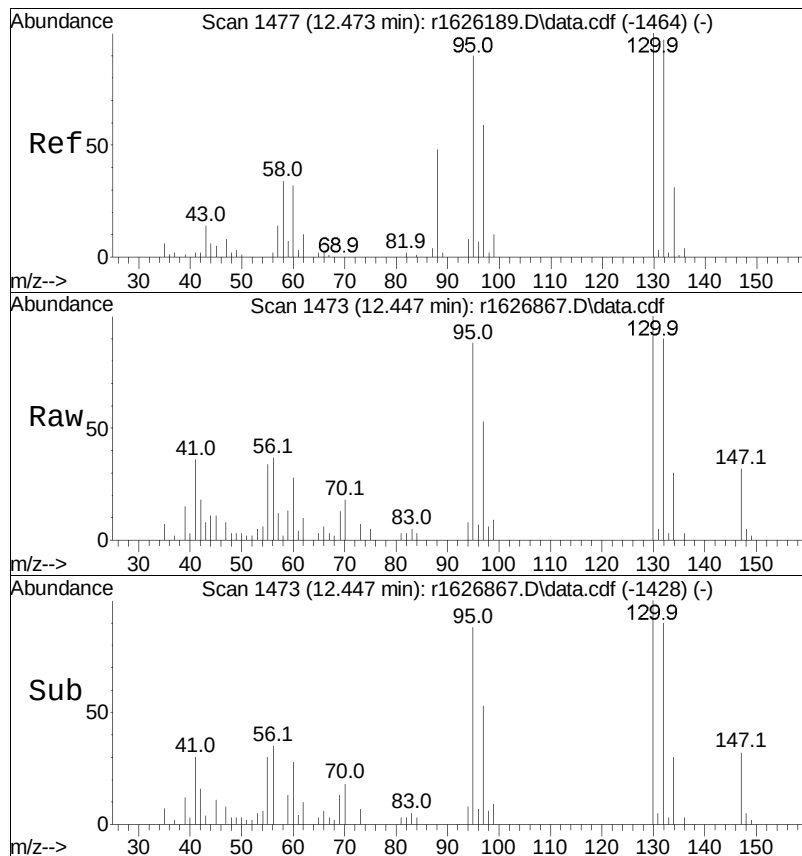




#57
bromodichloromethane
Concen: 0.08 ppbV
RT: 12.400 min Scan# 1466
Delta R.T. -0.027 min
Lab File: r1626867.D
Acq: 6 Oct 2021 10:52 PM

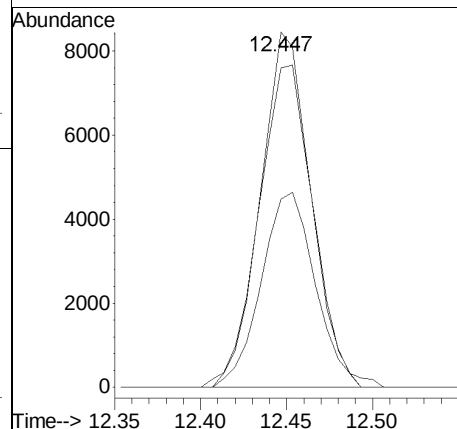
Tgt Ion	Ratio	Lower	Upper
83	100		
85	58.5	50.5	75.7
129	0.0	8.8	13.2#

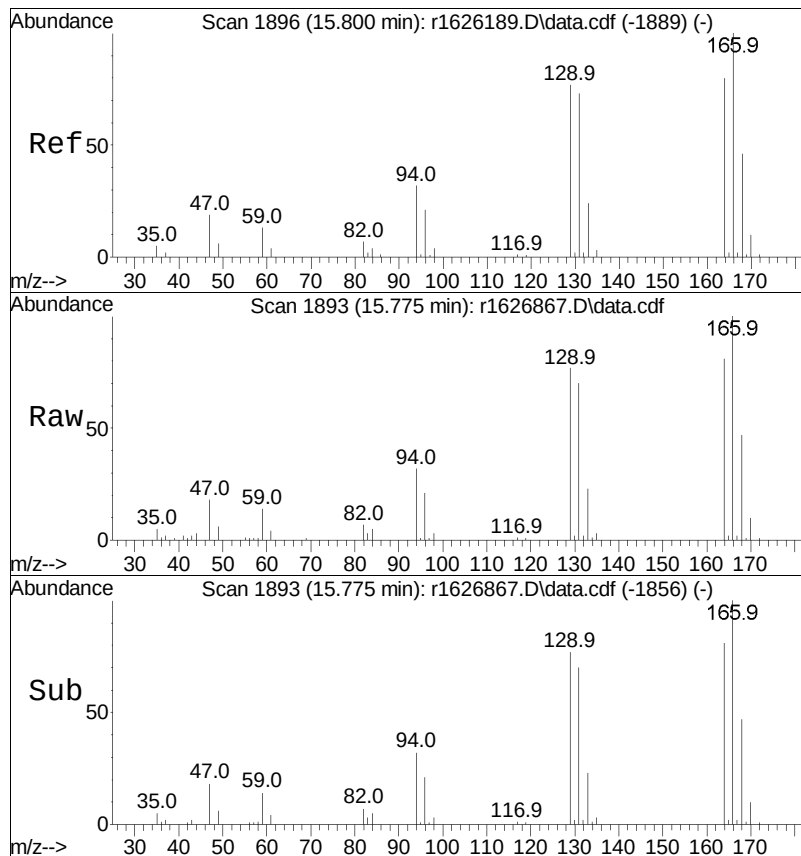




#59
trichloroethene
Concen: 0.65 ppbV
RT: 12.447 min Scan# 1473
Delta R.T. -0.027 min
Lab File: r1626867.D
Acq: 6 Oct 2021 10:52 PM

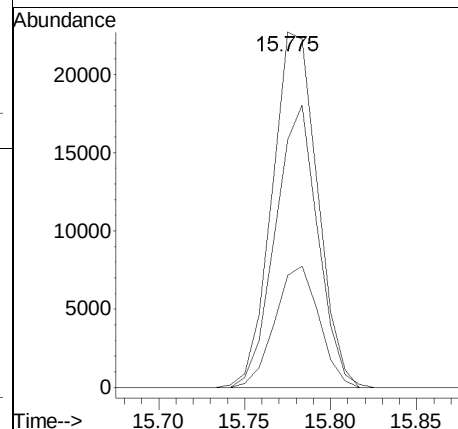
Tgt Ion:	130	Resp:	17279
Ion Ratio	Lower	Upper	
130	100		
132	89.9	77.5	116.3
97	53.0	47.3	70.9





#78
 tetrachloroethene
 Concen: 1.23 ppbV
 RT: 15.775 min Scan# 1893
 Delta R.T. -0.025 min
 Lab File: r1626867.D
 Acq: 6 Oct 2021 10:52 PM

Tgt	Ion	Ratio	Resp	Lower	Upper
166	100		41642		
131	69.7	58.7	88.1		
94	31.5	25.9	38.9		



Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626868.D
 Acq On : 6 Oct 2021 11:31 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-03,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:28:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) bromochloromethane	9.383	49	346421	10.000	ppbV	-0.03
Standard Area = 357950			Recovery =		96.78%	
43) 1,4-difluorobenzene	11.660	114	888900	10.000	ppbV	-0.02
Standard Area = 923831			Recovery =		96.22%	
67) chlorobenzene-D5	16.375	54	147536	10.000	ppbV	-0.02
Standard Area = 146691			Recovery =		100.58%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.844	85	13741	0.406	ppbV	99
6) chloromethane	4.024	50	2473	0.162	ppbV	97
9) vinyl chloride	0.000		0	N.D.		
14) chloroethane	0.000		0	N.D.		
21) trichlorofluoromethane	5.900	101	4664	0.178	ppbV	92
26) 1,1-dichloroethene	0.000		0	N.D.	d	
28) methylene chloride	6.826	49	2548	0.119	ppbV	94
31) Freon 113	7.162		0	N.D.		
32) trans-1,2-dichloroethene	0.000		0	N.D.		
33) 1,1-dichloroethane	0.000		0	N.D.		
37) cis-1,2-dichloroethene	9.183		0	N.D.		
39) chloroform	9.550	83	45112	1.420	ppbV	97
41) 2,2-dichloropropane	0.000		0	N.D.		
42) 1,2-dichloroethane	0.000		0	N.D.		
48) 1,1,1-trichloroethane	0.000		0	N.D.		
49) 1,1-dichloropropene	11.207		0	N.D.		
52) carbon tetrachloride	11.387		0	N.D.		
56) 1,2-dichloropropane	0.000		0	N.D.		
57) bromodichloromethane	12.407	83	4753	0.143	ppbV	88
59) trichloroethene	12.453	130	2099	0.079	ppbV	93
63) cis-1,3-dichloropropene	0.000		0	N.D.		
65) trans-1,3-dichloropropene	0.000		0	N.D.		
66) 1,1,2-trichloroethane	14.433		0	N.D.		
71) 1,3-dichloropropane	0.000		0	N.D.	d	
74) dibromochloromethane	15.067		0	N.D.		
78) tetrachloroethene	15.783	166	25016	0.755	ppbV	98
79) 1,1,1,2-tetrachloroethane	0.000		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626868.D
 Acq On : 6 Oct 2021 11:31 PM
 Operator : AIRLAB16:TS
 Sample : L2153634-03,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:28:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	16.433		0		N.D.	
86) 1,1,2,2-tetrachloroethane	0.000		0		N.D.	d
88) 1,2,3-trichloropropane	17.350		0		N.D.	
93) 2-chlorotoluene	0.000		0		N.D.	
95) 4-chlorotoluene	18.475		0		N.D.	
102) 1,3-dichlorobenzene	19.050		0		N.D.	
103) 1,4-dichlorobenzene	19.050		0		N.D.	
107) 1,2-dichlorobenzene	0.000		0		N.D.	
111) 1,2-dibromo-3-chloropr...	0.000		0		N.D.	
115) 1,2,4-trichlorobenzene	0.000		0		N.D.	
117) 1,2,3-trichlorobenzene	0.000		0		N.D.	
119) hexachlorobutadiene	0.000		0		N.D.	

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

Sub List : Default-LCS-AP2 - All compounds listed6T\r1626853.D

Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\

Data File : r1626868.D

Acq On : 6 Oct 2021 11:31 PM

Operator : AIRLAB16:TS

Sample : L2153634-03, 3, 250, 250

Misc : WG1555287, ICAL18260

ALS Vial : 0 Sample Multiplier: 1

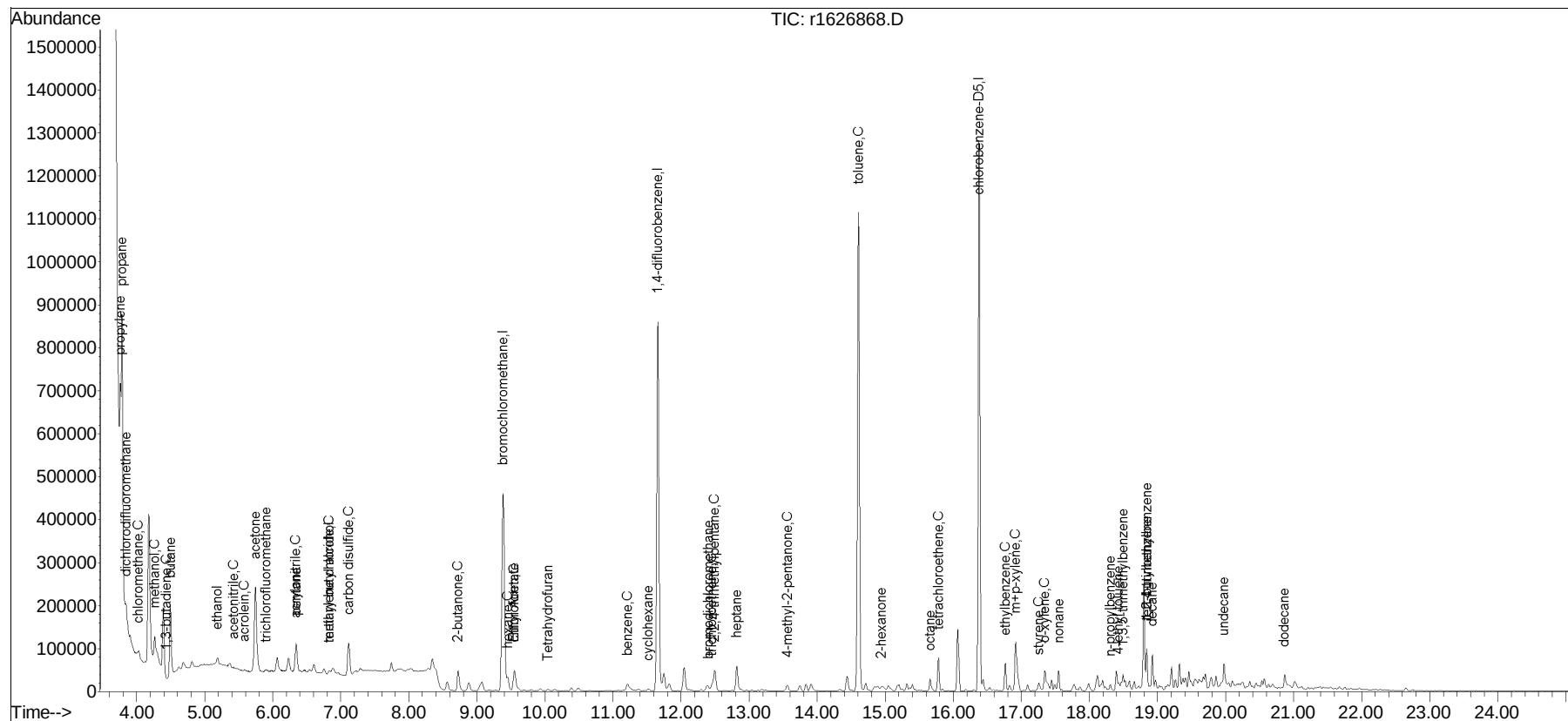
Quant Time: Oct 07 16:28:37 2021

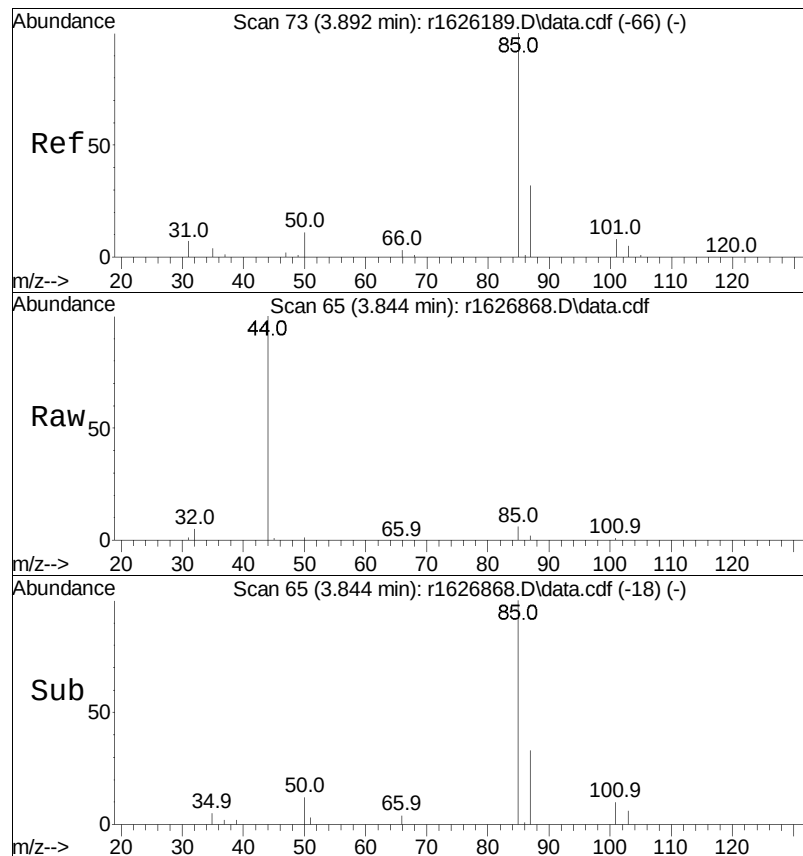
Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M

Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

QLast Update : Mon Aug 30 06:00:53 2021

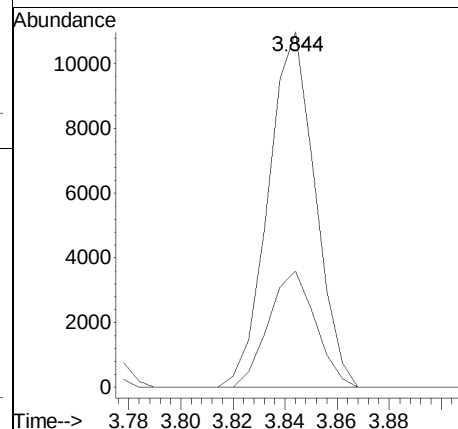
Response via : Initial Calibration

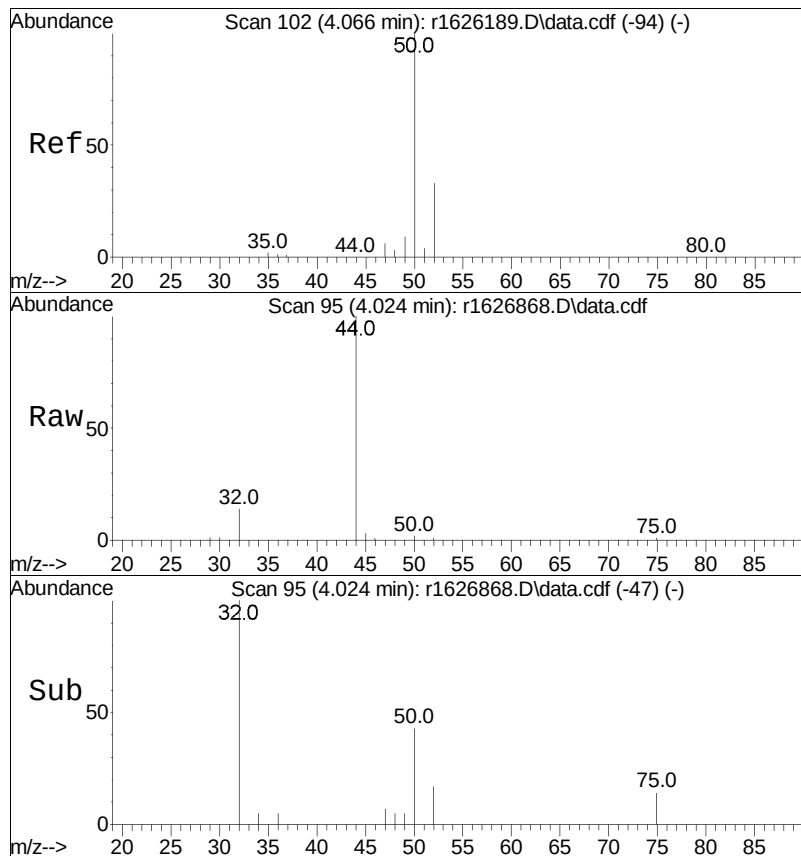




#5
 dichlorodifluoromethane
 Concen: 0.41 ppbV
 RT: 3.844 min Scan# 65
 Delta R.T. -0.048 min
 Lab File: r1626868.D
 Acq: 6 Oct 2021 11:31 PM

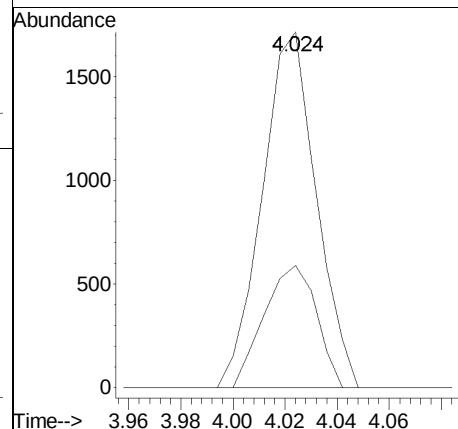
Tgt Ion:	85	Resp:	13741
Ion Ratio	Lower	Upper	
85	100		
87	32.7	25.5	38.3

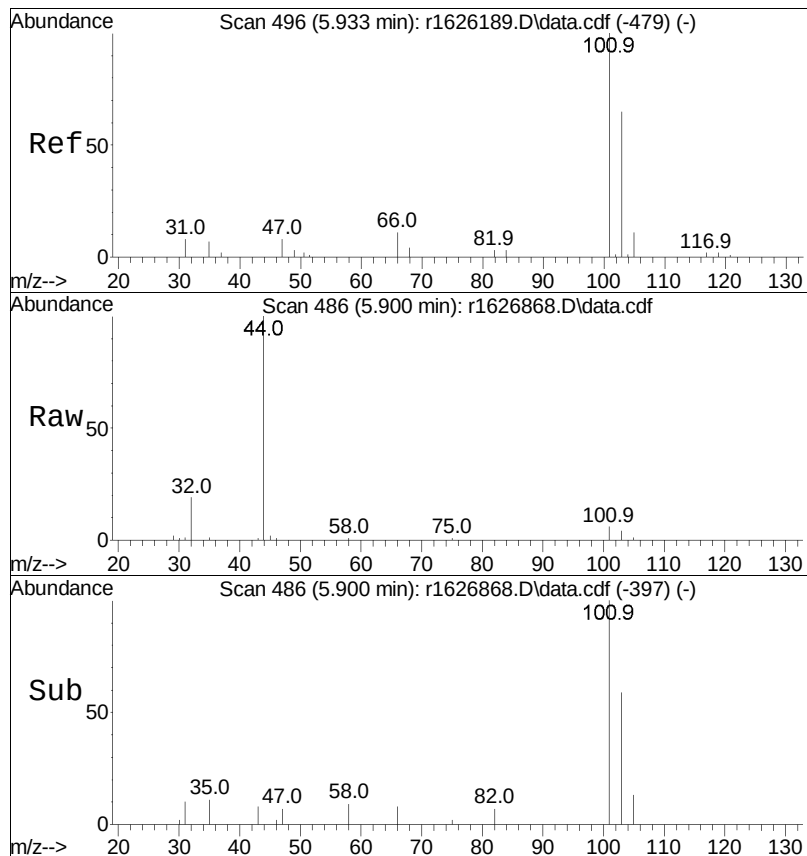




#6
 chloromethane
 Concen: 0.16 ppbV
 RT: 4.024 min Scan# 95
 Delta R.T. -0.042 min
 Lab File: r1626868.D
 Acq: 6 Oct 2021 11:31 PM

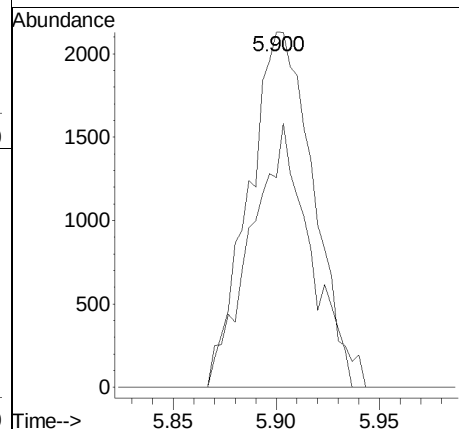
Tgt	Ion	Resp	Lower	Upper
50	100	2473		
52	34.3	26.1	39.1	

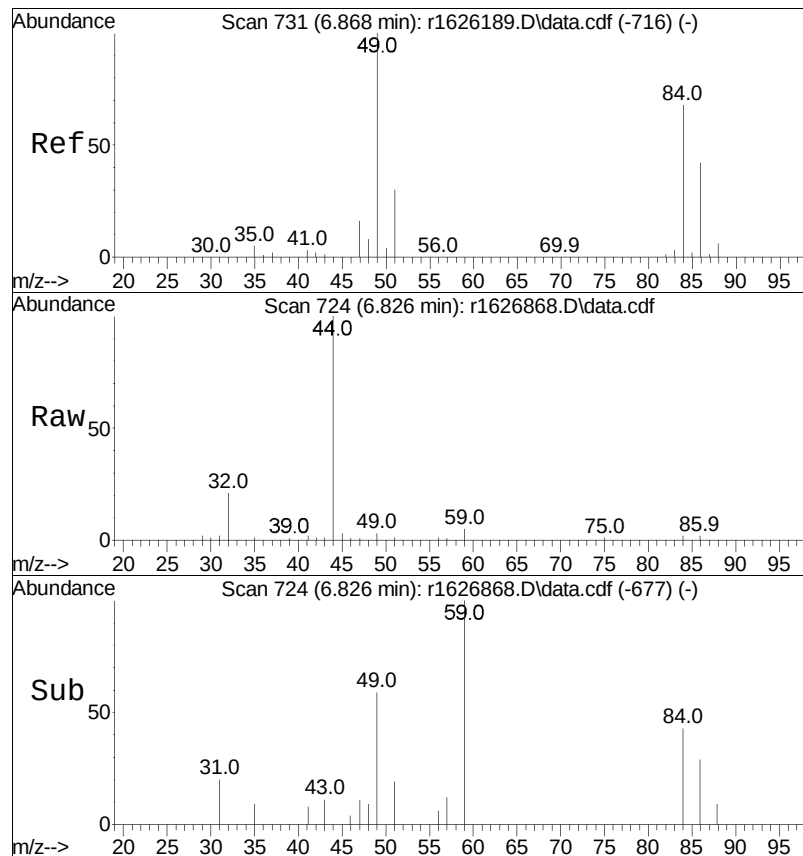




#21
trichlorofluoromethane
Concen: 0.18 ppbV
RT: 5.900 min Scan# 486
Delta R.T. -0.033 min
Lab File: r1626868.D
Acq: 6 Oct 2021 11:31 PM

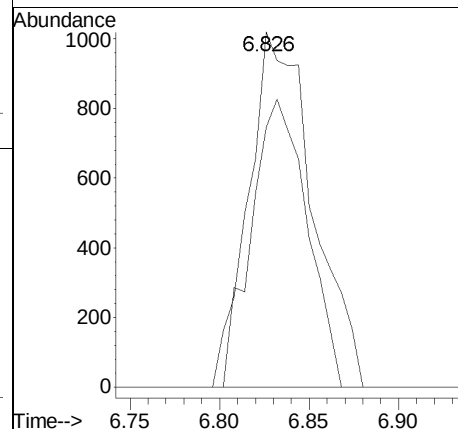
Tgt	Ion	Ratio	Resp	Lower	Upper
101	101	100	4664		
103	59.1	52.0	78.0		

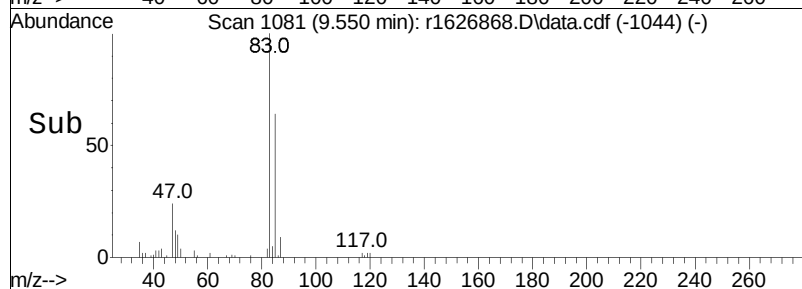
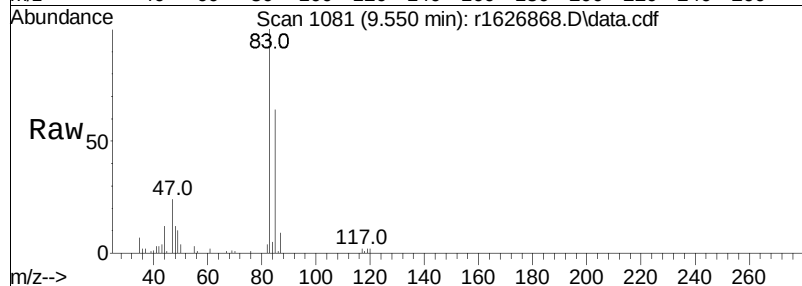
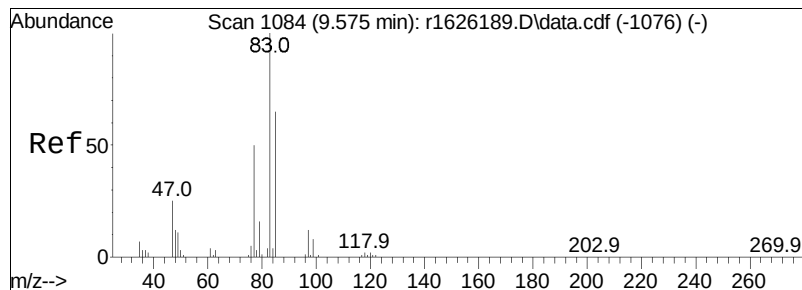




#28
 methylene chloride
 Concen: 0.12 ppbV
 RT: 6.826 min Scan# 724
 Delta R.T. -0.042 min
 Lab File: r1626868.D
 Acq: 6 Oct 2021 11:31 PM

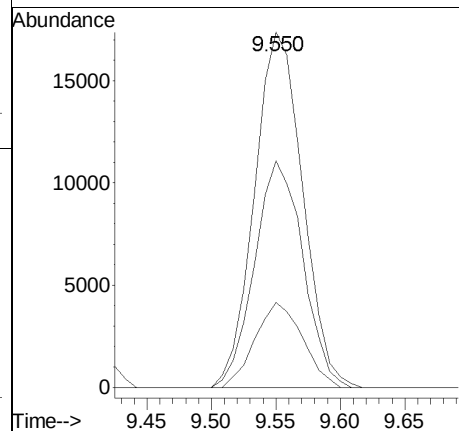
Tgt Ion:	49	84	Ratio	Lower	Upper
Resp:	2548				
Ion Ratio	100	73.2			
			54.6	81.8	

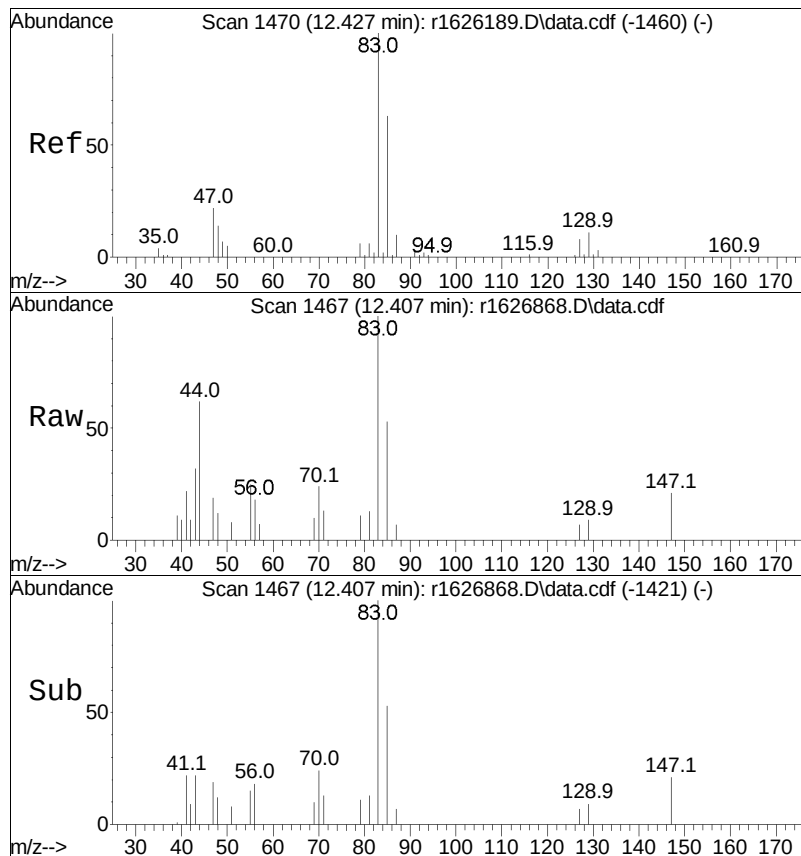




#39
chloroform
Concen: 1.42 ppbV
RT: 9.550 min Scan# 1081
Delta R.T. -0.025 min
Lab File: r1626868.D
Acq: 6 Oct 2021 11:31 PM

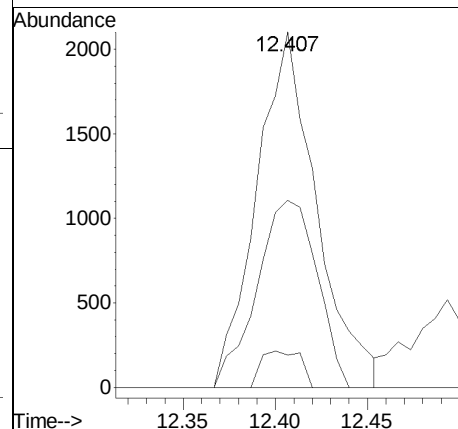
Tgt	Ion	Ratio	Resp	Lower	Upper
83	100		45112		
85	63.7	52.3		78.5	
47	23.9	20.6		31.0	

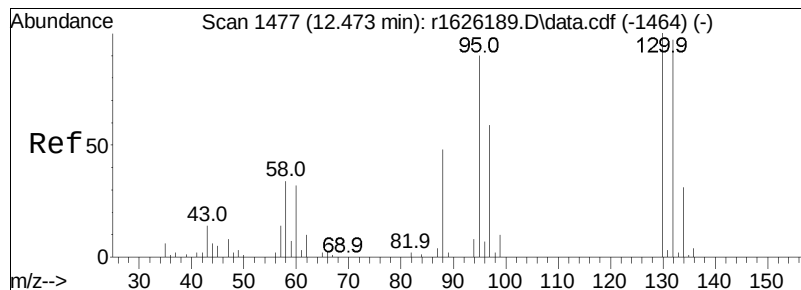




#57
bromodichloromethane
Concen: 0.14 ppbV
RT: 12.407 min Scan# 1467
Delta R.T. -0.020 min
Lab File: r1626868.D
Acq: 6 Oct 2021 11:31 PM

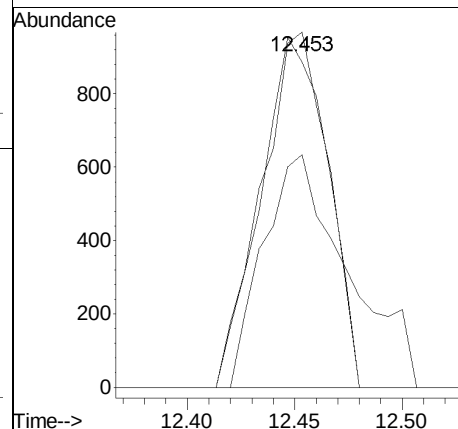
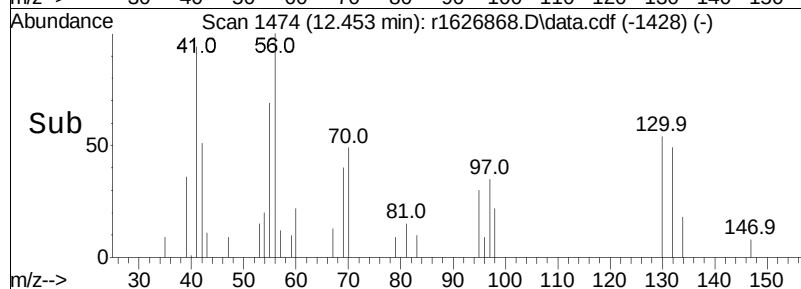
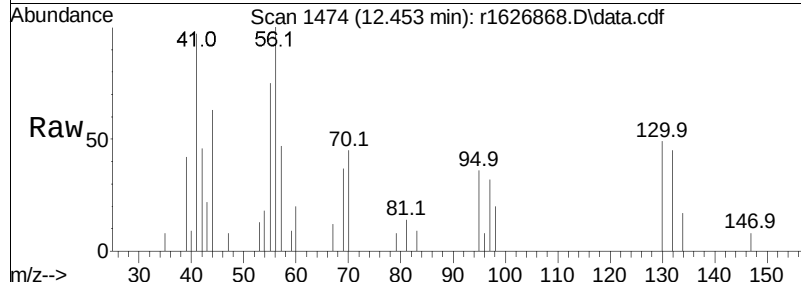
Tgt Ion:	83	Resp:	4753
Ion Ratio	Lower	Upper	
83	100		
85	52.6	50.5	75.7
129	9.1	8.8	13.2

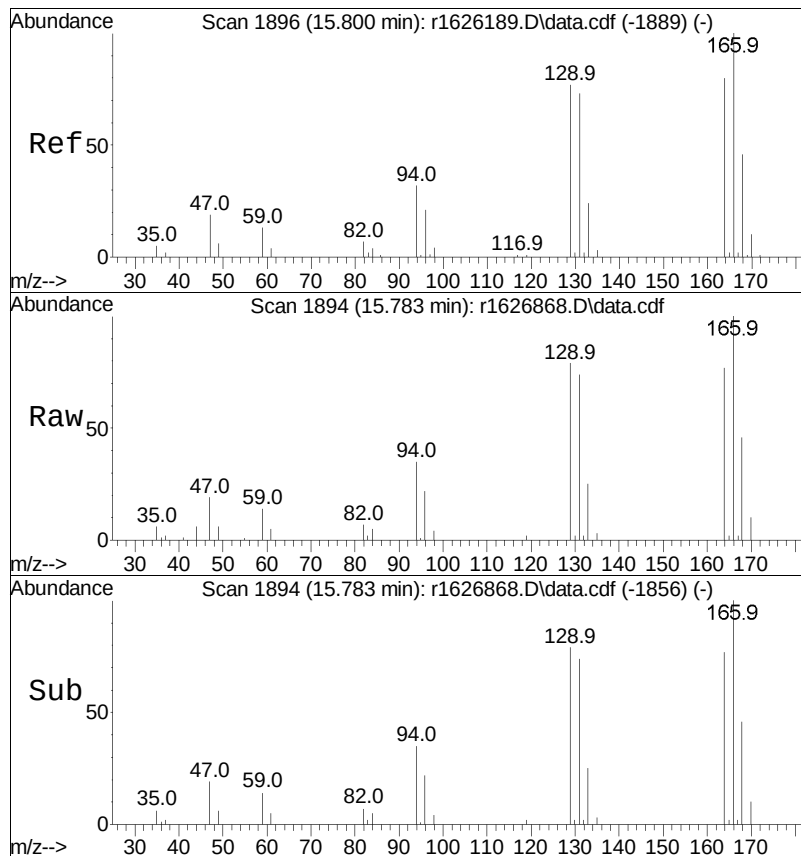




#59
 trichloroethene
 Concen: 0.08 ppbV
 RT: 12.453 min Scan# 1474
 Delta R.T. -0.020 min
 Lab File: r1626868.D
 Acq: 6 Oct 2021 11:31 PM

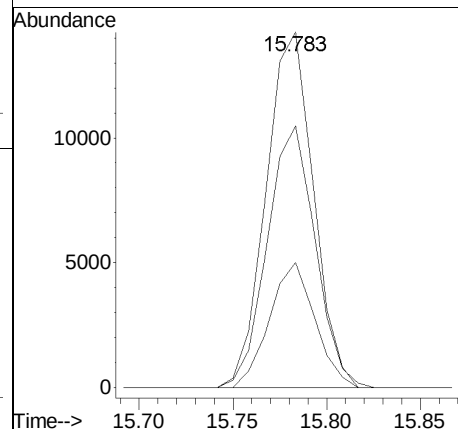
Tgt Ion	Ratio	Resp	Lower	Upper
130	100	2099		
132	91.5		77.5	116.3
97	65.5		47.3	70.9





#78
 tetrachloroethene
 Concen: 0.75 ppbV
 RT: 15.783 min Scan# 1894
 Delta R.T. -0.017 min
 Lab File: r1626868.D
 Acq: 6 Oct 2021 11:31 PM

Tgt Ion:	166	Resp:	25016
Ion Ratio	Lower	Upper	
166	100		
131	73.6	58.7	88.1
94	35.2	25.9	38.9



Volatiles Standards Data

Initial Calibration

Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRLAB16
Calibration dates : 08/29/21 20:26 08/30/21 01:03
Lab Number : L2153634
Project Number : 100849501
Ical Ref : ICAL18260

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
1) I bromochloromethane	-----ISTD-----									
2) chlorodifluoromethane	0.894	0.915	0.920	0.803	0.782	0.731	0.689	0.647	0.7975	13.17
3) propylene		0.514	0.511	0.422	0.419	0.389	0.339	0.327	0.4173	17.83
4) propane		0.664	0.637	0.549	0.540	0.516	0.494	0.471	0.5531	13.01
5) dichlorodifluoromethane	1.091	1.120	1.141	0.987	0.956	0.906	0.839	0.781	0.9775	13.60
6) C chloromethane	0.496	0.539	0.513	0.440	0.424	0.401	0.370	0.334	0.4396	16.41
7) Freon-114	1.227	1.321	1.331	1.137	1.100	1.037	0.944	0.818	1.1142	16.13
8) C methanol			0.264	0.200	0.201	0.188	0.179	0.166	0.1999	17.10
9) C vinyl chloride	0.480	0.496	0.502	0.436	0.427	0.411	0.394	0.371	0.4397	11.04
10) C 1,3-butadiene	0.426	0.428	0.426	0.378	0.373	0.355	0.333	0.302	0.3777	12.46
11) butane	0.788	0.810	0.823	0.687	0.652	0.611	0.560	0.506	0.6796	17.51
12) C acetaldehyde		0.402	0.401	0.337	0.326	0.302	0.268	0.222	0.3224	20.49
13) C bromomethane	0.417	0.450	0.466	0.390	0.384	0.368	0.346	0.328	0.3936	12.25
14) C chloroethane	0.224	0.240	0.246	0.207	0.203	0.195	0.185	0.181	0.2102	11.63
15) ethanol			0.410	0.364	0.364	0.328	0.285	0.250	0.3333	17.51
16) dichlorofluoromethane	0.948	0.951	0.935	0.806	0.785	0.741	0.705	0.640	0.8138	14.69
17) C vinyl bromide	0.414	0.444	0.445	0.391	0.387	0.369	0.340	0.324	0.3892	11.40
18) C acrolein		0.202	0.202	0.180	0.183	0.177	0.170	0.165	0.1828	7.97
19) acetone	0.781	0.796	0.796	0.665	0.648	0.591	0.512	0.459	0.6561	19.85
20) C acetonitrile	0.436	0.436	0.441	0.367	0.362	0.339	0.314	0.300	0.3744	15.21
21) trichlorofluoromethane	0.825	0.856	0.849	0.730	0.720	0.801	0.642	0.621	0.7556	12.09
22) isopropyl alcohol	0.817	0.865	0.872	0.757	0.750	0.912	0.642	0.584	0.7750	14.89
23) C acrylonitrile	0.379	0.414	0.400	0.350	0.343	0.401	0.327	0.308	0.3652	10.65
24) pentane	0.907	0.908	0.863	0.741	0.719	0.939	0.648	0.600	0.7906	16.51
25) ethyl ether	0.790	0.828	0.882	0.709	0.722	0.781	0.656	0.724	0.7615	9.56
26) C 1,1-dichloroethene	0.665	0.666	0.800	0.584	0.580	0.660	0.531	0.512	0.6248	14.85
27) tertiary butyl alcohol		0.716	0.753	0.692	0.637	0.701	0.622	0.646	0.6809	7.00
28) C methylene chloride		0.668	0.788	0.664	0.562	0.626	0.469	0.548	0.6178	16.66
29) C 3-chloropropene	0.761	0.840	0.826	0.737	0.741	0.695	0.646	0.591	0.7298	11.57
30) C carbon disulfide	1.568	1.717	1.787	1.629	1.650	1.606	1.497	1.389	1.6053	7.74
31) Freon 113	1.106	1.168	1.193	1.018	0.994	0.944	0.869	0.802	1.0117	13.75
32) trans-1,2-dichloroethene	0.734	0.811	0.818	0.739	0.739	0.704	0.664	0.629	0.7296	8.93
33) C 1,1-dichloroethane	0.937	1.024	1.026	0.897	0.883	0.838	0.788	0.739	0.8914	11.58
34) C MTBE	1.074	1.213	1.268	1.205	1.226	1.178	1.111	1.043	1.1647	6.84
35) C vinyl acetate			1.289	1.194	1.209	1.170	1.143	1.050	1.1758	6.71
36) C 2-butanone		1.355	1.428	1.345	1.280	1.258	1.178	1.007	1.2644	10.96



Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
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Instrument ID : AIRLAB16
Calibration dates : 08/29/21 20:26 08/30/21 01:03
Lab Number : L2153634
Project Number : 100849501
Ical Ref : ICAL18260

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

	Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
37)	cis-1,2-dichloroethene	0.682	0.699	0.722	0.652	0.657	0.621	0.594	0.559	0.6483	8.44
38)	Ethyl Acetate		0.180	0.182	0.184	0.191	0.173	0.169	0.162	0.1773	5.55
39) C	chloroform	0.974	1.020	1.052	0.917	0.910	0.878	0.827	0.759	0.9173	10.66
40)	Tetrahydrofuran		0.732	0.767	0.743	0.755	0.704	0.660	0.596	0.7083	8.62
41)	2,2-dichloropropane	0.610	0.693	0.709	0.641	0.650	0.636	0.604	0.560	0.6379	7.59
42) C	1,2-dichloroethane	0.584	0.628	0.624	0.548	0.536	0.508	0.479	0.454	0.5451	11.76
43) I	1,4-difluorobenzene	-----ISTD-----									
44) C	hexane	0.305	0.331	0.346	0.324	0.323	0.311	0.301	0.287	0.3161	5.93
45)	diisopropyl ether	0.143	0.175	0.176	0.161	0.161	0.154	0.150	0.144	0.1579	8.07
46)	tert-butyl ethyl ether	0.446	0.529	0.557	0.515	0.517	0.500	0.490	0.480	0.5043	6.66
47) s	1,2-dichloroethane-D4	0.267	0.265	0.260	0.261	0.258	0.249	0.245	0.238	0.2555	4.01
48) C	1,1,1-trichloroethane	0.303	0.322	0.329	0.292	0.293	0.281	0.273	0.261	0.2945	7.90
49)	1,1-dichloropropene	0.271	0.291	0.310	0.293	0.302	0.289	0.281	0.265	0.2875	5.25
50) C	benzene	0.855	0.797	0.796	0.689	0.685	0.660	0.639	0.602	0.7154	12.53
51)	thiophene	0.329	0.383	0.403	0.376	0.379	0.370	0.362	0.345	0.3683	6.22
52) C	carbon tetrachloride	0.272	0.308	0.322	0.289	0.293	0.287	0.279	0.265	0.2894	6.41
53)	cyclohexane	0.304	0.343	0.370	0.347	0.347	0.335	0.329	0.323	0.3373	5.82
54)	tert-amyl methyl ether	0.453	0.498	0.523	0.498	0.505	0.491	0.481	0.455	0.4879	4.92
55)	dibromomethane	0.226	0.244	0.239	0.214	0.210	0.198	0.193	0.181	0.2131	10.49
56) C	1,2-dichloropropane	0.251	0.270	0.270	0.239	0.235	0.221	0.213	0.200	0.2375	10.73
57)	bromodichloromethane	0.345	0.389	0.404	0.379	0.387	0.376	0.370	0.349	0.3749	5.26
58) C	1,4-dioxane	0.121	0.147	0.159	0.152	0.155	0.148	0.146	0.138	0.1457	8.19
59) C	trichloroethene	0.304	0.327	0.333	0.303	0.302	0.285	0.275	0.256	0.2981	8.63
60) C	2,2,4-trimethylpentane	1.004	1.147	1.222	1.109	1.072	1.016	0.971	0.919	1.0574	9.42
61)	methyl methacrylate		0.323	0.340	0.355	0.359	0.338	0.325	0.296	0.3336	6.40
62)	heptane	0.451	0.533	0.563	0.517	0.506	0.465	0.431	0.383	0.4809	12.31
63) C	cis-1,3-dichloropropene	0.236	0.286	0.307	0.313	0.329	0.325	0.326	0.309	0.3040	10.09
64) C	4-methyl-2-pentanone		0.538	0.603	0.608	0.611	0.565	0.538	0.481	0.5634	8.54
65)	trans-1,3-dichloropropene	0.196	0.245	0.266	0.282	0.300	0.297	0.303	0.291	0.2723	13.45
66) C	1,1,2-trichloroethane	0.276	0.297	0.303	0.269	0.268	0.251	0.243	0.229	0.2669	9.62
67) I	chlorobenzene-D5	-----ISTD-----									
68) C	toluene	6.317	5.976	5.773	4.893	4.759	4.528	4.214	3.881	5.0426	17.47
69) s	toluene-D8	6.583	6.600	6.535	6.483	6.383	6.231	6.038	5.866	6.3397	4.28
70)	2-methylthiophene	3.728	4.139	4.299	3.819	3.778	3.572	3.334	3.103	3.7214	10.54
71)	1,3-dichloropropane	2.310	2.566	2.694	2.381	2.368	2.239	2.112	1.940	2.3265	10.28
72)	2-hexanone	1.785	2.905	3.329	3.367	3.423	3.227	3.013	2.703	2.9690	18.18



Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRLAB16
Calibration dates : 08/29/21 20:26 08/30/21 01:03
Lab Number : L2153634
Project Number : 100849501
Ical Ref : ICAL18260

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

	Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
73)	3-methylthiophene	3.524	4.184	4.265	3.936	3.846	3.647	3.397	3.141	3.7424	10.37
74)	dibromochloromethane	2.294	2.590	2.754	2.606	2.637	2.546	2.392	2.200	2.5024	7.54
75) C	1,2-dibromoethane	2.199	2.598	2.691	2.536	2.561	2.422	2.302	2.094	2.4254	8.65
76)	butyl acetate		0.415	0.488	0.555	0.579	0.562	0.546	0.504	0.5212	10.92
77)	octane	1.353	1.750	1.883	1.733	1.709	1.639	1.542	1.434	1.6304	10.83
78) C	tetrachloroethene	2.342	2.552	2.642	2.289	2.262	2.140	1.978	1.763	2.2460	12.79
79)	1,1,1,2-tetrachloroethane	1.790	2.044	2.106	1.893	1.915	1.788	1.678	1.498	1.8389	10.67
80) C	chlorobenzene	4.292	4.707	4.748	4.227	4.188	3.973	3.602	3.130	4.1085	13.18
81) C	ethylbenzene	5.493	6.247	6.681	6.284	6.192	5.829	5.404	4.901	5.8789	9.90
82)	2-ethylthiophene	3.793	4.468	5.035	4.630	4.574	4.305	4.009	3.641	4.3069	10.85
83) C	m+p-xylene	4.335	5.436	5.818	5.181	5.054	4.720	4.322	3.811	4.8346	13.69
84) C	bromoform	1.768	2.010	2.186	2.232	2.264	2.199	2.137	1.891	2.0860	8.56
85) C	styrene	2.886	3.914	4.392	4.378	4.400	4.174	3.922	3.543	3.9510	13.29
86) C	1,1,2,2-tetrachloroethane	3.865	4.381	4.642	4.071	4.003	3.765	3.395	2.819	3.8676	14.68
87) C	o-xylene	4.408	5.585	5.979	5.331	5.153	4.806	4.326	3.697	4.9106	15.22
88)	1,2,3-trichloropropane	2.827	3.176	3.418	3.112	3.088	2.899	2.709	2.453	2.9602	10.19
89)	nonane	4.069	5.181	5.484	4.933	4.816	4.321	3.814	3.216	4.4791	16.99
90) s	bromofluorobenzene	4.303	4.376	4.417	4.413	4.337	4.232	4.025	4.022	4.2657	3.78
91) C	isopropylbenzene	6.733	7.599	8.071	7.280	7.141	6.678	6.033	5.312	6.8560	12.81
92)	bromobenzene	3.455	4.038	4.148	3.824	3.823	3.646	3.397	3.080	3.6764	9.64
93)	2-chlorotoluene	1.836	2.176	2.302	2.140	2.121	1.977	1.871	1.712	2.0168	9.95
94)	n-propylbenzene	1.711	2.224	2.524	2.360	2.295	2.162	2.047	1.848	2.1463	12.51
95)	4-chlorotoluene	1.559	2.151	2.319	2.148	2.116	1.958	1.864	1.714	1.9785	12.86
96)	4-ethyl toluene	5.958	7.836	8.669	8.260	8.187	7.562	6.871	5.998	7.4177	13.96
97)	1,3,5-trimethylbenzene	5.695	7.188	7.584	6.715	6.614	6.882	5.588	4.907	6.3967	14.21
98)	tert-butylbenzene	5.693	7.065	7.640	6.957	6.727	6.153	5.404	4.336	6.2468	17.14
99)	1,2,4-trimethylbenzene	5.201	6.636	7.194	6.628	6.523	5.990	5.252	4.283	5.9635	16.32
100)	decane	3.814	4.934	5.263	4.729	4.641	4.222	3.943	3.526	4.3839	13.75
101) C	Benzyl Chloride	1.516	2.236	2.536	3.158	3.800	3.782	3.928	3.696	3.0813	28.95
102)	1,3-dichlorobenzene	3.146	4.508	5.146	4.765	4.784	4.433	4.044	3.506	4.2915	15.89
103) C	1,4-dichlorobenzene	2.881	4.183	4.831	4.571	4.692	4.433	4.081	3.633	4.1630	15.45
104)	sec-butylbenzene	0.826	1.005	1.081	0.965	0.944	0.857	0.771	0.660	0.8887	15.38
105)	1,2,3-trimethylbenzene	6.764	8.034	8.527	7.552	7.373	6.684	5.777	4.647	6.9198	18.10
106)	p-isopropyltoluene	6.977	8.802	9.441	8.482	8.302	7.522	6.494	5.018	7.6297	18.79
107)	1,2-dichlorobenzene	3.470	4.431	5.052	4.579	4.559	4.188	3.928	3.546	4.2190	12.94
108)	n-butylbenzene	5.019	6.784	7.473	6.969	6.858	6.201	5.718	5.158	6.2724	14.33

Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRLAB16
Calibration dates : 08/29/21 20:26 08/30/21 01:03
Lab Number : L2153634
Project Number : 100849501
Ical Ref : ICAL18260

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

Compound		0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
109)	indan	6.528	8.116	8.910	8.154	8.099	7.392	6.727	5.729	7.4568	14.18
110)	indene	4.083	5.489	6.283	6.284	6.453	5.940	5.596	4.936	5.6331	14.27
111) C	1,2-dibromo-3-chloropropane	1.007	1.362	1.516	1.574	1.647	1.559	1.521	1.405	1.4490	13.85
112)	undecane	3.056	4.824	5.454	5.115	5.212	4.648	4.308	3.708	4.5404	17.97
113)	1,2,4,5-tetramethylbenzene	2.655	3.870	4.388	3.997	4.174	4.051	3.900	3.604	3.8299	13.76
114)	dodecane	1.025	3.361	4.751	4.566	5.325	4.197	4.212	3.533	3.8712	33.92#
115) C	1,2,4-trichlorobenzene	0.546	1.308	1.779	2.237	2.780	2.478	2.646	2.393	2.0210	37.88#
116)	naphthalene	2.425	6.041	7.974	7.779	8.822	7.397	7.521	6.839	6.8496	28.67
117)	1,2,3-trichlorobenzene	0.747	1.897	2.340	2.422	2.882	2.328	2.461	2.279	2.1695	29.26
118)	benzothiophene	0.216	0.631	0.901	1.021	1.268	1.132	1.151	0.961	0.9101	37.38#
119) C	hexachlorobutadiene	1.597	2.522	2.737	2.318	2.556	2.089	2.030	1.718	2.1959	18.61
120)	2-methylnaphthalene			0.683	0.665	1.320	1.043	1.753	1.769	1.2055	41.02#
121)	1-methylnaphthalene			2.052	1.710	2.885	2.029	3.127	2.981	2.4642	24.43

Response Factor Report

Method Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Method File : TFS16_210829.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Aug 30 06:00:53 2021
 Response Via : Initial Calibration

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

Compound		0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
-----		-----									
1) I	bromochloromethane	-----ISTD-----									
2)	chlorodifluoromethane	0.894	0.915	0.920	0.803	0.782	0.731	0.689	0.647	0.7975	13.17
3)	propylene		0.514	0.511	0.422	0.419	0.389	0.339	0.327	0.4173	17.83
4)	propane		0.664	0.637	0.549	0.540	0.516	0.494	0.471	0.5531	13.01
5)	dichlorodifluoromethane	1.091	1.120	1.141	0.987	0.956	0.906	0.839	0.781	0.9775	13.60
6) C	chloromethane	0.496	0.539	0.513	0.440	0.424	0.401	0.370	0.334	0.4396	16.41
7)	Freon-114	1.227	1.321	1.331	1.137	1.100	1.037	0.944	0.818	1.1142	16.13
8) C	methanol			0.264	0.200	0.201	0.188	0.179	0.166	0.1999	17.10
9) C	vinyl chloride	0.480	0.496	0.502	0.436	0.427	0.411	0.394	0.371	0.4397	11.04
10) C	1,3-butadiene	0.426	0.428	0.426	0.378	0.373	0.355	0.333	0.302	0.3777	12.46
11)	butane	0.788	0.810	0.823	0.687	0.652	0.611	0.560	0.506	0.6796	17.51
12) C	acetaldehyde		0.402	0.401	0.337	0.326	0.302	0.268	0.222	0.3224	20.49
13) C	bromomethane	0.417	0.450	0.466	0.390	0.384	0.368	0.346	0.328	0.3936	12.25
14) C	chloroethane	0.224	0.240	0.246	0.207	0.203	0.195	0.185	0.181	0.2102	11.63
15)	ethanol			0.410	0.364	0.364	0.328	0.285	0.250	0.3333	17.51
16)	dichlorofluoromethane	0.948	0.951	0.935	0.806	0.785	0.741	0.705	0.640	0.8138	14.69
17) C	vinyl bromide	0.414	0.444	0.445	0.391	0.387	0.369	0.340	0.324	0.3892	11.40
18) C	acrolein		0.202	0.202	0.180	0.183	0.177	0.170	0.165	0.1828	7.97
19)	acetone	0.781	0.796	0.796	0.665	0.648	0.591	0.512	0.459	0.6561	19.85
20) C	acetonitrile	0.436	0.436	0.441	0.367	0.362	0.339	0.314	0.300	0.3744	15.21
21)	trichlorofluoromethane	0.825	0.856	0.849	0.730	0.720	0.801	0.642	0.621	0.7556	12.09
22)	isopropyl alcohol	0.817	0.865	0.872	0.757	0.750	0.912	0.642	0.584	0.7750	14.89
23) C	acrylonitrile	0.379	0.414	0.400	0.350	0.343	0.401	0.327	0.308	0.3652	10.65
24)	pentane	0.907	0.908	0.863	0.741	0.719	0.939	0.648	0.600	0.7906	16.51
25)	ethyl ether	0.790	0.828	0.882	0.709	0.722	0.781	0.656	0.724	0.7615	9.56
26) C	1,1-dichloroethene	0.665	0.666	0.800	0.584	0.580	0.660	0.531	0.512	0.6248	14.85
27)	tertiary butyl alcohol		0.716	0.753	0.692	0.637	0.701	0.622	0.646	0.6809	7.00
28) C	methylene chloride		0.668	0.788	0.664	0.562	0.626	0.469	0.548	0.6178	16.66
29) C	3-chloropropene	0.761	0.840	0.826	0.737	0.741	0.695	0.646	0.591	0.7298	11.57
30) C	carbon disulfide	1.568	1.717	1.787	1.629	1.650	1.606	1.497	1.389	1.6053	7.74
31)	Freon 113	1.106	1.168	1.193	1.018	0.994	0.944	0.869	0.802	1.0117	13.75

Response Factor Report

Method Path : O:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Method File : TFS16_210829.M
 Title : TO-14A/TO-15 SIM/Full Scan Analysis
 Last Update : Mon Aug 30 06:00:53 2021
 Response Via : Initial Calibration

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

Compound		0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
32)	trans-1,2-dichloroethene	0.734	0.811	0.818	0.739	0.739	0.704	0.664	0.629	0.7296	8.93
33) C	1,1-dichloroethane	0.937	1.024	1.026	0.897	0.883	0.838	0.788	0.739	0.8914	11.58
34) C	MTBE	1.074	1.213	1.268	1.205	1.226	1.178	1.111	1.043	1.1647	6.84
35) C	vinyl acetate			1.289	1.194	1.209	1.170	1.143	1.050	1.1758	6.71
36) C	2-butanone		1.355	1.428	1.345	1.280	1.258	1.178	1.007	1.2644	10.96
37)	cis-1,2-dichloroethene	0.682	0.699	0.722	0.652	0.657	0.621	0.594	0.559	0.6483	8.44
38)	Ethyl Acetate		0.180	0.182	0.184	0.191	0.173	0.169	0.162	0.1773	5.55
39) C	chloroform	0.974	1.020	1.052	0.917	0.910	0.878	0.827	0.759	0.9173	10.66
40)	Tetrahydrofuran		0.732	0.767	0.743	0.755	0.704	0.660	0.596	0.7083	8.62
41)	2,2-dichloropropane	0.610	0.693	0.709	0.641	0.650	0.636	0.604	0.560	0.6379	7.59
42) C	1,2-dichloroethane	0.584	0.628	0.624	0.548	0.536	0.508	0.479	0.454	0.5451	11.76
43) I	1,4-difluorobenzene	-----ISTD-----									
44) C	hexane	0.305	0.331	0.346	0.324	0.323	0.311	0.301	0.287	0.3161	5.93
45)	diisopropyl ether	0.143	0.175	0.176	0.161	0.161	0.154	0.150	0.144	0.1579	8.07
46)	tert-butyl ethyl ether	0.446	0.529	0.557	0.515	0.517	0.500	0.490	0.480	0.5043	6.66
47) s	1,2-dichloroethane-D4	0.267	0.265	0.260	0.261	0.258	0.249	0.245	0.238	0.2555	4.01
48) C	1,1,1-trichloroethane	0.303	0.322	0.329	0.292	0.293	0.281	0.273	0.261	0.2945	7.90
49)	1,1-dichloropropene	0.271	0.291	0.310	0.293	0.302	0.289	0.281	0.265	0.2875	5.25
50) C	benzene	0.855	0.797	0.796	0.689	0.685	0.660	0.639	0.602	0.7154	12.53
51)	thiophene	0.329	0.383	0.403	0.376	0.379	0.370	0.362	0.345	0.3683	6.22
52) C	carbon tetrachloride	0.272	0.308	0.322	0.289	0.293	0.287	0.279	0.265	0.2894	6.41
53)	cyclohexane	0.304	0.343	0.370	0.347	0.347	0.335	0.329	0.323	0.3373	5.82
54)	tert-amyl methyl ether	0.453	0.498	0.523	0.498	0.505	0.491	0.481	0.455	0.4879	4.92
55)	dibromomethane	0.226	0.244	0.239	0.214	0.210	0.198	0.193	0.181	0.2131	10.49
56) C	1,2-dichloropropane	0.251	0.270	0.270	0.239	0.235	0.221	0.213	0.200	0.2375	10.73
57)	bromodichloromethane	0.345	0.389	0.404	0.379	0.387	0.376	0.370	0.349	0.3749	5.26
58) C	1,4-dioxane	0.121	0.147	0.159	0.152	0.155	0.148	0.146	0.138	0.1457	8.19
59) C	trichloroethene	0.304	0.327	0.333	0.303	0.302	0.285	0.275	0.256	0.2981	8.63
60) C	2,2,4-trimethylpentane	1.004	1.147	1.222	1.109	1.072	1.016	0.971	0.919	1.0574	9.42
61)	methyl methacrylate		0.323	0.340	0.355	0.359	0.338	0.325	0.296	0.3336	6.40
62)	heptane	0.451	0.533	0.563	0.517	0.506	0.465	0.431	0.383	0.4809	12.31

Response Factor Report

Method Path : O:\Forensics\Data\AirLab16\2021\08\0829T_I\
 Method File : TFS16_210829.M
 Title : TO-14A/TO-15 SIM/Full Scan Analysis
 Last Update : Mon Aug 30 06:00:53 2021
 Response Via : Initial Calibration

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

	Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
63) C	cis-1,3-dichloropropene	0.236	0.286	0.307	0.313	0.329	0.325	0.326	0.309	0.3040	10.09
64) C	4-methyl-2-pentanone		0.538	0.603	0.608	0.611	0.565	0.538	0.481	0.5634	8.54
65)	trans-1,3-dichloropropene	0.196	0.245	0.266	0.282	0.300	0.297	0.303	0.291	0.2723	13.45
66) C	1,1,2-trichloroethane	0.276	0.297	0.303	0.269	0.268	0.251	0.243	0.229	0.2669	9.62
67) I	chlorobenzene-D5	-----ISTD-----									
68) C	toluene	6.317	5.976	5.773	4.893	4.759	4.528	4.214	3.881	5.0426	17.47
69) s	toluene-D8	6.583	6.600	6.535	6.483	6.383	6.231	6.038	5.866	6.3397	4.28
70)	2-methylthiophene	3.728	4.139	4.299	3.819	3.778	3.572	3.334	3.103	3.7214	10.54
71)	1,3-dichloropropane	2.310	2.566	2.694	2.381	2.368	2.239	2.112	1.940	2.3265	10.28
72)	2-hexanone	1.785	2.905	3.329	3.367	3.423	3.227	3.013	2.703	2.9690	18.18
73)	3-methylthiophene	3.524	4.184	4.265	3.936	3.846	3.647	3.397	3.141	3.7424	10.37
74)	dibromochloromethane	2.294	2.590	2.754	2.606	2.637	2.546	2.392	2.200	2.5024	7.54
75) C	1,2-dibromoethane	2.199	2.598	2.691	2.536	2.561	2.422	2.302	2.094	2.4254	8.65
76)	butyl acetate		0.415	0.488	0.555	0.579	0.562	0.546	0.504	0.5212	10.92
77)	octane	1.353	1.750	1.883	1.733	1.709	1.639	1.542	1.434	1.6304	10.83
78) C	tetrachloroethene	2.342	2.552	2.642	2.289	2.262	2.140	1.978	1.763	2.2460	12.79
79)	1,1,1,2-tetrachloroethane	1.790	2.044	2.106	1.893	1.915	1.788	1.678	1.498	1.8389	10.67
80) C	chlorobenzene	4.292	4.707	4.748	4.227	4.188	3.973	3.602	3.130	4.1085	13.18
81) C	ethylbenzene	5.493	6.247	6.681	6.284	6.192	5.829	5.404	4.901	5.8789	9.90
82)	2-ethylthiophene	3.793	4.468	5.035	4.630	4.574	4.305	4.009	3.641	4.3069	10.85
83) C	m+p-xylene	4.335	5.436	5.818	5.181	5.054	4.720	4.322	3.811	4.8346	13.69
84) C	bromoform	1.768	2.010	2.186	2.232	2.264	2.199	2.137	1.891	2.0860	8.56
85) C	styrene	2.886	3.914	4.392	4.378	4.400	4.174	3.922	3.543	3.9510	13.29
86) C	1,1,2,2-tetrachloroethane	3.865	4.381	4.642	4.071	4.003	3.765	3.395	2.819	3.8676	14.68
87) C	o-xylene	4.408	5.585	5.979	5.331	5.153	4.806	4.326	3.697	4.9106	15.22
88)	1,2,3-trichloropropane	2.827	3.176	3.418	3.112	3.088	2.899	2.709	2.453	2.9602	10.19
89)	nonane	4.069	5.181	5.484	4.933	4.816	4.321	3.814	3.216	4.4791	16.99
90) s	bromofluorobenzene	4.303	4.376	4.417	4.413	4.337	4.232	4.025	4.022	4.2657	3.78
91) C	isopropylbenzene	6.733	7.599	8.071	7.280	7.141	6.678	6.033	5.312	6.8560	12.81
92)	bromobenzene	3.455	4.038	4.148	3.824	3.823	3.646	3.397	3.080	3.6764	9.64
93)	2-chlorotoluene	1.836	2.176	2.302	2.140	2.121	1.977	1.871	1.712	2.0168	9.95

Response Factor Report

Method Path : O:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Method File : TFS16_210829.M
 Title : TO-14A/TO-15 SIM/Full Scan Analysis
 Last Update : Mon Aug 30 06:00:53 2021
 Response Via : Initial Calibration

Calibration Files

0.2 =r1626185.D 0.5 =r1626186.D 1.0 =r1626187.D 5.0 =r1626188.D 10 =r1626189.D 20 =r1626190.D
 50 =r1626191.D 100 =r1626192.D

Compound		0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
94)	n-propylbenzene	1.711	2.224	2.524	2.360	2.295	2.162	2.047	1.848	2.1463	12.51
95)	4-chlorotoluene	1.559	2.151	2.319	2.148	2.116	1.958	1.864	1.714	1.9785	12.86
96)	4-ethyl toluene	5.958	7.836	8.669	8.260	8.187	7.562	6.871	5.998	7.4177	13.96
97)	1,3,5-trimethylbenzene	5.695	7.188	7.584	6.715	6.614	6.882	5.588	4.907	6.3967	14.21
98)	tert-butylbenzene	5.693	7.065	7.640	6.957	6.727	6.153	5.404	4.336	6.2468	17.14
99)	1,2,4-trimethylbenzene	5.201	6.636	7.194	6.628	6.523	5.990	5.252	4.283	5.9635	16.32
100)	decane	3.814	4.934	5.263	4.729	4.641	4.222	3.943	3.526	4.3839	13.75
101) C	Benzyl Chloride	1.516	2.236	2.536	3.158	3.800	3.782	3.928	3.696	3.0813	28.95
102)	1,3-dichlorobenzene	3.146	4.508	5.146	4.765	4.784	4.433	4.044	3.506	4.2915	15.89
103) C	1,4-dichlorobenzene	2.881	4.183	4.831	4.571	4.692	4.433	4.081	3.633	4.1630	15.45
104)	sec-butylbenzene	0.826	1.005	1.081	0.965	0.944	0.857	0.771	0.660	0.8887	15.38
105)	1,2,3-trimethylbenzene	6.764	8.034	8.527	7.552	7.373	6.684	5.777	4.647	6.9198	18.10
106)	p-isopropyltoluene	6.977	8.802	9.441	8.482	8.302	7.522	6.494	5.018	7.6297	18.79
107)	1,2-dichlorobenzene	3.470	4.431	5.052	4.579	4.559	4.188	3.928	3.546	4.2190	12.94
108)	n-butylbenzene	5.019	6.784	7.473	6.969	6.858	6.201	5.718	5.158	6.2724	14.33
109)	indan	6.528	8.116	8.910	8.154	8.099	7.392	6.727	5.729	7.4568	14.18
110)	indene	4.083	5.489	6.283	6.284	6.453	5.940	5.596	4.936	5.6331	14.27
111) C	1,2-dibromo-3-chloropropane	1.007	1.362	1.516	1.574	1.647	1.559	1.521	1.405	1.4490	13.85
112)	undecane	3.056	4.824	5.454	5.115	5.212	4.648	4.308	3.708	4.5404	17.97
113)	1,2,4,5-tetramethylbenzene	2.655	3.870	4.388	3.997	4.174	4.051	3.900	3.604	3.8299	13.76
114)	dodecane	1.025	3.361	4.751	4.566	5.325	4.197	4.212	3.533	3.8712	33.92#
115) C	1,2,4-trichlorobenzene	0.546	1.308	1.779	2.237	2.780	2.478	2.646	2.393	2.0210	37.88#
116)	naphthalene	2.425	6.041	7.974	7.779	8.822	7.397	7.521	6.839	6.8496	28.67
117)	1,2,3-trichlorobenzene	0.747	1.897	2.340	2.422	2.882	2.328	2.461	2.279	2.1695	29.26
118)	benzothiophene	0.216	0.631	0.901	1.021	1.268	1.132	1.151	0.961	0.9101	37.38#
119) C	hexachlorobutadiene	1.597	2.522	2.737	2.318	2.556	2.089	2.030	1.718	2.1959	18.61
120)	2-methylnaphthalene			0.683	0.665	1.320	1.043	1.753	1.769	1.2055	41.02#
121)	1-methylnaphthalene			2.052	1.710	2.885	2.029	3.127	2.981	2.4642	24.43

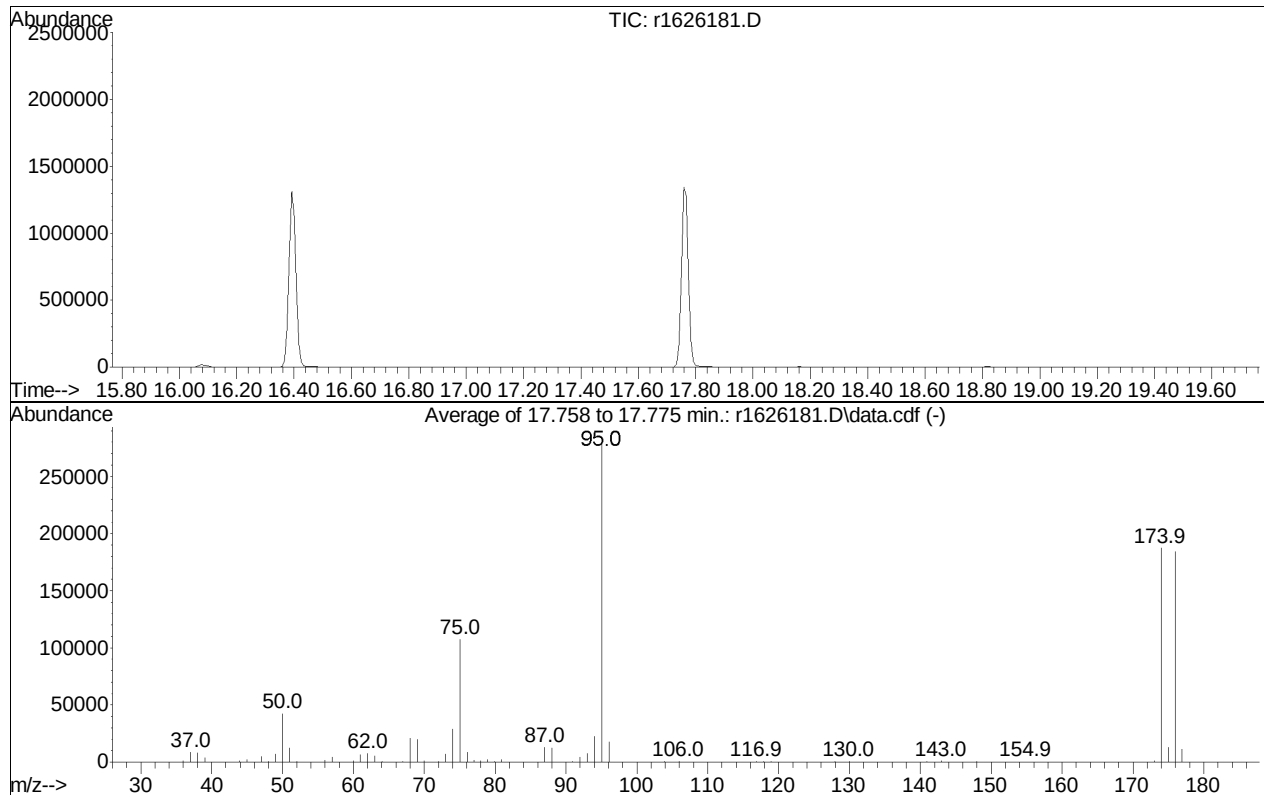
(#) = Out of Range

BFB

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626181.D
 Acq On : 29 Aug 2021 5:51 PM
 Operator : AIRLAB16:TS
 Sample : WG1540703-1,3,250,250
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Integration File: rteint.p

Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Aug 30 06:00:53 2021



Spectrum Information: Average of 17.758 to 17.775 min.

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	15.1	42329	PASS
75	95	30	66	38.4	107400	PASS
95	95	100	100	100.0	279630	PASS
96	95	5	9	6.5	18121	PASS
173	174	0.00	2	0.6	1076	PASS
174	95	50	120	67.0	187388	PASS
175	174	4	9	6.9	12947	PASS
176	174	93	101	98.3	184192	PASS
177	176	5	9	6.2	11413	PASS

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626185.D
 Acq On : 29 Aug 2021 8:26 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 31 11:40:30 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.408	49	351096	10.000	ppbV	0.00
Standard Area = 378800			Recovery =		92.69%	
43) 1,4-difluorobenzene	11.680	114	917088	10.000	ppbV	0.00
Standard Area = 984697			Recovery =		93.13%	
67) chlorobenzene-D5	16.400	54	141861	10.000	ppbV	0.00
Standard Area = 156202			Recovery =		90.82%	
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.300	65	244810	10.352	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		103.52%	
69) toluene-D8	14.517	98	933809	10.312	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		103.12%	
90) bromofluorobenzene	17.758	95	610387	9.920	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		99.20%	
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.784	51	6278	0.229	ppbV	99
3) propylene	3.808	41	3597M6	0.244	ppbV	
4) propane	3.832	29	5088	0.268	ppbV #	89
5) dichlorodifluoromethane	3.886	85	7664	0.228	ppbV	99
6) chloromethane	4.066	50	3483	0.234	ppbV	90
7) Freon-114	4.186	85	8616	0.223	ppbV	95
8) methanol	4.282	31	9870	1.398	ppbV #	34
9) vinyl chloride	4.318	62	3370	0.225	ppbV	97
10) 1,3-butadiene	4.480	54	2992	0.228	ppbV	91
11) butane	4.534	43	5534	0.242	ppbV	98
12) acetaldehyde	4.222	29	13909	1.216	ppbV #	88
13) bromomethane	4.786	94	2931	0.217	ppbV	99
14) chloroethane	5.002	64	1576	0.221	ppbV	90
15) ethanol	5.212	31	14071	1.102	ppbV	96
16) dichlorofluoromethane	5.134	67	6660	0.242	ppbV #	94
17) vinyl bromide	5.423	106	2907	0.214	ppbV	93
18) acrolein	5.610	56	1329	0.207	ppbV #	80
19) acetone	5.790	43	27417	1.206	ppbV #	95
20) acetonitrile	5.450	41	3061	0.241	ppbV	96
21) trichlorofluoromethane	5.940	101	5794	0.229	ppbV	97
22) isopropyl alcohol	6.133	45	14350	0.545	ppbV #	96
23) acrylonitrile	6.337	53	2661	0.221	ppbV	93
24) pentane	6.377	43	6372	0.252	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626185.D
 Acq On : 29 Aug 2021 8:26 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 31 11:40:30 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.467	31	5549	0.219	ppbV	94
26) 1,1-dichloroethene	6.706	61	4668	0.229	ppbV	90
27) tertiary butyl alcohol	6.880	59	4799	0.215	ppbV #	73
28) methylene chloride	6.874	49	5430	0.275	ppbV	87
29) 3-chloropropene	7.012	41	5347	0.206	ppbV	97
30) carbon disulfide	7.156	76	11007	0.190	ppbV #	73
31) Freon 113	7.198	101	7763	0.222	ppbV	97
32) trans-1,2-dichloroethene	7.992	61	5154	0.199	ppbV	96
33) 1,1-dichloroethane	8.225	63	6580	0.212	ppbV	94
34) MTBE	8.367	73	7539	0.175	ppbV #	92
35) vinyl acetate	8.475	43	7853	0.185	ppbV	97
36) 2-butanone	8.775	43	8792	0.196	ppbV	97
37) cis-1,2-dichloroethene	9.225	61	4787	0.207	ppbV	87
38) Ethyl Acetate	9.583	61	1682	0.251	ppbV #	23
39) chloroform	9.575	83	6842	0.214	ppbV	96
40) Tetrahydrofuran	10.083	42	4506	0.170	ppbV	91
41) 2,2-dichloropropane	9.592	77	4282	0.188	ppbV #	83
42) 1,2-dichloroethane	10.425	62	4104	0.218	ppbV #	95
44) hexane	9.483	57	5601	0.189	ppbV #	71
45) diisopropyl ether	9.533	87	2632M6	0.178	ppbV	
46) tert-butyl ethyl ether	10.167	59	8184	0.173	ppbV	95
48) 1,1,1-trichloroethane	10.708	97	5553	0.206	ppbV	99
49) 1,1-dichloropropene	11.080	75	4962	0.179	ppbV	98
50) benzene	11.240	78	15690	0.250	ppbV	99
51) thiophene	11.387	84	6039	0.174	ppbV	96
52) carbon tetrachloride	11.413	117	4996	0.186	ppbV	91
53) cyclohexane	11.547	56	5568	0.175	ppbV	97
54) tert-amyl methyl ether	11.987	73	8314	0.179	ppbV	96
55) dibromomethane	12.160	93	4144	0.215	ppbV	95
56) 1,2-dichloropropane	12.200	63	4601	0.213	ppbV	97
57) bromodichloromethane	12.427	83	6336	0.179	ppbV	99
58) 1,4-dioxane	12.527	88	2215	0.156	ppbV #	45
59) trichloroethene	12.473	130	5575	0.202	ppbV	89
60) 2,2,4-trimethylpentane	12.520	57	18418	0.187	ppbV	92
61) methyl methacrylate	12.760	41	4284	0.130	ppbV	99
62) heptane	12.847	43	8269	0.178	ppbV #	94
63) cis-1,3-dichloropropene	13.492	75	4335	0.143	ppbV	97
64) 4-methyl-2-pentanone	13.583	43	7871	0.141	ppbV	98
65) trans-1,3-dichloropropene	14.125	75	3589	0.130	ppbV	96
66) 1,1,2-trichloroethane	14.308	97	5054	0.206	ppbV	90

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626185.D
 Acq On : 29 Aug 2021 8:26 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 31 11:40:30 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.633	91	17922	0.265	ppbV	96
70) 2-methylthiophene	14.700	97	10577	0.197	ppbV	96
71) 1,3-dichloropropane	14.667	76	6554	0.195	ppbV	92
72) 2-hexanone	14.983	43	5064	0.104	ppbV #	83
73) 3-methylthiophene	14.900	97	9998	0.183	ppbV #	95
74) dibromochloromethane	15.083	129	6508	0.174	ppbV	97
75) 1,2-dibromoethane	15.342	107	6238	0.172	ppbV	94
76) butyl acetate	15.625	73	639M6	0.078	ppbV	
77) octane	15.675	85	3839	0.158	ppbV #	76
78) tetrachloroethene	15.800	166	6645	0.207	ppbV	92
79) 1,1,1,2-tetrachloroethane	16.425	131	5079	0.187	ppbV	94
80) chlorobenzene	16.433	112	12176	0.205	ppbV	98
81) ethylbenzene	16.783	91	15586	0.177	ppbV	98
82) 2-ethylthiophene	16.817	97	10762	0.166	ppbV	94
83) m+p-xylene	16.942	91	24596	0.343	ppbV	99
84) bromoform	17.008	173	5016	0.156	ppbV	98
85) styrene	17.267	104	8188	0.131	ppbV	97
86) 1,1,2,2-tetrachloroethane	17.358	83	10967	0.193	ppbV	99
87) o-xylene	17.358	91	12506	0.171	ppbV	100
88) 1,2,3-trichloropropane	17.483	75	8021	0.183	ppbV #	93
89) nonane	17.558	43	11544	0.169	ppbV	99
91) isopropylbenzene	17.883	105	19102	0.189	ppbV	97
92) bromobenzene	17.958	77	9804	0.181	ppbV	99
93) 2-chlorotoluene	18.292	126	5208	0.173	ppbV	89
94) n-propylbenzene	18.317	120	4855	0.149	ppbV	92
95) 4-chlorotoluene	18.350	126	4422	0.147	ppbV	96
96) 4-ethyl toluene	18.450	105	16904	0.146	ppbV	99
97) 1,3,5-trimethylbenzene	18.508	105	16159	0.172	ppbV	98
98) tert-butylbenzene	18.850	119	16153	0.169	ppbV	97
99) 1,2,4-trimethylbenzene	18.858	105	14756	0.159	ppbV	98
100) decane	18.942	57	10820	0.164	ppbV	96
101) Benzyl Chloride	18.983	91	4300	0.080	ppbV	95
102) 1,3-dichlorobenzene	18.992	146	8925	0.132	ppbV	97
103) 1,4-dichlorobenzene	19.050	146	8173	0.123	ppbV	96
104) sec-butylbenzene	19.083	105	23436	0.175	ppbV	99
105) 1,2,3-trimethylbenzene	19.217	105	19191	0.183	ppbV	98
106) p-isopropyltoluene	19.217	119	19796	0.168	ppbV	99
107) 1,2-dichlorobenzene	19.342	146	9845	0.152	ppbV	97
108) n-butylbenzene	19.575	91	14240	0.146	ppbV	95
109) indan	19.392	117	18520	0.161	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626185.D
 Acq On : 29 Aug 2021 8:26 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 31 11:40:30 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

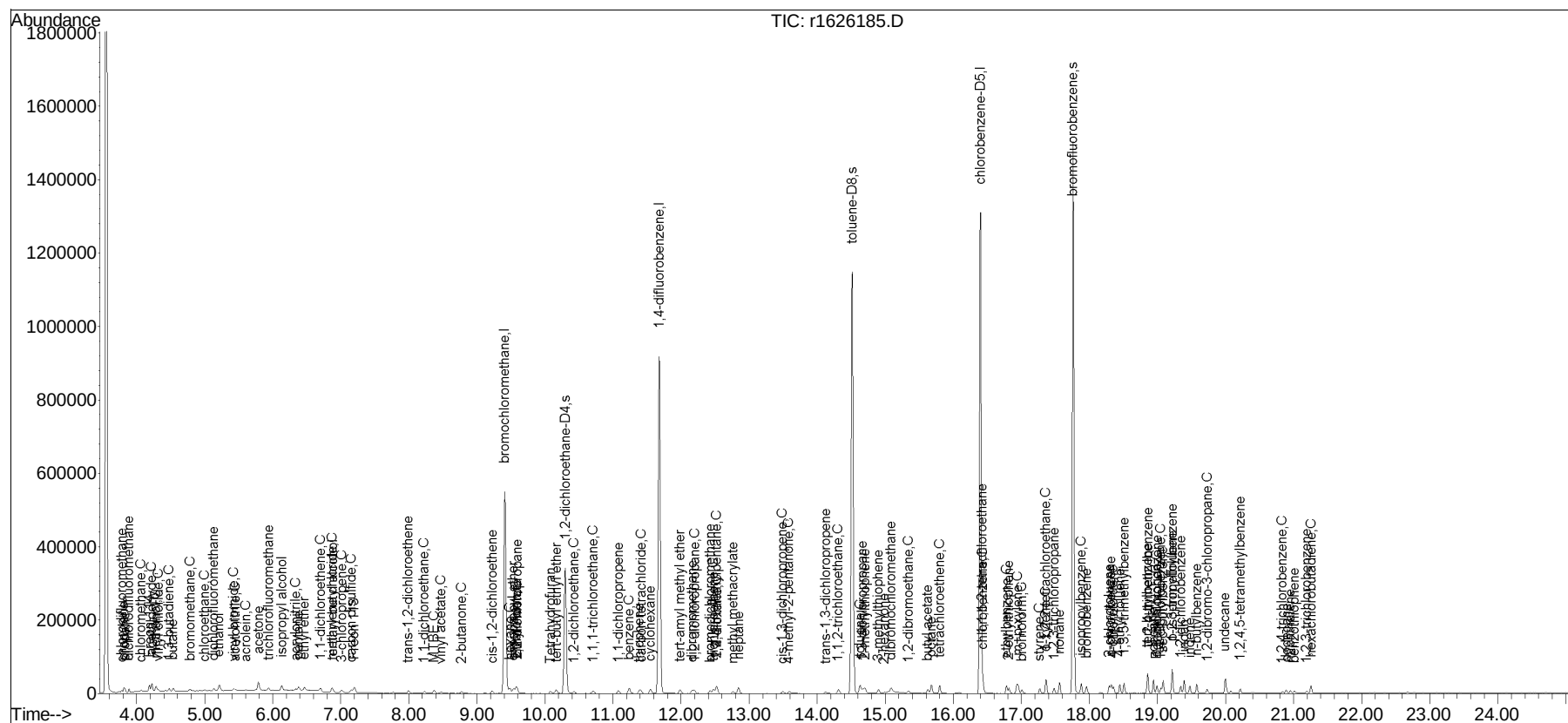
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.475	115	11584	0.127	ppbV	96
111)	1,2-dibromo-3-chloropr...	19.733	75	2857	0.122	ppbV	83
112)	undecane	19.992	57	8670	0.117	ppbV	100
113)	1,2,4,5-tetramethylben...	20.217	119	7534	0.127	ppbV #	96
114)	dodecane	20.892	57	2909M6	0.039	ppbV	
115)	1,2,4-trichlorobenzene	20.833	180	1550M6	0.039	ppbV	
116)	naphthalene	20.950	128	6879	0.055	ppbV #	95
117)	1,2,3-trichlorobenzene	21.192	180	2118	0.052	ppbV	95
118)	benzothiophene	21.008	134	6128M6	0.034	ppbV	
119)	hexachlorobutadiene	21.258	225	4532	0.125	ppbV	95
120)	2-methylnaphthalene	0.000		0	N.D.		
121)	1-methylnaphthalene	0.000		0	N.D.		

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


```
Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
Data File : r1626185.D
Acq On    : 29 Aug 2021    8:26 PM
Operator  : AIRLAB16:TS
Sample    : IT015-LLSTD0.2
Misc      : WG1540703
ALS Vial  : 0    Sample Multiplier: 1
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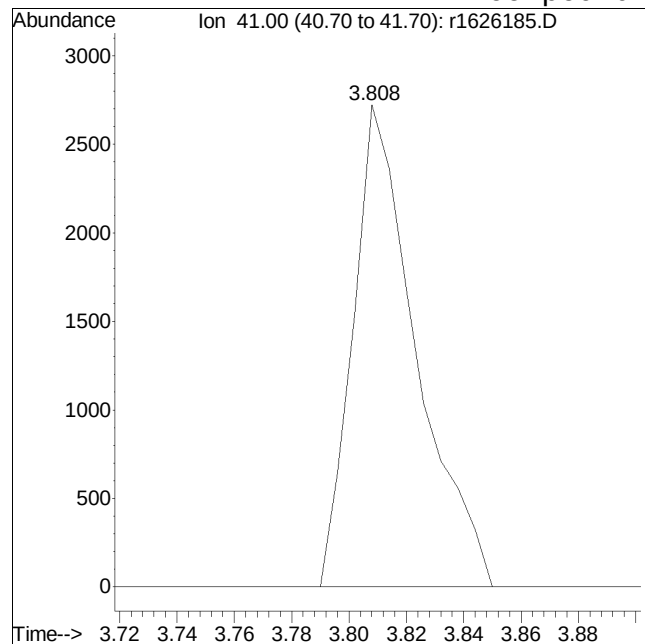
Quant Time: Aug 31 11:40:30 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 05:38:26 2021
Response via : Initial Calibration



Manual Integration Report

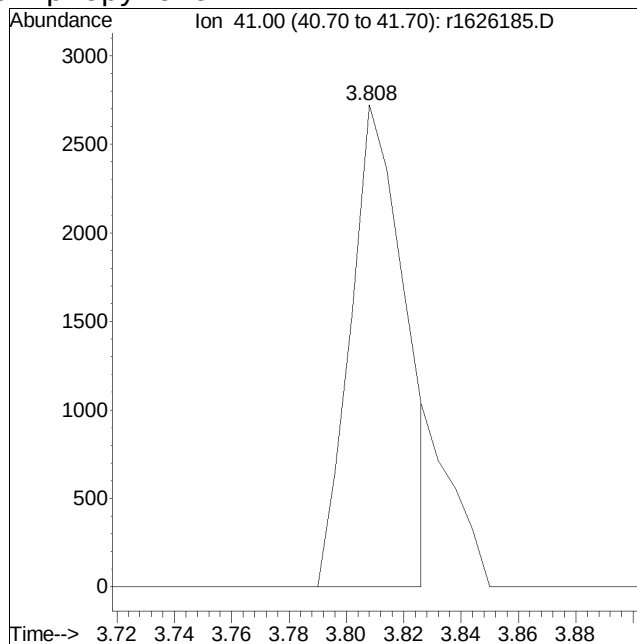
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Data File : r1626185.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:8: 6 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 8/30/2021 5:38 am

Compound #3: propylene



Original Peak Response = 4171

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

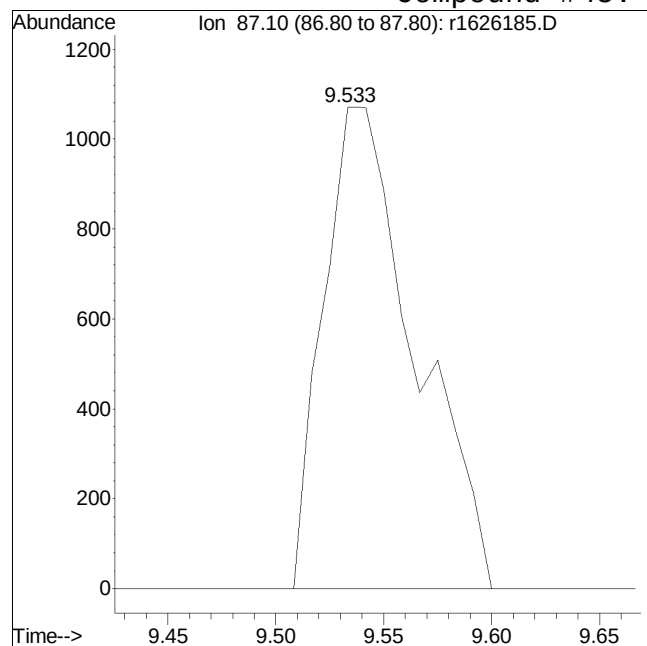


Manual Peak Response = 3597 M6

Manual Integration Report

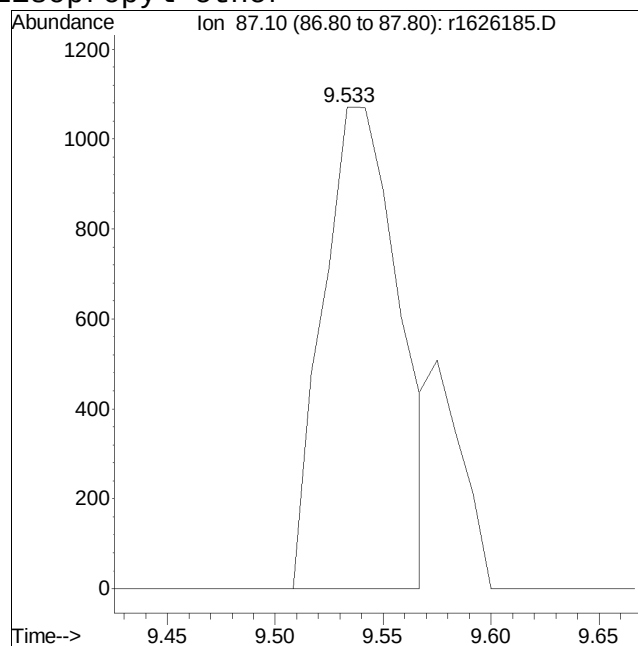
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626185.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:8: 6 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 8/30/2021 5:38 am

Compound #45: diisopropyl ether



Original Peak Response = 3167

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

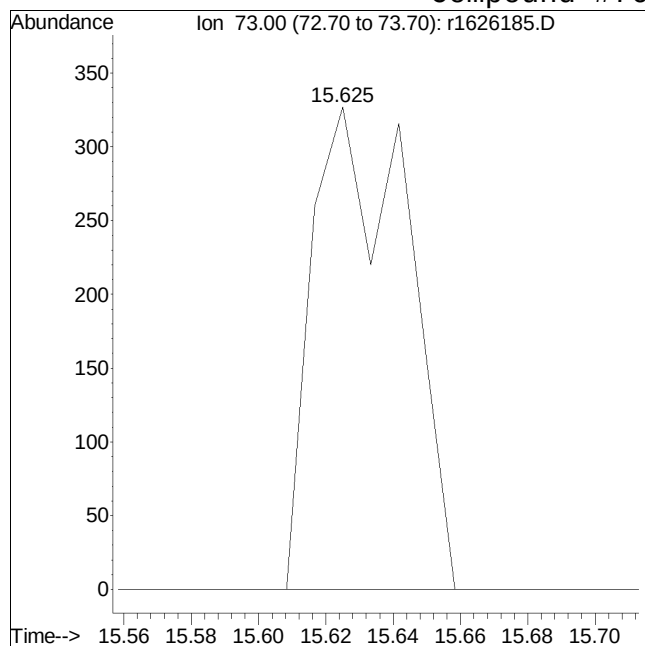


Manual Peak Response = 2632 M6

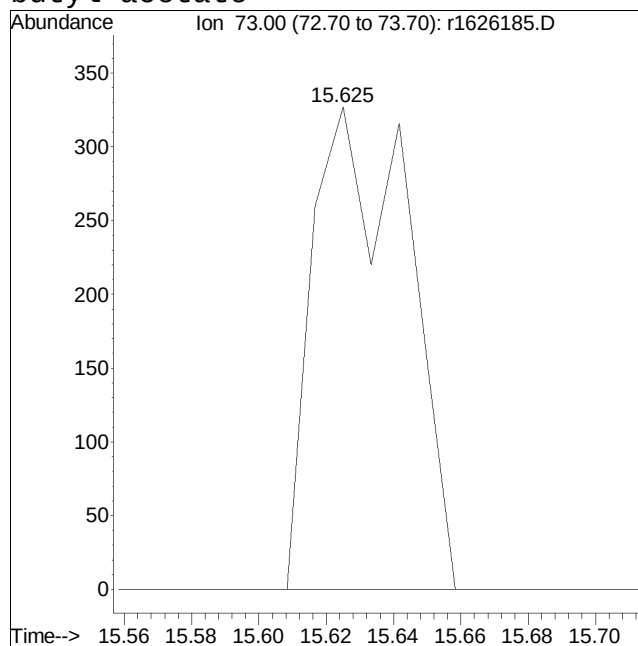
Manual Integration Report

Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626185.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:8: 6 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 8/30/2021 5:38 am

Compound #76: butyl acetate



Original Peak Response = 639



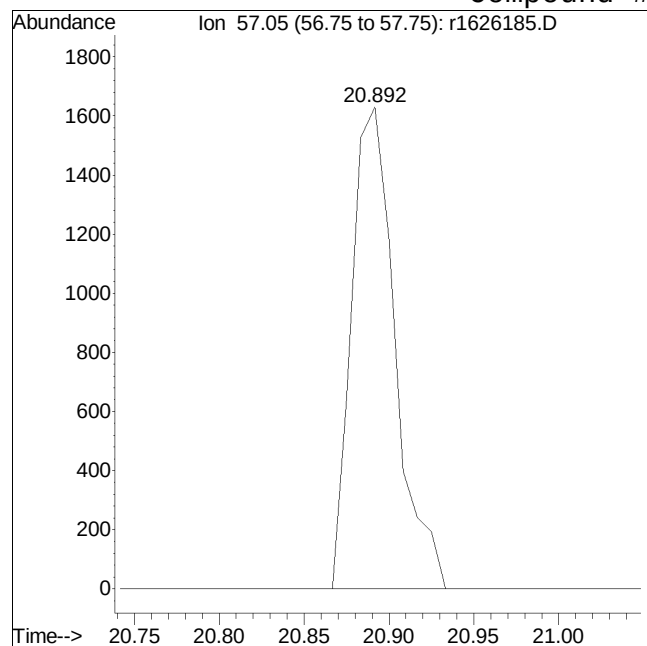
Manual Peak Response = 639 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

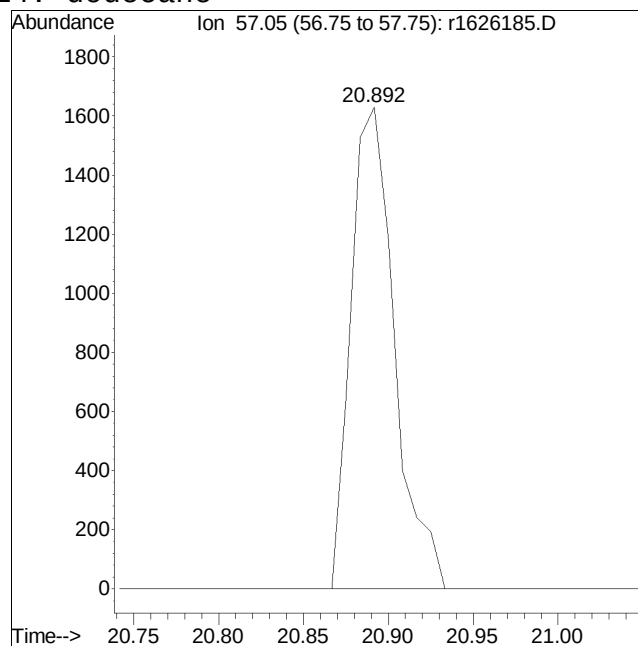
Manual Integration Report

Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626185.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:8: 6 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 8/30/2021 5:38 am

Compound #114: dodecane



Original Peak Response = 2909



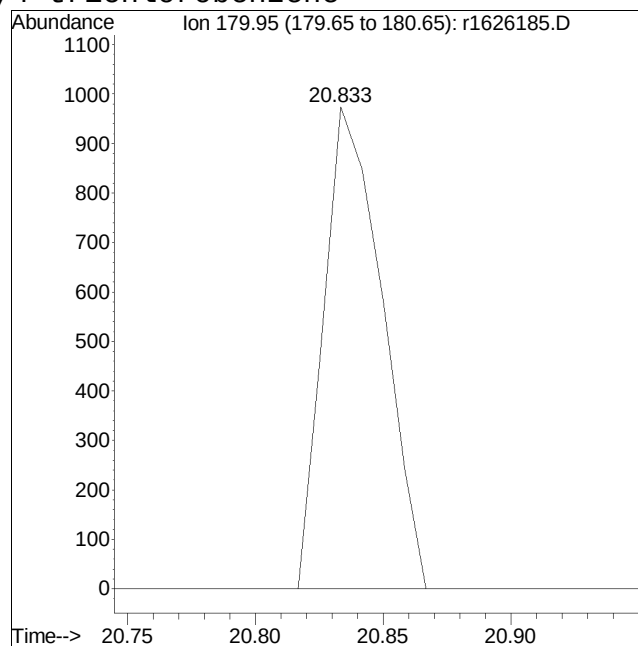
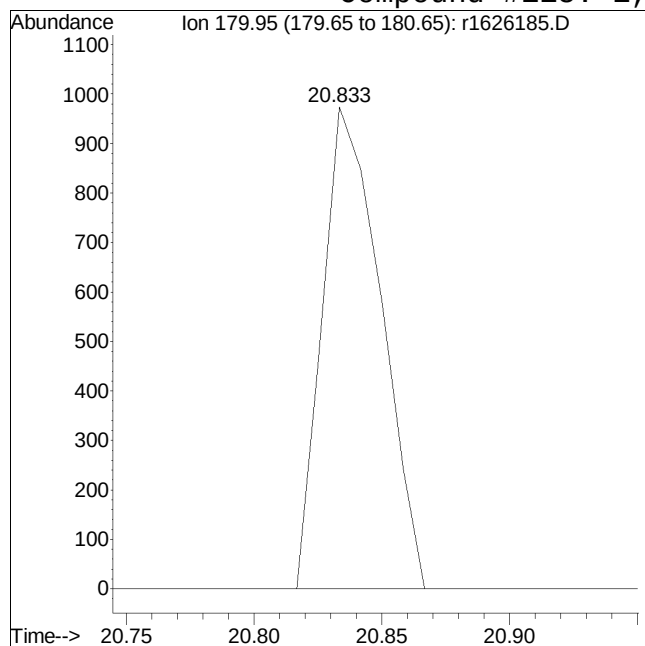
Manual Peak Response = 2909 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Manual Integration Report

Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626185.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:8: 6 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 8/30/2021 5:38 am

Compound #115: 1,2,4-trichlorobenzene



Original Peak Response = 1550

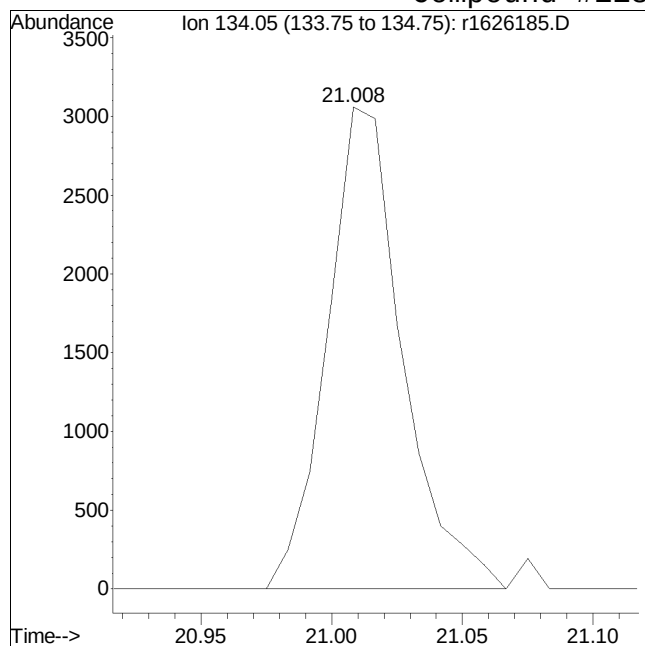
Manual Peak Response = 1550 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Manual Integration Report

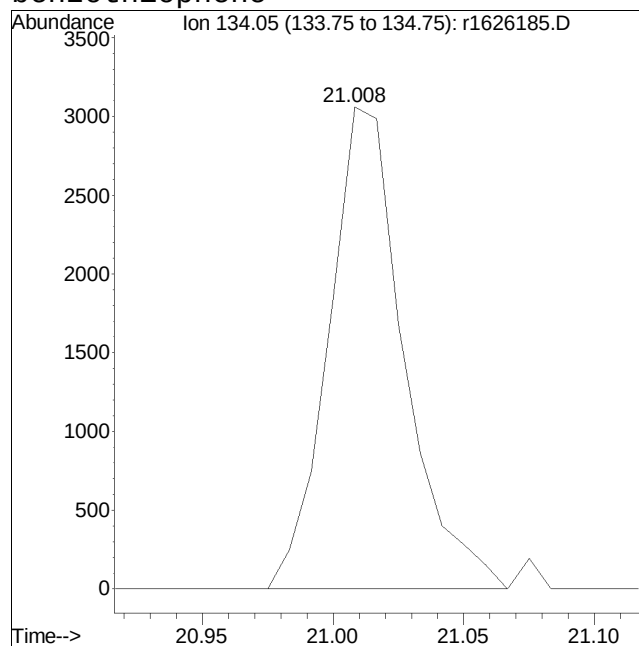
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626185.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:8: 6 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 8/30/2021 5:38 am

Compound #118: benzothiophene



Original Peak Response = 6128

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 6128 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626186.D
 Acq On : 29 Aug 2021 9:05 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:59:42 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.408	49	359291	10.000	ppbV	0.00
Standard Area = 378800			Recovery =	94.85%		
43) 1,4-difluorobenzene	11.673	114	930535	10.000	ppbV	0.00
Standard Area = 984697			Recovery =	94.50%		
67) chlorobenzene-D5	16.400	54	144311	10.000	ppbV	0.00
Standard Area = 156202			Recovery =	92.39%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.292	65	246986	10.293	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	102.93%		
69) toluene-D8	14.508	98	952420	10.339	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	103.39%		
90) bromofluorobenzene	17.767	95	631449	10.088	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	100.88%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.784	51	16431	0.585	ppbV	99
3) propylene	3.808	41	9232M6	0.613	ppbV	
4) propane	3.832	29	11922	0.614	ppbV #	91
5) dichlorodifluoromethane	3.886	85	20113	0.586	ppbV	95
6) chloromethane	4.066	50	9691	0.636	ppbV	98
7) Freon-114	4.186	85	23729	0.601	ppbV	96
8) methanol	4.282	31	24245	3.356	ppbV #	75
9) vinyl chloride	4.318	62	8907	0.580	ppbV	99
10) 1,3-butadiene	4.474	54	7696	0.574	ppbV	92
11) butane	4.534	43	14556	0.622	ppbV	97
12) acetaldehyde	4.222	29	36073	3.081	ppbV	95
13) bromomethane	4.780	94	8083	0.586	ppbV	94
14) chloroethane	4.996	64	4318	0.592	ppbV	89
15) ethanol	5.206	31	37821	2.895	ppbV	92
16) dichlorofluoromethane	5.134	67	17081	0.605	ppbV	98
17) vinyl bromide	5.420	106	7975	0.574	ppbV	97
18) acrolein	5.597	56	3633	0.552	ppbV #	79
19) acetone	5.770	43	71529	3.074	ppbV	95
20) acetonitrile	5.440	41	7838	0.603	ppbV	99
21) trichlorofluoromethane	5.933	101	15383	0.595	ppbV	99
22) isopropyl alcohol	6.117	45	38852	1.441	ppbV	100
23) acrylonitrile	6.327	53	7431	0.603	ppbV	95
24) pentane	6.370	43	16319	0.632	ppbV	97

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626186.D
 Acq On : 29 Aug 2021 9:05 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:59:42 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.450	31	14882	0.573	ppbV	97
26) 1,1-dichloroethene	6.694	61	11958	0.573	ppbV	99
27) tertiary butyl alcohol	6.862	59	12862	0.562	ppbV #	87
28) methylene chloride	6.862	49	12001	0.594	ppbV	98
29) 3-chloropropene	7.006	41	15094	0.567	ppbV	96
30) carbon disulfide	7.144	76	30844	0.520	ppbV #	84
31) Freon 113	7.192	101	20979	0.587	ppbV	96
32) trans-1,2-dichloroethene	7.992	61	14563	0.548	ppbV	97
33) 1,1-dichloroethane	8.225	63	18393	0.580	ppbV	96
34) MTBE	8.350	73	21790	0.495	ppbV	97
35) vinyl acetate	8.467	43	22905	0.527	ppbV	99
36) 2-butanone	8.750	43	24333	0.529	ppbV	96
37) cis-1,2-dichloroethene	9.217	61	12557	0.532	ppbV	98
38) Ethyl Acetate	9.558	61	3236M6	0.472	ppbV	
39) chloroform	9.575	83	18331	0.561	ppbV	98
40) Tetrahydrofuran	10.058	42	13159	0.485	ppbV	94
41) 2,2-dichloropropane	9.583	77	12458	0.534	ppbV	94
42) 1,2-dichloroethane	10.417	62	11274	0.585	ppbV	98
44) hexane	9.483	57	15411	0.513	ppbV #	70
45) diisopropyl ether	9.525	87	8160M6	0.545	ppbV	
46) tert-butyl ethyl ether	10.150	59	24604	0.512	ppbV	95
48) 1,1,1-trichloroethane	10.708	97	14993	0.549	ppbV	99
49) 1,1-dichloropropene	11.073	75	13528	0.482	ppbV	95
50) benzene	11.233	78	37072	0.582	ppbV	99
51) thiophene	11.380	84	17797	0.505	ppbV	98
52) carbon tetrachloride	11.400	117	14307	0.525	ppbV	97
53) cyclohexane	11.547	56	15956	0.495	ppbV	96
54) tert-amyl methyl ether	11.973	73	23159	0.493	ppbV	92
55) dibromomethane	12.160	93	11372	0.581	ppbV	91
56) 1,2-dichloropropane	12.193	63	12559	0.574	ppbV	97
57) bromodichloromethane	12.420	83	18087	0.503	ppbV	98
58) 1,4-dioxane	12.507	88	6842	0.474	ppbV #	59
59) trichloroethene	12.473	130	15218	0.542	ppbV	97
60) 2,2,4-trimethylpentane	12.520	57	53360	0.535	ppbV	98
61) methyl methacrylate	12.747	41	15026	0.450	ppbV	97
62) heptane	12.840	43	24778	0.526	ppbV	98
63) cis-1,3-dichloropropene	13.492	75	13313	0.434	ppbV	96
64) 4-methyl-2-pentanone	13.567	43	25017	0.440	ppbV	98
65) trans-1,3-dichloropropene	14.117	75	11398	0.408	ppbV	95
66) 1,1,2-trichloroethane	14.308	97	13824	0.555	ppbV	97

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626186.D
 Acq On : 29 Aug 2021 9:05 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:59:42 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68)	toluene	14.625	91	43120	0.628	ppbV	97
70)	2-methylthiophene	14.700	97	29866	0.548	ppbV	99
71)	1,3-dichloropropane	14.667	76	18518	0.542	ppbV	94
72)	2-hexanone	14.967	43	20963	0.424	ppbV	94
73)	3-methylthiophene	14.892	97	30189	0.544	ppbV	98
74)	dibromochloromethane	15.083	129	18690	0.491	ppbV	97
75)	1,2-dibromoethane	15.333	107	18749	0.507	ppbV	100
76)	butyl acetate	15.608	73	2994	0.359	ppbV	96
77)	octane	15.675	85	12627	0.512	ppbV	89
78)	tetrachloroethene	15.800	166	18414	0.564	ppbV	98
79)	1,1,1,2-tetrachloroethane	16.425	131	14747	0.534	ppbV	98
80)	chlorobenzene	16.433	112	33965	0.562	ppbV	99
81)	ethylbenzene	16.783	91	45074	0.504	ppbV	99
82)	2-ethylthiophene	16.817	97	32239	0.488	ppbV	97
83)	m+p-xylene	16.950	91	78448	1.076	ppbV	96
84)	bromoform	17.008	173	14504	0.444	ppbV	100
85)	styrene	17.267	104	28240	0.445	ppbV	98
86)	1,1,2,2-tetrachloroethane	17.367	83	31611	0.547	ppbV	98
87)	o-xylene	17.367	91	40302	0.542	ppbV	97
88)	1,2,3-trichloropropane	17.483	75	22915	0.514	ppbV	97
89)	nonane	17.567	43	37381	0.538	ppbV	98
91)	isopropylbenzene	17.883	105	54834	0.532	ppbV	97
92)	bromobenzene	17.958	77	29135	0.528	ppbV	96
93)	2-chlorotoluene	18.292	126	15699	0.513	ppbV	98
94)	n-propylbenzene	18.325	120	16046	0.484	ppbV	92
95)	4-chlorotoluene	18.350	126	15522	0.508	ppbV	93
96)	4-ethyl toluene	18.450	105	56541	0.479	ppbV	99
97)	1,3,5-trimethylbenzene	18.508	105	51867	0.543	ppbV	98
98)	tert-butylbenzene	18.858	119	50976	0.525	ppbV	98
99)	1,2,4-trimethylbenzene	18.858	105	47880	0.509	ppbV	98
100)	decane	18.942	57	35604	0.532	ppbV	97
101)	Benzyl Chloride	18.983	91	16132	0.294	ppbV	97
102)	1,3-dichlorobenzene	18.992	146	32529	0.471	ppbV	99
103)	1,4-dichlorobenzene	19.050	146	30181	0.446	ppbV	99
104)	sec-butylbenzene	19.083	105	72531	0.532	ppbV	100
105)	1,2,3-trimethylbenzene	19.217	105	57968	0.545	ppbV	96
106)	p-isopropyltoluene	19.217	119	63514	0.530	ppbV	99
107)	1,2-dichlorobenzene	19.342	146	31970	0.486	ppbV	98
108)	n-butylbenzene	19.575	91	48951	0.495	ppbV	95
109)	indan	19.392	117	58563	0.501	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626186.D
 Acq On : 29 Aug 2021 9:05 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:59:42 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

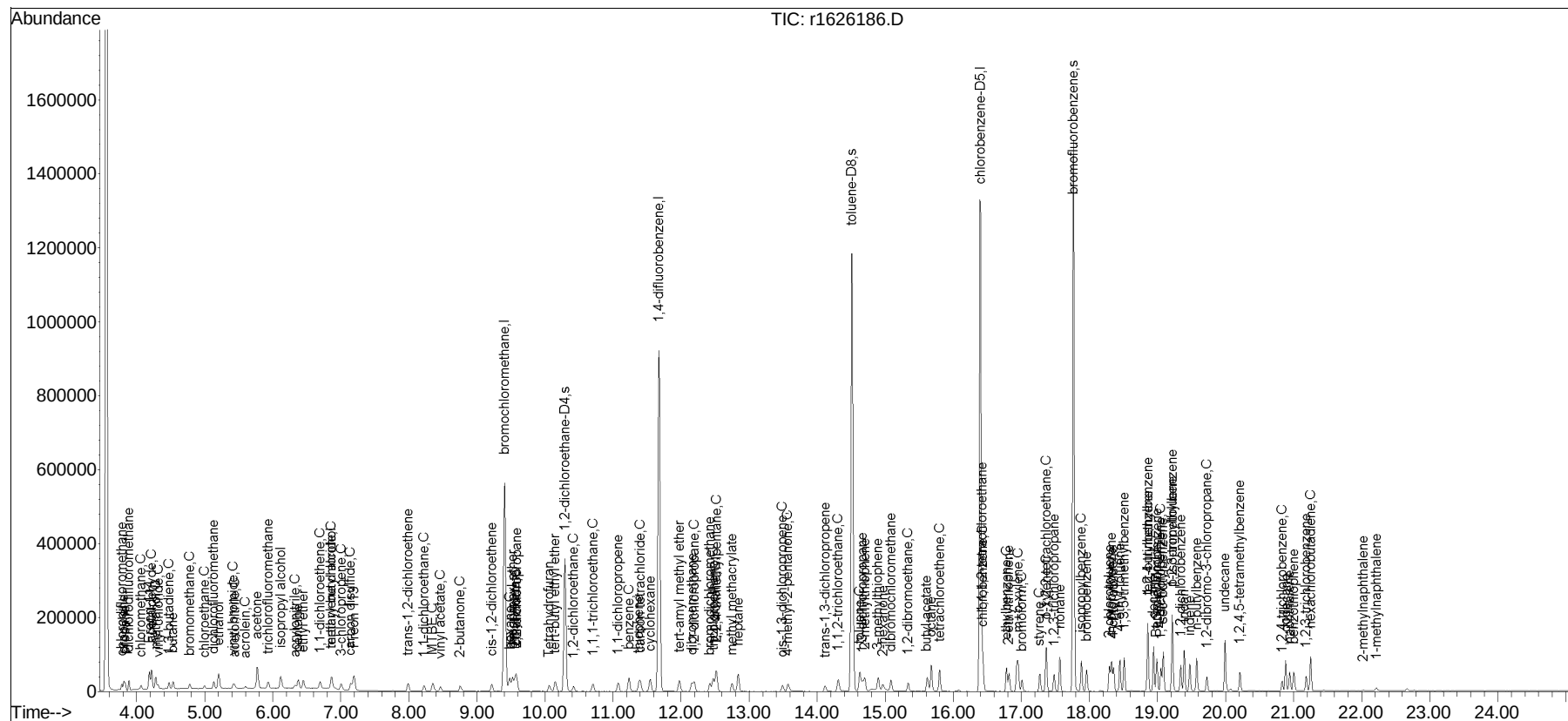
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.475	115	39606	0.425	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.725	75	9826	0.413	ppbV #	91
112)	undecane	19.992	57	34805	0.463	ppbV	97
113)	1,2,4,5-tetramethylben...	20.208	119	27921	0.463	ppbV	97
114)	dodecane	20.883	57	24250	0.316	ppbV	97
115)	1,2,4-trichlorobenzene	20.833	180	9439	0.235	ppbV	98
116)	naphthalene	20.942	128	43591	0.342	ppbV	100
117)	1,2,3-trichlorobenzene	21.183	180	13691	0.329	ppbV	98
118)	benzothiophene	21.000	134	45533	0.249	ppbV	100
119)	hexachlorobutadiene	21.250	225	18200	0.493	ppbV	95
120)	2-methylnaphthalene	22.025	142	1924	0.101	ppbV #	91
121)	1-methylnaphthalene	22.217	142	7213	0.173	ppbV	94

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

```
Data Path : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\
Data File : r1626186.D
Acq On    : 29 Aug 2021    9:05 PM
Operator  : AIRLAB16:TS
Sample    : IT015-LLSTD0.5
Misc      : WG1540703
ALS Vial  : 0    Sample Multiplier: 1
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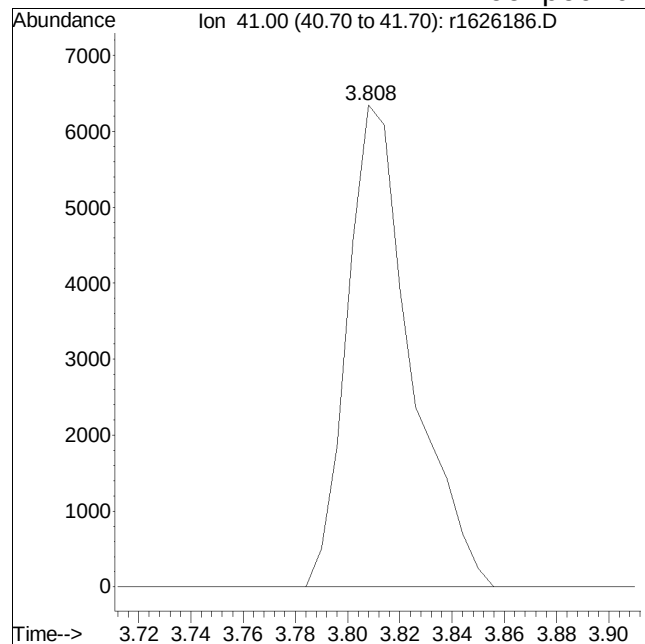
Quant Time: Aug 30 05:59:42 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 05:38:26 2021
Response via : Initial Calibration



Manual Integration Report

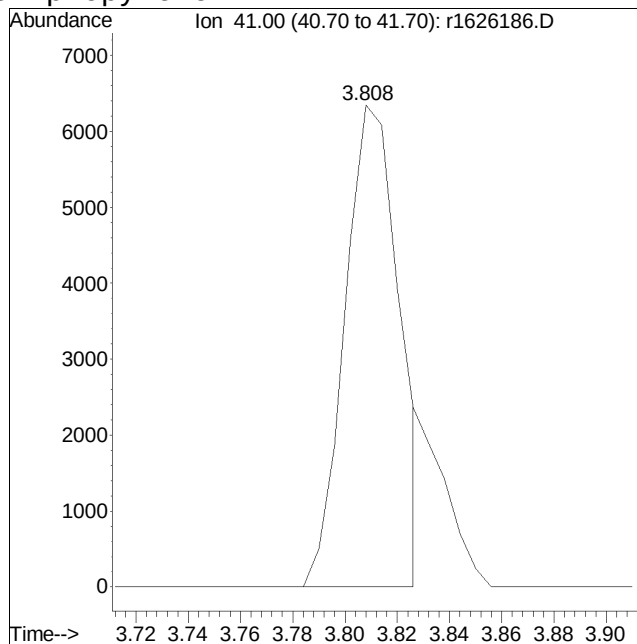
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626186.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:9: 5 Instrument :
Sample : IT015-LLSTD0.5 Quant Date : 8/30/2021 5:38 am

Compound #3: propylene



Original Peak Response = 10769

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

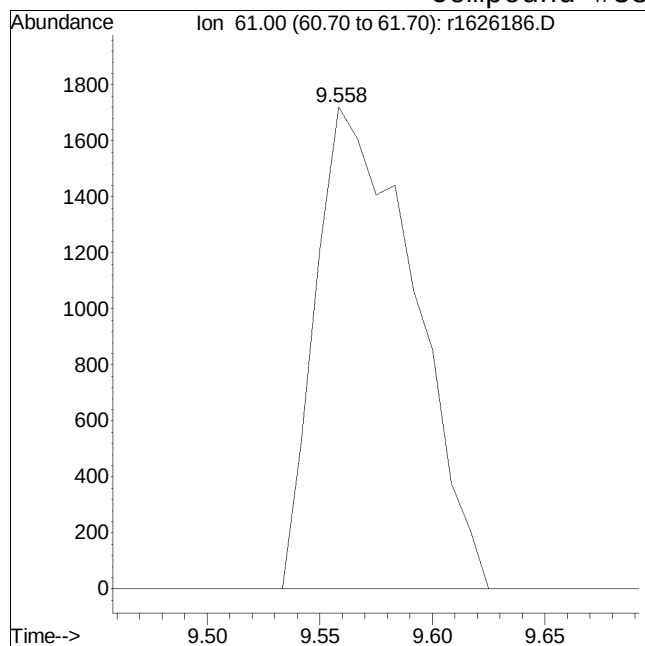


Manual Peak Response = 9232 M6

Manual Integration Report

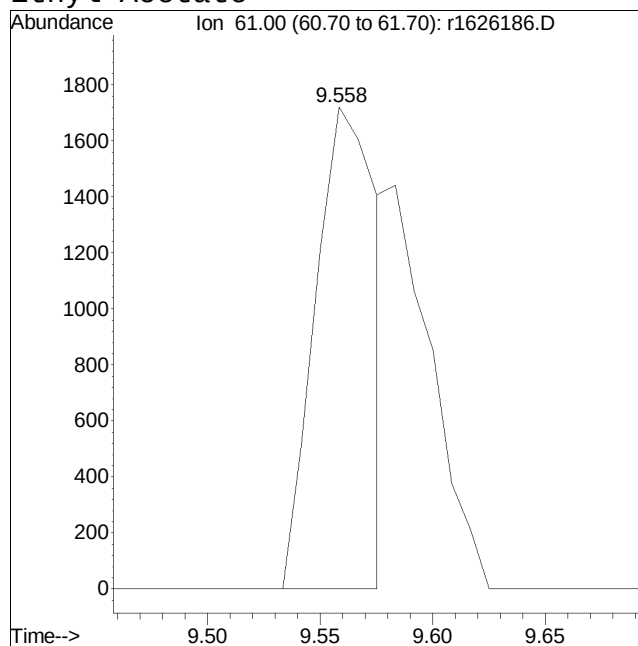
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626186.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:9: 5 Instrument :
Sample : IT015-LLSTD0.5 Quant Date : 8/30/2021 5:38 am

Compound #38: Ethyl Acetate



Original Peak Response = 5209

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

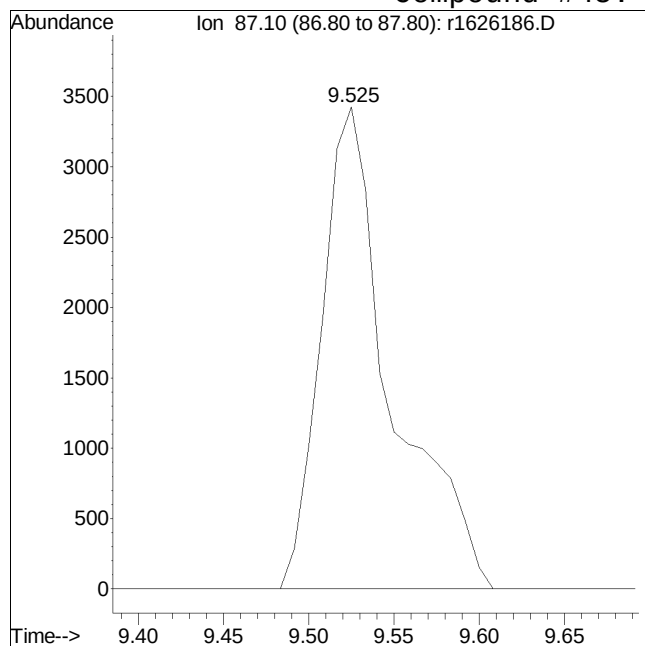


Manual Peak Response = 3236 M6

Manual Integration Report

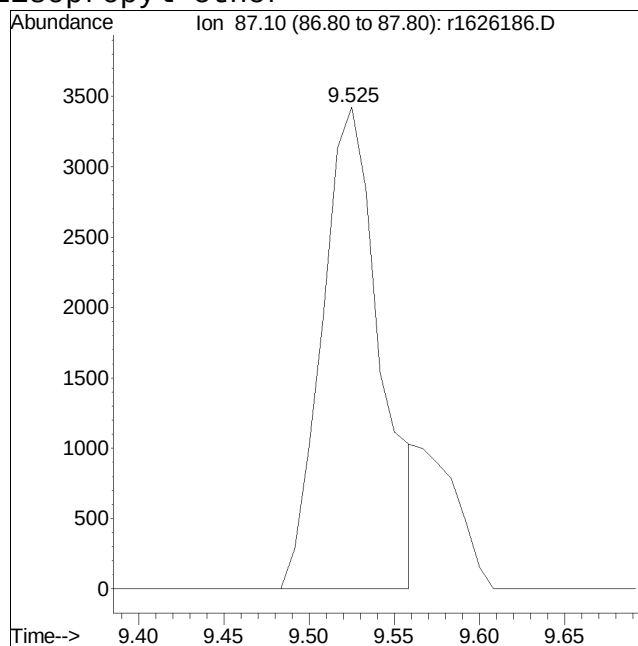
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626186.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:9: 5 Instrument :
Sample : IT015-LLSTD0.5 Quant Date : 8/30/2021 5:38 am

Compound #45: diisopropyl ether



Original Peak Response = 9821

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 8160 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626187.D
 Acq On : 29 Aug 2021 9:46 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:00:55 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.408	49	363809	10.000	ppbV	0.00
Standard Area = 378800			Recovery =	96.04%		
43) 1,4-difluorobenzene	11.673	114	947043	10.000	ppbV	0.00
Standard Area = 984697			Recovery =	96.18%		
67) chlorobenzene-D5	16.400	54	146708	10.000	ppbV	0.00
Standard Area = 156202			Recovery =	93.92%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.292	65	246623	10.099	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	100.99%		
69) toluene-D8	14.508	98	958732	10.237	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	102.37%		
90) bromofluorobenzene	17.767	95	648051	10.184	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	101.84%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.784	51	33477	1.176	ppbV	99
3) propylene	3.814	41	18596M6	1.219	ppbV	
4) propane	3.838	29	23190	1.179	ppbV	97
5) dichlorodifluoromethane	3.892	85	41518	1.194	ppbV	99
6) chloromethane	4.066	50	18673	1.210	ppbV	98
7) Freon-114	4.186	85	48423	1.210	ppbV	100
8) methanol	4.276	31	48099	6.575	ppbV	91
9) vinyl chloride	4.318	62	18279	1.176	ppbV	99
10) 1,3-butadiene	4.474	54	15494	1.141	ppbV	96
11) butane	4.534	43	29929	1.262	ppbV	99
12) acetaldehyde	4.216	29	72945	6.152	ppbV	96
13) bromomethane	4.780	94	16946	1.213	ppbV	98
14) chloroethane	4.996	64	8947	1.212	ppbV	98
15) ethanol	5.200	31	74557	5.635	ppbV	96
16) dichlorofluoromethane	5.134	67	34016	1.190	ppbV	98
17) vinyl bromide	5.417	106	16183	1.150	ppbV	96
18) acrolein	5.593	56	7362	1.105	ppbV	92
19) acetone	5.763	43	144823	6.146	ppbV	94
20) acetonitrile	5.437	41	16042	1.219	ppbV	98
21) trichlorofluoromethane	5.930	101	30870	1.178	ppbV	99
22) isopropyl alcohol	6.107	45	79277	2.904	ppbV	98
23) acrylonitrile	6.320	53	14568	1.168	ppbV	96
24) pentane	6.373	43	31382	1.200	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626187.D
 Acq On : 29 Aug 2021 9:46 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:00:55 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)	
25) ethyl ether	6.443	31	32091	1.221	ppbV	#	91
26) 1,1-dichloroethene	6.694	61	29115	1.379	ppbV		97
27) tertiary butyl alcohol	6.850	59	27401	1.183	ppbV	#	78
28) methylene chloride	6.862	49	28655	1.401	ppbV		99
29) 3-chloropropene	7.006	41	30046	1.115	ppbV		98
30) carbon disulfide	7.144	76	65019	1.083	ppbV		97
31) Freon 113	7.192	101	43419	1.200	ppbV		98
32) trans-1,2-dichloroethene	7.983	61	29742	1.106	ppbV		99
33) 1,1-dichloroethane	8.225	63	37317	1.162	ppbV		98
34) MTBE	8.342	73	46117	1.034	ppbV		99
35) vinyl acetate	8.458	43	46894	1.066	ppbV		99
36) 2-butanone	8.742	43	51945	1.115	ppbV		99
37) cis-1,2-dichloroethene	9.217	61	26280	1.099	ppbV		97
38) Ethyl Acetate	9.550	61	6629M6	0.955	ppbV		
39) chloroform	9.567	83	38289	1.157	ppbV		97
40) Tetrahydrofuran	10.050	42	27910	1.017	ppbV		100
41) 2,2-dichloropropane	9.583	77	25805	1.092	ppbV		92
42) 1,2-dichloroethane	10.417	62	22716	1.164	ppbV		100
44) hexane	9.483	57	32796	1.072	ppbV	#	75
45) diisopropyl ether	9.517	87	16650	1.093	ppbV		93
46) tert-butyl ethyl ether	10.142	59	52792	1.078	ppbV		99
48) 1,1,1-trichloroethane	10.700	97	31203	1.124	ppbV		99
49) 1,1-dichloropropene	11.073	75	29329	1.026	ppbV		99
50) benzene	11.233	78	75424	1.163	ppbV		99
51) thiophene	11.380	84	38157	1.064	ppbV		99
52) carbon tetrachloride	11.407	117	30524	1.100	ppbV		98
53) cyclohexane	11.547	56	35042	1.067	ppbV		97
54) tert-amyl methyl ether	11.967	73	49502	1.035	ppbV		97
55) dibromomethane	12.160	93	22638	1.137	ppbV		96
56) 1,2-dichloropropane	12.193	63	25592	1.149	ppbV		98
57) bromodichloromethane	12.420	83	38230	1.044	ppbV		98
58) 1,4-dioxane	12.500	88	15064	1.025	ppbV	#	78
59) trichloroethene	12.467	130	31542	1.104	ppbV		99
60) 2,2,4-trimethylpentane	12.513	57	115728	1.140	ppbV		99
61) methyl methacrylate	12.740	41	32160	0.947	ppbV		98
62) heptane	12.840	43	53291	1.112	ppbV		98
63) cis-1,3-dichloropropene	13.492	75	29097	0.933	ppbV		98
64) 4-methyl-2-pentanone	13.558	43	57123	0.988	ppbV		98
65) trans-1,3-dichloropropene	14.108	75	25174	0.886	ppbV		96
66) 1,1,2-trichloroethane	14.308	97	28733	1.133	ppbV		98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626187.D
 Acq On : 29 Aug 2021 9:46 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:00:55 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.625	91	84695	1.213	ppbV	99
70) 2-methylthiophene	14.700	97	63074	1.138	ppbV	99
71) 1,3-dichloropropane	14.658	76	39526	1.138	ppbV	93
72) 2-hexanone	14.950	43	48836M6	0.972	ppbV	
73) 3-methylthiophene	14.900	97	62566	1.109	ppbV	99
74) dibromochloromethane	15.083	129	40401	1.044	ppbV	96
75) 1,2-dibromoethane	15.333	107	39482	1.051	ppbV	100
76) butyl acetate	15.608	73	7158	0.843	ppbV	95
77) octane	15.675	85	27627	1.102	ppbV	83
78) tetrachloroethene	15.800	166	38757	1.168	ppbV	97
79) 1,1,1,2-tetrachloroethane	16.425	131	30898	1.100	ppbV	99
80) chlorobenzene	16.433	112	69661	1.134	ppbV	99
81) ethylbenzene	16.783	91	98012	1.079	ppbV	98
82) 2-ethylthiophene	16.817	97	73874	1.101	ppbV	98
83) m+p-xylene	16.942	91	170697	2.302	ppbV	99
84) bromoform	17.008	173	32076	0.966	ppbV	99
85) styrene	17.267	104	64428	0.998	ppbV	98
86) 1,1,2,2-tetrachloroethane	17.367	83	68104	1.160	ppbV	99
87) o-xylene	17.367	91	87711	1.160	ppbV	99
88) 1,2,3-trichloropropane	17.475	75	50141	1.107	ppbV	99
89) nonane	17.567	43	80457	1.139	ppbV	98
91) isopropylbenzene	17.883	105	118412	1.130	ppbV	98
92) bromobenzene	17.958	77	60850	1.085	ppbV	96
93) 2-chlorotoluene	18.292	126	33779	1.086	ppbV	98
94) n-propylbenzene	18.325	120	37022	1.100	ppbV	90
95) 4-chlorotoluene	18.350	126	34019	1.096	ppbV	93
96) 4-ethyl toluene	18.450	105	127175	1.059	ppbV	99
97) 1,3,5-trimethylbenzene	18.508	105	111270	1.147	ppbV	99
98) tert-butylbenzene	18.858	119	112085	1.136	ppbV	97
99) 1,2,4-trimethylbenzene	18.858	105	105545	1.103	ppbV	100
100) decane	18.942	57	77209	1.134	ppbV	99
101) Benzyl Chloride	18.983	91	37209	0.667	ppbV	100
102) 1,3-dichlorobenzene	18.992	146	75503	1.076	ppbV	99
103) 1,4-dichlorobenzene	19.050	146	70869	1.030	ppbV	99
104) sec-butylbenzene	19.083	105	158646	1.145	ppbV	99
105) 1,2,3-trimethylbenzene	19.217	105	125103	1.157	ppbV	97
106) p-isopropyltoluene	19.217	119	138509	1.137	ppbV	100
107) 1,2-dichlorobenzene	19.342	146	74122	1.108	ppbV	99
108) n-butylbenzene	19.575	91	109632	1.090	ppbV	97
109) indan	19.392	117	130717	1.100	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626187.D
 Acq On : 29 Aug 2021 9:46 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:00:55 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

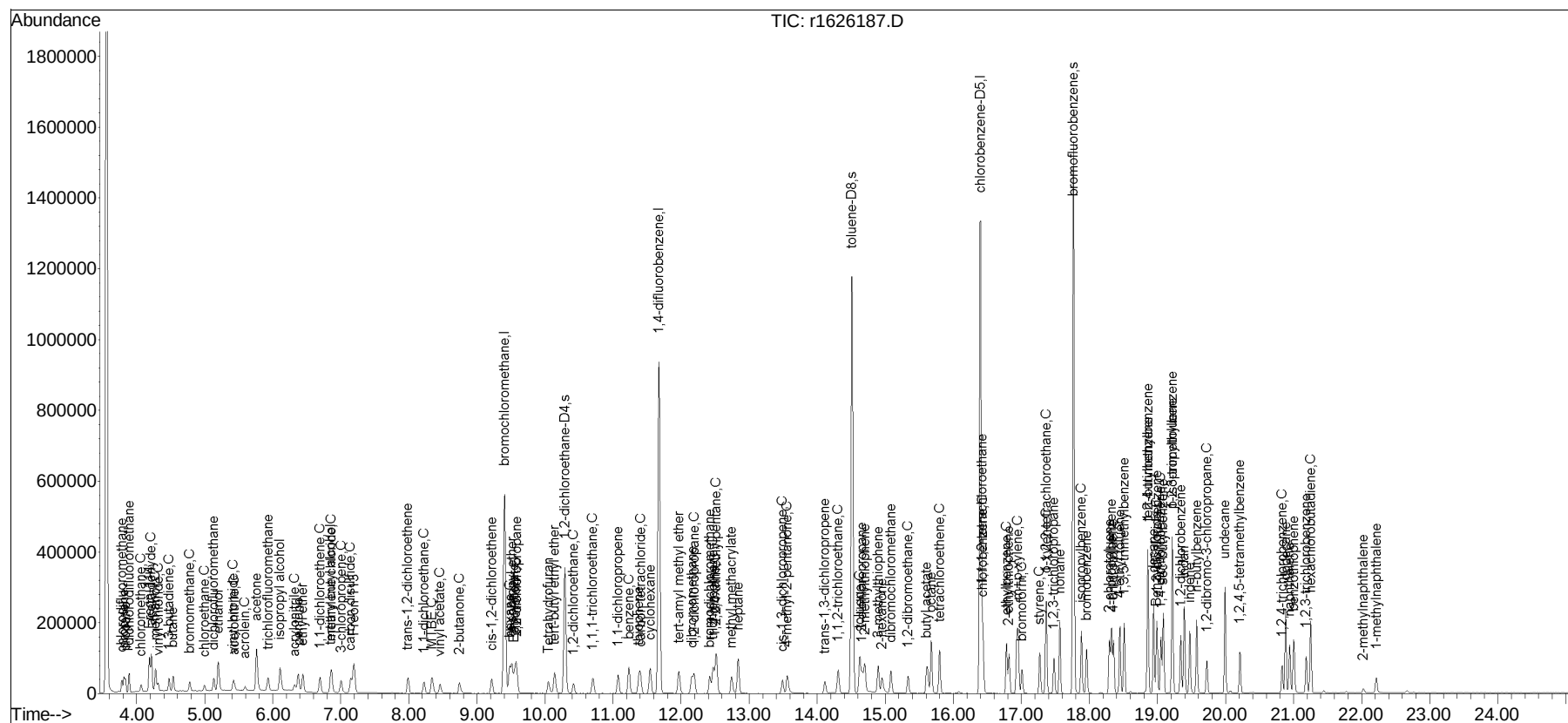
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.475	115	92174	0.974	ppbV	97
111)	1,2-dibromo-3-chloropr...	19.725	75	22234	0.920	ppbV	95
112)	undecane	19.992	57	80011	1.046	ppbV	97
113)	1,2,4,5-tetramethylben...	20.208	119	64379	1.051	ppbV	99
114)	dodecane	20.883	57	69708	0.892	ppbV	95
115)	1,2,4-trichlorobenzene	20.833	180	26106	0.640	ppbV	98
116)	naphthalene	20.942	128	116983	0.904	ppbV	99
117)	1,2,3-trichlorobenzene	21.183	180	34329	0.812	ppbV	99
118)	benzothiophene	21.000	134	132139	0.710	ppbV	99
119)	hexachlorobutadiene	21.250	225	40148	1.071	ppbV	99
120)	2-methylnaphthalene	22.025	142	10015	0.517	ppbV	96
121)	1-methylnaphthalene	22.217	142	30111	0.711	ppbV	97

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

```
Data Path : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\
Data File : r1626187.D
Acq On    : 29 Aug 2021    9:46 PM
Operator  : AIRLAB16:TS
Sample    : IT015-LLSTD1.0
Misc      : WG1540703
ALS Vial  : 0    Sample Multiplier: 1
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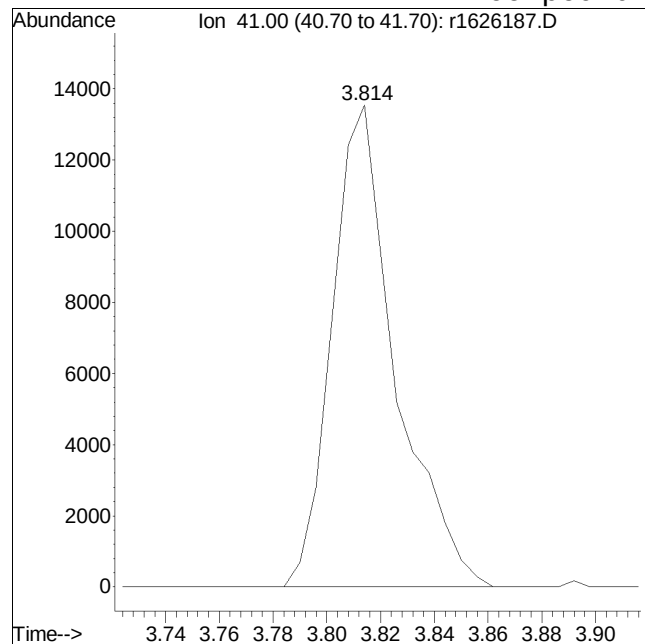
Quant Time: Aug 30 06:00:55 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 05:38:26 2021
Response via : Initial Calibration



Manual Integration Report

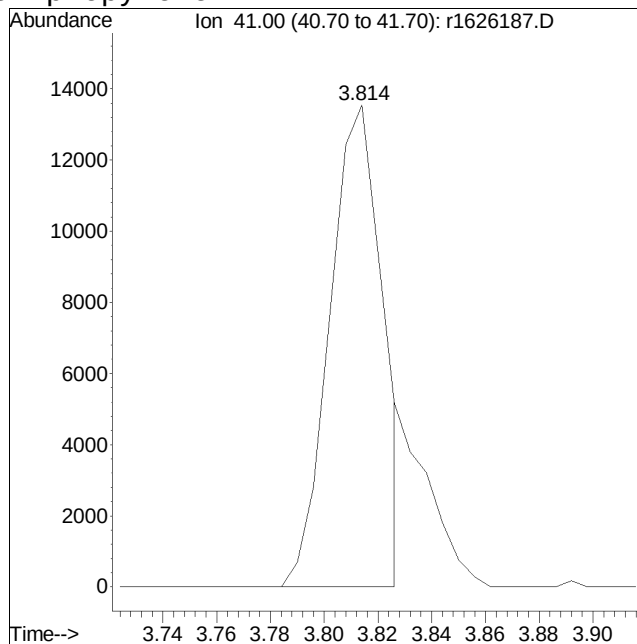
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626187.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:9: 6 Instrument :
Sample : IT015-LLSTD1.0 Quant Date : 8/30/2021 5:38 am

Compound #3: propylene



Original Peak Response = 22145

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

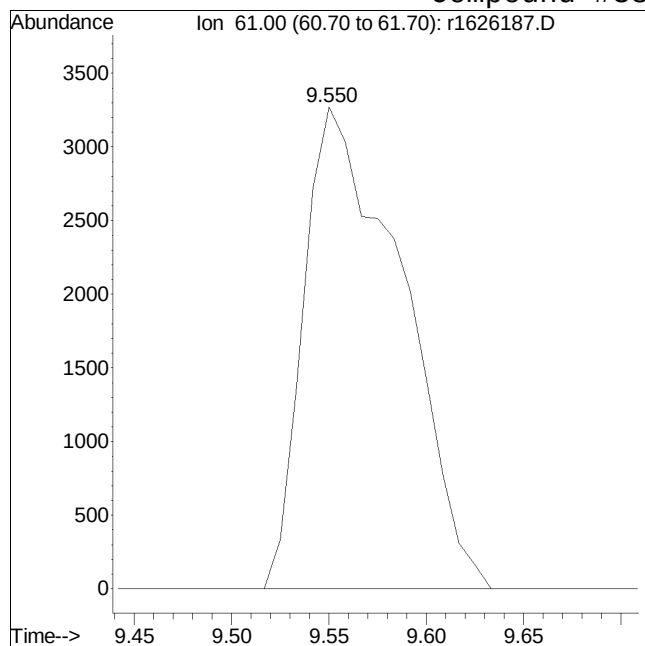


Manual Peak Response = 18596 M6

Manual Integration Report

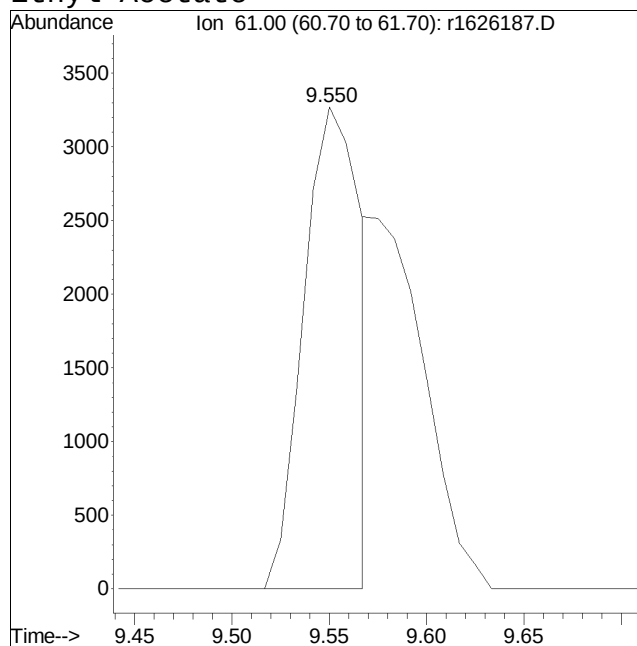
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626187.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:9: 6 Instrument :
Sample : IT015-LLSTD1.0 Quant Date : 8/30/2021 5:38 am

Compound #38: Ethyl Acetate



Original Peak Response = 11425

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

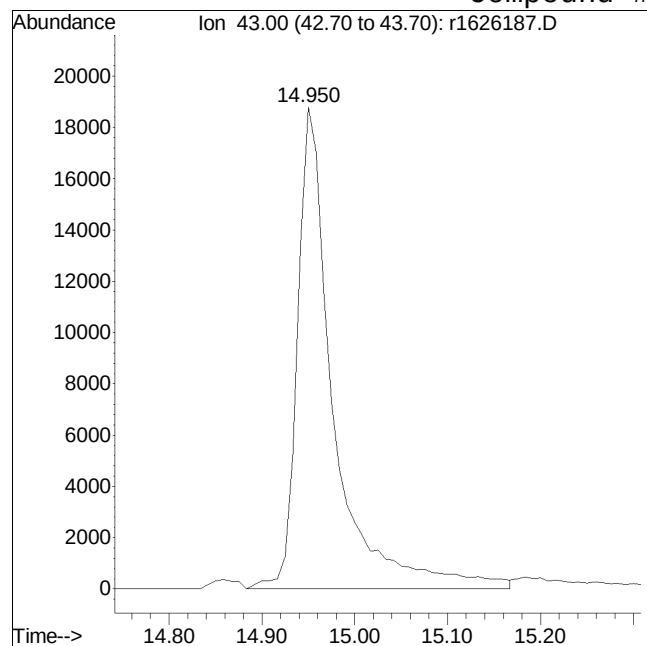


Manual Peak Response = 6629 M6

Manual Integration Report

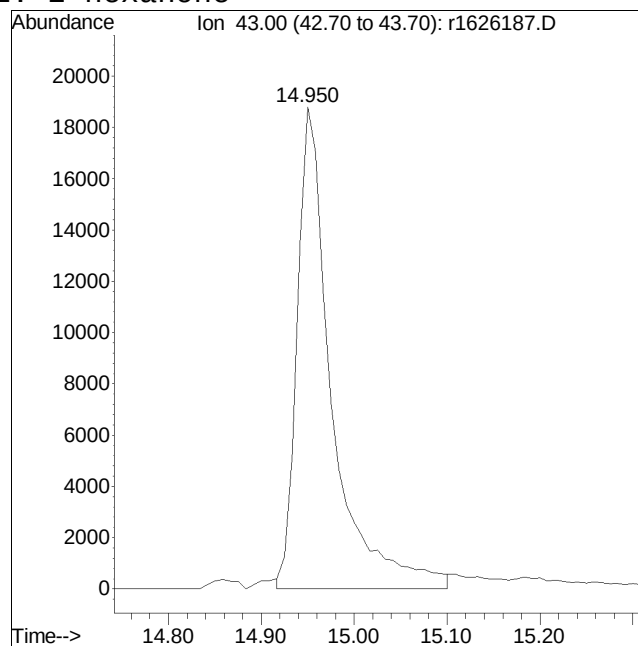
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626187.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:9: 6 Instrument :
Sample : IT015-LLSTD1.0 Quant Date : 8/30/2021 5:38 am

Compound #72: 2-hexanone



Original Peak Response = 51211

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 48836 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626188.D
 Acq On : 29 Aug 2021 10:25 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:01:33 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.417	49	374867	10.000	ppbV	0.00
Standard Area = 378800			Recovery =		98.96%	
43) 1,4-difluorobenzene	11.680	114	970234	10.000	ppbV	0.00
Standard Area = 984697			Recovery =		98.53%	
67) chlorobenzene-D5	16.400	54	152692	10.000	ppbV	0.00
Standard Area = 156202			Recovery =		97.75%	
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.300	65	253163	10.119	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		101.19%	
69) toluene-D8	14.517	98	989832	10.155	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		101.55%	
90) bromofluorobenzene	17.767	95	673864	10.175	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		101.75%	
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.778	51	150429	5.130	ppbV	99
3) propylene	3.808	41	79072M6	5.030	ppbV	
4) propane	3.832	29	102927	5.081	ppbV	97
5) dichlorodifluoromethane	3.886	85	184999	5.162	ppbV	100
6) chloromethane	4.060	50	82550	5.193	ppbV	98
7) Freon-114	4.186	85	213135	5.170	ppbV	99
8) methanol	4.270	31	187543	24.880	ppbV	97
9) vinyl chloride	4.312	62	81733	5.104	ppbV	100
10) 1,3-butadiene	4.474	54	70915	5.069	ppbV	96
11) butane	4.534	43	128758	5.271	ppbV	98
12) acetaldehyde	4.204	29	315526	25.827	ppbV	98
13) bromomethane	4.780	94	73047	5.074	ppbV	99
14) chloroethane	4.996	64	38836	5.106	ppbV	99
15) ethanol	5.182	31	340833	25.002	ppbV	99
16) dichlorofluoromethane	5.134	67	150989	5.128	ppbV	98
17) vinyl bromide	5.420	106	73301	5.057	ppbV	98
18) acrolein	5.590	56	33670	4.906	ppbV	97
19) acetone	5.747	43	623205	25.666	ppbV	98
20) acetonitrile	5.430	41	68812	5.073	ppbV	99
21) trichlorofluoromethane	5.937	101	136886	5.071	ppbV	97
22) isopropyl alcohol	6.087	45	354741	12.612	ppbV	99
23) acrylonitrile	6.320	53	65599M6	5.105	ppbV	
24) pentane	6.377	43	138892	5.153	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626188.D
 Acq On : 29 Aug 2021 10:25 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:01:33 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.433	31	132836	4.905	ppbV	98
26) 1,1-dichloroethene	6.700	61	109551	5.035	ppbV	98
27) tertiary butyl alcohol	6.826	59	129743	5.434	ppbV #	89
28) methylene chloride	6.868	49	124374	5.902	ppbV	97
29) 3-chloropropene	7.006	41	138151	4.973	ppbV	99
30) carbon disulfide	7.150	76	305351	4.936	ppbV	100
31) Freon 113	7.192	101	190756	5.118	ppbV	98
32) trans-1,2-dichloroethene	7.992	61	138553	5.000	ppbV	99
33) 1,1-dichloroethane	8.225	63	168144	5.080	ppbV	100
34) MTBE	8.325	73	225811	4.914	ppbV	99
35) vinyl acetate	8.458	43	223738	4.935	ppbV	99
36) 2-butanone	8.725	43	252035	5.252	ppbV	98
37) cis-1,2-dichloroethene	9.225	61	122173	4.959	ppbV	99
38) Ethyl Acetate	9.533	61	34507	4.826	ppbV	93
39) chloroform	9.575	83	171946	5.043	ppbV	99
40) Tetrahydrofuran	10.033	42	139266	4.923	ppbV	99
41) 2,2-dichloropropane	9.592	77	120223	4.935	ppbV	94
42) 1,2-dichloroethane	10.425	62	102639	5.104	ppbV	98
44) hexane	9.483	57	157103	5.011	ppbV	87
45) diisopropyl ether	9.508	87	77902	4.993	ppbV	96
46) tert-butyl ethyl ether	10.133	59	249921	4.983	ppbV	99
48) 1,1,1-trichloroethane	10.708	97	141665	4.979	ppbV	99
49) 1,1-dichloropropene	11.080	75	142187	4.856	ppbV	98
50) benzene	11.240	78	334180	5.031	ppbV	98
51) thiophene	11.387	84	182400	4.964	ppbV	100
52) carbon tetrachloride	11.407	117	140126	4.928	ppbV	100
53) cyclohexane	11.553	56	168436	5.007	ppbV	98
54) tert-amyl methyl ether	11.960	73	241398	4.925	ppbV	99
55) dibromomethane	12.160	93	103586	5.077	ppbV	98
56) 1,2-dichloropropane	12.193	63	115714	5.070	ppbV	99
57) bromodichloromethane	12.427	83	183841	4.901	ppbV	99
58) 1,4-dioxane	12.480	88	73678	4.892	ppbV	100
59) trichloroethene	12.473	130	146864	5.018	ppbV	99
60) 2,2,4-trimethylpentane	12.520	57	538121	5.172	ppbV	99
61) methyl methacrylate	12.733	41	172246	4.950	ppbV	99
62) heptane	12.840	43	250622	5.104	ppbV	98
63) cis-1,3-dichloropropene	13.492	75	151606	4.743	ppbV	99
64) 4-methyl-2-pentanone	13.542	43	294993	4.978	ppbV	100
65) trans-1,3-dichloropropene	14.117	75	136747	4.700	ppbV	97
66) 1,1,2-trichloroethane	14.308	97	130581	5.027	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626188.D
 Acq On : 29 Aug 2021 10:25 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:01:33 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.625	91	373576	5.141	ppbV	99
70) 2-methylthiophene	14.700	97	291551	5.055	ppbV	99
71) 1,3-dichloropropane	14.658	76	181816	5.028	ppbV	99
72) 2-hexanone	14.933	43	257069	4.918	ppbV	99
73) 3-methylthiophene	14.900	97	300518	5.118	ppbV	99
74) dibromochloromethane	15.083	129	198979	4.941	ppbV	98
75) 1,2-dibromoethane	15.333	107	193590	4.950	ppbV	99
76) butyl acetate	15.592	73	42367	4.796	ppbV	98
77) octane	15.675	85	132329	5.072	ppbV	97
78) tetrachloroethene	15.800	166	174742	5.058	ppbV	99
79) 1,1,1,2-tetrachloroethane	16.425	131	144500	4.943	ppbV	98
80) chlorobenzene	16.433	112	322732	5.046	ppbV	99
81) ethylbenzene	16.783	91	479764	5.074	ppbV	100
82) 2-ethylthiophene	16.817	97	353512	5.062	ppbV	99
83) m+p-xylene	16.942	91	791032	10.250	ppbV	99
84) bromoform	17.008	173	170393	4.929	ppbV	99
85) styrene	17.275	104	334252	4.976	ppbV	100
86) 1,1,2,2-tetrachloroethane	17.367	83	310803	5.085	ppbV	99
87) o-xylene	17.367	91	406998	5.172	ppbV	100
88) 1,2,3-trichloropropane	17.483	75	237570	5.038	ppbV	99
89) nonane	17.567	43	376587	5.121	ppbV	100
91) isopropylbenzene	17.883	105	555820	5.097	ppbV	100
92) bromobenzene	17.958	77	291948	5.002	ppbV	99
93) 2-chlorotoluene	18.292	126	163367	5.045	ppbV	99
94) n-propylbenzene	18.325	120	180167	5.141	ppbV	94
95) 4-chlorotoluene	18.358	126	163981	5.076	ppbV	95
96) 4-ethyl toluene	18.450	105	630647	5.045	ppbV	99
97) 1,3,5-trimethylbenzene	18.508	105	512652	5.077	ppbV	98
98) tert-butylbenzene	18.858	119	531127	5.171	ppbV	99
99) 1,2,4-trimethylbenzene	18.858	105	506058	5.081	ppbV	99
100) decane	18.942	57	361004	5.094	ppbV	98
101) Benzyl Chloride	18.983	91	241065	4.155	ppbV	99
102) 1,3-dichlorobenzene	18.992	146	363761	4.980	ppbV	99
103) 1,4-dichlorobenzene	19.050	146	348991	4.871	ppbV	100
104) sec-butylbenzene	19.083	105	736764	5.111	ppbV	100
105) 1,2,3-trimethylbenzene	19.217	105	576573	5.121	ppbV	95
106) p-isopropyltoluene	19.217	119	647562	5.108	ppbV	99
107) 1,2-dichlorobenzene	19.342	146	349601	5.022	ppbV	99
108) n-butylbenzene	19.575	91	532048	5.081	ppbV	98
109) indan	19.392	117	622523	5.034	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626188.D
 Acq On : 29 Aug 2021 10:25 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:01:33 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

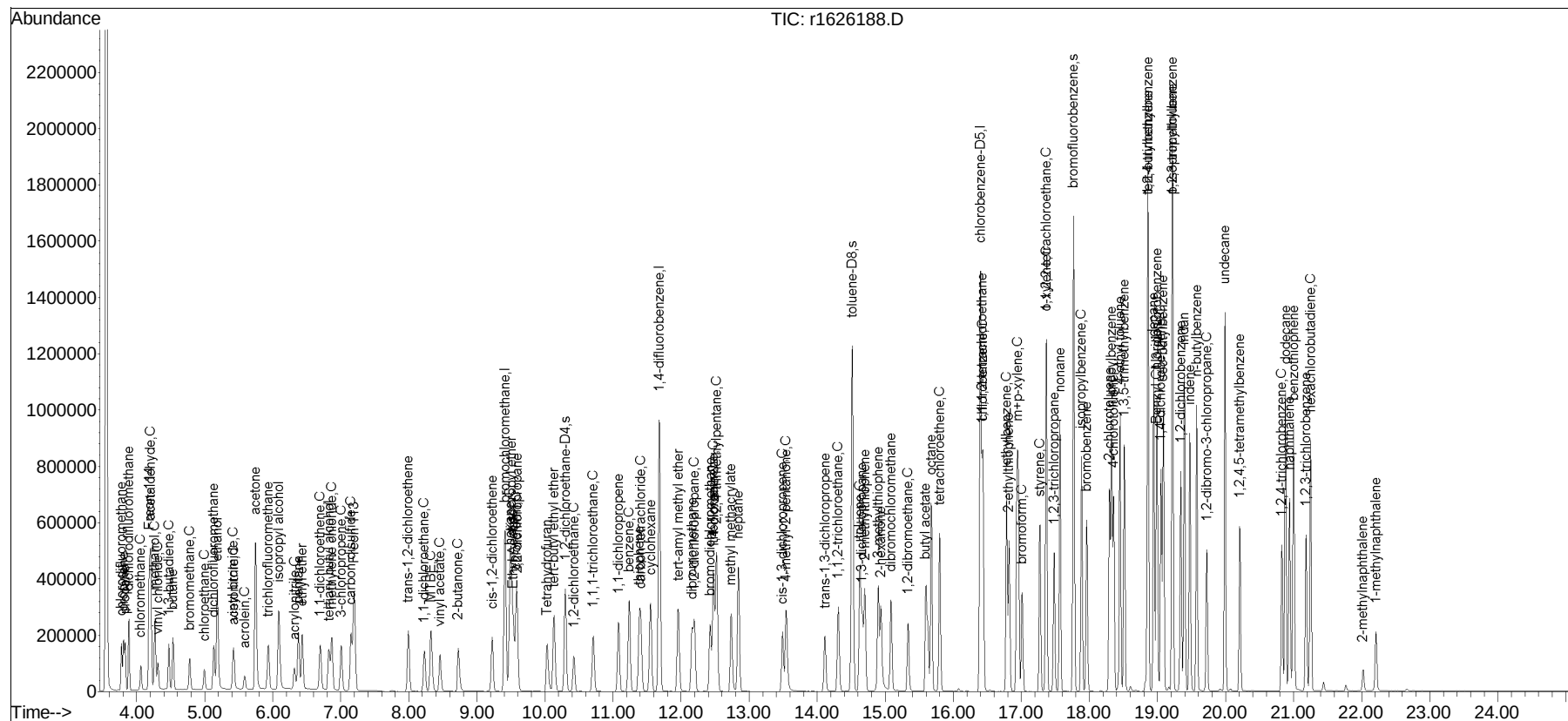
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110) indene	19.475	115	479780	4.869	ppbV	99
111) 1,2-dibromo-3-chloropr...	19.725	75	120191	4.778	ppbV	99
112) undecane	19.992	57	390496	4.907	ppbV	99
113) 1,2,4,5-tetramethylben...	20.208	119	305146	4.788	ppbV	98
114) dodecane	20.883	57	348581	4.287	ppbV	96
115) 1,2,4-trichlorobenzene	20.825	180	170761	4.023	ppbV	97
116) naphthalene	20.942	128	593859	4.409	ppbV	100
117) 1,2,3-trichlorobenzene	21.183	180	184943	4.203	ppbV	98
118) benzothiophene	21.000	134	779203	4.023	ppbV	100
119) hexachlorobutadiene	21.250	225	176980	4.535	ppbV	99
120) 2-methylnaphthalene	22.017	142	50747	2.517	ppbV	98
121) 1-methylnaphthalene	22.208	142	130584	2.964	ppbV	100

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

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Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
Data File : r1626188.D
Acq On    : 29 Aug 2021  10:25 PM
Operator  : AIRLAB16:TS
Sample    : IT015-LLSTD5.0
Misc      : WG1540703
ALS Vial  : 0      Sample Multiplier: 1
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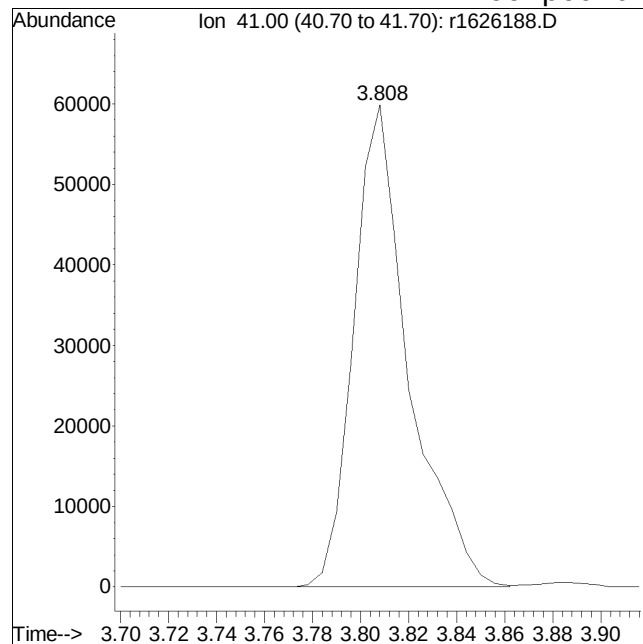
Quant Time: Aug 30 06:01:33 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 05:38:26 2021
Response via : Initial Calibration



Manual Integration Report

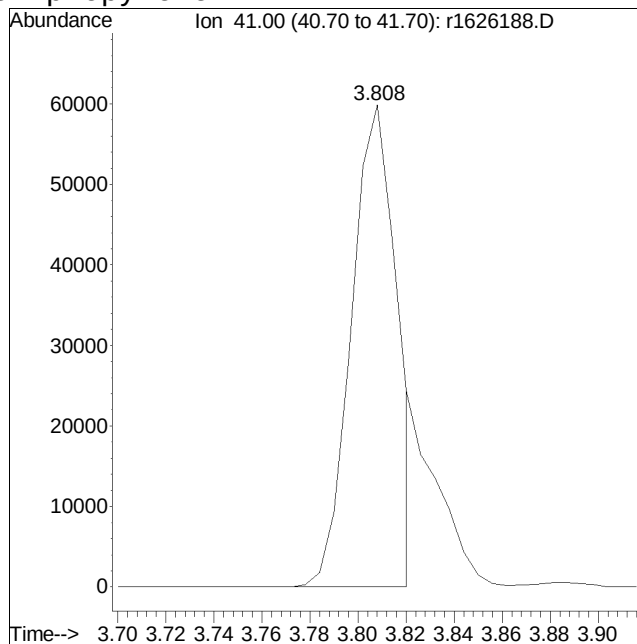
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Data File : r1626188.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:0: 5 Instrument :
Sample : IT015-LLSTD5.0 Quant Date : 8/30/2021 5:39 am

Compound #3: propylene



Original Peak Response = 95670

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

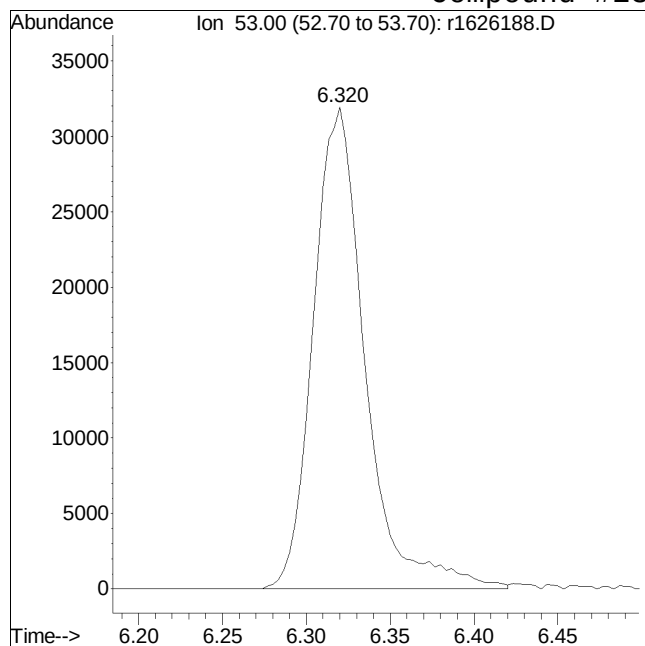


Manual Peak Response = 79072 M6

Manual Integration Report

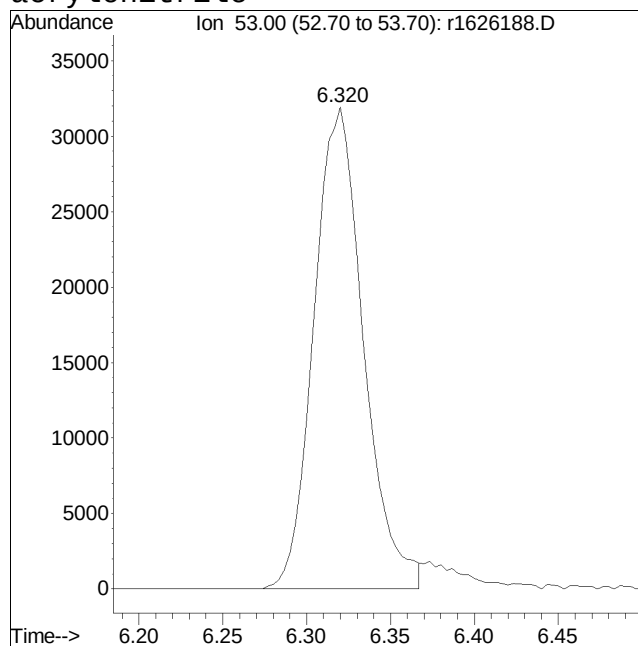
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Data File : r1626188.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:0: 5 Instrument :
Sample : IT015-LLSTD5.0 Quant Date : 8/30/2021 5:39 am

Compound #23: acrylonitrile



Original Peak Response = 68644

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 65599 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626189.D
 Acq On : 29 Aug 2021 11:06 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:36:51 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 16 10:31:28 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.408	49	378800	10.000	ppbV	0.00
Standard Area = 378800			Recovery = 100.00%			
43) 1,4-difluorobenzene	11.680	114	984697	10.000	ppbV	0.02
Standard Area = 984697			Recovery = 100.00%			
67) chlorobenzene-D5	16.400	54	156202	10.000	ppbV	0.02
Standard Area = 156202			Recovery = 100.00%			
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.300	65	253922	10.794	ppbV	0.02
Spiked Amount 10.000	Range 70 - 130		Recovery = 107.94%			
69) toluene-D8	14.517	98	997115	10.555	ppbV	0.02
Spiked Amount 10.000	Range 70 - 130		Recovery = 105.55%			
90) bromofluorobenzene	17.767	95	677524	11.010	ppbV	0.02
Spiked Amount 10.000	Range 70 - 130		Recovery = 110.10%			
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.784	51	296324	9.125	ppbV #	95
3) propylene	3.814	41	158858M6	9.243	ppbV	
4) propane	3.838	29	204717	8.621	ppbV	95
5) dichlorodifluoromethane	3.892	85	362141	9.463	ppbV	99
6) chloromethane	4.066	50	160625	7.156	ppbV	100
7) Freon-114	4.186	85	416553	7.862	ppbV	91
8) methanol	4.270	31	380847	37.439	ppbV	99
9) vinyl chloride	4.318	62	161826	7.783	ppbV	100
10) 1,3-butadiene	4.474	54	141371	7.214	ppbV	95
11) butane	4.534	43	246855	7.358	ppbV	99
12) acetaldehyde	4.210	29	617251	38.423	ppbV	98
13) bromomethane	4.780	94	145465	8.241	ppbV	98
14) chloroethane	4.996	64	76857	7.559	ppbV	100
15) ethanol	5.182	31	688761M6	38.259	ppbV	
16) dichlorofluoromethane	5.140	67	297524	8.438	ppbV	99
17) vinyl bromide	5.423	106	146478	8.191	ppbV	97
18) acrolein	5.583	56	69350	6.979	ppbV	96
19) acetone	5.740	43	1226782	40.190	ppbV	92
20) acetonitrile	5.430	41	137071	7.042	ppbV	95
21) trichlorofluoromethane	5.933	101	272751	9.185	ppbV	100
22) isopropyl alcohol	6.080	45	710562	18.969	ppbV	99
23) acrylonitrile	6.317	53	129846M6	7.000	ppbV	
24) pentane	6.377	43	272360	7.295	ppbV	97

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626189.D
 Acq On : 29 Aug 2021 11:06 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:36:51 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 16 10:31:28 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.427	31	273635	6.729	ppbV	96
26) 1,1-dichloroethene	6.700	61	219878	7.816	ppbV	99
27) tertiary butyl alcohol	6.808	59	241254	7.347	ppbV #	93
28) methylene chloride	6.868	49	212952	8.016	ppbV	98
29) 3-chloropropene	7.006	41	280696	9.602	ppbV	98
30) carbon disulfide	7.150	76	625127	9.433	ppbV	97
31) Freon 113	7.192	101	376605	10.615	ppbV	95
32) trans-1,2-dichloroethene	7.992	61	280013	9.628	ppbV	94
33) 1,1-dichloroethane	8.225	63	334435	9.881	ppbV	99
34) MTBE	8.317	73	464344	9.542	ppbV	97
35) vinyl acetate	8.450	43	458104	10.608	ppbV	99
36) 2-butanone	8.717	43	484916	10.531	ppbV	99
37) cis-1,2-dichloroethene	9.225	61	248943	9.904	ppbV	98
38) Ethyl Acetate	9.533	61	72248	10.057	ppbV	90
39) chloroform	9.575	83	344571	9.975	ppbV	97
40) Tetrahydrofuran	10.025	42	285841	10.234	ppbV	97
41) 2,2-dichloropropane	9.583	77	246158	9.992	ppbV	94
42) 1,2-dichloroethane	10.425	62	203201	10.732	ppbV	95
44) hexane	9.483	57	318188	8.394	ppbV	85
45) diisopropyl ether	9.500	87	158339	8.584	ppbV	92
46) tert-butyl ethyl ether	10.125	59	509003	8.884	ppbV	98
48) 1,1,1-trichloroethane	10.708	97	288738	10.756	ppbV	98
49) 1,1-dichloropropene	11.080	75	297187	9.541	ppbV	99
50) benzene	11.233	78	674150	8.955	ppbV	98
51) thiophene	11.387	84	372958	9.196	ppbV	97
52) carbon tetrachloride	11.407	117	288599	11.179	ppbV	99
53) cyclohexane	11.547	56	341442	8.581	ppbV	93
54) tert-amyl methyl ether	11.947	73	497489	9.174	ppbV	99
55) dibromomethane	12.160	93	207068	10.315	ppbV	98
56) 1,2-dichloropropane	12.193	63	231613	9.645	ppbV	100
57) bromodichloromethane	12.427	83	380689	10.103	ppbV	99
58) 1,4-dioxane	12.473	88	152859	9.688	ppbV	99
59) trichloroethene	12.473	130	297030	10.413	ppbV	96
60) 2,2,4-trimethylpentane	12.520	57	1055969M6	8.651	ppbV	
61) methyl methacrylate	12.733	41	353150	10.503	ppbV	100
62) heptane	12.840	43	498366	9.627	ppbV	96
63) cis-1,3-dichloropropene	13.492	75	324397	9.622	ppbV	100
64) 4-methyl-2-pentanone	13.533	43	601402	10.369	ppbV	98
65) trans-1,3-dichloropropene	14.108	75	295303	10.011	ppbV	100
66) 1,1,2-trichloroethane	14.308	97	263643	10.522	ppbV	96

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626189.D
 Acq On : 29 Aug 2021 11:06 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:36:51 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 16 10:31:28 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.625	91	743427	10.142	ppbV	99
70) 2-methylthiophene	14.700	97	590060	10.672	ppbV	99
71) 1,3-dichloropropane	14.658	76	369938	9.937	ppbV	98
72) 2-hexanone	14.933	43	534708	10.991	ppbV	98
73) 3-methylthiophene	14.892	97	600708	10.534	ppbV	99
74) dibromochloromethane	15.083	129	411962	12.477	ppbV	100
75) 1,2-dibromoethane	15.333	107	400073	11.001	ppbV	97
76) butyl acetate	15.592	73	90377	10.477	ppbV	89
77) octane	15.675	85	266889	9.756	ppbV	99
78) tetrachloroethene	15.800	166	353404	11.243	ppbV	99
79) 1,1,1,2-tetrachloroethane	16.425	131	299052	12.166	ppbV	98
80) chlorobenzene	16.433	112	654219	10.384	ppbV	98
81) ethylbenzene	16.783	91	967198	10.900	ppbV	97
82) 2-ethylthiophene	16.817	97	714430	11.335	ppbV	97
83) m+p-xylene	16.942	91	1579014	21.913	ppbV	96
84) bromoform	17.008	173	353628	13.650	ppbV	98
85) styrene	17.275	104	687230	11.179	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.367	83	625221	10.922	ppbV	99
87) o-xylene	17.367	91	804965	11.005	ppbV	97
88) 1,2,3-trichloropropane	17.483	75	482382	10.883	ppbV	97
89) nonane	17.567	43	752239	10.674	ppbV	94
91) isopropylbenzene	17.883	105	1115504	11.129	ppbV	98
92) bromobenzene	17.958	77	597113	10.652	ppbV	87
93) 2-chlorotoluene	18.292	126	331292	11.704	ppbV	93
94) n-propylbenzene	18.325	120	358483	11.188	ppbV	99
95) 4-chlorotoluene	18.358	126	330457	12.201	ppbV	91
96) 4-ethyl toluene	18.450	105	1278843	11.441	ppbV	99
97) 1,3,5-trimethylbenzene	18.517	105	1033056	11.242	ppbV	99
98) tert-butylbenzene	18.858	119	1050729	11.627	ppbV	100
99) 1,2,4-trimethylbenzene	18.858	105	1018925	11.420	ppbV	92
100) decane	18.942	57	724975	10.105	ppbV #	96
101) Benzyl Chloride	18.983	91	593528	12.228	ppbV	98
102) 1,3-dichlorobenzene	18.992	146	747261	12.330	ppbV	98
103) 1,4-dichlorobenzene	19.050	146	732883	12.373	ppbV	97
104) sec-butylbenzene	19.092	105	1474718	11.411	ppbV	99
105) 1,2,3-trimethylbenzene	19.225	105	1151729	11.314	ppbV	98
106) p-isopropyltoluene	19.217	119	1296758	11.696	ppbV	99
107) 1,2-dichlorobenzene	19.342	146	712111	12.310	ppbV	97
108) n-butylbenzene	19.575	91	1071181	11.615	ppbV	96
109) indan	19.392	117	1265050	11.806	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626189.D
 Acq On : 29 Aug 2021 11:06 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 05:36:51 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 16 10:31:28 2021
 Response via : Initial Calibration

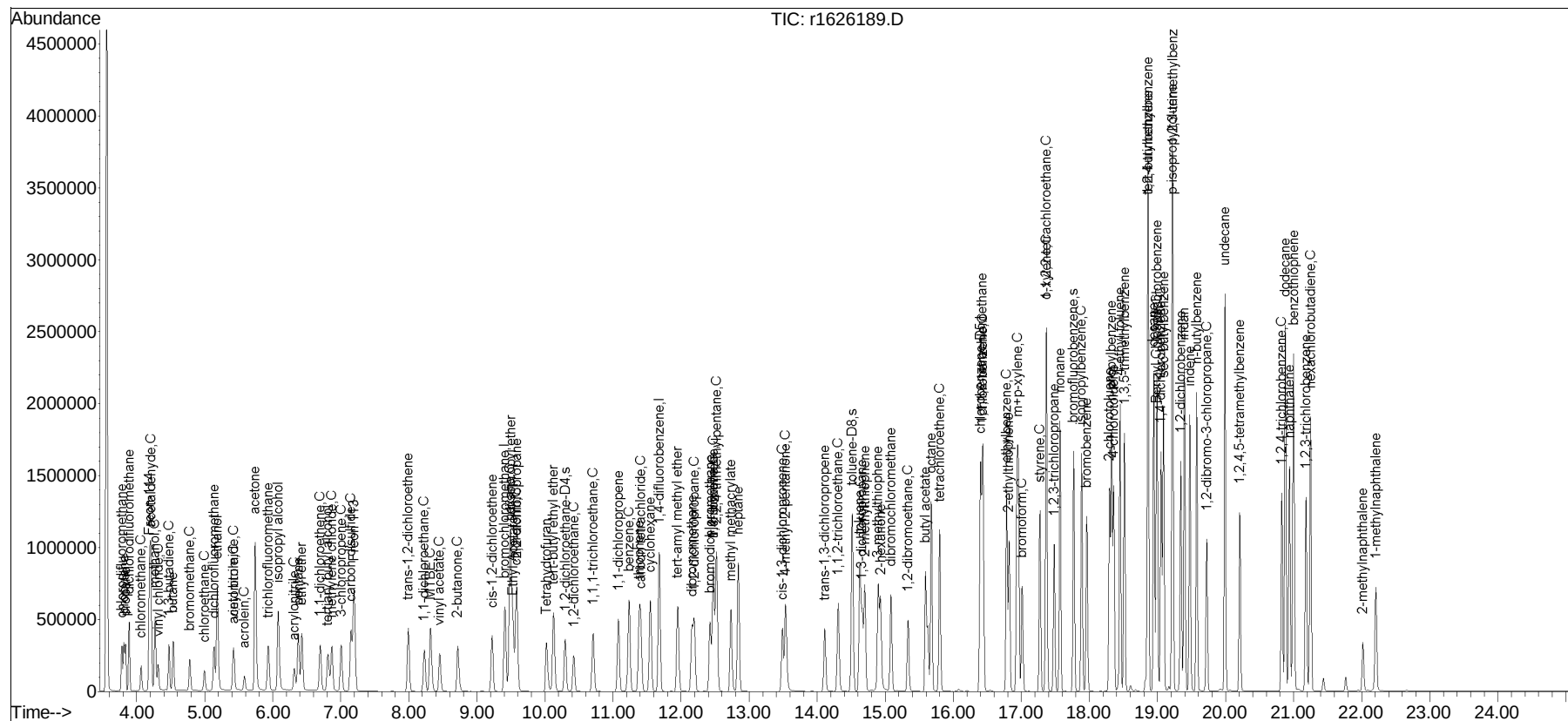
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.475	115	1007938	12.109	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.725	75	257331	11.988	ppbV	87
112)	undecane	19.992	57	814159	10.467	ppbV	94
113)	1,2,4,5-tetramethylben...	20.208	119	652032	11.630	ppbV	99
114)	dodecane	20.875	57	831844	11.197	ppbV	94
115)	1,2,4-trichlorobenzene	20.825	180	434271	13.895	ppbV	96
116)	naphthalene	20.942	128	1378037	12.139	ppbV	100
117)	1,2,3-trichlorobenzene	21.183	180	450129	14.351	ppbV	96
118)	benzothiophene	21.000	134	1981349	13.492	ppbV	98
119)	hexachlorobutadiene	21.250	225	399236	13.761	ppbV	98
120)	2-methylnaphthalene	22.017	142	206258	10.517	ppbV	98
121)	1-methylnaphthalene	22.208	142	450674	11.988	ppbV	98

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

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Data Path   : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\
Data File  : r1626189.D
Acq On     : 29 Aug 2021  11:06 PM
Operator   : AIRLAB16:TS
Sample     : IT015-LLSTD010
Misc       : WG1540703
ALS Vial   : 0      Sample Multiplier: 1
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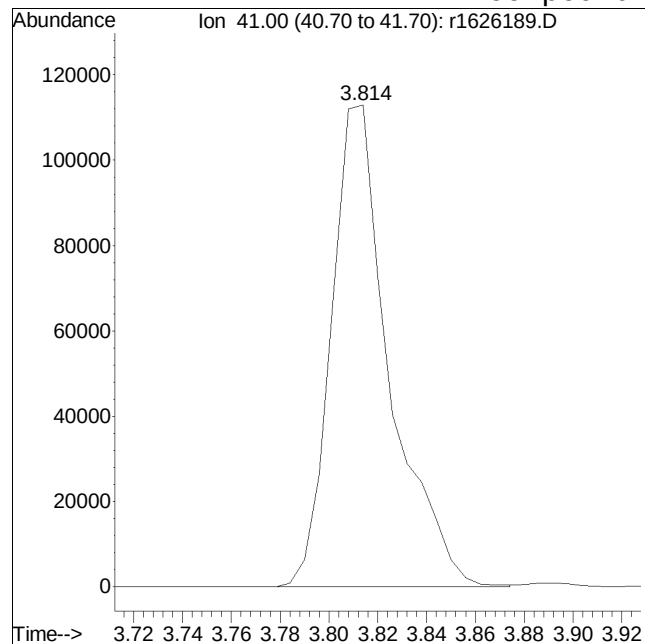
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Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 16 10:31:28 2021
Response via : Initial Calibration



Manual Integration Report

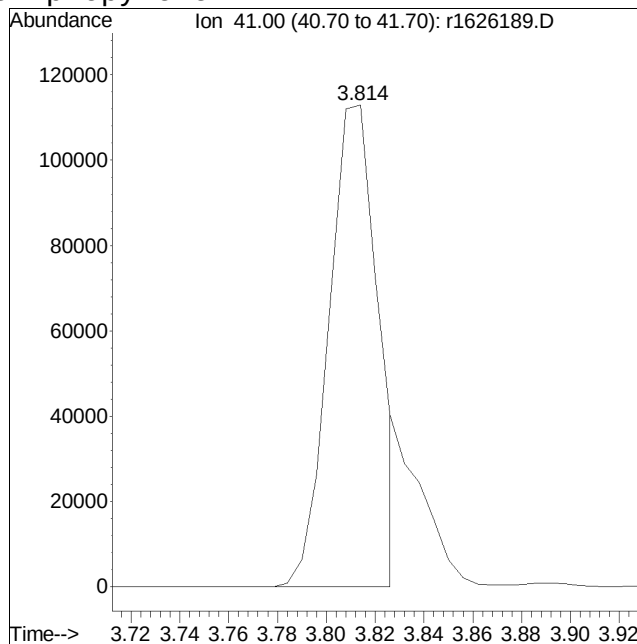
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Data File : r1626189.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:1: 6 Instrument :
Sample : IT015-LLSTD010 Quant Date : 8/30/2021 5:35 am

Compound #3: propylene



Original Peak Response = 187457

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

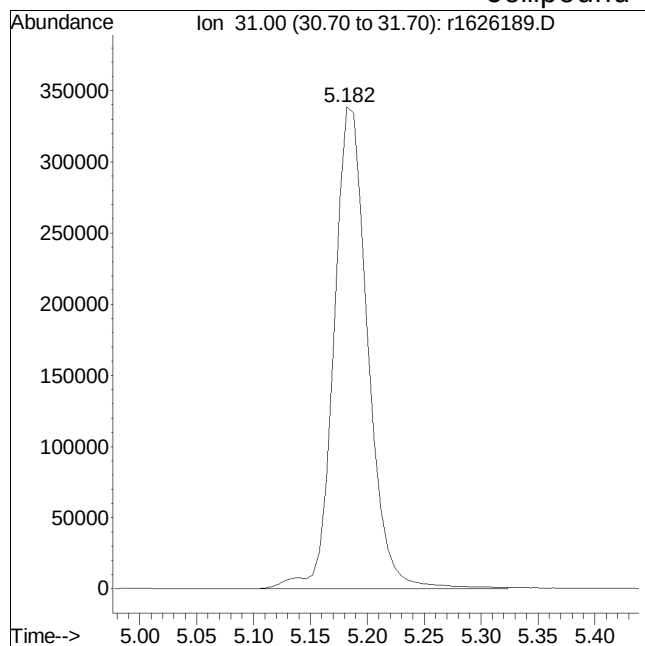


Manual Peak Response = 158858 M6

Manual Integration Report

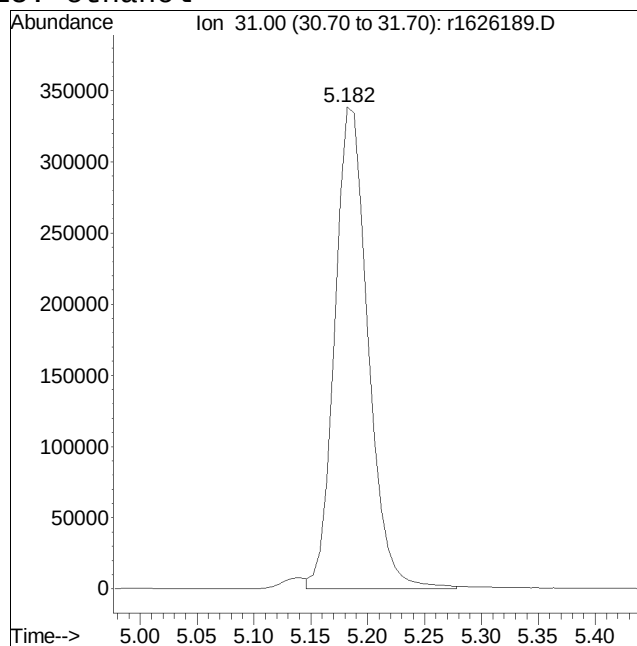
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626189.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:1: 6 Instrument :
Sample : IT015-LLSTD010 Quant Date : 8/30/2021 5:35 am

Compound #15: ethanol



Original Peak Response = 679925

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

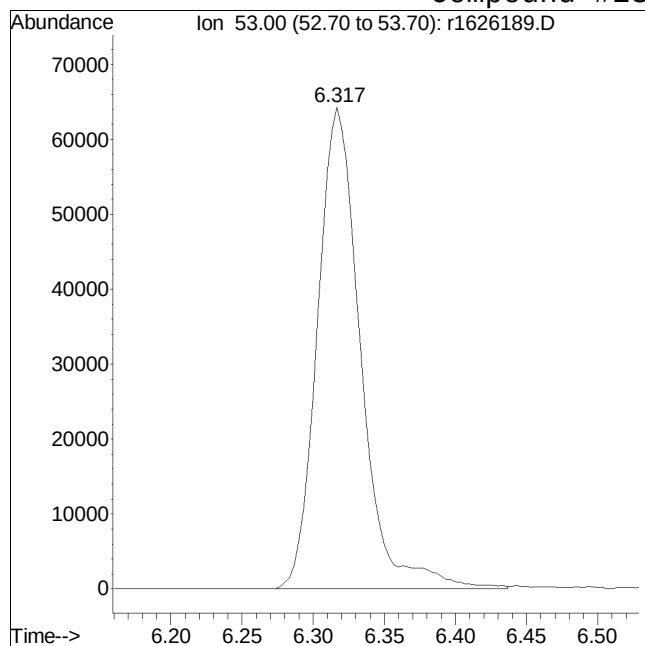


Manual Peak Response = 688761 M6

Manual Integration Report

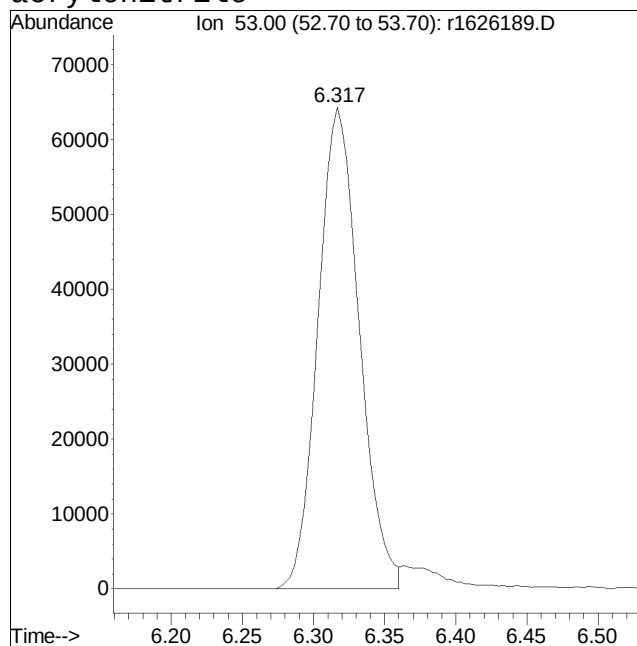
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626189.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:1: 6 Instrument :
Sample : IT015-LLSTD010 Quant Date : 8/30/2021 5:35 am

Compound #23: acrylonitrile



Original Peak Response = 136402

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

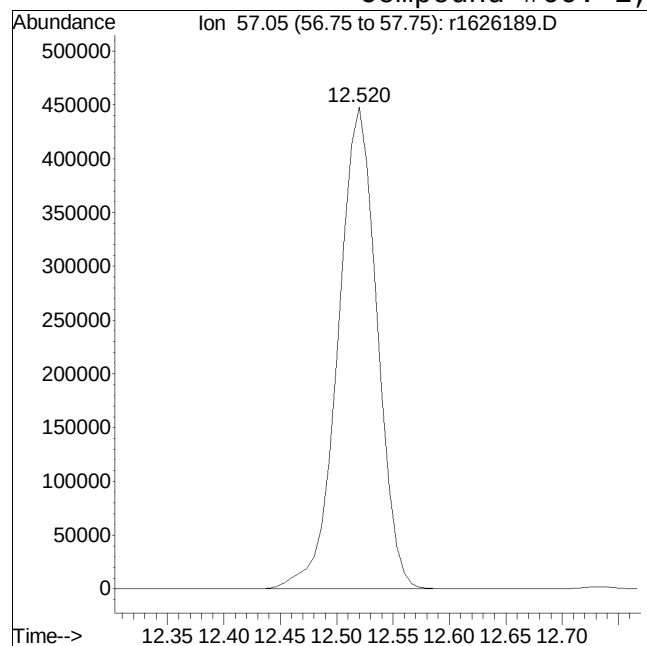


Manual Peak Response = 129846 M6

Manual Integration Report

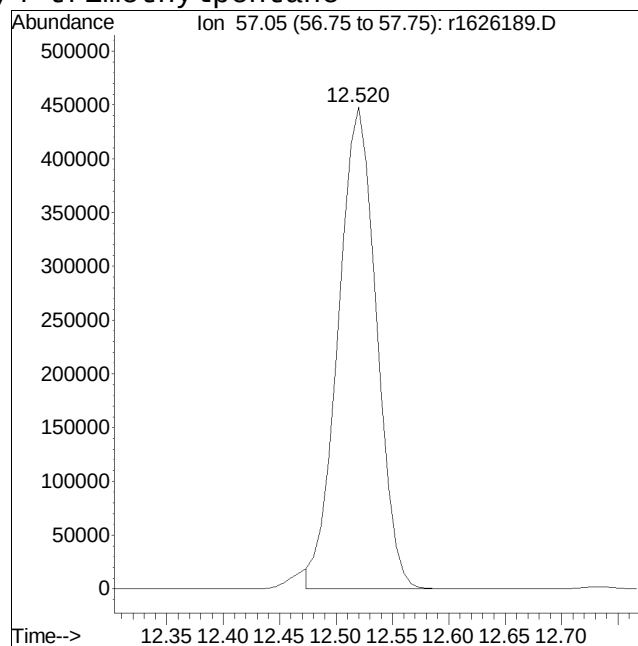
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626189.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:1: 6 Instrument :
Sample : IT015-LLSTD010 Quant Date : 8/30/2021 5:35 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 1077368

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 1055969 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626190.D
 Acq On : 29 Aug 2021 11:44 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD020
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:02:43 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.425	49	386233	10.000	ppbV	0.02
Standard Area = 378800			Recovery =	101.96%		
43) 1,4-difluorobenzene	11.687	114	1003081	10.000	ppbV	0.00
Standard Area = 984697			Recovery =	101.87%		
67) chlorobenzene-D5	16.400	54	159070	10.000	ppbV	0.00
Standard Area = 156202			Recovery =	101.84%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.308	65	249702	9.654	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	96.54%		
69) toluene-D8	14.517	98	991223	9.762	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	97.62%		
90) bromofluorobenzene	17.775	95	673196	9.757	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	97.57%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.778	51	564438	18.681	ppbV	99
3) propylene	3.808	41	300447M6	18.549	ppbV	
4) propane	3.832	29	398394	19.086	ppbV	99
5) dichlorodifluoromethane	3.886	85	699479	18.943	ppbV	100
6) chloromethane	4.066	50	309440	18.894	ppbV	99
7) Freon-114	4.186	85	800832	18.855	ppbV	99
8) methanol	4.270	31	725683	93.439	ppbV	98
9) vinyl chloride	4.318	62	317562	19.246	ppbV	100
10) 1,3-butadiene	4.474	54	274074	19.014	ppbV	99
11) butane	4.540	43	471641	18.738	ppbV	99
12) acetaldehyde	4.210	29	1166620	92.683	ppbV	98
13) bromomethane	4.786	94	284067	19.152	ppbV	99
14) chloroethane	5.002	64	150368	19.188	ppbV	99
15) ethanol	5.188	31	1267268	90.226	ppbV	97
16) dichlorofluoromethane	5.140	67	572098	18.859	ppbV	99
17) vinyl bromide	5.423	106	285297	19.102	ppbV	98
18) acrolein	5.587	56	136756	19.340	ppbV	97
19) acetone	5.743	43	2281928	91.215	ppbV	98
20) acetonitrile	5.433	41	261714	18.726	ppbV	97
21) trichlorofluoromethane	5.943	101	618521	22.241	ppbV	99
22) isopropyl alcohol	6.083	45	1761658	60.788	ppbV	99
23) acrylonitrile	6.323	53	310083	23.421	ppbV	97
24) pentane	6.383	43	725416	26.122	ppbV	96

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626190.D
 Acq On : 29 Aug 2021 11:44 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD020
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:02:43 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.430	31	603045	21.614	ppbV	95
26) 1,1-dichloroethene	6.706	61	509446	22.724	ppbV	96
27) tertiary butyl alcohol	6.802	59	541296	22.005	ppbV	94
28) methylene chloride	6.880	49	483774	22.280	ppbV	98
29) 3-chloropropene	7.018	41	536880	18.759	ppbV	99
30) carbon disulfide	7.156	76	1240289	19.459	ppbV	98
31) Freon 113	7.204	101	729351	18.994	ppbV	99
32) trans-1,2-dichloroethene	8.000	61	543656	19.042	ppbV	99
33) 1,1-dichloroethane	8.233	63	647624	18.992	ppbV	99
34) MTBE	8.317	73	910314	19.227	ppbV	99
35) vinyl acetate	8.458	43	903570	19.345	ppbV	99
36) 2-butanone	8.717	43	971957	19.658	ppbV	100
37) cis-1,2-dichloroethene	9.233	61	479796	18.902	ppbV	99
38) Ethyl Acetate	9.533	61	133810	18.164	ppbV	99
39) chloroform	9.583	83	678572	19.314	ppbV	98
40) Tetrahydrofuran	10.017	42	544184	18.672	ppbV	97
41) 2,2-dichloropropane	9.592	77	491128	19.568	ppbV	97
42) 1,2-dichloroethane	10.425	62	392107	18.925	ppbV	98
44) hexane	9.492	57	624566	19.269	ppbV	90
45) diisopropyl ether	9.500	87	309183	19.169	ppbV	89
46) tert-butyl ethyl ether	10.125	59	1002796	19.340	ppbV	98
48) 1,1,1-trichloroethane	10.717	97	564174	19.181	ppbV	98
49) 1,1-dichloropropene	11.087	75	579019	19.126	ppbV	97
50) benzene	11.240	78	1325033	19.295	ppbV	99
51) thiophene	11.393	84	742397	19.541	ppbV	99
52) carbon tetrachloride	11.413	117	575311	19.569	ppbV	97
53) cyclohexane	11.560	56	672531	19.336	ppbV	98
54) tert-amyl methyl ether	11.953	73	984075	19.418	ppbV	99
55) dibromomethane	12.167	93	397227	18.832	ppbV	98
56) 1,2-dichloropropane	12.200	63	444051	18.821	ppbV	99
57) bromodichloromethane	12.433	83	754922	19.467	ppbV	100
58) 1,4-dioxane	12.467	88	296911	19.068	ppbV	97
59) trichloroethene	12.480	130	572632	18.925	ppbV	99
60) 2,2,4-trimethylpentane	12.527	57	2037441M6	18.941	ppbV	
61) methyl methacrylate	12.733	41	677401	18.830	ppbV	99
62) heptane	12.847	43	931925	18.357	ppbV	97
63) cis-1,3-dichloropropene	13.492	75	652690	19.751	ppbV	98
64) 4-methyl-2-pentanone	13.533	43	1133126	18.496	ppbV	97
65) trans-1,3-dichloropropene	14.117	75	594846	19.774	ppbV	99
66) 1,1,2-trichloroethane	14.308	97	503713	18.756	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626190.D
 Acq On : 29 Aug 2021 11:44 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD020
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:02:43 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.633	91	1440483	19.027	ppbV	100
70) 2-methylthiophene	14.700	97	1136335	18.911	ppbV	99
71) 1,3-dichloropropane	14.667	76	712317	18.908	ppbV	99
72) 2-hexanone	14.925	43	1026623	18.854	ppbV	97
73) 3-methylthiophene	14.900	97	1160288	18.967	ppbV	99
74) dibromochloromethane	15.092	129	809884	19.305	ppbV	99
75) 1,2-dibromoethane	15.342	107	770558	18.913	ppbV	99
76) butyl acetate	15.592	73	178901	19.438	ppbV	93
77) octane	15.683	85	521438	19.185	ppbV	98
78) tetrachloroethene	15.800	166	680824	18.917	ppbV	98
79) 1,1,1,2-tetrachloroethane	16.425	131	568841	18.679	ppbV	98
80) chlorobenzene	16.442	112	1263910	18.971	ppbV	99
81) ethylbenzene	16.783	91	1854568	18.829	ppbV	99
82) 2-ethylthiophene	16.825	97	1369572	18.825	ppbV	100
83) m+p-xylene	16.950	91	3003381	37.355	ppbV	98
84) bromoform	17.017	173	699664	19.429	ppbV	97
85) styrene	17.275	104	1328025	18.976	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.367	83	1197707	18.811	ppbV	99
87) o-xylene	17.367	91	1529007	18.652	ppbV	99
88) 1,2,3-trichloropropane	17.483	75	922412	18.777	ppbV	99
89) nonane	17.575	43	1374676	17.945	ppbV	97
91) isopropylbenzene	17.892	105	2124527	18.702	ppbV	99
92) bromobenzene	17.967	77	1159867	19.074	ppbV	94
93) 2-chlorotoluene	18.300	126	628956	18.643	ppbV	95
94) n-propylbenzene	18.325	120	687833	18.841	ppbV	96
95) 4-chlorotoluene	18.358	126	623048	18.514	ppbV	100
96) 4-ethyl toluene	18.450	105	2405787	18.473	ppbV	100
97) 1,3,5-trimethylbenzene	18.517	105	2189505	20.812	ppbV	100
98) tert-butylbenzene	18.858	119	1957469	18.294	ppbV	99
99) 1,2,4-trimethylbenzene	18.867	105	1905750	18.366	ppbV	93
100) decane	18.950	57	1343089	18.192	ppbV	97
101) Benzyl Chloride	18.983	91	1203117	19.905	ppbV	99
102) 1,3-dichlorobenzene	19.000	146	1410301	18.533	ppbV	96
103) 1,4-dichlorobenzene	19.050	146	1410187	18.895	ppbV	99
104) sec-butylbenzene	19.092	105	2727983	18.165	ppbV	99
105) 1,2,3-trimethylbenzene	19.225	105	2126447	18.130	ppbV	97
106) p-isopropyltoluene	19.225	119	2393049	18.121	ppbV	99
107) 1,2-dichlorobenzene	19.342	146	1332238	18.371	ppbV	100
108) n-butylbenzene	19.575	91	1972746	18.085	ppbV	99
109) indan	19.400	117	2351713	18.255	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626190.D
 Acq On : 29 Aug 2021 11:44 PM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD020
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:02:43 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

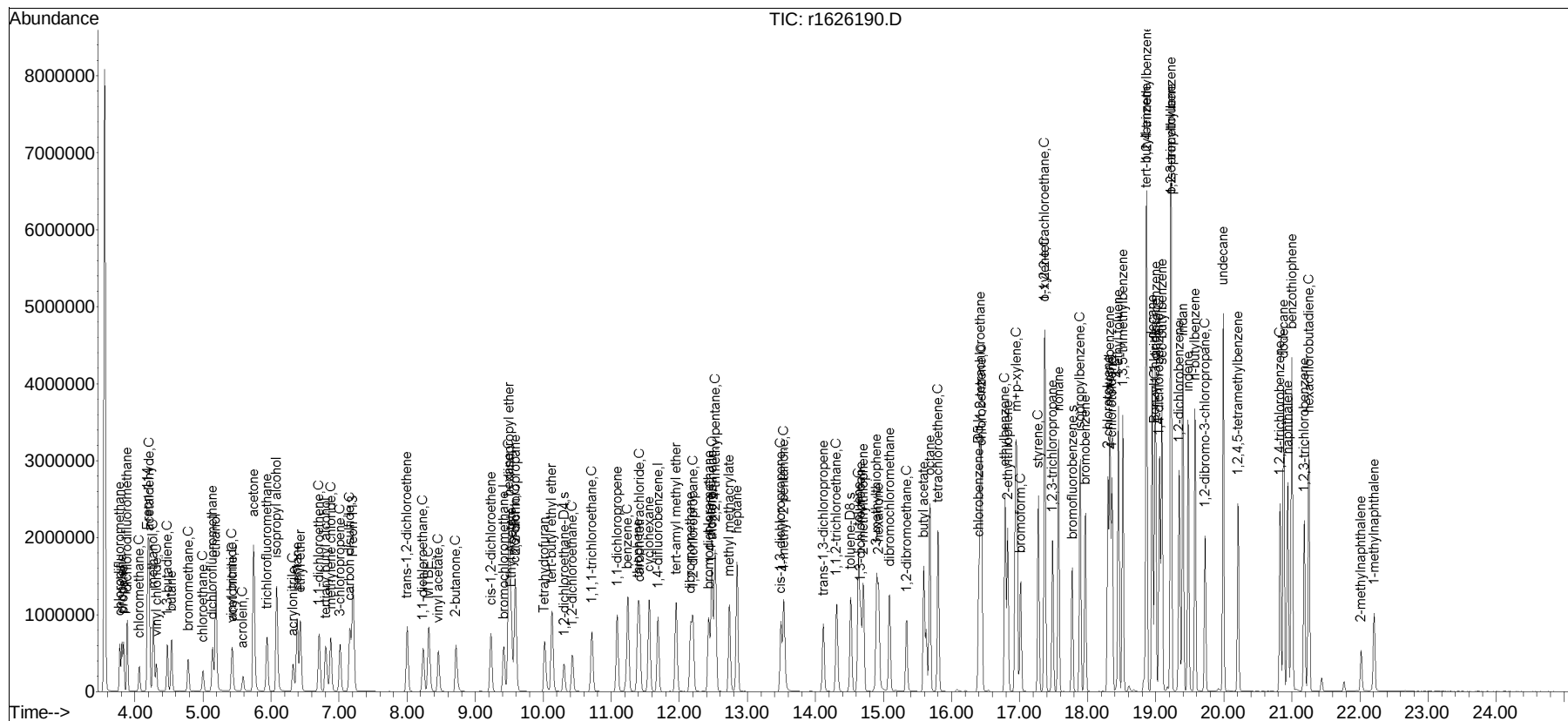
	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.475	115	1889866	18.412	ppbV	100
111)	1,2-dibromo-3-chloropr...	19.725	75	496098	18.931	ppbV	98
112)	undecane	19.992	57	1478682	17.835	ppbV	96
113)	1,2,4,5-tetramethylben...	20.208	119	1288805	19.410	ppbV	99
114)	dodecane	20.875	57	1335114	15.761	ppbV	96
115)	1,2,4-trichlorobenzene	20.825	180	788313	17.825	ppbV	99
116)	naphthalene	20.942	128	2353423	16.770	ppbV	100
117)	1,2,3-trichlorobenzene	21.183	180	740634	16.157	ppbV	99
118)	benzothiophene	21.000	134	3601469	17.849	ppbV	100
119)	hexachlorobutadiene	21.250	225	664509	16.344	ppbV	99
120)	2-methylnaphthalene	22.017	142	331876	15.800	ppbV	98
121)	1-methylnaphthalene	22.208	142	645371	14.062	ppbV	99

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

Sub List : Default - All compounds listed1\08\0829T_I\r1626189.D

Data Path : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\
Data File : r1626190.D
Acq On : 29 Aug 2021 11:44 PM
Operator : AIRLAB16:TS
Sample : IT015-LLSTD020
Misc : WG1540703
ALS Vial : 0 Sample Multiplier: 1

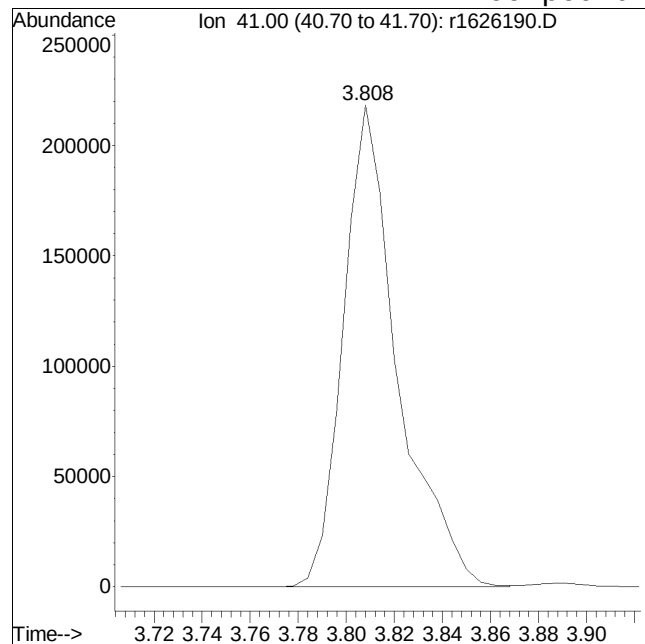
Quant Time: Aug 30 06:02:43 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 05:38:26 2021
Response via : Initial Calibration



Manual Integration Report

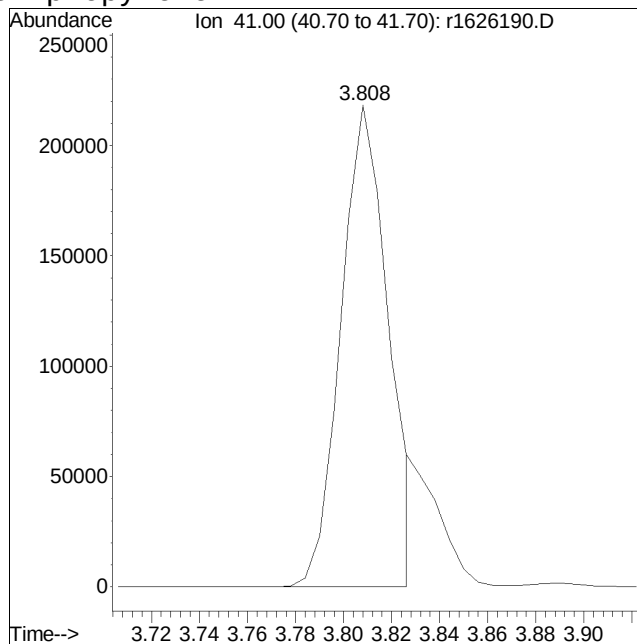
Data Path : 0:\Forensics\Data\AirLab16QMethod : TFS16_210829.M
Data File : r1626190.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:1: 4 Instrument :
Sample : IT015-LLSTD020 Quant Date : 8/30/2021 5:39 am

Compound #3: propylene



Original Peak Response = 344607

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

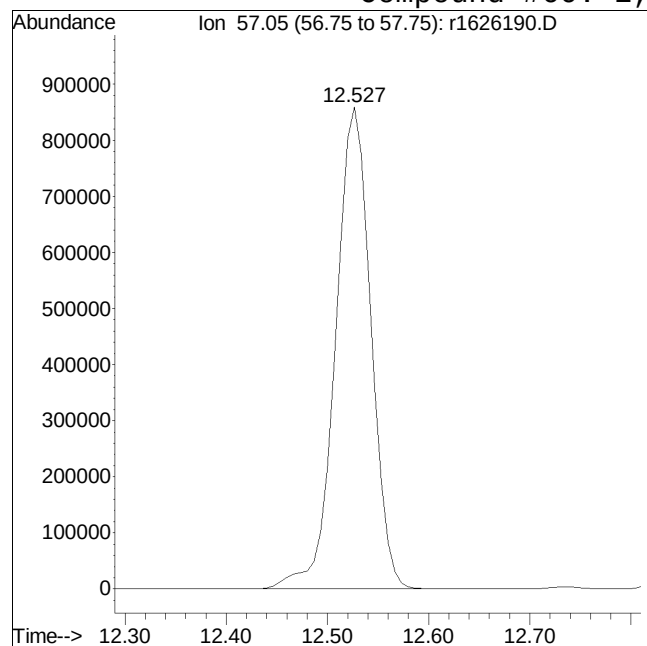


Manual Peak Response = 300447 M6

Manual Integration Report

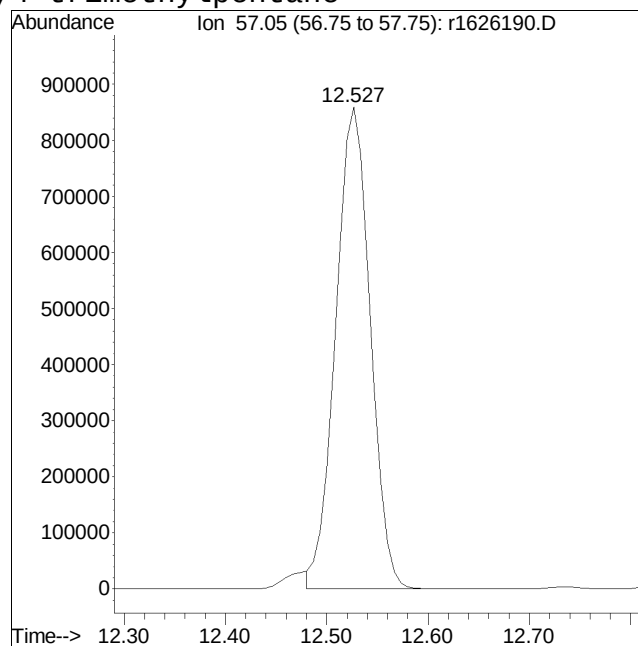
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626190.D Operator : AIRLAB16:TS
Date Inj'd : 8/29/2020 0:1: 4 Instrument :
Sample : IT015-LLSTD020 Quant Date : 8/30/2021 5:39 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 2089584

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 2037441 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626191.D
 Acq On : 30 Aug 2021 12:22 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD050
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:03:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.425	49	398245	10.000	ppbV	0.02
Standard Area = 378800			Recovery = 105.13%			
43) 1,4-difluorobenzene	11.687	114	1000278	10.000	ppbV	0.00
Standard Area = 984697			Recovery = 101.58%			
67) chlorobenzene-D5	16.400	54	162257	10.000	ppbV	0.00
Standard Area = 156202			Recovery = 103.88%			
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.308	65	245535	9.519	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery = 95.19%			
69) toluene-D8	14.517	98	979637	9.458	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery = 94.58%			
90) bromofluorobenzene	17.767	95	653018	9.279	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery = 92.79%			
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.778	51	1371262	44.016	ppbV	100
3) propylene	3.808	41	675984M6	40.475	ppbV	
4) propane	3.832	29	983505	45.696	ppbV	97
5) dichlorodifluoromethane	3.886	85	1669824	43.858	ppbV	98
6) chloromethane	4.066	50	736215	43.596	ppbV	100
7) Freon-114	4.186	85	1878854	42.902	ppbV	99
8) methanol	4.270	31	1786914	223.143	ppbV	98
9) vinyl chloride	4.312	62	785007	46.141	ppbV	99
10) 1,3-butadiene	4.474	54	663175	44.620	ppbV	98
11) butane	4.540	43	1115802	42.994	ppbV	98
12) acetaldehyde	4.204	29	2669028	205.646	ppbV	99
13) bromomethane	4.786	94	688648	45.030	ppbV	98
14) chloroethane	5.002	64	367745	45.512	ppbV	99
15) ethanol	5.194	31	2834676	195.733	ppbV	94
16) dichlorofluoromethane	5.146	67	1403179	44.859	ppbV	100
17) vinyl bromide	5.430	106	677069	43.966	ppbV	99
18) acrolein	5.587	56	339007	46.497	ppbV	97
19) acetone	5.743	43	5098732	197.663	ppbV	94
20) acetonitrile	5.433	41	624512	43.337	ppbV	99
21) trichlorofluoromethane	5.940	101	1279039	44.604	ppbV	100
22) isopropyl alcohol	6.087	45	3195941	106.954	ppbV	99
23) acrylonitrile	6.327	53	651429	47.720	ppbV	99
24) pentane	6.380	43	1289903	45.048	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626191.D
 Acq On : 30 Aug 2021 12:22 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD050
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:03:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.430	31	1305569	45.382	ppbV	98
26) 1,1-dichloroethene	6.706	61	1057317	45.739	ppbV	99
27) tertiary butyl alcohol	6.808	59	1238117	48.814	ppbV	93
28) methylene chloride	6.880	49	934690	41.749	ppbV	99
29) 3-chloropropene	7.012	41	1287278	43.621	ppbV	98
30) carbon disulfide	7.156	76	2981312	45.363	ppbV	98
31) Freon 113	7.204	101	1729826	43.689	ppbV	99
32) trans-1,2-dichloroethene	8.000	61	1321680	44.896	ppbV	99
33) 1,1-dichloroethane	8.233	63	1568442	44.608	ppbV	100
34) MTBE	8.317	73	2212802	45.328	ppbV	98
35) vinyl acetate	8.458	43	2275707	47.251	ppbV	98
36) 2-butanone	8.717	43	2346615	46.029	ppbV	98
37) cis-1,2-dichloroethene	9.233	61	1183068	45.203	ppbV	98
38) Ethyl Acetate	9.533	61	336008	44.237	ppbV	96
39) chloroform	9.592	83	1646244	45.444	ppbV	97
40) Tetrahydrofuran	10.017	42	1314838	43.753	ppbV	95
41) 2,2-dichloropropane	9.592	77	1202416	46.462	ppbV	94
42) 1,2-dichloroethane	10.433	62	953452	44.631	ppbV	98
44) hexane	9.492	57	1503210	46.507	ppbV	98
45) diisopropyl ether	9.508	87	748369	46.528	ppbV	85
46) tert-butyl ethyl ether	10.133	59	2451028	47.403	ppbV	99
48) 1,1,1-trichloroethane	10.717	97	1366571	46.592	ppbV	98
49) 1,1-dichloropropene	11.087	75	1405378	46.553	ppbV	97
50) benzene	11.247	78	3196952	46.683	ppbV	98
51) thiophene	11.393	84	1810271	47.782	ppbV	98
52) carbon tetrachloride	11.413	117	1395973	47.617	ppbV	97
53) cyclohexane	11.553	56	1647078	47.487	ppbV	97
54) tert-amyl methyl ether	11.953	73	2406720	47.624	ppbV	99
55) dibromomethane	12.167	93	965964	45.923	ppbV	97
56) 1,2-dichloropropane	12.200	63	1067730	45.382	ppbV	98
57) bromodichloromethane	12.433	83	1852280	47.898	ppbV	100
58) 1,4-dioxane	12.467	88	728430	46.911	ppbV	97
59) trichloroethene	12.480	130	1375195	45.577	ppbV	99
60) 2,2,4-trimethylpentane	12.527	57	4854548M6	45.256	ppbV	
61) methyl methacrylate	12.733	41	1627056	45.355	ppbV	97
62) heptane	12.847	43	2154710	42.562	ppbV	94
63) cis-1,3-dichloropropene	13.492	75	1628858	49.430	ppbV	98
64) 4-methyl-2-pentanone	13.533	43	2690898	44.047	ppbV	94
65) trans-1,3-dichloropropene	14.117	75	1515924	50.535	ppbV	98
66) 1,1,2-trichloroethane	14.317	97	1214355	45.343	ppbV	97

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626191.D
 Acq On : 30 Aug 2021 12:22 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD050
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:03:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.633	91	3418498	44.267	ppbV	99
70) 2-methylthiophene	14.708	97	2704614	44.126	ppbV	99
71) 1,3-dichloropropane	14.667	76	1713726	44.596	ppbV	97
72) 2-hexanone	14.925	43	2444231	44.006	ppbV	93
73) 3-methylthiophene	14.900	97	2755629	44.161	ppbV	99
74) dibromochloromethane	15.092	129	1940245	45.340	ppbV	99
75) 1,2-dibromoethane	15.342	107	1867740	44.943	ppbV	99
76) butyl acetate	15.592	73	443099	47.198	ppbV	87
77) octane	15.683	85	1251088	45.127	ppbV	90
78) tetrachloroethene	15.800	166	1605068	43.723	ppbV	100
79) 1,1,1,2-tetrachloroethane	16.425	131	1361528	43.829	ppbV	99
80) chlorobenzene	16.442	112	2922540	43.005	ppbV	98
81) ethylbenzene	16.783	91	4384093	43.636	ppbV	98
82) 2-ethylthiophene	16.825	97	3252454	43.826	ppbV	98
83) m+p-xylene	16.950	91	7013383	85.517	ppbV	99
84) bromoform	17.017	173	1734035	47.206	ppbV	98
85) styrene	17.275	104	3181611	44.569	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.367	83	2754401	42.411	ppbV	100
87) o-xylene	17.367	91	3509284	41.969	ppbV	99
88) 1,2,3-trichloropropane	17.483	75	2197646	43.858	ppbV	98
89) nonane	17.575	43	3093929	39.595	ppbV	91
91) isopropylbenzene	17.892	105	4894685	42.241	ppbV	98
92) bromobenzene	17.967	77	2756155	44.436	ppbV	96
93) 2-chlorotoluene	18.300	126	1517971	44.110	ppbV	97
94) n-propylbenzene	18.325	120	1660851	44.601	ppbV	89
95) 4-chlorotoluene	18.358	126	1512363	44.058	ppbV	94
96) 4-ethyl toluene	18.450	105	5574566	41.964	ppbV	98
97) 1,3,5-trimethylbenzene	18.517	105	4533249	42.244	ppbV	96
98) tert-butylbenzene	18.858	119	4384119	40.167	ppbV	98
99) 1,2,4-trimethylbenzene	18.867	105	4260620	40.254	ppbV	95
100) decane	18.950	57	3198518	42.473	ppbV	91
101) Benzyl Chloride	18.983	91	3186559	51.685	ppbV	97
102) 1,3-dichlorobenzene	19.000	146	3281016	42.269	ppbV	96
103) 1,4-dichlorobenzene	19.058	146	3310634	43.487	ppbV	94
104) sec-butylbenzene	19.092	105	6253984	40.825	ppbV	97
105) 1,2,3-trimethylbenzene	19.225	105	4686474	39.172	ppbV	98
106) p-isopropyltoluene	19.225	119	5268173	39.110	ppbV	98
107) 1,2-dichlorobenzene	19.342	146	3186798	43.081	ppbV	99
108) n-butylbenzene	19.575	91	4639257	41.694	ppbV	97
109) indan	19.400	117	5457173	41.528	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626191.D
 Acq On : 30 Aug 2021 12:22 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD050
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:03:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

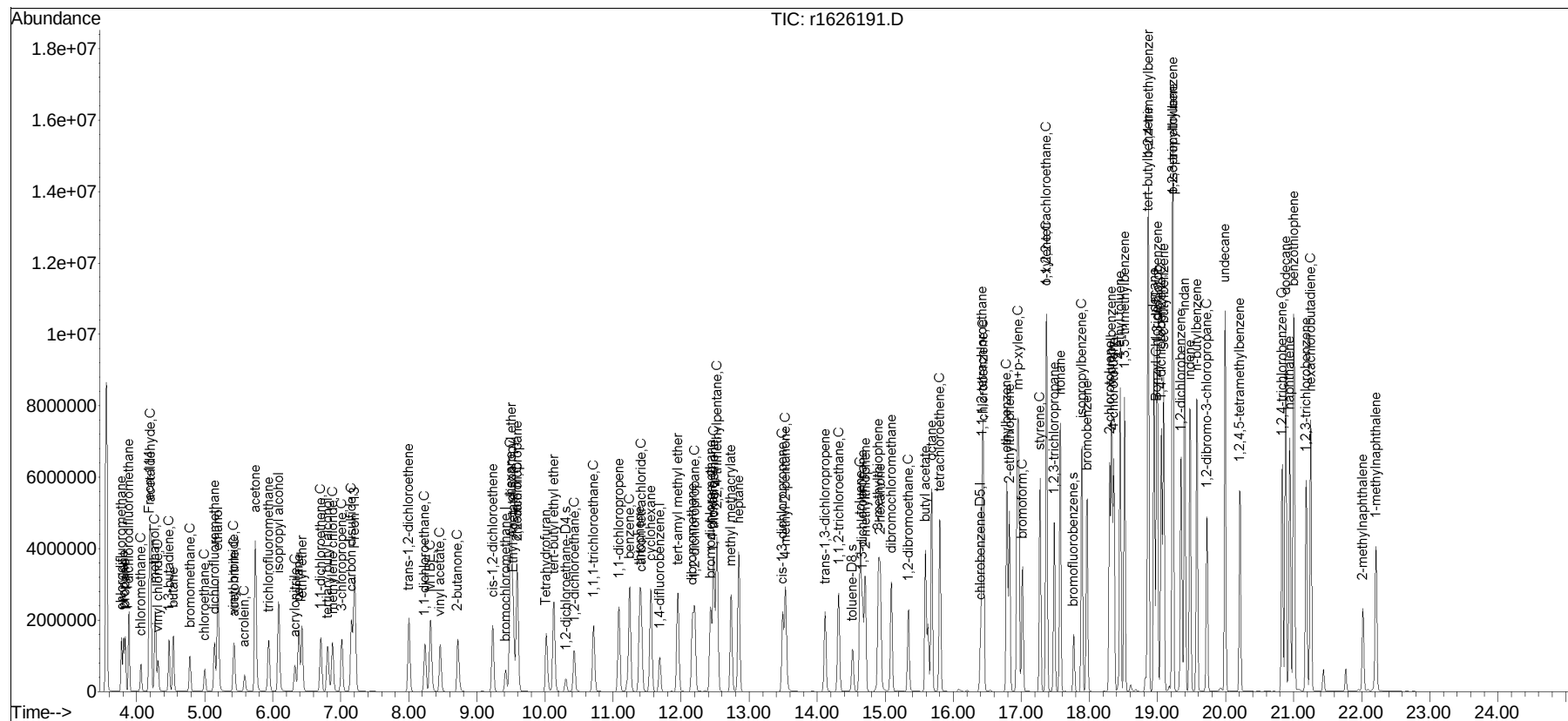
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110) indene	19.475	115	4540239	43.364	ppbV	98
111) 1,2-dibromo-3-chloropr...	19.725	75	1234343	46.177	ppbV	95
112) undecane	19.992	57	3494886	41.324	ppbV	91
113) 1,2,4,5-tetramethylben...	20.208	119	3164182	46.717	ppbV	100
114) dodecane	20.883	57	3416791	39.542	ppbV	90
115) 1,2,4-trichlorobenzene	20.833	180	2147000	47.594	ppbV	97
116) naphthalene	20.942	128	6101349	42.623	ppbV	99
117) 1,2,3-trichlorobenzene	21.183	180	1996585	42.701	ppbV	96
118) benzothiophene	21.000	134	9336766	45.365	ppbV	98
119) hexachlorobutadiene	21.250	225	1647132	39.717	ppbV	99
120) 2-methylnaphthalene	22.017	142	1421954	66.368	ppbV	99
121) 1-methylnaphthalene	22.208	142	2536869	54.190	ppbV	100

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

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Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
Data File : r1626191.D
Acq On    : 30 Aug 2021  12:22 AM
Operator  : AIRLAB16:TS
Sample    : IT015-LLSTD050
Misc      : WG1540703
ALS Vial  : 0      Sample Multiplier: 1
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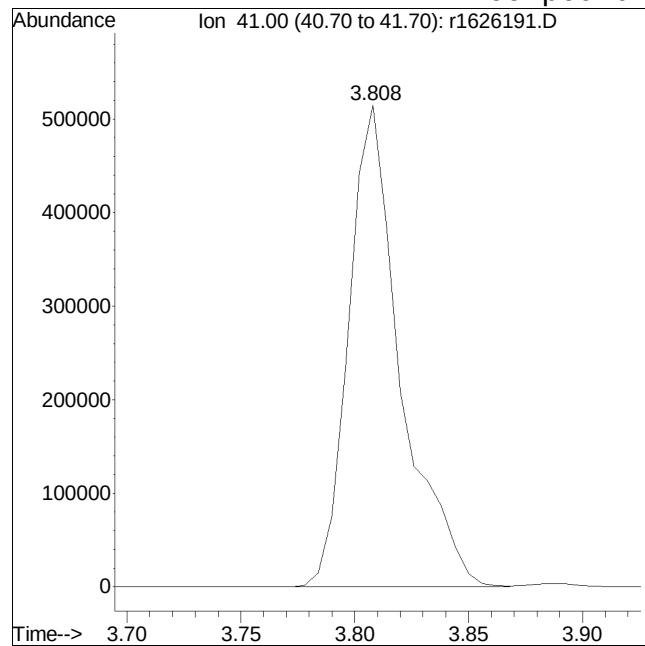
Quant Time: Aug 30 06:03:37 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 05:38:26 2021
Response via : Initial Calibration



Manual Integration Report

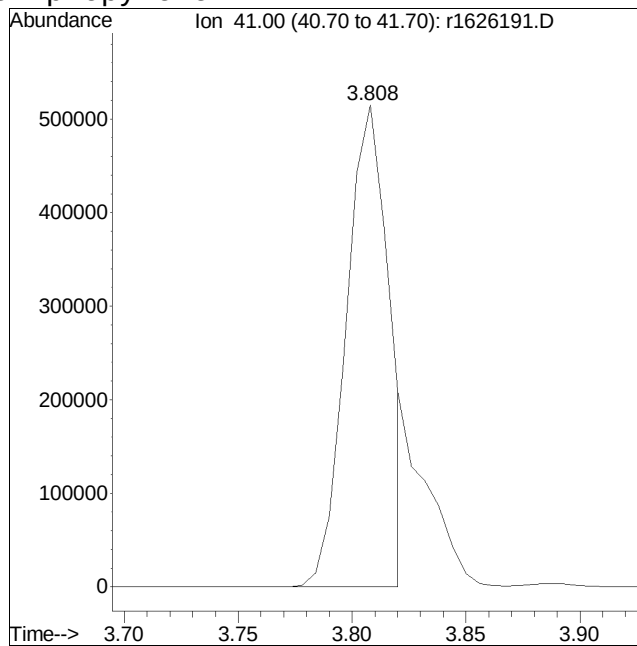
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626191.D Operator : AIRLAB16:TS
Date Inj'd : 8/30/2020 0:2: 2 Instrument :
Sample : IT015-LLSTD050 Quant Date : 8/30/2021 5:39 am

Compound #3: propylene



Original Peak Response = 817494

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

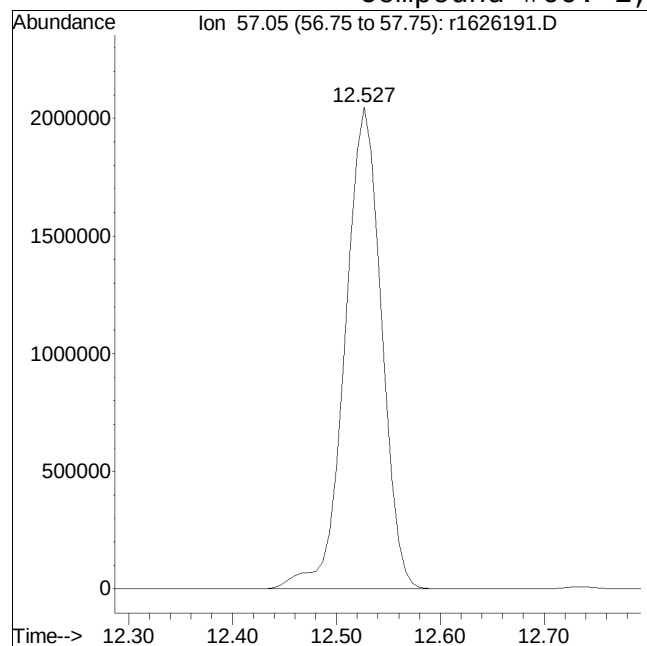


Manual Peak Response = 675984 M6

Manual Integration Report

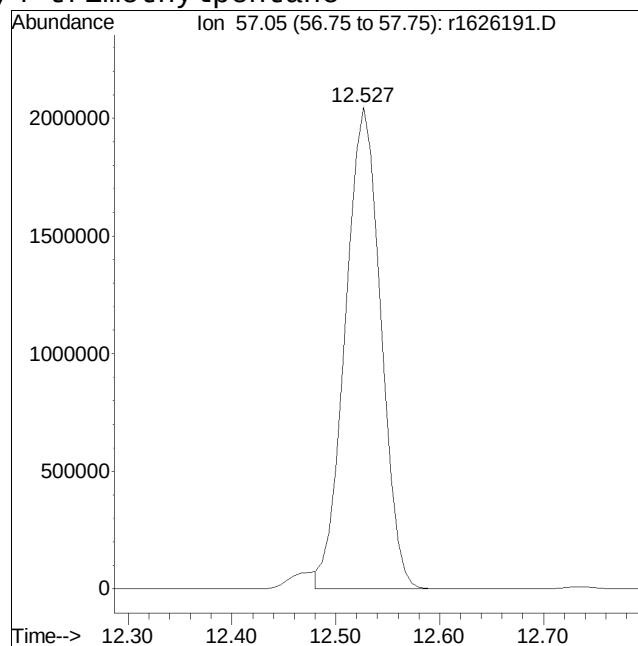
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626191.D Operator : AIRLAB16:TS
Date Inj'd : 8/30/2020 0:2: 2 Instrument :
Sample : IT015-LLSTD050 Quant Date : 8/30/2021 5:39 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 4988796

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 4854548 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626192.D
 Acq On : 30 Aug 2021 1:03 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD100
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:04:54 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.425	49	402112	10.000	ppbV	0.02
Standard Area = 378800			Recovery =	106.15%		
43) 1,4-difluorobenzene	11.687	114	989538	10.000	ppbV	0.00
Standard Area = 984697			Recovery =	100.49%		
67) chlorobenzene-D5	16.400	54	162278	10.000	ppbV	0.00
Standard Area = 156202			Recovery =	103.89%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.308	65	235612	9.234	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	92.34%		
69) toluene-D8	14.517	98	951860	9.189	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	91.89%		
90) bromofluorobenzene	17.767	95	652739	9.273	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	92.73%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.778	51	2602169	82.724	ppbV	99
3) propylene	3.808	41	1313801M6	77.908	ppbV	
4) propane	3.838	29	1895955	87.244	ppbV	95
5) dichlorodifluoromethane	3.892	85	3139251	81.660	ppbV	98
6) chloromethane	4.066	50	1341585	78.681	ppbV	99
7) Freon-114	4.186	85	3288654	74.372	ppbV	97
8) methanol	4.276	31	3346806	413.917	ppbV	97
9) vinyl chloride	4.318	62	1491032	86.796	ppbV	99
10) 1,3-butadiene	4.474	54	1214229	80.910	ppbV	95
11) butane	4.540	43	2036406	77.712	ppbV	96
12) acetaldehyde	4.210	29	4455045	339.956	ppbV	98
13) bromomethane	4.786	94	1320506	85.515	ppbV	98
14) chloroethane	5.002	64	728938	89.345	ppbV	99
15) ethanol	5.206	31	5027294	343.794	ppbV	93
16) dichlorofluoromethane	5.146	67	2572585	81.454	ppbV	100
17) vinyl bromide	5.427	106	1302682	83.778	ppbV	100
18) acrolein	5.587	56	663916	90.184	ppbV	93
19) acetone	5.747	43	9237596	354.670	ppbV #	94
20) acetonitrile	5.440	41	1208118	83.028	ppbV	100
21) trichlorofluoromethane	5.940	101	2498316	86.287	ppbV	97
22) isopropyl alcohol	6.093	45	5871471	194.602	ppbV	98
23) acrylonitrile	6.327	53	1236608	89.715	ppbV	99
24) pentane	6.380	43	2411124	83.395	ppbV	97

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626192.D
 Acq On : 30 Aug 2021 1:03 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD100
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:04:54 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.427	31	2911192	100.222	ppbV	96
26) 1,1-dichloroethene	6.706	61	2060417	88.275	ppbV	99
27) tertiary butyl alcohol	6.808	59	2596387	101.381	ppbV #	91
28) methylene chloride	6.880	49	2202528	97.432	ppbV	96
29) 3-chloropropene	7.012	41	2377701	79.797	ppbV	97
30) carbon disulfide	7.156	76	5584150	84.150	ppbV	98
31) Freon 113	7.198	101	3225257	80.675	ppbV	96
32) trans-1,2-dichloroethene	8.000	61	2527394	85.027	ppbV	99
33) 1,1-dichloroethane	8.233	63	2970757	83.679	ppbV	100
34) MTBE	8.317	73	4194490	85.095	ppbV	96
35) vinyl acetate	8.458	43	4223017	86.840	ppbV	96
36) 2-butanone	8.717	43	4048375	78.646	ppbV	96
37) cis-1,2-dichloroethene	9.233	61	2247091	85.032	ppbV	99
38) Ethyl Acetate	9.533	61	651576	84.958	ppbV	77
39) chloroform	9.592	83	3052455	83.451	ppbV	97
40) Tetrahydrofuran	10.017	42	2395499	78.947	ppbV	93
41) 2,2-dichloropropane	9.592	77	2250825	86.137	ppbV	91
42) 1,2-dichloroethane	10.425	62	1826245	84.663	ppbV	98
44) hexane	9.492	57	2842197	88.887	ppbV	93
45) diisopropyl ether	9.508	87	1421017	89.306	ppbV	71
46) tert-butyl ethyl ether	10.125	59	4747898	92.822	ppbV	97
48) 1,1,1-trichloroethane	10.717	97	2587466	89.175	ppbV	97
49) 1,1-dichloropropene	11.087	75	2618525	87.679	ppbV	96
50) benzene	11.240	78	5953308	87.876	ppbV	97
51) thiophene	11.393	84	3415496	91.131	ppbV	97
52) carbon tetrachloride	11.413	117	2624666	90.500	ppbV	99
53) cyclohexane	11.553	56	3197559	93.191	ppbV	95
54) tert-amyl methyl ether	11.947	73	4502776	90.067	ppbV	96
55) dibromomethane	12.167	93	1788568	85.953	ppbV	98
56) 1,2-dichloropropane	12.200	63	1979574	85.051	ppbV	97
57) bromodichloromethane	12.433	83	3456186	90.344	ppbV	100
58) 1,4-dioxane	12.467	88	1364367	88.820	ppbV	99
59) trichloroethene	12.480	130	2529233	84.734	ppbV	98
60) 2,2,4-trimethylpentane	12.527	57	9089381M6	85.655	ppbV	
61) methyl methacrylate	12.733	41	2929336	82.543	ppbV	95
62) heptane	12.847	43	3790639	75.689	ppbV #	88
63) cis-1,3-dichloropropene	13.492	75	3060085	93.870	ppbV	98
64) 4-methyl-2-pentanone	13.533	43	4761305	78.783	ppbV #	89
65) trans-1,3-dichloropropene	14.117	75	2877182	96.955	ppbV	98
66) 1,1,2-trichloroethane	14.317	97	2262777	85.407	ppbV	96

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626192.D
 Acq On : 30 Aug 2021 1:03 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD100
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:04:54 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.633	91	6297942	81.543	ppbV	100
70) 2-methylthiophene	14.708	97	5035796	82.148	ppbV	98
71) 1,3-dichloropropane	14.667	76	3148167	81.914	ppbV	95
72) 2-hexanone	14.933	43	4386675	78.967	ppbV	88
73) 3-methylthiophene	14.900	97	5097439	81.680	ppbV	100
74) dibromochloromethane	15.092	129	3570458	83.425	ppbV	99
75) 1,2-dibromoethane	15.342	107	3397382	81.740	ppbV	99
76) butyl acetate	15.592	73	817571	87.075	ppbV	79
77) octane	15.683	85	2326543	83.909	ppbV	82
78) tetrachloroethene	15.808	166	2860347	77.907	ppbV	95
79) 1,1,1,2-tetrachloroethane	16.425	131	2430179	78.220	ppbV	98
80) chlorobenzene	16.442	112	5079569	74.736	ppbV	98
81) ethylbenzene	16.783	91	7953558	79.154	ppbV	99
82) 2-ethylthiophene	16.825	97	5907833	79.597	ppbV	98
83) m+p-xylene	16.958	91	12369873	150.812	ppbV	99
84) bromoform	17.017	173	3069109	83.540	ppbV	98
85) styrene	17.275	104	5749964	80.536	ppbV	97
86) 1,1,2,2-tetrachloroethane	17.367	83	4574687	70.430	ppbV	99
87) o-xylene	17.367	91	5999919	71.746	ppbV	99
88) 1,2,3-trichloropropane	17.483	75	3981017	79.438	ppbV	98
89) nonane	17.575	43	5219309	66.786	ppbV	84
91) isopropylbenzene	17.883	105	8620437	74.385	ppbV	95
92) bromobenzene	17.967	77	4998334	80.574	ppbV	97
93) 2-chlorotoluene	18.292	126	2777644	80.704	ppbV	90
94) n-propylbenzene	18.325	120	2998706	80.518	ppbV	82
95) 4-chlorotoluene	18.358	126	2780943	81.004	ppbV	93
96) 4-ethyl toluene	18.450	105	9733725	73.264	ppbV	96
97) 1,3,5-trimethylbenzene	18.517	105	7962919	74.195	ppbV	96
98) tert-butylbenzene	18.858	119	7035971	64.456	ppbV	97
99) 1,2,4-trimethylbenzene	18.867	105	6950840	65.663	ppbV	94
100) decane	18.950	57	5722188	75.974	ppbV	85
101) Benzyl Chloride	18.983	91	5998102	97.275	ppbV	96
102) 1,3-dichlorobenzene	19.000	146	5689715	73.290	ppbV	94
103) 1,4-dichlorobenzene	19.058	146	5896352	77.442	ppbV	92
104) sec-butylbenzene	19.092	105	10706428	69.882	ppbV	93
105) 1,2,3-trimethylbenzene	19.225	105	7541070	63.025	ppbV	97
106) p-isopropyltoluene	19.225	119	8142715M6	60.442	ppbV	
107) 1,2-dichlorobenzene	19.350	146	5753619	77.771	ppbV	94
108) n-butylbenzene	19.583	91	8370043	75.213	ppbV	98
109) indan	19.400	117	9297354	70.742	ppbV #	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626192.D
 Acq On : 30 Aug 2021 1:03 AM
 Operator : AIRLAB16:TS
 Sample : IT015-LLSTD100
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 06:04:54 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 05:38:26 2021
 Response via : Initial Calibration

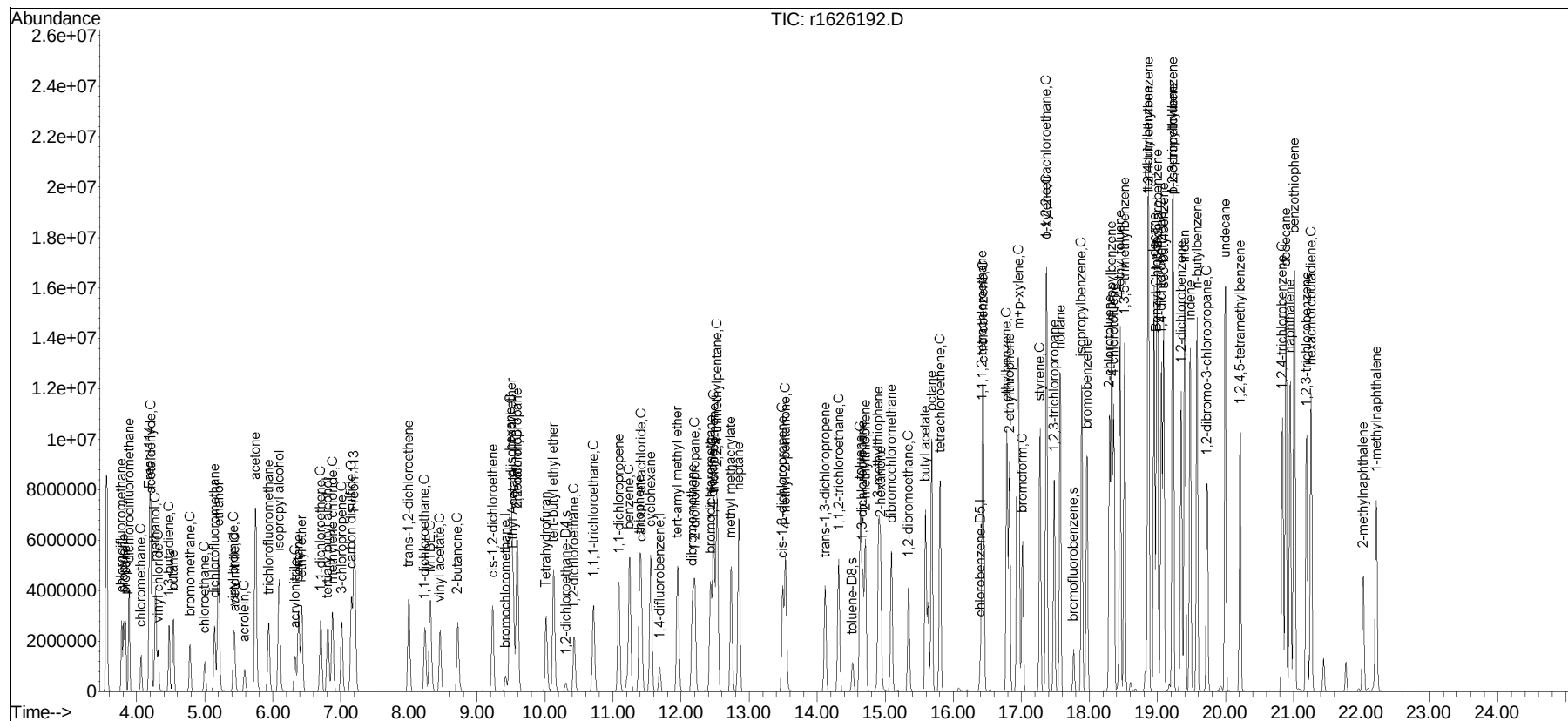
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)	
110)	indene	19.483	115	8010566	76.499	ppbV	#	97
111)	1,2-dibromo-3-chloropr...	19.725	75	2279671	85.272	ppbV		95
112)	undecane	20.000	57	6016518	71.132	ppbV		88
113)	1,2,4,5-tetramethylben...	20.217	119	5847883	86.329	ppbV		97
114)	dodecane	20.883	57	5733201	66.341	ppbV		86
115)	1,2,4-trichlorobenzene	20.833	180	3883399	86.075	ppbV		95
116)	naphthalene	20.950	128	11097829	77.518	ppbV		97
117)	1,2,3-trichlorobenzene	21.192	180	3698535	79.090	ppbV		96
118)	benzothiophene	21.008	134	15593472	75.755	ppbV	#	94
119)	hexachlorobutadiene	21.258	225	2787586	67.209	ppbV		98
120)	2-methylnaphthalene	22.025	142	2870797	133.973	ppbV		97
121)	1-methylnaphthalene	22.217	142	4838082	103.333	ppbV		98

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

```
Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
Data File : r1626192.D
Acq On    : 30 Aug 2021    1:03 AM
Operator  : AIRLAB16:TS
Sample    : IT015-LLSTD100
Misc      : WG1540703
ALS Vial  : 0    Sample Multiplier: 1
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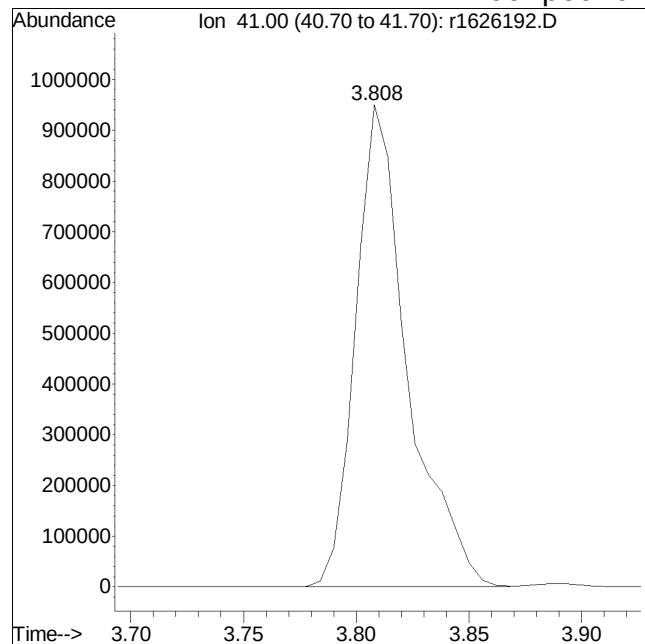
Quant Time: Aug 30 06:04:54 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 05:38:26 2021
Response via : Initial Calibration



Manual Integration Report

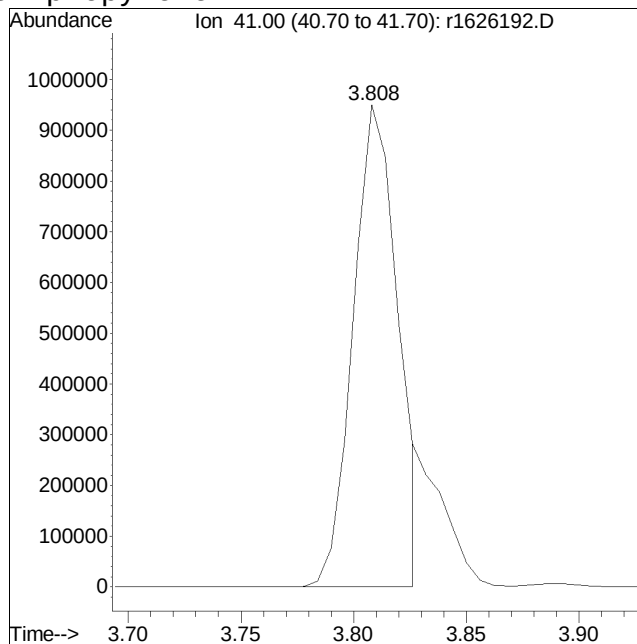
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626192.D Operator : AIRLAB16:TS
Date Inj'd : 8/30/2020 0:1: 3 Instrument :
Sample : IT015-LLSTD100 Quant Date : 8/30/2021 5:39 am

Compound #3: propylene



Original Peak Response = 1526819

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

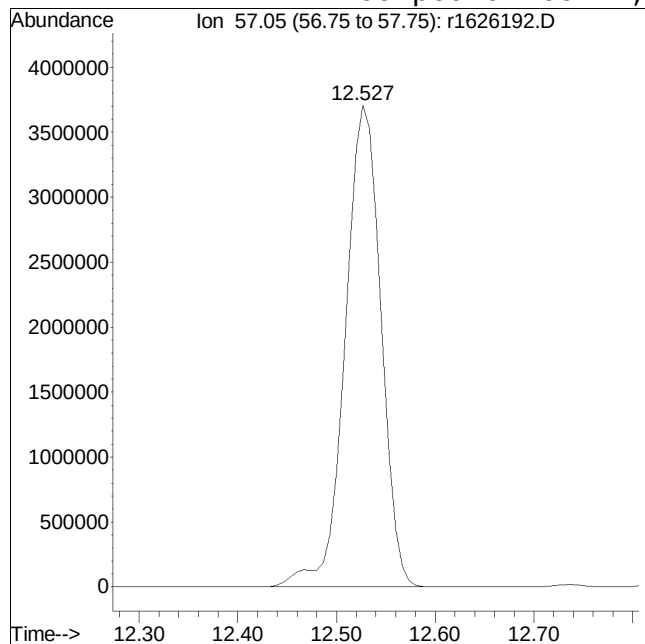


Manual Peak Response = 1313801 M6

Manual Integration Report

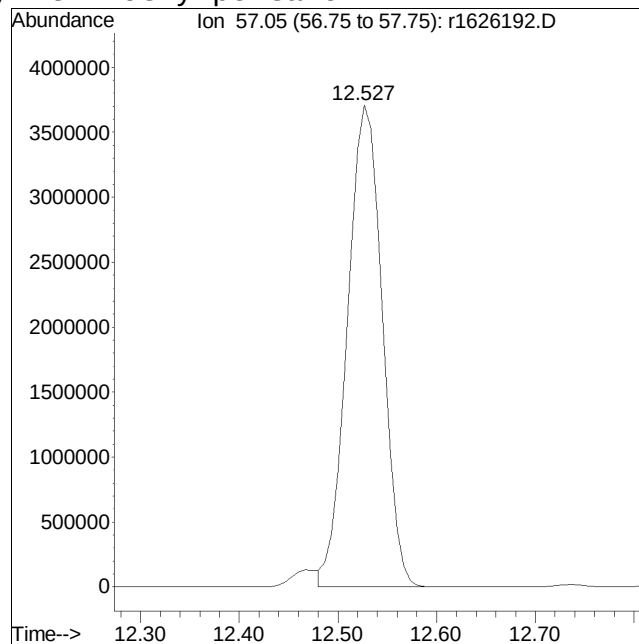
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626192.D Operator : AIRLAB16:TS
Date Inj'd : 8/30/2020 0:1: 3 Instrument :
Sample : IT015-LLSTD100 Quant Date : 8/30/2021 5:39 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 9348183

M6 = Misassignment of peak valley by



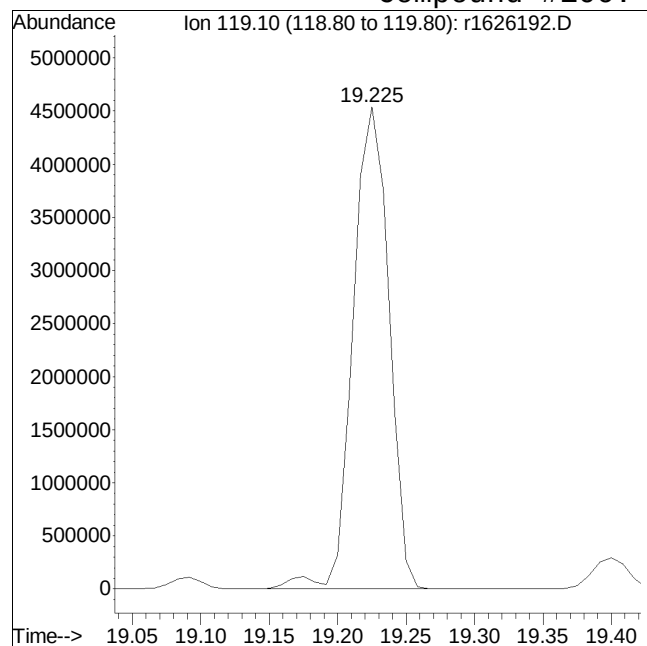
Manual Peak Response = 9089381 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Manual Integration Report

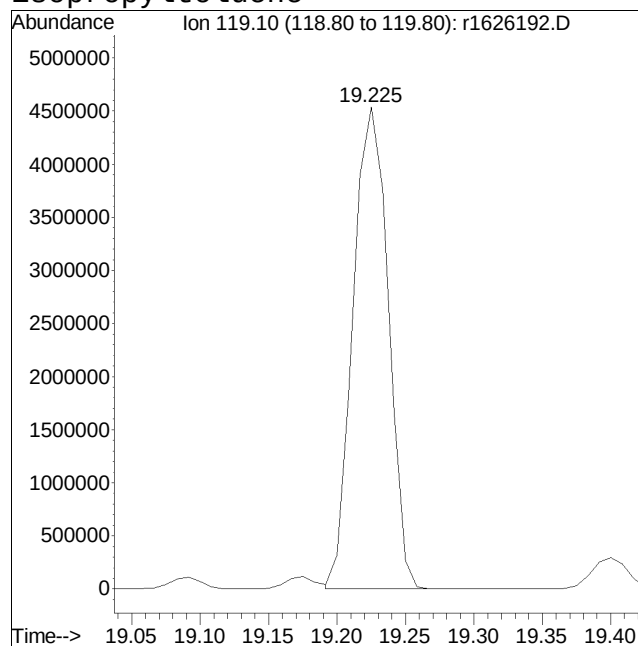
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626192.D Operator : AIRLAB16:TS
Date Inj'd : 8/30/2020 0:1: 3 Instrument :
Sample : IT015-LLSTD100 Quant Date : 8/30/2021 5:39 am

Compound #106: p-isopropyltoluene



Original Peak Response = 8324151

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 8142715 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626195.D
 Acq On : 30 Aug 2021 7:39 AM
 Operator : AIRLAB16:TS
 Sample : CT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 10:00:49 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	bromochloromethane	1.000	1.000	0.0	100	0.02
2	chlorodifluoromethane	0.798	0.684	14.3	87	0.00
3	propylene	0.417	0.401	3.8	95	0.00
4	propane	0.553	0.494	10.7	91	0.00
5	dichlorodifluoromethane	0.978	0.942	3.7	98	0.00
6 C	chloromethane	0.440	0.395	10.2	93	0.00
7	Freon-114	1.114	1.079	3.1	98	0.01
8 C	methanol	0.200	0.174	13.0	86	0.01
9 C	vinyl chloride	0.440	0.421	4.3	98	0.00
10 C	1,3-butadiene	0.378	0.369	2.4	99	0.01
11	butane	0.680	0.571	16.0	87	0.01
13 C	bromomethane	0.394	0.376	4.6	98	0.01
14 C	chloroethane	0.210	0.202	3.8	99	0.01
15	ethanol	0.333	0.278	16.5	76	0.02
16	dichlorofluoromethane	0.814	0.688	15.5	87	0.00
17 C	vinyl bromide	0.389	0.361	7.2	93	0.01
18 C	acrolein	0.183	0.167	8.7	91	0.01
19	acetone	0.656	0.469	28.5	72	0.01
20 C	acetonitrile	0.374	0.317	15.2	87	0.01
21	trichlorofluoromethane	0.756	0.712	5.8	99	0.01
22	isopropyl alcohol	0.775	0.553	28.6	73	0.01
23 C	acrylonitrile	0.365	0.336	7.9	98	0.01
24	pentane	0.791	0.630	20.4	87	0.01
25	ethyl ether	0.762	0.667	12.5	92	0.01
26 C	1,1-dichloroethene	0.625	0.673	-7.7	116	0.01
27	tertiary butyl alcohol	0.681	0.674	1.0	106	0.02
28 C	methylene chloride	0.618	0.671	-8.6	119	0.01
29 C	3-chloropropene	0.730	0.726	0.5	98	0.01
30 C	carbon disulfide	1.605	1.526	4.9	92	0.01
31	Freon 113	1.012	0.970	4.2	97	0.01
32	trans-1,2-dichloroethene	0.730	0.680	6.8	92	0.02
33 C	1,1-dichloroethane	0.891	0.842	5.5	95	0.02
34 C	MTBE	1.165	1.204	-3.3	98	0.02
35 C	vinyl acetate	1.176	1.103	6.2	91	0.02
36 C	2-butanone	1.264	1.231	2.6	96	0.02
37	cis-1,2-dichloroethene	0.648	0.644	0.6	98	0.00
38	Ethyl Acetate	0.177	0.179	-1.1	94	0.00
39 C	chloroform	0.917	0.933	-1.7	102	0.02
40	Tetrahydrofuran	0.708	0.672	5.1	89	0.00

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626195.D
 Acq On : 30 Aug 2021 7:39 AM
 Operator : AIRLAB16:TS
 Sample : CT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 10:00:49 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
41	2,2-dichloropropane	0.638	0.594	6.9	91	0.02
42 C	1,2-dichloroethane	0.545	0.519	4.8	96	0.00
43 I	1,4-difluorobenzene	1.000	1.000	0.0	100	0.01
44 C	hexane	0.316	0.319	-0.9	98	0.02
45	diisopropyl ether	0.158	0.149	5.7	92	0.02
46	tert-butyl ethyl ether	0.504	0.472	6.3	91	0.02
47 s	1,2-dichloroethane-D4	0.256	0.252	1.6	97	0.00
48 C	1,1,1-trichloroethane	0.294	0.289	1.7	98	0.00
49	1,1-dichloropropene	0.288	0.286	0.7	94	0.01
50 C	benzene	0.715	0.673	5.9	98	0.01
52 C	carbon tetrachloride	0.289	0.298	-3.1	101	0.01
53	cyclohexane	0.337	0.347	-3.0	100	0.01
54	tert-amyl methyl ether	0.488	0.467	4.3	92	0.01
55	dibromomethane	0.213	0.190	10.8	90	0.01
56 C	1,2-dichloropropane	0.237	0.227	4.2	96	0.01
57	bromodichloromethane	0.375	0.390	-4.0	101	0.01
58 C	1,4-dioxane	0.146	0.150	-2.7	96	0.00
59 C	trichloroethene	0.298	0.292	2.0	97	0.01
60 C	2,2,4-trimethylpentane	1.057	1.064	-0.7	99	0.01
61	methyl methacrylate	0.334	0.249	25.4	69	0.01
62	heptane	0.481	0.469	2.5	92	0.01
63 C	cis-1,3-dichloropropene	0.304	0.345	-13.5	104	0.00
64 C	4-methyl-2-pentanone	0.563	0.566	-0.5	92	0.02
65	trans-1,3-dichloropropene	0.272	0.267	1.8	89	0.02
66 C	1,1,2-trichloroethane	0.267	0.260	2.6	97	0.00
67 I	chlorobenzene-D5	1.000	1.000	0.0	101	0.00
68 C	toluene	5.043	4.586	9.1	97	0.02
69 s	toluene-D8	6.340	6.490	-2.4	102	0.00
71	1,3-dichloropropane	2.326	2.109	9.3	90	0.02
72	2-hexanone	2.969	3.098	-4.3	91	0.00
74	dibromochloromethane	2.502	2.612	-4.4	100	0.00
75 C	1,2-dibromoethane	2.425	2.468	-1.8	97	0.00
76	butyl acetate	0.521	0.511	1.9	89	0.00
77	octane	1.630	1.540	5.5	91	0.00
78 C	tetrachloroethene	2.246	2.191	2.4	97	0.00
79	1,1,1,2-tetrachloroethane	1.839	1.709	7.1	90	0.00
80 C	chlorobenzene	4.108	4.033	1.8	97	0.02

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626195.D
 Acq On : 30 Aug 2021 7:39 AM
 Operator : AIRLAB16:TS
 Sample : CT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 10:00:49 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
81 C	ethylbenzene	5.879	5.915	-0.6	96	0.00
83 C	m+p-xylene	4.835	4.843	-0.2	96	0.00
84 C	bromoform	2.086	2.262	-8.4	101	0.00
85 C	styrene	3.951	4.238	-7.3	97	0.00
86 C	1,1,2,2-tetrachloroethane	3.868	3.949	-2.1	99	0.00
87 C	o-xylene	4.911	4.987	-1.5	97	0.00
88	1,2,3-trichloropropane	2.960	2.751	7.1	90	0.00
89	nonane	4.479	4.054	9.5	85	0.00
90 s	bromofluorobenzene	4.266	4.360	-2.2	101	0.00
91 C	isopropylbenzene	6.856	6.605	3.7	93	0.00
92	bromobenzene	3.676	3.466	5.7	91	0.00
93	2-chlorotoluene	2.017	1.872	7.2	89	0.00
94	n-propylbenzene	2.146	2.054	4.3	90	0.00
95	4-chlorotoluene	1.979	1.825	7.8	87	0.00
96	4-ethyl toluene	7.418	7.596	-2.4	93	0.00
97	1,3,5-trimethylbenzene	6.397	7.007	-9.5	107	0.00
98	tert-butylbenzene	6.247	6.004	3.9	90	0.00
99	1,2,4-trimethylbenzene	5.963	6.340	-6.3	98	0.00
100	decane	4.384	4.084	6.8	89	0.00
101 C	Benzyl Chloride	3.081	3.467	-12.5	92	0.00
102	1,3-dichlorobenzene	4.292	4.591	-7.0	97	0.00
103 C	1,4-dichlorobenzene	4.163	4.403	-5.8	94	0.00
104	sec-butylbenzene	8.887	8.396	5.5	90	0.00
106	p-isopropyltoluene	7.630	6.809	10.8	83	0.00
107	1,2-dichlorobenzene	4.219	4.382	-3.9	97	0.00
108	n-butylbenzene	6.272	6.170	1.6	91	0.00
111 C	1,2-dibromo-3-chloropropane	1.449	1.457	-0.6	89	0.00
112	undecane	4.540	4.604	-1.4	89	0.00
114	dodecane	3.871	4.433	-14.5	84	0.02
115 C	1,2,4-trichlorobenzene	2.021	2.383	-17.9	86	0.02
116	naphthalene	6.850	7.155	-4.5	82	0.02
117	1,2,3-trichlorobenzene	2.170	2.326	-7.2	81	0.02
119 C	hexachlorobutadiene	2.196	2.309	-5.1	91	0.02

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 0

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626195.D
 Acq On : 30 Aug 2021 7:39 AM
 Operator : AIRLAB16:TS
 Sample : CT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 10:00:49 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default-ICV-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.425	49	377762	10.000	ppbV	0.02
Standard Area = 378800			Recovery =	99.73%		
43) 1,4-difluorobenzene	11.693	114	982161	10.000	ppbV	0.01
Standard Area = 984697			Recovery =	99.74%		
67) chlorobenzene-D5	16.408	54	157266	10.000	ppbV	0.00
Standard Area = 156202			Recovery =	100.68%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.308	65	247040	9.844	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	98.44%		
69) toluene-D8	14.525	98	1020629	10.237	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	102.37%		
90) bromofluorobenzene	17.767	95	685641	10.221	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	102.21%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.790	51	258409	8.577	ppbV	100
3) propylene	3.820	41	151449M6	9.606	ppbV	
4) propane	3.844	29	186516	8.927	ppbV	96
5) dichlorodifluoromethane	3.898	85	356010	9.641	ppbV	99
6) chloromethane	4.072	50	149286	8.989	ppbV	99
7) Freon-114	4.198	85	407750	9.687	ppbV	99
8) methanol	4.282	31	328528	43.504	ppbV	98
9) vinyl chloride	4.324	62	158963	9.570	ppbV	100
10) 1,3-butadiene	4.486	54	139342	9.766	ppbV	99
11) butane	4.546	43	215753	8.404	ppbV	98
13) bromomethane	4.792	94	141895	9.543	ppbV	97
14) chloroethane	5.008	64	76414	9.624	ppbV	98
15) ethanol	5.200	31	524845	41.679	ppbV	92
16) dichlorofluoromethane	5.146	67	259929	8.455	ppbV	99
17) vinyl bromide	5.433	106	136451	9.280	ppbV	96
18) acrolein	5.597	56	63139	9.143	ppbV	97
19) acetone	5.753	43	886467	35.769	ppbV #	95
20) acetonitrile	5.440	41	119665	8.461	ppbV	100
21) trichlorofluoromethane	5.947	101	268964	9.423	ppbV	100
22) isopropyl alcohol	6.093	45	521956	17.829	ppbV	99
23) acrylonitrile	6.330	53	126897	9.197	ppbV	99
24) pentane	6.390	43	237988	7.968	ppbV	100
25) ethyl ether	6.440	31	251843	8.755	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626195.D
 Acq On : 30 Aug 2021 7:39 AM
 Operator : AIRLAB16:TS
 Sample : CT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 10:00:49 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default-ICV-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
26) 1,1-dichloroethene	6.712	61	254257	10.772	ppbV	99
27) tertiary butyl alcohol	6.826	59	254659	9.900	ppbV	96
28) methylene chloride	6.880	49	253642	10.868	ppbV	100
29) 3-chloropropene	7.018	41	274226	9.947	ppbV	98
30) carbon disulfide	7.162	76	576473	9.506	ppbV	98
31) Freon 113	7.204	101	366483	9.589	ppbV	100
32) trans-1,2-dichloroethene	8.008	61	256733	9.315	ppbV	98
33) 1,1-dichloroethane	8.242	63	318256	9.451	ppbV	99
34) MTBE	8.333	73	454849	10.338	ppbV	98
35) vinyl acetate	8.467	43	416578	9.379	ppbV	99
36) 2-butanone	8.733	43	465160	9.739	ppbV	98
37) cis-1,2-dichloroethene	9.233	61	243115	9.927	ppbV	99
38) Ethyl Acetate	9.542	61	67555	10.086	ppbV	99
39) chloroform	9.592	83	352481	10.172	ppbV	97
40) Tetrahydrofuran	10.033	42	253970	9.492	ppbV	96
41) 2,2-dichloropropane	9.600	77	224430	9.313	ppbV	96
42) 1,2-dichloroethane	10.433	62	195999	9.518	ppbV	98
44) hexane	9.500	57	313253	10.089	ppbV	98
45) diisopropyl ether	9.517	87	145996	9.412	ppbV	96
46) tert-butyl ethyl ether	10.142	59	464030	9.369	ppbV	100
48) 1,1,1-trichloroethane	10.717	97	283528	9.804	ppbV	99
49) 1,1-dichloropropene	11.093	75	280818	9.944	ppbV	97
50) benzene	11.247	78	660636	9.402	ppbV	99
52) carbon tetrachloride	11.420	117	292713	10.298	ppbV	99
53) cyclohexane	11.560	56	340560	10.281	ppbV	97
54) tert-amyl methyl ether	11.960	73	458635	9.571	ppbV	98
55) dibromomethane	12.173	93	186906	8.929	ppbV	97
56) 1,2-dichloropropane	12.207	63	222858	9.556	ppbV	99
57) bromodichloromethane	12.440	83	382806	10.396	ppbV	99
58) 1,4-dioxane	12.480	88	147499	10.308	ppbV	98
59) trichloroethene	12.487	130	287003	9.804	ppbV	100
60) 2,2,4-trimethylpentane	12.533	57	1045249M6	10.064	ppbV	
61) methyl methacrylate	12.747	41	244984	7.477	ppbV	97
62) heptane	12.853	43	460178	9.743	ppbV	96
63) cis-1,3-dichloropropene	13.500	75	338405	11.334	ppbV	98
64) 4-methyl-2-pentanone	13.550	43	556108	10.050	ppbV	96
65) trans-1,3-dichloropropene	14.125	75	262274	9.806	ppbV	99
66) 1,1,2-trichloroethane	14.317	97	255818	9.757	ppbV	98
68) toluene	14.642	91	721175	9.094	ppbV	99
71) 1,3-dichloropropane	14.675	76	331668	9.065	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626195.D
 Acq On : 30 Aug 2021 7:39 AM
 Operator : AIRLAB16:TS
 Sample : CT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 10:00:49 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default-ICV-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
72) 2-hexanone	14.942	43	487132	10.433	ppbV	97
74) dibromochloromethane	15.092	129	410852	10.440	ppbV	99
75) 1,2-dibromoethane	15.342	107	388135	10.176	ppbV	99
76) butyl acetate	15.600	73	80423	9.811	ppbV	91
77) octane	15.683	85	242261	9.449	ppbV	93
78) tetrachloroethene	15.808	166	344559	9.755	ppbV	99
79) 1,1,1,2-tetrachloroethane	16.433	131	268809	9.295	ppbV	99
80) chlorobenzene	16.450	112	634297	9.817	ppbV	98
81) ethylbenzene	16.783	91	930153	10.061	ppbV	100
83) m+p-xylene	16.950	91	1523184	20.033	ppbV	99
84) bromoform	17.017	173	355691	10.842	ppbV	100
85) styrene	17.275	104	666521	10.727	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.367	83	621019	10.210	ppbV	99
87) o-xylene	17.367	91	784225	10.155	ppbV	100
88) 1,2,3-trichloropropane	17.483	75	432618	9.293	ppbV	99
89) nonane	17.567	43	637561	9.051	ppbV	97
91) isopropylbenzene	17.883	105	1038674	9.633	ppbV	100
92) bromobenzene	17.958	77	545018	9.427	ppbV	98
93) 2-chlorotoluene	18.292	126	294410	9.282	ppbV	100
94) n-propylbenzene	18.325	120	323091	9.572	ppbV	99
95) 4-chlorotoluene	18.350	126	287089	9.227	ppbV	97
96) 4-ethyl toluene	18.450	105	1194530	10.240	ppbV	99
97) 1,3,5-trimethylbenzene	18.508	105	1101954	10.954	ppbV	100
98) tert-butylbenzene	18.858	119	944250	9.612	ppbV	99
99) 1,2,4-trimethylbenzene	18.858	105	997069	10.631	ppbV	95
100) decane	18.942	57	642312	9.317	ppbV	97
101) Benzyl Chloride	18.983	91	545245	11.252	ppbV	100
102) 1,3-dichlorobenzene	18.992	146	721934	10.697	ppbV	99
103) 1,4-dichlorobenzene	19.050	146	692404	10.576	ppbV	100
104) sec-butylbenzene	19.092	105	1320348	9.447	ppbV	99
106) p-isopropyltoluene	19.217	119	1070777	8.924	ppbV	97
107) 1,2-dichlorobenzene	19.342	146	689164	10.387	ppbV	100
108) n-butylbenzene	19.583	91	970297	9.836	ppbV	97
111) 1,2-dibromo-3-chloropr...	19.733	75	229135	10.055	ppbV	98
112) undecane	20.000	57	724013	10.139	ppbV	97
114) dodecane	20.900	57	697104	11.450	ppbV	97
115) 1,2,4-trichlorobenzene	20.842	180	374706	11.789	ppbV	99
116) naphthalene	20.958	128	1125238	10.446	ppbV	100
117) 1,2,3-trichlorobenzene	21.200	180	365771	10.720	ppbV	99
119) hexachlorobutadiene	21.267	225	363109	10.515	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
 Data File : r1626195.D
 Acq On : 30 Aug 2021 7:39 AM
 Operator : AIRLAB16:TS
 Sample : CT015-LLSTD010
 Misc : WG1540703
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Aug 30 10:00:49 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\TFS16_210829.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

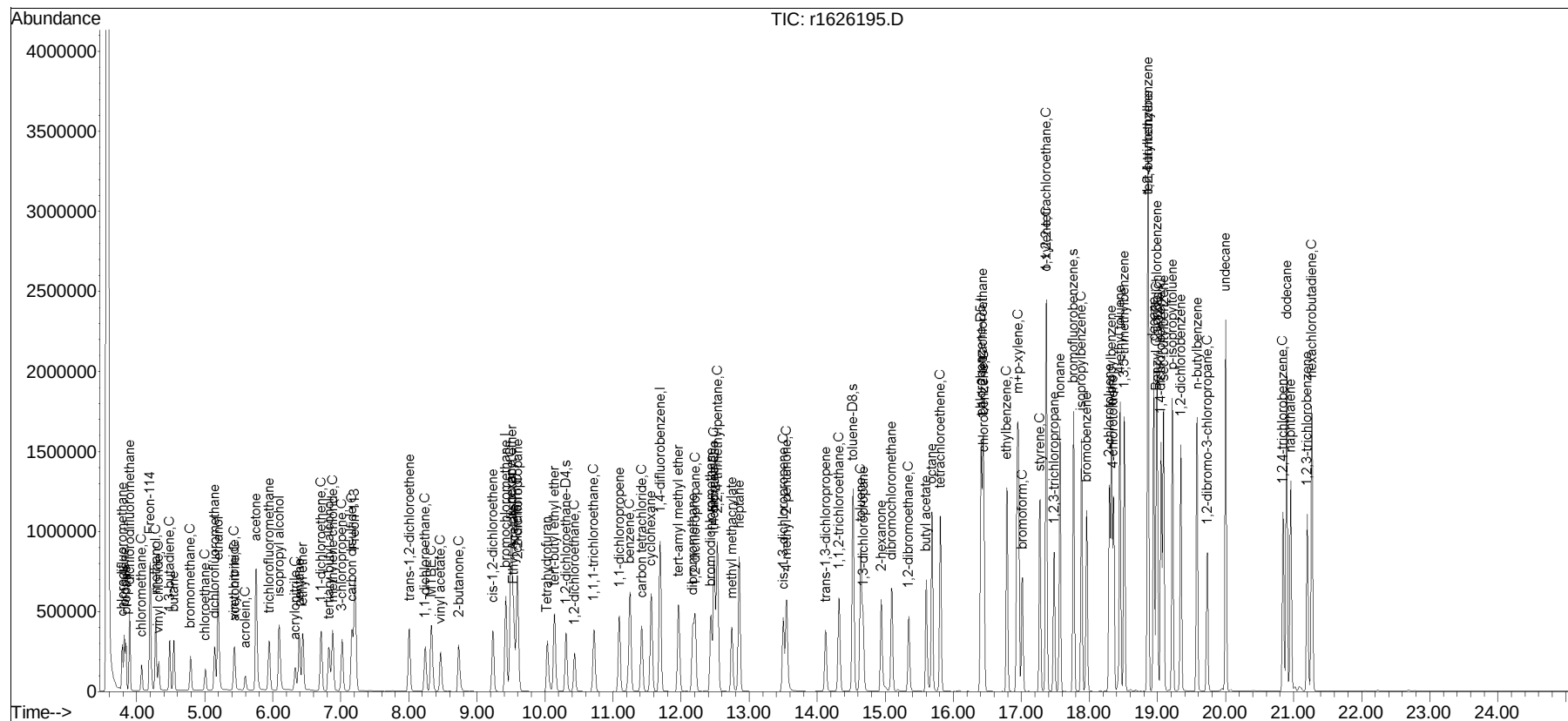
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\r1626189.D
 Sub List : Default-ICV-AP2 - All compounds listed

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

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

```
Data Path : 0:\Forensics\Data\Airlab16\2021\08\0829T_I\
Data File : r1626195.D
Acq On    : 30 Aug 2021    7:39 AM
Operator  : AIRLAB16:TS
Sample    : CT015-LLSTD010
Misc      : WG1540703
ALS Vial  : 0    Sample Multiplier: 1
```

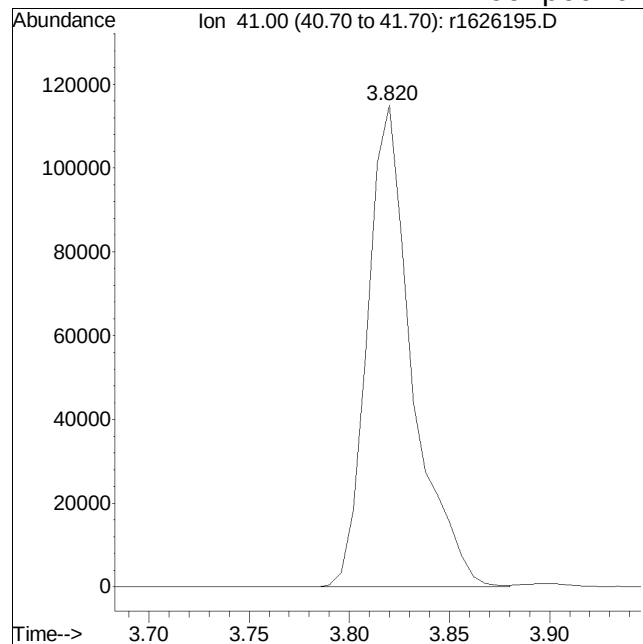
Quant Time: Aug 30 10:00:49 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\08\0829T_I\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 06:00:53 2021
Response via : Initial Calibration



Manual Integration Report

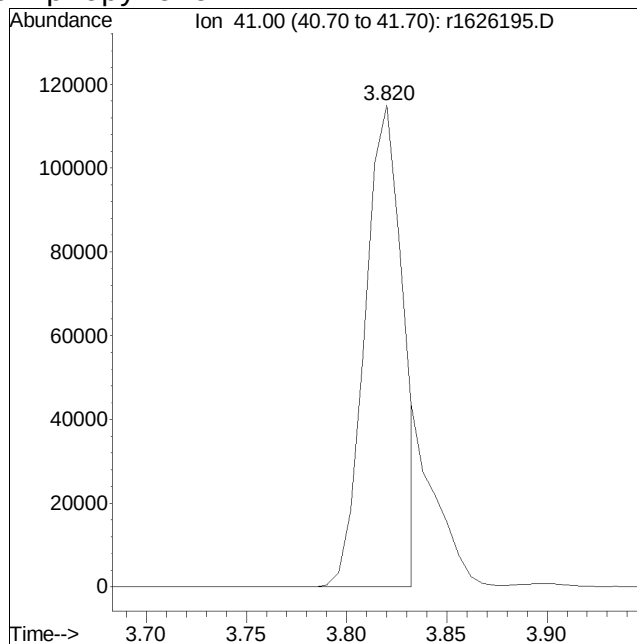
Data Path : 0:\Forensics\Data\AirLab16QMethod : TFS16_210829.M
Data File : r1626195.D Operator : AIRLAB16:TS
Date Inj'd : 8/30/2020 0:7: 9 Instrument :
Sample : CT015-LLSTD010 Quant Date : 8/30/2021 10:00 am

Compound #3: propylene



Original Peak Response = 178984

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

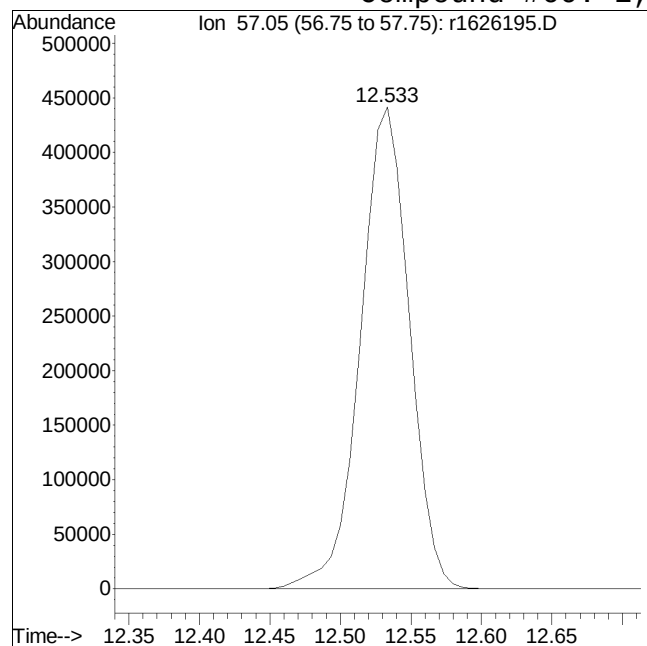


Manual Peak Response = 151449 M6

Manual Integration Report

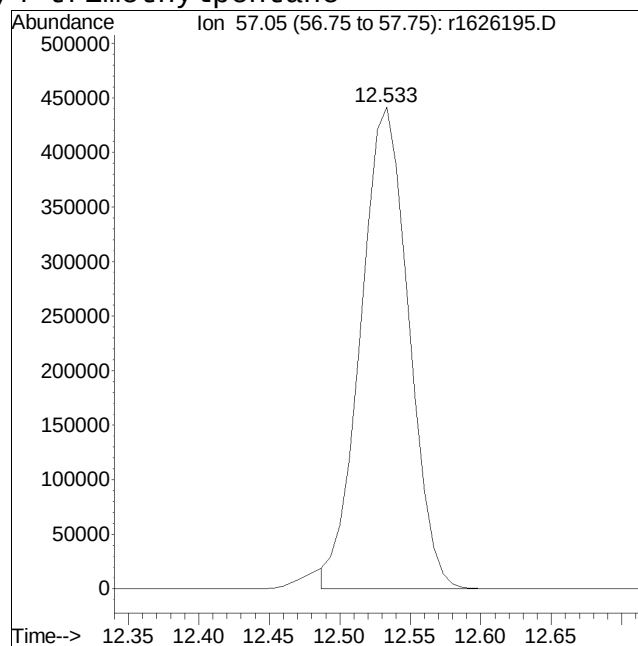
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626195.D Operator : AIRLAB16:TS
Date Inj'd : 8/30/2020 0:7: 9 Instrument :
Sample : CT015-LLSTD010 Quant Date : 8/30/2021 10:00 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 1067252

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 1045249 M6

Continuing Calibration

Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRLAB16
 Lab File ID : R1626853
 Sample No : WG1555287-2
 Channel :

Lab Number : L2153634
 Project Number : 100849501
 Calibration Date : 10/06/21 11:50
 Init. Calib. Date(s) : 08/29/21 08/30/21
 Init. Calib. Times : 20:26 01:03

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
bromochloromethane	1	1	-	0	30	94	-.03
chlorodifluoromethane	0.798	0.782	-	2	30	95	-.02
propylene	0.417	0.346	-	17	30	78	-.02
propane	0.553	0.203	-	63.3*	30	36	-.03
dichlorodifluoromethane	0.978	0.99	-	-1.2	30	98	-.02
chloromethane	0.44	0.356	-	19.1	30	79	-.02
Freon-114	1.114	1.019	-	8.5	30	88	-.02
methanol	0.2	0.173	-	13.5	30	81	-.02
vinyl chloride	0.44	0.405	-	8	30	90	-.03
1,3-butadiene	0.378	0.322	-	14.8	30	82	-.02
butane	0.68	0.546	-	19.7	30	79	-.02
bromomethane	0.394	0.369	-	6.3	30	91	-.02
chloroethane	0.21	0.187	-	11	30	87	-.03
ethanol	0.333	0.332	-	0.3	30	86	-.03
dichlorofluoromethane	0.814	0.734	-	9.8	30	88	-.04
vinyl bromide	0.389	0.353	-	9.3	30	86	-.03
acrolein	0.183	0.161	-	12	30	83	-.03
acetone	0.656	0.559	-	14.8	30	82	-.03
acetonitrile	0.374	0.312	-	16.6	30	81	-.03
trichlorofluoromethane	0.756	0.726	-	4	30	95	-.03
isopropyl alcohol	0.775	0.595	-	23.2	30	75	-.03
acrylonitrile	0.365	0.302	-	17.3	30	83	-.03
pentane	0.791	0.591	-	25.3	30	78	-.03
ethyl ether	0.762	0.623	-	18.2	30	81	-.03
1,1-dichloroethene	0.625	0.565	-	9.6	30	92	-.04
tertiary butyl alcohol	0.681	0.598	-	12.2	30	89	-.03
methylene chloride	0.618	0.459	-	25.7	30	77	-.03
3-chloropropene	0.73	0.506	-	30.7*	30	64	-.04
carbon disulfide	1.605	1.141	-	28.9	30	65	-.04
Freon 113	1.012	0.741	-	26.8	30	70	-.03
trans-1,2-dichloroethene	0.73	0.721	-	1.2	30	92	-.03
1,1-dichloroethane	0.891	0.852	-	4.4	30	91	-.03
MTBE	1.165	1.11	-	4.7	30	86	-.03
vinyl acetate	1.176	1.088	-	7.5	30	85	-.02
2-butanone	1.264	1.104	-	12.7	30	82	-.03
cis-1,2-dichloroethene	0.648	0.635	-	2	30	91	-.03
Ethyl Acetate	0.177	0.169	-	4.5	30	84	-.03
chloroform	0.917	0.959	-	-4.6	30	100	-.03
Tetrahydrofuran	0.708	0.619	-	12.6	30	77	-.03
2,2-dichloropropane	0.638	0.65	-	-1.9	30	94	-.03
1,2-dichloroethane	0.545	0.556	-	-2	30	98	-.03
1,4-difluorobenzene	1	1	-	0	30	94	-.03
hexane	0.316	0.328	-	-3.8	30	95	-.03

* Value outside of QC limits.



Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRLAB16
 Lab File ID : R1626853
 Sample No : WG1555287-2
 Channel :

Lab Number : L2153634
 Project Number : 100849501
 Calibration Date : 10/06/21 11:50
 Init. Calib. Date(s) : 08/29/21 08/30/21
 Init. Calib. Times : 20:26 01:03

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
diisopropyl ether	0.158	0.159	-	-0.6	30	93	-.03
tert-butyl ethyl ether	0.504	0.508	-	-0.8	30	92	-.03
1,1,1-trichloroethane	0.294	0.3	-	-2	30	96	-.03
1,1-dichloropropene	0.288	0.283	-	1.7	30	88	-.03
benzene	0.715	0.682	-	4.6	30	93	-.03
carbon tetrachloride	0.289	0.315	-	-9	30	101	-.03
cyclohexane	0.337	0.359	-	-6.5	30	97	-.03
tert-amyl methyl ether	0.488	0.452	-	7.4	30	84	-.03
dibromomethane	0.213	0.214	-	-0.5	30	96	-.03
1,2-dichloropropane	0.237	0.223	-	5.9	30	89	-.03
bromodichloromethane	0.375	0.408	-	-8.8	30	99	-.03
1,4-dioxane	0.146	0.152	-	-4.1	30	92	-.03
trichloroethene	0.298	0.304	-	-2	30	94	-.03
2,2,4-trimethylpentane	1.057	1.131	-	-7	30	99	-.03
methyl methacrylate	0.334	0.305	-	8.7	30	80	-.03
heptane	0.481	0.442	-	8.1	30	82	-.03
cis-1,3-dichloropropene	0.304	0.307	-	-1	30	87	-.03
4-methyl-2-pentanone	0.563	0.524	-	6.9	30	80	-.03
trans-1,3-dichloropropene	0.272	0.283	-	-4	30	88	-.02
1,1,2-trichloroethane	0.267	0.259	-	3	30	91	-.03
chlorobenzene-D5	1	1	-	0	30	94	-.02
toluene	5.043	4.733	-	6.1	30	93	-.03
1,3-dichloropropane	2.326	2.279	-	2	30	90	-.03
2-hexanone	2.969	2.829	-	4.7	30	78	-.03
dibromochloromethane	2.502	2.71	-	-8.3	30	96	-.03
1,2-dibromoethane	2.425	2.456	-	-1.3	30	90	-.03
butyl acetate	0.521	0.497	-	4.6	30	81	-.03
octane	1.63	1.74	-	-6.7	30	96	-.03
tetrachloroethene	2.246	2.255	-	-0.4	30	94	-.03
1,1,1,2-tetrachloroethane	1.839	1.925	-	-4.7	30	94	-.03
chlorobenzene	4.108	4.122	-	-0.3	30	92	-.02
ethylbenzene	5.879	6.096	-	-3.7	30	92	-.03
m+p-xylene	4.835	5.057	-	-4.6	30	94	-.03
bromoform	2.086	2.348	-	-12.6	30	97	-.02
styrene	3.951	4.17	-	-5.5	30	89	-.03
1,1,2,2-tetrachloroethane	3.868	4.191	-	-8.4	30	98	-.03
o-xylene	4.911	5.204	-	-6	30	95	-.03
1,2,3-trichloropropane	2.96	3.024	-	-2.2	30	92	-.03
nonane	4.479	4.206	-	6.1	30	82	-.03
isopropylbenzene	6.856	6.928	-	-1.1	30	91	-.03
bromobenzene	3.676	3.801	-	-3.4	30	93	-.03
2-chlorotoluene	2.017	2.132	-	-5.7	30	94	-.03
n-propylbenzene	2.146	2.359	-	-9.9	30	97	-.03

* Value outside of QC limits.



Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRLAB16
 Lab File ID : R1626853
 Sample No : WG1555287-2
 Channel :

Lab Number : L2153634
 Project Number : 100849501
 Calibration Date : 10/06/21 11:50
 Init. Calib. Date(s) : 08/29/21 08/30/21
 Init. Calib. Times : 20:26 01:03

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
4-chlorotoluene	1.979	2.114	-	-6.8	30	94	-.03
4-ethyl toluene	7.418	7.902	-	-6.5	30	91	-.03
1,3,5-trimethylbenzene	6.397	6.497	-	-1.6	30	92	-.03
tert-butylbenzene	6.247	6.807	-	-9	30	95	-.03
1,2,4-trimethylbenzene	5.963	6.286	-	-5.4	30	91	-.03
decane	4.384	4.811	-	-9.7	30	97	-.02
Benzyl Chloride	3.081	3.747	-	-21.6	30	93	-.03
1,3-dichlorobenzene	4.292	4.625	-	-7.8	30	91	-.03
1,4-dichlorobenzene	4.163	4.527	-	-8.7	30	91	-.03
sec-butylbenzene	8.887	9.101	-	-2.4	30	91	-.03
p-isopropyltoluene	7.63	8.301	-	-8.8	30	94	-.02
1,2-dichlorobenzene	4.219	4.5	-	-6.7	30	93	-.02
n-butylbenzene	6.272	6.752	-	-7.7	30	92	-.02
1,2-dibromo-3-chloropropan	1.449	1.488	-	-2.7	30	85	-.03
undecane	4.54	5.241	-	-15.4	30	94	-.02
dodecane	3.871	4.921	-	-27.1	30	87	0
1,2,4-trichlorobenzene	2.021	2.301	-	-13.9	30	78	0
naphthalene	6.85	7.795	-	-13.8	30	83	0
1,2,3-trichlorobenzene	2.17	2.398	-	-10.5	30	78	0
hexachlorobutadiene	2.196	2.324	-	-5.8	30	85	0

* Value outside of QC limits.



Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626853.D
 Acq On : 6 Oct 2021 11:50 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-2,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:13:52 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	bromochloromethane	1.000	1.000	0.0	94	-0.03
2	chlorodifluoromethane	0.798	0.782	2.0	95	-0.02
3	propylene	0.417	0.346	17.0	78	-0.02
4	propane	0.553	0.203	63.3#	36#	-0.03
5	dichlorodifluoromethane	0.978	0.990	-1.2	98	-0.02
6 C	chloromethane	0.440	0.356	19.1	79	-0.02
7	Freon-114	1.114	1.019	8.5	88	-0.02
8 C	methanol	0.200	0.173	13.5	81	-0.02
9 C	vinyl chloride	0.440	0.405	8.0	90	-0.03
10 C	1,3-butadiene	0.378	0.322	14.8	82	-0.02
11	butane	0.680	0.546	19.7	79	-0.02
13 C	bromomethane	0.394	0.369	6.3	91	-0.02
14 C	chloroethane	0.210	0.187	11.0	87	-0.03
15	ethanol	0.333	0.332	0.3	86	-0.03
16	dichlorofluoromethane	0.814	0.734	9.8	88	-0.04
17 C	vinyl bromide	0.389	0.353	9.3	86	-0.03
18 C	acrolein	0.183	0.161	12.0	83	-0.03
19	acetone	0.656	0.559	14.8	82	-0.03
20 C	acetonitrile	0.374	0.312	16.6	81	-0.03
21	trichlorofluoromethane	0.756	0.726	4.0	95	-0.03
22	isopropyl alcohol	0.775	0.595	23.2	75	-0.03
23 C	acrylonitrile	0.365	0.302	17.3	83	-0.03
24	pentane	0.791	0.591	25.3	78	-0.03
25	ethyl ether	0.762	0.623	18.2	81	-0.03
26 C	1,1-dichloroethene	0.625	0.565	9.6	92	-0.04
27	tertiary butyl alcohol	0.681	0.598	12.2	89	-0.03
28 C	methylene chloride	0.618	0.459	25.7	77	-0.03
29 C	3-chloropropene	0.730	0.506	30.7#	64	-0.04
30 C	carbon disulfide	1.605	1.141	28.9	65	-0.04
31	Freon 113	1.012	0.741	26.8	70	-0.03
32	trans-1,2-dichloroethene	0.730	0.721	1.2	92	-0.03
33 C	1,1-dichloroethane	0.891	0.852	4.4	91	-0.03
34 C	MTBE	1.165	1.110	4.7	86	-0.03
35 C	vinyl acetate	1.176	1.088	7.5	85	-0.02
36 C	2-butanone	1.264	1.104	12.7	82	-0.03
37	cis-1,2-dichloroethene	0.648	0.635	2.0	91	-0.03
38	Ethyl Acetate	0.177	0.169	4.5	84	-0.03
39 C	chloroform	0.917	0.959	-4.6	100	-0.03
40	Tetrahydrofuran	0.708	0.619	12.6	77	-0.03

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626853.D
 Acq On : 6 Oct 2021 11:50 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-2,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:13:52 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
41	2,2-dichloropropane	0.638	0.650	-1.9	94	-0.03
42 C	1,2-dichloroethane	0.545	0.556	-2.0	98	-0.03
43 I	1,4-difluorobenzene	1.000	1.000	0.0	94	-0.03
44 C	hexane	0.316	0.328	-3.8	95	-0.03
45	diisopropyl ether	0.158	0.159	-0.6	93	-0.03
46	tert-butyl ethyl ether	0.504	0.508	-0.8	92	-0.03
48 C	1,1,1-trichloroethane	0.294	0.300	-2.0	96	-0.03
49	1,1-dichloropropene	0.288	0.283	1.7	88	-0.03
50 C	benzene	0.715	0.682	4.6	93	-0.03
52 C	carbon tetrachloride	0.289	0.315	-9.0	101	-0.03
53	cyclohexane	0.337	0.359	-6.5	97	-0.03
54	tert-amyl methyl ether	0.488	0.452	7.4	84	-0.03
55	dibromomethane	0.213	0.214	-0.5	96	-0.03
56 C	1,2-dichloropropane	0.237	0.223	5.9	89	-0.03
57	bromodichloromethane	0.375	0.408	-8.8	99	-0.03
58 C	1,4-dioxane	0.146	0.152	-4.1	92	-0.03
59 C	trichloroethene	0.298	0.304	-2.0	94	-0.03
60 C	2,2,4-trimethylpentane	1.057	1.131	-7.0	99	-0.03
61	methyl methacrylate	0.334	0.305	8.7	80	-0.03
62	heptane	0.481	0.442	8.1	82	-0.03
63 C	cis-1,3-dichloropropene	0.304	0.307	-1.0	87	-0.03
64 C	4-methyl-2-pentanone	0.563	0.524	6.9	80	-0.03
65	trans-1,3-dichloropropene	0.272	0.283	-4.0	88	-0.02
66 C	1,1,2-trichloroethane	0.267	0.259	3.0	91	-0.03
67 I	chlorobenzene-D5	1.000	1.000	0.0	94	-0.02
68 C	toluene	5.043	4.733	6.1	93	-0.03
71	1,3-dichloropropane	2.326	2.279	2.0	90	-0.03
72	2-hexanone	2.969	2.829	4.7	78	-0.03
74	dibromochloromethane	2.502	2.710	-8.3	96	-0.03
75 C	1,2-dibromoethane	2.425	2.456	-1.3	90	-0.03
76	butyl acetate	0.521	0.497	4.6	81	-0.03
77	octane	1.630	1.740	-6.7	96	-0.03
78 C	tetrachloroethene	2.246	2.255	-0.4	94	-0.03
79	1,1,1,2-tetrachloroethane	1.839	1.925	-4.7	94	-0.03
80 C	chlorobenzene	4.108	4.122	-0.3	92	-0.02
81 C	ethylbenzene	5.879	6.096	-3.7	92	-0.03
83 C	m+p-xylene	4.835	5.057	-4.6	94	-0.03

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626853.D
 Acq On : 6 Oct 2021 11:50 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-2,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:13:52 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
84 C	bromoform	2.086	2.348	-12.6	97	-0.02
85 C	styrene	3.951	4.170	-5.5	89	-0.03
86 C	1,1,2,2-tetrachloroethane	3.868	4.191	-8.4	98	-0.03
87 C	o-xylene	4.911	5.204	-6.0	95	-0.03
88	1,2,3-trichloropropane	2.960	3.024	-2.2	92	-0.03
89	nonane	4.479	4.206	6.1	82	-0.03
91 C	isopropylbenzene	6.856	6.928	-1.1	91	-0.03
92	bromobenzene	3.676	3.801	-3.4	93	-0.03
93	2-chlorotoluene	2.017	2.132	-5.7	94	-0.03
94	n-propylbenzene	2.146	2.359	-9.9	97	-0.03
95	4-chlorotoluene	1.979	2.114	-6.8	94	-0.03
96	4-ethyl toluene	7.418	7.902	-6.5	91	-0.03
97	1,3,5-trimethylbenzene	6.397	6.497	-1.6	92	-0.03
98	tert-butylbenzene	6.247	6.807	-9.0	95	-0.03
99	1,2,4-trimethylbenzene	5.963	6.286	-5.4	91	-0.03
100	decane	4.384	4.811	-9.7	97	-0.02
101 C	Benzyl Chloride	3.081	3.747	-21.6	93	-0.03
102	1,3-dichlorobenzene	4.292	4.625	-7.8	91	-0.03
103 C	1,4-dichlorobenzene	4.163	4.527	-8.7	91	-0.03
104	sec-butylbenzene	8.887	9.101	-2.4	91	-0.03
106	p-isopropyltoluene	7.630	8.301	-8.8	94	-0.02
107	1,2-dichlorobenzene	4.219	4.500	-6.7	93	-0.02
108	n-butylbenzene	6.272	6.752	-7.7	92	-0.02
111 C	1,2-dibromo-3-chloropropane	1.449	1.488	-2.7	85	-0.03
112	undecane	4.540	5.241	-15.4	94	-0.02
114	dodecane	3.871	4.921	-27.1	87	0.00
115 C	1,2,4-trichlorobenzene	2.021	2.301	-13.9	78	0.00
116	naphthalene	6.850	7.795	-13.8	83	0.00
117	1,2,3-trichlorobenzene	2.170	2.398	-10.5	78	0.00
119 C	hexachlorobutadiene	2.196	2.324	-5.8	85	0.00

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626853.D
 Acq On : 6 Oct 2021 11:50 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-2,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:13:52 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.375	49	357950	10.000	ppbV	-0.03
Standard Area = 357950			Recovery	=	100.00%	
43) 1,4-difluorobenzene	11.647	114	923831	10.000	ppbV	-0.03
Standard Area = 923831			Recovery	=	100.00%	
67) chlorobenzene-D5	16.375	54	146691	10.000	ppbV	-0.02
Standard Area = 146691			Recovery	=	100.00%	

System Monitoring Compounds

Target Compounds					Qvalue	
2) chlorodifluoromethane	3.760	51	280083	9.811	ppbV	99
3) propylene	3.790	41	123798M6	8.287	ppbV	
4) propane	3.808	29	72770	3.675	ppbV #	91
5) dichlorodifluoromethane	3.868	85	354471	10.131	ppbV	99
6) chloromethane	4.042	50	127353	8.093	ppbV	99
7) Freon-114	4.162	85	364638	9.143	ppbV	100
8) methanol	4.246	31	310187	43.348	ppbV	100
9) vinyl chloride	4.288	62	144918	9.208	ppbV	99
10) 1,3-butadiene	4.450	54	115353	8.532	ppbV	92
11) butane	4.510	43	195564	8.039	ppbV	96
13) bromomethane	4.756	94	131931	9.364	ppbV	98
14) chloroethane	4.966	64	66847	8.885	ppbV	98
15) ethanol	5.152	31	594260	49.803	ppbV	93
16) dichlorofluoromethane	5.104	67	262713	9.019	ppbV	99
17) vinyl bromide	5.390	106	126304	9.065	ppbV	100
18) acrolein	5.550	56	57455	8.780	ppbV	93
19) acetone	5.710	43	999852	42.576	ppbV	98
20) acetonitrile	5.397	41	111570	8.326	ppbV	98
21) trichlorofluoromethane	5.903	101	259716	9.603	ppbV	99
22) isopropyl alcohol	6.047	45	532871	19.209	ppbV	99
23) acrylonitrile	6.287	53	108133	8.271	ppbV	98
24) pentane	6.343	43	211470	7.472	ppbV	98
25) ethyl ether	6.393	31	222905	8.177	ppbV	97
26) 1,1-dichloroethene	6.664	61	202072	9.035	ppbV	98
27) tertiary butyl alcohol	6.778	59	213895	8.776	ppbV	95
28) methylene chloride	6.838	49	164327	7.430	ppbV	96
29) 3-chloropropene	6.970	41	180972M6	6.928	ppbV	
30) carbon disulfide	7.114	76	408422	7.108	ppbV	98
31) Freon 113	7.162	101	265300	7.326	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626853.D
 Acq On : 6 Oct 2021 11:50 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-2,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:13:52 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
32) trans-1,2-dichloroethene	7.958	61	258239	9.888	ppbV	97
33) 1,1-dichloroethane	8.192	63	304927	9.556	ppbV	99
34) MTBE	8.283	73	397366	9.531	ppbV	97
35) vinyl acetate	8.425	43	389432	9.253	ppbV	98
36) 2-butanone	8.692	43	395312	8.735	ppbV	99
37) cis-1,2-dichloroethene	9.192	61	227270	9.794	ppbV	99
38) Ethyl Acetate	9.500	61	60395	9.516	ppbV	87
39) chloroform	9.542	83	343242	10.453	ppbV	97
40) Tetrahydrofuran	9.992	42	221489	8.737	ppbV	95
41) 2,2-dichloropropane	9.558	77	232522	10.183	ppbV	96
42) 1,2-dichloroethane	10.392	62	198984	10.198	ppbV	98
44) hexane	9.450	57	302651	10.363	ppbV	81
45) diisopropyl ether	9.467	87	147320	10.097	ppbV	85
46) tert-butyl ethyl ether	10.092	59	468871	10.064	ppbV	99
48) 1,1,1-trichloroethane	10.675	97	277301	10.194	ppbV	99
49) 1,1-dichloropropene	11.047	75	261002	9.826	ppbV	98
50) benzene	11.200	78	629856	9.530	ppbV	99
52) carbon tetrachloride	11.373	117	290566	10.868	ppbV	97
53) cyclohexane	11.513	56	331635	10.644	ppbV	93
54) tert-amyl methyl ether	11.920	73	417789	9.269	ppbV	98
55) dibromomethane	12.127	93	197883	10.050	ppbV	96
56) 1,2-dichloropropane	12.160	63	206422	9.410	ppbV	97
57) bromodichloromethane	12.393	83	376512	10.870	ppbV	100
58) 1,4-dioxane	12.440	88	140102	10.409	ppbV	100
59) trichloroethene	12.440	130	280560	10.189	ppbV	99
60) 2,2,4-trimethylpentane	12.487	57	1045244	10.700	ppbV	94
61) methyl methacrylate	12.700	41	282018	9.151	ppbV	97
62) heptane	12.813	43	408041	9.184	ppbV	91
63) cis-1,3-dichloropropene	13.458	75	283370	10.090	ppbV	99
64) 4-methyl-2-pentanone	13.508	43	483851	9.296	ppbV	93
65) trans-1,3-dichloropropene	14.083	75	261210	10.383	ppbV	99
66) 1,1,2-trichloroethane	14.275	97	238824	9.684	ppbV	96
68) toluene	14.600	91	694232	9.385	ppbV	100
71) 1,3-dichloropropane	14.633	76	334263	9.795	ppbV	95
72) 2-hexanone	14.900	43	414922	9.527	ppbV	89
74) dibromochloromethane	15.058	129	397511	10.829	ppbV	99
75) 1,2-dibromoethane	15.308	107	360312	10.127	ppbV	99
76) butyl acetate	15.567	73	72937	9.539	ppbV	85
77) octane	15.650	85	255242	10.672	ppbV	84
78) tetrachloroethene	15.775	166	330760	10.039	ppbV	96

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626853.D
 Acq On : 6 Oct 2021 11:50 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-2,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:13:52 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

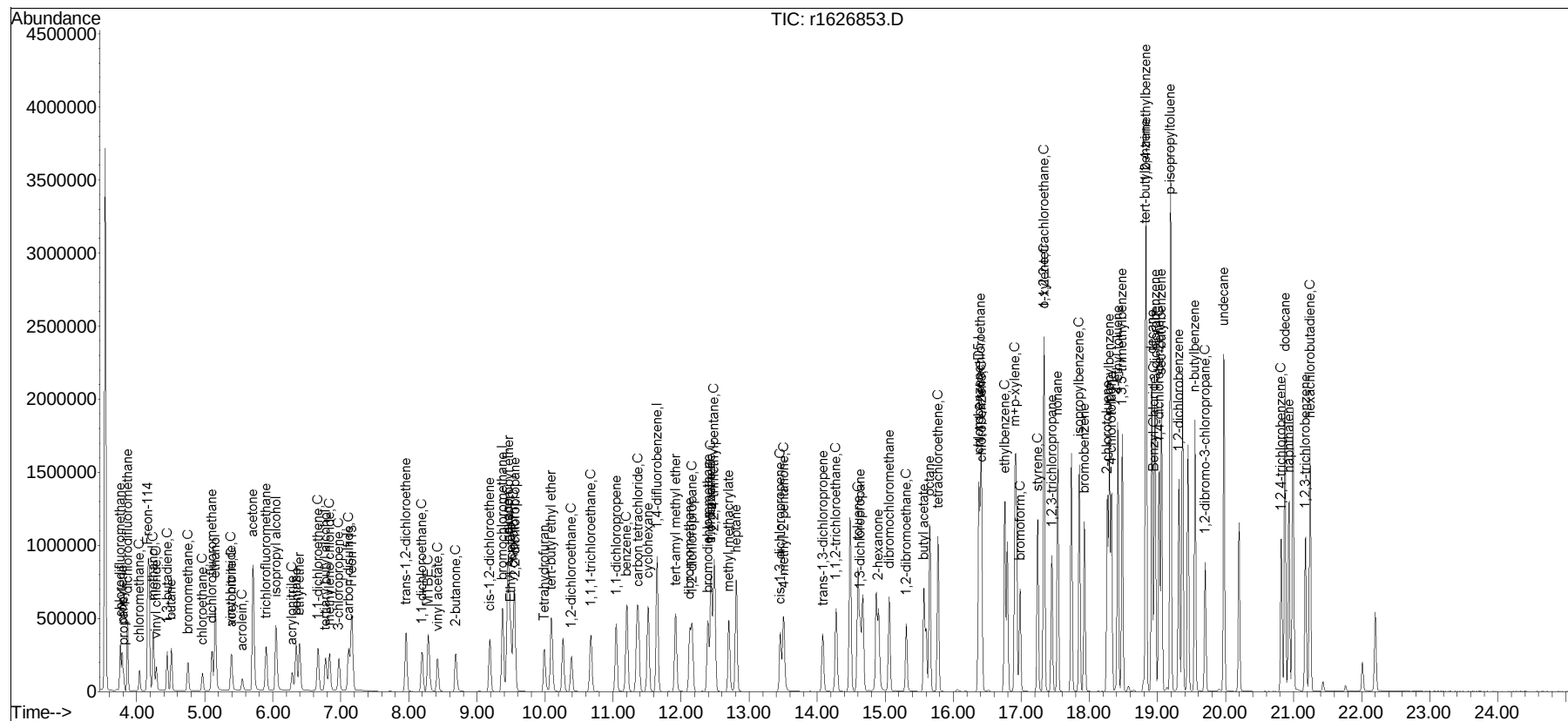
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
79)	1,1,1,2-tetrachloroethane	16.400	131	282379	10.468	ppbV	98
80)	chlorobenzene	16.417	112	604696	10.033	ppbV	98
81)	ethylbenzene	16.758	91	894278	10.370	ppbV	98
83)	m+p-xylene	16.908	91	1483536	20.919	ppbV	98
84)	bromoform	16.983	173	344477	11.257	ppbV	98
85)	styrene	17.242	104	611692	10.554	ppbV	98
86)	1,1,2,2-tetrachloroethane	17.333	83	614712	10.835	ppbV	100
87)	o-xylene	17.333	91	763313	10.596	ppbV	97
88)	1,2,3-trichloropropane	17.450	75	443606	10.216	ppbV	99
89)	nonane	17.533	43	617045	9.391	ppbV	84
91)	isopropylbenzene	17.850	105	1016275	10.105	ppbV	99
92)	bromobenzene	17.925	77	557634	10.340	ppbV	99
93)	2-chlorotoluene	18.258	126	312696	10.570	ppbV	97
94)	n-propylbenzene	18.292	120	346050	10.991	ppbV	96
95)	4-chlorotoluene	18.325	126	310087	10.684	ppbV	99
96)	4-ethyl toluene	18.417	105	1159160	10.653	ppbV	99
97)	1,3,5-trimethylbenzene	18.483	105	953042	10.157	ppbV	98
98)	tert-butylbenzene	18.825	119	998543	10.897	ppbV	98
99)	1,2,4-trimethylbenzene	18.833	105	922141	10.541	ppbV	97
100)	decane	18.917	57	705685	10.974	ppbV	85
101)	Benzyl Chloride	18.950	91	549601	12.159	ppbV	100
102)	1,3-dichlorobenzene	18.967	146	678379	10.776	ppbV	98
103)	1,4-dichlorobenzene	19.025	146	664098	10.875	ppbV	96
104)	sec-butylbenzene	19.058	105	1335088	10.241	ppbV	98
106)	p-isopropyltoluene	19.192	119	1217616	10.879	ppbV	98
107)	1,2-dichlorobenzene	19.317	146	660075	10.665	ppbV	98
108)	n-butylbenzene	19.550	91	990414	10.764	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.700	75	218307	10.271	ppbV	96
112)	undecane	19.975	57	768822	11.543	ppbV	86
114)	dodecane	20.875	57	721927	12.713	ppbV	84
115)	1,2,4-trichlorobenzene	20.817	180	337530	11.385	ppbV	98
116)	naphthalene	20.933	128	1143495	11.381	ppbV	99
117)	1,2,3-trichlorobenzene	21.175	180	351804	11.054	ppbV	99
119)	hexachlorobutadiene	21.242	225	340912	10.583	ppbV	99

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

```
Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\
Data File : r1626853.D
Acq On    : 6 Oct 2021 11:50 AM
Operator  : AIRLAB16:TS
Sample    : WG1555287-2,3,250,250
Misc      : WG1555287,ICAL18260
ALS Vial  : 0 Sample Multiplier: 1
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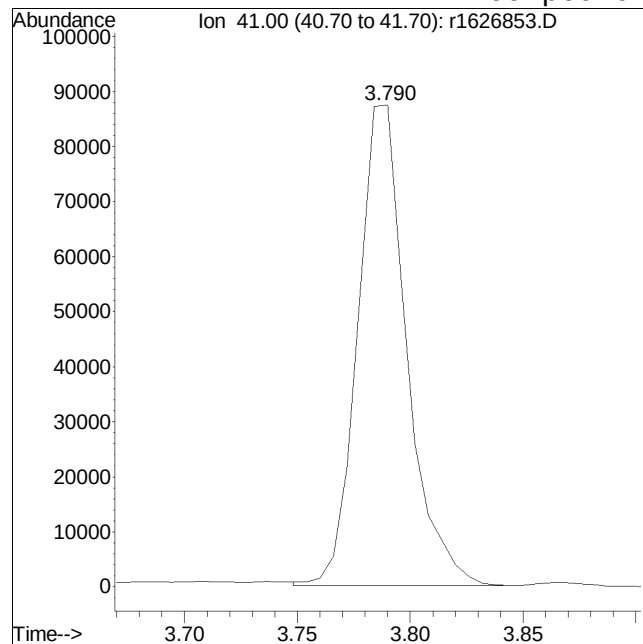
Quant Time: Oct 06 14:13:52 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 06:00:53 2021
Response via : Initial Calibration



Manual Integration Report

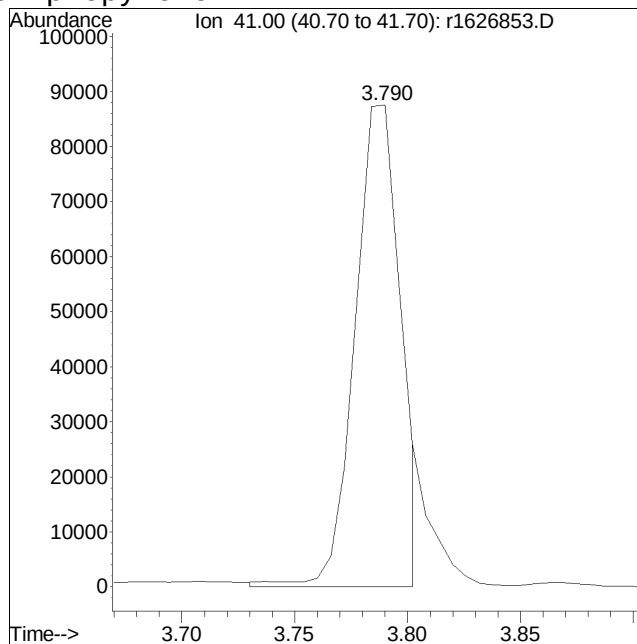
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Data File : r1626853.D Operator : AIRLAB16:TS
Date Inj'd : 10/6/2020 0:1: 0 Instrument :
Sample : WG1555287-2,3,250,250 Quant Date : 10/6/2021 2:12 pm

Compound #3: propylene



Original Peak Response = 131664

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

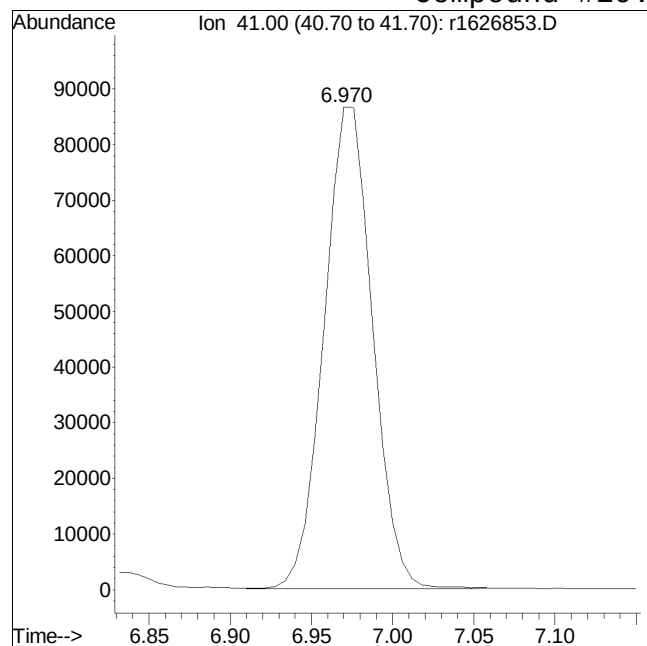


Manual Peak Response = 123798 M6

Manual Integration Report

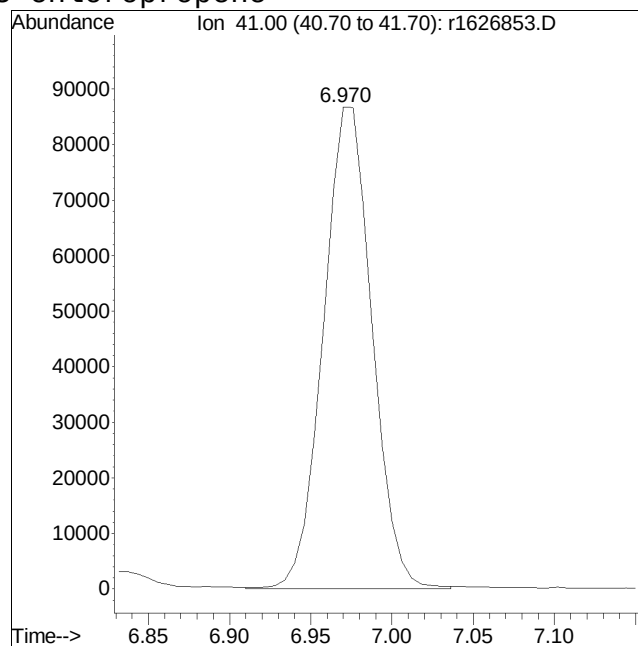
Data Path : 0:\Forensics\Data\Airlab16QMethod : TFS16_210829.M
Data File : r1626853.D Operator : AIRLAB16:TS
Date Inj'd : 10/6/2020 0:1: 0 Instrument :
Sample : WG1555287-2,3,250,250 Quant Date : 10/6/2021 2:12 pm

Compound #29: 3-chloropropene



Original Peak Response = 179865

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



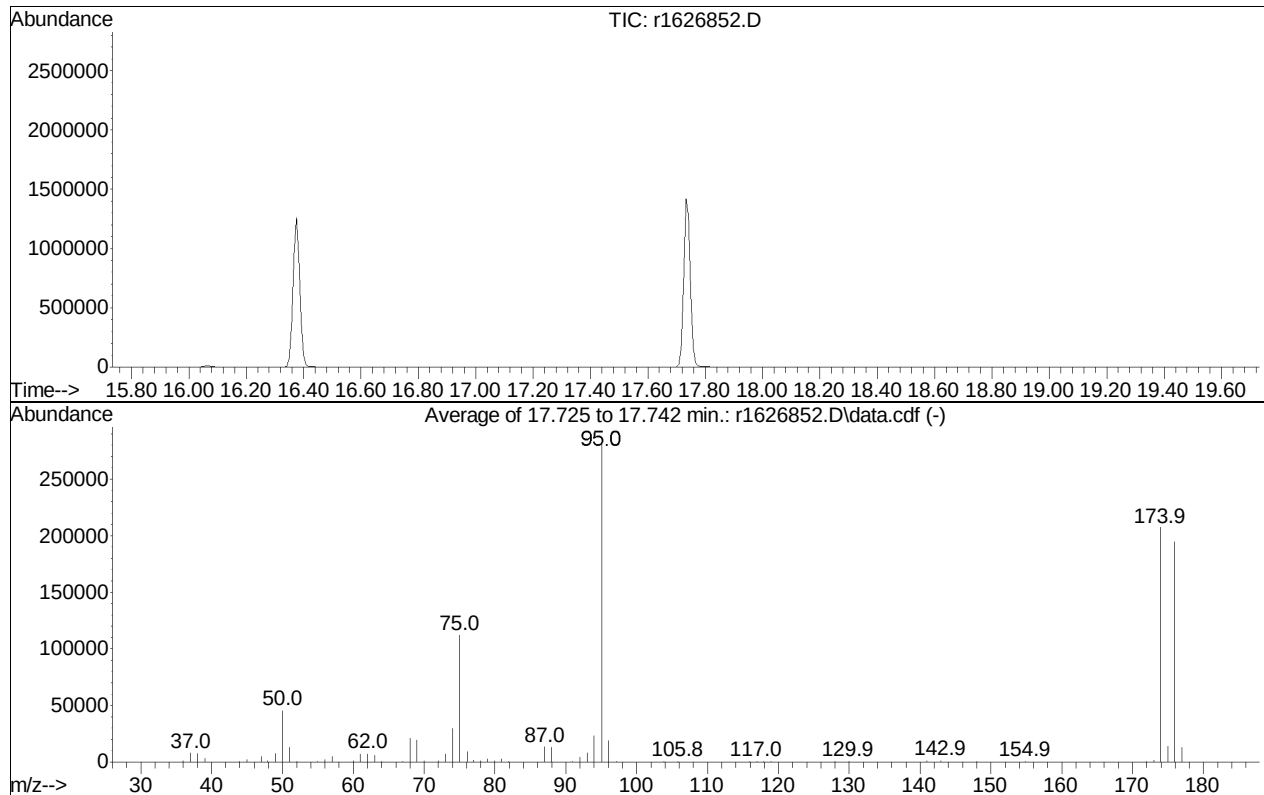
Manual Peak Response = 180972 M6

BFB

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626852.D
 Acq On : 6 Oct 2021 11:09 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-1,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Integration File: rteint.p

Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Aug 30 06:00:53 2021



Spectrum Information: Average of 17.725 to 17.742 min.

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	16.0	45293	PASS
75	95	30	66	39.7	112156	PASS
95	95	100	100	100.0	282222	PASS
96	95	5	9	6.7	18832	PASS
173	174	0.00	2	0.7	1377	PASS
174	95	50	120	73.5	207417	PASS
175	174	4	9	6.9	14294	PASS
176	174	93	101	94.0	194951	PASS
177	176	5	9	6.7	13050	PASS

Volatiles Raw QC Data

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626856.D
 Acq On : 6 Oct 2021 2:52 PM
 Operator : AIRLAB16:TS
 Sample : WG1555287-4,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 06:39:05 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.383	49	346259	10.000	ppbV	-0.03
Standard Area = 357950			Recovery =		96.73%	
43) 1,4-difluorobenzene	11.647	114	872255	10.000	ppbV	-0.03
Standard Area = 923831			Recovery =		94.42%	
67) chlorobenzene-D5	16.383	54	132477	10.000	ppbV	-0.02
Standard Area = 146691			Recovery =		90.31%	

System Monitoring Compounds

Target Compounds			Qvalue
5) dichlorodifluoromethane	0.000	0	N.D.
6) chloromethane	0.000	0	N.D.
9) vinyl chloride	0.000	0	N.D.
14) chloroethane	0.000	0	N.D.
21) trichlorofluoromethane	0.000	0	N.D.
26) 1,1-dichloroethene	0.000	0	N.D.
28) methylene chloride	6.838	0	N.D.
31) Freon 113	0.000	0	N.D.
32) trans-1,2-dichloroethene	0.000	0	N.D.
33) 1,1-dichloroethane	0.000	0	N.D.
37) cis-1,2-dichloroethene	0.000	0	N.D.
39) chloroform	0.000	0	N.D.
41) 2,2-dichloropropane	0.000	0	N.D.
42) 1,2-dichloroethane	0.000	0	N.D.
48) 1,1,1-trichloroethane	0.000	0	N.D.
49) 1,1-dichloropropene	0.000	0	N.D.
52) carbon tetrachloride	0.000	0	N.D.
56) 1,2-dichloropropane	0.000	0	N.D.
57) bromodichloromethane	0.000	0	N.D.
59) trichloroethene	0.000	0	N.D.
63) cis-1,3-dichloropropene	0.000	0	N.D.
65) trans-1,3-dichloropropene	0.000	0	N.D.
66) 1,1,2-trichloroethane	0.000	0	N.D.
71) 1,3-dichloropropane	0.000	0	N.D.
74) dibromochloromethane	0.000	0	N.D.
78) tetrachloroethene	0.000	0	N.D.
79) 1,1,1,2-tetrachloroethane	0.000	0	N.D.

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626856.D
 Acq On : 6 Oct 2021 2:52 PM
 Operator : AIRLAB16:TS
 Sample : WG1555287-4,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 06:39:05 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	0.000		0		N.D.	
86) 1,1,2,2-tetrachloroethane	0.000		0		N.D.	
88) 1,2,3-trichloropropane	0.000		0		N.D.	
93) 2-chlorotoluene	0.000		0		N.D.	
95) 4-chlorotoluene	0.000		0		N.D.	
102) 1,3-dichlorobenzene	0.000		0		N.D.	
103) 1,4-dichlorobenzene	0.000		0		N.D.	
107) 1,2-dichlorobenzene	19.333		0		N.D.	
111) 1,2-dibromo-3-chloropr...	19.725		0		N.D.	
115) 1,2,4-trichlorobenzene	20.842		0		N.D.	
117) 1,2,3-trichlorobenzene	21.200		0		N.D.	
119) hexachlorobutadiene	0.000		0		N.D.	

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

Sub List : Default-LCS-AP2 - All compounds listed6T\r1626853.D

Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\

Data File : r1626856.D

Acq On : 6 Oct 2021 2:52 PM

Operator : AIRLAB16:TS

Sample : WG1555287-4,3,250,250

Misc : WG1555287,ICAL18260

ALS Vial : 0 Sample Multiplier: 1

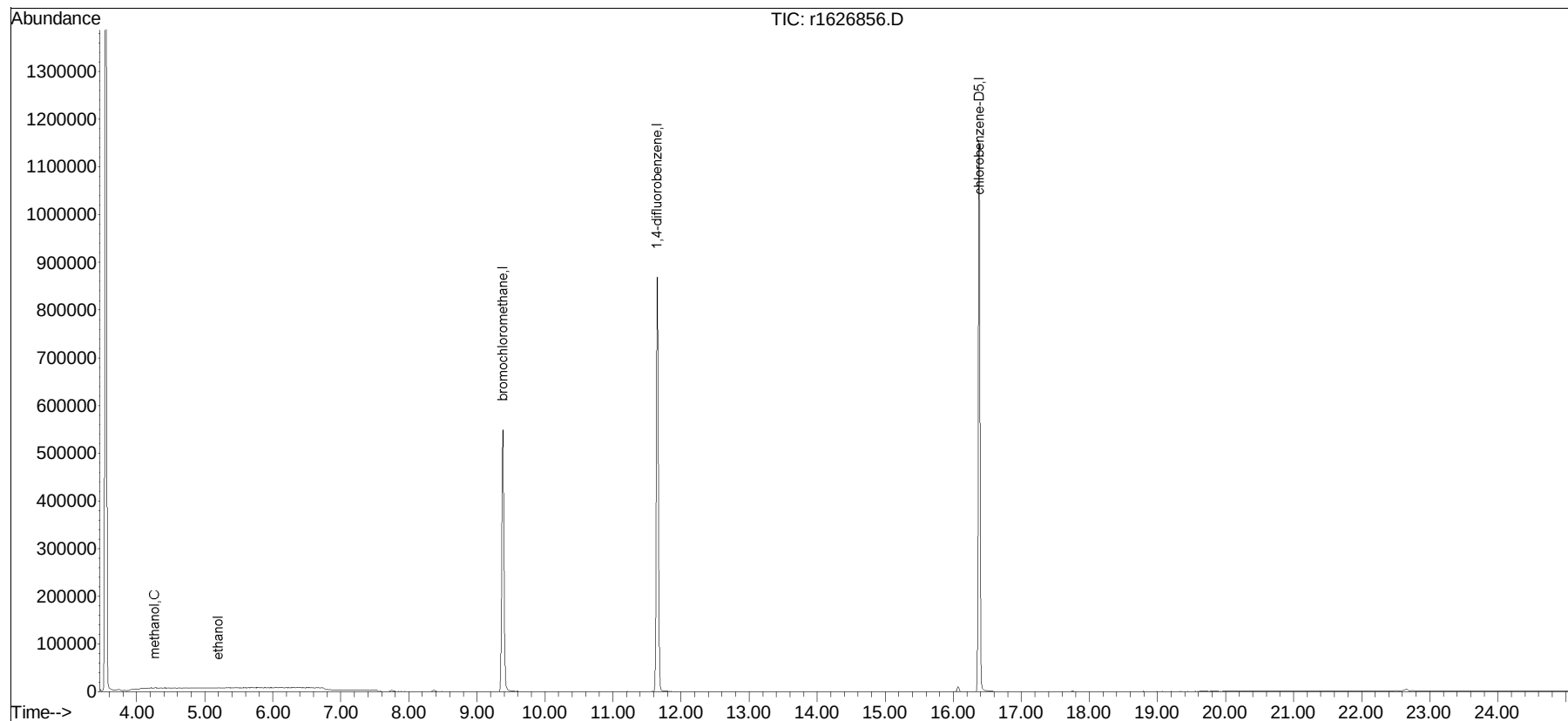
Quant Time: Oct 07 06:39:05 2021

Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M

Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

QLast Update : Mon Aug 30 06:00:53 2021

Response via : Initial Calibration



Manual Integration Report

Data Path	: 0:\Forensics\Data\Airlab16Q	Method	: TFS16_210829.M
Data File	: r1626856.D	Operator	: AIRLAB16:TS
Date Inj'd	: 10/6/2020 0:2: 2	Instrument	:
Sample	: WG1555287-4,3,250,250	Quant Date	: 10/7/2021 6:38 am

There are no manual integrations or false positives in this file.

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626854.D
 Acq On : 6 Oct 2021 12:31 PM
 Operator : AIRLAB16:TS
 Sample : WG1555287-3,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:15:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1 I	bromochloromethane	10.000	10.000	0.0	94	-0.03
2	chlorodifluoromethane	10.000	8.317	16.8	79	-0.02
3	propylene	10.000	8.788	12.1	82	-0.02
4	propane	10.000	8.762	12.4	84	-0.02
5	dichlorodifluoromethane	10.000	9.513	4.9	91	-0.02
6 C	chloromethane	10.000	7.388	26.1	72	-0.02
7	Freon-114	10.000	8.786	12.1	83	-0.02
8 C	methanol	50.000	42.071	15.9	78	-0.02
9 C	vinyl chloride	10.000	9.049	9.5	87	-0.02
10 C	1,3-butadiene	10.000	8.695	13.0	82	-0.02
11	butane	10.000	7.504	25.0	73	-0.02
13 C	bromomethane	10.000	9.272	7.3	89	-0.02
14 C	chloroethane	10.000	8.970	10.3	87	-0.02
15	ethanol	50.000	50.734	-1.5	87	-0.03
16	dichlorofluoromethane	10.000	8.528	14.7	83	-0.04
17 C	vinyl bromide	10.000	8.885	11.2	84	-0.03
18 C	acrolein	10.000	8.256	17.4	77	-0.03
19	acetone	50.000	40.093	19.8	76	-0.03
20 C	acetonitrile	10.000	8.247	17.5	80	-0.03
21	trichlorofluoromethane	10.000	9.809	1.9	96	-0.03
22	isopropyl alcohol	25.000	18.190	27.2	70	-0.03
23 C	acrylonitrile	10.000	7.942	20.6	79	-0.03
24	pentane	10.000	7.271	27.3	75	-0.03
25	ethyl ether	10.000	7.875	21.3	78	-0.03
26 C	1,1-dichloroethene	10.000	9.370	6.3	94	-0.04
27	tertiary butyl alcohol	10.000	8.983	10.2	90	-0.03
28 C	methylene chloride	10.000	7.398	26.0	76	-0.03
29 C	3-chloropropene	10.000	7.337	26.6	68	-0.03
30 C	carbon disulfide	10.000	6.793	32.1#	62	-0.04
31	Freon 113	10.000	7.590	24.1	72	-0.03
32	trans-1,2-dichloroethene	10.000	9.927	0.7	92	-0.03
33 C	1,1-dichloroethane	10.000	9.741	2.6	92	-0.03
34 C	MTBE	10.000	9.982	0.2	89	-0.03
35 C	vinyl acetate	10.000	8.862	11.4	81	-0.02
36 C	2-butanone	10.000	8.839	11.6	82	-0.03
37	cis-1,2-dichloroethene	10.000	10.327	-3.3	95	-0.03
38	Ethyl Acetate	10.000	10.760	-7.6	94	-0.03
39 C	chloroform	10.000	10.800	-8.0	102	-0.03
40	Tetrahydrofuran	10.000	8.833	11.7	78	-0.03

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626854.D
 Acq On : 6 Oct 2021 12:31 PM
 Operator : AIRLAB16:TS
 Sample : WG1555287-3,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:15:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
41	2,2-dichloropropane	10.000	9.901	1.0	91	-0.03
42 C	1,2-dichloroethane	10.000	10.352	-3.5	99	-0.03
43 I	1,4-difluorobenzene	10.000	10.000	0.0	94	-0.03
44 C	hexane	10.000	10.826	-8.3	99	-0.03
45	diisopropyl ether	10.000	9.960	0.4	92	-0.03
46	tert-butyl ethyl ether	10.000	9.775	2.2	90	-0.03
48 C	1,1,1-trichloroethane	10.000	10.496	-5.0	99	-0.03
49	1,1-dichloropropene	10.000	9.898	1.0	89	-0.03
50 C	benzene	10.000	9.519	4.8	93	-0.03
52 C	carbon tetrachloride	10.000	11.068	-10.7	103	-0.03
53	cyclohexane	10.000	11.002	-10.0	100	-0.03
54	tert-amyl methyl ether	10.000	9.143	8.6	83	-0.03
55	dibromomethane	10.000	9.797	2.0	93	-0.03
56 C	1,2-dichloropropane	10.000	9.664	3.4	92	-0.03
57	bromodichloromethane	10.000	11.358	-13.6	103	-0.03
58 C	1,4-dioxane	10.000	11.160	-11.6	98	-0.03
59 C	trichloroethene	10.000	10.358	-3.6	96	-0.03
60 C	2,2,4-trimethylpentane	10.000	11.231	-12.3	104	-0.03
61	methyl methacrylate	10.000	7.226	27.7	63	-0.03
62	heptane	10.000	9.504	5.0	85	-0.03
63 C	cis-1,3-dichloropropene	10.000	10.885	-8.8	94	-0.03
64 C	4-methyl-2-pentanone	10.000	9.744	2.6	84	-0.03
65	trans-1,3-dichloropropene	10.000	9.530	4.7	81	-0.02
66 C	1,1,2-trichloroethane	10.000	10.103	-1.0	95	-0.03
67 I	chlorobenzene-D5	10.000	10.000	0.0	93	-0.02
68 C	toluene	10.000	9.664	3.4	95	-0.03
71	1,3-dichloropropane	10.000	9.433	5.7	86	-0.03
72	2-hexanone	10.000	9.981	0.2	80	-0.03
74	dibromochloromethane	10.000	11.799	-18.0	104	-0.03
75 C	1,2-dibromoethane	10.000	10.524	-5.2	93	-0.03
76	butyl acetate	10.000	9.151	8.5	77	-0.03
77	octane	10.000	10.388	-3.9	92	-0.03
78 C	tetrachloroethene	10.000	10.278	-2.8	95	-0.03
79	1,1,1,2-tetrachloroethane	10.000	10.241	-2.4	91	-0.03
80 C	chlorobenzene	10.000	10.325	-3.2	94	-0.02
81 C	ethylbenzene	10.000	10.712	-7.1	95	-0.03
83 C	m+p-xylene	20.000	21.519	-7.6	96	-0.02

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626854.D
 Acq On : 6 Oct 2021 12:31 PM
 Operator : AIRLAB16:TS
 Sample : WG1555287-3,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:15:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
84 C	bromoform	10.000	12.069	-20.7	103	-0.02
85 C	styrene	10.000	10.735	-7.3	90	-0.03
86 C	1,1,2,2-tetrachloroethane	10.000	11.273	-12.7	101	-0.03
87 C	o-xylene	10.000	10.941	-9.4	97	-0.03
88	1,2,3-trichloropropane	10.000	10.047	-0.5	90	-0.03
89	nonane	10.000	9.093	9.1	79	-0.03
91 C	isopropylbenzene	10.000	10.368	-3.7	93	-0.03
92	bromobenzene	10.000	10.248	-2.5	92	-0.03
93	2-chlorotoluene	10.000	10.363	-3.6	92	-0.03
94	n-propylbenzene	10.000	10.717	-7.2	93	-0.03
95	4-chlorotoluene	10.000	10.542	-5.4	92	-0.03
96	4-ethyl toluene	10.000	10.874	-8.7	92	-0.03
97	1,3,5-trimethylbenzene	10.000	10.346	-3.5	93	-0.03
98	tert-butylbenzene	10.000	10.522	-5.2	91	-0.03
99	1,2,4-trimethylbenzene	10.000	10.903	-9.0	93	-0.03
100	decane	10.000	10.826	-8.3	95	-0.02
101 C	Benzyl Chloride	10.000	12.427	-24.3	94	-0.03
102	1,3-dichlorobenzene	10.000	11.206	-12.1	93	-0.03
103 C	1,4-dichlorobenzene	10.000	11.131	-11.3	92	-0.03
104	sec-butylbenzene	10.000	10.087	-0.9	88	-0.03
106	p-isopropyltoluene	10.000	9.875	1.3	84	-0.02
107	1,2-dichlorobenzene	10.000	11.125	-11.3	96	-0.02
108	n-butylbenzene	10.000	11.039	-10.4	94	-0.02
111 C	1,2-dibromo-3-chloropropane	10.000	10.918	-9.2	89	-0.03
112	undecane	10.000	11.770	-17.7	95	-0.02
114	dodecane	10.000	13.219	-32.2#	89	0.00
115 C	1,2,4-trichlorobenzene	10.000	11.572	-15.7	78	0.00
116	naphthalene	10.000	11.510	-15.1	83	0.00
117	1,2,3-trichlorobenzene	10.000	11.218	-12.2	79	0.00
119 C	hexachlorobutadiene	10.000	11.569	-15.7	92	0.00

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626854.D
 Acq On : 6 Oct 2021 12:31 PM
 Operator : AIRLAB16:TS
 Sample : WG1555287-3,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:15:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.383	49	354747	10.000	ppbV	-0.03
Standard Area = 357950			Recovery =	99.11%		
43) 1,4-difluorobenzene	11.647	114	924363	10.000	ppbV	-0.03
Standard Area = 923831			Recovery =	100.06%		
67) chlorobenzene-D5	16.375	54	145245	10.000	ppbV	-0.02
Standard Area = 146691			Recovery =	99.01%		

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.868	85	329877	9.513	ppbV	99
6) chloromethane	4.042	50	115220	7.388	ppbV	99
9) vinyl chloride	4.294	62	141149	9.049	ppbV	100
14) chloroethane	4.972	64	66880	8.970	ppbV	99
21) trichlorofluoromethane	5.903	101	262918	9.809	ppbV	98
26) 1,1-dichloroethene	6.664	61	207678	9.370	ppbV	98
28) methylene chloride	6.838	49	162143	7.398	ppbV	94
31) Freon 113	7.162	101	272423	7.590	ppbV	98
32) trans-1,2-dichloroethene	7.958	61	256919	9.927	ppbV	96
33) 1,1-dichloroethane	8.192	63	308049	9.741	ppbV	98
37) cis-1,2-dichloroethene	9.192	61	237496	10.327	ppbV	97
39) chloroform	9.542	83	351435	10.800	ppbV	96
41) 2,2-dichloropropane	9.550	77	224060	9.901	ppbV	95
42) 1,2-dichloroethane	10.392	62	200188	10.352	ppbV	98
48) 1,1,1-trichloroethane	10.675	97	285678	10.496	ppbV	98
49) 1,1-dichloropropene	11.047	75	263057	9.898	ppbV	97
52) carbon tetrachloride	11.373	117	296079	11.068	ppbV	99
56) 1,2-dichloropropane	12.160	63	212127	9.664	ppbV	98
57) bromodichloromethane	12.393	83	393631	11.358	ppbV	100
59) trichloroethene	12.440	130	285384	10.358	ppbV	98
63) cis-1,3-dichloropropene	13.458	75	305862	10.885	ppbV	98
65) trans-1,3-dichloropropene	14.083	75	239910	9.530	ppbV	99
66) 1,1,2-trichloroethane	14.275	97	249292	10.103	ppbV	95
71) 1,3-dichloropropane	14.633	76	318735	9.433	ppbV	95
74) dibromochloromethane	15.058	129	428839	11.799	ppbV	99
78) tetrachloroethene	15.775	166	335292	10.278	ppbV	97
79) 1,1,1,2-tetrachloroethane	16.400	131	273516	10.241	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626854.D
 Acq On : 6 Oct 2021 12:31 PM
 Operator : AIRLAB16:TS
 Sample : WG1555287-3,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 06 14:15:37 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

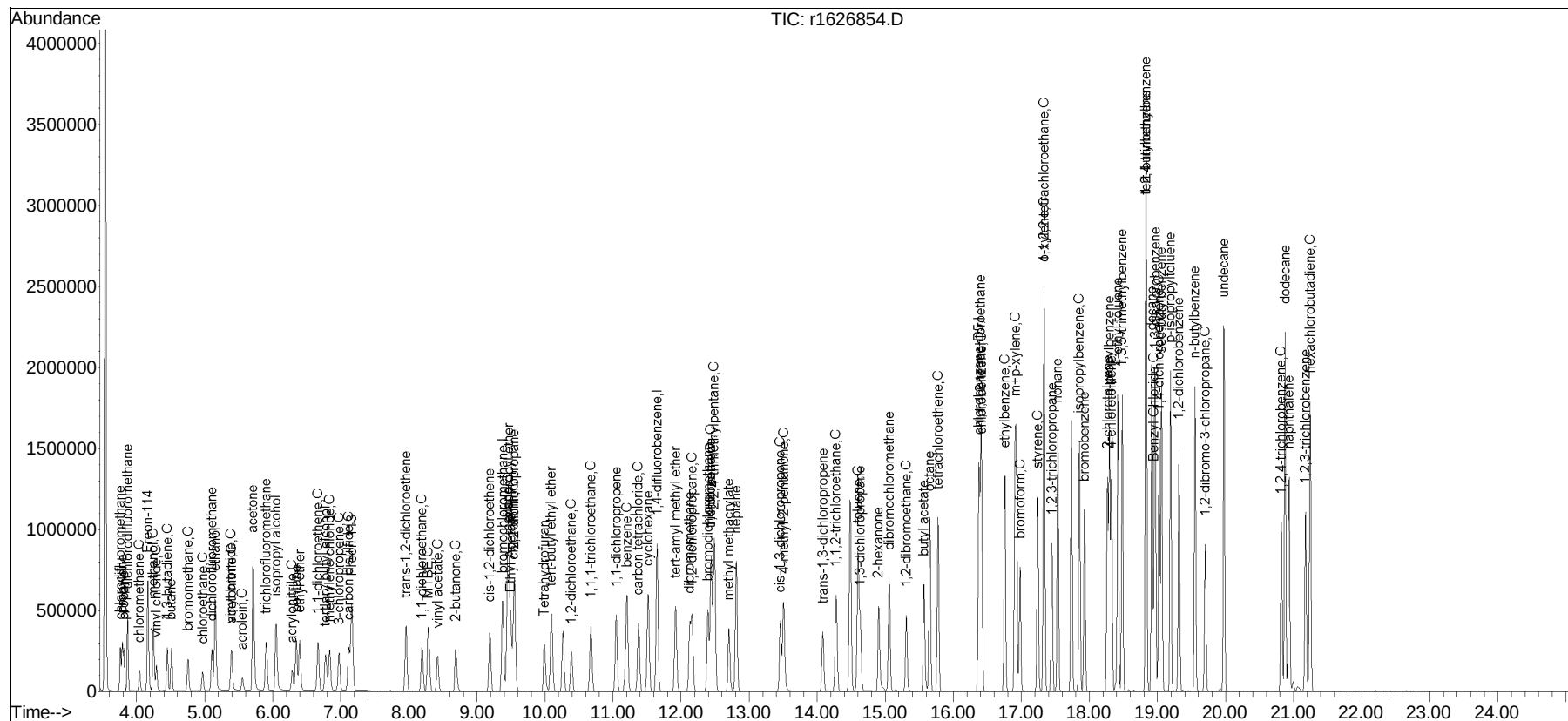
CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : Default-LCS-AP2 - All compounds listed

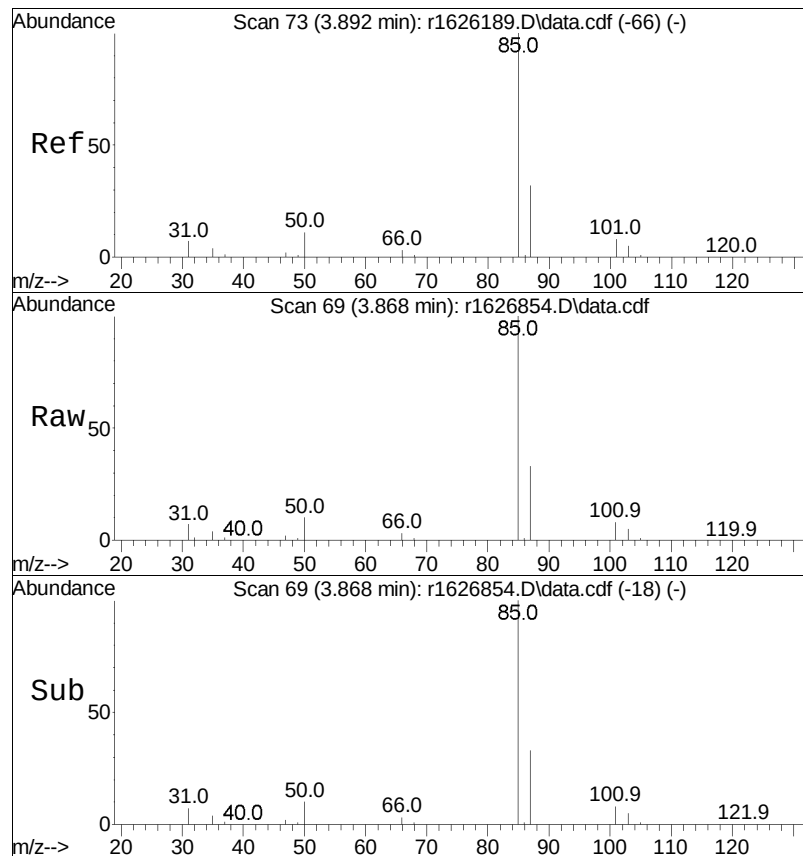
	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80)	chlorobenzene	16.417	112	616107	10.325	ppbV	100
86)	1,1,2,2-tetrachloroethane	17.333	83	633265	11.273	ppbV	98
88)	1,2,3-trichloropropane	17.450	75	431986	10.047	ppbV	99
93)	2-chlorotoluene	18.267	126	303573	10.363	ppbV	93
95)	4-chlorotoluene	18.325	126	302950	10.542	ppbV	100
102)	1,3-dichlorobenzene	18.967	146	698474	11.206	ppbV	99
103)	1,4-dichlorobenzene	19.025	146	673033	11.131	ppbV	98
107)	1,2-dichlorobenzene	19.317	146	681745	11.125	ppbV	98
111)	1,2-dibromo-3-chloropr...	19.700	75	229766	10.918	ppbV	95
115)	1,2,4-trichlorobenzene	20.817	180	339700	11.572	ppbV	99
117)	1,2,3-trichlorobenzene	21.175	180	353502	11.218	ppbV	99
119)	hexachlorobutadiene	21.242	225	368993	11.569	ppbV	99

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

```
Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\
Data File : r1626854.D
Acq On    : 6 Oct 2021 12:31 PM
Operator  : AIRLAB16:TS
Sample    : WG1555287-3,3,250,250
Misc      : WG1555287,ICAL18260
ALS Vial  : 0 Sample Multiplier: 1
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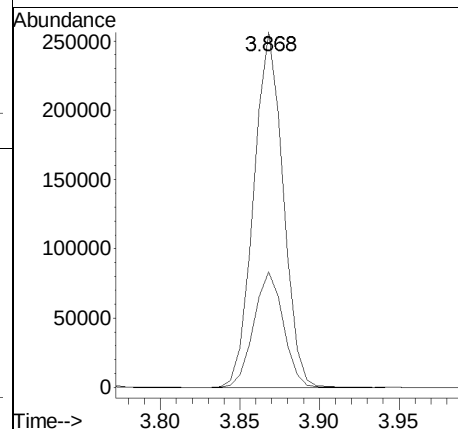
Quant Time: Oct 06 14:15:37 2021
Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Aug 30 06:00:53 2021
Response via : Initial Calibration

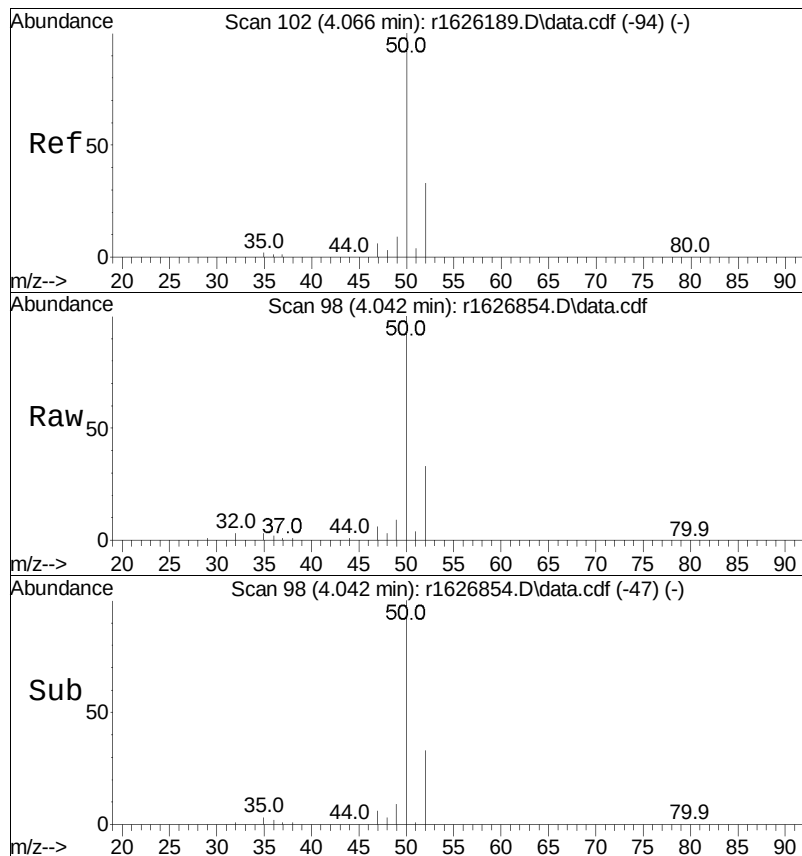




#5
dichlorodifluoromethane
Concen: 9.51 ppbV
RT: 3.868 min Scan# 69
Delta R.T. -0.024 min
Lab File: r1626854.D
Acq: 6 Oct 2021 12:31 PM

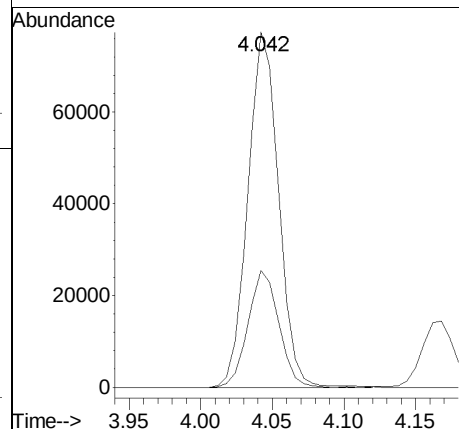
Tgt Ion	Ratio	Lower	Upper
85	100		
87	32.5	25.5	38.3

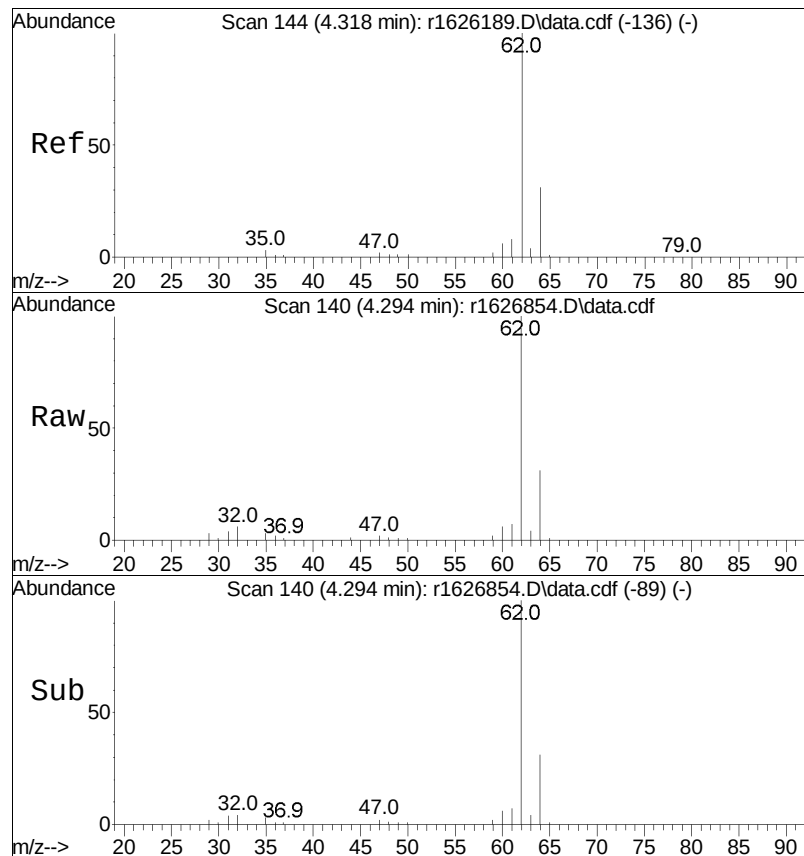




#6
 chloromethane
 Concen: 7.39 ppbV
 RT: 4.042 min Scan# 98
 Delta R.T. -0.024 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

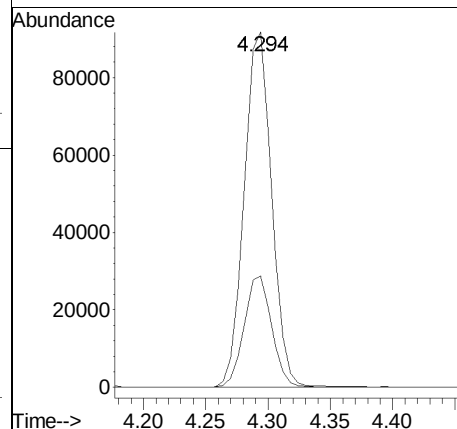
Tgt Ion	Ratio	Lower	Upper
50	100		
52	32.9	26.1	39.1

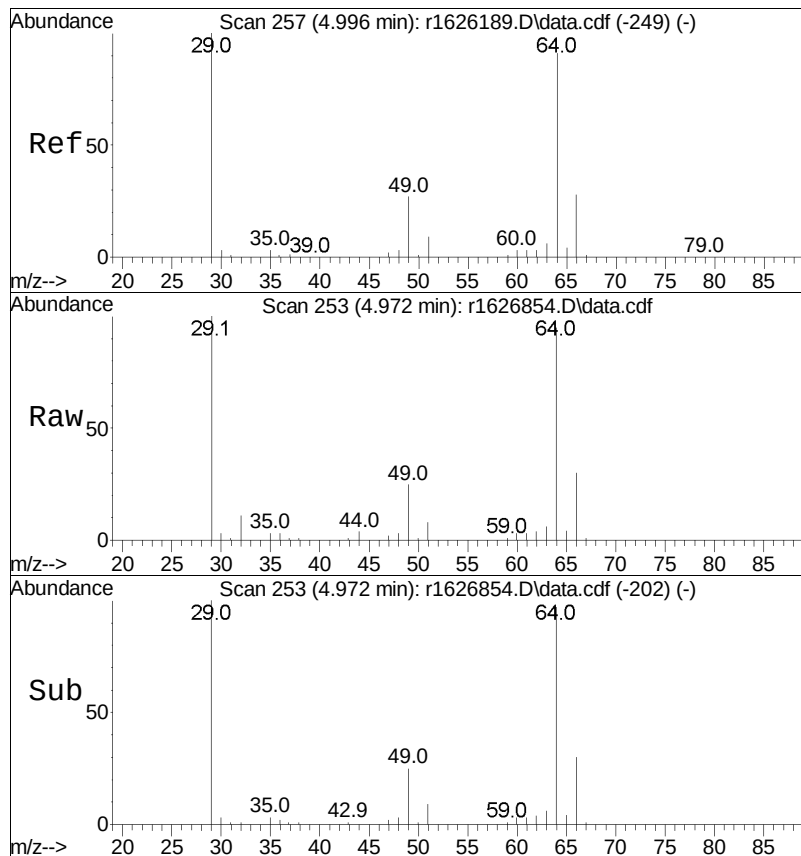




#9
 vinyl chloride
 Concen: 9.05 ppbV
 RT: 4.294 min Scan# 140
 Delta R.T. -0.024 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

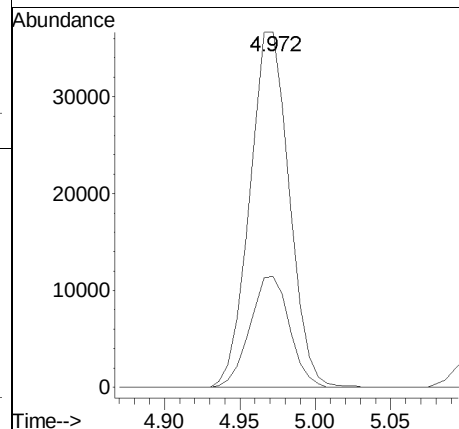
Tgt Ion	Ratio	Lower	Upper
62	100		
64	31.3	25.0	37.4

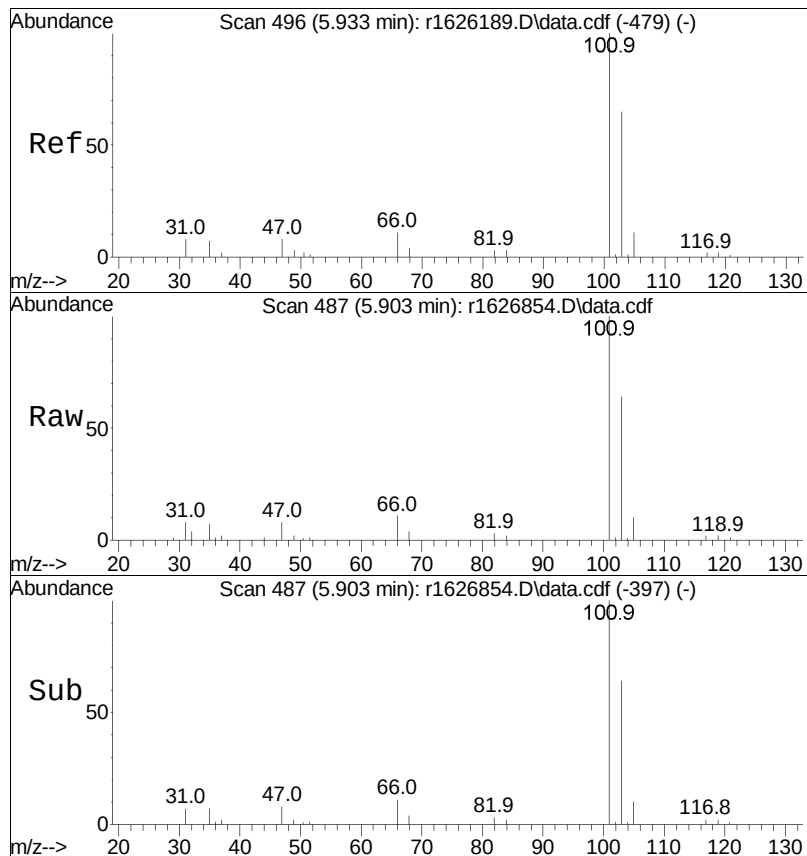




#14
 chloroethane
 Concen: 8.97 ppbV
 RT: 4.972 min Scan# 253
 Delta R.T. -0.024 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

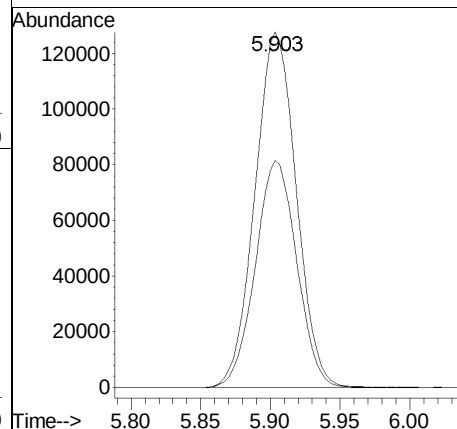
Tgt Ion	Ratio	Lower	Upper
64	100		
66	31.2	24.6	37.0

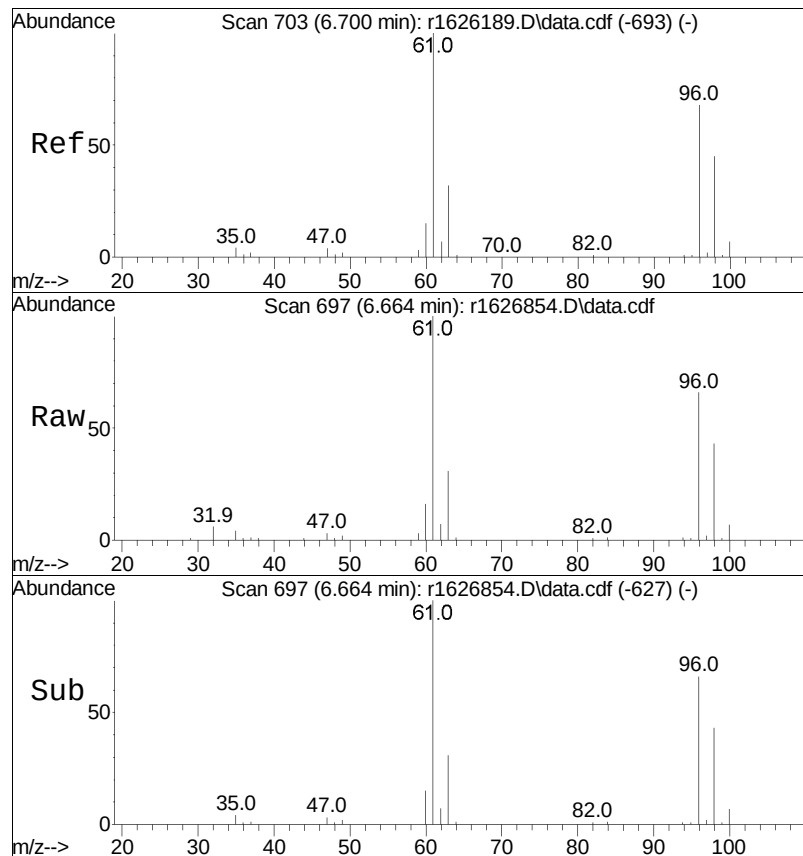




#21
 trichlorofluoromethane
 Concen: 9.81 ppbV
 RT: 5.903 min Scan# 487
 Delta R.T. -0.030 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

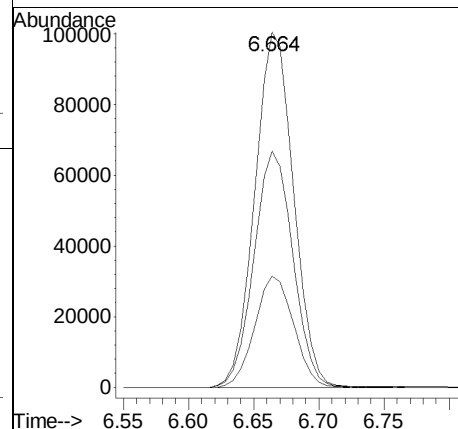
Tgt Ion	101	Resp	262918
Ion Ratio	Lower	Upper	
101	100		
103	63.8	52.0	78.0

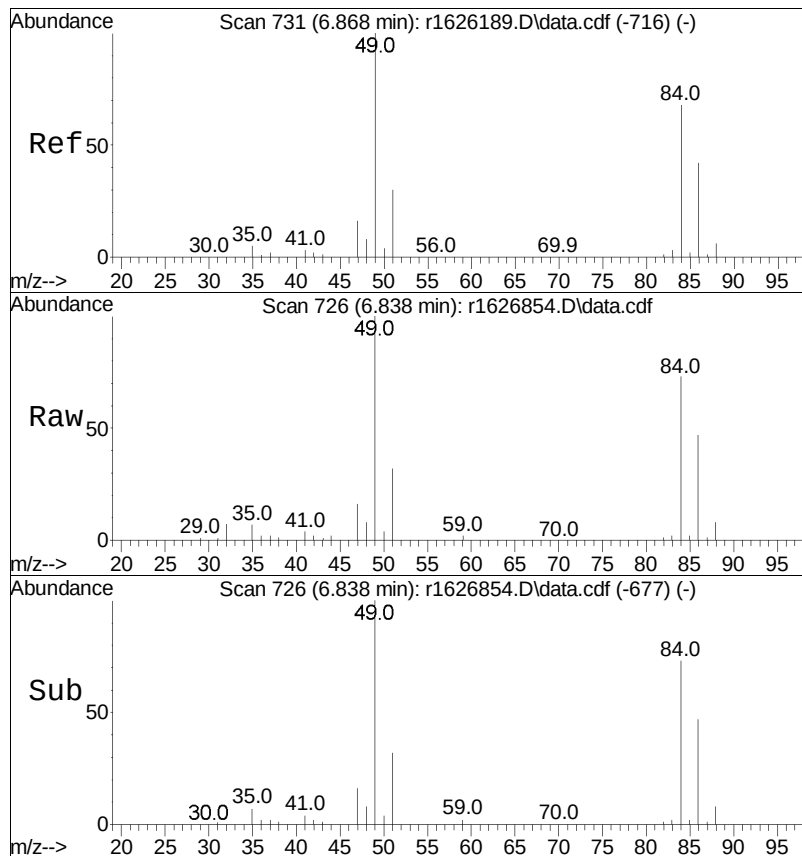




#26
 1,1-dichloroethene
 Concen: 9.37 ppbV
 RT: 6.664 min Scan# 697
 Delta R.T. -0.036 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

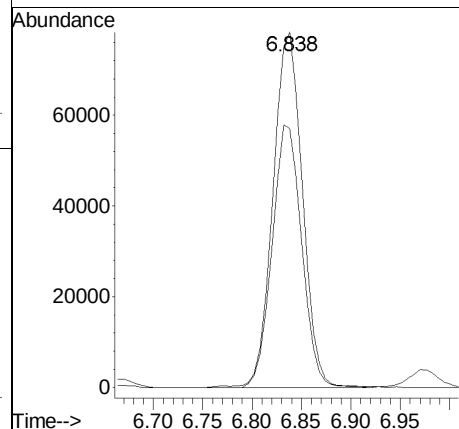
Tgt Ion:	61	Resp:	207678
Ion Ratio	Lower	Upper	
61	100		
96	66.5	54.8	82.2
63	31.3	25.4	38.0

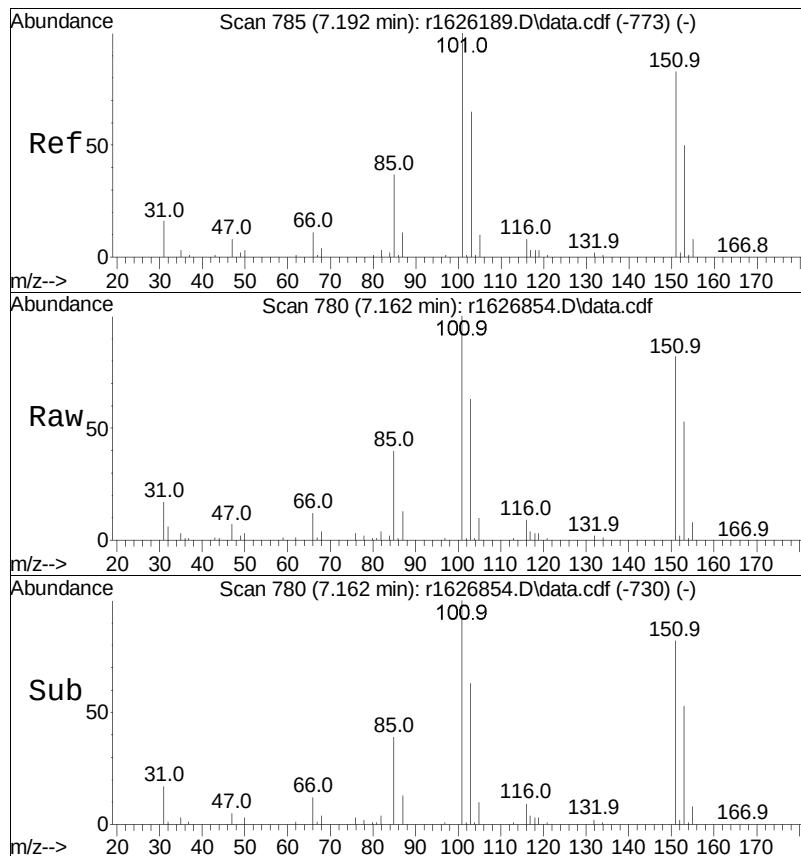




#28
 methylene chloride
 Concen: 7.40 ppbV
 RT: 6.838 min Scan# 726
 Delta R.T. -0.030 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

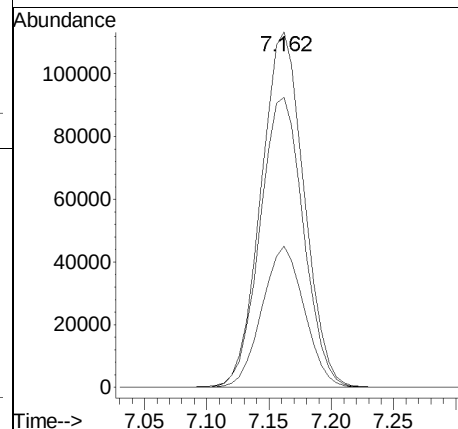
Tgt Ion:	49	84	Ratio	100	72.8	Resp:	162143	Lower	Upper
Ion	49	84	Ratio	100	72.8	Resp:	162143	Lower	Upper
								54.6	81.8

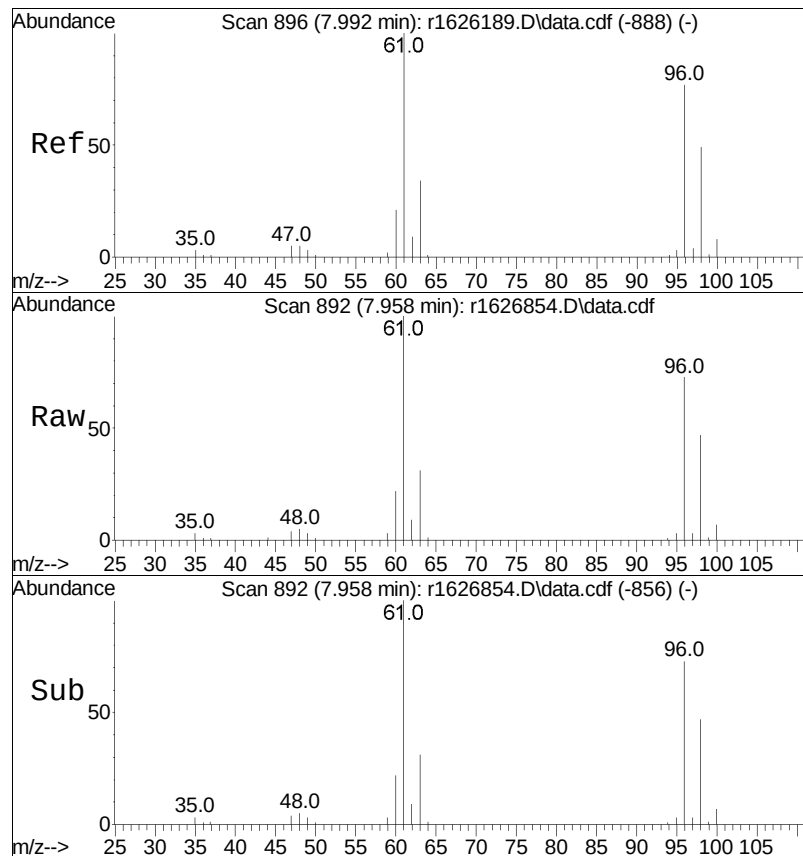




#31
 Freon 113
 Concen: 7.59 ppbV
 RT: 7.162 min Scan# 780
 Delta R.T. -0.030 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

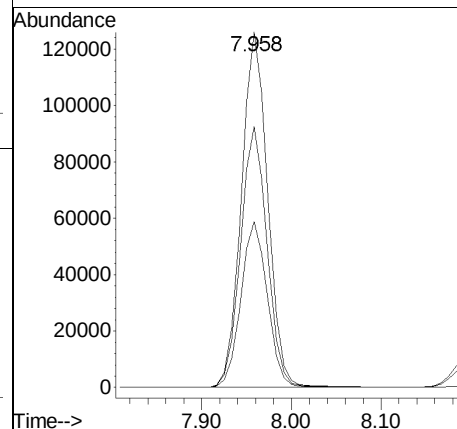
Tgt	Ion:101	Resp:	272423
Ion	Ratio	Lower	Upper
101	100		
85	39.8	29.7	44.5
151	81.7	66.2	99.4

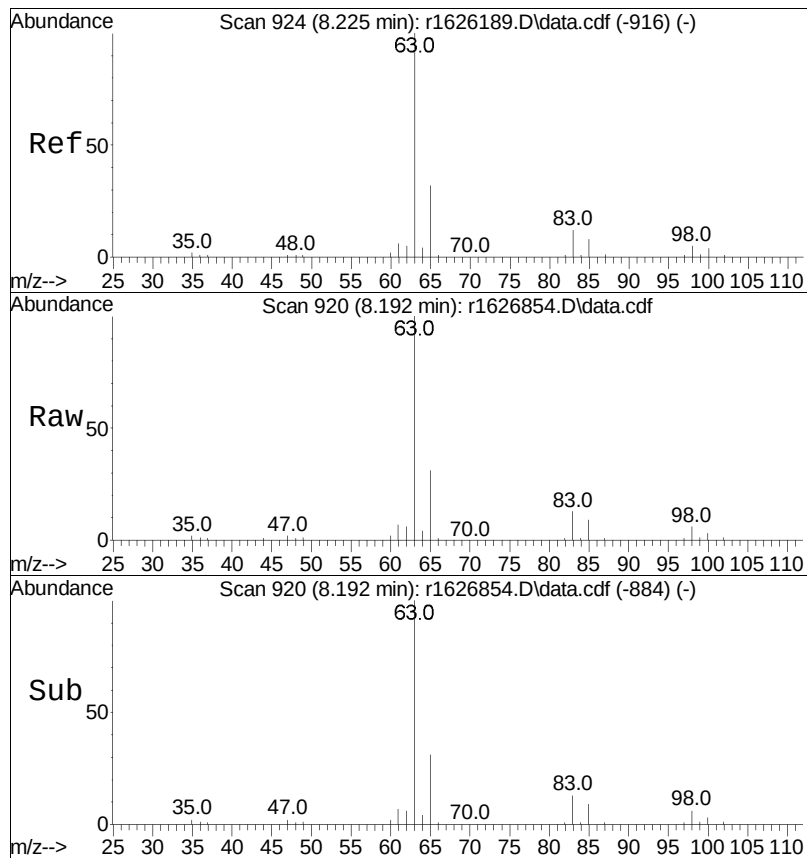




#32
 trans-1,2-dichloroethene
 Concen: 9.93 ppbV
 RT: 7.958 min Scan# 892
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

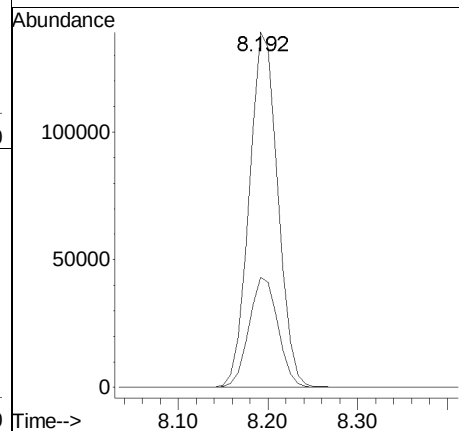
Tgt	Ion: 61	Resp:	256919
Ion	Ratio	Lower	Upper
61	100		
96	73.4	61.8	92.8
98	46.7	39.0	58.4

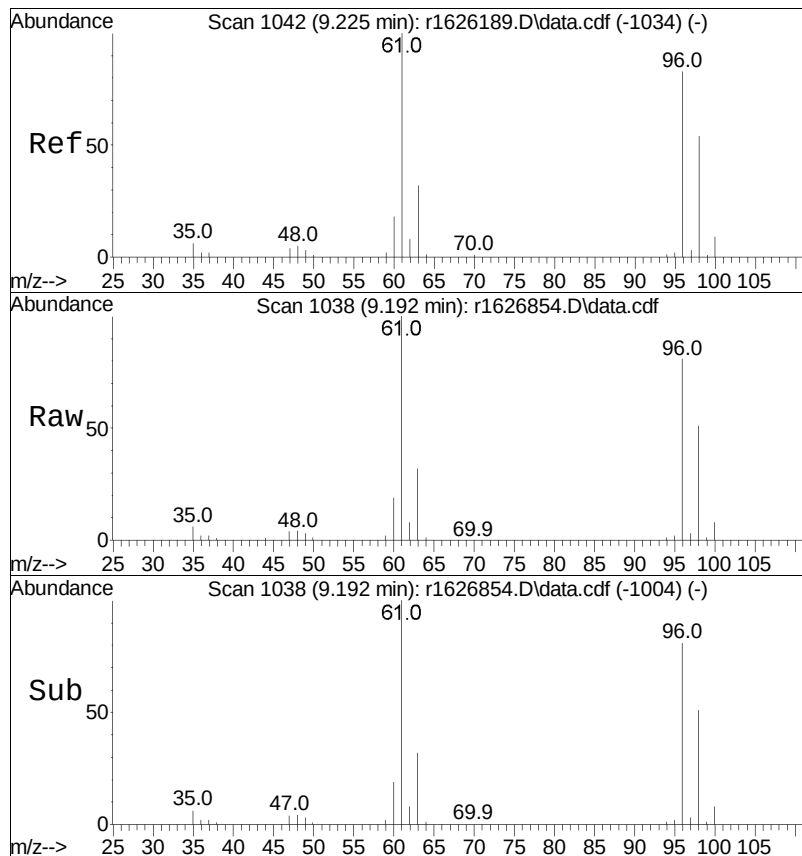




#33
 1,1-dichloroethane
 Concen: 9.74 ppbV
 RT: 8.192 min Scan# 920
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

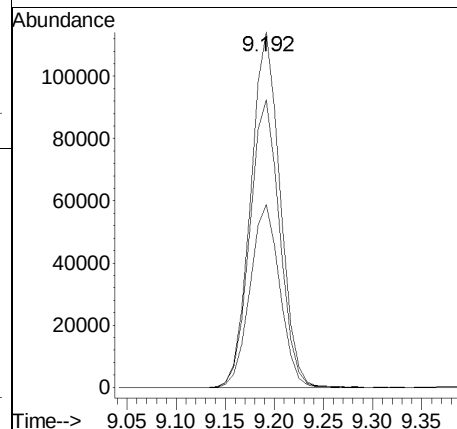
Tgt	Ion	Resp	Lower	Upper
63	100			
65	31.0	25.8	38.6	

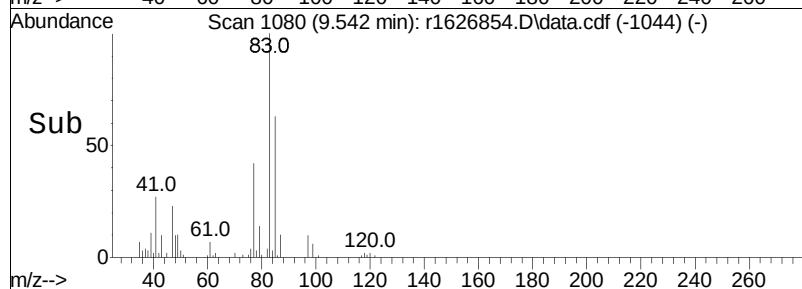
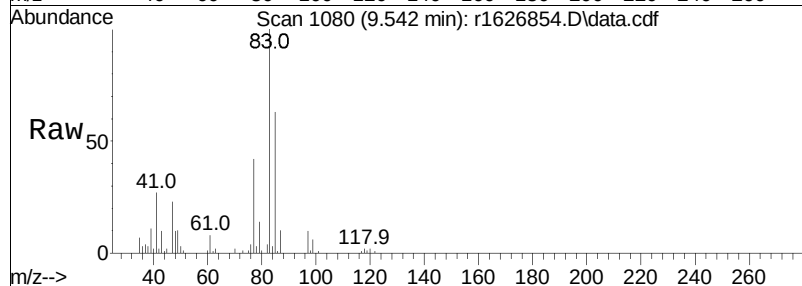
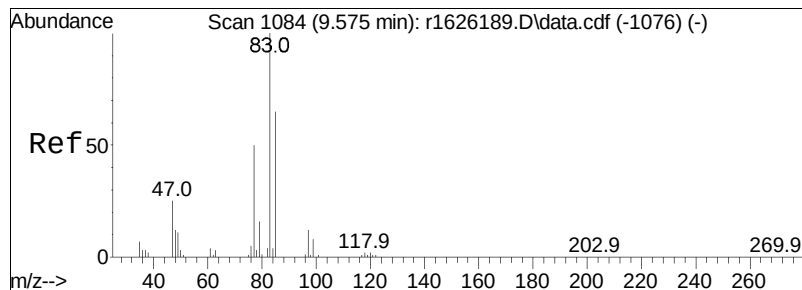




#37
 cis-1,2-dichloroethene
 Concen: 10.33 ppbV
 RT: 9.192 min Scan# 1038
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

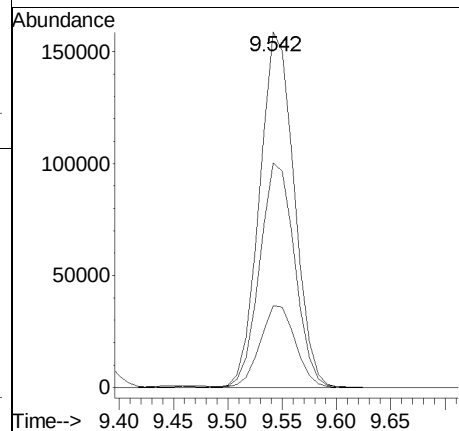
Tgt Ion:	61	Resp:	237496
Ion Ratio	Lower	Upper	
61	100		
96	80.9	66.6	100.0
98	51.4	43.3	64.9

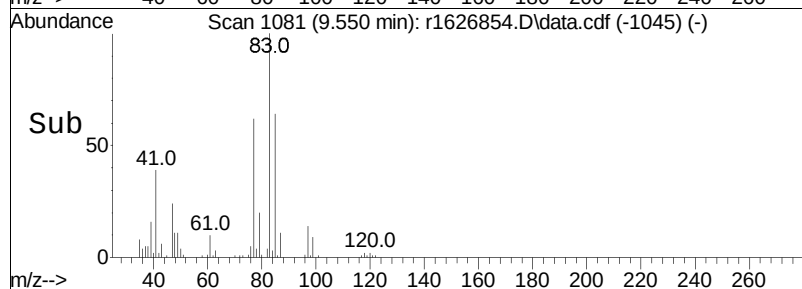
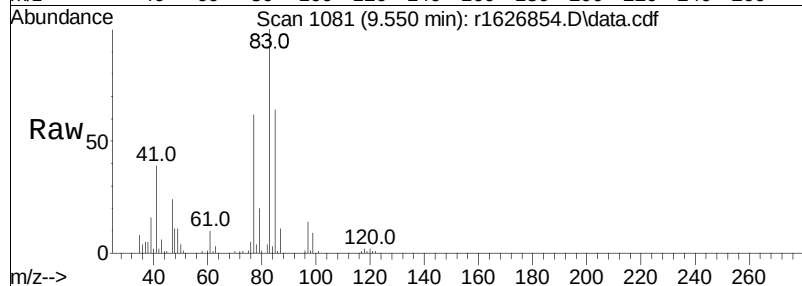
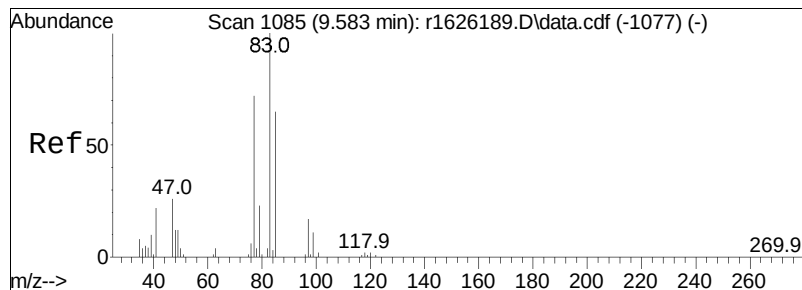




#39
chloroform
Concen: 10.80 ppbV
RT: 9.542 min Scan# 1080
Delta R.T. -0.033 min
Lab File: r1626854.D
Acq: 6 Oct 2021 12:31 PM

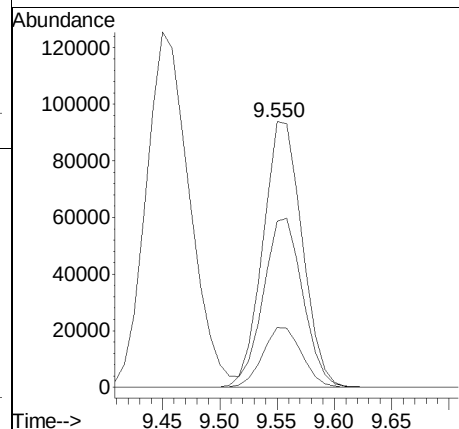
Tgt	Ion	Ratio	Resp	Lower	Upper
83	100		351435		
85	63.2	52.3		78.5	
47	23.0	20.6		31.0	

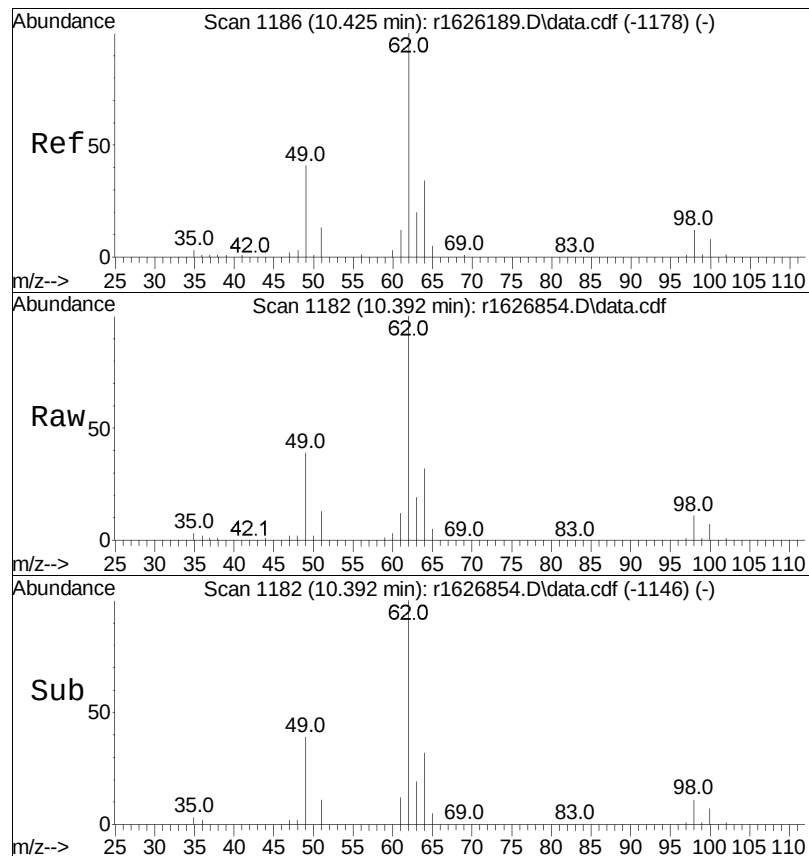




#41
 2,2-dichloropropane
 Concen: 9.90 ppbV
 RT: 9.550 min Scan# 1081
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

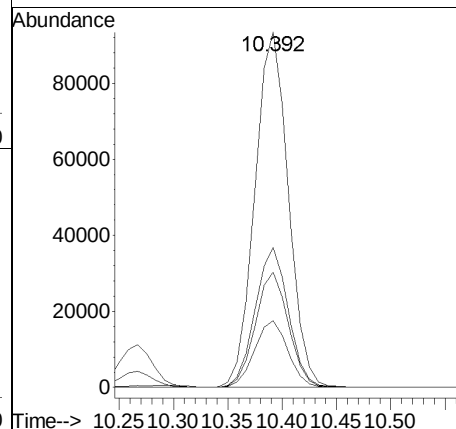
Tgt Ion	Ratio	Resp	Lower	Upper
77	100	224060		
41	62.5		53.7	80.5
97	22.6		18.4	27.6

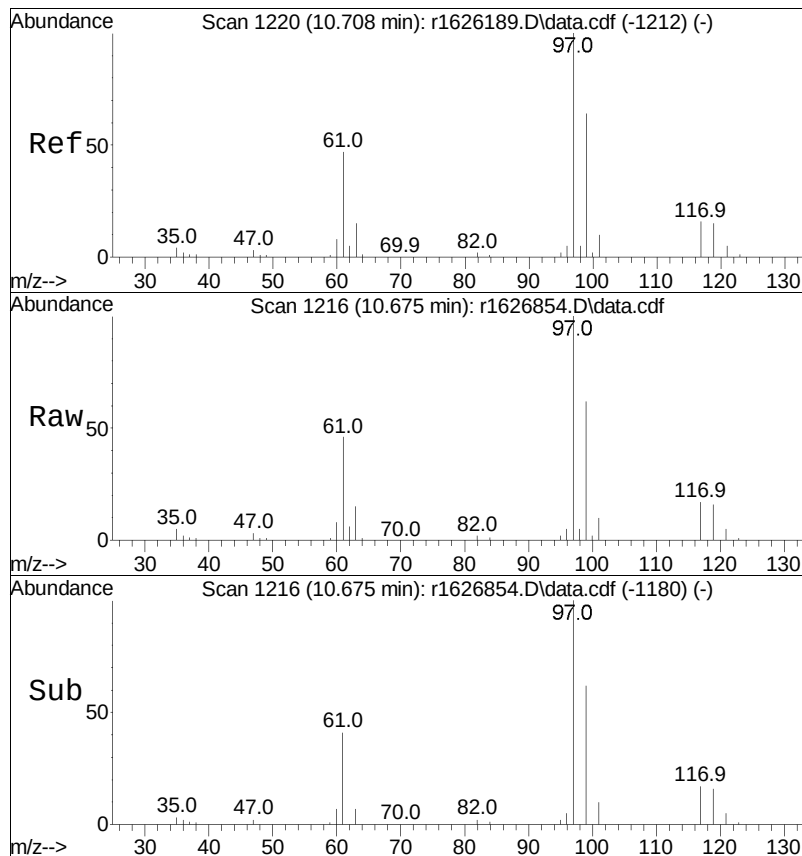




#42
 1,2-dichloroethane
 Concen: 10.35 ppbV
 RT: 10.392 min Scan# 1182
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

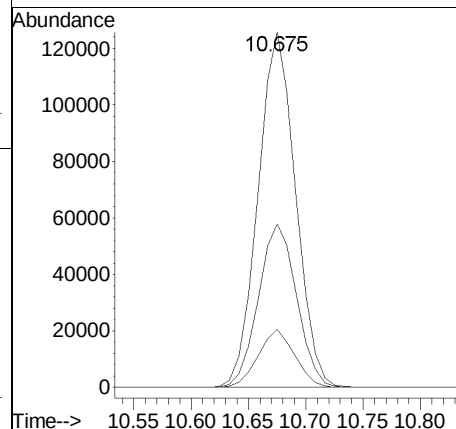
Tgt Ion:	62	Resp:	200188
Ion Ratio	Lower	Upper	
62	100		
64	32.5	27.0	40.4
49	39.4	32.8	49.2
63	18.8	15.8	23.8

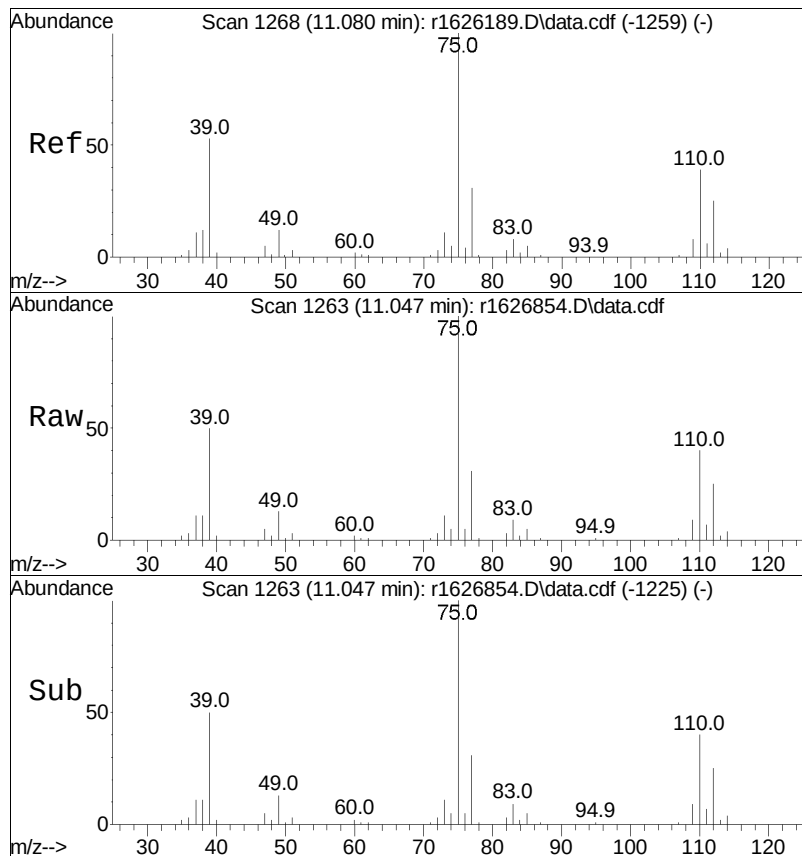




#48
 1,1,1-trichloroethane
 Concen: 10.50 ppbV
 RT: 10.675 min Scan# 1216
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

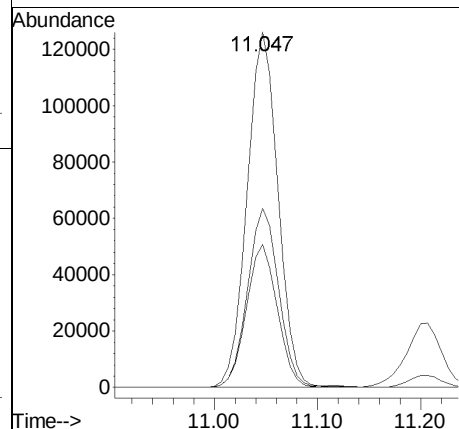
Tgt Ion	Ratio	Lower	Upper
97	100		
61	46.0	37.4	56.0
119	16.3	11.9	17.9

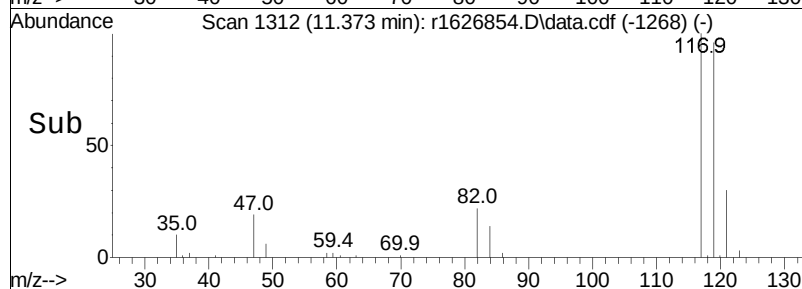
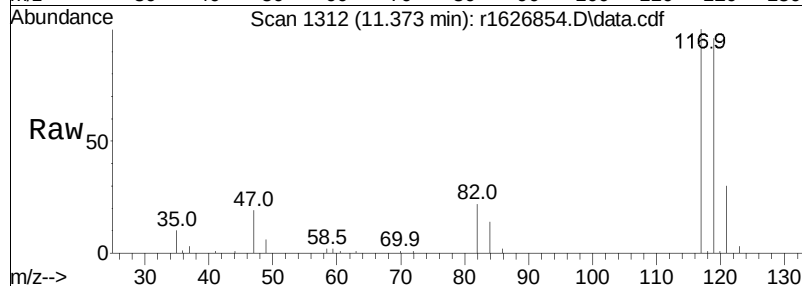
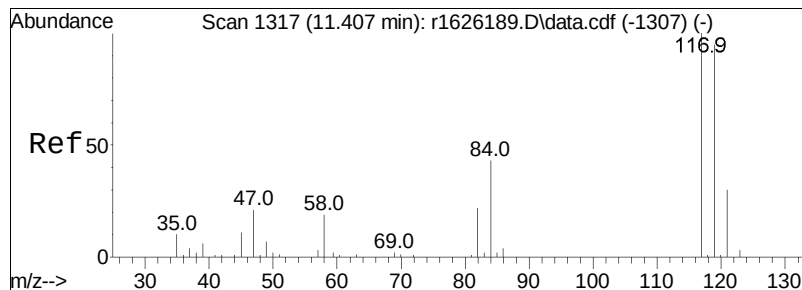




#49
 1,1-dichloropropene
 Concen: 9.90 ppbV
 RT: 11.047 min Scan# 1263
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

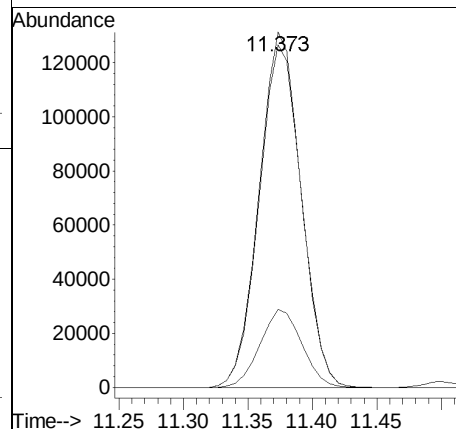
Tgt	Ion	Ratio	Lower	Upper
75	100			
110	40.2	30.8	46.2	
39	50.4	42.0	63.0	

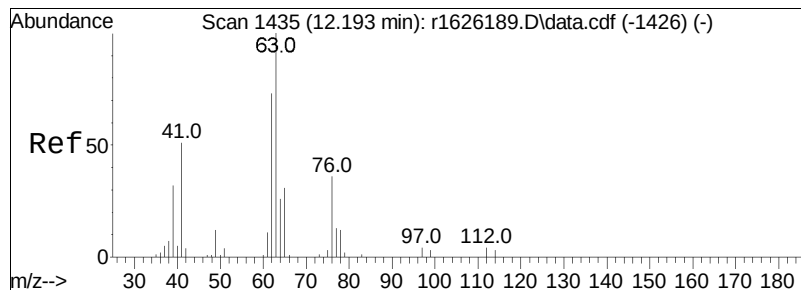




#52
carbon tetrachloride
Concen: 11.07 ppbV
RT: 11.373 min Scan# 1312
Delta R.T. -0.033 min
Lab File: r1626854.D
Acq: 6 Oct 2021 12:31 PM

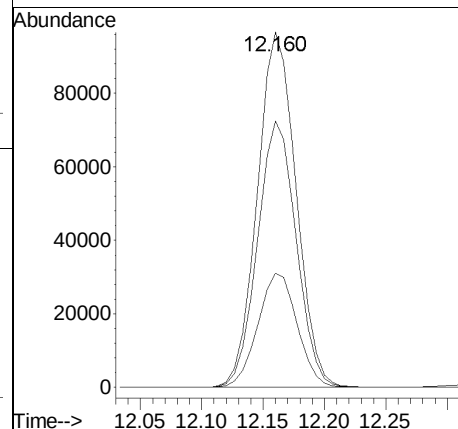
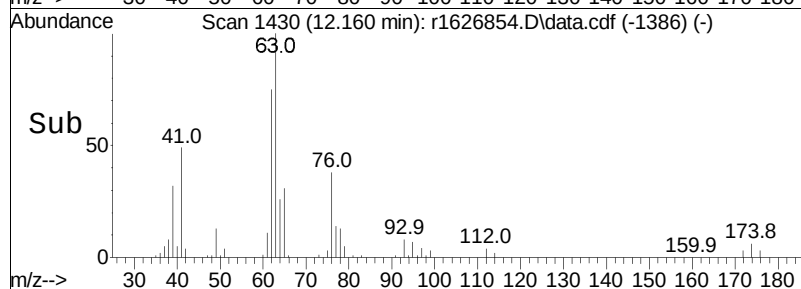
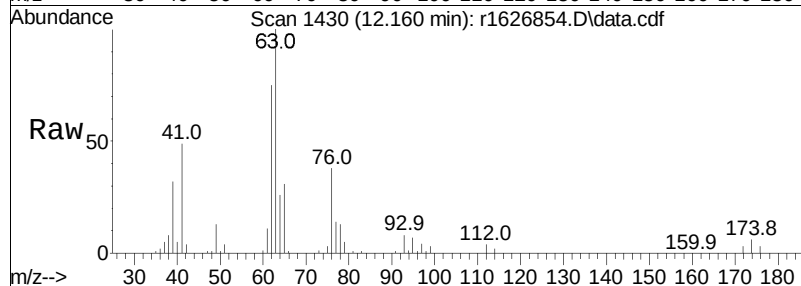
Tgt Ion	Ratio	Resp	Lower	Upper
117	100	296079		
119	96.4		76.0	114.0
82	22.0		17.9	26.9

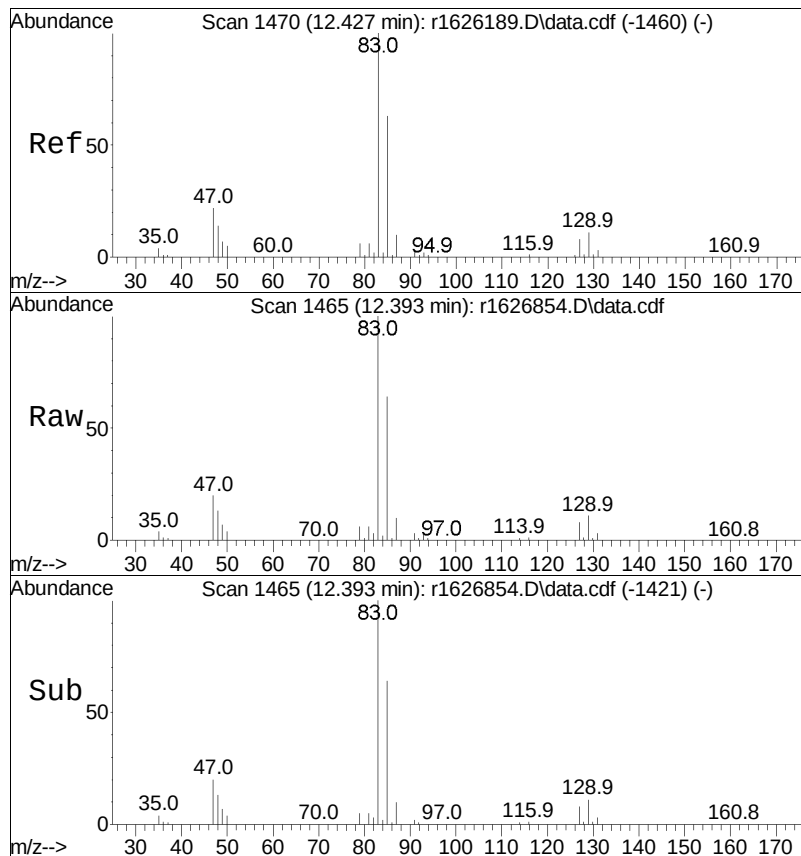




#56
 1,2-dichloropropane
 Concen: 9.66 ppbV
 RT: 12.160 min Scan# 1430
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

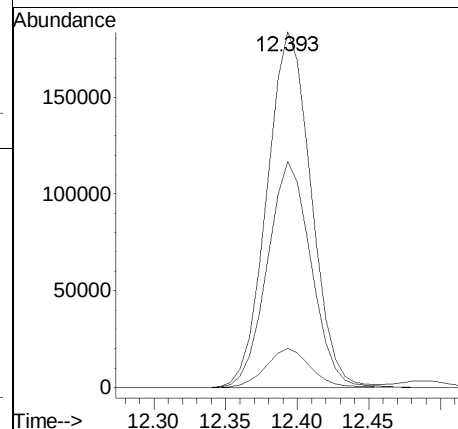
Tgt Ion	Ratio	Lower	Upper
63	100		
62	75.0	58.3	87.5
39	32.1	25.5	38.3

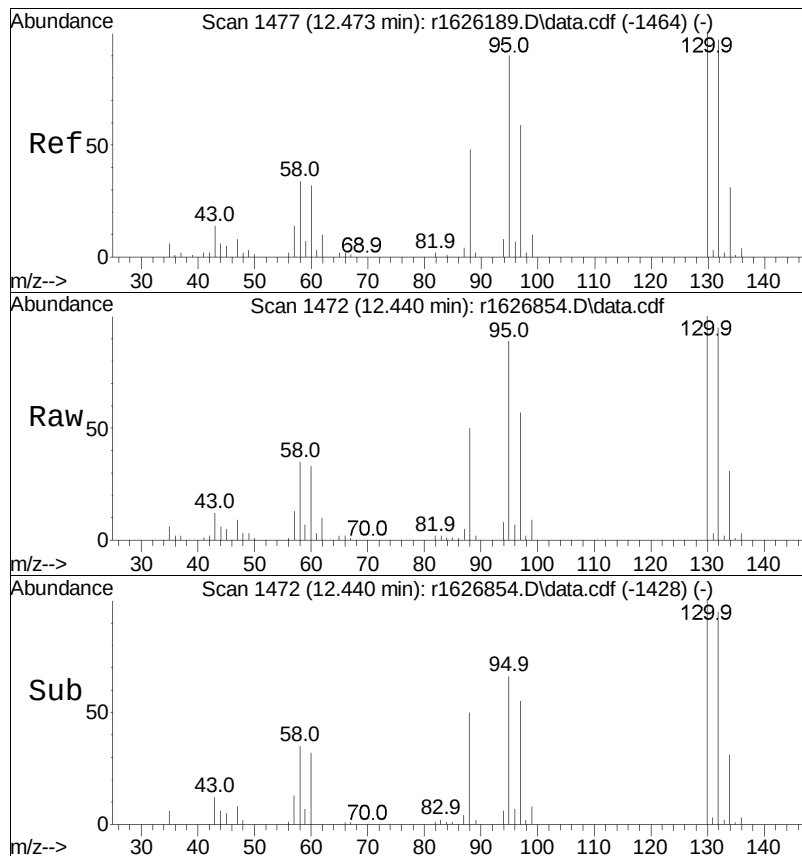




#57
bromodichloromethane
Concen: 11.36 ppbV
RT: 12.393 min Scan# 1465
Delta R.T. -0.033 min
Lab File: r1626854.D
Acq: 6 Oct 2021 12:31 PM

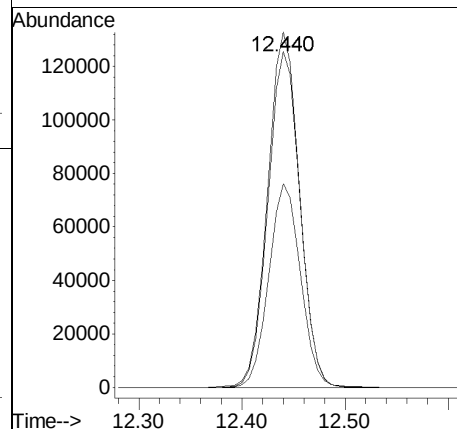
Tgt	Ion: 83	Resp:	393631
Ion	Ratio	Lower	Upper
83	100		
85	63.5	50.5	75.7
129	11.0	8.8	13.2

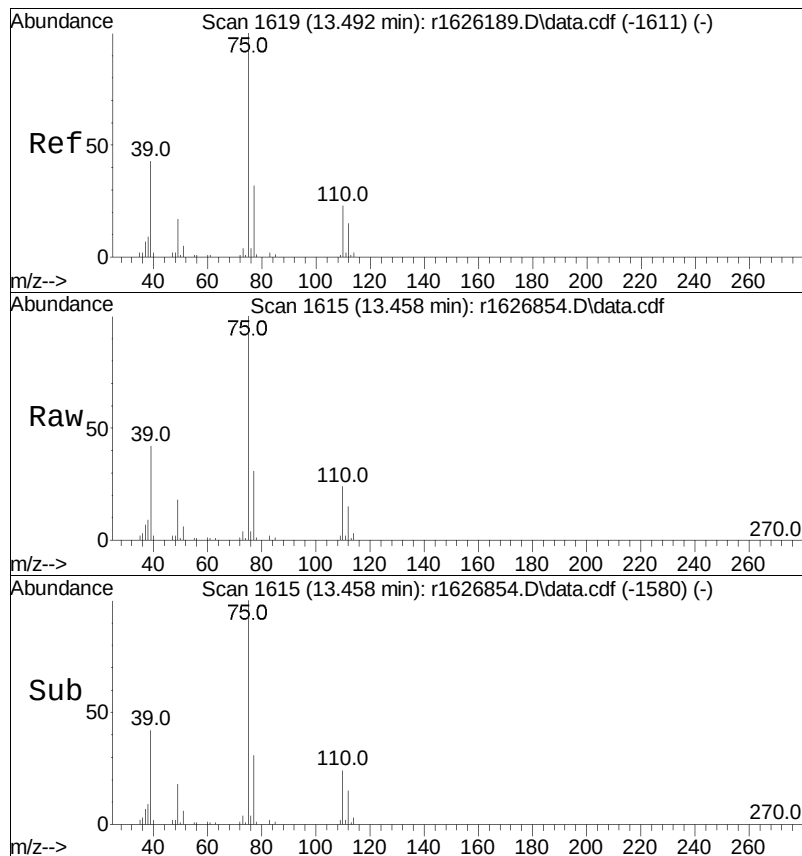




#59
trichloroethene
Concen: 10.36 ppbV
RT: 12.440 min Scan# 1472
Delta R.T. -0.033 min
Lab File: r1626854.D
Acq: 6 Oct 2021 12:31 PM

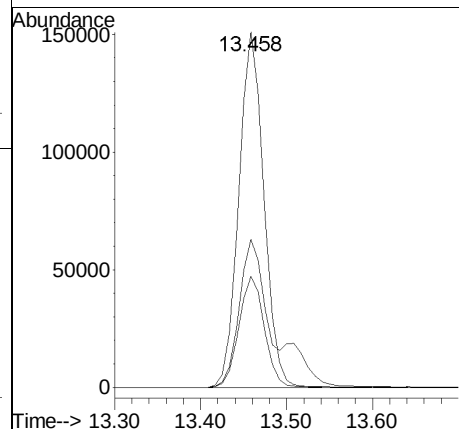
Tgt Ion:	130	Resp:	285384
Ion Ratio	Lower	Upper	
130	100		
132	94.5	77.5	116.3
97	57.3	47.3	70.9

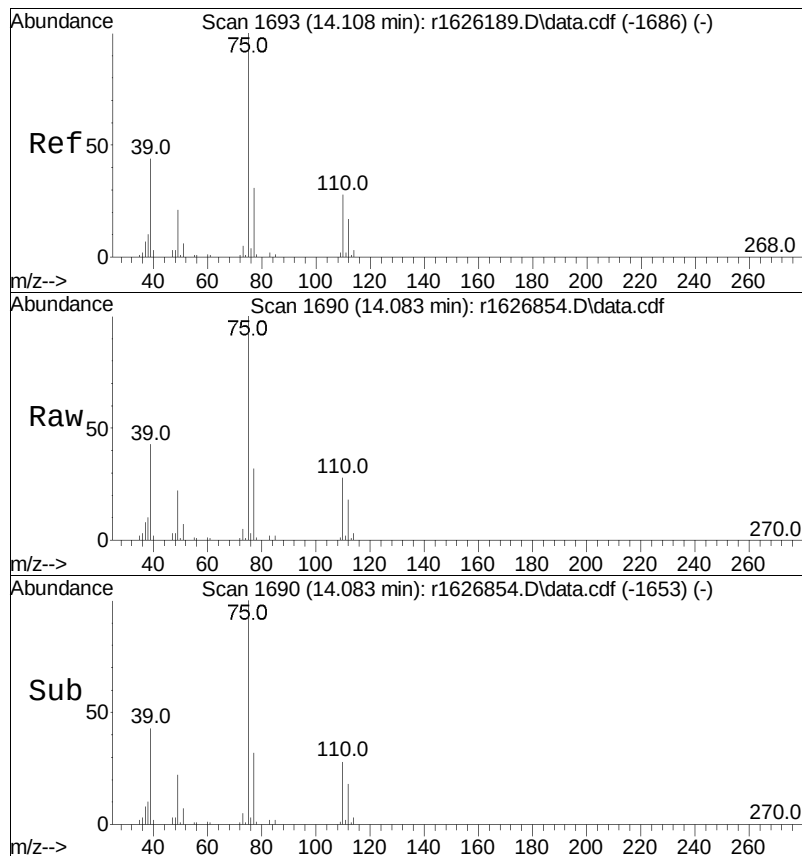




#63
 cis-1,3-dichloropropene
 Concen: 10.88 ppbV
 RT: 13.458 min Scan# 1615
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

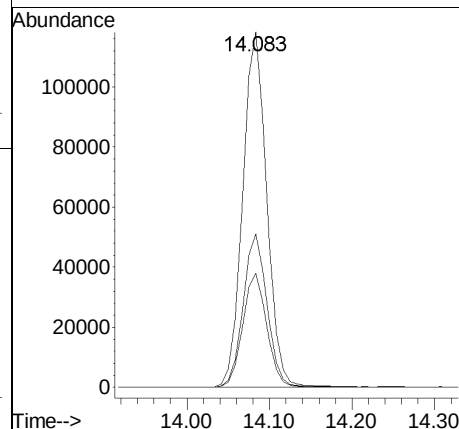
Tgt Ion	Ratio	Lower	Upper
75	100		
39	41.7	34.6	51.8
77	31.2	25.2	37.8

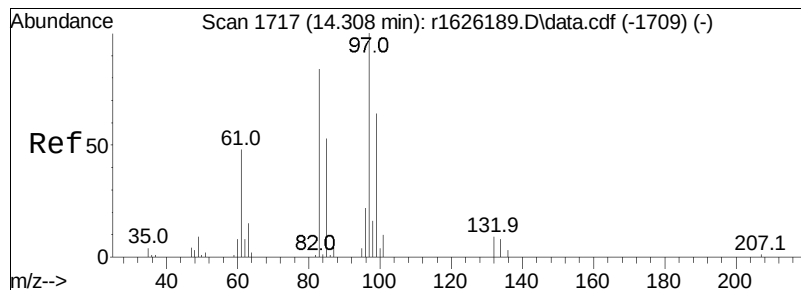




#65
 trans-1,3-dichloropropene
 Concen: 9.53 ppbV
 RT: 14.083 min Scan# 1690
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

Tgt Ion:	75	Resp:	239910
Ion Ratio	Lower	Upper	
75	100		
77	32.1	25.1	37.7
39	43.2	35.0	52.4





#66

1,1,2-trichloroethane

Concen: 10.10 ppbV

RT: 14.275 min Scan# 1713

Delta R.T. -0.033 min

Lab File: r1626854.D

Acq: 6 Oct 2021 12:31 PM

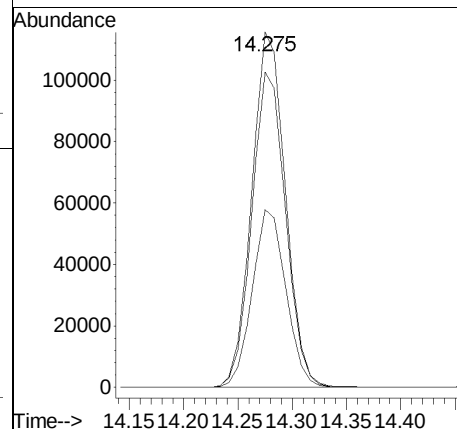
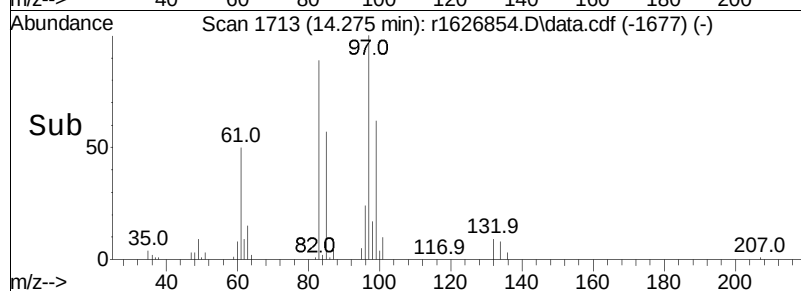
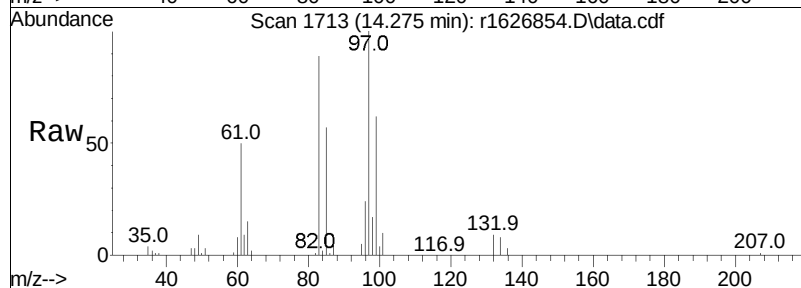
Tgt Ion: 97 Resp: 249292

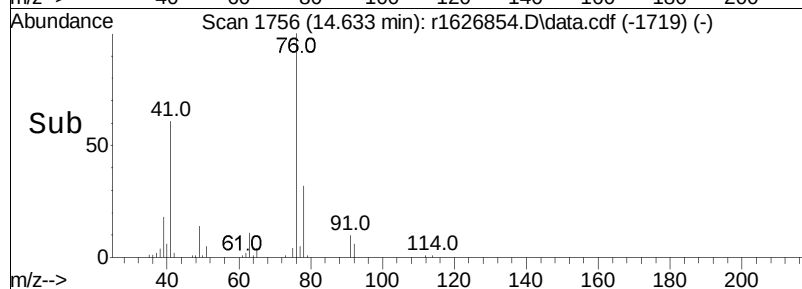
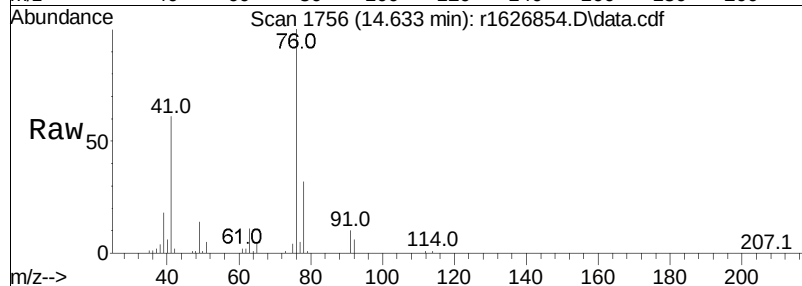
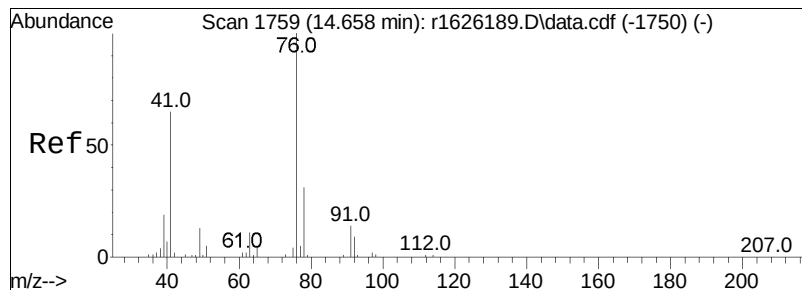
Ion Ratio Lower Upper

97 100

83 88.7 66.8 100.2

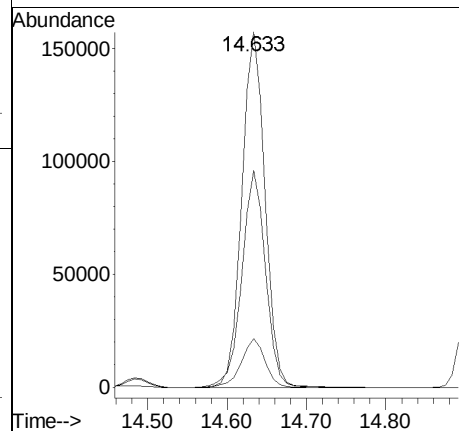
61 50.0 38.2 57.4

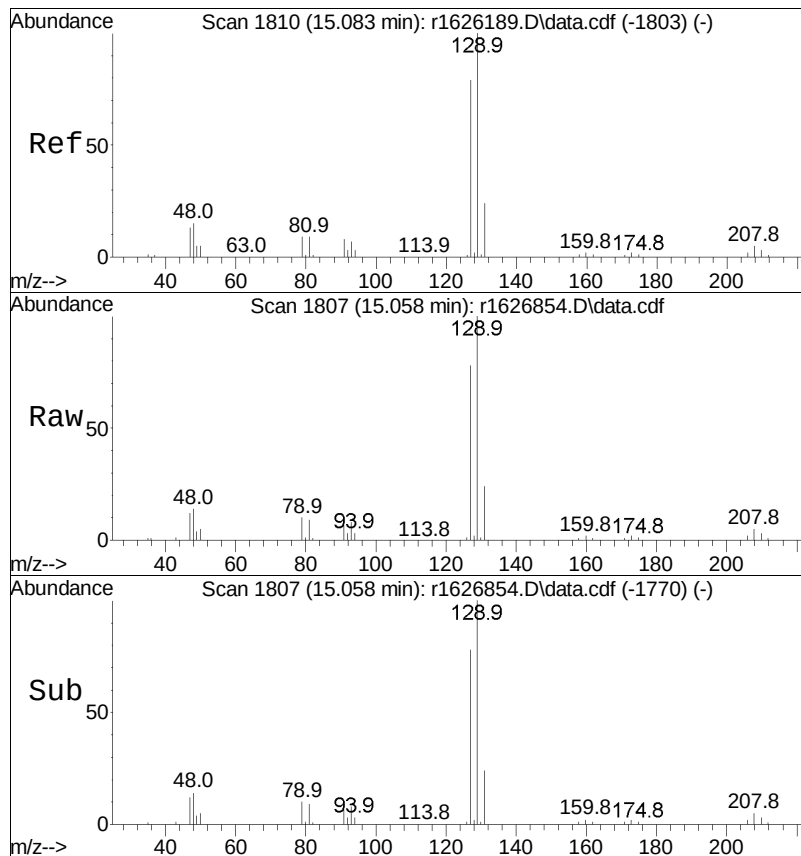




#71
 1,3-dichloropropane
 Concen: 9.43 ppbV
 RT: 14.633 min Scan# 1756
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

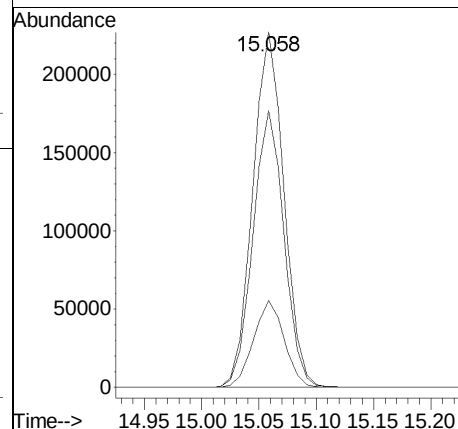
Tgt Ion	Ratio	Lower	Upper
76	100		
41	61.0	52.0	78.0
49	13.7	10.3	15.5

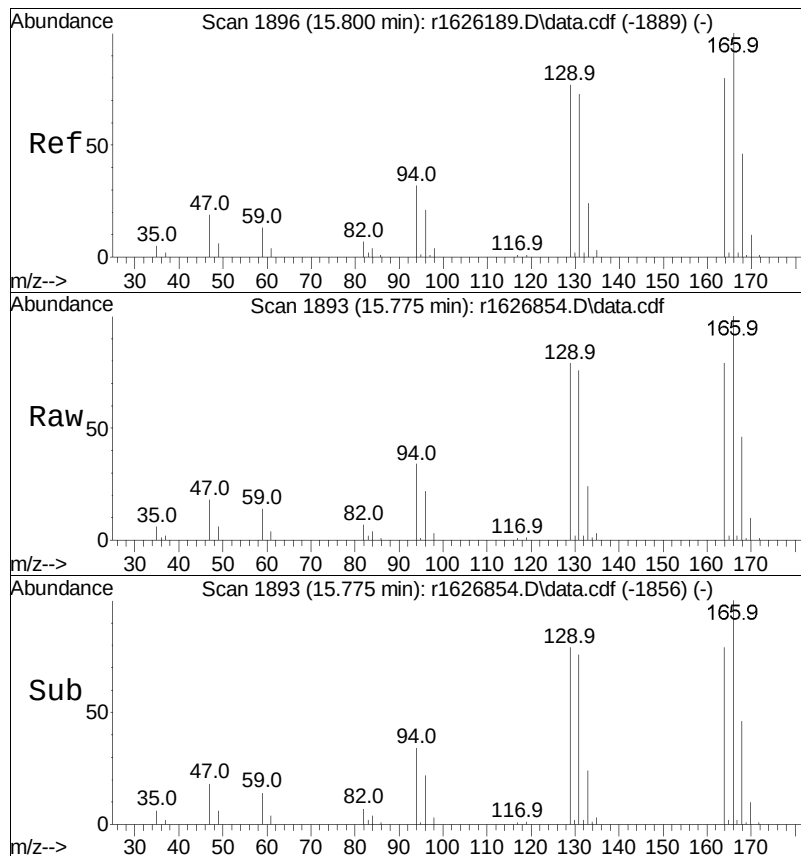




#74
 dibromochloromethane
 Concen: 11.80 ppbV
 RT: 15.058 min Scan# 1807
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

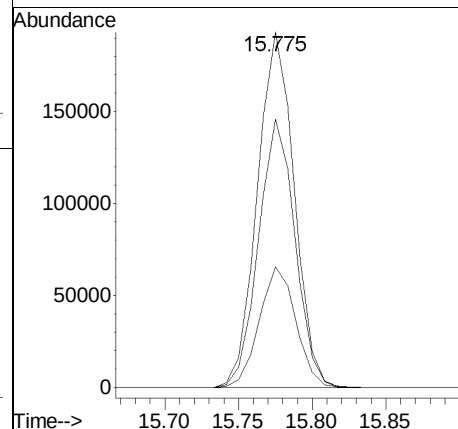
Tgt Ion	Ratio	Resp	Lower	Upper
129	100	428839		
127	77.9		63.1	94.7
131	24.4		19.2	28.8

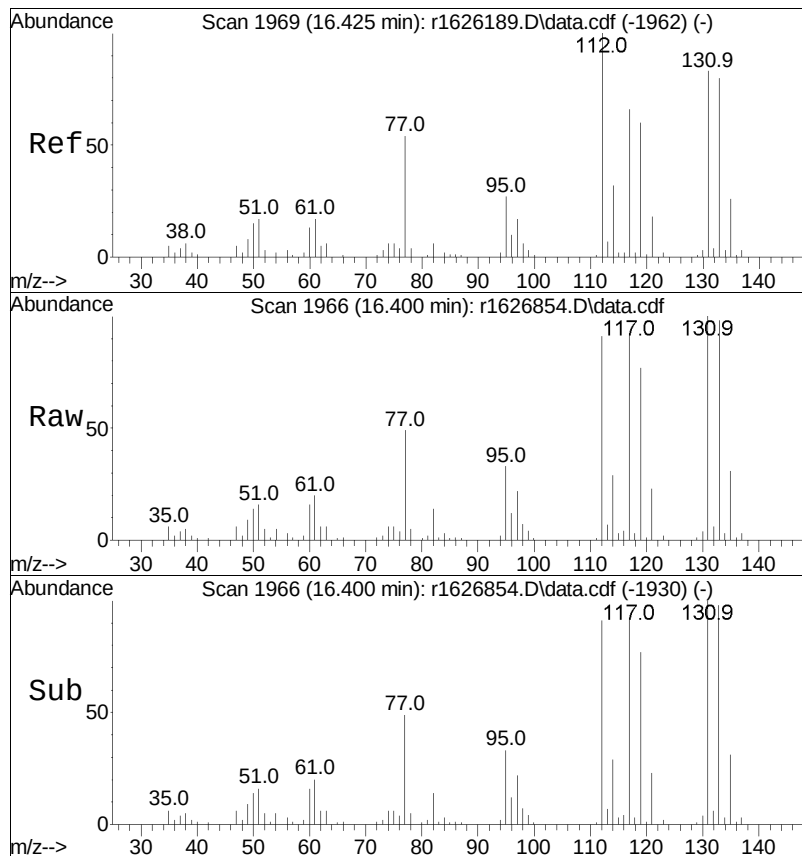




#78
 tetrachloroethene
 Concen: 10.28 ppbV
 RT: 15.775 min Scan# 1893
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

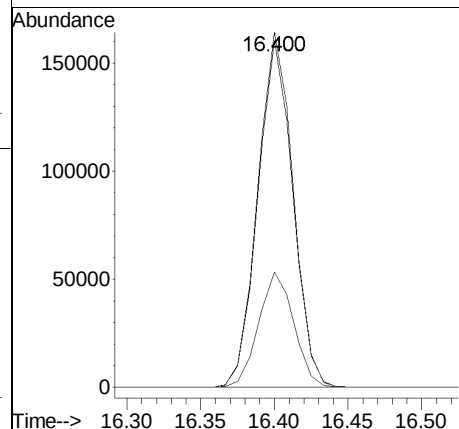
Tgt	Ion:166	Resp:	335292
Ion	Ratio	Lower	Upper
166	100		
131	75.6	58.7	88.1
94	33.9	25.9	38.9

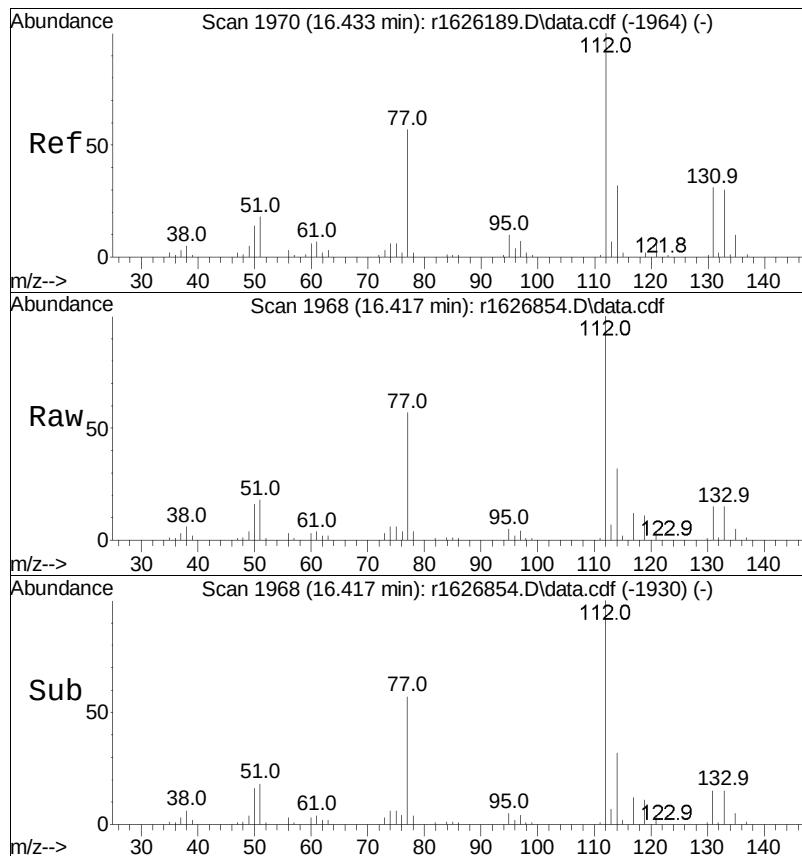




#79
 1,1,1,2-tetrachloroethane
 Concen: 10.24 ppbV
 RT: 16.400 min Scan# 1966
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

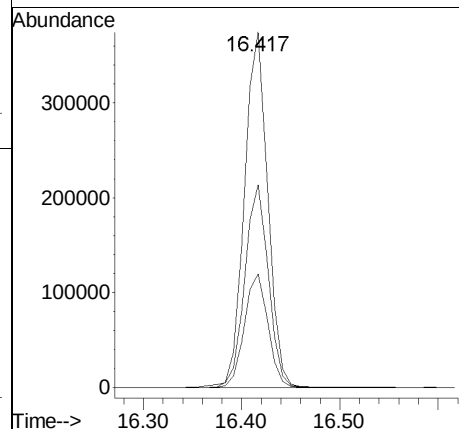
Tgt Ion:	131	Resp:	273516
Ion Ratio	Lower	Upper	
131	100		
133	97.7	77.1	115.7
95	32.5	26.2	39.2

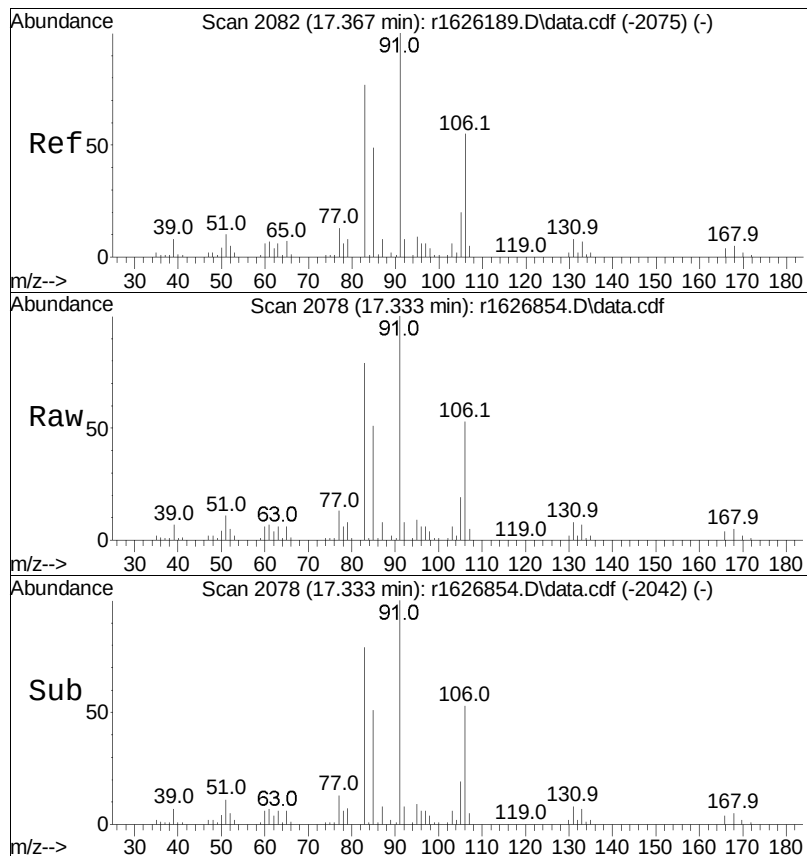




#80
chlorobenzene
Concen: 10.32 ppbV
RT: 16.417 min Scan# 1968
Delta R.T. -0.017 min
Lab File: r1626854.D
Acq: 6 Oct 2021 12:31 PM

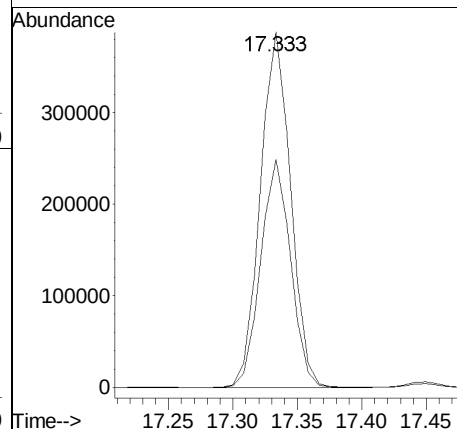
Tgt	Ion	Ratio	Lower	Upper
112	100			
114	32.0	25.5	38.3	
77	57.0	45.7	68.5	

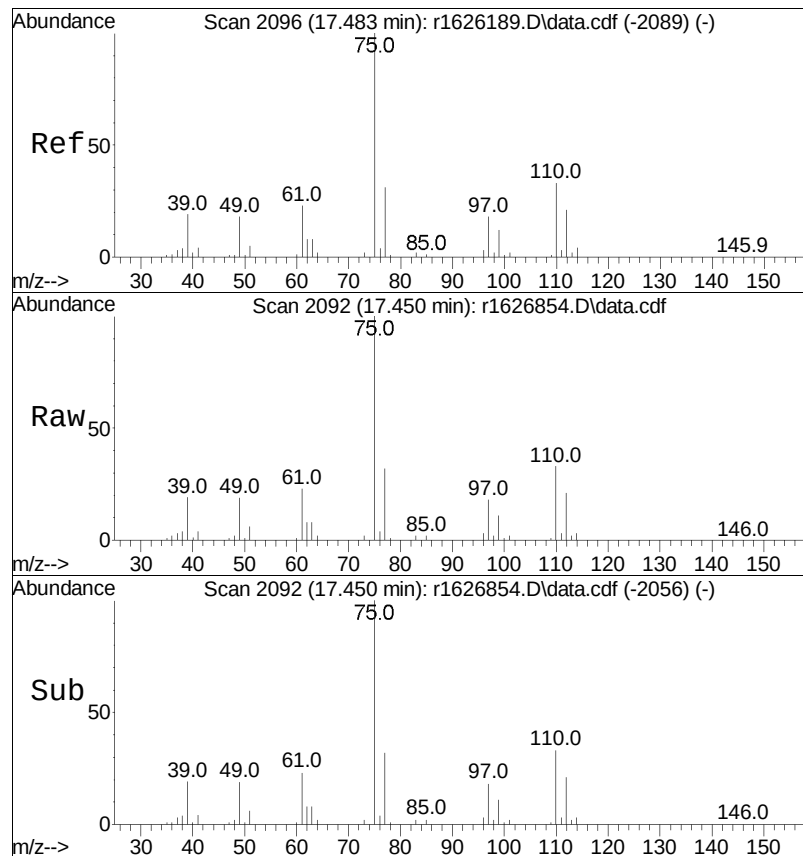




#86
 1,1,2,2-tetrachloroethane
 Concen: 11.27 ppbV
 RT: 17.333 min Scan# 2078
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

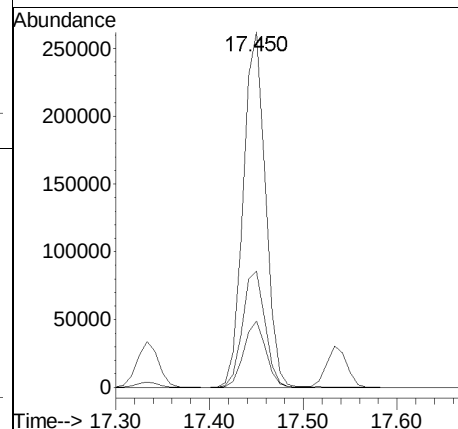
Tgt Ion:	83	Resp:	633265
Ion Ratio	Lower	Upper	
83	100		
85	64.2	50.3	75.5

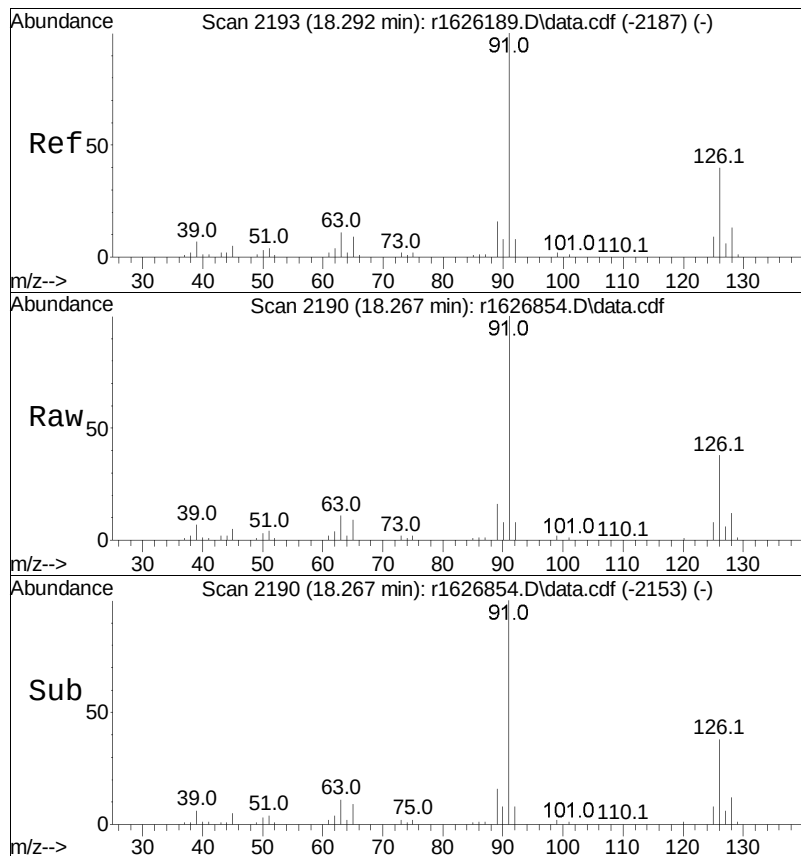




#88
 1,2,3-trichloropropane
 Concen: 10.05 ppbV
 RT: 17.450 min Scan# 2092
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

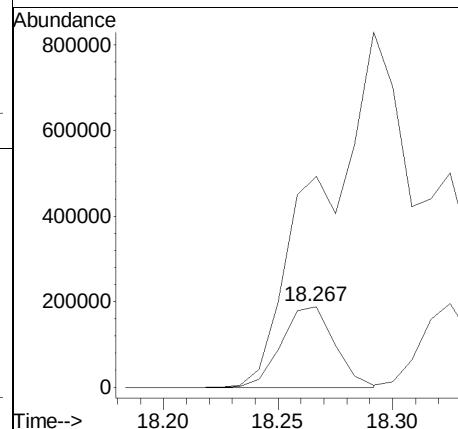
Tgt	Ion: 75	Resp:	431986
Ion	Ratio	Lower	Upper
75	100		
110	32.7	26.2	39.4
39	18.7	15.4	23.0

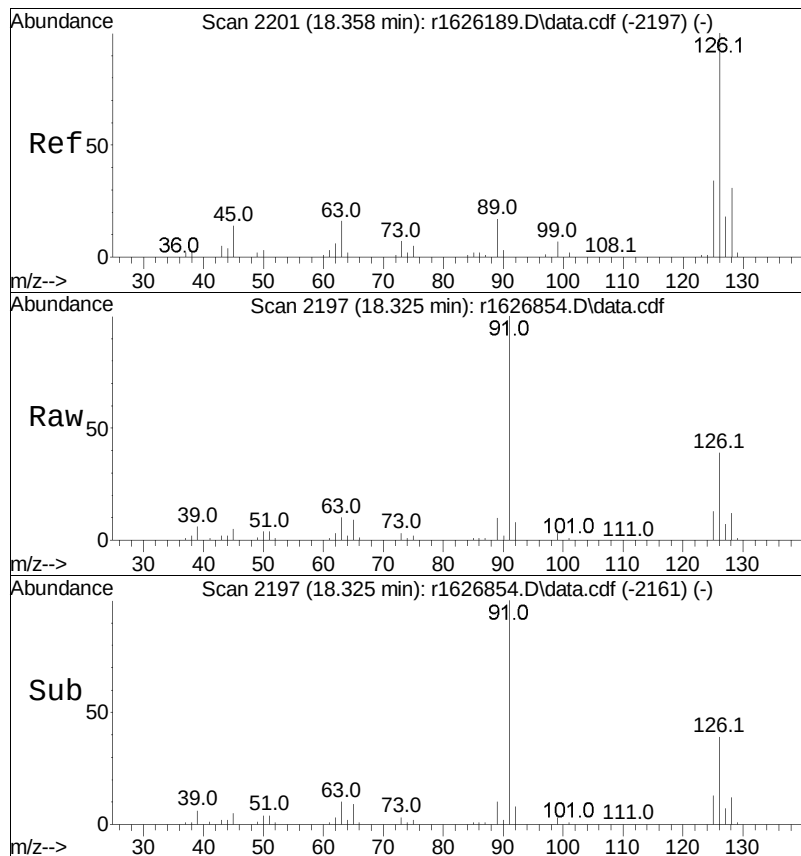




#93
 2-chlorotoluene
 Concen: 10.36 ppbV
 RT: 18.267 min Scan# 2190
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

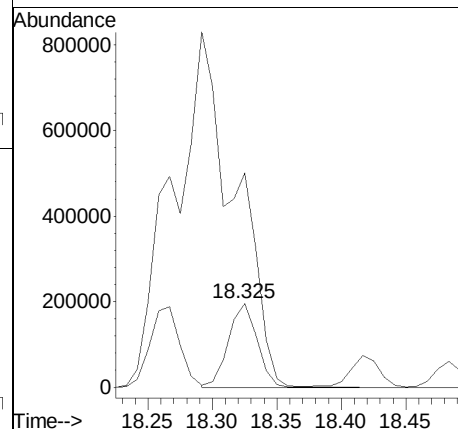
Tgt Ion	126	91	Ratio	Lower	Upper
Resp:	303573				
Ion Ratio	100	261.5		199.8	299.8

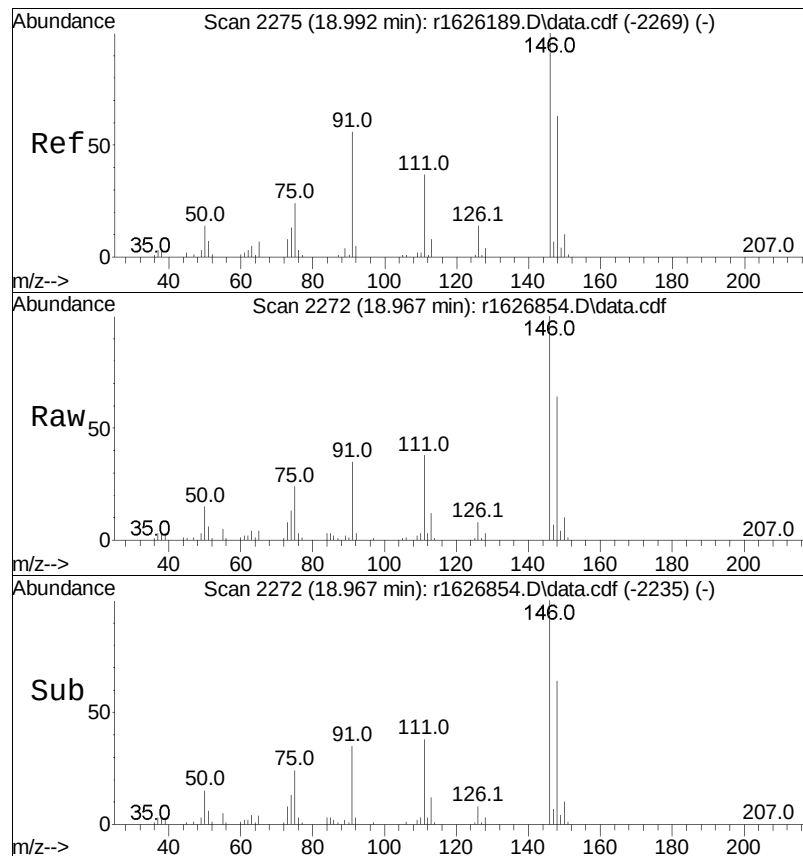




#95
 4-chlorotoluene
 Concen: 10.54 ppbV
 RT: 18.325 min Scan# 2197
 Delta R.T. -0.033 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

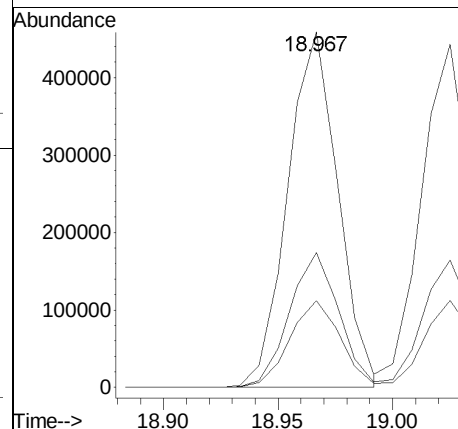
Tgt Ion	Ratio	Lower	Upper
126	100		
91	255.6	204.6	307.0

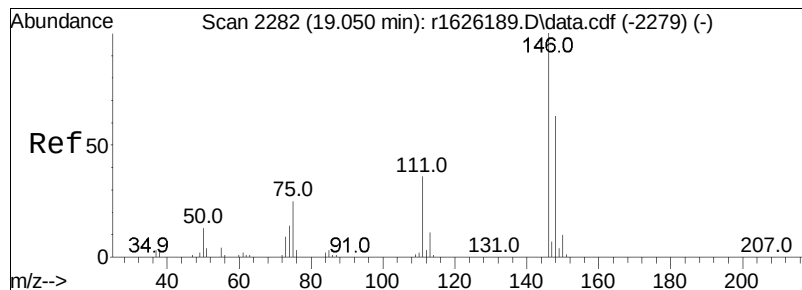




#102
 1,3-dichlorobenzene
 Concen: 11.21 ppbV
 RT: 18.967 min Scan# 2272
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

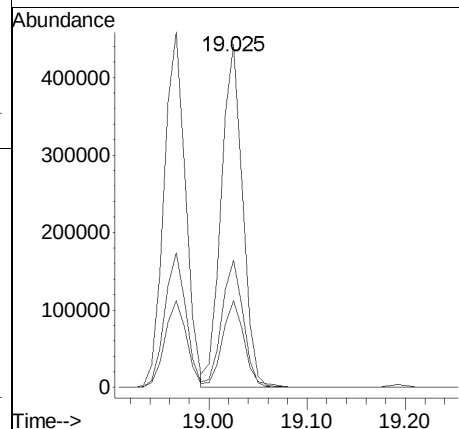
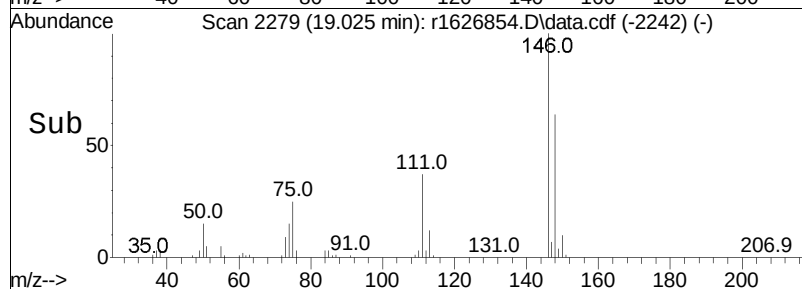
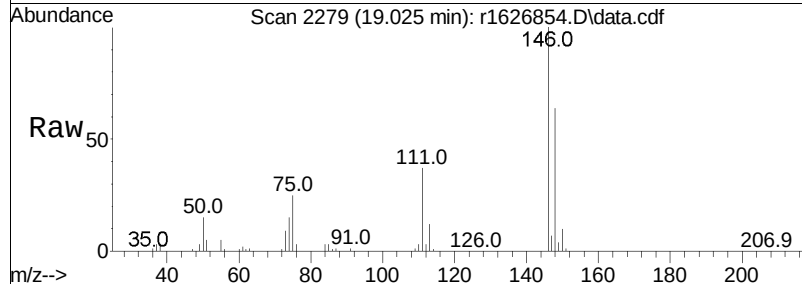
Tgt Ion	Ratio	Resp	Lower	Upper
146	100	698474		
111	37.9		29.8	44.8
75	24.4		19.4	29.0

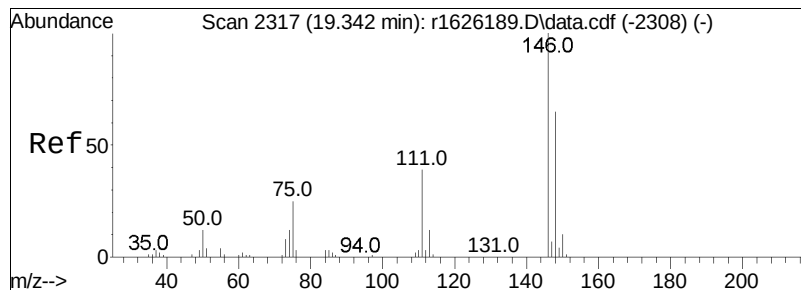




#103
 1,4-dichlorobenzene
 Concen: 11.13 ppbV
 RT: 19.025 min Scan# 2279
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

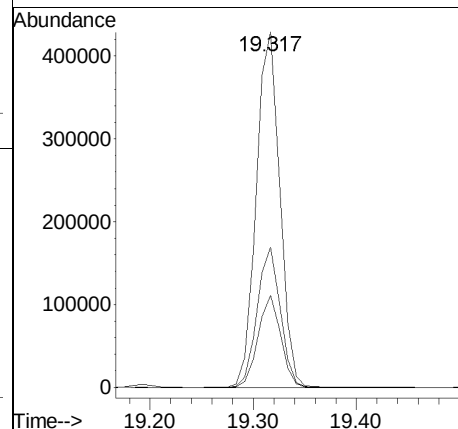
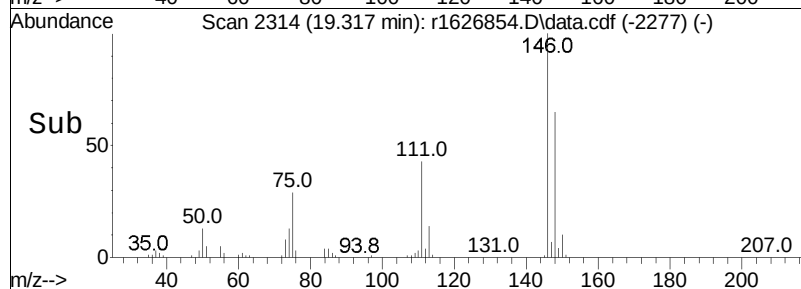
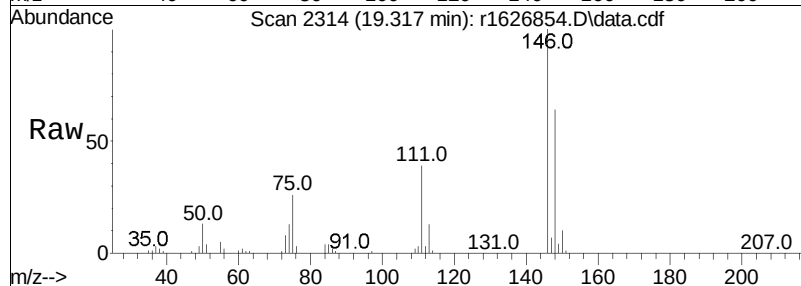
Tgt Ion	Ratio	Lower	Upper
146	100		
111	37.1	28.6	43.0
75	25.3	19.7	29.5

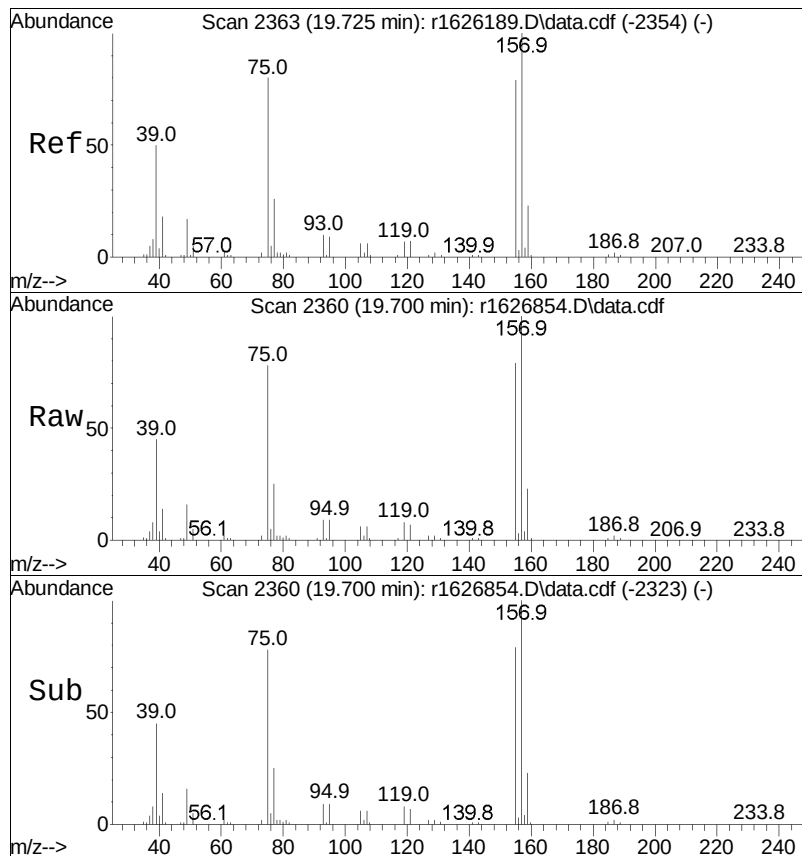




#107
 1,2-dichlorobenzene
 Concen: 11.13 ppbV
 RT: 19.317 min Scan# 2314
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

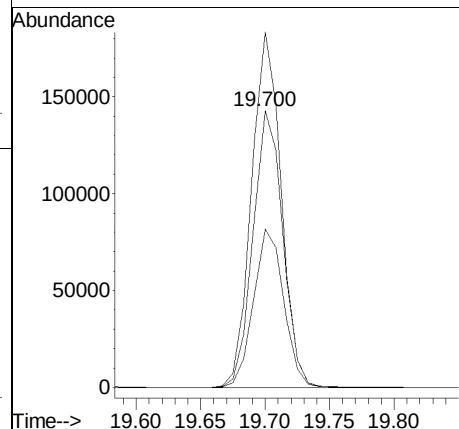
Tgt Ion:	146	Resp:	681745
Ion Ratio	Lower	Upper	
146	100		
111	39.5	30.8	46.2
75	26.0	20.0	30.0

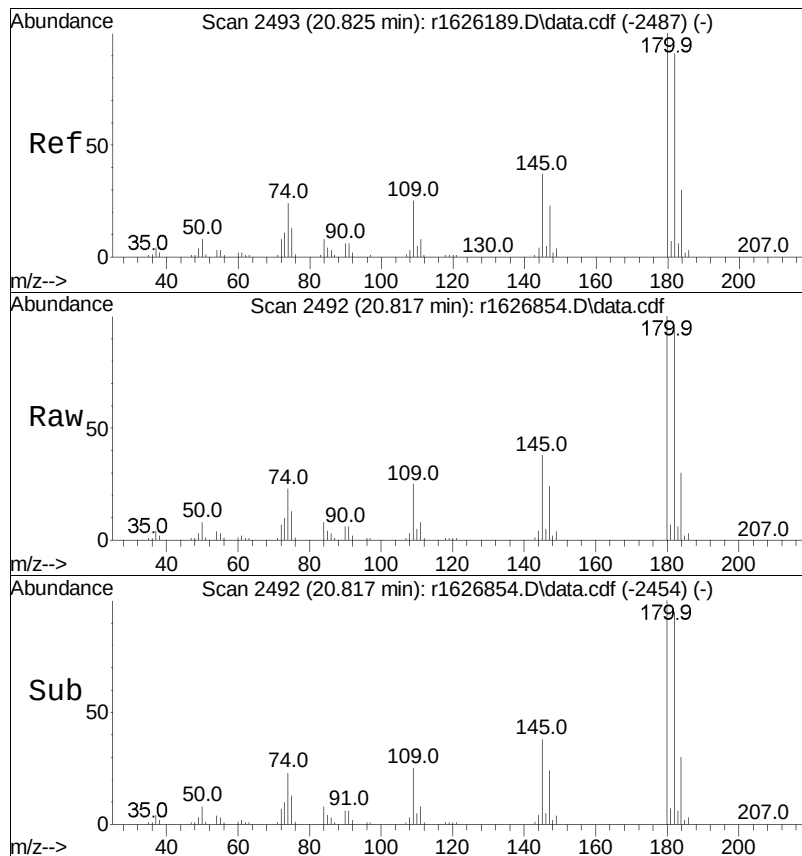




#111
 1,2-dibromo-3-chloropropane
 Concen: 10.92 ppbV
 RT: 19.700 min Scan# 2360
 Delta R.T. -0.025 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

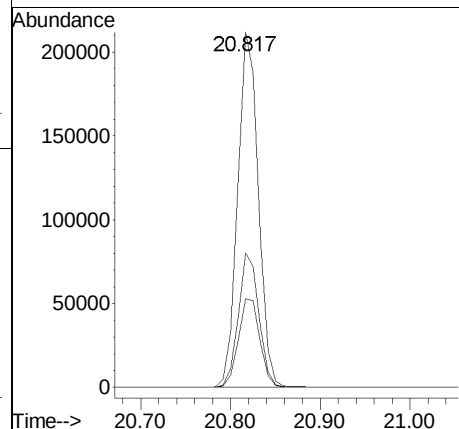
Tgt Ion	Ratio	Resp	Lower	Upper
75	100	229766		
157	128.3		99.5	149.3
39	57.1		50.0	75.0

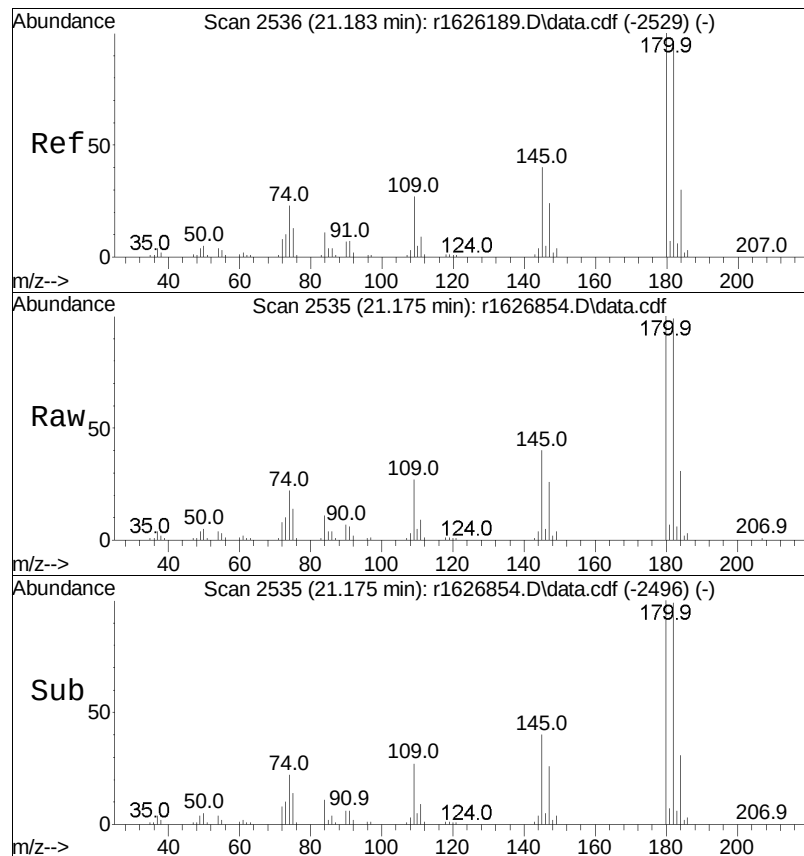




#115
 1,2,4-trichlorobenzene
 Concen: 11.57 ppbV
 RT: 20.817 min Scan# 2492
 Delta R.T. -0.008 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

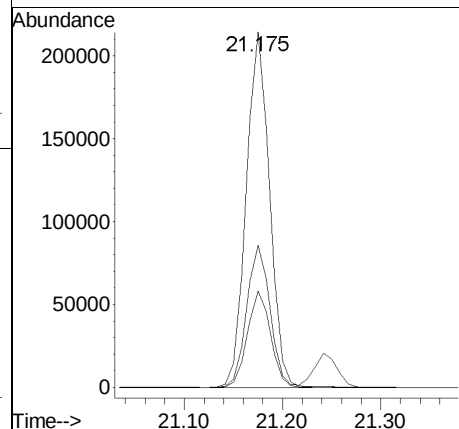
Tgt	Ion:180	Resp:	339700
Ion	Ratio	Lower	Upper
180	100		
145	37.9	29.5	44.3
109	25.0	20.2	30.2

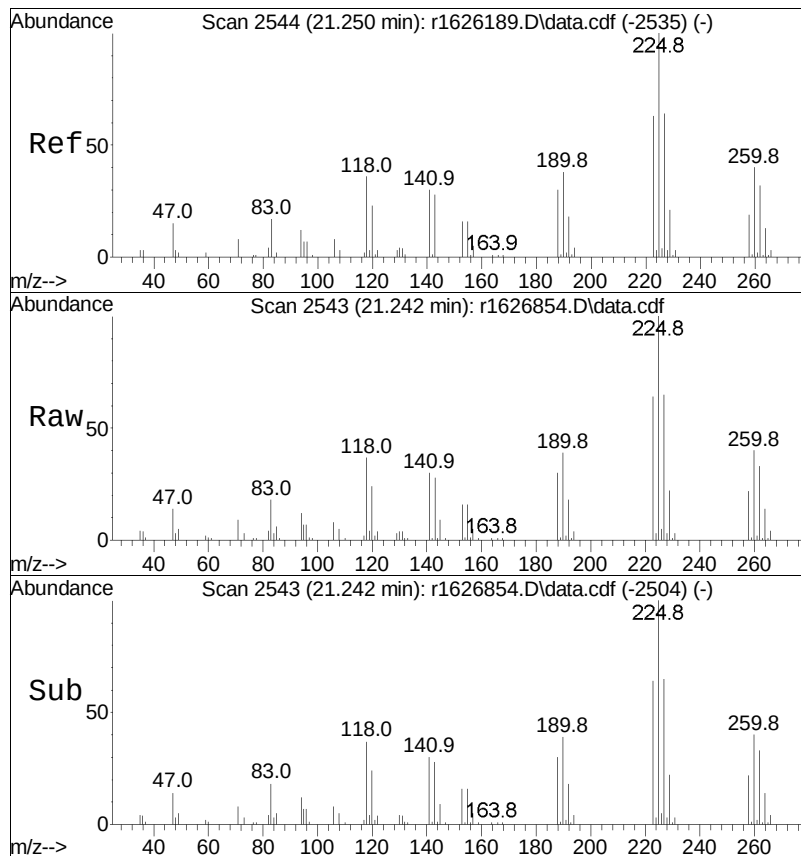




#117
 1,2,3-trichlorobenzene
 Concen: 11.22 ppbV
 RT: 21.175 min Scan# 2535
 Delta R.T. -0.008 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

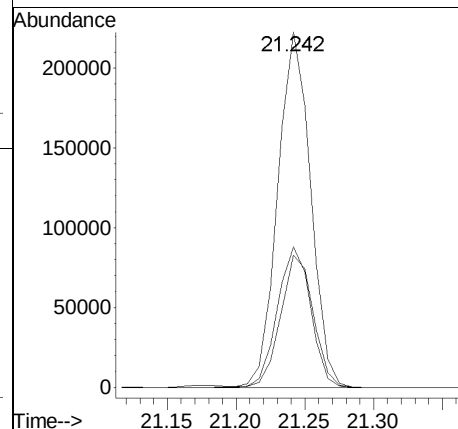
Tgt Ion	Ratio	Lower	Upper
180	100		
145	40.0	31.6	47.4
109	27.1	21.4	32.2





#119
 hexachlorobutadiene
 Concen: 11.57 ppbV
 RT: 21.242 min Scan# 2543
 Delta R.T. -0.008 min
 Lab File: r1626854.D
 Acq: 6 Oct 2021 12:31 PM

Tgt	Ion	Ratio	Resp	Lower	Upper
225	100		368993		
260	39.5	32.2		48.4	
118	37.3	29.4		44.0	



Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626869.D
 Acq On : 7 Oct 2021 12:09 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-5,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:09:57 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : ROSSVILLE - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.383	49	343181	10.000	ppbV	-0.03
Standard Area = 357950			Recovery =		95.87%	
43) 1,4-difluorobenzene	11.660	114	871039	10.000	ppbV	-0.02
Standard Area = 923831			Recovery =		94.29%	
67) chlorobenzene-D5	16.383	54	146027	10.000	ppbV	-0.02
Standard Area = 146691			Recovery =		99.55%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.844	85	13647	0.407	ppbV	95
6) chloromethane	4.024	50	2368	0.157	ppbV	98
9) vinyl chloride	0.000		0	N.D.		
14) chloroethane	0.000		0	N.D.		
21) trichlorofluoromethane	5.903	101	4486	0.173	ppbV	90
26) 1,1-dichloroethene	6.604	61	3798	0.177	ppbV #	35
28) methylene chloride	6.832	49	2129	0.100	ppbV	87
31) Freon 113	7.168		0	N.D.		
32) trans-1,2-dichloroethene	0.000		0	N.D.		
33) 1,1-dichloroethane	0.000		0	N.D.		
37) cis-1,2-dichloroethene	9.192		0	N.D.		
39) chloroform	9.550	83	45219	1.436	ppbV	99
41) 2,2-dichloropropane	0.000		0	N.D.		
42) 1,2-dichloroethane	0.000		0	N.D.		
48) 1,1,1-trichloroethane	0.000		0	N.D.		
49) 1,1-dichloropropene	11.207		0	N.D.		
52) carbon tetrachloride	11.387		0	N.D.		
56) 1,2-dichloropropane	0.000		0	N.D.		
57) bromodichloromethane	12.407	83	4814	0.147	ppbV	96
59) trichloroethene	12.453	130	2172	0.084	ppbV	92
63) cis-1,3-dichloropropene	0.000		0	N.D.		
65) trans-1,3-dichloropropene	0.000		0	N.D.		
66) 1,1,2-trichloroethane	14.433		0	N.D.		
71) 1,3-dichloropropane	14.608	76	3009	0.089	ppbV #	1
74) dibromochloromethane	15.067		0	N.D.		
78) tetrachloroethene	15.783	166	25210	0.769	ppbV	94
79) 1,1,1,2-tetrachloroethane	0.000		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airlab16\2021\10\1006T\
 Data File : r1626869.D
 Acq On : 7 Oct 2021 12:09 AM
 Operator : AIRLAB16:TS
 Sample : WG1555287-5,3,250,250
 Misc : WG1555287,ICAL18260
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 16:09:57 2021
 Quant Method : 0:\Forensics\Data\Airlab16\2021\10\1006T\TFS16_210829.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Aug 30 06:00:53 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airlab16\2021\10\1006T\r1626853.D
 Sub List : ROSSVILLE - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	16.433		0		N.D.	
86) 1,1,2,2-tetrachloroethane	0.000		0		N.D.	d
88) 1,2,3-trichloropropane	17.342		0		N.D.	
93) 2-chlorotoluene	0.000		0		N.D.	
95) 4-chlorotoluene	18.483		0		N.D.	
102) 1,3-dichlorobenzene	19.042		0		N.D.	
103) 1,4-dichlorobenzene	19.042		0		N.D.	
107) 1,2-dichlorobenzene	0.000		0		N.D.	
111) 1,2-dibromo-3-chloropr...	0.000		0		N.D.	
115) 1,2,4-trichlorobenzene	0.000		0		N.D.	
117) 1,2,3-trichlorobenzene	0.000		0		N.D.	
119) hexachlorobutadiene	0.000		0		N.D.	

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

Sub List : ROSSVILLE - All compounds listed10\1006T\r1626853.D

Data Path : 0:\Forensics\Data\AirLab16\2021\10\1006T\

Data File : r1626869.D

Acq On : 7 Oct 2021 12:09 AM

Operator : AIRLAB16:TS

Sample : WG1555287-5,3,250,250

Misc : WG1555287,ICAL18260

ALS Vial : 0 Sample Multiplier: 1

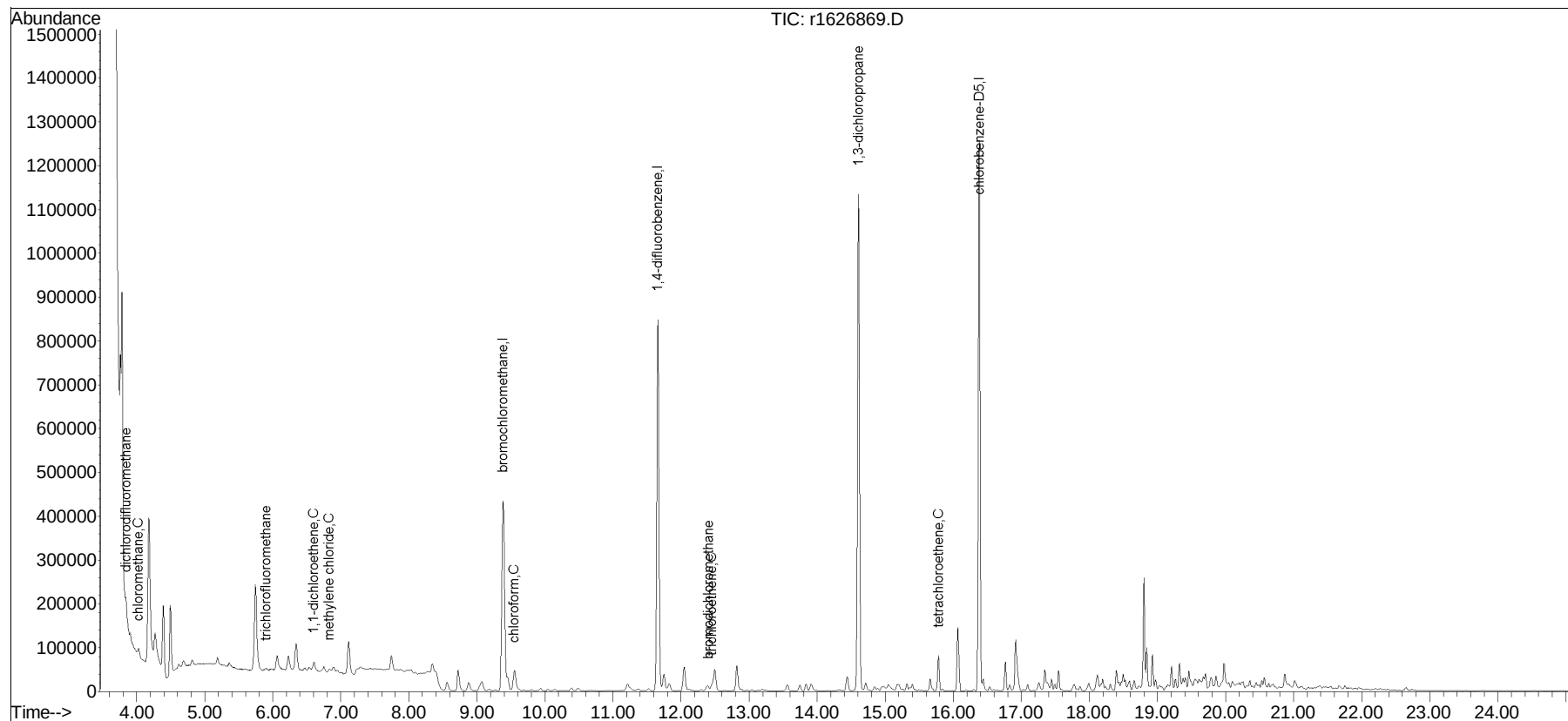
Quant Time: Oct 07 16:09:57 2021

Quant Method : 0:\Forensics\Data\AirLab16\2021\10\1006T\TFS16_210829.M

Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

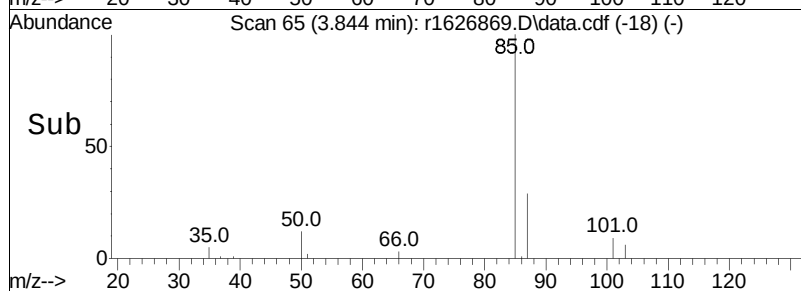
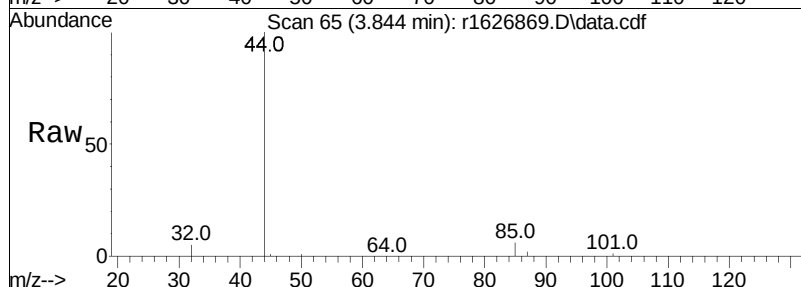
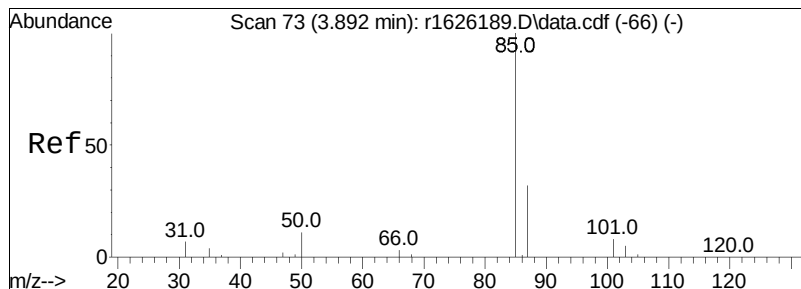
QLast Update : Mon Aug 30 06:00:53 2021

Response via : Initial Calibration



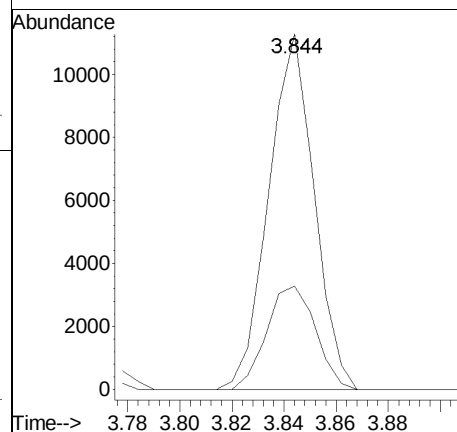
TFS16_210829.M Thu Oct 07 17:02:07 2021

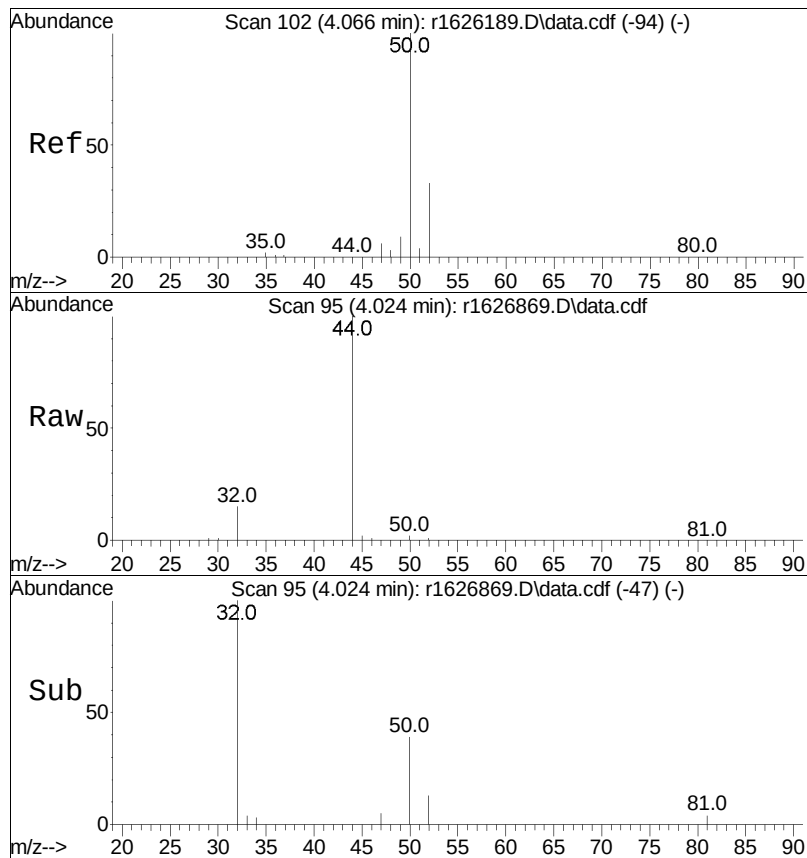
Page: 3



#5
dichlorodifluoromethane
Concen: 0.41 ppbV
RT: 3.844 min Scan# 65
Delta R.T. -0.048 min
Lab File: r1626869.D
Acq: 7 Oct 2021 12:09 AM

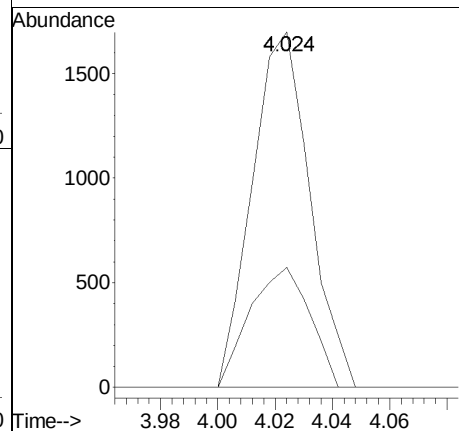
Tgt Ion: 85 Resp: 13647
Ion Ratio Lower Upper
85 100
87 29.1 25.5 38.3

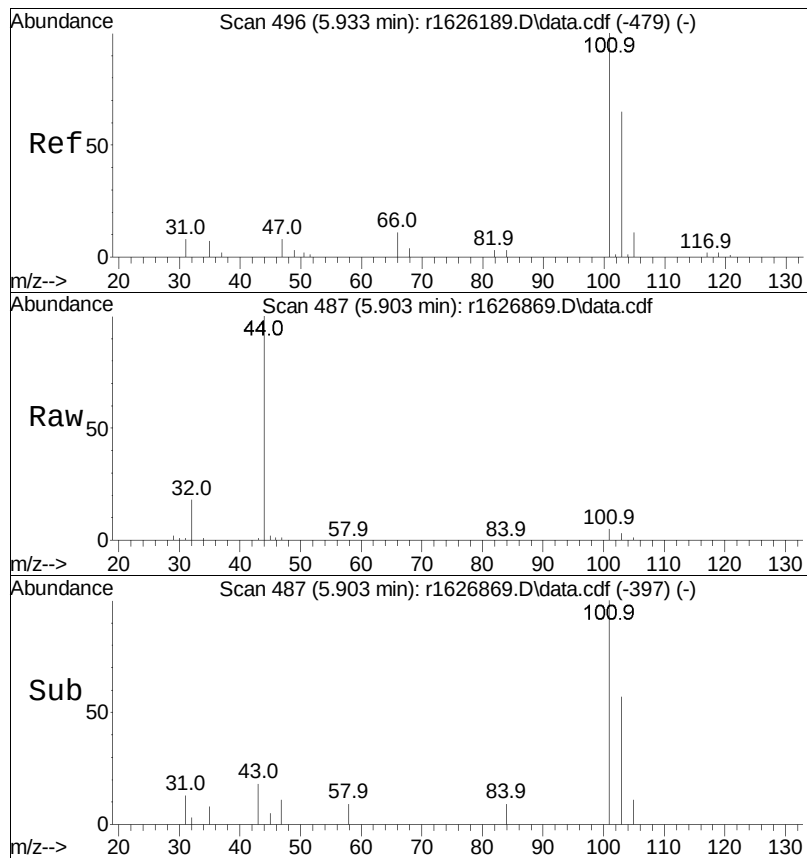




#6
 chloromethane
 Concen: 0.16 ppbV
 RT: 4.024 min Scan# 95
 Delta R.T. -0.042 min
 Lab File: r1626869.D
 Acq: 7 Oct 2021 12:09 AM

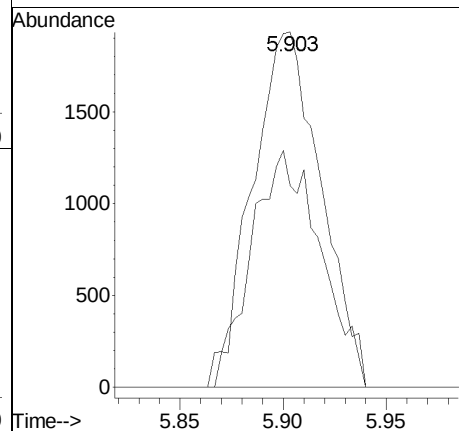
Tgt Ion	Ratio	Lower	Upper
50	100		
52	33.7	26.1	39.1

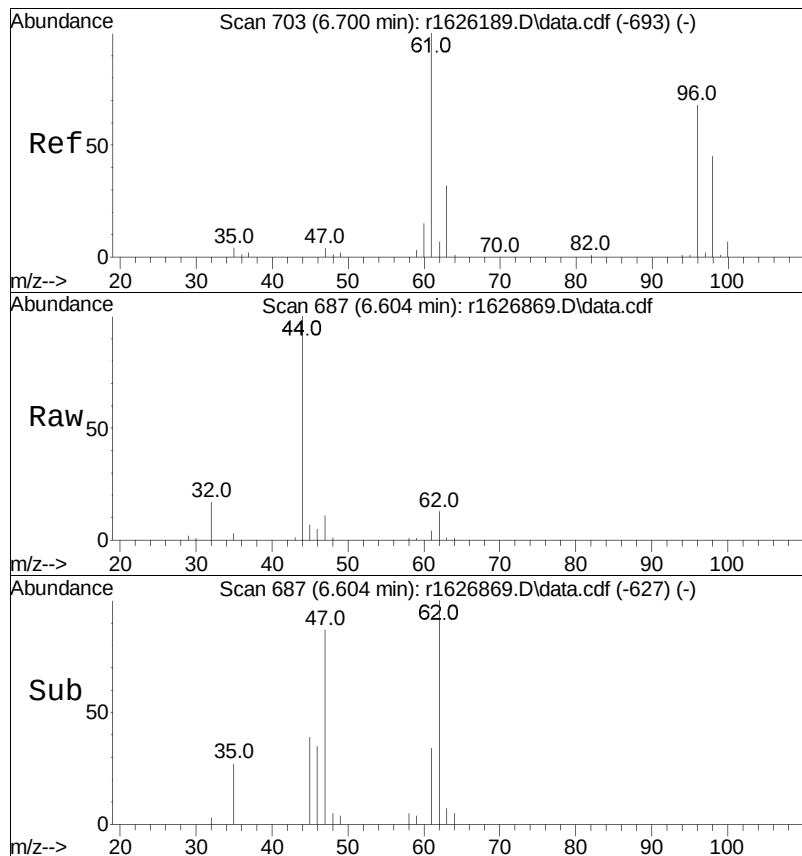




#21
trichlorofluoromethane
Concen: 0.17 ppbV
RT: 5.903 min Scan# 487
Delta R.T. -0.030 min
Lab File: r1626869.D
Acq: 7 Oct 2021 12:09 AM

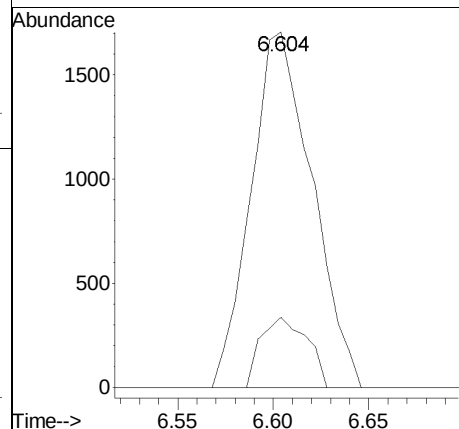
Tgt	Ion	Ratio	Lower	Upper
101	101	100		
103	103	56.8	52.0	78.0

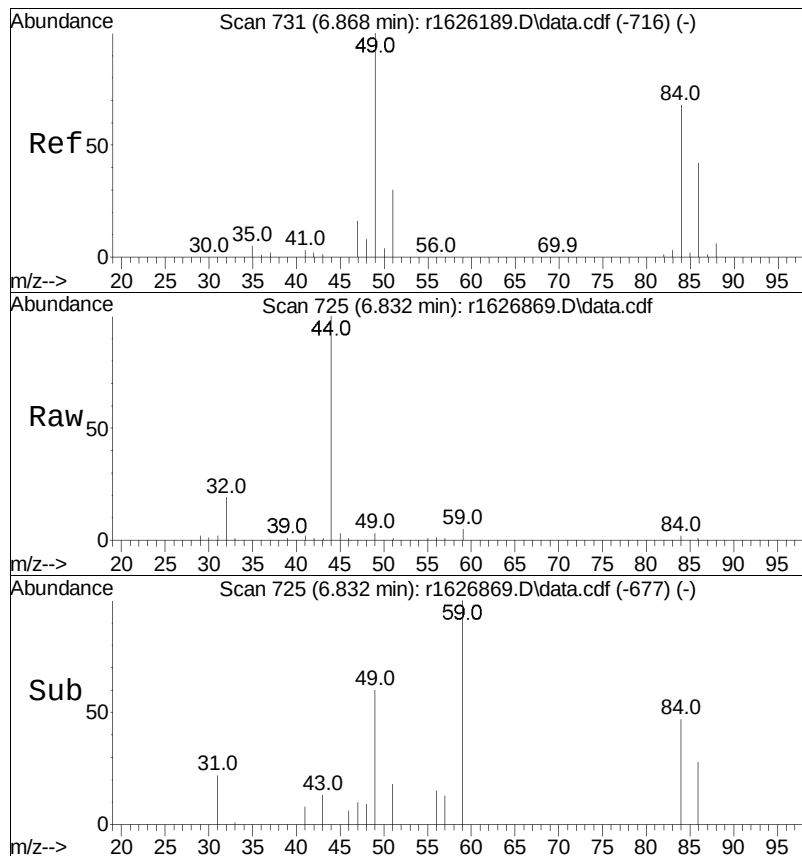




#26
 1,1-dichloroethene
 Concen: 0.18 ppbV
 RT: 6.604 min Scan# 687
 Delta R.T. -0.096 min
 Lab File: r1626869.D
 Acq: 7 Oct 2021 12:09 AM

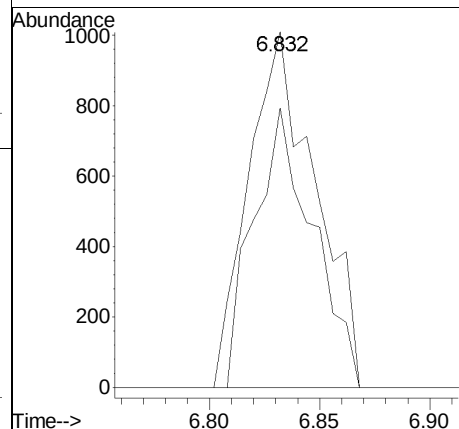
Tgt Ion: 61	Resp: 3798
Ion Ratio	Lower Upper
61 100	
96 0.0	54.8 82.2#
63 19.8	25.4 38.0#

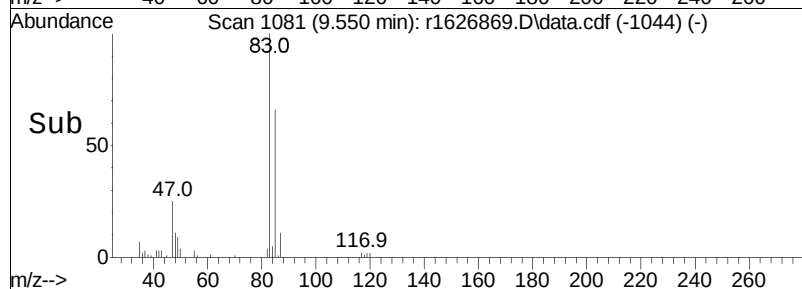
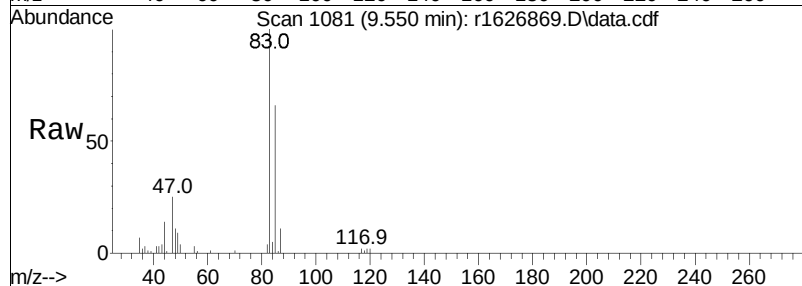
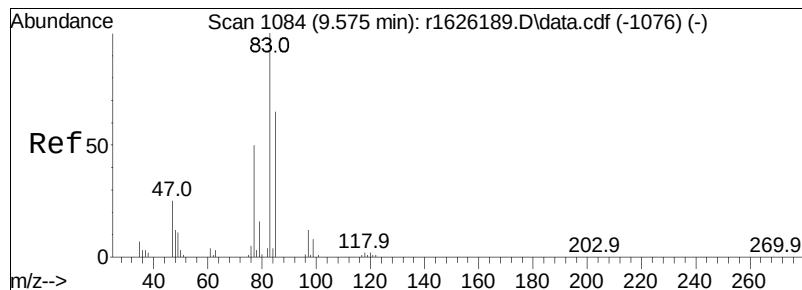




#28
 methylene chloride
 Concen: 0.10 ppbV
 RT: 6.832 min Scan# 725
 Delta R.T. -0.036 min
 Lab File: r1626869.D
 Acq: 7 Oct 2021 12:09 AM

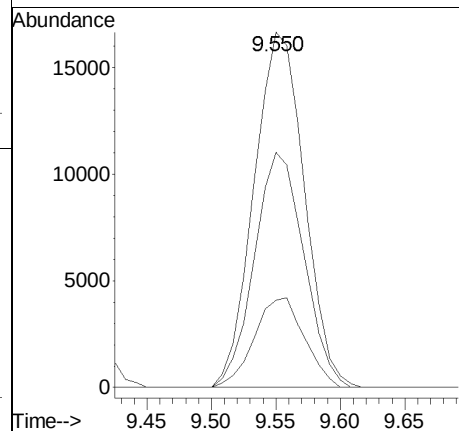
Tgt Ion:	49	Resp:	2129
Ion Ratio	Lower	Upper	
49	100		
84	78.7	54.6	81.8

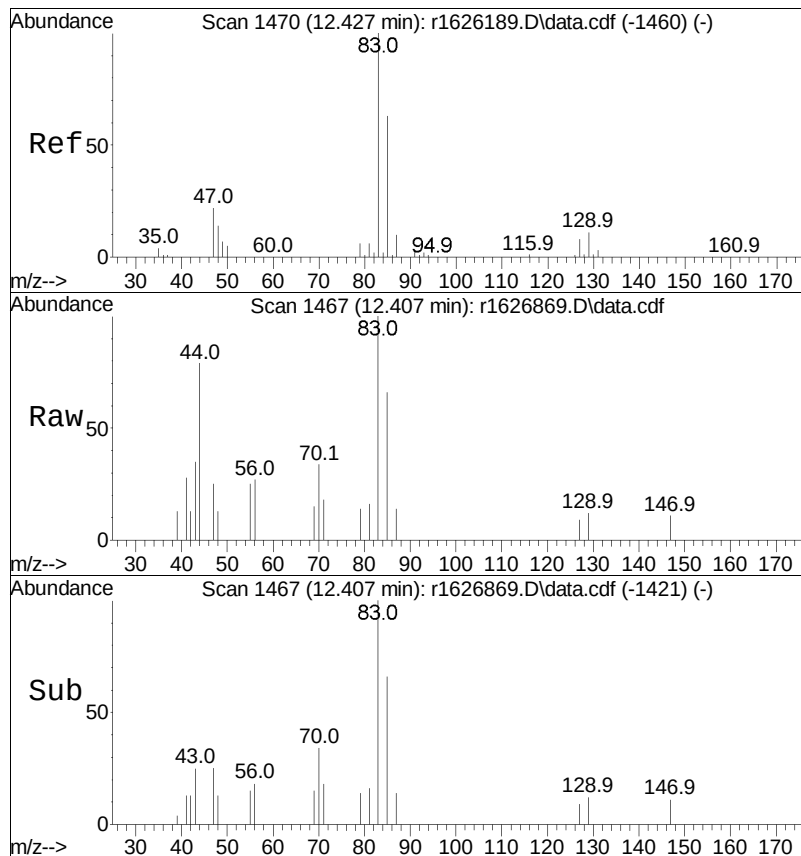




#39
chloroform
Concen: 1.44 ppbV
RT: 9.550 min Scan# 1081
Delta R.T. -0.025 min
Lab File: r1626869.D
Acq: 7 Oct 2021 12:09 AM

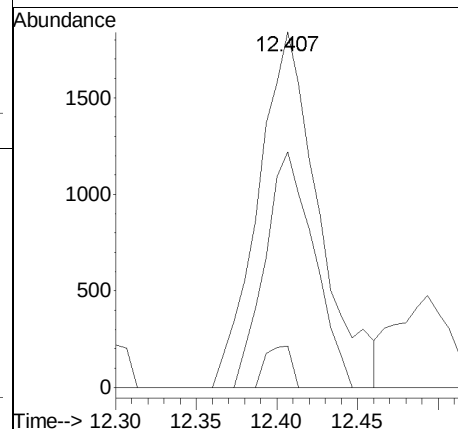
Tgt	Ion	Ratio	Resp	Lower	Upper
83	100		45219		
85	66.1	52.3		78.5	
47	24.5	20.6		31.0	

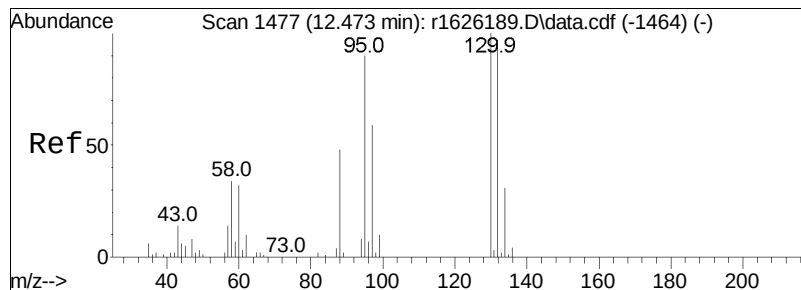




#57
bromodichloromethane
Concen: 0.15 ppbV
RT: 12.407 min Scan# 1467
Delta R.T. -0.020 min
Lab File: r1626869.D
Acq: 7 Oct 2021 12:09 AM

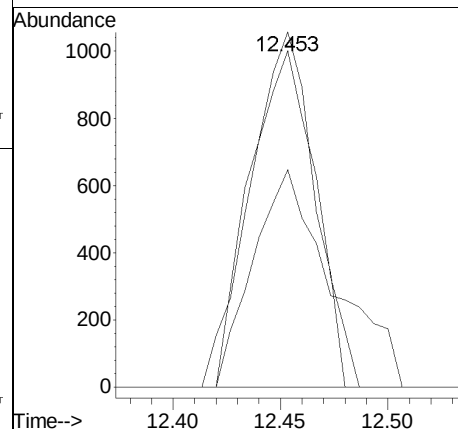
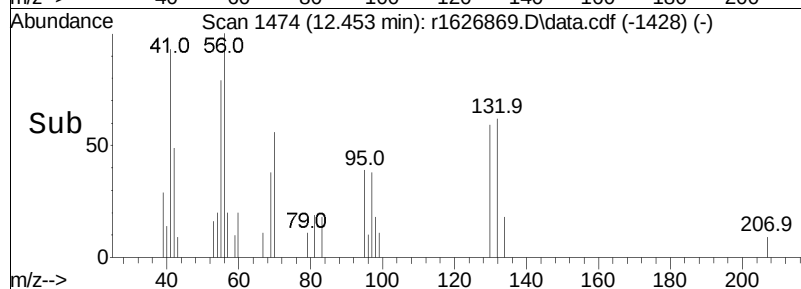
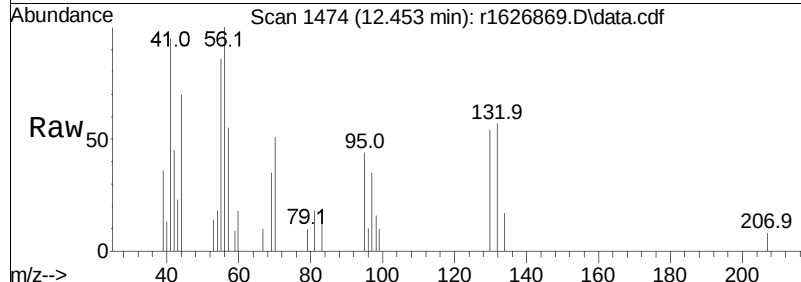
Tgt	Ion	Ratio	Resp	Lower	Upper
83	100		4814		
85	66.3	50.5		75.7	
129	11.7	8.8		13.2	

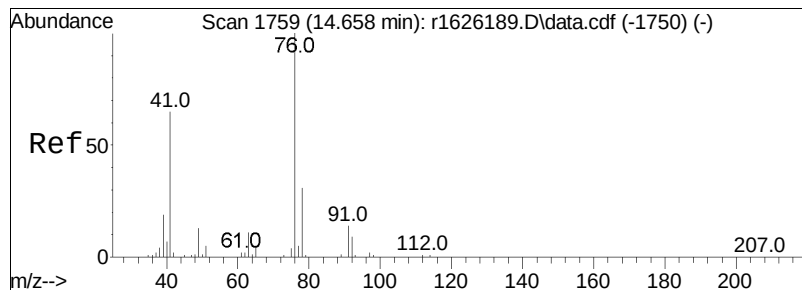




#59
 trichloroethene
 Concen: 0.08 ppbV
 RT: 12.453 min Scan# 1474
 Delta R.T. -0.020 min
 Lab File: r1626869.D
 Acq: 7 Oct 2021 12:09 AM

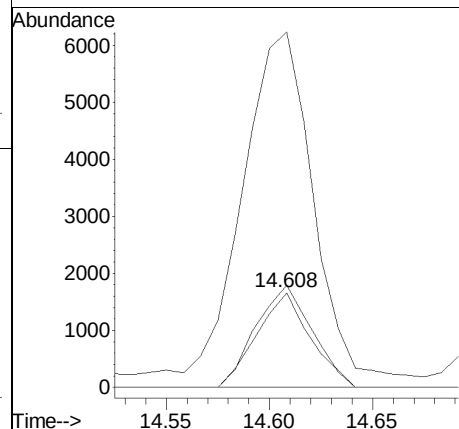
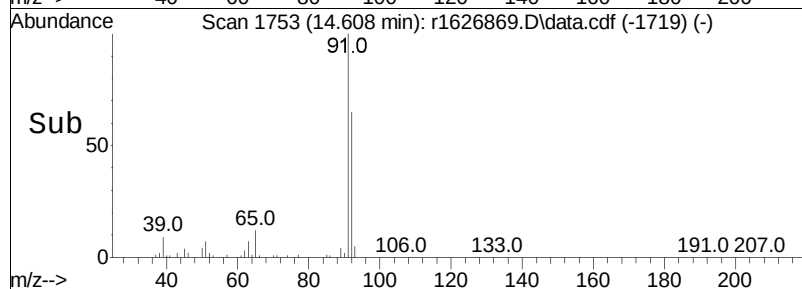
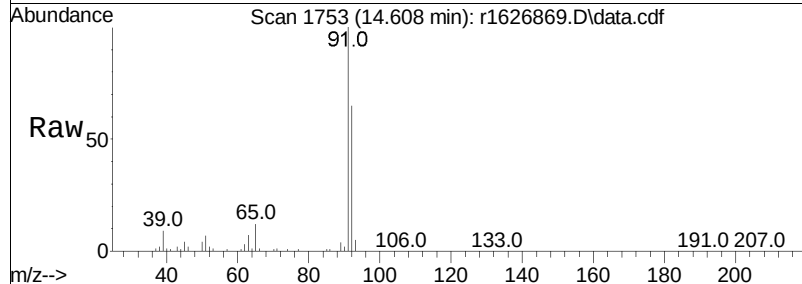
Tgt Ion	Ratio	Resp	Lower	Upper
130	100	2172		
132	105.6		77.5	116.3
97	64.6		47.3	70.9

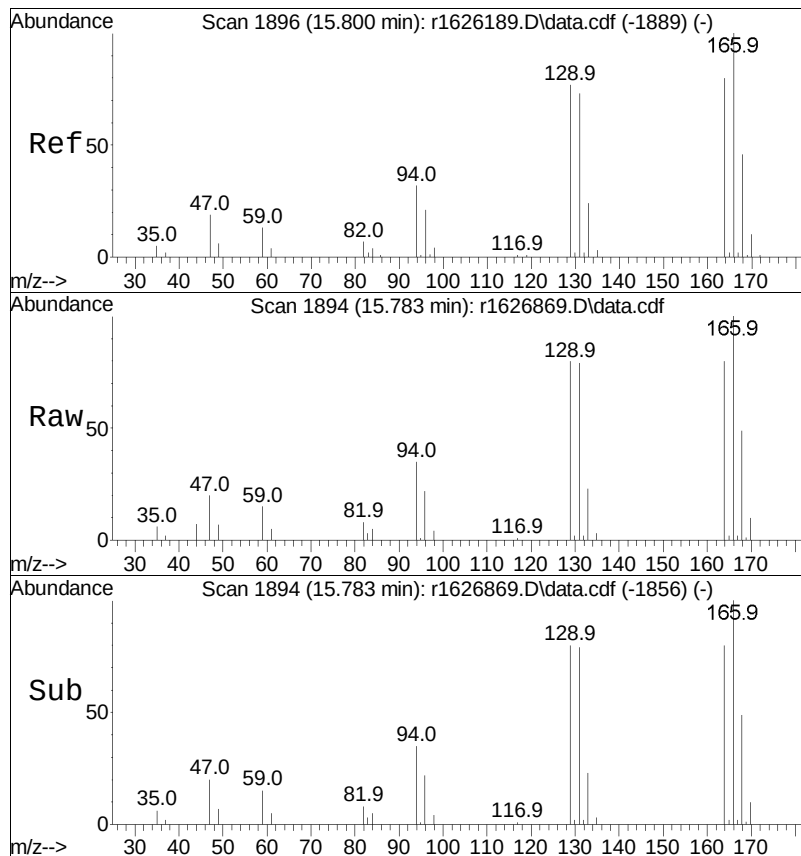




#71
 1,3-dichloropropane
 Concen: 0.09 ppbV
 RT: 14.608 min Scan# 1753
 Delta R.T. -0.050 min
 Lab File: r1626869.D
 Acq: 7 Oct 2021 12:09 AM

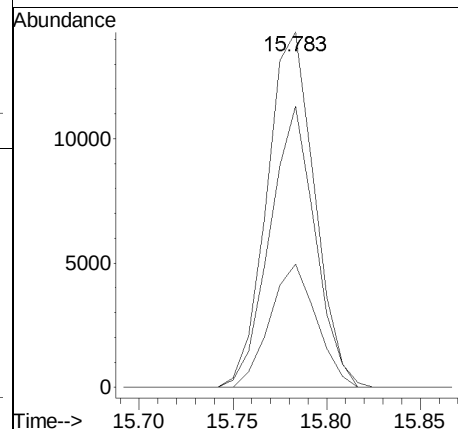
Tgt Ion	Ratio	Lower	Upper
76	100		
41	376.2	52.0	78.0#
49	108.3	10.3	15.5#





#78
 tetrachloroethene
 Concen: 0.77 ppbV
 RT: 15.783 min Scan# 1894
 Delta R.T. -0.017 min
 Lab File: r1626869.D
 Acq: 7 Oct 2021 12:09 AM

Tgt	Ion:166	Resp:	25210
Ion	Ratio	Lower	Upper
166	100		
131	79.2	58.7	88.1
94	34.7	25.9	38.9



Manual Integration Report

Data Path	: 0:\Forensics\Data\Airlab16Q	Method	: TFS16_210829.M
Data File	: r1626869.D	Operator	: AIRLAB16:TS
Date Inj'd	: 10/7/2020 0:2: 9	Instrument	:
Sample	: WG1555287-5,3,250,250	Quant Date	: 10/7/2021 6:42 am

There are no manual integrations or false positives in this file.

Calculation of Volatile Organic Compounds in Air

The instrument will calculate the concentration (ppbv). If the sample is diluted (DF), the result is multiplied by the DF to generate the final result.

$$\text{Result, ppbv} = C_s \times \text{DF}$$

Where:

C_s = Concentration of sample (ppbv)

DF = Dilution Factor

Calculation of Instrument Dilution Factor

For dilutions, smaller sample volumes (< 250mL) are analyzed. The smallest volume that can be analyzed with accuracy is 10 mL.

Samples that arrive at the laboratory with pressures below -15 inches Hg must be pressurized with zero air to greater than -15 inches Hg. This pressurization results in a dilution factor.

Calculation of Dilution Factor

$$\text{DF} = V_{\text{cf}} / V_{\text{ci}}$$

Where:

V_{ci} = volume of air in canister prior to pressurization, L

P =

Conversion of ppbv to $\mu\text{g}/\text{m}^3$

$$\mu\text{g}/\text{m}^3 = (\text{ppbv}) \times \text{MW} / 24.47$$

Where:

24.47 = molar gas constant (g/g-mole)

MW = molecular weight of the compound of interest

Dilution Factor for Pressurization of Subatmospheric Samples: Three Steps

Step 1: Calculate the volume in the canister prior to pressurization (Assume a 2.7 liter canister is used).

Dilution Factor for Pressurization of Subatmospheric Samples: Three Steps

Step 1: Calculate the volume in the canister prior to pressurization (Assume a 2.7 liter canister is used).

$$V_{ci} = 2.7 * PI / 14.696$$

Step 2: Calculate the volume in the canister after pressurization.

$$V_{cf} = 2.7 * PF / 14.696$$

Step 3: Calculate the dilution factor.

$$DF = V_{cf} / V_{ci}$$

Where:

V_{ci} = volume of air in canister prior to pressurization, L

PI = pressure reading of canister prior to pressurization (psia)

V_{cf} = volume of air in canister after pressurization, L

PF = pressure reading of canister after pressurization (psia)

DF = dilution factor

14.696 = atmospheric pressure (psia)

ALPHA ANALYTICAL LABORATORIES, INC.

Alpha WORK GROUP REPORT (wk02)

Oct 08 2021, 08:41 am

Work Group: WG1555287 for Department: 3 GC/MS

Created: 06-OCT-21 Due: Operator: TS

Sample	Client ID	C Product	Matrix	Stat	UA	HOLD	DUE	PR	Location
L2153634-01	134_LSV-21	S T015-LL	SOIL_VAPOR	DONE	U	1031	1008	S0	Can-6
L2153634-02	135_SVDUP01_100121	S T015-LL	SOIL_VAPOR	DONE	U	1031	1008	S0	Can-6
L2153634-03	136_LSV-22	S T015-LL	SOIL_VAPOR	DONE	U	1031	1008	S0	Can-6
L2153634-04	137_AMBIENT-1	S T015-LL	AIR	DONE	U	1031	1008	S0	Can-6
WG1555287-1	MS BFB Tune Standard	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555287-1	MS BFB Tune Standard	S T015-LL	AIR	DONE	U				
WG1555287-2	Continuing Calibrati	S T015-LL	AIR	DONE	U				
WG1555287-2	Continuing Calibrati	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555287-3	Laboratory Control S	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555287-3	Laboratory Control S	S T015-LL	AIR	DONE	U				
WG1555287-4	Laboratory Method Bl	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555287-4	Laboratory Method Bl	S T015-LL	AIR	DONE	U				
WG1555287-5	Duplicate Sample	S T015-LL	AIR	DONE	U				
WG1555287-5	Duplicate Sample	S T015-LL	SOIL_VAPOR	DONE	U				
Comments:									
WG1555287-5	L2153634-03								

Alpha Analytical Air Lab Instrument Run Log

Instrument ID: Airlab 16

Internal Standard/Surrogate IDs: SS20-009/ SS20-037

Date: 08/26/21

Internal Standard/Surrogate Volume: 100 ml

Analyst Initials: AW

Sequence File Name: 210826.S

SIM ICAL# 18227

Full Scan ICAL# 18226

APH ICAL# 18225

AS Position #	Sample ID	Acquisition Method	Data File ID	Standard ID or Batch ID #, ICAL Ref #	Comment (s)	Product/ Sublist	Check Pass ? Y/N
1	BA16082901	TO15_SFS.qgm	R1626178.qgd	250ML			NA
1	BA16082901	TO15_SFS.qgm	R1626179.qgd	250ML			NA
1	BA16082901	TO15_SFS.qgm	R1626180.qgd	250ML			NA
1	TA16082901	TO15_SFS.qgm	R1626181.qgd	250ML	TUNE		NA
5	ITO15-SIMTD0.02	TO15_SFS.qgm	R1626182.qgd	SS21-025D 50 mL	SIM ONLY		NA
5	ITO15-SIMTD0.05	TO15_SFS.qgm	R1626183.qgd	SS21-025D 125 mL	SIM ONLY		NA
5	ITO15-SIMTD0.1	TO15_SFS.qgm	R1626184.qgd	SS21-025D 250 mL	SIM ONLY		NA
6	ITO15-LLSTD0.2	TO15_SFS.qgm	R1626185.qgd	SS21-025C 50 mL			NA
6	ITO15-LLSTD0.5	TO15_SFS.qgm	R1626186.qgd	SS21-025C 125 mL			NA
6	ITO15-LLSTD1.0	TO15_SFS.qgm	R1626187.qgd	SS21-025C 250 mL			NA
7	ITO15-LLSTD5.0	TO15_SFS.qgm	R1626188.qgd	SS21-025B 125 mL			NA
7	ITO15-LLSTD010	TO15_SFS.qgm	R1626189.qgd	SS21-025B 250 mL			NA
8	ITO15-LLSTD020	TO15_SFS.qgm	R1626190.qgd	SS21-025A 50 mL			NA
8	ITO15-LLSTD050	TO15_SFS.qgm	R1626191.qgd	SS21-025A 125 mL			NA
8	ITO15-LLSTD100	TO15_SFS.qgm	R1626192.qgd	SS21-025A 250 mL	LL ONLY		NA
1	BA16082901	TO15_SFS.qgm	R1626193.qgd	250ML			NA
1	BA16082902	TO15_SFS.qgm	R1626194.qgd	250ML			NA
2	CTO15-LLSTD010	TO15_SFS.qgm	R1626195.qgd	SS21-024D 250 mL	LL ICV		NA
2	CTO15-SIMSTD5.0	TO15_SFS.qgm	R1626196.qgd	SS21-024D 125 mL	SIM ICV		NA

Alpha Analytical Air Lab Instrument Run Log

Column ID: Rtx-1 0.25 mm ID

Date(s) of Initial Calibration: Refer to Initial Calibration Summary Form 6

Date Acquired: see Instrument Performance Check Summary and/or quantitation report.

Sample ID information: L1301234-01,3,250,250 { Lab sample ID, dept #, actual
volume analyzed (mL), nominal
volume analyzed (mL) }

Dilution Factor: See Form 1 report, or divide nominal volume by actual volume
analyzed

Alpha Analytical Air Lab Instrument Run Log

Instrument ID: Airlab 16

Internal Standard/Surrogate IDs: SS20-028/ SS21-026

Date: 10/06/21

Internal Standard/Surrogate Volume: 100 ml

Analyst Initials: TS

Sequence File Name: 211006.S

SIM ICAL# 18261

Full Scan ICAL# 18260

APH ICAL# 18225

AS Position #	Sample ID	Acquisition Method	Data File ID	Standard ID or Batch ID #, ICAL Ref #	Comment (s)	Product/ Sublist	Check Pass ? Y/N
1	TA16100601	TO15_SFS.qgm	R1626852.qgd	250 mL	TUNE		NA
2	CA16100601	TO15_SFS.qgm	R1626853.qgd	SS21-025E 250 mL	LL CC		NA
3	CTO15-LLSTD10	TO15_SFS.qgm	R1626854.qgd	SS21-027B 250 mL	LL LCS		NA
3	CTO15-SIMSTD5	TO15_SFS.qgm	R1626855.qgd	SS21-027B 125 mL	SIM LCS		NA
1	BA16100601	TO15_SFS.qgm	R1626856.qgd	250 mL	LL BLANK		NA
1	BA16100602	TO15_SFS.qgm	R1626857.qgd	250 mL	SIM BLANK		NA
1	L2153634-04,3,250,250	TO15_SFS.qgm	R1626858.qgd	WG1555287,ICAL18260		40 CMPD REPORT LIST	Y
2	L2153594-08,3,250,250	TO15_SFS.qgm	R1626859.qgd	WG1555285,ICAL18261		5 CHLOR BY SIM	Y
3	L2153594-02,3,250,250	TO15_SFS.qgm	R1626860.qgd	WG1555285,ICAL18261		5 CHLOR BY SIM	Y
4	L2153594-06,3,250,250	TO15_SFS.qgm	R1626861.qgd	WG1555285,ICAL18261		5 CHLOR BY SIM	Y
5	L2151958-01,3,250,250	TO15_SFS.qgm	R1626862.qgd	WG1555285,ICAL18261		5 CHLOR BY SIM	Y
6	L2153594-04D,3,120.00,250	TO15_SFS.qgm	R1626863.qgd	WG1555285,ICAL18261		5 CHLOR BY SIM	Y
6	L2153594-04DUPD,3,120.00,250	TO15_SFS.qgm	R1626864.qgd	WG1555285,ICAL18261	SIM DUP	5 CHLOR BY SIM	Y
7	L2153594-09D,3,124.58,250	TO15_SFS.qgm	R1626865.qgd	WG1555285,ICAL18261		5 CHLOR BY SIM	Y
8	L2153634-01,3,250,250	TO15_SFS.qgm	R1626866.qgd	WG1555287,ICAL18260		40 CMPD REPORT LIST	Y
9	L2153634-02,3,250,250	TO15_SFS.qgm	R1626867.qgd	WG1555287,ICAL18260		40 CMPD REPORT LIST	Y
10	L2153634-03,3,250,250	TO15_SFS.qgm	R1626868.qgd	WG1555287,ICAL18260		40 CMPD REPORT LIST	Y
10	L2153634-03DUP,3,250,250	TO15_SFS.qgm	R1626869.qgd	WG1555287,ICAL18260	LL DUP	40 CMPD REPORT LIST	Y
11	L2153566-01,3,250,250	TO15_SFS.qgm	R1626870.qgd	WG1555288,ICAL18260		9 CHLOR	Y
11	L2153566-01DUP,3,250,250	TO15_SFS.qgm	R1626871.qgd	WG1555288,ICAL18260	MCP DUP	9 CHLOR	Y
12	L2153566-02D,3,150,250	TO15_SFS.qgm	R1626872.qgd	WG1555288,ICAL18260	T	9 CHLOR	Y

[illegible]

Date(s) of Initial Calibration: Refer to Initial Calibration Summary Form 6

Sample ID information: L1301234-01,3,250,250 { Lab sample ID, dept #, actual volume analyzed (mL), nominal volume analyzed (mL) }

Dilution Factor: See Form 1 report, or divide nominal volume by actual volume analyzed



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Alpha Analytical

Laboratory Code: 11148

SDG Number: L2153835

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Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153835
Report Date: 11/01/21

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L2153835-01	132_LSV-19	SOIL_VAPOR	STATEN ISLAND, NY	10/04/21 14:10	10/04/21
L2153835-02	133_LSV-20	SOIL_VAPOR	STATEN ISLAND, NY	10/04/21 11:50	10/04/21
L2153835-03	138_AMBIENT-2	AIR	STATEN ISLAND, NY	10/04/21 15:15	10/04/21

Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153835
Report Date: 11/01/21

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively. When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. All specific QC information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications. Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances the specific failure is not narrated but noted in the associated QC table. The information is also incorporated in the Data Usability format of our Data Merger tool where it can be reviewed along with any associated usability implications.

Please see the associated ADEx data file for a comparison of laboratory reporting limits that were achieved with the regulatory Numerical Standards requested on the Chain of Custody.

HOLD POLICY

For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Client Service Representative and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Client Services at 800-624-9220 with any questions.

Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153835
Report Date: 11/01/21

Case Narrative (continued)

Report Revision

October 26, 2021; the report has been amended to report TO15 SIM for select compounds for the sample designated 133_LSV-20.

Volatile Organics in Air

Canisters were released from the laboratory on October 4, 2021. The canister certification results are provided as an addendum.

L2153835-02D: The sample has elevated detection limits due to the dilution required by the elevated concentrations of non-target compounds in the sample.

The WG1555827-3 LCS recovery for benzyl chloride (132%) is above the upper 130% acceptance limit. All samples associated with this LCS do not have reportable amounts of this analyte.

TO15-SIM

L2153835-02D: The sample has elevated detection limits due to the dilution required by the elevated concentrations of non-target compounds in the sample.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature: 

Report Date: 11/01/21

Title: Technical Director/Representative



Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153835
Report Date: 11/01/21

GLOSSARY

Acronyms

DL	- Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the limit of quantitation (LOQ). The DL includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
EDL	- Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).
EMPC	- Estimated Maximum Possible Concentration: The concentration that results from the signal present at the retention time of an analyte when the ions meet all of the identification criteria except the ion abundance ratio criteria. An EMPC is a worst-case estimate of the concentration.
EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LOD	- Limit of Detection: This value represents the level to which a target analyte can reliably be detected for a specific analyte in a specific matrix by a specific method. The LOD includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
LOQ	- Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.) Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available. For Method 332.0, the spike recovery is calculated using the native concentration, including estimated values.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NDPA/DPA	- N-Nitrosodiphenylamine/Diphenylamine.
NI	- Not Ignitable.
NP	- Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.
NR	- No Results: Term is utilized when 'No Target Compounds Requested' is reported for the analysis of Volatile or Semivolatile Organic TIC only requests.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.
STLP	- Semi-dynamic Tank Leaching Procedure per EPA Method 1315.
TEF	- Toxic Equivalency Factors: The values assigned to each dioxin and furan to evaluate their toxicity relative to 2,3,7,8-TCDD.
TEQ	- Toxic Equivalent: The measure of a sample's toxicity derived by multiplying each dioxin and furan by its corresponding TEF and then summing the resulting values.
TIC	- Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.

Report Format: Data Usability Report



Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153835
Report Date: 11/01/21

Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Difference: With respect to Total Oxidizable Precursor (TOP) Assay analysis, the difference is defined as the Post-Treatment value minus the Pre-Treatment value.

Final pH: As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

Frozen Date/Time: With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

Initial pH: As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

PAH Total: With respect to Alkylated PAH analyses, the 'PAHs, Total' result is defined as the summation of results for all or a subset of the following compounds: Naphthalene, C1-C4 Naphthalenes, 2-Methylnaphthalene, 1-Methylnaphthalene, Biphenyl, Acenaphthylene, Acenaphthene, Fluorene, C1-C3 Fluorenes, Phenanthrene, C1-C4 Phenanthrenes/Anthracenes, Anthracene, Fluoranthene, Pyrene, C1-C4 Fluoranthenes/Pyrenes, Benz(a)anthracene, Chrysene, C1-C4 Chrysenes, Benzo(b)fluoranthene, Benzo(j)(k)fluoranthene, Benzo(e)pyrene, Benzo(a)pyrene, Perylene, Indeno(1,2,3-cd)pyrene, Dibenz(ah)+(ac)anthracene, Benzo(g,h,i)perylene. If a 'Total' result is requested, the results of its individual components will also be reported.

PFAS Total: With respect to PFAS analyses, the 'PFAS, Total (5)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA and PFOS. In addition, the 'PFAS, Total (6)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA, PFDA and PFOS. For MassDEP DW compliance analysis only, the 'PFAS, Total (6)' result is defined as the summation of results at or above the RL. Note: If a 'Total' result is requested, the results of its individual components will also be reported.

The target compound Chlordane (CAS No. 57-74-9) is reported for GC ECD analyses. Per EPA, this compound "refers to a mixture of chlordane isomers, other chlorinated hydrocarbons and numerous other components." (Reference: USEPA Toxicological Review of Chlordane, In Support of Summary Information on the Integrated Risk Information System (IRIS), December 1997.)

Total: With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

Data Qualifiers

- A** - Spectra identified as "Aldol Condensates" are byproducts of the extraction/concentration procedures when acetone is introduced in the process.
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).
- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- F** - The ratio of quantifier ion response to qualifier ion response falls outside of the laboratory criteria. Results are considered to be an estimated maximum concentration.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.

Report Format: Data Usability Report



Project Name: 990 ROSSVILLE AVENUE
Project Number: 100849501

Lab Number: L2153835
Report Date: 11/01/21

Data Qualifiers

- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- V** - The surrogate associated with this target analyte has a recovery outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)
- Z** - The batch matrix spike and/or duplicate associated with this target analyte has a recovery/RPD outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)
- ND** - Not detected at the reporting limit (RL) for the sample.



Volatile Organics Instruments

Volatile Organics:

Instrument: Agilent 7890 GC/5975C MSD
 Trap: Supelco K Trap (VOACARB 3000)
 Concentrator: EST Encon (or equivalent)
 Autosampler: EST Centurion (or equivalent)
 Purge time: 11 min

Columns (length x ID x df):
 RTX-VMS 20m x 0.18mm x 1um
 RTX-VMS 30m x 0.25mm x 1.4um
 RTX-502.2 40m x 0.18mm x 1um

Volatile Organics: VPH

Instrument: Agilent 6890 (or equivalent)
 Trap: Supelco K Trap (VOACARB 3000)
 Concentrator: EST Encon (or equivalent)
 Autosampler: EST Centurion (or equivalent)

Column Type: Restek RTX 502.2
 Column Length: 105 Meters
 df: 3.00 um
 ID: 0.53mm

Volatile Organics: PIANO

Instrument: Agilent 7890 GC/5975C MSD
 Trap: Supelco K Trap (VOACARB 3000)
 Concentrator: Tekmar Velocity / EST Encon
 Autosampler: Varian Archon / EST Centurion
 Purge time: 11 min

Column Type: DB-VRX
 Column Length: 60 Meters
 df: 1.40 um
 ID: 0.25 mm
 Desorb: 1 min

Volatile Organics: Dissolved Gas

Instrument: Agilent 7890 (or equivalent) with FID/TCD

Column Type: Haysep S Column
 Column Length: 2 Meters packed
 (100/200 mesh)

Autosampler: LEAP Headspace

Purge time: 0.6 min

Volatile Organics in Air Instruments

Volatile Organics in Air:

Instruments: Agilent 6890 GC / 5975 MSD Shimadzu QP2010-SE / QP2020

Concentrator: Entech 7100A or 7200
 Autosampler: Entech 7016CA or 7016D

Column Type: Restek RTX-1
 Column Length: 60 Meters
 df: 1.00 um
 ID: 0.25 mm or 0.32 mm

Trap 1: Glass Bead: manufacturer-Entech: 20 cm packing material

Trap 2: Tenax: manufacturer-Entech: 20 cm packing material



Semivolatile Organics Instruments - Westborough

Semivolatile Organics (Acid/Base/Neutral Extractables):

Instrument: Agilent 5973N MSD	Injection volume: 1 μ L; 2 μ L LVI
Column Type: Restek RXI-5SILMS	df: 0.32 μ m
Column Length: 30 Meters	ID: 0.25 mm

Polynuclear Aromatic Hydrocarbons by 8270 SIM:

Instrument: Agilent 5973 MSD	Injection volume: 1 μ L; 2 μ L LVI
Column Type: Restek RXI-5SILMS	df: 0.25 μ m
Column Length: 30 Meters	ID: 0.25 mm

Pesticides/PCB/Herbicides:

Instrument: Agilent 6890 w/Dual Micro ECDs	Injection Volume: 1 μ L
Column A: Restek RTX-CL/STX-CL	df: 0.32
Column B: Restek RTX/STX-CLP Pesticide II	df: 0.25
Column Length: 30 Meters	ID: 0.32 mm

Petroleum/EPH:

Instrument: Agilent 6890 w/FID / HP 5890 w/ FID	Injection Volume: 1 μ L
Column: Restek RTX 5	df: 0.25
Column Length: 30 Meters	
ID: 0.32 mm	



Semivolatile Organic Instruments - Mansfield

Semivolatile Organics (ALK-PAH Extractables):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 1 ul
Column Type: ZB-5	df: 0.25 um
Column Length: 60 Meters	ID: 0.25 mm

Semivolatile Organics (8270):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 2 ul
Column Type: ZB-Semivolatiles	df: 0.25 um
Column Length: 30 Meters	ID: 0.25 mm

Semivolatile Organics (8270 SIM):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 3 ul
Column Type: ZB-5	df: 0.25 um
Column Length: 30 Meters	ID: 0.25 mm

Semivolatile Organics (1,4-Dioxane):

Instrument: Agilent 5973N / 5975 / 5977 MSD	Injection volume: 3 ul
Column Type: RTX-5	df: 0.25um, 0.18 um
Column Length: 30 Meters	ID: 0.25um, 0.18 mm

Semivolatile Organics (209 Congener):

Instrument: Agilent 5973N / 5975 MSD	Injection volume: 3 ul
Column Type: RTX-5, RTX-PCB	df: 0.25um, 0.18 um
Column Length: 60 Meters	ID: 0.25um, 0.18 mm

Semivolatile Organics (8081):

Instrument: Agilent 6890 / 7890	Injection volume: 1 ul
Column Type: RTX-5 / RTX-CLP II	df: 0.25 um
Column Length: 60 Meters	ID: 0.25 mm

Semivolatile Organics (8082):

Instrument: Agilent 6890 w/Dual Micro ECDs	Injection Volume: 1uL
Column A: Restek RTX-CL/STX-CL	df: 0.32
Column B: Restek RTX/STX-CLPPesticide II	df: 0.25
Column Length: 30 Meters	ID: 0.32 mm

Semivolatile Organics (SHC Extractables):

Instrument: Agilent 6890	Injection volume: 1 ul
Column Type: RTX-5	df: 0.25 um
Column Length: 60 Meters	ID: 0.25 mm



Sample Delivery Group Summary

Alpha Job Number : L2153835

Received : 04-OCT-2021

Reviewer : Dylan Snook

Account Name : Langan Engineering & Environmental

Project Number : 100849501

Project Name : 990 ROSSVILLE AVENUE

Delivery Information

Samples Delivered By : Alpha Courier

Chain of Custody : Present

Cooler Information

Cooler	Seal/Seal#	Preservation	Temperature(°C)	Additional Information
NA	Absent/			

Condition Information

1) All samples on COC received?	YES
2) Extra samples received?	NO
3) Are there any sample container discrepancies?	NO
4) Are there any discrepancies between sample labels & COC? L2153835-03: 138_AMBIENT-2 vs. _AMBIENT-2	YES
5) Are samples in appropriate containers for requested analysis?	YES
6) Are samples properly preserved for requested analysis?	YES
7) Are samples within holding time for requested analysis?	YES
8) All sampling equipment returned?	YES

Volatile Organics/VPH

1) Reagent Water Vials Frozen by Client?	NA

ALPHA ANALYTICAL LABORATORIES, INC.
LOGIN CHAIN OF CUSTODY REPORT
Nov 02 2021, 10:42 am

Login Number: L2153835

Account: LANGAN-NJ Langan Engineering & Environmental Project: 100849501

Received: 04OCT21 Due Date: 11OCT21

Sample # Client ID Mat PR Collected

L2153835-01 132_LSV-19 11 S0 04OCT21 14:10

40 compound list applied ASP-B Package Due Date: 10/11/21

ASP-B, CAN-RENT, FLOW-RENT, T015-LL

L2153835-02 133_LSV-20 11 S0 04OCT21 11:50

40 compound list applied Package Due Date: 10/11/21

CAN-RENT, FLOW-RENT, T015-LL, T015-SIM

L2153835-03 138_AMBIENT-2 10 S0 04OCT21 15:15

40 compound list applied Package Due Date: 10/11/21

CAN-RENT, FLOW-RENT, T015-LL



AIR ANALYSIS

CHAIN OF CUSTODY

320 Forbes Blvd, Mansfield, MA 02048
TEL: 508-822-9300 FAX: 508-822-3288

Client Information

Client: Langan
Address: 300 Kimball Dr
Parsippany, NJ
Phone: 973-560-4900
Fax:
Email: breiner@langan.com

☐ These samples have been previously analyzed by Alpha

Other Project Specific Requirements/Comments:

Project-Specific Target Compound List: ☐

Project Information

Project Name: 990 Rossville Ave
Project Location: Staten Island, NY
Project #: 100849501
Project Manager: Ben Rao
ALPHA Quote #:

Turn-Around Time

☒ Standard ☐ RUSH (only confirmed if pre-approved!)

Date Due:

Time:

Date Rec'd in Lab:

10/5/21

Report Information - Data Deliverables

☐ FAX
☒ ADEx
Criteria Checker:
(Default based on Regulatory Criteria Indicated)
Other Formats:
☒ EMAIL (standard pdf report)
☒ Additional Deliverables:
ASP-B
Report to: (if different than Project Manager)

ALPHA Job #: 22153835

Billing Information

☒ Same as Client info PO #:

Regulatory Requirements/Report Limits

State/Fed Program Res / Comm

ANALYSIS

TO-15
TO-15 SIM
APH ☐ Substrate Non-petroleum HCs
Fixed Gases
Sulfides & Mercaptans by TO-15

All Columns Below Must Be Filled Out

ALPHA Lab ID (Lab Use Only)	Sample ID	COLLECTION						Sample Matrix*	Sampler's Initials	Can Size	ID Can	ID - Flow Controller					Sample Comments (i.e. PID)
		End Date	Start Time	End Time	Initial Vacuum	Final Vacuum							TO-15	TO-15 SIM	APH	Fixed Gases	
<u>53835-01</u>	<u>132-LSV-19</u>	<u>10/04/21</u>	<u>12:50</u>	<u>14:10</u>	<u>-29.88</u>	<u>-5.0</u>	<u>SV</u>	<u>mm</u>	<u>6L</u>	<u>3324</u>	<u>1102</u>	<u>X</u>					
<u>02</u>	<u>133-LSV-20</u>	<u>10/04/21</u>	<u>9:50</u>	<u>11:50</u>	<u>-29.82</u>	<u>-4.25</u>	<u>SV</u>	<u>mm</u>	<u>6L</u>	<u>2714</u>	<u>0581</u>	<u>X</u>					
<u>03</u>	<u>138-AMBIENT-2</u>	<u>10/04/21</u>	<u>7:20</u>	<u>15:15</u>	<u>-30.18</u>	<u>-6.18</u>	<u>AA</u>	<u>mm</u>	<u>6L</u>	<u>3256</u>	<u>1610</u>	<u>X</u>					

*SAMPLE MATRIX CODES

AA = Ambient Air (Indoor/Outdoor)
SV = Soil Vapor/Landfill Gas/SVE
Other = Please Specify

Container Type

Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. All samples submitted are subject to Alpha's Terms and Conditions. See reverse side.

Relinquished By:

Date/Time

Received By:

Date/Time:

Supporting Documentation

Project Name: 990 ROSSVILLE AVENUE

Lab Number: L2153835

Project Number: 100849501

Report Date: 11/01/21

Canister and Flow Controller Information

Samplenum	Client ID	Media ID	Media Type	Date Prepared	Bottle Order	Cleaning Batch ID	Can Leak Check	Initial Pressure (in. Hg)	Pressure on Receipt (in. Hg)	Flow Controller Leak Chk	Flow Out mL/min	Flow In mL/min	% RPD
L2153835-01	132_LSV-19	01102	Flow 2	10/04/21	366045		-	-	-	Pass	39.6	42.6	7
L2153835-01	132_LSV-19	3324	6.0L Can	10/04/21	366045	L2149533-03	Pass	-29.7	-5.8	-	-	-	-
L2153835-02	133_LSV-20	0581	Flow 1	10/04/21	366045		-	-	-	Pass	40.7	44.2	8
L2153835-02	133_LSV-20	2714	6.0L Can	10/04/21	366045	L2149533-03	Pass	-29.3	-5.0	-	-	-	-
L2153835-03	138_AMBIENT-2	01610	Flow 4	10/04/21	366045		-	-	-	Pass	10.2	10.4	2
L2153835-03	138_AMBIENT-2	3256	6.0L Can	10/04/21	366045	L2149533-03	Pass	-29.8	-6.2	-	-	-	-

Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
 Client ID: CAN 621 SHELF 38
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15
 Analytical Date: 09/15/21 19:50
 Analyst: RY

Date Collected: 09/14/21 16:00
 Date Received: 09/15/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Chlorodifluoromethane	ND	0.200	--	ND	0.707	--		1
Propylene	ND	0.500	--	ND	0.861	--		1
Propane	ND	0.500	--	ND	0.902	--		1
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.200	--	ND	1.40	--		1
Methanol	ND	5.00	--	ND	6.55	--		1
Vinyl chloride	ND	0.200	--	ND	0.511	--		1
1,3-Butadiene	ND	0.200	--	ND	0.442	--		1
Butane	ND	0.200	--	ND	0.475	--		1
Bromomethane	ND	0.200	--	ND	0.777	--		1
Chloroethane	ND	0.200	--	ND	0.528	--		1
Ethanol	ND	5.00	--	ND	9.42	--		1
Dichlorofluoromethane	ND	0.200	--	ND	0.842	--		1
Vinyl bromide	ND	0.200	--	ND	0.874	--		1
Acrolein	ND	0.500	--	ND	1.15	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Acetonitrile	ND	0.200	--	ND	0.336	--		1
Trichlorofluoromethane	ND	0.200	--	ND	1.12	--		1
Isopropanol	ND	0.500	--	ND	1.23	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
Pentane	ND	0.200	--	ND	0.590	--		1
Ethyl ether	ND	0.200	--	ND	0.606	--		1
1,1-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Tertiary butyl Alcohol	ND	0.500	--	ND	1.52	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
 Client ID: CAN 621 SHELF 38
 Sample Location:

Date Collected: 09/14/21 16:00
 Date Received: 09/15/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Methylene chloride	ND	0.500	--	ND	1.74	--		1
3-Chloropropene	ND	0.200	--	ND	0.626	--		1
Carbon disulfide	ND	0.200	--	ND	0.623	--		1
Freon-113	ND	0.200	--	ND	1.53	--		1
trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
1,1-Dichloroethane	ND	0.200	--	ND	0.809	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
Vinyl acetate	ND	1.00	--	ND	3.52	--		1
Xylenes, total	ND	0.600	--	ND	0.869	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--		1
Ethyl Acetate	ND	0.500	--	ND	1.80	--		1
Chloroform	ND	0.200	--	ND	0.977	--		1
Tetrahydrofuran	ND	0.500	--	ND	1.47	--		1
2,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1
1,2-Dichloroethane	ND	0.200	--	ND	0.809	--		1
n-Hexane	ND	0.200	--	ND	0.705	--		1
Diisopropyl ether	ND	0.200	--	ND	0.836	--		1
tert-Butyl Ethyl Ether	ND	0.200	--	ND	0.836	--		1
1,2-Dichloroethene (total)	ND	1.00	--	ND	1.00	--		1
1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--		1
1,1-Dichloropropene	ND	0.200	--	ND	0.908	--		1
Benzene	ND	0.200	--	ND	0.639	--		1
Carbon tetrachloride	ND	0.200	--	ND	1.26	--		1
Cyclohexane	ND	0.200	--	ND	0.688	--		1
tert-Amyl Methyl Ether	ND	0.200	--	ND	0.836	--		1
Dibromomethane	ND	0.200	--	ND	1.42	--		1
1,2-Dichloropropane	ND	0.200	--	ND	0.924	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
 Client ID: CAN 621 SHELF 38
 Sample Location:

Date Collected: 09/14/21 16:00
 Date Received: 09/15/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Bromodichloromethane	ND	0.200	--	ND	1.34	--		1
1,4-Dioxane	ND	0.200	--	ND	0.721	--		1
Trichloroethene	ND	0.200	--	ND	1.07	--		1
2,2,4-Trimethylpentane	ND	0.200	--	ND	0.934	--		1
Methyl Methacrylate	ND	0.500	--	ND	2.05	--		1
Heptane	ND	0.200	--	ND	0.820	--		1
cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--		1
1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--		1
Toluene	ND	0.200	--	ND	0.754	--		1
1,3-Dichloropropane	ND	0.200	--	ND	0.924	--		1
2-Hexanone	ND	0.200	--	ND	0.820	--		1
Dibromochloromethane	ND	0.200	--	ND	1.70	--		1
1,2-Dibromoethane	ND	0.200	--	ND	1.54	--		1
Butyl acetate	ND	0.500	--	ND	2.38	--		1
Octane	ND	0.200	--	ND	0.934	--		1
Tetrachloroethene	ND	0.200	--	ND	1.36	--		1
1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
Chlorobenzene	ND	0.200	--	ND	0.921	--		1
Ethylbenzene	ND	0.200	--	ND	0.869	--		1
p/m-Xylene	ND	0.400	--	ND	1.74	--		1
Bromoform	ND	0.200	--	ND	2.07	--		1
Styrene	ND	0.200	--	ND	0.852	--		1
1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--		1
o-Xylene	ND	0.200	--	ND	0.869	--		1
1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--		1
Nonane	ND	0.200	--	ND	1.05	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
 Client ID: CAN 621 SHELF 38
 Sample Location:

Date Collected: 09/14/21 16:00
 Date Received: 09/15/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
Bromobenzene	ND	0.200	--	ND	0.793	--		1
2-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
n-Propylbenzene	ND	0.200	--	ND	0.983	--		1
4-Chlorotoluene	ND	0.200	--	ND	1.04	--		1
4-Ethyltoluene	ND	0.200	--	ND	0.983	--		1
1,3,5-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
tert-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trimethylbenzene	ND	0.200	--	ND	0.983	--		1
Decane	ND	0.200	--	ND	1.16	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1
1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--		1
Undecane	ND	0.200	--	ND	1.28	--		1
Dodecane	ND	0.200	--	ND	1.39	--		1
1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Naphthalene	ND	0.200	--	ND	1.05	--		1
1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--		1
Hexachlorobutadiene	ND	0.200	--	ND	2.13	--		1

Results	Qualifier	Units	RDL	Dilution Factor
Tentatively Identified Compounds				

No Tentatively Identified Compounds



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
Client ID: CAN 621 SHELF 38
Sample Location:

Date Collected: 09/14/21 16:00
Date Received: 09/15/21
Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air								

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-Difluorobenzene	85		60-140
Bromochloromethane	87		60-140
chlorobenzene-d5	87		60-140



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
 Client ID: CAN 621 SHELF 38
 Sample Location:
 Matrix: Air
 Analytical Method: 48,TO-15-SIM
 Analytical Date: 09/15/21 19:50
 Analyst: RY

Date Collected: 09/14/21 16:00
 Date Received: 09/15/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--		1
Chloromethane	ND	0.200	--	ND	0.413	--		1
Freon-114	ND	0.050	--	ND	0.349	--		1
Vinyl chloride	ND	0.020	--	ND	0.051	--		1
1,3-Butadiene	ND	0.020	--	ND	0.044	--		1
Bromomethane	ND	0.020	--	ND	0.078	--		1
Chloroethane	ND	0.100	--	ND	0.264	--		1
Acrolein	ND	0.050	--	ND	0.115	--		1
Acetone	ND	1.00	--	ND	2.38	--		1
Trichlorofluoromethane	ND	0.050	--	ND	0.281	--		1
Acrylonitrile	ND	0.500	--	ND	1.09	--		1
1,1-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Methylene chloride	ND	0.500	--	ND	1.74	--		1
Freon-113	ND	0.050	--	ND	0.383	--		1
trans-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
1,1-Dichloroethane	ND	0.020	--	ND	0.081	--		1
Methyl tert butyl ether	ND	0.200	--	ND	0.721	--		1
2-Butanone	ND	0.500	--	ND	1.47	--		1
cis-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--		1
Chloroform	ND	0.020	--	ND	0.098	--		1
1,2-Dichloroethane	ND	0.020	--	ND	0.081	--		1
1,1,1-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Benzene	ND	0.100	--	ND	0.319	--		1
Carbon tetrachloride	ND	0.020	--	ND	0.126	--		1
1,2-Dichloropropane	ND	0.020	--	ND	0.092	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
 Client ID: CAN 621 SHELF 38
 Sample Location:

Date Collected: 09/14/21 16:00
 Date Received: 09/15/21
 Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
Bromodichloromethane	ND	0.020	--	ND	0.134	--		1
1,4-Dioxane	ND	0.100	--	ND	0.360	--		1
Trichloroethene	ND	0.020	--	ND	0.107	--		1
cis-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
4-Methyl-2-pentanone	ND	0.500	--	ND	2.05	--		1
trans-1,3-Dichloropropene	ND	0.020	--	ND	0.091	--		1
1,1,2-Trichloroethane	ND	0.020	--	ND	0.109	--		1
Toluene	ND	0.100	--	ND	0.377	--		1
Dibromochloromethane	ND	0.020	--	ND	0.170	--		1
1,2-Dibromoethane	ND	0.020	--	ND	0.154	--		1
Tetrachloroethene	ND	0.020	--	ND	0.136	--		1
1,1,1,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
Chlorobenzene	ND	0.100	--	ND	0.461	--		1
Ethylbenzene	ND	0.020	--	ND	0.087	--		1
p/m-Xylene	ND	0.040	--	ND	0.174	--		1
Bromoform	ND	0.020	--	ND	0.207	--		1
Styrene	ND	0.020	--	ND	0.085	--		1
1,1,2,2-Tetrachloroethane	ND	0.020	--	ND	0.137	--		1
o-Xylene	ND	0.020	--	ND	0.087	--		1
Isopropylbenzene	ND	0.200	--	ND	0.983	--		1
4-Ethyltoluene	ND	0.020	--	ND	0.098	--		1
1,3,5-Trimethybenzene	ND	0.020	--	ND	0.098	--		1
1,2,4-Trimethylbenzene	ND	0.020	--	ND	0.098	--		1
Benzyl chloride	ND	0.200	--	ND	1.04	--		1
1,3-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
1,4-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
sec-Butylbenzene	ND	0.200	--	ND	1.10	--		1
p-Isopropyltoluene	ND	0.200	--	ND	1.10	--		1



Project Name: BATCH CANISTER CERTIFICATION
Project Number: CANISTER QC BAT

Lab Number: L2149533
Report Date: 11/01/21

Air Canister Certification Results

Lab ID: L2149533-03
Client ID: CAN 621 SHELF 38
Sample Location:

Date Collected: 09/14/21 16:00
Date Received: 09/15/21
Field Prep: Not Specified

Parameter	ppbV			ug/m3			Qualifier	Dilution Factor
	Results	RL	MDL	Results	RL	MDL		
Volatile Organics in Air by SIM								
1,2-Dichlorobenzene	ND	0.020	--	ND	0.120	--		1
n-Butylbenzene	ND	0.200	--	ND	1.10	--		1
1,2,4-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Naphthalene	ND	0.050	--	ND	0.262	--		1
1,2,3-Trichlorobenzene	ND	0.050	--	ND	0.371	--		1
Hexachlorobutadiene	ND	0.050	--	ND	0.533	--		1

Internal Standard	% Recovery	Qualifier	Acceptance Criteria
1,4-difluorobenzene	84		60-140
bromochloromethane	85		60-140
chlorobenzene-d5	87		60-140



Organics

Volatile Organics in Air TO-15 Low Level

Volatiles QC Summary

Laboratory Control Sample Summary

Form 3

Air Volatiles

Client : Langan Engineering & Environmental Lab Number : L2153835
 Project Name : 990 ROSSVILLE AVENUE Project Number : 100849501
 Matrix : AIR
 LCS Sample ID : WG1555827-3 Analysis Date : 10/07/21 12:28 File ID : r318224
 LCSD Sample ID : Analysis Date : File ID :

Parameter	Laboratory Control Sample			Laboratory Control Duplicate			RPD	Recovery Limits	RPD Limit
	True (ppbV)	Found (ppbV)	%R	True (ppbV)	Found (ppbV)	%R			
Dichlorodifluoromethane	10	8.90	89				-	70-130	-
Chloromethane	10	9.50	95				-	70-130	-
Vinyl chloride	10	8.86	89				-	70-130	-
Chloroethane	10	8.22	82				-	70-130	-
Trichlorofluoromethane	10	8.99	90				-	70-130	-
1,1-Dichloroethene	10	8.80	88				-	70-130	-
Methylene chloride	10	9.75	98				-	70-130	-
Freon-113	10	9.35	94				-	70-130	-
trans-1,2-Dichloroethene	10	8.40	84				-	70-130	-
1,1-Dichloroethane	10	8.72	87				-	70-130	-
cis-1,2-Dichloroethene	10	8.85	88				-	70-130	-
Chloroform	10	9.27	93				-	70-130	-
2,2-Dichloropropane	10	9.78	98				-	70-130	-
1,2-Dichloroethane	10	8.56	86				-	70-130	-
1,1,1-Trichloroethane	10	9.60	96				-	70-130	-
1,1-Dichloropropene	10	9.73	97				-	70-130	-
Carbon tetrachloride	10	10.2	102				-	70-130	-
1,2-Dichloropropane	10	9.33	93				-	70-130	-
Bromodichloromethane	10	9.64	96				-	70-130	-
Trichloroethene	10	9.52	95				-	70-130	-
cis-1,3-Dichloropropene	10	10.8	108				-	70-130	-
trans-1,3-Dichloropropene	10	9.74	97				-	70-130	-
1,1,2-Trichloroethane	10	9.77	98				-	70-130	-
1,3-Dichloropropane	10	9.91	99				-	70-130	-
Dibromochloromethane	10	11.0	110				-	70-130	-
Tetrachloroethene	10	10.2	102				-	70-130	-



Laboratory Control Sample Summary

Form 3

Air Volatiles

Client : Langan Engineering & Environmental Lab Number : L2153835
 Project Name : 990 ROSSVILLE AVENUE Project Number : 100849501
 Matrix : AIR
 LCS Sample ID : WG1555827-3 Analysis Date : 10/07/21 12:28 File ID : r318224
 LCSD Sample ID : Analysis Date : File ID :

Parameter	Laboratory Control Sample			Laboratory Control Duplicate			RPD	Recovery Limits	RPD Limit
	True (ppbV)	Found (ppbV)	%R	True (ppbV)	Found (ppbV)	%R			
1,1,1,2-Tetrachloroethane	10	10.2	102				-	70-130	-
Chlorobenzene	10	10.4	104				-	70-130	-
1,1,2,2-Tetrachloroethane	10	10.7	107				-	70-130	-
1,2,3-Trichloropropane	10	10.1	101				-	70-130	-
2-Chlorotoluene	10	9.67	97				-	70-130	-
4-Chlorotoluene	10	9.89	99				-	70-130	-
1,3-Dichlorobenzene	10	11.5	115				-	70-130	-
1,4-Dichlorobenzene	10	11.0	110				-	70-130	-
1,2-Dichlorobenzene	10	11.1	111				-	70-130	-
1,2-Dibromo-3-chloropropane	10	10.8	108				-	70-130	-
1,2,4-Trichlorobenzene	10	11.7	117				-	70-130	-
1,2,3-Trichlorobenzene	10	11.1	111				-	70-130	-
Hexachlorobutadiene	10	11.0	110				-	70-130	-

Method Blank Summary
Form 4
Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153835
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Lab Sample ID	: WG1555827-4	Lab File ID	: r318226
Instrument ID	: AIRPIANO3		
Matrix	: AIR	Analysis Date	: 10/07/21 15:03

Client Sample No.	Lab Sample ID	Analysis Date
WG1555827-3LCS	WG1555827-3	10/07/21 12:28
138_AMBIENT-2	L2153835-03	10/07/21 20:52
132_LSV-19	L2153835-01	10/07/21 21:31
133_LSV-20	L2153835-02D	10/07/21 22:08
SV1DUP	WG1555827-5	10/07/21 23:27

Instrument Performance Check (Tune) Summary

Form 5

Air Volatiles

Bromofluorobenzene (BFB)

Client : Langan Engineering & Environmental	Lab Number : L2153835
Project Name : 990 ROSSVILLE AVENUE	Project Number : 100849501
Instrument ID : AIRPIANO3	Analysis Date : 10/07/21 10:25
Tune Standard : WG1555827-1	Tune File ID : r318221_tune

m/e	Ion Abundance Criteria	%Relative Abundance
50	8.0 - 40.0% of mass 95	14.9
75	30.0 - 66.0% of mass 95	39.8
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.7
173	Less than 2.0% of mass 174	0.4 (.5)1
174	50.0 - 120.0% of mass 95	75.5
175	4.0 - 9.0% of mass 174	5.3 (7)1
176	93.0 - 101% of mass 174	71.6 (94.8)1
177	5.0 - 9.0% of mass 176	4.7 (6.6)2

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

This Check Applies to the following Samples, MS, MSD, Blanks, and Standards:

Client Sample ID	Lab Sample ID	File ID	Analysis Date/Time
WG1555827-2CCAL	WG1555827-2	R318223	10/07/21 11:46
WG1555827-3LCS	WG1555827-3	R318224	10/07/21 12:28
WG1555827-4BLANK	WG1555827-4	R318226	10/07/21 15:03
138_AMBIENT-2	L2153835-03	R318234	10/07/21 20:52
132_LSV-19	L2153835-01	R318235	10/07/21 21:31
133_LSV-20	L2153835-02D	R318236	10/07/21 22:08
WG1555827-5DUP	WG1555827-5	R318238	10/07/21 23:27

Internal Standard Area and RT Summary

Form 8a

Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153835
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Instrument ID	: AIRPIANO3	Analysis Date	: 10/07/21 11:46:00
Sample No	: WG1555827-2	Lab File ID	: R318223

	Bromochloromethane		1,4-Difluorobenzene		Chlorobenzene-d5	
	Area	RT	Area	RT	Area	RT
WG1555827-2	399927	9.53	1080836	11.79	167175	16.53
Upper Limit	559898	9.86	1513170	12.12	234045	16.86
Lower Limit	239956	9.20	648502	11.46	100305	16.20
Sample ID						
WG1555827-3 LCS	402386	9.53	1081002	11.79	164632	16.53
WG1555827-4 BLANK	379198	9.53	1005136	11.80	156361	16.53
138_AMBIENT-2	392397	9.53	1024559	11.80	167057	16.53
132_LSV-19	410179	9.54	1083286	11.80	181287	16.54
133_LSV-20	420498	9.54	1130252	11.80	179677	16.54
SV1 DUP	400325	9.54	1094699	11.81	180596	16.54

Area Upper Limit = +40% of internal standard area
Area Lower Limit = - 40% of internal standard area

RT Upper Limit = +0.33 minutes of internal standard RT
RT Lower Limit = -0.33 minutes of internal standard RT

* Values outside of QC limits





Date Created: 02/01/21
Created By: Jason Hebert
File: PM10116-1
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Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
1,1,1-Trichloroethane	71-55-6	0.2	0.0501	ppbV	70-130			25	25			
1,1,2,2-Tetrachloroethane	79-34-5	0.2	0.0614	ppbV	70-130			25	25			
1,1,2-Trichloroethane	79-00-5	0.2	0.067	ppbV	70-130			25	25			
1,1-Dichloroethane	75-34-3	0.2	0.0628	ppbV	70-130			25	25			
1,1-Dichloroethene	75-35-4	0.2	0.0643	ppbV	70-130			25	25			
1,2,3-Trimethylbenzene	526-73-8	0.2	0.0576	ppbV	70-130			25	25			
1,2,4-Trichlorobenzene	120-82-1	0.2	0.0674	ppbV	70-130			25	25			
1,2,4-Trimethylbenzene	95-63-6	0.2	0.0368	ppbV	70-130			25	25			
1,2,4,5-Tetramethylbenzene	95-93-2	0.2	0.0604	ppbV	70-130			25	25			
1,2-Dibromoethane	106-93-4	0.2	0.0561	ppbV	70-130			25	25			
1,2-Dichlorobenzene	95-50-1	0.2	0.0628	ppbV	70-130			25	25			
1,2-Dichloroethane	107-06-2	0.2	0.0602	ppbV	70-130			25	25			
1,2-Dichloropropane	78-87-5	0.2	0.061	ppbV	70-130			25	25			
1,3,5-Trimethylbenzene	108-67-8	0.2	0.0675	ppbV	70-130			25	25			
1,3-Butadiene	106-99-0	0.2	0.067	ppbV	70-130			25	25			
1,3-Dichlorobenzene	541-73-1	0.2	0.0627	ppbV	70-130			25	25			
1,4-Dichlorobenzene	106-46-7	0.2	0.0636	ppbV	70-130			25	25			
1,4-Dioxane	123-91-1	0.2	0.0805	ppbV	70-130			25	25			
2,2,4-Trimethylpentane	540-84-1	0.2	0.0361	ppbV	70-130			25	25			
2-Butanone	78-93-3	0.5	0.0482	ppbV	70-130			25	25			
2-Hexanone	591-78-6	0.2	0.0648	ppbV	70-130			25	25			
2-Methylthiophene	554-14-3	0.2	0.0524	ppbV	70-130			25	25			
3-Methylthiophene	616-44-4	0.2	0.0393	ppbV	70-130			25	25			
3-Chloropropene	107-05-1	0.2	0.0585	ppbV	70-130			25	25			
2-Ethylthiophene	872-55-9	0.2	0.0407	ppbV	70-130			25	25			
4-Ethyltoluene	622-96-8	0.2	0.037	ppbV	70-130			25	25			
Acetone	67-64-1	1	0.689	ppbV	40-160			25	25			
Benzene	71-43-2	0.2	0.0487	ppbV	70-130			25	25			
Benzyl chloride	100-44-7	0.2	0.0482	ppbV	70-130			25	25			
Benzothiophene	95-15-8	0.5	0.077	ppbV	70-130			25	25			
Bromodichloromethane	75-27-4	0.2	0.0504	ppbV	70-130			25	25			
Bromoform	75-25-2	0.2	0.0641	ppbV	70-130			25	25			
Bromomethane	74-83-9	0.2	0.0773	ppbV	70-130			25	25			
Carbon disulfide	75-15-0	0.2	0.0559	ppbV	70-130			25	25			
Carbon tetrachloride	56-23-5	0.2	0.0499	ppbV	70-130			25	25			
Chlorobenzene	108-90-7	0.2	0.0624	ppbV	70-130			25	25			
Chloroethane	75-00-3	0.2	0.0805	ppbV	70-130			25	25			
Chloroform	67-66-3	0.2	0.0633	ppbV	70-130			25	25			
Chloromethane	74-87-3	0.2	0.0689	ppbV	70-130			25	25			
cis-1,2-Dichloroethene	156-59-2	0.2	0.117	ppbV	70-130			25	25			
cis-1,3-Dichloropropene	10061-01-5	0.2	0.0409	ppbV	70-130			25	25			
Cyclohexane	110-82-7	0.2	0.0368	ppbV	70-130			25	25			

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Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
Dibromochloromethane	124-48-1	0.2	0.0614	ppbV	70-130			25	25			
Dichlorodifluoromethane	75-71-8	0.2	0.0583	ppbV	70-130			25	25			
Diethyl carbonate	105-58-8	20	20	ppbV	70-130			25	25			
Dimethyl carbonate	616-38-6	20	20	ppbV	70-130			25	25			
Ethyl Alcohol	64-17-5	5	0.733	ppbV	40-160			25	25			
Ethyl Acetate	141-78-6	0.5	0.122	ppbV	70-130			25	25			
Ethylbenzene	100-41-4	0.2	0.0432	ppbV	70-130			25	25			
Ethyl methyl carbonate	623-53-0	20	20	ppbV	70-130			25	25			
1,1,2-Trichloro-1,2,2-Trifluoroethane	76-13-1	0.2	0.0656	ppbV	70-130			25	25			
1,2-Dichloro-1,1,2,2-tetrafluoroethane	76-14-2	0.2	0.0591	ppbV	70-130			25	25			
Hexachlorobutadiene	87-68-3	0.2	0.0529	ppbV	70-130			25	25			
iso-Propyl Alcohol	67-63-0	0.5	0.478	ppbV	40-160			25	25			
Methylene chloride	75-09-2	0.5	0.134	ppbV	70-130			25	25			
4-Methyl-2-pentanone	108-10-1	0.5	0.0421	ppbV	70-130			25	25			
Methyl tert butyl ether	1634-04-4	0.2	0.0525	ppbV	70-130			25	25			
Methyl Methacrylate	80-62-6	0.5	0.0697	ppbV	40-160			25	25			
p/m-Xylene	179601-23-1	0.4	0.091	ppbV	70-130			25	25			
o-Xylene	95-47-6	0.2	0.0453	ppbV	70-130			25	25			
Xylene (Total)	1330-20-7	0.2	0.0453	ppbV				25	25			
Heptane	142-82-5	0.2	0.047	ppbV	70-130			25	25			
n-Heptane	142-82-5	0.2	0.047	ppbV	70-130			25	25			
n-Hexane	110-54-3	0.2	0.0364	ppbV	70-130			25	25			
Propylene	115-07-1	0.5	0.0599	ppbV	70-130			25	25			
Styrene	100-42-5	0.2	0.0434	ppbV	70-130			25	25			
Tetrachloroethene	127-18-4	0.2	0.0655	ppbV	70-130			25	25			
Thiophene	110-02-1	0.2	0.0389	ppbV	70-130			25	25			
Tetrahydrofuran	109-99-9	0.5	0.0568	ppbV	70-130			25	25			
Toluene	108-88-3	0.2	0.052	ppbV	70-130			25	25			
trans-1,2-Dichloroethene	156-60-5	0.2	0.0643	ppbV	70-130			25	25			
1,2-Dichloroethene (total)	540-59-0	0.2	0.0643	ppbV				25	25			
trans-1,3-Dichloropropene	10061-02-6	0.2	0.0436	ppbV	70-130			25	25			
1,3-Dichloropropene, Total	542-75-6	0.2	0.0409	ppbV				25	25			
Trichloroethene	79-01-6	0.2	0.0505	ppbV	70-130			25	25			
Trichlorofluoromethane	75-69-4	0.2	0.0686	ppbV	70-130			25	25			
Vinyl acetate	108-05-4	1	0.0479	ppbV	70-130			25	25			
Vinyl bromide	593-60-2	0.2	0.0717	ppbV	70-130			25	25			
Vinyl chloride	75-01-4	0.2	0.0627	ppbV	70-130			25	25			
Naphthalene	91-20-3	0.2	0.0885	ppbV	70-130			25	25			
Total HC As Hexane	NONE	10	0.0364	ppbV	70-130			25	25			
Total VOCs As Toluene	NONE	10	0.052	ppbV	70-130			25	25			
Propane	74-98-6	0.5	0.132	ppbV	70-130			25	25			
Acrylonitrile	107-13-1	0.5	0.0555	ppbV	70-130			25	25			

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Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
Acrolein	107-02-8	0.5	0.0596	ppbV	60-113			25	25			
1,1,1,2-Tetrachloroethane	630-20-6	0.2	0.0561	ppbV	70-130			25	25			
Isopropylbenzene	98-82-8	0.2	0.0491	ppbV	70-130			25	25			
1,2,3-Trichloropropane	96-18-4	0.2	0.061	ppbV	70-130			25	25			
Acetonitrile	75-05-8	0.2	0.082	ppbV	70-130			25	25			
Bromobenzene	108-86-1	0.2	0.0613	ppbV	70-130			25	25			
Chlorodifluoromethane	75-45-6	0.2	0.0584	ppbV	70-130			25	25			
Dichlorofluoromethane	75-43-4	0.2	0.0807	ppbV	70-130			25	25			
Dibromomethane	74-95-3	0.2	0.0563	ppbV	70-130			25	25			
Pentane	109-66-0	0.2	0.0659	ppbV	70-130			25	25			
Octane	111-65-9	0.2	0.0445	ppbV	70-130			25	25			
Tertiary-Amyl Methyl Ether	994-05-8	0.2	0.0476	ppbV	70-130			25	25			
o-Chlorotoluene	95-49-8	0.2	0.0486	ppbV	70-130			25	25			
p-Chlorotoluene	106-43-4	0.2	0.056	ppbV	70-130			25	25			
2,2-Dichloropropane	594-20-7	0.2	0.0458	ppbV	70-130			25	25			
1,1-Dichloropropene	563-58-6	0.2	0.0457	ppbV	70-130			25	25			
Isopropyl Ether	108-20-3	0.2	0.0621	ppbV	70-130			25	25			
Ethyl-Tert-Butyl Ether	637-92-3	0.2	0.0422	ppbV	70-130			25	25			
1,2,3-Trichlorobenzene	87-61-6	0.2	0.0715	ppbV	70-130			25	25			
Ethyl ether	60-29-7	0.2	0.0737	ppbV	70-130			25	25			
n-Butylbenzene	104-51-8	0.2	0.044	ppbV	70-130			25	25			
sec-Butylbenzene	135-98-8	0.2	0.0429	ppbV	70-130			25	25			
tert-Butylbenzene	98-06-6	0.2	0.042	ppbV	70-130			25	25			
1,2-Dibromo-3-chloropropane	96-12-8	0.2	0.0495	ppbV	70-130			25	25			
p-Isopropyltoluene	99-87-6	0.2	0.052	ppbV	70-130			25	25			
n-Propylbenzene	103-65-1	0.2	0.0419	ppbV	70-130			25	25			
1,3-Dichloropropane	142-28-9	0.2	0.106	ppbV	70-130			25	25			
Methanol	67-56-1	5	1.84	ppbV	70-130			25	25			
Acetaldehyde	75-07-0	2.5	0.444	ppbV	70-130			25	25			
Butane	106-97-8	0.2	0.0646	ppbV	70-130			25	25			
Nonane (C9)	111-84-2	0.2	0.0463	ppbV	70-130			25	25			
Decane (C10)	124-18-5	0.2	0.0404	ppbV	70-130			25	25			
Undecane	1120-21-4	0.2	0.0427	ppbV	70-130			25	25			
Indane	496-11-7	0.2	0.0507	ppbV	70-130			25	25			
Indene	95-13-6	0.2	0.0433	ppbV	70-130			25	25			
1-Methylnaphthalene	90-12-0	1	0.466	ppbV	70-130			25	25			
Dodecane (C12)	112-40-3	0.2	0.0658	ppbV	70-130			25	25			
Butyl Acetate	123-86-4	0.5	0.126	ppbV	70-130			25	25			
tert-Butyl Alcohol	75-65-0	0.5	0.0466	ppbV	70-130			25	25			
2-Methylnaphthalene	91-57-6	1	0.393	ppbV	70-130			25	25			
1,2-Dichloroethane-d4	17060-07-0										70-130	
Toluene-d8	2037-26-5										70-130	

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Volatile Organics in Air: TO-15 (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

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Please Note that the RL information provided in this table is calculated using a 100% Solids factor. (Sol/ Solids only)
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Volatiles Sample Data

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153835-01
 Client ID : 132_LSV-19
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R318235
 Sample Amount : 250 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : 10/04/21 14:10
 Date Received : 10/04/21
 Date Analyzed : 10/07/21 21:31
 Dilution Factor : 1
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	0.411	0.200	--	2.03	0.989	--	
74-87-3	Chloromethane	ND	0.200	--	ND	0.413	--	U
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	ND	0.200	--	ND	1.12	--	U
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	0.539	0.500	--	1.87	1.74	--	
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
67-66-3	Chloroform	2.91	0.200	--	14.2	0.977	--	
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U
127-18-4	Tetrachloroethene	ND	0.200	--	ND	1.36	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153835-01
 Client ID : 132_LSV-19
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R318235
 Sample Amount : 250 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : 10/04/21 14:10
 Date Received : 10/04/21
 Date Analyzed : 10/07/21 21:31
 Dilution Factor : 1
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153835-02D
 Client ID : 133_LSV-20
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R318236
 Sample Amount : 35.0 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : 10/04/21 11:50
 Date Received : 10/04/21
 Date Analyzed : 10/07/21 22:08
 Dilution Factor : 7.143
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	ND	1.43	--	ND	7.07	--	U
74-87-3	Chloromethane	ND	1.43	--	ND	2.95	--	U
75-01-4	Vinyl chloride	ND	1.43	--	ND	3.66	--	U
75-00-3	Chloroethane	ND	1.43	--	ND	3.77	--	U
75-69-4	Trichlorofluoromethane	ND	1.43	--	ND	8.04	--	U
75-35-4	1,1-Dichloroethene	ND	1.43	--	ND	5.67	--	U
75-09-2	Methylene chloride	ND	3.57	--	ND	12.4	--	U
76-13-1	Freon-113	ND	1.43	--	ND	11.0	--	U
156-60-5	trans-1,2-Dichloroethene	ND	1.43	--	ND	5.67	--	U
75-34-3	1,1-Dichloroethane	ND	1.43	--	ND	5.79	--	U
156-59-2	cis-1,2-Dichloroethene	ND	1.43	--	ND	5.67	--	U
67-66-3	Chloroform	ND	1.43	--	ND	6.98	--	U
594-20-7	2,2-Dichloropropane	ND	1.43	--	ND	6.61	--	U
107-06-2	1,2-Dichloroethane	ND	1.43	--	ND	5.79	--	U
71-55-6	1,1,1-Trichloroethane	ND	1.43	--	ND	7.80	--	U
563-58-6	1,1-Dichloropropene	ND	1.43	--	ND	6.49	--	U
56-23-5	Carbon tetrachloride	ND	1.43	--	ND	9.00	--	U
78-87-5	1,2-Dichloropropane	ND	1.43	--	ND	6.61	--	U
75-27-4	Bromodichloromethane	ND	1.43	--	ND	9.58	--	U
79-01-6	Trichloroethene	ND	1.43	--	ND	7.69	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	1.43	--	ND	6.49	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	1.43	--	ND	6.49	--	U
79-00-5	1,1,2-Trichloroethane	ND	1.43	--	ND	7.80	--	U
142-28-9	1,3-Dichloropropane	ND	1.43	--	ND	6.61	--	U
124-48-1	Dibromochloromethane	ND	1.43	--	ND	12.2	--	U
127-18-4	Tetrachloroethene	ND	1.43	--	ND	9.70	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153835-02D
 Client ID : 133_LSV-20
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15
 Lab File ID : R318236
 Sample Amount : 35.0 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : 10/04/21 11:50
 Date Received : 10/04/21
 Date Analyzed : 10/07/21 22:08
 Dilution Factor : 7.143
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
630-20-6	1,1,1,2-Tetrachloroethane	ND	1.43	--	ND	9.82	--	U
108-90-7	Chlorobenzene	ND	1.43	--	ND	6.59	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	1.43	--	ND	9.82	--	U
96-18-4	1,2,3-Trichloropropane	ND	1.43	--	ND	8.62	--	U
95-49-8	2-Chlorotoluene	ND	1.43	--	ND	7.40	--	U
106-43-4	4-Chlorotoluene	ND	1.43	--	ND	7.40	--	U
541-73-1	1,3-Dichlorobenzene	ND	1.43	--	ND	8.60	--	U
106-46-7	1,4-Dichlorobenzene	ND	1.43	--	ND	8.60	--	U
95-50-1	1,2-Dichlorobenzene	ND	1.43	--	ND	8.60	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	1.43	--	ND	13.8	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	1.43	--	ND	10.6	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	1.43	--	ND	10.6	--	U
87-68-3	Hexachlorobutadiene	ND	1.43	--	ND	15.3	--	U
542-75-6	1,3-Dichloropropene, Total	ND	1.43	--	ND	6.49	--	U

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153835-03
 Client ID : 138_AMBIENT-2
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R318234
 Sample Amount : 250 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : 10/04/21 15:15
 Date Received : 10/04/21
 Date Analyzed : 10/07/21 20:52
 Dilution Factor : 1
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	0.417	0.200	--	2.06	0.989	--	
74-87-3	Chloromethane	0.521	0.200	--	1.08	0.413	--	
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	ND	0.200	--	ND	1.12	--	U
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
67-66-3	Chloroform	ND	0.200	--	ND	0.977	--	U
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U
127-18-4	Tetrachloroethene	ND	0.200	--	ND	1.36	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153835-03
 Client ID : 138_AMBIENT-2
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R318234
 Sample Amount : 250 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : 10/04/21 15:15
 Date Received : 10/04/21
 Date Analyzed : 10/07/21 20:52
 Dilution Factor : 1
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U

Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : WG1555827-4
 Client ID : WG1555827-4BLANK
 Sample Location :
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R318226
 Sample Amount : 250 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : NA
 Date Received : NA
 Date Analyzed : 10/07/21 15:03
 Dilution Factor : 1
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-71-8	Dichlorodifluoromethane	ND	0.200	--	ND	0.989	--	U
74-87-3	Chloromethane	ND	0.200	--	ND	0.413	--	U
75-01-4	Vinyl chloride	ND	0.200	--	ND	0.511	--	U
75-00-3	Chloroethane	ND	0.200	--	ND	0.528	--	U
75-69-4	Trichlorofluoromethane	ND	0.200	--	ND	1.12	--	U
75-35-4	1,1-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-09-2	Methylene chloride	ND	0.500	--	ND	1.74	--	U
76-13-1	Freon-113	ND	0.200	--	ND	1.53	--	U
156-60-5	trans-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
75-34-3	1,1-Dichloroethane	ND	0.200	--	ND	0.809	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.200	--	ND	0.793	--	U
67-66-3	Chloroform	ND	0.200	--	ND	0.977	--	U
594-20-7	2,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
107-06-2	1,2-Dichloroethane	ND	0.200	--	ND	0.809	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.200	--	ND	1.09	--	U
542-75-6	1,3-Dichloropropene, Total	ND	0.200	--	ND	0.908	--	U
563-58-6	1,1-Dichloropropene	ND	0.200	--	ND	0.908	--	U
56-23-5	Carbon tetrachloride	ND	0.200	--	ND	1.26	--	U
78-87-5	1,2-Dichloropropane	ND	0.200	--	ND	0.924	--	U
75-27-4	Bromodichloromethane	ND	0.200	--	ND	1.34	--	U
79-01-6	Trichloroethene	ND	0.200	--	ND	1.07	--	U
10061-01-5	cis-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
10061-02-6	trans-1,3-Dichloropropene	ND	0.200	--	ND	0.908	--	U
79-00-5	1,1,2-Trichloroethane	ND	0.200	--	ND	1.09	--	U
142-28-9	1,3-Dichloropropane	ND	0.200	--	ND	0.924	--	U
124-48-1	Dibromochloromethane	ND	0.200	--	ND	1.70	--	U



Results Summary

Form 1

Volatile Organics in Air

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : WG1555827-4
 Client ID : WG1555827-4BLANK
 Sample Location :
 Sample Matrix : AIR
 Analytical Method : 48,TO-15
 Lab File ID : R318226
 Sample Amount : 250 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : NA
 Date Received : NA
 Date Analyzed : 10/07/21 15:03
 Dilution Factor : 1
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
127-18-4	Tetrachloroethene	ND	0.200	--	ND	1.36	--	U
630-20-6	1,1,1,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
108-90-7	Chlorobenzene	ND	0.200	--	ND	0.921	--	U
79-34-5	1,1,2,2-Tetrachloroethane	ND	0.200	--	ND	1.37	--	U
96-18-4	1,2,3-Trichloropropane	ND	0.200	--	ND	1.21	--	U
95-49-8	2-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
106-43-4	4-Chlorotoluene	ND	0.200	--	ND	1.04	--	U
541-73-1	1,3-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
106-46-7	1,4-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
95-50-1	1,2-Dichlorobenzene	ND	0.200	--	ND	1.20	--	U
96-12-8	1,2-Dibromo-3-chloropropane	ND	0.200	--	ND	1.93	--	U
120-82-1	1,2,4-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-61-6	1,2,3-Trichlorobenzene	ND	0.200	--	ND	1.48	--	U
87-68-3	Hexachlorobutadiene	ND	0.200	--	ND	2.13	--	U

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318234.D
 Acq On : 7 Oct 2021 8:52 PM
 Operator : AIRPIAN03:RY
 Sample : L2153835-03,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:07:52 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : ROSSVILLE - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.53	49	392397	10.000	ppbV	-0.03
Standard Area = 399927			Recovery =		98.12%	
43) 1,4-difluorobenzene	11.80	114	1024559	10.000	ppbV	-0.03
Standard Area = 1080836			Recovery =		94.79%	
67) chlorobenzene-D5	16.53	54	167057	10.000	ppbV	-0.02
Standard Area = 167175			Recovery =		99.93%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.98	85	15295	0.417	ppbV	98
6) chloromethane	4.16	50	9216	0.521	ppbV	98
9) vinyl chloride	0.00		0	N.D.		
14) chloroethane	0.00		0	N.D.		
21) trichlorofluoromethane	6.06	101	5690	0.155	ppbV	97
26) 1,1-dichloroethene	0.00		0	N.D.		
28) methylene chloride	6.99	49	4064	0.144	ppbV	95
31) Freon 113	7.32	101	2371	0.058	ppbV	91
32) trans-1,2-dichloroethene	0.00		0	N.D.		
33) 1,1-dichloroethane	0.00		0	N.D.		
37) cis-1,2-dichloroethene	0.00		0	N.D.		
39) chloroform	9.70		0	N.D.		
41) 2,2-dichloropropane	0.00		0	N.D.		
42) 1,2-dichloroethane	0.00		0	N.D.		
48) 1,1,1-trichloroethane	0.00		0	N.D.		
49) 1,1-dichloropropene	11.37		0	N.D.		
52) carbon tetrachloride	11.54	117	1864	0.065	ppbV	92
56) 1,2-dichloropropane	0.00		0	N.D.		
57) bromodichloromethane	12.65		0	N.D.		
59) trichloroethene	0.00		0	N.D.		
63) cis-1,3-dichloropropene	0.00		0	N.D.		
65) trans-1,3-dichloropropene	0.00		0	N.D.		
66) 1,1,2-trichloroethane	0.00		0	N.D.		
71) 1,3-dichloropropane	0.00		0	N.D.		
74) dibromochloromethane	0.00		0	N.D.		
78) tetrachloroethene	15.93		0	N.D.		
79) 1,1,1,2-tetrachloroethane	0.00		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318234.D
 Acq On : 7 Oct 2021 8:52 PM
 Operator : AIRPIAN03:RY
 Sample : L2153835-03,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:07:52 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : ROSSVILLE - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	0.00		0		N.D.	
86) 1,1,2,2-tetrachloroethane	0.00		0		N.D.	
88) 1,2,3-trichloropropane	0.00		0		N.D.	
93) 2-chlorotoluene	0.00		0		N.D.	
95) 4-chlorotoluene	0.00		0		N.D.	
102) 1,3-dichlorobenzene	19.15		0		N.D.	
103) 1,4-dichlorobenzene	19.15		0		N.D.	
107) 1,2-dichlorobenzene	0.00		0		N.D.	
111) 1,2-dibromo-3-chloropr...	0.00		0		N.D.	
115) 1,2,4-trichlorobenzene	0.00		0		N.D.	
117) 1,2,3-trichlorobenzene	0.00		0		N.D.	
119) hexachlorobutadiene	0.00		0		N.D.	

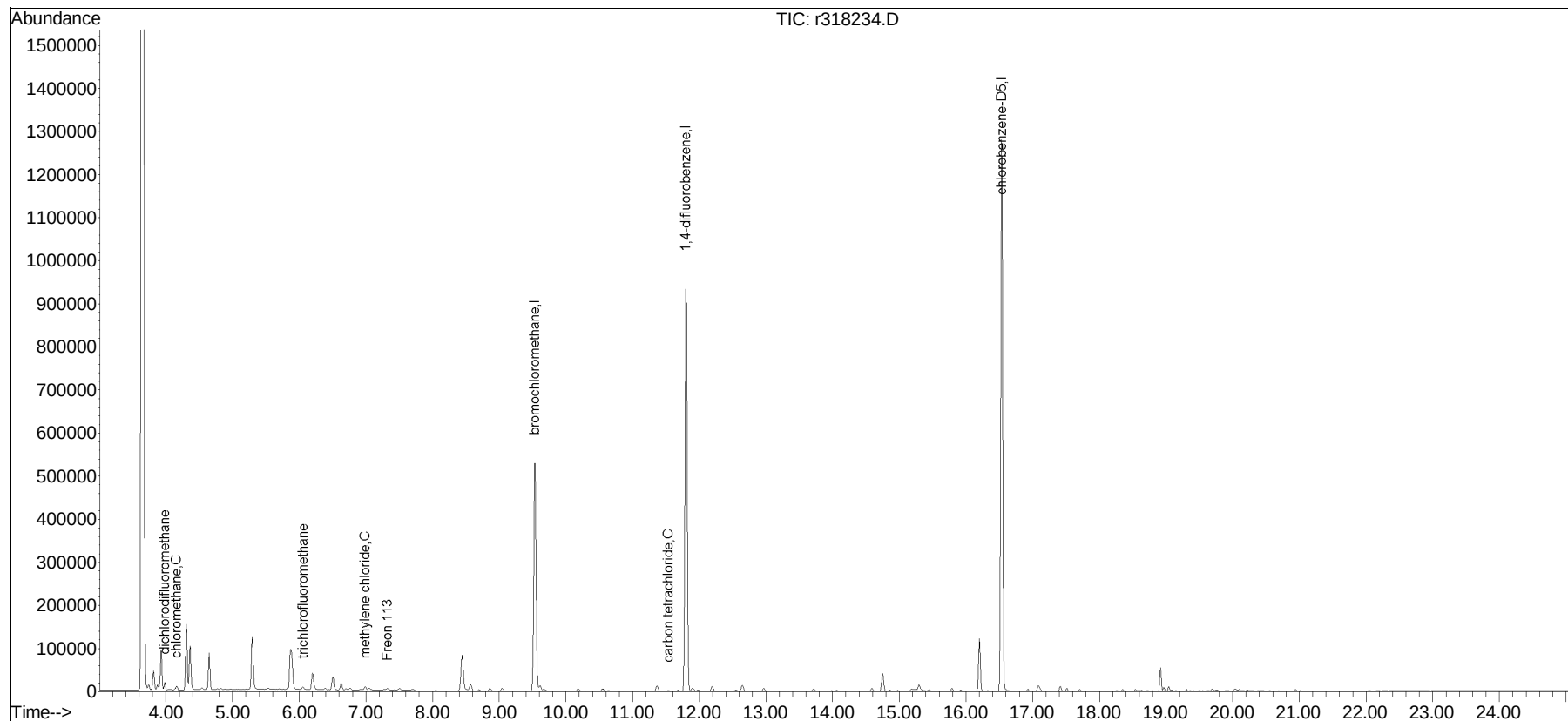
(#) = qualifier out of range (m) = manual integration (+) = signals summed

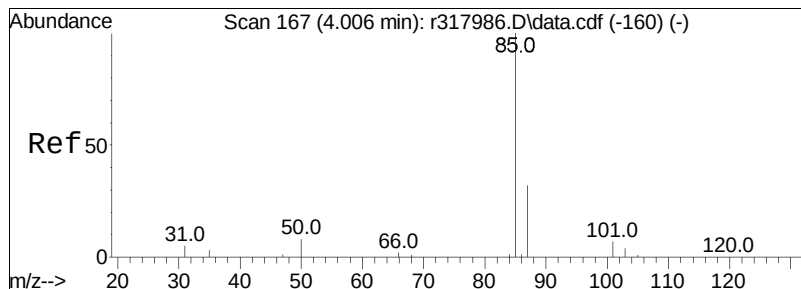
Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318234.D
 Acq On : 7 Oct 2021 8:52 PM
 Operator : AIRPIANO3:RY
 Sample : L2153835-03, 3, 250, 250
 Misc : WG1555827, ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:07:52 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

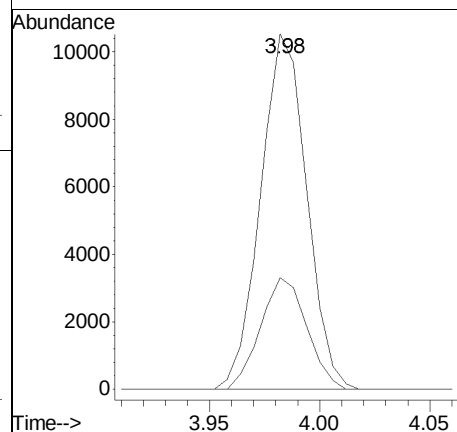
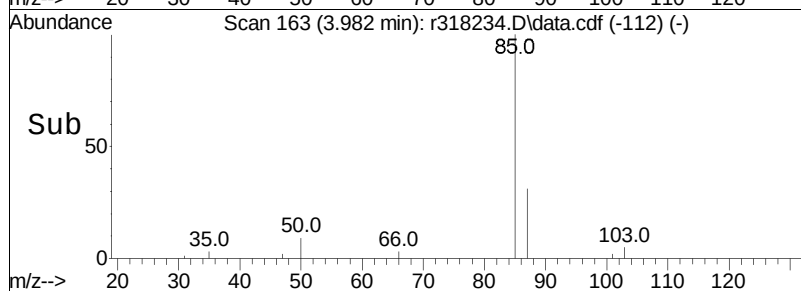
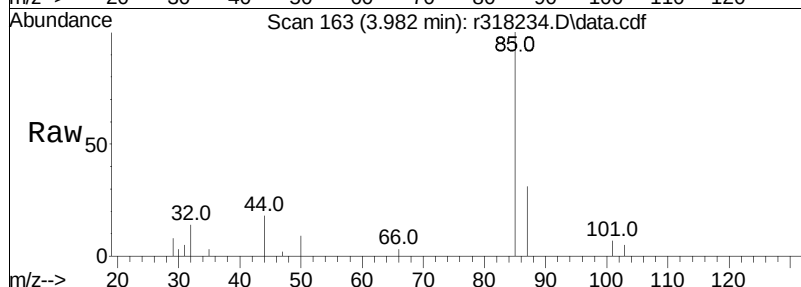
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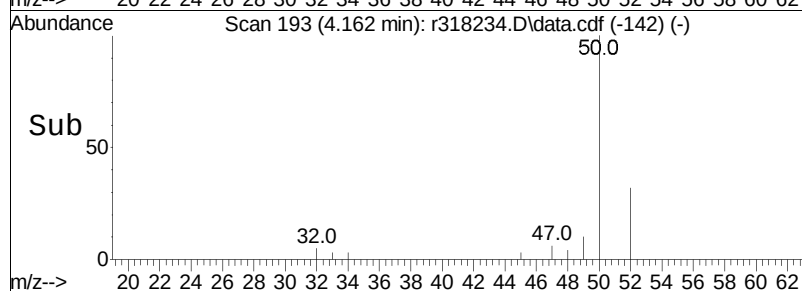
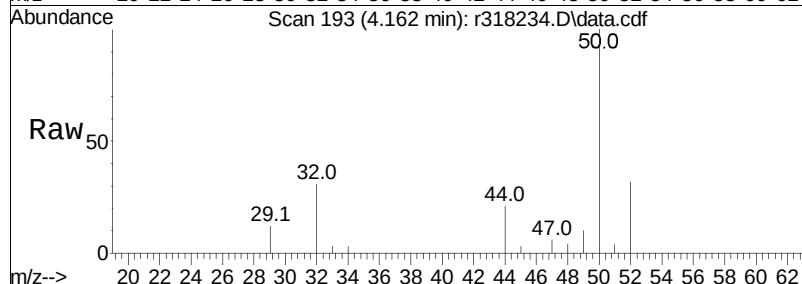
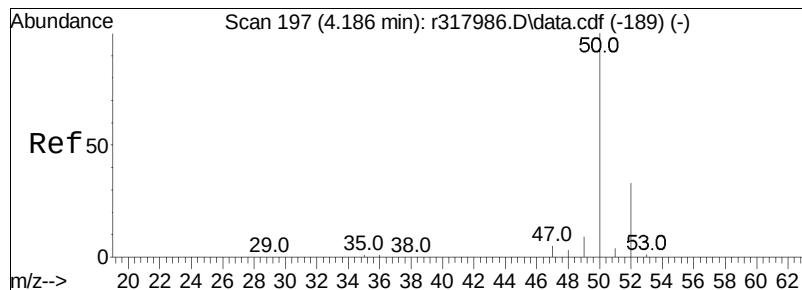




#5
dichlorodifluoromethane
Concen: 0.42 ppbV
RT: 3.98 min Scan# 163
Delta R.T. -0.024 min
Lab File: r318234.D
Acq: 7 Oct 2021 8:52 PM

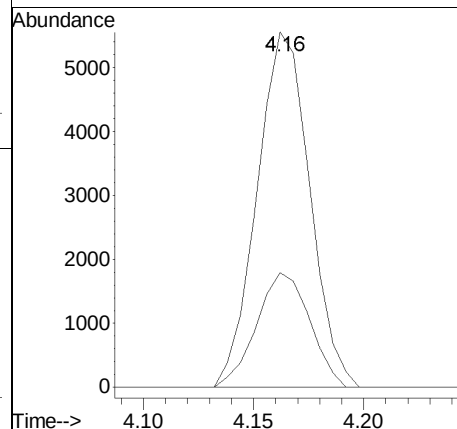
Tgt Ion: 85 Resp: 15295
Ion Ratio Lower Upper
85 100
87 31.5 25.8 38.8

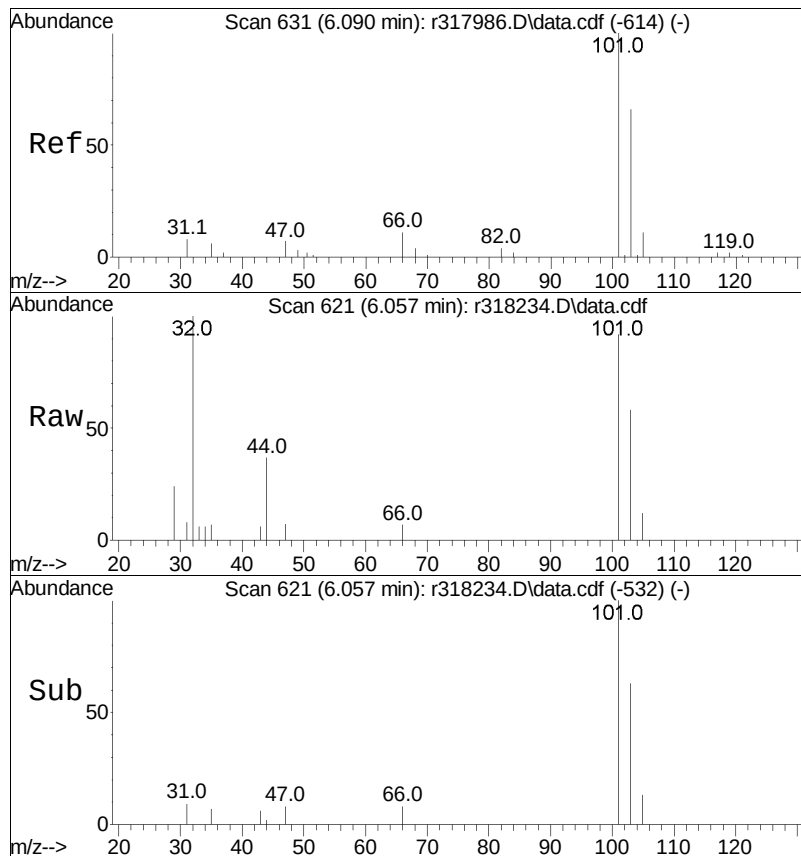




#6
 chloromethane
 Concen: 0.52 ppbV
 RT: 4.16 min Scan# 193
 Delta R.T. -0.024 min
 Lab File: r318234.D
 Acq: 7 Oct 2021 8:52 PM

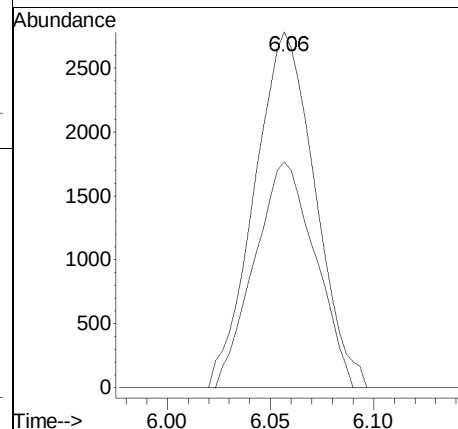
Tgt	Ion	Ratio	Lower	Upper
50	100			
52	32.3		26.7	40.1

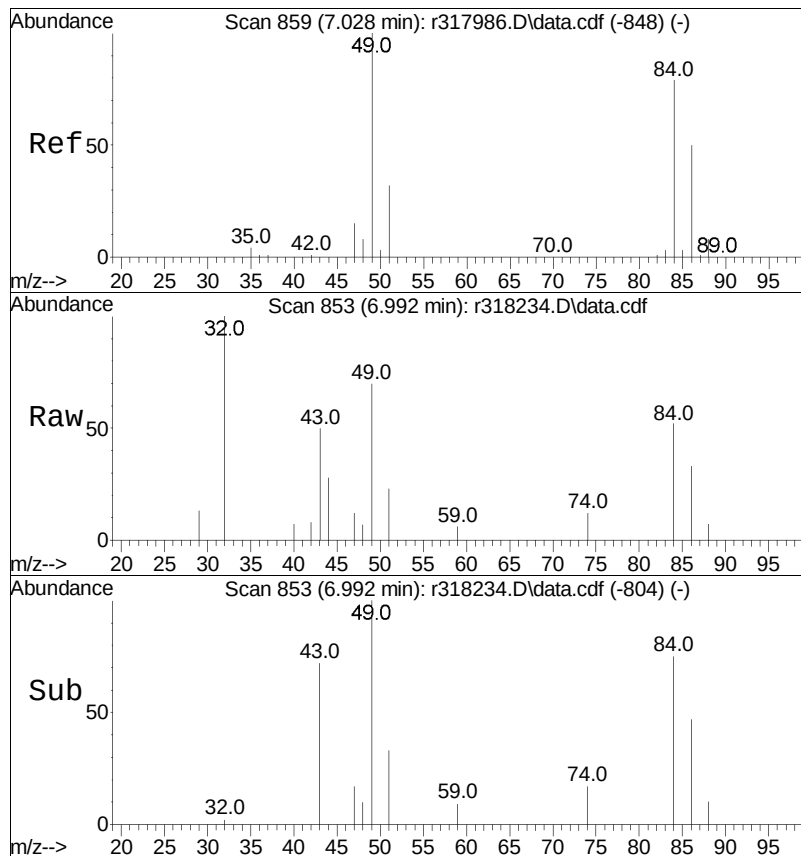




#21
trichlorofluoromethane
Concen: 0.16 ppbV
RT: 6.06 min Scan# 621
Delta R.T. -0.033 min
Lab File: r318234.D
Acq: 7 Oct 2021 8:52 PM

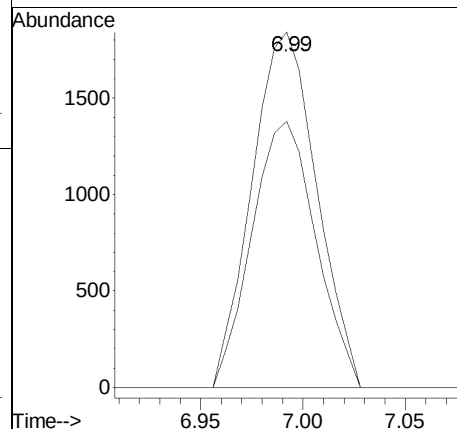
Tgt	Ion	Ratio	Lower	Upper
101	101	100		
103	63.5	52.4	78.6	

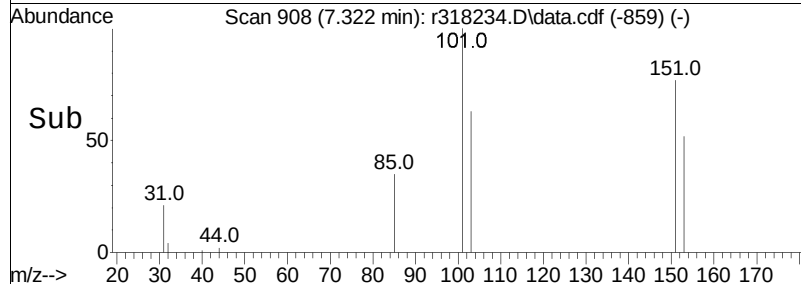
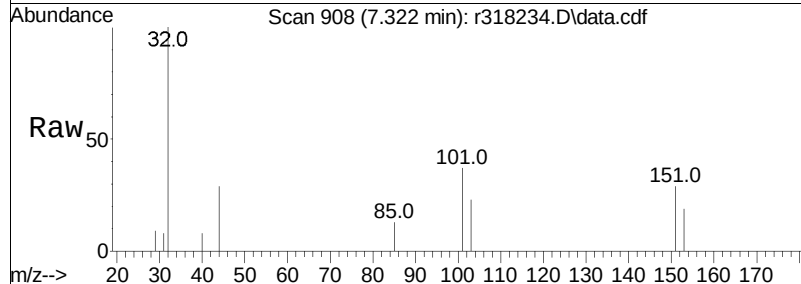
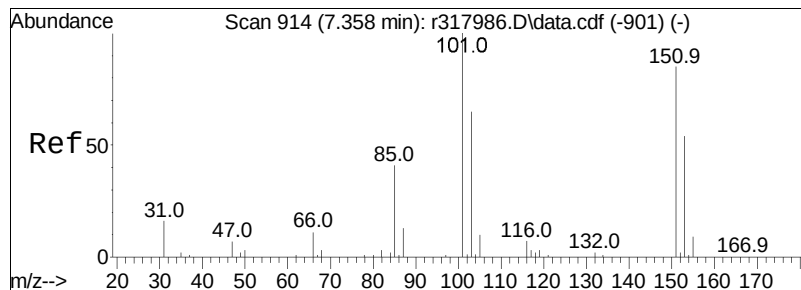




#28
 methylene chloride
 Concen: 0.14 ppbV
 RT: 6.99 min Scan# 853
 Delta R.T. -0.036 min
 Lab File: r318234.D
 Acq: 7 Oct 2021 8:52 PM

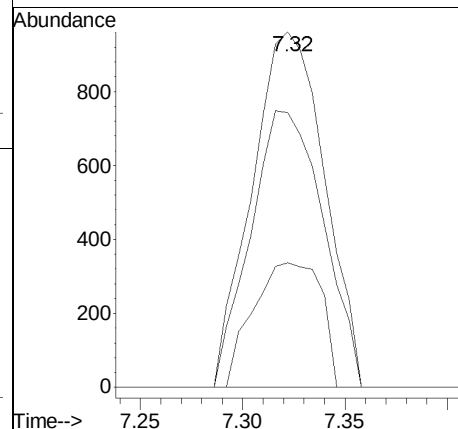
Tgt Ion:	49	84	Ratio	Lower	Upper
Resp:	4064				
Ion Ratio	100	74.9			
		63.5			95.3

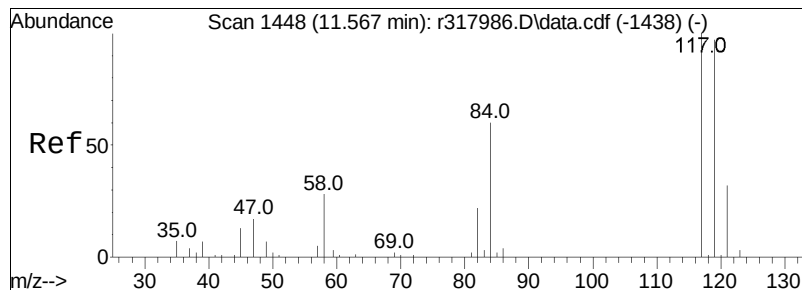




#31
 Freon 113
 Concen: 0.06 ppbV
 RT: 7.32 min Scan# 908
 Delta R.T. -0.036 min
 Lab File: r318234.D
 Acq: 7 Oct 2021 8:52 PM

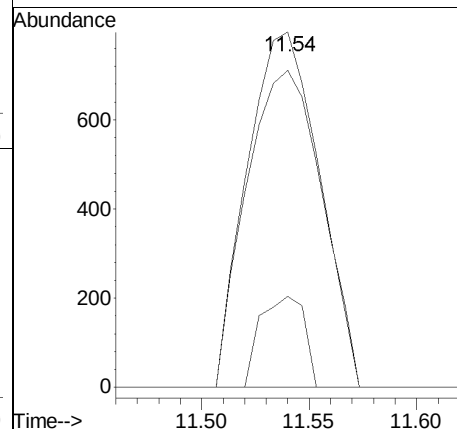
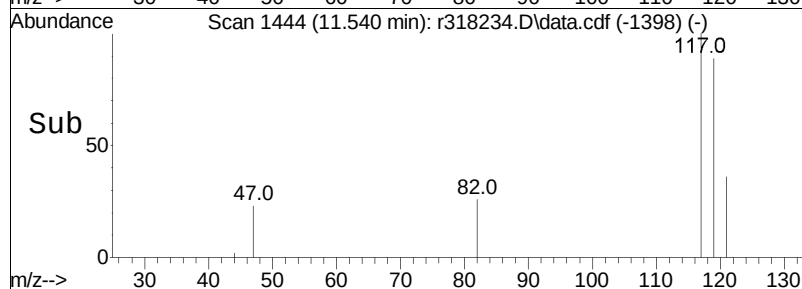
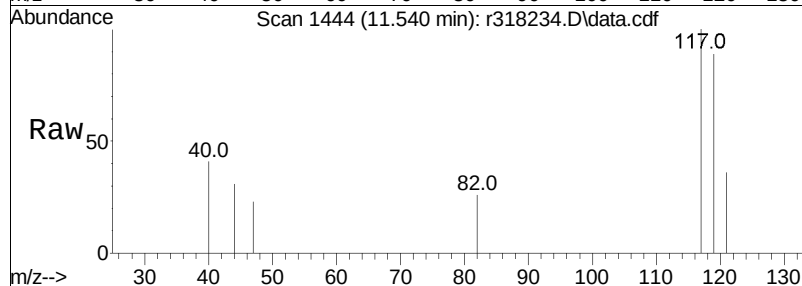
Tgt Ion:	101	Resp:	2371
Ion Ratio	Lower	Upper	
101	100		
85	35.1	33.0	49.6
151	77.3	67.8	101.8





#52
carbon tetrachloride
Concen: 0.06 ppbV
RT: 11.54 min Scan# 1444
Delta R.T. -0.027 min
Lab File: r318234.D
Acq: 7 Oct 2021 8:52 PM

Tgt Ion	Ratio	Lower	Upper
117	100		
119	89.2	77.9	116.9
82	25.6	18.0	27.0



Manual Integration/Negative Proof Report

Data Path	: O:\Forensics\Data\Airpiano3Q	Method	: TFS3_210926.M
Data File	: r318234.D	Operator	: AIRPIAN03:RY
Date Inj'd	: 10/7/2020 0:8: 2	Instrument	:
Sample	: L2153835-03,3,250,250	Quant Date	: 10/8/2021 8:00 am

There are no manual integrations or false positives in this file.

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318235.D
 Acq On : 7 Oct 2021 9:31 PM
 Operator : AIRPIAN03:RY
 Sample : L2153835-01,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:09:32 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : ROSSVILLE - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) bromochloromethane	9.54	49	410179	10.000	ppbV	-0.03
Standard Area = 399927			Recovery	=	102.56%	
43) 1,4-difluorobenzene	11.80	114	1083286	10.000	ppbV	-0.03
Standard Area = 1080836			Recovery	=	100.23%	
67) chlorobenzene-D5	16.54	54	181287	10.000	ppbV	-0.02
Standard Area = 167175			Recovery	=	108.44%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.98	85	15732	0.411	ppbV	100
6) chloromethane	4.16	50	3291	0.178	ppbV	99
9) vinyl chloride	0.00		0	N.D.		
14) chloroethane	5.12		0	N.D.		
21) trichlorofluoromethane	6.06	101	7604	0.199	ppbV	98
26) 1,1-dichloroethene	6.90		0	N.D.		
28) methylene chloride	7.00	49	15865	0.539	ppbV	95
31) Freon 113	7.33	101	2681	0.063	ppbV	97
32) trans-1,2-dichloroethene	0.00		0	N.D.		
33) 1,1-dichloroethane	0.00		0	N.D.	d	
37) cis-1,2-dichloroethene	0.00		0	N.D.		
39) chloroform	9.70	83	129924	2.908	ppbV	97
41) 2,2-dichloropropane	9.75		0	N.D.		
42) 1,2-dichloroethane	0.00		0	N.D.		
48) 1,1,1-trichloroethane	0.00		0	N.D.		
49) 1,1-dichloropropene	0.00		0	N.D.	d	
52) carbon tetrachloride	11.54	117	2068	0.068	ppbV #	95
56) 1,2-dichloropropane	0.00		0	N.D.		
57) bromodichloromethane	0.00		0	N.D.	d	
59) trichloroethene	0.00		0	N.D.		
63) cis-1,3-dichloropropene	0.00		0	N.D.		
65) trans-1,3-dichloropropene	0.00		0	N.D.		
66) 1,1,2-trichloroethane	14.52		0	N.D.		
71) 1,3-dichloropropane	14.75		0	N.D.		
74) dibromochloromethane	0.00		0	N.D.		
78) tetrachloroethene	15.93	166	2827	0.065	ppbV	95
79) 1,1,1,2-tetrachloroethane	0.00		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318235.D
 Acq On : 7 Oct 2021 9:31 PM
 Operator : AIRPIAN03:RY
 Sample : L2153835-01,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:09:32 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : ROSSVILLE - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	0.00		0		N.D.	d
86) 1,1,2,2-tetrachloroethane	0.00		0		N.D.	d
88) 1,2,3-trichloropropane	17.51		0		N.D.	
93) 2-chlorotoluene	0.00		0		N.D.	d
95) 4-chlorotoluene	0.00		0		N.D.	d
102) 1,3-dichlorobenzene	0.00		0		N.D.	d
103) 1,4-dichlorobenzene	19.15		0		N.D.	
107) 1,2-dichlorobenzene	0.00		0		N.D.	
111) 1,2-dibromo-3-chloropr...	0.00		0		N.D.	
115) 1,2,4-trichlorobenzene	0.00		0		N.D.	
117) 1,2,3-trichlorobenzene	0.00		0		N.D.	
119) hexachlorobutadiene	0.00		0		N.D.	

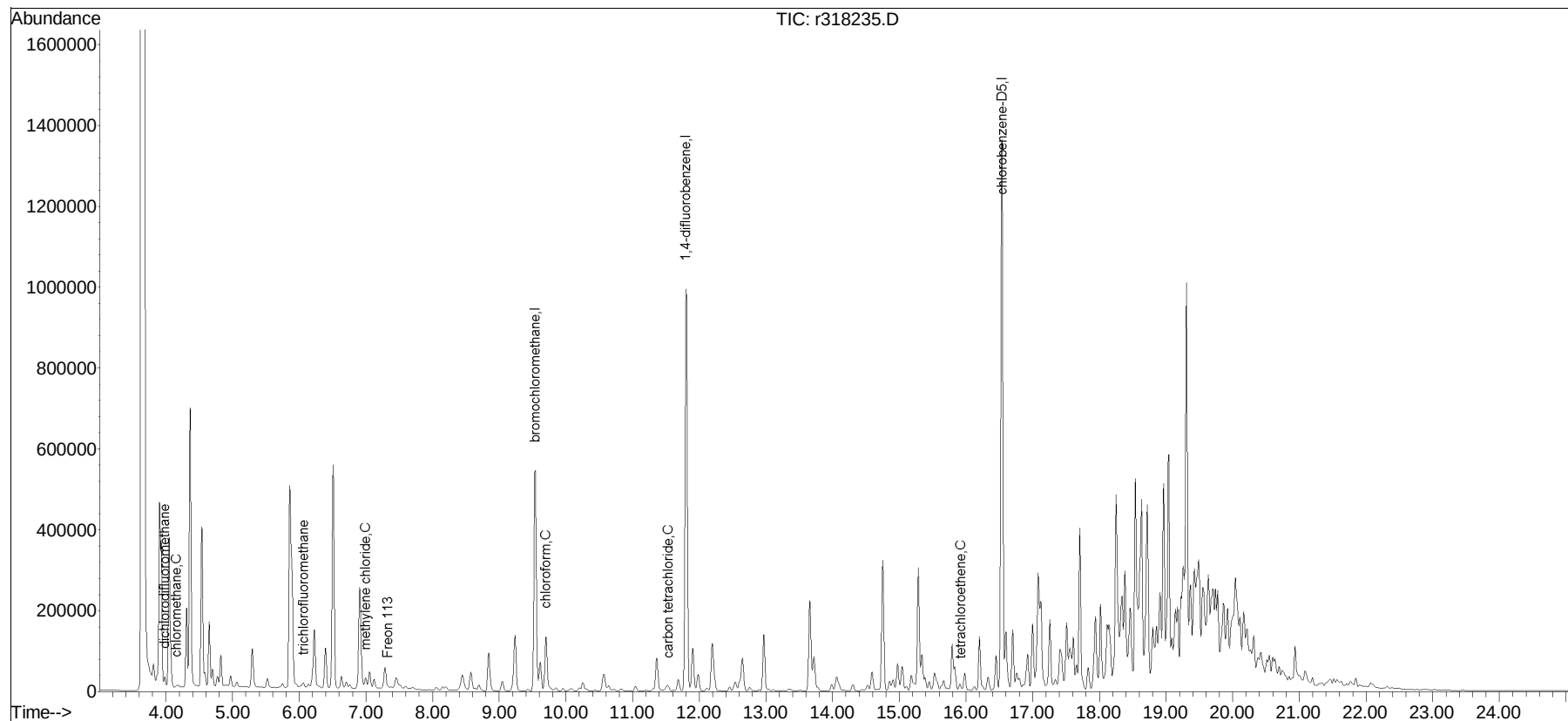
(#) = qualifier out of range (m) = manual integration (+) = signals summed

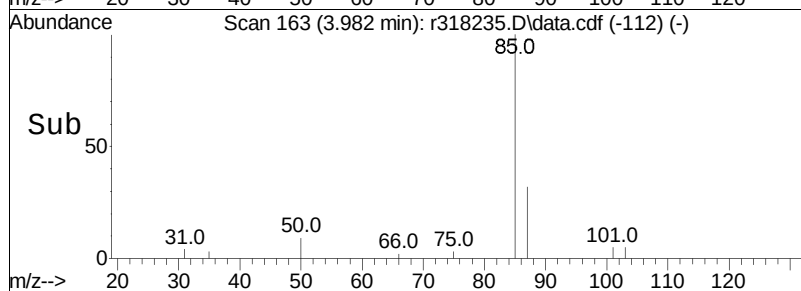
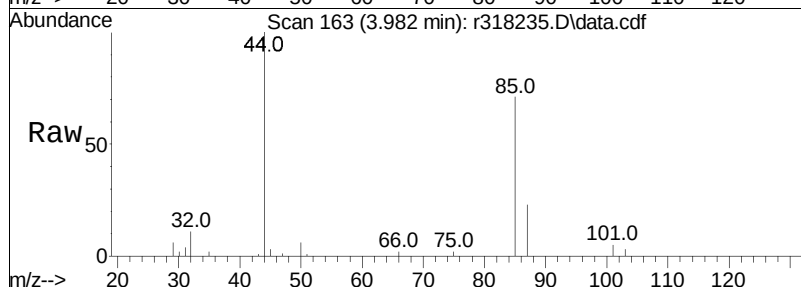
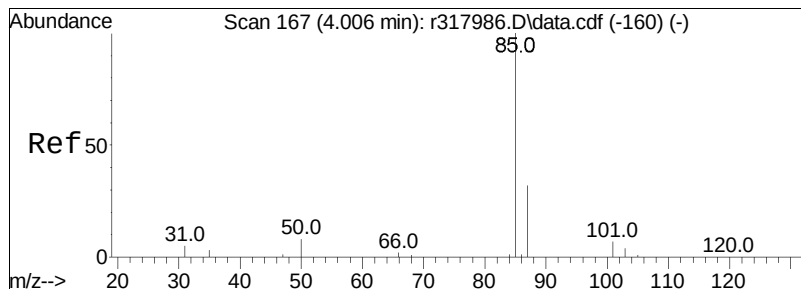
Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318235.D
 Acq On : 7 Oct 2021 9:31 PM
 Operator : AIRPIANO3:RY
 Sample : L2153835-01, 3, 250, 250
 Misc : WG1555827, ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:09:32 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

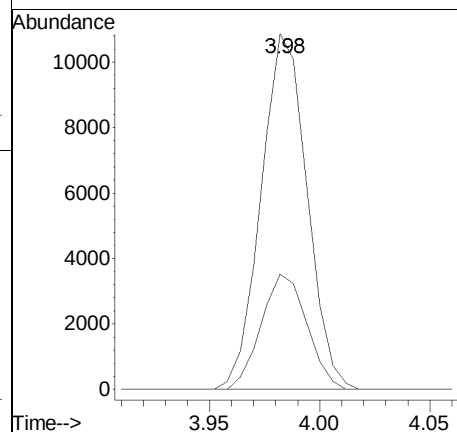
Sub List : ROSSVILLE - All compounds listed\10\1007T\r318223.D

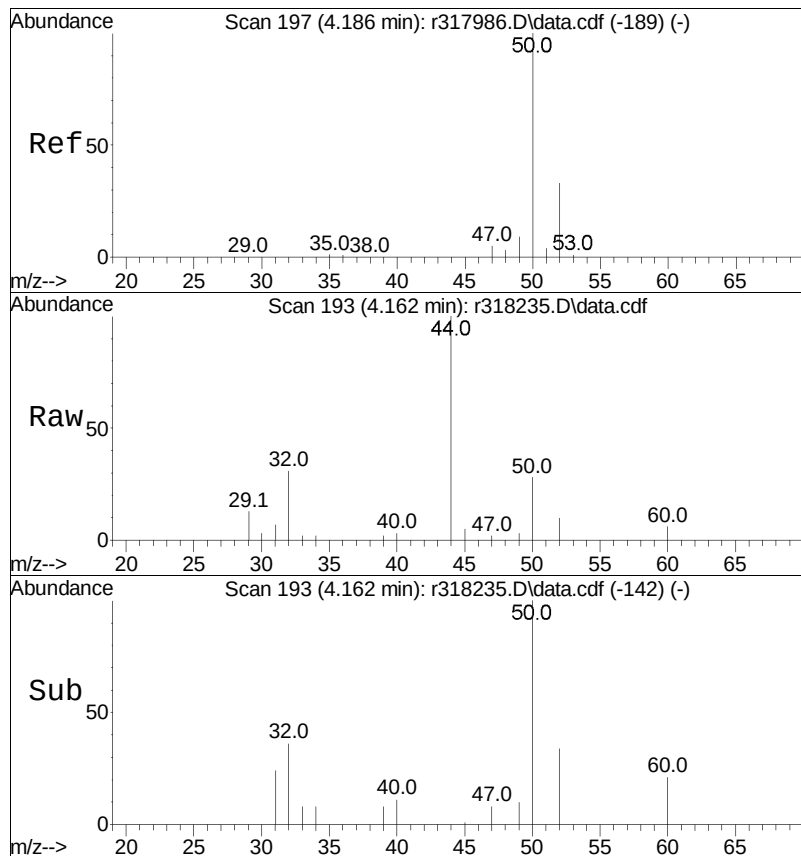




#5
dichlorodifluoromethane
Concen: 0.41 ppbV
RT: 3.98 min Scan# 163
Delta R.T. -0.024 min
Lab File: r318235.D
Acq: 7 Oct 2021 9:31 PM

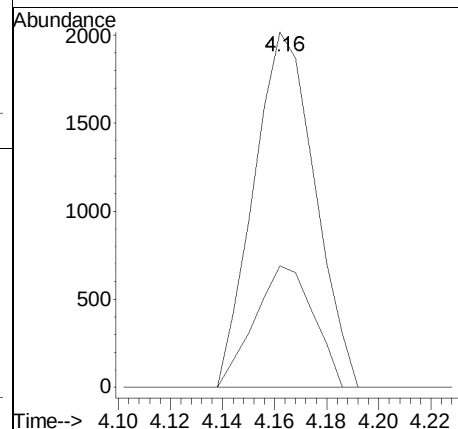
Tgt Ion: 85 Resp: 15732
Ion Ratio Lower Upper
85 100
87 32.4 25.8 38.8

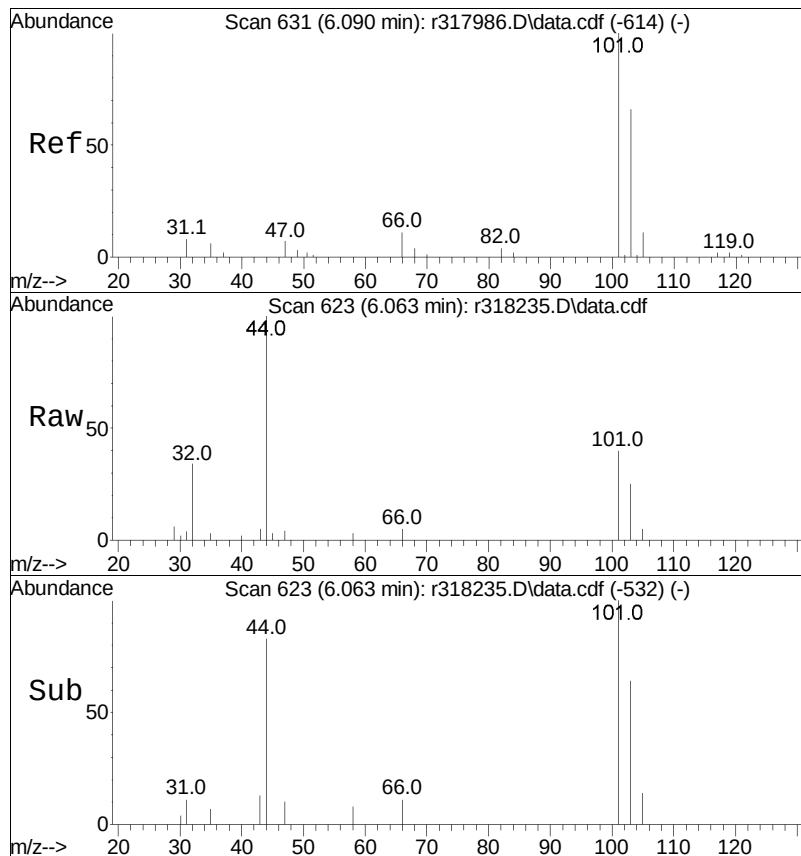




#6
 chloromethane
 Concen: 0.18 ppbV
 RT: 4.16 min Scan# 193
 Delta R.T. -0.024 min
 Lab File: r318235.D
 Acq: 7 Oct 2021 9:31 PM

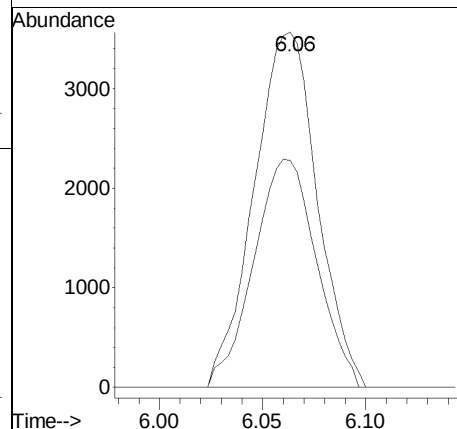
Tgt Ion	Ratio	Lower	Upper
50	100		
52	34.2	26.7	40.1

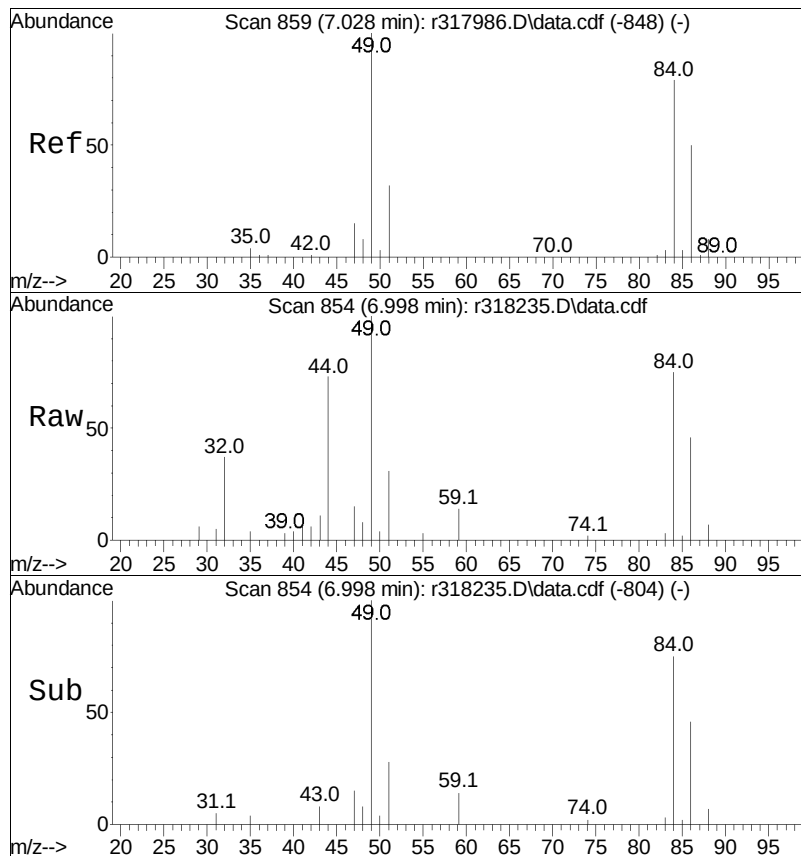




#21
trichlorofluoromethane
Concen: 0.20 ppbV
RT: 6.06 min Scan# 623
Delta R.T. -0.027 min
Lab File: r318235.D
Acq: 7 Oct 2021 9:31 PM

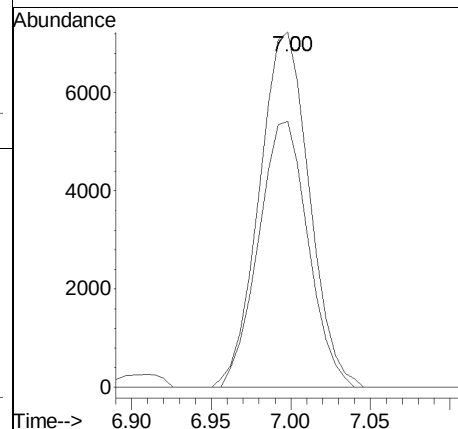
Tgt	Ion	Ratio	Resp	Lower	Upper
101	101	100	7604		
103	63.9	52.4	78.6		

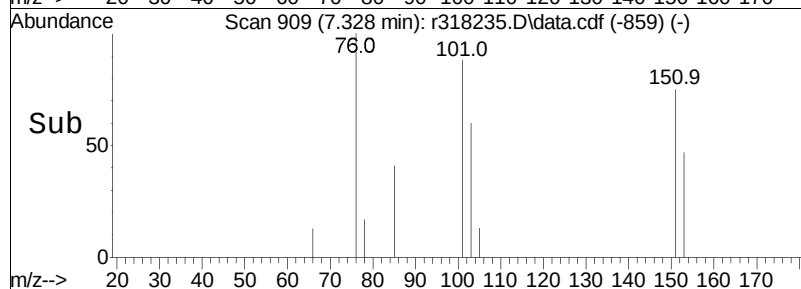
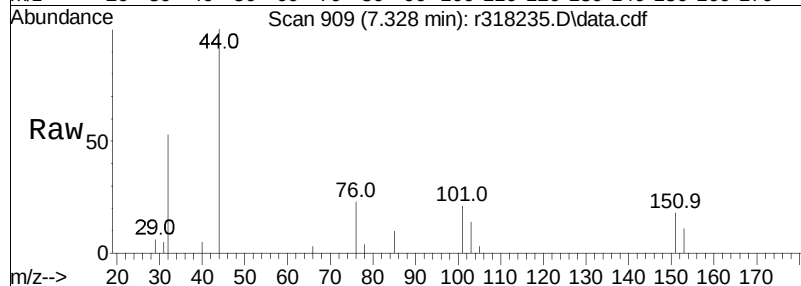
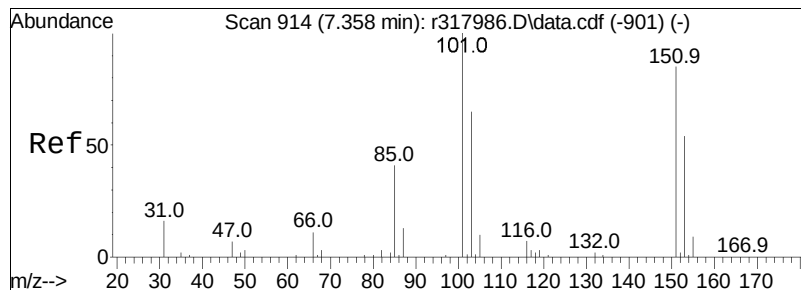




#28
 methylene chloride
 Concen: 0.54 ppbV
 RT: 7.00 min Scan# 854
 Delta R.T. -0.030 min
 Lab File: r318235.D
 Acq: 7 Oct 2021 9:31 PM

Tgt	Ion	Resp	Lower	Upper
49	100			
84	74.9	63.5	95.3	





#31

Freon 113

Concen: 0.06 ppbV

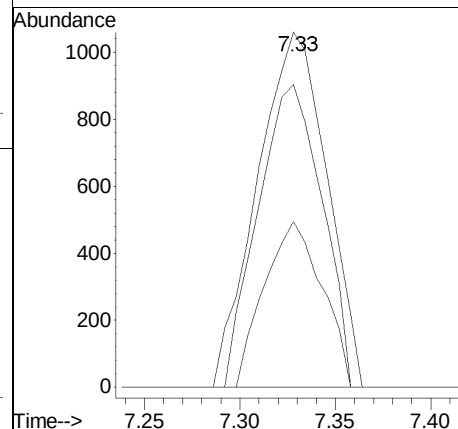
RT: 7.33 min Scan# 909

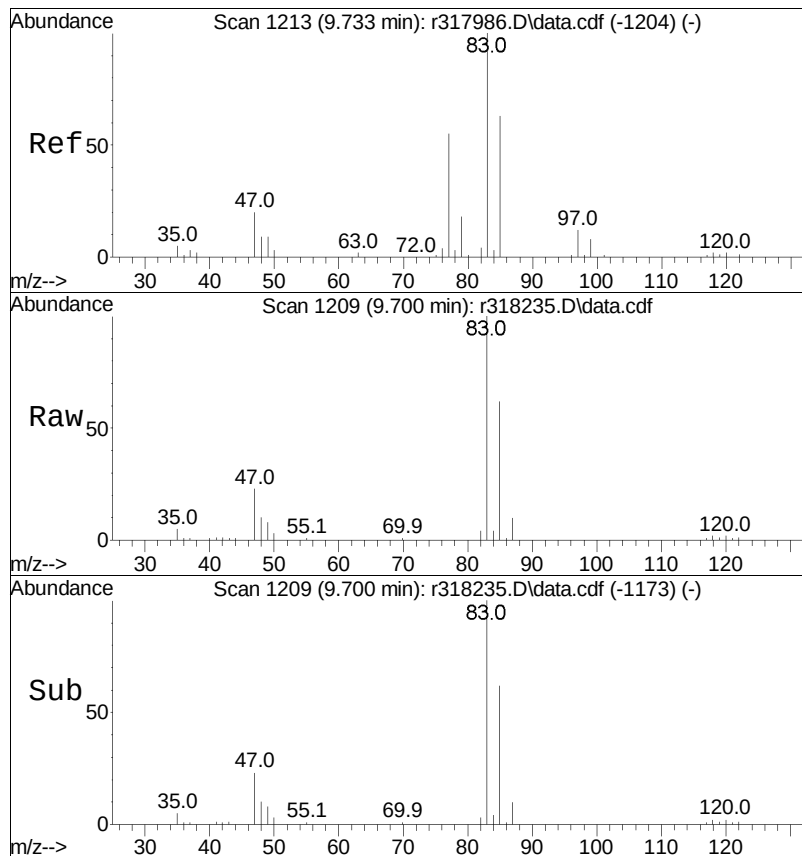
Delta R.T. -0.030 min

Lab File: r318235.D

Acq: 7 Oct 2021 9:31 PM

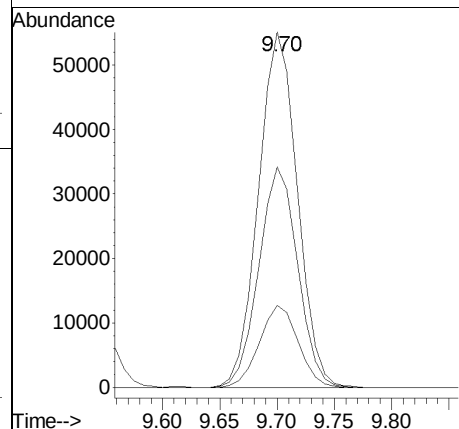
Tgt Ion:	101	Resp:	2681
Ion Ratio	Lower	Upper	
101	100		
85	46.7	33.0	49.6
151	85.2	67.8	101.8

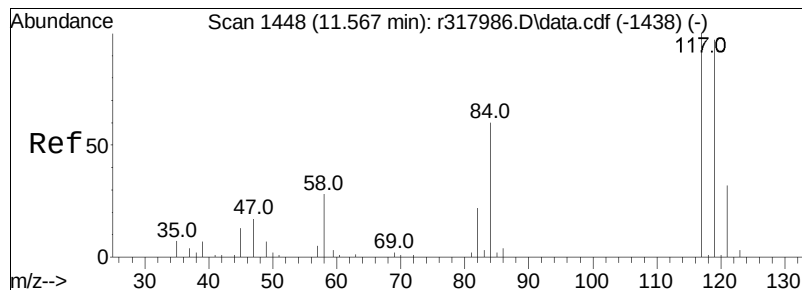




#39
 chloroform
 Concen: 2.91 ppbV
 RT: 9.70 min Scan# 1209
 Delta R.T. -0.033 min
 Lab File: r318235.D
 Acq: 7 Oct 2021 9:31 PM

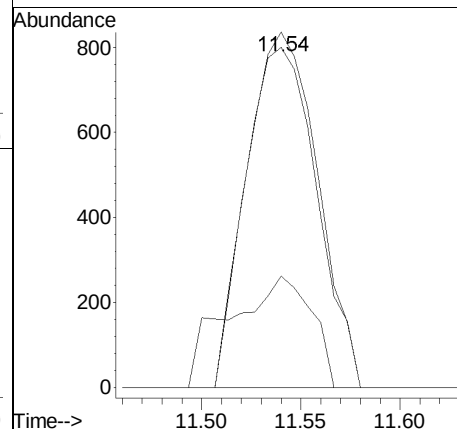
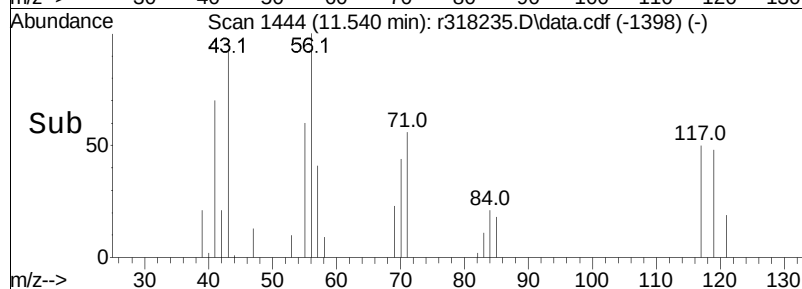
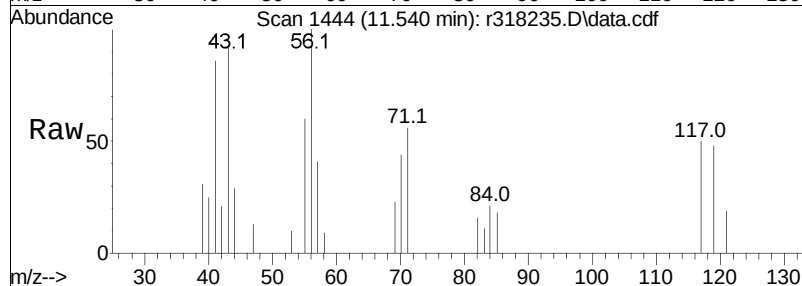
Tgt Ion	Ratio	Lower	Upper
83	100		
85	62.0	51.1	76.7
47	23.1	16.3	24.5

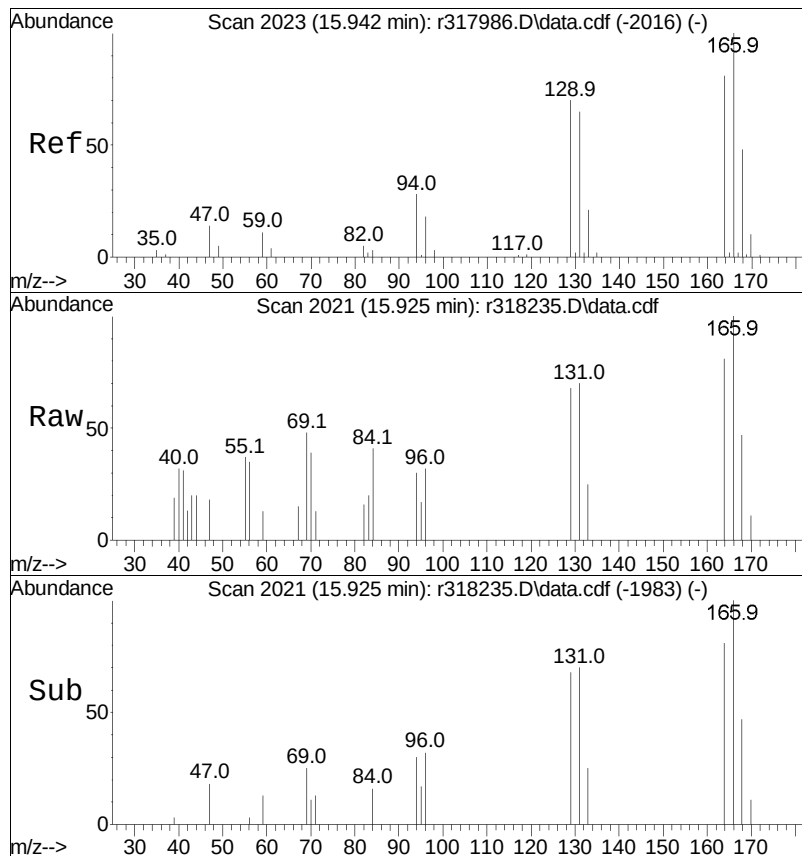




#52
 carbon tetrachloride
 Concen: 0.07 ppbV
 RT: 11.54 min Scan# 1444
 Delta R.T. -0.027 min
 Lab File: r318235.D
 Acq: 7 Oct 2021 9:31 PM

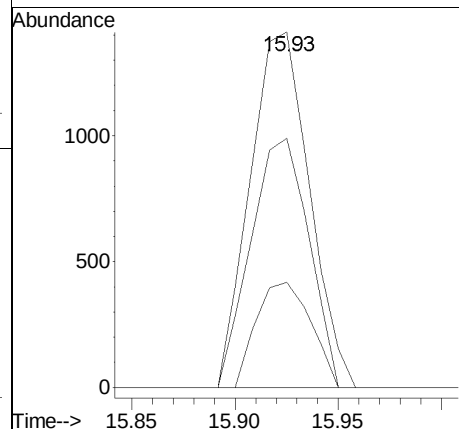
Tgt Ion	Ratio	Lower	Upper
117	100		
119	95.7	77.9	116.9
82	31.3	18.0	27.0#





#78
 tetrachloroethene
 Concen: 0.07 ppbV
 RT: 15.93 min Scan# 2021
 Delta R.T. -0.017 min
 Lab File: r318235.D
 Acq: 7 Oct 2021 9:31 PM

Tgt Ion	Ratio	Lower	Upper
166	100		
131	70.1	52.1	78.1
94	29.6	22.6	34.0



Manual Integration/Negative Proof Report

Data Path : O:\Forensics\Data\Airpiano3QMethod : TFS3_210926.M
Data File : r318235.D Operator : AIRPIAN03:RY
Date Inj'd : 10/7/2020 0:9: 1 Instrument :
Sample : L2153835-01,3,250,250 Quant Date : 10/8/2021 8:01 am

There are no manual integrations or false positives in this file.

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318236.D
 Acq On : 7 Oct 2021 10:08 PM
 Operator : AIRPIAN03:RY
 Sample : L2153835-02D,3,35,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:11:48 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : ROSSVILLE - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.54	49	420498	10.000	ppbV	-0.03
Standard Area = 399927			Recovery = 105.14%			
43) 1,4-difluorobenzene	11.80	114	1130252	10.000	ppbV	-0.03
Standard Area = 1080836			Recovery = 104.57%			
67) chlorobenzene-D5	16.54	54	179677	10.000	ppbV	-0.02
Standard Area = 167175			Recovery = 107.48%			

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.98	85	2046	0.052	ppbV	93
6) chloromethane	4.16	50	2981	0.157	ppbV	100
9) vinyl chloride	4.42		0	N.D.		
14) chloroethane	5.12	64	1621	0.117	ppbV	95
21) trichlorofluoromethane	6.06		0	N.D.		
26) 1,1-dichloroethene	6.87		0	N.D.		
28) methylene chloride	7.00		0	N.D.		
31) Freon 113	7.32		0	N.D.		
32) trans-1,2-dichloroethene	0.00		0	N.D.		
33) 1,1-dichloroethane	8.48		0	N.D.		
37) cis-1,2-dichloroethene	0.00		0	N.D.		
39) chloroform	9.70	83	8337	0.182	ppbV	98
41) 2,2-dichloropropane	0.00		0	N.D.	d	
42) 1,2-dichloroethane	0.00		0	N.D.		
48) 1,1,1-trichloroethane	0.00		0	N.D.		
49) 1,1-dichloropropene	11.37		0	N.D.		
52) carbon tetrachloride	0.00		0	N.D.		
56) 1,2-dichloropropane	0.00		0	N.D.		
57) bromodichloromethane	0.00		0	N.D.	d	
59) trichloroethene	0.00		0	N.D.		
63) cis-1,3-dichloropropene	0.00		0	N.D.		
65) trans-1,3-dichloropropene	0.00		0	N.D.		
66) 1,1,2-trichloroethane	0.00		0	N.D.		
71) 1,3-dichloropropane	14.75		0	N.D.		
74) dibromochloromethane	0.00		0	N.D.		
78) tetrachloroethene	15.92		0	N.D.		
79) 1,1,1,2-tetrachloroethane	0.00		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318236.D
 Acq On : 7 Oct 2021 10:08 PM
 Operator : AIRPIAN03:RY
 Sample : L2153835-02D, 3, 35, 250
 Misc : WG1555827, ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:11:48 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : ROSSVILLE - All compounds listed

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

80)	chlorobenzene	16.60		0		N.D.	
86)	1,1,2,2-tetrachloroethane	17.57		0		N.D.	
88)	1,2,3-trichloropropane	0.00		0		N.D.	
93)	2-chlorotoluene	0.00		0		N.D.	
95)	4-chlorotoluene	0.00		0		N.D.	
102)	1,3-dichlorobenzene	0.00		0		N.D.	
103)	1,4-dichlorobenzene	0.00		0		N.D.	
107)	1,2-dichlorobenzene	0.00		0		N.D.	
111)	1,2-dibromo-3-chloropr...	0.00		0		N.D.	
115)	1,2,4-trichlorobenzene	0.00		0		N.D.	
117)	1,2,3-trichlorobenzene	0.00		0		N.D.	
119)	hexachlorobutadiene	0.00		0		N.D.	

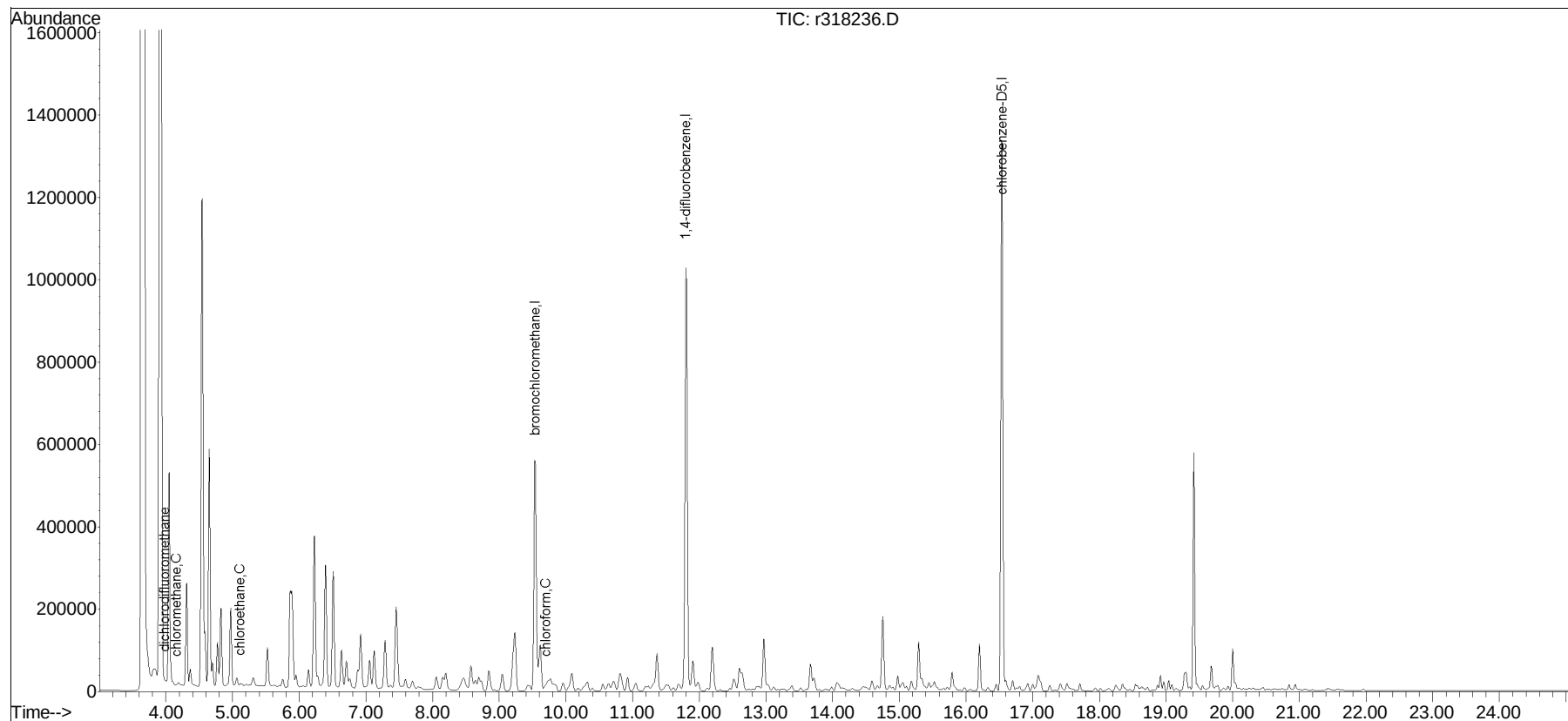
(#) = qualifier out of range (m) = manual integration (+) = signals summed

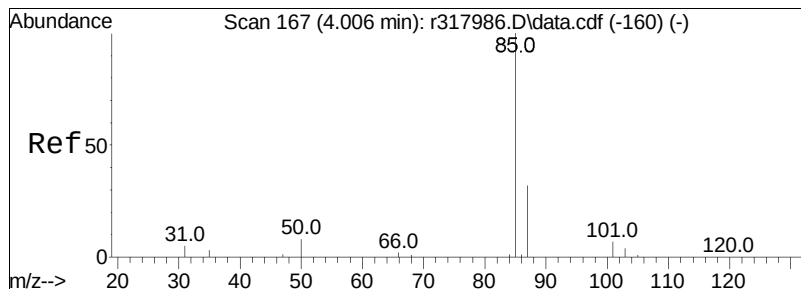
Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318236.D
 Acq On : 7 Oct 2021 10:08 PM
 Operator : AIRPIANO3:RY
 Sample : L2153835-02D,3,35,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:11:48 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

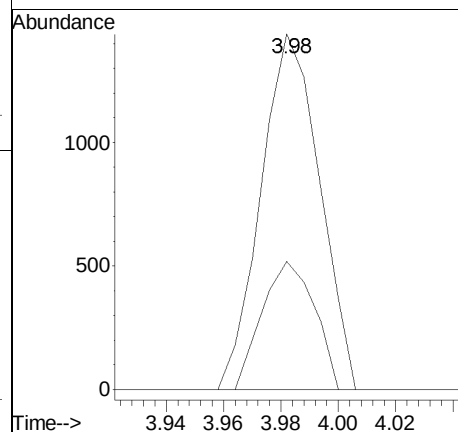
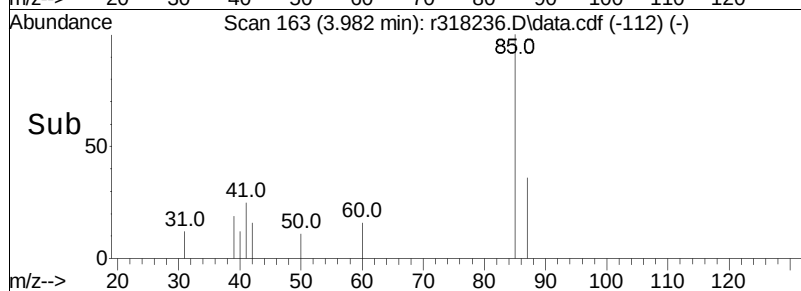
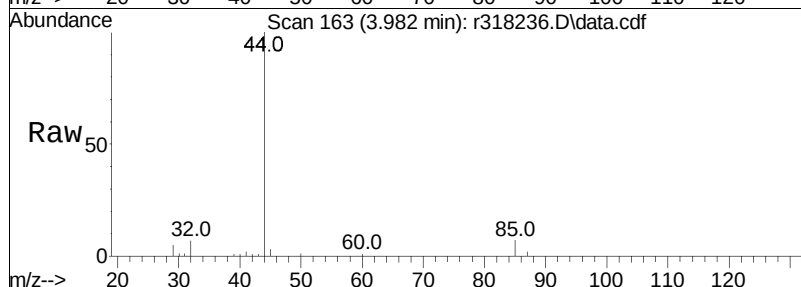
Sub List : ROSSVILLE - All compounds listed\10\1007T\r318223.D

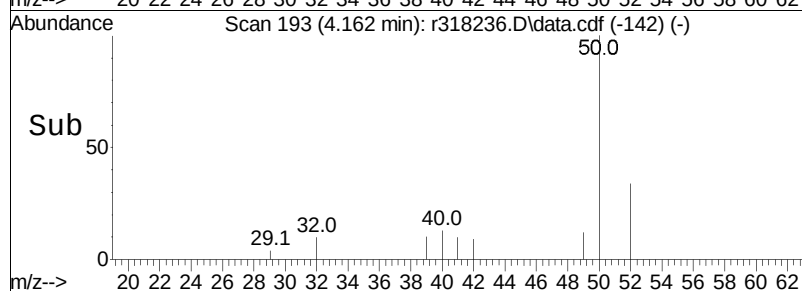
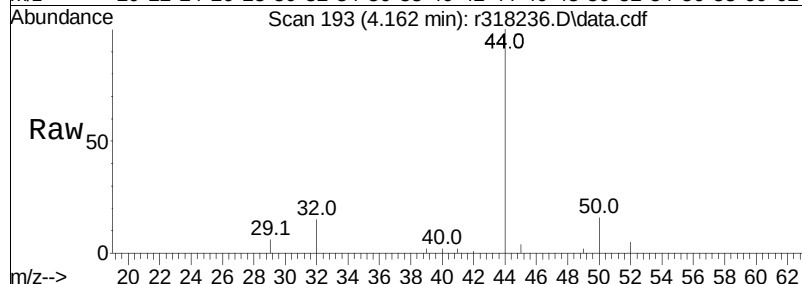
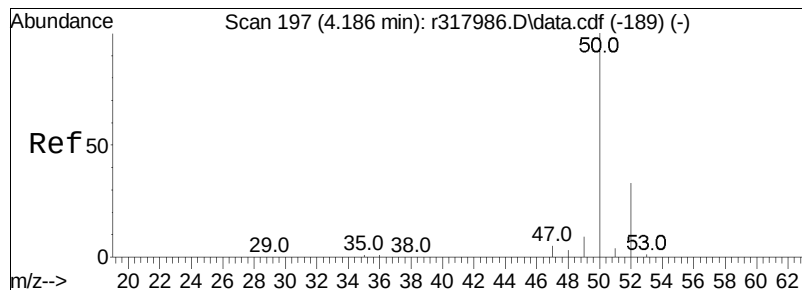




#5
 dichlorodifluoromethane
 Concen: 0.05 ppbV
 RT: 3.98 min Scan# 163
 Delta R.T. -0.024 min
 Lab File: r318236.D
 Acq: 7 Oct 2021 10:08 PM

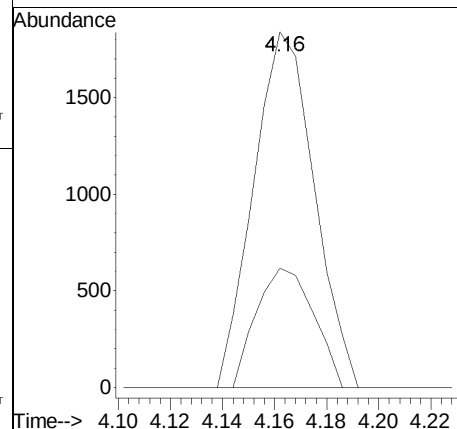
Tgt Ion: 85 Resp: 2046
 Ion Ratio Lower Upper
 85 100
 87 36.0 25.8 38.8

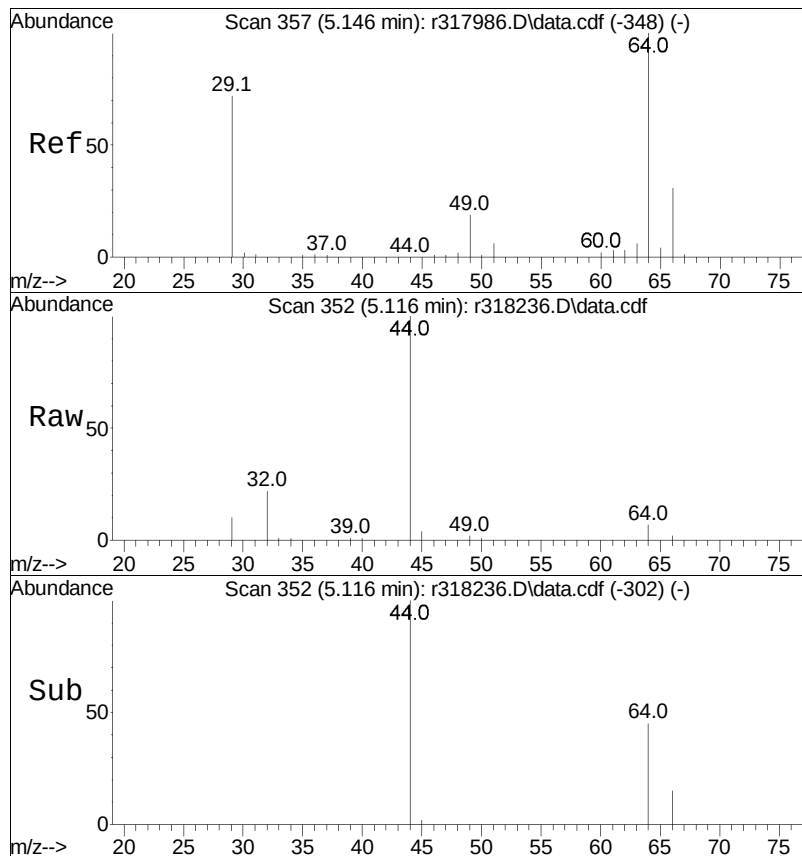




#6
 chloromethane
 Concen: 0.16 ppbV
 RT: 4.16 min Scan# 193
 Delta R.T. -0.024 min
 Lab File: r318236.D
 Acq: 7 Oct 2021 10:08 PM

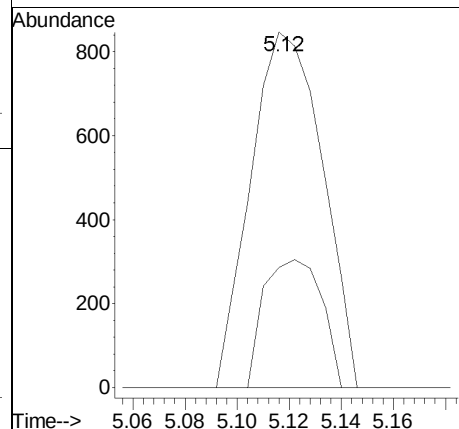
Tgt	Ion	Resp	Lower	Upper
50	100	2981		
52	33.6		26.7	40.1

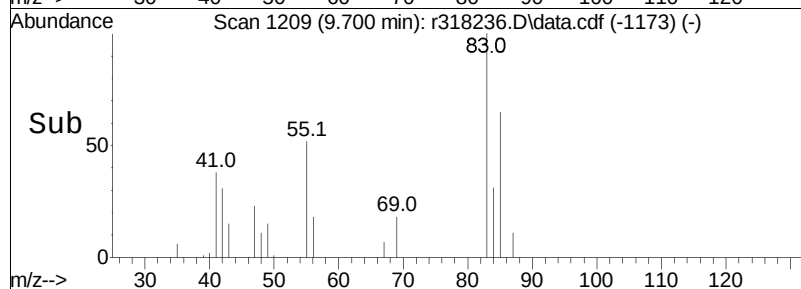
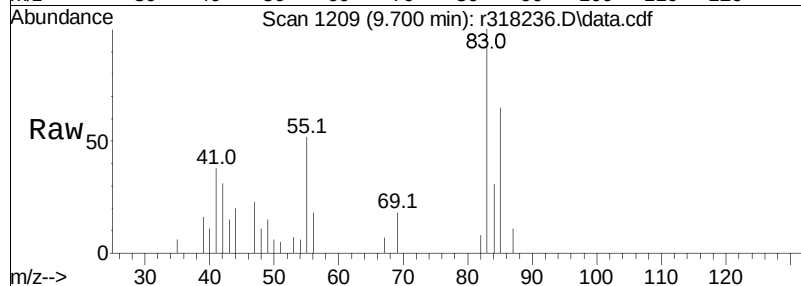
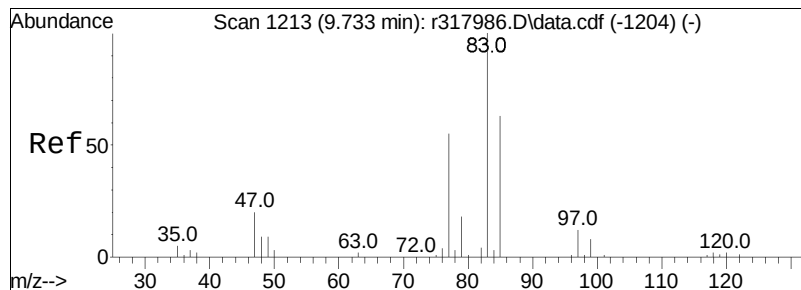




#14
chloroethane
Concen: 0.12 ppbV
RT: 5.12 min Scan# 352
Delta R.T. -0.030 min
Lab File: r318236.D
Acq: 7 Oct 2021 10:08 PM

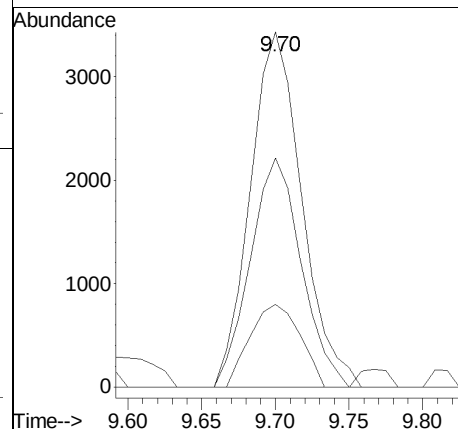
Tgt	Ion	Ratio	Lower	Upper
64	100			
66	33.8	24.7	37.1	





#39
chloroform
Concen: 0.18 ppbV
RT: 9.70 min Scan# 1209
Delta R.T. -0.033 min
Lab File: r318236.D
Acq: 7 Oct 2021 10:08 PM

Tgt	Ion	Ratio	Resp	Lower	Upper
83	100		8337		
85	64.5	51.1		76.7	
47	23.4	16.3		24.5	



Manual Integration/Negative Proof Report

Data Path	: O:\Forensics\Data\Airpiano3Q	Method	: TFS3_210926.M
Data File	: r318236.D	Operator	: AIRPIAN03:RY
Date Inj'd	: 10/7/2020 0:0: 8	Instrument	:
Sample	: L2153835-02D,3,35,250	Quant Date	: 10/8/2021 8:01 am

There are no manual integrations or false positives in this file.

Volatiles Standards Data

Initial Calibration

Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRPIANO3
Calibration dates : 09/26/21 19:59 09/27/21 00:41
Lab Number : L2153835
Project Number : 100849501
Ical Ref : ICAL18330

Calibration Files

0.2 =r317982.D 0.5 =r317983.D 1.0 =r317984.D 5.0 =r317985.D 10 =r317986.D 20 =r317987.D
 50 =r317988.D 100 =r317989.D

Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
1) I bromochloromethane	-----ISTD-----									
2) chlorodifluoromethane	0.999	0.978	0.985	0.830	0.799	0.766	0.698	0.634	0.8361	16.60
3) propylene		0.509	0.538	0.457	0.461	0.431	0.399	0.401	0.4566	11.48
4) propane		0.776	0.771	0.642	0.633	0.617	0.565	0.508	0.6444	15.38
5) dichlorodifluoromethane	1.153	1.141	1.147	0.967	0.907	0.834	0.713	0.608	0.9338	22.29
6) C chloromethane	0.534	0.530	0.533	0.449	0.428	0.409	0.375	0.347	0.4507	16.49
7) Freon-114	1.535	1.525	1.540	1.301	1.225	1.113	0.926	0.719	1.2358	24.62
8) C methanol			0.303	0.246	0.228	0.216	0.194	0.171	0.2262	20.31
9) C vinyl chloride	0.715	0.698	0.707	0.612	0.590	0.562	0.520	0.472	0.6095	14.93
10) C 1,3-butadiene	0.590	0.585	0.593	0.512	0.492	0.461	0.415	0.373	0.5026	16.64
11) butane	1.013	0.967	0.960	0.816	0.788	0.762	0.705	0.654	0.8331	15.84
12) C acetaldehyde		0.386	0.366	0.303	0.279	0.236	0.191	0.151	0.2730	31.86#
13) C bromomethane	0.568	0.557	0.561	0.483	0.467	0.443	0.399	0.355	0.4791	16.56
14) C chloroethane	0.395	0.401	0.387	0.338	0.332	0.303	0.251	0.227	0.3293	19.96
15) ethanol			0.543	0.456	0.423	0.403	0.340	0.283	0.4080	22.17
16) dichlorofluoromethane	1.170	1.138	1.143	0.976	0.942	0.892	0.798	0.710	0.9711	17.51
17) C vinyl bromide	0.565	0.555	0.560	0.482	0.471	0.442	0.395	0.339	0.4760	17.35
18) C acrolein		0.318	0.362	0.309	0.286	0.312	0.238	0.288	0.3021	12.47
19) acetone	1.103	1.028	1.018	0.886	0.847	0.751	0.609	0.543	0.8480	23.86
20) C acetonitrile	0.571	0.569	0.563	0.468	0.470	0.459	0.425	0.390	0.4894	14.27
21) trichlorofluoromethane	1.110	1.095	1.105	0.945	0.914	0.860	0.765	0.670	0.9329	17.68
22) isopropyl alcohol	1.102	1.090	1.113	1.070	1.032	0.990	0.903	0.812	1.0139	10.57
23) C acrylonitrile	0.638	0.627	0.648	0.555	0.556	0.551	0.523	0.493	0.5738	9.92
24) pentane	1.350	1.290	1.286	1.146	1.288	1.203	1.152	1.025	1.2177	8.73
25) ethyl ether	1.403	1.347	1.344	1.271	1.280	1.334	1.239	1.083	1.2876	7.57
26) C 1,1-dichloroethene	0.989	0.977	0.979	0.859	0.858	0.833	0.768	0.694	0.8696	12.34
27) tertiary butyl alcohol		1.137	1.187	1.118	1.115	1.177	1.128	1.047	1.1298	4.09
28) C methylene chloride		0.870	0.863	0.727	0.707	0.672	0.617	0.566	0.7175	16.06
29) C 3-chloropropene	0.960	0.940	0.950	0.837	0.830	0.812	0.776	0.743	0.8561	9.76
30) C carbon disulfide	2.345	2.352	2.353	2.023	1.959	1.856	1.684	1.504	2.0097	16.12
31) Freon 113	1.244	1.199	1.207	1.029	1.011	0.973	0.881	0.770	1.0392	16.20
32) trans-1,2-dichloroethene	1.056	1.031	1.041	0.906	0.911	0.894	0.831	0.753	0.9278	11.63
33) C 1,1-dichloroethane	1.249	1.199	1.218	1.053	1.054	1.042	0.986	0.915	1.0897	10.96
34) C MTBE	1.828	1.858	1.894	1.654	1.630	1.548	1.414	1.277	1.6379	13.44
35) C vinyl acetate			1.434	1.274	1.293	1.280	1.219	1.162	1.2768	7.15
36) C 2-butanone		1.471	1.485	1.363	1.333	1.295	1.158	1.088	1.3132	11.32



Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRPIANO3
Calibration dates : 09/26/21 19:59 09/27/21 00:41
Lab Number : L2153835
Project Number : 100849501
Ical Ref : ICAL18330

Calibration Files

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 50 =r317988.D 100 =r317989.D

	Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
37)	cis-1,2-dichloroethene	0.911	0.902	0.902	0.791	0.802	0.782	0.735	0.672	0.8122	10.72
38)	Ethyl Acetate		0.247	0.258	0.230	0.236	0.231	0.225	0.209	0.2339	6.75
39) C	chloroform	1.294	1.263	1.290	1.097	1.081	1.021	0.897	0.771	1.0891	17.52
40)	Tetrahydrofuran	0.939	0.875	0.900	0.794	0.791	0.777	0.741	0.709	0.8157	9.87
41)	2,2-dichloropropane	0.835	0.823	0.870	0.817	0.829	0.800	0.712	0.617	0.7877	10.50
42) C	1,2-dichloroethane	0.734	0.708	0.726	0.617	0.614	0.586	0.527	0.467	0.6222	15.52
43) I	1,4-difluorobenzene	-----ISTD-----									
44) C	hexane	0.522	0.494	0.501	0.434	0.430	0.410	0.366	0.308	0.4330	16.78
45)	diisopropyl ether	0.267	0.267	0.266	0.233	0.234	0.227	0.209	0.183	0.2356	12.86
46)	tert-butyl ethyl ether	0.740	0.743	0.766	0.686	0.694	0.687	0.632	0.573	0.6902	9.18
47) s	1,2-dichloroethane-D4	0.248	0.251	0.252	0.251	0.254	0.244	0.239	0.227	0.2459	3.68
48) C	1,1,1-trichloroethane	0.338	0.335	0.342	0.299	0.299	0.283	0.258	0.251	0.3007	11.78
49)	1,1-dichloropropene	0.379	0.378	0.392	0.333	0.325	0.308	0.284	0.262	0.3326	14.24
50) C	benzene	1.210	1.036	0.997	0.816	0.797	0.747	0.681	0.619	0.8627	23.21
51)	thiophene	0.524	0.517	0.526	0.446	0.443	0.437	0.405	0.372	0.4587	12.64
52) C	carbon tetrachloride	0.316	0.314	0.325	0.288	0.287	0.272	0.241	0.209	0.2814	14.19
53)	cyclohexane	0.537	0.512	0.527	0.458	0.461	0.447	0.419	0.388	0.4685	11.30
54)	tert-amyl methyl ether	0.724	0.721	0.734	0.650	0.648	0.628	0.582	0.532	0.6524	11.07
55)	dibromomethane	0.255	0.246	0.243	0.207	0.205	0.198	0.179	0.158	0.2113	16.07
56) C	1,2-dichloropropane	0.302	0.292	0.293	0.258	0.257	0.250	0.236	0.216	0.2630	11.52
57)	bromodichloromethane	0.491	0.483	0.485	0.430	0.424	0.401	0.358	0.315	0.4232	15.06
58) C	1,4-dioxane	0.219	0.203	0.211	0.186	0.185	0.188	0.175	0.158	0.1907	10.41
59) C	trichloroethene	0.349	0.351	0.353	0.307	0.306	0.293	0.270	0.243	0.3091	13.12
60) C	2,2,4-trimethylpentane	1.609	1.585	1.606	1.362	1.387	1.290	1.154	0.992	1.3733	16.40
61)	methyl methacrylate		0.332	0.345	0.340	0.342	0.311	0.293	0.276	0.3199	8.45
62)	heptane	0.560	0.562	0.561	0.484	0.475	0.450	0.418	0.390	0.4875	13.88
63) C	cis-1,3-dichloropropene	0.412	0.409	0.423	0.388	0.386	0.368	0.339	0.315	0.3801	9.88
64) C	4-methyl-2-pentanone		0.612	0.631	0.562	0.554	0.528	0.491	0.456	0.5476	11.36
65)	trans-1,3-dichloropropene	0.323	0.344	0.371	0.357	0.360	0.343	0.316	0.292	0.3381	7.79
66) C	1,1,2-trichloroethane	0.303	0.304	0.305	0.266	0.264	0.256	0.238	0.218	0.2693	12.08
67) I	chlorobenzene-D5	-----ISTD-----									
68) C	toluene	7.985	6.919	6.504	5.412	5.349	5.171	4.651	4.196	5.7735	21.87
69) s	toluene-D8	6.356	6.409	6.318	6.365	6.532	6.595	6.797	7.106	6.5596	4.15
70)	2-methylthiophene	4.397	4.365	4.361	3.684	3.704	3.691	3.436	3.162	3.8499	12.20
71)	1,3-dichloropropane	3.095	3.131	3.089	2.645	2.593	2.499	2.316	2.189	2.6945	13.72
72)	2-hexanone	3.181	3.501	3.434	3.245	3.235	3.152	2.949	2.765	3.1829	7.53



Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRPIANO3
Calibration dates : 09/26/21 19:59 09/27/21 00:41
Lab Number : L2153835
Project Number : 100849501
Ical Ref : ICAL18330

Calibration Files

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 50 =r317988.D 100 =r317989.D

	Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
73)	3-methylthiophene	4.400	4.471	4.490	3.811	3.808	3.786	3.451	3.092	3.9137	12.98
74)	dibromochloromethane	2.592	2.620	2.652	2.375	2.375	2.289	2.041	1.824	2.3459	12.47
75) C	1,2-dibromoethane	2.732	2.756	2.783	2.472	2.414	2.312	2.127	1.962	2.4446	12.44
76)	butyl acetate		0.775	0.830	0.791	0.805	0.788	0.764	0.741	0.7850	3.67
77)	octane	2.644	2.650	2.617	2.306	2.284	2.249	2.093	1.948	2.3489	11.29
78) C	tetrachloroethene	2.763	2.774	2.734	2.393	2.329	2.258	2.069	1.796	2.3896	14.85
79)	1,1,1,2-tetrachloroethane	1.883	1.909	1.928	1.725	1.730	1.679	1.495	1.251	1.6998	13.61
80) C	chlorobenzene	5.156	5.105	5.102	4.436	4.358	4.141	3.704	3.088	4.3862	16.88
81) C	ethylbenzene	7.432	7.491	7.454	6.584	6.587	6.314	5.605	4.887	6.5441	14.38
82)	2-ethylthiophene	4.975	5.053	5.052	4.344	4.299	4.244	3.814	3.386	4.3959	13.84
83) C	m+p-xylene	6.191	6.289	6.277	5.455	5.320	5.032	4.304	3.464	5.2917	19.14
84) C	bromoform	2.263	2.390	2.438	2.305	2.323	2.253	2.007	1.715	2.2117	10.77
85) C	styrene	4.817	5.106	5.147	4.640	4.581	4.374	3.977	3.528	4.5214	12.24
86) C	1,1,2,2-tetrachloroethane	4.647	4.660	4.696	4.096	3.983	3.702	3.087	2.359	3.9040	21.41
87) C	o-xylene	6.192	6.321	6.362	5.528	5.335	4.948	4.066	3.144	5.2372	21.99
88)	1,2,3-trichloropropane	3.622	3.612	3.685	3.162	3.087	2.966	2.708	2.496	3.1672	14.02
89)	nonane	4.836	4.897	4.939	4.245	4.103	3.959	3.648	3.247	4.2340	14.70
90) s	bromofluorobenzene	4.388	4.400	4.338	4.438	4.536	4.596	4.790	4.934	4.5524	4.65
91) C	isopropylbenzene	8.299	8.436	8.448	7.260	6.947	6.597	5.809	4.827	7.0780	18.63
92)	bromobenzene	4.932	5.026	5.010	4.297	4.172	3.989	3.572	3.114	4.2641	16.51
93)	2-chlorotoluene	2.298	2.358	2.394	2.130	2.109	2.070	1.900	1.700	2.1200	11.15
94)	n-propylbenzene	2.718	2.761	2.880	2.572	2.528	2.477	2.232	1.886	2.5067	12.75
95)	4-chlorotoluene	2.014	2.237	2.327	2.018	2.004	1.968	1.821	1.661	2.0061	10.50
96)	4-ethyl toluene	8.783	9.014	9.408	8.175	7.788	7.259	6.381	5.132	7.7425	18.63
97)	1,3,5-trimethylbenzene	7.568	7.576	7.721	6.672	6.547	6.086	5.158	4.133	6.4327	19.80
98)	tert-butylbenzene	8.148	8.203	8.192	7.048	6.715	6.042	4.590	3.306	6.5306	27.68
99)	1,2,4-trimethylbenzene	7.391	7.584	7.651	6.713	6.366	5.764	4.369	3.078	6.1145	26.92
100)	decane	5.943	6.062	6.183	5.506	5.406	5.132	4.345	3.493	5.2587	17.63
101) C	Benzyl Chloride	2.310	2.766	3.454	4.469	4.874	4.773	4.174	3.247	3.7584	25.42
102)	1,3-dichlorobenzene	4.093	4.714	4.985	4.443	4.376	3.974	3.525	2.667	4.0972	17.88
103) C	1,4-dichlorobenzene	3.729	4.734	5.033	4.495	4.290	4.011	3.330	2.691	4.0392	19.08
104)	sec-butylbenzene	1.081	1.095	1.093	0.941	0.892	0.823	0.689	0.517	0.8915	23.47
105)	1,2,3-trimethylbenzene	7.836	8.026	7.988	7.297	6.845	5.860	4.409	3.079	6.4174	28.56
106)	p-isopropyltoluene	9.784	9.936	9.863	8.498	7.978	7.072	5.212	3.521	7.7330	30.43#
107)	1,2-dichlorobenzene	4.300	4.424	4.629	4.172	4.091	3.770	3.347	2.813	3.9432	15.35
108)	n-butylbenzene	7.503	7.772	8.005	7.130	6.944	6.378	5.325	4.252	6.6636	19.42

Initial Calibration Summary

Form 6

Air Volatiles

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 50 =r317988.D 100 =r317989.D

	Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
109)	indan	8.204	8.353	8.662	8.056	7.651	6.615	5.433	4.167	7.1427	22.48
110)	indene	6.050	6.343	6.723	6.491	6.257	5.527	4.682	3.706	5.7223	18.16
111) C	1,2-dibromo-3-chloropropane	1.704	1.848	1.989	1.841	1.789	1.653	1.447	1.236	1.6884	14.40
112)	undecane	6.382	6.731	6.926	6.422	6.261	5.618	4.702	3.686	5.8411	19.16
113)	1,2,4,5-tetramethylbenzene	6.538	6.869	7.107	5.899	5.677	5.639	4.911	4.006	5.8309	17.69
114)	dodecane	5.453	6.266	6.737	7.051	6.900	5.512	4.715	3.708	5.7927	20.25
115) C	1,2,4-trichlorobenzene	2.615	3.071	3.393	3.604	3.615	3.286	3.066	2.525	3.1469	13.10
116)	naphthalene	7.585	8.730	9.307	9.148	8.944	7.856	6.907	5.774	8.0314	15.46
117)	1,2,3-trichlorobenzene	3.005	3.335	3.555	3.560	3.542	3.058	2.842	2.388	3.1606	13.23
118)	benzothiophene	1.247	1.487	1.617	1.450	1.414	1.312	1.034	0.747	1.2885	21.73
119) C	hexachlorobutadiene	3.592	3.722	3.748	3.520	3.293	2.701	2.368	1.756	3.0876	23.74
120)	2-methylnaphthalene			1.429	1.937	2.115	1.731	1.811	1.030	1.6755	23.28
121)	1-methylnaphthalene			4.096	4.927	4.975	3.659	3.521	1.642	3.8033	32.19#

Response Factor Report

Method Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Method File : TFS3_210926.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Sep 27 10:25:06 2021
 Response Via : Initial Calibration

Calibration Files

0.2 =r317982.D 0.5 =r317983.D 1.0 =r317984.D 5.0 =r317985.D 10 =r317986.D 20 =r317987.D
 50 =r317988.D 100 =r317989.D

Compound		0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
-----ISTD-----											
1) I	bromochloromethane										
2)	chlorodifluoromethane	0.999	0.978	0.985	0.830	0.799	0.766	0.698	0.634	0.8361	16.60
3)	propylene		0.509	0.538	0.457	0.461	0.431	0.399	0.401	0.4566	11.48
4)	propane		0.776	0.771	0.642	0.633	0.617	0.565	0.508	0.6444	15.38
5)	dichlorodifluoromethane	1.153	1.141	1.147	0.967	0.907	0.834	0.713	0.608	0.9338	22.29
6) C	chloromethane	0.534	0.530	0.533	0.449	0.428	0.409	0.375	0.347	0.4507	16.49
7)	Freon-114	1.535	1.525	1.540	1.301	1.225	1.113	0.926	0.719	1.2358	24.62
8) C	methanol			0.303	0.246	0.228	0.216	0.194	0.171	0.2262	20.31
9) C	vinyl chloride	0.715	0.698	0.707	0.612	0.590	0.562	0.520	0.472	0.6095	14.93
10) C	1,3-butadiene	0.590	0.585	0.593	0.512	0.492	0.461	0.415	0.373	0.5026	16.64
11)	butane	1.013	0.967	0.960	0.816	0.788	0.762	0.705	0.654	0.8331	15.84
12) C	acetaldehyde		0.386	0.366	0.303	0.279	0.236	0.191	0.151	0.2730	31.86#
13) C	bromomethane	0.568	0.557	0.561	0.483	0.467	0.443	0.399	0.355	0.4791	16.56
14) C	chloroethane	0.395	0.401	0.387	0.338	0.332	0.303	0.251	0.227	0.3293	19.96
15)	ethanol			0.543	0.456	0.423	0.403	0.340	0.283	0.4080	22.17
16)	dichlorofluoromethane	1.170	1.138	1.143	0.976	0.942	0.892	0.798	0.710	0.9711	17.51
17) C	vinyl bromide	0.565	0.555	0.560	0.482	0.471	0.442	0.395	0.339	0.4760	17.35
18) C	acrolein		0.318	0.362	0.309	0.286	0.312	0.238	0.288	0.3021	12.47
19)	acetone	1.103	1.028	1.018	0.886	0.847	0.751	0.609	0.543	0.8480	23.86
20) C	acetonitrile	0.571	0.569	0.563	0.468	0.470	0.459	0.425	0.390	0.4894	14.27
21)	trichlorofluoromethane	1.110	1.095	1.105	0.945	0.914	0.860	0.765	0.670	0.9329	17.68
22)	isopropyl alcohol	1.102	1.090	1.113	1.070	1.032	0.990	0.903	0.812	1.0139	10.57
23) C	acrylonitrile	0.638	0.627	0.648	0.555	0.556	0.551	0.523	0.493	0.5738	9.92
24)	pentane	1.350	1.290	1.286	1.146	1.288	1.203	1.152	1.025	1.2177	8.73
25)	ethyl ether	1.403	1.347	1.344	1.271	1.280	1.334	1.239	1.083	1.2876	7.57
26) C	1,1-dichloroethene	0.989	0.977	0.979	0.859	0.858	0.833	0.768	0.694	0.8696	12.34
27)	tertiary butyl alcohol		1.137	1.187	1.118	1.115	1.177	1.128	1.047	1.1298	4.09
28) C	methylene chloride		0.870	0.863	0.727	0.707	0.672	0.617	0.566	0.7175	16.06
29) C	3-chloropropene	0.960	0.940	0.950	0.837	0.830	0.812	0.776	0.743	0.8561	9.76
30) C	carbon disulfide	2.345	2.352	2.353	2.023	1.959	1.856	1.684	1.504	2.0097	16.12
31)	Freon 113	1.244	1.199	1.207	1.029	1.011	0.973	0.881	0.770	1.0392	16.20

Response Factor Report

Method Path : O:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Method File : TFS3_210926.M
 Title : TO-14A/TO-15 SIM/Full Scan Analysis
 Last Update : Mon Sep 27 10:25:06 2021
 Response Via : Initial Calibration

Calibration Files

0.2 =r317982.D 0.5 =r317983.D 1.0 =r317984.D 5.0 =r317985.D 10 =r317986.D 20 =r317987.D
 50 =r317988.D 100 =r317989.D

Compound		0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
32)	trans-1,2-dichloroethene	1.056	1.031	1.041	0.906	0.911	0.894	0.831	0.753	0.9278	11.63
33) C	1,1-dichloroethane	1.249	1.199	1.218	1.053	1.054	1.042	0.986	0.915	1.0897	10.96
34) C	MTBE	1.828	1.858	1.894	1.654	1.630	1.548	1.414	1.277	1.6379	13.44
35) C	vinyl acetate			1.434	1.274	1.293	1.280	1.219	1.162	1.2768	7.15
36) C	2-butanone		1.471	1.485	1.363	1.333	1.295	1.158	1.088	1.3132	11.32
37)	cis-1,2-dichloroethene	0.911	0.902	0.902	0.791	0.802	0.782	0.735	0.672	0.8122	10.72
38)	Ethyl Acetate		0.247	0.258	0.230	0.236	0.231	0.225	0.209	0.2339	6.75
39) C	chloroform	1.294	1.263	1.290	1.097	1.081	1.021	0.897	0.771	1.0891	17.52
40)	Tetrahydrofuran	0.939	0.875	0.900	0.794	0.791	0.777	0.741	0.709	0.8157	9.87
41)	2,2-dichloropropane	0.835	0.823	0.870	0.817	0.829	0.800	0.712	0.617	0.7877	10.50
42) C	1,2-dichloroethane	0.734	0.708	0.726	0.617	0.614	0.586	0.527	0.467	0.6222	15.52
43) I	1,4-difluorobenzene	-----ISTD-----									
44) C	hexane	0.522	0.494	0.501	0.434	0.430	0.410	0.366	0.308	0.4330	16.78
45)	diisopropyl ether	0.267	0.267	0.266	0.233	0.234	0.227	0.209	0.183	0.2356	12.86
46)	tert-butyl ethyl ether	0.740	0.743	0.766	0.686	0.694	0.687	0.632	0.573	0.6902	9.18
47) s	1,2-dichloroethane-D4	0.248	0.251	0.252	0.251	0.254	0.244	0.239	0.227	0.2459	3.68
48) C	1,1,1-trichloroethane	0.338	0.335	0.342	0.299	0.299	0.283	0.258	0.251	0.3007	11.78
49)	1,1-dichloropropene	0.379	0.378	0.392	0.333	0.325	0.308	0.284	0.262	0.3326	14.24
50) C	benzene	1.210	1.036	0.997	0.816	0.797	0.747	0.681	0.619	0.8627	23.21
51)	thiophene	0.524	0.517	0.526	0.446	0.443	0.437	0.405	0.372	0.4587	12.64
52) C	carbon tetrachloride	0.316	0.314	0.325	0.288	0.287	0.272	0.241	0.209	0.2814	14.19
53)	cyclohexane	0.537	0.512	0.527	0.458	0.461	0.447	0.419	0.388	0.4685	11.30
54)	tert-amyl methyl ether	0.724	0.721	0.734	0.650	0.648	0.628	0.582	0.532	0.6524	11.07
55)	dibromomethane	0.255	0.246	0.243	0.207	0.205	0.198	0.179	0.158	0.2113	16.07
56) C	1,2-dichloropropane	0.302	0.292	0.293	0.258	0.257	0.250	0.236	0.216	0.2630	11.52
57)	bromodichloromethane	0.491	0.483	0.485	0.430	0.424	0.401	0.358	0.315	0.4232	15.06
58) C	1,4-dioxane	0.219	0.203	0.211	0.186	0.185	0.188	0.175	0.158	0.1907	10.41
59) C	trichloroethene	0.349	0.351	0.353	0.307	0.306	0.293	0.270	0.243	0.3091	13.12
60) C	2,2,4-trimethylpentane	1.609	1.585	1.606	1.362	1.387	1.290	1.154	0.992	1.3733	16.40
61)	methyl methacrylate		0.332	0.345	0.340	0.342	0.311	0.293	0.276	0.3199	8.45
62)	heptane	0.560	0.562	0.561	0.484	0.475	0.450	0.418	0.390	0.4875	13.88

Response Factor Report

Method Path : O:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Method File : TFS3_210926.M
Title : TO-14A/TO-15 SIM/Full Scan Analysis
Last Update : Mon Sep 27 10:25:06 2021
Response Via : Initial Calibration

Calibration Files

0.2 =r317982.D 0.5 =r317983.D 1.0 =r317984.D 5.0 =r317985.D 10 =r317986.D 20 =r317987.D
50 =r317988.D 100 =r317989.D

	Compound	0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
63) C	cis-1,3-dichloropropene	0.412	0.409	0.423	0.388	0.386	0.368	0.339	0.315	0.3801	9.88
64) C	4-methyl-2-pentanone		0.612	0.631	0.562	0.554	0.528	0.491	0.456	0.5476	11.36
65)	trans-1,3-dichloropropene	0.323	0.344	0.371	0.357	0.360	0.343	0.316	0.292	0.3381	7.79
66) C	1,1,2-trichloroethane	0.303	0.304	0.305	0.266	0.264	0.256	0.238	0.218	0.2693	12.08
67) I	chlorobenzene-D5	-----ISTD-----									
68) C	toluene	7.985	6.919	6.504	5.412	5.349	5.171	4.651	4.196	5.7735	21.87
69) s	toluene-D8	6.356	6.409	6.318	6.365	6.532	6.595	6.797	7.106	6.5596	4.15
70)	2-methylthiophene	4.397	4.365	4.361	3.684	3.704	3.691	3.436	3.162	3.8499	12.20
71)	1,3-dichloropropane	3.095	3.131	3.089	2.645	2.593	2.499	2.316	2.189	2.6945	13.72
72)	2-hexanone	3.181	3.501	3.434	3.245	3.235	3.152	2.949	2.765	3.1829	7.53
73)	3-methylthiophene	4.400	4.471	4.490	3.811	3.808	3.786	3.451	3.092	3.9137	12.98
74)	dibromochloromethane	2.592	2.620	2.652	2.375	2.375	2.289	2.041	1.824	2.3459	12.47
75) C	1,2-dibromoethane	2.732	2.756	2.783	2.472	2.414	2.312	2.127	1.962	2.4446	12.44
76)	butyl acetate		0.775	0.830	0.791	0.805	0.788	0.764	0.741	0.7850	3.67
77)	octane	2.644	2.650	2.617	2.306	2.284	2.249	2.093	1.948	2.3489	11.29
78) C	tetrachloroethene	2.763	2.774	2.734	2.393	2.329	2.258	2.069	1.796	2.3896	14.85
79)	1,1,1,2-tetrachloroethane	1.883	1.909	1.928	1.725	1.730	1.679	1.495	1.251	1.6998	13.61
80) C	chlorobenzene	5.156	5.105	5.102	4.436	4.358	4.141	3.704	3.088	4.3862	16.88
81) C	ethylbenzene	7.432	7.491	7.454	6.584	6.587	6.314	5.605	4.887	6.5441	14.38
82)	2-ethylthiophene	4.975	5.053	5.052	4.344	4.299	4.244	3.814	3.386	4.3959	13.84
83) C	m+p-xylene	6.191	6.289	6.277	5.455	5.320	5.032	4.304	3.464	5.2917	19.14
84) C	bromoform	2.263	2.390	2.438	2.305	2.323	2.253	2.007	1.715	2.2117	10.77
85) C	styrene	4.817	5.106	5.147	4.640	4.581	4.374	3.977	3.528	4.5214	12.24
86) C	1,1,2,2-tetrachloroethane	4.647	4.660	4.696	4.096	3.983	3.702	3.087	2.359	3.9040	21.41
87) C	o-xylene	6.192	6.321	6.362	5.528	5.335	4.948	4.066	3.144	5.2372	21.99
88)	1,2,3-trichloropropane	3.622	3.612	3.685	3.162	3.087	2.966	2.708	2.496	3.1672	14.02
89)	nonane	4.836	4.897	4.939	4.245	4.103	3.959	3.648	3.247	4.2340	14.70
90) s	bromofluorobenzene	4.388	4.400	4.338	4.438	4.536	4.596	4.790	4.934	4.5524	4.65
91) C	isopropylbenzene	8.299	8.436	8.448	7.260	6.947	6.597	5.809	4.827	7.0780	18.63
92)	bromobenzene	4.932	5.026	5.010	4.297	4.172	3.989	3.572	3.114	4.2641	16.51
93)	2-chlorotoluene	2.298	2.358	2.394	2.130	2.109	2.070	1.900	1.700	2.1200	11.15

Response Factor Report

Method Path : O:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Method File : TFS3_210926.M
Title : TO-14A/TO-15 SIM/Full Scan Analysis
Last Update : Mon Sep 27 10:25:06 2021
Response Via : Initial Calibration

Calibration Files

0.2 =r317982.D 0.5 =r317983.D 1.0 =r317984.D 5.0 =r317985.D 10 =r317986.D 20 =r317987.D
50 =r317988.D 100 =r317989.D

Compound		0.2	0.5	1.0	5.0	10	20	50	100	Avg	%RSD
94)	n-propylbenzene	2.718	2.761	2.880	2.572	2.528	2.477	2.232	1.886	2.5067	12.75
95)	4-chlorotoluene	2.014	2.237	2.327	2.018	2.004	1.968	1.821	1.661	2.0061	10.50
96)	4-ethyl toluene	8.783	9.014	9.408	8.175	7.788	7.259	6.381	5.132	7.7425	18.63
97)	1,3,5-trimethylbenzene	7.568	7.576	7.721	6.672	6.547	6.086	5.158	4.133	6.4327	19.80
98)	tert-butylbenzene	8.148	8.203	8.192	7.048	6.715	6.042	4.590	3.306	6.5306	27.68
99)	1,2,4-trimethylbenzene	7.391	7.584	7.651	6.713	6.366	5.764	4.369	3.078	6.1145	26.92
100)	decane	5.943	6.062	6.183	5.506	5.406	5.132	4.345	3.493	5.2587	17.63
101) C	Benzyl Chloride	2.310	2.766	3.454	4.469	4.874	4.773	4.174	3.247	3.7584	25.42
102)	1,3-dichlorobenzene	4.093	4.714	4.985	4.443	4.376	3.974	3.525	2.667	4.0972	17.88
103) C	1,4-dichlorobenzene	3.729	4.734	5.033	4.495	4.290	4.011	3.330	2.691	4.0392	19.08
104)	sec-butylbenzene	1.081	1.095	1.093	0.941	0.892	0.823	0.689	0.517	0.8915	23.47
105)	1,2,3-trimethylbenzene	7.836	8.026	7.988	7.297	6.845	5.860	4.409	3.079	6.4174	28.56
106)	p-isopropyltoluene	9.784	9.936	9.863	8.498	7.978	7.072	5.212	3.521	7.7330	30.43#
107)	1,2-dichlorobenzene	4.300	4.424	4.629	4.172	4.091	3.770	3.347	2.813	3.9432	15.35
108)	n-butylbenzene	7.503	7.772	8.005	7.130	6.944	6.378	5.325	4.252	6.6636	19.42
109)	indan	8.204	8.353	8.662	8.056	7.651	6.615	5.433	4.167	7.1427	22.48
110)	indene	6.050	6.343	6.723	6.491	6.257	5.527	4.682	3.706	5.7223	18.16
111) C	1,2-dibromo-3-chloropropane	1.704	1.848	1.989	1.841	1.789	1.653	1.447	1.236	1.6884	14.40
112)	undecane	6.382	6.731	6.926	6.422	6.261	5.618	4.702	3.686	5.8411	19.16
113)	1,2,4,5-tetramethylbenzene	6.538	6.869	7.107	5.899	5.677	5.639	4.911	4.006	5.8309	17.69
114)	dodecane	5.453	6.266	6.737	7.051	6.900	5.512	4.715	3.708	5.7927	20.25
115) C	1,2,4-trichlorobenzene	2.615	3.071	3.393	3.604	3.615	3.286	3.066	2.525	3.1469	13.10
116)	naphthalene	7.585	8.730	9.307	9.148	8.944	7.856	6.907	5.774	8.0314	15.46
117)	1,2,3-trichlorobenzene	3.005	3.335	3.555	3.560	3.542	3.058	2.842	2.388	3.1606	13.23
118)	benzothiophene	1.247	1.487	1.617	1.450	1.414	1.312	1.034	0.747	1.2885	21.73
119) C	hexachlorobutadiene	3.592	3.722	3.748	3.520	3.293	2.701	2.368	1.756	3.0876	23.74
120)	2-methylnaphthalene			1.429	1.937	2.115	1.731	1.811	1.030	1.6755	23.28
121)	1-methylnaphthalene			4.096	4.927	4.975	3.659	3.521	1.642	3.8033	32.19#

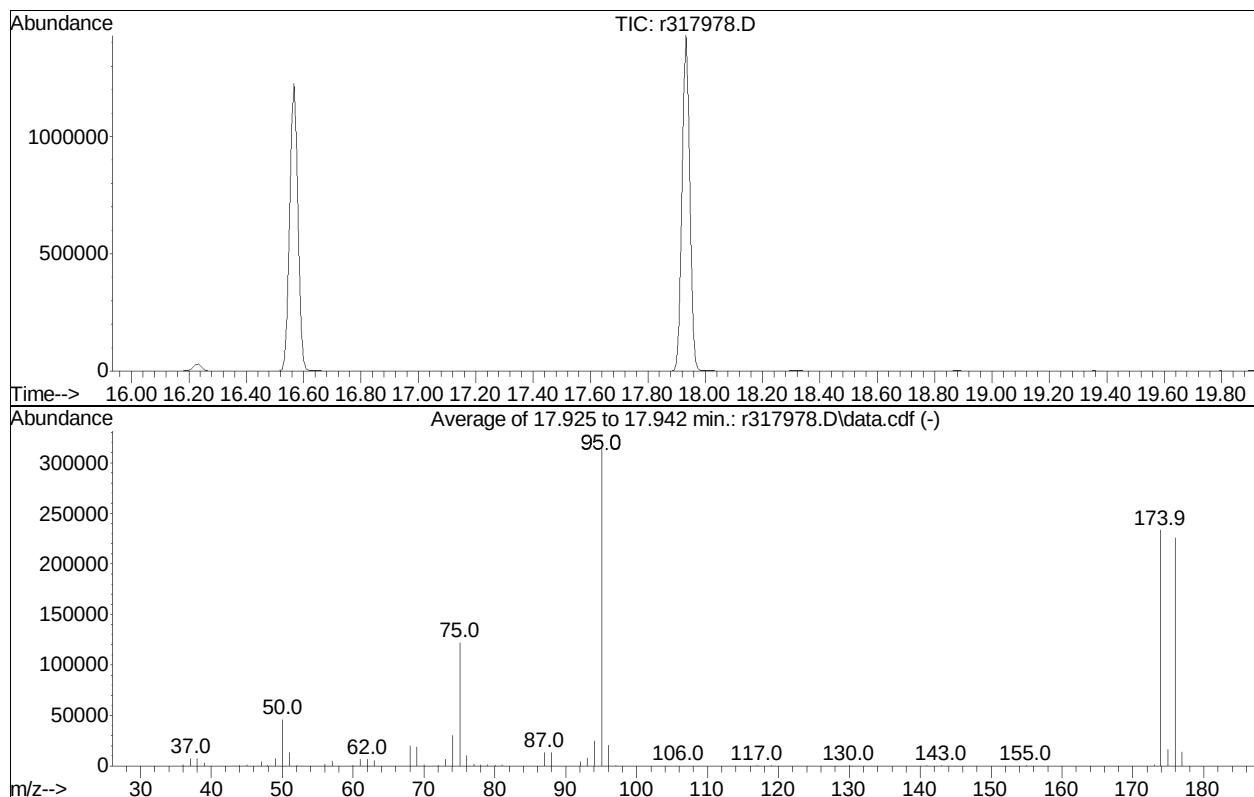
(#) = Out of Range

BFB

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317978.D
 Acq On : 26 Sep 2021 5:29 PM
 Operator : AIRPIAN03:TS
 Sample : WG1551274-1,3,250,250
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Integration File: rteint.p

Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Sep 27 10:25:06 2021



Spectrum Information: Average of 17.925 to 17.942 min.

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	14.7	46299	PASS
75	95	30	66	38.6	121877	PASS
95	95	100	100	100.0	315971	PASS
96	95	5	9	6.6	20900	PASS
173	174	0.00	2	0.7	1546	PASS
174	95	50	120	74.0	233909	PASS
175	174	4	9	7.1	16532	PASS
176	174	93	101	96.4	225566	PASS
177	176	5	9	6.3	14317	PASS

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317982.D
 Acq On : 26 Sep 2021 7:59 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:13:27 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.575	49	363990	10.000	ppbV	0.00
Standard Area = 371494			Recovery =		97.98%	
43) 1,4-difluorobenzene	11.833	114	1009364	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =		96.46%	
67) chlorobenzene-D5	16.558	54	165719	10.000	ppbV	0.00
Standard Area = 171406			Recovery =		96.68%	
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.458	65	250689	9.771	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		97.71%	
69) toluene-D8	14.667	98	1053256	9.730	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		97.30%	
90) bromofluorobenzene	17.925	95	727151	9.674	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		96.74%	
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.904	51	7276	0.250	ppbV	98
3) propylene	3.934	41	3906M6	0.233	ppbV	
4) propane	3.958	29	6193	0.269	ppbV	98
5) dichlorodifluoromethane	4.012	85	8397	0.254	ppbV	100
6) chloromethane	4.192	50	3889	0.250	ppbV	96
7) Freon-114	4.318	85	11178	0.251	ppbV	97
8) methanol	4.396	31	13208	1.593	ppbV #	77
9) vinyl chloride	4.450	62	5203	0.242	ppbV	98
10) 1,3-butadiene	4.618	54	4292	0.240	ppbV	97
11) butane	4.678	43	7372	0.257	ppbV	99
12) acetaldehyde	4.336	29	15937	1.571	ppbV	97
13) bromomethane	4.930	94	4138	0.243	ppbV	95
14) chloroethane	5.152	64	2879	0.239	ppbV	96
15) ethanol	5.333	31	21547	1.398	ppbV	99
16) dichlorofluoromethane	5.293	67	8516	0.248	ppbV #	98
17) vinyl bromide	5.577	106	4112	0.240	ppbV	100
18) acrolein	5.733	56	2864	0.275	ppbV #	85
19) acetone	5.907	43	40133	1.301	ppbV	96
20) acetonitrile	5.577	41	4157	0.243	ppbV	95
21) trichlorofluoromethane	6.093	101	8080	0.243	ppbV	100
22) isopropyl alcohol	6.237	45	20055	0.534	ppbV	98
23) acrylonitrile	6.470	53	4645	0.230	ppbV	97
24) pentane	6.543	43	9829	0.210	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317982.D
 Acq On : 26 Sep 2021 7:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:13:27 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.593	31	10210	0.219	ppbV	97
26) 1,1-dichloroethene	6.866	61	7201	0.231	ppbV	99
27) tertiary butyl alcohol	6.974	59	8022M6	0.198	ppbV	
28) methylene chloride	7.028	49	6753	0.263	ppbV	100
29) 3-chloropropene	7.172	41	6989	0.231	ppbV	99
30) carbon disulfide	7.322	76	17070	0.239	ppbV #	88
31) Freon 113	7.358	101	9057	0.246	ppbV	97
32) trans-1,2-dichloroethene	8.158	61	7684	0.232	ppbV	99
33) 1,1-dichloroethane	8.392	63	9096	0.237	ppbV	98
34) MTBE	8.492	73	13307	0.224	ppbV	98
35) vinyl acetate	8.617	43	9855	0.209	ppbV	99
36) 2-butanone	8.892	43	11031	0.227	ppbV	99
37) cis-1,2-dichloroethene	9.383	61	6633	0.227	ppbV	100
38) Ethyl Acetate	9.700	61	1821	0.212	ppbV	96
39) chloroform	9.733	83	9418	0.239	ppbV	98
40) Tetrahydrofuran	10.217	42	6836	0.238	ppbV	99
41) 2,2-dichloropropane	9.750	77	6079	0.202	ppbV #	83
42) 1,2-dichloroethane	10.583	62	5342	0.239	ppbV	99
44) hexane	9.650	57	10537	0.243	ppbV #	73
45) diisopropyl ether	9.667	87	5381	0.228	ppbV	90
46) tert-butyl ethyl ether	10.292	59	14931	0.213	ppbV	98
48) 1,1,1-trichloroethane	10.867	97	6821	0.226	ppbV	97
49) 1,1-dichloropropene	11.240	75	7647	0.233	ppbV	99
50) benzene	11.400	78	24421	0.303	ppbV	99
51) thiophene	11.547	84	10578	0.236	ppbV	99
52) carbon tetrachloride	11.573	117	6372	0.220	ppbV	96
53) cyclohexane	11.720	56	10844	0.233	ppbV	99
54) tert-amyl methyl ether	12.120	73	14616	0.223	ppbV	99
55) dibromomethane	12.320	93	5139	0.248	ppbV	96
56) 1,2-dichloropropane	12.353	63	6089	0.234	ppbV	96
57) bromodichloromethane	12.580	83	9914	0.232	ppbV	98
58) 1,4-dioxane	12.653	88	4422	0.237	ppbV	89
59) trichloroethene	12.633	130	7050	0.229	ppbV	98
60) 2,2,4-trimethylpentane	12.680	57	32490	0.232	ppbV	99
61) methyl methacrylate	12.893	41	6636	0.192	ppbV	98
62) heptane	13.000	43	11298	0.236	ppbV	99
63) cis-1,3-dichloropropene	13.650	75	8325	0.214	ppbV	98
64) 4-methyl-2-pentanone	13.708	43	12305	0.220	ppbV	99
65) trans-1,3-dichloropropene	14.267	75	6513	0.179	ppbV	97
66) 1,1,2-trichloroethane	14.467	97	6111	0.229	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317982.D
 Acq On : 26 Sep 2021 7:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:13:27 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.783	91	26466	0.299	ppbV	99
70) 2-methylthiophene	14.850	97	14574	0.237	ppbV	97
71) 1,3-dichloropropane	14.817	76	10257	0.239	ppbV	99
72) 2-hexanone	15.083	43	10544	0.197	ppbV	94
73) 3-methylthiophene	15.042	97	14582	0.231	ppbV	96
74) dibromochloromethane	15.225	129	8591	0.218	ppbV	98
75) 1,2-dibromoethane	15.475	107	9056	0.226	ppbV	98
76) butyl acetate	15.733	73	2365	0.177	ppbV	96
77) octane	15.817	85	8763	0.232	ppbV	97
78) tetrachloroethene	15.942	166	9157	0.237	ppbV	100
79) 1,1,1,2-tetrachloroethane	16.583	131	6240	0.218	ppbV	99
80) chlorobenzene	16.600	112	17090	0.237	ppbV	98
81) ethylbenzene	16.950	91	24631	0.226	ppbV	99
82) 2-ethylthiophene	16.992	97	16488	0.231	ppbV	99
83) m+p-xylene	17.117	91	41040	0.466	ppbV	100
84) bromoform	17.183	173	7501	0.195	ppbV	98
85) styrene	17.442	104	15967	0.210	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.533	83	15403	0.233	ppbV	98
87) o-xylene	17.533	91	20523	0.232	ppbV	99
88) 1,2,3-trichloropropane	17.650	75	12004	0.235	ppbV	97
89) nonane	17.725	43	16027	0.236	ppbV	96
91) isopropylbenzene	18.042	105	27507	0.239	ppbV	96
92) bromobenzene	18.117	77	16347	0.236	ppbV	100
93) 2-chlorotoluene	18.442	126	7617	0.218	ppbV	98
94) n-propylbenzene	18.475	120	9010	0.215	ppbV	100
95) 4-chlorotoluene	18.500	126	6674	0.201	ppbV	85
96) 4-ethyl toluene	18.592	105	29110	0.226	ppbV	97
97) 1,3,5-trimethylbenzene	18.650	105	25084	0.231	ppbV	97
98) tert-butylbenzene	18.983	119	27005	0.243	ppbV	98
99) 1,2,4-trimethylbenzene	18.983	105	24496	0.232	ppbV	95
100) decane	19.058	57	19697	0.220	ppbV	96
101) Benzyl Chloride	19.100	91	7657	0.095	ppbV	96
102) 1,3-dichlorobenzene	19.108	146	13567	0.187	ppbV	100
103) 1,4-dichlorobenzene	19.167	146	12358	0.174	ppbV	97
104) sec-butylbenzene	19.200	105	35838	0.242	ppbV	97
105) 1,2,3-trimethylbenzene	19.325	105	25972	0.229	ppbV	99
106) p-isopropyltoluene	19.317	119	32429	0.241	ppbV	99
107) 1,2-dichlorobenzene	19.442	146	14251	0.210	ppbV	97
108) n-butylbenzene	19.658	91	24869	0.216	ppbV	95
109) indan	19.492	117	27192	0.214	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317982.D
 Acq On : 26 Sep 2021 7:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD0.2
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:13:27 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

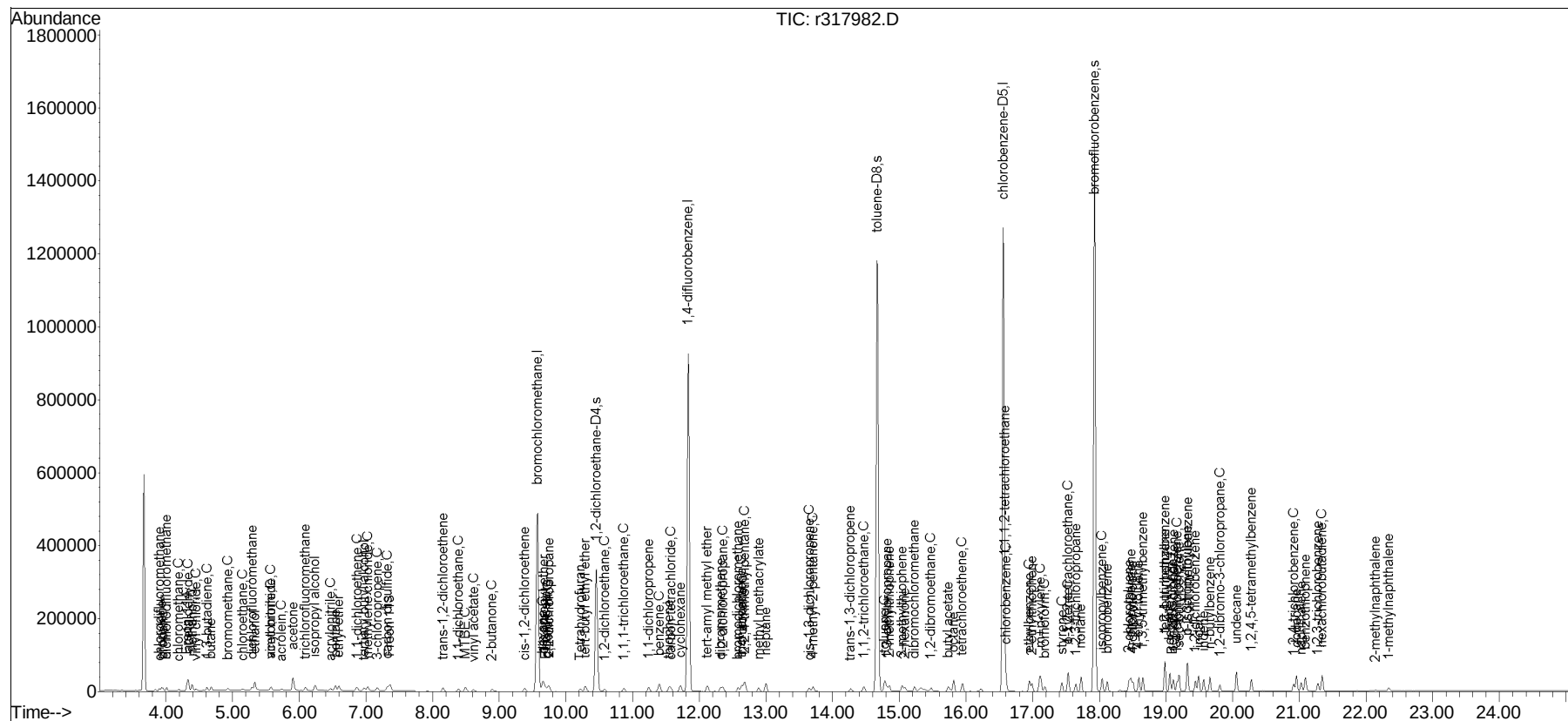
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.567	115	20051	0.193	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.808	75	5649	0.191	ppbV	88
112)	undecane	20.058	57	21153	0.204	ppbV	96
113)	1,2,4,5-tetramethylben...	20.283	119	21670	0.230	ppbV	99
114)	dodecane	20.958	57	18073	0.158	ppbV	96
115)	1,2,4-trichlorobenzene	20.917	180	8667	0.145	ppbV	98
116)	naphthalene	21.025	128	25141	0.170	ppbV	99
117)	1,2,3-trichlorobenzene	21.275	180	9959	0.170	ppbV	97
118)	benzothiophene	21.092	134	41319	0.176	ppbV	99
119)	hexachlorobutadiene	21.342	225	11904	0.218	ppbV	95
120)	2-methylnaphthalene	22.142	142	2108	0.060	ppbV	95
121)	1-methylnaphthalene	22.342	142	7684	0.093	ppbV	98

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File   : r317982.D
Acq On      : 26 Sep 2021    7:59 PM
Operator    : AIRPIANO3:TS
Sample      : IT015-LLSTD0.2
Misc        : WG1551274
ALS Vial    : 0    Sample Multiplier: 1
```

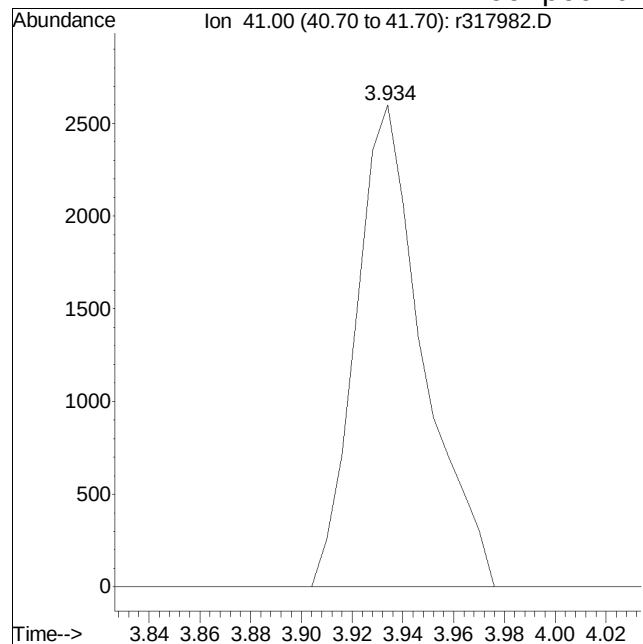
Quant Time: Sep 27 10:13:27 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:39:08 2021
Response via : Initial Calibration



Manual Integration Report

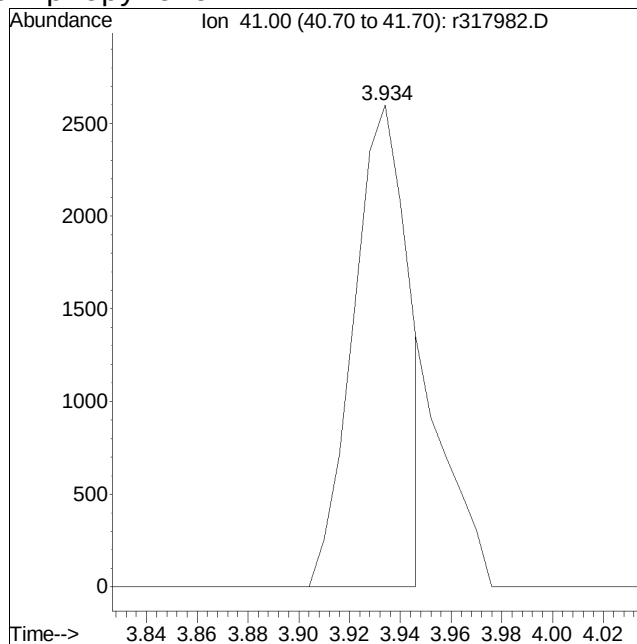
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317982.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:7: 9 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 9/27/2021 7:39 am

Compound #3: propylene



Original Peak Response = 4780

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

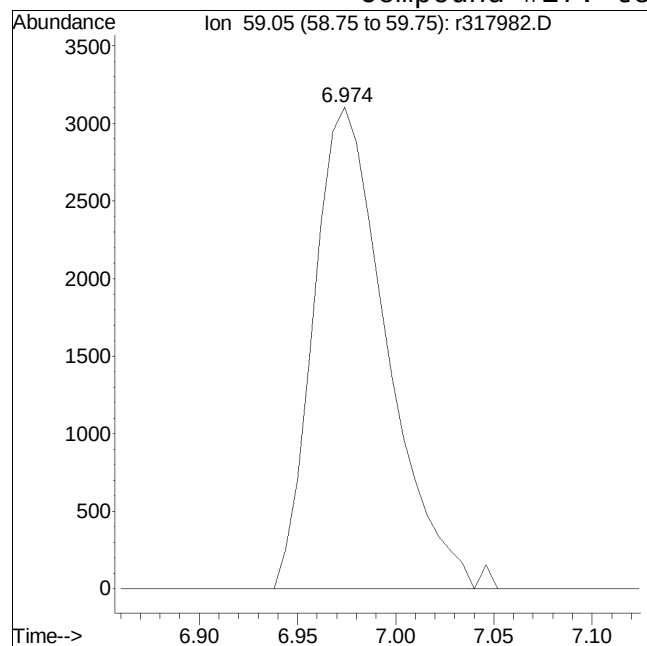


Manual Peak Response = 3906 M6

Manual Integration Report

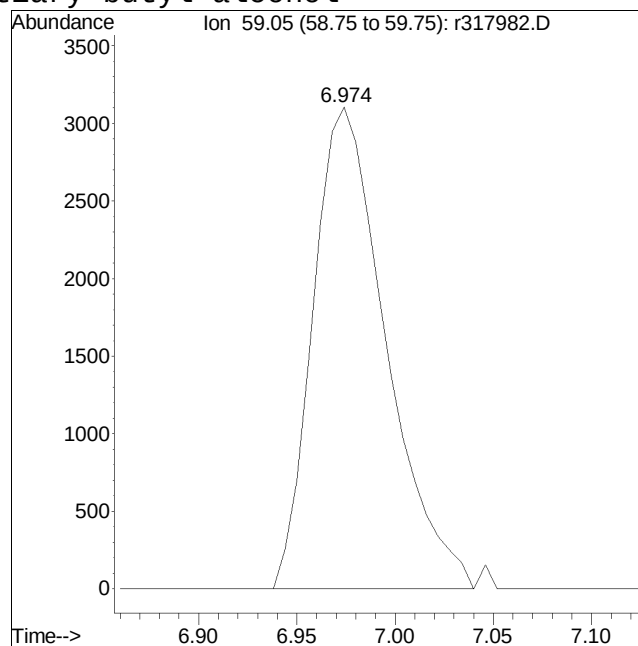
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317982.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:7: 9 Instrument :
Sample : IT015-LLSTD0.2 Quant Date : 9/27/2021 7:39 am

Compound #27: tertiary butyl alcohol



Original Peak Response = 8078

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 8022 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317983.D
 Acq On : 26 Sep 2021 8:38 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:15:02 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	360579	10.000	ppbV	0.00
Standard Area = 371494			Recovery =		97.06%	
43) 1,4-difluorobenzene	11.833	114	1006836	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =		96.22%	
67) chlorobenzene-D5	16.558	54	162944	10.000	ppbV	0.00
Standard Area = 171406			Recovery =		95.06%	
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.450	65	252376	9.862	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		98.62%	
69) toluene-D8	14.667	98	1044325	9.812	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		98.12%	
90) bromofluorobenzene	17.925	95	716990	9.701	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		97.01%	
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.898	51	17625	0.612	ppbV	99
3) propylene	3.928	41	9178M6	0.553	ppbV	
4) propane	3.952	29	13982	0.613	ppbV	99
5) dichlorodifluoromethane	4.006	85	20574	0.629	ppbV	100
6) chloromethane	4.186	50	9552	0.619	ppbV	99
7) Freon-114	4.312	85	27500	0.623	ppbV	97
8) methanol	4.390	31	28547	3.476	ppbV	90
9) vinyl chloride	4.444	62	12579	0.591	ppbV	99
10) 1,3-butadiene	4.612	54	10553	0.595	ppbV	100
11) butane	4.678	43	17436	0.614	ppbV	99
12) acetaldehyde	4.330	29	34768	3.459	ppbV	95
13) bromomethane	4.924	94	10036	0.596	ppbV	97
14) chloroethane	5.146	64	7234	0.605	ppbV	99
15) ethanol	5.327	31	49910	3.269	ppbV	97
16) dichlorofluoromethane	5.287	67	20522	0.604	ppbV	99
17) vinyl bromide	5.570	106	9999	0.589	ppbV	99
18) acrolein	5.730	56	5742	0.556	ppbV #	90
19) acetone	5.897	43	92628	3.032	ppbV	97
20) acetonitrile	5.573	41	10254	0.605	ppbV	99
21) trichlorofluoromethane	6.090	101	19743	0.599	ppbV	97
22) isopropyl alcohol	6.227	45	49130	1.320	ppbV	100
23) acrylonitrile	6.463	53	11296	0.564	ppbV	97
24) pentane	6.537	43	23252M6	0.501	ppbV	

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317983.D
 Acq On : 26 Sep 2021 8:38 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:15:02 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.587	31	24290	0.526	ppbV	98
26) 1,1-dichloroethene	6.860	61	17619	0.570	ppbV	98
27) tertiary butyl alcohol	6.962	59	20496	0.510	ppbV	95
28) methylene chloride	7.022	49	15683	0.615	ppbV	98
29) 3-chloropropene	7.166	41	16951	0.567	ppbV	99
30) carbon disulfide	7.316	76	42408	0.600	ppbV	96
31) Freon 113	7.358	101	21612	0.593	ppbV	99
32) trans-1,2-dichloroethene	8.150	61	18591	0.566	ppbV	99
33) 1,1-dichloroethane	8.383	63	21618	0.569	ppbV	99
34) MTBE	8.483	73	33499	0.570	ppbV	99
35) vinyl acetate	8.608	43	24696	0.530	ppbV	100
36) 2-butanone	8.883	43	26524	0.552	ppbV	99
37) cis-1,2-dichloroethene	9.383	61	16262	0.562	ppbV	98
38) Ethyl Acetate	9.692	61	4458	0.524	ppbV	93
39) chloroform	9.733	83	22765	0.584	ppbV	100
40) Tetrahydrofuran	10.200	42	15772	0.553	ppbV	99
41) 2,2-dichloropropane	9.750	77	14838	0.497	ppbV #	80
42) 1,2-dichloroethane	10.575	62	12760	0.577	ppbV	99
44) hexane	9.642	57	24857	0.575	ppbV #	75
45) diisopropyl ether	9.658	87	13462	0.572	ppbV	92
46) tert-butyl ethyl ether	10.283	59	37419	0.535	ppbV	100
48) 1,1,1-trichloroethane	10.867	97	16840	0.558	ppbV	99
49) 1,1-dichloropropene	11.240	75	19018	0.581	ppbV	99
50) benzene	11.400	78	52138	0.649	ppbV	99
51) thiophene	11.547	84	26036	0.584	ppbV	99
52) carbon tetrachloride	11.573	117	15808	0.546	ppbV	99
53) cyclohexane	11.713	56	25776	0.556	ppbV	98
54) tert-amyl methyl ether	12.113	73	36298	0.556	ppbV	99
55) dibromomethane	12.320	93	12359	0.598	ppbV	96
56) 1,2-dichloropropane	12.353	63	14714	0.568	ppbV	97
57) bromodichloromethane	12.580	83	24300	0.569	ppbV	98
58) 1,4-dioxane	12.640	88	10217	0.548	ppbV	98
59) trichloroethene	12.633	130	17680	0.575	ppbV	99
60) 2,2,4-trimethylpentane	12.680	57	79811	0.571	ppbV	99
61) methyl methacrylate	12.887	41	16731	0.486	ppbV	99
62) heptane	13.000	43	28291	0.592	ppbV	96
63) cis-1,3-dichloropropene	13.642	75	20566	0.529	ppbV	99
64) 4-methyl-2-pentanone	13.700	43	30794	0.553	ppbV	97
65) trans-1,3-dichloropropene	14.267	75	17320	0.478	ppbV	99
66) 1,1,2-trichloroethane	14.467	97	15316	0.576	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317983.D
 Acq On : 26 Sep 2021 8:38 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:15:02 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.775	91	56370	0.647	ppbV	99
70) 2-methylthiophene	14.850	97	35562	0.589	ppbV	98
71) 1,3-dichloropropane	14.808	76	25505	0.604	ppbV	98
72) 2-hexanone	15.075	43	28526	0.541	ppbV	94
73) 3-methylthiophene	15.042	97	36426	0.587	ppbV	99
74) dibromochloromethane	15.225	129	21347	0.552	ppbV	99
75) 1,2-dibromoethane	15.475	107	22452	0.571	ppbV	99
76) butyl acetate	15.725	73	6317	0.481	ppbV	97
77) octane	15.817	85	21589	0.580	ppbV	97
78) tetrachloroethene	15.942	166	22598	0.595	ppbV	99
79) 1,1,1,2-tetrachloroethane	16.583	131	15551	0.552	ppbV	97
80) chlorobenzene	16.600	112	41588	0.586	ppbV	99
81) ethylbenzene	16.950	91	61030	0.569	ppbV	99
82) 2-ethylthiophene	16.992	97	41169	0.588	ppbV	99
83) m+p-xylene	17.117	91	102477	1.182	ppbV	99
84) bromoform	17.183	173	19469	0.514	ppbV	98
85) styrene	17.433	104	41600	0.557	ppbV	100
86) 1,1,2,2-tetrachloroethane	17.533	83	37970	0.585	ppbV	99
87) o-xylene	17.533	91	51497	0.592	ppbV	98
88) 1,2,3-trichloropropane	17.642	75	29425	0.585	ppbV	100
89) nonane	17.725	43	39894	0.597	ppbV	96
91) isopropylbenzene	18.042	105	68726	0.607	ppbV	96
92) bromobenzene	18.117	77	40947	0.602	ppbV	96
93) 2-chlorotoluene	18.442	126	19211	0.559	ppbV	99
94) n-propylbenzene	18.475	120	22498	0.546	ppbV	89
95) 4-chlorotoluene	18.500	126	18222	0.558	ppbV	91
96) 4-ethyl toluene	18.592	105	73438	0.579	ppbV	97
97) 1,3,5-trimethylbenzene	18.650	105	61721	0.579	ppbV	99
98) tert-butylbenzene	18.983	119	66835	0.611	ppbV	97
99) 1,2,4-trimethylbenzene	18.983	105	61790	0.596	ppbV	98
100) decane	19.058	57	49388	0.561	ppbV	95
101) Benzyl Chloride	19.100	91	22539	0.284	ppbV	95
102) 1,3-dichlorobenzene	19.108	146	38408	0.539	ppbV	99
103) 1,4-dichlorobenzene	19.167	146	38570	0.552	ppbV	97
104) sec-butylbenzene	19.192	105	89252	0.614	ppbV	97
105) 1,2,3-trimethylbenzene	19.317	105	65386	0.586	ppbV	97
106) p-isopropyltoluene	19.317	119	80953M6	0.612	ppbV	
107) 1,2-dichlorobenzene	19.433	146	36043	0.541	ppbV	99
108) n-butylbenzene	19.658	91	63318	0.560	ppbV	96
109) indan	19.483	117	68057	0.546	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317983.D
 Acq On : 26 Sep 2021 8:38 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD0.5
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:15:02 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

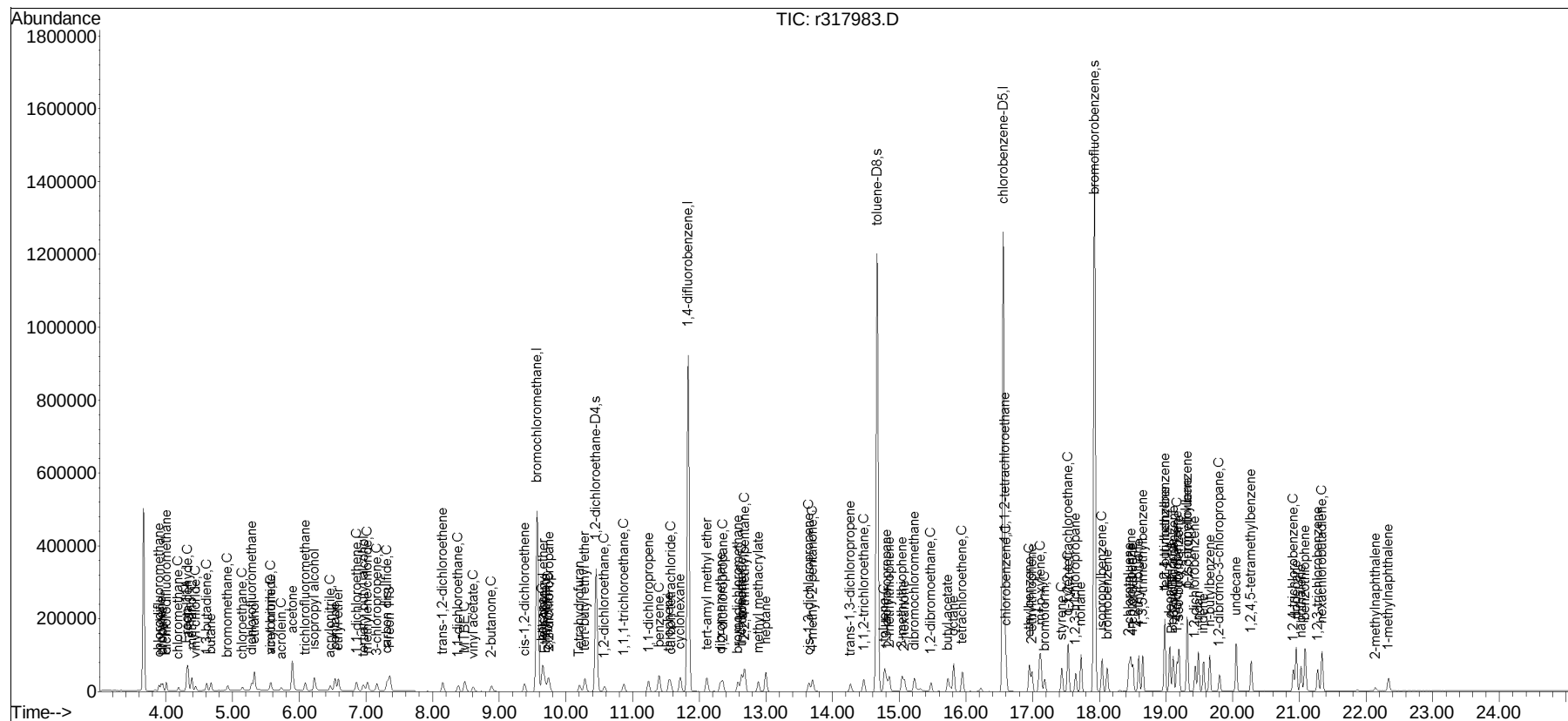
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.558	115	51676	0.507	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.800	75	15057	0.517	ppbV	96
112)	undecane	20.050	57	54839	0.538	ppbV	97
113)	1,2,4,5-tetramethylben...	20.275	119	55963	0.605	ppbV	100
114)	dodecane	20.950	57	51051	0.454	ppbV	96
115)	1,2,4-trichlorobenzene	20.908	180	25022	0.425	ppbV	99
116)	naphthalene	21.025	128	71124	0.488	ppbV	99
117)	1,2,3-trichlorobenzene	21.275	180	27172	0.471	ppbV	99
118)	benzothiophene	21.083	134	121133	0.526	ppbV	98
119)	hexachlorobutadiene	21.342	225	30324	0.565	ppbV	95
120)	2-methylnaphthalene	22.142	142	9000	0.261	ppbV	99
121)	1-methylnaphthalene	22.333	142	29084	0.359	ppbV	98

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

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Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File  : r317983.D
Acq On     : 26 Sep 2021    8:38 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-LLSTD0.5
Misc       : WG1551274
ALS Vial   : 0    Sample Multiplier: 1
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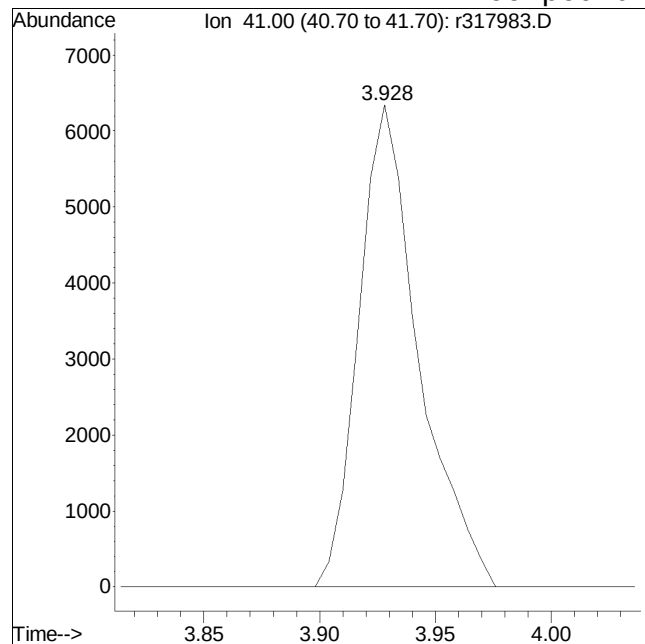
Quant Time: Sep 27 10:15:02 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:39:08 2021
Response via : Initial Calibration



Manual Integration Report

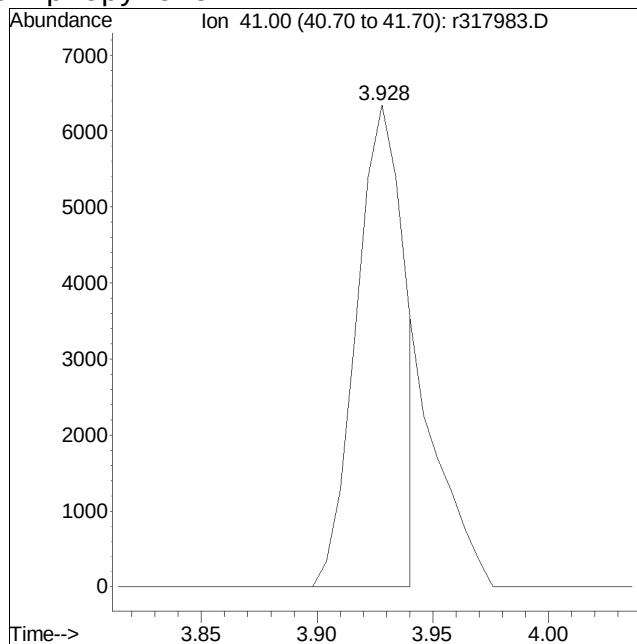
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Data File : r317983.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:8: 8 Instrument :
Sample : IT015-LLSTD0.5 Quant Date : 9/27/2021 7:39 am

Compound #3: propylene



Original Peak Response = 11449

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

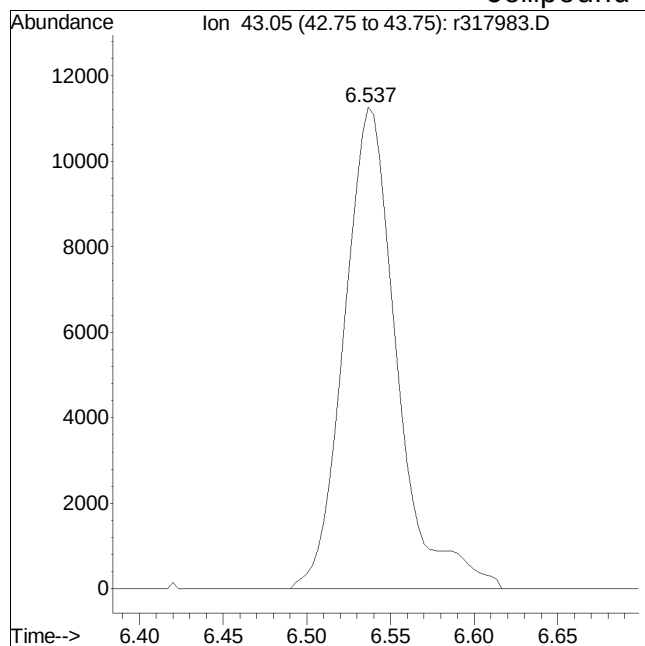


Manual Peak Response = 9178 M6

Manual Integration Report

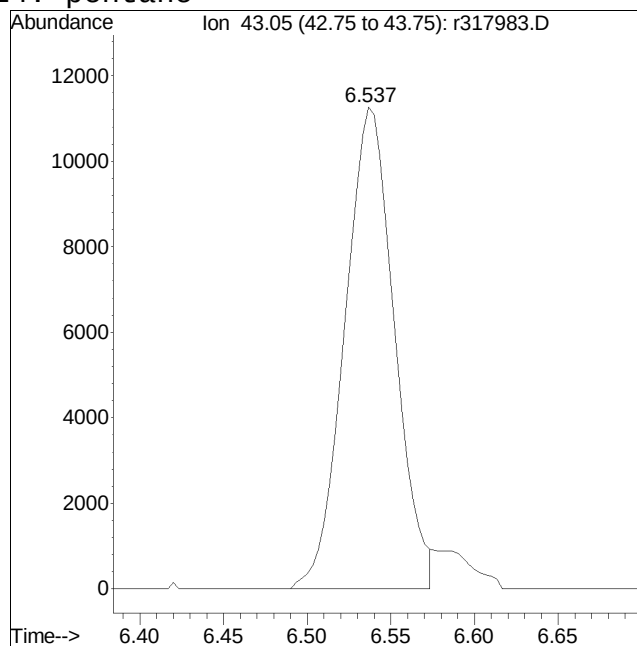
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Data File : r317983.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:8: 8 Instrument :
Sample : IT015-LLSTD0.5 Quant Date : 9/27/2021 7:39 am

Compound #24: pentane



Original Peak Response = 24729

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

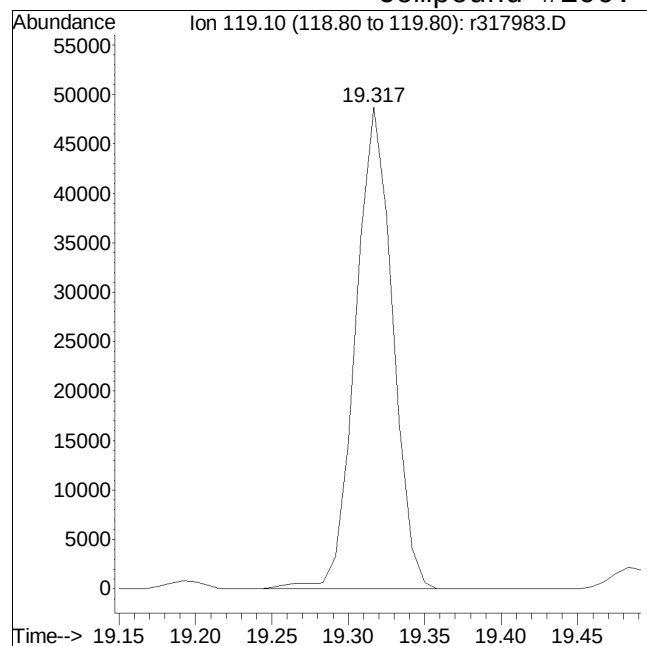


Manual Peak Response = 23252 M6

Manual Integration Report

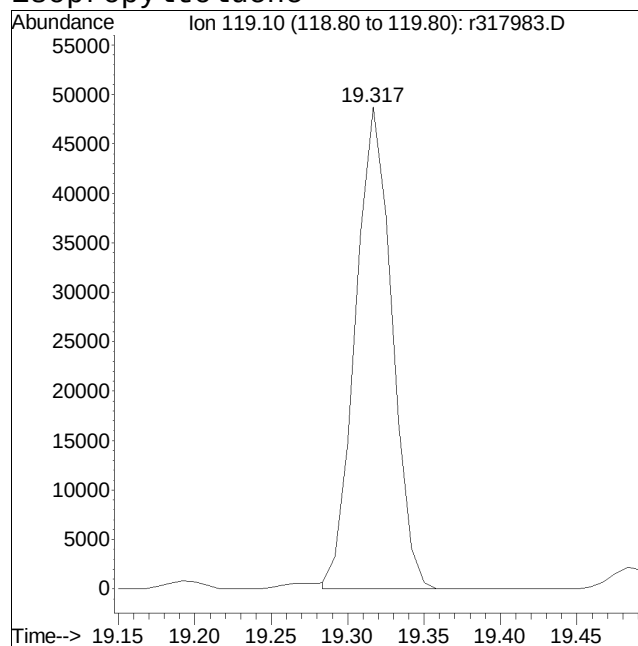
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317983.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:8: 8 Instrument :
Sample : IT015-LLSTD0.5 Quant Date : 9/27/2021 7:39 am

Compound #106: p-isopropyltoluene



Original Peak Response = 82131

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 80953 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317984.D
 Acq On : 26 Sep 2021 9:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:17:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	364268	10.000	ppbV	0.00
Standard Area = 371494			Recovery =		98.05%	
43) 1,4-difluorobenzene	11.833	114	1018672	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =		97.35%	
67) chlorobenzene-D5	16.558	54	167006	10.000	ppbV	0.00
Standard Area = 171406			Recovery =		97.43%	
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.450	65	256598	9.910	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		99.10%	
69) toluene-D8	14.667	98	1055075	9.672	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		96.72%	
90) bromofluorobenzene	17.925	95	724427	9.563	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		95.63%	
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.898	51	35871	1.233	ppbV	99
3) propylene	3.928	41	19599M6	1.168	ppbV	
4) propane	3.952	29	28078	1.219	ppbV	99
5) dichlorodifluoromethane	4.006	85	41767	1.264	ppbV	100
6) chloromethane	4.192	50	19428	1.246	ppbV	100
7) Freon-114	4.318	85	56101	1.257	ppbV	98
8) methanol	4.390	31	55274	6.662	ppbV	95
9) vinyl chloride	4.450	62	25771	1.199	ppbV	99
10) 1,3-butadiene	4.612	54	21604	1.206	ppbV	98
11) butane	4.678	43	34966	1.219	ppbV	99
12) acetaldehyde	4.330	29	66635	6.562	ppbV	96
13) bromomethane	4.930	94	20429	1.201	ppbV	100
14) chloroethane	5.146	64	14109	1.168	ppbV	97
15) ethanol	5.323	31	98827	6.408	ppbV	98
16) dichlorofluoromethane	5.287	67	41637	1.213	ppbV	99
17) vinyl bromide	5.573	106	20408	1.191	ppbV	97
18) acrolein	5.730	56	13181	1.263	ppbV #	94
19) acetone	5.893	43	185372	6.006	ppbV	97
20) acetonitrile	5.570	41	20522	1.198	ppbV	98
21) trichlorofluoromethane	6.093	101	40242	1.209	ppbV	97
22) isopropyl alcohol	6.220	45	101381	2.697	ppbV	100
23) acrylonitrile	6.467	53	23589	1.166	ppbV	98
24) pentane	6.540	43	46852M6	0.998	ppbV	

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317984.D
 Acq On : 26 Sep 2021 9:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:17:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.583	31	48965	1.050	ppbV	98
26) 1,1-dichloroethene	6.860	61	35658	1.141	ppbV	98
27) tertiary butyl alcohol	6.950	59	43246	1.065	ppbV	97
28) methylene chloride	7.028	49	31435	1.221	ppbV	97
29) 3-chloropropene	7.166	41	34606	1.145	ppbV	99
30) carbon disulfide	7.316	76	85703	1.201	ppbV	98
31) Freon 113	7.358	101	43970	1.194	ppbV	100
32) trans-1,2-dichloroethene	8.150	61	37913	1.142	ppbV	99
33) 1,1-dichloroethane	8.383	63	44363	1.155	ppbV	99
34) MTBE	8.475	73	69001	1.162	ppbV	98
35) vinyl acetate	8.608	43	52251	1.110	ppbV	99
36) 2-butanone	8.875	43	54108	1.115	ppbV	99
37) cis-1,2-dichloroethene	9.383	61	32868	1.125	ppbV	99
38) Ethyl Acetate	9.683	61	9411	1.094	ppbV	89
39) chloroform	9.733	83	46978	1.193	ppbV	99
40) Tetrahydrofuran	10.192	42	32788	1.138	ppbV	98
41) 2,2-dichloropropane	9.750	77	31694	1.050	ppbV #	87
42) 1,2-dichloroethane	10.575	62	26435	1.183	ppbV	98
44) hexane	9.650	57	51056	1.167	ppbV	98
45) diisopropyl ether	9.658	87	27048	1.136	ppbV	93
46) tert-butyl ethyl ether	10.283	59	78070	1.104	ppbV	100
48) 1,1,1-trichloroethane	10.867	97	34821	1.141	ppbV	98
49) 1,1-dichloropropene	11.240	75	39915	1.206	ppbV	100
50) benzene	11.400	78	101522	1.250	ppbV	99
51) thiophene	11.547	84	53558	1.186	ppbV	98
52) carbon tetrachloride	11.573	117	33084	1.130	ppbV	98
53) cyclohexane	11.713	56	53690	1.144	ppbV	100
54) tert-amyl methyl ether	12.107	73	74735	1.132	ppbV	99
55) dibromomethane	12.320	93	24705	1.181	ppbV	98
56) 1,2-dichloropropane	12.353	63	29866	1.139	ppbV	99
57) bromodichloromethane	12.580	83	49377	1.144	ppbV	100
58) 1,4-dioxane	12.633	88	21542	1.142	ppbV	99
59) trichloroethene	12.633	130	35998	1.157	ppbV	98
60) 2,2,4-trimethylpentane	12.680	57	163572	1.157	ppbV	99
61) methyl methacrylate	12.887	41	35130	1.008	ppbV	99
62) heptane	13.000	43	57141	1.181	ppbV	98
63) cis-1,3-dichloropropene	13.650	75	43119	1.096	ppbV	99
64) 4-methyl-2-pentanone	13.692	43	64236	1.139	ppbV	97
65) trans-1,3-dichloropropene	14.267	75	37781	1.031	ppbV	100
66) 1,1,2-trichloroethane	14.467	97	31047	1.154	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317984.D
 Acq On : 26 Sep 2021 9:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:17:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.783	91	108616	1.216	ppbV	99
70) 2-methylthiophene	14.850	97	72824	1.177	ppbV	100
71) 1,3-dichloropropane	14.808	76	51586	1.191	ppbV	99
72) 2-hexanone	15.075	43	57351	1.061	ppbV	95
73) 3-methylthiophene	15.042	97	74983	1.179	ppbV	99
74) dibromochloromethane	15.225	129	44282	1.117	ppbV	98
75) 1,2-dibromoethane	15.475	107	46471	1.153	ppbV	100
76) butyl acetate	15.725	73	13869	1.031	ppbV	97
77) octane	15.817	85	43711	1.146	ppbV	97
78) tetrachloroethene	15.942	166	45661	1.174	ppbV	100
79) 1,1,1,2-tetrachloroethane	16.583	131	32194	1.114	ppbV	98
80) chlorobenzene	16.600	112	85214	1.171	ppbV	99
81) ethylbenzene	16.950	91	124479	1.132	ppbV	99
82) 2-ethylthiophene	16.992	97	84376	1.175	ppbV	99
83) m+p-xylene	17.117	91	209657	2.360	ppbV	99
84) bromoform	17.183	173	40717	1.049	ppbV	99
85) styrene	17.433	104	85966	1.124	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.533	83	78433	1.179	ppbV	100
87) o-xylene	17.533	91	106252	1.192	ppbV	98
88) 1,2,3-trichloropropane	17.642	75	61536	1.193	ppbV	100
89) nonane	17.725	43	82488	1.204	ppbV	95
91) isopropylbenzene	18.042	105	141085	1.216	ppbV	97
92) bromobenzene	18.117	77	83672	1.201	ppbV	98
93) 2-chlorotoluene	18.442	126	39985	1.135	ppbV	100
94) n-propylbenzene	18.475	120	48091	1.139	ppbV	93
95) 4-chlorotoluene	18.500	126	38860	1.161	ppbV	94
96) 4-ethyl toluene	18.592	105	157126	1.208	ppbV	98
97) 1,3,5-trimethylbenzene	18.650	105	128943	1.179	ppbV	97
98) tert-butylbenzene	18.983	119	136807	1.220	ppbV	96
99) 1,2,4-trimethylbenzene	18.983	105	127769	1.202	ppbV	98
100) decane	19.058	57	103267	1.144	ppbV	96
101) Benzyl Chloride	19.100	91	57683	0.709	ppbV	95
102) 1,3-dichlorobenzene	19.108	146	83253	1.139	ppbV	99
103) 1,4-dichlorobenzene	19.167	146	84051	1.173	ppbV	98
104) sec-butylbenzene	19.192	105	182536	1.225	ppbV	98
105) 1,2,3-trimethylbenzene	19.325	105	133403	1.167	ppbV	97
106) p-isopropyltoluene	19.317	119	164711M6	1.214	ppbV	
107) 1,2-dichlorobenzene	19.442	146	77302	1.131	ppbV	97
108) n-butylbenzene	19.658	91	133689	1.153	ppbV	96
109) indan	19.483	117	144655	1.132	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317984.D
 Acq On : 26 Sep 2021 9:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD1.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:17:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

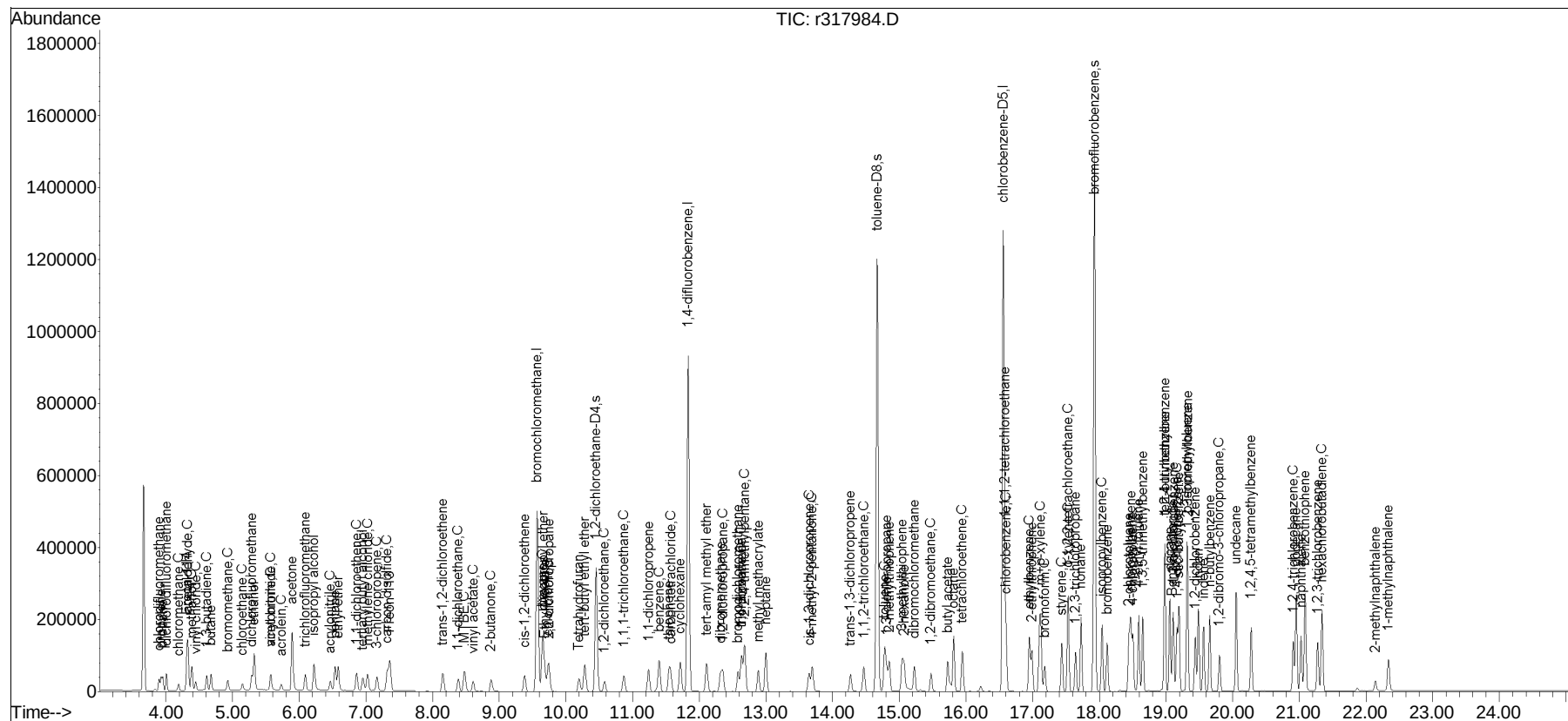
	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)

110)	indene	19.567	115	112274	1.074	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.800	75	33219	1.112	ppbV	97
112)	undecane	20.050	57	115674	1.106	ppbV	97
113)	1,2,4,5-tetramethylben...	20.275	119	118689	1.252	ppbV	100
114)	dodecane	20.950	57	112510	0.976	ppbV	97
115)	1,2,4-trichlorobenzene	20.908	180	56668	0.939	ppbV	99
116)	naphthalene	21.025	128	155425	1.041	ppbV	100
117)	1,2,3-trichlorobenzene	21.275	180	59367	1.004	ppbV	98
118)	benzothiophene	21.083	134	269990	1.143	ppbV	98
119)	hexachlorobutadiene	21.342	225	62592	1.138	ppbV	95
120)	2-methylnaphthalene	22.142	142	23863	0.675	ppbV	98
121)	1-methylnaphthalene	22.333	142	68402	0.823	ppbV	100

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File  : r317984.D
Acq On     : 26 Sep 2021    9:20 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-LLSTD1.0
Misc       : WG1551274
ALS Vial   : 0    Sample Multiplier: 1
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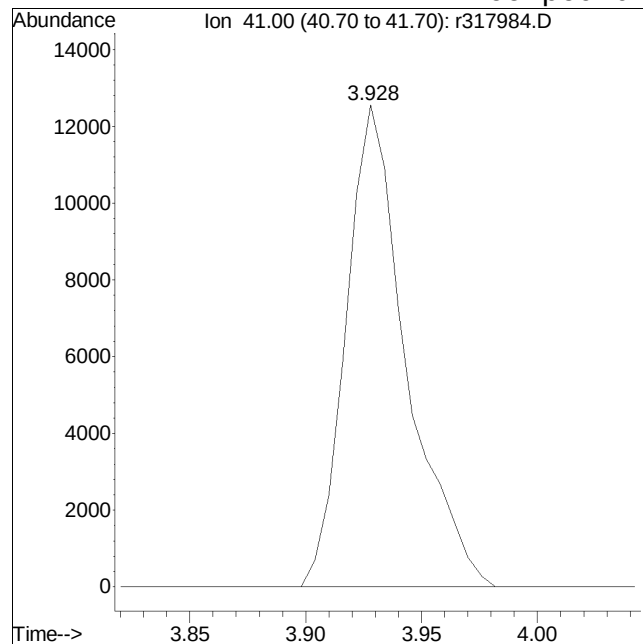
Quant Time: Sep 27 10:17:34 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:39:08 2021
Response via : Initial Calibration



Manual Integration Report

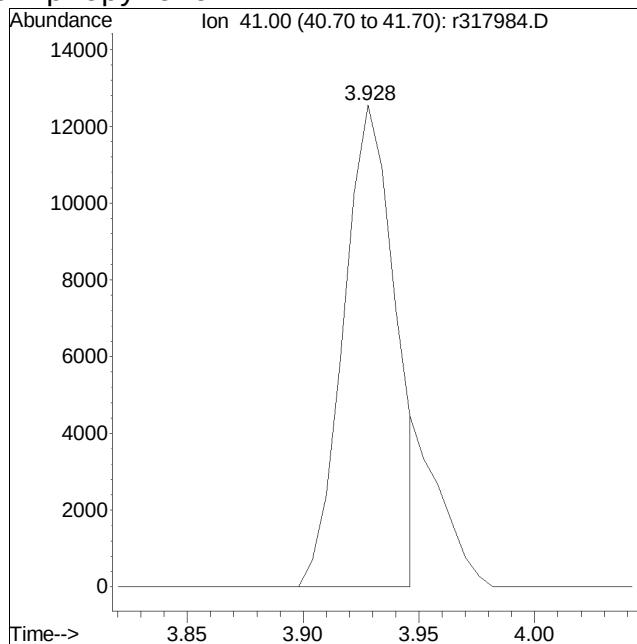
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317984.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:9: 0 Instrument :
Sample : IT015-LLSTD1.0 Quant Date : 9/27/2021 7:39 am

Compound #3: propylene



Original Peak Response = 22762

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

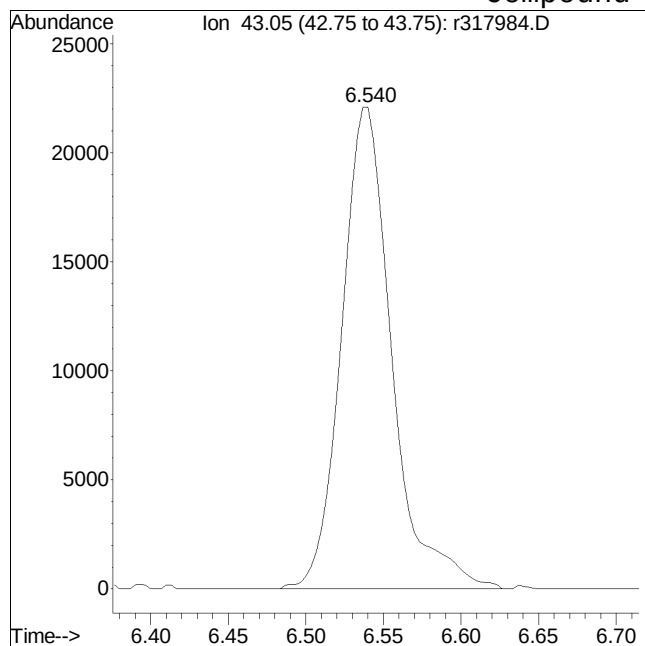


Manual Peak Response = 19599 M6

Manual Integration Report

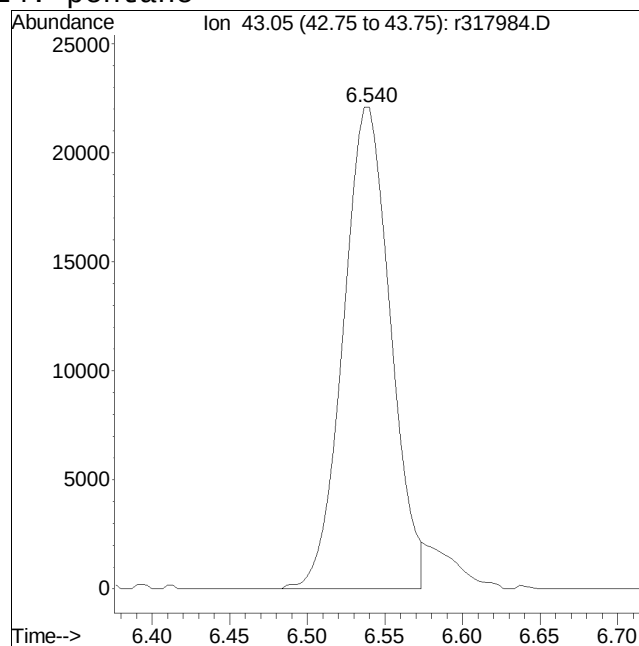
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317984.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:9: 0 Instrument :
Sample : IT015-LLSTD1.0 Quant Date : 9/27/2021 7:39 am

Compound #24: pentane



Original Peak Response = 49839

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

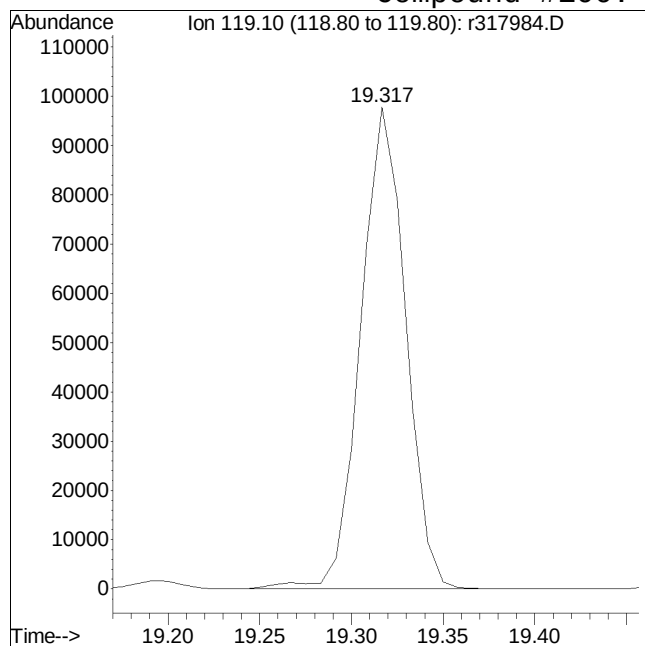


Manual Peak Response = 46852 M6

Manual Integration Report

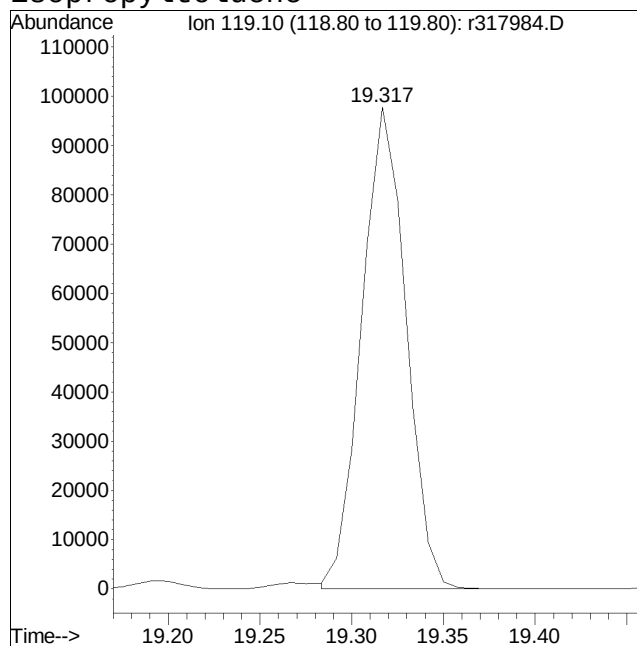
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317984.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:9: 0 Instrument :
Sample : IT015-LLSTD1.0 Quant Date : 9/27/2021 7:39 am

Compound #106: p-isopropyltoluene



Original Peak Response = 167123

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 164711 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317985.D
 Acq On : 26 Sep 2021 10:00 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:18:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.575	49	370017	10.000	ppbV	0.00
Standard Area = 371494			Recovery =	99.60%		
43) 1,4-difluorobenzene	11.833	114	1036566	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =	99.06%		
67) chlorobenzene-D5	16.558	54	170213	10.000	ppbV	0.00
Standard Area = 171406			Recovery =	99.30%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.450	65	260692	9.895	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	98.95%		
69) toluene-D8	14.667	98	1083393	9.745	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	97.45%		
90) bromofluorobenzene	17.925	95	755379	9.784	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	97.84%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.898	51	153532	5.193	ppbV	99
3) propylene	3.928	41	84565M6	4.962	ppbV	
4) propane	3.958	29	118725	5.072	ppbV	98
5) dichlorodifluoromethane	4.006	85	178884	5.329	ppbV	100
6) chloromethane	4.192	50	83042	5.244	ppbV	100
7) Freon-114	4.318	85	240742	5.312	ppbV	98
8) methanol	4.390	31	227177	26.954	ppbV	99
9) vinyl chloride	4.450	62	113141	5.183	ppbV	98
10) 1,3-butadiene	4.612	54	94655	5.201	ppbV	98
11) butane	4.678	43	150915	5.178	ppbV	100
12) acetaldehyde	4.330	29	280405	27.186	ppbV	97
13) bromomethane	4.930	94	89354	5.172	ppbV	99
14) chloroethane	5.152	64	62517	5.096	ppbV	99
15) ethanol	5.320	31	422214	26.950	ppbV	99
16) dichlorofluoromethane	5.290	67	180529	5.178	ppbV	100
17) vinyl bromide	5.573	106	89205	5.123	ppbV	100
18) acrolein	5.730	56	57205	5.397	ppbV	97
19) acetone	5.883	43	819247	26.132	ppbV	98
20) acetonitrile	5.570	41	86492	4.972	ppbV	99
21) trichlorofluoromethane	6.093	101	174778	5.167	ppbV	99
22) isopropyl alcohol	6.210	45	494767	12.958	ppbV	100
23) acrylonitrile	6.463	53	102713	4.996	ppbV	99
24) pentane	6.540	43	211999	4.447	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317985.D
 Acq On : 26 Sep 2021 10:00 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:18:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.580	31	235144	4.966	ppbV	99
26) 1,1-dichloroethene	6.860	61	159000	5.008	ppbV	100
27) tertiary butyl alcohol	6.938	59	206755	5.011	ppbV	98
28) methylene chloride	7.028	49	134559	5.145	ppbV	99
29) 3-chloropropene	7.166	41	154925	5.046	ppbV	99
30) carbon disulfide	7.322	76	374357	5.165	ppbV	99
31) Freon 113	7.358	101	190291	5.087	ppbV	99
32) trans-1,2-dichloroethene	8.158	61	167627	4.972	ppbV	99
33) 1,1-dichloroethane	8.392	63	194835	4.995	ppbV	100
34) MTBE	8.467	73	305951	5.072	ppbV	99
35) vinyl acetate	8.608	43	235653	4.927	ppbV	99
36) 2-butanone	8.867	43	252097	5.113	ppbV	100
37) cis-1,2-dichloroethene	9.383	61	146379	4.932	ppbV	100
38) Ethyl Acetate	9.675	61	42574	4.873	ppbV	82
39) chloroform	9.733	83	202951	5.072	ppbV	100
40) Tetrahydrofuran	10.183	42	146876	5.020	ppbV	100
41) 2,2-dichloropropane	9.750	77	151063	4.927	ppbV	96
42) 1,2-dichloroethane	10.575	62	114135	5.026	ppbV	100
44) hexane	9.650	57	225012	5.054	ppbV	91
45) diisopropyl ether	9.650	87	120643	4.980	ppbV	97
46) tert-butyl ethyl ether	10.275	59	355392	4.940	ppbV	100
48) 1,1,1-trichloroethane	10.867	97	154935	4.991	ppbV	100
49) 1,1-dichloropropene	11.240	75	172666	5.127	ppbV	98
50) benzene	11.400	78	423038	5.118	ppbV	99
51) thiophene	11.547	84	231413	5.038	ppbV	99
52) carbon tetrachloride	11.573	117	149281	5.010	ppbV	99
53) cyclohexane	11.713	56	237200	4.968	ppbV	99
54) tert-amyl methyl ether	12.100	73	337097	5.016	ppbV	100
55) dibromomethane	12.320	93	107129	5.033	ppbV	99
56) 1,2-dichloropropane	12.353	63	133683	5.011	ppbV	99
57) bromodichloromethane	12.580	83	222815	5.072	ppbV	99
58) 1,4-dioxane	12.620	88	96454	5.024	ppbV	99
59) trichloroethene	12.633	130	159307	5.030	ppbV	99
60) 2,2,4-trimethylpentane	12.680	57	705868M6	4.908	ppbV	
61) methyl methacrylate	12.880	41	176165	4.968	ppbV	100
62) heptane	13.000	43	251054	5.101	ppbV	99
63) cis-1,3-dichloropropene	13.642	75	201137	5.024	ppbV	99
64) 4-methyl-2-pentanone	13.683	43	291478	5.080	ppbV	98
65) trans-1,3-dichloropropene	14.267	75	185260	4.969	ppbV	99
66) 1,1,2-trichloroethane	14.467	97	137835	5.033	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317985.D
 Acq On : 26 Sep 2021 10:00 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:18:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.783	91	460581	5.058	ppbV	99
70) 2-methylthiophene	14.850	97	313529	4.972	ppbV	99
71) 1,3-dichloropropane	14.808	76	225095	5.099	ppbV	99
72) 2-hexanone	15.067	43	276203	5.016	ppbV	97
73) 3-methylthiophene	15.042	97	324359	5.004	ppbV	99
74) dibromochloromethane	15.225	129	202110	5.000	ppbV	99
75) 1,2-dibromoethane	15.475	107	210385	5.121	ppbV	100
76) butyl acetate	15.717	73	67323	4.912	ppbV	98
77) octane	15.817	85	196268	5.048	ppbV	99
78) tetrachloroethene	15.942	166	203622	5.136	ppbV	100
79) 1,1,1,2-tetrachloroethane	16.583	131	146770	4.985	ppbV	99
80) chlorobenzene	16.600	112	377531	5.090	ppbV	100
81) ethylbenzene	16.950	91	560302	4.997	ppbV	99
82) 2-ethylthiophene	16.992	97	369708	5.053	ppbV	99
83) m+p-xylene	17.108	91	928567	10.255	ppbV	99
84) bromoform	17.183	173	196147	4.960	ppbV	99
85) styrene	17.433	104	394884	5.064	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.525	83	348638	5.142	ppbV	99
87) o-xylene	17.533	91	470492	5.181	ppbV	97
88) 1,2,3-trichloropropane	17.642	75	269107	5.121	ppbV	100
89) nonane	17.725	43	361312	5.174	ppbV	97
91) isopropylbenzene	18.042	105	617855	5.225	ppbV	98
92) bromobenzene	18.117	77	365739	5.150	ppbV	99
93) 2-chlorotoluene	18.442	126	181288	5.050	ppbV	97
94) n-propylbenzene	18.467	120	218875	5.087	ppbV	96
95) 4-chlorotoluene	18.500	126	171716	5.035	ppbV	97
96) 4-ethyl toluene	18.592	105	695730	5.248	ppbV	99
97) 1,3,5-trimethylbenzene	18.650	105	567847	5.095	ppbV	99
98) tert-butylbenzene	18.983	119	599844	5.248	ppbV	98
99) 1,2,4-trimethylbenzene	18.983	105	571357	5.273	ppbV	99
100) decane	19.058	57	468608	5.093	ppbV	99
101) Benzyl Chloride	19.100	91	380380	4.585	ppbV	98
102) 1,3-dichlorobenzene	19.108	146	378155	5.077	ppbV	100
103) 1,4-dichlorobenzene	19.167	146	382580	5.239	ppbV	98
104) sec-butylbenzene	19.192	105	801035	5.275	ppbV	98
105) 1,2,3-trimethylbenzene	19.317	105	620988	5.330	ppbV	98
106) p-isopropyltoluene	19.317	119	723196M6	5.231	ppbV	
107) 1,2-dichlorobenzene	19.433	146	355024	5.098	ppbV	100
108) n-butylbenzene	19.658	91	606836	5.134	ppbV	97
109) indan	19.483	117	685643	5.265	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317985.D
 Acq On : 26 Sep 2021 10:00 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD5.0
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:18:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

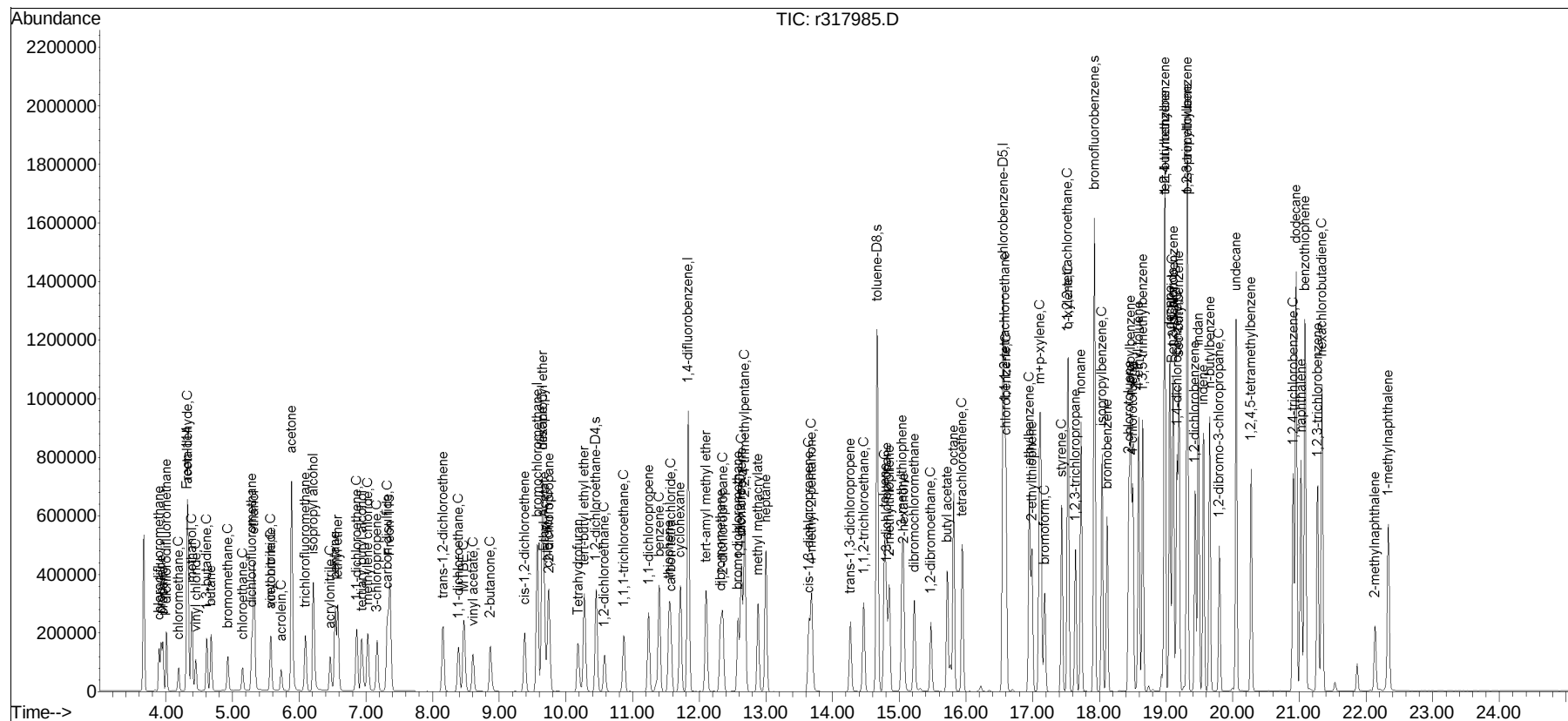
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110) indene	19.558	115	552384	5.187	ppbV	98
111) 1,2-dibromo-3-chloropr...	19.800	75	156664	5.145	ppbV	99
112) undecane	20.050	57	546522	5.128	ppbV	99
113) 1,2,4,5-tetramethylben...	20.275	119	502070	5.196	ppbV	99
114) dodecane	20.950	57	600099	5.109	ppbV	99
115) 1,2,4-trichlorobenzene	20.908	180	306682	4.984	ppbV	99
116) naphthalene	21.025	128	778569	5.114	ppbV	100
117) 1,2,3-trichlorobenzene	21.275	180	303010	5.026	ppbV	97
118) benzothiophene	21.083	134	1234077	5.126	ppbV	99
119) hexachlorobutadiene	21.342	225	299534	5.344	ppbV	95
120) 2-methylnaphthalene	22.133	142	164834	4.578	ppbV	100
121) 1-methylnaphthalene	22.333	142	419306	4.951	ppbV	99

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File  : r317985.D
Acq On     : 26 Sep 2021  10:00 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-LLSTD5.0
Misc       : WG1551274
ALS Vial   : 0    Sample Multiplier: 1
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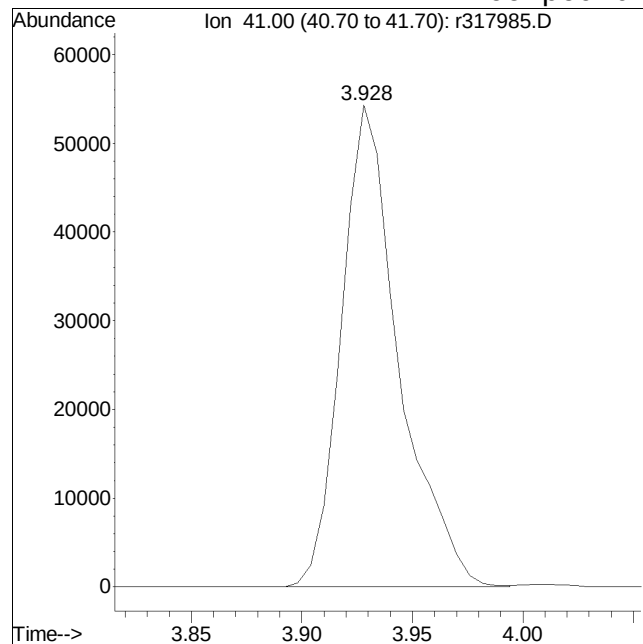
Quant Time: Sep 27 10:18:40 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:39:08 2021
Response via : Initial Calibration



Manual Integration Report

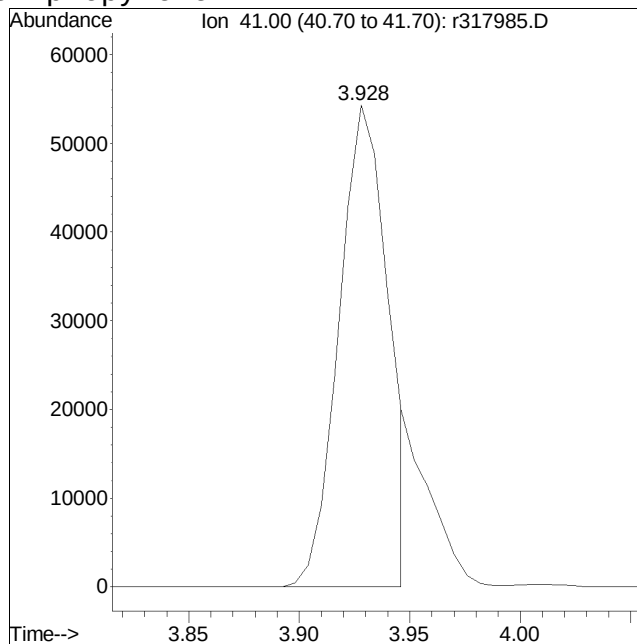
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317985.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 0 Instrument :
Sample : IT015-LLSTD5.0 Quant Date : 9/27/2021 7:39 am

Compound #3: propylene



Original Peak Response = 98577

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

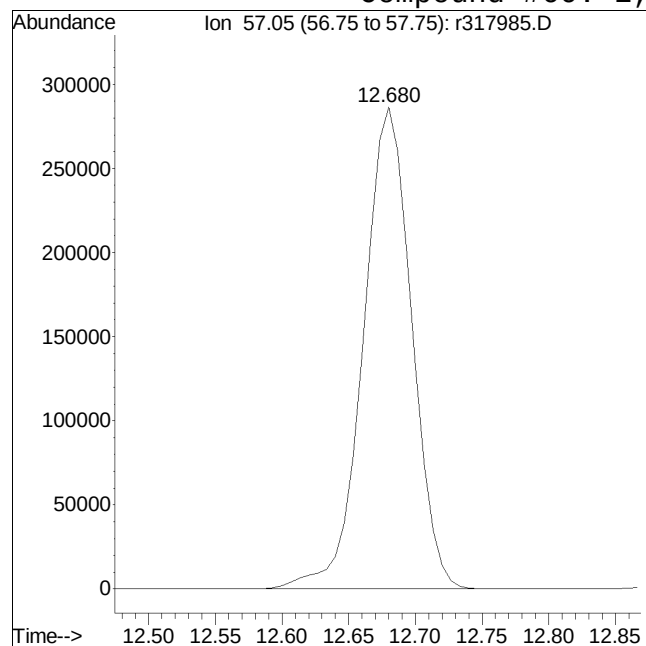


Manual Peak Response = 84565 M6

Manual Integration Report

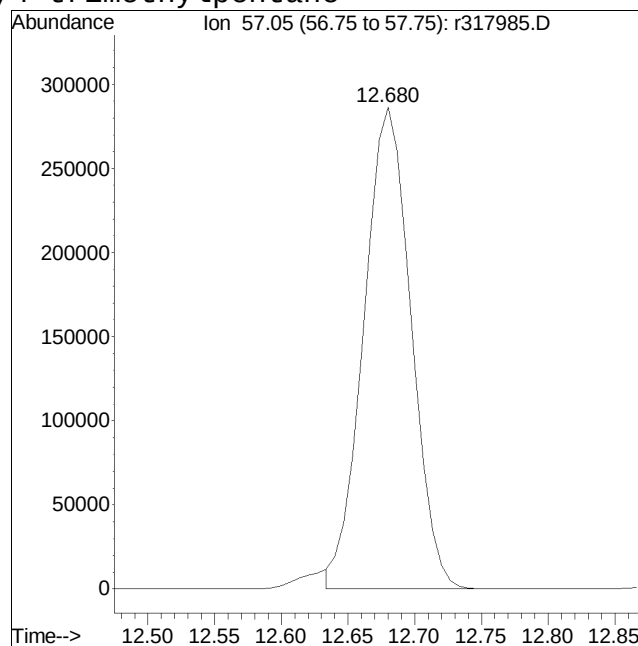
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317985.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 0 Instrument :
Sample : IT015-LLSTD5.0 Quant Date : 9/27/2021 7:39 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 723022

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

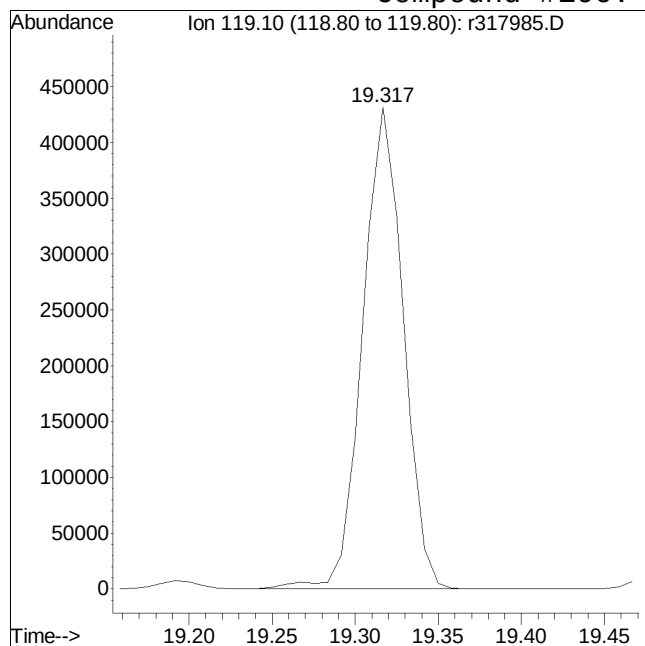


Manual Peak Response = 705868 M6

Manual Integration Report

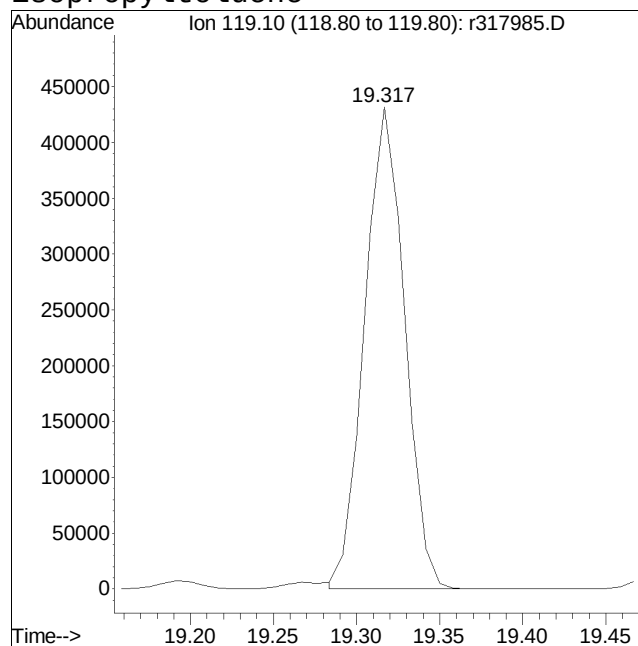
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317985.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 0 Instrument :
Sample : IT015-LLSTD5.0 Quant Date : 9/27/2021 7:39 am

Compound #106: p-isopropyltoluene



Original Peak Response = 734804

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 723196 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317986.D
 Acq On : 26 Sep 2021 10:41 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:24:07 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Fri Aug 20 07:24:15 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	371494	10.000	ppbV	0.00
Standard Area = 371494			Recovery =	100.00%		
43) 1,4-difluorobenzene	11.833	114	1046436	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =	100.00%		
67) chlorobenzene-D5	16.558	54	171406	10.000	ppbV	0.00
Standard Area = 171406			Recovery =	100.00%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.450	65	265974	10.627	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	106.27%		
69) toluene-D8	14.667	98	1119588	11.327	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	113.27%		
90) bromofluorobenzene	17.925	95	777455	11.353	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	113.53%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.898	51	296813	10.108	ppbV	99
3) propylene	3.928	41	171114M6	8.666	ppbV	
4) propane	3.952	29	234994	9.870	ppbV	100
5) dichlorodifluoromethane	4.006	85	337041	10.796	ppbV	98
6) chloromethane	4.186	50	158993	10.142	ppbV	100
7) Freon-114	4.312	85	455035	10.779	ppbV	98
8) methanol	4.384	31	423093	55.373	ppbV	95
9) vinyl chloride	4.444	62	219167	9.632	ppbV	100
10) 1,3-butadiene	4.612	54	182732	10.132	ppbV	91
11) butane	4.678	43	292638	9.313	ppbV	99
12) acetaldehyde	4.330	29	517776	57.544	ppbV	84
13) bromomethane	4.924	94	173456	10.079	ppbV	99
14) chloroethane	5.146	64	123166	10.278	ppbV	99
15) ethanol	5.317	31	786459	58.312	ppbV	92
16) dichlorofluoromethane	5.287	67	350022	9.936	ppbV	99
17) vinyl bromide	5.570	106	174820	10.383	ppbV	97
18) acrolein	5.723	56	106421	8.888	ppbV	99
19) acetone	5.880	43	1573768	47.076	ppbV	97
20) acetonitrile	5.567	41	174649	9.189	ppbV	99
21) trichlorofluoromethane	6.090	101	339591	10.210	ppbV	97
22) isopropyl alcohol	6.207	45	958366	22.743	ppbV	99
23) acrylonitrile	6.460	53	206397	9.825	ppbV	97
24) pentane	6.537	43	478616	11.188	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317986.D
 Acq On : 26 Sep 2021 10:41 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:24:07 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Fri Aug 20 07:24:15 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.573	31	475372	10.549	ppbV	97
26) 1,1-dichloroethene	6.860	61	318737	9.114	ppbV	97
27) tertiary butyl alcohol	6.926	59	414240	8.387	ppbV	95
28) methylene chloride	7.028	49	262558	10.442	ppbV	94
29) 3-chloropropene	7.166	41	308231	8.948	ppbV	97
30) carbon disulfide	7.316	76	727728	10.340	ppbV	99
31) Freon 113	7.358	101	375547	10.054	ppbV	97
32) trans-1,2-dichloroethene	8.150	61	338491	8.886	ppbV	95
33) 1,1-dichloroethane	8.383	63	391603	8.886	ppbV	99
34) MTBE	8.467	73	605589	9.910	ppbV	96
35) vinyl acetate	8.600	43	480178	9.490	ppbV	99
36) 2-butanone	8.858	43	495062	10.198	ppbV	99
37) cis-1,2-dichloroethene	9.375	61	297992	9.066	ppbV	94
38) Ethyl Acetate	9.675	61	87718	9.085	ppbV	97
39) chloroform	9.733	83	401736	10.206	ppbV	98
40) Tetrahydrofuran	10.175	42	293724	9.261	ppbV	99
41) 2,2-dichloropropane	9.750	77	307843	10.035	ppbV	98
42) 1,2-dichloroethane	10.575	62	227986	9.303	ppbV	96
44) hexane	9.642	57	449480	9.547	ppbV	98
45) diisopropyl ether	9.650	87	244580	9.976	ppbV	85
46) tert-butyl ethyl ether	10.275	59	726281	9.117	ppbV	97
48) 1,1,1-trichloroethane	10.867	97	313404	10.146	ppbV	97
49) 1,1-dichloropropene	11.240	75	339994	10.766	ppbV	95
50) benzene	11.393	78	834358	10.150	ppbV	98
51) thiophene	11.547	84	463739	9.801	ppbV	96
52) carbon tetrachloride	11.567	117	300801	10.665	ppbV	99
53) cyclohexane	11.713	56	481961	9.542	ppbV	96
54) tert-amyl methyl ether	12.100	73	678483	10.248	ppbV	97
55) dibromomethane	12.313	93	214885	10.056	ppbV	97
56) 1,2-dichloropropane	12.347	63	269329	9.461	ppbV	100
57) bromodichloromethane	12.580	83	443512	10.423	ppbV	99
58) 1,4-dioxane	12.620	88	193801	9.811	ppbV	96
59) trichloroethene	12.627	130	319717	10.137	ppbV	98
60) 2,2,4-trimethylpentane	12.680	57	1451906	9.826	ppbV	99
61) methyl methacrylate	12.880	41	357958	9.692	ppbV	97
62) heptane	13.000	43	496855	10.113	ppbV	95
63) cis-1,3-dichloropropene	13.642	75	404141	10.782	ppbV	95
64) 4-methyl-2-pentanone	13.683	43	579223	10.423	ppbV	95
65) trans-1,3-dichloropropene	14.267	75	376400	10.879	ppbV	95
66) 1,1,2-trichloroethane	14.467	97	276489	10.247	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317986.D
 Acq On : 26 Sep 2021 10:41 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:24:07 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Fri Aug 20 07:24:15 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.775	91	916908	9.982	ppbV	99
70) 2-methylthiophene	14.850	97	634948	10.306	ppbV	99
71) 1,3-dichloropropane	14.808	76	444500	11.371	ppbV	94
72) 2-hexanone	15.058	43	554544	11.265	ppbV	95
73) 3-methylthiophene	15.042	97	652749	10.422	ppbV	99
74) dibromochloromethane	15.225	129	407044	10.933	ppbV	100
75) 1,2-dibromoethane	15.475	107	413706	11.709	ppbV	99
76) butyl acetate	15.717	73	138010	11.455	ppbV	95
77) octane	15.817	85	391517	10.541	ppbV	95
78) tetrachloroethene	15.942	166	399272	10.772	ppbV	99
79) 1,1,1,2-tetrachloroethane	16.583	131	296481	11.069	ppbV	99
80) chlorobenzene	16.600	112	746935	11.478	ppbV	99
81) ethylbenzene	16.950	91	1129089	10.838	ppbV	95
82) 2-ethylthiophene	16.983	97	736853	10.695	ppbV	99
83) m+p-xylene	17.117	91	1823657	21.946	ppbV	94
84) bromoform	17.175	173	398260	11.034	ppbV	99
85) styrene	17.433	104	785195	11.857	ppbV	98
86) 1,1,2,2-tetrachloroethane	17.525	83	682747	11.198	ppbV	98
87) o-xylene	17.525	91	914486	11.217	ppbV	95
88) 1,2,3-trichloropropane	17.642	75	529179	11.488	ppbV	97
89) nonane	17.725	43	703205	11.245	ppbV	91
91) isopropylbenzene	18.042	105	1190827	11.829	ppbV	97
92) bromobenzene	18.117	77	715120	11.421	ppbV	98
93) 2-chlorotoluene	18.442	126	361501	11.020	ppbV	96
94) n-propylbenzene	18.467	120	433303	11.188	ppbV	99
95) 4-chlorotoluene	18.500	126	343455	10.646	ppbV	99
96) 4-ethyl toluene	18.592	105	1334914	11.791	ppbV	97
97) 1,3,5-trimethylbenzene	18.650	105	1122254	11.961	ppbV	97
98) tert-butylbenzene	18.975	119	1151003	11.565	ppbV	98
99) 1,2,4-trimethylbenzene	18.983	105	1091091	12.344	ppbV	96
100) decane	19.058	57	926540	10.620	ppbV	91
101) Benzyl Chloride	19.092	91	835360	11.337	ppbV	100
102) 1,3-dichlorobenzene	19.108	146	750114	12.104	ppbV	98
103) 1,4-dichlorobenzene	19.158	146	735367	12.065	ppbV	99
104) sec-butylbenzene	19.192	105	1529180	12.175	ppbV	98
105) 1,2,3-trimethylbenzene	19.317	105	1173319	11.832	ppbV	95
106) p-isopropyltoluene	19.317	119	1367499M6	11.379	ppbV	
107) 1,2-dichlorobenzene	19.433	146	701293	12.004	ppbV	99
108) n-butylbenzene	19.650	91	1190196	11.456	ppbV	98
109) indan	19.483	117	1311348	11.095	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317986.D
 Acq On : 26 Sep 2021 10:41 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:24:07 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Fri Aug 20 07:24:15 2021
 Response via : Initial Calibration

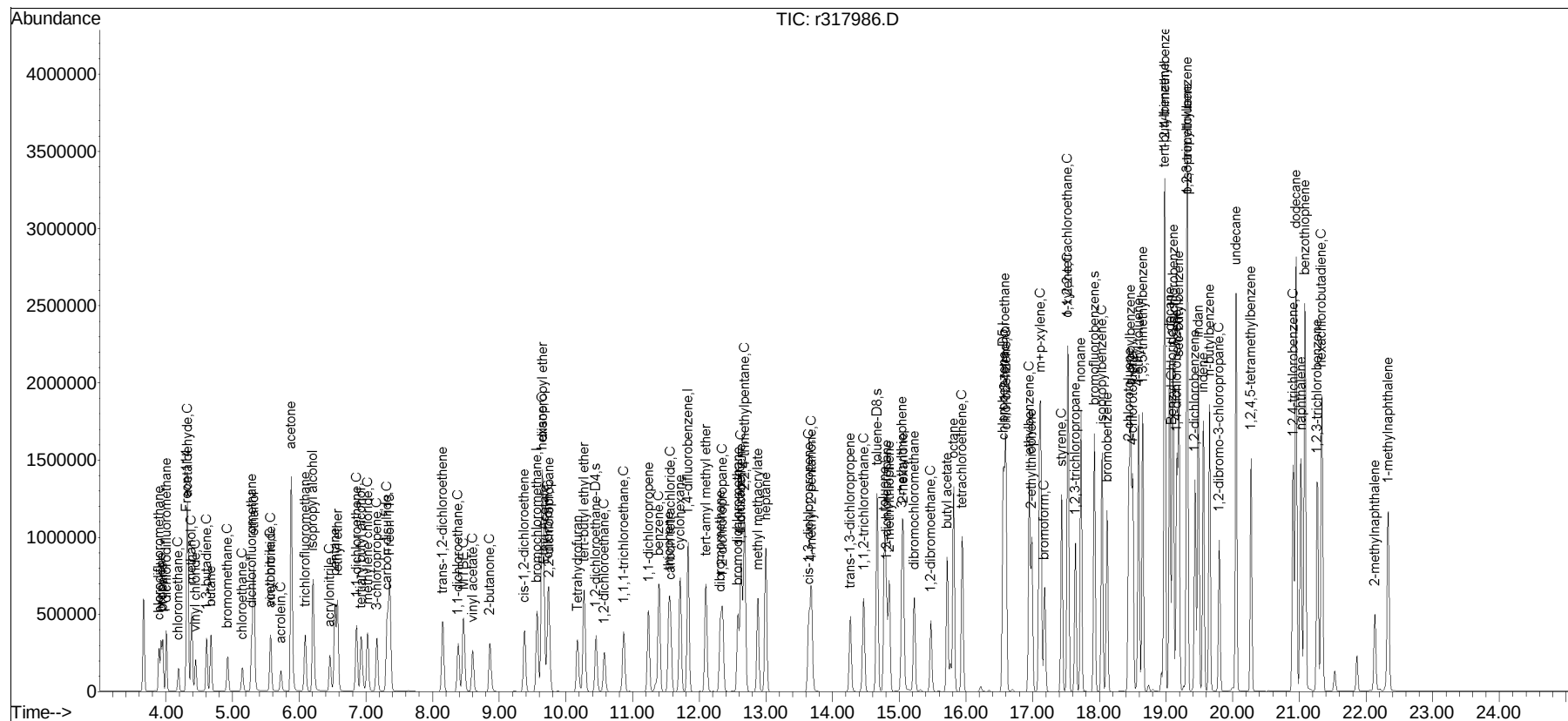
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.558	115	1072483	11.337	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.800	75	306604	12.185	ppbV	94
112)	undecane	20.050	57	1073159	11.120	ppbV	94
113)	1,2,4,5-tetramethylben...	20.275	119	973043	13.785	ppbV	99
114)	dodecane	20.950	57	1182721	12.043	ppbV	93
115)	1,2,4-trichlorobenzene	20.908	180	619692	11.931	ppbV	94
116)	naphthalene	21.025	128	1533095	12.162	ppbV	99
117)	1,2,3-trichlorobenzene	21.267	180	607163	12.208	ppbV	98
118)	benzothiophene	21.083	134	2424189	14.239	ppbV	99
119)	hexachlorobutadiene	21.333	225	564481	12.039	ppbV	97
120)	2-methylnaphthalene	22.133	142	362592	13.145	ppbV	99
121)	1-methylnaphthalene	22.333	142	852805	17.335	ppbV	99

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

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Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File  : r317986.D
Acq On     : 26 Sep 2021  10:41 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-LLSTD010
Misc       : WG1551274
ALS Vial   : 0    Sample Multiplier: 1
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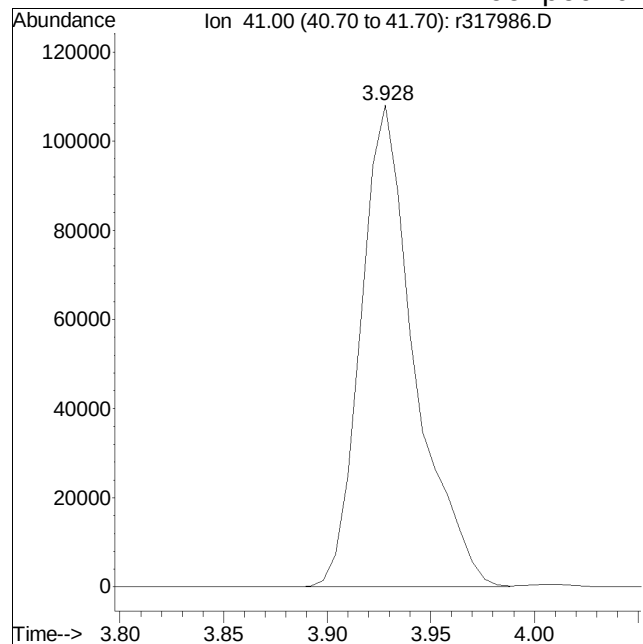
Quant Time: Sep 27 10:24:07 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Fri Aug 20 07:24:15 2021
Response via : Initial Calibration



Manual Integration Report

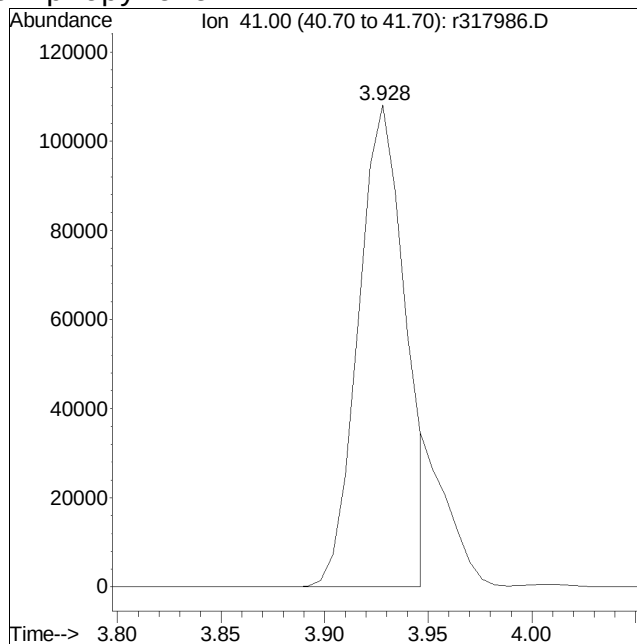
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317986.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 1 Instrument :
Sample : IT015-LLSTD010 Quant Date : 9/27/2021 7:37 am

Compound #3: propylene



Original Peak Response = 195615

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

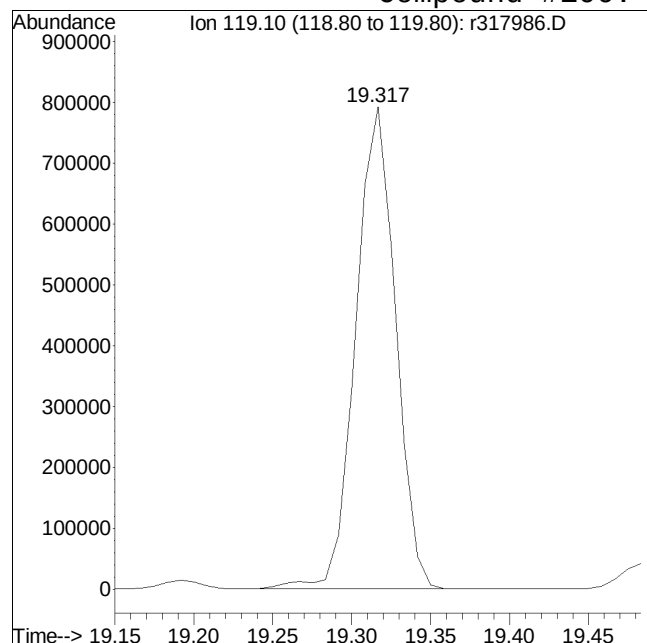


Manual Peak Response = 171114 M6

Manual Integration Report

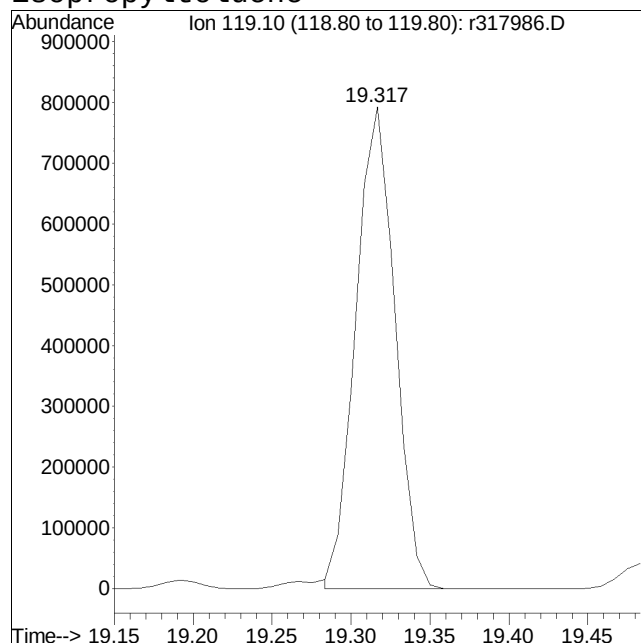
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317986.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 1 Instrument :
Sample : IT015-LLSTD010 Quant Date : 9/27/2021 7:37 am

Compound #106: p-isopropyltoluene



Original Peak Response = 1392308

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 1367499 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317987.D
 Acq On : 26 Sep 2021 11:20 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD020
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:19:54 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	371607	10.000	ppbV	0.00
Standard Area = 371494			Recovery =	100.03%		
43) 1,4-difluorobenzene	11.833	114	1056462	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =	100.96%		
67) chlorobenzene-D5	16.558	54	169962	10.000	ppbV	0.00
Standard Area = 171406			Recovery =	99.16%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.450	65	258263	9.618	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	96.18%		
69) toluene-D8	14.667	98	1120823	10.096	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	100.96%		
90) bromofluorobenzene	17.925	95	781071	10.132	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	101.32%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.892	51	569001	19.165	ppbV	100
3) propylene	3.922	41	320626M6	18.732	ppbV	
4) propane	3.952	29	458753	19.516	ppbV	99
5) dichlorodifluoromethane	4.006	85	620151	18.394	ppbV	99
6) chloromethane	4.186	50	303995	19.114	ppbV	99
7) Freon-114	4.312	85	827415	18.178	ppbV	99
8) methanol	4.384	31	801009	94.632	ppbV	99
9) vinyl chloride	4.444	62	417919	19.063	ppbV	100
10) 1,3-butadiene	4.612	54	342383	18.731	ppbV	98
11) butane	4.672	43	566623	19.357	ppbV	100
12) acetaldehyde	4.330	29	878291	84.788	ppbV	96
13) bromomethane	4.924	94	329258	18.976	ppbV	98
14) chloroethane	5.146	64	225127	18.273	ppbV	100
15) ethanol	5.317	31	1496510	95.113	ppbV	97
16) dichlorofluoromethane	5.287	67	662716	18.928	ppbV	100
17) vinyl bromide	5.573	106	328343	18.776	ppbV	99
18) acrolein	5.723	56	232002	21.794	ppbV	97
19) acetone	5.877	43	2789564	88.600	ppbV	97
20) acetonitrile	5.567	41	341379	19.541	ppbV	99
21) trichlorofluoromethane	6.090	101	639365	18.822	ppbV	99
22) isopropyl alcohol	6.203	45	1838871	47.954	ppbV	99
23) acrylonitrile	6.460	53	409797	19.849	ppbV	99
24) pentane	6.537	43	894336	18.680	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317987.D
 Acq On : 26 Sep 2021 11:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD020
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:19:54 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.570	31	991553	20.852	ppbV	99
26) 1,1-dichloroethene	6.860	61	618792	19.408	ppbV	99
27) tertiary butyl alcohol	6.926	59	874701	21.109	ppbV	98
28) methylene chloride	7.028	49	499694	19.026	ppbV	97
29) 3-chloropropene	7.166	41	603708	19.580	ppbV	99
30) carbon disulfide	7.316	76	1379697	18.953	ppbV	100
31) Freon 113	7.358	101	723180	19.251	ppbV	99
32) trans-1,2-dichloroethene	8.150	61	664070	19.613	ppbV	99
33) 1,1-dichloroethane	8.383	63	774659	19.776	ppbV	100
34) MTBE	8.458	73	1150506	18.992	ppbV	99
35) vinyl acetate	8.600	43	951094	19.801	ppbV	99
36) 2-butanone	8.858	43	962210	19.430	ppbV	100
37) cis-1,2-dichloroethene	9.383	61	581160	19.497	ppbV	99
38) Ethyl Acetate	9.675	61	171944	19.596	ppbV	92
39) chloroform	9.733	83	758559	18.876	ppbV	99
40) Tetrahydrofuran	10.167	42	577335	19.650	ppbV	100
41) 2,2-dichloropropane	9.750	77	594706	19.313	ppbV	98
42) 1,2-dichloroethane	10.575	62	435700	19.105	ppbV	100
44) hexane	9.642	57	865787	19.079	ppbV	98
45) diisopropyl ether	9.642	87	480347	19.453	ppbV	90
46) tert-butyl ethyl ether	10.275	59	1450619	19.784	ppbV	100
48) 1,1,1-trichloroethane	10.867	97	598846	18.926	ppbV	99
49) 1,1-dichloropropene	11.240	75	651534	18.981	ppbV	99
50) benzene	11.400	78	1578507	18.739	ppbV	99
51) thiophene	11.547	84	922881	19.712	ppbV	99
52) carbon tetrachloride	11.573	117	573946	18.900	ppbV	100
53) cyclohexane	11.713	56	943710	19.395	ppbV	99
54) tert-amyl methyl ether	12.093	73	1326242	19.362	ppbV	99
55) dibromomethane	12.320	93	418119	19.273	ppbV	98
56) 1,2-dichloropropane	12.347	63	528221	19.426	ppbV	99
57) bromodichloromethane	12.580	83	846543	18.906	ppbV	99
58) 1,4-dioxane	12.613	88	396529	20.266	ppbV	100
59) trichloroethene	12.627	130	618939	19.175	ppbV	99
60) 2,2,4-trimethylpentane	12.680	57	2724932M6	18.590	ppbV	
61) methyl methacrylate	12.880	41	657771	18.201	ppbV	99
62) heptane	13.000	43	950844	18.956	ppbV	99
63) cis-1,3-dichloropropene	13.642	75	777560	19.057	ppbV	100
64) 4-methyl-2-pentanone	13.675	43	1115216	19.071	ppbV	98
65) trans-1,3-dichloropropene	14.267	75	723700	19.044	ppbV	99
66) 1,1,2-trichloroethane	14.467	97	540786	19.373	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317987.D
 Acq On : 26 Sep 2021 11:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD020
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:19:54 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.775	91	1757766	19.333	ppbV	100
70) 2-methylthiophene	14.850	97	1254504	19.925	ppbV	99
71) 1,3-dichloropropane	14.808	76	849602	19.276	ppbV	100
72) 2-hexanone	15.058	43	1071421	19.485	ppbV	98
73) 3-methylthiophene	15.042	97	1287011	19.884	ppbV	99
74) dibromochloromethane	15.225	129	778188	19.280	ppbV	99
75) 1,2-dibromoethane	15.475	107	785884	19.158	ppbV	100
76) butyl acetate	15.717	73	267748	19.565	ppbV	96
77) octane	15.817	85	764511	19.693	ppbV	98
78) tetrachloroethene	15.942	166	767674	19.390	ppbV	99
79) 1,1,1,2-tetrachloroethane	16.583	131	570709	19.413	ppbV	100
80) chlorobenzene	16.600	112	1407472	19.003	ppbV	99
81) ethylbenzene	16.950	91	2146294	19.171	ppbV	100
82) 2-ethylthiophene	16.992	97	1442586	19.744	ppbV	99
83) m+p-xylene	17.108	91	3421283	37.840	ppbV	99
84) bromoform	17.183	173	765856	19.393	ppbV	99
85) styrene	17.433	104	1486984	19.099	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.525	83	1258564	18.590	ppbV	99
87) o-xylene	17.533	91	1681984	18.549	ppbV	97
88) 1,2,3-trichloropropane	17.642	75	1008129	19.213	ppbV	100
89) nonane	17.725	43	1345623	19.298	ppbV	99
91) isopropylbenzene	18.042	105	2242635	18.993	ppbV	98
92) bromobenzene	18.117	77	1355928	19.122	ppbV	98
93) 2-chlorotoluene	18.442	126	703795	19.634	ppbV	95
94) n-propylbenzene	18.467	120	841979	19.597	ppbV	92
95) 4-chlorotoluene	18.500	126	668866	19.640	ppbV	96
96) 4-ethyl toluene	18.592	105	2467615	18.642	ppbV	98
97) 1,3,5-trimethylbenzene	18.650	105	2068671	18.590	ppbV	99
98) tert-butylbenzene	18.983	119	2053834	17.995	ppbV	99
99) 1,2,4-trimethylbenzene	18.983	105	1959334	18.110	ppbV	100
100) decane	19.058	57	1744548	18.989	ppbV	99
101) Benzyl Chloride	19.100	91	1622550	19.588	ppbV	100
102) 1,3-dichlorobenzene	19.108	146	1350955	18.163	ppbV	98
103) 1,4-dichlorobenzene	19.158	146	1363500	18.699	ppbV	99
104) sec-butylbenzene	19.192	105	2797229	18.448	ppbV	99
105) 1,2,3-trimethylbenzene	19.325	105	1991873	17.121	ppbV	97
106) p-isopropyltoluene	19.317	119	2404016M6	17.413	ppbV	
107) 1,2-dichlorobenzene	19.433	146	1281442	18.428	ppbV	99
108) n-butylbenzene	19.650	91	2168148	18.372	ppbV	98
109) indan	19.483	117	2248668	17.293	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317987.D
 Acq On : 26 Sep 2021 11:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD020
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:19:54 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

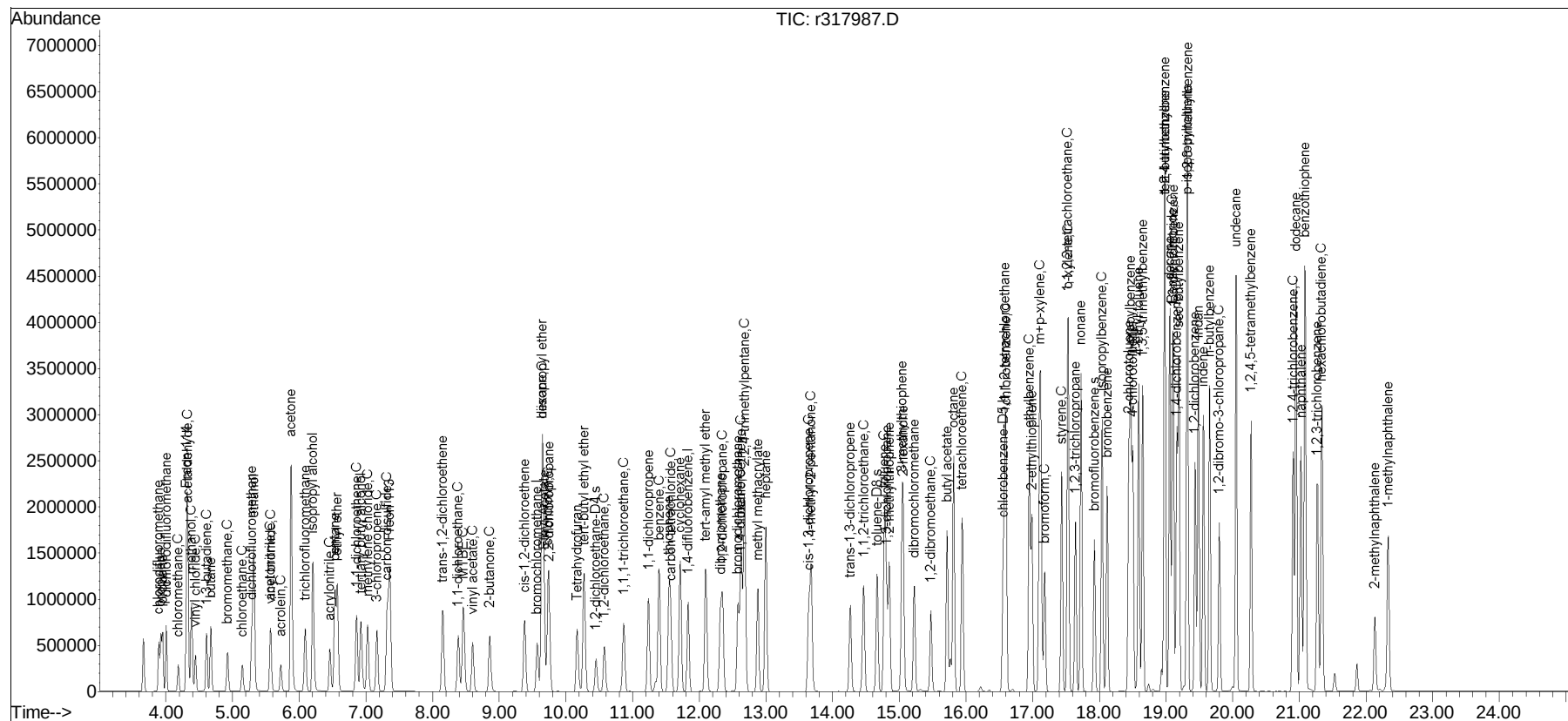
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.558	115	1878910	17.668	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.800	75	562034	18.487	ppbV	97
112)	undecane	20.050	57	1909554	17.945	ppbV	98
113)	1,2,4,5-tetramethylben...	20.275	119	1916954	19.868	ppbV	99
114)	dodecane	20.950	57	1873699	15.977	ppbV	99
115)	1,2,4-trichlorobenzene	20.908	180	1116880	18.176	ppbV	99
116)	naphthalene	21.025	128	2670439	17.567	ppbV	100
117)	1,2,3-trichlorobenzene	21.267	180	1039378	17.264	ppbV	99
118)	benzothiophene	21.083	134	4461026	18.558	ppbV	99
119)	hexachlorobutadiene	21.333	225	918301	16.406	ppbV	99
120)	2-methylnaphthalene	22.133	142	588469	16.367	ppbV	99
121)	1-methylnaphthalene	22.333	142	1243654	14.707	ppbV	99

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

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Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File  : r317987.D
Acq On     : 26 Sep 2021  11:20 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-LLSTD020
Misc       : WG1551274
ALS Vial   : 0      Sample Multiplier: 1
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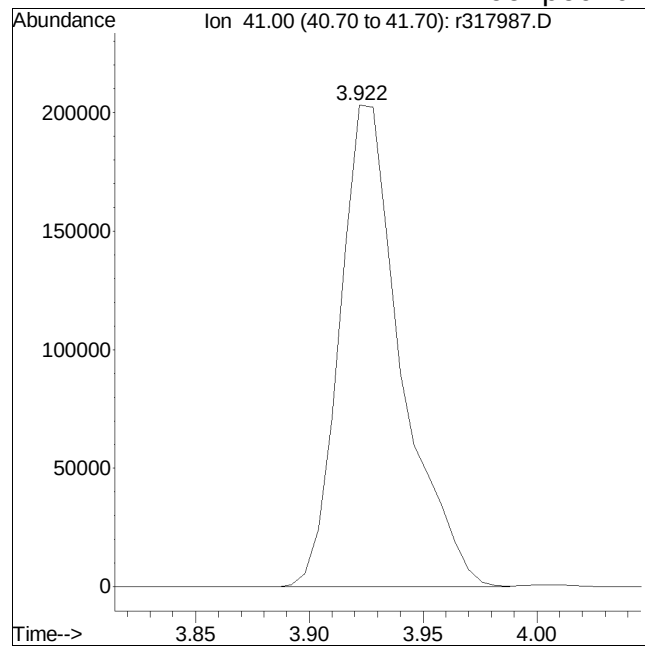
Quant Time: Sep 27 10:19:54 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:39:08 2021
Response via : Initial Calibration



Manual Integration Report

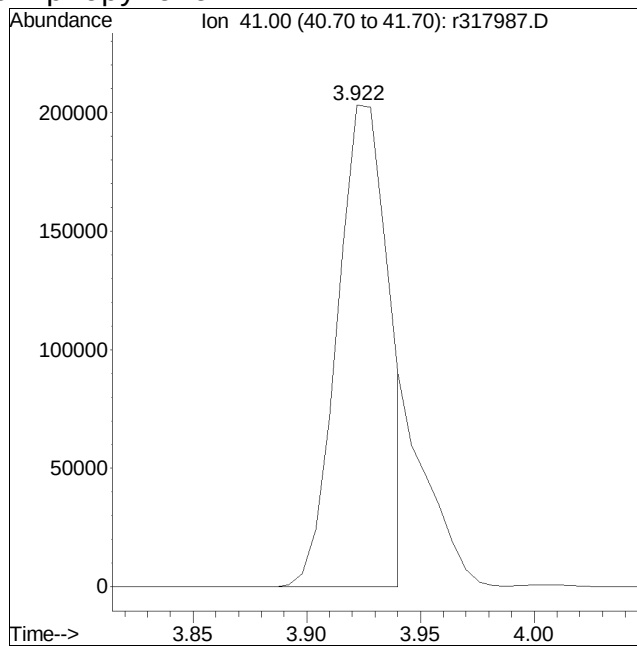
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Data File : r317987.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 0 Instrument :
Sample : IT015-LLSTD020 Quant Date : 9/27/2021 7:39 am

Compound #3: propylene



Original Peak Response = 382280

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

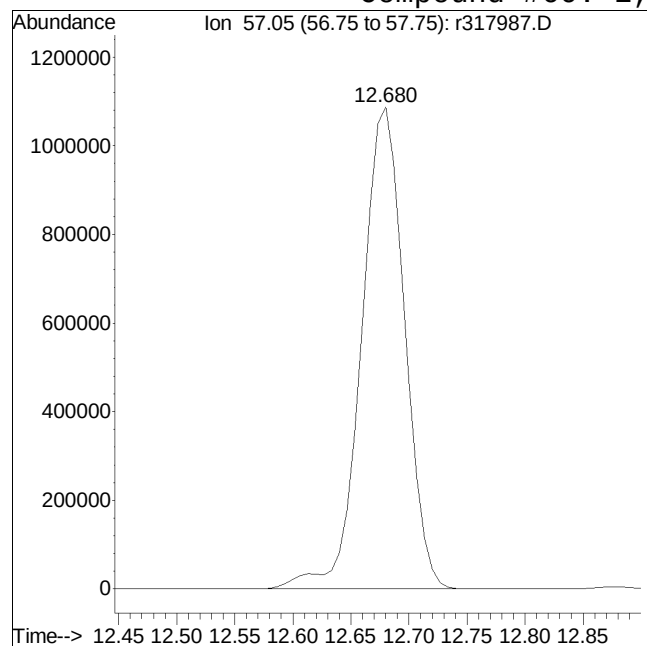


Manual Peak Response = 320626 M6

Manual Integration Report

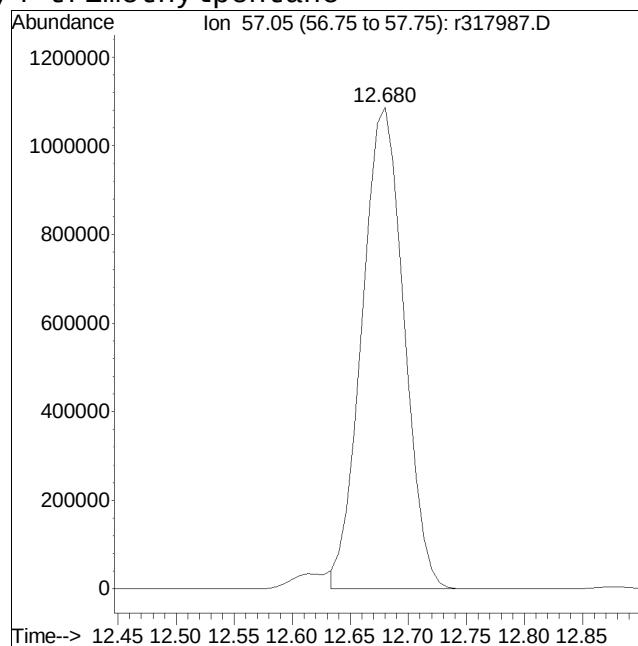
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Data File : r317987.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 0 Instrument :
Sample : IT015-LLSTD020 Quant Date : 9/27/2021 7:39 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 2810417

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

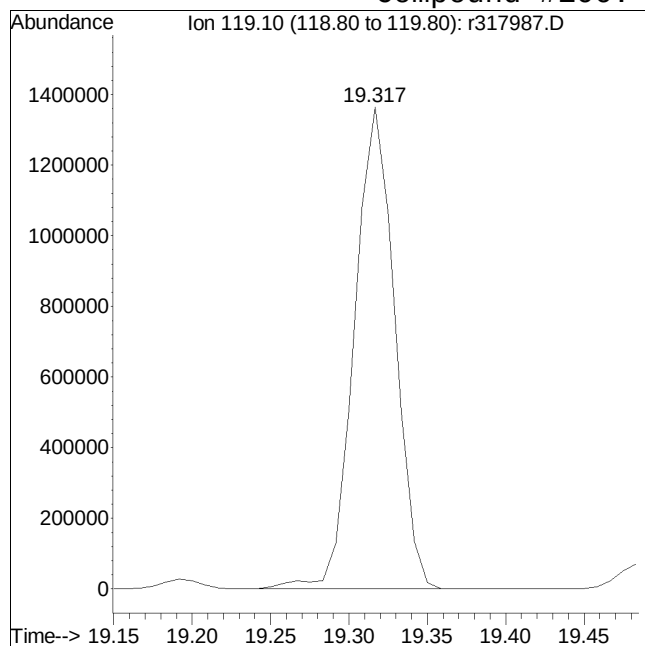


Manual Peak Response = 2724932 M6

Manual Integration Report

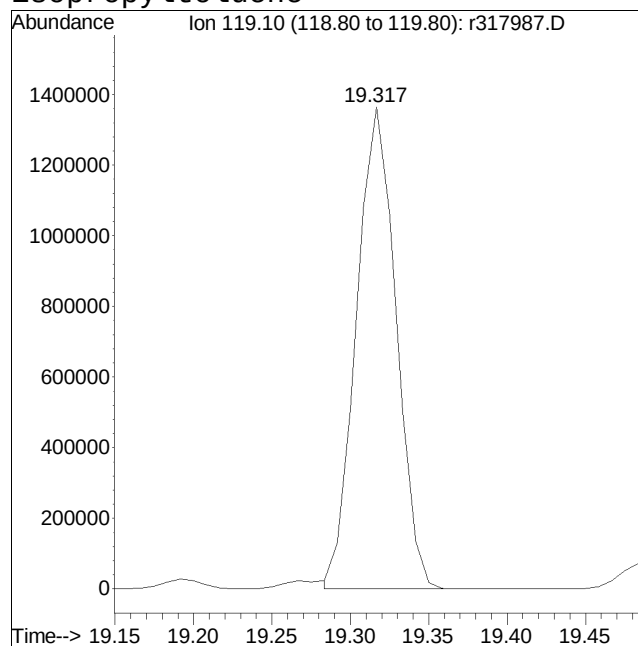
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Data File : r317987.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 0 Instrument :
Sample : IT015-LLSTD020 Quant Date : 9/27/2021 7:39 am

Compound #106: p-isopropyltoluene



Original Peak Response = 2447723

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 2404016 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317988.D
 Acq On : 26 Sep 2021 11:59 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD050
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:20:53 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.575	49	364003	10.000	ppbV	0.00
Standard Area = 371494			Recovery =	97.98%		
43) 1,4-difluorobenzene	11.833	114	1031043	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =	98.53%		
67) chlorobenzene-D5	16.558	54	162421	10.000	ppbV	0.00
Standard Area = 171406			Recovery =	94.76%		
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.458	65	246352	9.401	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	94.01%		
69) toluene-D8	14.667	98	1104051	10.407	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	104.07%		
90) bromofluorobenzene	17.925	95	777997	10.561	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	105.61%		
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.898	51	1271217	43.710	ppbV	100
3) propylene	3.928	41	725742M6	43.286	ppbV	
4) propane	3.952	29	1027410	44.620	ppbV	99
5) dichlorodifluoromethane	4.006	85	1297542	39.290	ppbV	98
6) chloromethane	4.186	50	682980	43.841	ppbV	100
7) Freon-114	4.312	85	1686221	37.820	ppbV	98
8) methanol	4.384	31	1768697	213.321	ppbV	98
9) vinyl chloride	4.444	62	946391	44.070	ppbV	100
10) 1,3-butadiene	4.612	54	756151	42.232	ppbV	95
11) butane	4.678	43	1283510	44.763	ppbV	99
12) acetaldehyde	4.330	29	1733652	170.859	ppbV	88
13) bromomethane	4.930	94	726192	42.728	ppbV	99
14) chloroethane	5.146	64	457452	37.905	ppbV	99
15) ethanol	5.323	31	3089892	200.486	ppbV	91
16) dichlorofluoromethane	5.290	67	1452833	42.361	ppbV	99
17) vinyl bromide	5.573	106	719058	41.978	ppbV	99
18) acrolein	5.723	56	433532	41.576	ppbV	97
19) acetone	5.880	43	5545597	179.814	ppbV	93
20) acetonitrile	5.567	41	773918	45.225	ppbV	98
21) trichlorofluoromethane	6.090	101	1392008	41.834	ppbV	98
22) isopropyl alcohol	6.210	45	4106760	109.334	ppbV	98
23) acrylonitrile	6.463	53	952394	47.093	ppbV	98
24) pentane	6.537	43	2097287	44.722	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317988.D
 Acq On : 26 Sep 2021 11:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD050
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:20:53 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.573	31	2254234	48.396	ppbV	98
26) 1,1-dichloroethene	6.860	61	1396933	44.729	ppbV	96
27) tertiary butyl alcohol	6.926	59	2053727	50.598	ppbV	98
28) methylene chloride	7.028	49	1122308	43.625	ppbV	96
29) 3-chloropropene	7.166	41	1412104	46.756	ppbV	97
30) carbon disulfide	7.322	76	3065520	42.991	ppbV	100
31) Freon 113	7.358	101	1603630	43.580	ppbV	97
32) trans-1,2-dichloroethene	8.158	61	1512257	45.596	ppbV	98
33) 1,1-dichloroethane	8.383	63	1794518	46.768	ppbV	100
34) MTBE	8.458	73	2573280	43.367	ppbV	97
35) vinyl acetate	8.600	43	2217754	47.137	ppbV	98
36) 2-butanone	8.858	43	2107091	43.438	ppbV	99
37) cis-1,2-dichloroethene	9.383	61	1337916	45.822	ppbV	99
38) Ethyl Acetate	9.675	61	409536	47.649	ppbV	90
39) chloroform	9.733	83	1631792	41.454	ppbV	99
40) Tetrahydrofuran	10.167	42	1349199	46.880	ppbV	100
41) 2,2-dichloropropane	9.750	77	1295060	42.935	ppbV	95
42) 1,2-dichloroethane	10.575	62	958439	42.905	ppbV	98
44) hexane	9.650	57	1884647	42.555	ppbV	84
45) diisopropyl ether	9.650	87	1075851	44.644	ppbV	89
46) tert-butyl ethyl ether	10.275	59	3260121	45.558	ppbV	98
48) 1,1,1-trichloroethane	10.867	97	1331823	43.130	ppbV	99
49) 1,1-dichloropropene	11.240	75	1465693	43.753	ppbV	98
50) benzene	11.400	78	3508583	42.679	ppbV	99
51) thiophene	11.547	84	2086369	45.662	ppbV	99
52) carbon tetrachloride	11.573	117	1240539	41.857	ppbV	99
53) cyclohexane	11.713	56	2161386	45.515	ppbV	100
54) tert-amyl methyl ether	12.100	73	2998440	44.853	ppbV	99
55) dibromomethane	12.320	93	925134	43.695	ppbV	98
56) 1,2-dichloropropane	12.353	63	1216810	45.854	ppbV	99
57) bromodichloromethane	12.580	83	1843763	42.193	ppbV	99
58) 1,4-dioxane	12.613	88	903206	47.301	ppbV	98
59) trichloroethene	12.633	130	1389353	44.104	ppbV	99
60) 2,2,4-trimethylpentane	12.680	57	5949598M6	41.590	ppbV	
61) methyl methacrylate	12.880	41	1509030	42.786	ppbV	98
62) heptane	13.000	43	2155128	44.023	ppbV	99
63) cis-1,3-dichloropropene	13.642	75	1747149	43.877	ppbV	99
64) 4-methyl-2-pentanone	13.675	43	2529429	44.321	ppbV	97
65) trans-1,3-dichloropropene	14.267	75	1631179	43.983	ppbV	100
66) 1,1,2-trichloroethane	14.467	97	1226894	45.037	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317988.D
 Acq On : 26 Sep 2021 11:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD050
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:20:53 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.783	91	3777295	43.475	ppbV	98
70) 2-methylthiophene	14.850	97	2790352	46.377	ppbV	100
71) 1,3-dichloropropane	14.808	76	1880434	44.645	ppbV	99
72) 2-hexanone	15.058	43	2394844	45.575	ppbV	99
73) 3-methylthiophene	15.042	97	2802977	45.317	ppbV	99
74) dibromochloromethane	15.225	129	1657259	42.967	ppbV	98
75) 1,2-dibromoethane	15.475	107	1727218	44.059	ppbV	100
76) butyl acetate	15.717	73	620495	47.447	ppbV	97
77) octane	15.817	85	1699637	45.813	ppbV	98
78) tetrachloroethene	15.942	166	1680636	44.421	ppbV	99
79) 1,1,1,2-tetrachloroethane	16.583	131	1213743	43.203	ppbV	99
80) chlorobenzene	16.600	112	3007962	42.498	ppbV	98
81) ethylbenzene	16.950	91	4552067	42.547	ppbV	95
82) 2-ethylthiophene	16.992	97	3097530	44.363	ppbV	96
83) m+p-xylene	17.117	91	6991218	80.914	ppbV	94
84) bromoform	17.183	173	1629535	43.180	ppbV	98
85) styrene	17.433	104	3229581	43.406	ppbV	98
86) 1,1,2,2-tetrachloroethane	17.533	83	2507056	38.751	ppbV	99
87) o-xylene	17.533	91	3302408	38.110	ppbV	93
88) 1,2,3-trichloropropane	17.642	75	2199375	43.861	ppbV	98
89) nonane	17.725	43	2962342	44.457	ppbV	95
91) isopropylbenzene	18.042	105	4717529	41.807	ppbV	94
92) bromobenzene	18.117	77	2901067	42.812	ppbV	94
93) 2-chlorotoluene	18.442	126	1542852	45.040	ppbV	81
94) n-propylbenzene	18.475	120	1812216	44.137	ppbV	76
95) 4-chlorotoluene	18.500	126	1479076	45.447	ppbV	89
96) 4-ethyl toluene	18.592	105	5181707	40.964	ppbV	96
97) 1,3,5-trimethylbenzene	18.650	105	4189052	39.392	ppbV	98
98) tert-butylbenzene	18.983	119	3727883	34.180	ppbV	92
99) 1,2,4-trimethylbenzene	18.983	105	3548305	34.320	ppbV	97
100) decane	19.058	57	3528222	40.186	ppbV	93
101) Benzyl Chloride	19.100	91	3389369	42.818	ppbV	93
102) 1,3-dichlorobenzene	19.108	146	2862364	40.270	ppbV	98
103) 1,4-dichlorobenzene	19.167	146	2704697	38.815	ppbV	97
104) sec-butylbenzene	19.192	105	5592998	38.598	ppbV	93
105) 1,2,3-trimethylbenzene	19.325	105	3580771	32.207	ppbV	99
106) p-isopropyltoluene	19.317	119	4232624M6	32.082	ppbV	
107) 1,2-dichlorobenzene	19.442	146	2718097	40.902	ppbV	96
108) n-butylbenzene	19.658	91	4324206	38.342	ppbV	91
109) indan	19.492	117	4412339	35.509	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317988.D
 Acq On : 26 Sep 2021 11:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD050
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:20:53 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

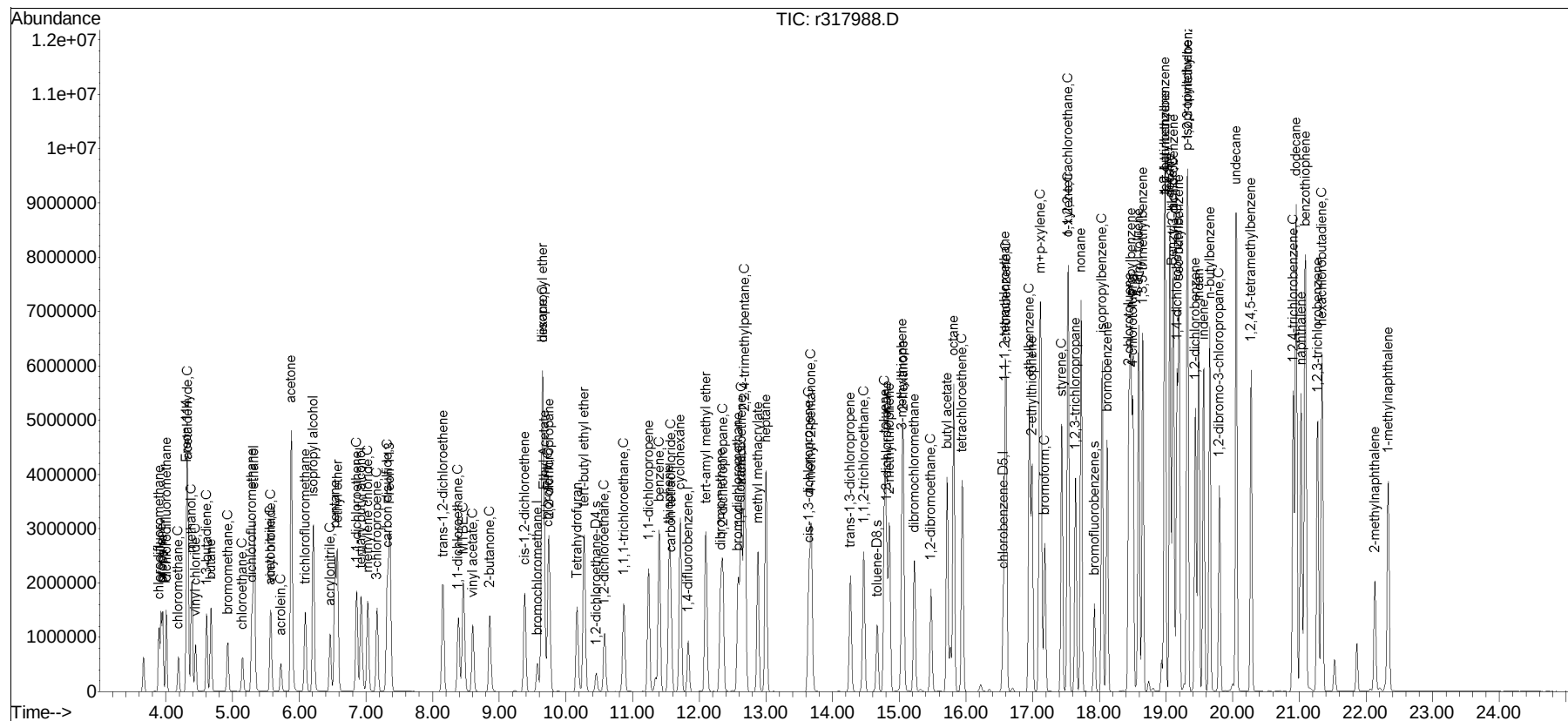
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.567	115	3802427	37.416	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.800	75	1174970	40.442	ppbV	91
112)	undecane	20.050	57	3818849	37.554	ppbV	92
113)	1,2,4,5-tetramethylben...	20.275	119	3988653	43.259	ppbV	95
114)	dodecane	20.950	57	3828757	34.163	ppbV	93
115)	1,2,4-trichlorobenzene	20.908	180	2489808	42.401	ppbV	98
116)	naphthalene	21.025	128	5609451	38.613	ppbV	99
117)	1,2,3-trichlorobenzene	21.275	180	2307832	40.113	ppbV	99
118)	benzothiophene	21.092	134	8398349	36.560	ppbV	98
119)	hexachlorobutadiene	21.342	225	1923455	35.960	ppbV	98
120)	2-methylnaphthalene	22.133	142	1470443	42.797	ppbV	100
121)	1-methylnaphthalene	22.333	142	2859224	35.382	ppbV	99

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File  : r317988.D
Acq On     : 26 Sep 2021  11:59 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-LLSTD050
Misc       : WG1551274
ALS Vial   : 0    Sample Multiplier: 1
```

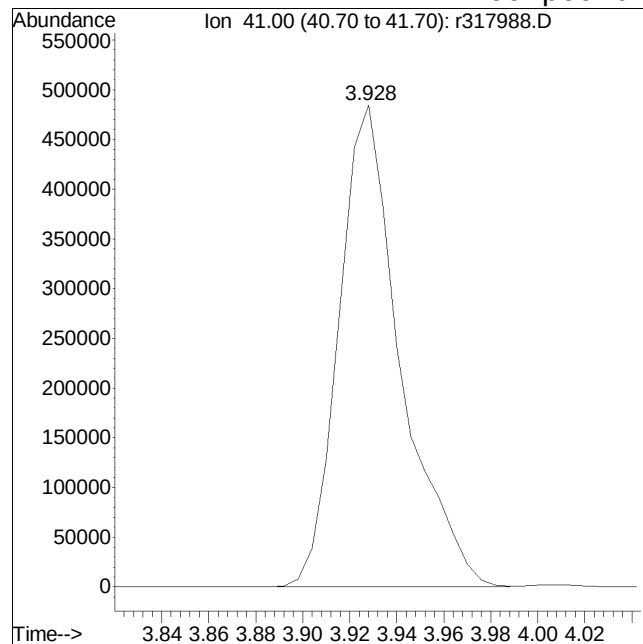
Quant Time: Sep 27 10:20:53 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:39:08 2021
Response via : Initial Calibration



Manual Integration Report

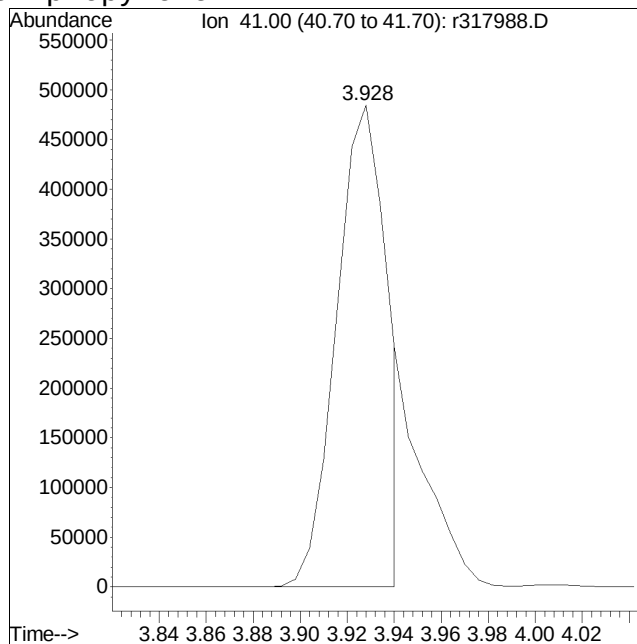
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317988.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 9 Instrument :
Sample : IT015-LLSTD050 Quant Date : 9/27/2021 7:39 am

Compound #3: propylene



Original Peak Response = 885351

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

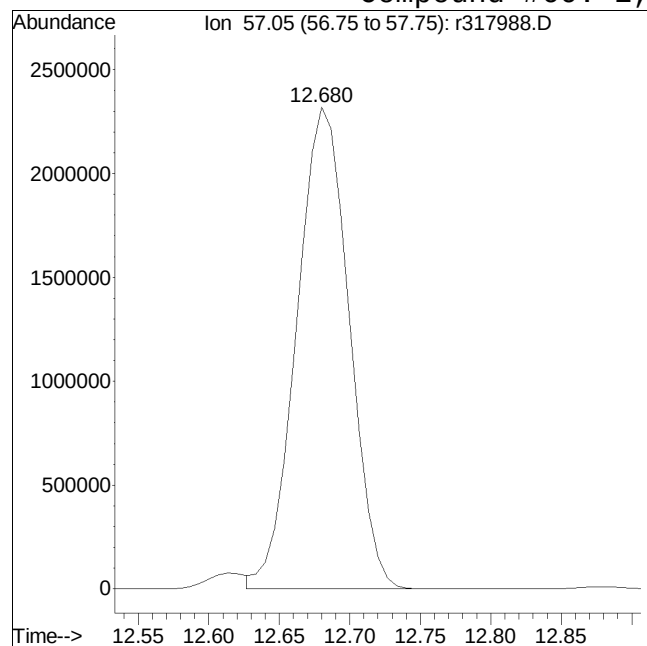


Manual Peak Response = 725742 M6

Manual Integration Report

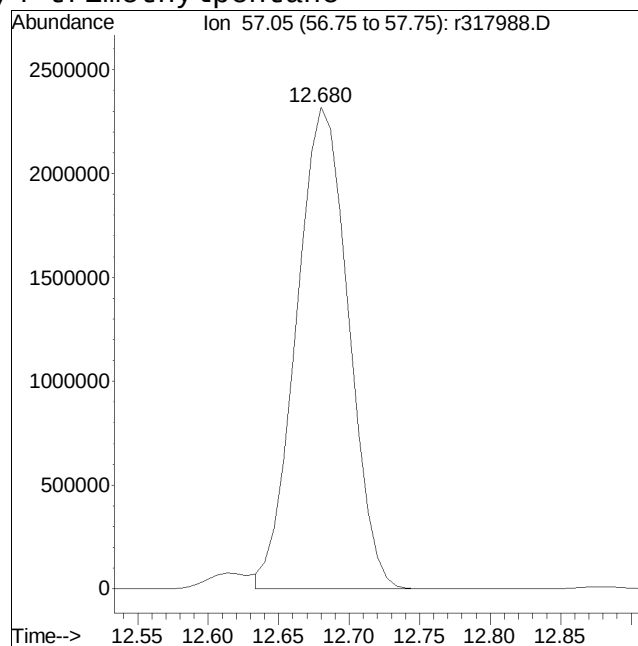
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317988.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 9 Instrument :
Sample : IT015-LLSTD050 Quant Date : 9/27/2021 7:39 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 5977802

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

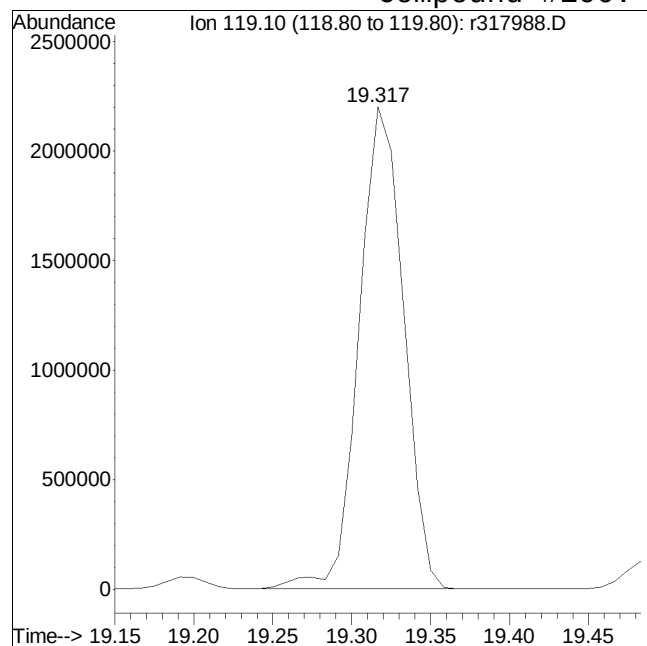


Manual Peak Response = 5949598 M6

Manual Integration Report

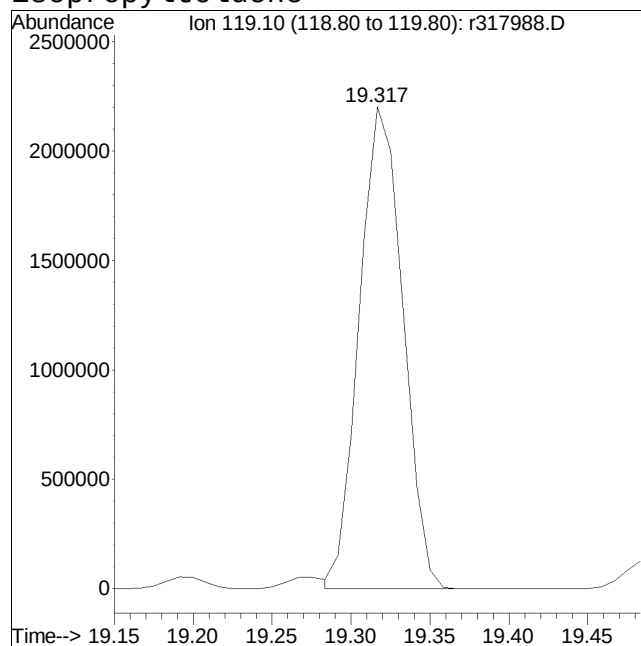
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317988.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 9 Instrument :
Sample : IT015-LLSTD050 Quant Date : 9/27/2021 7:39 am

Compound #106: p-isopropyltoluene



Original Peak Response = 4324987

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 4232624 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317989.D
 Acq On : 27 Sep 2021 12:41 AM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD100
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:22:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.575	49	354861	10.000	ppbV	0.00
Standard Area = 371494			Recovery =		95.52%	
43) 1,4-difluorobenzene	11.833	114	991910	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =		94.79%	
67) chlorobenzene-D5	16.558	54	150732	10.000	ppbV	# 0.00
Standard Area = 171406			Recovery =		87.94%	
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.458	65	225106	8.929	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		89.29%	
69) toluene-D8	14.667	98	1071115	10.879	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		108.79%	
90) bromofluorobenzene	17.925	95	743737	10.878	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		108.78%	
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.892	51	2250705	79.383	ppbV	100
3) propylene	3.922	41	1422780M6	87.045	ppbV	
4) propane	3.952	29	1804404	80.384	ppbV	96
5) dichlorodifluoromethane	4.000	85	2156300	66.976	ppbV	98
6) chloromethane	4.186	50	1232722	81.167	ppbV	100
7) Freon-114	4.306	85	2552606	58.726	ppbV	97
8) methanol	4.384	31	3028398	374.663	ppbV	97
9) vinyl chloride	4.444	62	1675301	80.022	ppbV	100
10) 1,3-butadiene	4.606	54	1323551	75.826	ppbV	93
11) butane	4.672	43	2321672	83.055	ppbV	99
12) acetaldehyde	4.330	29	2672062	270.127	ppbV	# 83
13) bromomethane	4.924	94	1258313	75.944	ppbV	99
14) chloroethane	5.146	64	805268	68.445	ppbV	98
15) ethanol	5.330	31	5029592	334.750	ppbV	# 83
16) dichlorofluoromethane	5.287	67	2518344	75.321	ppbV	99
17) vinyl bromide	5.570	106	1202968	72.037	ppbV	98
18) acrolein	5.720	56	1022837	100.617	ppbV	98
19) acetone	5.880	43	9639951	320.625	ppbV	# 92
20) acetonitrile	5.567	41	1384810	83.008	ppbV	98
21) trichlorofluoromethane	6.087	101	2376935	73.275	ppbV	98
22) isopropyl alcohol	6.213	45	7207323	196.823	ppbV	98
23) acrylonitrile	6.463	53	1748453	88.684	ppbV	97
24) pentane	6.533	43	3638659	79.588	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317989.D
 Acq On : 27 Sep 2021 12:41 AM
 Operator : AIRPIANO3:TS
 Sample : IT015-LLSTD100
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:22:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) ethyl ether	6.570	31	3844821	84.671	ppbV	95
26) 1,1-dichloroethene	6.860	61	2463348	80.907	ppbV	93
27) tertiary butyl alcohol	6.926	59	3714934	93.884	ppbV	97
28) methylene chloride	7.028	49	2009465	80.121	ppbV	94
29) 3-chloropropene	7.166	41	2636652	89.551	ppbV	95
30) carbon disulfide	7.316	76	5338647	76.799	ppbV	100
31) Freon 113	7.352	101	2732193	76.162	ppbV	97
32) trans-1,2-dichloroethene	8.150	61	2673797	82.694	ppbV	94
33) 1,1-dichloroethane	8.383	63	3248572	86.844	ppbV	99
34) MTBE	8.458	73	4531981	78.344	ppbV	96
35) vinyl acetate	8.600	43	4123106	89.891	ppbV	97
36) 2-butanone	8.858	43	3861128	81.648	ppbV	98
37) cis-1,2-dichloroethene	9.383	61	2383970	83.751	ppbV	96
38) Ethyl Acetate	9.675	61	741956	88.549	ppbV	83
39) chloroform	9.742	83	2737458	71.335	ppbV	99
40) Tetrahydrofuran	10.158	42	2515260	89.647	ppbV	99
41) 2,2-dichloropropane	9.750	77	2189181	74.447	ppbV	94
42) 1,2-dichloroethane	10.575	62	1655802	76.032	ppbV	96
44) hexane	9.642	57	3055881	71.724	ppbV	99
45) diisopropyl ether	9.650	87	1816396	78.348	ppbV	88
46) tert-butyl ethyl ether	10.267	59	5687616	82.616	ppbV	95
48) 1,1,1-trichloroethane	10.867	97	2489359	83.796	ppbV	98
49) 1,1-dichloropropene	11.240	75	2595712	80.543	ppbV	96
50) benzene	11.400	78	6137436	77.602	ppbV	98
51) thiophene	11.547	84	3686354	83.862	ppbV	100
52) carbon tetrachloride	11.573	117	2075172	72.781	ppbV	98
53) cyclohexane	11.713	56	3846993	84.207	ppbV	98
54) tert-amyl methyl ether	12.100	73	5279177	82.086	ppbV	98
55) dibromomethane	12.320	93	1571070	77.131	ppbV	96
56) 1,2-dichloropropane	12.353	63	2141603	83.887	ppbV	97
57) bromodichloromethane	12.580	83	3127837	74.401	ppbV	99
58) 1,4-dioxane	12.613	88	1566621	85.280	ppbV	97
59) trichloroethene	12.633	130	2413433	79.636	ppbV	97
60) 2,2,4-trimethylpentane	12.680	57	9844508M6	71.531	ppbV	
61) methyl methacrylate	12.880	41	2740266	80.761	ppbV	96
62) heptane	13.000	43	3867908	82.127	ppbV	97
63) cis-1,3-dichloropropene	13.642	75	3126373	81.611	ppbV	98
64) 4-methyl-2-pentanone	13.683	43	4525774	82.430	ppbV	97
65) trans-1,3-dichloropropene	14.267	75	2891507	81.043	ppbV	99
66) 1,1,2-trichloroethane	14.467	97	2164462	82.587	ppbV	97

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317989.D
 Acq On : 27 Sep 2021 12:41 AM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD100
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:22:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
68) toluene	14.783	91	6325160	78.445	ppbV	99
70) 2-methylthiophene	14.850	97	4765692	85.351	ppbV	99
71) 1,3-dichloropropane	14.817	76	3298971	84.397	ppbV	98
72) 2-hexanone	15.067	43	4167516	85.460	ppbV	99
73) 3-methylthiophene	15.042	97	4660766	81.195	ppbV	98
74) dibromochloromethane	15.225	129	2749500	76.813	ppbV	97
75) 1,2-dibromoethane	15.475	107	2956895	81.276	ppbV	98
76) butyl acetate	15.717	73	1116971	92.035	ppbV	95
77) octane	15.817	85	2936373	85.287	ppbV	97
78) tetrachloroethene	15.950	166	2707169	77.102	ppbV	98
79) 1,1,1,2-tetrachloroethane	16.583	131	1885980	72.337	ppbV	98
80) chlorobenzene	16.608	112	4654701	70.865	ppbV	99
81) ethylbenzene	16.950	91	7365538	74.182	ppbV	91
82) 2-ethylthiophene	16.992	97	5103927	78.767	ppbV	93
83) m+p-xylene	17.117	91	10444183	130.251	ppbV	94
84) bromoform	17.183	173	2585275	73.818	ppbV	97
85) styrene	17.442	104	5318108	77.019	ppbV	98
86) 1,1,2,2-tetrachloroethane	17.533	83	3555424	59.218	ppbV	99
87) o-xylene	17.533	91	4739587	58.936	ppbV	93
88) 1,2,3-trichloropropane	17.642	75	3762966	80.863	ppbV	97
89) nonane	17.733	43	4893518	79.133	ppbV	90
91) isopropylbenzene	18.042	105	7276462	69.485	ppbV	91
92) bromobenzene	18.117	77	4693711	74.638	ppbV	91
93) 2-chlorotoluene	18.442	126	2562447M6	80.606	ppbV	
94) n-propylbenzene	18.475	120	2842814	74.607	ppbV #	64
95) 4-chlorotoluene	18.500	126	2503910	82.903	ppbV	82
96) 4-ethyl toluene	18.592	105	7735273	65.894	ppbV	92
97) 1,3,5-trimethylbenzene	18.650	105	6229615	63.123	ppbV	94
98) tert-butylbenzene	18.983	119	4983885	49.239	ppbV	90
99) 1,2,4-trimethylbenzene	18.992	105	4639608	48.355	ppbV	96
100) decane	19.058	57	5265327	64.622	ppbV #	89
101) Benzyl Chloride	19.100	91	4893630	66.616	ppbV #	89
102) 1,3-dichlorobenzene	19.117	146	4019450	60.934	ppbV	97
103) 1,4-dichlorobenzene	19.167	146	4056222	62.725	ppbV	98
104) sec-butylbenzene	19.200	105	7799495	58.000	ppbV #	88
105) 1,2,3-trimethylbenzene	19.325	105	4640709	44.977	ppbV	100
106) p-isopropyltoluene	19.325	119	5307725M6	43.350	ppbV	
107) 1,2-dichlorobenzene	19.442	146	4240326	68.758	ppbV	97
108) n-butylbenzene	19.658	91	6408518	61.229	ppbV #	84
109) indan	19.492	117	6281443	54.471	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317989.D
 Acq On : 27 Sep 2021 12:41 AM
 Operator : AIRPIAN03:TS
 Sample : IT015-LLSTD100
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:22:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:39:08 2021
 Response via : Initial Calibration

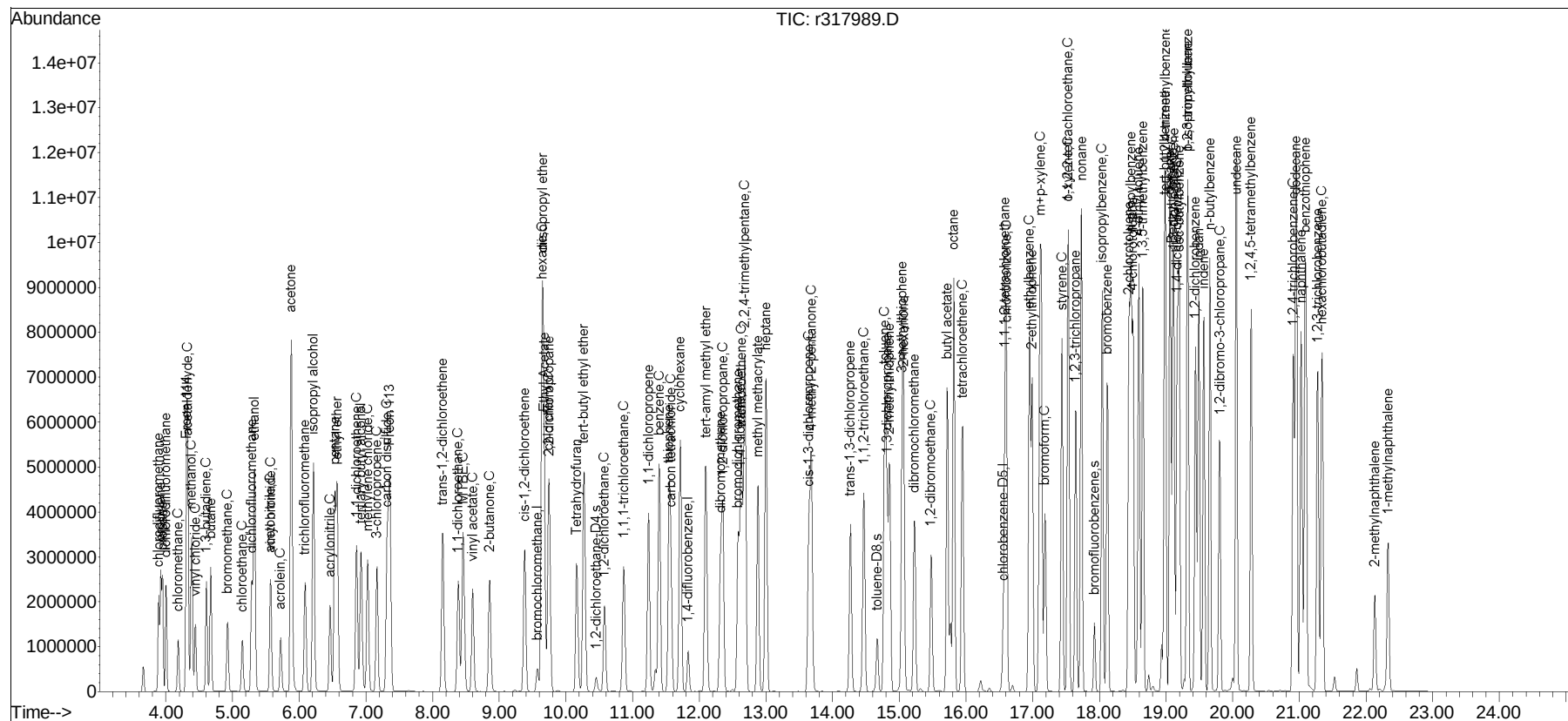
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
110)	indene	19.567	115	5585695	59.225	ppbV	99
111)	1,2-dibromo-3-chloropr...	19.808	75	1862863	69.091	ppbV	93
112)	undecane	20.058	57	5556546	58.879	ppbV	90
113)	1,2,4,5-tetramethylben...	20.275	119	6038386	70.568	ppbV	91
114)	dodecane	20.950	57	5589341	53.740	ppbV	89
115)	1,2,4-trichlorobenzene	20.908	180	3806181	69.845	ppbV	98
116)	naphthalene	21.025	128	8702701	64.551	ppbV	98
117)	1,2,3-trichlorobenzene	21.275	180	3599925	67.423	ppbV	98
118)	benzothiophene	21.092	134	11261771	52.828	ppbV	96
119)	hexachlorobutadiene	21.342	225	2647209	53.329	ppbV	99
120)	2-methylnaphthalene	22.133	142	1552474	48.689	ppbV	100
121)	1-methylnaphthalene	22.333	142	2475443	33.008	ppbV	100

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File  : r317989.D
Acq On     : 27 Sep 2021  12:41 AM
Operator   : AIRPIANO3:TS
Sample     : IT015-LLSTD100
Misc       : WG1551274
ALS Vial   : 0      Sample Multiplier: 1
```

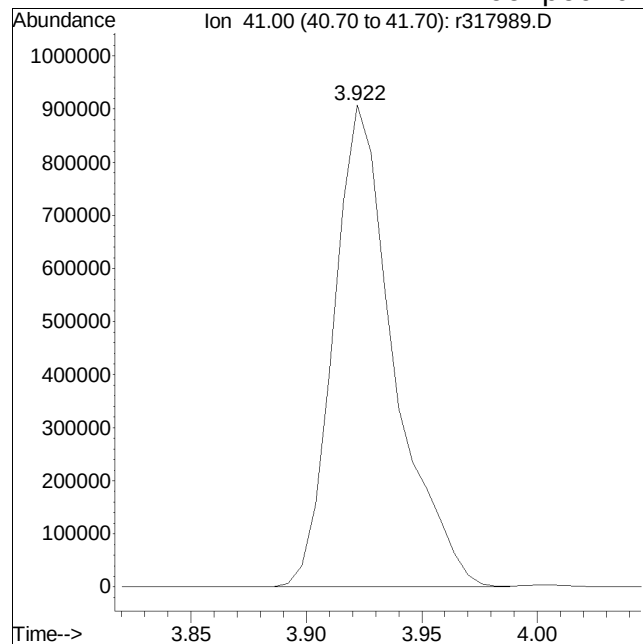
Quant Time: Sep 27 10:22:11 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:39:08 2021
Response via : Initial Calibration



Manual Integration Report

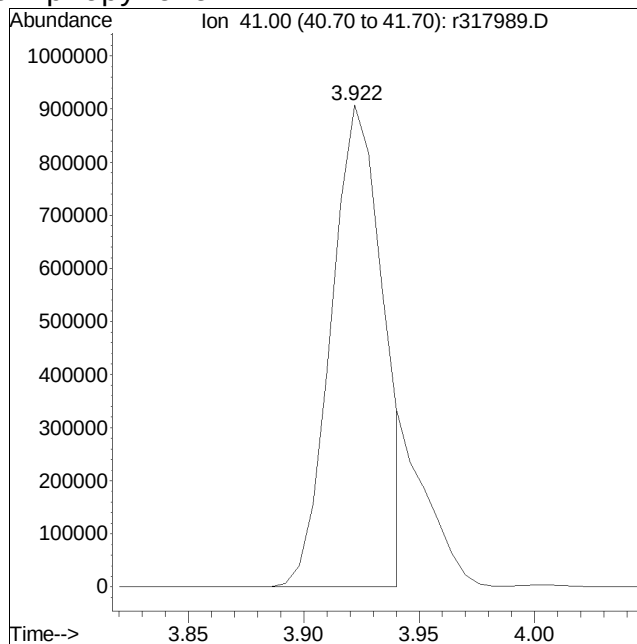
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317989.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:2: 1 Instrument :
Sample : IT015-LLSTD100 Quant Date : 9/27/2021 7:40 am

Compound #3: propylene



Original Peak Response = 1654466

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

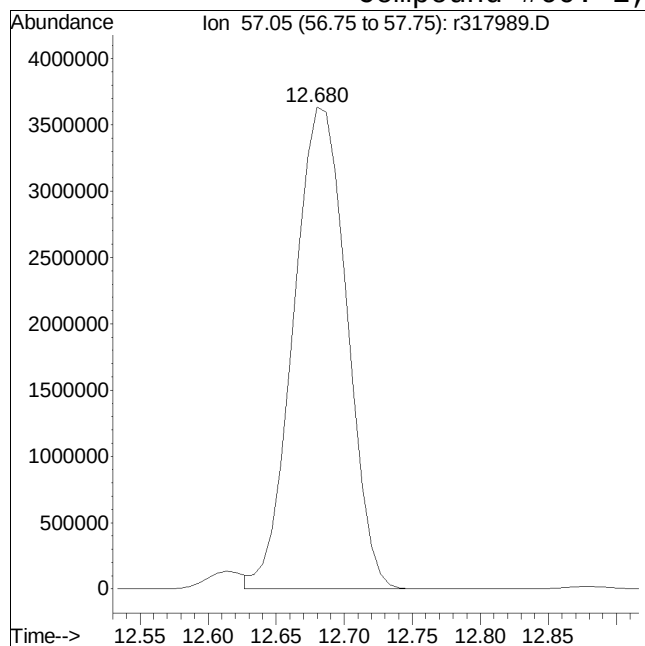


Manual Peak Response = 1422780 M6

Manual Integration Report

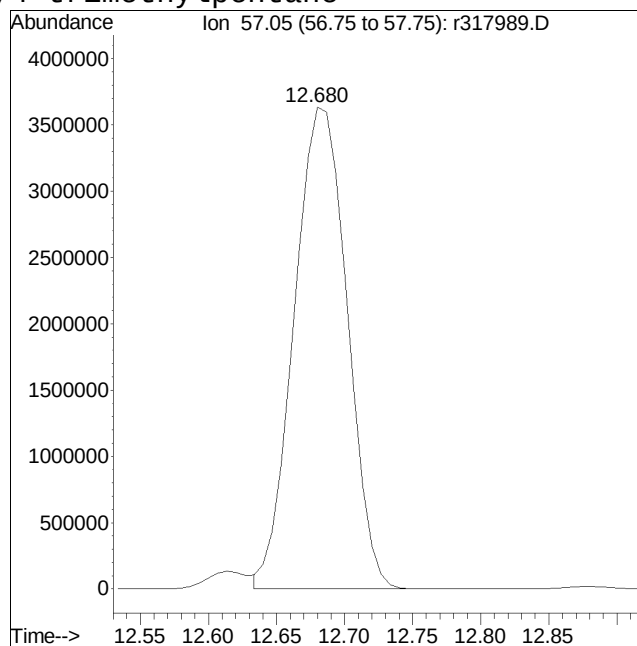
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317989.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:2: 1 Instrument :
Sample : IT015-LLSTD100 Quant Date : 9/27/2021 7:40 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 9884796

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

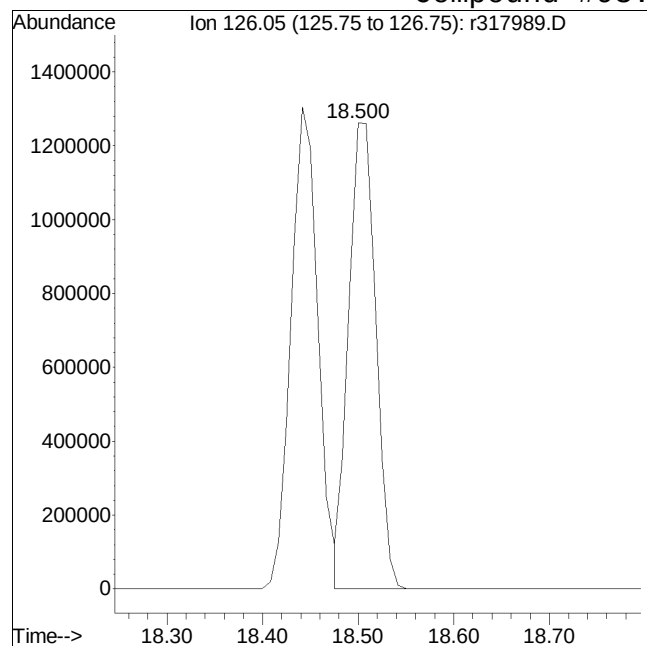


Manual Peak Response = 9844508 M6

Manual Integration Report

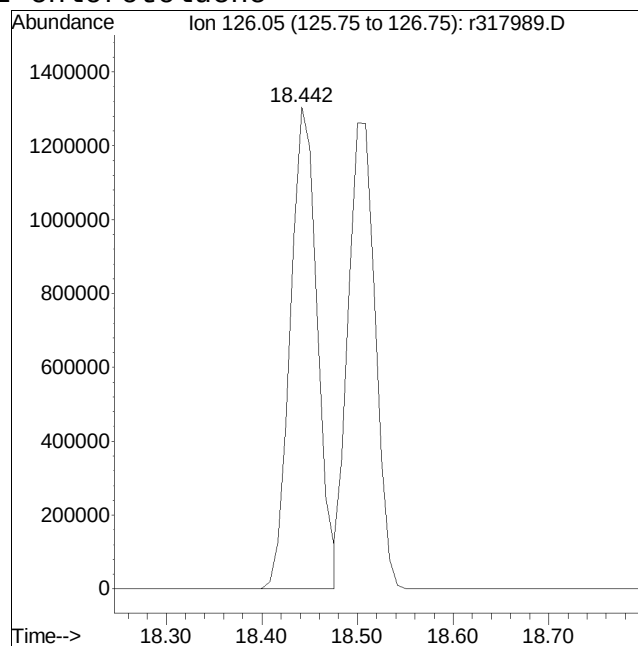
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317989.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:2: 1 Instrument :
Sample : IT015-LLSTD100 Quant Date : 9/27/2021 7:40 am

Compound #93: 2-chlorotoluene



Original Peak Response = 2503910

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

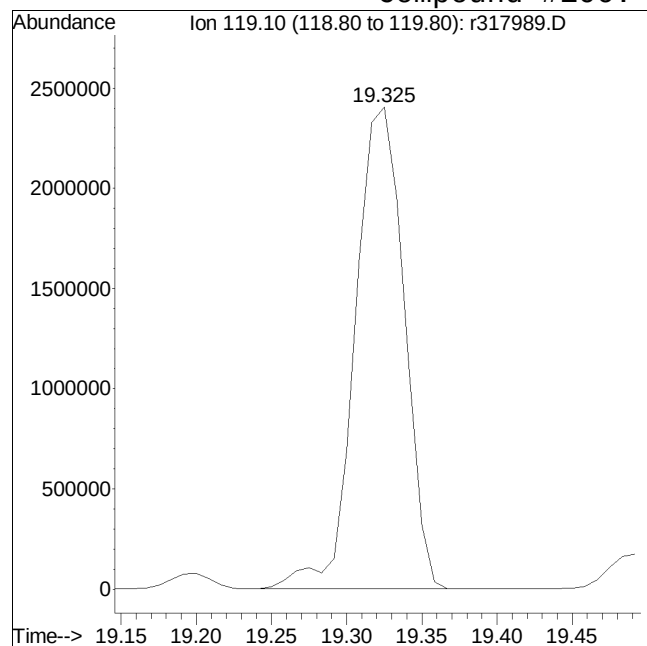


Manual Peak Response = 2562447 M6

Manual Integration Report

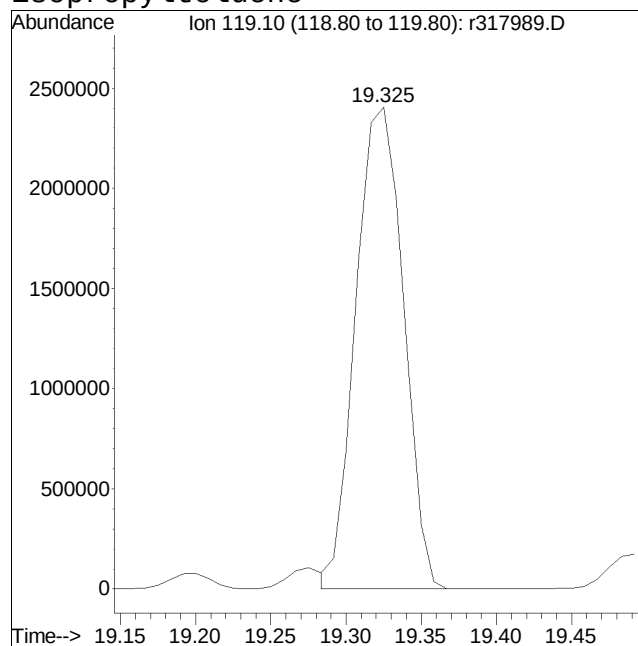
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317989.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:2: 1 Instrument :
Sample : IT015-LLSTD100 Quant Date : 9/27/2021 7:40 am

Compound #106: p-isopropyltoluene



Original Peak Response = 5472084

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 5307725 M6

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317992.D
 Acq On : 27 Sep 2021 7:57 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:27:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	bromochloromethane	1.000	1.000	0.0	84	0.00
2	chlorodifluoromethane	0.836	0.715	14.5	75	0.00
3	propylene	0.457	0.531	-16.2	97	0.00
4	propane	0.644	0.612	5.0	81	0.00
5	dichlorodifluoromethane	0.934	0.830	11.1	77	0.00
6 C	chloromethane	0.451	0.420	6.9	82	0.00
7	Freon-114	1.236	1.188	3.9	81	0.00
8 C	methanol	0.226	0.193	14.6	71	0.00
9 C	vinyl chloride	0.609	0.590	3.1	84	0.00
10 C	1,3-butadiene	0.503	0.474	5.8	81	0.00
11	butane	0.833	0.758	9.0	81	0.00
13 C	bromomethane	0.479	0.463	3.3	83	0.00
14 C	chloroethane	0.329	0.336	-2.1	85	0.00
15	ethanol	0.408	0.380	6.9	75	0.00
16	dichlorofluoromethane	0.971	0.858	11.6	76	0.00
17 C	vinyl bromide	0.476	0.446	6.3	80	0.00
18 C	acrolein	0.302	0.238	21.2	70	0.00
19	acetone	0.848	0.773	8.8	77	0.00
20 C	acetonitrile	0.489	0.468	4.3	84	0.00
21	trichlorofluoromethane	0.933	0.855	8.4	78	0.00
22	isopropyl alcohol	1.014	0.953	6.0	77	0.00
23 C	acrylonitrile	0.574	0.563	1.9	85	0.00
24	pentane	1.218	1.186	2.6	77	0.00
25	ethyl ether	1.288	1.215	5.7	80	0.00
26 C	1,1-dichloroethene	0.870	0.893	-2.6	87	0.00
27	tertiary butyl alcohol	1.130	1.132	-0.2	85	0.00
28 C	methylene chloride	0.717	0.696	2.9	83	0.00
29 C	3-chloropropene	0.856	0.952	-11.2	96	0.00
30 C	carbon disulfide	2.010	1.857	7.6	80	0.00
31	Freon 113	1.039	1.049	-1.0	87	0.00
32	trans-1,2-dichloroethene	0.928	0.945	-1.8	87	0.00
33 C	1,1-dichloroethane	1.090	1.136	-4.2	90	0.00
34 C	MTBE	1.638	1.597	2.5	82	0.00
35 C	vinyl acetate	1.277	1.269	0.6	82	0.00
36 C	2-butanone	1.313	1.305	0.6	82	0.00
37	cis-1,2-dichloroethene	0.812	0.865	-6.5	91	0.00
38	Ethyl Acetate	0.234	0.263	-12.4	93	0.00
39 C	chloroform	1.089	1.070	1.7	83	0.00
40	Tetrahydrofuran	0.816	0.826	-1.2	88	0.00

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317992.D
 Acq On : 27 Sep 2021 7:57 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:27:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
41	2,2-dichloropropane	0.788	0.720	8.6	73	0.00
42 C	1,2-dichloroethane	0.622	0.574	7.7	78	0.00
43 I	1,4-difluorobenzene	1.000	1.000	0.0	88	0.00
44 C	hexane	0.433	0.445	-2.8	91	0.00
45	diisopropyl ether	0.236	0.223	5.5	84	0.00
46	tert-butyl ethyl ether	0.690	0.668	3.2	85	0.00
47 s	1,2-dichloroethane-D4	0.246	0.222	9.8	77	0.00
48 C	1,1,1-trichloroethane	0.301	0.285	5.3	84	0.00
49	1,1-dichloropropene	0.333	0.302	9.3	82	0.00
50 C	benzene	0.863	0.758	12.2	84	0.00
52 C	carbon tetrachloride	0.281	0.263	6.4	80	0.00
53	cyclohexane	0.469	0.485	-3.4	93	0.00
54	tert-amyl methyl ether	0.652	0.597	8.4	81	0.00
55	dibromomethane	0.211	0.198	6.2	85	0.00
56 C	1,2-dichloropropane	0.263	0.274	-4.2	94	0.00
57	bromodichloromethane	0.423	0.404	4.5	84	0.00
58 C	1,4-dioxane	0.191	0.197	-3.1	93	0.00
59 C	trichloroethene	0.309	0.312	-1.0	90	0.00
60 C	2,2,4-trimethylpentane	1.373	1.425	-3.8	90	0.00
61	methyl methacrylate	0.320	0.271	15.3	70	0.00
62	heptane	0.487	0.481	1.2	89	0.00
63 C	cis-1,3-dichloropropene	0.380	0.388	-2.1	88	0.00
64 C	4-methyl-2-pentanone	0.548	0.556	-1.5	88	0.00
65	trans-1,3-dichloropropene	0.338	0.303	10.4	74	0.00
66 C	1,1,2-trichloroethane	0.269	0.280	-4.1	93	0.00
67 I	chlorobenzene-D5	1.000	1.000	0.0	85	0.00
68 C	toluene	5.773	5.763	0.2	92	0.00
69 s	toluene-D8	6.560	6.550	0.2	85	0.00
71	1,3-dichloropropane	2.694	2.427	9.9	80	0.00
72	2-hexanone	3.183	3.263	-2.5	86	0.00
74	dibromochloromethane	2.346	2.569	-9.5	92	0.00
75 C	1,2-dibromoethane	2.445	2.452	-0.3	87	0.00
76	butyl acetate	0.785	0.750	4.5	79	0.00
77	octane	2.349	2.270	3.4	85	0.00
78 C	tetrachloroethene	2.390	2.556	-6.9	94	0.00
79	1,1,1,2-tetrachloroethane	1.700	1.725	-1.5	85	0.00
80 C	chlorobenzene	4.386	4.501	-2.6	88	0.00

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317992.D
 Acq On : 27 Sep 2021 7:57 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:27:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
81 C	ethylbenzene	6.544	7.105	-8.6	92	0.00
83 C	m+p-xylene	5.292	5.737	-8.4	92	0.00
84 C	bromoform	2.212	2.514	-13.7	92	0.00
85 C	styrene	4.521	4.731	-4.6	88	0.00
86 C	1,1,2,2-tetrachloroethane	3.904	4.324	-10.8	93	0.00
87 C	o-xylene	5.237	5.727	-9.4	92	0.00
88	1,2,3-trichloropropane	3.167	2.917	7.9	81	0.00
89	nonane	4.234	4.021	5.0	84	0.00
90 s	bromofluorobenzene	4.552	4.811	-5.7	90	0.00
91 C	isopropylbenzene	7.078	6.999	1.1	86	0.00
92	bromobenzene	4.264	4.074	4.5	83	0.00
93	2-chlorotoluene	2.120	2.110	0.5	85	0.00
94	n-propylbenzene	2.507	2.592	-3.4	87	0.00
95	4-chlorotoluene	2.006	2.094	-4.4	89	0.00
96	4-ethyl toluene	7.742	7.890	-1.9	86	0.00
97	1,3,5-trimethylbenzene	6.433	6.612	-2.8	86	0.00
98	tert-butylbenzene	6.531	6.754	-3.4	86	0.00
99	1,2,4-trimethylbenzene	6.114	6.504	-6.4	87	0.00
100	decane	5.259	5.605	-6.6	88	0.00
101 C	Benzyl Chloride	3.758	5.254	-39.8#	92	0.00
102	1,3-dichlorobenzene	4.097	4.532	-10.6	88	0.00
103 C	1,4-dichlorobenzene	4.039	4.401	-9.0	87	0.00
104	sec-butylbenzene	8.915	8.671	2.7	83	0.00
106	p-isopropyltoluene	7.733	7.731	0.0	83	0.00
107	1,2-dichlorobenzene	3.943	4.177	-5.9	87	0.00
108	n-butylbenzene	6.664	7.322	-9.9	90	0.00
111 C	1,2-dibromo-3-chloropropane	1.688	1.624	3.8	77	0.00
112	undecane	5.841	6.439	-10.2	88	0.00
114	dodecane	5.793	6.740	-16.3	83	0.00
115 C	1,2,4-trichlorobenzene	3.147	3.688	-17.2	87	0.00
116	naphthalene	8.031	9.055	-12.8	86	0.00
117	1,2,3-trichlorobenzene	3.161	3.436	-8.7	83	0.00
119 C	hexachlorobutadiene	3.088	3.314	-7.3	86	0.00

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317992.D
 Acq On : 27 Sep 2021 7:57 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:27:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default-ICV-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	311878	10.000	ppbV	0.00
Standard Area = 371494			Recovery =		83.95%	
43) 1,4-difluorobenzene	11.827	114	920249	10.000	ppbV	0.00
Standard Area = 1046436			Recovery =		87.94%	
67) chlorobenzene-D5	16.558	54	146122	10.000	ppbV	0.00
Standard Area = 171406			Recovery =		85.25%	
System Monitoring Compounds						
47) 1,2-dichloroethane-D4	10.450	65	204152	9.023	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		90.23%	
69) toluene-D8	14.667	98	957092	9.985	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		99.85%	
90) bromofluorobenzene	17.925	95	702935	10.567	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		105.67%	
Target Compounds						
					Qvalue	
2) chlorodifluoromethane	3.892	51	223042	8.553	ppbV	99
3) propylene	3.922	41	165476M6	11.621	ppbV	
4) propane	3.952	29	190868	9.497	ppbV	98
5) dichlorodifluoromethane	4.006	85	258723	8.884	ppbV	99
6) chloromethane	4.186	50	130833	9.307	ppbV	99
7) Freon-114	4.312	85	370395	9.610	ppbV	98
8) methanol	4.384	31	300829	42.635	ppbV	97
9) vinyl chloride	4.444	62	183985	9.679	ppbV	100
10) 1,3-butadiene	4.606	54	147924	9.437	ppbV	93
11) butane	4.672	43	236443	9.100	ppbV	99
13) bromomethane	4.924	94	144366	9.663	ppbV	99
14) chloroethane	5.140	64	104910	10.214	ppbV	100
15) ethanol	5.313	31	592103	46.529	ppbV	95
16) dichlorofluoromethane	5.283	67	267560	8.834	ppbV	99
17) vinyl bromide	5.570	106	139030	9.364	ppbV	97
18) acrolein	5.720	56	74329	7.889	ppbV	95
19) acetone	5.877	43	1204791	45.553	ppbV	94
20) acetonitrile	5.563	41	145895	9.558	ppbV	99
21) trichlorofluoromethane	6.087	101	266514	9.160	ppbV	100
22) isopropyl alcohol	6.203	45	742666	23.485	ppbV	99
23) acrylonitrile	6.457	53	175520	9.808	ppbV	97
24) pentane	6.533	43	369839	9.739	ppbV	100
25) ethyl ether	6.570	31	378951	9.437	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317992.D
 Acq On : 27 Sep 2021 7:57 AM
 Operator : AIRPIAN03:TS
 Sample : CT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:27:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default-ICV-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
26) 1,1-dichloroethene	6.854	61	278614	10.273	ppbV	97
27) tertiary butyl alcohol	6.926	59	352922	10.016	ppbV	97
28) methylene chloride	7.022	49	216971	9.697	ppbV	93
29) 3-chloropropene	7.160	41	297032	11.125	ppbV	96
30) carbon disulfide	7.316	76	579216	9.241	ppbV	99
31) Freon 113	7.352	101	327027	10.090	ppbV	98
32) trans-1,2-dichloroethene	8.150	61	294779	10.187	ppbV	99
33) 1,1-dichloroethane	8.383	63	354265	10.424	ppbV	100
34) MTBE	8.458	73	498175	9.752	ppbV	96
35) vinyl acetate	8.600	43	395838	9.940	ppbV	99
36) 2-butanone	8.858	43	407049	9.939	ppbV	100
37) cis-1,2-dichloroethene	9.375	61	269794	10.651	ppbV	99
38) Ethyl Acetate	9.667	61	81947	11.233	ppbV	97
39) chloroform	9.725	83	333779	9.826	ppbV	98
40) Tetrahydrofuran	10.167	42	257690	10.130	ppbV	100
41) 2,2-dichloropropane	9.742	77	224655	9.144	ppbV	96
42) 1,2-dichloroethane	10.575	62	178882	9.219	ppbV	98
44) hexane	9.642	57	409120	10.267	ppbV	97
45) diisopropyl ether	9.642	87	205232	9.464	ppbV	90
46) tert-butyl ethyl ether	10.267	59	614411	9.674	ppbV	99
48) 1,1,1-trichloroethane	10.867	97	262025	9.470	ppbV	100
49) 1,1-dichloropropene	11.233	75	277692	9.073	ppbV	98
50) benzene	11.393	78	697879	8.790	ppbV	99
52) carbon tetrachloride	11.567	117	241636	9.330	ppbV	98
53) cyclohexane	11.713	56	446014	10.344	ppbV	97
54) tert-amyl methyl ether	12.093	73	549753	9.157	ppbV	99
55) dibromomethane	12.313	93	182420	9.382	ppbV	99
56) 1,2-dichloropropane	12.347	63	252449	10.429	ppbV	98
57) bromodichloromethane	12.573	83	372019	9.552	ppbV	100
58) 1,4-dioxane	12.613	88	181188	10.325	ppbV	99
59) trichloroethene	12.627	130	287062	10.093	ppbV	99
60) 2,2,4-trimethylpentane	12.673	57	1311277M6	10.376	ppbV	
61) methyl methacrylate	12.873	41	249432	8.472	ppbV	98
62) heptane	12.993	43	442279	9.859	ppbV	97
63) cis-1,3-dichloropropene	13.642	75	357443	10.220	ppbV	100
64) 4-methyl-2-pentanone	13.675	43	511823	10.157	ppbV	96
65) trans-1,3-dichloropropene	14.258	75	278995	8.966	ppbV	99
66) 1,1,2-trichloroethane	14.458	97	258105	10.417	ppbV	96
68) toluene	14.775	91	842036	9.981	ppbV	100
71) 1,3-dichloropropane	14.808	76	354684	9.009	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317992.D
 Acq On : 27 Sep 2021 7:57 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:27:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default-ICV-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
72) 2-hexanone	15.058	43	476756	10.251	ppbV	97
74) dibromochloromethane	15.225	129	375415	10.952	ppbV	99
75) 1,2-dibromoethane	15.467	107	358264	10.030	ppbV	99
76) butyl acetate	15.717	73	109562	9.552	ppbV	91
77) octane	15.808	85	331679	9.663	ppbV	96
78) tetrachloroethene	15.942	166	373507	10.697	ppbV	96
79) 1,1,1,2-tetrachloroethane	16.583	131	252089	10.150	ppbV	99
80) chlorobenzene	16.600	112	657655	10.261	ppbV	98
81) ethylbenzene	16.950	91	1038189	10.857	ppbV	97
83) m+p-xylene	17.108	91	1676723	21.685	ppbV	97
84) bromoform	17.175	173	367339	11.366	ppbV	100
85) styrene	17.433	104	691303	10.464	ppbV	99
86) 1,1,2,2-tetrachloroethane	17.525	83	631844	11.076	ppbV	99
87) o-xylene	17.525	91	836872	10.936	ppbV	98
88) 1,2,3-trichloropropane	17.642	75	426223	9.210	ppbV	100
89) nonane	17.725	43	587508	9.496	ppbV	95
91) isopropylbenzene	18.033	105	1022647	9.888	ppbV	97
92) bromobenzene	18.117	77	595259	9.554	ppbV	99
93) 2-chlorotoluene	18.442	126	308338	9.954	ppbV	91
94) n-propylbenzene	18.467	120	378741	10.340	ppbV	97
95) 4-chlorotoluene	18.500	126	306020	10.440	ppbV	98
96) 4-ethyl toluene	18.583	105	1152841	10.190	ppbV	97
97) 1,3,5-trimethylbenzene	18.650	105	966120	10.278	ppbV	96
98) tert-butylbenzene	18.975	119	986862	10.342	ppbV	97
99) 1,2,4-trimethylbenzene	18.975	105	950446	10.638	ppbV	95
100) decane	19.050	57	819082	10.659	ppbV	95
101) Benzyl Chloride	19.092	91	767683	13.979	ppbV	100
102) 1,3-dichlorobenzene	19.108	146	662159	11.060	ppbV	99
103) 1,4-dichlorobenzene	19.158	146	643116	10.896	ppbV	98
104) sec-butylbenzene	19.192	105	1266979	9.726	ppbV	99
106) p-isopropyltoluene	19.317	119	1129706	9.998	ppbV	99
107) 1,2-dichlorobenzene	19.433	146	610352	10.593	ppbV	99
108) n-butylbenzene	19.650	91	1069917	10.988	ppbV	97
111) 1,2-dibromo-3-chloropr...	19.800	75	237327	9.620	ppbV	94
112) undecane	20.050	57	940922	11.024	ppbV	97
114) dodecane	20.950	57	984814	11.635	ppbV	97
115) 1,2,4-trichlorobenzene	20.900	180	538938	11.720	ppbV	96
116) naphthalene	21.017	128	1323195	11.275	ppbV	98
117) 1,2,3-trichlorobenzene	21.267	180	502117	10.872	ppbV	99
119) hexachlorobutadiene	21.333	225	484213	10.733	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
 Data File : r317992.D
 Acq On : 27 Sep 2021 7:57 AM
 Operator : AIRPIAN03:TS
 Sample : CT015-LLSTD010
 Misc : WG1551274
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:27:11 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

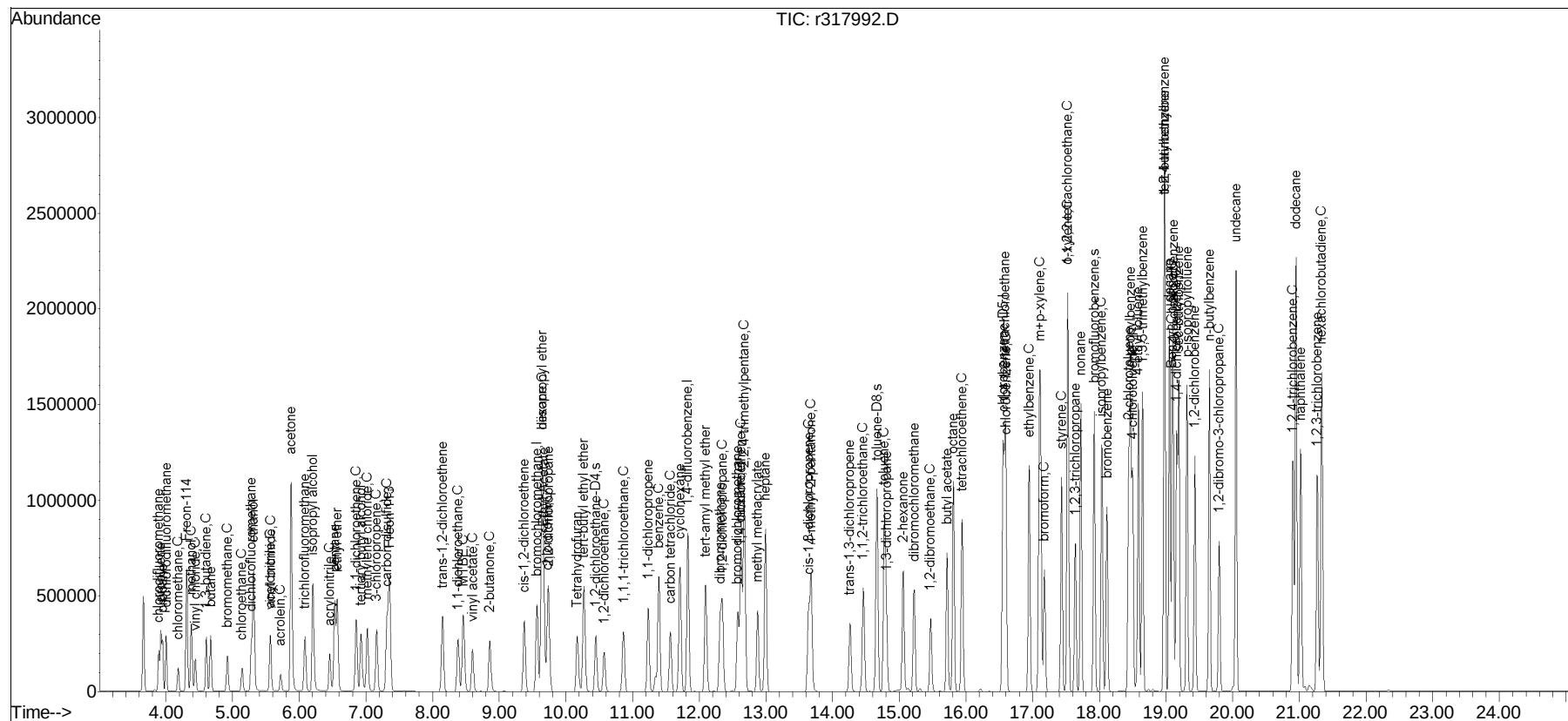
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\r317986.D
 Sub List : Default-ICV-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
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(#) = qualifier out of range (m) = manual integration (+) = signals summed

```
Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\
Data File : r317992.D
Acq On    : 27 Sep 2021    7:57 AM
Operator  : AIRPIANO3:TS
Sample    : CT015-LLSTD010
Misc      : WG1551274
ALS Vial  : 0    Sample Multiplier: 1
```

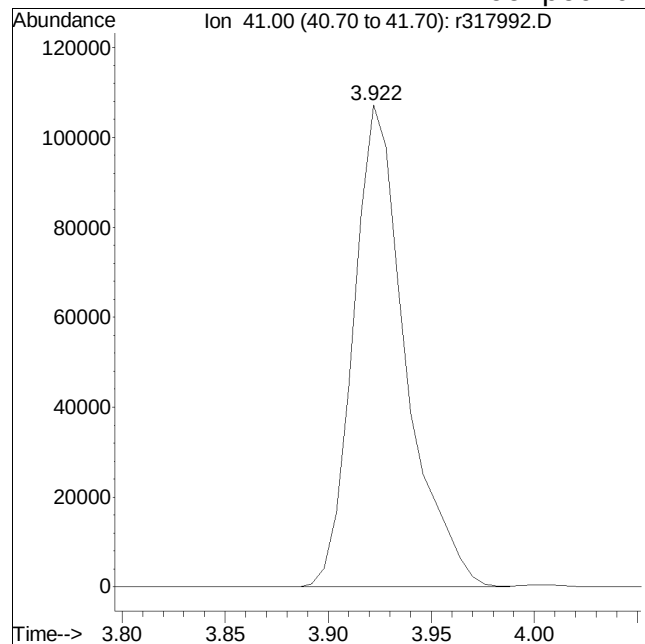
Quant Time: Sep 27 10:27:11 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926T_I\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 10:25:07 2021
Response via : Initial Calibration



Manual Integration Report

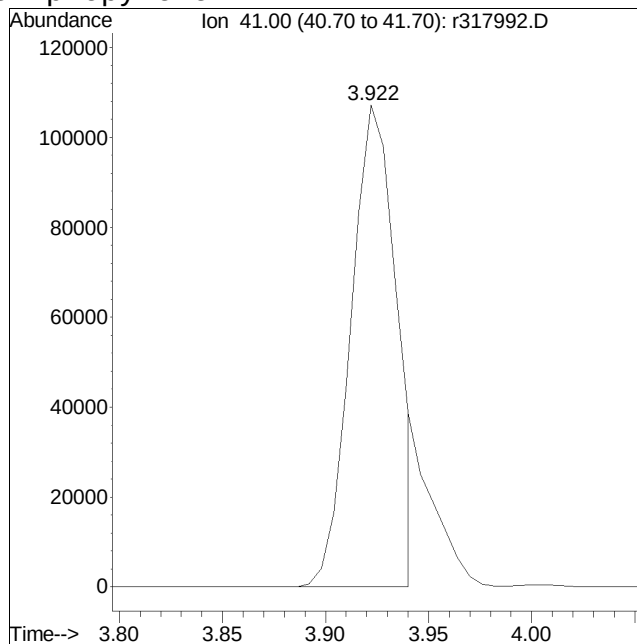
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317992.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:7: 7 Instrument :
Sample : CT015-LLSTD010 Quant Date : 9/27/2021 10:26 am

Compound #3: propylene



Original Peak Response = 189437

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

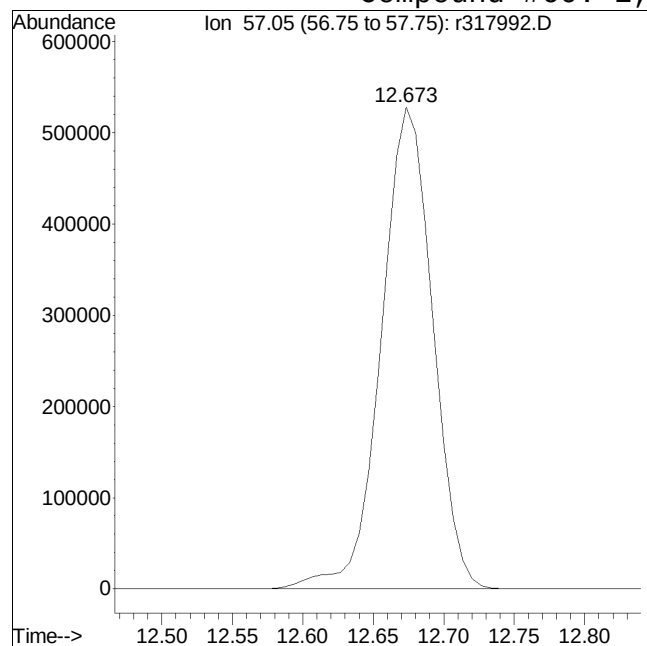


Manual Peak Response = 165476 M6

Manual Integration Report

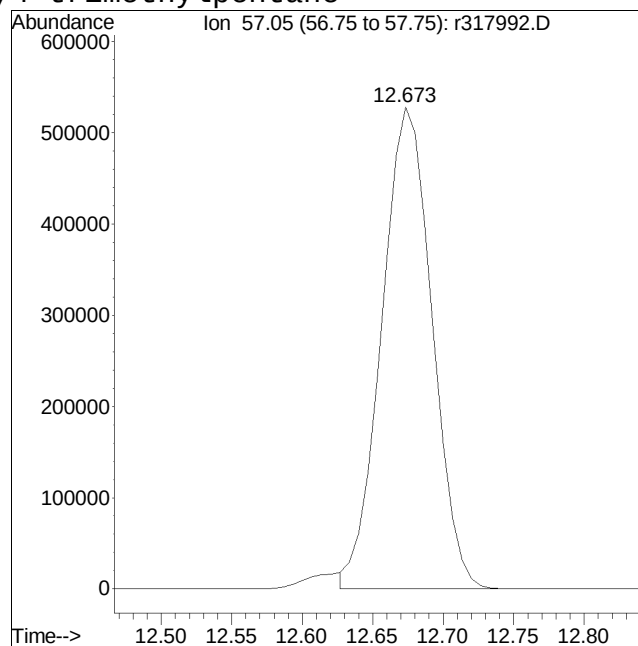
Data Path : 0:\Forensics\Data\AirpianoQMethod : TFS3_210926.M
Data File : r317992.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:7: 7 Instrument :
Sample : CT015-LLSTD010 Quant Date : 9/27/2021 10:26 am

Compound #60: 2,2,4-trimethylpentane



Original Peak Response = 1343613

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 1311277 M6

Continuing Calibration

Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRPIANO3
 Lab File ID : R318223
 Sample No : WG1555827-2
 Channel :

Lab Number : L2153835
 Project Number : 100849501
 Calibration Date : 10/07/21 11:46
 Init. Calib. Date(s) : 09/26/21 09/27/21
 Init. Calib. Times : 19:59 00:41

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
bromochloromethane	1	1	-	0	30	108	-.04
chlorodifluoromethane	0.836	0.793	-	5.1	30	107	-.03
propylene	0.457	0.443	-	3.1	30	104	-.03
propane	0.644	0.601	-	6.7	30	102	-.03
dichlorodifluoromethane	0.934	0.906	-	3	30	107	-.03
chloromethane	0.451	0.456	-	-1.1	30	115	-.03
Freon-114	1.236	1.228	-	0.6	30	108	-.03
methanol	0.226	0.229	-	-1.3	30	108	-.03
vinyl chloride	0.609	0.562	-	7.7	30	103	-.03
1,3-butadiene	0.503	0.497	-	1.2	30	109	-.04
butane	0.833	0.789	-	5.3	30	108	-.04
bromomethane	0.479	0.443	-	7.5	30	102	-.04
chloroethane	0.329	0.277	-	15.8	30	90	-.04
ethanol	0.408	0.425	-	-4.2	30	108	-.04
dichlorofluoromethane	0.971	1.007	-	-3.7	30	115	-.04
vinyl bromide	0.476	0.458	-	3.8	30	105	-.04
acrolein	0.302	0.289	-	4.3	30	109	-.04
acetone	0.848	0.887	-	-4.6	30	113	-.04
acetonitrile	0.489	0.444	-	9.2	30	102	-.04
trichlorofluoromethane	0.933	0.89	-	4.6	30	105	-.04
isopropyl alcohol	1.014	1.105	-	-9	30	115	-.04
acrylonitrile	0.574	0.522	-	9.1	30	101	-.04
pentane	1.218	1.148	-	5.7	30	96	-.04
ethyl ether	1.288	0.946	-	26.6	30	80	-.04
1,1-dichloroethene	0.87	0.77	-	11.5	30	97	-.04
tertiary butyl alcohol	1.13	1.026	-	9.2	30	99	-.04
methylene chloride	0.717	0.718	-	-0.1	30	109	-.05
3-chloropropene	0.856	0.832	-	2.8	30	108	-.04
carbon disulfide	2.01	1.997	-	0.6	30	110	-.04
Freon 113	1.039	0.999	-	3.8	30	106	-.05
trans-1,2-dichloroethene	0.928	0.816	-	12.1	30	96	-.04
1,1-dichloroethane	1.09	0.971	-	10.9	30	99	-.04
MTBE	1.638	1.643	-	-0.3	30	109	-.05
vinyl acetate	1.277	1.335	-	-4.5	30	111	-.04
2-butanone	1.313	1.331	-	-1.4	30	108	-.04
cis-1,2-dichloroethene	0.812	0.72	-	11.3	30	97	-.04
Ethyl Acetate	0.234	0.213	-	9	30	97	-.04
chloroform	1.089	1.024	-	6	30	102	-.04
Tetrahydrofuran	0.816	0.807	-	1.1	30	110	-.04
2,2-dichloropropane	0.788	0.863	-	-9.5	30	112	-.05
1,2-dichloroethane	0.622	0.564	-	9.3	30	99	-.04
1,4-difluorobenzene	1	1	-	0	30	103	-.04
hexane	0.433	0.408	-	5.8	30	98	-.04

* Value outside of QC limits.



Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRPIANO3
 Lab File ID : R318223
 Sample No : WG1555827-2
 Channel :

Lab Number : L2153835
 Project Number : 100849501
 Calibration Date : 10/07/21 11:46
 Init. Calib. Date(s) : 09/26/21 09/27/21
 Init. Calib. Times : 19:59 00:41

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
diisopropyl ether	0.236	0.223	-	5.5	30	98	-.04
tert-butyl ethyl ether	0.69	0.673	-	2.5	30	100	-.04
1,1,1-trichloroethane	0.301	0.298	-	1	30	103	-.04
1,1-dichloropropene	0.333	0.341	-	-2.4	30	108	-.05
benzene	0.863	0.807	-	6.5	30	105	-.04
carbon tetrachloride	0.281	0.29	-	-3.2	30	104	-.04
cyclohexane	0.469	0.436	-	7	30	98	-.04
tert-amyl methyl ether	0.652	0.695	-	-6.6	30	111	-.04
dibromomethane	0.211	0.202	-	4.3	30	102	-.04
1,2-dichloropropane	0.263	0.249	-	5.3	30	100	-.04
bromodichloromethane	0.423	0.411	-	2.8	30	100	-.04
1,4-dioxane	0.191	0.176	-	7.9	30	98	-.04
trichloroethene	0.309	0.3	-	2.9	30	102	-.04
2,2,4-trimethylpentane	1.373	1.316	-	4.2	30	98	-.04
methyl methacrylate	0.32	0.365	-	-14.1	30	110	-.04
heptane	0.487	0.513	-	-5.3	30	112	-.04
cis-1,3-dichloropropene	0.38	0.405	-	-6.6	30	108	-.04
4-methyl-2-pentanone	0.548	0.607	-	-10.8	30	113	-.04
trans-1,3-dichloropropene	0.338	0.378	-	-11.8	30	109	-.04
1,1,2-trichloroethane	0.269	0.267	-	0.7	30	105	-.04
chlorobenzene-D5	1	1	-	0	30	98	-.02
toluene	5.773	5.47	-	5.2	30	100	-.03
1,3-dichloropropane	2.694	2.932	-	-8.8	30	110	-.03
2-hexanone	3.183	3.783	-	-18.9	30	114	-.03
dibromochloromethane	2.346	2.56	-	-9.1	30	105	-.03
1,2-dibromoethane	2.445	2.697	-	-10.3	30	109	-.03
butyl acetate	0.785	0.895	-	-14	30	108	-.03
octane	2.349	2.373	-	-1	30	101	-.03
tetrachloroethene	2.39	2.546	-	-6.5	30	107	-.03
1,1,1,2-tetrachloroethane	1.7	1.901	-	-11.8	30	107	-.02
chlorobenzene	4.386	4.62	-	-5.3	30	103	-.03
ethylbenzene	6.544	6.71	-	-2.5	30	99	-.02
m+p-xylene	5.292	5.578	-	-5.4	30	102	-.03
bromoform	2.212	2.6	-	-17.5	30	109	-.03
styrene	4.521	5.015	-	-10.9	30	107	-.02
1,1,2,2-tetrachloroethane	3.904	4.211	-	-7.9	30	103	-.02
o-xylene	5.237	5.56	-	-6.2	30	102	-.02
1,2,3-trichloropropane	3.167	3.471	-	-9.6	30	110	-.02
nonane	4.234	4.806	-	-13.5	30	114	-.03
isopropylbenzene	7.078	7.794	-	-10.1	30	109	-.03
bromobenzene	4.264	4.616	-	-8.3	30	108	-.03
2-chlorotoluene	2.12	2.225	-	-5	30	103	-.02
n-propylbenzene	2.507	2.654	-	-5.9	30	102	-.02

* Value outside of QC limits.



Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRPIANO3
 Lab File ID : R318223
 Sample No : WG1555827-2
 Channel :

Lab Number : L2153835
 Project Number : 100849501
 Calibration Date : 10/07/21 11:46
 Init. Calib. Date(s) : 09/26/21 09/27/21
 Init. Calib. Times : 19:59 00:41

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
4-chlorotoluene	2.006	2.147	-	-7	30	105	-.02
4-ethyl toluene	7.742	8.704	-	-12.4	30	109	-.02
1,3,5-trimethylbenzene	6.433	7.12	-	-10.7	30	106	-.02
tert-butylbenzene	6.531	7.022	-	-7.5	30	102	-.02
1,2,4-trimethylbenzene	6.114	6.893	-	-12.7	30	106	-.03
decane	5.259	5.682	-	-8	30	103	-.02
Benzyl Chloride	3.758	5.104	-	-35.8*	30	102	-.02
1,3-dichlorobenzene	4.097	4.667	-	-13.9	30	104	-.03
1,4-dichlorobenzene	4.039	4.722	-	-16.9	30	107	-.02
sec-butylbenzene	8.915	9.972	-	-11.9	30	109	-.02
p-isopropyltoluene	7.733	8.526	-	-10.3	30	104	-.02
1,2-dichlorobenzene	3.943	4.416	-	-12	30	105	-.02
n-butylbenzene	6.664	7.295	-	-9.5	30	102	-.02
1,2-dibromo-3-chloropropan	1.688	1.97	-	-16.7	30	107	-.03
undecane	5.841	6.428	-	-10	30	100	-.02
dodecane	5.793	6.673	-	-15.2	30	94	-.02
1,2,4-trichlorobenzene	3.147	3.699	-	-17.5	30	100	-.03
naphthalene	8.031	9.098	-	-13.3	30	99	-.02
1,2,3-trichlorobenzene	3.161	3.547	-	-12.2	30	98	-.02
hexachlorobutadiene	3.088	3.345	-	-8.3	30	99	-.02

* Value outside of QC limits.



Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318223.D
 Acq On : 7 Oct 2021 11:46 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-2,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:01:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	bromochloromethane	1.000	1.000	0.0	108	-0.04
2	chlorodifluoromethane	0.836	0.793	5.1	107	-0.03
3	propylene	0.457	0.443	3.1	104	-0.03
4	propane	0.644	0.601	6.7	102	-0.03
5	dichlorodifluoromethane	0.934	0.906	3.0	107	-0.03
6 C	chloromethane	0.451	0.456	-1.1	115	-0.03
7	Freon-114	1.236	1.228	0.6	108	-0.03
8 C	methanol	0.226	0.229	-1.3	108	-0.03
9 C	vinyl chloride	0.609	0.562	7.7	103	-0.03
10 C	1,3-butadiene	0.503	0.497	1.2	109	-0.04
11	butane	0.833	0.789	5.3	108	-0.04
13 C	bromomethane	0.479	0.443	7.5	102	-0.04
14 C	chloroethane	0.329	0.277	15.8	90	-0.04
15	ethanol	0.408	0.425	-4.2	108	-0.04
16	dichlorofluoromethane	0.971	1.007	-3.7	115	-0.04
17 C	vinyl bromide	0.476	0.458	3.8	105	-0.04
18 C	acrolein	0.302	0.289	4.3	109	-0.04
19	acetone	0.848	0.887	-4.6	113	-0.04
20 C	acetonitrile	0.489	0.444	9.2	102	-0.04
21	trichlorofluoromethane	0.933	0.890	4.6	105	-0.04
22	isopropyl alcohol	1.014	1.105	-9.0	115	-0.04
23 C	acrylonitrile	0.574	0.522	9.1	101	-0.04
24	pentane	1.218	1.148	5.7	96	-0.04
25	ethyl ether	1.288	0.946	26.6	80	-0.04
26 C	1,1-dichloroethene	0.870	0.770	11.5	97	-0.04
27	tertiary butyl alcohol	1.130	1.026	9.2	99	-0.04
28 C	methylene chloride	0.717	0.718	-0.1	109	-0.05
29 C	3-chloropropene	0.856	0.832	2.8	108	-0.04
30 C	carbon disulfide	2.010	1.997	0.6	110	-0.04
31	Freon 113	1.039	0.999	3.8	106	-0.05
32	trans-1,2-dichloroethene	0.928	0.816	12.1	96	-0.04
33 C	1,1-dichloroethane	1.090	0.971	10.9	99	-0.04
34 C	MTBE	1.638	1.643	-0.3	109	-0.05
35 C	vinyl acetate	1.277	1.335	-4.5	111	-0.04
36 C	2-butanone	1.313	1.331	-1.4	108	-0.04
37	cis-1,2-dichloroethene	0.812	0.720	11.3	97	-0.04
38	Ethyl Acetate	0.234	0.213	9.0	97	-0.04
39 C	chloroform	1.089	1.024	6.0	102	-0.04
40	Tetrahydrofuran	0.816	0.807	1.1	110	-0.04

TFS3_210926.M Fri Oct 08 11:59:23 2021

1

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318223.D
 Acq On : 7 Oct 2021 11:46 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-2,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:01:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
41	2,2-dichloropropane	0.788	0.863	-9.5	112	-0.05
42 C	1,2-dichloroethane	0.622	0.564	9.3	99	-0.04
43 I	1,4-difluorobenzene	1.000	1.000	0.0	103	-0.04
44 C	hexane	0.433	0.408	5.8	98	-0.04
45	diisopropyl ether	0.236	0.223	5.5	98	-0.04
46	tert-butyl ethyl ether	0.690	0.673	2.5	100	-0.04
48 C	1,1,1-trichloroethane	0.301	0.298	1.0	103	-0.04
49	1,1-dichloropropene	0.333	0.341	-2.4	108	-0.05
50 C	benzene	0.863	0.807	6.5	105	-0.04
52 C	carbon tetrachloride	0.281	0.290	-3.2	104	-0.04
53	cyclohexane	0.469	0.436	7.0	98	-0.04
54	tert-amyl methyl ether	0.652	0.695	-6.6	111	-0.04
55	dibromomethane	0.211	0.202	4.3	102	-0.04
56 C	1,2-dichloropropane	0.263	0.249	5.3	100	-0.04
57	bromodichloromethane	0.423	0.411	2.8	100	-0.04
58 C	1,4-dioxane	0.191	0.176	7.9	98	-0.04
59 C	trichloroethene	0.309	0.300	2.9	102	-0.04
60 C	2,2,4-trimethylpentane	1.373	1.316	4.2	98	-0.04
61	methyl methacrylate	0.320	0.365	-14.1	110	-0.04
62	heptane	0.487	0.513	-5.3	112	-0.04
63 C	cis-1,3-dichloropropene	0.380	0.405	-6.6	108	-0.04
64 C	4-methyl-2-pentanone	0.548	0.607	-10.8	113	-0.04
65	trans-1,3-dichloropropene	0.338	0.378	-11.8	109	-0.04
66 C	1,1,2-trichloroethane	0.269	0.267	0.7	105	-0.04
67 I	chlorobenzene-D5	1.000	1.000	0.0	98	-0.02
68 C	toluene	5.773	5.470	5.2	100	-0.03
71	1,3-dichloropropane	2.694	2.932	-8.8	110	-0.03
72	2-hexanone	3.183	3.783	-18.9	114	-0.03
74	dibromochloromethane	2.346	2.560	-9.1	105	-0.03
75 C	1,2-dibromoethane	2.445	2.697	-10.3	109	-0.03
76	butyl acetate	0.785	0.895	-14.0	108	-0.03
77	octane	2.349	2.373	-1.0	101	-0.03
78 C	tetrachloroethene	2.390	2.546	-6.5	107	-0.03
79	1,1,1,2-tetrachloroethane	1.700	1.901	-11.8	107	-0.02
80 C	chlorobenzene	4.386	4.620	-5.3	103	-0.03
81 C	ethylbenzene	6.544	6.710	-2.5	99	-0.02
83 C	m+p-xylene	5.292	5.578	-5.4	102	-0.03

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318223.D
 Acq On : 7 Oct 2021 11:46 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-2,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:01:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
84 C	bromoform	2.212	2.600	-17.5	109	-0.03
85 C	styrene	4.521	5.015	-10.9	107	-0.02
86 C	1,1,2,2-tetrachloroethane	3.904	4.211	-7.9	103	-0.02
87 C	o-xylene	5.237	5.560	-6.2	102	-0.02
88	1,2,3-trichloropropane	3.167	3.471	-9.6	110	-0.02
89	nonane	4.234	4.806	-13.5	114	-0.03
91 C	isopropylbenzene	7.078	7.794	-10.1	109	-0.03
92	bromobenzene	4.264	4.616	-8.3	108	-0.03
93	2-chlorotoluene	2.120	2.225	-5.0	103	-0.02
94	n-propylbenzene	2.507	2.654	-5.9	102	-0.02
95	4-chlorotoluene	2.006	2.147	-7.0	105	-0.02
96	4-ethyl toluene	7.742	8.704	-12.4	109	-0.02
97	1,3,5-trimethylbenzene	6.433	7.120	-10.7	106	-0.02
98	tert-butylbenzene	6.531	7.022	-7.5	102	-0.02
99	1,2,4-trimethylbenzene	6.114	6.893	-12.7	106	-0.03
100	decane	5.259	5.682	-8.0	103	-0.02
101 C	Benzyl Chloride	3.758	5.104	-35.8#	102	-0.02
102	1,3-dichlorobenzene	4.097	4.667	-13.9	104	-0.03
103 C	1,4-dichlorobenzene	4.039	4.722	-16.9	107	-0.02
104	sec-butylbenzene	8.915	9.972	-11.9	109	-0.02
106	p-isopropyltoluene	7.733	8.526	-10.3	104	-0.02
107	1,2-dichlorobenzene	3.943	4.416	-12.0	105	-0.02
108	n-butylbenzene	6.664	7.295	-9.5	102	-0.02
111 C	1,2-dibromo-3-chloropropane	1.688	1.970	-16.7	107	-0.03
112	undecane	5.841	6.428	-10.0	100	-0.02
114	dodecane	5.793	6.673	-15.2	94	-0.02
115 C	1,2,4-trichlorobenzene	3.147	3.699	-17.5	100	-0.03
116	naphthalene	8.031	9.098	-13.3	99	-0.02
117	1,2,3-trichlorobenzene	3.161	3.547	-12.2	98	-0.02
119 C	hexachlorobutadiene	3.088	3.345	-8.3	99	-0.02

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318223.D
 Acq On : 7 Oct 2021 11:46 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-2,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:01:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.53	49	399927	10.000	ppbV	-0.04
Standard Area = 399927			Recovery	=	100.00%	
43) 1,4-difluorobenzene	11.79	114	1080836	10.000	ppbV	-0.04
Standard Area = 1080836			Recovery	=	100.00%	
67) chlorobenzene-D5	16.53	54	167175	10.000	ppbV	-0.02
Standard Area = 167175			Recovery	=	100.00%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
2) chlorodifluoromethane	3.87	51	317251	9.488	ppbV	100
3) propylene	3.90	41	177138M6	9.701	ppbV	
4) propane	3.92	29	240502	9.332	ppbV	96
5) dichlorodifluoromethane	3.98	85	362220	9.699	ppbV	99
6) chloromethane	4.16	50	182381	10.118	ppbV	98
7) Freon-114	4.28	85	491232	9.940	ppbV	97
8) methanol	4.35	31	458879	50.716	ppbV	99
9) vinyl chloride	4.41	62	224681	9.218	ppbV	99
10) 1,3-butadiene	4.58	54	198917	9.897	ppbV	93
11) butane	4.64	43	315553	9.471	ppbV	99
13) bromomethane	4.89	94	177318	9.255	ppbV	99
14) chloroethane	5.11	64	110788	8.412	ppbV	98
15) ethanol	5.28	31	849594	52.064	ppbV	99
16) dichlorofluoromethane	5.25	67	402618	10.367	ppbV	99
17) vinyl bromide	5.53	106	183360	9.631	ppbV	99
18) acrolein	5.68	56	115501	9.560	ppbV	96
19) acetone	5.84	43	1773579	52.295	ppbV	94
20) acetonitrile	5.53	41	177730	9.080	ppbV	99
21) trichlorofluoromethane	6.05	101	355934	9.540	ppbV	99
22) isopropyl alcohol	6.16	45	1104625	27.241	ppbV	98
23) acrylonitrile	6.42	53	208953	9.106	ppbV	99
24) pentane	6.49	43	459155	9.429	ppbV	97
25) ethyl ether	6.53	31	378356	7.347	ppbV	96
26) 1,1-dichloroethene	6.82	61	308127	8.860	ppbV	97
27) tertiary butyl alcohol	6.88	59	410443	9.084	ppbV	94
28) methylene chloride	6.98	49	287346	10.015	ppbV	96
29) 3-chloropropene	7.12	41	332863	9.722	ppbV	97
30) carbon disulfide	7.27	76	798731	9.938	ppbV	99
31) Freon 113	7.31	101	399362	9.609	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318223.D
 Acq On : 7 Oct 2021 11:46 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-2,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:01:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
32) trans-1,2-dichloroethene	8.11	61	326349	8.795	ppbV	97
33) 1,1-dichloroethane	8.34	63	388404	8.913	ppbV	99
34) MTBE	8.42	73	657189	10.033	ppbV	96
35) vinyl acetate	8.56	43	533903	10.456	ppbV	96
36) 2-butanone	8.82	43	532210	10.134	ppbV	99
37) cis-1,2-dichloroethene	9.33	61	287805	8.860	ppbV	96
38) Ethyl Acetate	9.63	61	85226	9.111	ppbV	76
39) chloroform	9.69	83	409452	9.400	ppbV	97
40) Tetrahydrofuran	10.13	42	322787	9.895	ppbV	100
41) 2,2-dichloropropane	9.70	77	345049	10.953	ppbV	99
42) 1,2-dichloroethane	10.53	62	225737	9.072	ppbV	97
44) hexane	9.60	57	441284	9.429	ppbV	87
45) diisopropyl ether	9.61	87	240759	9.453	ppbV	77
46) tert-butyl ethyl ether	10.23	59	727691	9.755	ppbV	100
48) 1,1,1-trichloroethane	10.82	97	321560	9.895	ppbV	98
49) 1,1-dichloropropene	11.19	75	368535	10.252	ppbV	97
50) benzene	11.35	78	872184	9.353	ppbV	98
52) carbon tetrachloride	11.53	117	313665	10.312	ppbV	99
53) cyclohexane	11.67	56	471424	9.309	ppbV	97
54) tert-amyl methyl ether	12.06	73	750807	10.648	ppbV	97
55) dibromomethane	12.27	93	218375	9.562	ppbV	98
56) 1,2-dichloropropane	12.31	63	268834	9.456	ppbV	99
57) bromodichloromethane	12.54	83	444638	9.720	ppbV	99
58) 1,4-dioxane	12.58	88	190576	9.246	ppbV	99
59) trichloroethene	12.59	130	324518	9.715	ppbV	99
60) 2,2,4-trimethylpentane	12.64	57	1422808	9.586	ppbV	96
61) methyl methacrylate	12.84	41	394762	11.416	ppbV	99
62) heptane	12.96	43	554378	10.522	ppbV	93
63) cis-1,3-dichloropropene	13.60	75	437265	10.644	ppbV	97
64) 4-methyl-2-pentanone	13.64	43	656248	11.089	ppbV	93
65) trans-1,3-dichloropropene	14.23	75	409038	11.192	ppbV	97
66) 1,1,2-trichloroethane	14.43	97	289002	9.931	ppbV	96
68) toluene	14.74	91	914409	9.474	ppbV	99
71) 1,3-dichloropropane	14.78	76	490216	10.883	ppbV	100
72) 2-hexanone	15.03	43	632506	11.887	ppbV	92
74) dibromochloromethane	15.19	129	428046	10.915	ppbV	99
75) 1,2-dibromoethane	15.44	107	450812	11.031	ppbV	98
76) butyl acetate	15.69	73	149615	11.401	ppbV	89
77) octane	15.78	85	396692	10.102	ppbV	91
78) tetrachloroethene	15.92	166	425610	10.654	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318223.D
 Acq On : 7 Oct 2021 11:46 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-2,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:01:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : Default-LCS-AP2 - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
79)	1,1,1,2-tetrachloroethane	16.56	131	317861	11.186	ppbV	100
80)	chlorobenzene	16.57	112	772304	10.532	ppbV	99
81)	ethylbenzene	16.93	91	1121684	10.253	ppbV	96
83)	m+p-xylene	17.08	91	1865114	21.083	ppbV	95
84)	bromoform	17.15	173	434615	11.754	ppbV	99
85)	styrene	17.41	104	838453	11.093	ppbV	100
86)	1,1,2,2-tetrachloroethane	17.50	83	704000	10.787	ppbV	100
87)	o-xylene	17.50	91	929510	10.617	ppbV	95
88)	1,2,3-trichloropropane	17.62	75	580316	10.960	ppbV	98
89)	nonane	17.70	43	803481	11.351	ppbV	90
91)	isopropylbenzene	18.02	105	1302985	11.012	ppbV	96
92)	bromobenzene	18.09	77	771725	10.826	ppbV	98
93)	2-chlorotoluene	18.42	126	371979	10.496	ppbV	95
94)	n-propylbenzene	18.44	120	443653	10.587	ppbV	98
95)	4-chlorotoluene	18.48	126	358946	10.703	ppbV	98
96)	4-ethyl toluene	18.57	105	1455075	11.242	ppbV	97
97)	1,3,5-trimethylbenzene	18.63	105	1190289	11.069	ppbV	95
98)	tert-butylbenzene	18.96	119	1173978	10.753	ppbV	98
99)	1,2,4-trimethylbenzene	18.96	105	1152274	11.273	ppbV	99
100)	decane	19.03	57	949847	10.804	ppbV	92
101)	Benzyl Chloride	19.07	91	853228	13.580	ppbV	99
102)	1,3-dichlorobenzene	19.08	146	780136	11.390	ppbV	99
103)	1,4-dichlorobenzene	19.14	146	789463	11.691	ppbV	98
104)	sec-butylbenzene	19.17	105	1667000	11.185	ppbV	100
106)	p-isopropyltoluene	19.29	119	1425357	11.026	ppbV	96
107)	1,2-dichlorobenzene	19.42	146	738254	11.199	ppbV	96
108)	n-butylbenzene	19.63	91	1219503	10.947	ppbV	100
111)	1,2-dibromo-3-chloropr...	19.77	75	329268	11.665	ppbV	98
112)	undecane	20.03	57	1074666	11.006	ppbV	93
114)	dodecane	20.93	57	1115529	11.519	ppbV	93
115)	1,2,4-trichlorobenzene	20.88	180	618385	11.755	ppbV	99
116)	naphthalene	21.00	128	1520909	11.328	ppbV	100
117)	1,2,3-trichlorobenzene	21.24	180	592936	11.222	ppbV	99
119)	hexachlorobutadiene	21.32	225	559199	10.834	ppbV	97

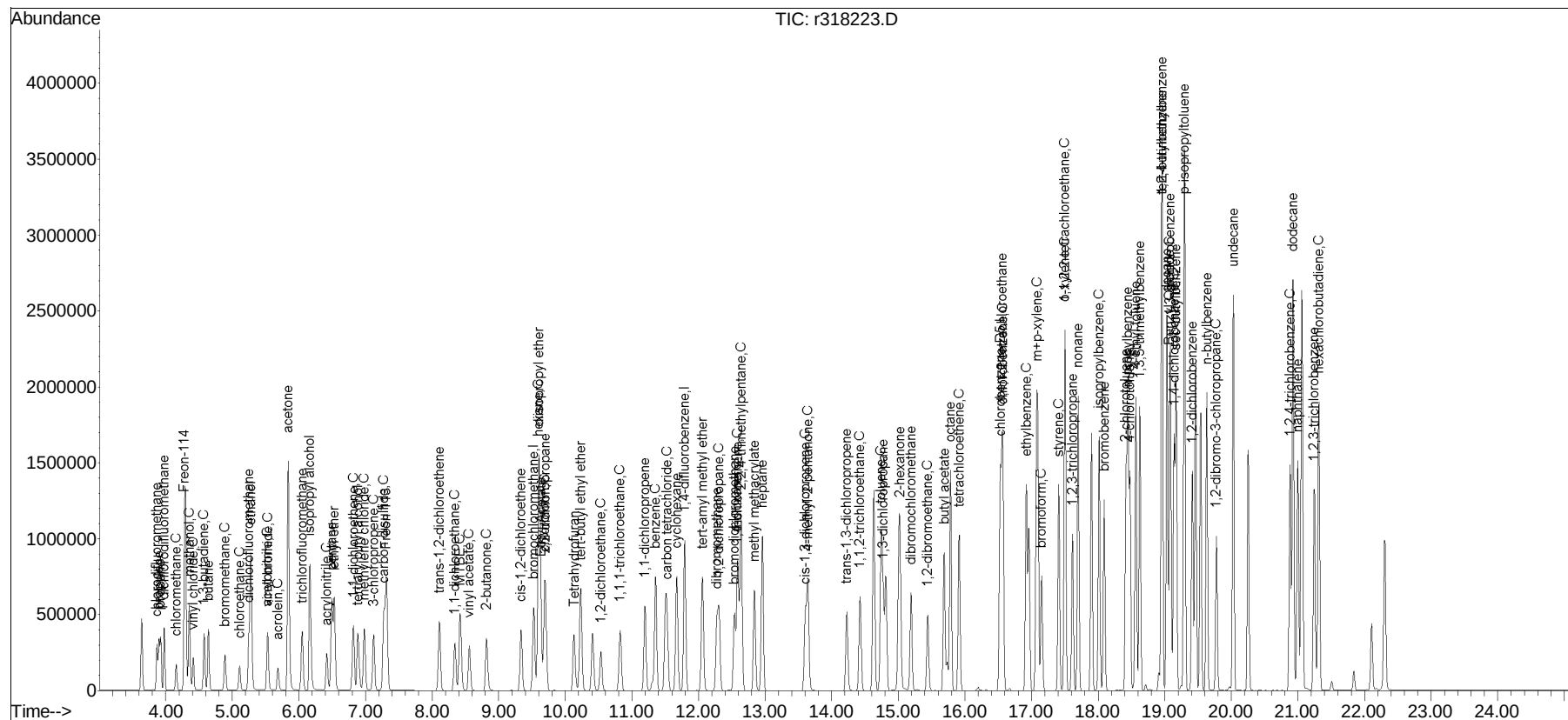
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318223.D
 Acq On : 7 Oct 2021 11:46 AM
 Operator : AIRPIANO3:RY
 Sample : WG1555827-2,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:01:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

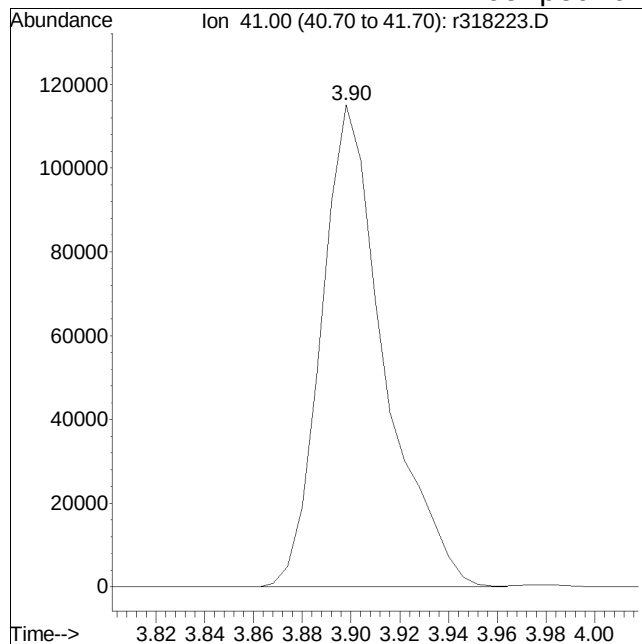
Sub List : Default-LCS-AP2 - All compounds listed 07T\r318223.D



Manual Integration/Negative Proof Report

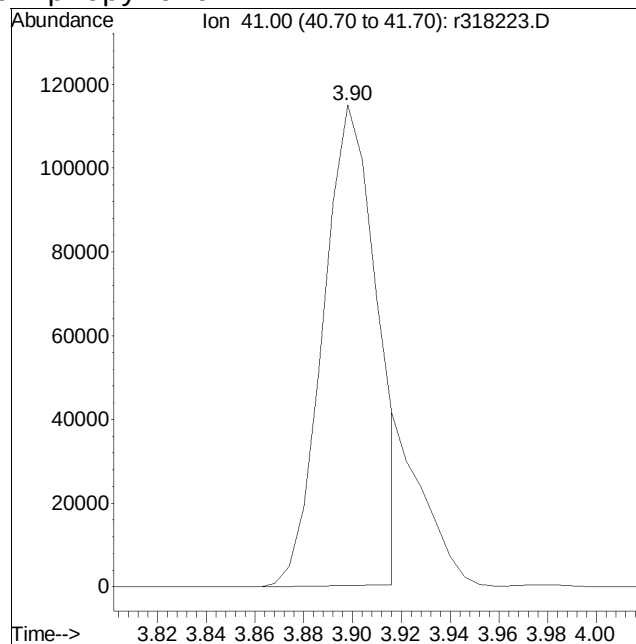
Data Path : 0:\Forensics\Data\Airpiano3QMethod : TFS3_210926.M
Data File : r318223.D Operator : AIRPIAN03:RY
Date Inj'd : 10/7/2020 0:1: 6 Instrument :
Sample : WG1555827-2, 3, 250, 250 Quant Date : 10/7/2021 1:01 pm

Compound #3: propylene



Original Peak Response = 207004

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



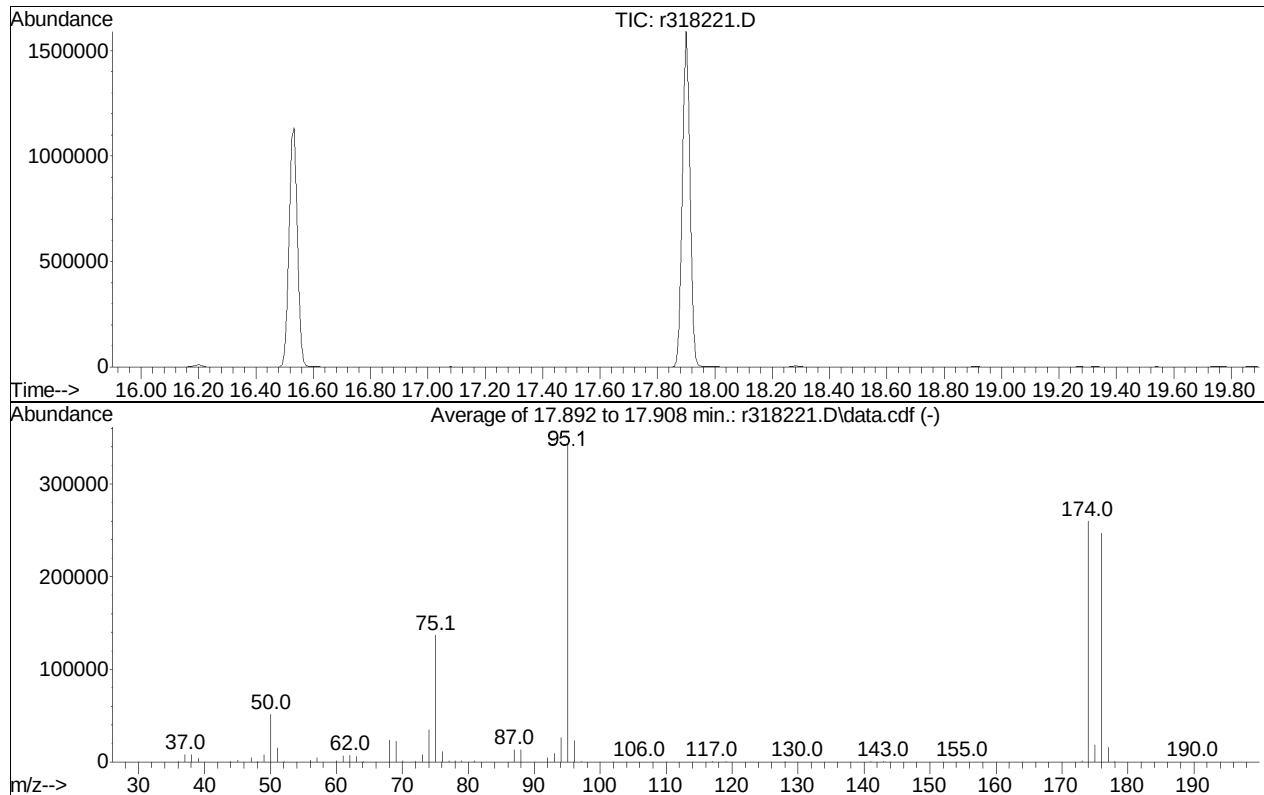
Manual Peak Response = 177138 M6

BFB

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318221.D
 Acq On : 7 Oct 2021 10:25 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-1,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Integration File: rteint.p

Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Sep 27 10:25:06 2021



Spectrum Information: Average of 17.892 to 17.908 min.

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	14.9	51187	PASS
75	95	30	66	39.8	137269	PASS
95	95	100	100	100.0	344572	PASS
96	95	5	9	6.7	22927	PASS
173	174	0.00	2	0.5	1425	PASS
174	95	50	120	75.5	260230	PASS
175	174	4	9	7.0	18295	PASS
176	174	93	101	94.8	246728	PASS
177	176	5	9	6.6	16162	PASS

Volatiles Raw QC Data

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318226.D
 Acq On : 7 Oct 2021 3:03 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-4,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 06:58:31 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.53	49	379198	10.000	ppbV	-0.03
Standard Area = 399927			Recovery =		94.82%	
43) 1,4-difluorobenzene	11.80	114	1005136	10.000	ppbV	-0.03
Standard Area = 1080836			Recovery =		93.00%	
67) chlorobenzene-D5	16.53	54	156361	10.000	ppbV	-0.02
Standard Area = 167175			Recovery =		93.53%	

System Monitoring Compounds

Target Compounds			Qvalue
5) dichlorodifluoromethane	0.00	0	N.D.
6) chloromethane	0.00	0	N.D.
9) vinyl chloride	0.00	0	N.D.
14) chloroethane	0.00	0	N.D.
21) trichlorofluoromethane	0.00	0	N.D.
26) 1,1-dichloroethene	0.00	0	N.D.
28) methylene chloride	6.99	0	N.D.
31) Freon 113	0.00	0	N.D.
32) trans-1,2-dichloroethene	0.00	0	N.D.
33) 1,1-dichloroethane	0.00	0	N.D.
37) cis-1,2-dichloroethene	0.00	0	N.D.
39) chloroform	0.00	0	N.D.
41) 2,2-dichloropropane	0.00	0	N.D.
42) 1,2-dichloroethane	0.00	0	N.D.
48) 1,1,1-trichloroethane	0.00	0	N.D.
49) 1,1-dichloropropene	0.00	0	N.D.
52) carbon tetrachloride	0.00	0	N.D.
56) 1,2-dichloropropane	0.00	0	N.D.
57) bromodichloromethane	0.00	0	N.D.
59) trichloroethene	0.00	0	N.D.
63) cis-1,3-dichloropropene	0.00	0	N.D.
65) trans-1,3-dichloropropene	0.00	0	N.D.
66) 1,1,2-trichloroethane	0.00	0	N.D.
71) 1,3-dichloropropane	0.00	0	N.D.
74) dibromochloromethane	0.00	0	N.D.
78) tetrachloroethene	0.00	0	N.D.
79) 1,1,1,2-tetrachloroethane	0.00	0	N.D.

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318226.D
 Acq On : 7 Oct 2021 3:03 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-4,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 06:58:31 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80) chlorobenzene	0.00		0		N.D.	
86) 1,1,2,2-tetrachloroethane	0.00		0		N.D.	
88) 1,2,3-trichloropropane	0.00		0		N.D.	
93) 2-chlorotoluene	0.00		0		N.D.	
95) 4-chlorotoluene	0.00		0		N.D.	
102) 1,3-dichlorobenzene	19.09		0		N.D.	
103) 1,4-dichlorobenzene	19.15		0		N.D.	
107) 1,2-dichlorobenzene	19.43		0		N.D.	
111) 1,2-dibromo-3-chloropr...	0.00		0		N.D.	
115) 1,2,4-trichlorobenzene	20.90		0		N.D.	
117) 1,2,3-trichlorobenzene	21.26		0		N.D.	
119) hexachlorobutadiene	21.32		0		N.D.	

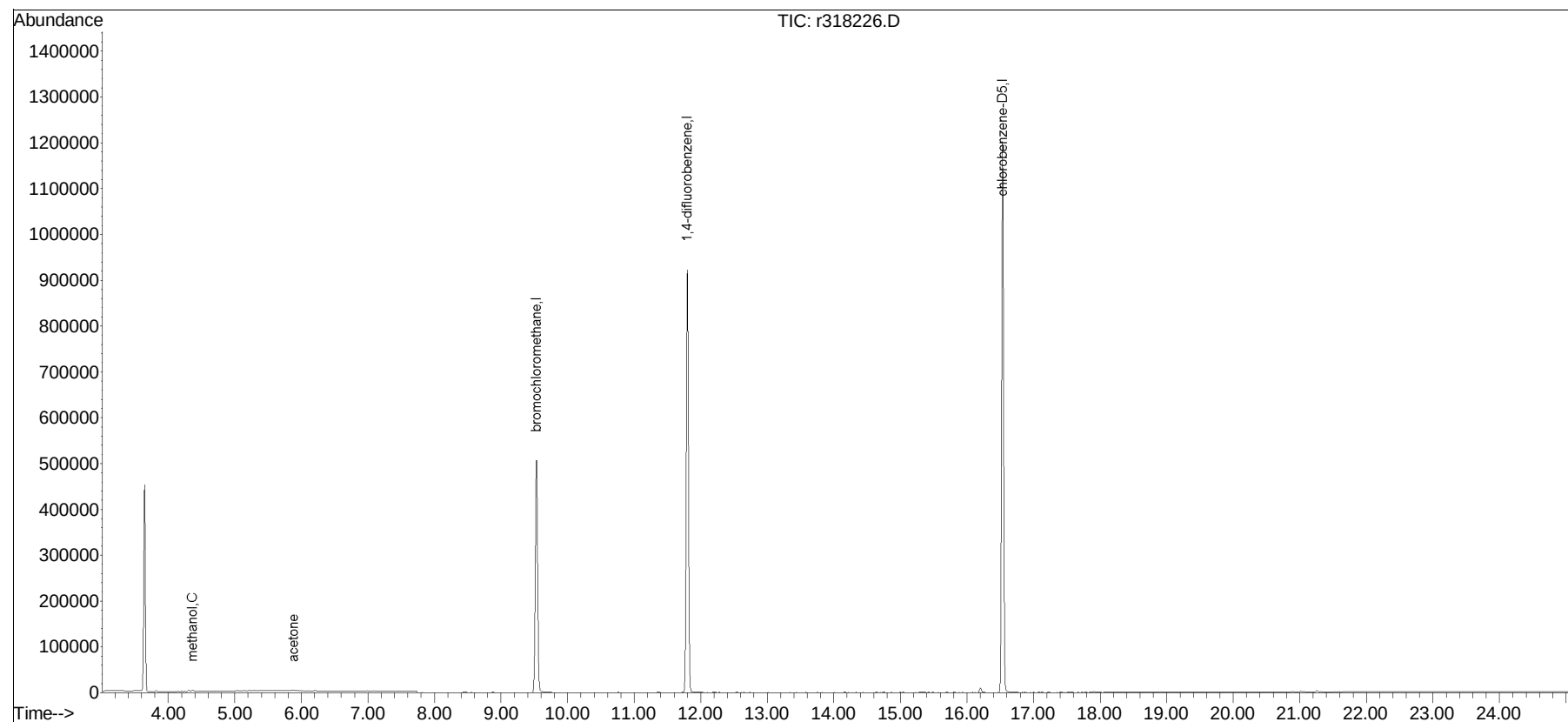
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
Data File : r318226.D
Acq On : 7 Oct 2021 3:03 PM
Operator : AIRPIANO3:RY
Sample : WG1555827-4,3,250,250
Misc : WG1555827,ICAL18331
ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 06:58:31 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 10:25:07 2021
Response via : Initial Calibration

Sub List : Default-LCS-AP2 - All compounds listed07T\r318223.D



Manual Integration/Negative Proof Report

Data Path : O:\Forensics\Data\Airpiano3QMethod : TFS3_210926.M
Data File : r318226.D Operator : AIRPIAN03:RY
Date Inj'd : 10/7/2020 0:3: 3 Instrument :
Sample : WG1555827-4,3,250,250 Quant Date : 10/8/2021 7:58 am

There are no manual integrations or false positives in this file.

LSC Area Percent Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318226.D
 Acq On : 7 Oct 2021 3:03 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-4,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Integration Parameters: rteint.p

Integrator: RTE

Smoothing : OFF

Sampling : 1

Start Thrs: 0.2

Stop Thrs : 0

Filtering: 5

Min Area: 1 % of largest Peak

Max Peaks: 100

Peak Location: TOP

If leading or trailing edge < 100 prefer < Baseline drop else tangent >
 Peak separation: 5

Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis

Signal : TIC: r318226.D

peak #	R.T. min	first scan	max scan	last scan	PK TY	peak height	corr. area	corr. % max.	% of total
1	9.533	1181	1189	1211	rBV	506702	1220804	51.00%	21.483%
2	11.800	1474	1483	1498	rVB	922247	2068070	86.39%	36.393%
3	16.533	2086	2092	2113	rBV	1202184	2393796	100.00%	42.124%

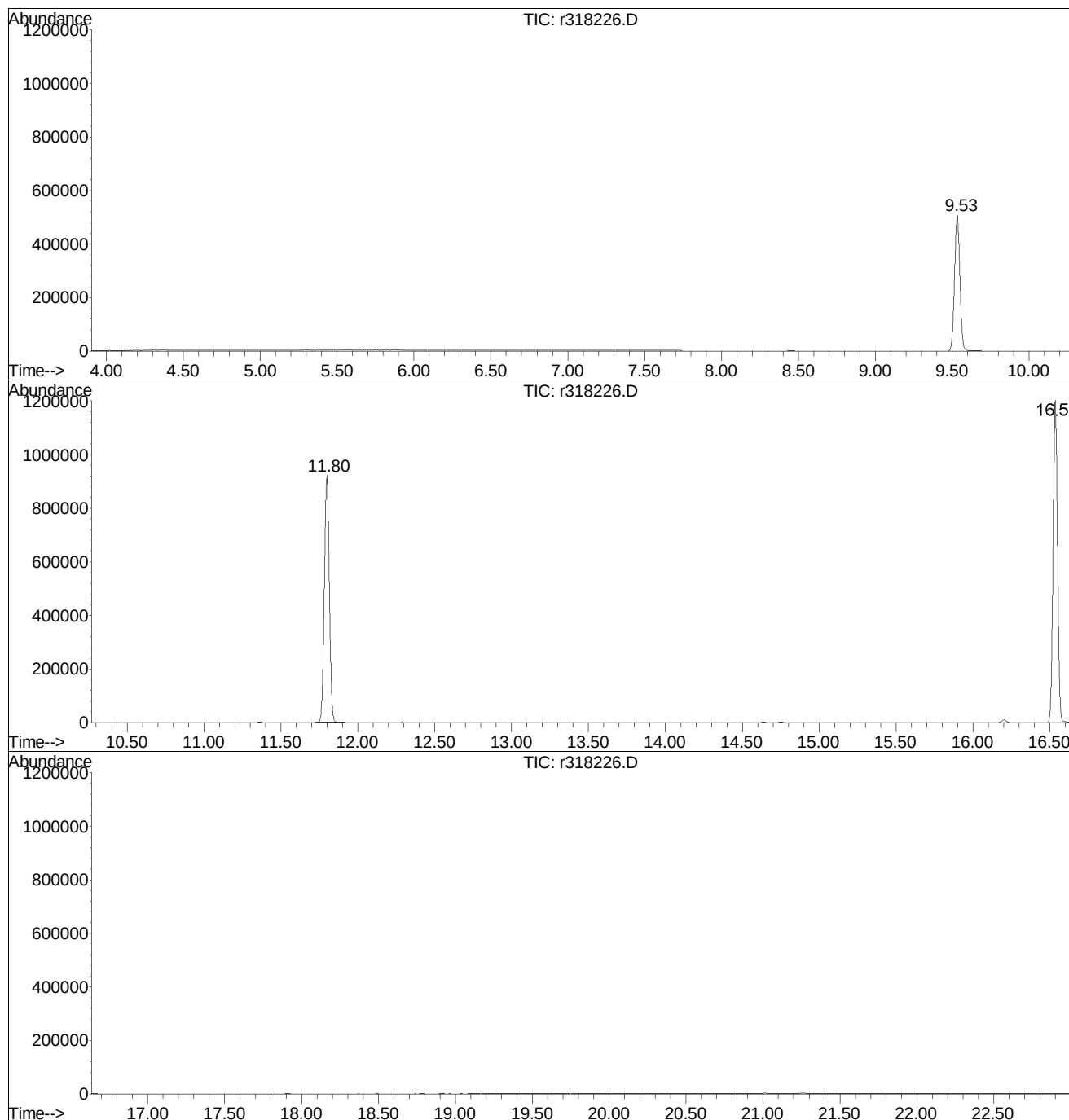
Sum of corrected areas: 5682670

LSC Report - Integrated Chromatogram

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
Data File : r318226.D
Acq On : 7 Oct 2021 3:03 PM
Operator : AIRPIAN03:RY
Sample : WG1555827-4,3,250,250
Misc : WG1555827,ICAL18331
ALS Vial : 0 Sample Multiplier: 1

Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

TIC Library : 0:\Organics\DATABASE\NIST02.L
TIC Integration Parameters: LSCINT.P



Library Search Compound Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
Data File : r318226.D
Acq On : 7 Oct 2021 3:03 PM
Operator : AIRPIAN03:RY
Sample : WG1555827-4,3,250,250
Misc : WG1555827,ICAL18331
ALS Vial : 0 Sample Multiplier: 1

Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis

TIC Library : 0:\Organics\DATABASE\NIST02.L
TIC Integration Parameters: LSCINT.P

No Library Search Compounds Detected

Tentatively Identified Compound (LSC) summary

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318226.D
 Acq On : 7 Oct 2021 3:03 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-4,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

TIC Library : 0:\Organics\DATABASE\NIST02.L
 TIC Integration Parameters: LSCINT.P

TIC Top Hit name	RT	EstConc	Units	Response	--Internal Standard--			
					#	RT	Resp	Conc

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318224.D
 Acq On : 7 Oct 2021 12:28 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-3,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:03:30 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1 I	bromochloromethane	10.000	10.000	0.0	108	-0.04
2	chlorodifluoromethane	10.000	8.382	16.2	95	-0.03
3	propylene	10.000	10.212	-2.1	110	-0.03
4	propane	10.000	8.425	15.7	93	-0.02
5	dichlorodifluoromethane	10.000	8.898	11.0	99	-0.03
6 C	chloromethane	10.000	9.504	5.0	108	-0.03
7	Freon-114	10.000	9.397	6.0	103	-0.03
8 C	methanol	50.000	42.140	15.7	91	-0.03
9 C	vinyl chloride	10.000	8.855	11.4	99	-0.03
10 C	1,3-butadiene	10.000	9.891	1.1	109	-0.04
11	butane	10.000	8.368	16.3	96	-0.04
13 C	bromomethane	10.000	8.876	11.2	99	-0.04
14 C	chloroethane	10.000	8.216	17.8	88	-0.04
15	ethanol	50.000	47.310	5.4	99	-0.04
16	dichlorofluoromethane	10.000	9.148	8.5	102	-0.04
17 C	vinyl bromide	10.000	10.321	-3.2	113	-0.04
18 C	acrolein	10.000	8.812	11.9	101	-0.04
19	acetone	50.000	44.661	10.7	97	-0.04
20 C	acetonitrile	10.000	10.052	-0.5	113	-0.04
21	trichlorofluoromethane	10.000	8.987	10.1	99	-0.04
22	isopropyl alcohol	25.000	23.924	4.3	102	-0.04
23 C	acrylonitrile	10.000	8.822	11.8	99	-0.04
24	pentane	10.000	8.535	14.6	87	-0.04
25	ethyl ether	10.000	8.161	18.4	89	-0.04
26 C	1,1-dichloroethene	10.000	8.801	12.0	97	-0.04
27	tertiary butyl alcohol	10.000	8.708	12.9	96	-0.04
28 C	methylene chloride	10.000	9.746	2.5	107	-0.05
29 C	3-chloropropene	10.000	10.116	-1.2	113	-0.04
30 C	carbon disulfide	10.000	9.039	9.6	100	-0.04
31	Freon 113	10.000	9.346	6.5	104	-0.04
32	trans-1,2-dichloroethene	10.000	8.405	16.0	93	-0.04
33 C	1,1-dichloroethane	10.000	8.720	12.8	98	-0.04
34 C	MTBE	10.000	9.729	2.7	106	-0.05
35 C	vinyl acetate	10.000	9.733	2.7	104	-0.04
36 C	2-butanone	10.000	9.515	4.8	102	-0.04
37	cis-1,2-dichloroethene	10.000	8.852	11.5	97	-0.04
38	Ethyl Acetate	10.000	9.134	8.7	98	-0.04
39 C	chloroform	10.000	9.270	7.3	101	-0.04
40	Tetrahydrofuran	10.000	9.390	6.1	105	-0.05

TFS3_210926.M Fri Oct 08 11:59:54 2021

1

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318224.D
 Acq On : 7 Oct 2021 12:28 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-3,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:03:30 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
41	2,2-dichloropropane	10.000	9.781	2.2	101	-0.05
42 C	1,2-dichloroethane	10.000	8.563	14.4	94	-0.04
43 I	1,4-difluorobenzene	10.000	10.000	0.0	103	-0.04
44 C	hexane	10.000	9.352	6.5	97	-0.04
45	diisopropyl ether	10.000	8.769	12.3	91	-0.05
46	tert-butyl ethyl ether	10.000	8.968	10.3	92	-0.04
48 C	1,1,1-trichloroethane	10.000	9.600	4.0	100	-0.04
49	1,1-dichloropropene	10.000	9.726	2.7	103	-0.05
50 C	benzene	10.000	9.036	9.6	101	-0.04
52 C	carbon tetrachloride	10.000	10.160	-1.6	103	-0.04
53	cyclohexane	10.000	9.308	6.9	98	-0.04
54	tert-amyl methyl ether	10.000	9.774	2.3	102	-0.04
55	dibromomethane	10.000	8.787	12.1	93	-0.04
56 C	1,2-dichloropropane	10.000	9.328	6.7	98	-0.04
57	bromodichloromethane	10.000	9.642	3.6	99	-0.04
58 C	1,4-dioxane	10.000	9.286	7.1	99	-0.04
59 C	trichloroethene	10.000	9.517	4.8	99	-0.04
60 C	2,2,4-trimethylpentane	10.000	9.562	4.4	98	-0.04
61	methyl methacrylate	10.000	8.619	13.8	83	-0.04
62	heptane	10.000	10.231	-2.3	109	-0.04
63 C	cis-1,3-dichloropropene	10.000	10.816	-8.2	110	-0.03
64 C	4-methyl-2-pentanone	10.000	10.694	-6.9	109	-0.04
65	trans-1,3-dichloropropene	10.000	9.744	2.6	95	-0.04
66 C	1,1,2-trichloroethane	10.000	9.772	2.3	103	-0.04
67 I	chlorobenzene-D5	10.000	10.000	0.0	96	-0.02
68 C	toluene	10.000	9.346	6.5	97	-0.03
71	1,3-dichloropropane	10.000	9.908	0.9	99	-0.03
72	2-hexanone	10.000	11.044	-10.4	104	-0.03
74	dibromochloromethane	10.000	10.969	-9.7	104	-0.03
75 C	1,2-dibromoethane	10.000	10.737	-7.4	104	-0.03
76	butyl acetate	10.000	10.379	-3.8	97	-0.03
77	octane	10.000	9.335	6.6	92	-0.03
78 C	tetrachloroethene	10.000	10.177	-1.8	100	-0.03
79	1,1,1,2-tetrachloroethane	10.000	10.258	-2.6	97	-0.02
80 C	chlorobenzene	10.000	10.433	-4.3	101	-0.03
81 C	ethylbenzene	10.000	10.069	-0.7	96	-0.02
83 C	m+p-xylene	20.000	20.629	-3.1	99	-0.03

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318224.D
 Acq On : 7 Oct 2021 12:28 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-3,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:03:30 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
84 C	bromoform	10.000	11.491	-14.9	105	-0.03
85 C	styrene	10.000	10.749	-7.5	102	-0.02
86 C	1,1,2,2-tetrachloroethane	10.000	10.700	-7.0	101	-0.02
87 C	o-xylene	10.000	10.431	-4.3	98	-0.02
88	1,2,3-trichloropropane	10.000	10.087	-0.9	99	-0.02
89	nonane	10.000	10.231	-2.3	101	-0.03
91 C	isopropylbenzene	10.000	10.426	-4.3	102	-0.03
92	bromobenzene	10.000	10.051	-0.5	99	-0.03
93	2-chlorotoluene	10.000	9.671	3.3	93	-0.02
94	n-propylbenzene	10.000	9.783	2.2	93	-0.02
95	4-chlorotoluene	10.000	9.887	1.1	95	-0.02
96	4-ethyl toluene	10.000	10.734	-7.3	102	-0.02
97	1,3,5-trimethylbenzene	10.000	10.740	-7.4	101	-0.02
98	tert-butylbenzene	10.000	9.797	2.0	92	-0.02
99	1,2,4-trimethylbenzene	10.000	11.087	-10.9	102	-0.03
100	decane	10.000	9.954	0.5	93	-0.02
101 C	Benzyl Chloride	10.000	13.155	-31.5#	97	-0.02
102	1,3-dichlorobenzene	10.000	11.540	-15.4	104	-0.03
103 C	1,4-dichlorobenzene	10.000	10.975	-9.7	99	-0.02
104	sec-butylbenzene	10.000	10.260	-2.6	98	-0.02
106	p-isopropyltoluene	10.000	9.635	3.7	90	-0.02
107	1,2-dichlorobenzene	10.000	11.141	-11.4	103	-0.02
108	n-butylbenzene	10.000	10.363	-3.6	96	-0.02
111 C	1,2-dibromo-3-chloropropane	10.000	10.810	-8.1	98	-0.02
112	undecane	10.000	10.328	-3.3	93	-0.02
114	dodecane	10.000	10.733	-7.3	87	-0.02
115 C	1,2,4-trichlorobenzene	10.000	11.701	-17.0	98	-0.03
116	naphthalene	10.000	10.681	-6.8	92	-0.02
117	1,2,3-trichlorobenzene	10.000	11.064	-10.6	95	-0.02
119 C	hexachlorobutadiene	10.000	11.032	-10.3	99	-0.02

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318224.D
 Acq On : 7 Oct 2021 12:28 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-3,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:03:30 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.53	49	402386	10.000	ppbV	-0.04
Standard Area = 399927			Recovery =	100.61%		
43) 1,4-difluorobenzene	11.79	114	1081002	10.000	ppbV	-0.04
Standard Area = 1080836			Recovery =	100.02%		
67) chlorobenzene-D5	16.53	54	164632	10.000	ppbV	-0.02
Standard Area = 167175			Recovery =	98.48%		

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.98	85	334358	8.898	ppbV	100
6) chloromethane	4.16	50	172378	9.504	ppbV	99
9) vinyl chloride	4.41	62	217176	8.855	ppbV	99
14) chloroethane	5.11	64	108873	8.216	ppbV	99
21) trichlorofluoromethane	6.05	101	337378	8.987	ppbV	100
26) 1,1-dichloroethene	6.82	61	307961	8.801	ppbV	98
28) methylene chloride	6.98	49	281362	9.746	ppbV	97
31) Freon 113	7.32	101	390821	9.346	ppbV	98
32) trans-1,2-dichloroethene	8.11	61	313781	8.405	ppbV	97
33) 1,1-dichloroethane	8.34	63	382335	8.720	ppbV	99
37) cis-1,2-dichloroethene	9.33	61	289309	8.852	ppbV	96
39) chloroform	9.69	83	406247	9.270	ppbV	98
41) 2,2-dichloropropane	9.70	77	310028	9.781	ppbV	97
42) 1,2-dichloroethane	10.53	62	214386	8.563	ppbV	97
48) 1,1,1-trichloroethane	10.82	97	312013	9.600	ppbV	99
49) 1,1-dichloropropene	11.19	75	349689	9.726	ppbV	97
52) carbon tetrachloride	11.53	117	309101	10.160	ppbV	97
56) 1,2-dichloropropane	12.31	63	265230	9.328	ppbV	99
57) bromodichloromethane	12.54	83	441144	9.642	ppbV	99
59) trichloroethene	12.59	130	317954	9.517	ppbV	100
63) cis-1,3-dichloropropene	13.61	75	444393	10.816	ppbV	99
65) trans-1,3-dichloropropene	14.23	75	356175	9.744	ppbV	98
66) 1,1,2-trichloroethane	14.43	97	284438	9.772	ppbV	98
71) 1,3-dichloropropane	14.78	76	439500	9.908	ppbV	99
74) dibromochloromethane	15.19	129	423626	10.969	ppbV	99
78) tetrachloroethene	15.92	166	400378	10.177	ppbV	98
79) 1,1,1,2-tetrachloroethane	16.56	131	287058	10.258	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318224.D
 Acq On : 7 Oct 2021 12:28 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-3,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:03:30 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : Default-LCS-AP2 - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
80)	chlorobenzene	16.57	112	753391	10.433	ppbV	99
86)	1,1,2,2-tetrachloroethane	17.50	83	687750	10.700	ppbV	100
88)	1,2,3-trichloropropane	17.62	75	525952	10.087	ppbV	99
93)	2-chlorotoluene	18.42	126	337518	9.671	ppbV	92
95)	4-chlorotoluene	18.48	126	326541	9.887	ppbV	96
102)	1,3-dichlorobenzene	19.08	146	778432	11.540	ppbV	98
103)	1,4-dichlorobenzene	19.14	146	729798	10.975	ppbV	99
107)	1,2-dichlorobenzene	19.42	146	723253	11.141	ppbV	98
111)	1,2-dibromo-3-chloropr...	19.78	75	300495	10.810	ppbV	93
115)	1,2,4-trichlorobenzene	20.88	180	606194	11.701	ppbV	98
117)	1,2,3-trichlorobenzene	21.25	180	575719	11.064	ppbV	98
119)	hexachlorobutadiene	21.32	225	560767	11.032	ppbV	97

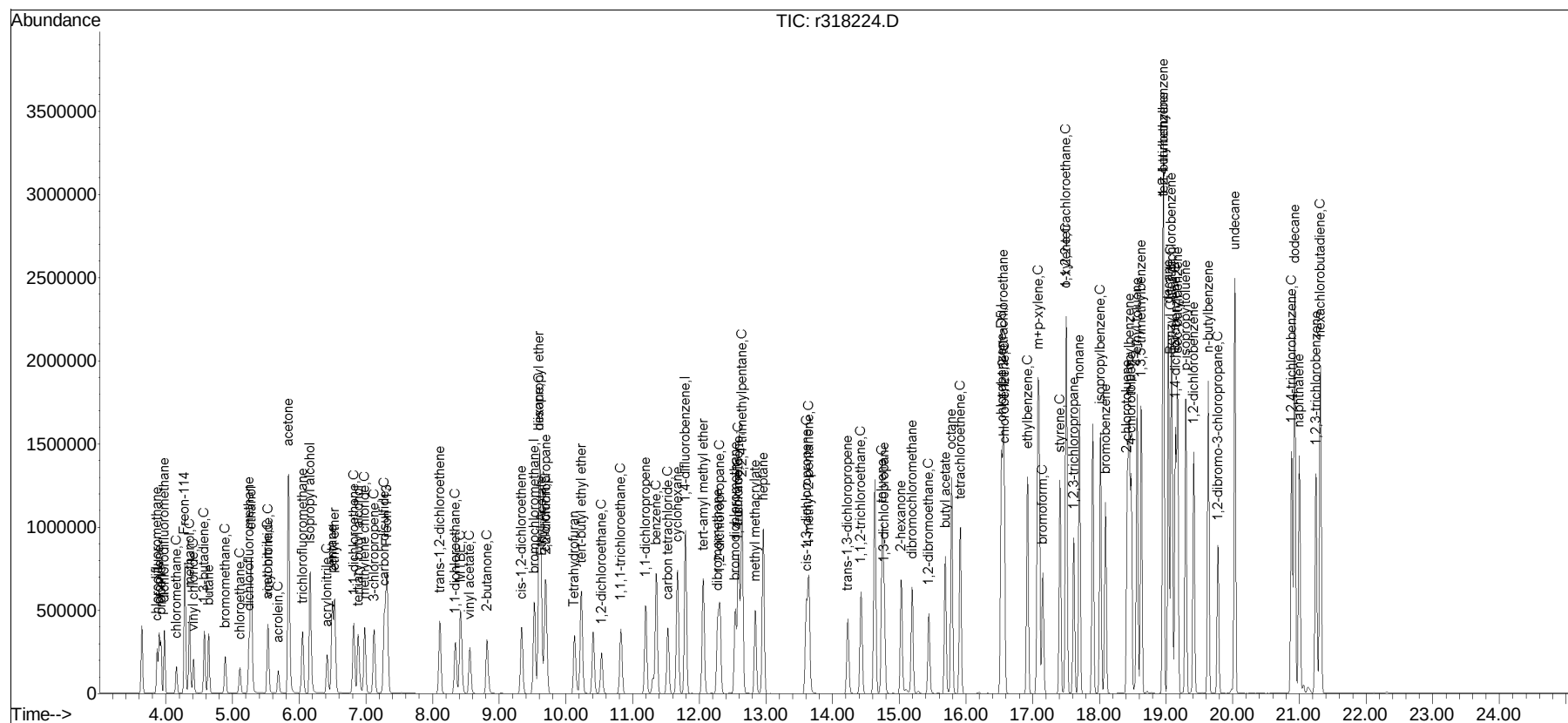
(#) = qualifier out of range (m) = manual integration (+) = signals summed

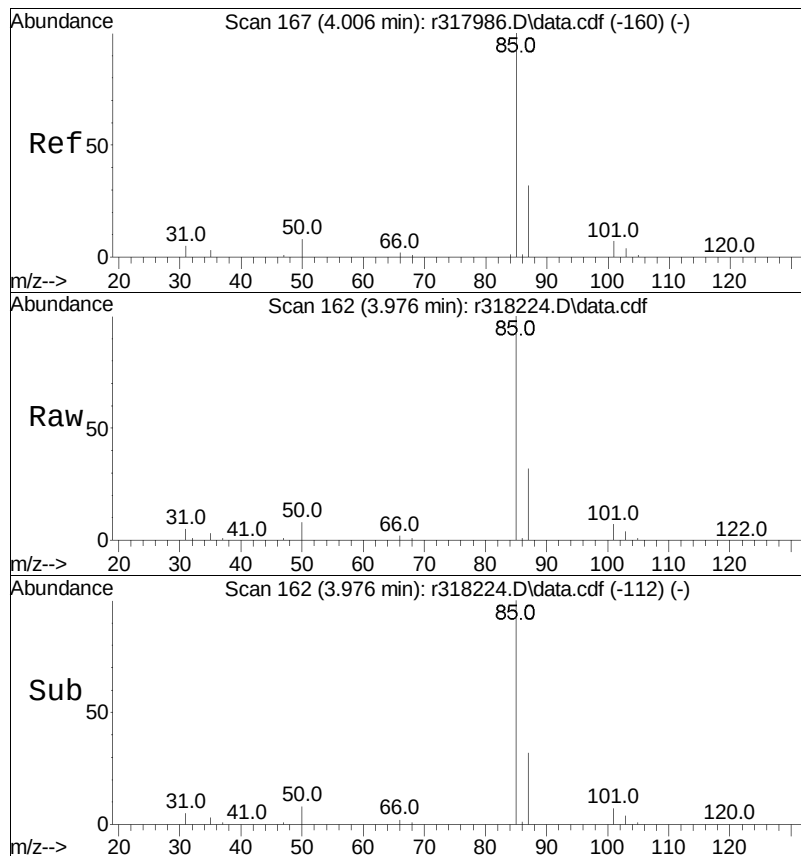
Quantitation Report (QT Reviewed)

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Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
Data File : r318224.D
Acq On    : 7 Oct 2021 12:28 PM
Operator  : AIRPIANO3:RY
Sample    : WG1555827-3,3,250,250
Misc      : WG1555827,ICAL18331
ALS Vial  : 0 Sample Multiplier: 1
```

Quant Time: Oct 07 13:03:30 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 10:25:07 2021
Response via : Initial Calibration

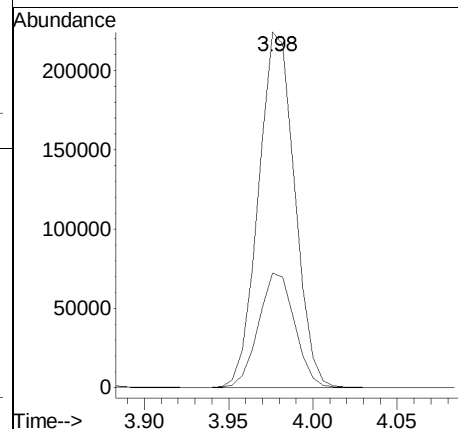
Sub List : Default-LCS-AP2 - All compounds listed07T\r318223.D

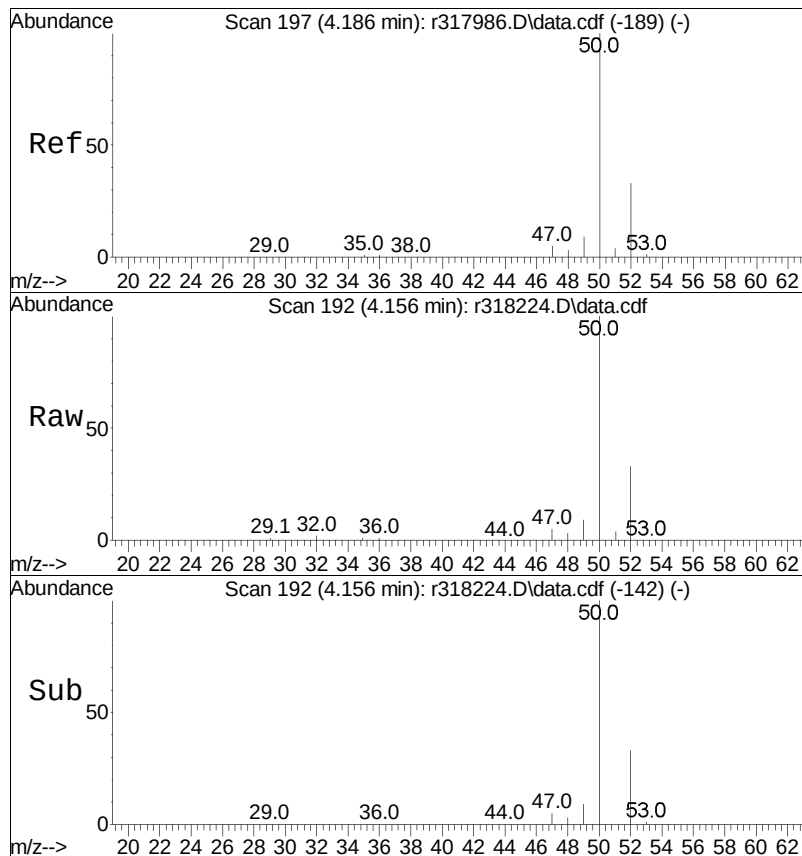




#5
 dichlorodifluoromethane
 Concen: 8.90 ppbV
 RT: 3.98 min Scan# 162
 Delta R.T. -0.030 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

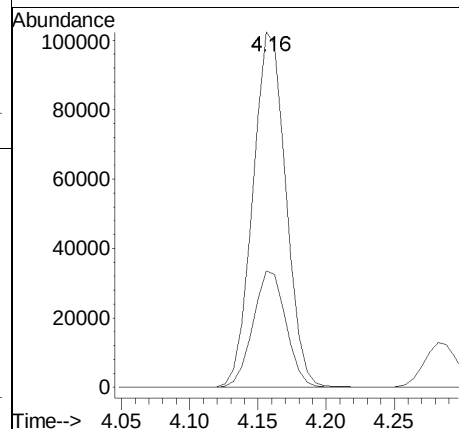
Tgt Ion	Ratio	Lower	Upper
85	100		
87	32.2	25.8	38.8

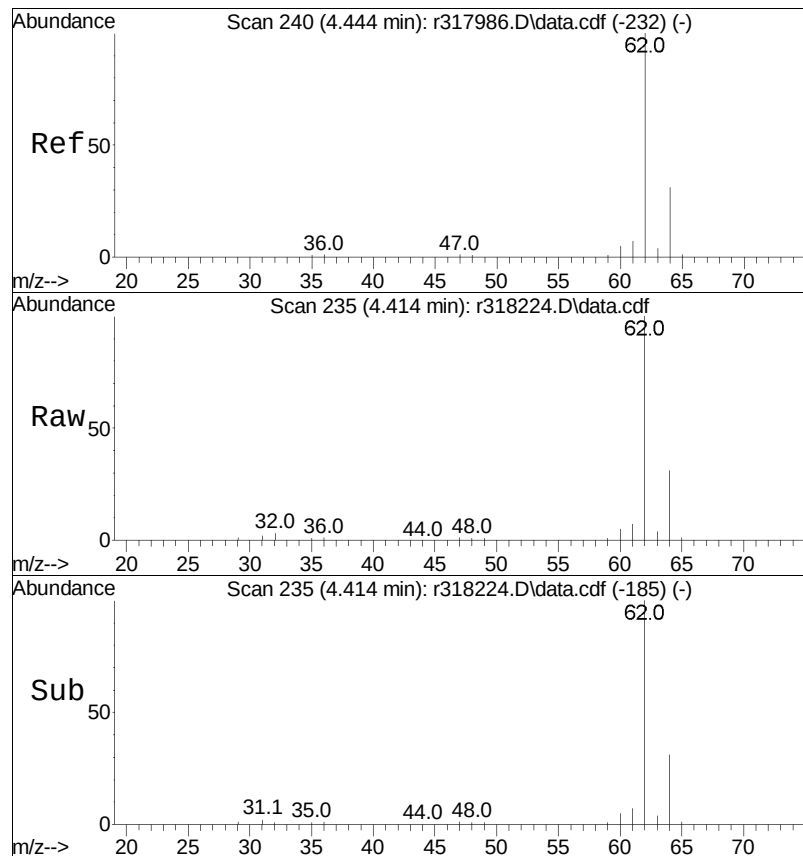




#6
 chloromethane
 Concen: 9.50 ppbV
 RT: 4.16 min Scan# 192
 Delta R.T. -0.030 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

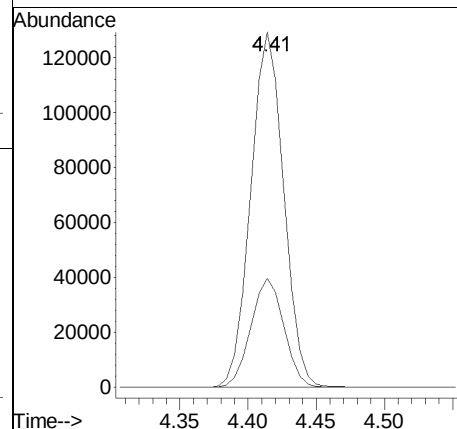
Tgt Ion:	50	Resp:	172378
Ion Ratio	Lower	Upper	
50	100		
52	32.8	26.7	40.1

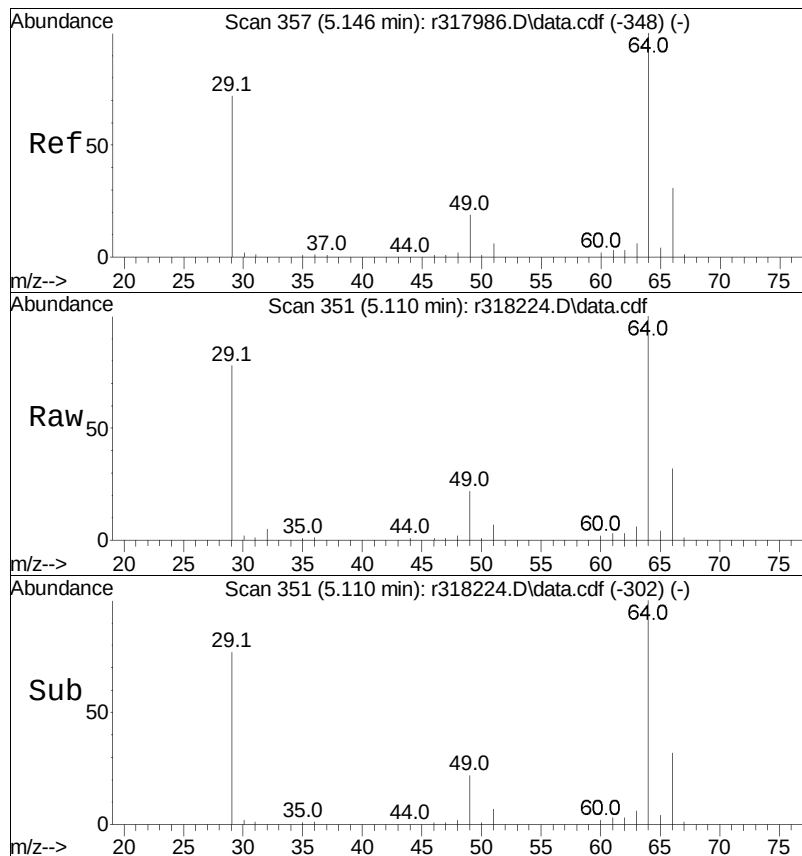




#9
 vinyl chloride
 Concen: 8.86 ppbV
 RT: 4.41 min Scan# 235
 Delta R.T. -0.030 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

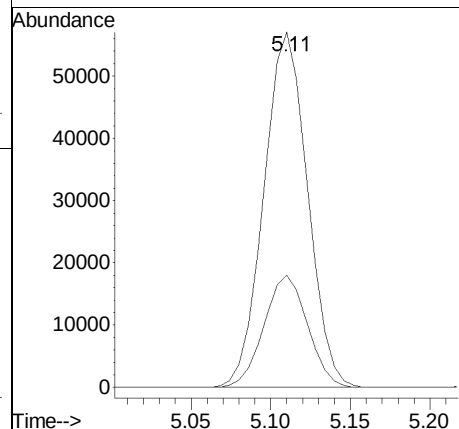
Tgt Ion	Ratio	Lower	Upper
62	100		
64	30.7	25.1	37.7

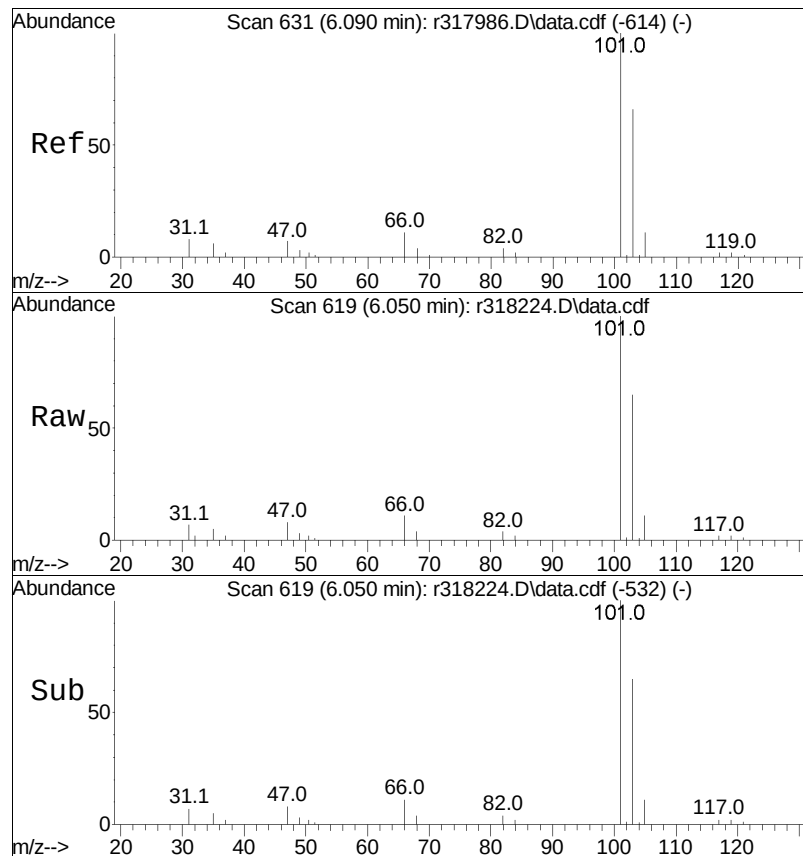




#14
 chloroethane
 Concen: 8.22 ppbV
 RT: 5.11 min Scan# 351
 Delta R.T. -0.036 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

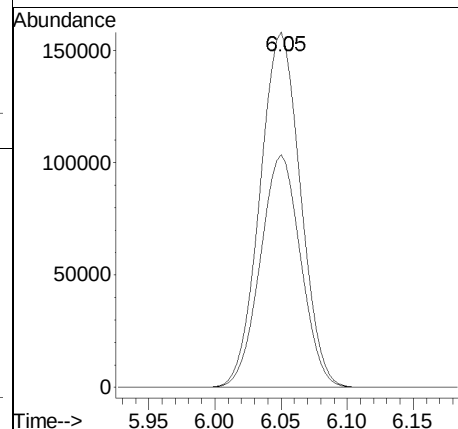
Tgt	Ion	Ratio	Lower	Upper
64	100			
66	31.6	24.7	37.1	

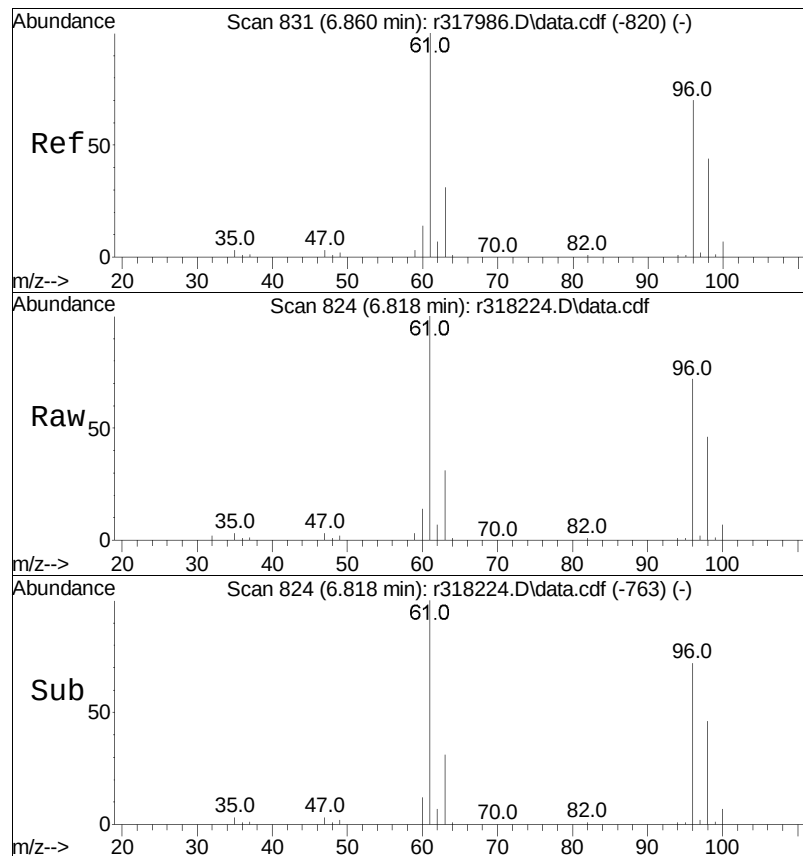




#21
 trichlorofluoromethane
 Concen: 8.99 ppbV
 RT: 6.05 min Scan# 619
 Delta R.T. -0.040 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

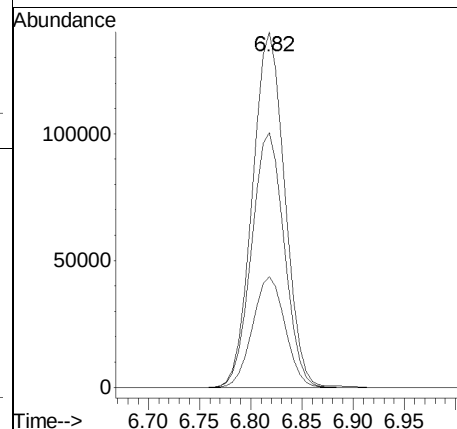
Tgt	Ion	Ratio	Lower	Upper
101	101	100		
103	65.5	52.4	78.6	

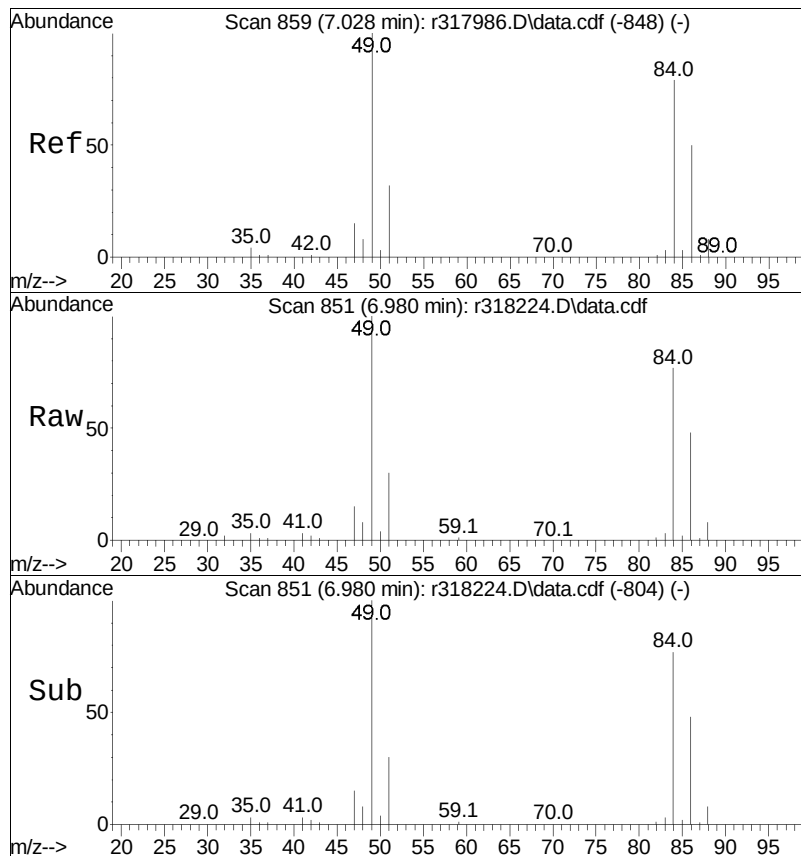




#26
 1,1-dichloroethene
 Concen: 8.80 ppbV
 RT: 6.82 min Scan# 824
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

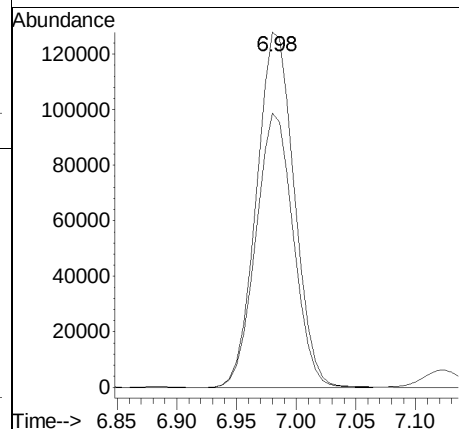
Tgt	Ion: 61	Resp:	307961
Ion	Ratio	Lower	Upper
61	100		
96	71.7	56.1	84.1
63	31.2	24.7	37.1

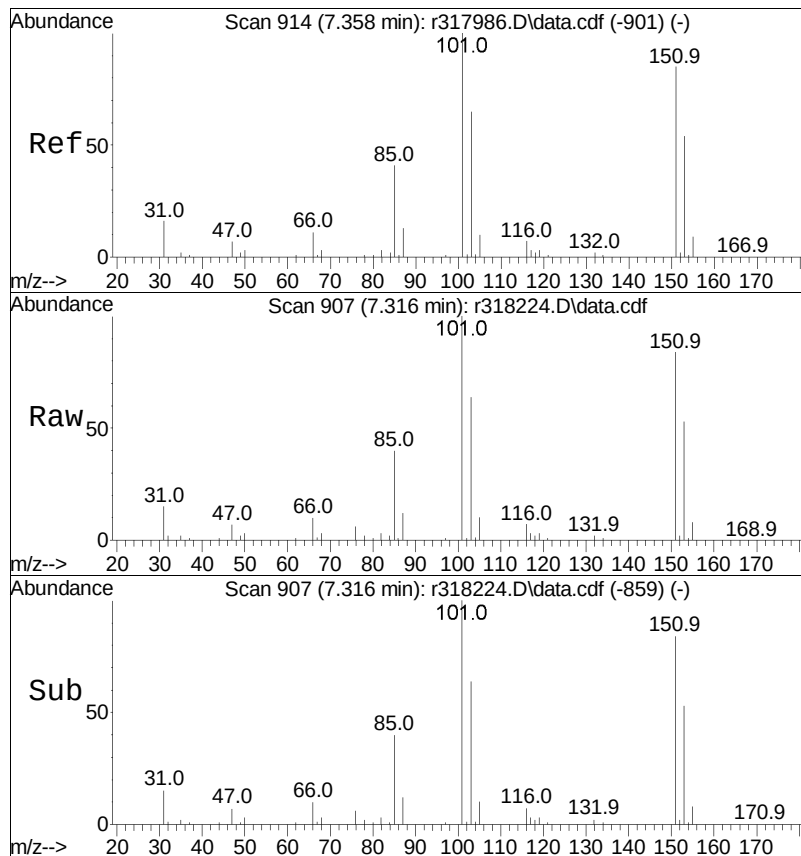




#28
 methylene chloride
 Concen: 9.75 ppbV
 RT: 6.98 min Scan# 851
 Delta R.T. -0.048 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

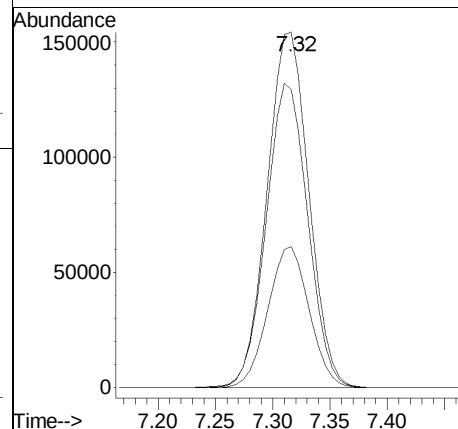
Tgt Ion:	49	84	Ratio	100	77.2	Resp:	281362	Lower	63.5	Upper	95.3
Ion	49	84	Ratio	100	77.2	Resp:	281362	Lower	63.5	Upper	95.3

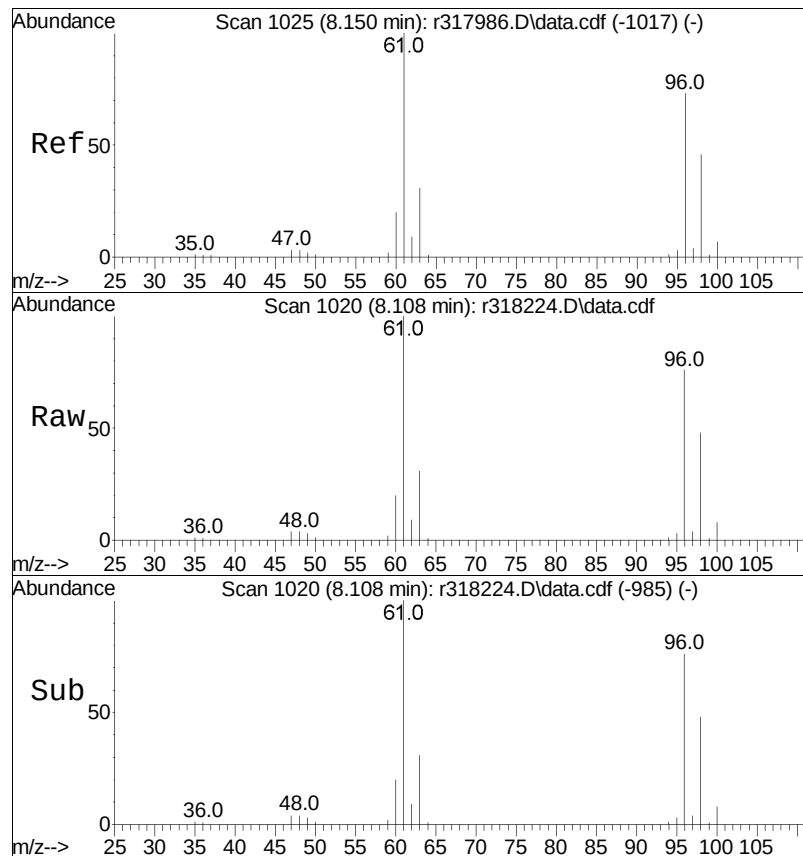




#31
 Freon 113
 Concen: 9.35 ppbV
 RT: 7.32 min Scan# 907
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

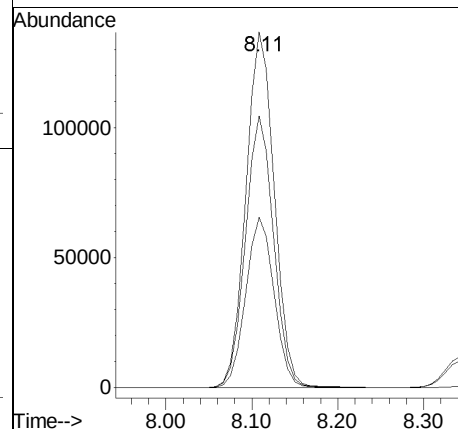
Tgt Ion:	101	Resp:	390821
Ion Ratio	Lower	Upper	
101	100		
85	39.6	33.0	49.6
151	83.9	67.8	101.8

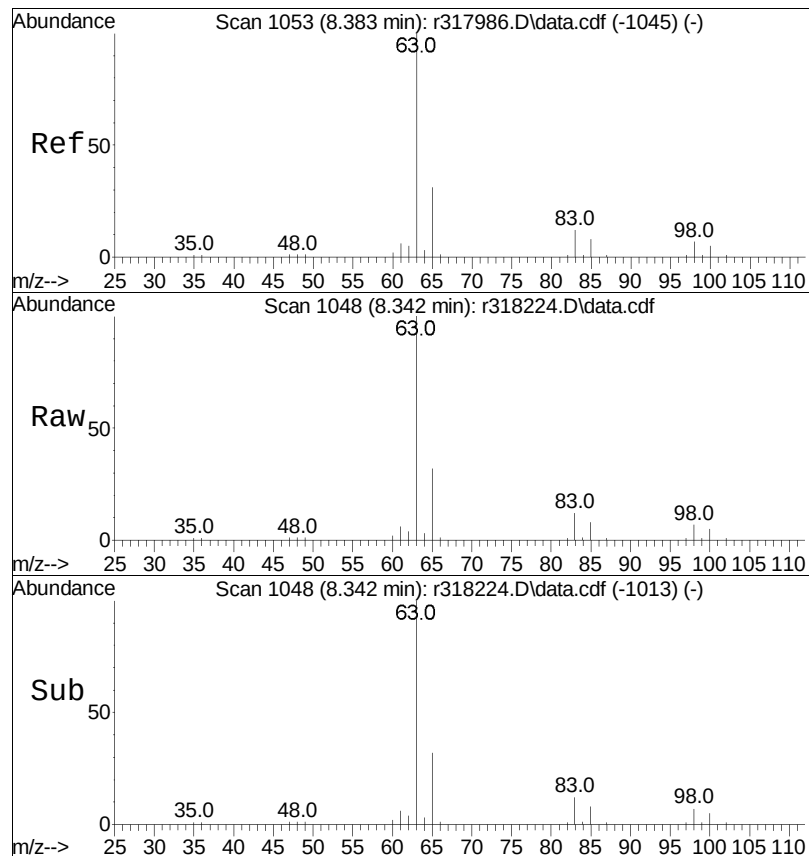




#32
 trans-1,2-dichloroethene
 Concen: 8.40 ppbV
 RT: 8.11 min Scan# 1020
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

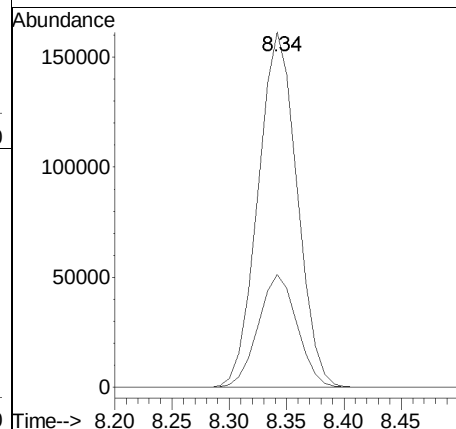
Tgt Ion:	61	Resp:	313781
Ion Ratio	Lower	Upper	
61	100		
96	76.4	58.7	88.1
98	47.9	36.9	55.3

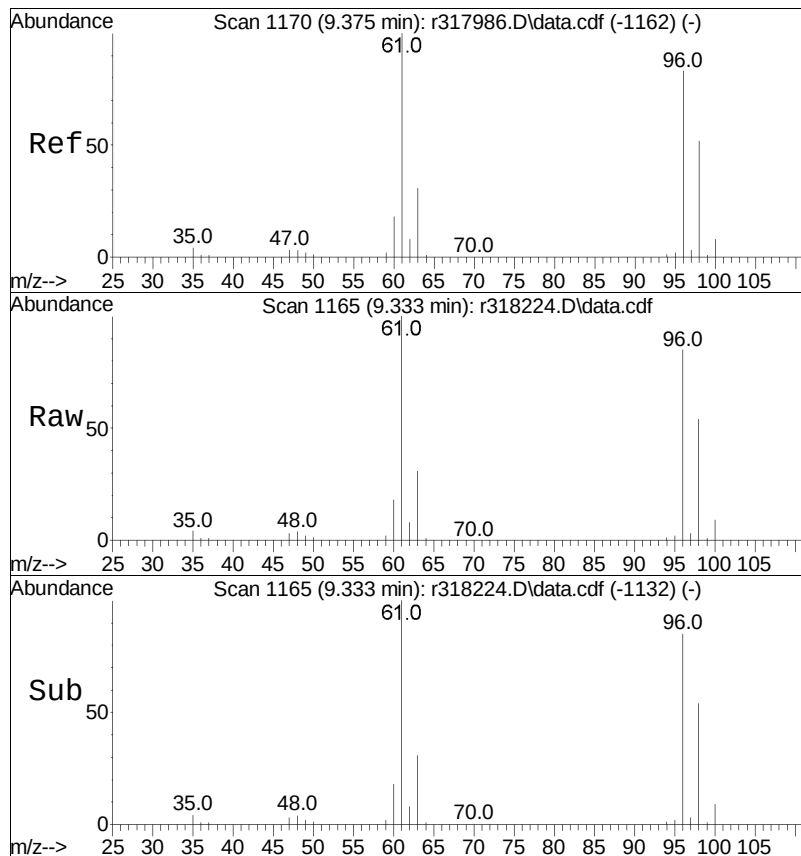




#33
 1,1-dichloroethane
 Concen: 8.72 ppbV
 RT: 8.34 min Scan# 1048
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

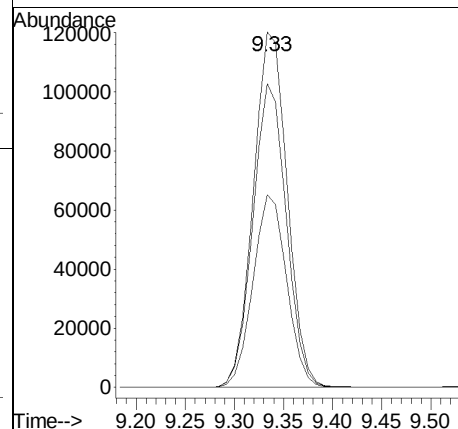
Tgt	Ion	Resp	382335
Ion	Ratio	Lower	Upper
63	100		
65	31.8	25.0	37.4

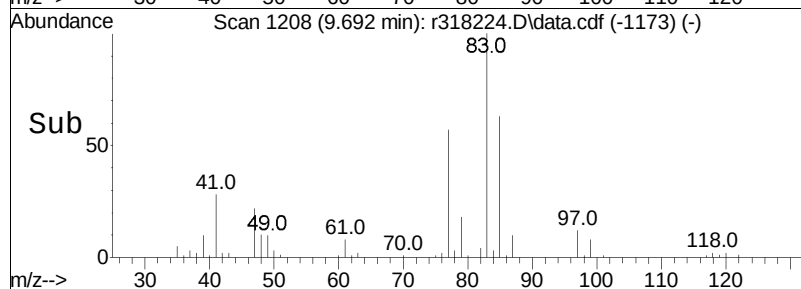
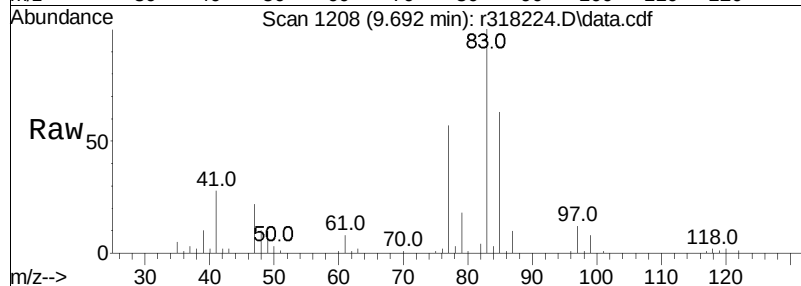
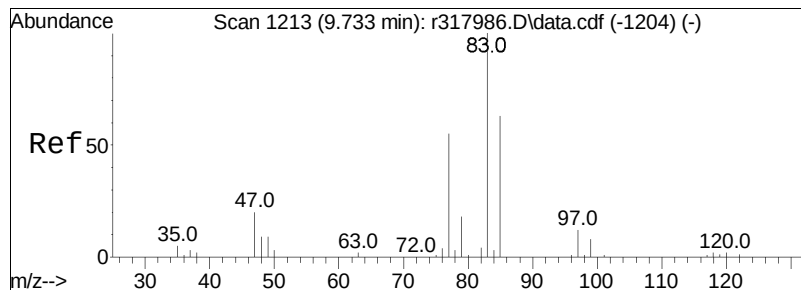




#37
 cis-1,2-dichloroethene
 Concen: 8.85 ppbV
 RT: 9.33 min Scan# 1165
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

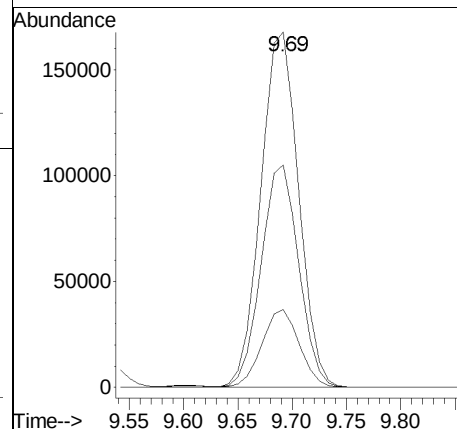
Tgt Ion:	61	Resp:	289309
Ion Ratio	Lower	Upper	
61	100		
96	85.5	66.0	99.0
98	54.3	41.3	61.9

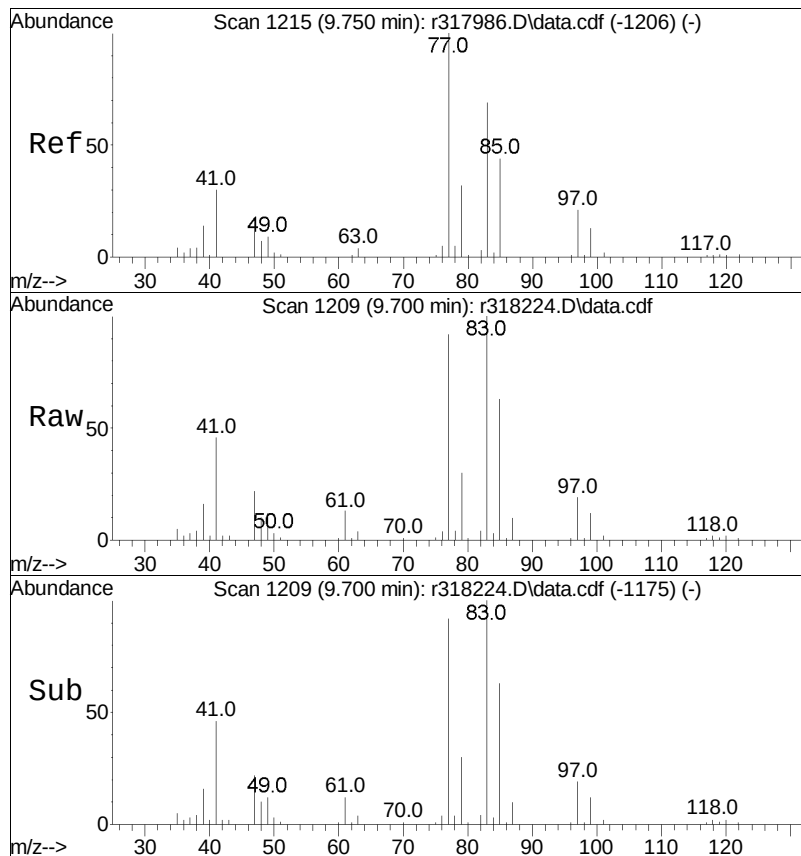




#39
chloroform
Concen: 9.27 ppbV
RT: 9.69 min Scan# 1208
Delta R.T. -0.042 min
Lab File: r318224.D
Acq: 7 Oct 2021 12:28 PM

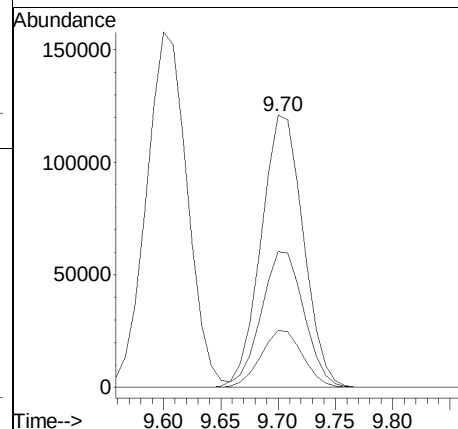
Tgt	Ion: 83	Resp: 406247
Ion	Ratio	Lower Upper
83	100	
85	62.6	51.1 76.7
47	21.9	16.3 24.5

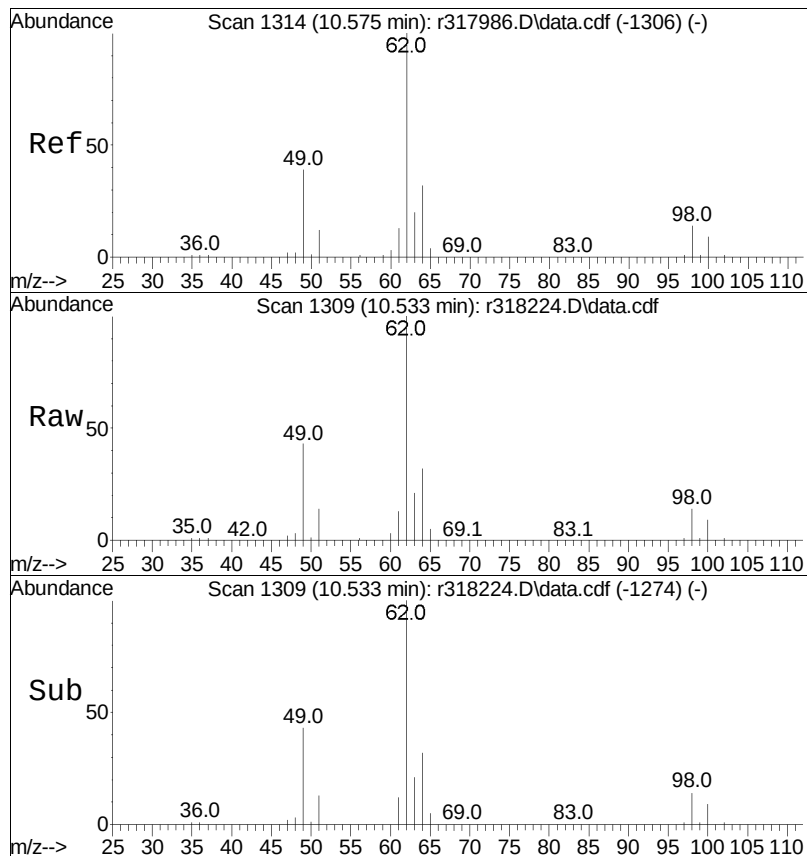




#41
 2,2-dichloropropane
 Concen: 9.78 ppbV
 RT: 9.70 min Scan# 1209
 Delta R.T. -0.050 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

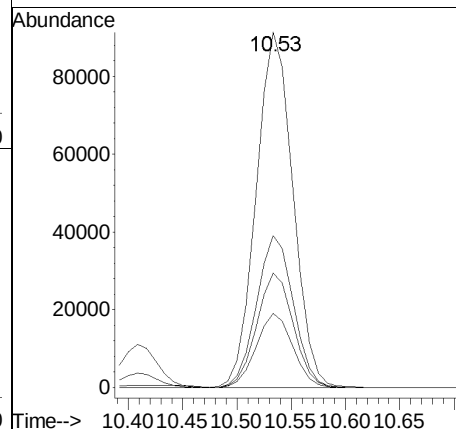
Tgt Ion:	77	Resp:	310028
Ion Ratio	Lower	Upper	
77	100		
41	49.9	42.0	63.0
97	21.0	17.0	25.4

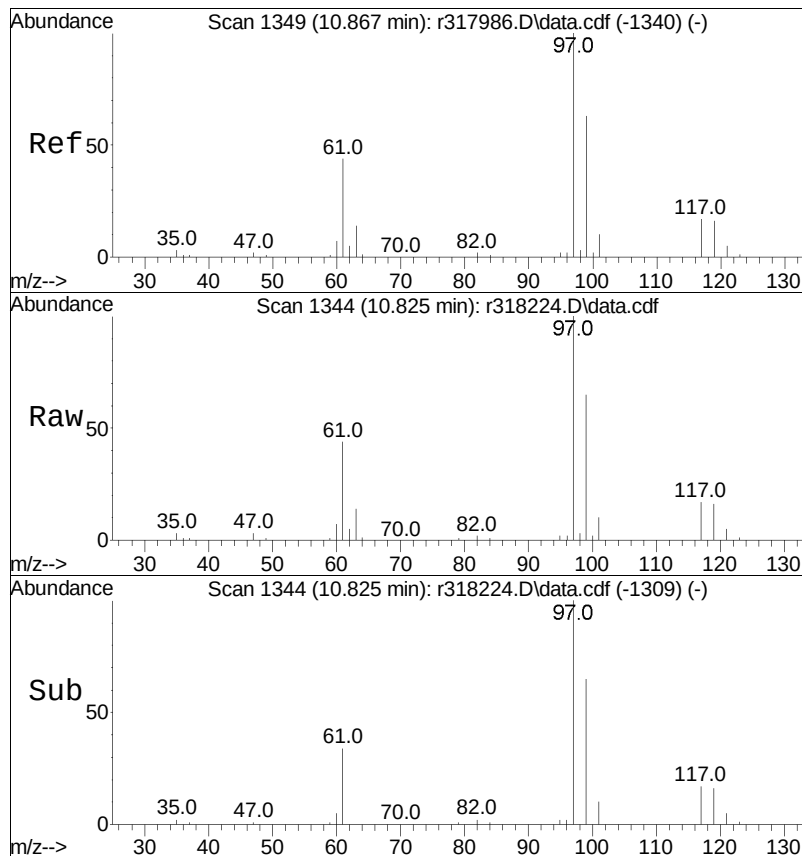




#42
 1,2-dichloroethane
 Concen: 8.56 ppbV
 RT: 10.53 min Scan# 1309
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

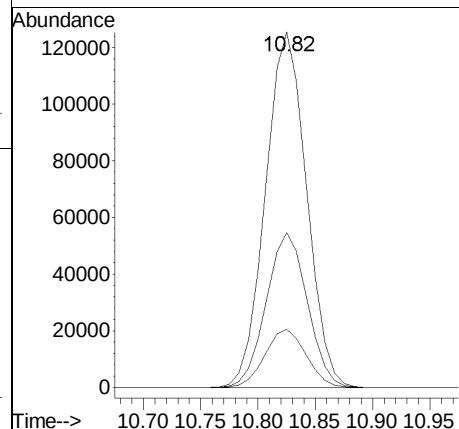
Tgt Ion:	62	Resp:	214386
Ion Ratio	Lower	Upper	
62	100		
64	32.2	25.4	38.2
49	42.7	31.3	46.9
63	20.8	16.2	24.2

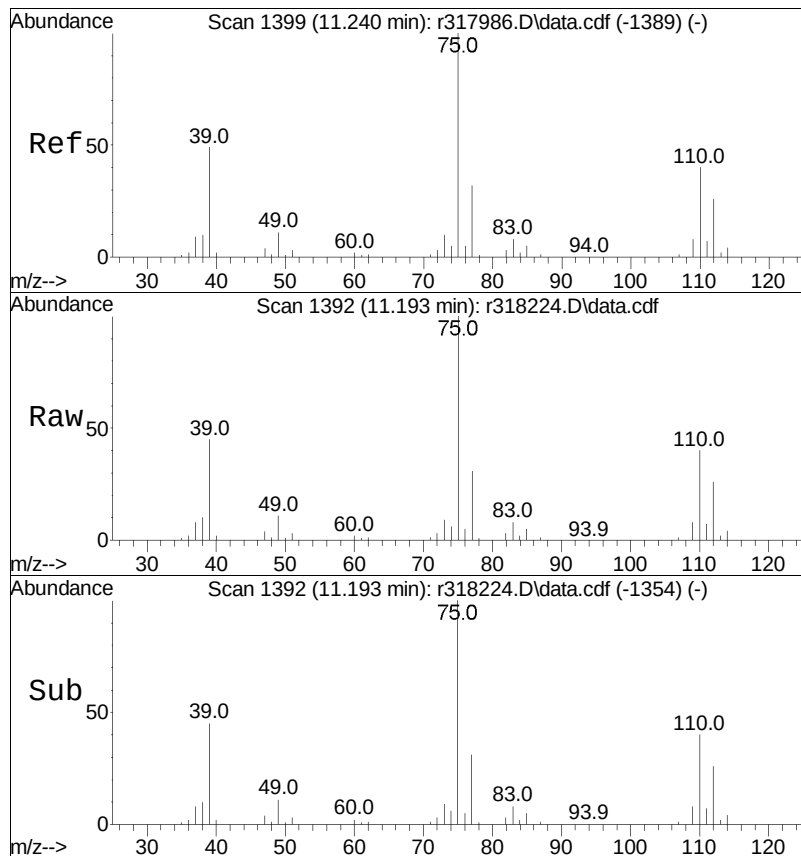




#48
 1,1,1-trichloroethane
 Concen: 9.60 ppbV
 RT: 10.82 min Scan# 1344
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

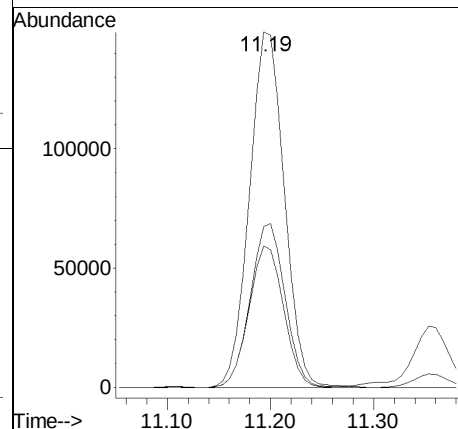
Tgt Ion:	97	Resp:	312013
Ion Ratio	100	Lower	Upper
97	100		
61	43.5	35.5	53.3
119	16.4	13.0	19.6

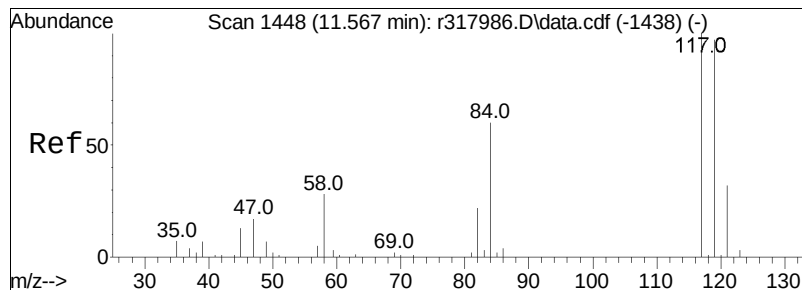




#49
 1,1-dichloropropene
 Concen: 9.73 ppbV
 RT: 11.19 min Scan# 1392
 Delta R.T. -0.047 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

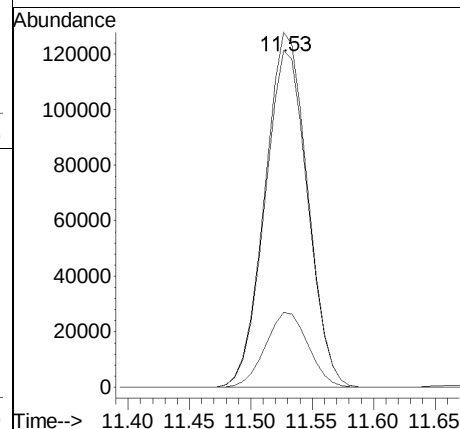
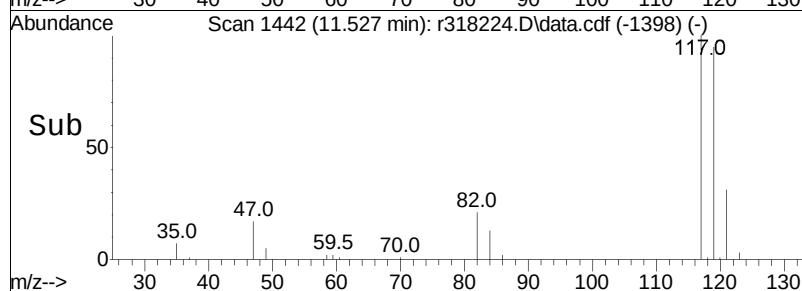
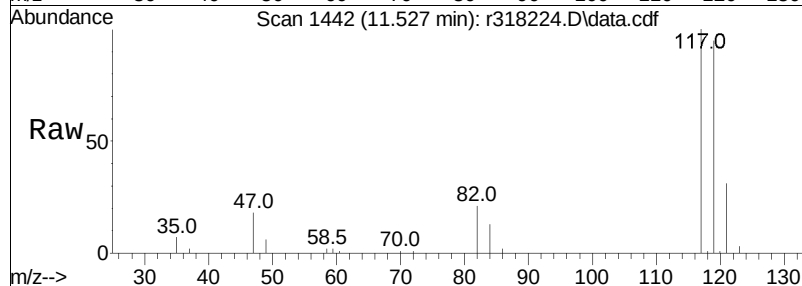
Tgt Ion	Ratio	Resp	Lower	Upper
75	100	349689		
110	39.8		32.0	48.0
39	45.3		39.0	58.6

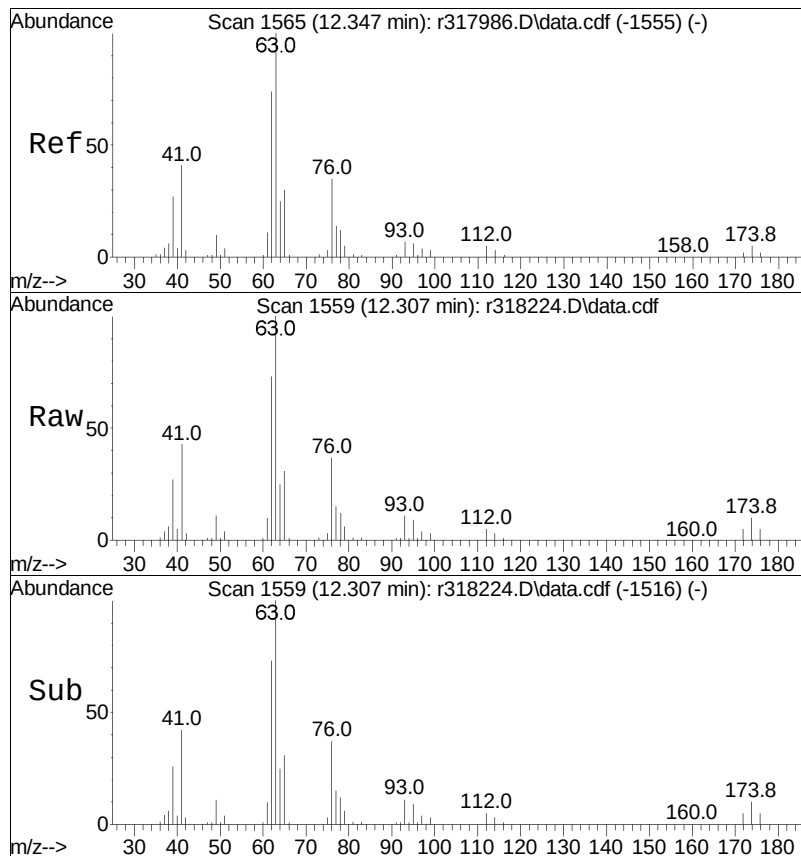




#52
carbon tetrachloride
Concen: 10.16 ppbV
RT: 11.53 min Scan# 1442
Delta R.T. -0.040 min
Lab File: r318224.D
Acq: 7 Oct 2021 12:28 PM

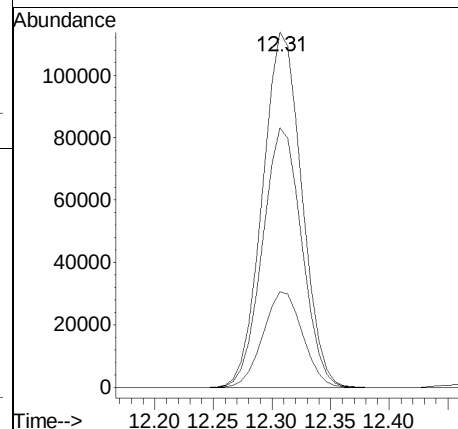
Tgt Ion	Ratio	Lower	Upper
117	100		
119	94.9	77.9	116.9
82	21.1	18.0	27.0

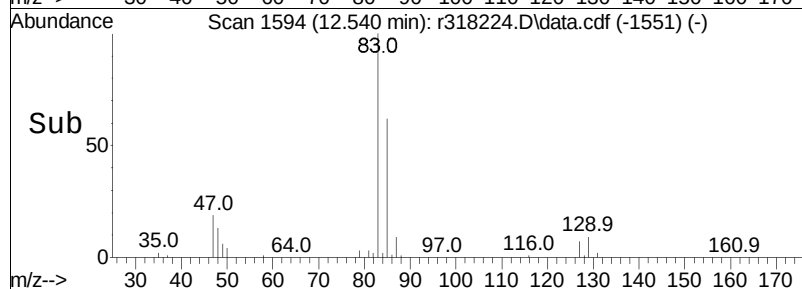
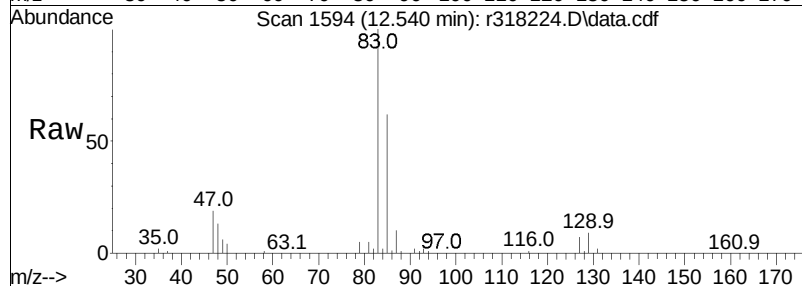
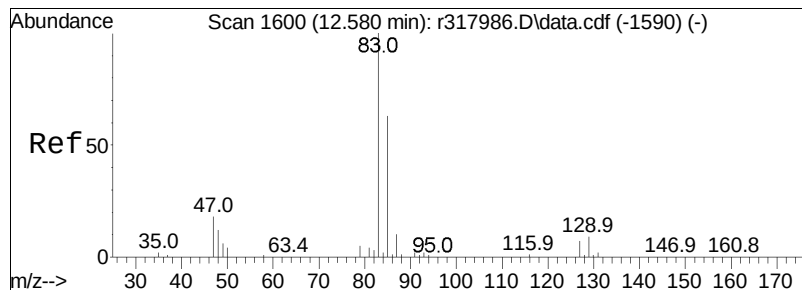




#56
 1,2-dichloropropane
 Concen: 9.33 ppbV
 RT: 12.31 min Scan# 1559
 Delta R.T. -0.040 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

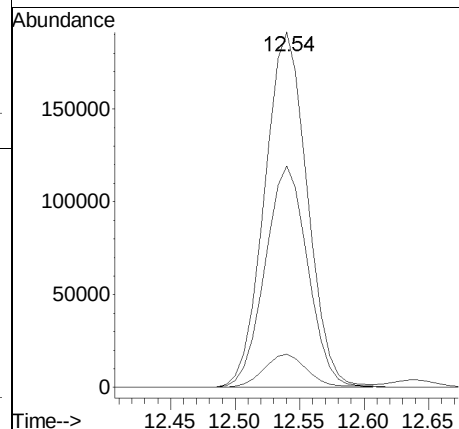
Tgt Ion	Ratio	Lower	Upper
63	100		
62	73.1	59.1	88.7
39	26.9	21.4	32.0

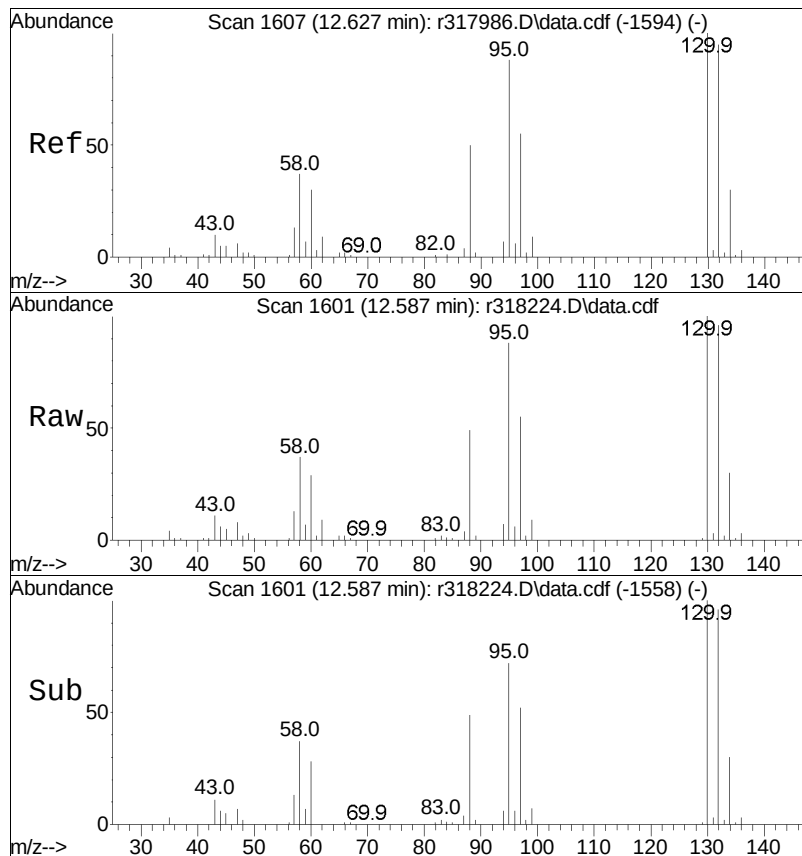




#57
bromodichloromethane
Concen: 9.64 ppbV
RT: 12.54 min Scan# 1594
Delta R.T. -0.040 min
Lab File: r318224.D
Acq: 7 Oct 2021 12:28 PM

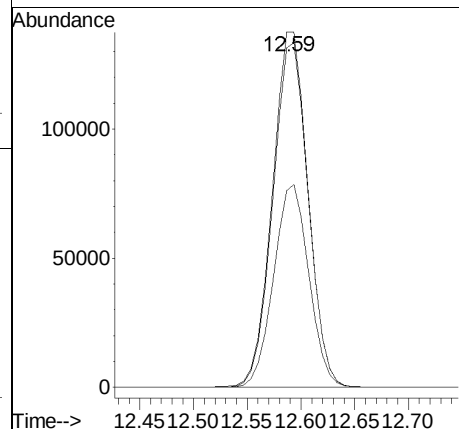
Tgt	Ion	Resp	Lower	Upper
83	100			
85	62.4		50.6	75.8
129	9.3		7.6	11.4

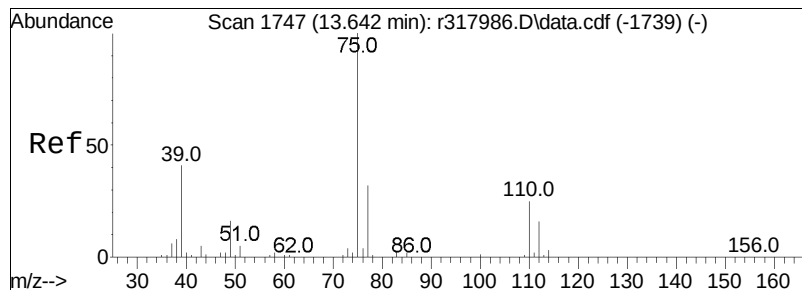




#59
trichloroethene
Concen: 9.52 ppbV
RT: 12.59 min Scan# 1601
Delta R.T. -0.040 min
Lab File: r318224.D
Acq: 7 Oct 2021 12:28 PM

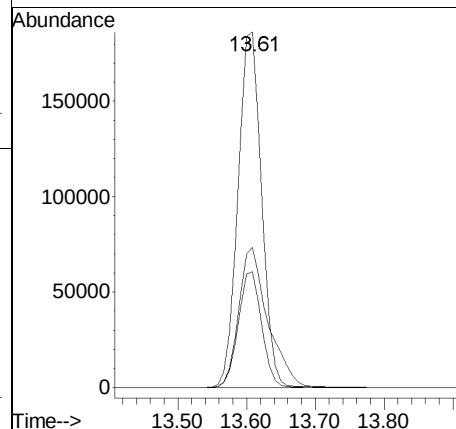
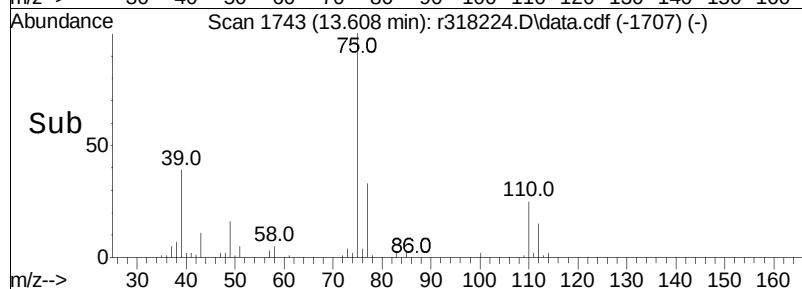
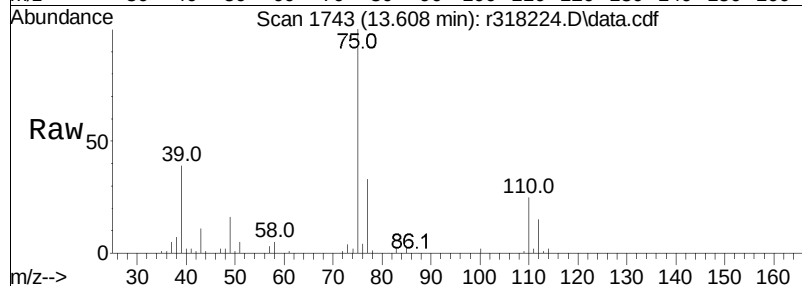
Tgt	Ion	Ratio	Resp	Lower	Upper
130	100		317954		
132	95.6	76.2	114.4		
97	55.4	44.4	66.6		

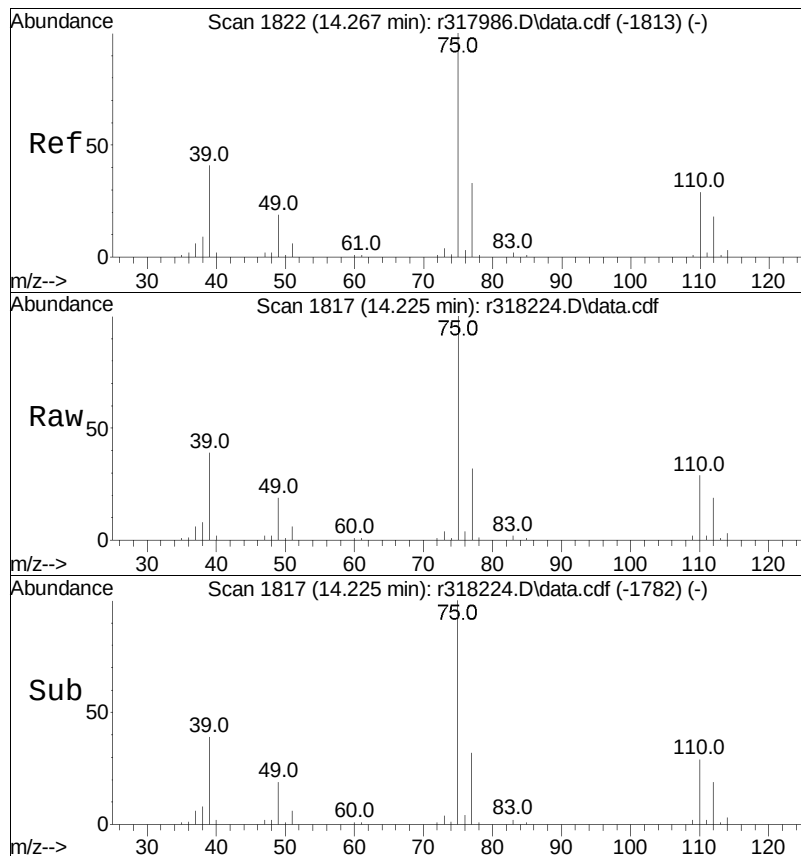




#63
 cis-1,3-dichloropropene
 Concen: 10.82 ppbV
 RT: 13.61 min Scan# 1743
 Delta R.T. -0.033 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

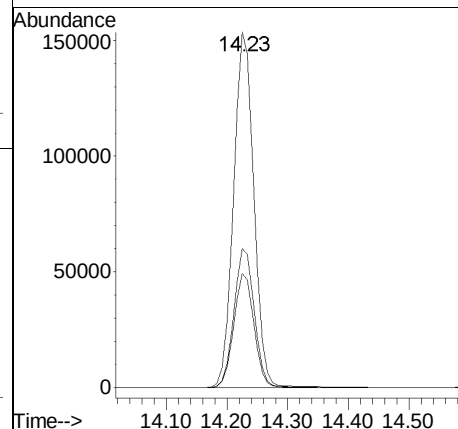
Tgt Ion:	75	Resp:	444393
Ion Ratio	Lower	Upper	
75	100		
39	39.4	32.6	48.8
77	32.5	25.9	38.9

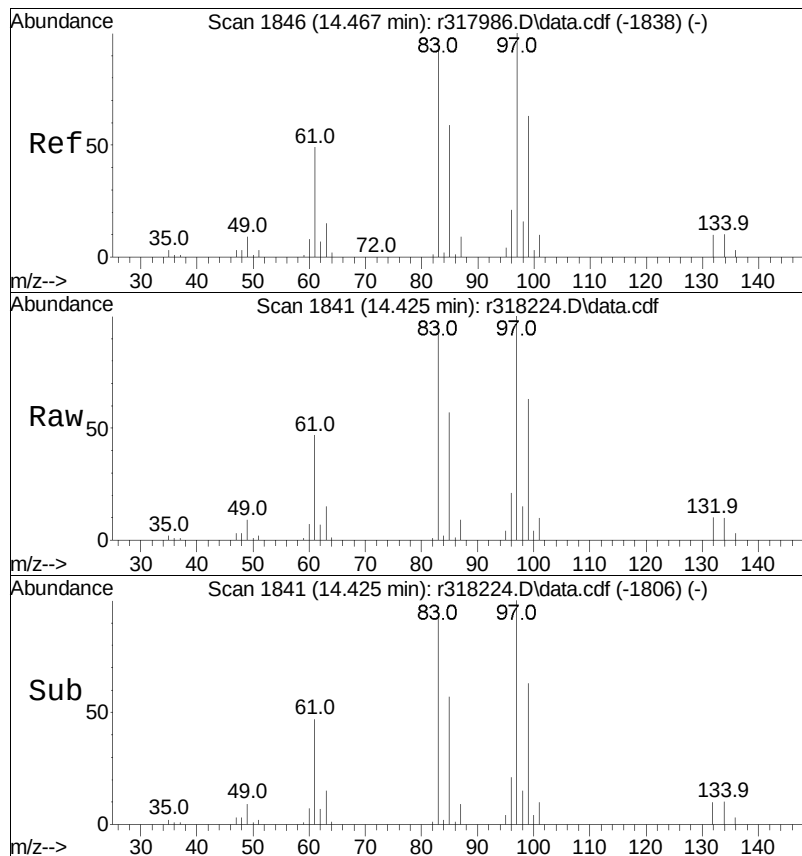




#65
 trans-1,3-dichloropropene
 Concen: 9.74 ppbV
 RT: 14.23 min Scan# 1817
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

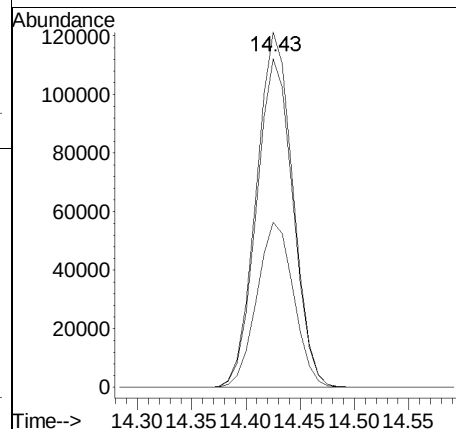
Tgt Ion:	75	Resp:	356175
Ion Ratio	Lower	Upper	
75	100		
77	32.1	26.2	39.2
39	39.1	33.0	49.6

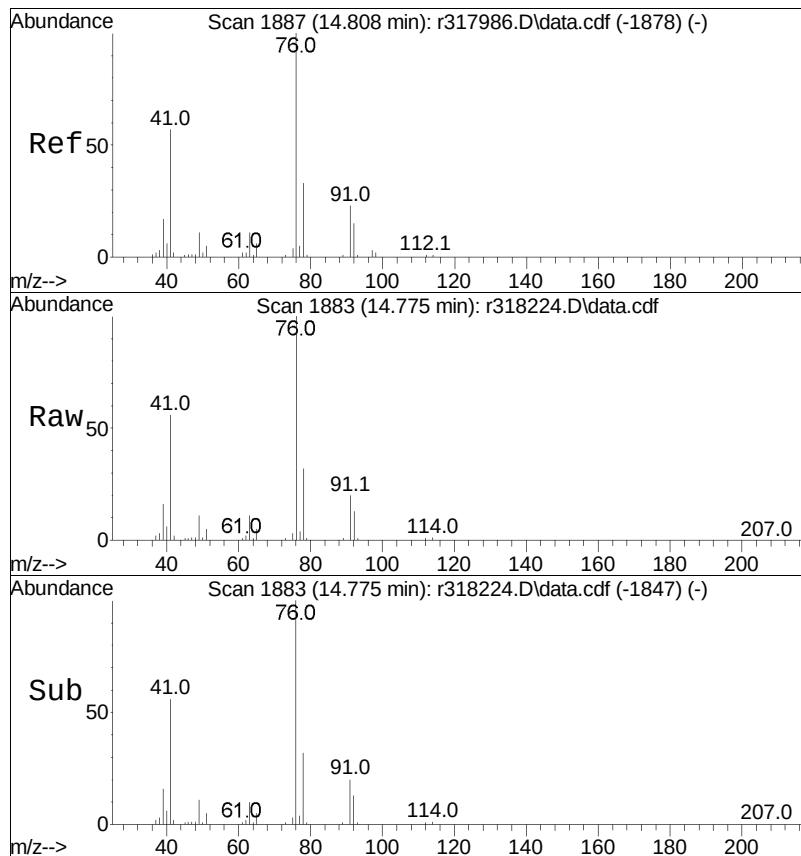




#66
 1,1,2-trichloroethane
 Concen: 9.77 ppbV
 RT: 14.43 min Scan# 1841
 Delta R.T. -0.042 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

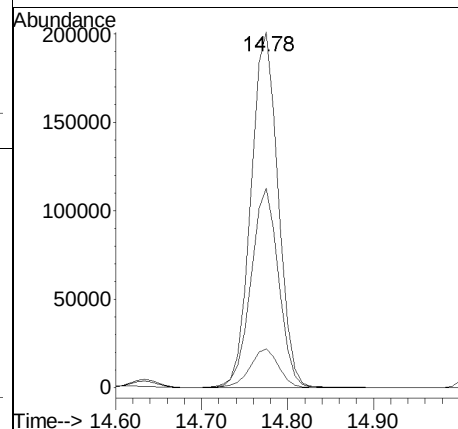
Tgt Ion:	97	Resp:	284438
Ion Ratio	100	Lower	Upper
97	100		
83	92.4	74.7	112.1
61	46.5	39.4	59.2

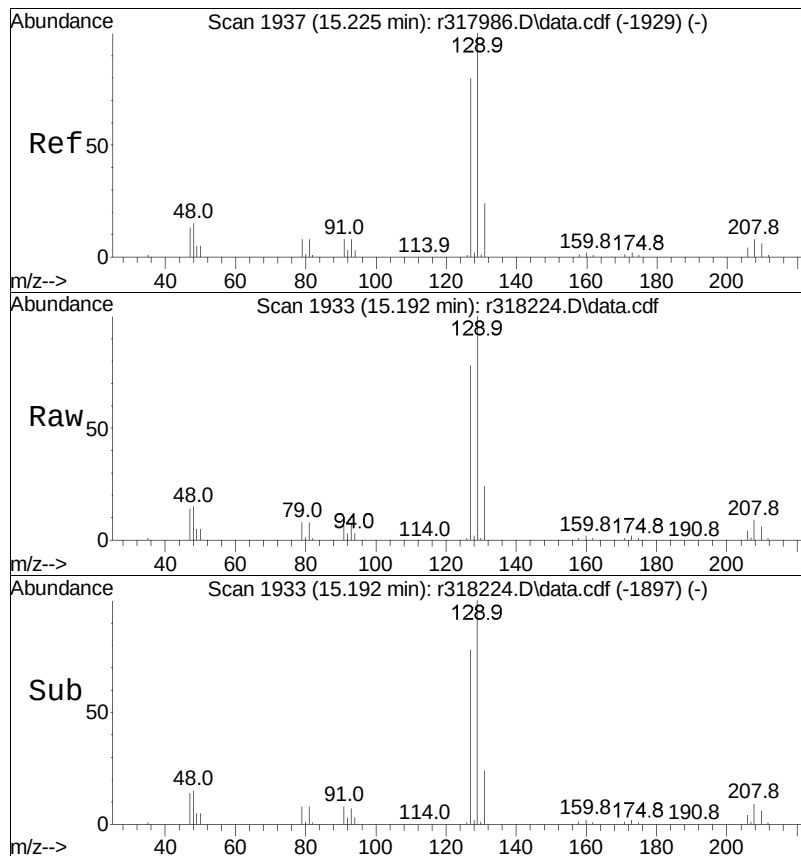




#71
 1,3-dichloropropane
 Concen: 9.91 ppbV
 RT: 14.78 min Scan# 1883
 Delta R.T. -0.033 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

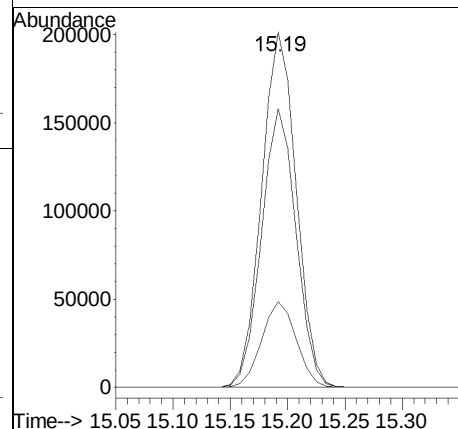
Tgt Ion:	76	Resp:	439500
Ion Ratio	Lower	Upper	
76	100		
41	56.1	45.4	68.0
49	10.9	8.9	13.3

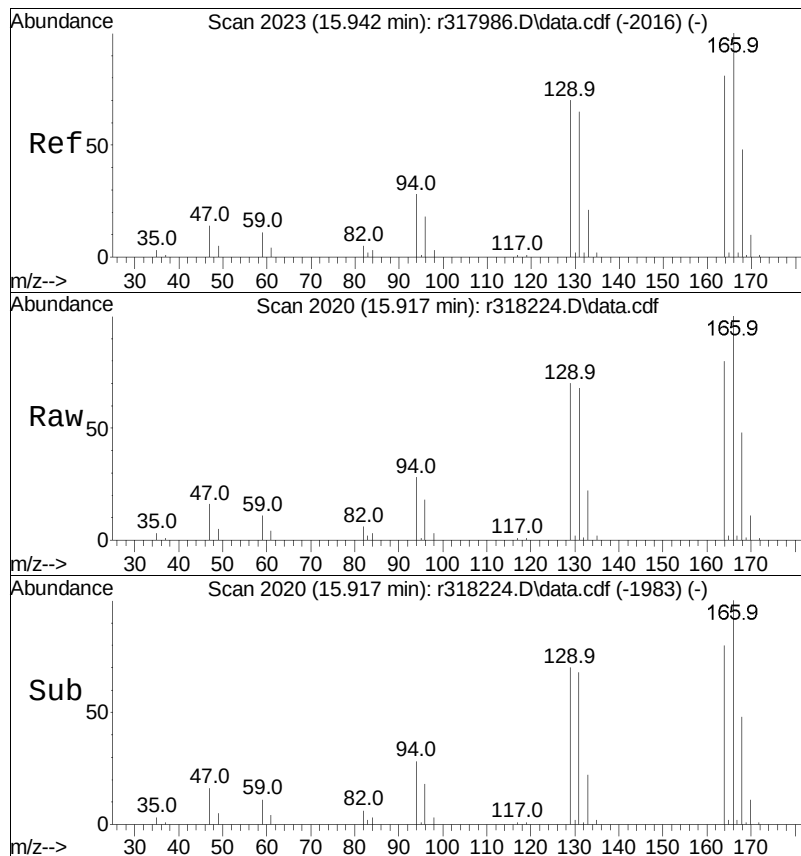




#74
 dibromochloromethane
 Concen: 10.97 ppbV
 RT: 15.19 min Scan# 1933
 Delta R.T. -0.033 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

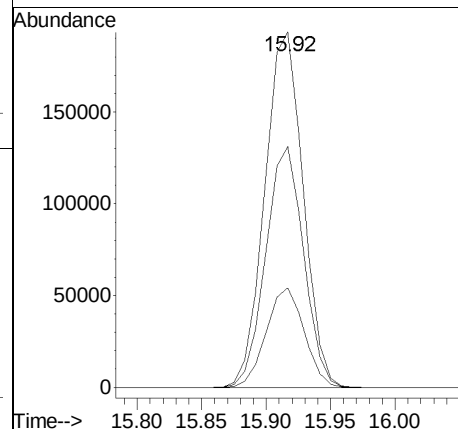
Tgt Ion	Ratio	Resp	Lower	Upper
129	100	423626		
127	78.5		64.0	96.0
131	24.2		19.2	28.8

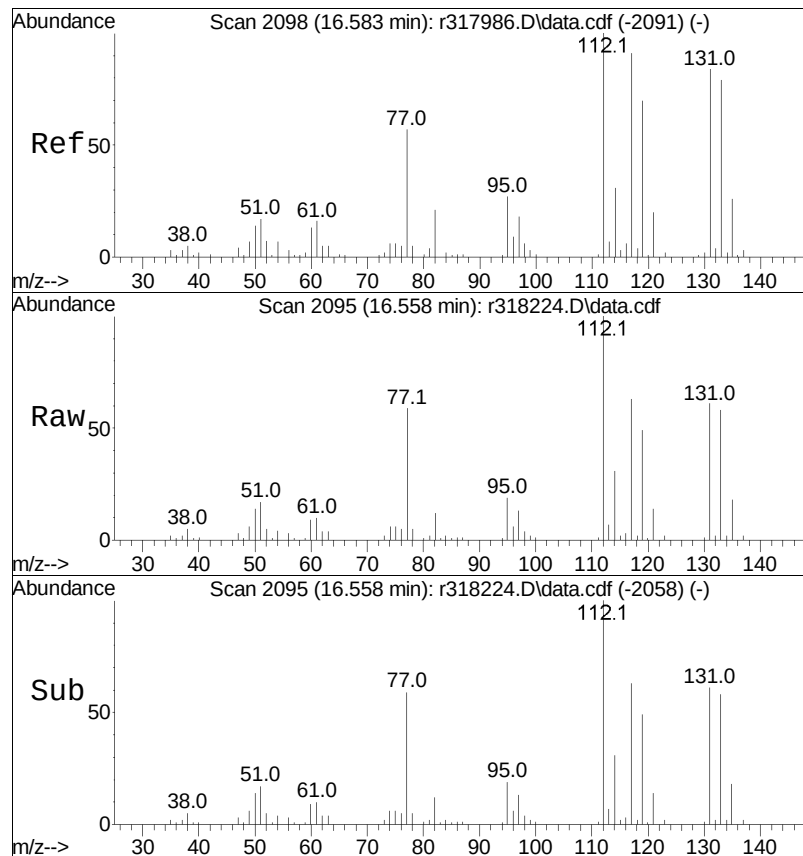




#78
 tetrachloroethene
 Concen: 10.18 ppbV
 RT: 15.92 min Scan# 2020
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

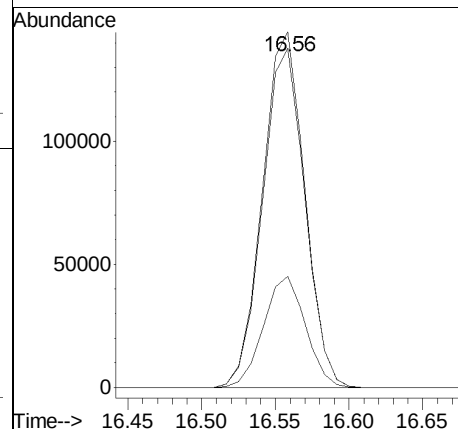
Tgt Ion	Ratio	Lower	Upper
166	100		
131	67.8	52.1	78.1
94	28.0	22.6	34.0

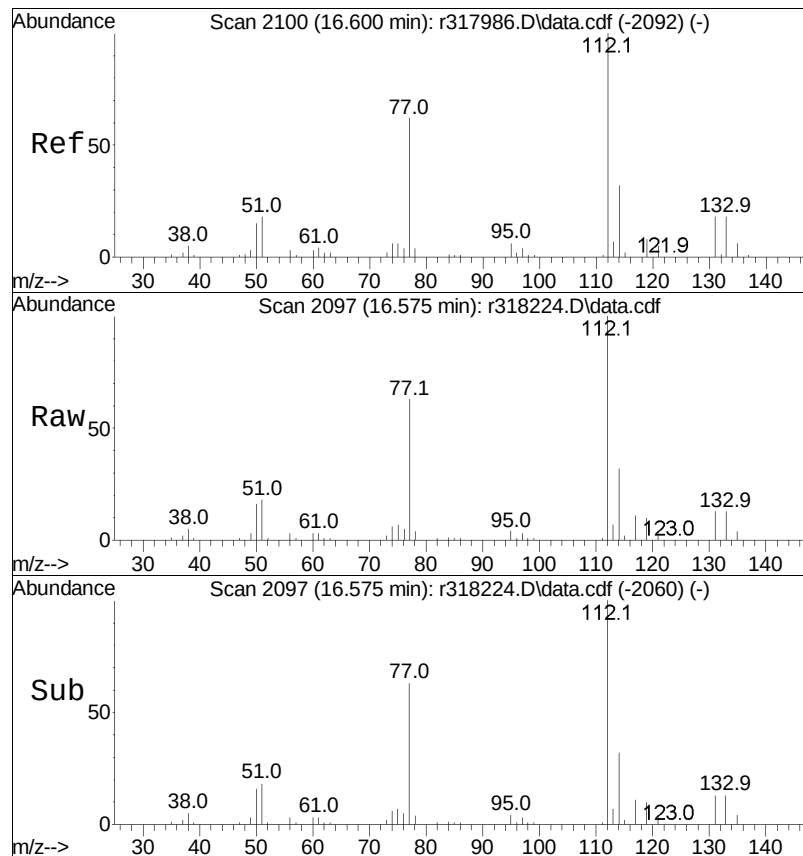




#79
 1,1,1,2-tetrachloroethane
 Concen: 10.26 ppbV
 RT: 16.56 min Scan# 2095
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

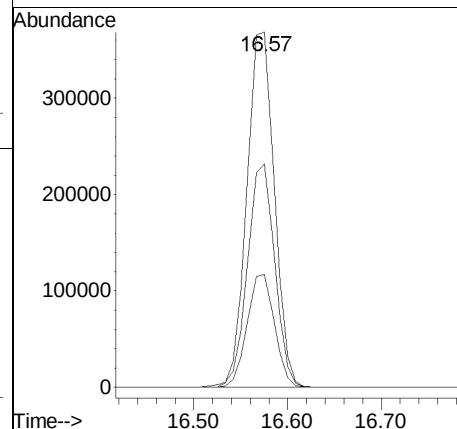
Tgt Ion:	131	Resp:	287058
Ion Ratio	Lower	Upper	
131	100		
133	95.4	75.4	113.0
95	31.3	25.3	37.9

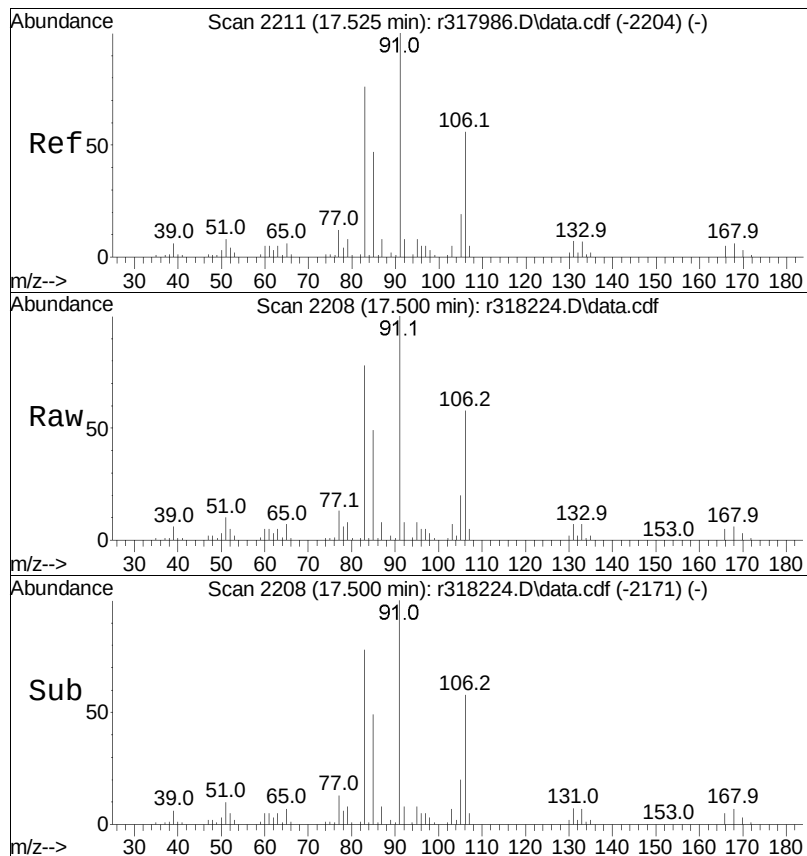




#80
chlorobenzene
Concen: 10.43 ppbV
RT: 16.57 min Scan# 2097
Delta R.T. -0.025 min
Lab File: r318224.D
Acq: 7 Oct 2021 12:28 PM

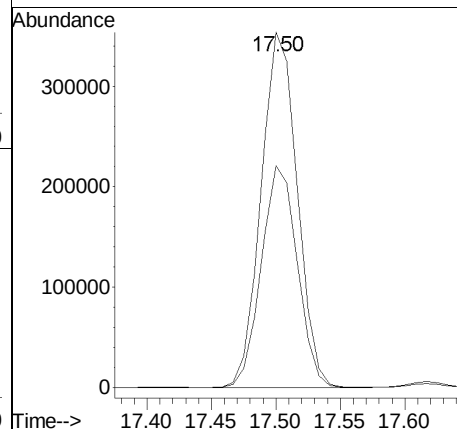
Tgt	Ion:112	Resp:	753391
Ion	Ratio	Lower	Upper
112	100		
114	31.8	25.6	38.4
77	62.9	49.5	74.3

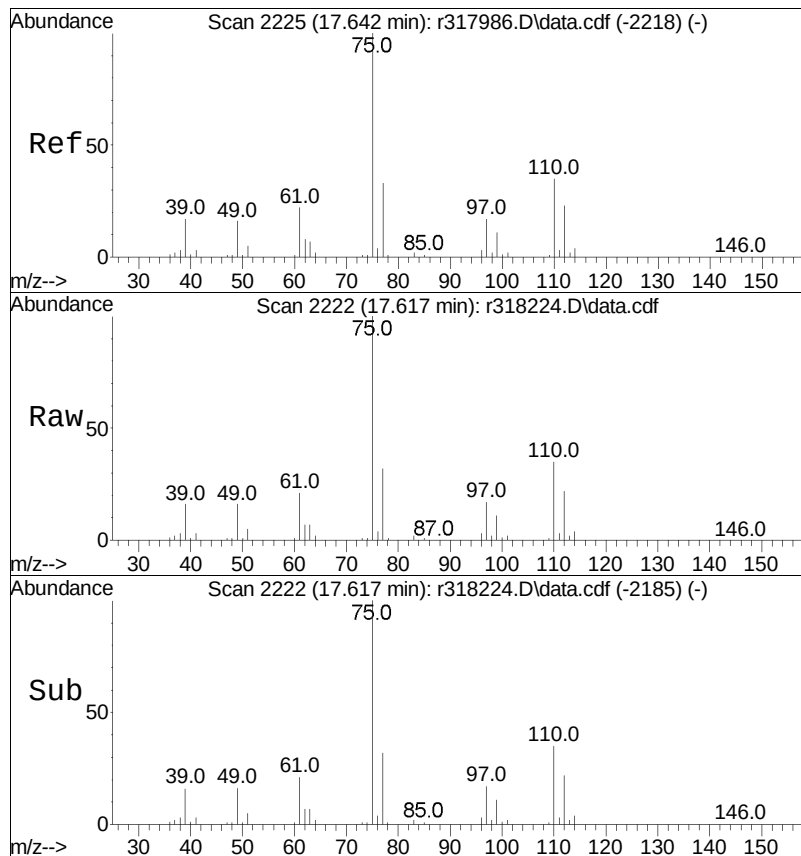




#86
 1,1,2,2-tetrachloroethane
 Concen: 10.70 ppbV
 RT: 17.50 min Scan# 2208
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

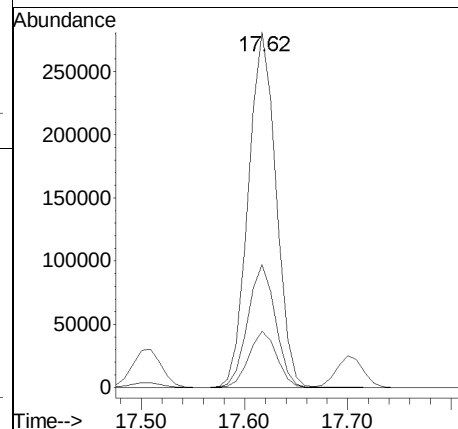
Tgt Ion:	83	Resp:	687750
Ion Ratio	Lower	Upper	
83	100		
85	62.4	49.8	74.8

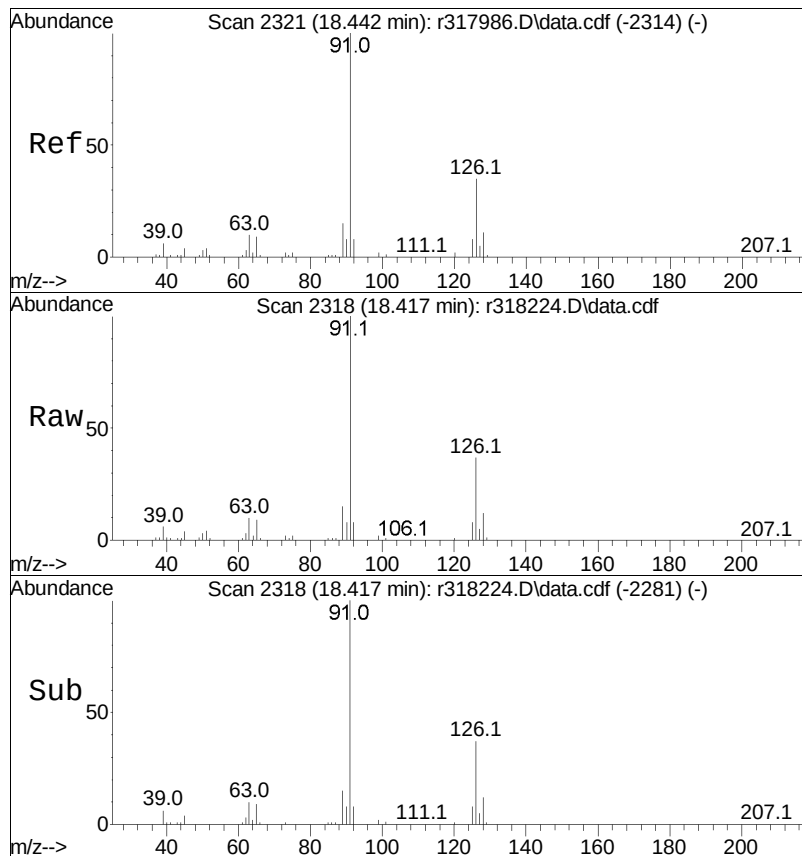




#88
 1,2,3-trichloropropane
 Concen: 10.09 ppbV
 RT: 17.62 min Scan# 2222
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

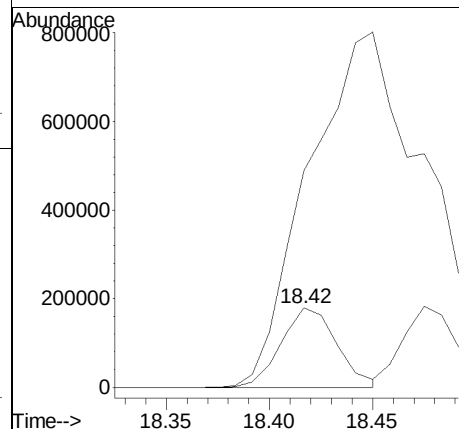
Tgt	Ion	Ratio	Resp	Lower	Upper
75	100		525952		
110	34.5	28.2	42.2		
39	15.8	13.3	19.9		

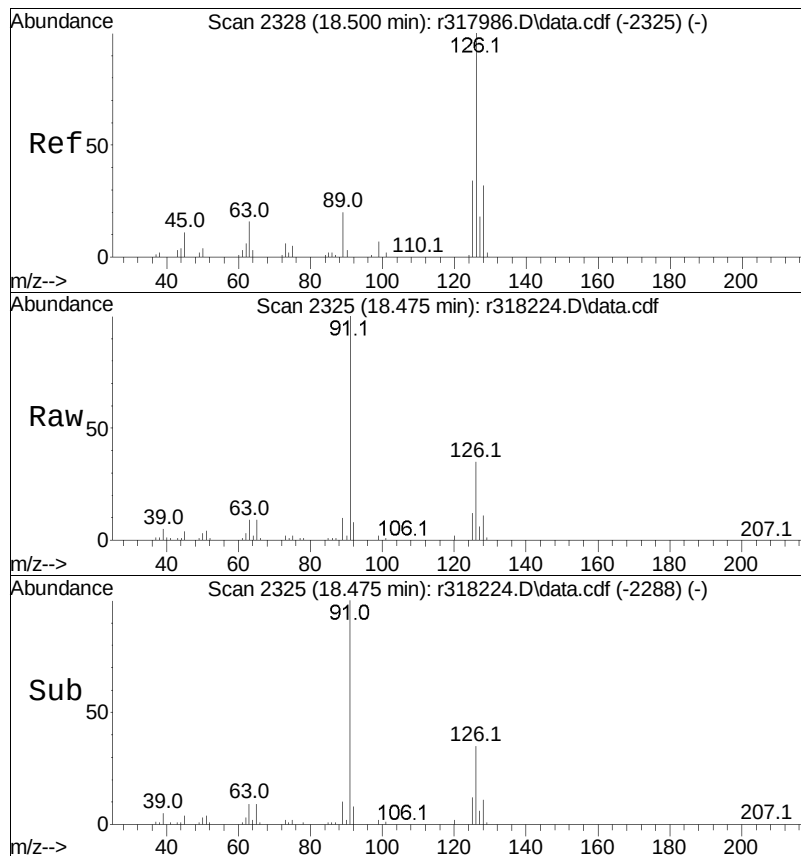




#93
 2-chlorotoluene
 Concen: 9.67 ppbV
 RT: 18.42 min Scan# 2318
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

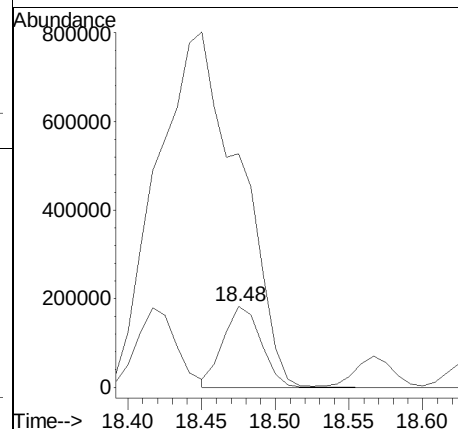
Tgt Ion	Ratio	Lower	Upper
126	100		
91	272.4	230.2	345.4

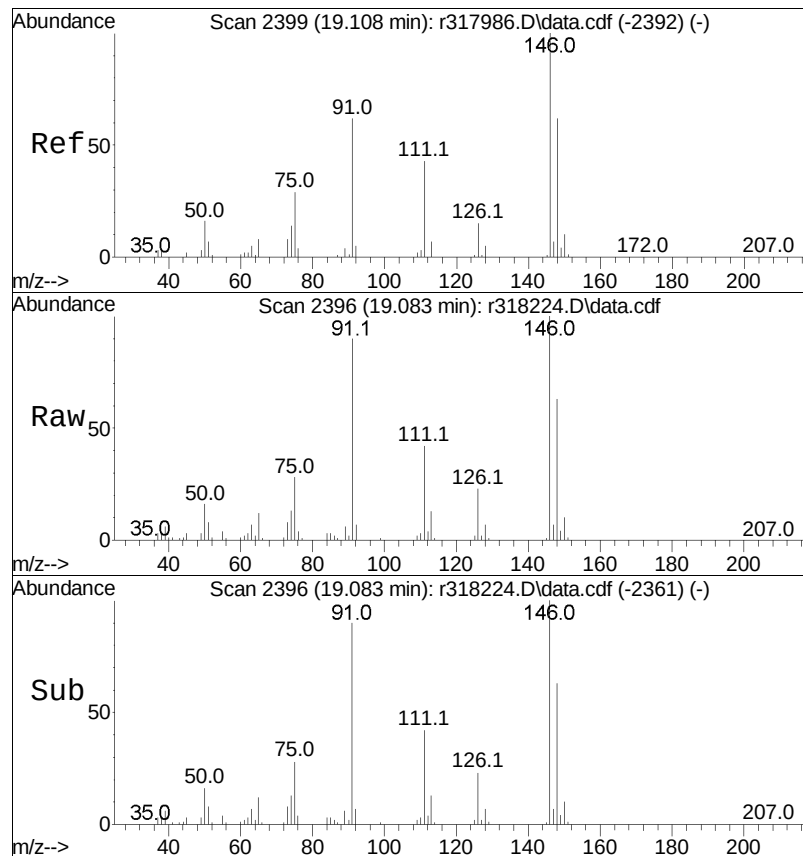




#95
 4-chlorotoluene
 Concen: 9.89 ppbV
 RT: 18.48 min Scan# 2325
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

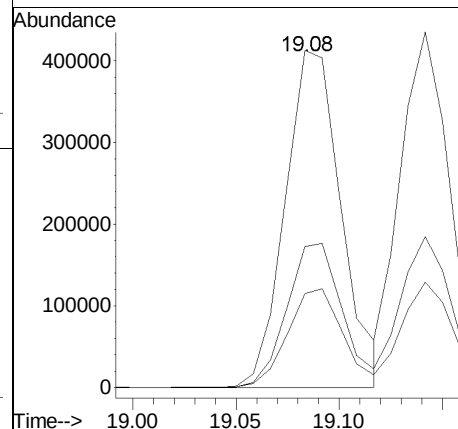
Tgt Ion	Ratio	Lower	Upper
126	100		
91	288.2	224.2	336.2

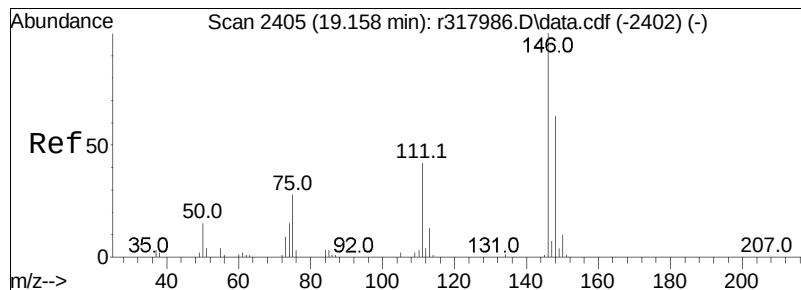




#102
 1,3-dichlorobenzene
 Concen: 11.54 ppbV
 RT: 19.08 min Scan# 2396
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

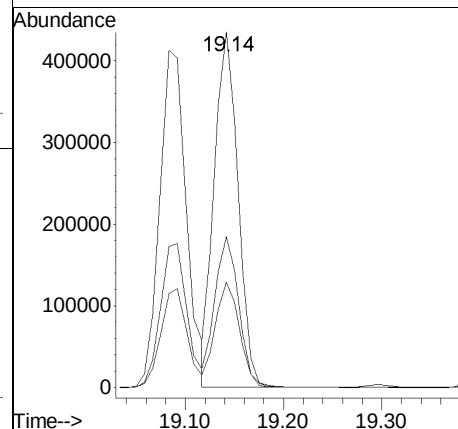
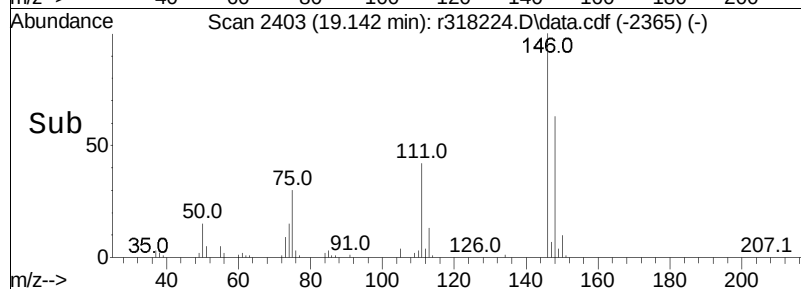
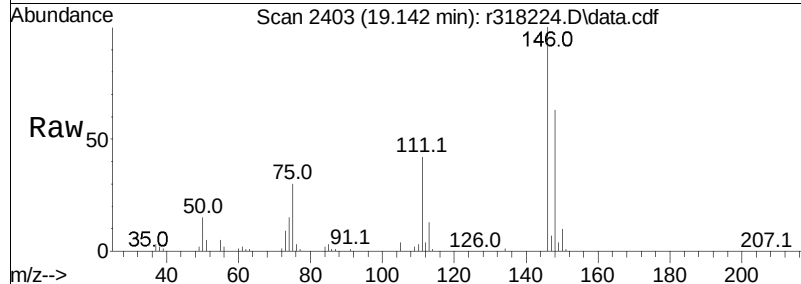
Tgt Ion	Ratio	Resp	Lower	Upper
146	100	778432		
111	41.8		34.4	51.6
75	27.8		22.9	34.3

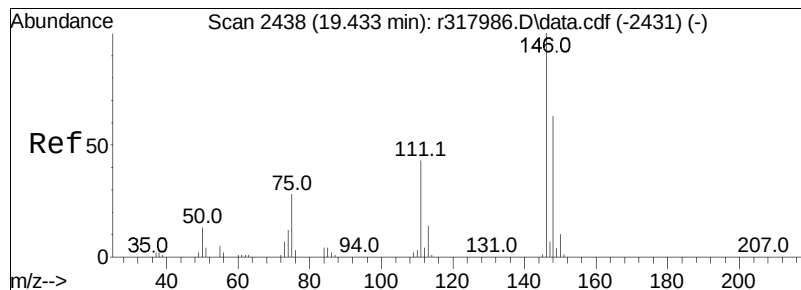




#103
 1,4-dichlorobenzene
 Concen: 10.97 ppbV
 RT: 19.14 min Scan# 2403
 Delta R.T. -0.017 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

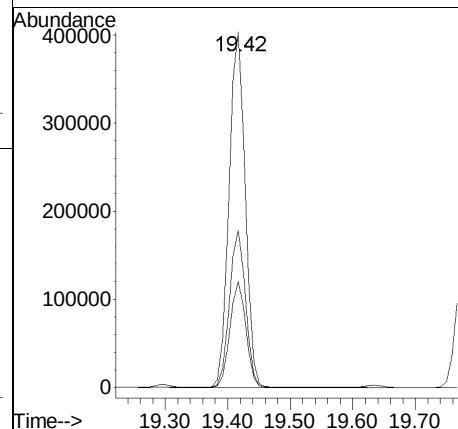
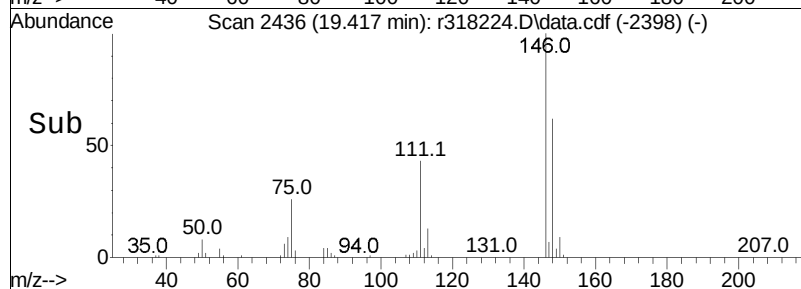
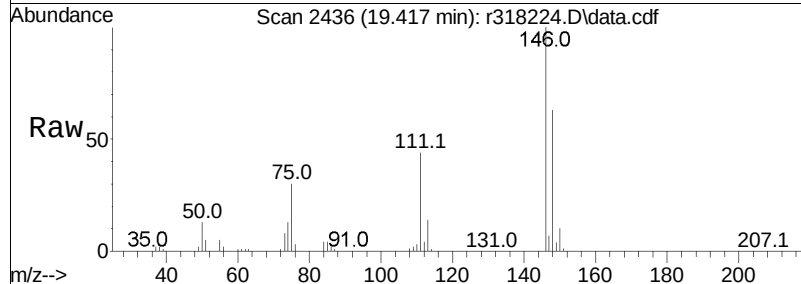
Tgt Ion	Ratio	Lower	Upper
146	100		
111	42.4	33.6	50.4
75	29.6	22.7	34.1

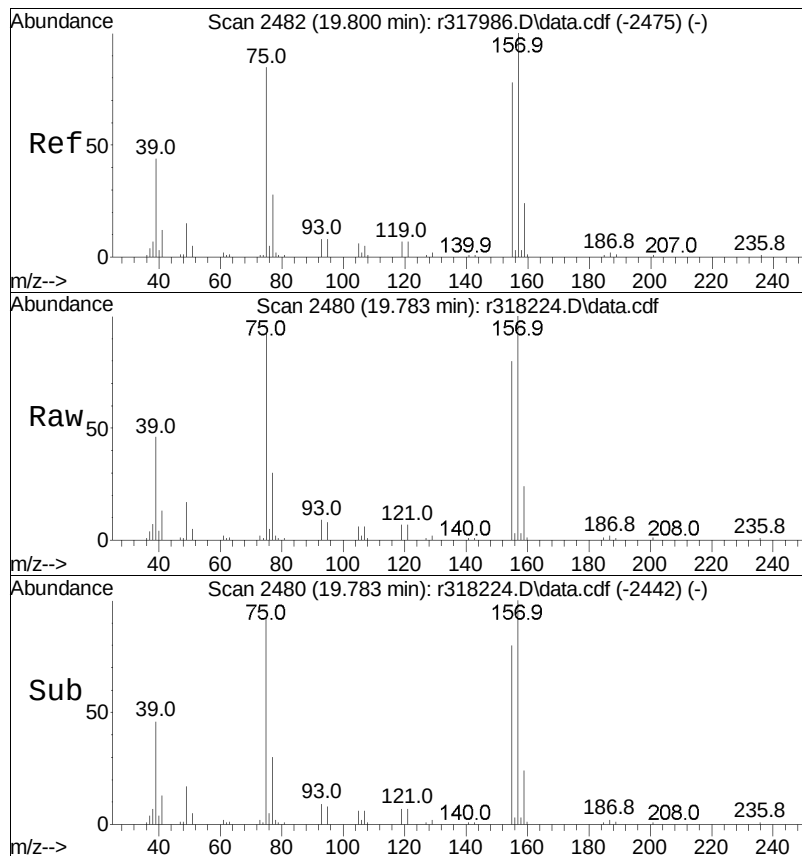




#107
 1,2-dichlorobenzene
 Concen: 11.14 ppbV
 RT: 19.42 min Scan# 2436
 Delta R.T. -0.017 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

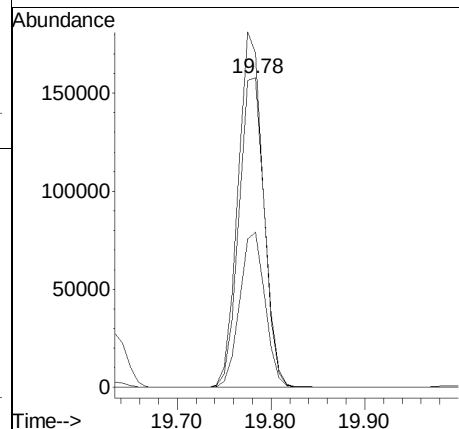
Tgt Ion	Ratio	Lower	Upper
146	100		
111	44.3	34.6	51.8
75	29.8	22.6	34.0

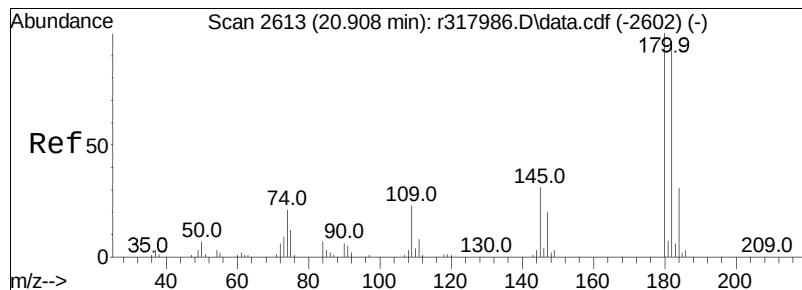




#111
 1,2-dibromo-3-chloropropane
 Concen: 10.81 ppbV
 RT: 19.78 min Scan# 2480
 Delta R.T. -0.017 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

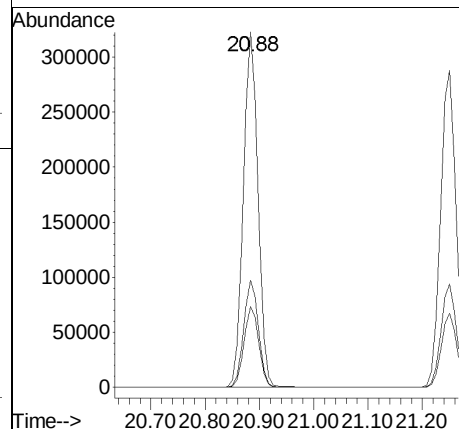
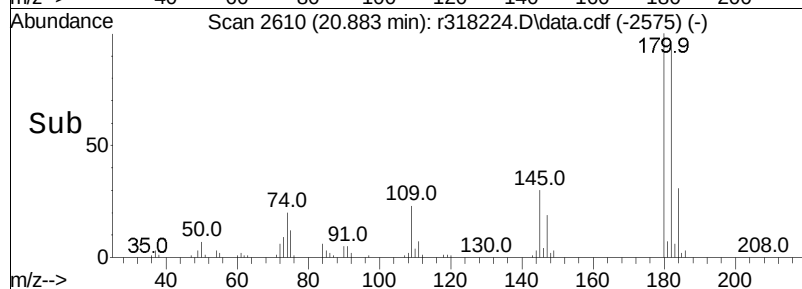
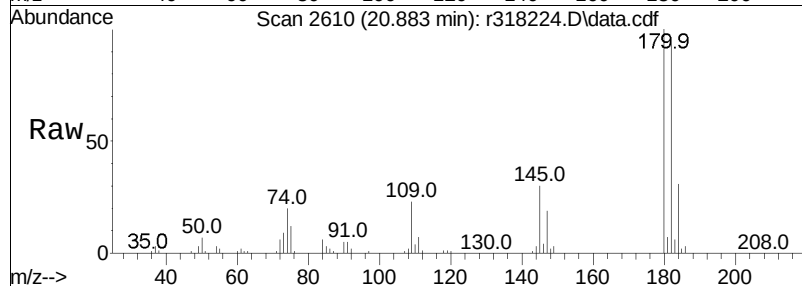
Tgt Ion:	75	Resp:	300495
Ion Ratio	100	Lower	Upper
157	108.0	94.1	141.1
39	50.1	41.1	61.7

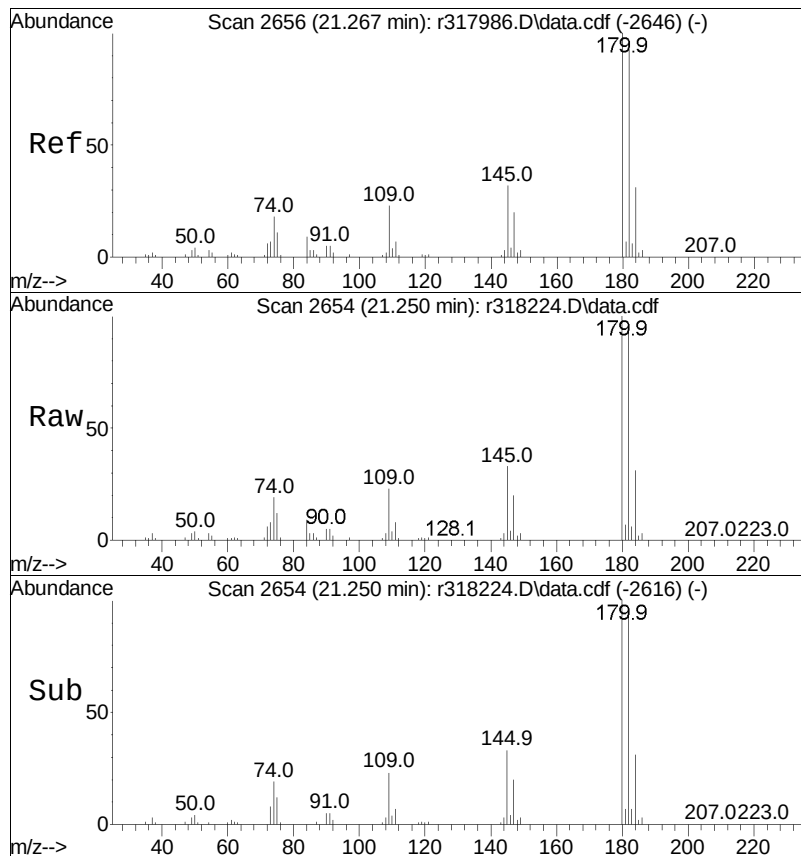




#115
 1,2,4-trichlorobenzene
 Concen: 11.70 ppbV
 RT: 20.88 min Scan# 2610
 Delta R.T. -0.025 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

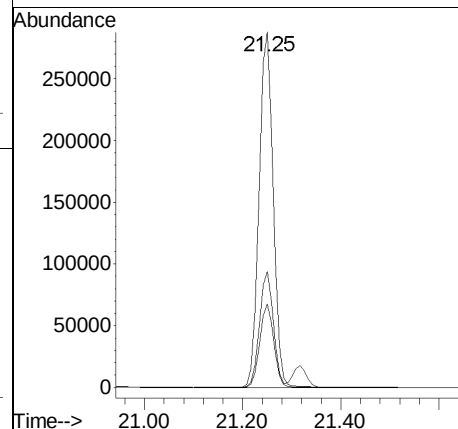
Tgt Ion	Ratio	Lower	Upper
180	100		
145	30.2	25.2	37.8
109	22.7	18.7	28.1

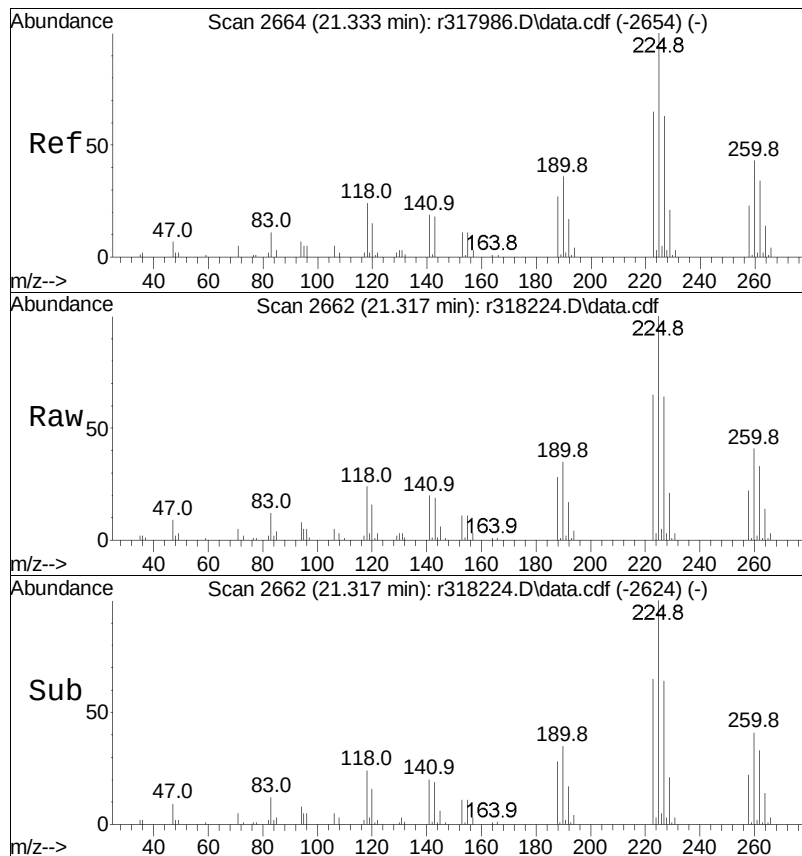




#117
 1,2,3-trichlorobenzene
 Concen: 11.06 ppbV
 RT: 21.25 min Scan# 2654
 Delta R.T. -0.017 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

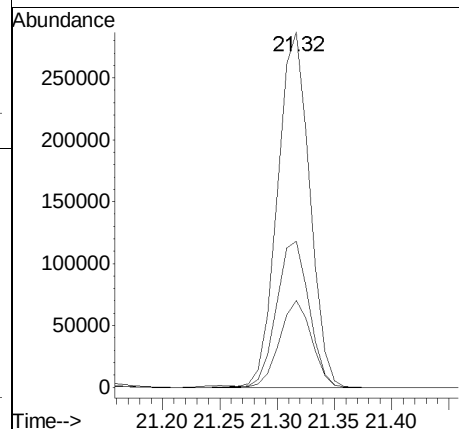
Tgt	Ion	Ratio	Resp	Lower	Upper
180	100		575719		
145	32.6	25.4		38.0	
109	23.5	18.2		27.2	





#119
 hexachlorobutadiene
 Concen: 11.03 ppbV
 RT: 21.32 min Scan# 2662
 Delta R.T. -0.017 min
 Lab File: r318224.D
 Acq: 7 Oct 2021 12:28 PM

Tgt Ion	Ratio	Lower	Upper
225	100		
260	41.2	34.7	52.1
118	24.5	19.0	28.4



Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318238.D
 Acq On : 7 Oct 2021 11:27 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-5,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:15:36 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : T015-NY - .

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

Internal Standards						
1) bromochloromethane	9.54	49	400325	10.000	ppbV	-0.03
Standard Area = 399927			Recovery	=	100.10%	
43) 1,4-difluorobenzene	11.81	114	1094699	10.000	ppbV	-0.03
Standard Area = 1080836			Recovery	=	101.28%	
67) chlorobenzene-D5	16.54	54	180596	10.000	ppbV	-0.02
Standard Area = 167175			Recovery	=	108.03%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
5) dichlorodifluoromethane	3.99	85	15125	0.405	ppbV	100
6) chloromethane	4.17	50	9026	0.500	ppbV	100
7) Freon-114	4.29		0	N.D.		
9) vinyl chloride	4.42	62	3415	0.140	ppbV	98
10) 1,3-butadiene	4.59	54	11430	0.568	ppbV	95
13) bromomethane	0.00		0	N.D.		
14) chloroethane	0.00		0	N.D.	d	
15) ethanol	5.29	31	1105802	67.698	ppbV	99
17) vinyl bromide	0.00		0	N.D.		
19) acetone	5.85	43	3555021	104.718	ppbV	93
21) trichlorofluoromethane	6.06	101	52090	1.395	ppbV	97
22) isopropyl alcohol	6.18	45	432434	10.654	ppbV	100
26) 1,1-dichloroethene	6.90		0	N.D.		
27) tertiary butyl alcohol	6.90	59	446163	9.864	ppbV	95
28) methylene chloride	7.00	49	4716	0.164	ppbV	94
29) 3-chloropropene	0.00		0	N.D.		
30) carbon disulfide	7.29	76	183551	2.281	ppbV	99
31) Freon 113	7.33	101	2375	0.057	ppbV	89
32) trans-1,2-dichloroethene	0.00		0	N.D.		
33) 1,1-dichloroethane	0.00		0	N.D.		
34) MTBE	8.44		0	N.D.		
36) 2-butanone	8.82	43	1405632	26.738	ppbV	99
37) cis-1,2-dichloroethene	0.00		0	N.D.		
38) Ethyl Acetate	9.66	61	5251	0.561	ppbV	94
39) chloroform	9.71	83	16888	0.387	ppbV	98
40) Tetrahydrofuran	10.15	42	171229	5.244	ppbV	100
42) 1,2-dichloroethane	0.00		0	N.D.		
44) hexane	9.62	57	14209	0.300	ppbV #	59
48) 1,1,1-trichloroethane	10.83		0	N.D.		

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
 Data File : r318238.D
 Acq On : 7 Oct 2021 11:27 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555827-5,3,250,250
 Misc : WG1555827,ICAL18331
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 12:15:36 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 10:25:07 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007T\r318223.D
 Sub List : T015-NY - .

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
50) benzene	11.37	78	417988	4.426	ppbV	99
52) carbon tetrachloride	11.54	117	2526	0.082	ppbV	89
53) cyclohexane	11.69	56	28901	0.563	ppbV	93
56) 1,2-dichloropropane	0.00		0	N.D.		
57) bromodichloromethane	0.00		0	N.D.	d	
58) 1,4-dioxane	12.61	88	2630	0.126	ppbV	90
59) trichloroethene	12.60	130	43063	1.273	ppbV	99
60) 2,2,4-trimethylpentane	12.65	57	24499	0.163	ppbV #	61
62) heptane	12.97	43	22533	0.422	ppbV #	67
63) cis-1,3-dichloropropene	0.00		0	N.D.		
64) 4-methyl-2-pentanone	13.66	43	389110	6.492	ppbV	93
65) trans-1,3-dichloropropene	0.00		0	N.D.		
66) 1,1,2-trichloroethane	14.38		0	N.D.		
68) toluene	14.76	91	187030	1.794	ppbV	99
72) 2-hexanone	15.04	43	152837	2.659	ppbV	89
74) dibromochloromethane	0.00		0	N.D.		
75) 1,2-dibromoethane	0.00		0	N.D.		
78) tetrachloroethene	15.93	166	35104	0.813	ppbV	98
80) chlorobenzene	0.00		0	N.D.	d	
81) ethylbenzene	16.93	91	45913	0.388	ppbV	96
83) m+p-xylene	17.08	91	85729	0.897	ppbV	95
84) bromoform	0.00		0	N.D.		
85) styrene	17.42	104	58477	0.716	ppbV	100
86) 1,1,2,2-tetrachloroethane	0.00		0	N.D.	d	
87) o-xylene	17.51	91	39420	0.417	ppbV	97
96) 4-ethyl toluene	18.57	105	15545M6	0.111	ppbV	
97) 1,3,5-trimethylbenzene	18.63	105	26764	0.230	ppbV	94
99) 1,2,4-trimethylbenzene	18.97	105	80701	0.731	ppbV #	81
101) Benzyl Chloride	0.00		0	N.D.	d	
102) 1,3-dichlorobenzene	19.15		0	N.D.		
103) 1,4-dichlorobenzene	19.15		0	N.D.		
107) 1,2-dichlorobenzene	0.00		0	N.D.		
115) 1,2,4-trichlorobenzene	0.00		0	N.D.		
119) hexachlorobutadiene	0.00		0	N.D.		

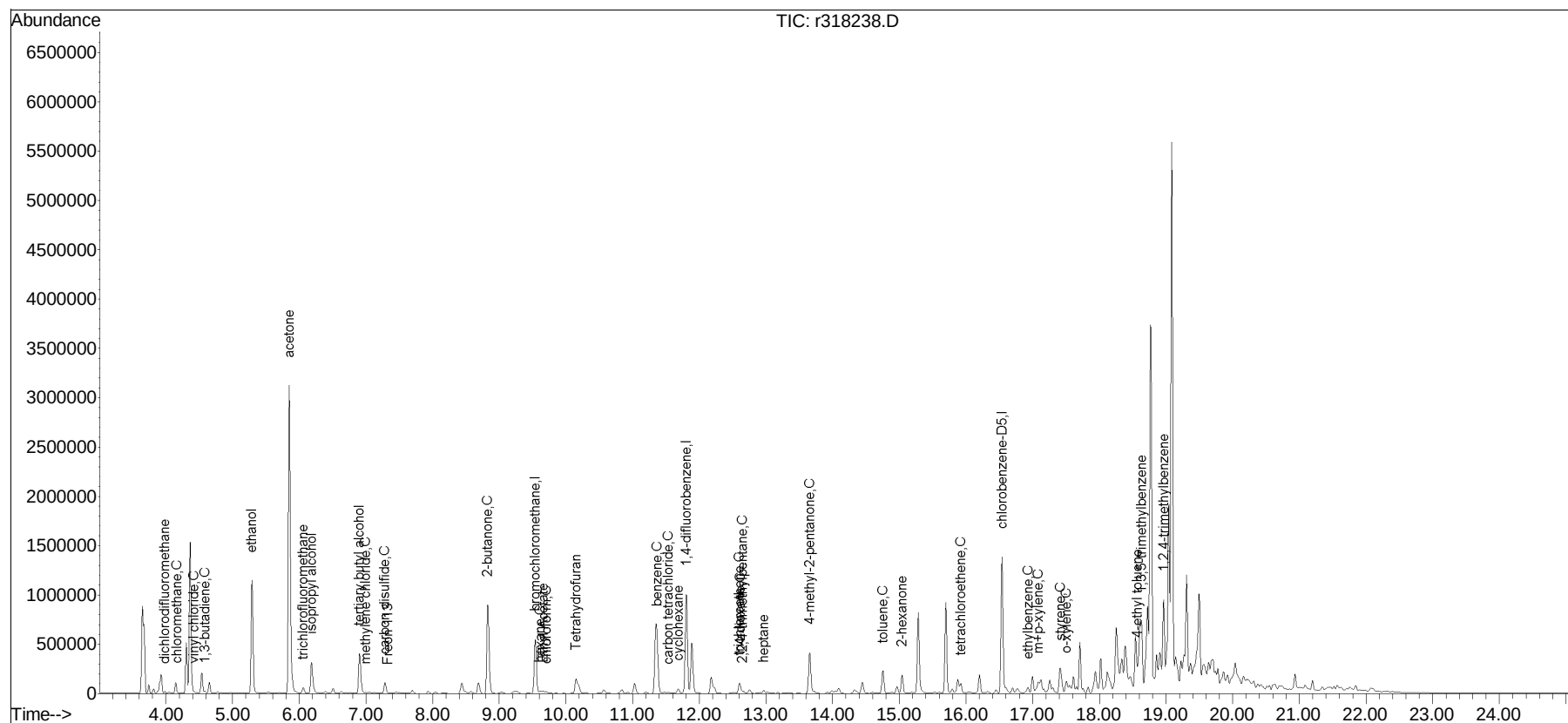
(#) = qualifier out of range (m) = manual integration (+) = signals summed

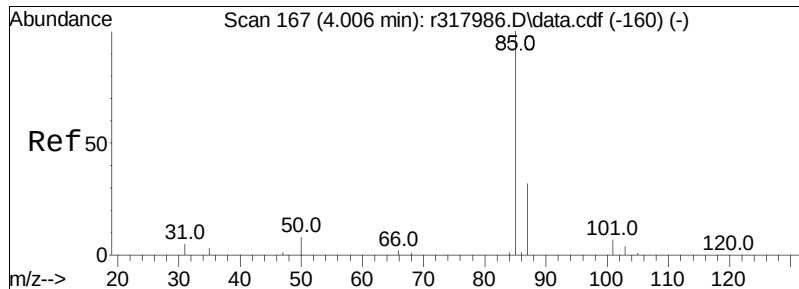
Quantitation Report (QT Reviewed)

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Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007T\
Data File : r318238.D
Acq On    : 7 Oct 2021 11:27 PM
Operator  : AIRPIAN03:RY
Sample    : WG1555827-5,3,250,250
Misc      : WG1555827,ICAL18331
ALS Vial  : 0 Sample Multiplier: 1
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Quant Time: Oct 08 12:15:36 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007T\TFS3_210926.M
Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 10:25:07 2021
Response via : Initial Calibration

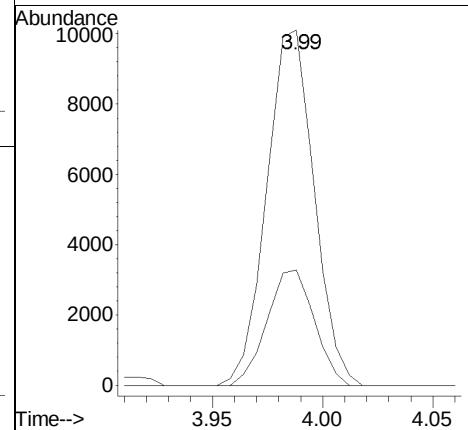
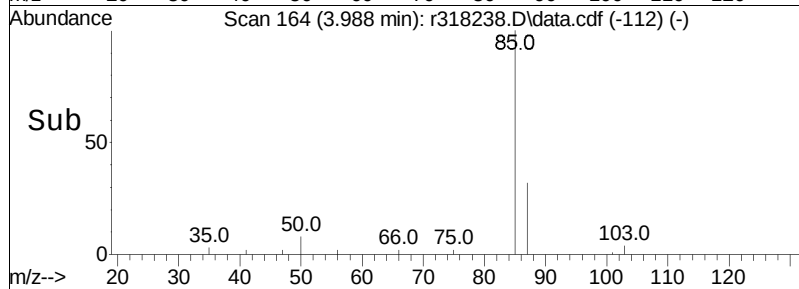
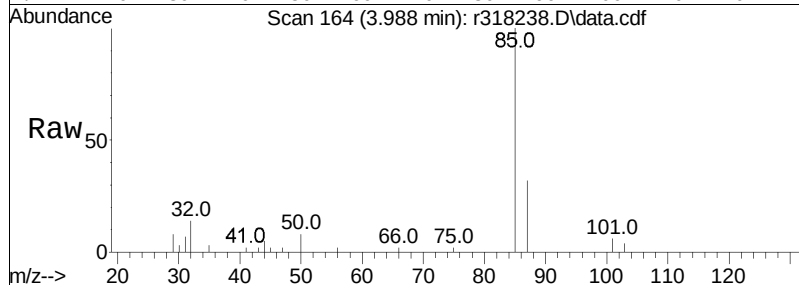
Sub List : T015-NY - .s\Data\Airpiano3\2021\10\1007T\r318223.D

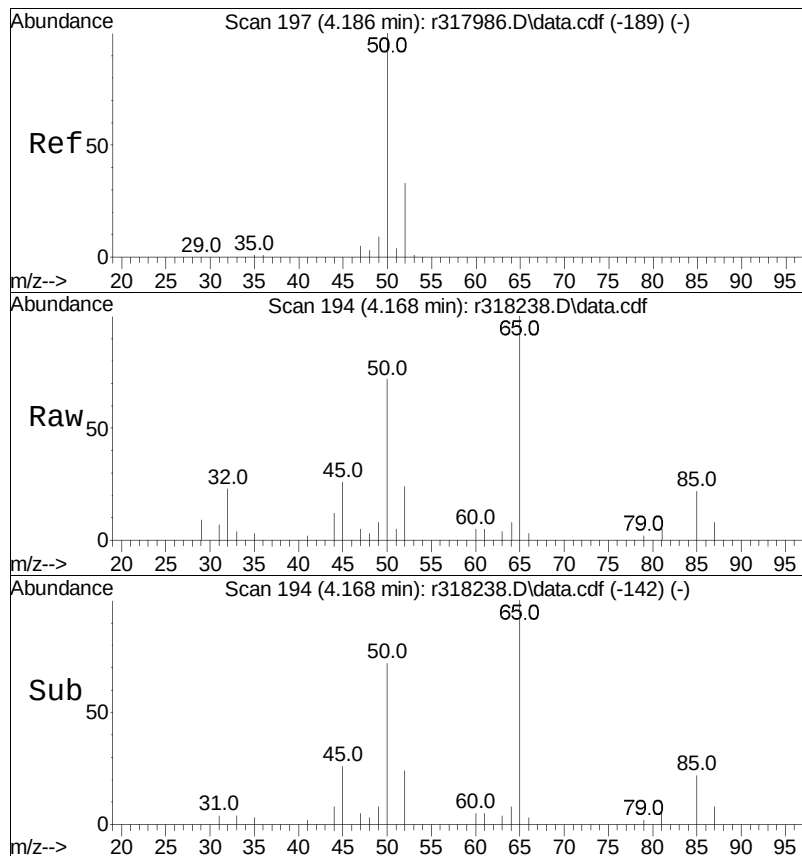




#5
dichlorodifluoromethane
Concen: 0.40 ppbV
RT: 3.99 min Scan# 164
Delta R.T. -0.018 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

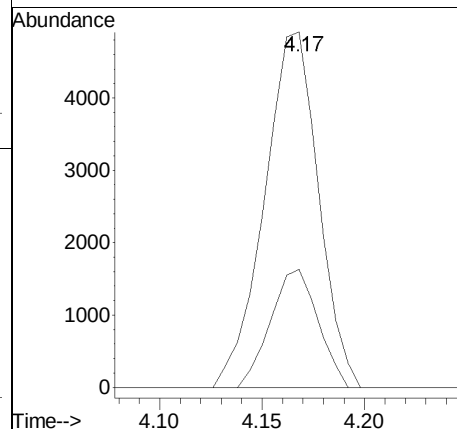
Tgt Ion: 85 Resp: 15125
Ion Ratio Lower Upper
85 100
87 32.5 25.8 38.8

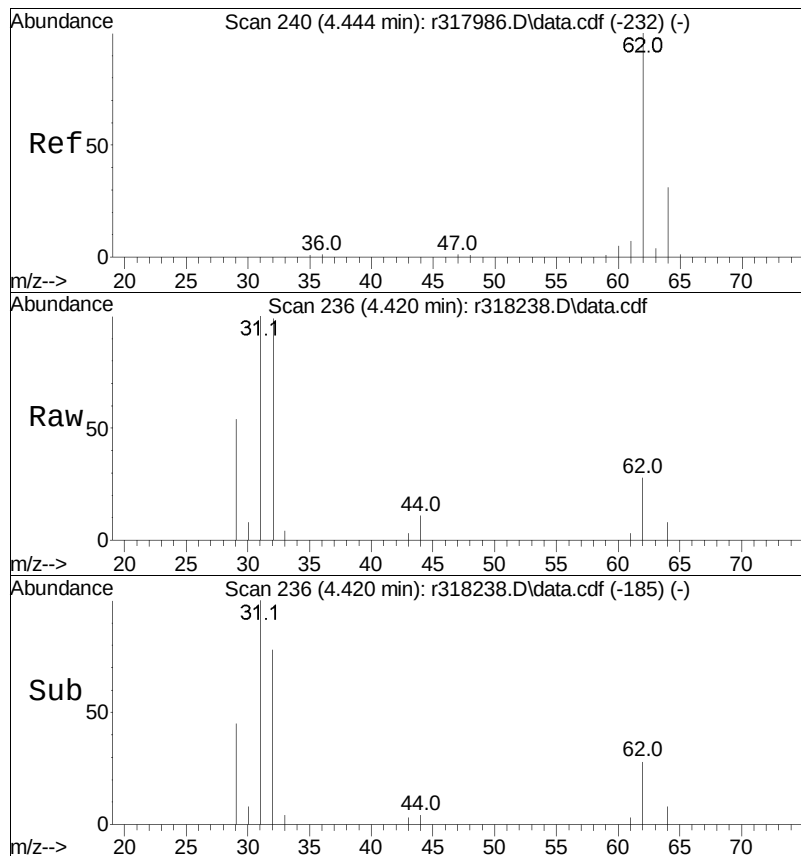




#6
 chloromethane
 Concen: 0.50 ppbV
 RT: 4.17 min Scan# 194
 Delta R.T. -0.018 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

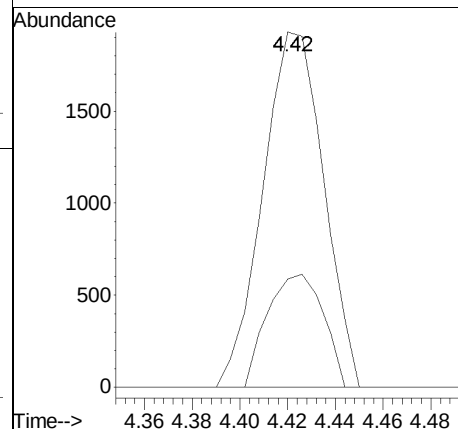
Tgt	Ion	Resp	Lower	Upper
50	100	9026		
52	33.2	26.7	40.1	

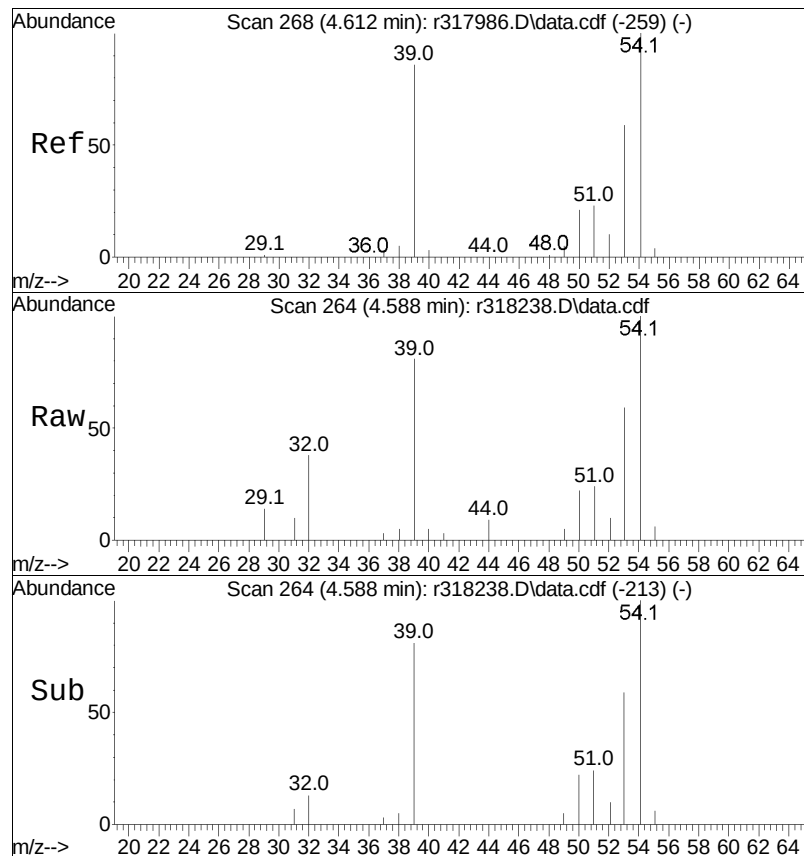




#9
 vinyl chloride
 Concen: 0.14 ppbV
 RT: 4.42 min Scan# 236
 Delta R.T. -0.024 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

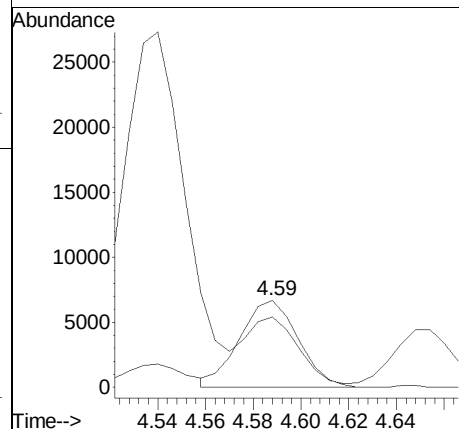
Tgt Ion	Ratio	Lower	Upper
62	100		
64	30.5	25.1	37.7

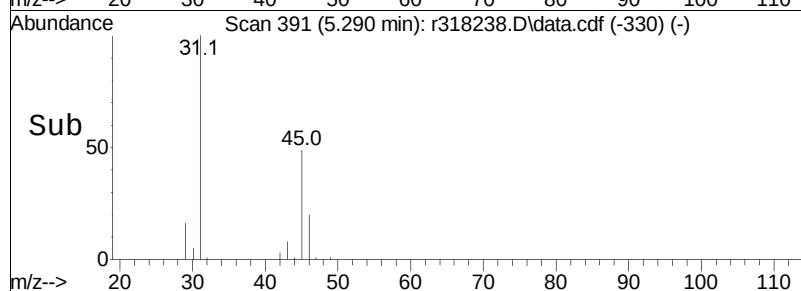
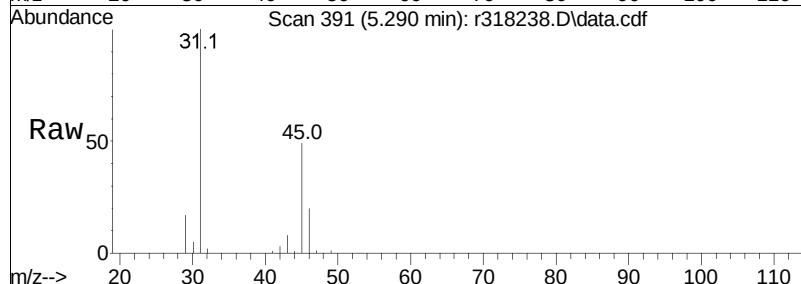
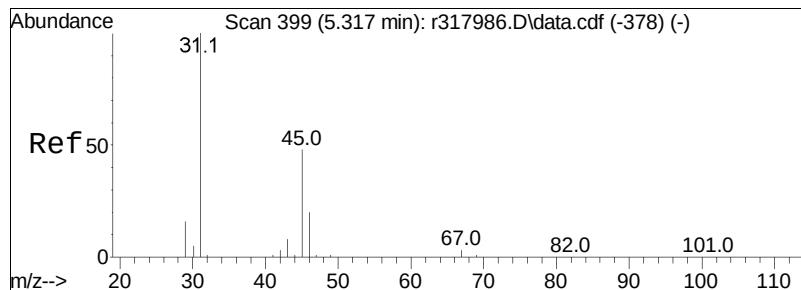




#10
 1,3-butadiene
 Concen: 0.57 ppbV
 RT: 4.59 min Scan# 264
 Delta R.T. -0.024 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

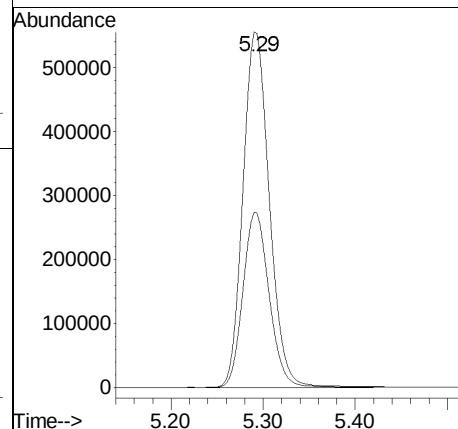
Tgt Ion:	54	Resp:	11430
Ion Ratio	Lower	Upper	
54	100		
39	81.0	68.8	103.2

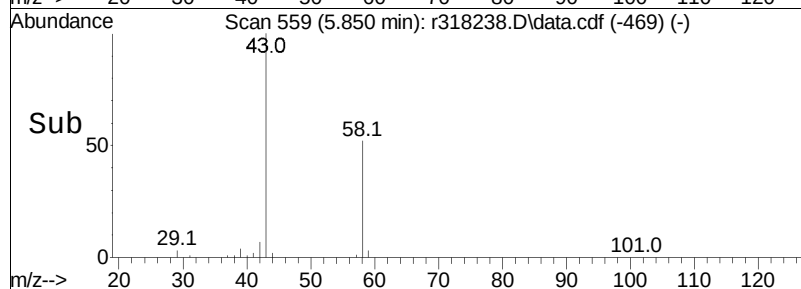
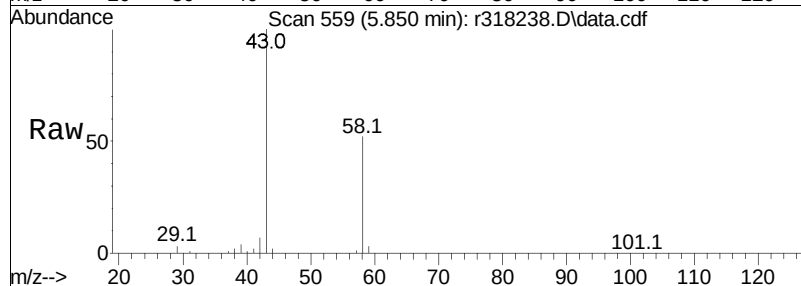
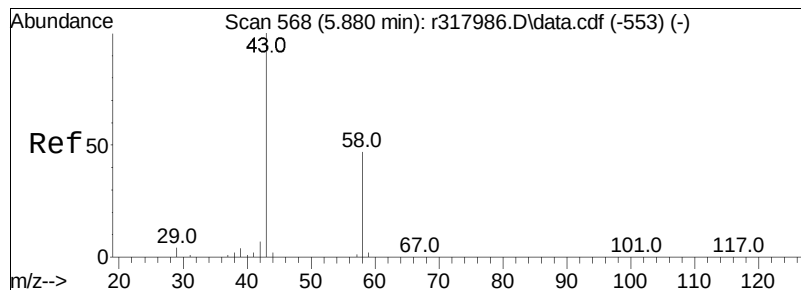




#15
ethanol
Concen: 67.70 ppbV
RT: 5.29 min Scan# 391
Delta R.T. -0.027 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

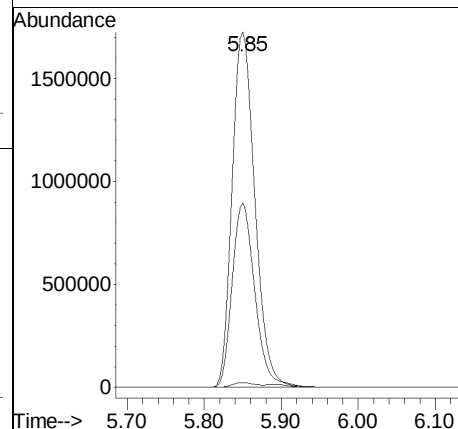
Tgt	Ion	Ratio	Lower	Upper
31	100			
45	49.2	38.8	58.2	

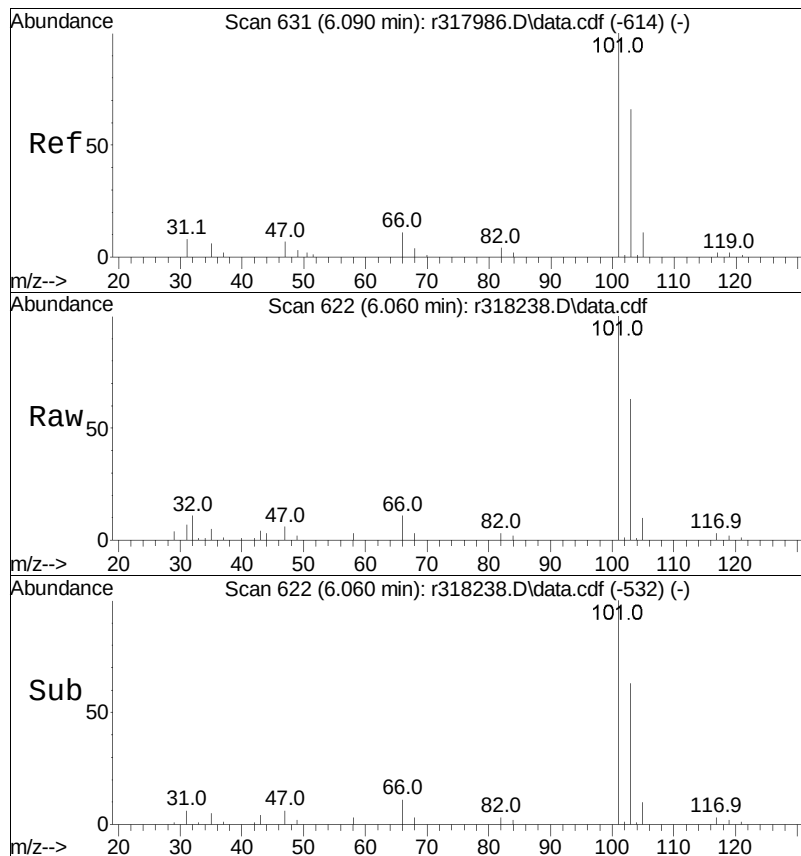




#19
acetone
Concen: 104.72 ppbV
RT: 5.85 min Scan# 559
Delta R.T. -0.030 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

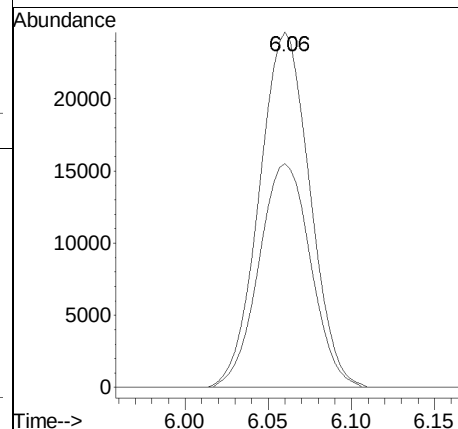
Tgt Ion	Ratio	Lower	Upper
43	100		
58	51.9	37.9	56.9
57	1.4	1.0	1.6

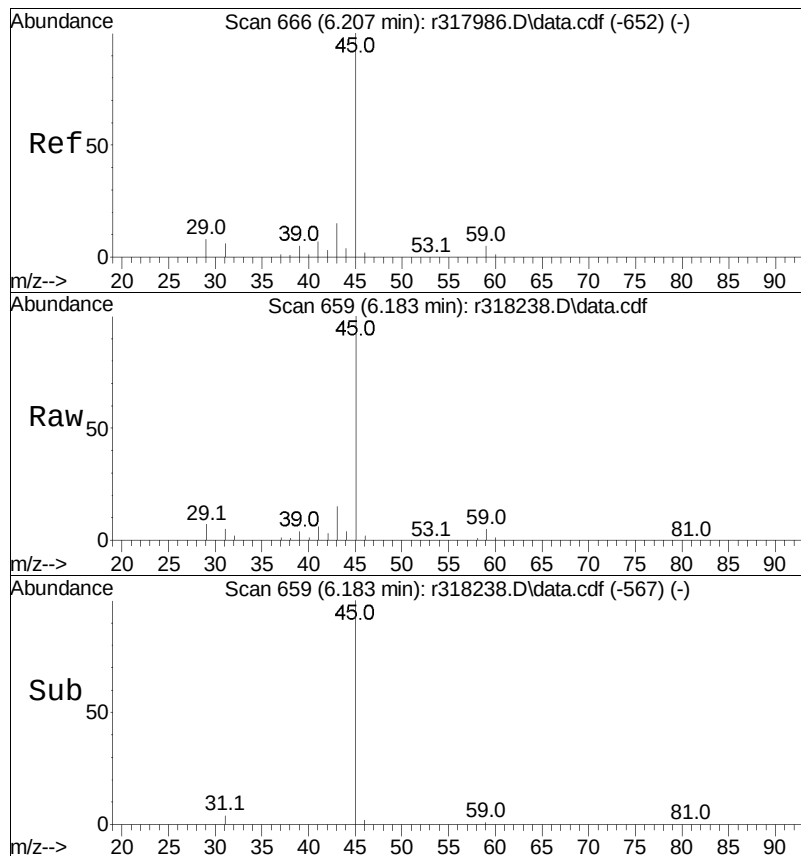




#21
 trichlorofluoromethane
 Concen: 1.39 ppbV
 RT: 6.06 min Scan# 622
 Delta R.T. -0.030 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

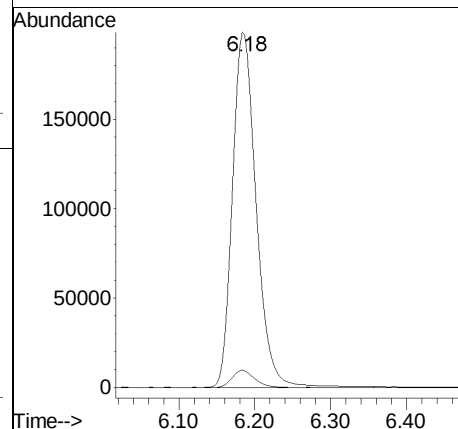
Tgt Ion	Ratio	Lower	Upper
101	100		
103	63.0	52.4	78.6

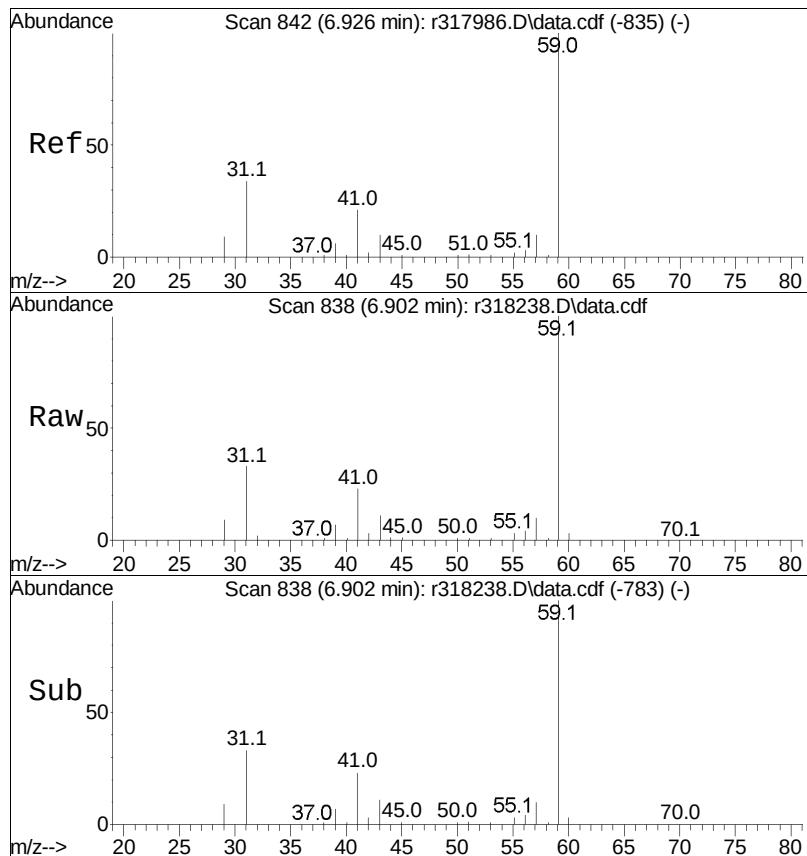




#22
 isopropyl alcohol
 Concen: 10.65 ppbV
 RT: 6.18 min Scan# 659
 Delta R.T. -0.023 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

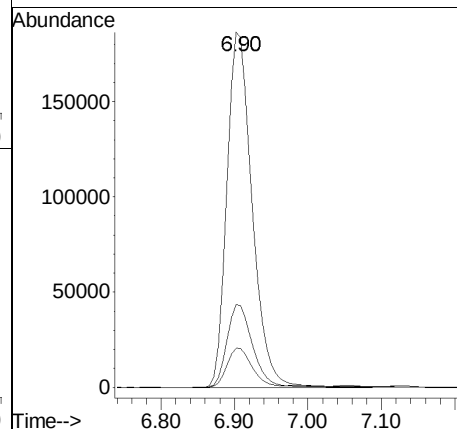
Tgt Ion	Ratio	Lower	Upper
45	100		
59	4.8	3.8	5.6

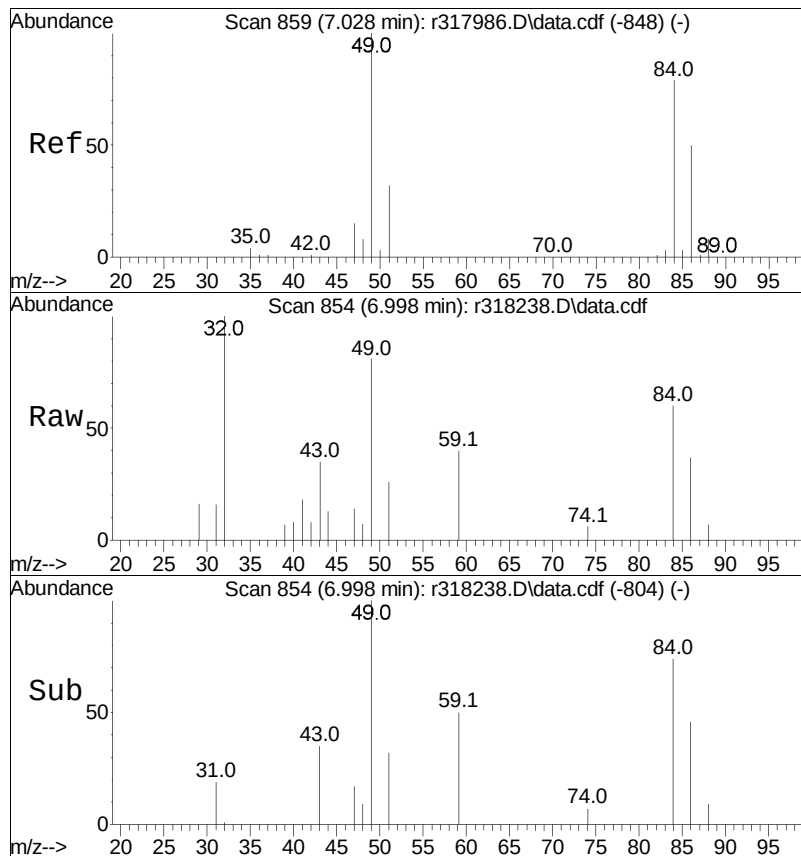




#27
 tertiary butyl alcohol
 Concen: 9.86 ppbV
 RT: 6.90 min Scan# 838
 Delta R.T. -0.024 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

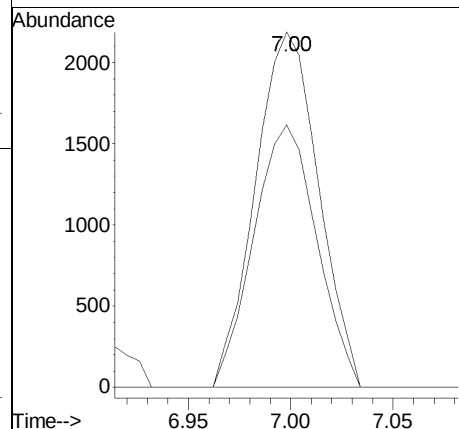
Tgt Ion:	59	Resp:	446163
Ion Ratio	Lower	Upper	
59	100		
41	23.3	16.5	24.7
43	11.0	7.8	11.6

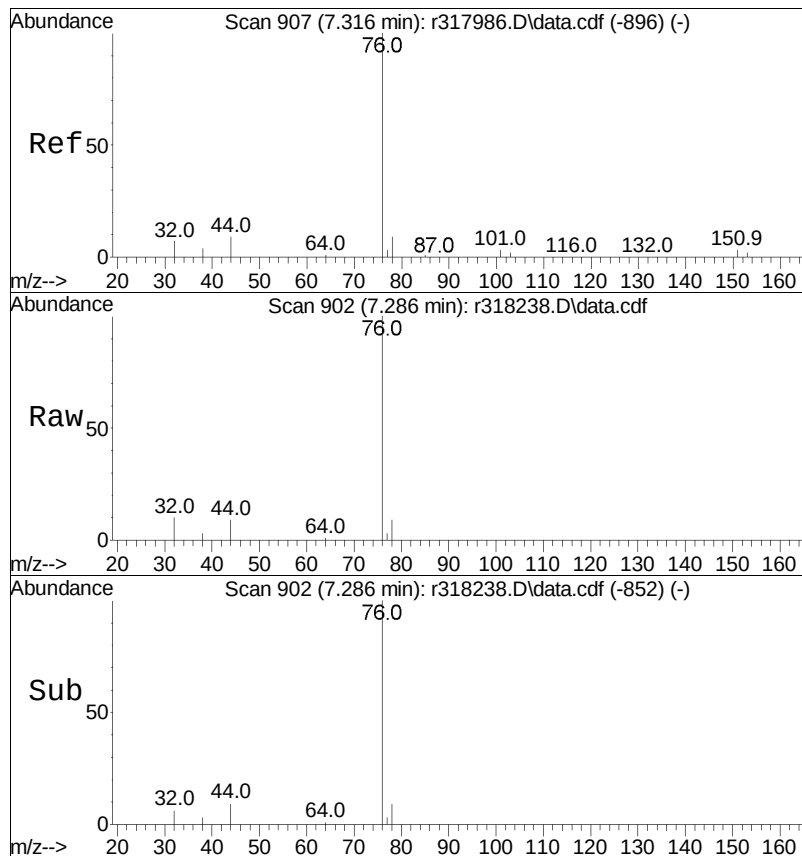




#28
 methylene chloride
 Concen: 0.16 ppbV
 RT: 7.00 min Scan# 854
 Delta R.T. -0.030 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

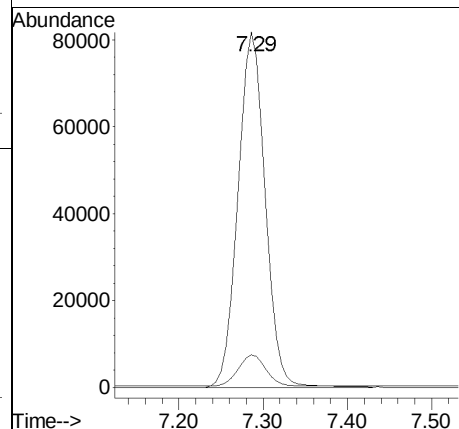
Tgt Ion:	49	84	Ratio	Lower	Upper
Resp:	4716				
Ion Ratio	100	73.9		63.5	95.3

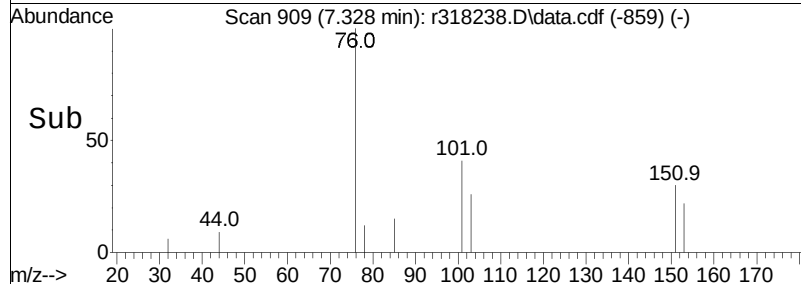
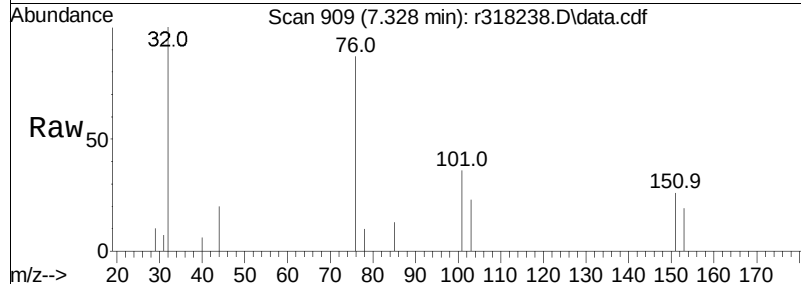
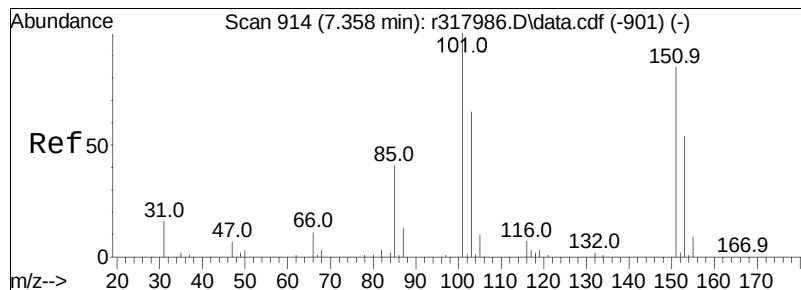




#30
 carbon disulfide
 Concen: 2.28 ppbV
 RT: 7.29 min Scan# 902
 Delta R.T. -0.030 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

Tgt Ion	Ratio	Lower	Upper
76	100		
44	9.2	7.0	10.4





#31

Freon 113

Concen: 0.06 ppbV

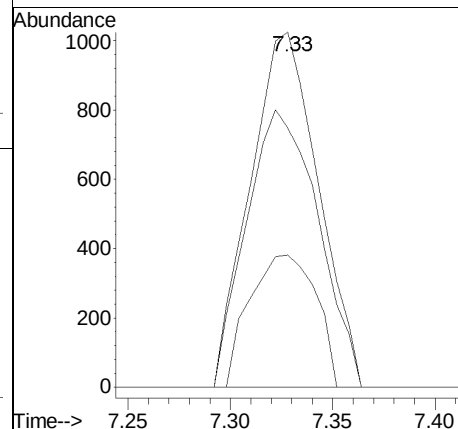
RT: 7.33 min Scan# 909

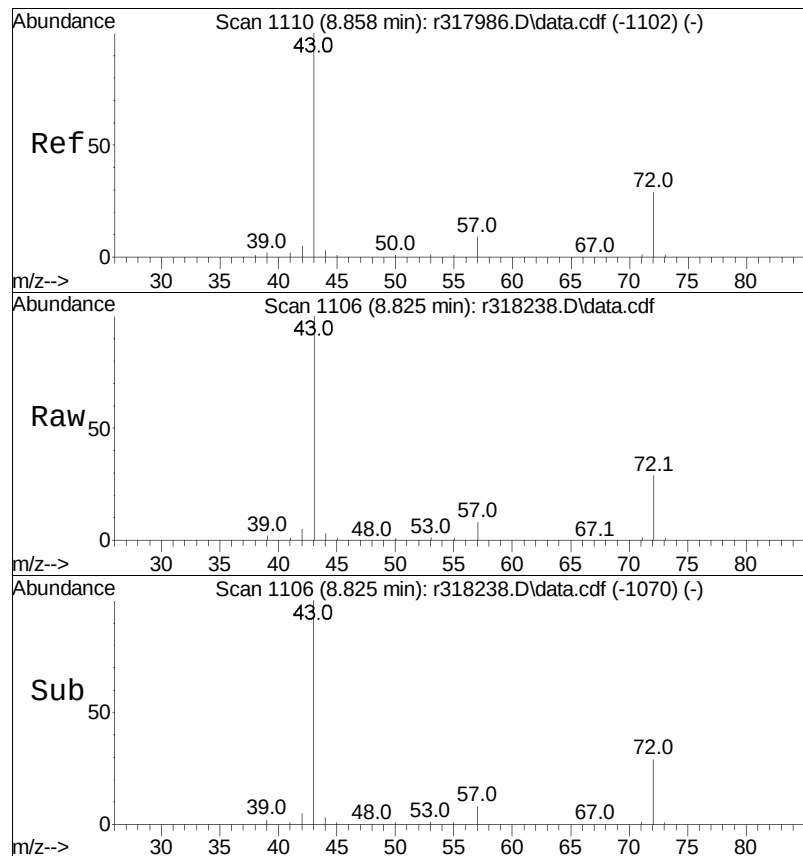
Delta R.T. -0.030 min

Lab File: r318238.D

Acq: 7 Oct 2021 11:27 PM

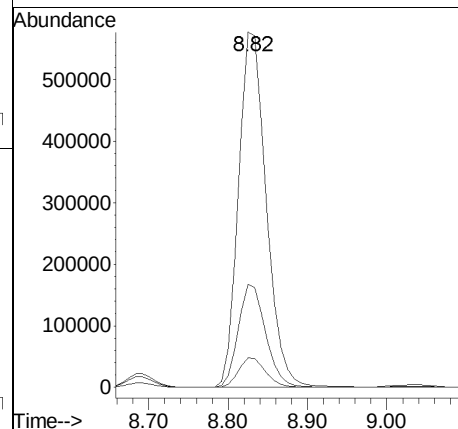
Tgt Ion:101	Resp:	2375
Ion Ratio	Lower	Upper
101 100		
85 37.3	33.0	49.6
151 73.0	67.8	101.8

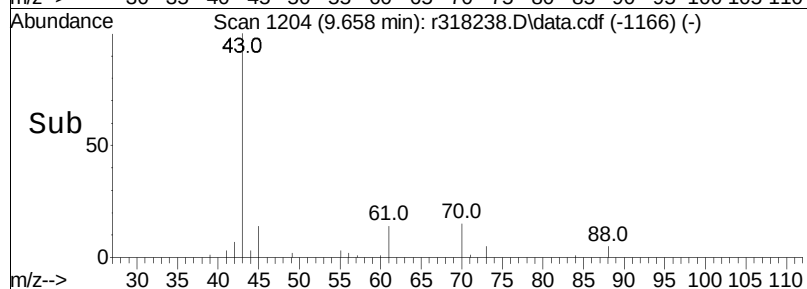
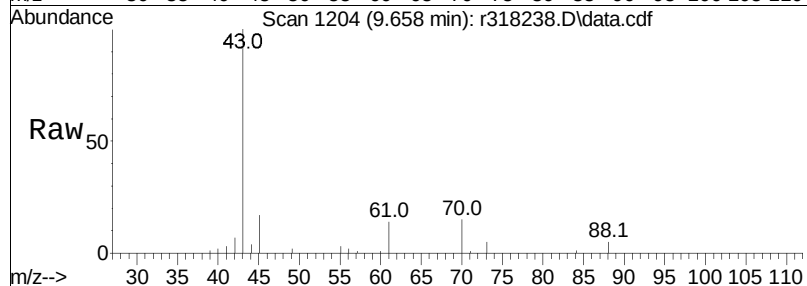
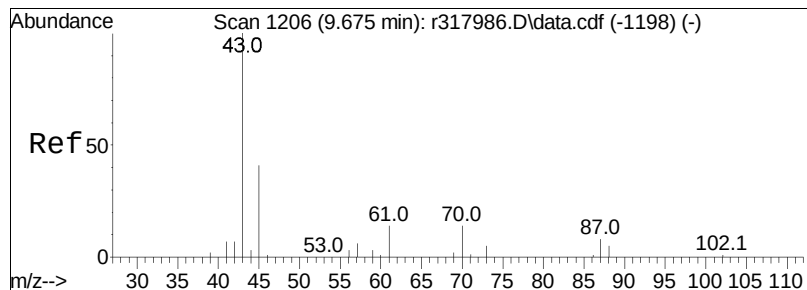




#36
 2-butanone
 Concen: 26.74 ppbV
 RT: 8.82 min Scan# 1106
 Delta R.T. -0.033 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

Tgt Ion:	43	Resp:	1405632
Ion	Ratio	Lower	Upper
43	100		
72	29.0	23.0	34.6
57	8.3	7.2	10.8





#38

Ethyl Acetate

Concen: 0.56 ppbV

RT: 9.66 min Scan# 1204

Delta R.T. -0.017 min

Lab File: r318238.D

Acq: 7 Oct 2021 11:27 PM

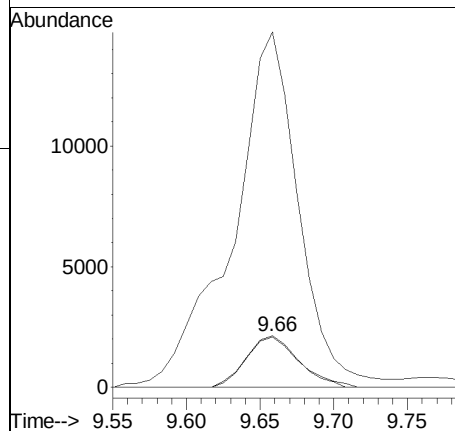
Tgt Ion: 61 Resp: 5251

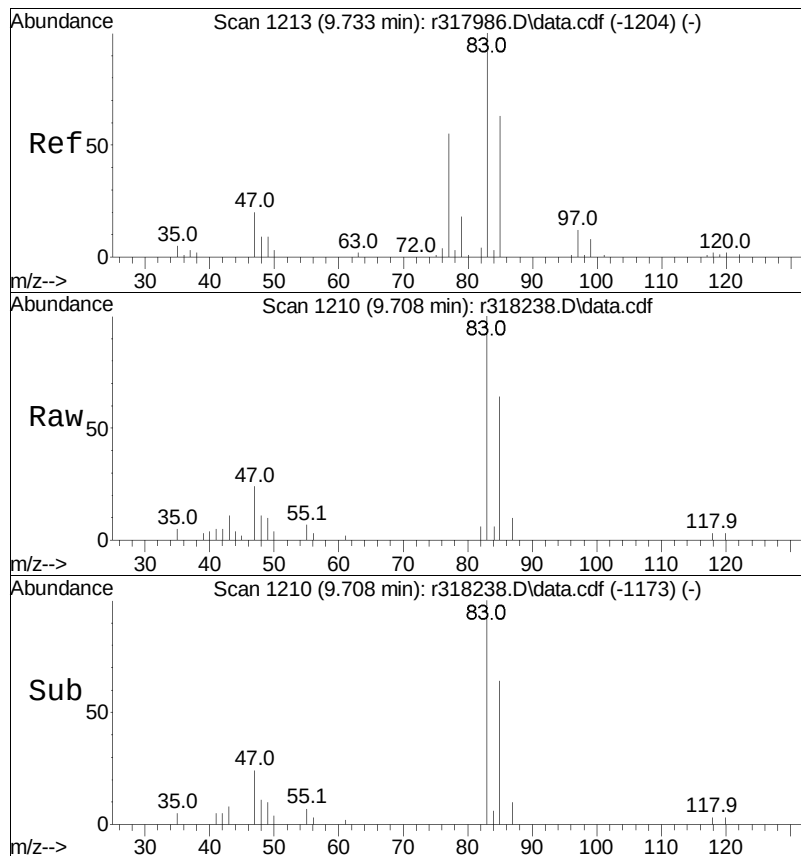
Ion Ratio Lower Upper

61 100

70 102.7 76.6 115.0

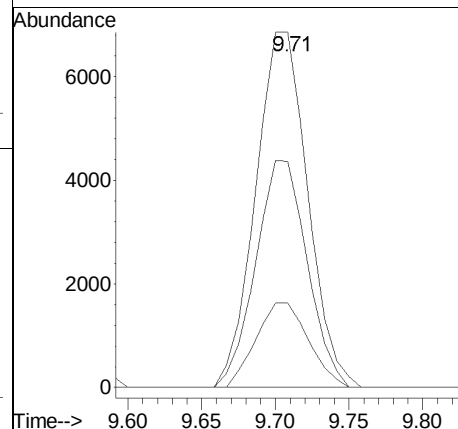
43 705.5 580.2 870.4

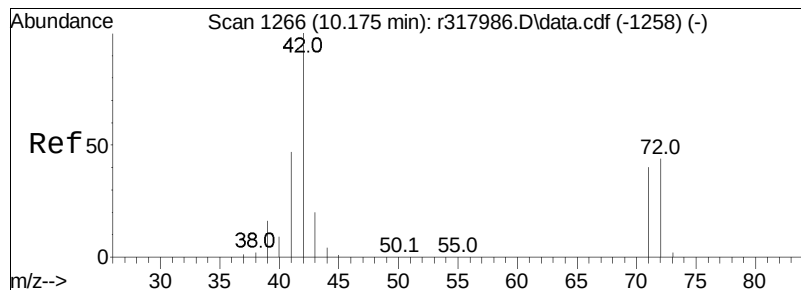




#39
 chloroform
 Concen: 0.39 ppbV
 RT: 9.71 min Scan# 1210
 Delta R.T. -0.025 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

Tgt	Ion: 83	Resp:	16888
Ion	Ratio	Lower	Upper
83	100		
85	63.6	51.1	76.7
47	23.8	16.3	24.5





#40

Tetrahydrofuran

Concen: 5.24 ppbV

RT: 10.15 min Scan# 1263

Delta R.T. -0.025 min

Lab File: r318238.D

Acq: 7 Oct 2021 11:27 PM

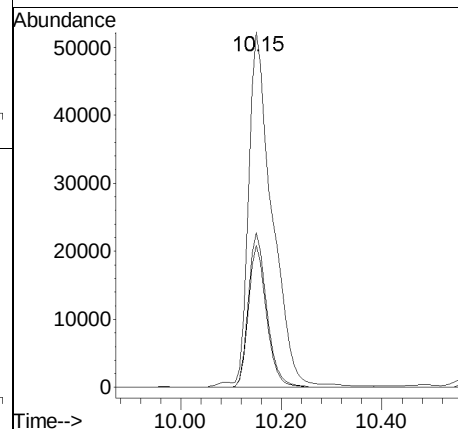
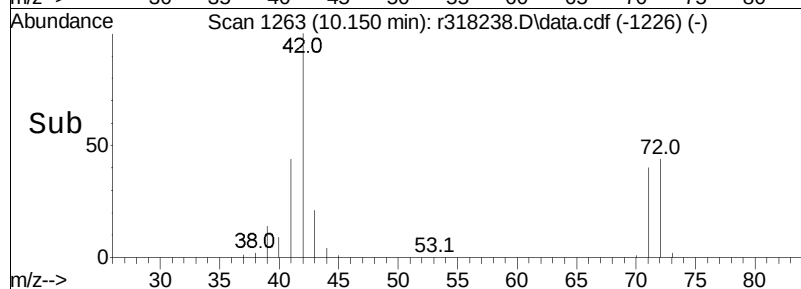
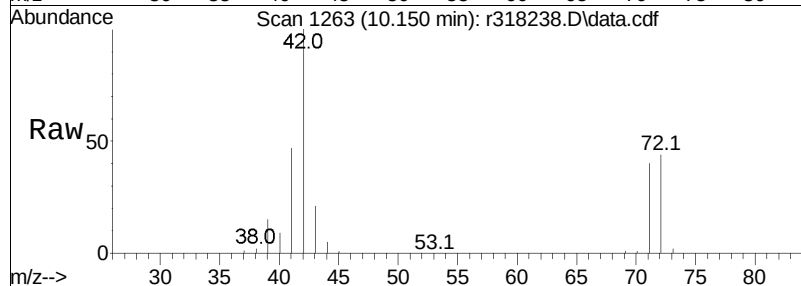
Tgt Ion: 42 Resp: 171229

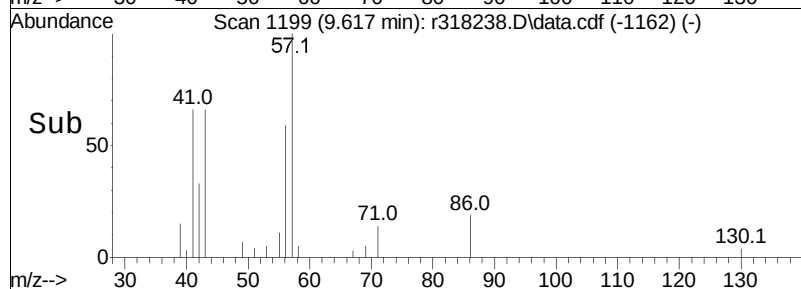
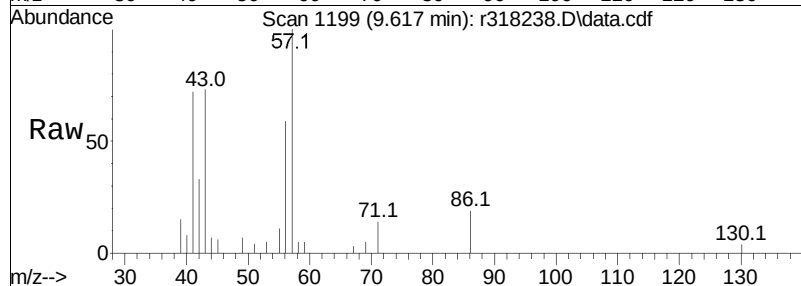
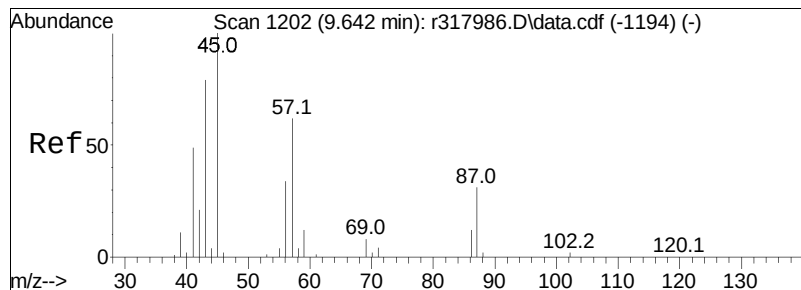
Ion Ratio Lower Upper

42 100

71 40.0 32.1 48.1

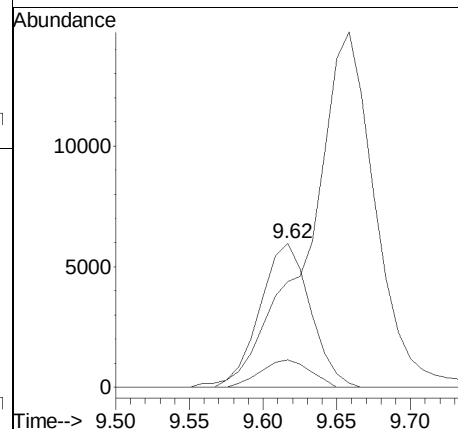
72 43.5 35.0 52.6

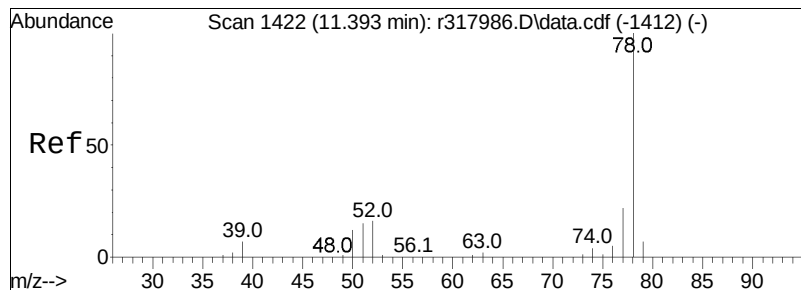




#44
hexane
Concen: 0.30 ppbV
RT: 9.62 min Scan# 1199
Delta R.T. -0.025 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

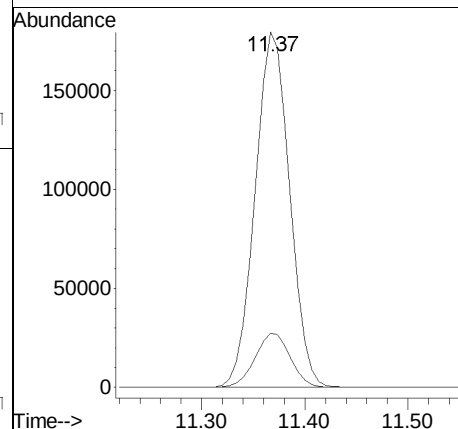
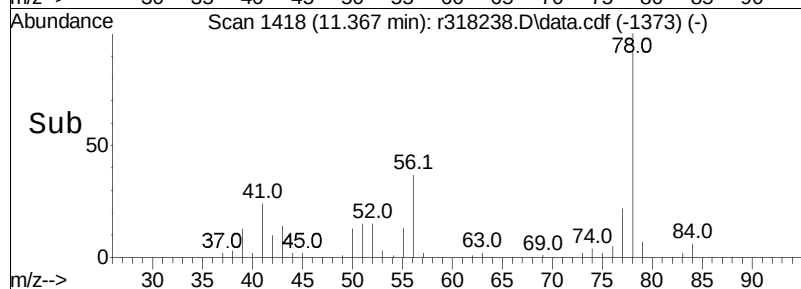
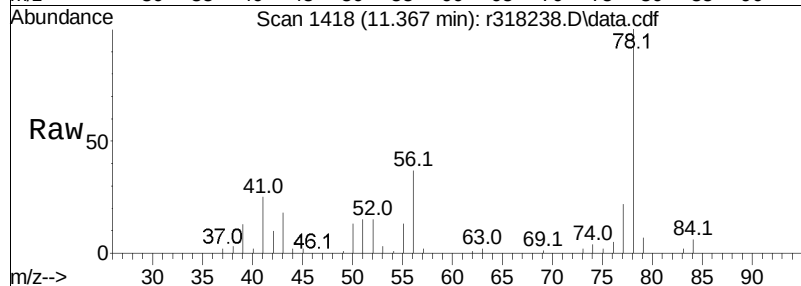
Tgt Ion	Ratio	Lower	Upper
57	100		
43	73.4	102.6	153.8#
86	19.1	15.9	23.9

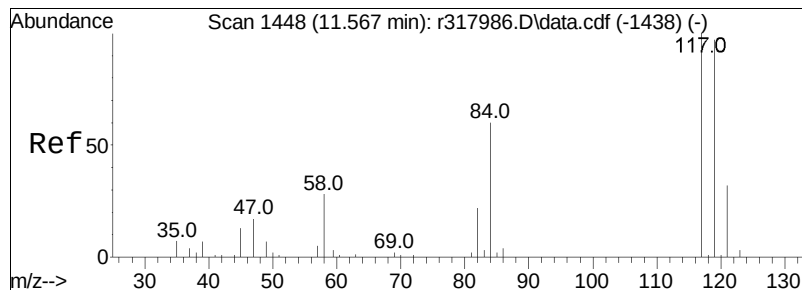




#50
benzene
Concen: 4.43 ppbV
RT: 11.37 min Scan# 1418
Delta R.T. -0.027 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

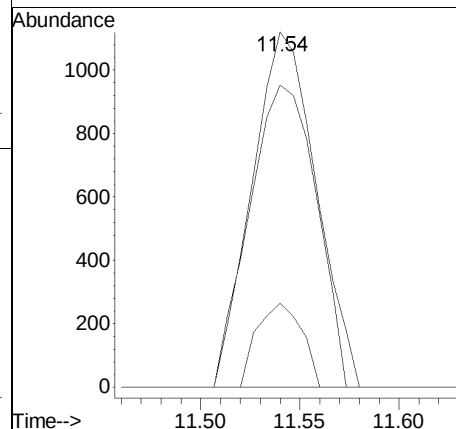
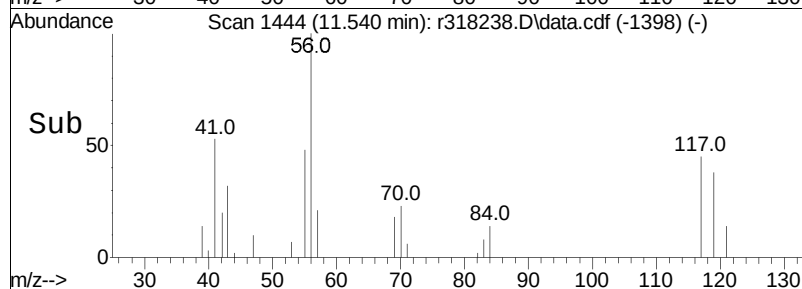
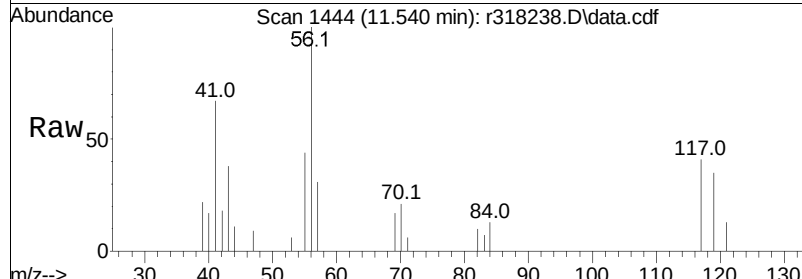
Tgt	Ion	Ratio	Lower	Upper
78	100			
52	15.3	12.6	19.0	

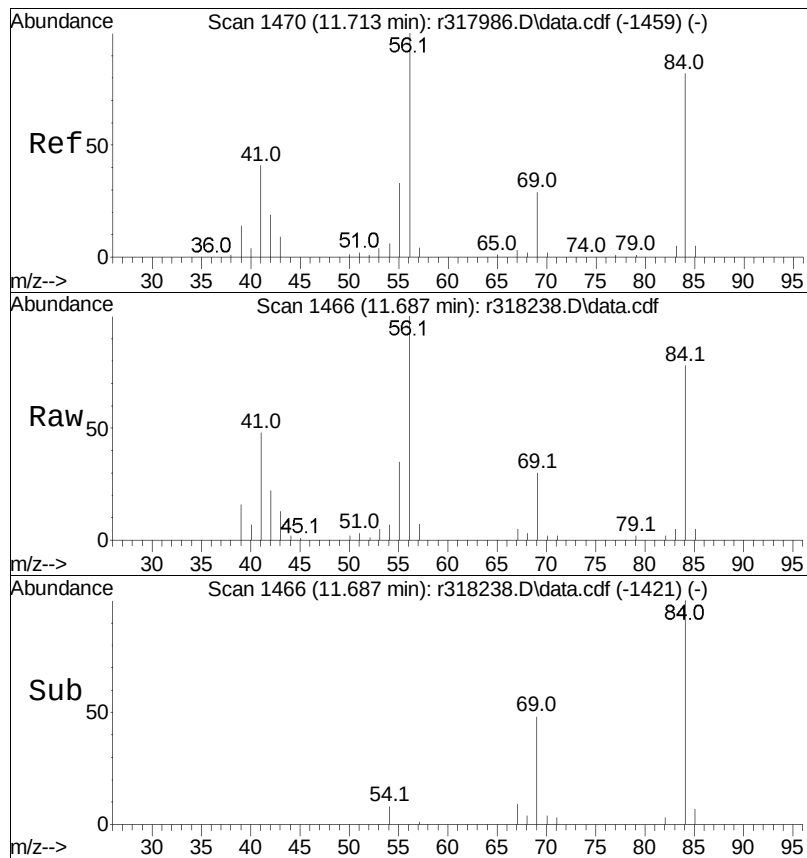




#52
carbon tetrachloride
Concen: 0.08 ppbV
RT: 11.54 min Scan# 1444
Delta R.T. -0.027 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

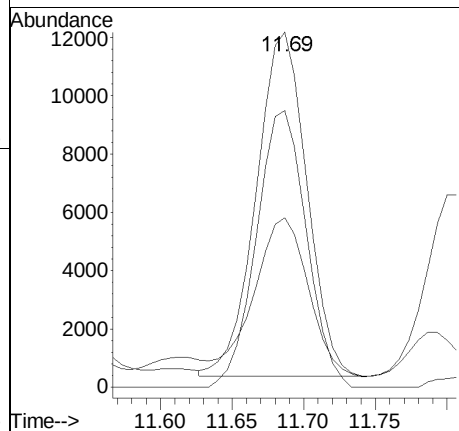
Tgt Ion	Ratio	Lower	Upper
117	100		
119	85.1	77.9	116.9
82	23.7	18.0	27.0

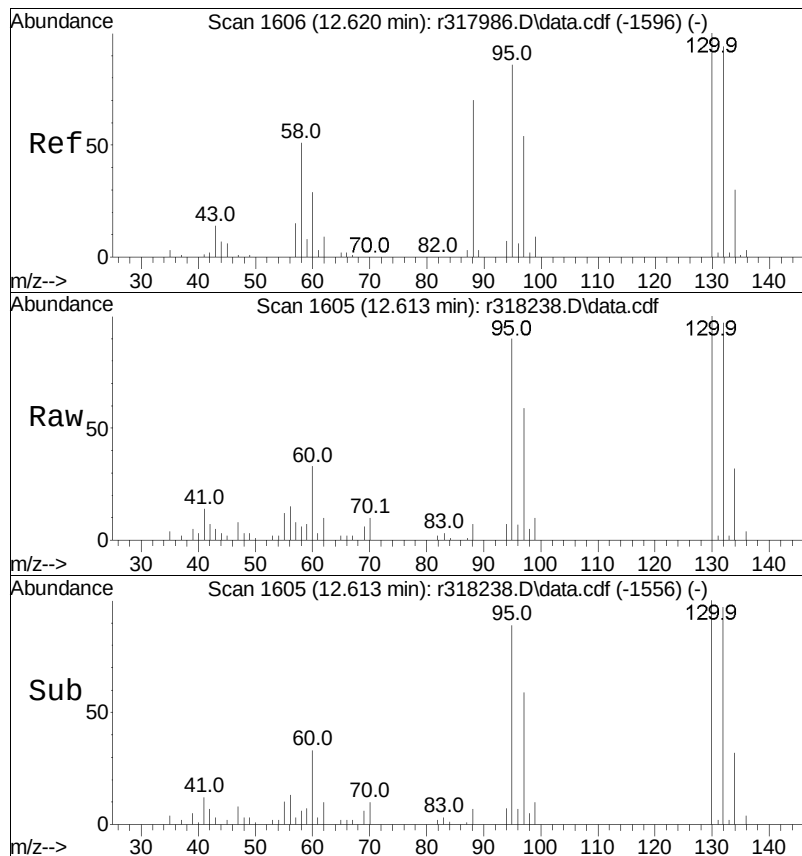




#53
cyclohexane
Concen: 0.56 ppbV
RT: 11.69 min Scan# 1466
Delta R.T. -0.027 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

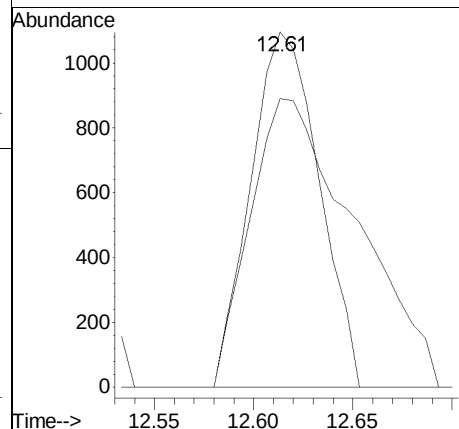
Tgt	Ion: 56	Resp:	28901
Ion	Ratio	Lower	Upper
56	100		
84	77.9	65.6	98.4
41	47.8	32.8	49.2

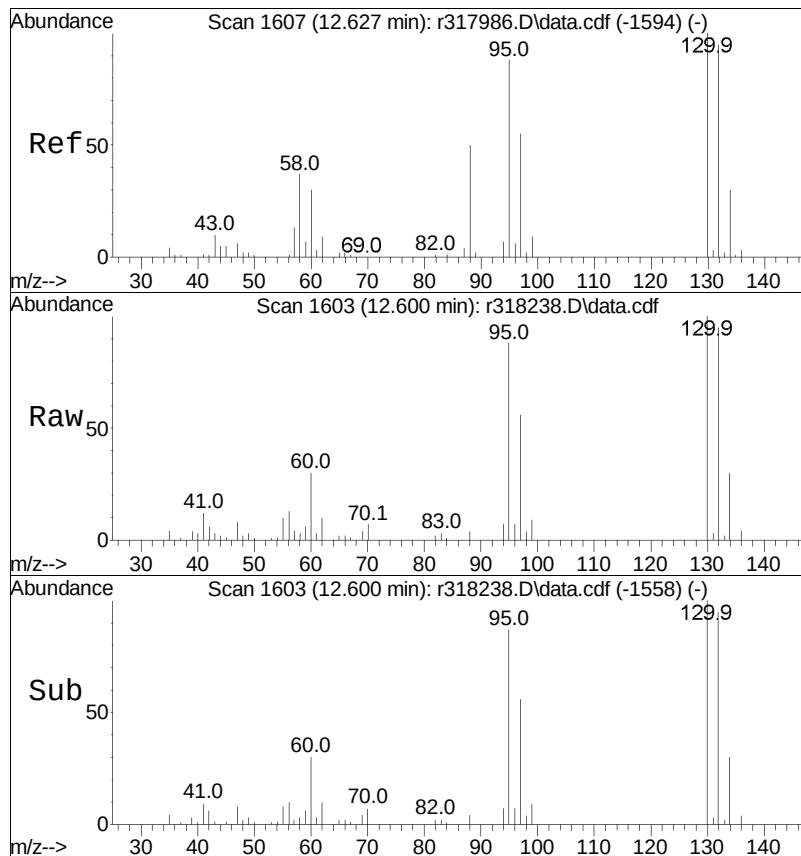




#58
 1,4-dioxane
 Concen: 0.13 ppbV
 RT: 12.61 min Scan# 1605
 Delta R.T. -0.007 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

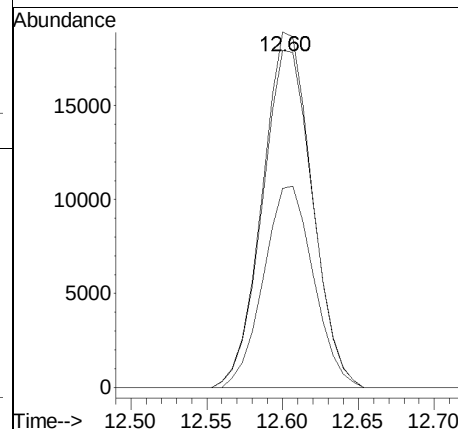
Tgt	Ion	Ratio	Lower	Upper
88	100			
58	81.3	58.5	87.7	

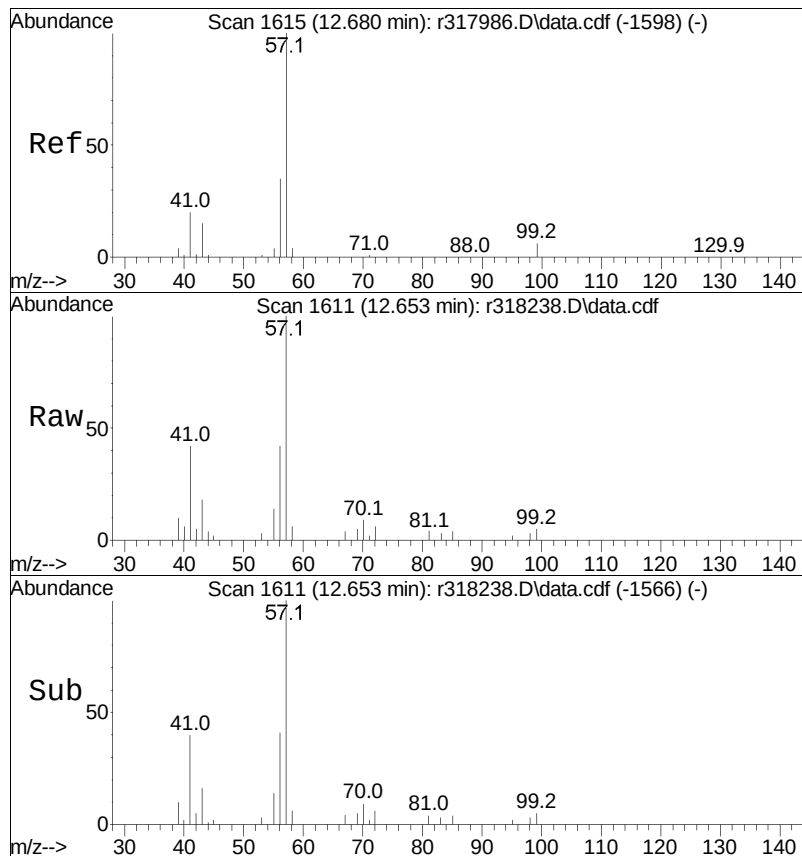




#59
trichloroethene
Concen: 1.27 ppbV
RT: 12.60 min Scan# 1603
Delta R.T. -0.027 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

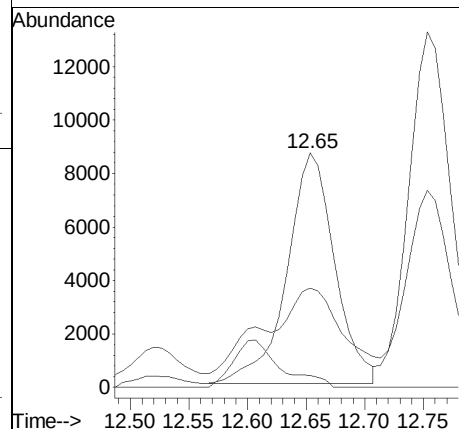
Tgt Ion:	130	Resp:	43063
Ion Ratio	Lower	Upper	
130	100		
132	94.9	76.2	114.4
97	56.0	44.4	66.6

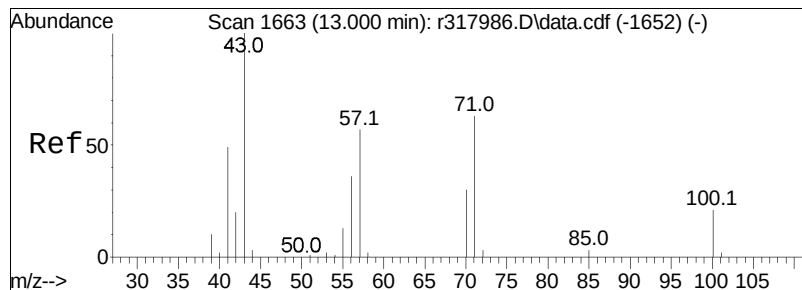




#60
 2,2,4-trimethylpentane
 Concen: 0.16 ppbV
 RT: 12.65 min Scan# 1611
 Delta R.T. -0.027 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

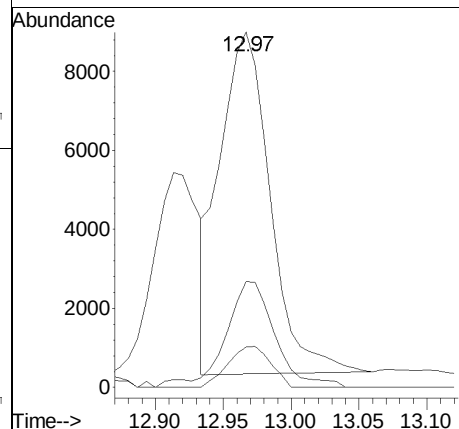
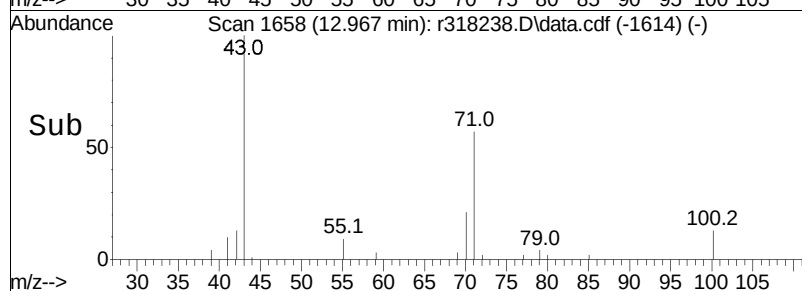
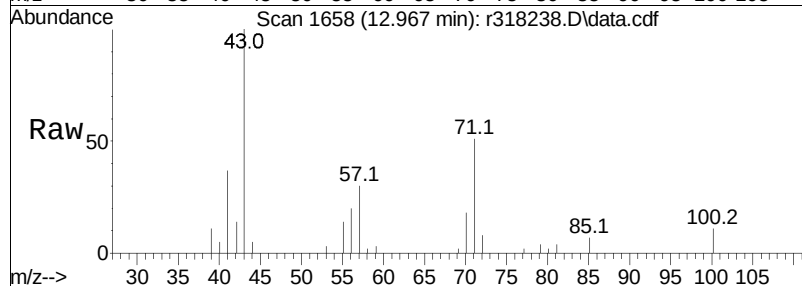
Tgt Ion	Ratio	Lower	Upper
57	100		
99	5.1	4.7	7.1
41	42.4	15.8	23.8

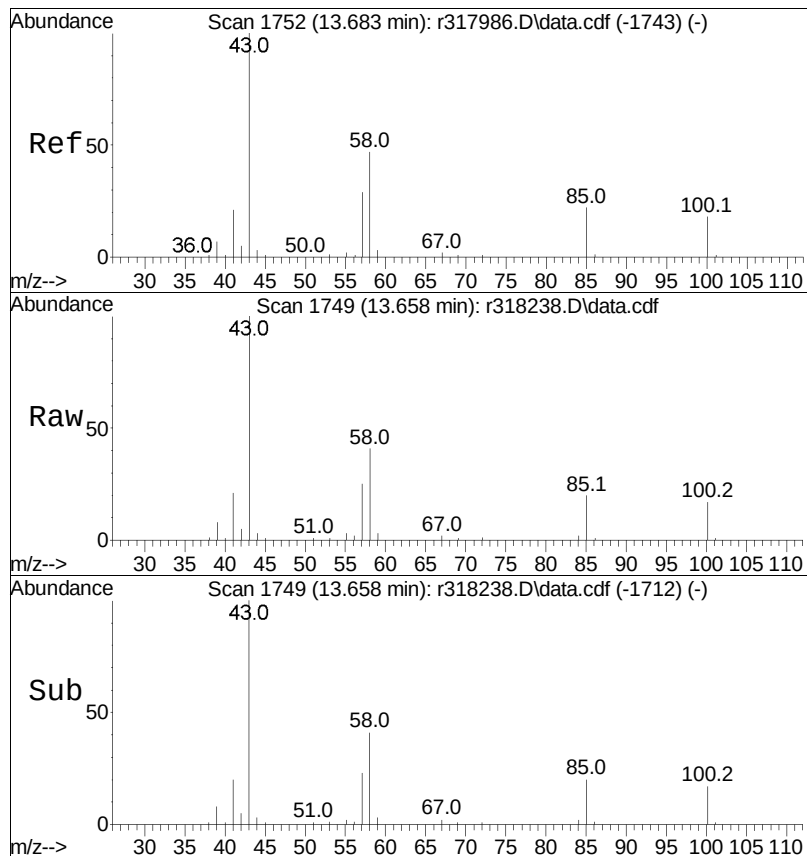




#62
heptane
Concen: 0.42 ppbV
RT: 12.97 min Scan# 1658
Delta R.T. -0.033 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

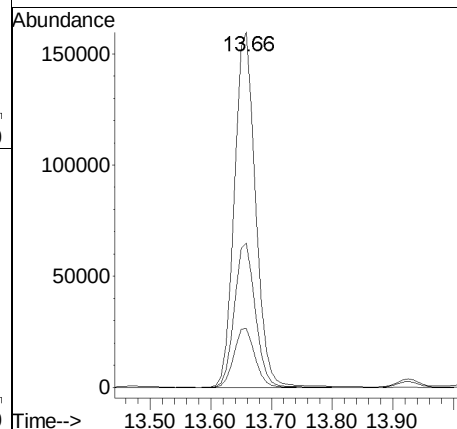
Tgt Ion	Ratio	Lower	Upper
43	100		
57	29.7	45.7	68.5#
100	11.3	17.0	25.6#

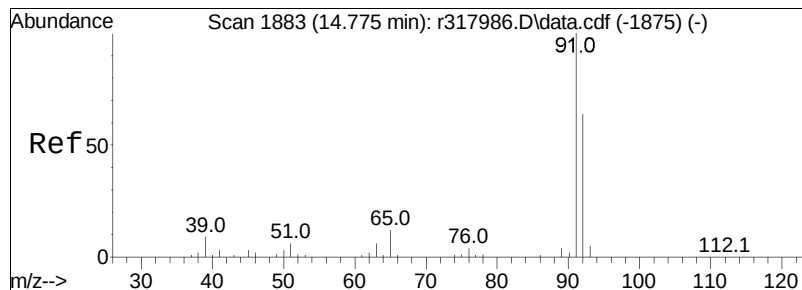




#64
 4-methyl-2-pentanone
 Concen: 6.49 ppbV
 RT: 13.66 min Scan# 1749
 Delta R.T. -0.025 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

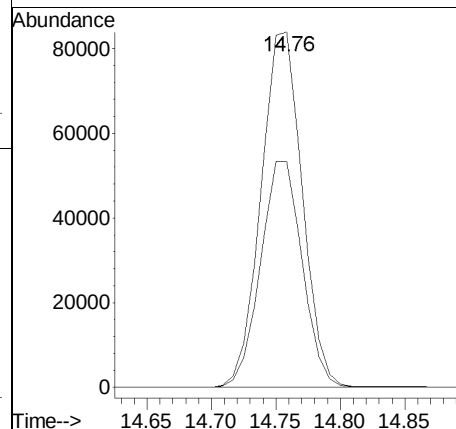
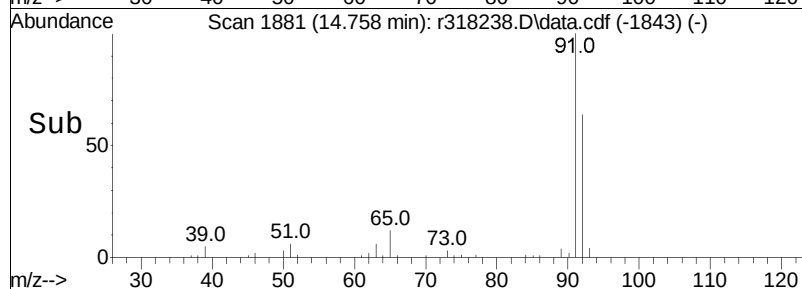
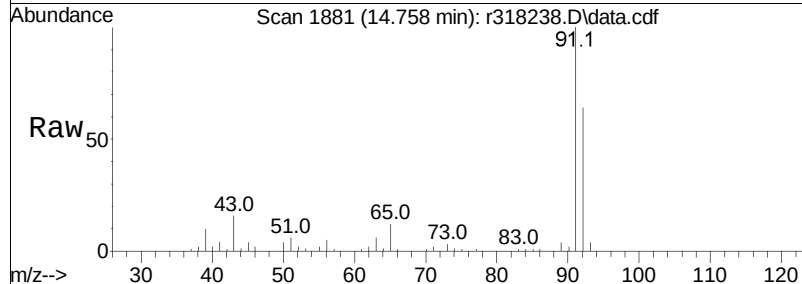
Tgt Ion:	43	58	100	Resp:	389110	Lower	Upper
Ratio	100	40.6	16.6				
		37.4	14.3				
		56.0	21.5				

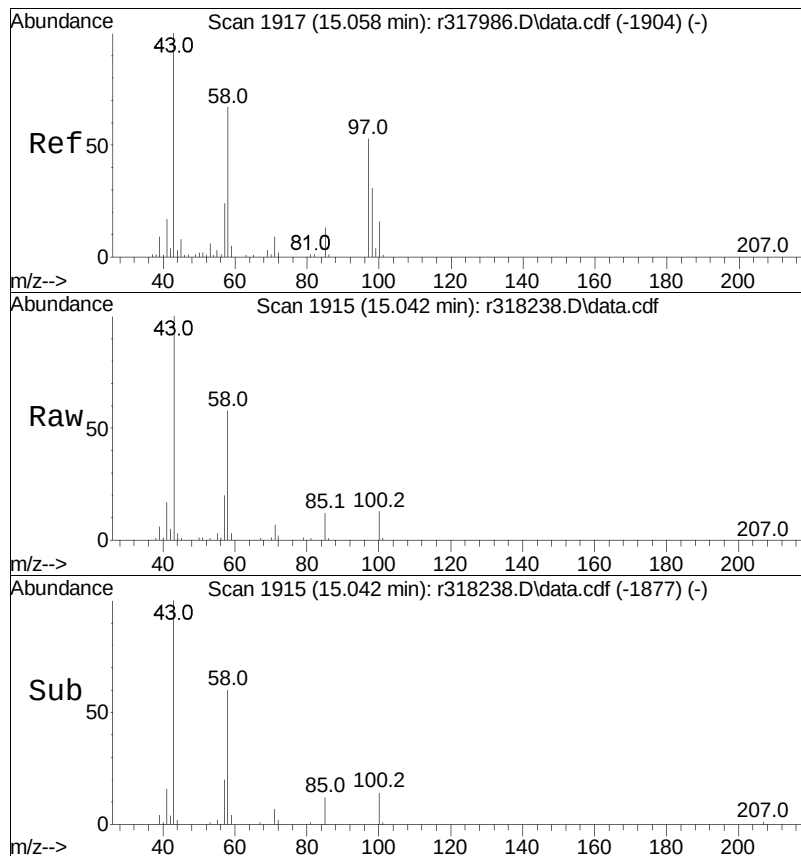




#68
toluene
Concen: 1.79 ppbV
RT: 14.76 min Scan# 1881
Delta R.T. -0.017 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

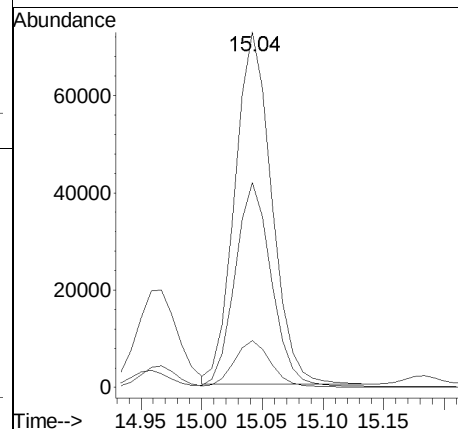
Tgt Ion	Ratio	Lower	Upper
91	100		
92	63.6	51.4	77.0

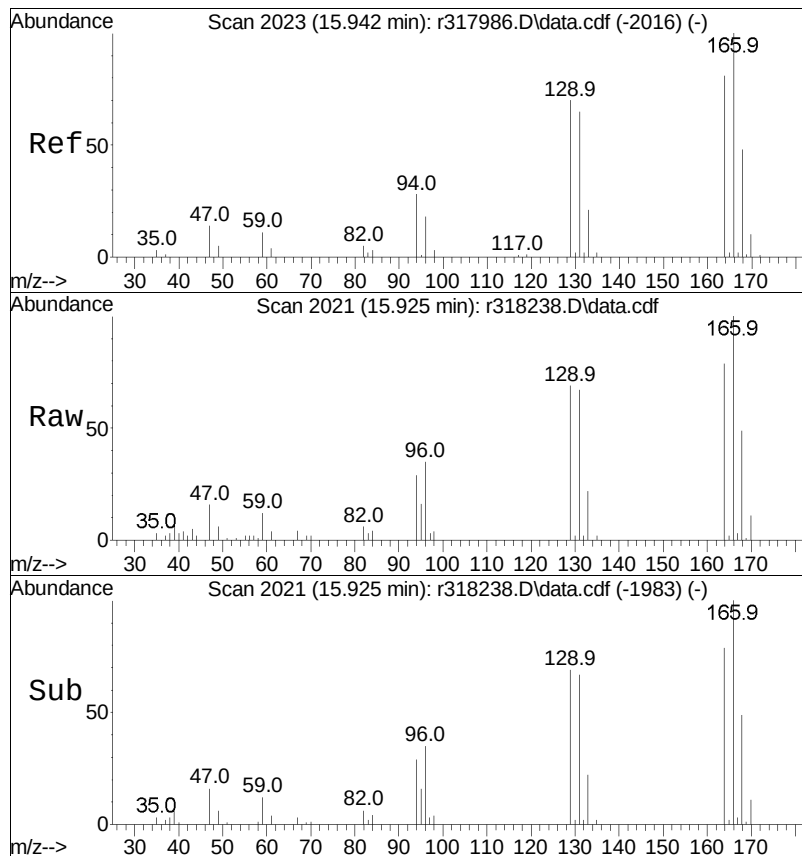




#72
 2-hexanone
 Concen: 2.66 ppbV
 RT: 15.04 min Scan# 1915
 Delta R.T. -0.017 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

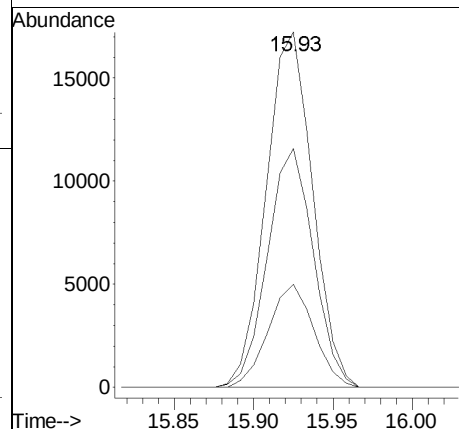
Tgt Ion:	43	Resp:	152837
Ion Ratio	Lower	Upper	
43	100		
58	57.6	53.9	80.9
100	13.2	12.4	18.6

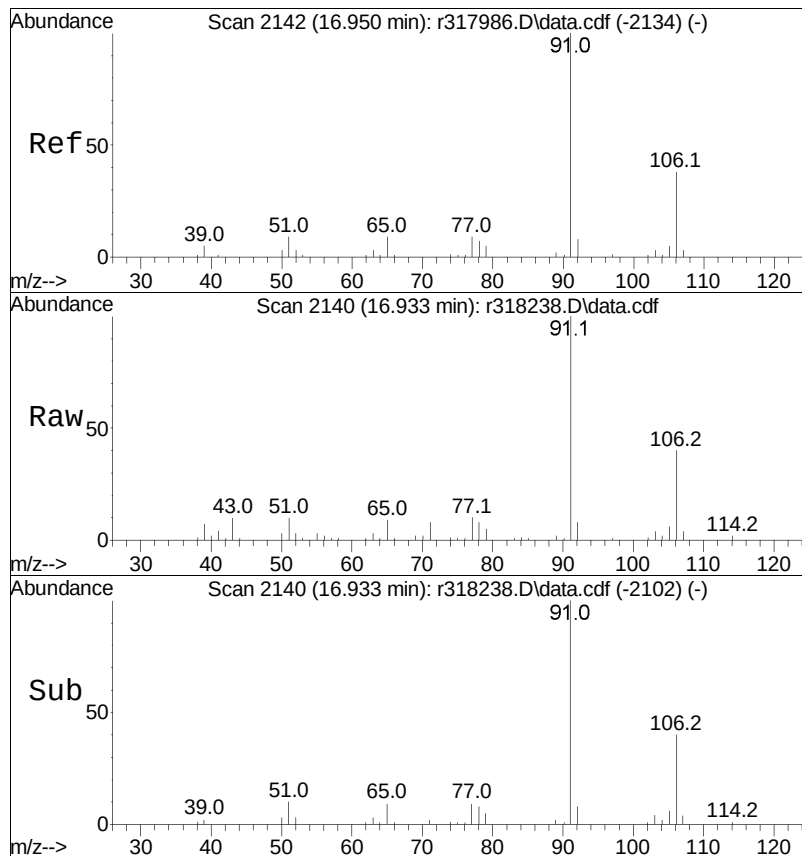




#78
 tetrachloroethene
 Concen: 0.81 ppbV
 RT: 15.93 min Scan# 2021
 Delta R.T. -0.017 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

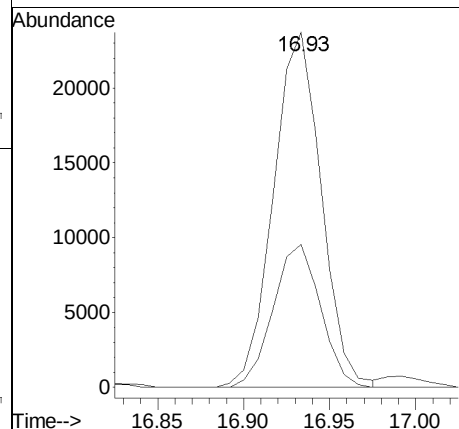
Tgt Ion:	166	Resp:	35104
Ion Ratio	Lower	Upper	
166	100		
131	67.2	52.1	78.1
94	29.0	22.6	34.0

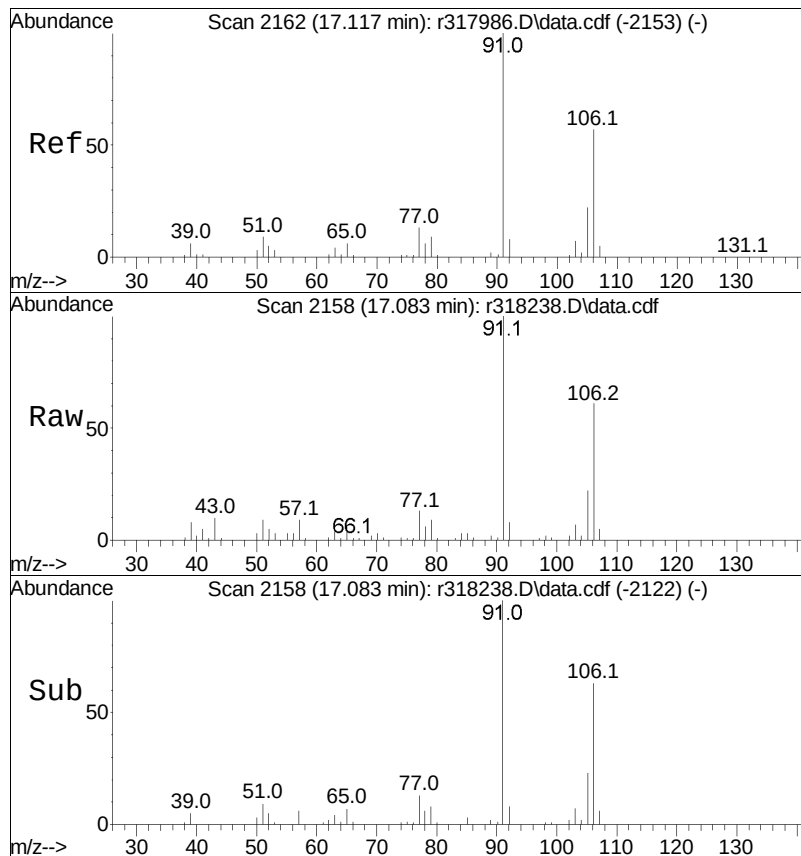




#81
ethylbenzene
Concen: 0.39 ppbV
RT: 16.93 min Scan# 2140
Delta R.T. -0.017 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

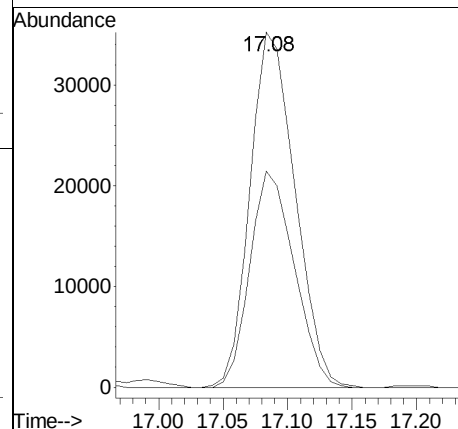
Tgt	Ion	Resp	Lower	Upper
91	100	45913		
106	40.2	30.4	45.6	

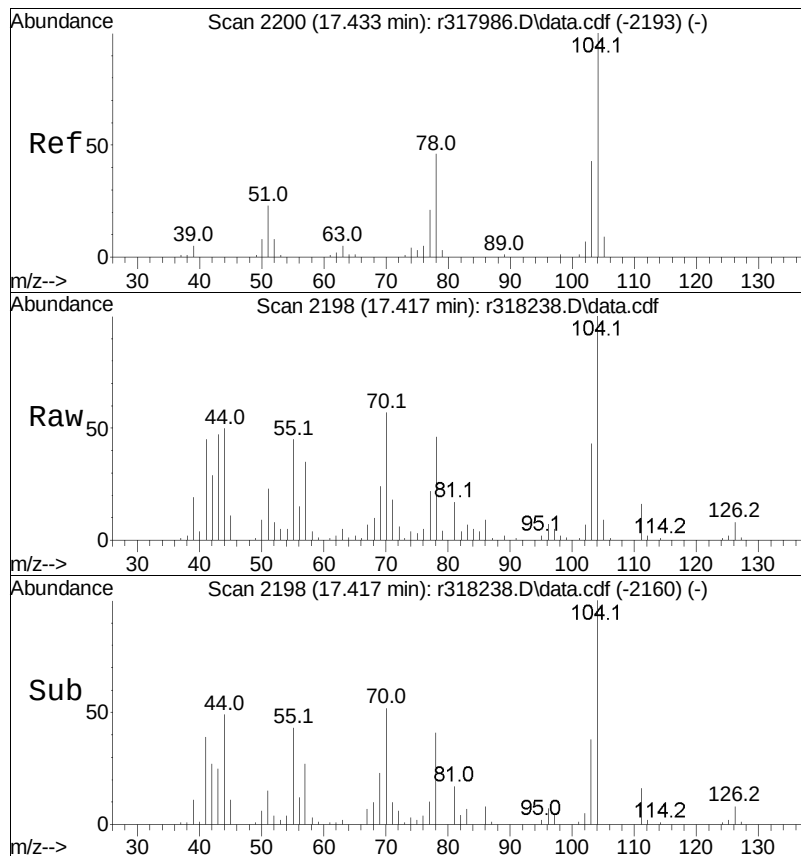




#83
 m+p-xylene
 Concen: 0.90 ppbV
 RT: 17.08 min Scan# 2158
 Delta R.T. -0.033 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

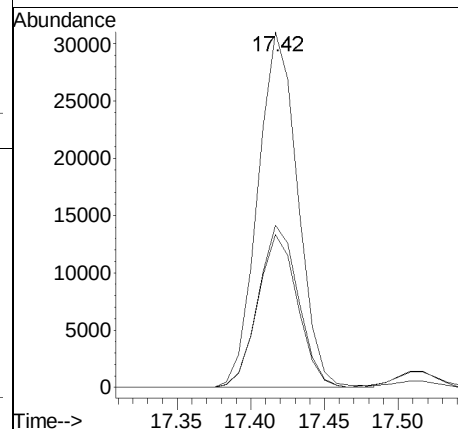
Tgt	Ion	Resp	Lower	Upper
91	100	85729		
106	60.9	45.9	68.9	

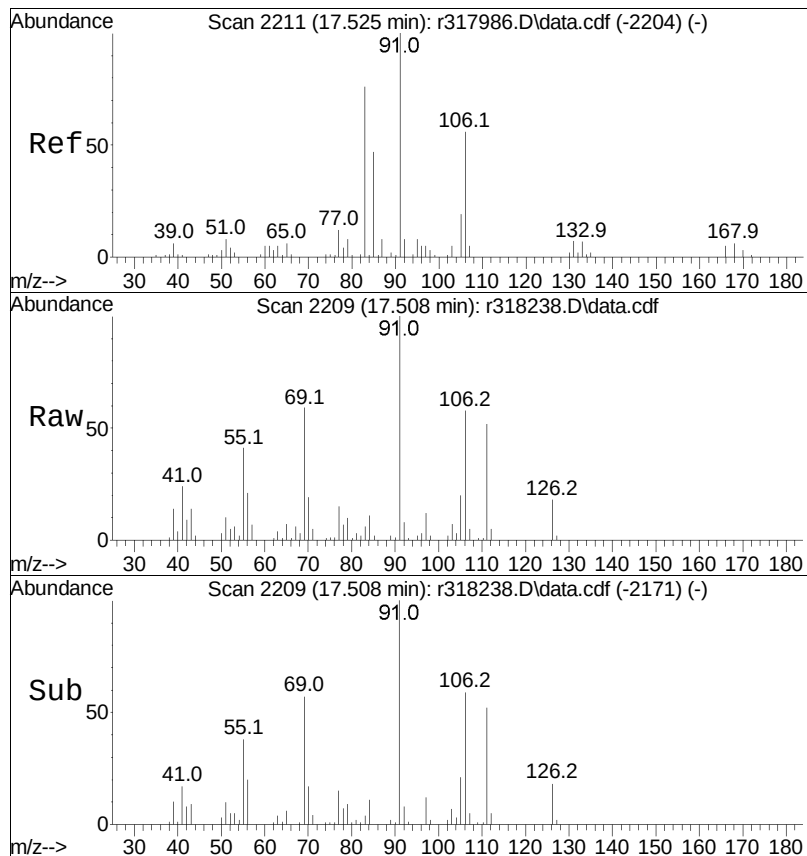




#85
styrene
Concen: 0.72 ppbV
RT: 17.42 min Scan# 2198
Delta R.T. -0.017 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

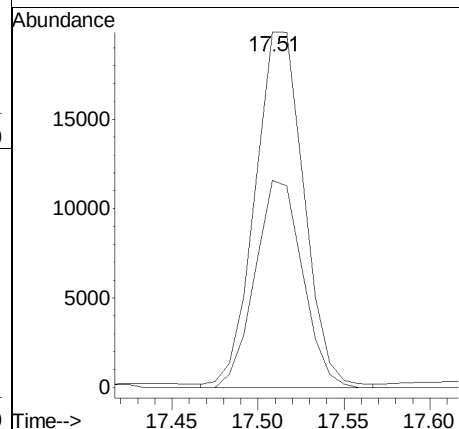
Tgt	Ion:104	Resp:	58477
Ion	Ratio	Lower	Upper
104	100		
103	43.0	34.2	51.4
78	45.6	36.5	54.7

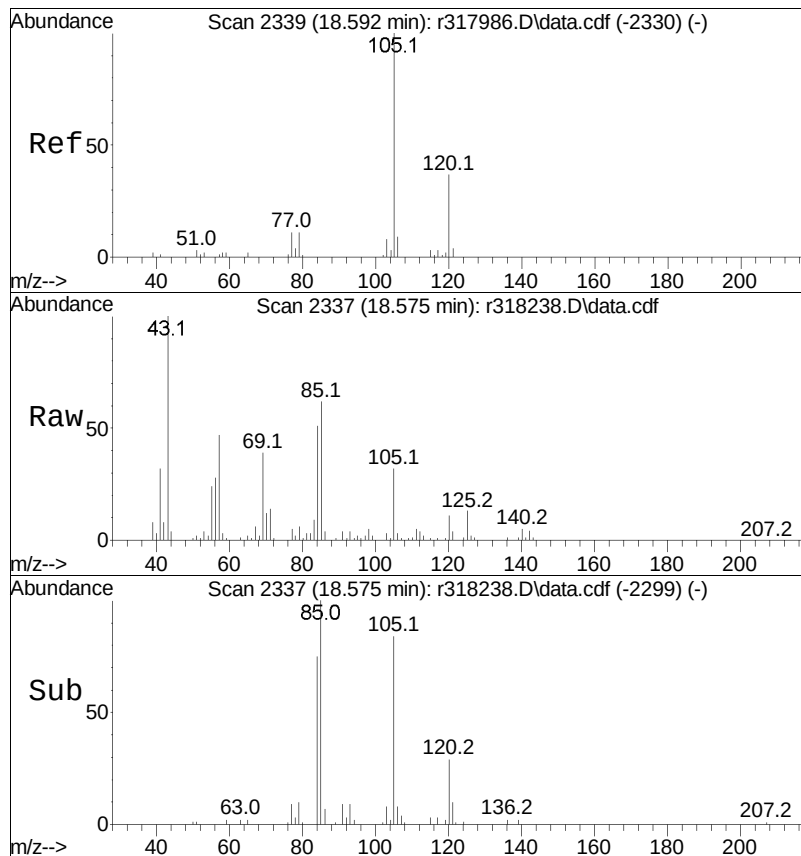




#87
o-xylene
Concen: 0.42 ppbV
RT: 17.51 min Scan# 2209
Delta R.T. -0.017 min
Lab File: r318238.D
Acq: 7 Oct 2021 11:27 PM

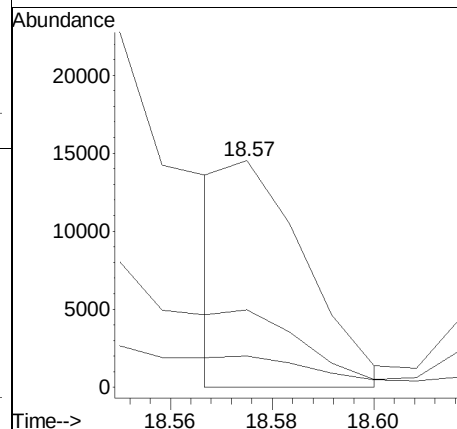
Tgt Ion: 91 Resp: 39420
Ion Ratio Lower Upper
91 100
106 58.2 44.6 66.8

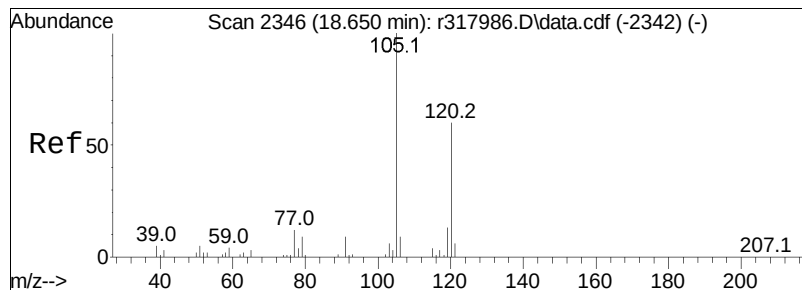




#96
 4-ethyl toluene
 Concen: 0.11 ppbV m
 RT: 18.57 min Scan# 2337
 Delta R.T. -0.017 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

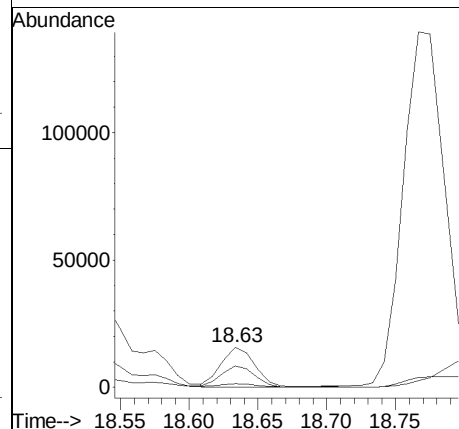
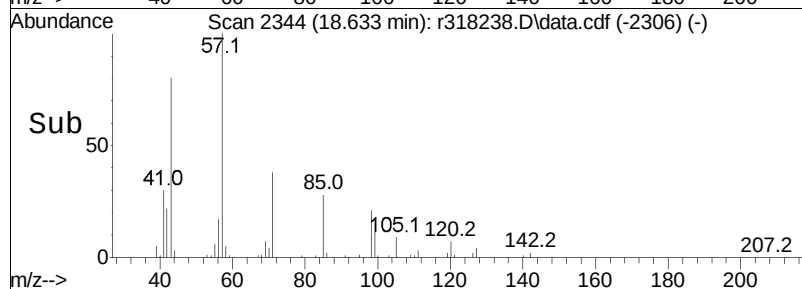
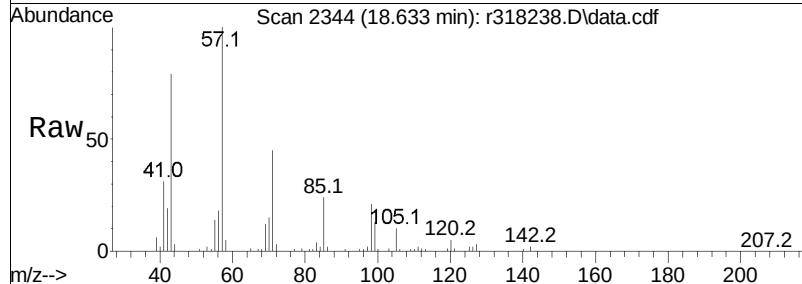
Tgt Ion:	105	Resp:	15545
Ion Ratio	Lower	Upper	
105	100		
120	34.2	29.9	44.9
91	13.8	7.8	11.8#

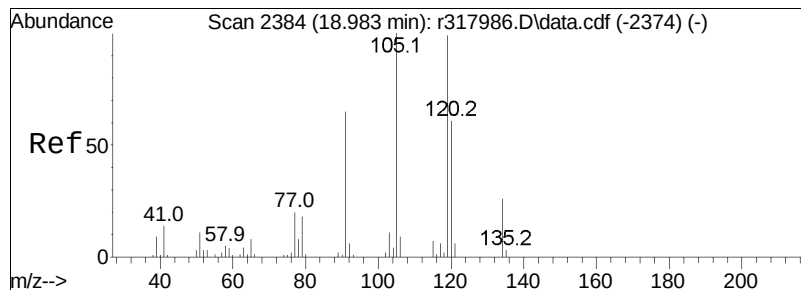




#97
 1,3,5-trimethylbenzene
 Concen: 0.23 ppbV
 RT: 18.63 min Scan# 2344
 Delta R.T. -0.017 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

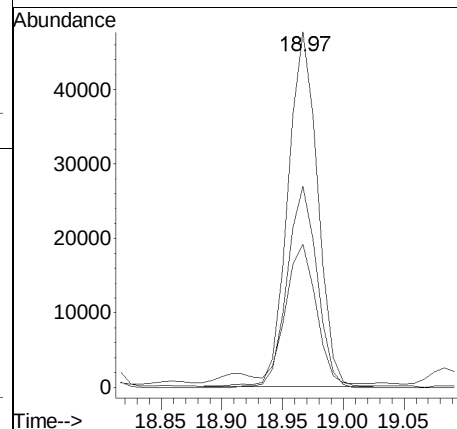
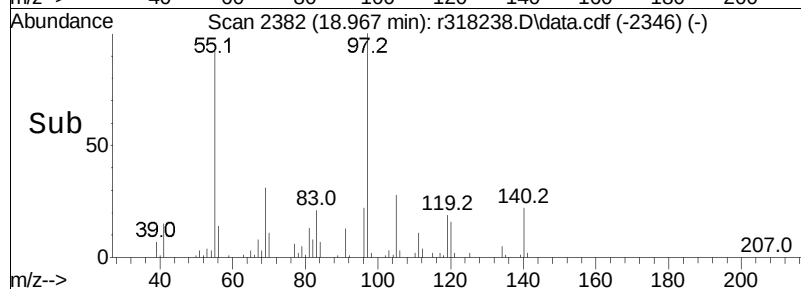
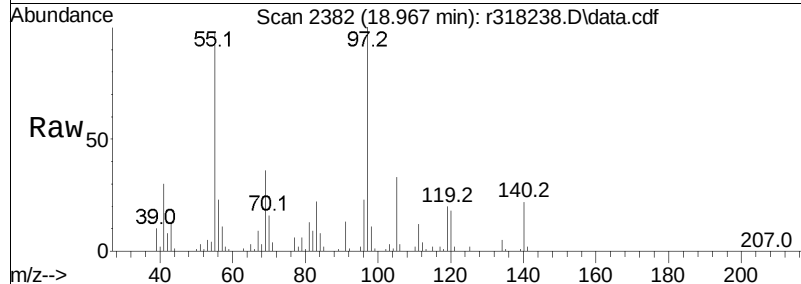
Tgt Ion	Ratio	Lower	Upper
105	100		
120	53.8	46.8	70.2
91	9.4	7.4	11.0





#99
 1,2,4-trimethylbenzene
 Concen: 0.73 ppbV
 RT: 18.97 min Scan# 2382
 Delta R.T. -0.017 min
 Lab File: r318238.D
 Acq: 7 Oct 2021 11:27 PM

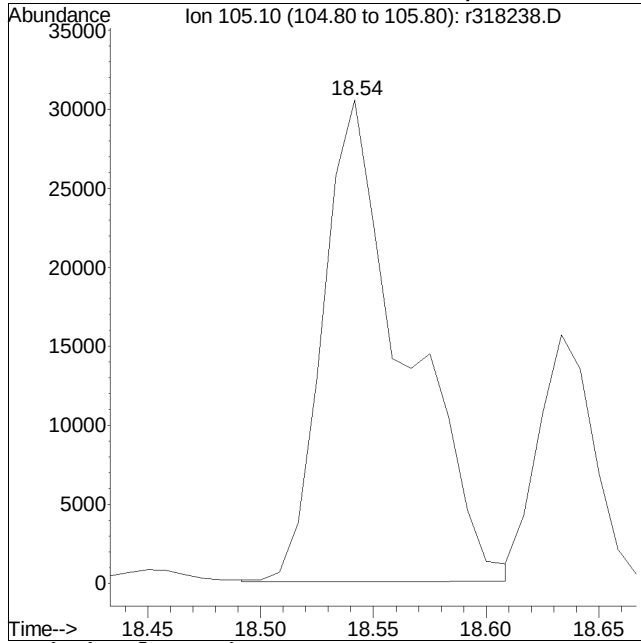
Tgt Ion	Ratio	Resp	Lower	Upper
105	100	80701		
120	56.6		49.1	73.7
91	40.3		52.3	78.5#



Manual Integration/Negative Proof Report

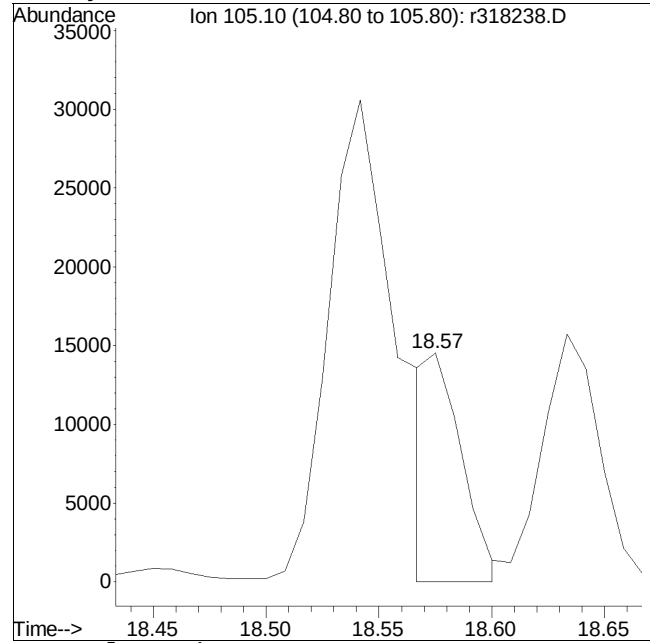
Data Path : 0:\Forensics\Data\Airpiano3QMethod : TFS3_210926.M
Data File : r318238.D Operator : AIRPIAN03:RY
Date Inj'd : 10/7/2020 0:1: 7 Instrument :
Sample : WG1555827-5,3,250,250 Quant Date : 10/8/2021 8:03 am

Compound #96: 4-ethyl toluene



Original Peak Response = 77782

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 15545 M6

Calculation of Volatile Organic Compounds in Air

The instrument will calculate the concentration (ppbv). If the sample is diluted (DF), the result is multiplied by the DF to generate the final result.

$$\text{Result, ppbv} = C_s \times \text{DF}$$

Where:

C_s = Concentration of sample (ppbv)

DF = Dilution Factor

Calculation of Instrument Dilution Factor

For dilutions, smaller sample volumes (< 250mL) are analyzed. The smallest volume that can be analyzed with accuracy is 10 mL.

Samples that arrive at the laboratory with pressures below -15 inches Hg must be pressurized with zero air to greater than -15 inches Hg. This pressurization results in a dilution factor.

Calculation of Dilution Factor

$$\text{DF} = V_{\text{cf}} / V_{\text{ci}}$$

Where:

V_{ci} = volume of air in canister prior to pressurization, L

P =

Conversion of ppbv to $\mu\text{g}/\text{m}^3$

$$\mu\text{g}/\text{m}^3 = (\text{ppbv}) \times \text{MW} / 24.47$$

Where:

24.47 = molar gas constant (g/g-mole)

MW = molecular weight of the compound of interest

Dilution Factor for Pressurization of Subatmospheric Samples: Three Steps

Step 1: Calculate the volume in the canister prior to pressurization (Assume a 2.7 liter canister is used).

Dilution Factor for Pressurization of Subatmospheric Samples: Three Steps

Step 1: Calculate the volume in the canister prior to pressurization (Assume a 2.7 liter canister is used).

$$V_{ci} = 2.7 * PI / 14.696$$

Step 2: Calculate the volume in the canister after pressurization.

$$V_{cf} = 2.7 * PF / 14.696$$

Step 3: Calculate the dilution factor.

$$DF = V_{cf} / V_{ci}$$

Where:

V_{ci} = volume of air in canister prior to pressurization, L

PI = pressure reading of canister prior to pressurization (psia)

V_{cf} = volume of air in canister after pressurization, L

PF = pressure reading of canister after pressurization (psia)

DF = dilution factor

14.696 = atmospheric pressure (psia)

ALPHA ANALYTICAL LABORATORIES, INC.

Alpha WORK GROUP REPORT (wk02)

Oct 08 2021, 02:00 pm

Work Group: WG1555827 for Department: 3 GC/MS

Created: 07-OCT-21 Due: Operator: AW

Sample	Client ID	C Product	Matrix	Stat	UA	HOLD	DUE	PR	Location
L2153835-01	132_LSV-19	S T015-LL	SOIL_VAPOR	DONE	U	1103	1011	S0	Can-6
L2153835-02	133_LSV-20	S T015-LL	SOIL_VAPOR	DONE	U	1103	1011	S0	Can-6
L2153835-03	138_AMBIENT-2	S T015-LL	AIR	DONE	U	1103	1011	S0	Can-6
L2153889-01	SV1	S T015-LL	SOIL_VAPOR	DONE	U	1103	1012	S0	Can-2.7
L2153889-02	SV2	S T015-LL	SOIL_VAPOR	DONE	U	1103	1012	S0	Can-2.7
L2154105-01	SG-1	S T015-LL	SOIL_VAPOR	DONE	U	1103	1012	S0	Can-2.7
L2154105-02	SG-2	S T015-LL	SOIL_VAPOR	DONE	U	1103	1012	S0	Can-2.7
L2154105-03	SG-3	S T015-LL	SOIL_VAPOR	DONE	U	1103	1012	S0	Can-2.7
L2154105-04	SG-4	S T015-LL	SOIL_VAPOR	DONE	U	1103	1012	S0	Can-2.7
L2154105-05	SG-5	S T015-LL	SOIL_VAPOR	DONE	U	1104	1012	S0	Can-2.7
L2154105-06	SG-6	S T015-LL	SOIL_VAPOR	DONE	U	1104	1012	S0	Can-2.7
L2154177-01	CAN 3544	S T015-LL	AIR	DONE	U	1104	1012	NC	Can-1
L2154177-02	CAN 3539	S T015-LL	AIR	DONE	U	1104	1012	NC	Can-1
L2154177-03	CAN 3554	S T015-LL	AIR	DONE	U	1104	1012	NC	Can-1
L2154669-01	CAN 2563 SHELF 32	S T015-LL	AIR	DONE	U	1105	1014	NC	Can-6
L2154669-02	CAN 2957 SHELF 49	S T015-LL	AIR	DONE	U	1105	1014	NC	Can-6
L2154669-03	CAN 1609 SHELF 52	S T015-LL	AIR	DONE	U	1105	1014	NC	Can-6
WG1555827-1	MS BFB Tune Standard	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555827-1	MS BFB Tune Standard	S T015-LL	AIR	DONE	U				
WG1555827-2	Continuing Calibrati	S T015-LL	AIR	DONE	U				
WG1555827-2	Continuing Calibrati	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555827-3	Laboratory Control S	S T015-LL	AIR	DONE	U				
WG1555827-3	Laboratory Control S	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555827-4	Laboratory Method Bl	S T015-LL	AIR	DONE	U				
WG1555827-4	Laboratory Method Bl	S T015-LL	SOIL_VAPOR	DONE	U				
WG1555827-5	Duplicate Sample	S T015-LL	AIR	DONE	U				
WG1555827-5	Duplicate Sample	S T015-LL	SOIL_VAPOR	DONE	U				
Comments:									
WG1555827-5	L2153889-01								

Alpha Analytical Air Lab Instrument Run Log

Instrument ID: Airpiano3

Internal Standard/Surrogate IDs: SS20-028 / SS21-026

Date: 09/26/21

Internal Standard/Surrogate Volume: 100 ml

Analyst Initials: TS

Sequence File Name: 210926.S

SIM ICAL# 18243

Full Scan ICAL# 18242

APH ICAL# 18240

PIANO ICAL# 18053

AS Position #	Sample ID	Acquisition Method	Data File ID	Standard ID or Batch ID #, ICAL Ref #	Comment (s)	Product/ sublist	Leak Check Pass ? Y/ N
1	BA3092601	TO15_SFS.qgm	R317975.qgd	250 mL			NA
1	BA3092602	TO15_SFS.qgm	R317976.qgd	250 mL			NA
1	BA3092603	TO15_SFS.qgm	R317977.qgd	250 mL			NA
1	TA3092601	TO15_SFS.qgm	R317978.qgd	250 mL	TUNE		NA
5	ITO15-SIMSTD0.02	TO15_SFS.qgm	R317979.qgd	50 mL SS21-031D	SIM ONLY	DEFAULT	NA
5	ITO15-SIMSTD0.05	TO15_SFS.qgm	R317980.qgd	125 mL SS21-031D	SIM ONLY	DEFAULT	NA
5	ITO15-SIMSTD0.1	TO15_SFS.qgm	R317981.qgd	250 mL SS21-031D	SIM ONLY	DEFAULT	NA
6	ITO15-SIMSTD0.2	TO15_SFS.qgm	R317982.qgd	50 mL SS21-031C		DEFAULT	NA
6	ITO15-SIMSTD0.5	TO15_SFS.qgm	R317983.qgd	125 mL SS21-031C		DEFAULT	NA
6	ITO15-SIMSTD1.0	TO15_SFS.qgm	R317984.qgd	250 mL SS21-031C		DEFAULT	NA
7	ITO15-SIMSTD5.0	TO15_SFS.qgm	R317985.qgd	125 mL SS21-031B		DEFAULT	NA
7	ITO15-SIMSTD010	TO15_SFS.qgm	R317986.qgd	250 mL SS21-031B		DEFAULT	NA
8	ITO15-SIMSTD020	TO15_SFS.qgm	R317987.qgd	50 mL SS21-031A		DEFAULT	NA
8	ITO15-SIMSTD050	TO15_SFS.qgm	R317988.qgd	125 mL SS21-031A		DEFAULT	NA
8	ITO15-LLSTD100	TO15_SFS.qgm	R317989.qgd	250 mL SS21-031A	LL ONLY	DEFAULT	NA
1	BA3092601	TO15_SFS.qgm	R317990.qgd	250 mL			NA
1	BA3092602	TO15_SFS.qgm	R317991.qgd	250 mL			NA
2	CTO15-LLSTD010	TO15_SFS.qgm	R317992.qgd	250 mL SS21-027C	LL ICV	DEFAULT _ ICV_ AP2	NA
2	CTO15-SIMSTD5.0	TO15_SFS.qgm	R317993.qgd	125 mL SS21-027C	SIM ICV	DEFAULT _ ICV_ AP2	NA

Alpha Analytical Air Lab Instrument Run Log

Date(s) of Initial Calibration: Refer to Initial Calibration Summary Form 6

Date Acquired: see Instrument Performance Check Summary and/or quantitation report.

Sample ID information: L1301234-01,3,250,250 { Lab sample ID, dept #, actual volume analyzed (mL), nominal volume analyzed (mL) }

Dilution Factor: See Form 1 report, or divide nominal volume by actual volume analyzed

Alpha Analytical Air Lab Instrument Run Log

Instrument ID: Airpiano3

Internal Standard/Surrogate IDs: SS20-028 / SS21-026

Date: 10/07/21

Internal Standard/Surrogate Volume: 100 ml

Analyst Initials: AW

Sequence File Name: 211007.S

SIM ICAL# 18332

Full Scan ICAL# 18331

APH ICAL# 18333

PIANO ICAL#

AS Position #	Sample ID	Acquisition Method	Data File ID	Standard ID or Batch ID #, ICAL Ref #	Comment (s)	Product/ sublist	Leak Check Pass? Y/N
1	TA3100701	TO15_SFS.qgm	R318221.qgd	250 mL	TUNE		NA
2	CAPH-10STD10	TO15_SFS.qgm	R318222.qgd	125 mL SS21-030B2	APH CC		NA
3	CA3100701	TO15_SFS.qgm	R318223.qgd	250 mL SS21-031G	LL CC		NA
4	CTO15-LLSTD10	TO15_SFS.qgm	R318224.qgd	250 mL SS21-027C	LL LCS		NA
4	CTO15-SIMSTD5	TO15_SFS.qgm	R318225.qgd	125 mL SS21-027C	SIM LCS		NA
1	BA3100701	TO15_SFS.qgm	R318226.qgd	250 mL	LL BLANK		NA
1	BA3100702	TO15_SFS.qgm	R318227.qgd	250 mL	SIM BLANK		NA
1	L2154669-01,3,250,250	TO15_SFS.qgm	R318228.qgd	250 mL		LL/SIM/APH	Y
2	L2154669-02,3,250,250	TO15_SFS.qgm	R318229.qgd	250 mL		LL/SIM/APH	Y
3	L2154669-03,3,250,250	TO15_SFS.qgm	R318230.qgd	250 mL		LL/SIM/APH	Y
4	L2154177-01,3,250,250	TO15_SFS.qgm	R318231.qgd	250 mL		LL/SIM	Y
5	L2154177-02,3,250,250	TO15_SFS.qgm	R318232.qgd	250 mL		LL/SIM	Y
6	L2154177-03,3,250,250	TO15_SFS.qgm	R318233.qgd	250 mL		LL/SIM	Y
7	L2153835-03,3,250,250	TO15_SFS.qgm	R318234.qgd	WG1555827,ICAL18331		40 COMPOUNDS LIST	Y
8	L2153835-01,3,250,250	TO15_SFS.qgm	R318235.qgd	WG1555827,ICAL18331		40 COMPOUNDS LIST	Y
9	L2153835-02D,3,35,250	TO15_SFS.qgm	R318236.qgd	WG1555827,ICAL18331	NT	40 COMPOUNDS LIST	Y
10	L2153889-01,3,250,250	TO15_SFS.qgm	R318237.qgd	WG1555827,ICAL18331		NY	Y
10	L2153889-01DUP,3,250,250	TO15_SFS.qgm	R318238.qgd	WG1555827,ICAL18331	LL DUP	NY	Y
11	L2153889-02,3,250,250	TO15_SFS.qgm	R318239.qgd	WG1555827,ICAL18331		NY	Y
12	L2154105-01,3,250,250	TO15_SFS.qgm	R318240.qgd	WG1555827,ICAL18331		NY	Y
13	L2154105-02D,3,180,250	TO15_SFS.qgm	R318241.qgd	WG1555827,ICAL18331	T	NY	Y

Alpha Analytical Air Lab Instrument Run Log

14	L2154105-03D,3,190,250	TO15_SFS.qgm	R318242.qgd	WG1555827,ICAL18331	T	NY	Y
15	L2154105-04,3,250,250	TO15_SFS.qgm	R318243.qgd	WG1555827,ICAL18331		NY	Y
16	L2154105-05,3,250,250	TO15_SFS.qgm	R318244.qgd	WG1555827,ICAL18331		NY	Y
1	L2154105-06,3,250,250	TO15_SFS.qgm	R318245.qgd	WG1555827,ICAL18331		NY	Y

Date(s) of Initial Calibration: Refer to Initial Calibration Summary Form 6

Date Acquired: see Instrument Performance Check Summary and/or quantitation report.

Sample ID information: L1301234-01,3,250,250 { Lab sample ID, dept #, actual volume analyzed (mL), nominal volume analyzed (mL) }

Dilution Factor: See Form 1 report, or divide nominal volume by actual volume analyzed

GC/MS VOA
Air Analysis
Selective Ion Monitoring

Volatiles QC Summary

Laboratory Control Sample Summary

Form 3

Air Volatiles

Client : Langan Engineering & Environmental Lab Number : L2153835
 Project Name : 990 ROSSVILLE AVENUE Project Number : 100849501
 Matrix : AIR
 LCS Sample ID : WG1555826-3 Analysis Date : 10/07/21 13:07 File ID : r318225_Ev2
 LCSD Sample ID : Analysis Date : File ID :

Parameter	Laboratory Control Sample			Laboratory Control Duplicate			RPD	Recovery Limits	RPD Limit
	True (ppbV)	Found (ppbV)	%R	True (ppbV)	Found (ppbV)	%R			
Vinyl chloride	5	4.32	86				-	70-130	25
1,1-Dichloroethene	5	4.21	84				-	70-130	25
cis-1,2-Dichloroethene	5	4.25	85				-	70-130	25
1,1,1-Trichloroethane	5	4.62	92				-	70-130	25
Carbon tetrachloride	5	4.84	97				-	70-130	25
Trichloroethene	5	4.66	93				-	70-130	25
Tetrachloroethene	5	4.89	98				-	70-130	25

Method Blank Summary
Form 4
Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153835
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Lab Sample ID	: WG1555826-4	Lab File ID	: r318227_Ev2
Instrument ID	: AIRPIANO3		
Matrix	: AIR	Analysis Date	: 10/07/21 15:42

Client Sample No.	Lab Sample ID	Analysis Date
WG1555826-3LCS	WG1555826-3	10/07/21 13:07
133_LSV-20	L2153835-02D	10/07/21 22:08
DUMMY 202DUP	WG1555826-5	10/07/21 23:27

Instrument Performance Check (Tune) Summary

Form 5

Air Volatiles

Bromofluorobenzene (BFB)

Client : Langan Engineering & Environmental	Lab Number : L2153835
Project Name : 990 ROSSVILLE AVENUE	Project Number : 100849501
Instrument ID : AIRPIANO3	Analysis Date : 09/26/21 17:29
Tune Standard : WG1551141-1	Tune File ID : r317978_tune

m/e	Ion Abundance Criteria	%Relative Abundance
50	8.0 - 40.0% of mass 95	14.7
75	30.0 - 66.0% of mass 95	38.6
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	0.5 (.7)1
174	50.0 - 120.0% of mass 95	74
175	4.0 - 9.0% of mass 174	5.2 (7.1)1
176	93.0 - 101% of mass 174	71.4 (96.4)1
177	5.0 - 9.0% of mass 176	4.5 (6.3)2

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

This Check Applies to the following Samples, MS, MSD, Blanks, and Standards:

Client Sample ID	Lab Sample ID	File ID	Analysis Date/Time
STD0.02	R1482945-1	R317979_EV2	09/26/21 18:04
STD0.05	R1482945-2	R317980_EV2	09/26/21 18:41
STD0.1	R1482945-3	R317981_EV2	09/26/21 19:20
STD0.2	R1482945-4	R317982_EV2	09/26/21 19:59
STD0.5	R1482945-5	R317983_EV2	09/26/21 20:38
STD1.0	R1482945-6	R317984_EV2	09/26/21 21:20
STD5.0	R1482945-7	R317985_EV2	09/26/21 22:00
STD010	R1482945-8	R317986_EV2	09/26/21 22:41
STD020	R1482945-9	R317987_EV2	09/26/21 23:20
STD050	R1482945-10	R317988_EV2	09/26/21 23:59
ICV Quant	R1482945-11	R317993_EV2	09/27/21 08:37

Instrument Performance Check (Tune) Summary

Form 5

Air Volatiles

Bromofluorobenzene (BFB)

Client : Langan Engineering & Environmental	Lab Number : L2153835
Project Name : 990 ROSSVILLE AVENUE	Project Number : 100849501
Instrument ID : AIRPIANO3	Analysis Date : 10/07/21 10:25
Tune Standard : WG1555826-1	Tune File ID : r318221_tune

m/e	Ion Abundance Criteria	%Relative Abundance
50	8.0 - 40.0% of mass 95	14.9
75	30.0 - 66.0% of mass 95	39.8
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.7
173	Less than 2.0% of mass 174	0.4 (.5)1
174	50.0 - 120.0% of mass 95	75.5
175	4.0 - 9.0% of mass 174	5.3 (7)1
176	93.0 - 101% of mass 174	71.6 (94.8)1
177	5.0 - 9.0% of mass 176	4.7 (6.6)2

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

This Check Applies to the following Samples, MS, MSD, Blanks, and Standards:

Client Sample ID	Lab Sample ID	File ID	Analysis Date/Time
WG1555826-2CCAL	WG1555826-2	R318225_EV2	10/07/21 13:07
WG1555826-3LCS	WG1555826-3	R318225_EV2	10/07/21 13:07
WG1555826-4BLANK	WG1555826-4	R318227_EV2	10/07/21 15:42
133_LSV-20	L2153835-02D	R318236_EV2	10/07/21 22:08
WG1555826-5DUP	WG1555826-5	R318238_EV2	10/07/21 23:27

Internal Standard Area and RT Summary

Form 8a

Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153835
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Instrument ID	: AIRPIANO3	Analysis Date	: 10/07/21 13:07:00
Sample No	: WG1555826-2	Lab File ID	: R318225_EV2

	Bromochloromethane		1,4-Difluorobenzene		Chlorobenzene-d5	
	Area	RT	Area	RT	Area	RT
WG1555826-2	244850	9.53	676518	11.79	100891	16.52
Upper Limit	342790	9.86	947125	12.12	141247	16.85
Lower Limit	146910	9.20	405911	11.46	60535	16.19
Sample ID						
WG1555826-3 LCS	244850	9.53	676518	11.79	100891	16.52
WG1555826-4 BLANK	233671	9.53	620988	11.80	95224	16.50
133_LSV-20	260989	9.53	721438	11.80	108662	16.53
DUMMY 202 DUP	247557	9.53	691439	11.80	109695	16.53

Area Upper Limit = +40% of internal standard area
Area Lower Limit = - 40% of internal standard area

RT Upper Limit = +0.33 minutes of internal standard RT
RT Lower Limit = -0.33 minutes of internal standard RT

* Values outside of QC limits





Date Created: 02/01/21
Created By: Jason Hebert
File: PM10116-1
Page: 1

Volatile Organics in Air by TO-15 SIM (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
1,1,1-Trichloroethane	71-55-6	0.02	0.0083	ppbV	70-130	25		25	25			
1,1,1,2-Tetrachloroethane	630-20-6	0.02	0.0053	ppbV	70-130	25		25	25			
1,1,2,2-Tetrachloroethane	79-34-5	0.02	0.0056	ppbV	70-130	25		25	25			
1,1,2-Trichloroethane	79-00-5	0.02	0.0058	ppbV	70-130	25		25	25			
1,1-Dichloroethane	75-34-3	0.02	0.0073	ppbV	70-130	25		25	25			
1,1-Dichloroethene	75-35-4	0.02	0.0084	ppbV	70-130	25		25	25			
1,2,3-Trichloropropane	96-18-4	0.02	0.0054	ppbV	70-130	25		25	25			
1,2,4-Trimethylbenzene	95-63-6	0.02	0.0043	ppbV	70-130	25		25	25			
1,2-Dibromoethane	106-93-4	0.02	0.008	ppbV	70-130	25		25	25			
1,2-Dibromo-3-chloropropane	96-12-8	0.02	0.0056	ppbV	70-130	25		25	25			
1,2-Dichlorobenzene	95-50-1	0.02	0.0098	ppbV	70-130	25		25	25			
1,2-Dichloroethane	107-06-2	0.02	0.0097	ppbV	70-130	25		25	25			
1,2-Dichloropropane	78-87-5	0.02	0.0054	ppbV	70-130	25		25	25			
1,3,5-Trimethylbenzene	108-67-8	0.02	0.0056	ppbV	70-130	25		25	25			
1,3-Butadiene	106-99-0	0.02	0.0097	ppbV	70-130	25		25	25			
1,3-Dichlorobenzene	541-73-1	0.02	0.0056	ppbV	70-130	25		25	25			
1,4-Dichlorobenzene	106-46-7	0.02	0.0053	ppbV	70-130	25		25	25			
1,4-Dioxane	123-91-1	0.1	0.032	ppbV	70-130	25		25	25			
1-Bromo-2-Chloroethane	107-04-0	0.02	0.0102	ppbV	70-130	25		25	25			
1-Bromo-3-Fluorobenzene	1073-06-9	0.02	0.0065	ppbV	70-130	25		25	25			
1-Bromo-4-Ethylbenzene	1585-07-5	0.05	0.004	ppbV	70-130	25		25	25			
2,2,4-Trimethylpentane	540-84-1	0.2	0.0063	ppbV	70-130	25		25	25			
2-Bromopyridine	109-04-6	0.1	0.0161	ppbV	30-150	25		25	25			
2-Hexanone	591-78-6	0.2	0.015	ppbV	70-130	25		25	25			
3,4-Dichlorobenzotrifluoride	328-84-7	0.02	0.0024	ppbV	70-130	25		25	25			
3-Amino-4-Chlorobenzotrifluoride	121-50-6	0.05	0.0178	ppbV	30-150	25		25	25			
3-Chloropropene	107-05-1	0.2	0.0067	ppbV	70-130	25		25	25			
3-Nitro-4-Chlorobenzotrifluoride	121-17-5	0.5	0.129	ppbV	30-150	25		25	25			
4-Bromofluorobenzene	460-00-4	0.05	0.0094	ppbV	70-130	25		25	25			
4-Chlorobenzotrifluoride	98-56-6	0.02	0.006	ppbV	70-130	25		25	25			
4-Ethyltoluene	622-96-8	0.02	0.0042	ppbV	70-130	25		25	25			
Benzene	71-43-2	0.1	0.005	ppbV	70-130	25		25	25			
Benzyl chloride	100-44-7	0.2	0.0072	ppbV	70-130	25		25	25			
Bromobenzene	108-86-1	0.2	0.0063	ppbV	70-130	25		25	25			
Bromodichloromethane	75-27-4	0.02	0.0067	ppbV	70-130	25		25	25			
Bromoform	75-25-2	0.02	0.0065	ppbV	70-130	25		25	25			
Bromomethane	74-83-9	0.02	0.0085	ppbV	70-130	25		25	25			
Carbon disulfide	75-15-0	0.2	0.0138	ppbV	70-130	25		25	25			
Carbon tetrachloride	56-23-5	0.02	0.01	ppbV	70-130	25		25	25			
Chlorobenzene	108-90-7	0.1	0.0064	ppbV	70-130	25		25	25			
Chloroethane	75-00-3	0.1	0.0135	ppbV	70-130	25		25	25			
Chloroform	67-66-3	0.02	0.0089	ppbV	70-130	25		25	25			

Please Note that the RL information provided in this table is calculated using a 100% Solids factor. (Soil/Solids only)
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Date Created: 02/01/21
Created By: Jason Hebert
File: PM10116-1
Page: 2

Volatile Organics in Air by TO-15 SIM (AIR)

Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

Analyte	CAS #	RL	MDL	Units	LCS Criteria	LCS RPD	MS Criteria	MS RPD	Duplicate RPD	Surrogate Criteria		
Chloromethane	74-87-3	0.2	0.024	ppbV	70-130	25		25	25			
cis-1,2-Dichloroethene	156-59-2	0.02	0.0096	ppbV	70-130	25		25	25			
trans-1,2-Dichloroethene	156-60-5	0.02	0.0076	ppbV	70-130	25		25	25			
1,2-Dichloroethene (total)	540-59-0	0.02	0.0076	ppbV				25	25			
cis-1,3-Dichloropropene	10061-01-5	0.02	0.007	ppbV	70-130	25		25	25			
1,3-Dichloropropene, Total	542-75-6	0.02	0.007	ppbV				25	25			
Cyclohexane	110-82-7	0.2	0.0064	ppbV	70-130	25		25	25			
Dibromochloromethane	124-48-1	0.02	0.0086	ppbV	70-130	25		25	25			
Dibromomethane	74-95-3	0.2	0.018	ppbV	70-130	25		25	25			
Dichlorodifluoromethane	75-71-8	0.2	0.018	ppbV	70-130	25		25	25			
Ethyl Alcohol	64-17-5	5	0.329	ppbV	40-160	25		25	25			
Ethyl Acetate	141-78-6	0.5	0.0307	ppbV	70-130	25		25	25			
Ethylbenzene	100-41-4	0.02	0.0049	ppbV	70-130	25		25	25			
Fluorobenzene	462-06-6	0.05	0.009	ppbV	70-130	25		25	25			
1,1,2-Trichloro-1,2,2-Trifluoroethane	76-13-1	0.05	0.0088	ppbV	70-130	25		25	25			
1,2-Dichloro-1,1,2,2-tetrafluoroethane	76-14-2	0.05	0.0072	ppbV	70-130	25		25	25			
Methylcyclohexane	108-87-2	0.02	0.0051	ppbV	70-130	25		25	25			
Methylene chloride	75-09-2	0.5	0.0131	ppbV	70-130	25		25	25			
Methyl tert butyl ether	1634-04-4	0.2	0.0083	ppbV	70-130	25		25	25			
m/p-Dibromobenzene	108-36-1/106-37-6	0.05	0.0137	ppbV	70-130	25		25	25			
Naphthalene	91-20-3	0.05	0.035	ppbV	70-130	25		25	25			
p/m-Xylene	179601-23-1	0.04	0.019	ppbV	70-130	25		25	25			
o-Xylene	95-47-6	0.02	0.0067	ppbV	70-130	25		25	25			
Heptane	142-82-5	0.2	0.0041	ppbV	70-130	25		25	25			
n-Hexane	110-54-3	0.2	0.0048	ppbV	70-130	25		25	25			
Propylene	115-07-1	0.5	0.0465	ppbV	70-130	25		25	25			
Styrene	100-42-5	0.02	0.0049	ppbV	70-130	25		25	25			
tert-Butyl Alcohol	75-65-0	0.5	0.012	ppbV	70-130	25		25	25			
Tetrachloroethene	127-18-4	0.02	0.0078	ppbV	70-130	25		25	25			
Tetrahydrofuran	109-99-9	0.5	0.0066	ppbV	70-130	25		25	25			
Toluene	108-88-3	0.05	0.014	ppbV	70-130	25		25	25			
trans-1,3-Dichloropropene	10061-02-6	0.02	0.007	ppbV	70-130	25		25	25			
Trichloroethene	79-01-6	0.02	0.0062	ppbV	70-130	25		25	25			
1,2,4-Trichlorobenzene	120-82-1	0.05	0.03	ppbV	70-130	25		25	25			
Trichlorofluoromethane	75-69-4	0.05	0.0095	ppbV	70-130	25		25	25			
Vinyl acetate	108-05-4	1	0.0111	ppbV	70-130	25		25	25			
Vinyl bromide	593-60-2	0.2	0.0099	ppbV	70-130	25		25	25			
Hexachlorobutadiene	87-68-3	0.05	0.017	ppbV	70-130	25		25	25			
iso-Propyl Alcohol	67-63-0	0.5	0.179	ppbV	40-160	25		25	25			
Vinyl chloride	75-01-4	0.02	0.0072	ppbV	70-130	25		25	25			
Acrylonitrile	107-13-1	0.5	0.0245	ppbV	70-130	25		25	25			
n-Butylbenzene	104-51-8	0.2	0.0048	ppbV	70-130	25		25	25			

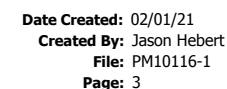
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Holding Time: 30 days
Container/Sample Preservation: 1 - Canister - 2.7 Liter

[illegible]

Please Note that the RL information provided in this table is calculated using a 100% Solids factor. (Soll/Solids only)
Please Note that the information provided in this table is subject to change at anytime at the discretion of Alpha Analytical, Inc.



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Volatiles Sample Data

Results Summary

Form 1

Volatile Organics in Air by SIM

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : L2153835-02D
 Client ID : 133_LSV-20
 Sample Location : STATEN ISLAND, NY
 Sample Matrix : SOIL_VAPOR
 Analytical Method : 48,TO-15-SIM
 Lab File ID : R318236_EV2
 Sample Amount : 35.0 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : 10/04/21 11:50
 Date Received : 10/04/21
 Date Analyzed : 10/07/21 22:08
 Dilution Factor : 7.143
 Analyst : TS
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-01-4	Vinyl chloride	0.278	0.143	--	0.711	0.366	--	
75-35-4	1,1-Dichloroethene	ND	0.143	--	ND	0.567	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.143	--	ND	0.567	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.143	--	ND	0.780	--	U
56-23-5	Carbon tetrachloride	ND	0.143	--	ND	0.900	--	U
79-01-6	Trichloroethene	ND	0.143	--	ND	0.769	--	U
127-18-4	Tetrachloroethene	ND	0.143	--	ND	0.970	--	U

Results Summary

Form 1

Volatile Organics in Air by SIM

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Lab ID : WG1555826-4
 Client ID : WG1555826-4BLANK
 Sample Location :
 Sample Matrix : AIR
 Analytical Method : 48,TO-15-SIM
 Lab File ID : R318227_EV2
 Sample Amount : 250 ml

Lab Number : L2153835
 Project Number : 100849501
 Date Collected : NA
 Date Received : NA
 Date Analyzed : 10/07/21 15:42
 Dilution Factor : 1
 Analyst : RY
 Instrument ID : AIRPIANO3
 GC Column : RTX-1

CAS NO.	Parameter	ppbV			ug/m3			Qualifier
		Results	RL	MDL	Results	RL	MDL	
75-01-4	Vinyl chloride	ND	0.020	--	ND	0.051	--	U
75-35-4	1,1-Dichloroethene	ND	0.020	--	ND	0.079	--	U
156-59-2	cis-1,2-Dichloroethene	ND	0.020	--	ND	0.079	--	U
71-55-6	1,1,1-Trichloroethane	ND	0.020	--	ND	0.109	--	U
56-23-5	Carbon tetrachloride	ND	0.020	--	ND	0.126	--	U
79-01-6	Trichloroethene	ND	0.020	--	ND	0.107	--	U
127-18-4	Tetrachloroethene	ND	0.020	--	ND	0.136	--	U

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318236_Ev2.D
 Acq On : 7 Oct 2021 10:08 PM
 Operator : AIRPIAN03:TS
 Sample : L2153835-02D,3,35,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 26 15:39:01 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:51:29 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D
 Sub List : 7-NY-SIM - .

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

Internal Standards						
1) bromochloromethane	9.533	49	260989	10.000	ppbV	-0.03
Standard Area = 244850			Recovery = 106.59%			
33) 1,4-difluorobenzene	11.800	114	721438	10.000	ppbV	-0.03
Standard Area = 676518			Recovery = 106.64%			
51) chlorobenzene-D5	16.533	54	108662	10.000	ppbV	-0.02
Standard Area = 100891			Recovery = 107.70%			

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
6) vinyl chloride	4.414	62	653	0.039	ppbV	93
17) 1,1-dichloroethene	0.000		0	N.D.	d	
28) cis-1,2-dichloroethene	9.333		0	N.D.		
36) 1,1,1-trichloroethane	0.000		0	N.D.		
38) carbon tetrachloride	11.540		0	N.D.		
44) trichloroethene	12.760		0	N.D.		
57) tetrachloroethene	15.917	166	535	0.019	ppbV	93

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

Sub List : 7-NY-SIM - .\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\

Data File : r318236_Ev2.D

Acq On : 7 Oct 2021 10:08 PM

Operator : AIRPIANO3:TS

Sample : L2153835-02D, 3, 35, 250

Misc : WG1555826, ICAL18332

ALS Vial : 0 Sample Multiplier: 1

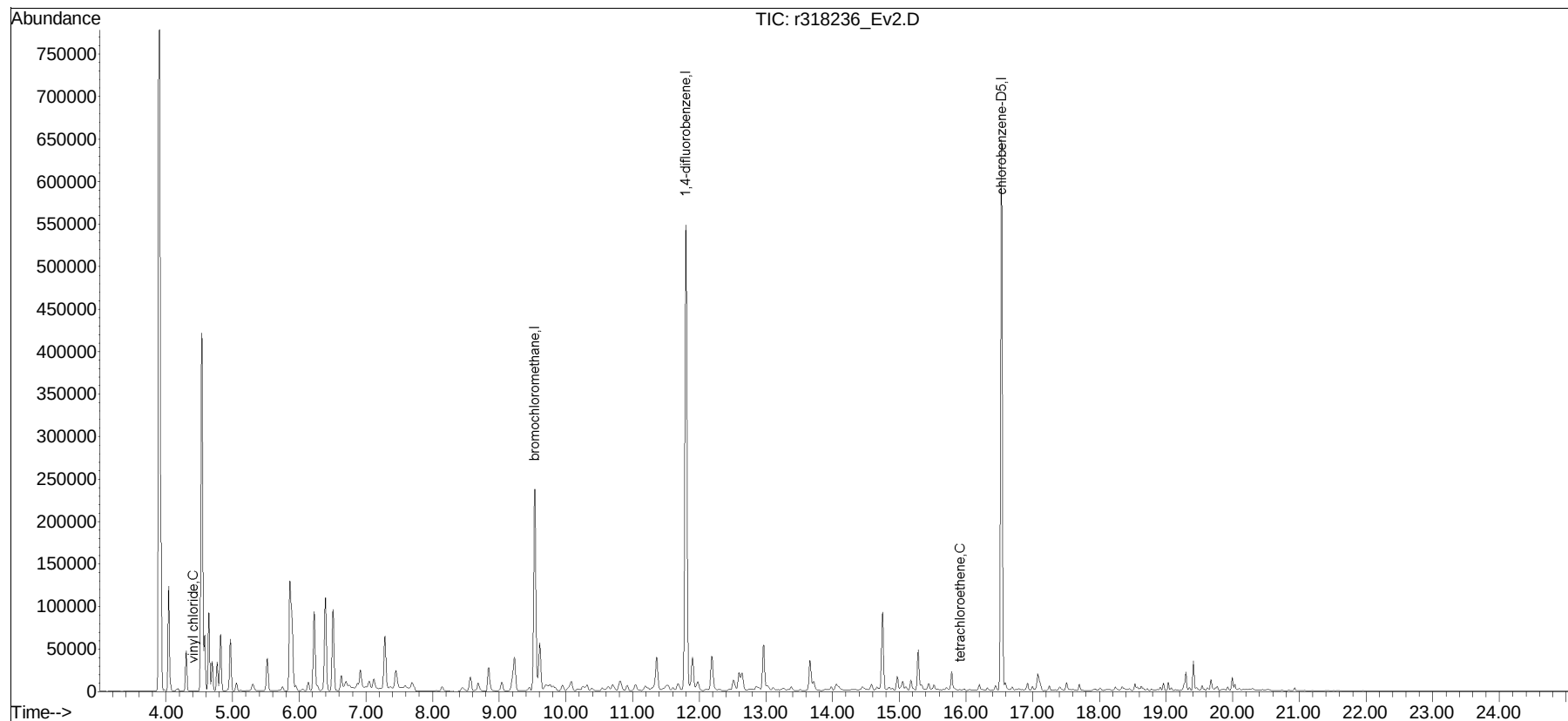
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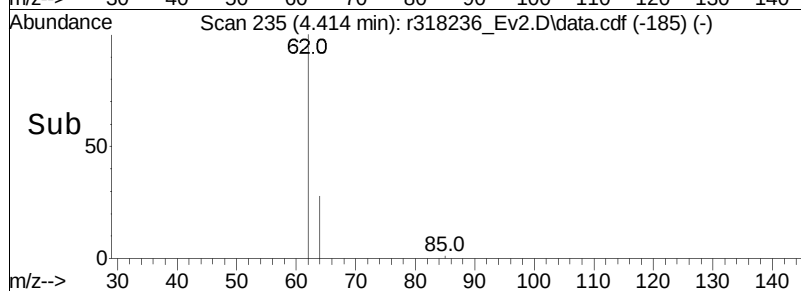
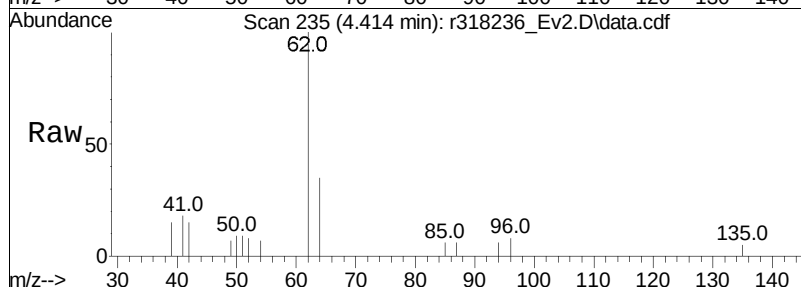
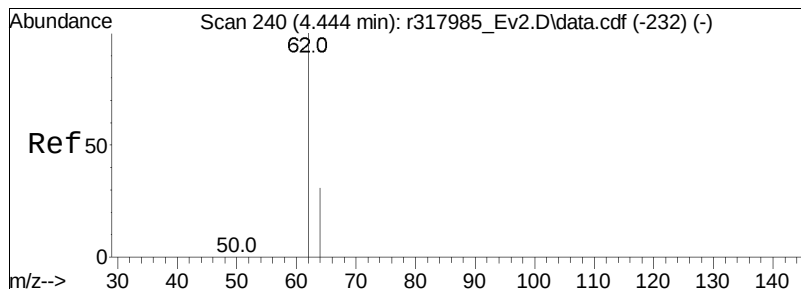
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Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

QLast Update : Mon Sep 27 09:51:29 2021

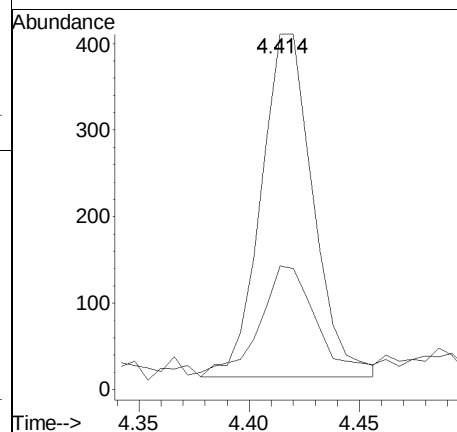
Response via : Initial Calibration

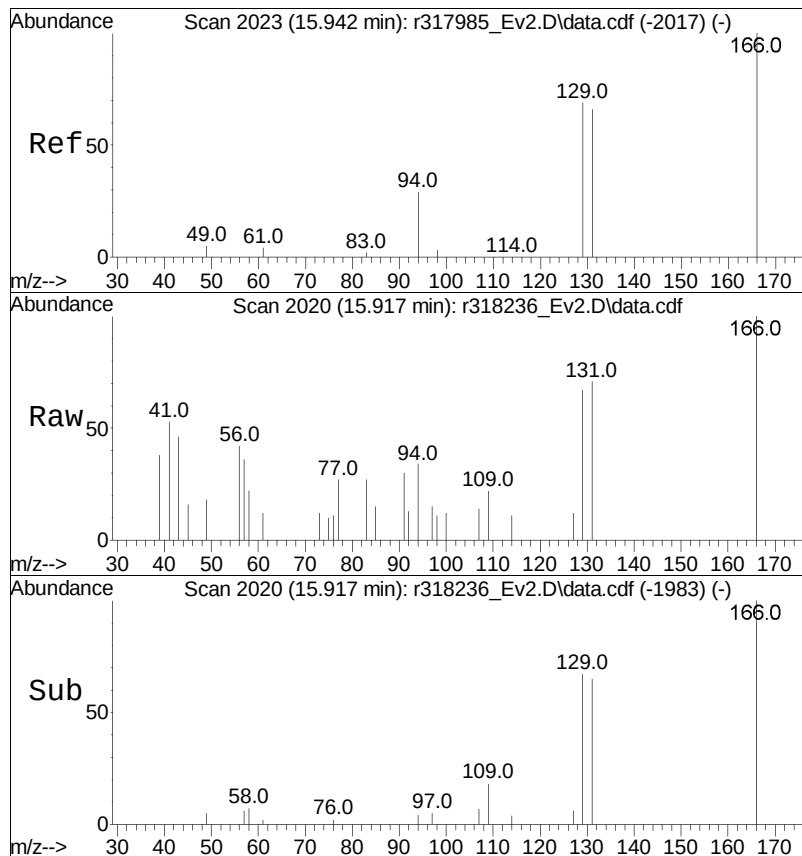




#6
 vinyl chloride
 Concen: 0.04 ppbV
 RT: 4.414 min Scan# 235
 Delta R.T. -0.030 min
 Lab File: r318236_Ev2.D
 Acq: 7 Oct 2021 10:08 PM

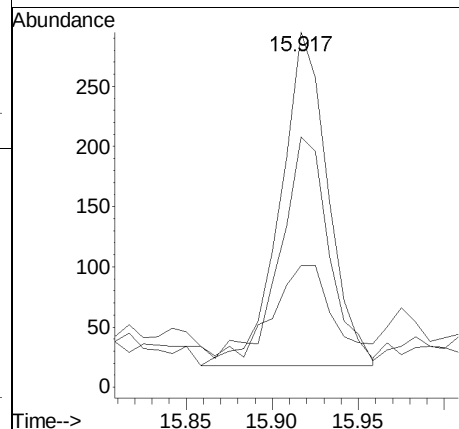
Tgt Ion: 62 Resp: 653
 Ion Ratio Lower Upper
 62 100
 64 34.8 24.6 37.0





#57
 tetrachloroethene
 Concen: 0.02 ppbV
 RT: 15.917 min Scan# 2020
 Delta R.T. -0.025 min
 Lab File: r318236_Ev2.D
 Acq: 7 Oct 2021 10:08 PM

Tgt Ion	Ratio	Lower	Upper
166	100		
131	70.5	53.1	79.7
94	34.2	22.9	34.3



Manual Integration Report

Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r318236_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 10/7/2020 0:0: 8 Instrument :
Sample : L2153835-02D,3,35,250 Quant Date : 10/26/2021 3:38 pm

There are no manual integrations or false positives in this file.

Volatiles Standards Data

Initial Calibration

Initial Calibration Summary

Form 6

Air Volatiles

Client	: Langan Engineering & Environmental	Lab Number	: L2153835
Project Name	: 990 ROSSVILLE AVENUE	Project Number	: 100849501
Instrument ID	: AIRPIANO3	Ical Ref	: ICAL18332
Calibration dates	: 09/26/21 18:04 09/26/21 23:59		

Calibration Files

0.02=r317979_Ev2.D 0.05=r317980_Ev2.D 0.1 =r317981_Ev2.D 0.2 =r317982_Ev2.D 0.5 =r317983_Ev2.D
 1.0 =r317984_Ev2.D 5.0 =r317985_Ev2.D 10.0=r317986_Ev2.D 20.0=r317987_Ev2.D 50.0=r317988_Ev2.D

Compound		0.02	0.05	0.1	0.2	0.5	1.0	5.0	10.0	20.0	50.0	Avg	%RSD
1) I	bromochloromethane	-----ISTD-----											
2)	propylene				0.535	0.501	0.492	0.452	0.449	0.424	0.393	0.4639	10.45
3)	dichlorodifluoromethane				1.140	1.128	1.144	0.968	0.901	0.837	0.721	0.9771	17.13
4) C	chloromethane				0.542	0.520	0.516	0.435	0.412	0.393	0.362	0.4544	15.56
5)	Freon-114		1.402	1.334	1.557	1.541	1.542	1.312	1.226	1.123	0.933	1.3300	15.89
6) C	vinyl chloride	0.713	0.645	0.617	0.717	0.701	0.707	0.611	0.592	0.565	0.522	0.6391	10.79
7) C	1,3-butadiene	0.630	0.541	0.505	0.594	0.590	0.586	0.508	0.486	0.459	0.416	0.5315	12.86
8) C	bromomethane	0.739	0.593	0.493	0.574	0.567	0.570	0.489	0.474	0.449	0.407	0.5356	17.58
9) C	chloroethane	0.471	0.371	0.355	0.421	0.395	0.392	0.334	0.330	0.318	0.300	0.3687	14.21
10)	ethanol					0.538	0.526	0.446	0.414	0.398	0.338	0.4432	17.41
11) C	vinyl bromide				0.555	0.560	0.572	0.492	0.474	0.452	0.405	0.5012	12.57
12) C	acrolein		0.491	0.309	0.377	0.315	0.362	0.308	0.285	0.311	0.239	0.3331	21.43
13)	acetone				1.089	1.025	1.017	0.883	0.838	0.736	0.591	0.8829	20.13
14)	trichlorofluoromethane		0.974	0.989	1.122	1.103	1.114	0.953	0.921	0.866	0.772	0.9792	12.19
15)	isopropyl alcohol				1.109	1.096	1.131	1.089	1.032	0.990	0.896	1.0491	7.89
16) C	acrylonitrile			0.553	0.635	0.632	0.627	0.544	0.548	0.549	0.523	0.5764	8.06
17) C	1,1-dichloroethene	1.094	0.933	0.873	0.993	0.973	0.975	0.850	0.843	0.829	0.763	0.9126	10.79
18)	tertiary butyl alcohol				1.103	1.130	1.158	1.108	1.106	1.176	1.126	1.1295	2.49
19) C	methylene chloride					0.865	0.857	0.721	0.700	0.669	0.616	0.7380	13.75
20) C	3-chloropropene				0.937	0.923	0.932	0.820	0.811	0.795	0.760	0.8541	8.70
21) C	carbon disulfide				2.415	2.405	2.386	2.047	1.976	1.882	1.701	2.1161	13.60
22)	Freon 113		1.082	1.059	1.222	1.208	1.214	1.044	1.017	0.984	0.897	1.0809	10.48
23)	trans-1,2-dichloroethene	1.099	0.989	0.921	1.036	1.025	1.036	0.900	0.898	0.888	0.823	0.9616	9.08
24) C	1,1-dichloroethane	1.378	1.159	1.067	1.213	1.193	1.203	1.041	1.039	1.031	0.973	1.1297	10.76
25) C	MTBE	1.660	1.637	1.606	1.860	1.867	1.890	1.657	1.626	1.557	1.416	1.6776	9.05
26) C	vinyl acetate					1.367	1.417	1.270	1.278	1.267	1.204	1.3006	5.97
27) C	2-butanone				1.477	1.449	1.464	1.284	1.257	1.222	1.142	1.3278	10.12
28)	cis-1,2-dichloroethene	1.064	0.858	0.812	0.919	0.909	0.911	0.791	0.796	0.786	0.733	0.8579	11.19
29)	Ethyl Acetate				0.254	0.242	0.254	0.225	0.235	0.239	0.227	0.2394	4.79
30) C	chloroform	1.429	1.205	1.110	1.303	1.277	1.285	1.106	1.086	1.030	0.910	1.1742	13.09
31)	Tetrahydrofuran				0.868	0.889	0.888	0.791	0.788	0.773	0.737	0.8191	7.49
32) C	1,2-dichloroethane	0.672	0.698	0.627	0.725	0.712	0.714	0.613	0.607	0.582	0.523	0.6472	10.40
33) I	1,4-difluorobenzene	-----ISTD-----											
34) C	hexane				0.504	0.483	0.495	0.427	0.421	0.400	0.354	0.4408	12.58
35) s	1,2-dichloroethane-D4				0.243	0.245	0.248	0.248	0.247	0.239	0.231	0.2428	2.59
36) C	1,1,1-trichloroethane	0.398	0.309	0.287	0.335	0.333	0.343	0.296	0.292	0.279	0.275	0.3148	12.08



Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRPIANO3
Calibration dates : 09/26/21 18:04 09/26/21 23:59
Lab Number : L2153835
Project Number : 100849501
Ical Ref : ICAL18332

Calibration Files

0.02=r317979_Ev2.D 0.05=r317980_Ev2.D 0.1 =r317981_Ev2.D 0.2 =r317982_Ev2.D 0.5 =r317983_Ev2.D
 1.0 =r317984_Ev2.D 5.0 =r317985_Ev2.D 10.0=r317986_Ev2.D 20.0=r317987_Ev2.D 50.0=r317988_Ev2.D

	Compound	0.02	0.05	0.1	0.2	0.5	1.0	5.0	10.0	20.0	50.0	Avg	%RSD
37) C	benzene			0.947	1.237	1.050	1.010	0.829	0.802	0.752	0.680	0.9132	20.01
38) C	carbon tetrachloride	0.346	0.299	0.278	0.323	0.316	0.327	0.288	0.289	0.271	0.239	0.2976	10.55
39)	cyclohexane			0.539	0.524	0.531	0.461	0.458	0.445	0.415	0.4820		10.14
40)	Dibromomethane		0.304	0.249	0.272	0.247	0.249	0.211	0.208	0.201	0.180	0.2358	16.50
41) C	1,2-dichloropropane	0.362	0.290	0.282	0.294	0.298	0.298	0.259	0.258	0.251	0.235	0.2827	12.62
42)	bromodichloromethane	0.434	0.438	0.407	0.491	0.486	0.492	0.433	0.429	0.401	0.357	0.4368	9.97
43) C	1,4-dioxane			0.198	0.219	0.213	0.216	0.189	0.187	0.190	0.176	0.1985	7.93
44) C	trichloroethene	0.341	0.344	0.323	0.370	0.359	0.365	0.317	0.313	0.298	0.274	0.3304	9.40
45) C	2,2,4-trimethylpentane				1.619	1.588	1.614	1.370	1.349	1.281	1.136	1.4222	13.25
46)	heptane				0.561	0.563	0.560	0.487	0.473	0.447	0.412	0.5005	12.30
47) C	cis-1,3-dichloropropene	0.305	0.277	0.264	0.327	0.353	0.372	0.354	0.358	0.340	0.312	0.3260	11.06
48) C	4-methyl-2-pentanone					0.598	0.624	0.553	0.541	0.514	0.474	0.5507	9.94
49)	trans-1,3-dichloropropene	0.400	0.340	0.341	0.409	0.418	0.431	0.386	0.384	0.364	0.335	0.3809	9.08
50) C	1,1,2-trichloroethane	0.299	0.284	0.258	0.305	0.300	0.305	0.266	0.265	0.254	0.235	0.2771	9.00
51) I	chlorobenzene-D5	-----ISTD-----											
52) C	toluene		6.574	5.921	8.200	7.176	6.766	5.595	5.546	5.292	4.768	6.2043	17.24
53) s	toluene-D8				6.441	6.500	6.441	6.456	6.651	6.659	6.865	6.5733	2.43
54)	2-hexanone				3.142	3.433	3.534	3.277	3.253	3.148	2.920	3.2437	6.23
55)	dibromochloromethane	2.753	2.478	2.225	2.666	2.676	2.727	2.439	2.455	2.334	2.092	2.4845	8.97
56) C	1,2-dibromoethane	2.933	2.541	2.372	2.812	2.884	2.907	2.546	2.517	2.396	2.201	2.6109	9.85
57) C	tetrachloroethene	2.917	2.572	2.420	2.838	2.821	2.819	2.427	2.410	2.300	2.107	2.5632	10.67
58)	1,1,1,2-tetrachloroethane	2.061	1.783	1.657	1.962	1.985	2.009	1.785	1.795	1.720	1.528	1.8285	9.40
59) C	chlorobenzene	5.532	4.705	4.673	5.325	5.252	5.250	4.490	4.445	4.217	3.769	4.7658	11.82
60) C	ethylbenzene	7.435	6.646	6.466	7.737	7.691	7.733	6.775	6.733	6.376	5.651	6.9242	10.13
61) C	m+p-xylene	5.853	5.374	5.321	6.343	6.376	6.434	5.583	5.473	5.120	4.304	5.6182	11.82
62) C	bromoform	2.261	2.105	1.988	2.340	2.435	2.502	2.355	2.386	2.289	2.066	2.2727	7.42
63) C	styrene	4.209	4.146	4.287	4.974	5.212	5.328	4.802	4.701	4.482	4.094	4.6235	9.72
64) C	1,1,2,2-tetrachloroethane	4.568	4.244	3.963	4.800	4.778	4.814	4.200	4.078	3.768	3.116	4.2328	12.77
65) C	o-xylene	6.142	5.527	5.326	6.362	6.488	6.530	5.628	5.468	5.016	4.105	5.6592	13.39
66)	1,2,3-Trichloropropane	3.522	3.156	3.112	3.645	3.695	3.788	3.272	3.177	3.020	2.764	3.3152	10.05
67) s	bromofluorobenzene				4.505	4.520	4.482	4.555	4.658	4.666	4.872	4.6083	2.97
68) C	isopropylbenzene				8.482	8.617	8.643	7.373	7.182	6.697	5.837	7.5473	14.34
69)	Bromobenzene				5.021	5.110	5.127	4.422	4.314	4.076	3.630	4.5287	12.77
70)	4-ethyl toluene	7.496	7.146	7.029	8.817	9.034	9.453	8.241	7.993	7.374	6.319	7.8901	12.62
71)	1,3,5-trimethylbenzene	6.794	6.312	6.280	7.651	7.843	7.946	6.899	6.668	6.183	5.275	6.7849	12.40
72)	tert-butylbenzene				7.871	7.916	8.013	6.861	6.493	5.857	4.466	6.7824	19.32



Initial Calibration Summary

Form 6

Air Volatiles

Client : Langan Engineering & Environmental
Project Name : 990 ROSSVILLE AVENUE
Instrument ID : AIRPIANO3
Calibration dates : 09/26/21 18:04 09/26/21 23:59
Lab Number : L2153835
Project Number : 100849501
Ical Ref : ICAL18332

Calibration Files

0.02=r317979_Ev2.D 0.05=r317980_Ev2.D 0.1 =r317981_Ev2.D 0.2 =r317982_Ev2.D 0.5 =r317983_Ev2.D
 1.0 =r317984_Ev2.D 5.0 =r317985_Ev2.D 10.0=r317986_Ev2.D 20.0=r317987_Ev2.D 50.0=r317988_Ev2.D

	Compound	0.02	0.05	0.1	0.2	0.5	1.0	5.0	10.0	20.0	50.0	Avg	%RSD
73)	1,2,4-trimethylbenzene	6.988	6.230	5.993	7.422	7.614	7.770	6.768	6.471	5.868	4.397	6.5521	15.38
74) C	Benzyl Chloride			1.759	2.304	2.759	3.522	4.589	4.982	4.836	4.233	3.6230	33.95#
75)	1,3-dichlorobenzene	3.589	3.428	3.709	4.029	4.766	5.079	4.539	4.435	4.094	3.457	4.1127	14.02
76) C	1,4-dichlorobenzene	3.307	3.094	3.673	3.971	4.773	5.019	4.488	4.367	4.070	3.576	4.0338	15.66
77)	sec-butylbenzene				1.092	1.106	1.112	0.953	0.910	0.833	0.687	0.9559	16.80
78)	p-isopropyltoluene				9.361	9.464	9.659	8.274	7.795	6.835	5.057	8.0634	20.79
79)	1,2-dichlorobenzene	4.092	3.635	3.520	4.311	4.440	4.714	4.229	4.127	3.858	3.438	4.0363	10.33
80)	n-butylbenzene				7.544	7.979	8.164	7.309	7.133	6.484	5.436	7.1497	13.12
81)	1,2-dibromo-3-chloropr...	1.610	1.426	1.456	1.732	1.911	2.028	1.879	1.816	1.666	1.467	1.6990	12.36
82) C	1,2,4-trichlorobenzene		1.879	1.967	2.664	3.164	3.507	3.686	3.701	3.320	3.145	3.0037	22.97
83)	naphthalene		5.320	6.078	7.670	8.785	9.505	9.297	9.052	7.882	7.028	7.8463	18.80
84)	1,2,3-trichlorobenzene		2.369	2.459	2.973	3.385	3.600	3.619	3.572	3.069	2.931	3.1086	15.32
85) C	hexachlorobutadiene		3.336	3.217	3.733	3.832	3.867	3.587	3.401	2.810	2.437	3.3577	14.31

Response Factor Report

Method Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Method File : TSIM3_210926.M
Title : T0-14A/T0-15 SIM/Full Scan Analysis
Last Update : Mon Sep 27 09:51:29 2021
Response Via : Initial Calibration

Calibration Files

0.02=r317979_Ev2.D 0.05=r317980_Ev2.D 0.1 =r317981_Ev2.D 0.2 =r317982_Ev2.D 0.5 =r317983_Ev2.D
1.0 =r317984_Ev2.D 5.0 =r317985_Ev2.D 10.0=r317986_Ev2.D 20.0=r317987_Ev2.D 50.0=r317988_Ev2.D

Compound		0.02	0.05	0.1	0.2	0.5	1.0	5.0	10.0	20.0	50.0	Avg	%RSD
-----ISTD-----													
1) I	bromochloromethane												
2)	propylene				0.535	0.501	0.492	0.452	0.449	0.424	0.393	0.4639	10.45
3)	dichlorodifluorome...				1.140	1.128	1.144	0.968	0.901	0.837	0.721	0.9771	17.13
4) C	chloromethane				0.542	0.520	0.516	0.435	0.412	0.393	0.362	0.4544	15.56
5)	Freon-114		1.402	1.334	1.557	1.541	1.542	1.312	1.226	1.123	0.933	1.3300	15.89
6) C	vinyl chloride	0.713	0.645	0.617	0.717	0.701	0.707	0.611	0.592	0.565	0.522	0.6391	10.79
7) C	1,3-butadiene	0.630	0.541	0.505	0.594	0.590	0.586	0.508	0.486	0.459	0.416	0.5315	12.86
8) C	bromomethane	0.739	0.593	0.493	0.574	0.567	0.570	0.489	0.474	0.449	0.407	0.5356	17.58
9) C	chloroethane	0.471	0.371	0.355	0.421	0.395	0.392	0.334	0.330	0.318	0.300	0.3687	14.21
10)	ethanol					0.538	0.526	0.446	0.414	0.398	0.338	0.4432	17.41
11) C	vinyl bromide				0.555	0.560	0.572	0.492	0.474	0.452	0.405	0.5012	12.57
12) C	acrolein		0.491	0.309	0.377	0.315	0.362	0.308	0.285	0.311	0.239	0.3331	21.43
13)	acetone				1.089	1.025	1.017	0.883	0.838	0.736	0.591	0.8829	20.13
14)	trichlorofluoromet...		0.974	0.989	1.122	1.103	1.114	0.953	0.921	0.866	0.772	0.9792	12.19
15)	isopropyl alcohol				1.109	1.096	1.131	1.089	1.032	0.990	0.896	1.0491	7.89
16) C	acrylonitrile			0.553	0.635	0.632	0.627	0.544	0.548	0.549	0.523	0.5764	8.06
17) C	1,1-dichloroethene	1.094	0.933	0.873	0.993	0.973	0.975	0.850	0.843	0.829	0.763	0.9126	10.79
18)	tertiary butyl alc...				1.103	1.130	1.158	1.108	1.106	1.176	1.126	1.1295	2.49
19) C	methylene chloride					0.865	0.857	0.721	0.700	0.669	0.616	0.7380	13.75
20) C	3-chloropropene				0.937	0.923	0.932	0.820	0.811	0.795	0.760	0.8541	8.70
21) C	carbon disulfide				2.415	2.405	2.386	2.047	1.976	1.882	1.701	2.1161	13.60
22)	Freon 113		1.082	1.059	1.222	1.208	1.214	1.044	1.017	0.984	0.897	1.0809	10.48
23)	trans-1,2-dichloro...	1.099	0.989	0.921	1.036	1.025	1.036	0.900	0.898	0.888	0.823	0.9616	9.08
24) C	1,1-dichloroethane	1.378	1.159	1.067	1.213	1.193	1.203	1.041	1.039	1.031	0.973	1.1297	10.76
25) C	MTBE	1.660	1.637	1.606	1.860	1.867	1.890	1.657	1.626	1.557	1.416	1.6776	9.05
26) C	vinyl acetate					1.367	1.417	1.270	1.278	1.267	1.204	1.3006	5.97
27) C	2-butanone				1.477	1.449	1.464	1.284	1.257	1.222	1.142	1.3278	10.12
28)	cis-1,2-dichloroet...	1.064	0.858	0.812	0.919	0.909	0.911	0.791	0.796	0.786	0.733	0.8579	11.19
29)	Ethyl Acetate				0.254	0.242	0.254	0.225	0.235	0.239	0.227	0.2394	4.79
30) C	chloroform	1.429	1.205	1.110	1.303	1.277	1.285	1.106	1.086	1.030	0.910	1.1742	13.09
31)	Tetrahydrofuran				0.868	0.889	0.888	0.791	0.788	0.773	0.737	0.8191	7.49

Response Factor Report

Method Path : O:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Method File : TSIM3_210926.M
Title : TO-14A/TO-15 SIM/Full Scan Analysis
Last Update : Mon Sep 27 09:51:29 2021
Response Via : Initial Calibration

Calibration Files

0.02=r317979_Ev2.D 0.05=r317980_Ev2.D 0.1 =r317981_Ev2.D 0.2 =r317982_Ev2.D 0.5 =r317983_Ev2.D
1.0 =r317984_Ev2.D 5.0 =r317985_Ev2.D 10.0=r317986_Ev2.D 20.0=r317987_Ev2.D 50.0=r317988_Ev2.D

	Compound	0.02	0.05	0.1	0.2	0.5	1.0	5.0	10.0	20.0	50.0	Avg	%RSD
32) C	1,2-dichloroethane	0.672	0.698	0.627	0.725	0.712	0.714	0.613	0.607	0.582	0.523	0.6472	10.40
33) I	1,4-difluorobenzene	-----ISTD-----											
34) C	hexane				0.504	0.483	0.495	0.427	0.421	0.400	0.354	0.4408	12.58
35) s	1,2-dichloroethane-D4				0.243	0.245	0.248	0.248	0.247	0.239	0.231	0.2428	2.59
36) C	1,1,1-trichloroethane	0.398	0.309	0.287	0.335	0.333	0.343	0.296	0.292	0.279	0.275	0.3148	12.08
37) C	benzene			0.947	1.237	1.050	1.010	0.829	0.802	0.752	0.680	0.9132	20.01
38) C	carbon tetrachloride	0.346	0.299	0.278	0.323	0.316	0.327	0.288	0.289	0.271	0.239	0.2976	10.55
39)	cyclohexane				0.539	0.524	0.531	0.461	0.458	0.445	0.415	0.4820	10.14
40)	Dibromomethane		0.304	0.249	0.272	0.247	0.249	0.211	0.208	0.201	0.180	0.2358	16.50
41) C	1,2-dichloropropane	0.362	0.290	0.282	0.294	0.298	0.298	0.259	0.258	0.251	0.235	0.2827	12.62
42)	bromodichloromethane	0.434	0.438	0.407	0.491	0.486	0.492	0.433	0.429	0.401	0.357	0.4368	9.97
43) C	1,4-dioxane			0.198	0.219	0.213	0.216	0.189	0.187	0.190	0.176	0.1985	7.93
44) C	trichloroethene	0.341	0.344	0.323	0.370	0.359	0.365	0.317	0.313	0.298	0.274	0.3304	9.40
45) C	2,2,4-trimethylpen...				1.619	1.588	1.614	1.370	1.349	1.281	1.136	1.4222	13.25
46)	heptane				0.561	0.563	0.560	0.487	0.473	0.447	0.412	0.5005	12.30
47) C	cis-1,3-dichloropr...	0.305	0.277	0.264	0.327	0.353	0.372	0.354	0.358	0.340	0.312	0.3260	11.06
48) C	4-methyl-2-pentanone					0.598	0.624	0.553	0.541	0.514	0.474	0.5507	9.94
49)	trans-1,3-dichloro...	0.400	0.340	0.341	0.409	0.418	0.431	0.386	0.384	0.364	0.335	0.3809	9.08
50) C	1,1,2-trichloroethane	0.299	0.284	0.258	0.305	0.300	0.305	0.266	0.265	0.254	0.235	0.2771	9.00
51) I	chlorobenzene-D5	-----ISTD-----											
52) C	toluene		6.574	5.921	8.200	7.176	6.766	5.595	5.546	5.292	4.768	6.2043	17.24
53) s	toluene-D8				6.441	6.500	6.441	6.456	6.651	6.659	6.865	6.5733	2.43
54)	2-hexanone				3.142	3.433	3.534	3.277	3.253	3.148	2.920	3.2437	6.23
55)	dibromochloromethane	2.753	2.478	2.225	2.666	2.676	2.727	2.439	2.455	2.334	2.092	2.4845	8.97
56) C	1,2-dibromoethane	2.933	2.541	2.372	2.812	2.884	2.907	2.546	2.517	2.396	2.201	2.6109	9.85
57) C	tetrachloroethene	2.917	2.572	2.420	2.838	2.821	2.819	2.427	2.410	2.300	2.107	2.5632	10.67
58)	1,1,1,2-tetrachlor...	2.061	1.783	1.657	1.962	1.985	2.009	1.785	1.795	1.720	1.528	1.8285	9.40
59) C	chlorobenzene	5.532	4.705	4.673	5.325	5.252	5.250	4.490	4.445	4.217	3.769	4.7658	11.82
60) C	ethylbenzene	7.435	6.646	6.466	7.737	7.691	7.733	6.775	6.733	6.376	5.651	6.9242	10.13
61) C	m+p-xylene	5.853	5.374	5.321	6.343	6.376	6.434	5.583	5.473	5.120	4.304	5.6182	11.82

Response Factor Report

Method Path : O:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Method File : TSIM3_210926.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Sep 27 09:51:29 2021
 Response Via : Initial Calibration

Calibration Files

0.02=r317979_Ev2.D 0.05=r317980_Ev2.D 0.1 =r317981_Ev2.D 0.2 =r317982_Ev2.D 0.5 =r317983_Ev2.D
 1.0 =r317984_Ev2.D 5.0 =r317985_Ev2.D 10.0=r317986_Ev2.D 20.0=r317987_Ev2.D 50.0=r317988_Ev2.D

	Compound	0.02	0.05	0.1	0.2	0.5	1.0	5.0	10.0	20.0	50.0	Avg	%RSD
62)	C bromoform	2.261	2.105	1.988	2.340	2.435	2.502	2.355	2.386	2.289	2.066	2.2727	7.42
63)	C styrene	4.209	4.146	4.287	4.974	5.212	5.328	4.802	4.701	4.482	4.094	4.6235	9.72
64)	C 1,1,2,2-tetrachlor...	4.568	4.244	3.963	4.800	4.778	4.814	4.200	4.078	3.768	3.116	4.2328	12.77
65)	C o-xylene	6.142	5.527	5.326	6.362	6.488	6.530	5.628	5.468	5.016	4.105	5.6592	13.39
66)	1,2,3-Trichloropro...	3.522	3.156	3.112	3.645	3.695	3.788	3.272	3.177	3.020	2.764	3.3152	10.05
67)	s bromofluorobenzene				4.505	4.520	4.482	4.555	4.658	4.666	4.872	4.6083	2.97
68)	C isopropylbenzene				8.482	8.617	8.643	7.373	7.182	6.697	5.837	7.5473	14.34
69)	Bromobenzene				5.021	5.110	5.127	4.422	4.314	4.076	3.630	4.5287	12.77
70)	4-ethyl toluene	7.496	7.146	7.029	8.817	9.034	9.453	8.241	7.993	7.374	6.319	7.8901	12.62
71)	1,3,5-trimethylben...	6.794	6.312	6.280	7.651	7.843	7.946	6.899	6.668	6.183	5.275	6.7849	12.40
72)	tert-butylbenzene				7.871	7.916	8.013	6.861	6.493	5.857	4.466	6.7824	19.32
73)	1,2,4-trimethylben...	6.988	6.230	5.993	7.422	7.614	7.770	6.768	6.471	5.868	4.397	6.5521	15.38
74)	C Benzyl Chloride			1.759	2.304	2.759	3.522	4.589	4.982	4.836	4.233	3.6230	33.95#
75)	1,3-dichlorobenzene	3.589	3.428	3.709	4.029	4.766	5.079	4.539	4.435	4.094	3.457	4.1127	14.02
76)	C 1,4-dichlorobenzene	3.307	3.094	3.673	3.971	4.773	5.019	4.488	4.367	4.070	3.576	4.0338	15.66
77)	sec-butylbenzene				1.092	1.106	1.112	0.953	0.910	0.833	0.687	0.9559	16.80
78)	p-isopropyltoluene				9.361	9.464	9.659	8.274	7.795	6.835	5.057	8.0634	20.79
79)	1,2-dichlorobenzene	4.092	3.635	3.520	4.311	4.440	4.714	4.229	4.127	3.858	3.438	4.0363	10.33
80)	n-butylbenzene				7.544	7.979	8.164	7.309	7.133	6.484	5.436	7.1497	13.12
81)	1,2-dibromo-3-chlo...	1.610	1.426	1.456	1.732	1.911	2.028	1.879	1.816	1.666	1.467	1.6990	12.36
82)	C 1,2,4-trichloroben...		1.879	1.967	2.664	3.164	3.507	3.686	3.701	3.320	3.145	3.0037	22.97
83)	naphthalene		5.320	6.078	7.670	8.785	9.505	9.297	9.052	7.882	7.028	7.8463	18.80
84)	1,2,3-trichloroben...		2.369	2.459	2.973	3.385	3.600	3.619	3.572	3.069	2.931	3.1086	15.32
85)	C hexachlorobutadiene		3.336	3.217	3.733	3.832	3.867	3.587	3.401	2.810	2.437	3.3577	14.31

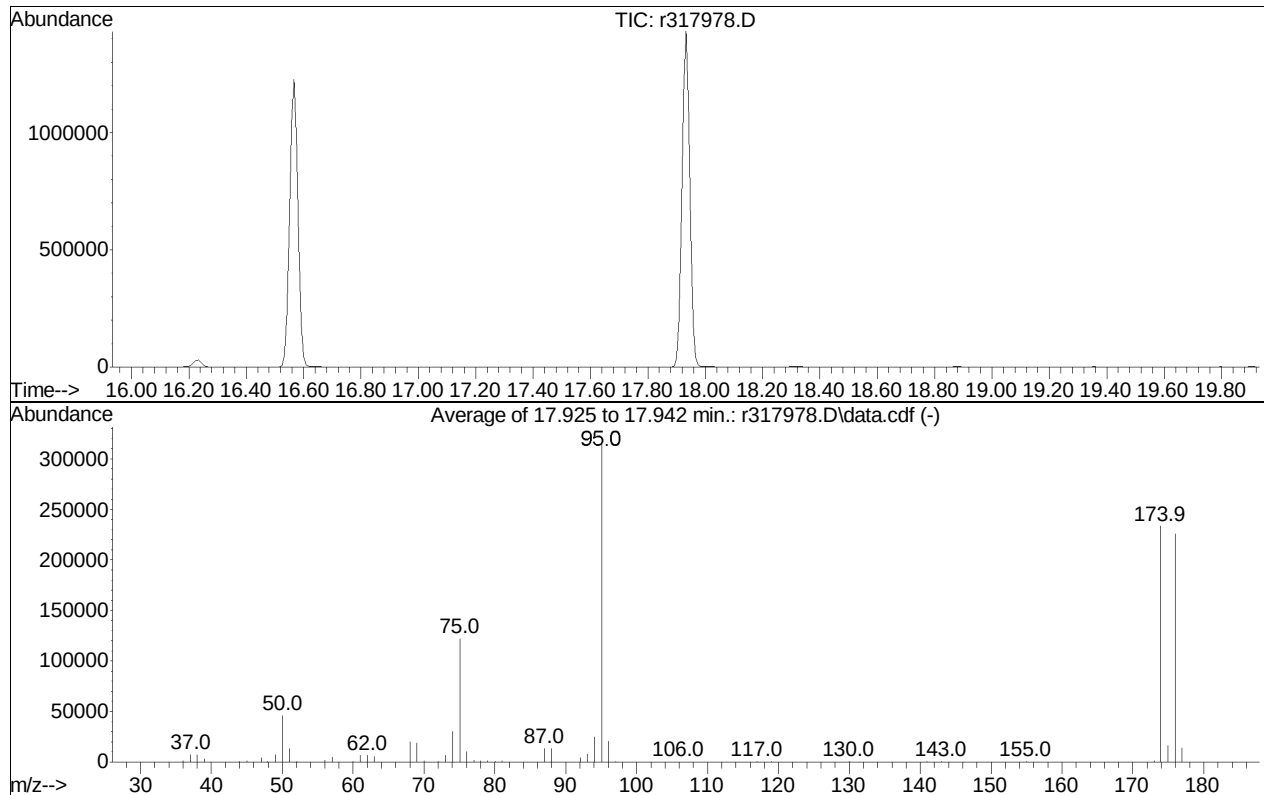
(#) = Out of Range

BFB

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317978.D
 Acq On : 26 Sep 2021 5:29 PM
 Operator : AIRPIAN03:TS
 Sample : WG1551141-1,3,250,250
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Integration File: rteint.p

Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Sep 27 09:51:29 2021



Spectrum Information: Average of 17.925 to 17.942 min.

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	14.7	46299	PASS
75	95	30	66	38.6	121877	PASS
95	95	100	100	100.0	315971	PASS
96	95	5	9	6.6	20900	PASS
173	174	0.00	2	0.7	1546	PASS
174	95	50	120	74.0	233909	PASS
175	174	4	9	7.1	16532	PASS
176	174	93	101	96.4	225566	PASS
177	176	5	9	6.3	14317	PASS

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317979_Ev2.D
 Acq On : 26 Sep 2021 6:04 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.02
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:34:44 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	216584	10.000	ppbV	0.00
Standard Area = 227668			Recovery =		95.13%	
33) 1,4-difluorobenzene	11.833	114	624087	10.000	ppbV	0.00
Standard Area = 647621			Recovery =		96.37%	
51) chlorobenzene-D5	16.558	54	97518	10.000	ppbV	0.00
Standard Area = 103400			Recovery =		94.31%	
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.467	65	53	0.003	ppbV	0.02
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.03%#	
53) toluene-D8	14.667	98	307	0.005	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.05%#	
67) bromofluorobenzene	17.925	95	810M4	0.018	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.18%#	
Target Compounds						
					Qvalue	
2) propylene	3.928	41	328M6	0.033	ppbV	
3) dichlorodifluoromethane	4.012	85	554	0.026	ppbV	89
4) chloromethane	4.192	50	316	0.034	ppbV #	79
5) Freon-114	4.318	85	715	0.025	ppbV	94
6) vinyl chloride	4.450	62	309	0.023	ppbV #	78
7) 1,3-butadiene	4.612	54	273M4	0.025	ppbV	
8) bromomethane	4.930	94	320	0.030	ppbV	96
9) chloroethane	5.146	64	204	0.028	ppbV #	45
10) ethanol	5.337	31	1409	0.146	ppbV	97
11) vinyl bromide	5.577	106	264	0.025	ppbV	88
12) acrolein	5.737	56	329M4	0.049	ppbV	
13) acetone	5.913	43	3537	0.185	ppbV #	98
14) trichlorofluoromethane	6.090	101	506M4	0.025	ppbV	
15) isopropyl alcohol	6.253	45	1403M4	0.059	ppbV	
16) acrylonitrile	6.480	53	307M6	0.026	ppbV	
17) 1,1-dichloroethene	6.860	61	474	0.026	ppbV #	93
18) tertiary butyl alcohol	6.992	59	515	0.021	ppbV #	88
19) methylene chloride	7.028	49	713	0.046	ppbV	97
20) 3-chloropropene	7.166	41	429M4	0.024	ppbV	
21) carbon disulfide	7.322	76	1019	0.023	ppbV #	3
22) Freon 113	7.358	101	586	0.026	ppbV #	91
23) trans-1,2-dichloroethene	8.150	61	476	0.024	ppbV	96

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317979_Ev2.D
 Acq On : 26 Sep 2021 6:04 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.02
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:34:44 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)	
24) 1,1-dichloroethane	8.383	63	597	0.026	ppbV	#	81
25) MTBE	8.508	73	719	0.020	ppbV	#	78
26) vinyl acetate	8.608	43	717M6	0.026	ppbV		
27) 2-butanone	8.908	43	768	0.028	ppbV	#	88
28) cis-1,2-dichloroethene	9.375	61	461	0.027	ppbV		98
29) Ethyl Acetate	9.717	61	95M6	0.019	ppbV		
30) chloroform	9.733	83	619	0.026	ppbV	#	88
31) Tetrahydrofuran	10.233	42	477	0.028	ppbV	#	85
32) 1,2-dichloroethane	10.583	62	291	0.022	ppbV	#	79
34) hexane	9.642	57	790	0.030	ppbV	#	51
36) 1,1,1-trichloroethane	10.867	97	497	0.027	ppbV	#	77
37) benzene	11.400	78	1914	0.037	ppbV	#	91
38) carbon tetrachloride	11.573	117	432	0.024	ppbV	#	94
39) cyclohexane	11.720	56	643M6	0.022	ppbV		
40) Dibromomethane	12.320	93	533	0.040	ppbV	#	97
41) 1,2-dichloropropane	12.360	63	452	0.028	ppbV	#	93
42) bromodichloromethane	12.580	83	542	0.020	ppbV	#	89
43) 1,4-dioxane	12.673	88	477	0.040	ppbV		85
44) trichloroethene	12.640	130	426	0.022	ppbV		90
45) 2,2,4-trimethylpentane	12.680	57	2154M6	0.025	ppbV		
46) heptane	12.993	43	696	0.023	ppbV	#	90
47) cis-1,3-dichloropropene	14.275	75	381	0.017	ppbV	#	85
48) 4-methyl-2-pentanone	13.725	43	762M4	0.022	ppbV		
49) trans-1,3-dichloropropene	13.650	75	499	0.021	ppbV	#	82
50) 1,1,2-trichloroethane	14.467	97	373	0.022	ppbV	#	85
52) toluene	14.783	91	1731	0.032	ppbV		99
54) 2-hexanone	15.100	43	591	0.018	ppbV	#	94
55) dibromochloromethane	15.225	129	537	0.023	ppbV	#	92
56) 1,2-dibromoethane	15.475	107	572	0.023	ppbV		95
57) tetrachloroethene	15.950	166	569	0.024	ppbV	#	91
58) 1,1,1,2-tetrachloroethane	16.592	131	402	0.023	ppbV	#	91
59) chlorobenzene	16.600	112	1079	0.025	ppbV		97
60) ethylbenzene	16.950	91	1450M6	0.022	ppbV		
61) m+p-xylene	17.117	91	2283M4	0.042	ppbV		
62) bromoform	17.183	173	441	0.019	ppbV		87
63) styrene	17.442	104	821	0.018	ppbV		94
64) 1,1,2,2-tetrachloroethane	17.533	83	891	0.022	ppbV		99
65) o-xylene	17.533	91	1198	0.022	ppbV		96
66) 1,2,3-Trichloropropane	17.650	75	687M4	0.022	ppbV		
68) isopropylbenzene	18.042	105	1533	0.021	ppbV		98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317979_Ev2.D
 Acq On : 26 Sep 2021 6:04 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD0.02
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:34:44 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

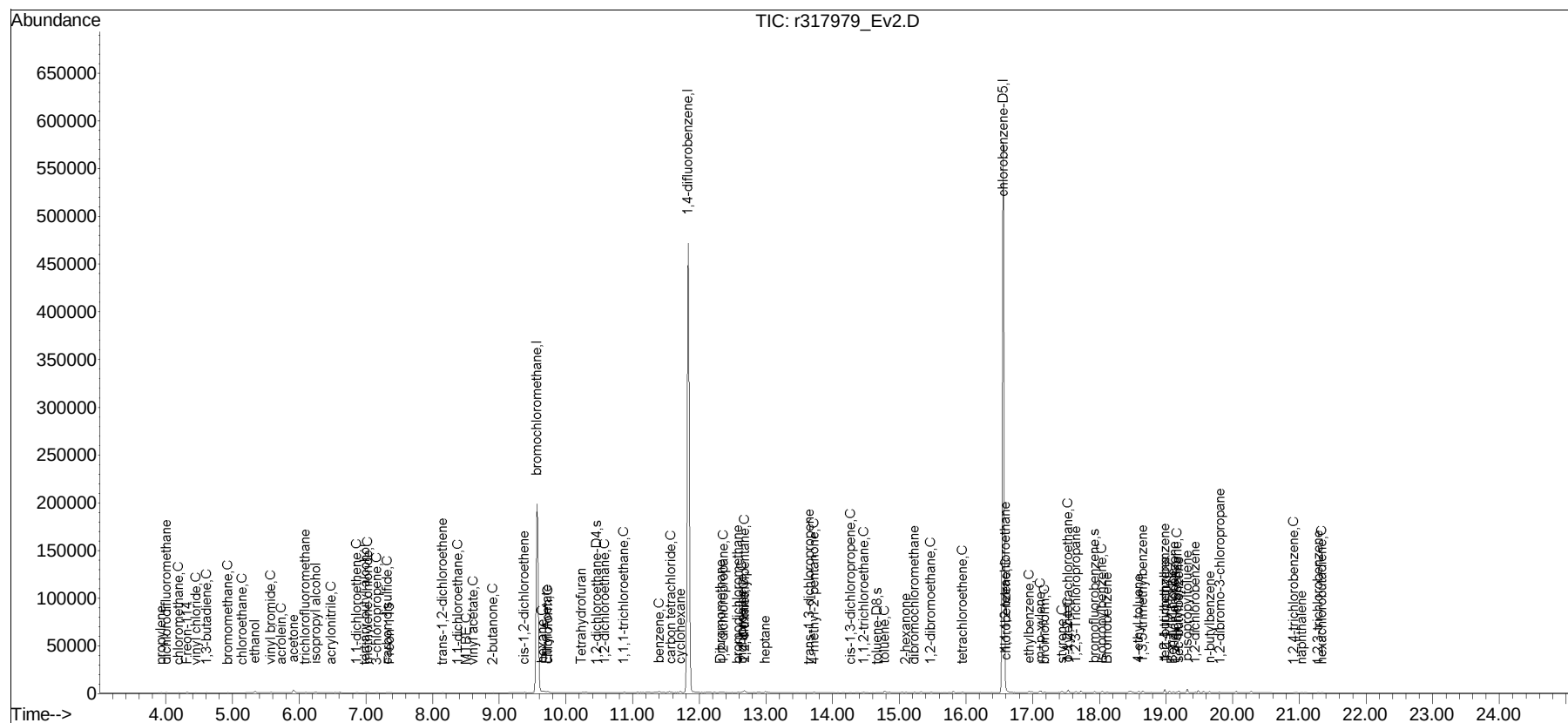
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

	Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
69)	Bromobenzene	18.117	77	858	0.020	ppbV	97
70)	4-ethyl toluene	18.592	105	1462	0.018	ppbV #	95
71)	1,3,5-trimethylbenzene	18.650	105	1325	0.020	ppbV #	98
72)	tert-butylbenzene	18.983	119	1444	0.022	ppbV	95
73)	1,2,4-trimethylbenzene	18.983	105	1363	0.021	ppbV	96
74)	Benzyl Chloride	19.100	91	373M4	0.008	ppbV	
75)	1,3-dichlorobenzene	19.117	146	700	0.016	ppbV #	90
76)	1,4-dichlorobenzene	19.167	146	645	0.015	ppbV	95
77)	sec-butylbenzene	19.192	105	1910	0.021	ppbV	100
78)	p-isopropyltoluene	19.317	119	1634	0.020	ppbV	97
79)	1,2-dichlorobenzene	19.442	146	798	0.019	ppbV #	88
80)	n-butylbenzene	19.658	91	1245	0.017	ppbV	92
81)	1,2-dibromo-3-chloropr...	19.808	75	314M4	0.017	ppbV	
82)	1,2,4-trichlorobenzene	20.917	180	424	0.012	ppbV #	75
83)	naphthalene	21.033	128	1198M6	0.013	ppbV	
84)	1,2,3-trichlorobenzene	21.283	180	530M4	0.015	ppbV	
85)	hexachlorobutadiene	21.342	225	679	0.019	ppbV #	90

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317979_Ev2.D
Acq On     : 26 Sep 2021   6:04 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD0.02
Misc      : WG1551141
ALS Vial   : 0    Sample Multiplier: 1
```

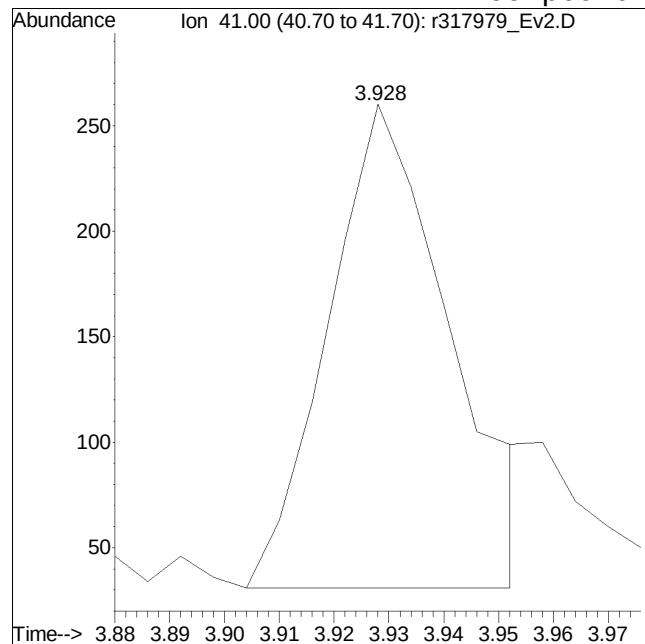
Quant Time: Sep 27 09:34:44 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

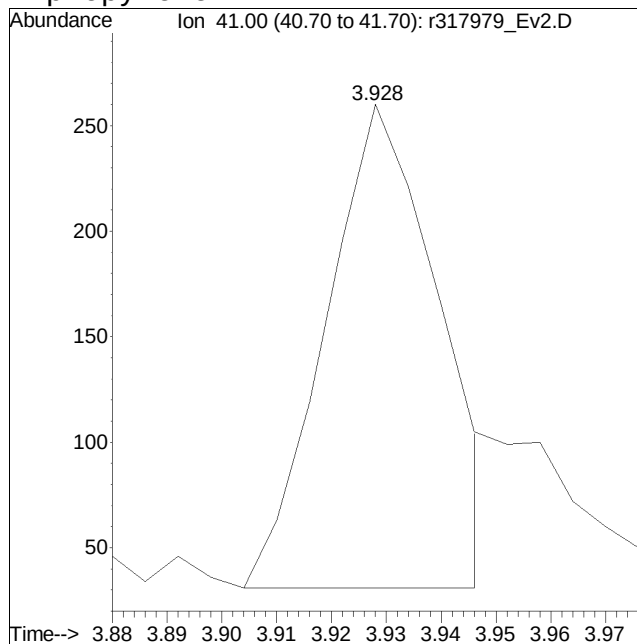
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 353

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

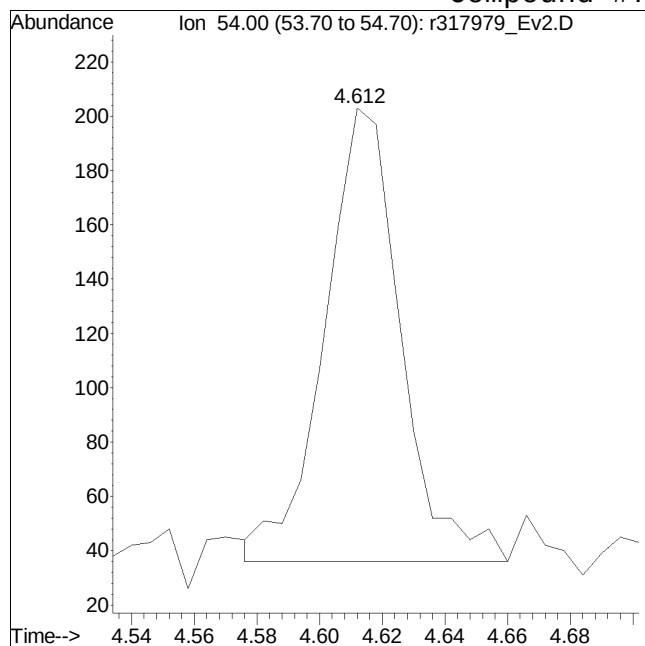


Manual Peak Response = 328 M6

Manual Integration Report

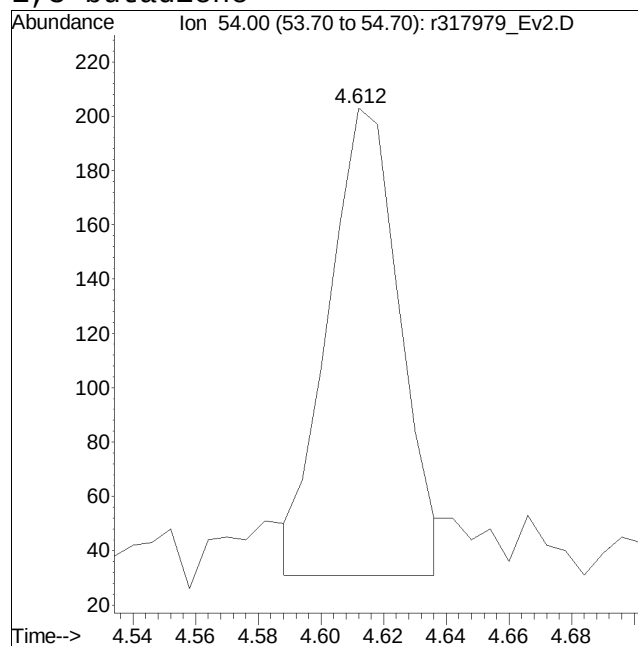
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #7: 1,3-butadiene



Original Peak Response = 282

M4 = Poor automated baseline construction.

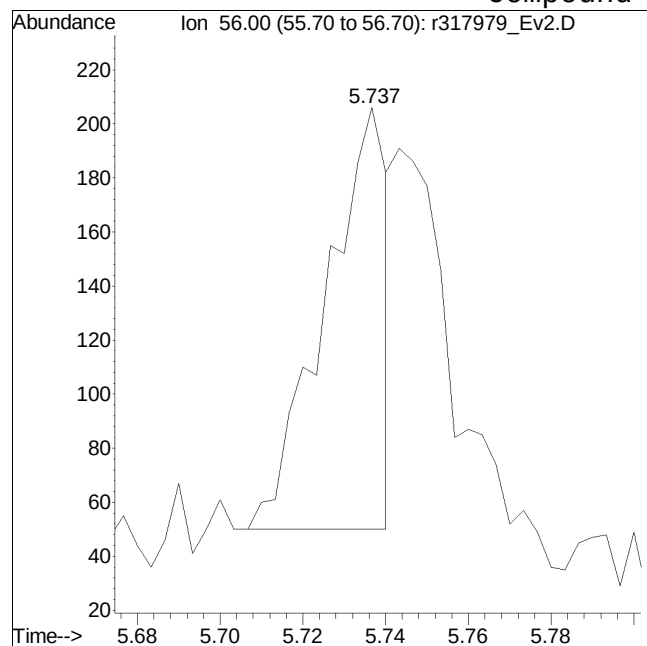


Manual Peak Response = 273 M4

Manual Integration Report

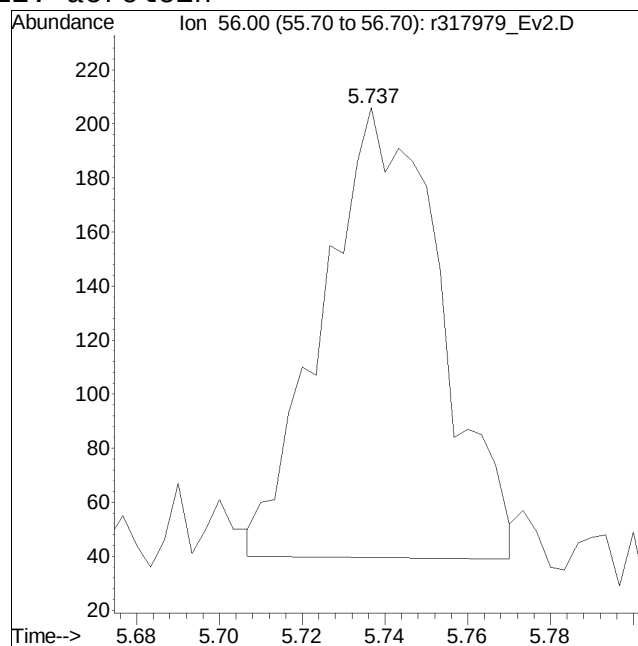
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Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #12: acrolein



Original Peak Response = 162

M4 = Poor automated baseline construction.

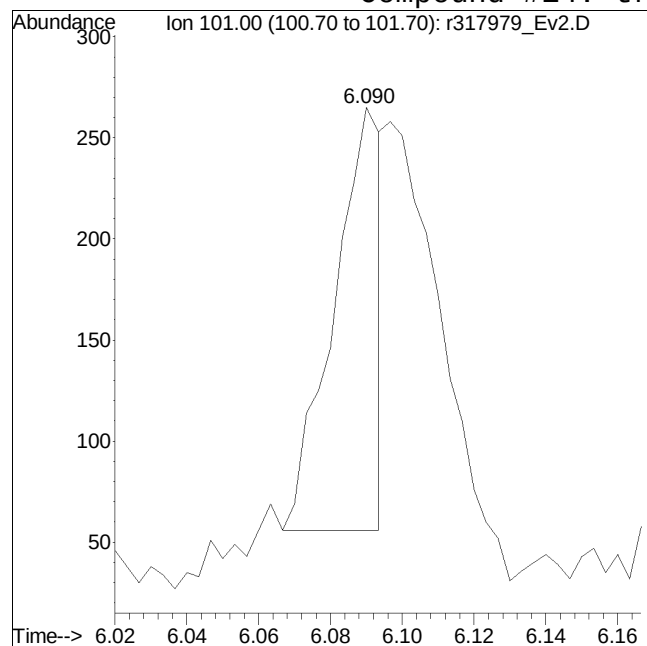


Manual Peak Response = 329 M4

Manual Integration Report

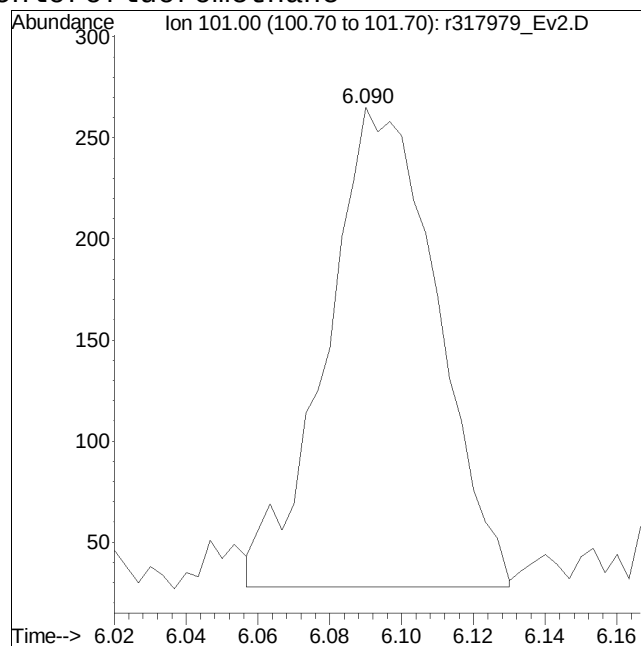
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #14: trichlorofluoromethane



Original Peak Response = 191

M4 = Poor automated baseline construction.

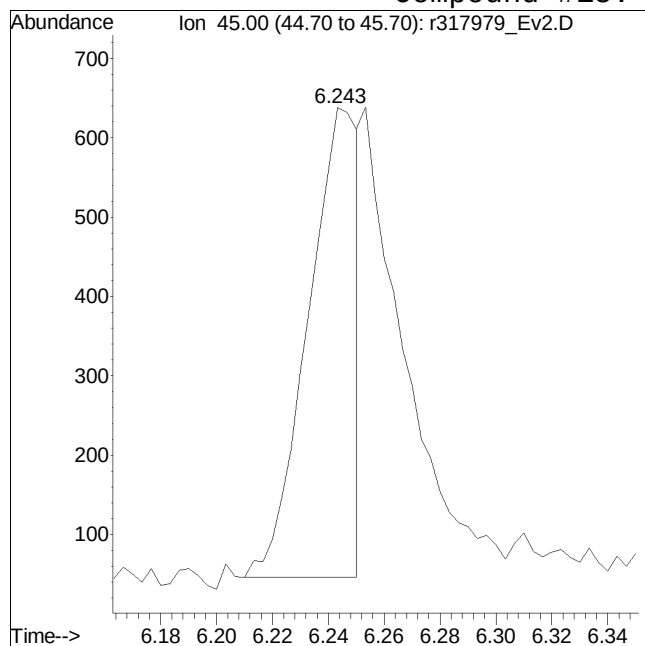


Manual Peak Response = 506 M4

Manual Integration Report

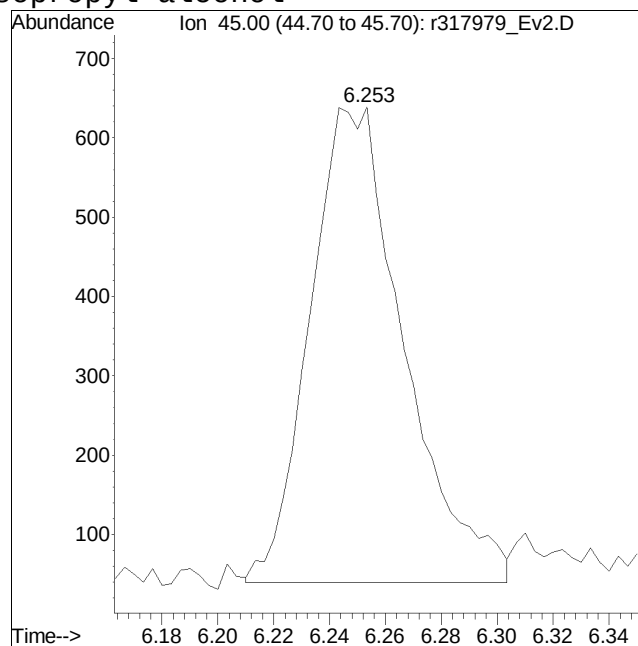
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Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #15: isopropyl alcohol



Original Peak Response = 727

M4 = Poor automated baseline construction.

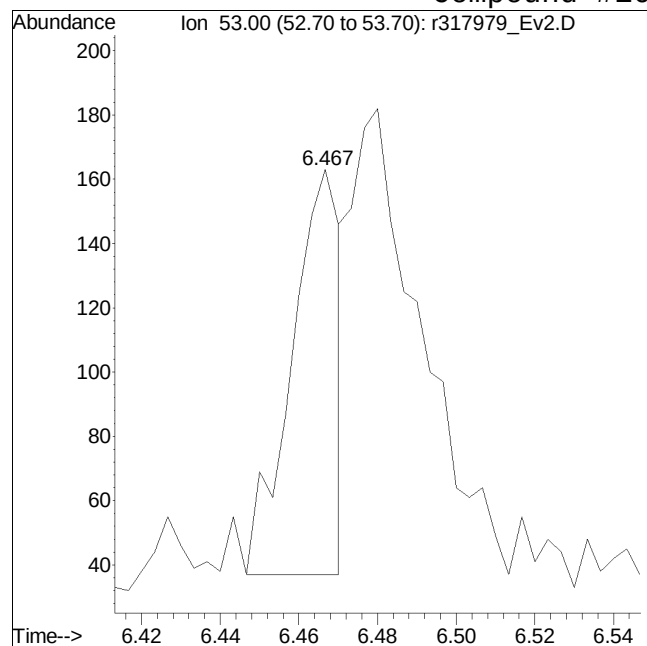


Manual Peak Response = 1403 M4

Manual Integration Report

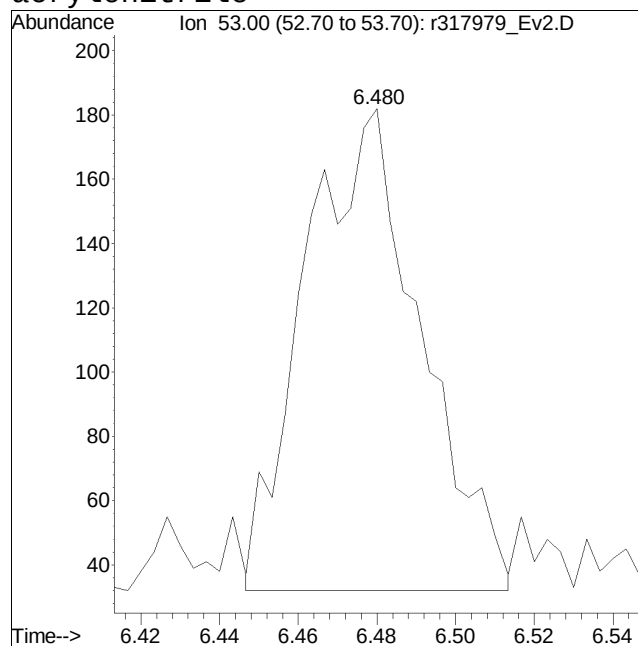
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Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #16: acrylonitrile



Original Peak Response = 108

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

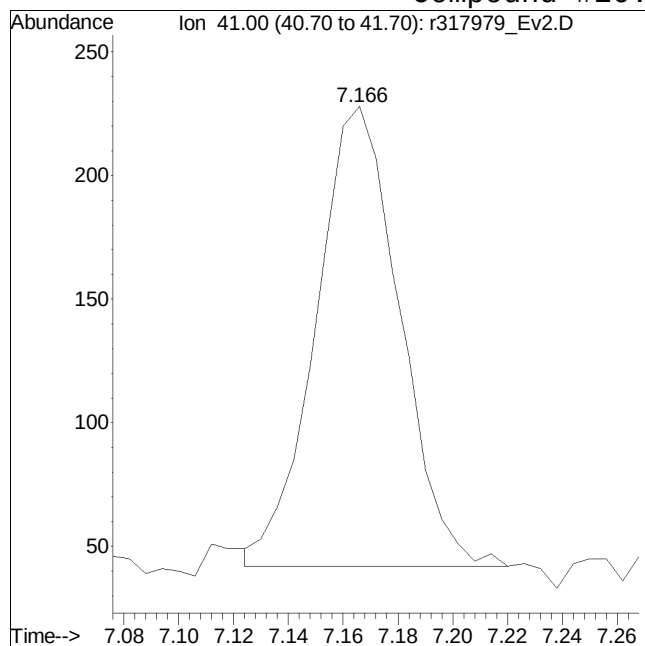


Manual Peak Response = 307 M6

Manual Integration Report

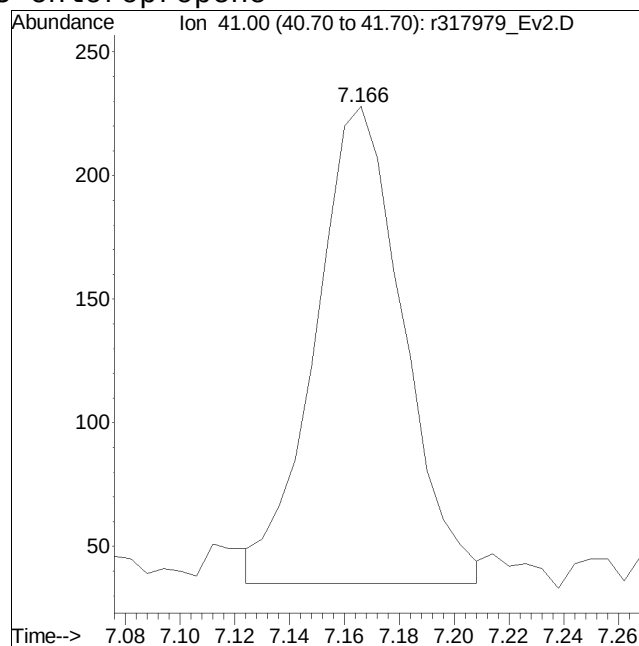
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #20: 3-chloropropene



Original Peak Response = 395

M4 = Poor automated baseline construction.

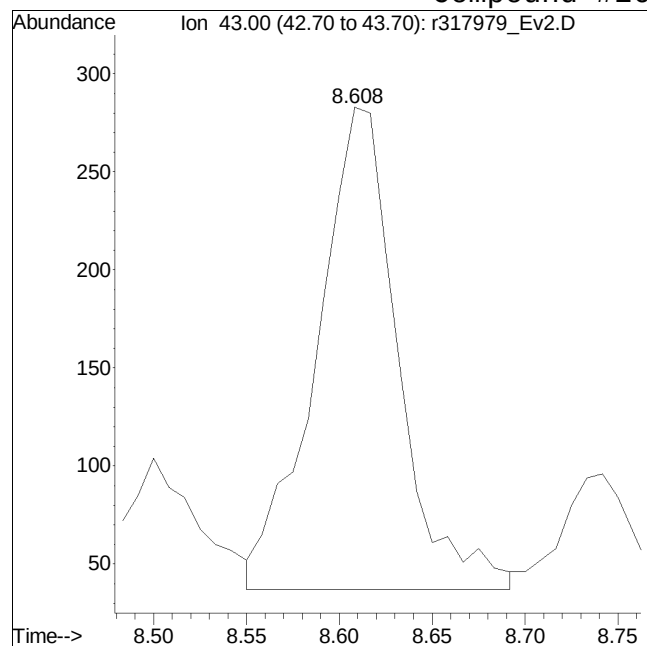


Manual Peak Response = 429 M4

Manual Integration Report

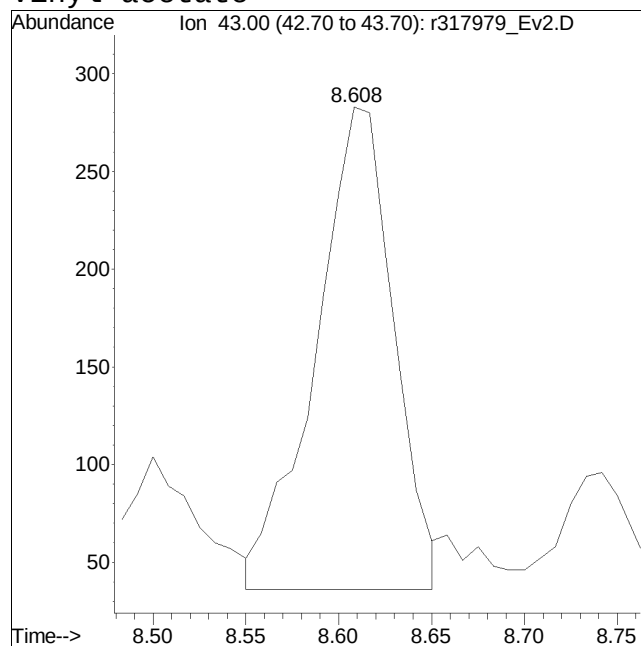
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #26: vinyl acetate



Original Peak Response = 752

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

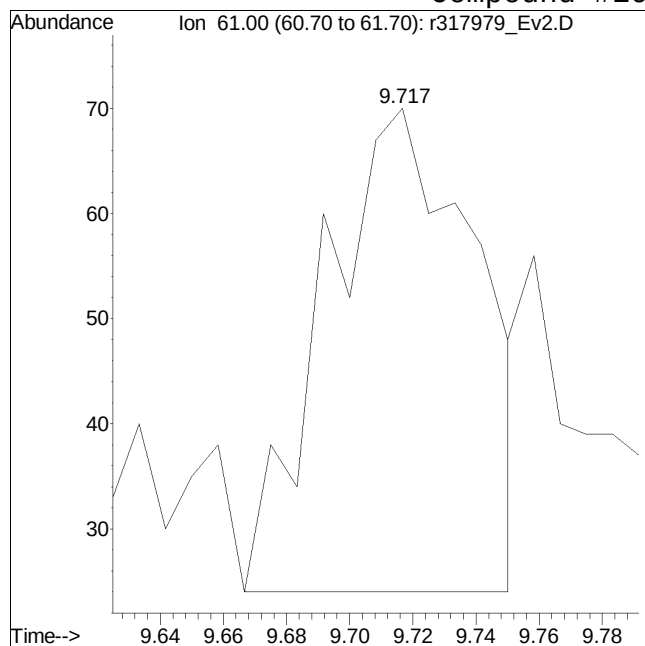


Manual Peak Response = 717 M6

Manual Integration Report

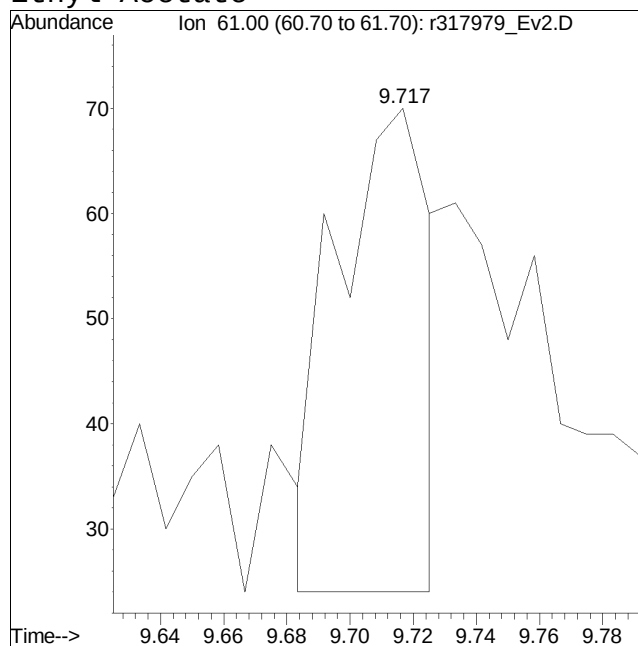
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #29: Ethyl Acetate



Original Peak Response = 154

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

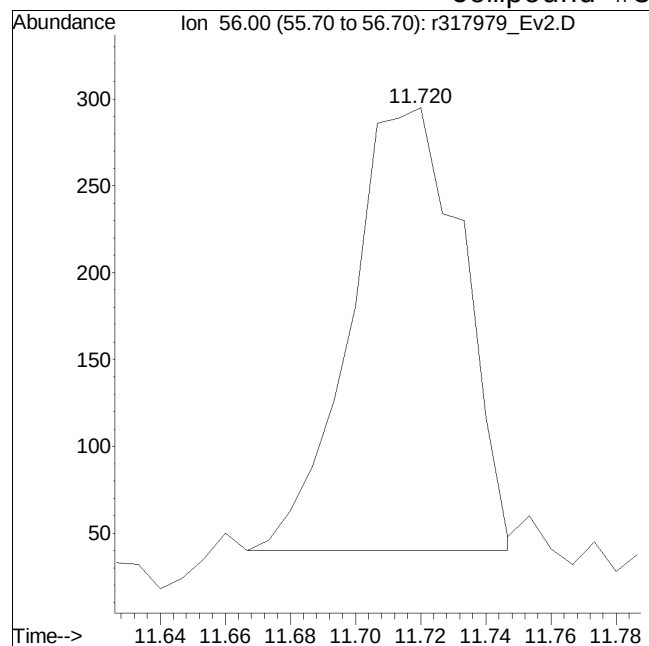


Manual Peak Response = 95 M6

Manual Integration Report

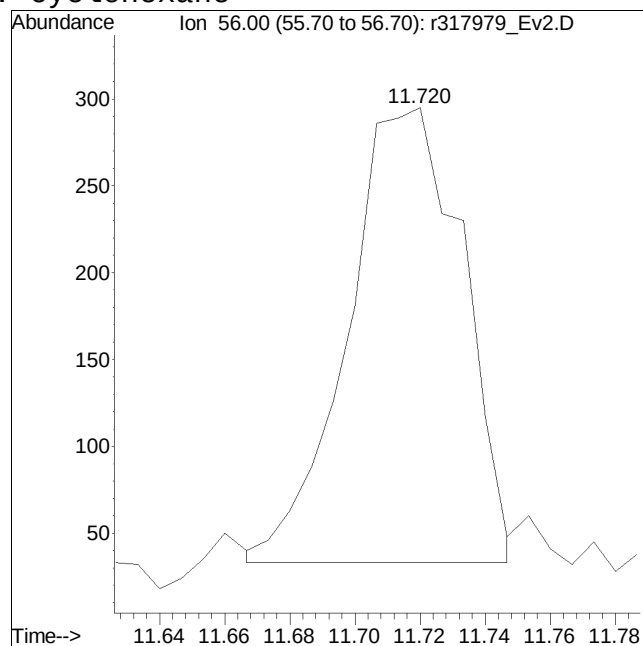
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #39: cyclohexane



Original Peak Response = 609

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

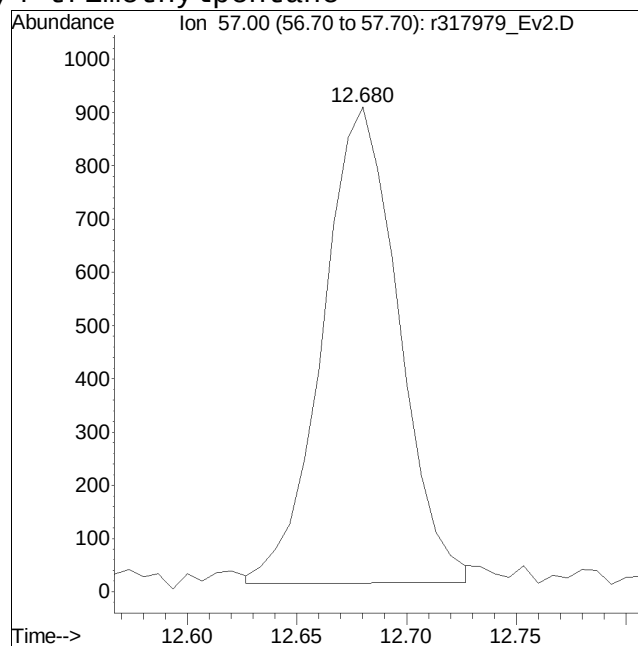
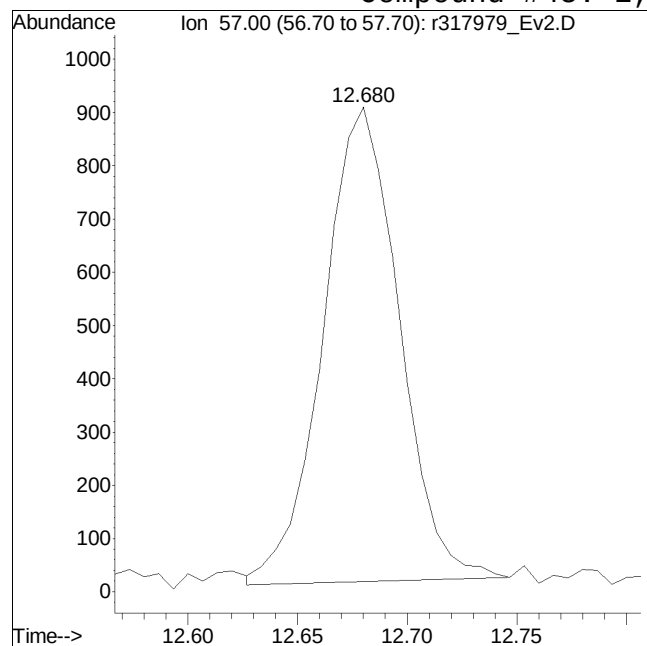


Manual Peak Response = 643 M6

Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #45: 2,2,4-trimethylpentane



Original Peak Response = 2152

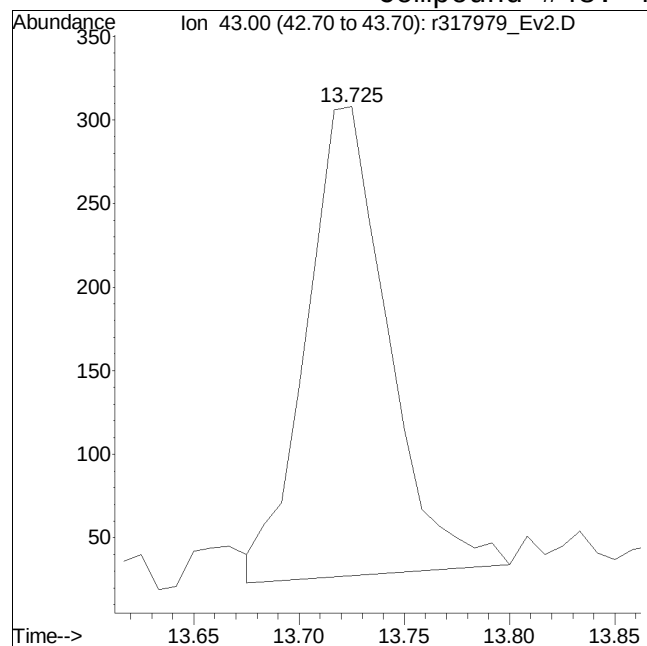
Manual Peak Response = 2154 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Manual Integration Report

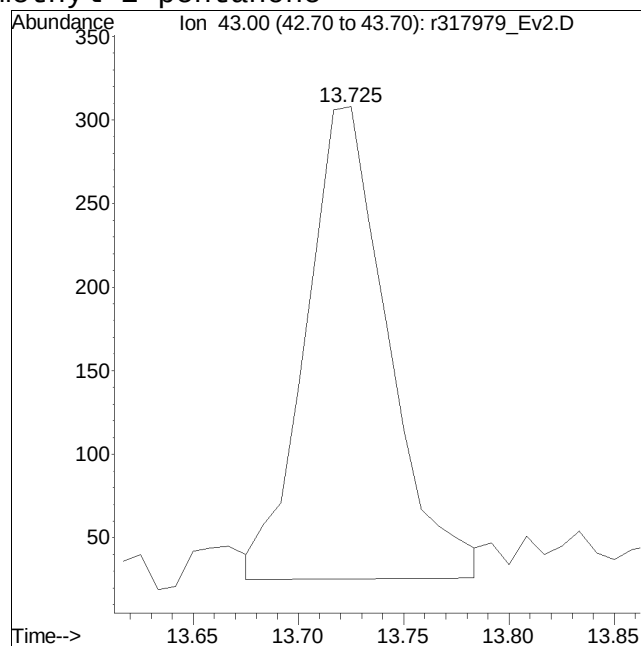
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #48: 4-methyl-2-pentanone



Original Peak Response = 755

M4 = Poor automated baseline construction.

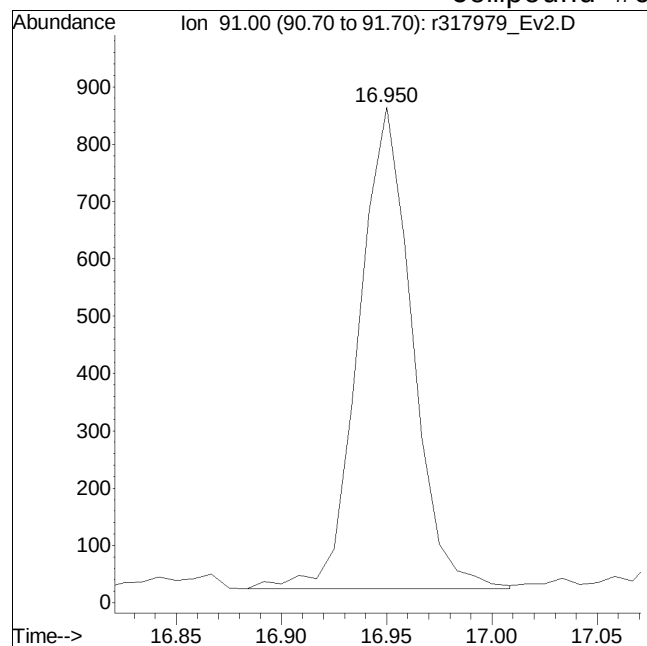


Manual Peak Response = 762 M4

Manual Integration Report

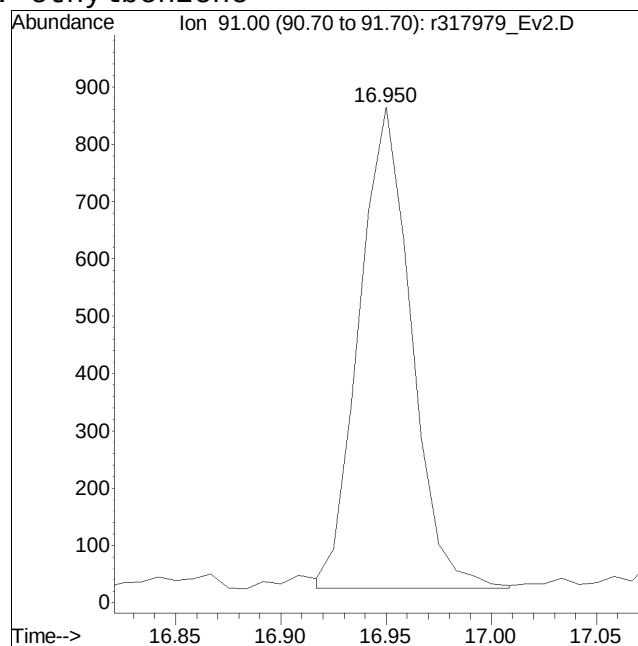
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #60: ethylbenzene



Original Peak Response = 1488

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

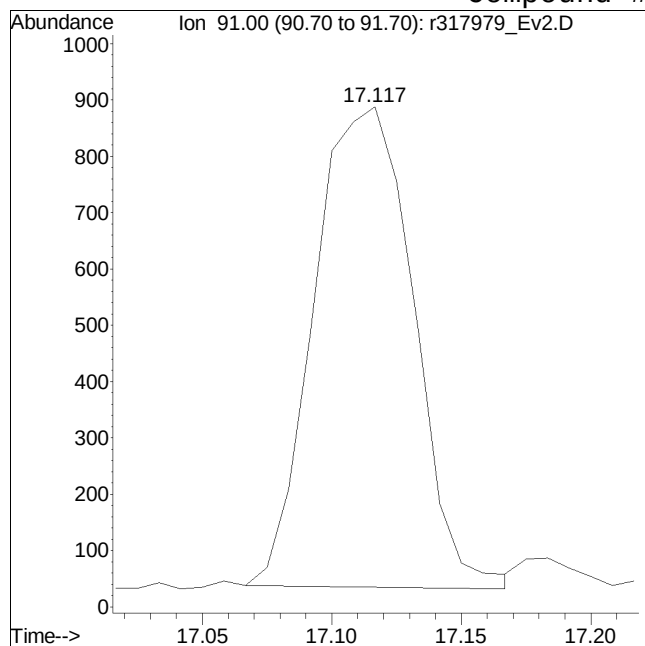


Manual Peak Response = 1450 M6

Manual Integration Report

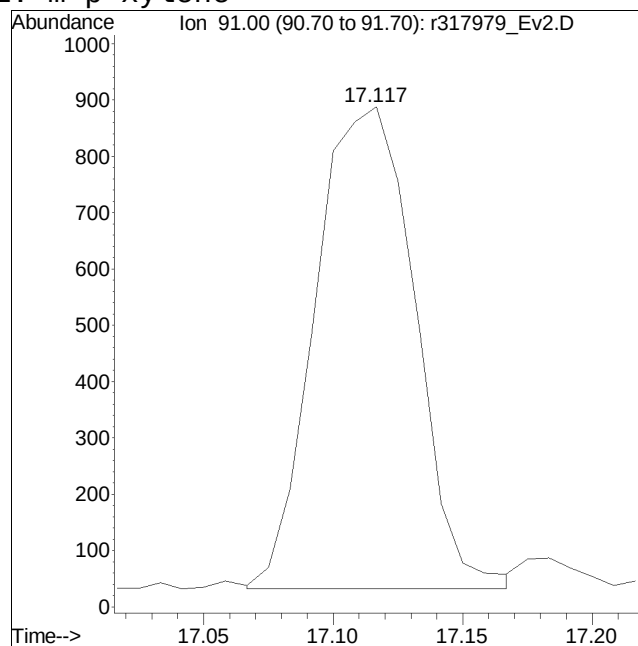
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #61: m+p-xylene



Original Peak Response = 2265

M4 = Poor automated baseline construction.

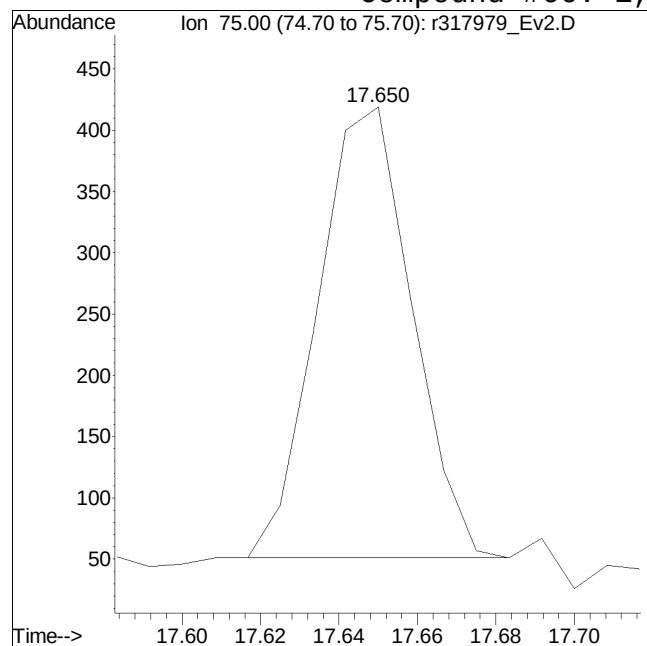


Manual Peak Response = 2283 M4

Manual Integration Report

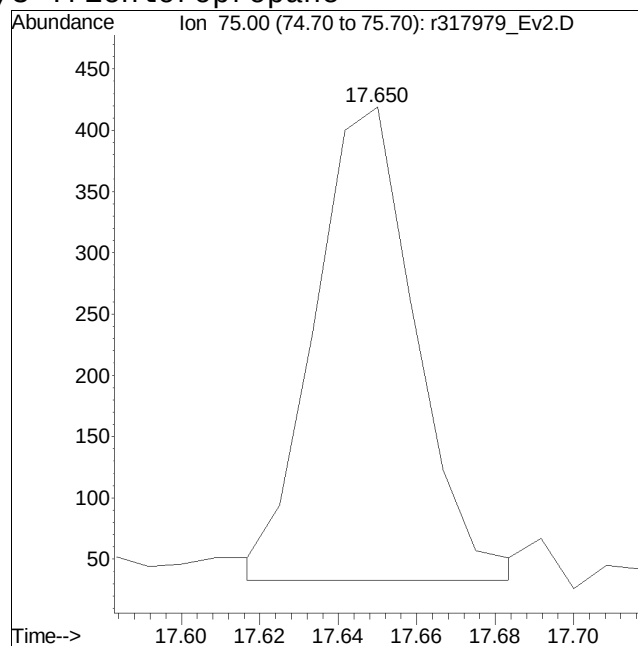
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #66: 1,2,3-Trichloropropane



Original Peak Response = 615

M4 = Poor automated baseline construction.

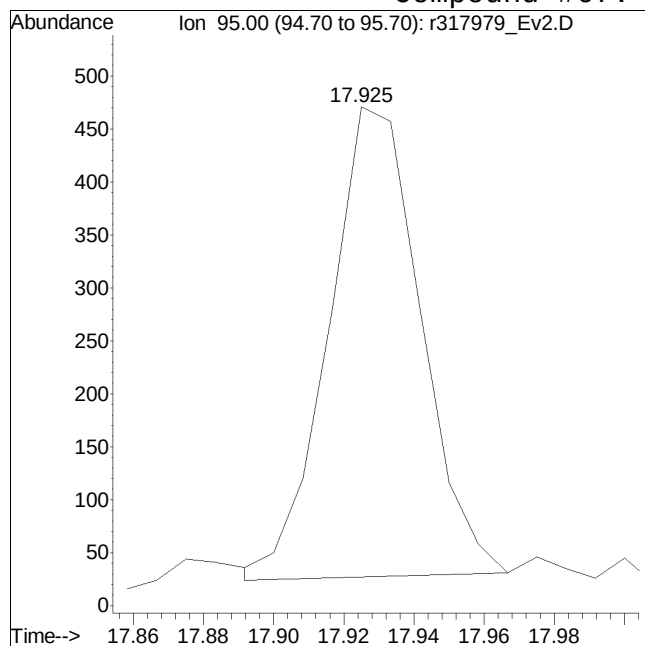


Manual Peak Response = 687 M4

Manual Integration Report

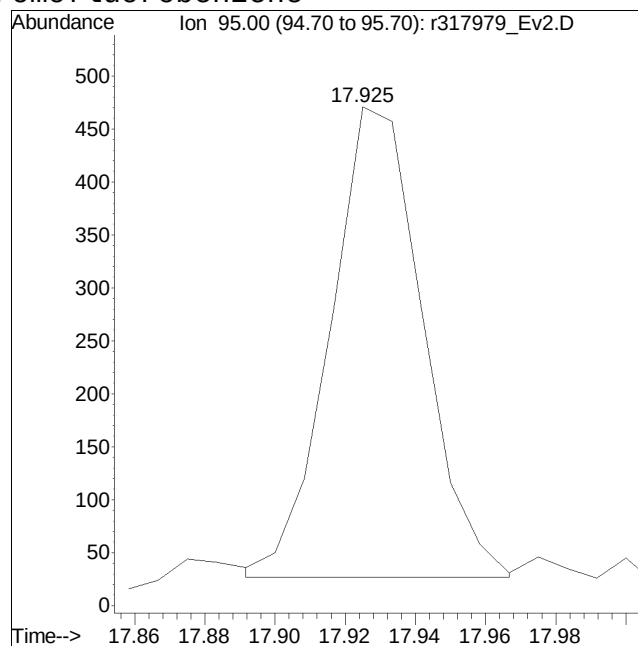
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #67: bromofluorobenzene



Original Peak Response = 808

M4 = Poor automated baseline construction.

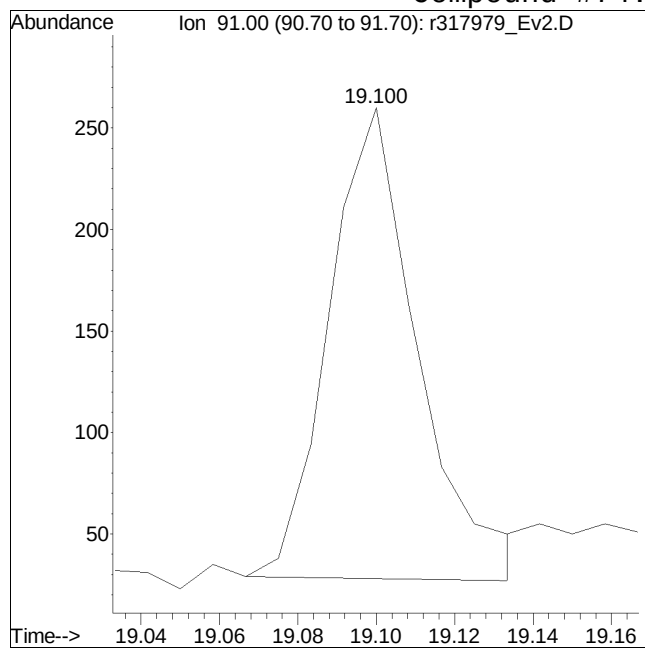


Manual Peak Response = 810 M4

Manual Integration Report

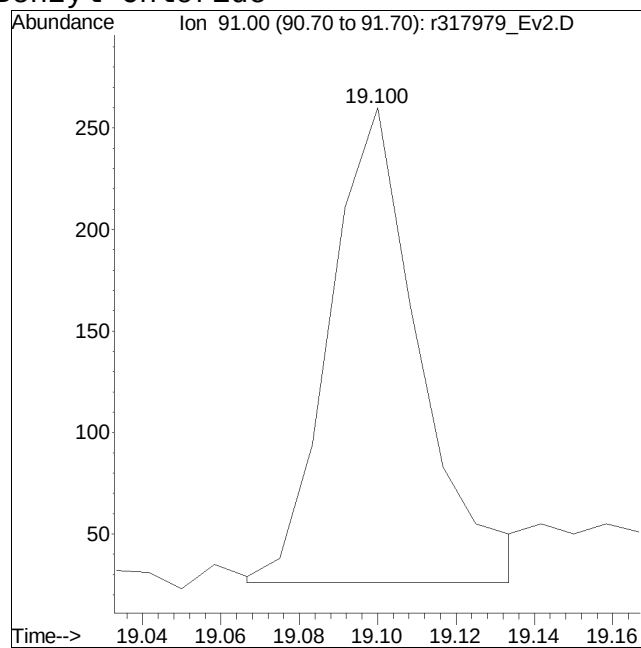
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #74: Benzyl Chloride



Original Peak Response = 365

M4 = Poor automated baseline construction.

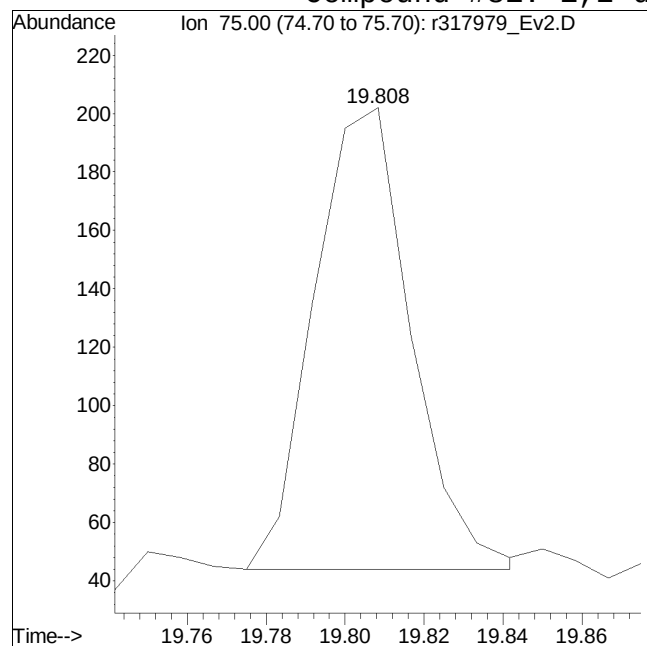


Manual Peak Response = 373 M4

Manual Integration Report

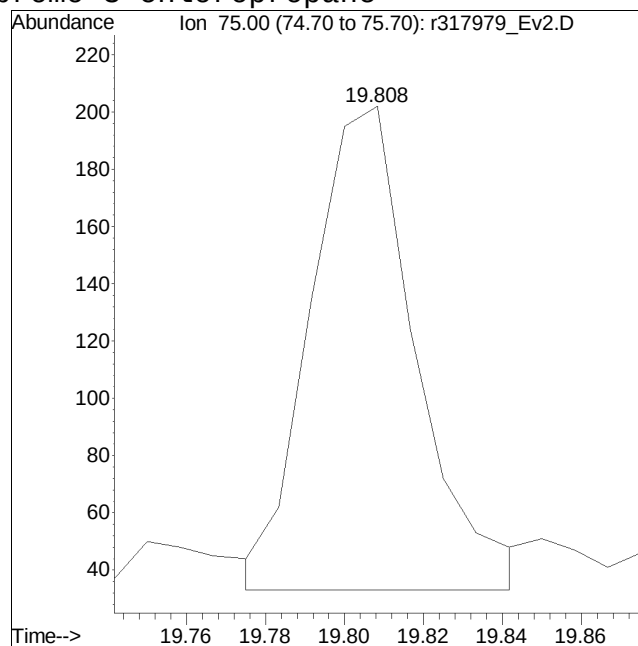
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #81: 1,2-dibromo-3-chloropropane



Original Peak Response = 270

M4 = Poor automated baseline construction.

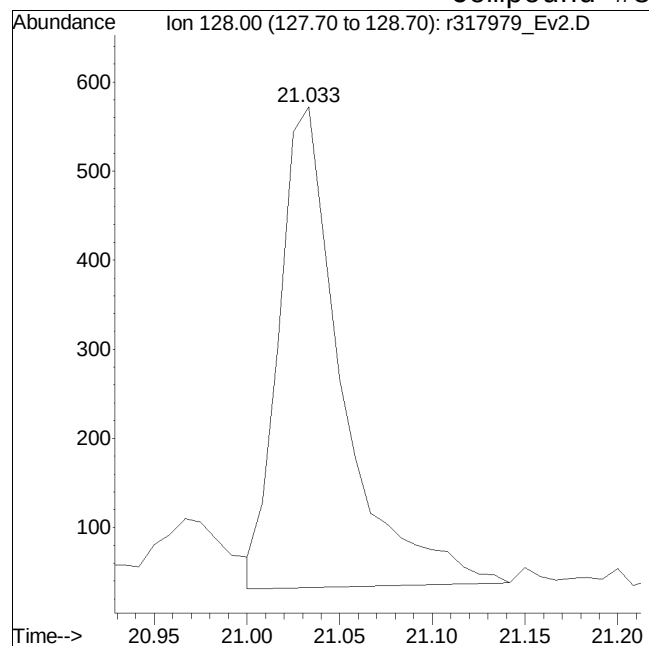


Manual Peak Response = 314 M4

Manual Integration Report

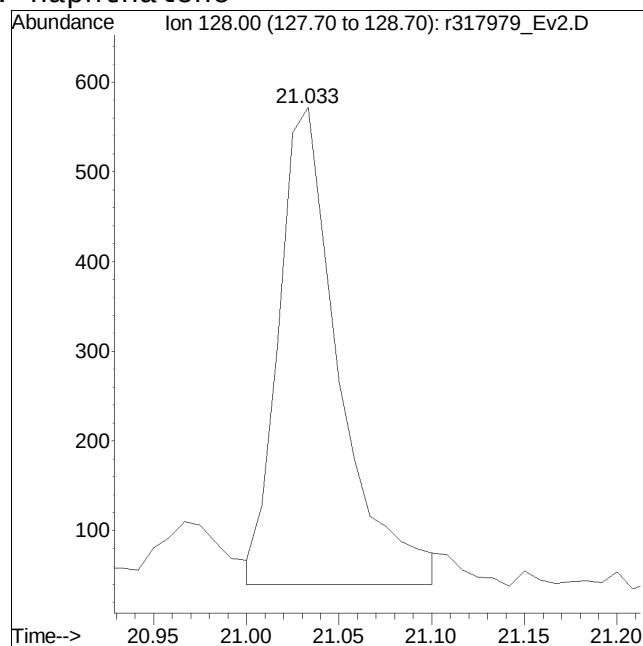
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #83: naphthalene



Original Peak Response = 1276

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

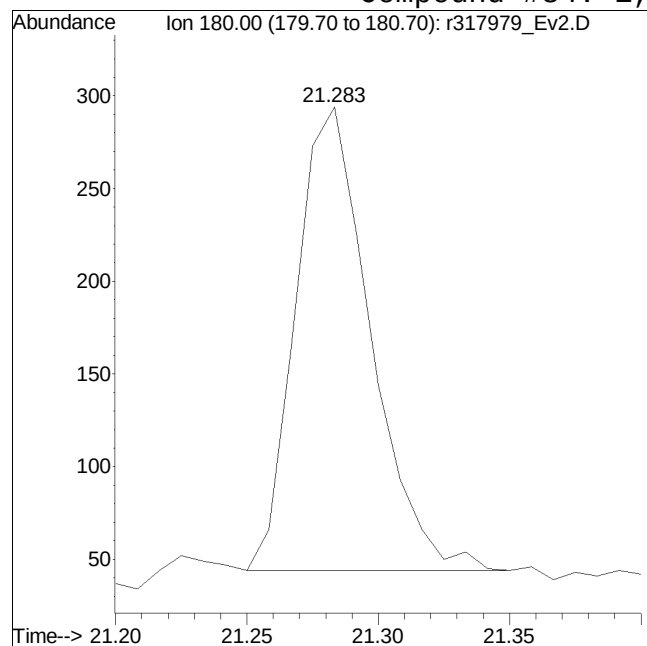


Manual Peak Response = 1198 M6

Manual Integration Report

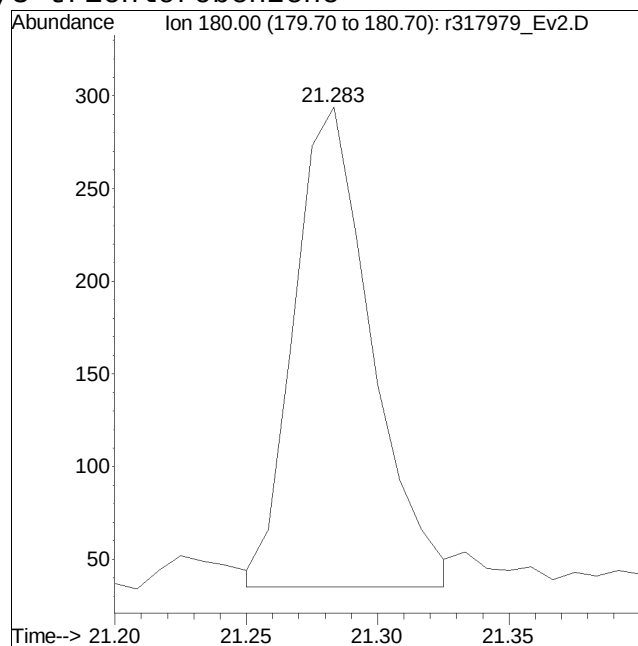
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317979_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 4 Instrument :
Sample : IT015-SIMSTD0.02 Quant Date : 9/27/2021 7:44 am

Compound #84: 1,2,3-trichlorobenzene



Original Peak Response = 495

M4 = Poor automated baseline construction.



Manual Peak Response = 530 M4

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317980_Ev2.D
 Acq On : 26 Sep 2021 6:41 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.05
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:37:39 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	218758	10.000	ppbV	0.00
Standard Area = 227668			Recovery =		96.09%	
33) 1,4-difluorobenzene	11.833	114	625848	10.000	ppbV	0.00
Standard Area = 647621			Recovery =		96.64%	
51) chlorobenzene-D5	16.558	54	97597	10.000	ppbV	0.00
Standard Area = 103400			Recovery =		94.39%	
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.567	65	68	0.004	ppbV	0.12
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.04%#	
53) toluene-D8	14.675	98	233	0.004	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.04%#	
67) bromofluorobenzene	17.925	95	484	0.011	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.11%#	
Target Compounds						
					Qvalue	
2) propylene	3.928	41	625M6	0.063	ppbV	
3) dichlorodifluoromethane	4.006	85	1206	0.057	ppbV	96
4) chloromethane	4.186	50	608	0.064	ppbV	89
5) Freon-114	4.318	85	1534M6	0.053	ppbV	
6) vinyl chloride	4.450	62	706	0.053	ppbV #	87
7) 1,3-butadiene	4.612	54	592	0.053	ppbV	88
8) bromomethane	4.930	94	649	0.061	ppbV	97
9) chloroethane	5.152	64	406	0.056	ppbV #	89
10) ethanol	5.337	31	2747	0.282	ppbV	97
11) vinyl bromide	5.580	106	609	0.057	ppbV	95
12) acrolein	5.740	56	537	0.080	ppbV	96
13) acetone	5.913	43	6319	0.327	ppbV #	97
14) trichlorofluoromethane	6.097	101	1065	0.051	ppbV	90
15) isopropyl alcohol	6.243	45	2647	0.111	ppbV #	90
16) acrylonitrile	6.473	53	628	0.053	ppbV	98
17) 1,1-dichloroethene	6.860	61	1021	0.055	ppbV	94
18) tertiary butyl alcohol	6.986	59	1043	0.043	ppbV #	97
19) methylene chloride	7.028	49	1249	0.079	ppbV	95
20) 3-chloropropene	7.166	41	862	0.048	ppbV	93
21) carbon disulfide	7.322	76	2413	0.054	ppbV #	54
22) Freon 113	7.364	101	1184	0.052	ppbV	99
23) trans-1,2-dichloroethene	8.150	61	1082	0.055	ppbV	99
24) 1,1-dichloroethane	8.383	63	1268	0.056	ppbV	92

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317980_Ev2.D
 Acq On : 26 Sep 2021 6:41 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.05
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:37:39 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)	
25) MTBE	8.500	73	1791	0.049	ppbV	#	87
26) vinyl acetate	8.608	43	1414M3	0.051	ppbV		
27) 2-butanone	8.900	43	1611	0.057	ppbV	#	98
28) cis-1,2-dichloroethene	9.375	61	938M6	0.054	ppbV		
29) Ethyl Acetate	9.708	61	213	0.043	ppbV	#	50
30) chloroform	9.733	83	1318M6	0.054	ppbV		
31) Tetrahydrofuran	10.233	42	989	0.057	ppbV		90
32) 1,2-dichloroethane	10.583	62	763	0.057	ppbV	#	91
34) hexane	9.650	57	1422	0.053	ppbV	#	62
36) 1,1,1-trichloroethane	10.875	97	968M6	0.052	ppbV		
37) benzene	11.400	78	3282	0.063	ppbV		98
38) carbon tetrachloride	11.573	117	937	0.052	ppbV	#	88
39) cyclohexane	11.713	56	1595	0.055	ppbV		94
40) Dibromomethane	12.320	93	952	0.072	ppbV	#	97
41) 1,2-dichloropropane	12.353	63	908	0.056	ppbV		96
42) bromodichloromethane	12.580	83	1372	0.051	ppbV	#	94
43) 1,4-dioxane	12.667	88	782M6	0.066	ppbV		
44) trichloroethene	12.633	130	1075	0.054	ppbV		97
45) 2,2,4-trimethylpentane	12.680	57	4567	0.053	ppbV	#	99
46) heptane	13.000	43	1641	0.054	ppbV		98
47) cis-1,3-dichloropropene	14.267	75	868M4	0.039	ppbV		
48) 4-methyl-2-pentanone	13.717	43	1544	0.045	ppbV	#	93
49) trans-1,3-dichloropropene	13.650	75	1064	0.044	ppbV		95
50) 1,1,2-trichloroethane	14.467	97	890	0.053	ppbV		99
52) toluene	14.783	91	3208	0.059	ppbV		99
54) 2-hexanone	15.092	43	1107	0.035	ppbV		96
55) dibromochloromethane	15.225	129	1209	0.051	ppbV		97
56) 1,2-dibromoethane	15.475	107	1240	0.050	ppbV		99
57) tetrachloroethene	15.950	166	1255	0.053	ppbV		95
58) 1,1,1,2-tetrachloroethane	16.583	131	870	0.050	ppbV		97
59) chlorobenzene	16.600	112	2296	0.052	ppbV		97
60) ethylbenzene	16.950	91	3243	0.049	ppbV		98
61) m+p-xylene	17.108	91	5245	0.096	ppbV		99
62) bromoform	17.183	173	1027	0.045	ppbV		95
63) styrene	17.433	104	2023	0.043	ppbV		94
64) 1,1,2,2-tetrachloroethane	17.533	83	2071	0.051	ppbV		99
65) o-xylene	17.525	91	2697	0.049	ppbV		97
66) 1,2,3-Trichloropropane	17.642	75	1540	0.048	ppbV		97
68) isopropylbenzene	18.042	105	3481	0.048	ppbV		98
69) Bromobenzene	18.117	77	1954	0.045	ppbV		98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317980_Ev2.D
 Acq On : 26 Sep 2021 6:41 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD0.05
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:37:39 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

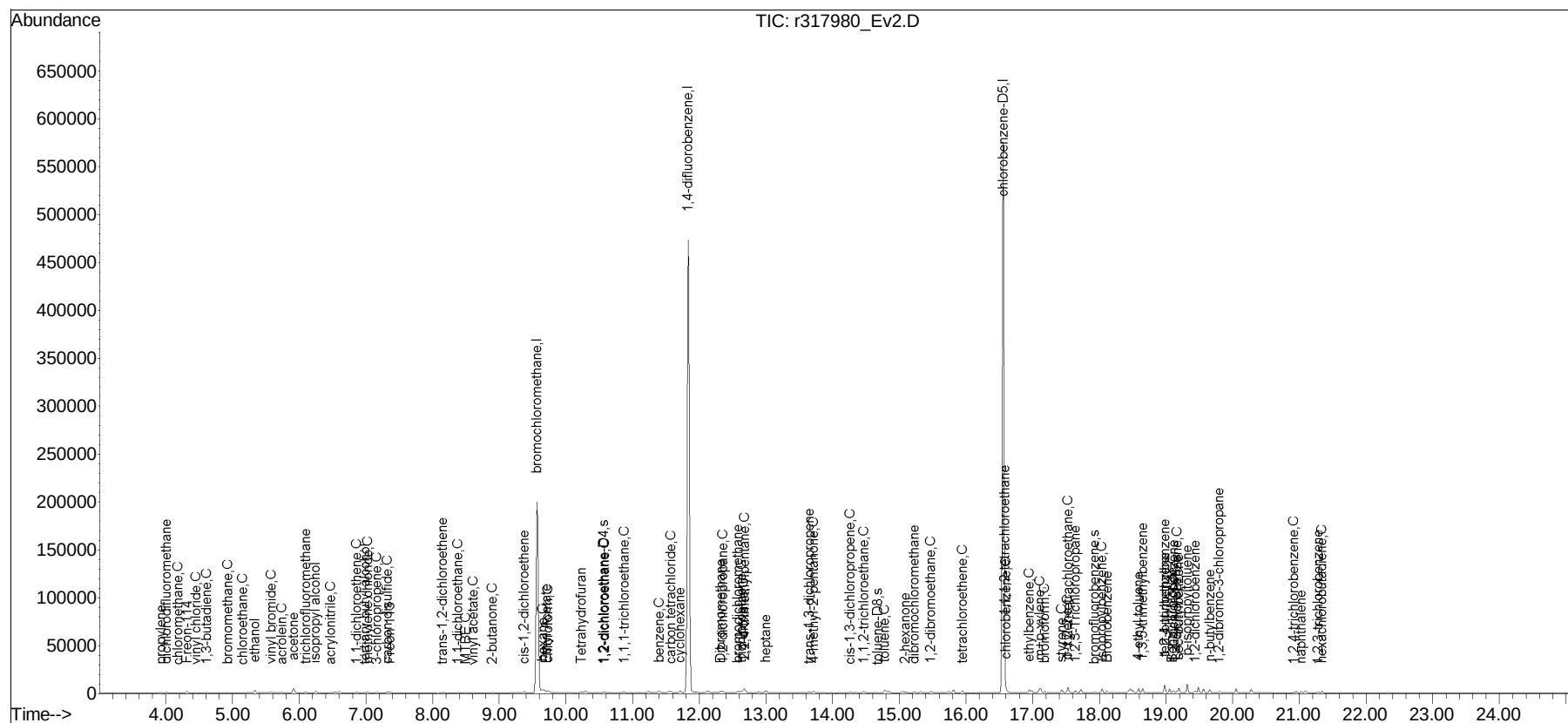
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.592	105	3487	0.043	ppbV	97
71) 1,3,5-trimethylbenzene	18.650	105	3080	0.046	ppbV	95
72) tert-butylbenzene	18.983	119	3320	0.050	ppbV	99
73) 1,2,4-trimethylbenzene	18.983	105	3040	0.046	ppbV	98
74) Benzyl Chloride	19.100	91	752	0.017	ppbV	91
75) 1,3-dichlorobenzene	19.108	146	1673M3	0.038	ppbV	
76) 1,4-dichlorobenzene	19.167	146	1510M4	0.034	ppbV	
77) sec-butylbenzene	19.192	105	4486	0.048	ppbV	95
78) p-isopropyltoluene	19.317	119	3812	0.047	ppbV	100
79) 1,2-dichlorobenzene	19.442	146	1774M6	0.043	ppbV	
80) n-butylbenzene	19.658	91	2934	0.041	ppbV	97
81) 1,2-dibromo-3-chloropr...	19.800	75	696M6	0.038	ppbV	
82) 1,2,4-trichlorobenzene	20.917	180	917	0.025	ppbV #	88
83) naphthalene	21.025	128	2596	0.029	ppbV #	94
84) 1,2,3-trichlorobenzene	21.283	180	1156	0.033	ppbV	95
85) hexachlorobutadiene	21.342	225	1628	0.047	ppbV	98

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317980_Ev2.D
Acq On     : 26 Sep 2021   6:41 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD0.05
Misc       : WG1551141
ALS Vial   : 0   Sample Multiplier: 1
```

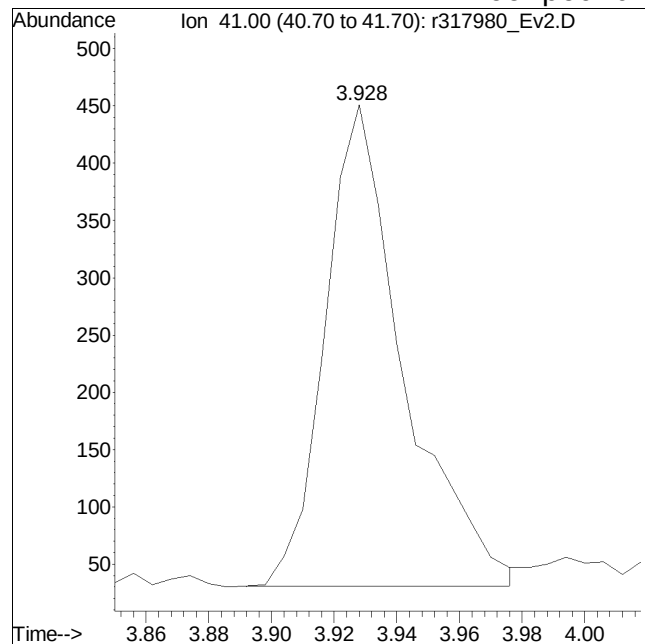
Quant Time: Sep 27 09:37:39 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

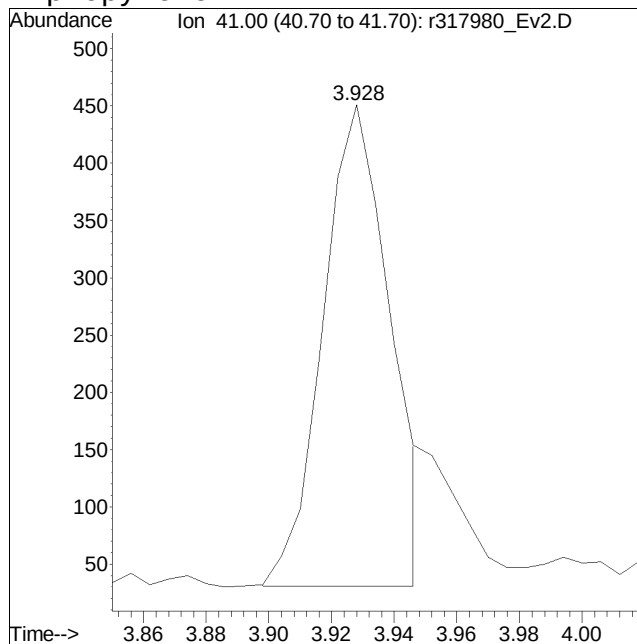
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 730

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

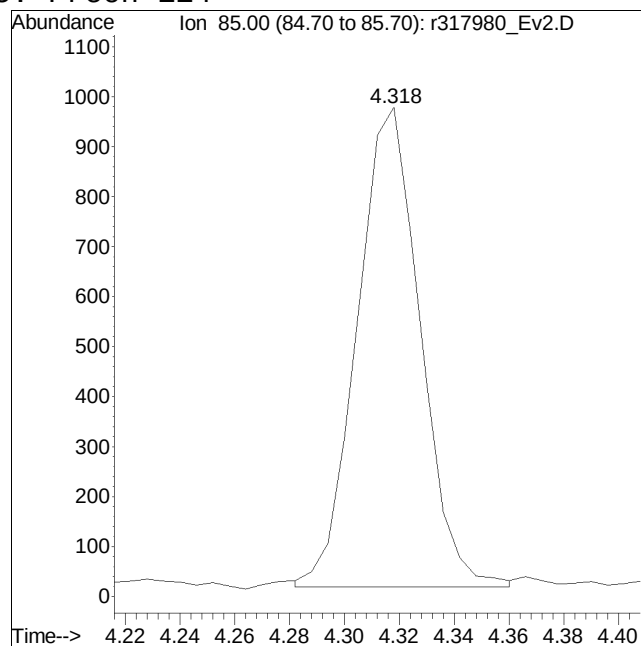
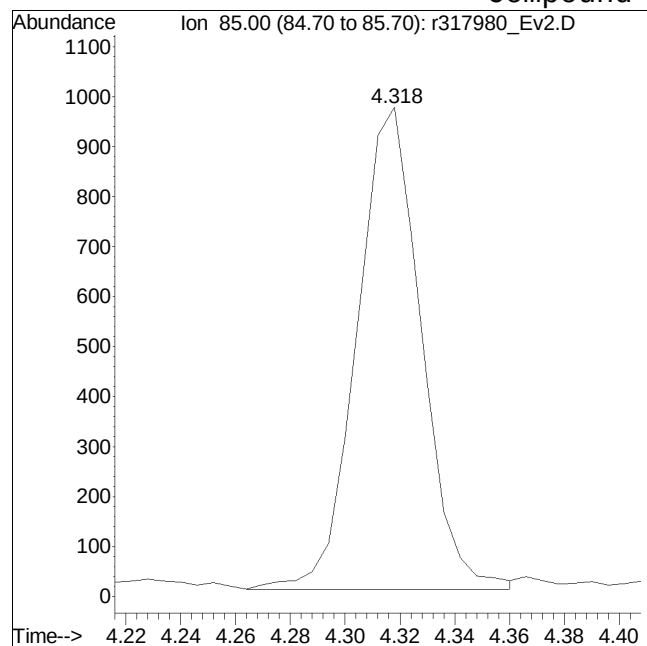


Manual Peak Response = 625 M6

Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #5: Freon-114



Original Peak Response = 1567

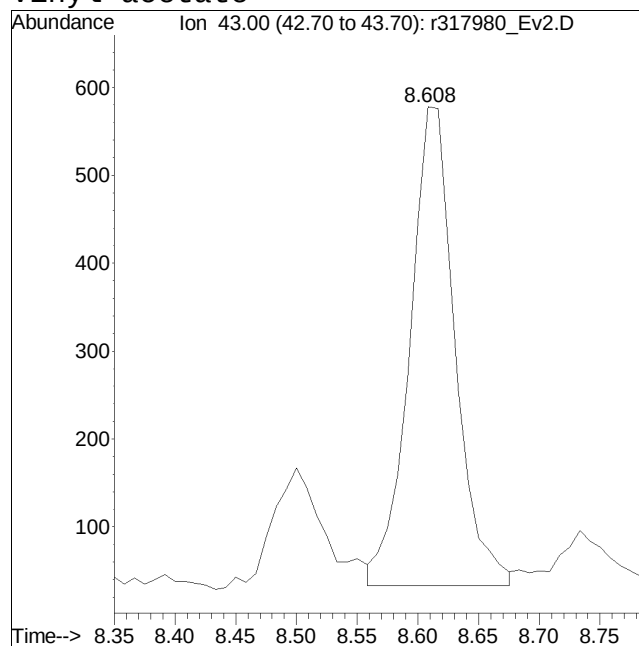
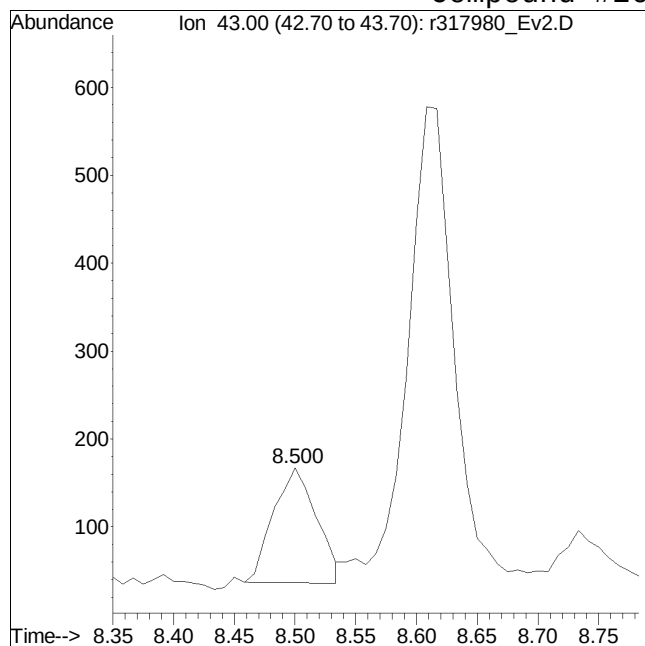
Manual Peak Response = 1534 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #26: vinyl acetate



Original Peak Response = 324

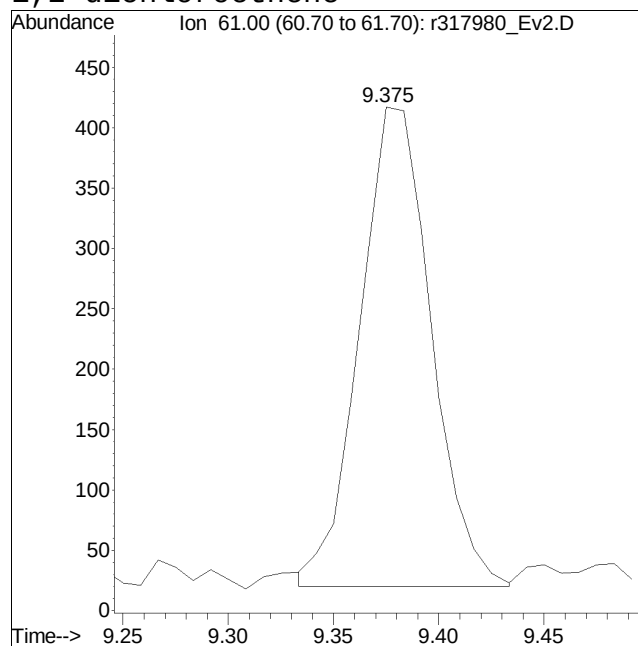
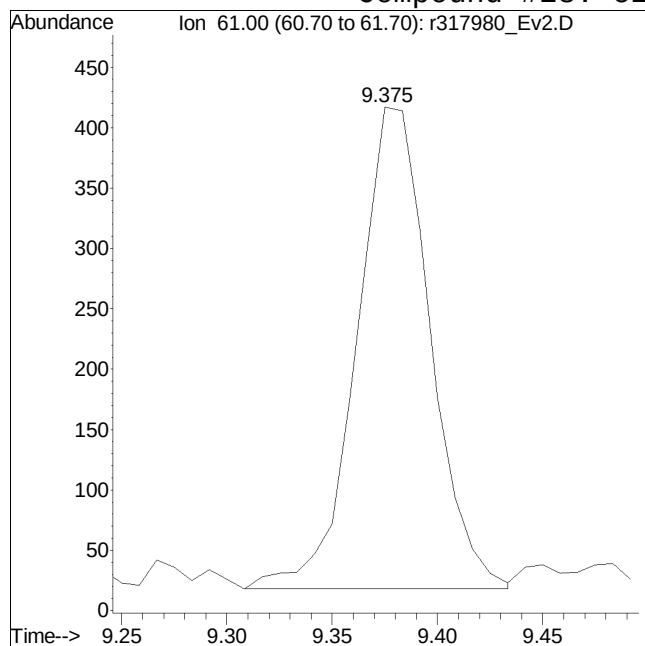
Manual Peak Response = 1414 M3

M3 = Misidentification of the peak (i.e. 1,4-dichlorobenzene identified as 1,3-dichlorobenzene), or misidentification from 2 partially resolved peaks not being split.

Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #28: cis-1,2-dichloroethene



Original Peak Response = 969

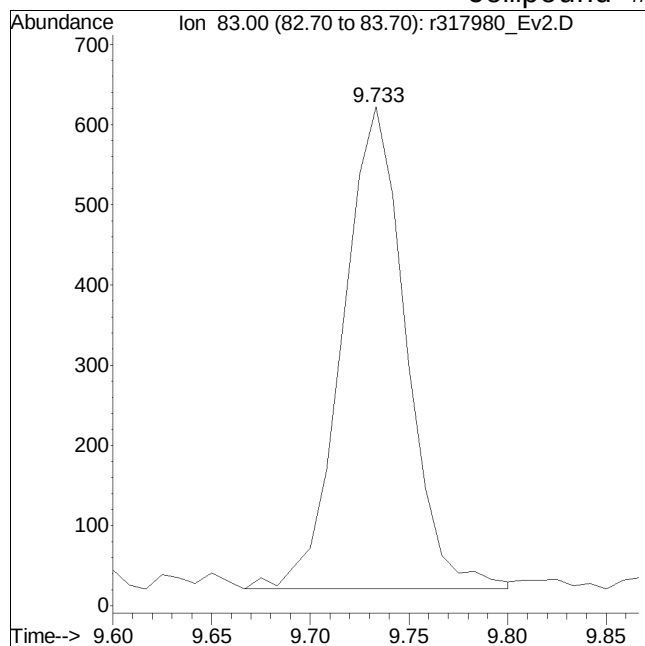
Manual Peak Response = 938 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

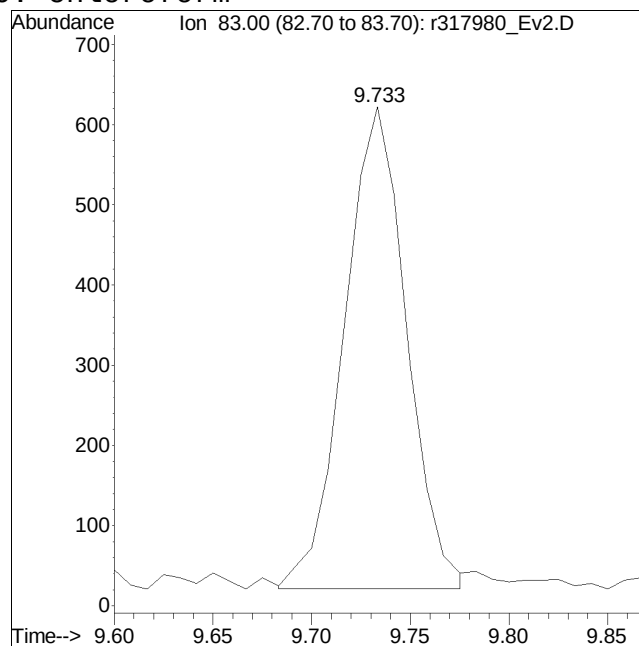
Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #30: chloroform



Original Peak Response = 1348



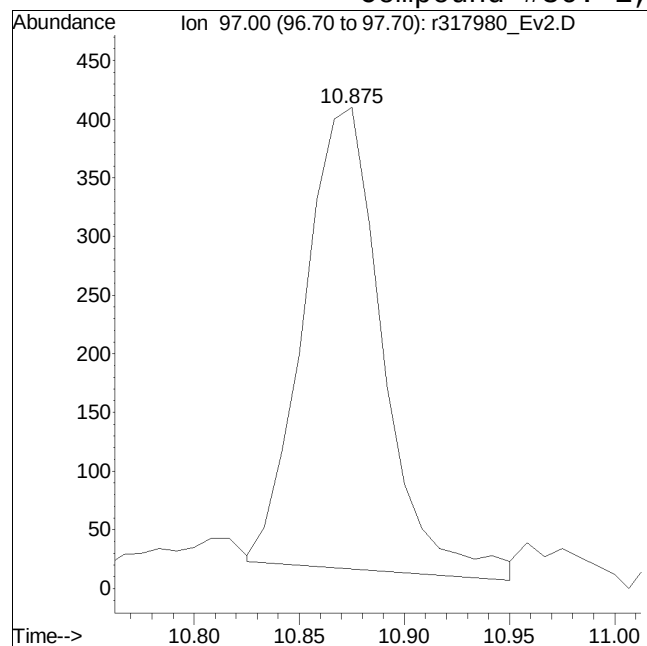
Manual Peak Response = 1318 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Manual Integration Report

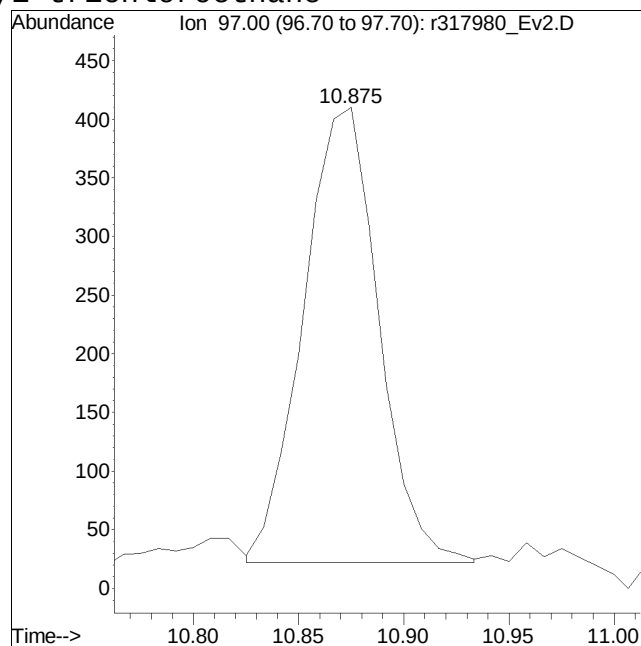
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #36: 1,1,1-trichloroethane



Original Peak Response = 1024

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

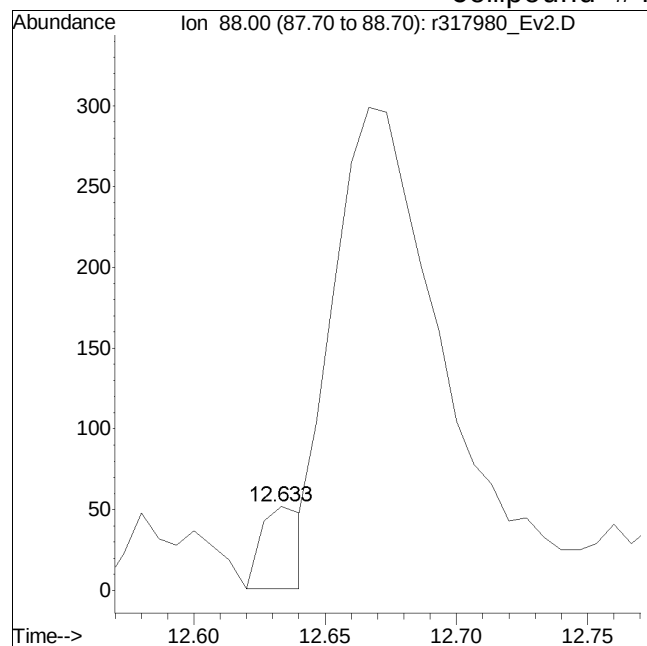


Manual Peak Response = 968 M6

Manual Integration Report

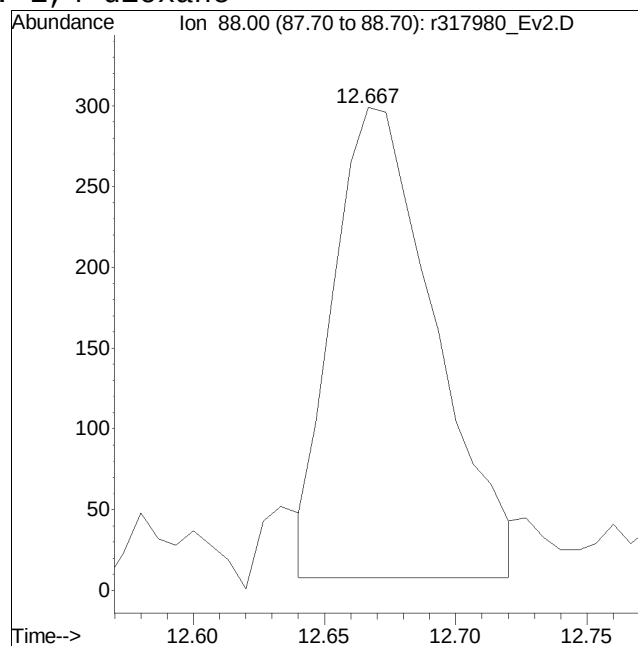
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #43: 1,4-dioxane



Original Peak Response = 56

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

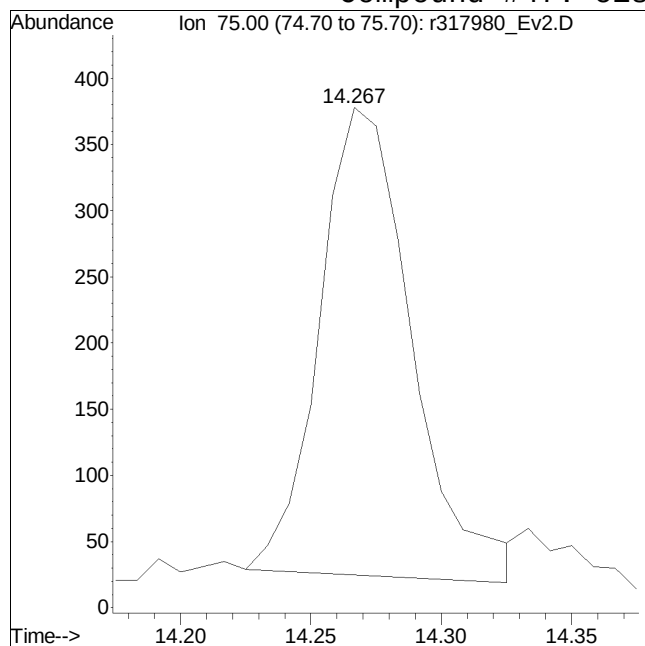


Manual Peak Response = 782 M6

Manual Integration Report

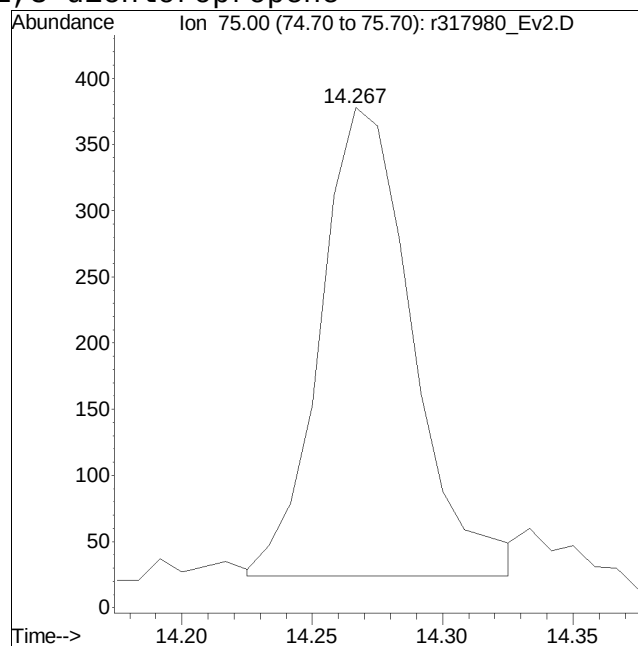
Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #47: cis-1,3-dichloropropene



Original Peak Response = 868

M4 = Poor automated baseline construction.

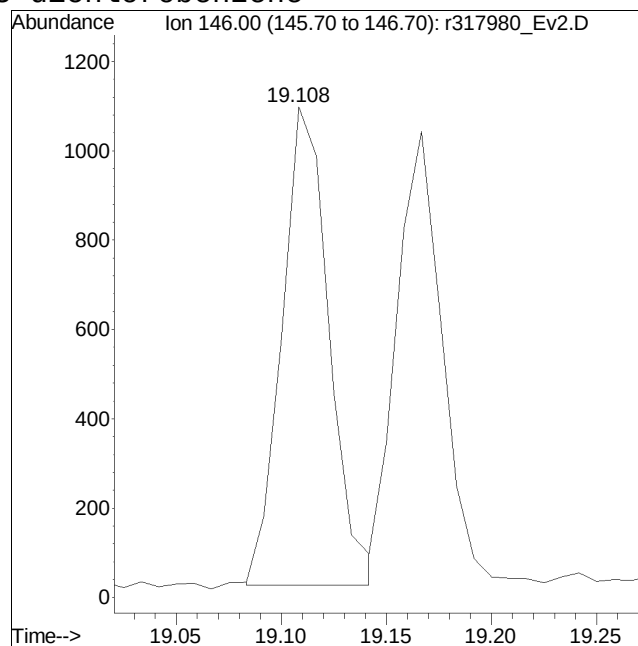
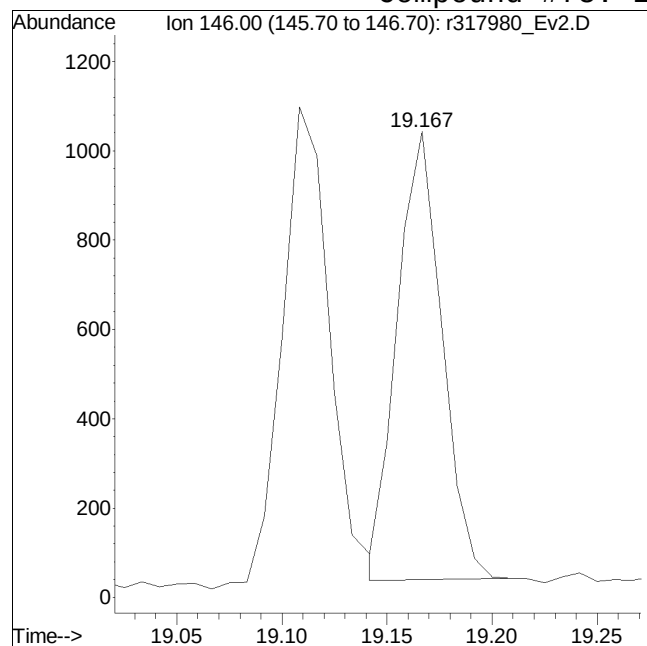


Manual Peak Response = 868 M4

Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #75: 1,3-dichlorobenzene



Original Peak Response = 1490

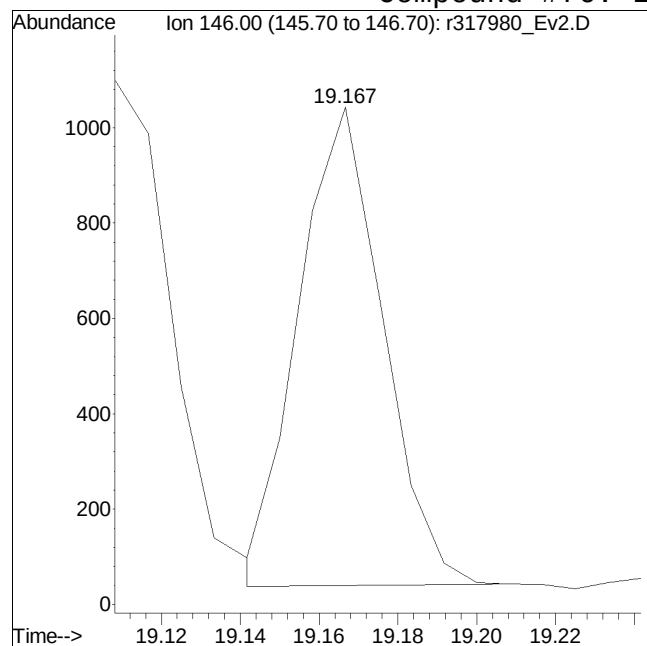
Manual Peak Response = 1673 M3

M3 = Misidentification of the peak (i.e. 1,4-dichlorobenzene identified as 1,3-dichlorobenzene), or misidentification from 2 partially resolved peaks not being split.

Manual Integration Report

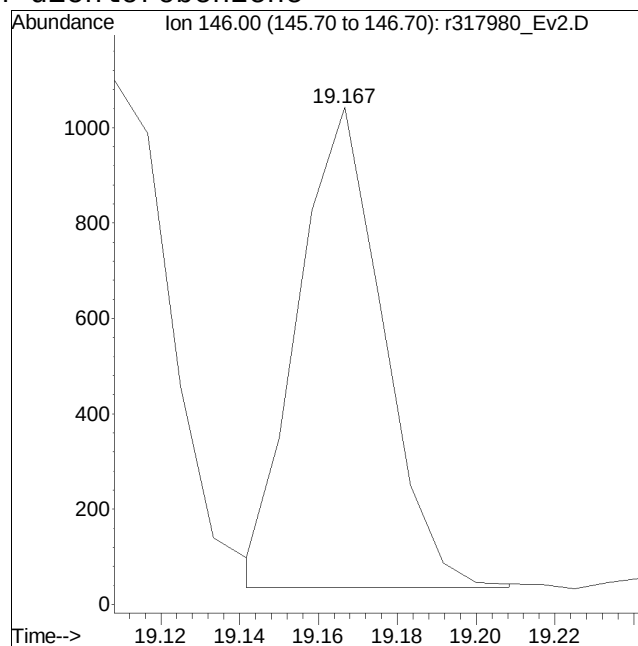
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #76: 1,4-dichlorobenzene



Original Peak Response = 1490

M4 = Poor automated baseline construction.

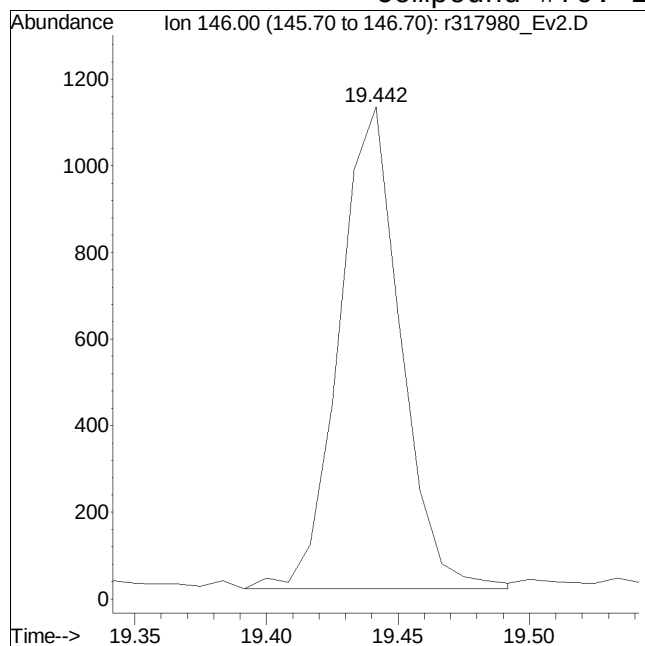


Manual Peak Response = 1510 M4

Manual Integration Report

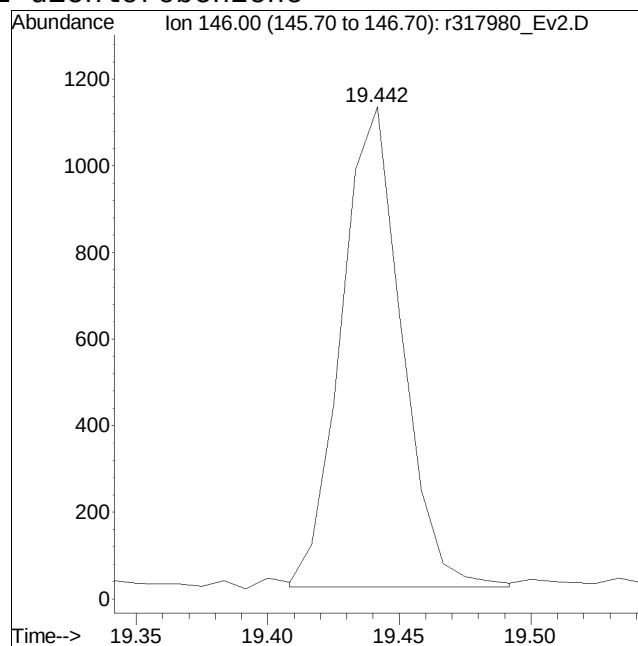
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #79: 1,2-dichlorobenzene



Original Peak Response = 1814

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

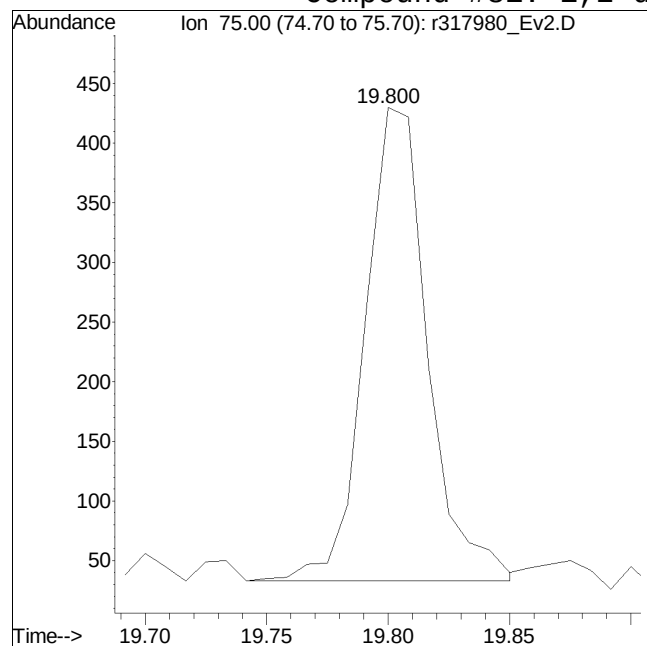


Manual Peak Response = 1774 M6

Manual Integration Report

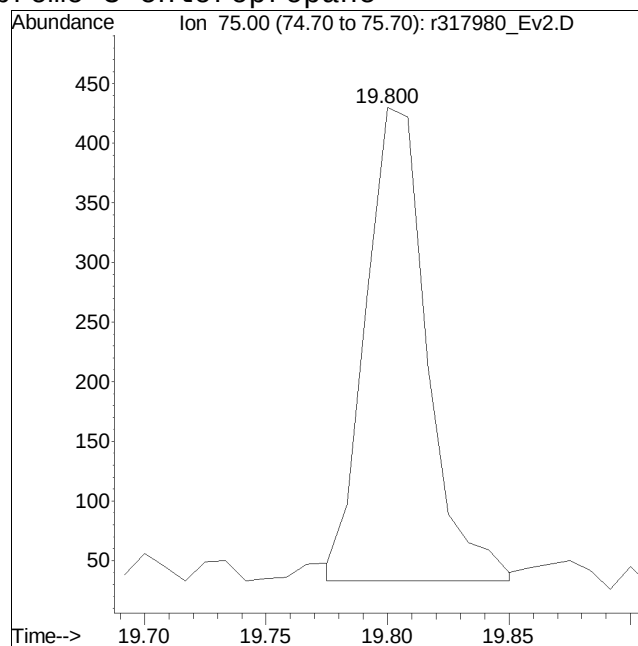
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317980_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:6: 1 Instrument :
Sample : IT015-SIMSTD0.05 Quant Date : 9/27/2021 7:44 am

Compound #81: 1,2-dibromo-3-chloropropane



Original Peak Response = 713

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 696 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317981_Ev2.D
 Acq On : 26 Sep 2021 7:20 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.1
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:37:54 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	220388	10.000	ppbV	0.00
Standard Area = 227668			Recovery =		96.80%	
33) 1,4-difluorobenzene	11.833	114	629044	10.000	ppbV	0.00
Standard Area = 647621			Recovery =		97.13%	
51) chlorobenzene-D5	16.558	54	98238	10.000	ppbV	0.00
Standard Area = 103400			Recovery =		95.01%	
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.583	65	84	0.005	ppbV	0.13
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.05%#	
53) toluene-D8	14.667	98	245	0.004	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.04%#	
67) bromofluorobenzene	17.925	95	464	0.010	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		0.10%#	
Target Compounds						
					Qvalue	
2) propylene	3.928	41	1103M6	0.111	ppbV	
3) dichlorodifluoromethane	4.006	85	2231	0.105	ppbV	98
4) chloromethane	4.186	50	1132	0.118	ppbV	94
5) Freon-114	4.318	85	2939	0.102	ppbV	96
6) vinyl chloride	4.444	62	1359	0.101	ppbV	94
7) 1,3-butadiene	4.612	54	1114	0.099	ppbV	96
8) bromomethane	4.930	94	1087	0.101	ppbV	96
9) chloroethane	5.146	64	783	0.106	ppbV	93
10) ethanol	5.333	31	5170	0.526	ppbV	98
11) vinyl bromide	5.577	106	1148	0.106	ppbV	95
12) acrolein	5.740	56	682	0.100	ppbV #	86
13) acetone	5.907	43	11144	0.572	ppbV #	100
14) trichlorofluoromethane	6.093	101	2179	0.104	ppbV	98
15) isopropyl alcohol	6.240	45	5089	0.212	ppbV	98
16) acrylonitrile	6.470	53	1219	0.102	ppbV	96
17) 1,1-dichloroethene	6.860	61	1923	0.103	ppbV	97
18) tertiary butyl alcohol	6.980	59	2237	0.092	ppbV #	93
19) methylene chloride	7.022	49	2164	0.136	ppbV	98
20) 3-chloropropene	7.166	41	1781	0.099	ppbV	97
21) carbon disulfide	7.322	76	4554	0.101	ppbV #	74
22) Freon 113	7.358	101	2335	0.101	ppbV	97
23) trans-1,2-dichloroethene	8.150	61	2030	0.102	ppbV	98
24) 1,1-dichloroethane	8.383	63	2352	0.103	ppbV	96

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317981_Ev2.D
 Acq On : 26 Sep 2021 7:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD0.1
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:37:54 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.500	73	3540	0.097	ppbV	95
26) vinyl acetate	8.608	43	2734	0.098	ppbV	95
27) 2-butanone	8.892	43	2900	0.103	ppbV #	98
28) cis-1,2-dichloroethene	9.375	61	1790	0.103	ppbV	98
29) Ethyl Acetate	9.700	61	460	0.093	ppbV #	64
30) chloroform	9.733	83	2447	0.100	ppbV	97
31) Tetrahydrofuran	10.225	42	1830	0.105	ppbV	97
32) 1,2-dichloroethane	10.575	62	1381	0.102	ppbV	93
34) hexane	9.642	57	2795	0.104	ppbV #	57
36) 1,1,1-trichloroethane	10.867	97	1807	0.097	ppbV #	90
37) benzene	11.400	78	5954	0.114	ppbV	98
38) carbon tetrachloride	11.573	117	1750	0.097	ppbV	96
39) cyclohexane	11.713	56	2919	0.101	ppbV	96
40) Dibromomethane	12.313	93	1565	0.118	ppbV #	88
41) 1,2-dichloropropane	12.353	63	1774	0.109	ppbV #	96
42) bromodichloromethane	12.580	83	2560	0.094	ppbV #	98
43) 1,4-dioxane	12.667	88	1243	0.104	ppbV #	74
44) trichloroethene	12.633	130	2034	0.102	ppbV	95
45) 2,2,4-trimethylpentane	12.673	57	8907	0.103	ppbV	99
46) heptane	12.993	43	3034	0.099	ppbV	97
47) cis-1,3-dichloropropene	14.267	75	1658	0.074	ppbV	91
48) 4-methyl-2-pentanone	13.708	43	3175	0.091	ppbV	98
49) trans-1,3-dichloropropene	13.642	75	2146	0.088	ppbV	93
50) 1,1,2-trichloroethane	14.467	97	1620	0.097	ppbV	96
52) toluene	14.775	91	5817	0.106	ppbV	100
54) 2-hexanone	15.083	43	2575	0.080	ppbV	96
55) dibromochloromethane	15.225	129	2186	0.091	ppbV	98
56) 1,2-dibromoethane	15.475	107	2330	0.093	ppbV	98
57) tetrachloroethene	15.942	166	2377	0.100	ppbV	98
58) 1,1,1,2-tetrachloroethane	16.583	131	1628	0.093	ppbV	98
59) chlorobenzene	16.600	112	4591	0.104	ppbV	97
60) ethylbenzene	16.950	91	6352	0.095	ppbV	97
61) m+p-xylene	17.117	91	10455	0.191	ppbV	98
62) bromoform	17.183	173	1953	0.084	ppbV	98
63) styrene	17.433	104	4211	0.089	ppbV	97
64) 1,1,2,2-tetrachloroethane	17.525	83	3893	0.094	ppbV	99
65) o-xylene	17.525	91	5232	0.095	ppbV	98
66) 1,2,3-Trichloropropane	17.642	75	3057	0.095	ppbV	98
68) isopropylbenzene	18.042	105	6813	0.094	ppbV	98
69) Bromobenzene	18.117	77	4123	0.095	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317981_Ev2.D
 Acq On : 26 Sep 2021 7:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD0.1
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:37:54 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

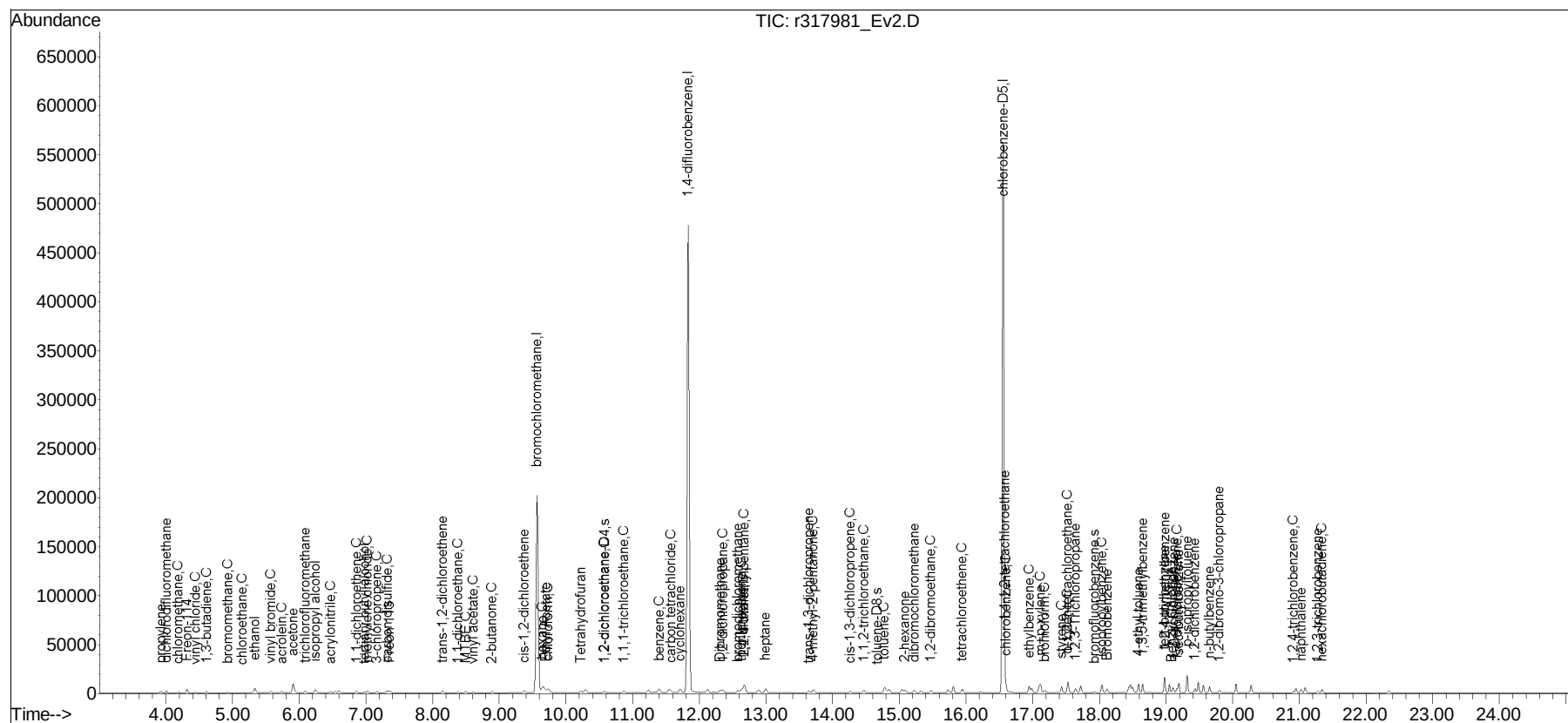
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.592	105	6905	0.085	ppbV	99
71) 1,3,5-trimethylbenzene	18.650	105	6169	0.091	ppbV	97
72) tert-butylbenzene	18.975	119	6373	0.095	ppbV	99
73) 1,2,4-trimethylbenzene	18.983	105	5887	0.089	ppbV	95
74) Benzyl Chloride	19.092	91	1728	0.038	ppbV	99
75) 1,3-dichlorobenzene	19.108	146	3644	0.082	ppbV	93
76) 1,4-dichlorobenzene	19.167	146	3608	0.082	ppbV	97
77) sec-butylbenzene	19.192	105	8877	0.095	ppbV	96
78) p-isopropyltoluene	19.317	119	7551	0.093	ppbV	99
79) 1,2-dichlorobenzene	19.433	146	3458	0.083	ppbV #	92
80) n-butylbenzene	19.650	91	5897	0.082	ppbV	95
81) 1,2-dibromo-3-chloropr...	19.800	75	1430	0.077	ppbV #	85
82) 1,2,4-trichlorobenzene	20.908	180	1932	0.053	ppbV #	89
83) naphthalene	21.025	128	5971	0.065	ppbV	98
84) 1,2,3-trichlorobenzene	21.275	180	2416	0.068	ppbV	95
85) hexachlorobutadiene	21.342	225	3160	0.090	ppbV	98

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317981_Ev2.D
Acq On     : 26 Sep 2021   7:20 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD0.1
Misc       : WG1551141
ALS Vial   : 0    Sample Multiplier: 1
```

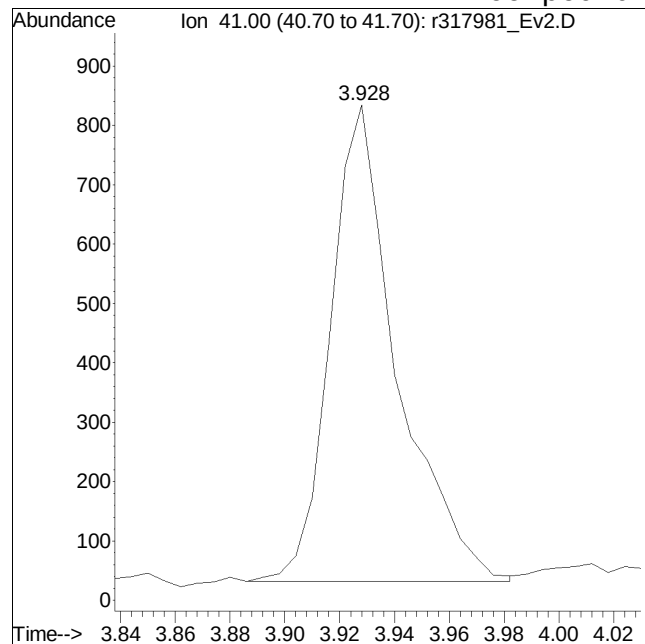
Quant Time: Sep 27 09:37:54 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

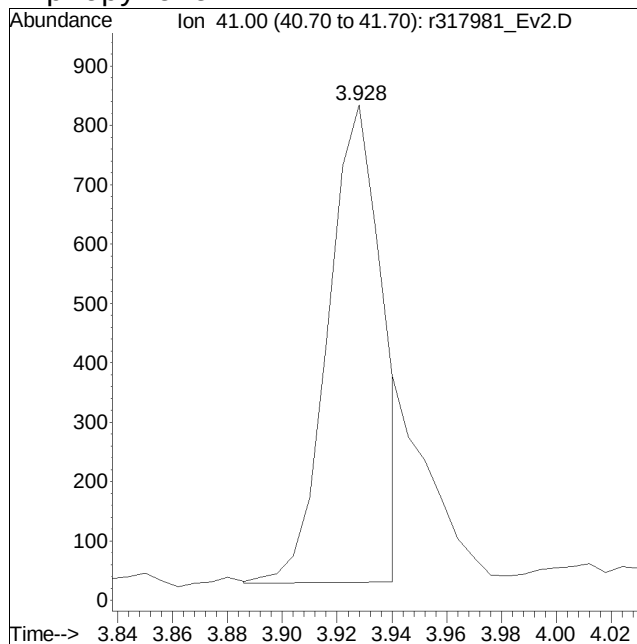
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317981_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:7: 0 Instrument :
Sample : IT015-SIMSTD0.1 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 1355

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 1103 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317982_Ev2.D
 Acq On : 26 Sep 2021 7:59 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.2
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:39:08 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	224347	10.000	ppbV	0.00
Standard Area = 227668			Recovery =		98.54%	
33) 1,4-difluorobenzene	11.833	114	633993	10.000	ppbV	0.00
Standard Area = 647621			Recovery =		97.90%	
51) chlorobenzene-D5	16.550	54	100854	10.000	ppbV	0.00
Standard Area = 103400			Recovery =		97.54%	
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.450	65	153811	9.786	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		97.86%	
53) toluene-D8	14.667	98	649565	9.976	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		99.76%	
67) bromofluorobenzene	17.925	95	454394	9.891	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		98.91%	
Target Compounds						
					Qvalue	
2) propylene	3.928	41	2399M6	0.236	ppbV	
3) dichlorodifluoromethane	4.006	85	5114	0.236	ppbV	100
4) chloromethane	4.186	50	2430	0.249	ppbV	98
5) Freon-114	4.318	85	6985	0.237	ppbV	98
6) vinyl chloride	4.444	62	3218	0.235	ppbV	98
7) 1,3-butadiene	4.612	54	2664	0.234	ppbV	96
8) bromomethane	4.930	94	2576	0.235	ppbV	99
9) chloroethane	5.146	64	1891	0.252	ppbV	94
10) ethanol	5.330	31	12767	1.277	ppbV	99
11) vinyl bromide	5.573	106	2489	0.226	ppbV	99
12) acrolein	5.737	56	1693	0.245	ppbV	98
13) acetone	5.903	43	24441	1.233	ppbV	99
14) trichlorofluoromethane	6.093	101	5034	0.235	ppbV	99
15) isopropyl alcohol	6.233	45	12437	0.509	ppbV	98
16) acrylonitrile	6.470	53	2850	0.234	ppbV	98
17) 1,1-dichloroethene	6.860	61	4455	0.234	ppbV	100
18) tertiary butyl alcohol	6.968	59	4947	0.199	ppbV	99
19) methylene chloride	7.022	49	4116	0.254	ppbV	100
20) 3-chloropropene	7.166	41	4205	0.229	ppbV	98
21) carbon disulfide	7.322	76	10835	0.236	ppbV #	91
22) Freon 113	7.358	101	5482	0.234	ppbV	99
23) trans-1,2-dichloroethene	8.150	61	4650	0.230	ppbV	98
24) 1,1-dichloroethane	8.383	63	5441	0.233	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317982_Ev2.D
 Acq On : 26 Sep 2021 7:59 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.2
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:39:08 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.483	73	8347	0.225	ppbV	96
26) vinyl acetate	8.608	43	6047	0.212	ppbV	99
27) 2-butanone	8.883	43	6629	0.230	ppbV	99
28) cis-1,2-dichloroethene	9.375	61	4125	0.233	ppbV	100
29) Ethyl Acetate	9.692	61	1138	0.225	ppbV	97
30) chloroform	9.733	83	5848	0.236	ppbV	97
31) Tetrahydrofuran	10.208	42	3894M6	0.220	ppbV	
32) 1,2-dichloroethane	10.575	62	3253	0.236	ppbV	98
34) hexane	9.642	57	6394	0.236	ppbV #	68
36) 1,1,1-trichloroethane	10.867	97	4250	0.227	ppbV	94
37) benzene	11.400	78	15685	0.299	ppbV	98
38) carbon tetrachloride	11.573	117	4092	0.224	ppbV	100
39) cyclohexane	11.713	56	6836	0.234	ppbV	99
40) Dibromomethane	12.320	93	3447	0.257	ppbV #	100
41) 1,2-dichloropropane	12.347	63	3732	0.228	ppbV	96
42) bromodichloromethane	12.580	83	6227	0.227	ppbV	96
43) 1,4-dioxane	12.647	88	2783	0.232	ppbV	89
44) trichloroethene	12.627	130	4692	0.233	ppbV	95
45) 2,2,4-trimethylpentane	12.673	57	20527	0.236	ppbV	99
46) heptane	12.993	43	7111	0.230	ppbV	99
47) cis-1,3-dichloropropene	14.267	75	4142	0.185	ppbV	99
48) 4-methyl-2-pentanone	13.700	43	7357	0.210	ppbV	97
49) trans-1,3-dichloropropene	13.642	75	5188	0.212	ppbV	98
50) 1,1,2-trichloroethane	14.467	97	3867	0.229	ppbV	98
52) toluene	14.775	91	16540	0.293	ppbV	100
54) 2-hexanone	15.075	43	6337	0.192	ppbV	95
55) dibromochloromethane	15.225	129	5377	0.219	ppbV	100
56) 1,2-dibromoethane	15.475	107	5672	0.221	ppbV	99
57) tetrachloroethene	15.942	166	5725	0.234	ppbV	98
58) 1,1,1,2-tetrachloroethane	16.583	131	3958	0.220	ppbV	99
59) chlorobenzene	16.600	112	10741	0.237	ppbV	96
60) ethylbenzene	16.950	91	15606	0.228	ppbV	97
61) m+p-xylene	17.108	91	25589	0.454	ppbV	98
62) bromoform	17.183	173	4720	0.199	ppbV	99
63) styrene	17.433	104	10032	0.207	ppbV	99
64) 1,1,2,2-tetrachloroethane	17.525	83	9681	0.229	ppbV	99
65) o-xylene	17.525	91	12832	0.226	ppbV	100
66) 1,2,3-Trichloropropane	17.642	75	7353	0.223	ppbV	99
68) isopropylbenzene	18.033	105	17108	0.230	ppbV	98
69) Bromobenzene	18.108	77	10128	0.227	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317982_Ev2.D
 Acq On : 26 Sep 2021 7:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD0.2
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:39:08 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

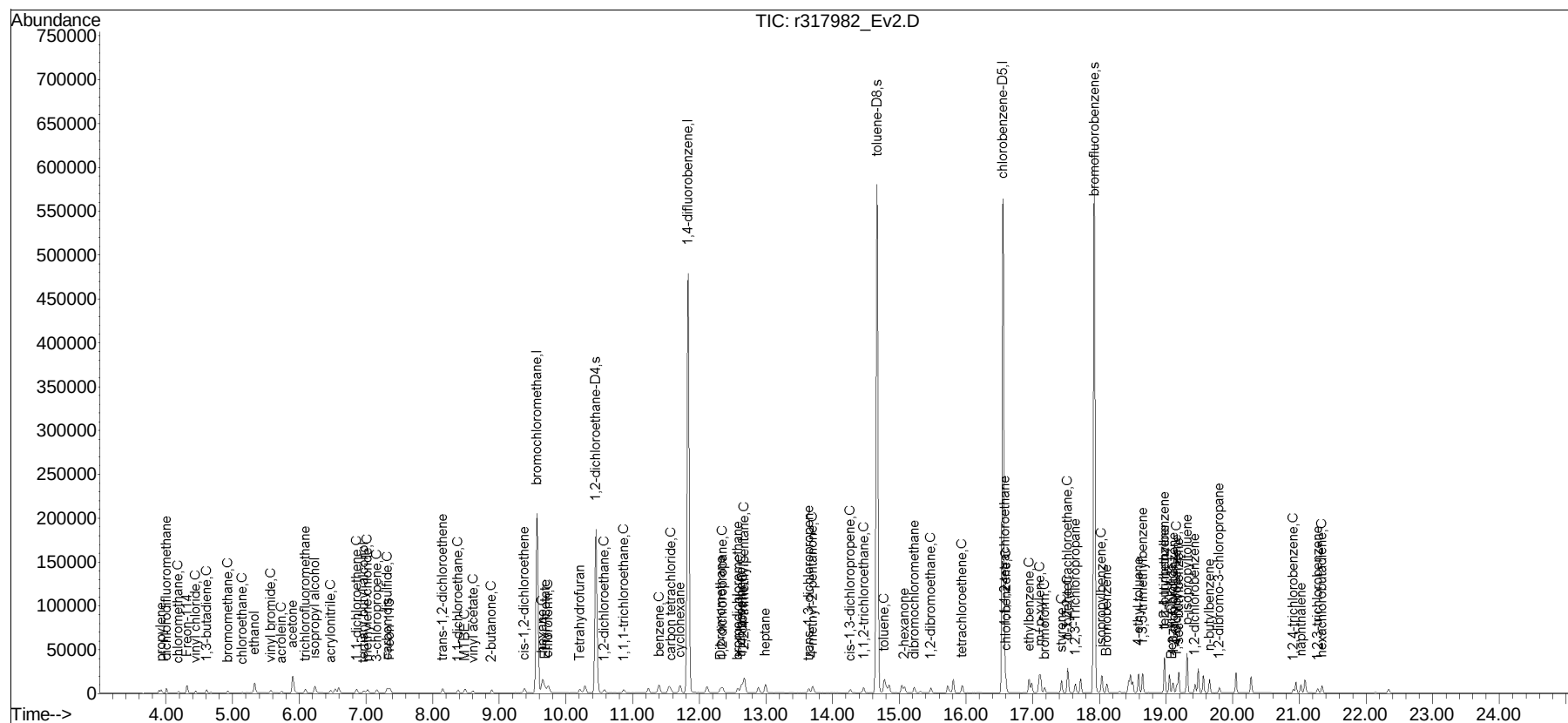
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.592	105	17784	0.214	ppbV	99
71) 1,3,5-trimethylbenzene	18.650	105	15432	0.222	ppbV	98
72) tert-butylbenzene	18.975	119	15877	0.229	ppbV	98
73) 1,2,4-trimethylbenzene	18.975	105	14971	0.219	ppbV	95
74) Benzyl Chloride	19.092	91	4648	0.100	ppbV	96
75) 1,3-dichlorobenzene	19.108	146	8127	0.178	ppbV	95
76) 1,4-dichlorobenzene	19.158	146	8009	0.177	ppbV	96
77) sec-butylbenzene	19.192	105	22018	0.229	ppbV	96
78) p-isopropyltoluene	19.317	119	18882	0.226	ppbV	100
79) 1,2-dichlorobenzene	19.433	146	8695	0.204	ppbV	94
80) n-butylbenzene	19.650	91	15216	0.206	ppbV	96
81) 1,2-dibromo-3-chloropr...	19.800	75	3493	0.184	ppbV	92
82) 1,2,4-trichlorobenzene	20.908	180	5373	0.145	ppbV	97
83) naphthalene	21.025	128	15470	0.165	ppbV	100
84) 1,2,3-trichlorobenzene	21.275	180	5997	0.164	ppbV	98
85) hexachlorobutadiene	21.342	225	7529	0.208	ppbV	100

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


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Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317982_Ev2.D
Acq On     : 26 Sep 2021   7:59 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD0.2
Misc       : WG1551141
ALS Vial   : 0    Sample Multiplier: 1
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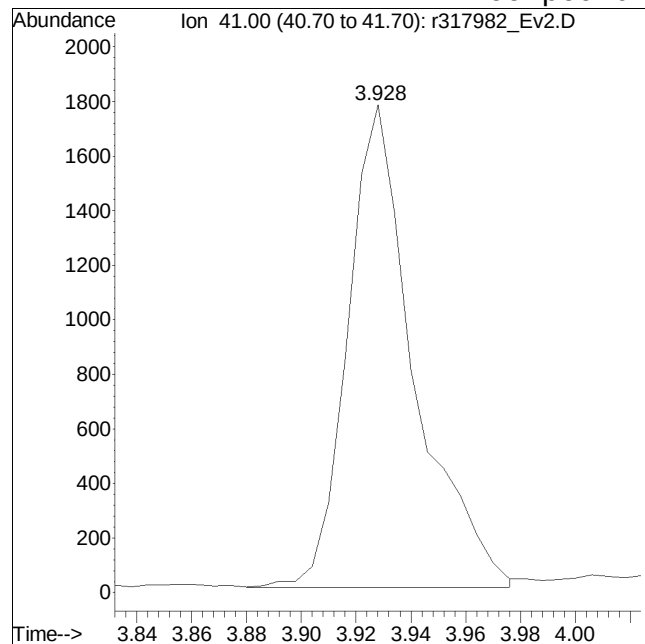
Quant Time: Sep 27 09:39:08 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

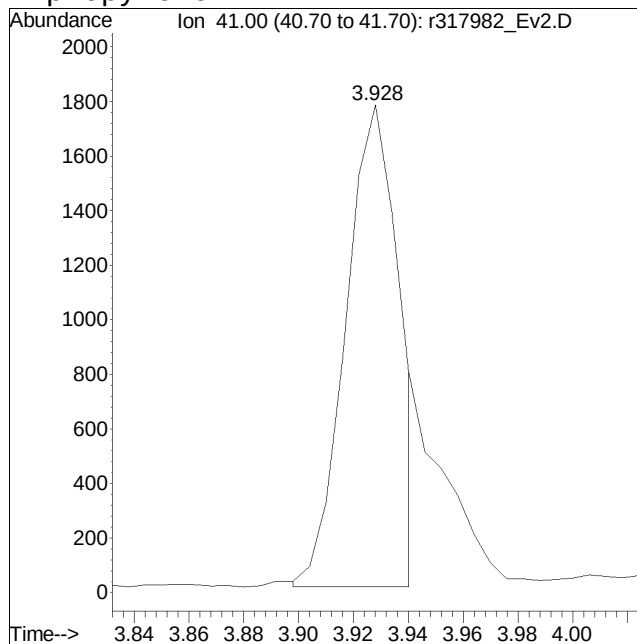
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317982_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:7: 9 Instrument :
Sample : IT015-SIMSTD0.2 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 2987

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

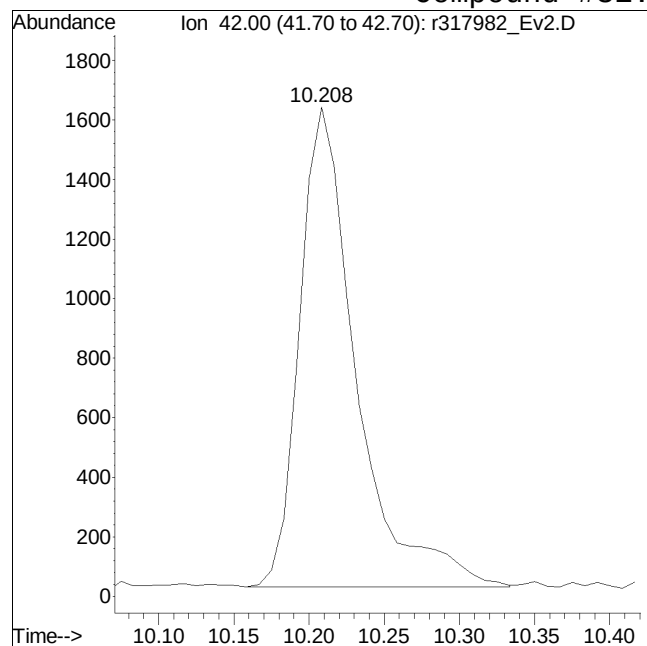


Manual Peak Response = 2399 M6

Manual Integration Report

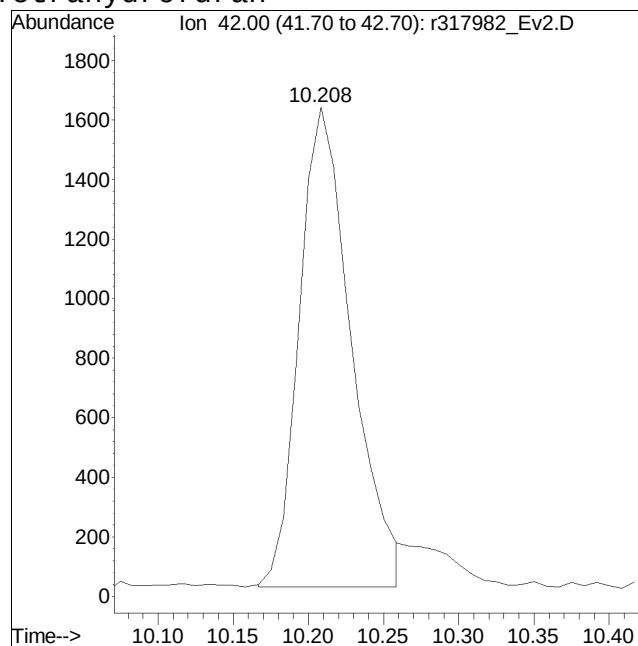
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317982_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:7: 9 Instrument :
Sample : IT015-SIMSTD0.2 Quant Date : 9/27/2021 7:44 am

Compound #31: Tetrahydrofuran



Original Peak Response = 4227

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 3894 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317983_Ev2.D
 Acq On : 26 Sep 2021 8:38 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.5
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:39:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.558	49	221766	10.000	ppbV	0.00
Standard Area = 227668			Recovery =		97.41%	
33) 1,4-difluorobenzene	11.827	114	632536	10.000	ppbV	0.00
Standard Area = 647621			Recovery =		97.67%	
51) chlorobenzene-D5	16.550	54	99132	10.000	ppbV	0.00
Standard Area = 103400			Recovery =		95.87%	
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.450	65	154992	9.884	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		98.84%	
53) toluene-D8	14.667	98	644392	10.069	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		100.69%	
67) bromofluorobenzene	17.925	95	448059	9.922	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		99.22%	
Target Compounds						
					Qvalue	
2) propylene	3.922	41	5558M6	0.554	ppbV	
3) dichlorodifluoromethane	4.006	85	12506	0.583	ppbV	100
4) chloromethane	4.186	50	5770	0.598	ppbV	99
5) Freon-114	4.312	85	17082	0.587	ppbV	100
6) vinyl chloride	4.444	62	7773	0.573	ppbV	99
7) 1,3-butadiene	4.606	54	6544	0.581	ppbV	95
8) bromomethane	4.924	94	6282	0.579	ppbV	100
9) chloroethane	5.146	64	4377	0.591	ppbV	100
10) ethanol	5.323	31	29815	3.017	ppbV	99
11) vinyl bromide	5.570	106	6208	0.569	ppbV	100
12) acrolein	5.730	56	3490	0.511	ppbV	96
13) acetone	5.893	43	56831	2.901	ppbV	98
14) trichlorofluoromethane	6.090	101	12234	0.579	ppbV	98
15) isopropyl alcohol	6.223	45	30382	1.258	ppbV	99
16) acrylonitrile	6.467	53	7008	0.581	ppbV	99
17) 1,1-dichloroethene	6.854	61	10787	0.573	ppbV	98
18) tertiary butyl alcohol	6.956	59	12525	0.510	ppbV	99
19) methylene chloride	7.022	49	9588	0.599	ppbV	99
20) 3-chloropropene	7.160	41	10235	0.563	ppbV	99
21) carbon disulfide	7.316	76	26669	0.587	ppbV	97
22) Freon 113	7.352	101	13392	0.578	ppbV	99
23) trans-1,2-dichloroethene	8.142	61	11362	0.569	ppbV	94
24) 1,1-dichloroethane	8.383	63	13228	0.573	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317983_Ev2.D
 Acq On : 26 Sep 2021 8:38 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD0.5
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:39:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.475	73	20699	0.563	ppbV	99
26) vinyl acetate	8.600	43	15163	0.538	ppbV	98
27) 2-butanone	8.875	43	16067	0.564	ppbV	99
28) cis-1,2-dichloroethene	9.375	61	10077	0.575	ppbV	98
29) Ethyl Acetate	9.683	61	2688	0.538	ppbV	98
30) chloroform	9.725	83	14155	0.577	ppbV	99
31) Tetrahydrofuran	10.192	42	9858	0.562	ppbV	95
32) 1,2-dichloroethane	10.575	62	7899	0.581	ppbV	100
34) hexane	9.642	57	15276	0.565	ppbV	85
36) 1,1,1-trichloroethane	10.867	97	10545	0.564	ppbV	97
37) benzene	11.393	78	33198	0.633	ppbV	100
38) carbon tetrachloride	11.567	117	9996	0.549	ppbV	100
39) cyclohexane	11.707	56	16571	0.568	ppbV	97
40) Dibromomethane	12.313	93	7806	0.584	ppbV #	98
41) 1,2-dichloropropane	12.347	63	9410	0.575	ppbV	99
42) bromodichloromethane	12.573	83	15358	0.561	ppbV	100
43) 1,4-dioxane	12.640	88	6737	0.563	ppbV	94
44) trichloroethene	12.627	130	11356	0.566	ppbV	99
45) 2,2,4-trimethylpentane	12.673	57	50227	0.580	ppbV	99
46) heptane	12.993	43	17803	0.578	ppbV	98
47) cis-1,3-dichloropropene	14.258	75	11151	0.498	ppbV	98
48) 4-methyl-2-pentanone	13.692	43	18924	0.541	ppbV	98
49) trans-1,3-dichloropropene	13.642	75	13234	0.542	ppbV	100
50) 1,1,2-trichloroethane	14.458	97	9493	0.564	ppbV	99
52) toluene	14.775	91	35569	0.641	ppbV	98
54) 2-hexanone	15.067	43	17015	0.524	ppbV	94
55) dibromochloromethane	15.225	129	13265	0.549	ppbV	99
56) 1,2-dibromoethane	15.475	107	14294	0.566	ppbV	100
57) tetrachloroethene	15.942	166	13985	0.581	ppbV	99
58) 1,1,1,2-tetrachloroethane	16.583	131	9840	0.556	ppbV	99
59) chlorobenzene	16.600	112	26031	0.585	ppbV	95
60) ethylbenzene	16.942	91	38120	0.568	ppbV	100
61) m+p-xylene	17.108	91	63205	1.142	ppbV	100
62) bromoform	17.175	173	12067	0.517	ppbV	99
63) styrene	17.433	104	25835	0.543	ppbV	99
64) 1,1,2,2-tetrachloroethane	17.525	83	23684	0.569	ppbV	99
65) o-xylene	17.525	91	32158	0.576	ppbV	99
66) 1,2,3-Trichloropropane	17.642	75	18317	0.565	ppbV	99
68) isopropylbenzene	18.033	105	42709	0.584	ppbV	98
69) Bromobenzene	18.108	77	25329	0.578	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317983_Ev2.D
 Acq On : 26 Sep 2021 8:38 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD0.5
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:39:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

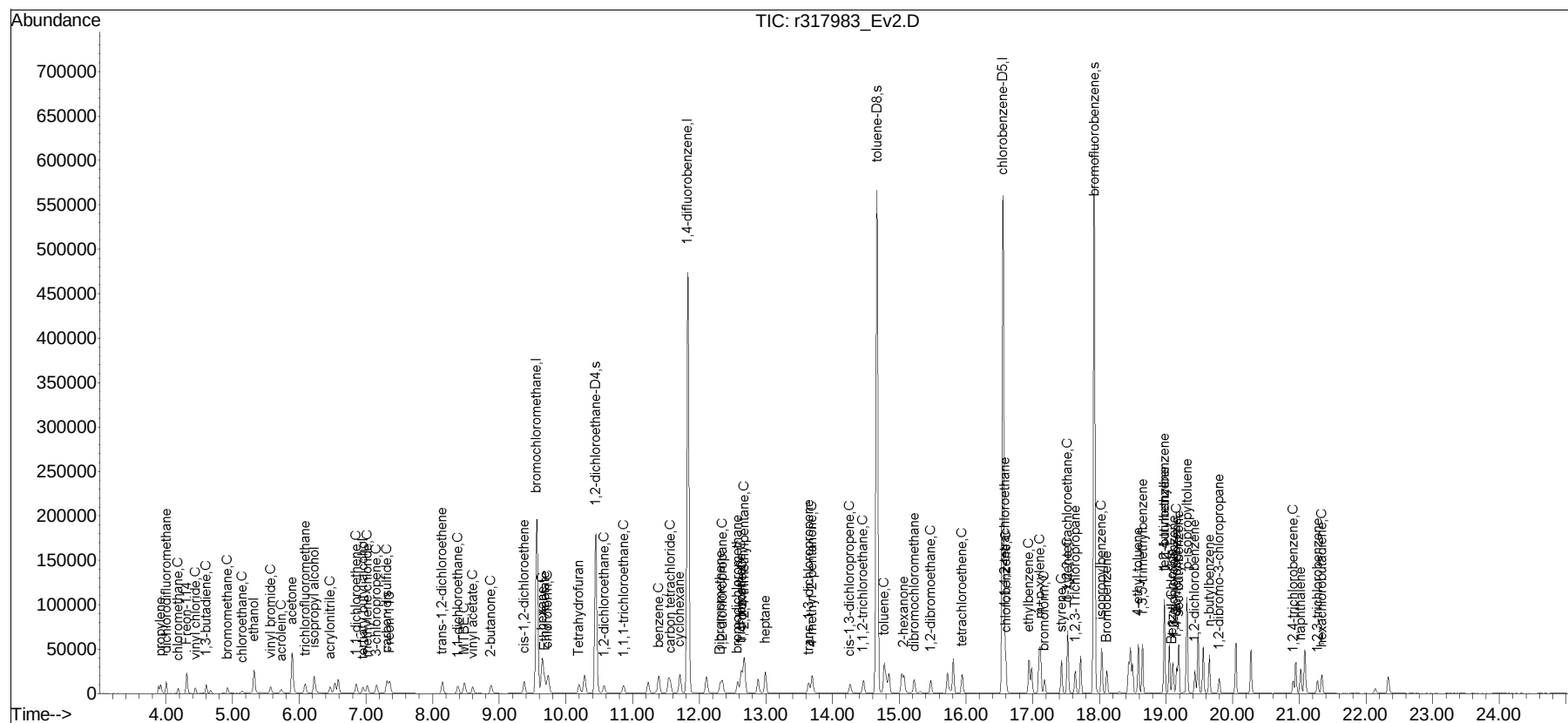
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.583	105	44776	0.548	ppbV	98
71) 1,3,5-trimethylbenzene	18.650	105	38875	0.568	ppbV	98
72) tert-butylbenzene	18.975	119	39236	0.577	ppbV	99
73) 1,2,4-trimethylbenzene	18.975	105	37742	0.563	ppbV	98
74) Benzyl Chloride	19.092	91	13675	0.301	ppbV	98
75) 1,3-dichlorobenzene	19.108	146	23625	0.525	ppbV	99
76) 1,4-dichlorobenzene	19.158	146	23656	0.532	ppbV	99
77) sec-butylbenzene	19.192	105	54808	0.580	ppbV	99
78) p-isopropyltoluene	19.317	119	46908	0.572	ppbV	99
79) 1,2-dichlorobenzene	19.433	146	22006	0.525	ppbV	98
80) n-butylbenzene	19.650	91	39549	0.546	ppbV	99
81) 1,2-dibromo-3-chloropr...	19.800	75	9474	0.509	ppbV	94
82) 1,2,4-trichlorobenzene	20.908	180	15683	0.429	ppbV	99
83) naphthalene	21.017	128	43545	0.472	ppbV	100
84) 1,2,3-trichlorobenzene	21.275	180	16778	0.468	ppbV	98
85) hexachlorobutadiene	21.342	225	18992	0.534	ppbV	99

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

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Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317983_Ev2.D
Acq On     : 26 Sep 2021    8:38 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD0.5
Misc       : WG1551141
ALS Vial   : 0    Sample Multiplier: 1
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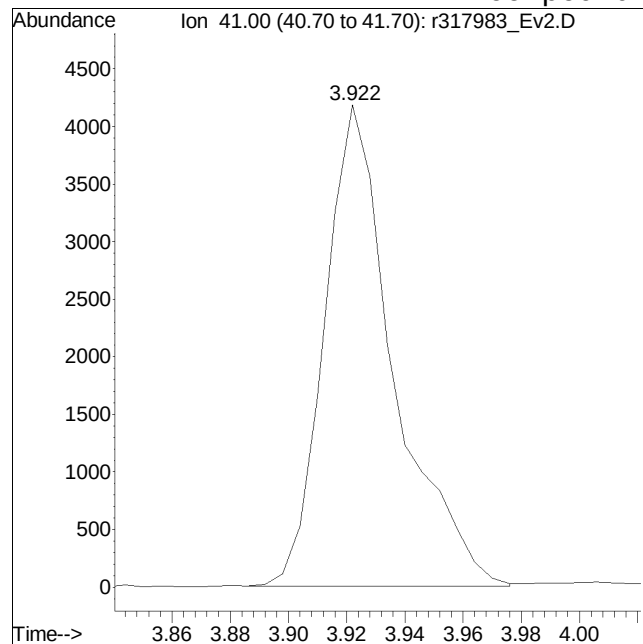
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Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

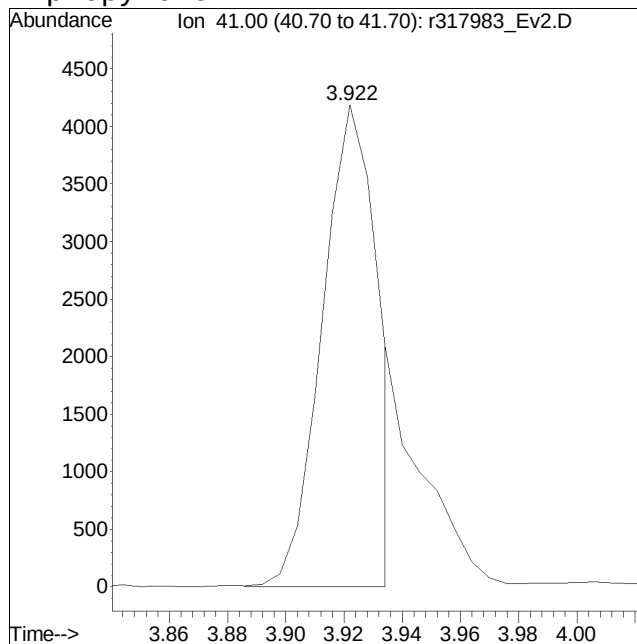
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317983_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:8: 8 Instrument :
Sample : IT015-SIMSTD0.5 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 6907

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 5558 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317984_Ev2.D
 Acq On : 26 Sep 2021 9:20 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD1.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:40:29 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	224568	10.000	ppbV	0.00
Standard Area = 227668			Recovery =		98.64%	
33) 1,4-difluorobenzene	11.833	114	635362	10.000	ppbV	0.00
Standard Area = 647621			Recovery =		98.11%	
51) chlorobenzene-D5	16.550	54	100763	10.000	ppbV	0.00
Standard Area = 103400			Recovery =		97.45%	
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.450	65	157660	10.010	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		100.10%	
53) toluene-D8	14.667	98	648967	9.976	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		99.76%	
67) bromofluorobenzene	17.925	95	451667	9.840	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		98.40%	
Target Compounds						
					Qvalue	
2) propylene	3.922	41	11046M6	1.087	ppbV	
3) dichlorodifluoromethane	4.006	85	25698	1.182	ppbV	99
4) chloromethane	4.186	50	11578	1.184	ppbV	99
5) Freon-114	4.312	85	34634	1.175	ppbV	99
6) vinyl chloride	4.444	62	15884	1.157	ppbV	100
7) 1,3-butadiene	4.606	54	13150	1.152	ppbV	95
8) bromomethane	4.924	94	12794	1.164	ppbV	99
9) chloroethane	5.146	64	8802	1.173	ppbV	99
10) ethanol	5.320	31	59074	5.904	ppbV	100
11) vinyl bromide	5.570	106	12836	1.163	ppbV	100
12) acrolein	5.727	56	8119	1.174	ppbV	98
13) acetone	5.890	43	114238	5.759	ppbV	97
14) trichlorofluoromethane	6.090	101	25010	1.168	ppbV	99
15) isopropyl alcohol	6.217	45	63502	2.596	ppbV	100
16) acrylonitrile	6.463	53	14082	1.153	ppbV	99
17) 1,1-dichloroethene	6.854	61	21901	1.148	ppbV	99
18) tertiary butyl alcohol	6.950	59	26008	1.045	ppbV	100
19) methylene chloride	7.022	49	19236	1.187	ppbV	99
20) 3-chloropropene	7.160	41	20939	1.137	ppbV	99
21) carbon disulfide	7.316	76	53589	1.166	ppbV	99
22) Freon 113	7.358	101	27264	1.163	ppbV	99
23) trans-1,2-dichloroethene	8.150	61	23255	1.150	ppbV	99
24) 1,1-dichloroethane	8.383	63	27006	1.155	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317984_Ev2.D
 Acq On : 26 Sep 2021 9:20 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD1.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:40:29 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.475	73	42444	1.141	ppbV	100
26) vinyl acetate	8.600	43	31831	1.116	ppbV	98
27) 2-butanone	8.867	43	32875	1.141	ppbV	99
28) cis-1,2-dichloroethene	9.375	61	20462	1.152	ppbV	98
29) Ethyl Acetate	9.683	61	5699	1.126	ppbV	97
30) chloroform	9.725	83	28861	1.162	ppbV	100
31) Tetrahydrofuran	10.183	42	19934	1.123	ppbV	95
32) 1,2-dichloroethane	10.575	62	16025	1.163	ppbV	99
34) hexane	9.642	57	31445	1.158	ppbV	91
36) 1,1,1-trichloroethane	10.867	97	21778	1.159	ppbV	99
37) benzene	11.393	78	64156	1.218	ppbV	99
38) carbon tetrachloride	11.567	117	20771	1.136	ppbV	99
39) cyclohexane	11.713	56	33768	1.152	ppbV	99
40) Dibromomethane	12.313	93	15850	1.181	ppbV #	99
41) 1,2-dichloropropane	12.347	63	18948	1.153	ppbV	99
42) bromodichloromethane	12.573	83	31279	1.137	ppbV	99
43) 1,4-dioxane	12.633	88	13703	1.140	ppbV	99
44) trichloroethene	12.627	130	23189	1.150	ppbV	99
45) 2,2,4-trimethylpentane	12.673	57	102526	1.178	ppbV	100
46) heptane	12.993	43	35606	1.150	ppbV	99
47) cis-1,3-dichloropropene	14.267	75	23648	1.052	ppbV	98
48) 4-methyl-2-pentanone	13.683	43	39644	1.128	ppbV	99
49) trans-1,3-dichloropropene	13.642	75	27393	1.117	ppbV	99
50) 1,1,2-trichloroethane	14.458	97	19394	1.146	ppbV	100
52) toluene	14.775	91	68175	1.209	ppbV	100
54) 2-hexanone	15.067	43	35606	1.078	ppbV	96
55) dibromochloromethane	15.225	129	27479	1.118	ppbV	100
56) 1,2-dibromoethane	15.475	107	29291	1.142	ppbV	99
57) tetrachloroethene	15.942	166	28404	1.162	ppbV	99
58) 1,1,1,2-tetrachloroethane	16.583	131	20240	1.125	ppbV	99
59) chlorobenzene	16.600	112	52897	1.169	ppbV	95
60) ethylbenzene	16.942	91	77918	1.141	ppbV	100
61) m+p-xylene	17.108	91	129669	2.305	ppbV	100
62) bromoform	17.175	173	25215	1.063	ppbV	100
63) styrene	17.433	104	53691	1.110	ppbV	100
64) 1,1,2,2-tetrachloroethane	17.525	83	48508	1.146	ppbV	100
65) o-xylene	17.525	91	65802	1.160	ppbV	99
66) 1,2,3-Trichloropropane	17.633	75	38169	1.158	ppbV	99
68) isopropylbenzene	18.033	105	87091	1.172	ppbV	98
69) Bromobenzene	18.108	77	51661	1.160	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317984_Ev2.D
 Acq On : 26 Sep 2021 9:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD1.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:40:29 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

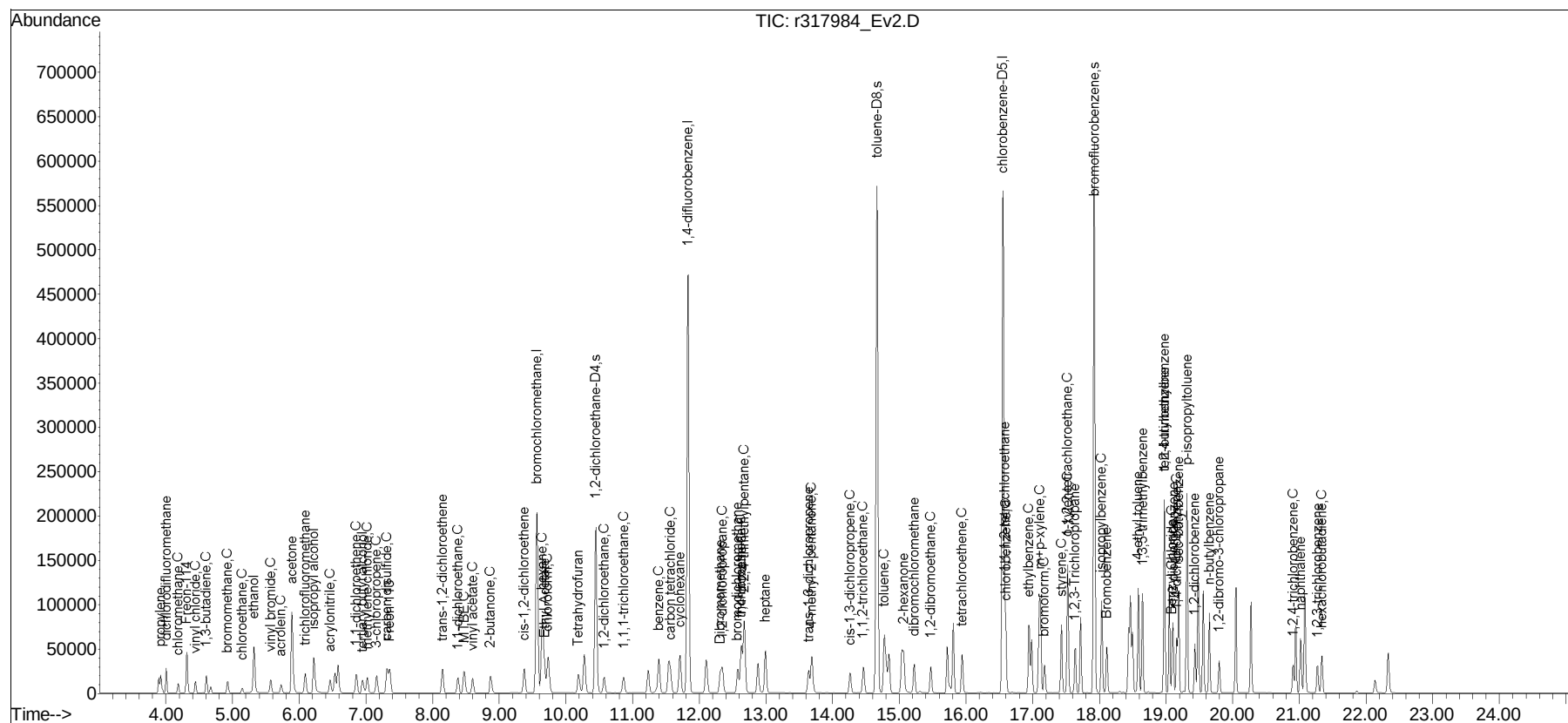
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.583	105	95248	1.147	ppbV	98
71) 1,3,5-trimethylbenzene	18.650	105	80062	1.152	ppbV	99
72) tert-butylbenzene	18.975	119	80738	1.168	ppbV	99
73) 1,2,4-trimethylbenzene	18.975	105	78294	1.148	ppbV	99
74) Benzyl Chloride	19.092	91	35488	0.767	ppbV	97
75) 1,3-dichlorobenzene	19.108	146	51181	1.119	ppbV	99
76) 1,4-dichlorobenzene	19.158	146	50577	1.118	ppbV	100
77) sec-butylbenzene	19.192	105	111999	1.167	ppbV	98
78) p-isopropyltoluene	19.317	119	97326	1.167	ppbV	99
79) 1,2-dichlorobenzene	19.433	146	47504	1.115	ppbV	99
80) n-butylbenzene	19.650	91	82262	1.117	ppbV	99
81) 1,2-dibromo-3-chloropr...	19.800	75	20434	1.079	ppbV	96
82) 1,2,4-trichlorobenzene	20.908	180	35336	0.951	ppbV	100
83) naphthalene	21.017	128	95777	1.022	ppbV	100
84) 1,2,3-trichlorobenzene	21.275	180	36272	0.995	ppbV	98
85) hexachlorobutadiene	21.342	225	38965	1.078	ppbV	99

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317984_Ev2.D
Acq On     : 26 Sep 2021   9:20 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD1.0
Misc       : WG1551141
ALS Vial   : 0    Sample Multiplier: 1
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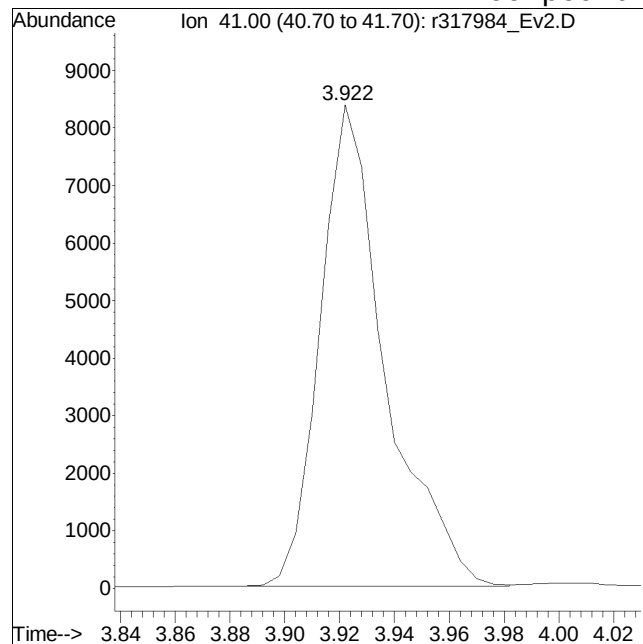
Quant Time: Sep 27 09:40:29 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

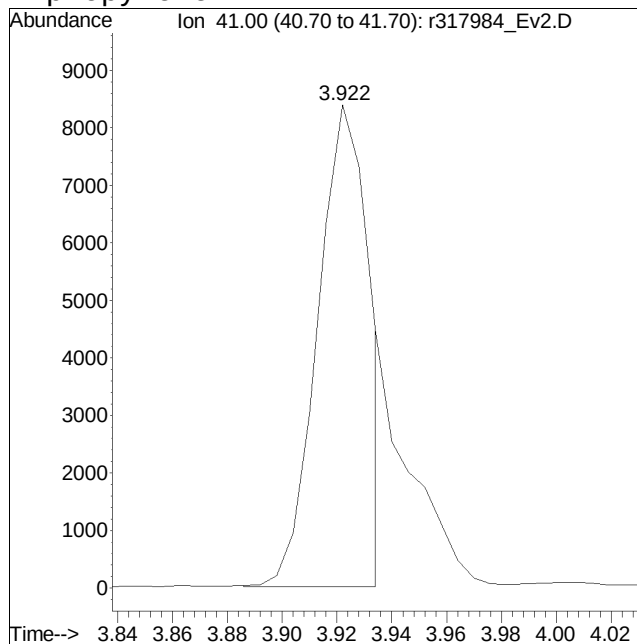
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317984_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:9: 0 Instrument :
Sample : IT015-SIMSTD1.0 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 13804

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 11046 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317985_Ev2.D
 Acq On : 26 Sep 2021 10:00 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 07:43:32 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Fri Aug 20 14:40:10 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	227668	10.000	ppbV	0.02
Standard Area = 227668			Recovery = 100.00%			
33) 1,4-difluorobenzene	11.833	114	647621	10.000	ppbV	0.01
Standard Area = 647621			Recovery = 100.00%			
51) chlorobenzene-D5	16.550	54	103400	10.000	ppbV	0.00
Standard Area = 103400			Recovery = 100.00%			
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.450	65	160548	10.354	ppbV	0.02
Spiked Amount 10.000	Range 70 - 130		Recovery = 103.54%			
53) toluene-D8	14.667	98	667559	11.671	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery = 116.71%			
67) bromofluorobenzene	17.925	95	471015	11.790	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery = 117.90%			
Target Compounds						
					Qvalue	
2) propylene	3.922	41	51504M6	4.212	ppbV	
3) dichlorodifluoromethane	4.006	85	110178	5.452	ppbV	99
4) chloromethane	4.186	50	49560	5.184	ppbV	100
5) Freon-114	4.312	85	149394	5.396	ppbV	98
6) vinyl chloride	4.444	62	69584	4.846	ppbV	99
7) 1,3-butadiene	4.612	54	57851	4.926	ppbV	91
8) bromomethane	4.924	94	55711	5.175	ppbV	96
9) chloroethane	5.146	64	38040	4.792	ppbV	95
10) ethanol	5.317	31	253613	27.580	ppbV	95
11) vinyl bromide	5.573	106	55956	5.202	ppbV	100
12) acrolein	5.727	56	35057	4.467	ppbV	97
13) acetone	5.883	43	502798	24.083	ppbV	95
14) trichlorofluoromethane	6.090	101	108504	5.135	ppbV	100
15) isopropyl alcohol	6.207	45	309955	11.697	ppbV	98
16) acrylonitrile	6.460	53	61892	4.692	ppbV	99
17) 1,1-dichloroethene	6.860	61	96713	4.399	ppbV	94
18) tertiary butyl alcohol	6.932	59	126150	4.015	ppbV	94
19) methylene chloride	7.022	49	82121	5.159	ppbV	94
20) 3-chloropropene	7.160	41	93359	4.487	ppbV	97
21) carbon disulfide	7.316	76	233059	5.211	ppbV	100
22) Freon 113	7.358	101	118854	5.059	ppbV	97
23) trans-1,2-dichloroethene	8.150	61	102475	4.361	ppbV	90
24) 1,1-dichloroethane	8.383	63	118511	4.356	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317985_Ev2.D
 Acq On : 26 Sep 2021 10:00 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 07:43:32 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Fri Aug 20 14:40:10 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.467	73	188607	4.878	ppbV	94
26) vinyl acetate	8.600	43	144554	4.573	ppbV	100
27) 2-butanone	8.858	43	146110	4.850	ppbV	99
28) cis-1,2-dichloroethene	9.375	61	90020	4.311	ppbV	94
29) Ethyl Acetate	9.675	61	25649	4.178	ppbV	82
30) chloroform	9.725	83	125908	4.858	ppbV	98
31) Tetrahydrofuran	10.175	42	90005	4.658	ppbV	95
32) 1,2-dichloroethane	10.575	62	69819	4.478	ppbV	96
34) hexane	9.642	57	138389	4.609	ppbV	89
36) 1,1,1-trichloroethane	10.867	97	95768	4.815	ppbV	96
37) benzene	11.393	78	268373	4.690	ppbV	97
38) carbon tetrachloride	11.567	117	93194	4.985	ppbV	96
39) cyclohexane	11.713	56	149413	4.646	ppbV	98
40) Dibromomethane	12.313	93	68425	4.709	ppbV #	98
41) 1,2-dichloropropane	12.347	63	83734	4.616	ppbV	99
42) bromodichloromethane	12.573	83	140213	5.039	ppbV	97
43) 1,4-dioxane	12.620	88	61260	4.876	ppbV	93
44) trichloroethene	12.627	130	102778	4.944	ppbV	99
45) 2,2,4-trimethylpentane	12.673	57	443566M6	4.628	ppbV	
46) heptane	12.993	43	157736	5.045	ppbV	95
47) cis-1,3-dichloropropene	14.258	75	114607	5.244	ppbV	96
48) 4-methyl-2-pentanone	13.675	43	179091	5.182	ppbV	94
49) trans-1,3-dichloropropene	13.642	75	124929	5.356	ppbV	94
50) 1,1,2-trichloroethane	14.458	97	86220	4.945	ppbV	98
52) toluene	14.775	91	289254	4.312	ppbV	99
54) 2-hexanone	15.058	43	169412	5.711	ppbV	94
55) dibromochloromethane	15.225	129	126073	5.476	ppbV	99
56) 1,2-dibromoethane	15.475	107	131652	6.069	ppbV	99
57) tetrachloroethene	15.942	166	125462	5.320	ppbV	98
58) 1,1,1,2-tetrachloroethane	16.583	131	92295	5.493	ppbV	100
59) chlorobenzene	16.592	112	232137	5.671	ppbV	98
60) ethylbenzene	16.942	91	350248	5.400	ppbV	95
61) m+p-xylene	17.108	91	577329	11.040	ppbV	94
62) bromoform	17.175	173	121763	5.354	ppbV	99
63) styrene	17.433	104	248273	5.966	ppbV	96
64) 1,1,2,2-tetrachloroethane	17.525	83	217121	5.592	ppbV	100
65) o-xylene	17.525	91	290986	5.569	ppbV	94
66) 1,2,3-Trichloropropane	17.633	75	169176	5.985	ppbV	98
68) isopropylbenzene	18.033	105	381207	6.012	ppbV	96
69) Bromobenzene	18.108	77	228594	5.760	ppbV	97

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317985_Ev2.D
 Acq On : 26 Sep 2021 10:00 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 07:43:32 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Fri Aug 20 14:40:10 2021
 Response via : Initial Calibration

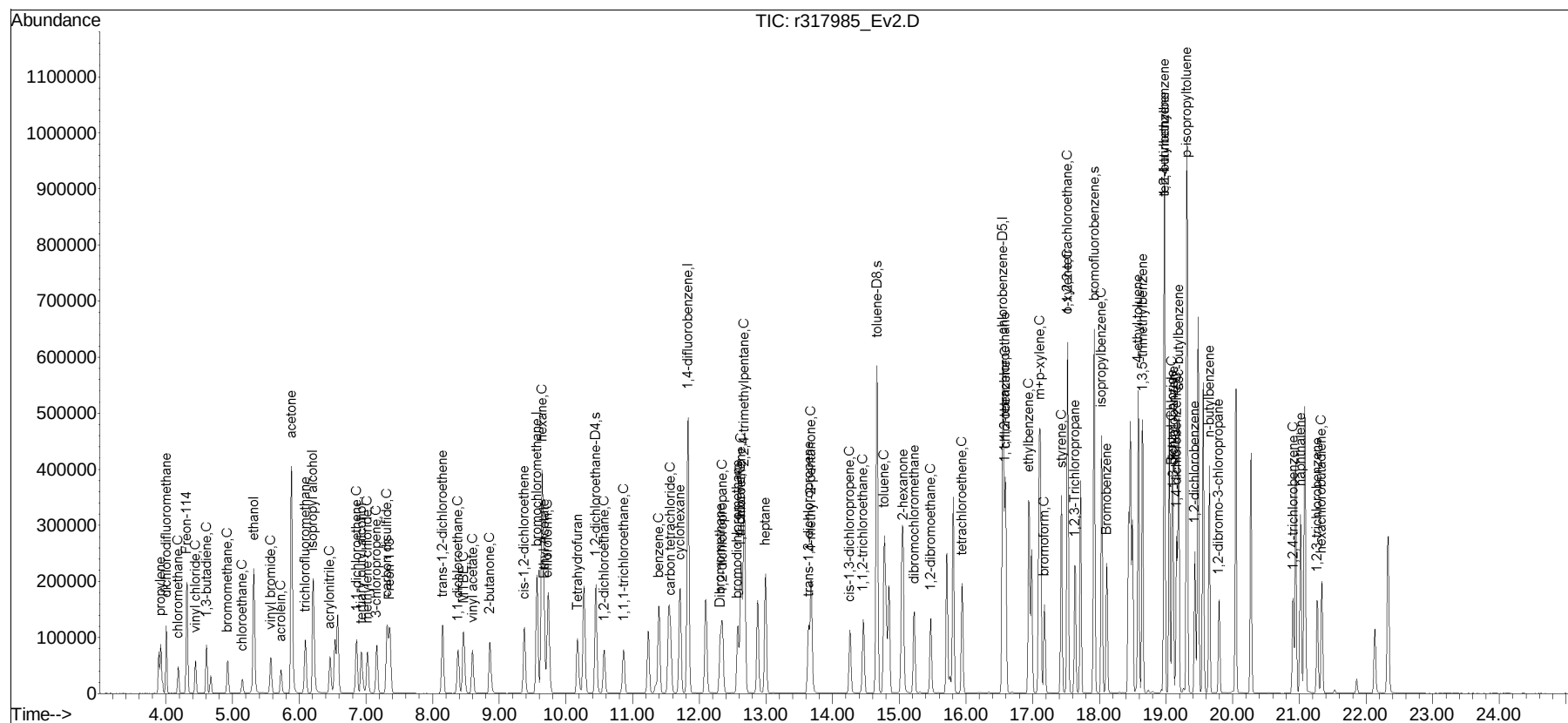
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.583	105	426062	6.001	ppbV	96
71) 1,3,5-trimethylbenzene	18.650	105	356685	6.077	ppbV	99
72) tert-butylbenzene	18.975	119	354722	5.573	ppbV	97
73) 1,2,4-trimethylbenzene	18.975	105	349892	6.179	ppbV	96
74) Benzyl Chloride	19.092	91	237256	5.331	ppbV	96
75) 1,3-dichlorobenzene	19.108	146	234688	6.003	ppbV	95
76) 1,4-dichlorobenzene	19.158	146	232041	6.050	ppbV	94
77) sec-butylbenzene	19.192	105	492608	6.174	ppbV	97
78) p-isopropyltoluene	19.308	119	427742	5.634	ppbV	97
79) 1,2-dichlorobenzene	19.433	146	218641	5.972	ppbV	95
80) n-butylbenzene	19.650	91	377873	5.747	ppbV	99
81) 1,2-dibromo-3-chloropr...	19.792	75	97131	6.296	ppbV	94
82) 1,2,4-trichlorobenzene	20.908	180	190589	6.082	ppbV	99
83) naphthalene	21.017	128	480654	6.294	ppbV	99
84) 1,2,3-trichlorobenzene	21.267	180	187128	6.222	ppbV	97
85) hexachlorobutadiene	21.333	225	185457	6.056	ppbV	98

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


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Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317985_Ev2.D
Acq On     : 26 Sep 2021  10:00 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD5.0
Misc       : WG1551141
ALS Vial   : 0      Sample Multiplier: 1
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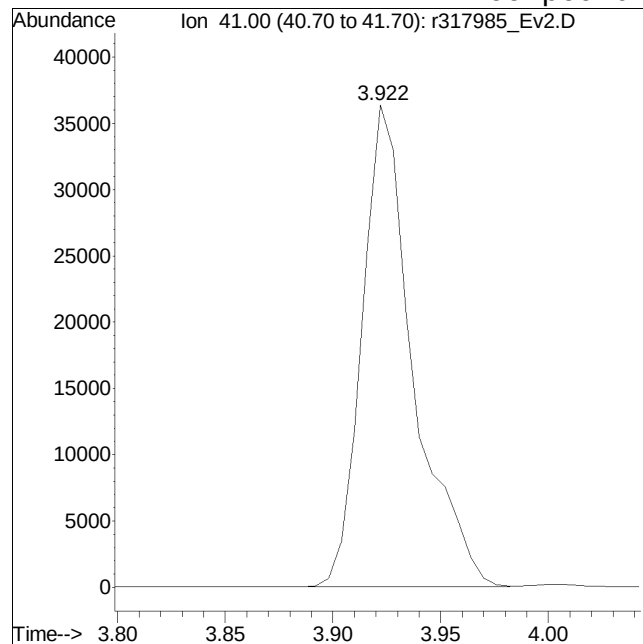
Quant Time: Sep 27 07:43:32 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Fri Aug 20 14:40:10 2021
Response via : Initial Calibration



Manual Integration Report

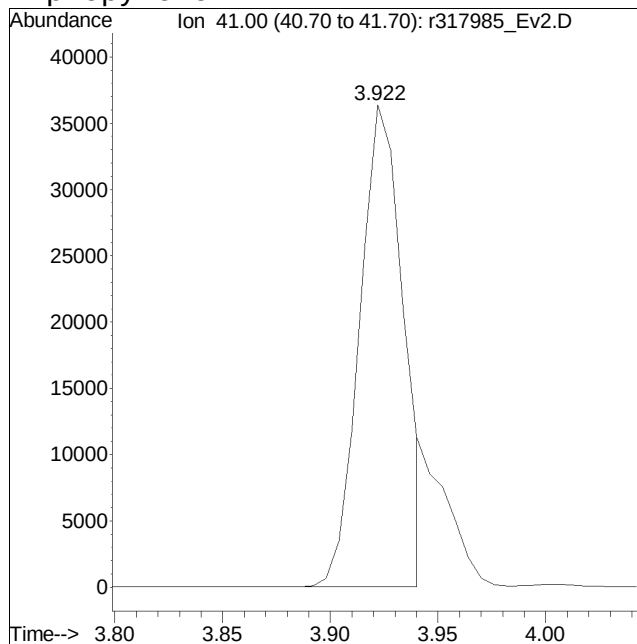
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317985_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 0 Instrument :
Sample : IT015-SIMSTD5.0 Quant Date : 9/27/2021 7:42 am

Compound #2: propylene



Original Peak Response = 60162

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

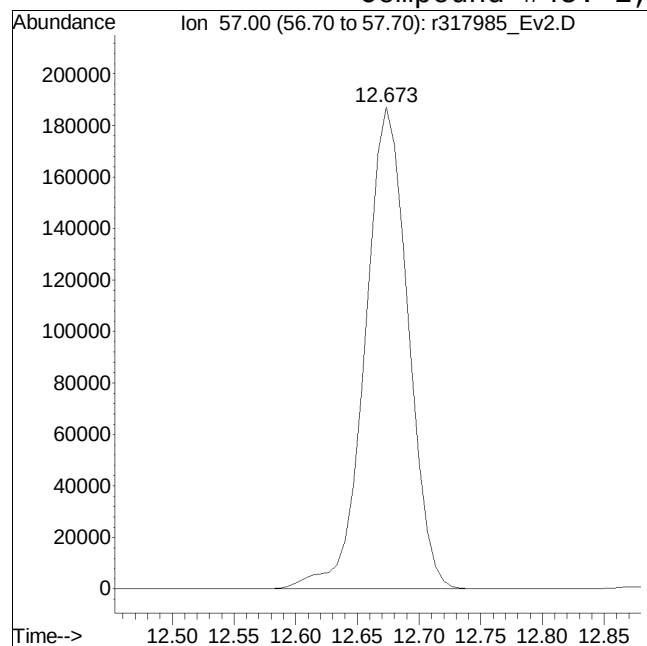


Manual Peak Response = 51504 M6

Manual Integration Report

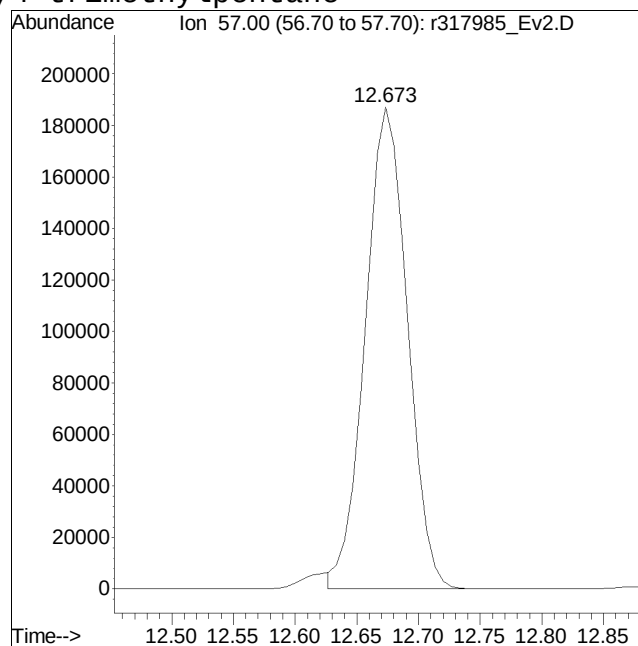
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317985_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 0 Instrument :
Sample : IT015-SIMSTD5.0 Quant Date : 9/27/2021 7:42 am

Compound #45: 2,2,4-trimethylpentane



Original Peak Response = 453479

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 443566 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317986_Ev2.D
 Acq On : 26 Sep 2021 10:41 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD010
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:41:48 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.558	49	229310	10.000	ppbV	0.00
Standard Area = 227668			Recovery =	100.72%		
33) 1,4-difluorobenzene	11.827	114	659514	10.000	ppbV	0.00
Standard Area = 647621			Recovery =	101.84%		
51) chlorobenzene-D5	16.550	54	104298	10.000	ppbV	0.00
Standard Area = 103400			Recovery =	100.87%		
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.450	65	162697	9.951	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	99.51%		
53) toluene-D8	14.667	98	693721	10.302	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	103.02%		
67) bromofluorobenzene	17.925	95	485797	10.225	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	102.25%		
Target Compounds						
					Qvalue	
2) propylene	3.922	41	103053M6	9.933	ppbV	
3) dichlorodifluoromethane	4.006	85	206651	9.311	ppbV	100
4) chloromethane	4.186	50	94555	9.471	ppbV	99
5) Freon-114	4.312	85	281069	9.340	ppbV	98
6) vinyl chloride	4.444	62	135777	9.686	ppbV	100
7) 1,3-butadiene	4.606	54	111451	9.564	ppbV	94
8) bromomethane	4.924	94	108774	9.692	ppbV	99
9) chloroethane	5.146	64	75598	9.865	ppbV	97
10) ethanol	5.313	31	474307	46.420	ppbV	99
11) vinyl bromide	5.570	106	108590	9.634	ppbV	98
12) acrolein	5.723	56	65419	9.264	ppbV	97
13) acetone	5.877	43	960343	47.408	ppbV	98
14) trichlorofluoromethane	6.087	101	211159	9.661	ppbV	99
15) isopropyl alcohol	6.203	45	591597	23.687	ppbV	99
16) acrylonitrile	6.457	53	125664	10.079	ppbV	100
17) 1,1-dichloroethene	6.854	61	193226	9.918	ppbV	99
18) tertiary butyl alcohol	6.926	59	253643	9.981	ppbV	98
19) methylene chloride	7.022	49	160545	9.705	ppbV	97
20) 3-chloropropene	7.160	41	185903	9.885	ppbV	99
21) carbon disulfide	7.316	76	453178	9.653	ppbV	99
22) Freon 113	7.352	101	233221	9.741	ppbV	100
23) trans-1,2-dichloroethene	8.142	61	205873	9.973	ppbV	95
24) 1,1-dichloroethane	8.375	63	238307	9.982	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317986_Ev2.D
 Acq On : 26 Sep 2021 10:41 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD010
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:41:48 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.458	73	372766	9.811	ppbV	98
26) vinyl acetate	8.592	43	293126	10.066	ppbV	99
27) 2-butanone	8.850	43	288334	9.796	ppbV	99
28) cis-1,2-dichloroethene	9.375	61	182454	10.062	ppbV	98
29) Ethyl Acetate	9.667	61	53840	10.420	ppbV	93
30) chloroform	9.725	83	249030	9.819	ppbV	99
31) Tetrahydrofuran	10.167	42	180730	9.968	ppbV	100
32) 1,2-dichloroethane	10.567	62	139088	9.889	ppbV	99
34) hexane	9.642	57	277917	9.860	ppbV	92
36) 1,1,1-trichloroethane	10.858	97	192553	9.872	ppbV	97
37) benzene	11.393	78	529034	9.679	ppbV	100
38) carbon tetrachloride	11.567	117	190657	10.045	ppbV	99
39) cyclohexane	11.707	56	302027	9.925	ppbV	99
40) Dibromomethane	12.313	93	137484	9.865	ppbV #	100
41) 1,2-dichloropropane	12.340	63	169942	9.965	ppbV	99
42) bromodichloromethane	12.573	83	282699	9.899	ppbV	100
43) 1,4-dioxane	12.613	88	123166	9.871	ppbV	98
44) trichloroethene	12.627	130	206319	9.856	ppbV	99
45) 2,2,4-trimethylpentane	12.673	57	889632M6	9.847	ppbV	
46) heptane	12.993	43	312030	9.713	ppbV	98
47) cis-1,3-dichloropropene	14.258	75	235941	10.108	ppbV	100
48) 4-methyl-2-pentanone	13.675	43	356654	9.778	ppbV	97
49) trans-1,3-dichloropropene	13.633	75	253331	9.956	ppbV	98
50) 1,1,2-trichloroethane	14.458	97	174590	9.942	ppbV	99
52) toluene	14.775	91	578479	9.913	ppbV	100
54) 2-hexanone	15.050	43	339279	9.927	ppbV	100
55) dibromochloromethane	15.225	129	256075	10.068	ppbV	100
56) 1,2-dibromoethane	15.467	107	262542	9.885	ppbV	99
57) tetrachloroethene	15.942	166	251383	9.932	ppbV	100
58) 1,1,1,2-tetrachloroethane	16.583	131	187171	10.053	ppbV	100
59) chlorobenzene	16.592	112	463641	9.900	ppbV	100
60) ethylbenzene	16.942	91	702268	9.939	ppbV	100
61) m+p-xylene	17.108	91	1141736	19.606	ppbV	100
62) bromoform	17.175	173	248900	10.133	ppbV	100
63) styrene	17.433	104	490296	9.789	ppbV	99
64) 1,1,2,2-tetrachloroethane	17.525	83	425330	9.710	ppbV	100
65) o-xylene	17.525	91	570303	9.715	ppbV	98
66) 1,2,3-Trichloropropane	17.633	75	331310	9.708	ppbV	99
68) isopropylbenzene	18.033	105	749044	9.740	ppbV	98
69) Bromobenzene	18.108	77	449983	9.758	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317986_Ev2.D
 Acq On : 26 Sep 2021 10:41 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD010
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:41:48 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

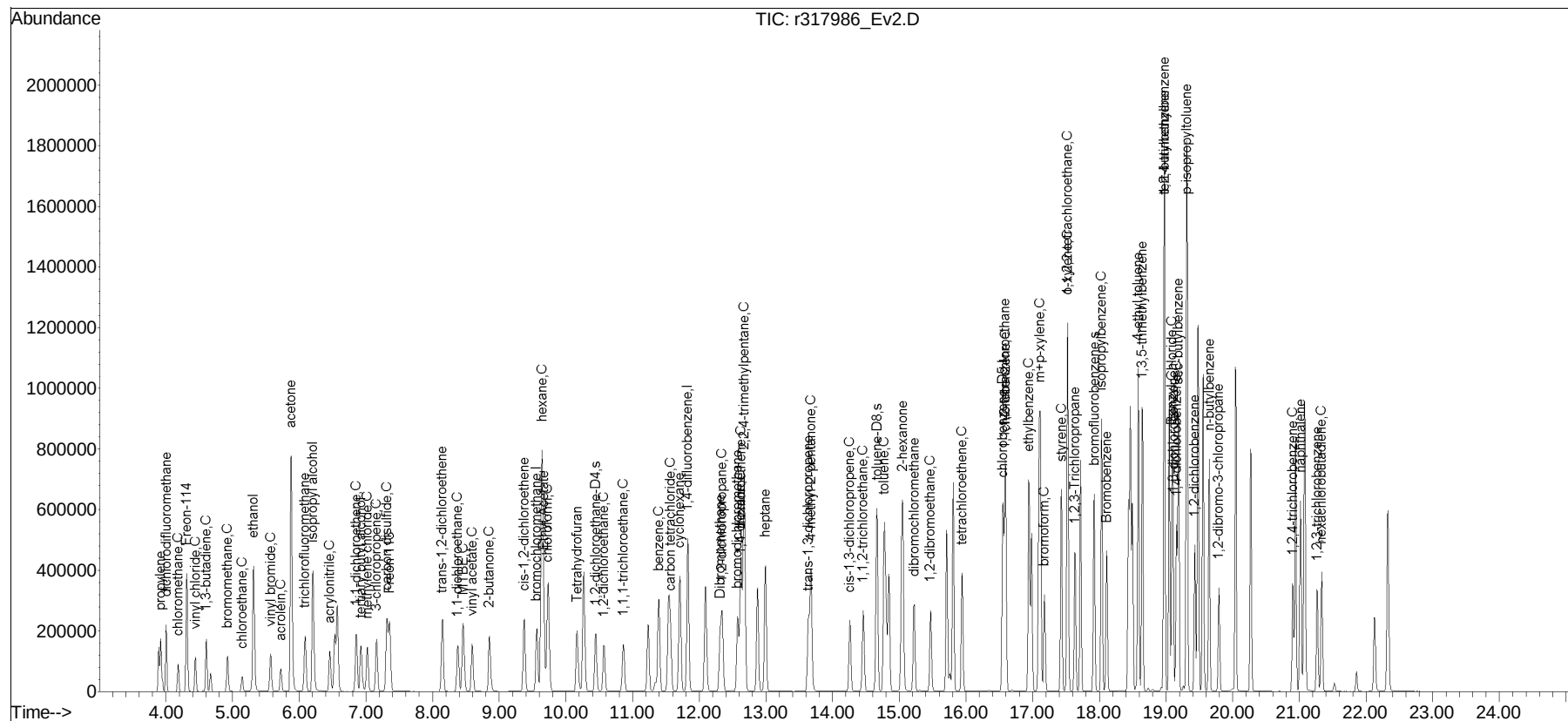
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.583	105	833620	9.699	ppbV	99
71) 1,3,5-trimethylbenzene	18.642	105	695474	9.665	ppbV	97
72) tert-butylbenzene	18.975	119	677209	9.463	ppbV	97
73) 1,2,4-trimethylbenzene	18.975	105	674897	9.561	ppbV	98
74) Benzyl Chloride	19.092	91	519569	10.855	ppbV	97
75) 1,3-dichlorobenzene	19.108	146	462544	9.770	ppbV	99
76) 1,4-dichlorobenzene	19.158	146	455493	9.730	ppbV	97
77) sec-butylbenzene	19.183	105	949052	9.550	ppbV	96
78) p-isopropyltoluene	19.308	119	812966	9.421	ppbV	97
79) 1,2-dichlorobenzene	19.433	146	430426	9.758	ppbV	98
80) n-butylbenzene	19.650	91	743973	9.759	ppbV	97
81) 1,2-dibromo-3-chloropr...	19.792	75	189430	9.667	ppbV	97
82) 1,2,4-trichlorobenzene	20.900	180	386053	10.041	ppbV	98
83) naphthalene	21.017	128	944093	9.736	ppbV	100
84) 1,2,3-trichlorobenzene	21.267	180	372541	9.868	ppbV	99
85) hexachlorobutadiene	21.333	225	354745	9.482	ppbV	98

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

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Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317986_Ev2.D
Acq On     : 26 Sep 2021  10:41 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD010
Misc       : WG1551141
ALS Vial   : 0    Sample Multiplier: 1
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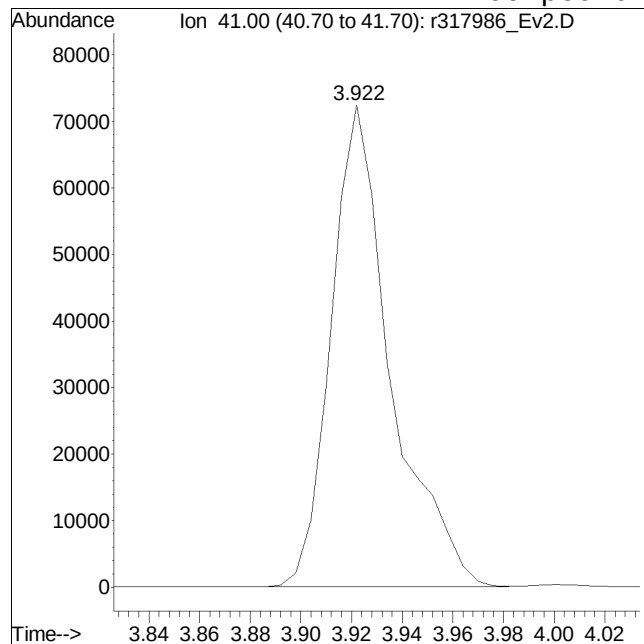
Quant Time: Sep 27 09:41:48 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

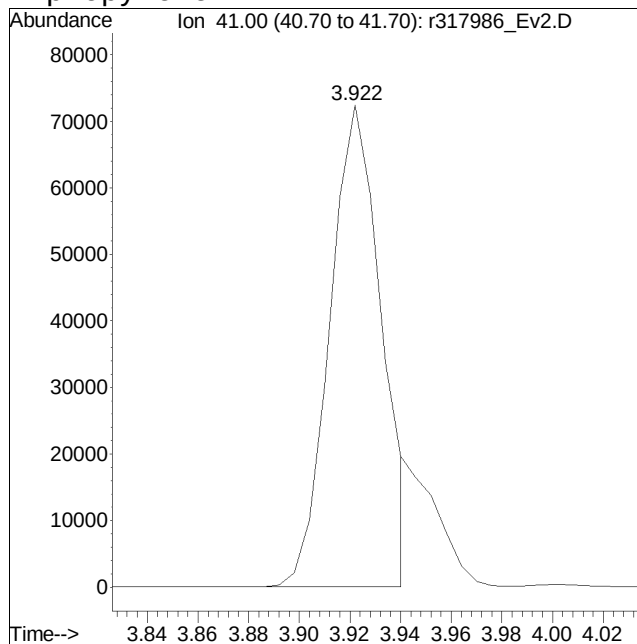
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317986_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 1 Instrument :
Sample : IT015-SIMSTD010 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 118167

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

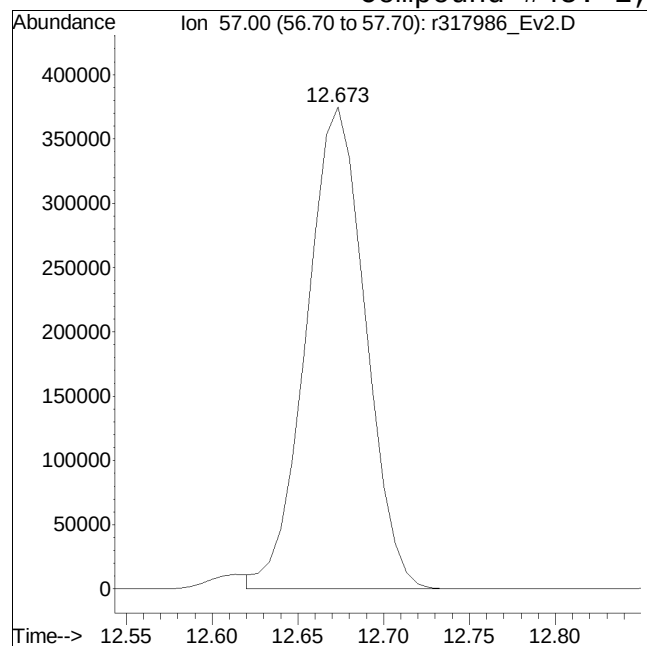


Manual Peak Response = 103053 M6

Manual Integration Report

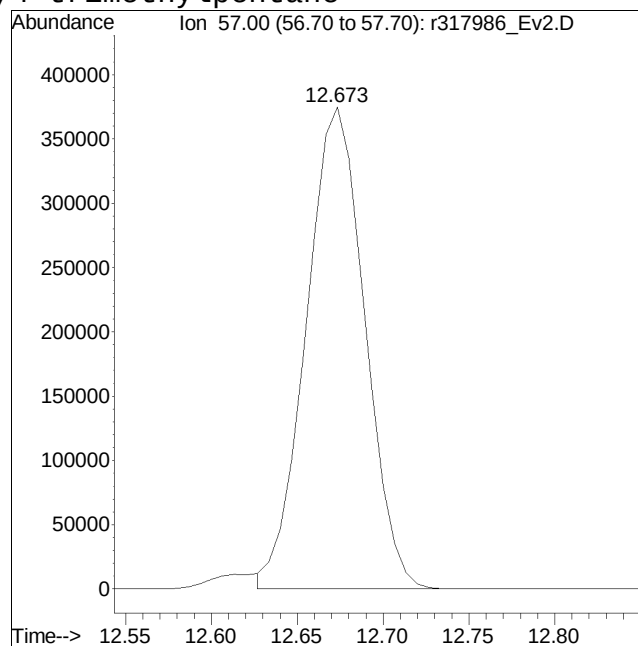
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317986_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:0: 1 Instrument :
Sample : IT015-SIMSTD010 Quant Date : 9/27/2021 7:44 am

Compound #45: 2,2,4-trimethylpentane



Original Peak Response = 894275

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 889632 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317987_Ev2.D
 Acq On : 26 Sep 2021 11:20 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD020
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:42:36 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	228434	10.000	ppbV	0.00
Standard Area = 227668			Recovery =	100.34%		
33) 1,4-difluorobenzene	11.827	114	666791	10.000	ppbV	0.00
Standard Area = 647621			Recovery =	102.96%		
51) chlorobenzene-D5	16.550	54	103826	10.000	ppbV	0.00
Standard Area = 103400			Recovery =	100.41%		
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.450	65	159163	9.629	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	96.29%		
53) toluene-D8	14.667	98	691370	10.314	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	103.14%		
67) bromofluorobenzene	17.925	95	484418	10.242	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	102.42%		
Target Compounds						
					Qvalue	
2) propylene	3.922	41	193785M6	18.750	ppbV	
3) dichlorodifluoromethane	4.000	85	382496	17.300	ppbV	100
4) chloromethane	4.180	50	179765	18.075	ppbV	99
5) Freon-114	4.312	85	513080	17.114	ppbV	94
6) vinyl chloride	4.438	62	258011	18.477	ppbV	100
7) 1,3-butadiene	4.606	54	209572	18.052	ppbV	94
8) bromomethane	4.924	94	205222	18.357	ppbV	99
9) chloroethane	5.140	64	145070	19.004	ppbV	98
10) ethanol	5.313	31	908692	89.274	ppbV	97
11) vinyl bromide	5.570	106	206551	18.395	ppbV	100
12) acrolein	5.720	56	142158	20.207	ppbV	99
13) acetone	5.873	43	1680923	83.298	ppbV	94
14) trichlorofluoromethane	6.090	101	395607	18.169	ppbV	99
15) isopropyl alcohol	6.200	45	1131311	45.471	ppbV	98
16) acrylonitrile	6.457	53	250801	20.193	ppbV	99
17) 1,1-dichloroethene	6.854	61	378733	19.515	ppbV	100
18) tertiary butyl alcohol	6.920	59	537303	21.225	ppbV	97
19) methylene chloride	7.022	49	305702	18.550	ppbV	95
20) 3-chloropropene	7.160	41	363200	19.387	ppbV	99
21) carbon disulfide	7.316	76	859839	18.385	ppbV	99
22) Freon 113	7.352	101	449635	18.852	ppbV	99
23) trans-1,2-dichloroethene	8.150	61	405924	19.740	ppbV	98
24) 1,1-dichloroethane	8.375	63	470828	19.798	ppbV	99

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317987_Ev2.D
 Acq On : 26 Sep 2021 11:20 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD020
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:42:36 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.458	73	711131	18.789	ppbV	97
26) vinyl acetate	8.592	43	578694	19.949	ppbV	100
27) 2-butanone	8.850	43	558107	19.035	ppbV	99
28) cis-1,2-dichloroethene	9.375	61	359162	19.882	ppbV	97
29) Ethyl Acetate	9.667	61	109105	21.198	ppbV	94
30) chloroform	9.725	83	470675	18.629	ppbV	99
31) Tetrahydrofuran	10.158	42	353225	19.557	ppbV	97
32) 1,2-dichloroethane	10.567	62	266105	18.993	ppbV	99
34) hexane	9.642	57	533913	18.736	ppbV	90
36) 1,1,1-trichloroethane	10.858	97	372465	18.887	ppbV	98
37) benzene	11.393	78	1002194	18.135	ppbV	99
38) carbon tetrachloride	11.567	117	361634	18.844	ppbV	98
39) cyclohexane	11.707	56	593212	19.281	ppbV	99
40) Dibromomethane	12.313	93	268012	19.021	ppbV #	100
41) 1,2-dichloropropane	12.347	63	335014	19.430	ppbV	98
42) bromodichloromethane	12.573	83	534590	18.515	ppbV	98
43) 1,4-dioxane	12.607	88	253944	20.131	ppbV	97
44) trichloroethene	12.627	130	397174	18.766	ppbV	100
45) 2,2,4-trimethylpentane	12.673	57	1707672M6	18.696	ppbV	
46) heptane	12.993	43	595961	18.348	ppbV	97
47) cis-1,3-dichloropropene	14.258	75	452840	19.188	ppbV	99
48) 4-methyl-2-pentanone	13.667	43	686014	18.602	ppbV	97
49) trans-1,3-dichloropropene	13.633	75	485665	18.879	ppbV	99
50) 1,1,2-trichloroethane	14.458	97	338751	19.080	ppbV	97
52) toluene	14.775	91	1098936	18.918	ppbV	100
54) 2-hexanone	15.050	43	653647	19.212	ppbV	98
55) dibromochloromethane	15.225	129	484696	19.144	ppbV	99
56) 1,2-dibromoethane	15.467	107	497579	18.820	ppbV	99
57) tetrachloroethene	15.942	166	477703	18.960	ppbV	99
58) 1,1,1,2-tetrachloroethane	16.583	131	357079	19.265	ppbV	99
59) chlorobenzene	16.592	112	875640	18.783	ppbV	99
60) ethylbenzene	16.942	91	1324038	18.824	ppbV	98
61) m+p-xylene	17.108	91	2126274	36.678	ppbV	98
62) bromoform	17.175	173	475244	19.435	ppbV	99
63) styrene	17.433	104	930727	18.667	ppbV	99
64) 1,1,2,2-tetrachloroethane	17.525	83	782344	17.942	ppbV	100
65) o-xylene	17.525	91	1041537	17.823	ppbV	95
66) 1,2,3-Trichloropropane	17.633	75	627150	18.459	ppbV	99
68) isopropylbenzene	18.033	105	1390686	18.166	ppbV	97
69) Bromobenzene	18.108	77	846454	18.438	ppbV	96

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317987_Ev2.D
 Acq On : 26 Sep 2021 11:20 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD020
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:42:36 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

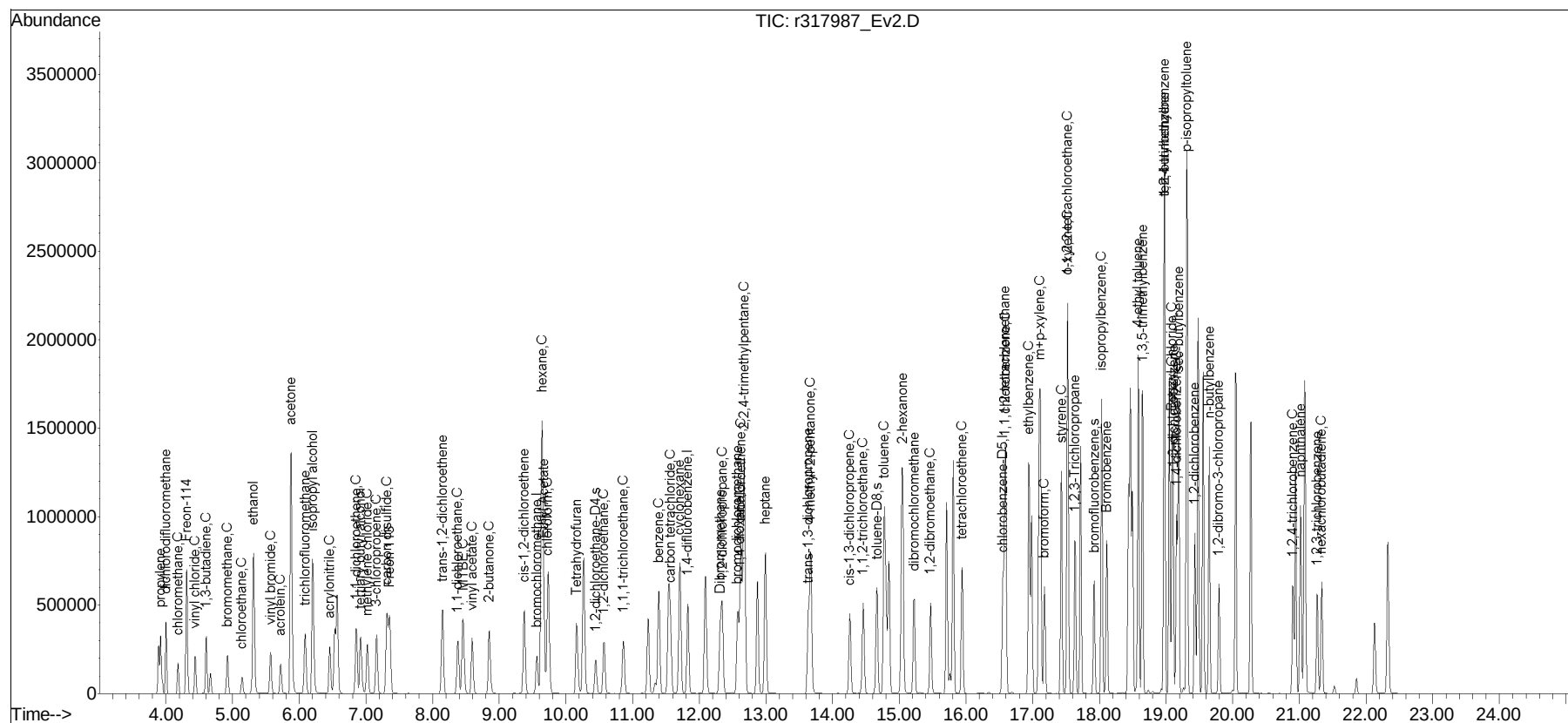
CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.583	105	1531295	17.897	ppbV	97
71) 1,3,5-trimethylbenzene	18.650	105	1283889	17.924	ppbV	99
72) tert-butylbenzene	18.975	119	1216155	17.072	ppbV	96
73) 1,2,4-trimethylbenzene	18.975	105	1218596	17.342	ppbV	98
74) Benzyl Chloride	19.092	91	1004227	21.077	ppbV	94
75) 1,3-dichlorobenzene	19.108	146	850119	18.037	ppbV	99
76) 1,4-dichlorobenzene	19.158	146	845086	18.135	ppbV	98
77) sec-butylbenzene	19.192	105	1729924	17.487	ppbV	97
78) p-isopropyltoluene	19.308	119	1419394	16.524	ppbV	94
79) 1,2-dichlorobenzene	19.433	146	801033	18.243	ppbV	99
80) n-butylbenzene	19.650	91	1346327	17.741	ppbV	95
81) 1,2-dibromo-3-chloropr...	19.792	75	345879	17.732	ppbV	94
82) 1,2,4-trichlorobenzene	20.900	180	689309	18.009	ppbV	97
83) naphthalene	21.017	128	1636701	16.956	ppbV	99
84) 1,2,3-trichlorobenzene	21.267	180	637209	16.956	ppbV	99
85) hexachlorobutadiene	21.333	225	583408	15.664	ppbV	96

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

```
Data Path   : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File  : r317987_Ev2.D
Acq On     : 26 Sep 2021  11:20 PM
Operator   : AIRPIANO3:TS
Sample     : IT015-SIMSTD020
Misc       : WG1551141
ALS Vial   : 0    Sample Multiplier: 1
```

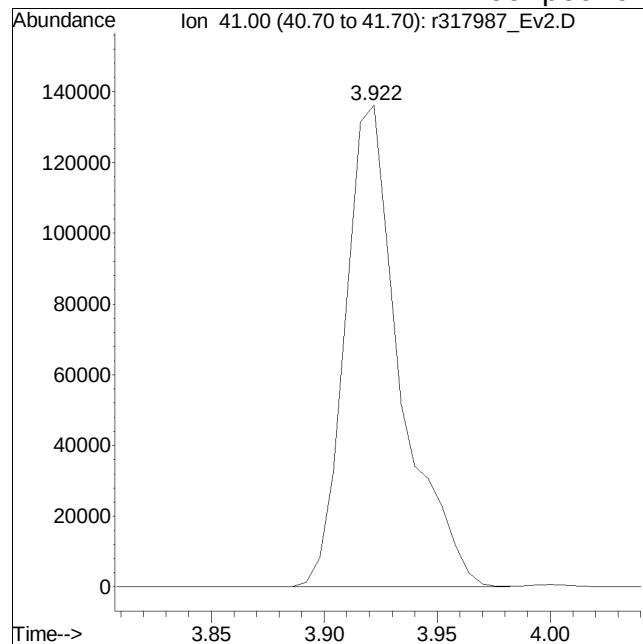
Quant Time: Sep 27 09:42:36 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

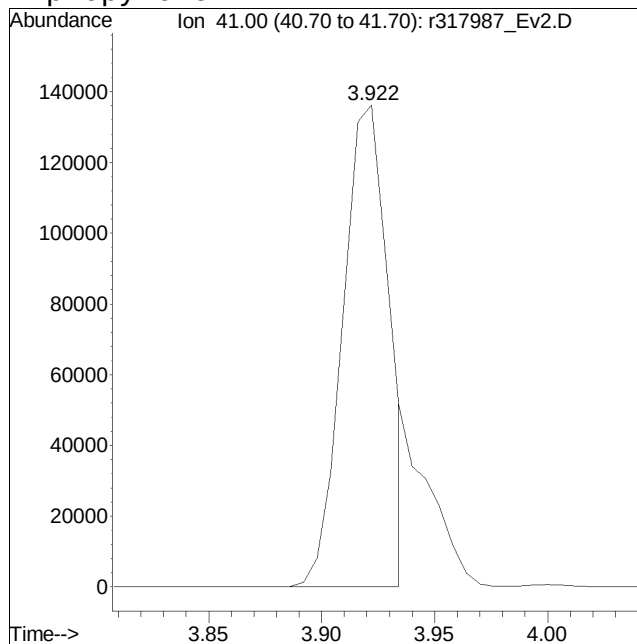
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Data File : r317987_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 0 Instrument :
Sample : IT015-SIMSTD020 Quant Date : 9/27/2021 7:44 am

Compound #2: propylene



Original Peak Response = 231357

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

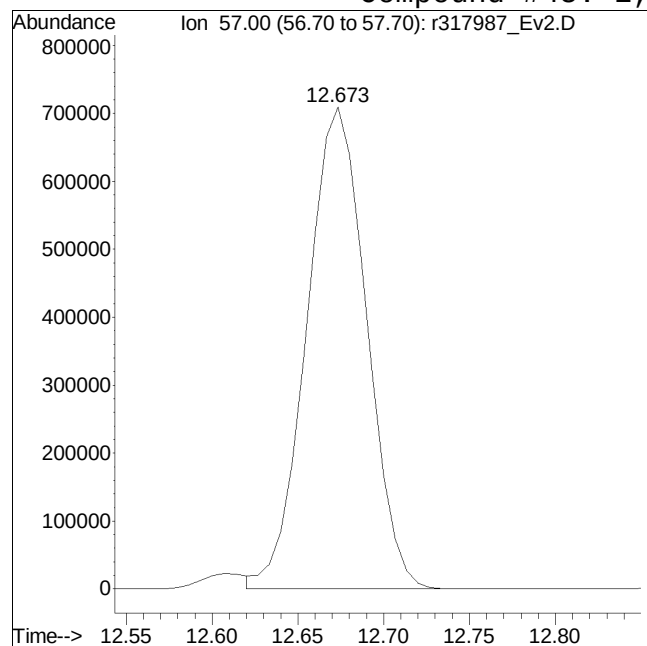


Manual Peak Response = 193785 M6

Manual Integration Report

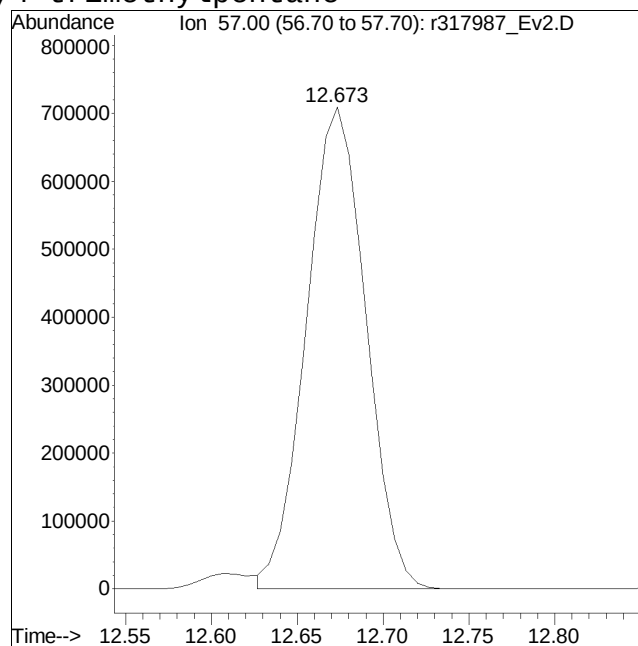
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317987_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 0 Instrument :
Sample : IT015-SIMSTD020 Quant Date : 9/27/2021 7:44 am

Compound #45: 2,2,4-trimethylpentane



Original Peak Response = 1715185

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 1707672 M6

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317988_Ev2.D
 Acq On : 26 Sep 2021 11:59 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD050
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:43:17 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.567	49	223723	10.000	ppbV	0.00
Standard Area = 227668			Recovery =	98.27%		
33) 1,4-difluorobenzene	11.833	114	651875	10.000	ppbV	0.00
Standard Area = 647621			Recovery =	100.66%		
51) chlorobenzene-D5	16.550	54	99483	10.000	ppbV	0.00
Standard Area = 103400			Recovery =	96.21%		
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.450	65	150421	9.308	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	93.08%		
53) toluene-D8	14.667	98	682963	10.634	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	106.34%		
67) bromofluorobenzene	17.925	95	484641	10.694	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =	106.94%		
Target Compounds						
					Qvalue	
2) propylene	3.922	41	439978M6	43.466	ppbV	
3) dichlorodifluoromethane	4.006	85	806731	37.256	ppbV	99
4) chloromethane	4.186	50	405304	41.611	ppbV	99
5) Freon-114	4.312	85	1044156	35.563	ppbV	93
6) vinyl chloride	4.444	62	584343	42.729	ppbV	98
7) 1,3-butadiene	4.606	54	465071	40.904	ppbV	89
8) bromomethane	4.924	94	455829	41.632	ppbV	100
9) chloroethane	5.146	64	335409	44.864	ppbV	96
10) ethanol	5.320	31	1891580	189.751	ppbV	91
11) vinyl bromide	5.573	106	452898	41.183	ppbV	99
12) acrolein	5.723	56	267817	38.871	ppbV	# 95
13) acetone	5.880	43	3307944	167.377	ppbV	# 90
14) trichlorofluoromethane	6.090	101	863031	40.471	ppbV	100
15) isopropyl alcohol	6.207	45	2506852	102.880	ppbV	97
16) acrylonitrile	6.460	53	585259	48.114	ppbV	99
17) 1,1-dichloroethene	6.860	61	853586	44.908	ppbV	96
18) tertiary butyl alcohol	6.920	59	1259662	50.808	ppbV	96
19) methylene chloride	7.022	49	688970	42.688	ppbV	94
20) 3-chloropropene	7.160	41	850503	46.353	ppbV	98
21) carbon disulfide	7.316	76	1902820	41.543	ppbV	99
22) Freon 113	7.352	101	1003566	42.963	ppbV	99
23) trans-1,2-dichloroethene	8.150	61	921022	45.731	ppbV	97
24) 1,1-dichloroethane	8.383	63	1088592	46.738	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317988_Ev2.D
 Acq On : 26 Sep 2021 11:59 PM
 Operator : AIRPIANO3:TS
 Sample : IT015-SIMSTD050
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:43:17 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.458	73	1583943	42.731	ppbV	96
26) vinyl acetate	8.592	43	1346530	47.397	ppbV	99
27) 2-butanone	8.850	43	1277503	44.488	ppbV	98
28) cis-1,2-dichloroethene	9.375	61	820472	46.375	ppbV	98
29) Ethyl Acetate	9.667	61	254104	50.408	ppbV	95
30) chloroform	9.733	83	1017798	41.131	ppbV	97
31) Tetrahydrofuran	10.158	42	824273	46.598	ppbV	98
32) 1,2-dichloroethane	10.575	62	584744	42.614	ppbV	98
34) hexane	9.642	57	1154113	41.426	ppbV	95
36) 1,1,1-trichloroethane	10.867	97	896458	46.498	ppbV	98
37) benzene	11.393	78	2217862	41.051	ppbV	98
38) carbon tetrachloride	11.567	117	778728	41.507	ppbV	99
39) cyclohexane	11.713	56	1353210	44.989	ppbV	99
40) Dibromomethane	12.313	93	587426	42.645	ppbV #	97
41) 1,2-dichloropropane	12.347	63	765271	45.398	ppbV	97
42) bromodichloromethane	12.580	83	1163441	41.218	ppbV	97
43) 1,4-dioxane	12.607	88	574155	46.556	ppbV	99
44) trichloroethene	12.627	130	891918	43.107	ppbV	98
45) 2,2,4-trimethylpentane	12.673	57	3702104	41.459	ppbV	99
46) heptane	12.993	43	1343470	42.308	ppbV	98
47) cis-1,3-dichloropropene	14.258	75	1015542	44.016	ppbV	99
48) 4-methyl-2-pentanone	13.675	43	1544269	42.833	ppbV	93
49) trans-1,3-dichloropropene	13.642	75	1092066	43.422	ppbV	99
50) 1,1,2-trichloroethane	14.458	97	765492	44.102	ppbV	98
52) toluene	14.775	91	2371836	42.613	ppbV	99
54) 2-hexanone	15.050	43	1452442	44.555	ppbV	100
55) dibromochloromethane	15.225	129	1040745	42.901	ppbV	97
56) 1,2-dibromoethane	15.475	107	1094704	43.213	ppbV	98
57) tetrachloroethene	15.942	166	1048138	43.416	ppbV	98
58) 1,1,1,2-tetrachloroethane	16.583	131	760060	42.797	ppbV	99
59) chlorobenzene	16.600	112	1874718	41.969	ppbV	95
60) ethylbenzene	16.942	91	2810818	41.706	ppbV	94
61) m+p-xylene	17.108	91	4281720	77.084	ppbV	93
62) bromoform	17.183	173	1027493	43.854	ppbV	98
63) styrene	17.433	104	2036394	42.626	ppbV	98
64) 1,1,2,2-tetrachloroethane	17.525	83	1549853	37.096	ppbV	99
65) o-xylene	17.525	91	2041660	36.463	ppbV	92
66) 1,2,3-Trichloropropane	17.633	75	1375001	42.238	ppbV	98
68) isopropylbenzene	18.033	105	2903433	39.582	ppbV	93
69) Bromobenzene	18.108	77	1805719	41.051	ppbV	92

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317988_Ev2.D
 Acq On : 26 Sep 2021 11:59 PM
 Operator : AIRPIAN03:TS
 Sample : IT015-SIMSTD050
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 09:43:17 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 07:44:06 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default - All compounds listed

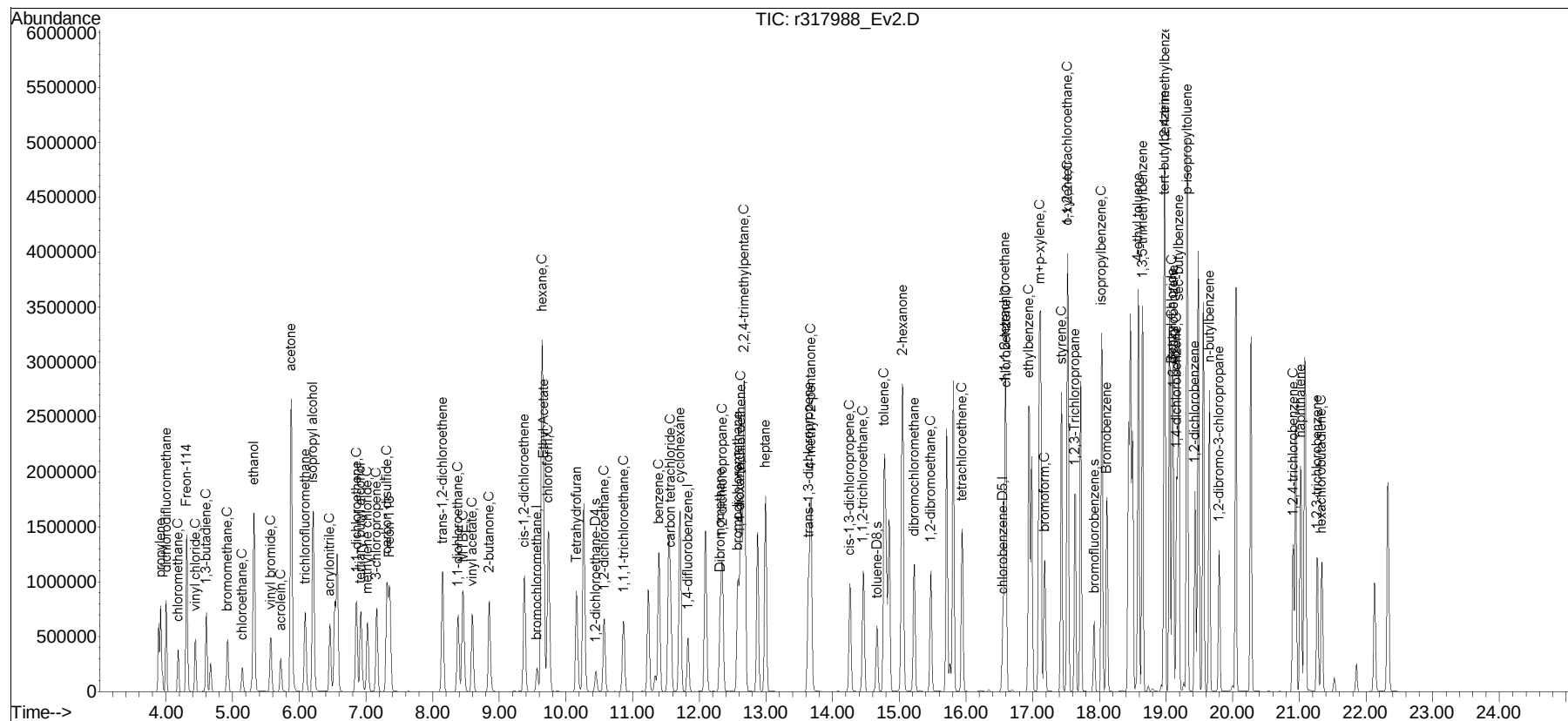
Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.583	105	3143411	38.342	ppbV	93
71) 1,3,5-trimethylbenzene	18.650	105	2623646	38.226	ppbV	96
72) tert-butylbenzene	18.975	119	2221415	32.545	ppbV	90
73) 1,2,4-trimethylbenzene	18.983	105	2187028	32.483	ppbV	93
74) Benzyl Chloride	19.092	91	2105445	46.118	ppbV #	90
75) 1,3-dichlorobenzene	19.108	146	1719467	38.075	ppbV	95
76) 1,4-dichlorobenzene	19.158	146	1778998	39.843	ppbV	97
77) sec-butylbenzene	19.192	105	3416461	36.043	ppbV	92
78) p-isopropyltoluene	19.317	119	2515253M6	30.559	ppbV	
79) 1,2-dichlorobenzene	19.433	146	1710045	40.646	ppbV	97
80) n-butylbenzene	19.650	91	2703882	37.186	ppbV #	88
81) 1,2-dibromo-3-chloropr...	19.800	75	729623	39.038	ppbV	89
82) 1,2,4-trichlorobenzene	20.908	180	1564536	42.661	ppbV	99
83) naphthalene	21.017	128	3495708	37.796	ppbV	98
84) 1,2,3-trichlorobenzene	21.267	180	1458063	40.493	ppbV	98
85) hexachlorobutadiene	21.333	225	1212175	33.968	ppbV	94

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

Sub List : Default - All compounds listed21\09\0926SIM_I\r317985_Ev2.D

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
Data File : r317988_Ev2.D
Acq On : 26 Sep 2021 11:59 PM
Operator : AIRPIANO3:TS
Sample : IT015-SIMSTD050
Misc : WG1551141
ALS Vial : 0 Sample Multiplier: 1

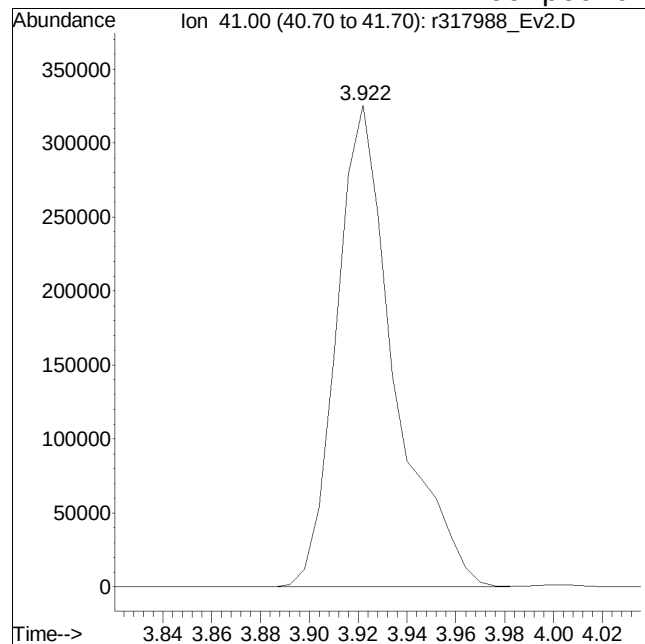
Quant Time: Sep 27 09:43:17 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 07:44:06 2021
Response via : Initial Calibration



Manual Integration Report

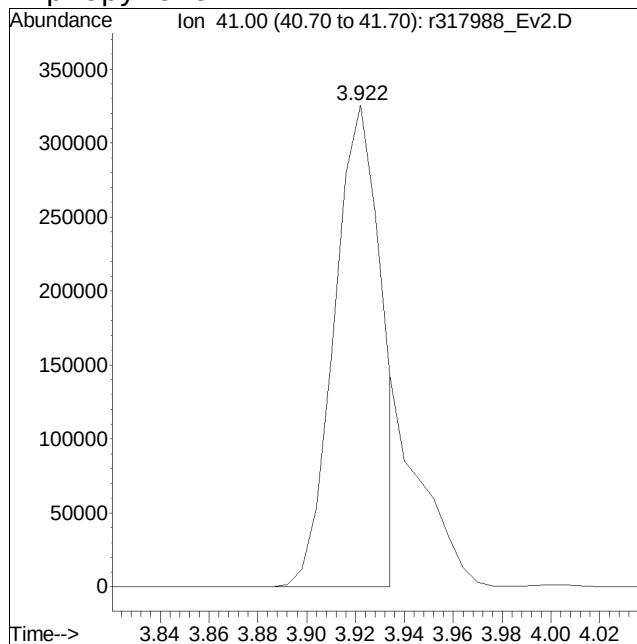
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Data File : r317988_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 9 Instrument :
Sample : IT015-SIMSTD050 Quant Date : 9/27/2021 7:45 am

Compound #2: propylene



Original Peak Response = 536794

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

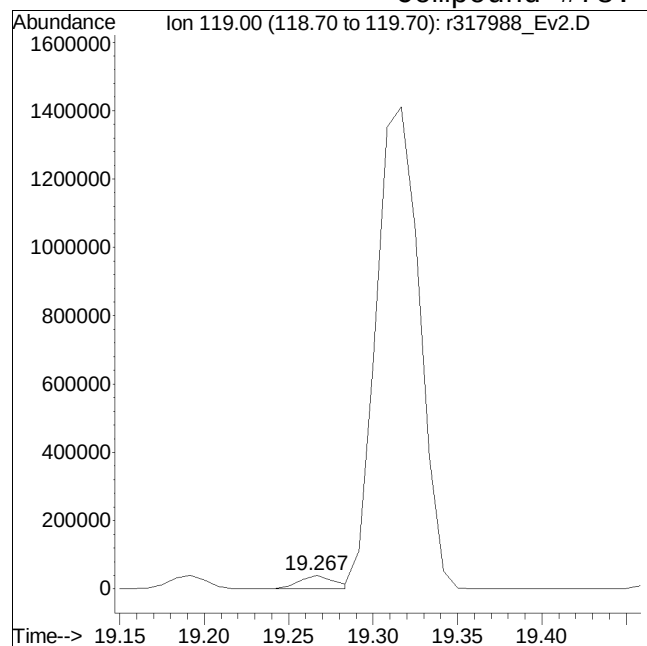


Manual Peak Response = 439978 M6

Manual Integration Report

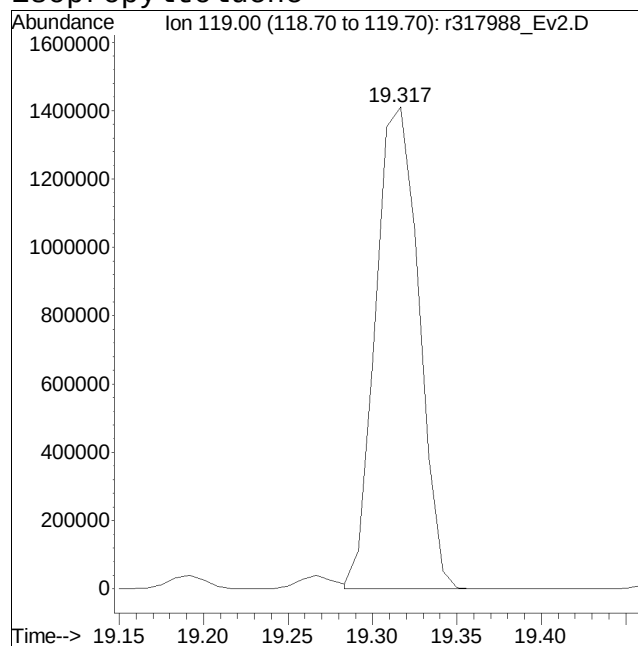
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Data File : r317988_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/26/2020 0:1: 9 Instrument :
Sample : IT015-SIMSTD050 Quant Date : 9/27/2021 7:45 am

Compound #78: p-isopropyltoluene



Original Peak Response = 58787

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



Manual Peak Response = 2515253 M6

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317993_Ev2.D
 Acq On : 27 Sep 2021 8:37 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:11:18 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	bromochloromethane	1.000	1.000	0.0	85	0.00
2	propylene	0.464	0.529	-14.0	100	0.00
3	dichlorodifluoromethane	0.977	0.851	12.9	75	0.00
4 C	chloromethane	0.454	0.413	9.0	81	0.00
5	Freon-114	1.330	1.231	7.4	80	0.00
6 C	vinyl chloride	0.639	0.601	5.9	84	0.00
7 C	1,3-butadiene	0.532	0.496	6.8	83	0.00
8 C	bromomethane	0.536	0.485	9.5	84	0.00
9 C	chloroethane	0.369	0.355	3.8	91	0.00
10	ethanol	0.443	0.392	11.5	75	0.00
11 C	vinyl bromide	0.501	0.461	8.0	80	0.00
12 C	acrolein	0.333	0.242	27.3	67	0.00
13	acetone	0.883	0.776	12.1	75	0.00
14	trichlorofluoromethane	0.979	0.873	10.8	78	0.00
15	isopropyl alcohol	1.049	0.979	6.7	77	0.00
16 C	acrylonitrile	0.576	0.562	2.4	88	0.00
17 C	1,1-dichloroethene	0.913	0.907	0.7	91	0.00
18	tertiary butyl alcohol	1.130	1.157	-2.4	89	0.00
19 C	methylene chloride	0.738	0.706	4.3	83	0.00
20 C	3-chloropropene	0.854	0.948	-11.0	99	0.00
21 C	carbon disulfide	2.116	1.906	9.9	79	0.00
22	Freon 113	1.081	1.091	-0.9	89	0.00
23	trans-1,2-dichloroethene	0.962	0.962	0.0	91	0.00
24 C	1,1-dichloroethane	1.130	1.154	-2.1	95	0.00
25 C	MTBE	1.678	1.629	2.9	84	0.00
26 C	vinyl acetate	1.301	1.258	3.3	84	0.00
27 C	2-butanone	1.328	1.309	1.4	87	0.00
28	cis-1,2-dichloroethene	0.858	0.890	-3.7	96	0.00
29	Ethyl Acetate	0.239	0.276	-15.5	104	0.00
30 C	chloroform	1.174	1.109	5.5	86	0.00
31	Tetrahydrofuran	0.819	0.823	-0.5	89	0.00
32 C	1,2-dichloroethane	0.647	0.581	10.2	81	0.00
33 I	1,4-difluorobenzene	1.000	1.000	0.0	91	0.00
34 C	hexane	0.441	0.446	-1.1	96	0.00
35 s	1,2-dichloroethane-D4	0.243	0.221	9.1	82	0.00
36 C	1,1,1-trichloroethane	0.315	0.282	10.5	87	0.00
37 C	benzene	0.913	0.777	14.9	86	0.00
38 C	carbon tetrachloride	0.298	0.265	11.1	84	0.00

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317993_Ev2.D
 Acq On : 27 Sep 2021 8:37 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:11:18 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
39	cyclohexane	0.482	0.487	-1.0	97	0.00
40	Dibromomethane	0.236	0.205	13.1	89	0.00
41 C	1,2-dichloropropane	0.283	0.279	1.4	99	0.00
42	bromodichloromethane	0.437	0.412	5.7	87	0.00
43 C	1,4-dioxane	0.199	0.201	-1.0	97	0.00
44 C	trichloroethene	0.330	0.326	1.2	94	0.00
45 C	2,2,4-trimethylpentane	1.422	1.455	-2.3	97	0.00
46	heptane	0.500	0.480	4.0	90	0.00
47 C	cis-1,3-dichloropropene	0.326	0.295	9.5	76	0.00
48 C	4-methyl-2-pentanone	0.551	0.543	1.5	90	0.00
49	trans-1,3-dichloropropene	0.381	0.384	-0.8	91	0.00
50 C	1,1,2-trichloroethane	0.277	0.280	-1.1	96	0.00
51 I	chlorobenzene-D5	1.000	1.000	0.0	89	0.00
52 C	toluene	6.204	6.029	2.8	96	0.00
53 s	toluene-D8	6.573	6.779	-3.1	93	0.00
54	2-hexanone	3.244	3.196	1.5	87	0.00
55	dibromochloromethane	2.485	2.650	-6.6	97	0.00
56 C	1,2-dibromoethane	2.611	2.525	3.3	88	0.00
57 C	tetrachloroethene	2.563	2.612	-1.9	96	0.00
58	1,1,1,2-tetrachloroethane	1.828	1.779	2.7	89	0.00
59 C	chlorobenzene	4.766	4.660	2.2	92	0.00
60 C	ethylbenzene	6.924	7.418	-7.1	97	0.00
61 C	m+p-xylene	5.618	6.029	-7.3	96	0.00
62 C	bromoform	2.273	2.554	-12.4	96	0.00
63 C	styrene	4.624	4.873	-5.4	90	0.00
64 C	1,1,2,2-tetrachloroethane	4.233	4.502	-6.4	95	0.00
65 C	o-xylene	5.659	6.046	-6.8	95	0.00
66	1,2,3-Trichloropropane	3.315	3.008	9.3	82	0.00
67 s	bromofluorobenzene	4.608	4.572	0.8	89	0.00
68 C	isopropylbenzene	7.547	7.220	4.3	87	0.00
69	Bromobenzene	4.529	4.183	7.6	84	0.00
70	4-ethyl toluene	7.890	8.196	-3.9	88	0.00
71	1,3,5-trimethylbenzene	6.785	6.878	-1.4	89	0.00
72	tert-butylbenzene	6.782	6.898	-1.7	89	0.02
73	1,2,4-trimethylbenzene	6.552	6.884	-5.1	90	0.02
74 C	Benzyl Chloride	3.623	5.027	-38.8#	97	0.02
75	1,3-dichlorobenzene	4.113	4.606	-12.0	90	0.02
76 C	1,4-dichlorobenzene	4.034	4.613	-14.4	91	0.02

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317993_Ev2.D
 Acq On : 27 Sep 2021 8:37 AM
 Operator : AIRPIAN03:TS
 Sample : CT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:11:18 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
77	sec-butylbenzene	9.559	9.134	4.4	85	0.02
78	p-isopropyltoluene	8.063	7.755	3.8	83	0.03
79	1,2-dichlorobenzene	4.036	4.317	-7.0	91	0.03
80	n-butylbenzene	7.150	7.612	-6.5	93	0.04
81	1,2-dibromo-3-chloropropane	1.699	1.670	1.7	79	0.05
82 C	1,2,4-trichlorobenzene	3.004	3.667	-22.1	88	0.05
83	naphthalene	7.846	9.362	-19.3	89	0.05
84	1,2,3-trichlorobenzene	3.109	3.496	-12.4	86	0.05
85 C	hexachlorobutadiene	3.358	3.536	-5.3	88	0.05

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317993_Ev2.D
 Acq On : 27 Sep 2021 8:37 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:11:18 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default-ICV-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.558	49	194106	10.000	ppbV	0.00
Standard Area = 227668			Recovery =		85.26%	
33) 1,4-difluorobenzene	11.827	114	592508	10.000	ppbV	0.00
Standard Area = 647621			Recovery =		91.49%	
51) chlorobenzene-D5	16.550	54	91832	10.000	ppbV	0.00
Standard Area = 103400			Recovery =		88.81%	
System Monitoring Compounds						
35) 1,2-dichloroethane-D4	10.442	65	131045	9.108	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		91.08%	
53) toluene-D8	14.658	98	622506	10.313	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		103.13%	
67) bromofluorobenzene	17.917	95	419869	9.922	ppbV	0.00
Spiked Amount 10.000	Range 70 - 130		Recovery =		99.22%	
Target Compounds						Qvalue
2) propylene	3.922	41	51304M6	5.698	ppbV	
3) dichlorodifluoromethane	4.000	85	82611	4.356	ppbV	100
4) chloromethane	4.180	50	40117	4.548	ppbV	99
5) Freon-114	4.312	85	119485	4.628	ppbV	93
6) vinyl chloride	4.438	62	58333	4.702	ppbV	99
7) 1,3-butadiene	4.606	54	48107	4.663	ppbV	90
8) bromomethane	4.924	94	47031	4.524	ppbV	98
9) chloroethane	5.140	64	34500	4.821	ppbV	95
10) ethanol	5.313	31	190310	22.122	ppbV	95
11) vinyl bromide	5.570	106	44735	4.598	ppbV	100
12) acrolein	5.720	56	23473	3.630	ppbV	# 94
13) acetone	5.880	43	376597	21.975	ppbV	90
14) trichlorofluoromethane	6.087	101	84686	4.456	ppbV	99
15) isopropyl alcohol	6.207	45	237526	11.664	ppbV	98
16) acrylonitrile	6.457	53	54585	4.879	ppbV	98
17) 1,1-dichloroethene	6.854	61	88035	4.970	ppbV	98
18) tertiary butyl alcohol	6.926	59	112329	5.123	ppbV	96
19) methylene chloride	7.016	49	68566	4.787	ppbV	92
20) 3-chloropropene	7.160	41	92043	5.552	ppbV	96
21) carbon disulfide	7.310	76	185026	4.505	ppbV	98
22) Freon 113	7.352	101	105929	5.049	ppbV	98
23) trans-1,2-dichloroethene	8.142	61	93319	5.000	ppbV	97
24) 1,1-dichloroethane	8.375	63	112011	5.108	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317993_Ev2.D
 Acq On : 27 Sep 2021 8:37 AM
 Operator : AIRPIANO3:TS
 Sample : CT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:11:18 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default-ICV-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
25) MTBE	8.458	73	158110	4.856	ppbV	95
26) vinyl acetate	8.592	43	122061	4.835	ppbV	99
27) 2-butanone	8.850	43	127016	4.928	ppbV	98
28) cis-1,2-dichloroethene	9.367	61	86409	5.189	ppbV	98
29) Ethyl Acetate	9.667	61	26755	5.757	ppbV	85
30) chloroform	9.725	83	107666	4.724	ppbV	96
31) Tetrahydrofuran	10.167	42	79893	5.025	ppbV	97
32) 1,2-dichloroethane	10.567	62	56341	4.485	ppbV	98
34) hexane	9.633	57	132171	5.061	ppbV	83
36) 1,1,1-trichloroethane	10.858	97	83501	4.476	ppbV	98
37) benzene	11.387	78	230269	4.256	ppbV	100
38) carbon tetrachloride	11.567	117	78406	4.446	ppbV	98
39) cyclohexane	11.707	56	144376	5.055	ppbV	98
40) Dibromomethane	12.307	93	60741	4.348	ppbV #	99
41) 1,2-dichloropropane	12.340	63	82684	4.937	ppbV	97
42) bromodichloromethane	12.573	83	122014	4.714	ppbV	97
43) 1,4-dioxane	12.613	88	59541	5.062	ppbV	98
44) trichloroethene	12.627	130	96492	4.929	ppbV	98
45) 2,2,4-trimethylpentane	12.667	57	431073M6	5.115	ppbV	
46) heptane	12.987	43	142069	4.791	ppbV	96
47) cis-1,3-dichloropropene	14.258	75	87408	4.525	ppbV	99
48) 4-methyl-2-pentanone	13.675	43	160921	4.932	ppbV	92
49) trans-1,3-dichloropropene	13.633	75	113855	5.045	ppbV	99
50) 1,1,2-trichloroethane	14.458	97	82811	5.044	ppbV	95
52) toluene	14.767	91	276821	4.859	ppbV	100
54) 2-hexanone	15.050	43	146725	4.926	ppbV	95
55) dibromochloromethane	15.217	129	121683	5.333	ppbV	99
56) 1,2-dibromoethane	15.467	107	115959	4.836	ppbV	100
57) tetrachloroethene	15.942	166	119950	5.096	ppbV	95
58) 1,1,1,2-tetrachloroethane	16.575	131	81702	4.866	ppbV	99
59) chlorobenzene	16.592	112	213982	4.889	ppbV	95
60) ethylbenzene	16.942	91	340589	5.356	ppbV	97
61) m+p-xylene	17.100	91	553669	10.731	ppbV	95
62) bromoform	17.175	173	117281	5.620	ppbV	100
63) styrene	17.425	104	223733	5.269	ppbV	100
64) 1,1,2,2-tetrachloroethane	17.517	83	206705	5.318	ppbV	100
65) o-xylene	17.517	91	277616	5.342	ppbV	94
66) 1,2,3-Trichloropropane	17.633	75	138117	4.537	ppbV	99
68) isopropylbenzene	18.033	105	331502	4.783	ppbV	94
69) Bromobenzene	18.108	77	192083	4.619	ppbV	94

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\
 Data File : r317993_Ev2.D
 Acq On : 27 Sep 2021 8:37 AM
 Operator : AIRPIAN03:TS
 Sample : CT015-SIMSTD5.0
 Misc : WG1551141
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Sep 27 10:11:18 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\r317985_Ev2.D
 Sub List : Default-ICV-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
70) 4-ethyl toluene	18.583	105	376330	5.194	ppbV	96
71) 1,3,5-trimethylbenzene	18.650	105	315829	5.069	ppbV	95
72) tert-butylbenzene	18.992	119	316709	5.085	ppbV	99
73) 1,2,4-trimethylbenzene	18.992	105	316071	5.253	ppbV	92
74) Benzyl Chloride	19.108	91	230824	6.938	ppbV	100
75) 1,3-dichlorobenzene	19.125	146	211475	5.599	ppbV	99
76) 1,4-dichlorobenzene	19.183	146	211794	5.717	ppbV	94
77) sec-butylbenzene	19.208	105	419406	4.778	ppbV	95
78) p-isopropyltoluene	19.342	119	356072	4.809	ppbV	97
79) 1,2-dichlorobenzene	19.467	146	198239	5.348	ppbV	99
80) n-butylbenzene	19.692	91	349533	5.324	ppbV	96
81) 1,2-dibromo-3-chloropr...	19.842	75	76659	4.913	ppbV	89
82) 1,2,4-trichlorobenzene	20.958	180	168375	6.104	ppbV	99
83) naphthalene	21.067	128	429854	5.966	ppbV	98
84) 1,2,3-trichlorobenzene	21.317	180	160510M6	5.623	ppbV	
85) hexachlorobutadiene	21.383	225	162366	5.266	ppbV	99

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

Sub List : Default-ICV-AP2 - All compounds listed26SIM_I\r317985_Ev2.D

Data Path : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\

Data File : r317993_Ev2.D

Acq On : 27 Sep 2021 8:37 AM

Operator : AIRPIANO3:TS

Sample : CT015-SIMSTD5.0

Misc : WG1551141

ALS Vial : 0 Sample Multiplier: 1

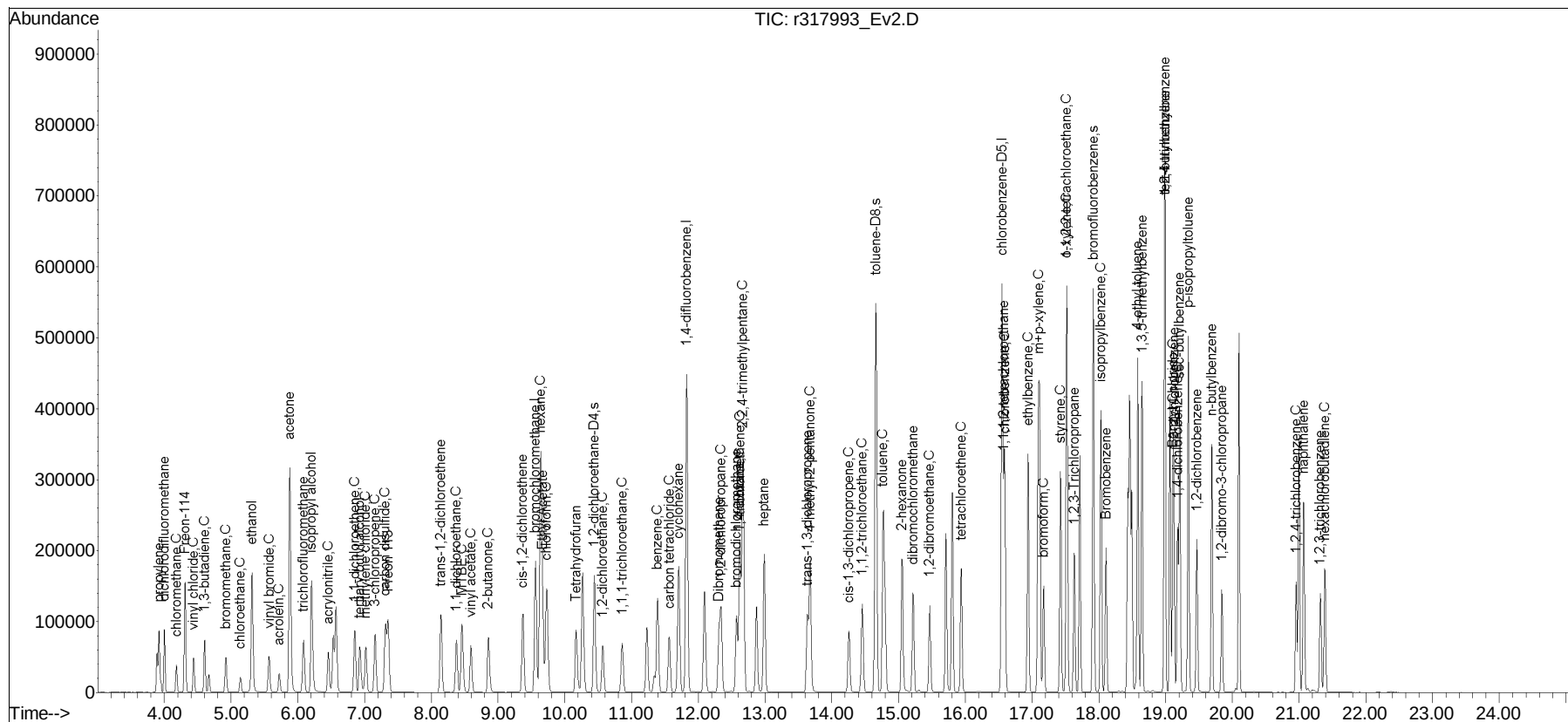
Quant Time: Sep 27 10:11:18 2021

Quant Method : 0:\Forensics\Data\Airpiano3\2021\09\0926SIM_I\TSIM3_210926.M

Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

QLast Update : Mon Sep 27 09:49:21 2021

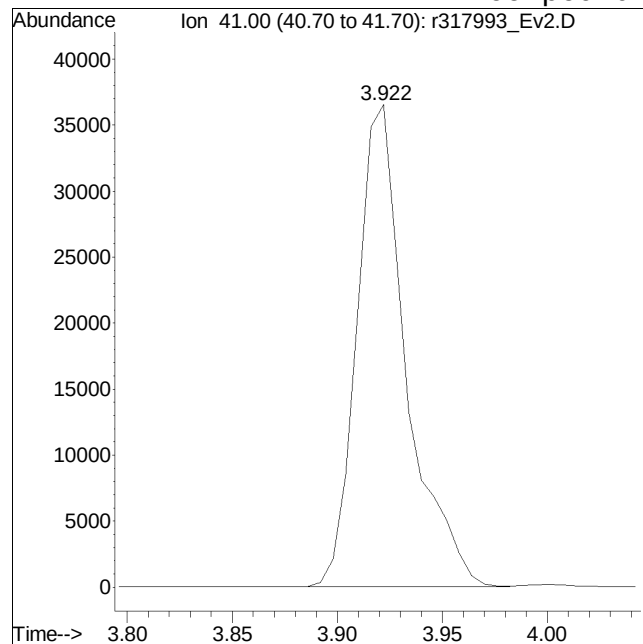
Response via : Initial Calibration



Manual Integration Report

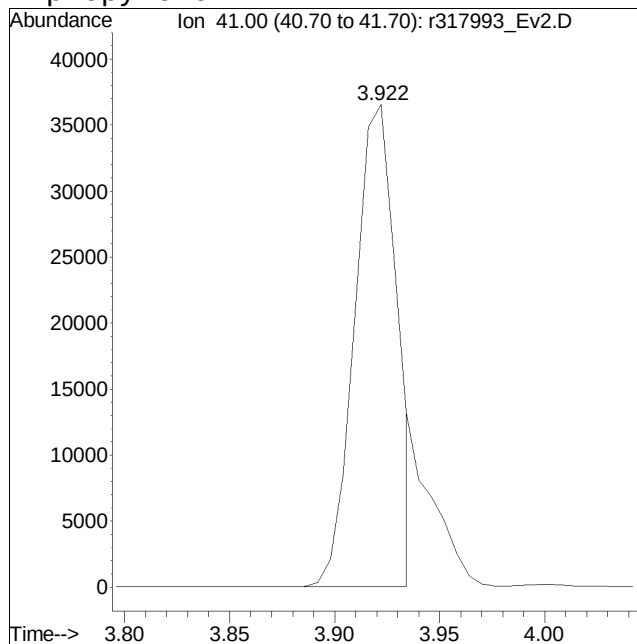
Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317993_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:8: 7 Instrument :
Sample : CT015-SIMSTD5.0 Quant Date : 9/27/2021 10:07 am

Compound #2: propylene



Original Peak Response = 59738

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

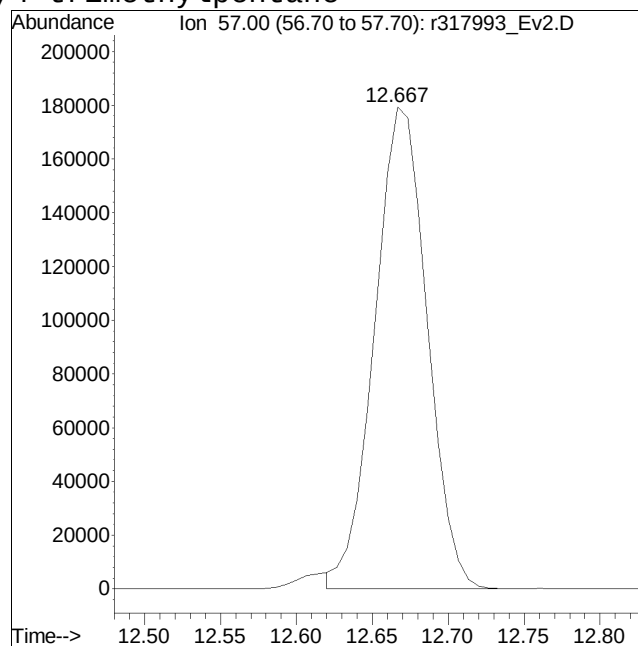
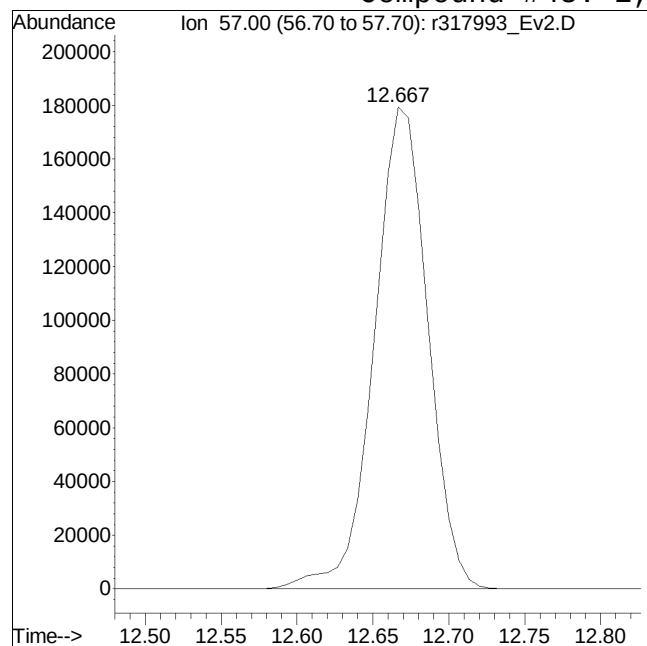


Manual Peak Response = 51304 M6

Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317993_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:8: 7 Instrument :
Sample : CT015-SIMSTD5.0 Quant Date : 9/27/2021 10:07 am

Compound #45: 2,2,4-trimethylpentane



Original Peak Response = 439689

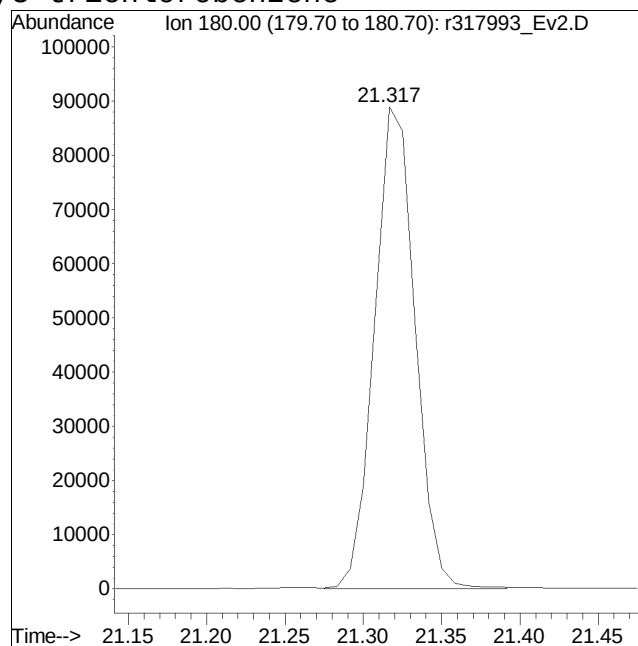
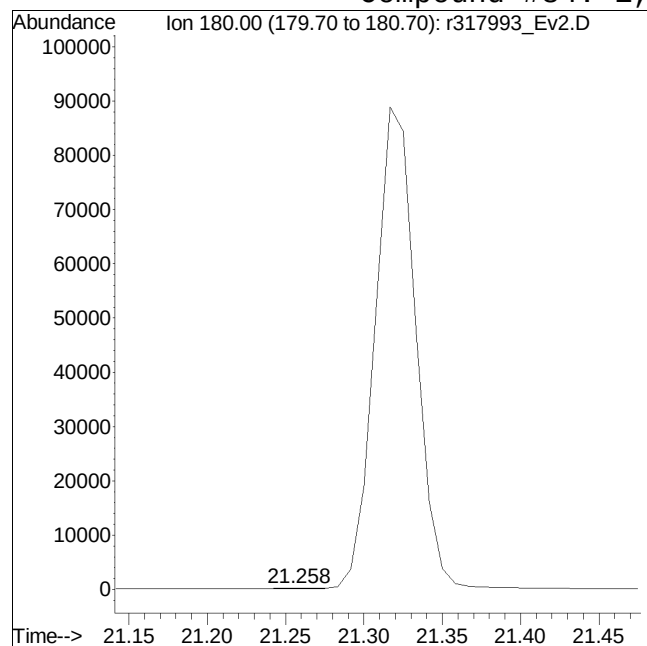
Manual Peak Response = 431073 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Manual Integration Report

Data Path : 0:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r317993_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 9/27/2020 0:8: 7 Instrument :
Sample : CT015-SIMSTD5.0 Quant Date : 9/27/2021 10:07 am

Compound #84: 1,2,3-trichlorobenzene



Original Peak Response = 419

Manual Peak Response = 160510 M6

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).

Continuing Calibration

Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRPIANO3
 Lab File ID : R318225_EV2
 Sample No : WG1555826-2
 Channel :

Lab Number : L2153835
 Project Number : 100849501
 Calibration Date : 10/07/21 13:07
 Init. Calib. Date(s) : 09/26/21 09/26/21
 Init. Calib. Times : 18:04 23:59

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
bromochloromethane	1	1	-	0	30	108	-.04
propylene	0.464	0.487	-	-5	30	116	-.02
dichlorodifluoromethane	0.977	0.867	-	11.3	30	96	-.02
chloromethane	0.454	0.423	-	6.8	30	104	-.03
Freon-114	1.33	1.21	-	9	30	99	-.03
vinyl chloride	0.639	0.552	-	13.6	30	97	-.03
1,3-butadiene	0.532	0.498	-	6.4	30	105	-.04
bromomethane	0.536	0.446	-	16.8	30	98	-.03
chloroethane	0.369	0.276	-	25.2	30	89	-.04
ethanol	0.443	0.39	-	12	30	94	-.03
vinyl bromide	0.501	0.518	-	-3.4	30	113	-.04
acrolein	0.333	0.267	-	19.8	30	93	-.04
acetone	0.883	0.802	-	9.2	30	98	-.04
trichlorofluoromethane	0.979	0.885	-	9.6	30	100	-.04
isopropyl alcohol	1.049	1.022	-	2.6	30	101	-.04
acrylonitrile	0.576	0.497	-	13.7	30	98	-.04
1,1-dichloroethene	0.913	0.769	-	15.8	30	97	-.04
tertiary butyl alcohol	1.13	0.987	-	12.7	30	96	-.04
methylene chloride	0.738	0.714	-	3.3	30	106	-.04
3-chloropropene	0.854	0.869	-	-1.8	30	114	-.04
carbon disulfide	2.116	1.881	-	11.1	30	99	-.04
Freon 113	1.081	1.014	-	6.2	30	104	-.04
trans-1,2-dichloroethene	0.962	0.793	-	17.6	30	95	-.04
1,1-dichloroethane	1.13	0.963	-	14.8	30	100	-.04
MTBE	1.678	1.627	-	3	30	106	-.04
vinyl acetate	1.301	1.253	-	3.7	30	106	-.04
2-butanone	1.328	1.279	-	3.7	30	107	-.04
cis-1,2-dichloroethene	0.858	0.729	-	15	30	99	-.04
Ethyl Acetate	0.239	0.22	-	7.9	30	105	-.04
chloroform	1.174	1.038	-	11.6	30	101	-.03
Tetrahydrofuran	0.819	0.773	-	5.6	30	105	-.04
1,2-dichloroethane	0.647	0.542	-	16.2	30	95	-.04
1,4-difluorobenzene	1	1	-	0	30	104	-.04
hexane	0.441	0.402	-	8.8	30	98	-.04
1,1,1-trichloroethane	0.315	0.291	-	7.6	30	103	-.04
benzene	0.913	0.797	-	12.7	30	100	-.04
carbon tetrachloride	0.298	0.288	-	3.4	30	105	-.03
cyclohexane	0.482	0.438	-	9.1	30	99	-.04
Dibromomethane	0.236	0.193	-	18.2	30	96	-.04
1,2-dichloropropane	0.283	0.25	-	11.7	30	101	-.04
bromodichloromethane	0.437	0.418	-	4.3	30	101	-.03
1,4-dioxane	0.199	0.179	-	10.1	30	99	-.04
trichloroethene	0.33	0.308	-	6.7	30	101	-.03

* Value outside of QC limits.



Calibration Verification Summary

Form 7

Air Volatiles

Client : Langan Engineering & Environmental
 Project Name : 990 ROSSVILLE AVENUE
 Instrument ID : AIRPIANO3
 Lab File ID : R318225_EV2
 Sample No : WG1555826-2
 Channel :

Lab Number : L2153835
 Project Number : 100849501
 Calibration Date : 10/07/21 13:07
 Init. Calib. Date(s) : 09/26/21 09/26/21
 Init. Calib. Times : 18:04 23:59

Compound	Ave. RRF	RRF	Min RRF	%D	Max %D	Area%	Dev(min)
2,2,4-trimethylpentane	1.422	1.332	-	6.3	30	102	-.03
heptane	0.5	0.507	-	-1.4	30	109	-.04
cis-1,3-dichloropropene	0.326	0.324	-	0.6	30	96	-.03
4-methyl-2-pentanone	0.551	0.58	-	-5.3	30	109	-.03
trans-1,3-dichloropropene	0.381	0.411	-	-7.9	30	111	-.04
1,1,2-trichloroethane	0.277	0.266	-	4	30	104	-.03
chlorobenzene-D5	1	1	-	0	30	98	-.03
toluene	6.204	5.641	-	9.1	30	98	-.03
2-hexanone	3.244	3.535	-	-9	30	105	-.03
dibromochloromethane	2.485	2.653	-	-6.8	30	106	-.03
1,2-dibromoethane	2.611	2.755	-	-5.5	30	106	-.03
tetrachloroethene	2.563	2.506	-	2.2	30	101	-.03
1,1,1,2-tetrachloroethane	1.828	1.803	-	1.4	30	99	-.02
chlorobenzene	4.766	4.735	-	0.7	30	103	-.02
ethylbenzene	6.924	6.813	-	1.6	30	98	-.02
m+p-xylene	5.618	5.62	-	-0	30	98	-.03
bromoform	2.273	2.6	-	-14.4	30	108	-.03
styrene	4.624	5.042	-	-9	30	102	-.02
1,1,2,2-tetrachloroethane	4.233	4.321	-	-2.1	30	100	-.02
o-xylene	5.659	5.723	-	-1.1	30	99	-.02
1,2,3-Trichloropropane	3.315	3.286	-	0.9	30	98	-.02
isopropylbenzene	7.547	7.644	-	-1.3	30	101	-.03
Bromobenzene	4.529	4.387	-	3.1	30	97	-.02
4-ethyl toluene	7.89	8.638	-	-9.5	30	102	-.02
1,3,5-trimethylbenzene	6.785	7.296	-	-7.5	30	103	-.02
tert-butylbenzene	6.782	6.56	-	3.3	30	93	0
1,2,4-trimethylbenzene	6.552	7.186	-	-9.7	30	104	0
Benzyl Chloride	3.623	4.725	-	-30.4*	30	100	0
1,3-dichlorobenzene	4.113	4.715	-	-14.6	30	101	0
1,4-dichlorobenzene	4.034	4.719	-	-17	30	103	0
sec-butylbenzene	9.559	9.631	-	-0.8	30	99	0
p-isopropyltoluene	8.063	7.344	-	8.9	30	87	.02
1,2-dichlorobenzene	4.036	4.45	-	-10.3	30	103	.02
n-butylbenzene	7.15	7.111	-	0.5	30	95	.03
1,2-dibromo-3-chloropropan	1.699	1.871	-	-10.1	30	97	.03
1,2,4-trichlorobenzene	3.004	3.669	-	-22.1	30	97	.03
naphthalene	7.846	8.939	-	-13.9	30	94	.03
1,2,3-trichlorobenzene	3.109	3.543	-	-14	30	96	.03
hexachlorobutadiene	3.358	3.528	-	-5.1	30	96	.03

* Value outside of QC limits.



Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-2,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
1 I	bromochloromethane	1.000	1.000	0.0	108	-0.04
2	propylene	0.464	0.487	-5.0	116	-0.02
3	dichlorodifluoromethane	0.977	0.867	11.3	96	-0.02
4 C	chloromethane	0.454	0.423	6.8	104	-0.03
5	Freon-114	1.330	1.210	9.0	99	-0.03
6 C	vinyl chloride	0.639	0.552	13.6	97	-0.03
7 C	1,3-butadiene	0.532	0.498	6.4	105	-0.04
8 C	bromomethane	0.536	0.446	16.8	98	-0.03
9 C	chloroethane	0.369	0.276	25.2	89	-0.04
10	ethanol	0.443	0.390	12.0	94	-0.03
11 C	vinyl bromide	0.501	0.518	-3.4	113	-0.04
12 C	acrolein	0.333	0.267	19.8	93	-0.04
13	acetone	0.883	0.802	9.2	98	-0.04
14	trichlorofluoromethane	0.979	0.885	9.6	100	-0.04
15	isopropyl alcohol	1.049	1.022	2.6	101	-0.04
16 C	acrylonitrile	0.576	0.497	13.7	98	-0.04
17 C	1,1-dichloroethene	0.913	0.769	15.8	97	-0.04
18	tertiary butyl alcohol	1.130	0.987	12.7	96	-0.04
19 C	methylene chloride	0.738	0.714	3.3	106	-0.04
20 C	3-chloropropene	0.854	0.869	-1.8	114	-0.04
21 C	carbon disulfide	2.116	1.881	11.1	99	-0.04
22	Freon 113	1.081	1.014	6.2	104	-0.04
23	trans-1,2-dichloroethene	0.962	0.793	17.6	95	-0.04
24 C	1,1-dichloroethane	1.130	0.963	14.8	100	-0.04
25 C	MTBE	1.678	1.627	3.0	106	-0.04
26 C	vinyl acetate	1.301	1.253	3.7	106	-0.04
27 C	2-butanone	1.328	1.279	3.7	107	-0.04
28	cis-1,2-dichloroethene	0.858	0.729	15.0	99	-0.04
29	Ethyl Acetate	0.239	0.220	7.9	105	-0.04
30 C	chloroform	1.174	1.038	11.6	101	-0.03
31	Tetrahydrofuran	0.819	0.773	5.6	105	-0.04
32 C	1,2-dichloroethane	0.647	0.542	16.2	95	-0.04
33 I	1,4-difluorobenzene	1.000	1.000	0.0	104	-0.04
34 C	hexane	0.441	0.402	8.8	98	-0.04
36 C	1,1,1-trichloroethane	0.315	0.291	7.6	103	-0.04
37 C	benzene	0.913	0.797	12.7	100	-0.04
38 C	carbon tetrachloride	0.298	0.288	3.4	105	-0.03
39	cyclohexane	0.482	0.438	9.1	99	-0.04

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-2,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
40	Dibromomethane	0.236	0.193	18.2	96	-0.04
41 C	1,2-dichloropropane	0.283	0.250	11.7	101	-0.04
42	bromodichloromethane	0.437	0.418	4.3	101	-0.03
43 C	1,4-dioxane	0.199	0.179	10.1	99	-0.04
44 C	trichloroethene	0.330	0.308	6.7	101	-0.03
45 C	2,2,4-trimethylpentane	1.422	1.332	6.3	102	-0.03
46	heptane	0.500	0.507	-1.4	109	-0.04
47 C	cis-1,3-dichloropropene	0.326	0.324	0.6	96	-0.03
48 C	4-methyl-2-pentanone	0.551	0.580	-5.3	109	-0.03
49	trans-1,3-dichloropropene	0.381	0.411	-7.9	111	-0.04
50 C	1,1,2-trichloroethane	0.277	0.266	4.0	104	-0.03
51 I	chlorobenzene-D5	1.000	1.000	0.0	98	-0.03
52 C	toluene	6.204	5.641	9.1	98	-0.03
54	2-hexanone	3.244	3.535	-9.0	105	-0.03
55	dibromochloromethane	2.485	2.653	-6.8	106	-0.03
56 C	1,2-dibromoethane	2.611	2.755	-5.5	106	-0.03
57 C	tetrachloroethene	2.563	2.506	2.2	101	-0.03
58	1,1,1,2-tetrachloroethane	1.828	1.803	1.4	99	-0.02
59 C	chlorobenzene	4.766	4.735	0.7	103	-0.02
60 C	ethylbenzene	6.924	6.813	1.6	98	-0.02
61 C	m+p-xylene	5.618	5.620	-0.0	98	-0.03
62 C	bromoforn	2.273	2.600	-14.4	108	-0.03
63 C	styrene	4.624	5.042	-9.0	102	-0.02
64 C	1,1,2,2-tetrachloroethane	4.233	4.321	-2.1	100	-0.02
65 C	o-xylene	5.659	5.723	-1.1	99	-0.02
66	1,2,3-Trichloropropane	3.315	3.286	0.9	98	-0.02
68 C	isopropylbenzene	7.547	7.644	-1.3	101	-0.03
69	Bromobenzene	4.529	4.387	3.1	97	-0.02
70	4-ethyl toluene	7.890	8.638	-9.5	102	-0.02
71	1,3,5-trimethylbenzene	6.785	7.296	-7.5	103	-0.02
72	tert-butylbenzene	6.782	6.560	3.3	93	0.00
73	1,2,4-trimethylbenzene	6.552	7.186	-9.7	104	0.00
74 C	Benzyl Chloride	3.623	4.725	-30.4#	100	0.00
75	1,3-dichlorobenzene	4.113	4.715	-14.6	101	0.00
76 C	1,4-dichlorobenzene	4.034	4.719	-17.0	103	0.00
77	sec-butylbenzene	9.559	9.631	-0.8	99	0.00
78	p-isopropyltoluene	8.063	7.344	8.9	87	0.02
79	1,2-dichlorobenzene	4.036	4.450	-10.3	103	0.02

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-2,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	AvgRF	CCRF	%Dev	Area%	Dev(min)
80	n-butylbenzene	7.150	7.111	0.5	95	0.03
81	1,2-dibromo-3-chloropropane	1.699	1.871	-10.1	97	0.03
82 C	1,2,4-trichlorobenzene	3.004	3.669	-22.1	97	0.03
83	naphthalene	7.846	8.939	-13.9	94	0.03
84	1,2,3-trichlorobenzene	3.109	3.543	-14.0	96	0.03
85 C	hexachlorobutadiene	3.358	3.528	-5.1	96	0.03

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-2,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.53	49	244850	10.000	ppbV	-0.04
Standard Area = 244850			Recovery = 100.00%			
33) 1,4-difluorobenzene	11.79	114	676518	10.000	ppbV	-0.04
Standard Area = 676518			Recovery = 100.00%			
51) chlorobenzene-D5	16.52	54	100891	10.000	ppbV	-0.03
Standard Area = 100891			Recovery = 100.00%			

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
2) propylene	3.90	41	59592M6	5.247	ppbV	
3) dichlorodifluoromethane	3.98	85	106131	4.436	ppbV	100
4) chloromethane	4.16	50	51767	4.652	ppbV	98
5) Freon-114	4.28	85	148155	4.549	ppbV	98
6) vinyl chloride	4.41	62	67545	4.316	ppbV	100
7) 1,3-butadiene	4.58	54	60969	4.685	ppbV	99
8) bromomethane	4.89	94	54660	4.168	ppbV	100
9) chloroethane	5.11	64	33850	3.750	ppbV	96
10) ethanol	5.28	31	238467	21.975	ppbV	96
11) vinyl bromide	5.54	106	63427	5.169	ppbV	98
12) acrolein	5.69	56	32722	4.012	ppbV	99
13) acetone	5.85	43	490870	22.707	ppbV	95
14) trichlorofluoromethane	6.05	101	108361	4.520	ppbV	99
15) isopropyl alcohol	6.17	45	312813	12.178	ppbV	99
16) acrylonitrile	6.42	53	60820	4.309	ppbV	99
17) 1,1-dichloroethene	6.82	61	94097	4.211	ppbV	98
18) tertiary butyl alcohol	6.89	59	120871	4.370	ppbV	96
19) methylene chloride	6.99	49	87408	4.837	ppbV	98
20) 3-chloropropene	7.12	41	106341	5.085	ppbV	97
21) carbon disulfide	7.28	76	230277	4.444	ppbV	100
22) Freon 113	7.32	101	124182	4.692	ppbV	97
23) trans-1,2-dichloroethene	8.11	61	97048	4.122	ppbV	99
24) 1,1-dichloroethane	8.34	63	117942	4.264	ppbV	100
25) MTBE	8.43	73	199167	4.849	ppbV	98
26) vinyl acetate	8.56	43	153352	4.816	ppbV	96
27) 2-butanone	8.82	43	156587	4.816	ppbV	97
28) cis-1,2-dichloroethene	9.33	61	89288	4.250	ppbV	98
29) Ethyl Acetate	9.63	61	26908	4.590	ppbV	79
30) chloroform	9.69	83	127043	4.419	ppbV	100

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-2,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
31) Tetrahydrofuran	10.13	42	94653	4.720	ppbV	97
32) 1,2-dichloroethane	10.53	62	66361	4.188	ppbV	97
34) hexane	9.60	57	136121	4.565	ppbV	98
36) 1,1,1-trichloroethane	10.82	97	98429	4.621	ppbV	99
37) benzene	11.35	78	269687	4.365	ppbV	99
38) carbon tetrachloride	11.53	117	97465	4.840	ppbV	98
39) cyclohexane	11.67	56	148032	4.540	ppbV	98
40) Dibromomethane	12.27	93	65380	4.099	ppbV #	97
41) 1,2-dichloropropane	12.31	63	84665	4.427	ppbV	100
42) bromodichloromethane	12.54	83	141380	4.784	ppbV	99
43) 1,4-dioxane	12.58	88	60617	4.513	ppbV	98
44) trichloroethene	12.59	130	104142	4.659	ppbV	97
45) 2,2,4-trimethylpentane	12.64	57	450512	4.682	ppbV	98
46) heptane	12.95	43	171375	5.061	ppbV	94
47) cis-1,3-dichloropropene	14.23	75	109642	4.971	ppbV	98
48) 4-methyl-2-pentanone	13.64	43	196064	5.262	ppbV	96
49) trans-1,3-dichloropropene	13.60	75	138862	5.389	ppbV	99
50) 1,1,2-trichloroethane	14.43	97	90066	4.804	ppbV	96
52) toluene	14.74	91	284557	4.546	ppbV	100
54) 2-hexanone	15.03	43	178324	5.449	ppbV	91
55) dibromochloromethane	15.19	129	133826	5.339	ppbV	99
56) 1,2-dibromoethane	15.44	107	138966	5.276	ppbV	99
57) tetrachloroethene	15.92	166	126419	4.888	ppbV	99
58) 1,1,1,2-tetrachloroethane	16.56	131	90945	4.930	ppbV	98
59) chlorobenzene	16.57	112	238846	4.967	ppbV	98
60) ethylbenzene	16.92	91	343710	4.920	ppbV	97
61) m+p-xylene	17.08	91	566974	10.003	ppbV	96
62) bromoform	17.15	173	131157	5.720	ppbV	99
63) styrene	17.41	104	254324	5.452	ppbV	99
64) 1,1,2,2-tetrachloroethane	17.50	83	217952	5.104	ppbV	99
65) o-xylene	17.50	91	288712	5.057	ppbV	97
66) 1,2,3-Trichloropropane	17.62	75	165762	4.956	ppbV	99
68) isopropylbenzene	18.01	105	385581	5.064	ppbV	97
69) Bromobenzene	18.09	77	221286	4.843	ppbV	99
70) 4-ethyl toluene	18.57	105	435760	5.474	ppbV	98
71) 1,3,5-trimethylbenzene	18.63	105	368061	5.377	ppbV	97
72) tert-butylbenzene	18.98	119	330924	4.836	ppbV	96
73) 1,2,4-trimethylbenzene	18.98	105	362524	5.484	ppbV	92
74) Benzyl Chloride	19.09	91	238357	6.521	ppbV	99
75) 1,3-dichlorobenzene	19.11	146	237841	5.732	ppbV	98

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-2,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D
 Sub List : Default-LCS-AP2 - All compounds listed

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
76) 1,4-dichlorobenzene	19.17	146	238035	5.849	ppbV	95
77) sec-butylbenzene	19.19	105	485825	5.037	ppbV	94
78) p-isopropyltoluene	19.32	119	370466	4.554	ppbV	93
79) 1,2-dichlorobenzene	19.45	146	224489	5.513	ppbV	98
80) n-butylbenzene	19.68	91	358717	4.973	ppbV	99
81) 1,2-dibromo-3-chloropr...	19.82	75	94374	5.505	ppbV	98
82) 1,2,4-trichlorobenzene	20.94	180	185068	6.107	ppbV	99
83) naphthalene	21.05	128	450940	5.696	ppbV	100
84) 1,2,3-trichlorobenzene	21.30	180	178738	5.699	ppbV	98
85) hexachlorobutadiene	21.37	225	177980	5.254	ppbV	98

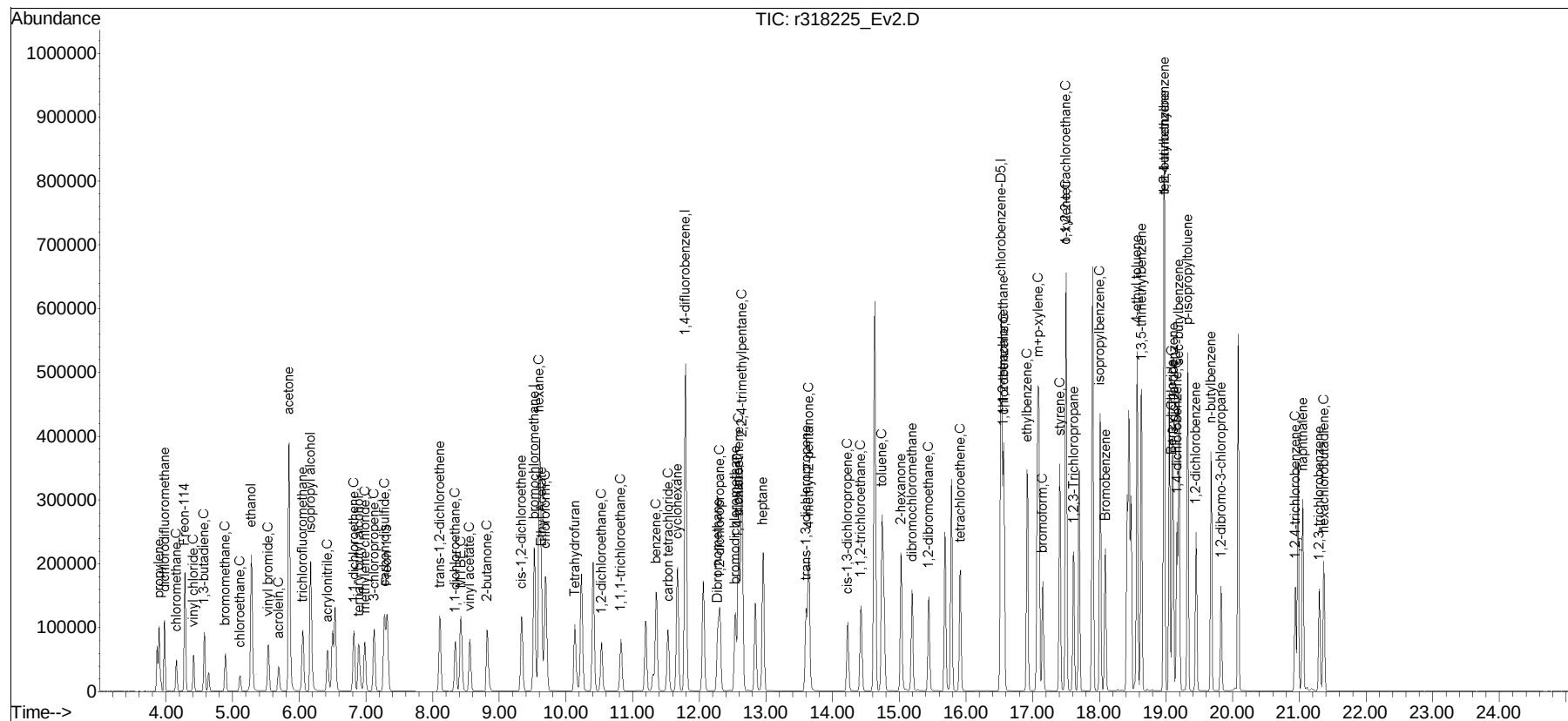
(#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIANO3:RY
 Sample : WG1555826-2,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

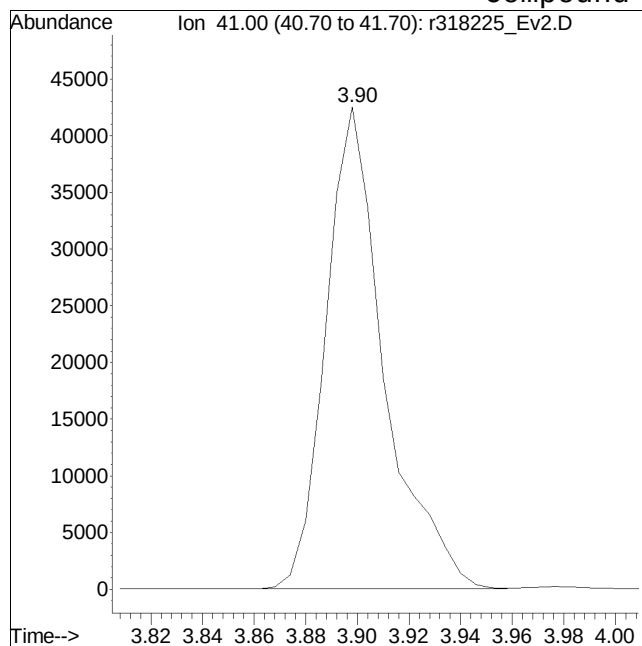
Sub List : Default-LCS-AP2 - All compounds listed07SIM\r318225_Ev2.D



Manual Integration/Negative Proof Report

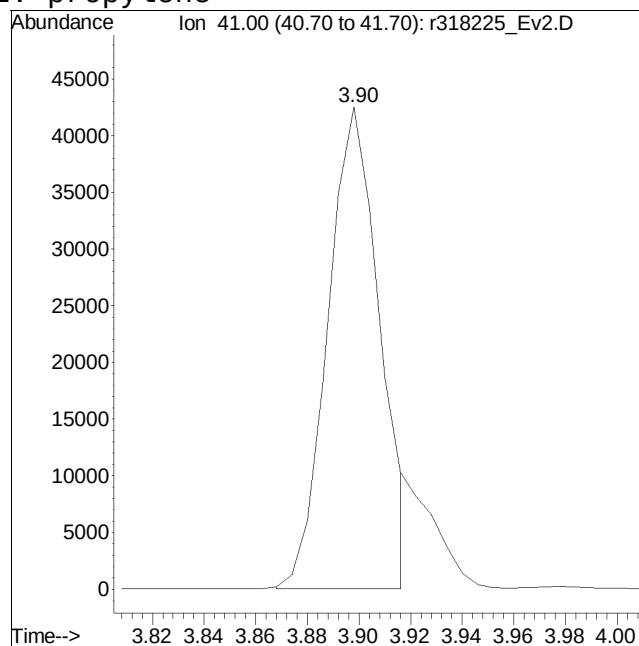
Data Path : 0:\Forensics\Data\Airpiano3QMethod : TSIM3_210926.M
Data File : r318225_Ev2.D Operator : AIRPIAN03:RY
Date Inj'd : 10/7/2020 0:1: 7 Instrument :
Sample : WG1555826-2, 3, 250, 250 Quant Date : 10/7/2021 1:59 pm

Compound #2: propylene



Original Peak Response = 66967

M6 = Misassignment of peak valley by automated integration (poor split of 2 peaks).



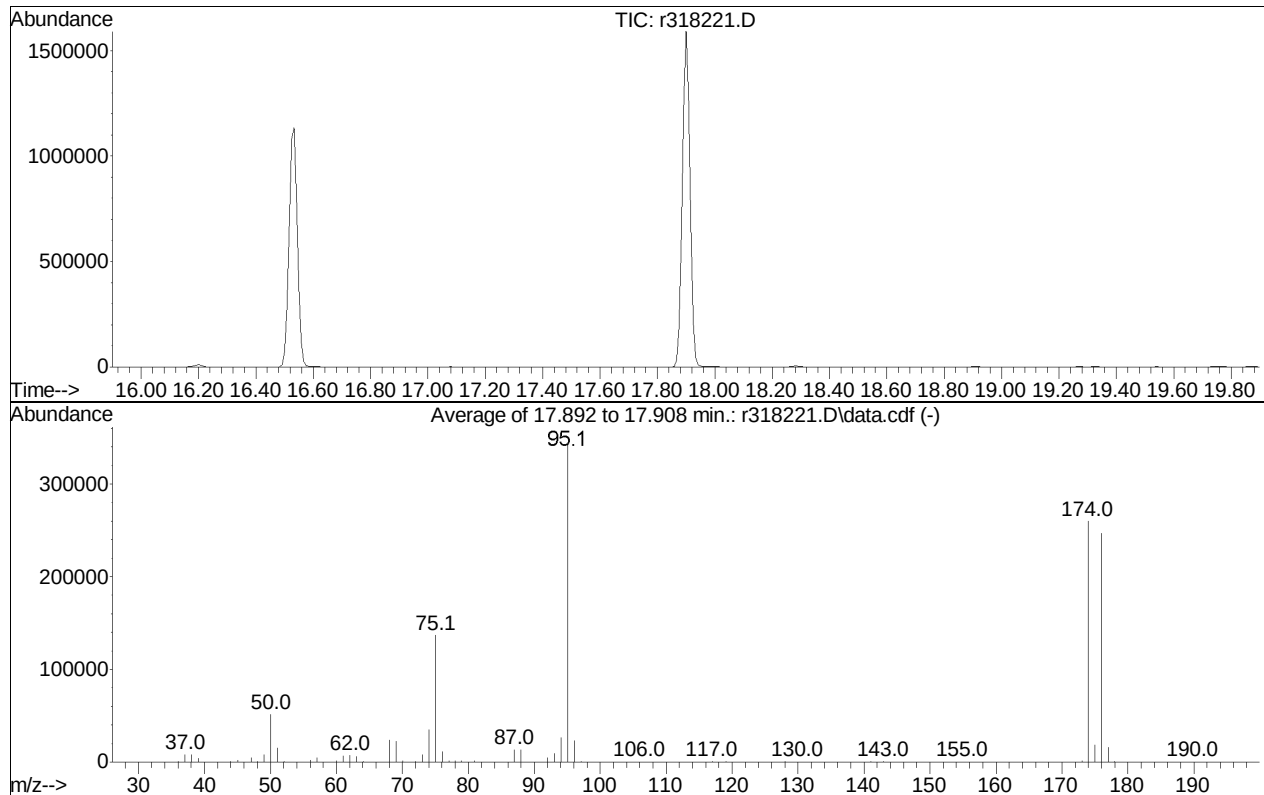
Manual Peak Response = 59592 M6

BFB

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318221.D
 Acq On : 7 Oct 2021 10:25 AM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-1,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Integration File: rteint.p

Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Title : T0-14A/T0-15 SIM/Full Scan Analysis
 Last Update : Mon Sep 27 09:51:29 2021



Spectrum Information: Average of 17.892 to 17.908 min.

Target Mass	Rel. to Mass	Lower Limit%	Upper Limit%	Rel. Abn%	Raw Abn	Result Pass/Fail
50	95	8	40	14.9	51187	PASS
75	95	30	66	39.8	137269	PASS
95	95	100	100	100.0	344572	PASS
96	95	5	9	6.7	22927	PASS
173	174	0.00	2	0.5	1425	PASS
174	95	50	120	75.5	260230	PASS
175	174	4	9	7.0	18295	PASS
176	174	93	101	94.8	246728	PASS
177	176	5	9	6.6	16162	PASS

Volatiles Raw QC Data

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318227_Ev2.D
 Acq On : 7 Oct 2021 3:42 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-4,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 16:19:40 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.53	49	233671	10.000	ppbV	-0.03
Standard Area = 244850			Recovery =		95.43%	
33) 1,4-difluorobenzene	11.80	114	620988	10.000	ppbV	-0.03
Standard Area = 676518			Recovery =		91.79%	
51) chlorobenzene-D5	16.50	54	95224	10.000	ppbV	-0.05
Standard Area = 100891			Recovery =		94.38%	

System Monitoring Compounds

Target Compounds			Qvalue
6) vinyl chloride	0.00	0	N.D.
17) 1,1-dichloroethene	0.00	0	N.D.
28) cis-1,2-dichloroethene	0.00	0	N.D.
36) 1,1,1-trichloroethane	0.00	0	N.D.
38) carbon tetrachloride	11.51	0	N.D.
44) trichloroethene	0.00	0	N.D.
57) tetrachloroethene	15.91	0	N.D.

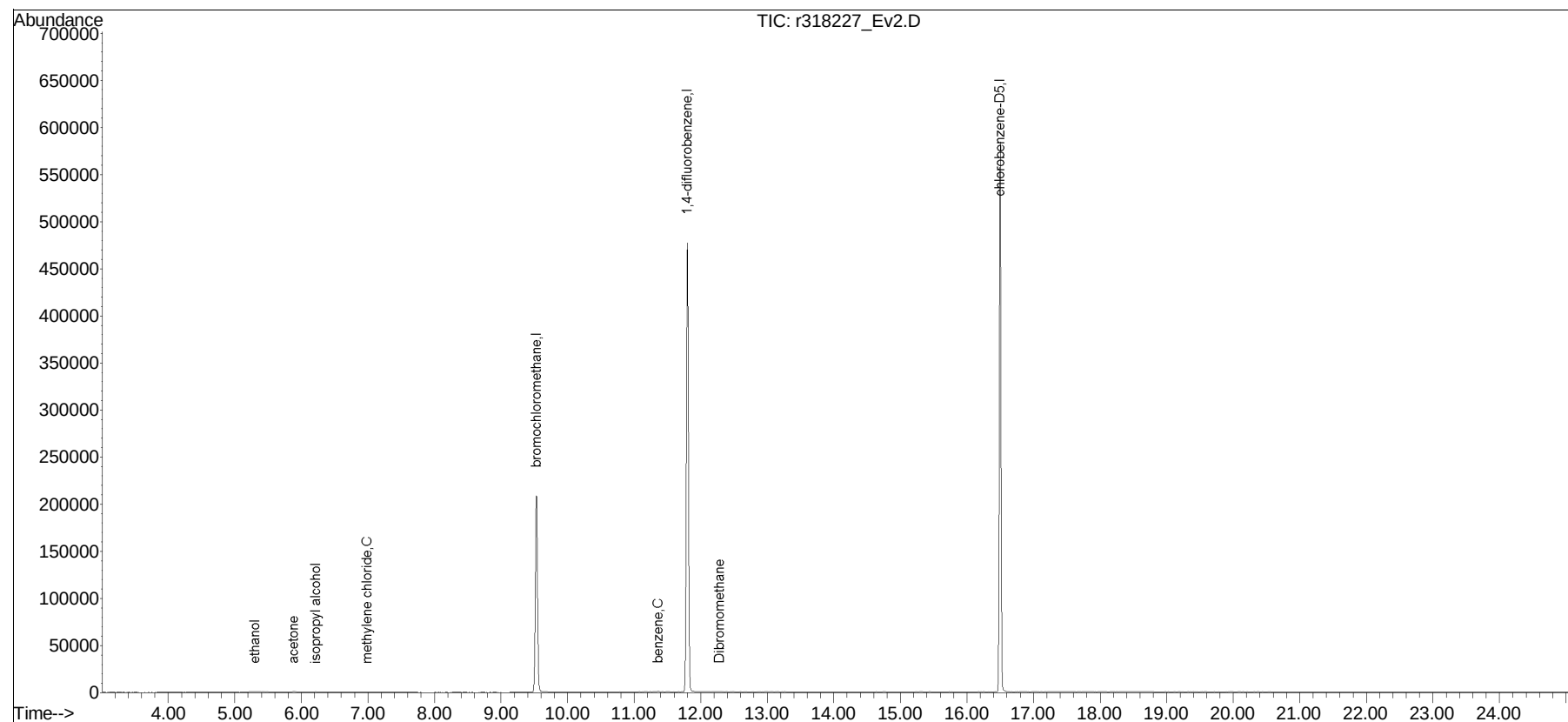
 (#) = qualifier out of range (m) = manual integration (+) = signals summed

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
Data File : r318227_Ev2.D
Acq On : 7 Oct 2021 3:42 PM
Operator : AIRPIANO3:RY
Sample : WG1555826-4,3,250,250
Misc : WG1555826,ICAL18332
ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 08 16:19:40 2021
Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
QLast Update : Mon Sep 27 09:49:21 2021
Response via : Initial Calibration

Sub List : Default-LCS-AP2 - All compounds listed07SIM\r318225_Ev2.D



Manual Integration/Negative Proof Report

Data Path	: O:\Forensics\Data\Airpiano3Q	Method	: TSIM3_210926.M
Data File	: r318227_Ev2.D	Operator	: AIRPIAN03:RY
Date Inj'd	: 10/7/2020 0:3: 2	Instrument	:
Sample	: WG1555826-4,3,250,250	Quant Date	: 10/8/2021 4:15 pm

There are no manual integrations or false positives in this file.

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-3,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
1 I	bromochloromethane	10.000	10.000	0.0	108	-0.04
2	propylene	5.000	5.247	-4.9	116	-0.02
3	dichlorodifluoromethane	5.000	4.436	11.3	96	-0.02
4 C	chloromethane	5.000	4.652	7.0	104	-0.03
5	Freon-114	5.000	4.549	9.0	99	-0.03
6 C	vinyl chloride	5.000	4.316	13.7	97	-0.03
7 C	1,3-butadiene	5.000	4.685	6.3	105	-0.04
8 C	bromomethane	5.000	4.168	16.6	98	-0.03
9 C	chloroethane	5.000	3.750	25.0	89	-0.04
10	ethanol	25.000	21.975	12.1	94	-0.03
11 C	vinyl bromide	5.000	5.169	-3.4	113	-0.04
12 C	acrolein	5.000	4.012	19.8	93	-0.04
13	acetone	25.000	22.707	9.2	98	-0.04
14	trichlorofluoromethane	5.000	4.520	9.6	100	-0.04
15	isopropyl alcohol	12.500	12.178	2.6	101	-0.04
16 C	acrylonitrile	5.000	4.309	13.8	98	-0.04
17 C	1,1-dichloroethene	5.000	4.211	15.8	97	-0.04
18	tertiary butyl alcohol	5.000	4.370	12.6	96	-0.04
19 C	methylene chloride	5.000	4.837	3.3	106	-0.04
20 C	3-chloropropene	5.000	5.085	-1.7	114	-0.04
21 C	carbon disulfide	5.000	4.444	11.1	99	-0.04
22	Freon 113	5.000	4.692	6.2	104	-0.04
23	trans-1,2-dichloroethene	5.000	4.122	17.6	95	-0.04
24 C	1,1-dichloroethane	5.000	4.264	14.7	100	-0.04
25 C	MTBE	5.000	4.849	3.0	106	-0.04
26 C	vinyl acetate	5.000	4.816	3.7	106	-0.04
27 C	2-butanone	5.000	4.816	3.7	107	-0.04
28	cis-1,2-dichloroethene	5.000	4.250	15.0	99	-0.04
29	Ethyl Acetate	5.000	4.590	8.2	105	-0.04
30 C	chloroform	5.000	4.419	11.6	101	-0.03
31	Tetrahydrofuran	5.000	4.720	5.6	105	-0.04
32 C	1,2-dichloroethane	5.000	4.188	16.2	95	-0.04
33 I	1,4-difluorobenzene	10.000	10.000	0.0	104	-0.04
34 C	hexane	5.000	4.565	8.7	98	-0.04
36 C	1,1,1-trichloroethane	5.000	4.621	7.6	103	-0.04
37 C	benzene	5.000	4.365	12.7	100	-0.04
38 C	carbon tetrachloride	5.000	4.840	3.2	105	-0.03
39	cyclohexane	5.000	4.540	9.2	99	-0.04

TSIM3_210926.M Fri Oct 08 16:21:01 2021

1

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-3,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
40	Dibromomethane	5.000	4.099	18.0	96	-0.04
41 C	1,2-dichloropropane	5.000	4.427	11.5	101	-0.04
42	bromodichloromethane	5.000	4.784	4.3	101	-0.03
43 C	1,4-dioxane	5.000	4.513	9.7	99	-0.04
44 C	trichloroethene	5.000	4.659	6.8	101	-0.03
45 C	2,2,4-trimethylpentane	5.000	4.682	6.4	102	-0.03
46	heptane	5.000	5.061	-1.2	109	-0.04
47 C	cis-1,3-dichloropropene	5.000	4.971	0.6	96	-0.03
48 C	4-methyl-2-pentanone	5.000	5.262	-5.2	109	-0.03
49	trans-1,3-dichloropropene	5.000	5.389	-7.8	111	-0.04
50 C	1,1,2-trichloroethane	5.000	4.804	3.9	104	-0.03
51 I	chlorobenzene-D5	10.000	10.000	0.0	98	-0.03
52 C	toluene	5.000	4.546	9.1	98	-0.03
54	2-hexanone	5.000	5.449	-9.0	105	-0.03
55	dibromochloromethane	5.000	5.339	-6.8	106	-0.03
56 C	1,2-dibromoethane	5.000	5.276	-5.5	106	-0.03
57 C	tetrachloroethene	5.000	4.888	2.2	101	-0.03
58	1,1,1,2-tetrachloroethane	5.000	4.930	1.4	99	-0.02
59 C	chlorobenzene	5.000	4.967	0.7	103	-0.02
60 C	ethylbenzene	5.000	4.920	1.6	98	-0.02
61 C	m+p-xylene	10.000	10.003	-0.0	98	-0.03
62 C	bromofom	5.000	5.720	-14.4	108	-0.03
63 C	styrene	5.000	5.452	-9.0	102	-0.02
64 C	1,1,2,2-tetrachloroethane	5.000	5.104	-2.1	100	-0.02
65 C	o-xylene	5.000	5.057	-1.1	99	-0.02
66	1,2,3-Trichloropropane	5.000	4.956	0.9	98	-0.02
68 C	isopropylbenzene	5.000	5.064	-1.3	101	-0.03
69	Bromobenzene	5.000	4.843	3.1	97	-0.02
70	4-ethyl toluene	5.000	5.474	-9.5	102	-0.02
71	1,3,5-trimethylbenzene	5.000	5.377	-7.5	103	-0.02
72	tert-butylbenzene	5.000	4.836	3.3	93	0.00
73	1,2,4-trimethylbenzene	5.000	5.484	-9.7	104	0.00
74 C	Benzyl Chloride	5.000	6.521	-30.4#	100	0.00
75	1,3-dichlorobenzene	5.000	5.732	-14.6	101	0.00
76 C	1,4-dichlorobenzene	5.000	5.849	-17.0	103	0.00
77	sec-butylbenzene	5.000	5.037	-0.7	99	0.00
78	p-isopropyltoluene	5.000	4.554	8.9	87	0.02
79	1,2-dichlorobenzene	5.000	5.513	-10.3	103	0.02

Evaluate Continuing Calibration Report

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-3,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

Min. RRF : 0.000 Min. Rel. Area : 60% Max. R.T. Dev 0.33min
 Max. RRF Dev : 30% Max. Rel. Area : 140%

	Compound	Amount	Calc.	%Dev	Area%	Dev(min)
80	n-butylbenzene	5.000	4.973	0.5	95	0.03
81	1,2-dibromo-3-chloropropane	5.000	5.505	-10.1	97	0.03
82 C	1,2,4-trichlorobenzene	5.000	6.107	-22.1	97	0.03
83	naphthalene	5.000	5.696	-13.9	94	0.03
84	1,2,3-trichlorobenzene	5.000	5.699	-14.0	96	0.03
85 C	hexachlorobutadiene	5.000	5.254	-5.1	96	0.03

* Evaluation of CC level amount vs concentration.
 (#) = Out of Range SPCC's out = 0 CCC's out = 1

Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIAN03:RY
 Sample : WG1555826-3,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : TO-14A/TO-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D
 Sub List : Default-LCS-AP2 - All compounds listed

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

Internal Standards						
1) bromochloromethane	9.53	49	244850	10.000	ppbV	-0.04
Standard Area = 244850			Recovery	=	100.00%	
33) 1,4-difluorobenzene	11.79	114	676518	10.000	ppbV	-0.04
Standard Area = 676518			Recovery	=	100.00%	
51) chlorobenzene-D5	16.52	54	100891	10.000	ppbV	-0.03
Standard Area = 100891			Recovery	=	100.00%	

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
6) vinyl chloride	4.41	62	67545	4.316	ppbV	100
17) 1,1-dichloroethene	6.82	61	94097	4.211	ppbV	98
28) cis-1,2-dichloroethene	9.33	61	89288	4.250	ppbV	98
36) 1,1,1-trichloroethane	10.82	97	98429	4.621	ppbV	99
38) carbon tetrachloride	11.53	117	97465	4.840	ppbV	98
44) trichloroethene	12.59	130	104142	4.659	ppbV	97
57) tetrachloroethene	15.92	166	126419	4.888	ppbV	99

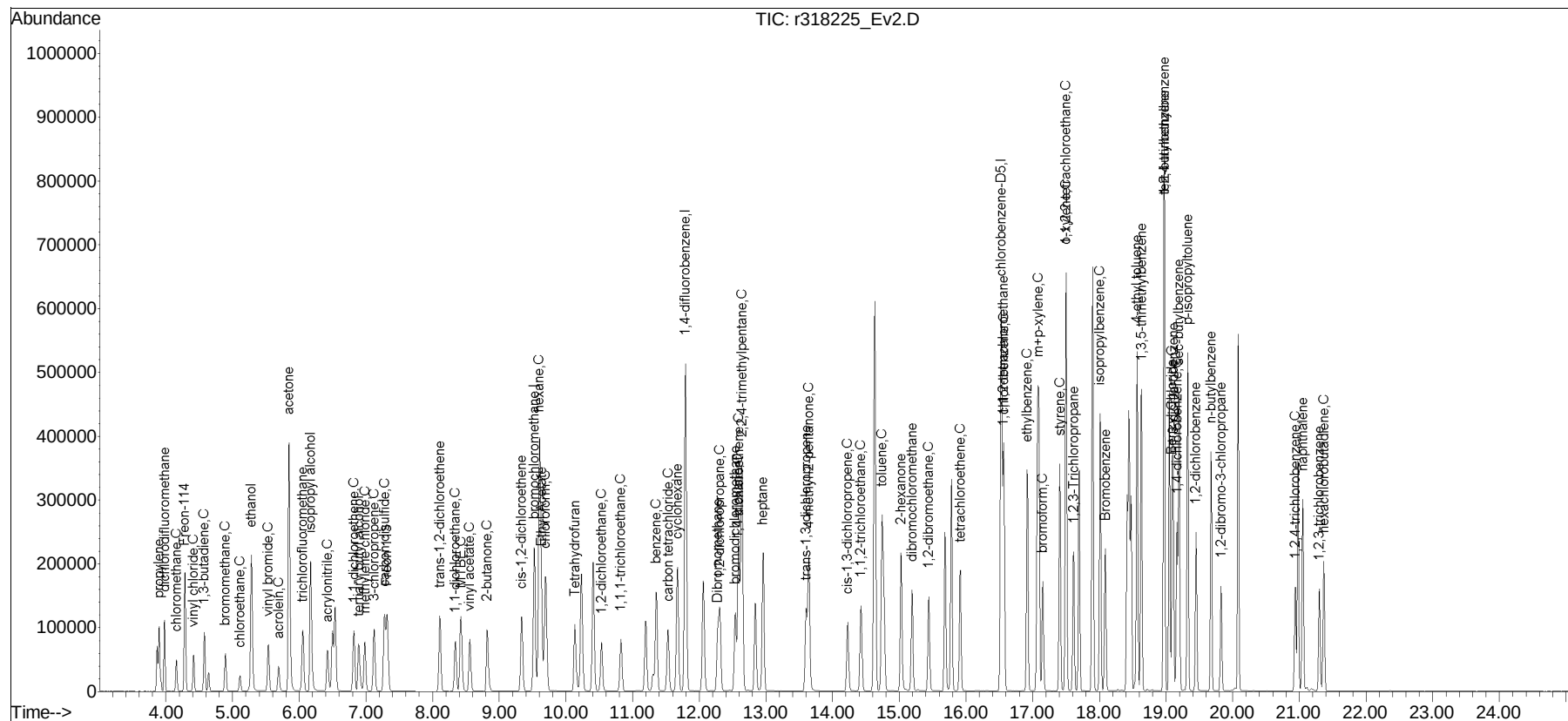
 (#) = qualifier out of range (m) = manual integration (+) = signals summed

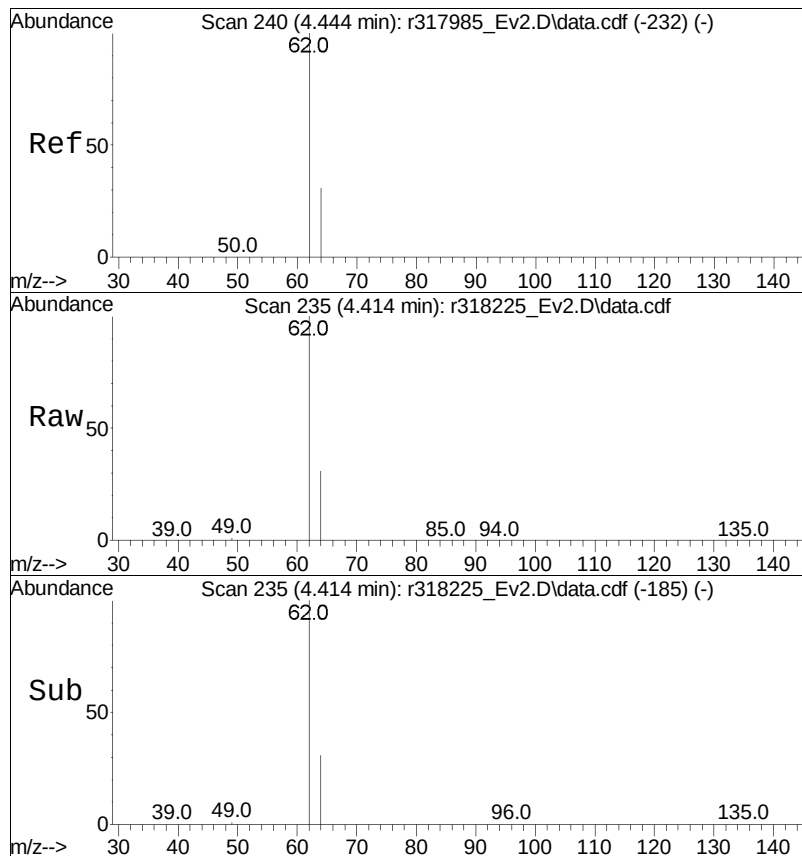
Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318225_Ev2.D
 Acq On : 7 Oct 2021 1:07 PM
 Operator : AIRPIANO3:RY
 Sample : WG1555826-3,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 07 13:59:34 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

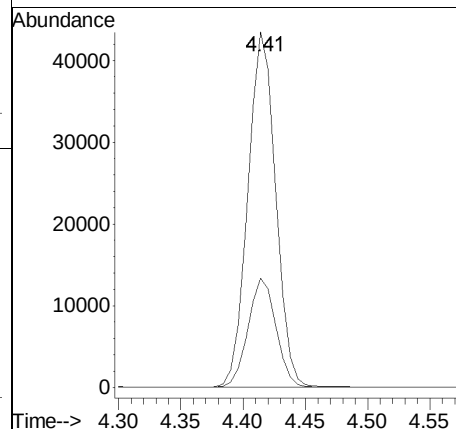
Sub List : Default-LCS-AP2 - All compounds listed07SIM\r318225_Ev2.D

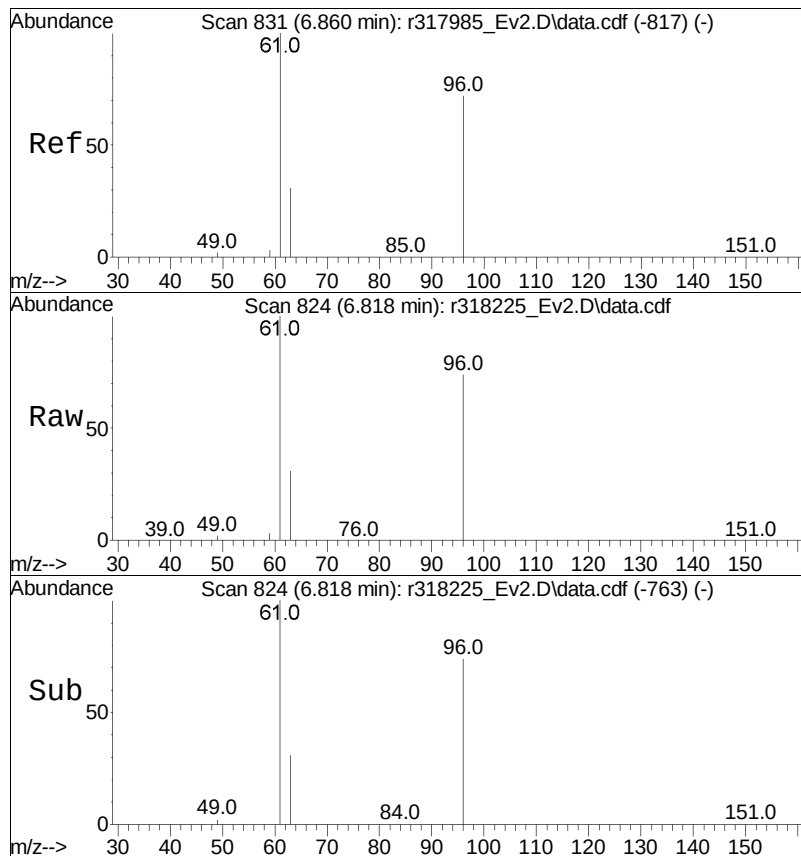




#6
 vinyl chloride
 Concen: 4.32 ppbV
 RT: 4.41 min Scan# 235
 Delta R.T. -0.030 min
 Lab File: r318225_Ev2.D
 Acq: 7 Oct 2021 1:07 PM

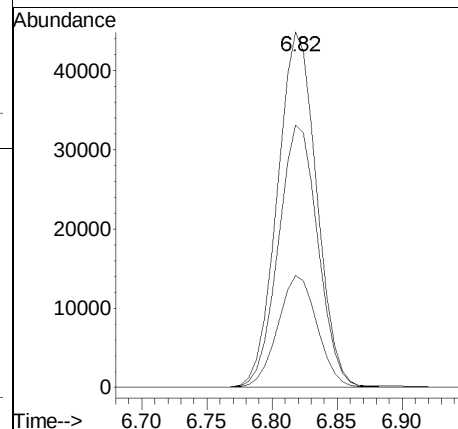
Tgt	Ion	Ratio	Lower	Upper
62	100			
64	30.8	24.6	37.0	

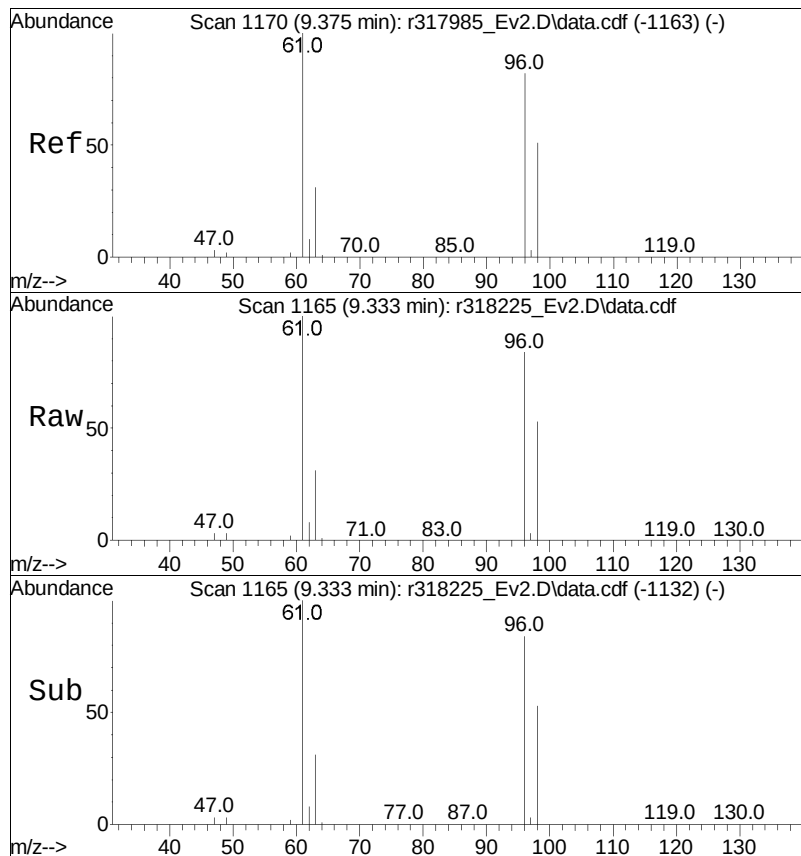




#17
 1,1-dichloroethene
 Concen: 4.21 ppbV
 RT: 6.82 min Scan# 824
 Delta R.T. -0.042 min
 Lab File: r318225_Ev2.D
 Acq: 7 Oct 2021 1:07 PM

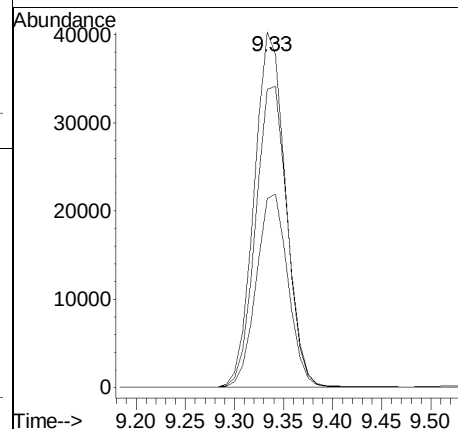
Tgt Ion:	61	Resp:	94097
Ion Ratio	Lower	Upper	
61	100		
96	73.8	57.8	86.6
63	31.5	24.8	37.2

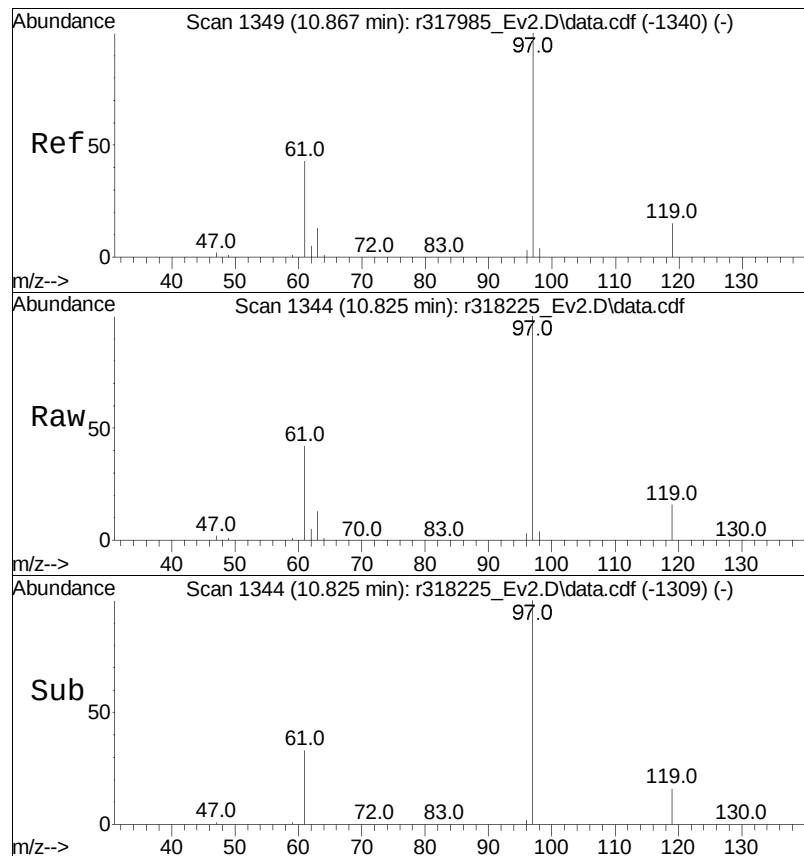




#28
 cis-1,2-dichloroethene
 Concen: 4.25 ppbV
 RT: 9.33 min Scan# 1165
 Delta R.T. -0.042 min
 Lab File: r318225_Ev2.D
 Acq: 7 Oct 2021 1:07 PM

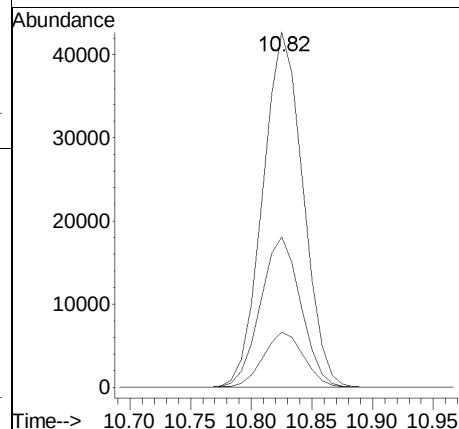
Tgt Ion:	61	Resp:	89288
Ion Ratio	Lower	Upper	
61	100		
96	83.9	65.8	98.8
98	53.1	41.2	61.8

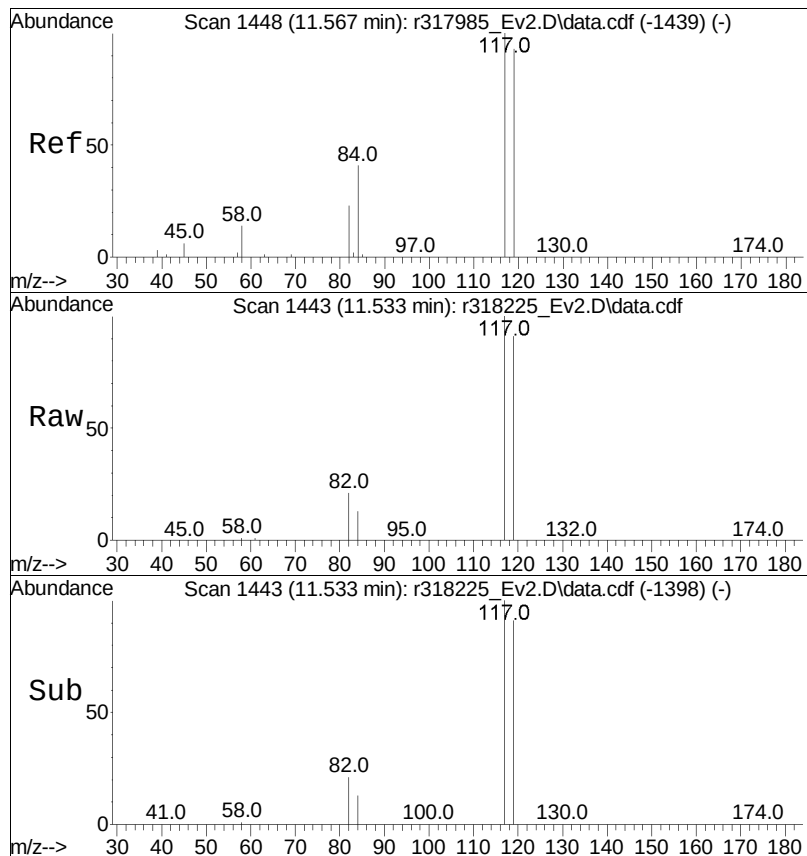




#36
 1,1,1-trichloroethane
 Concen: 4.62 ppbV
 RT: 10.82 min Scan# 1344
 Delta R.T. -0.042 min
 Lab File: r318225_Ev2.D
 Acq: 7 Oct 2021 1:07 PM

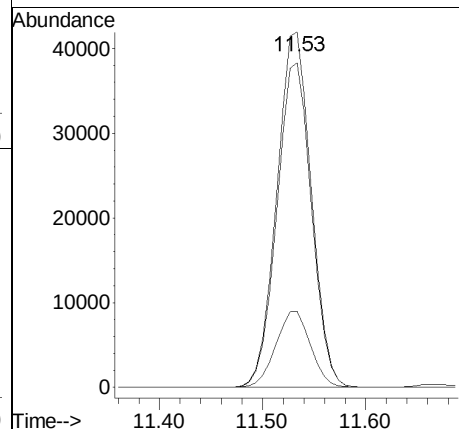
Tgt Ion	Ratio	Resp	Lower	Upper
97	100	98429		
61	42.4		34.3	51.5
119	15.6		12.4	18.6

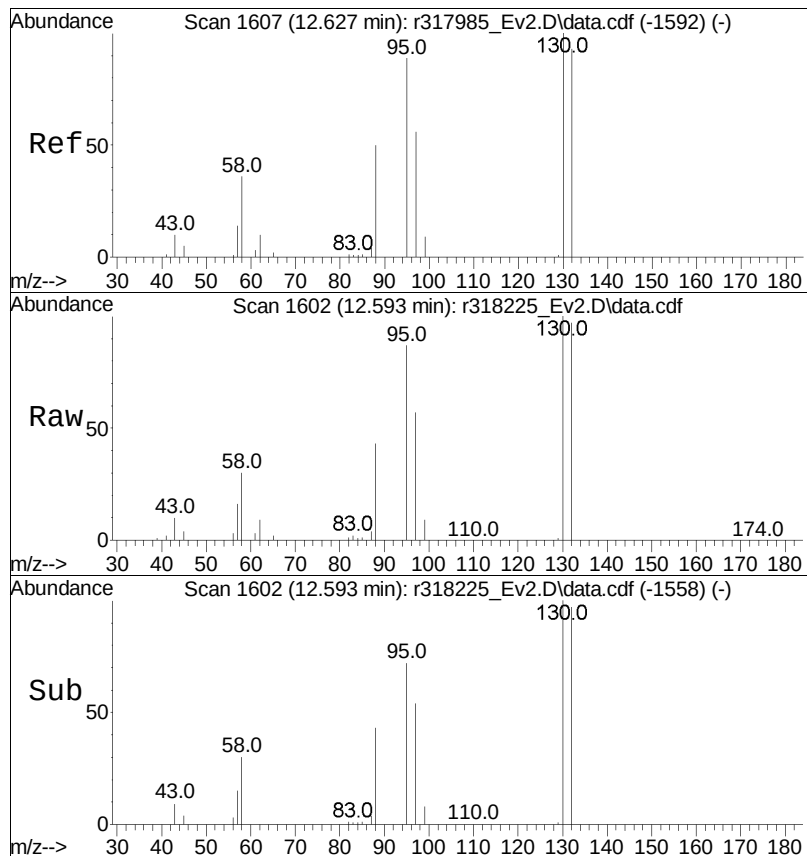




#38
 carbon tetrachloride
 Concen: 4.84 ppbV
 RT: 11.53 min Scan# 1443
 Delta R.T. -0.033 min
 Lab File: r318225_Ev2.D
 Acq: 7 Oct 2021 1:07 PM

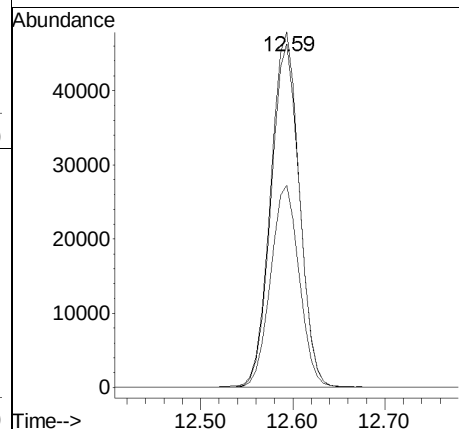
Tgt Ion:	117	Resp:	97465
Ion Ratio	Lower	Upper	
117	100		
119	91.3	74.1	111.1
82	21.4	18.4	27.6

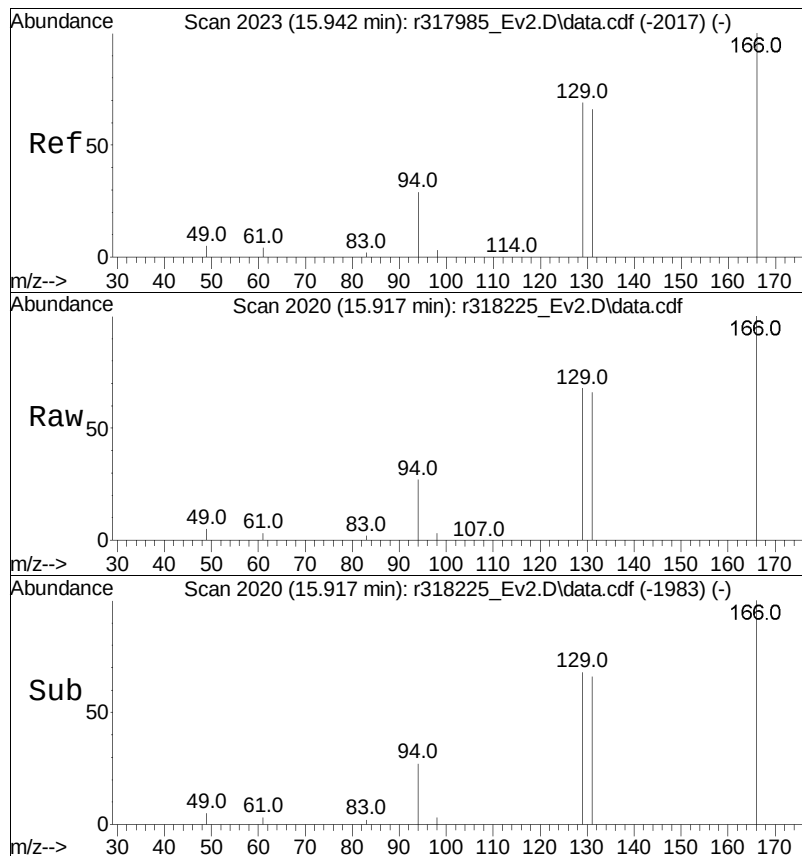




#44
 trichloroethene
 Concen: 4.66 ppbV
 RT: 12.59 min Scan# 1602
 Delta R.T. -0.033 min
 Lab File: r318225_Ev2.D
 Acq: 7 Oct 2021 1:07 PM

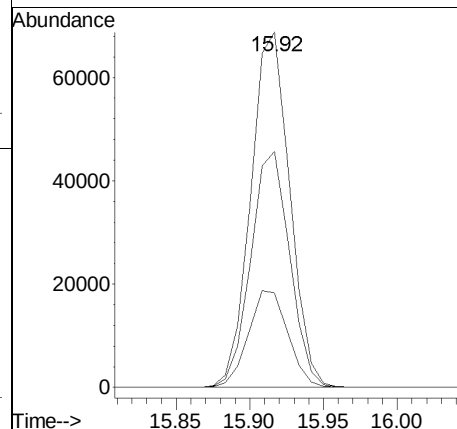
Tgt Ion	Ratio	Lower	Upper
130	100		
132	96.7	74.0	111.0
97	56.9	45.0	67.6





#57
 tetrachloroethene
 Concen: 4.89 ppbV
 RT: 15.92 min Scan# 2020
 Delta R.T. -0.025 min
 Lab File: r318225_Ev2.D
 Acq: 7 Oct 2021 1:07 PM

Tgt	Ion:166	Resp:	126419
Ion	Ratio	Lower	Upper
166	100		
131	66.4	53.1	79.7
94	26.6	22.9	34.3



Quantitation Report (QT Reviewed)

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\
 Data File : r318238_Ev2.D
 Acq On : 7 Oct 2021 11:27 PM
 Operator : AIRPIAN03:TS
 Sample : WG1555826-5,3,250,250
 Misc : WG1555826,ICAL18332
 ALS Vial : 0 Sample Multiplier: 1

Quant Time: Oct 26 15:38:20 2021
 Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M
 Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis
 QLast Update : Mon Sep 27 09:49:21 2021
 Response via : Initial Calibration

CCAL FILE : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D
 Sub List : 7-NY-SIM - .

Compound	R.T.	QIon	Response	Conc	Units	Dev(Min)
Internal Standards						
1) bromochloromethane	9.533	49	247557	10.000	ppbV	-0.03
Standard Area = 244850			Recovery = 101.11%			
33) 1,4-difluorobenzene	11.800	114	691439	10.000	ppbV	-0.03
Standard Area = 676518			Recovery = 102.21%			
51) chlorobenzene-D5	16.533	54	109695	10.000	ppbV	-0.02
Standard Area = 100891			Recovery = 108.73%			

System Monitoring Compounds

Target Compounds	R.T.	QIon	Response	Conc	Units	Qvalue
6) vinyl chloride	4.420	62	2216	0.140	ppbV	98
17) 1,1-dichloroethene	6.824		0	N.D.		
28) cis-1,2-dichloroethene	9.342		0	N.D.		
36) 1,1,1-trichloroethane	10.833	97	295	0.014	ppbV #	64
38) carbon tetrachloride	11.540	117	1532	0.074	ppbV	99
44) trichloroethene	12.600	130	28334	1.240	ppbV	98
57) tetrachloroethene	15.917	166	22150	0.788	ppbV	100

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

Sub List : 7-NY-SIM - .\Data\Airpiano3\2021\10\1007SIM\r318225_Ev2.D

Data Path : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\

Data File : r318238_Ev2.D

Acq On : 7 Oct 2021 11:27 PM

Operator : AIRPIANO3:TS

Sample : WG1555826-5,3,250,250

Misc : WG1555826,ICAL18332

ALS Vial : 0 Sample Multiplier: 1

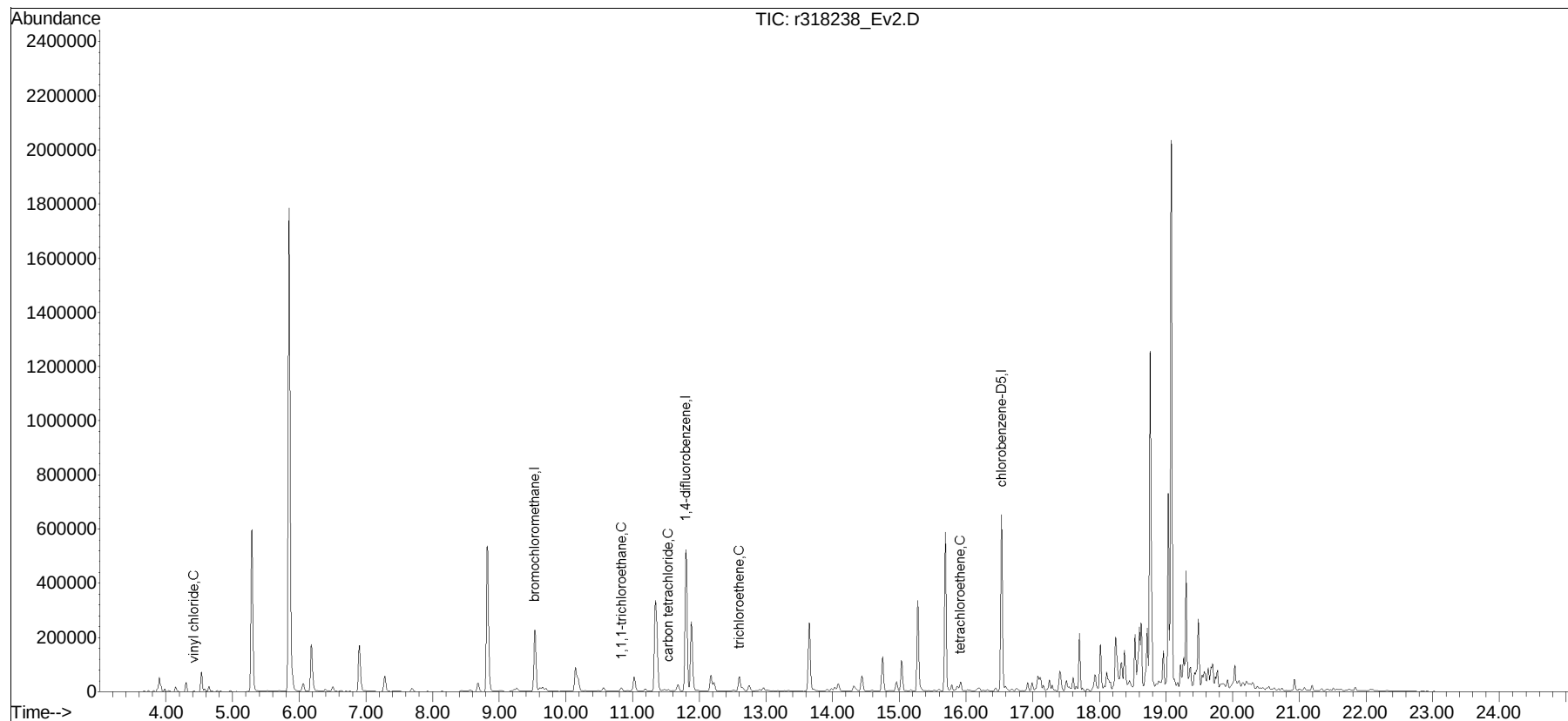
Quant Time: Oct 26 15:38:20 2021

Quant Method : 0:\Forensics\Data\Airpiano3\2021\10\1007SIM\TSIM3_210926.M

Quant Title : T0-14A/T0-15 SIM/Full Scan Analysis

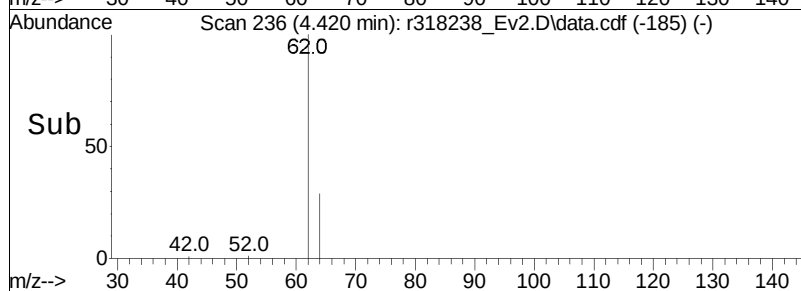
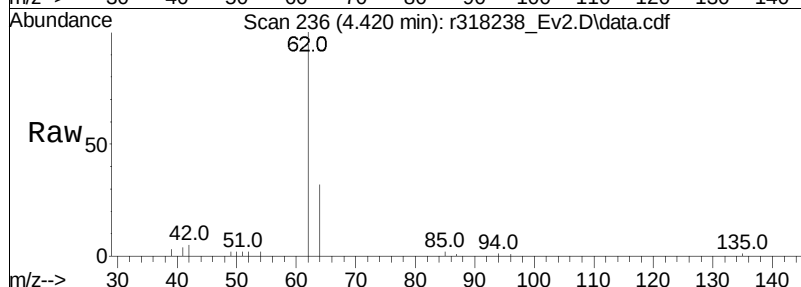
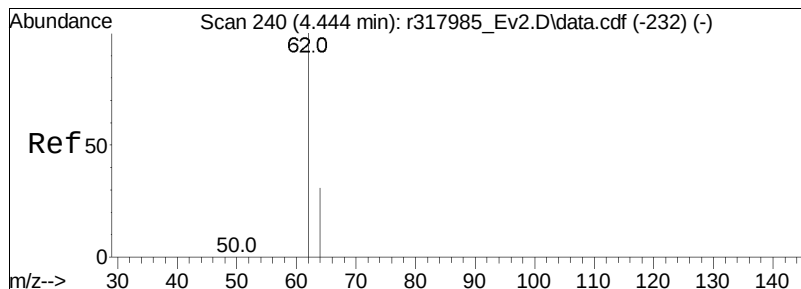
QLast Update : Mon Sep 27 09:49:21 2021

Response via : Initial Calibration



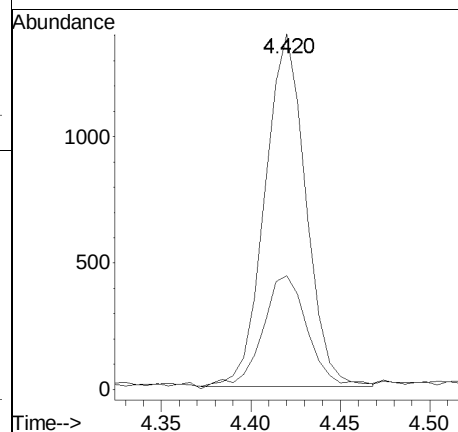
TSIM3_210926.M Tue Oct 26 15:40:24 2021

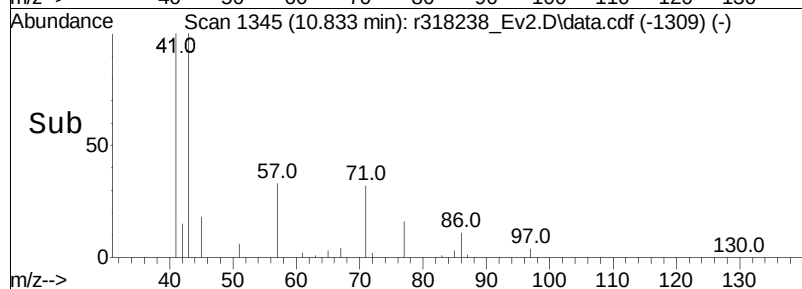
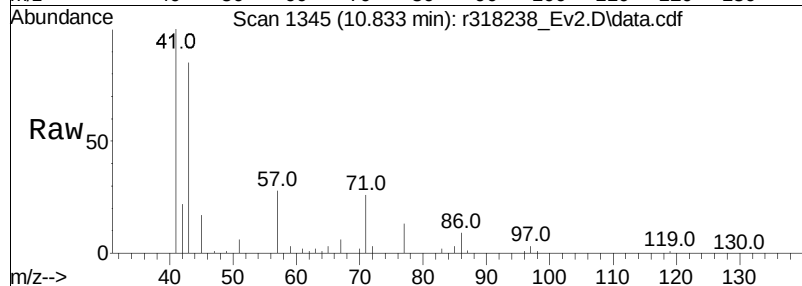
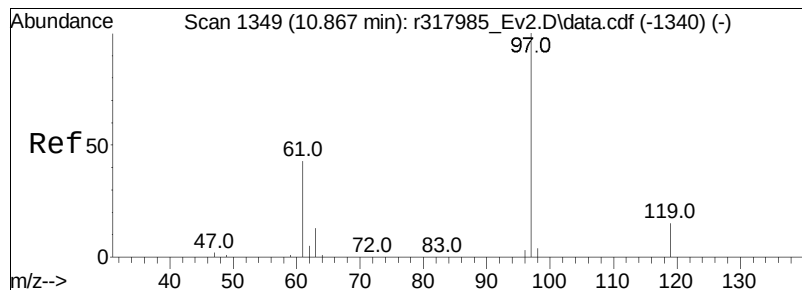
Page: 2



#6
 vinyl chloride
 Concen: 0.14 ppbV
 RT: 4.420 min Scan# 236
 Delta R.T. -0.024 min
 Lab File: r318238_Ev2.D
 Acq: 7 Oct 2021 11:27 PM

Tgt Ion: 62 Resp: 2216
 Ion Ratio Lower Upper
 62 100
 64 32.0 24.6 37.0





#36

1,1,1-trichloroethane

Concen: 0.01 ppbV

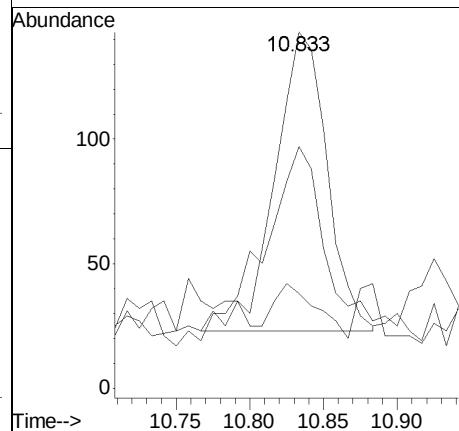
RT: 10.833 min Scan# 1345

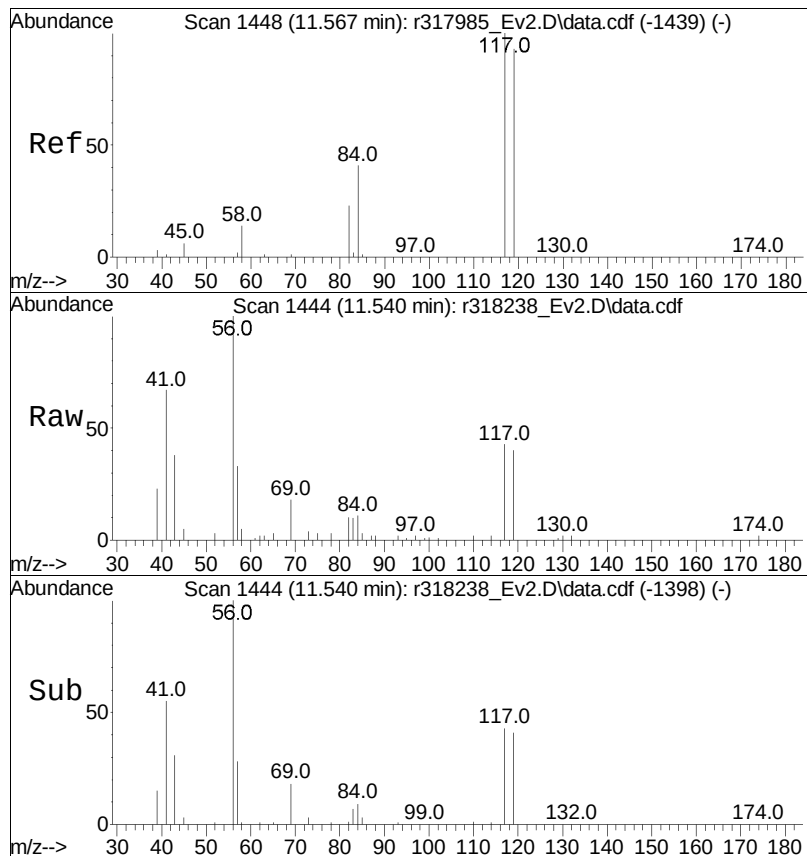
Delta R.T. -0.033 min

Lab File: r318238_Ev2.D

Acq: 7 Oct 2021 11:27 PM

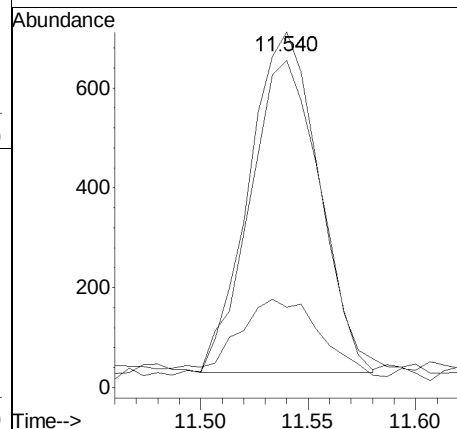
Tgt Ion: 97	Resp:	295
Ion Ratio	Lower	Upper
97 100		
61 67.8	34.3	51.5#
119 26.6	12.4	18.6#

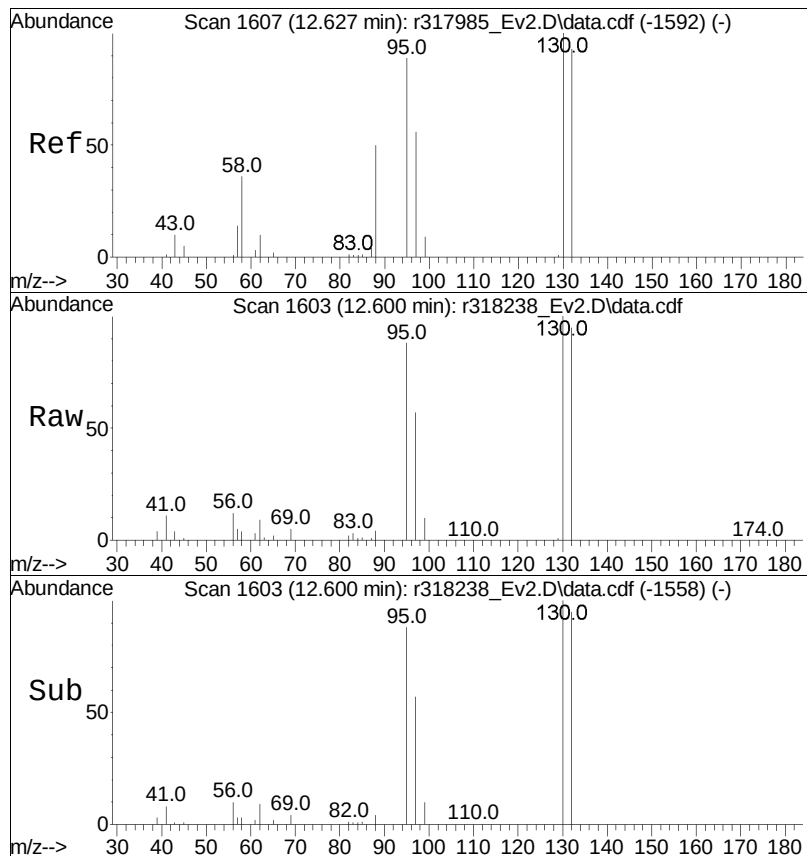




#38
carbon tetrachloride
Concen: 0.07 ppbV
RT: 11.540 min Scan# 1444
Delta R.T. -0.027 min
Lab File: r318238_Ev2.D
Acq: 7 Oct 2021 11:27 PM

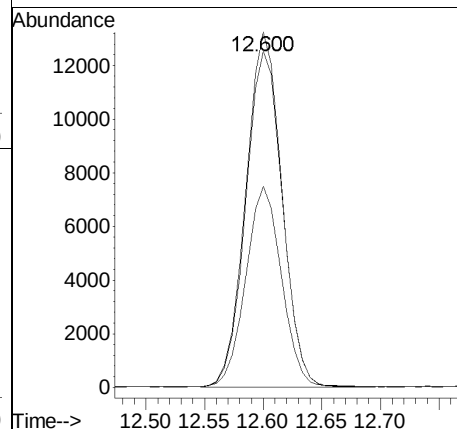
Tgt Ion	Ratio	Resp	Lower	Upper
117	100	1532		
119	92.0		74.1	111.1
82	22.6		18.4	27.6

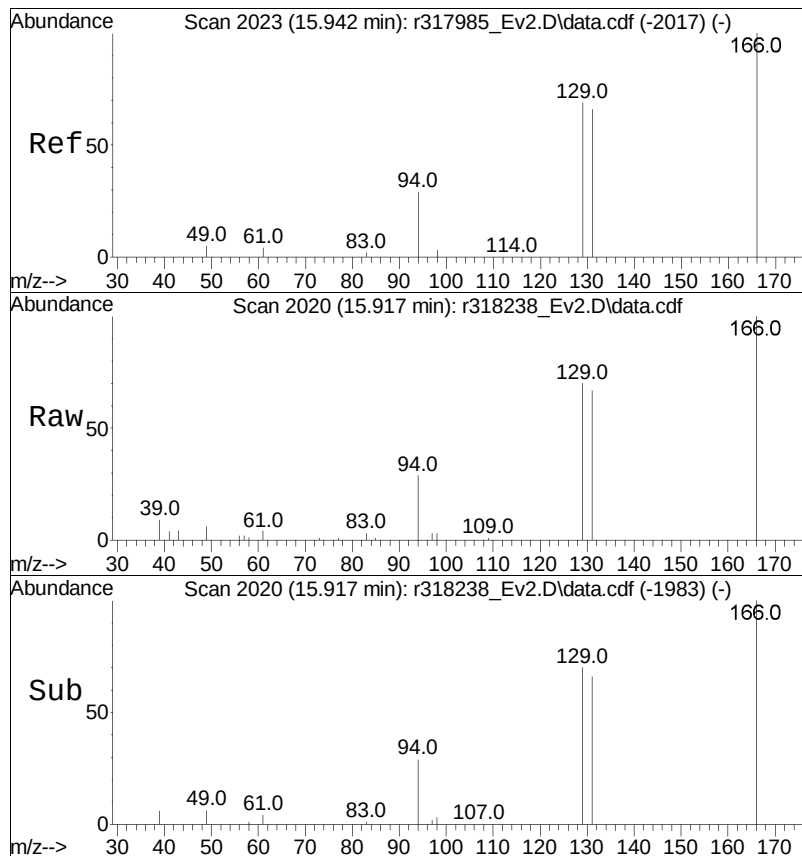




#44
trichloroethene
Concen: 1.24 ppbV
RT: 12.600 min Scan# 1603
Delta R.T. -0.027 min
Lab File: r318238_Ev2.D
Acq: 7 Oct 2021 11:27 PM

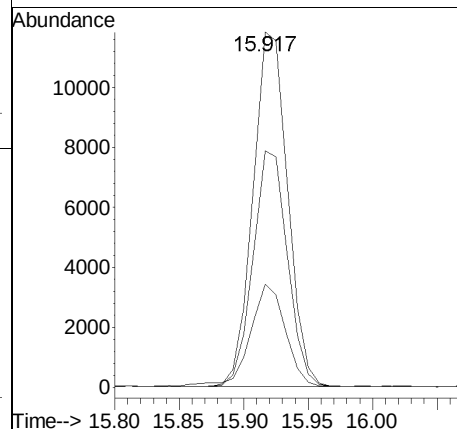
Tgt Ion:	130	Resp:	28334
Ion Ratio	Lower	Upper	
130	100		
132	94.6	74.0	111.0
97	56.6	45.0	67.6





#57
 tetrachloroethene
 Concen: 0.79 ppbV
 RT: 15.917 min Scan# 2020
 Delta R.T. -0.025 min
 Lab File: r318238_Ev2.D
 Acq: 7 Oct 2021 11:27 PM

Tgt	Ion:166	Resp:	22150
Ion	Ratio	Lower	Upper
166	100		
131	66.6	53.1	79.7
94	29.0	22.9	34.3



Manual Integration Report

Data Path : O:\Forensics\Data\AirpianoQMethod : TSIM3_210926.M
Data File : r318238_Ev2.D Operator : AIRPIAN03:TS
Date Inj'd : 10/7/2020 0:1: 7 Instrument :
Sample : WG1555826-5,3,250,250 Quant Date : 10/26/2021 3:38 pm

There are no manual integrations or false positives in this file.

Calculation of Volatile Organic Compounds in Air

The instrument will calculate the concentration (ppbv). If the sample is diluted (DF), the result is multiplied by the DF to generate the final result.

$$\text{Result, ppbv} = C_s \times \text{DF}$$

Where:

C_s = Concentration of sample (ppbv)

DF = Dilution Factor

Calculation of Instrument Dilution Factor

For dilutions, smaller sample volumes (< 250mL) are analyzed. The smallest volume that can be analyzed with accuracy is 10 mL.

Samples that arrive at the laboratory with pressures below -15 inches Hg must be pressurized with zero air to greater than -15 inches Hg. This pressurization results in a dilution factor.

Calculation of Dilution Factor

$$\text{DF} = V_{\text{cf}} / V_{\text{ci}}$$

Where:

V_{ci} = volume of air in canister prior to pressurization, L

P =

Conversion of ppbv to $\mu\text{g}/\text{m}^3$

$$\mu\text{g}/\text{m}^3 = (\text{ppbv}) \times \text{MW} / 24.47$$

Where:

24.47 = molar gas constant (g/g-mole)

MW = molecular weight of the compound of interest

Dilution Factor for Pressurization of Subatmospheric Samples: Three Steps

Step 1: Calculate the volume in the canister prior to pressurization (Assume a 2.7 liter canister is used).

Dilution Factor for Pressurization of Subatmospheric Samples: Three Steps

Step 1: Calculate the volume in the canister prior to pressurization (Assume a 2.7 liter canister is used).

$$V_{ci} = 2.7 * PI / 14.696$$

Step 2: Calculate the volume in the canister after pressurization.

$$V_{cf} = 2.7 * PF / 14.696$$

Step 3: Calculate the dilution factor.

$$DF = V_{cf} / V_{ci}$$

Where:

V_{ci} = volume of air in canister prior to pressurization, L

PI = pressure reading of canister prior to pressurization (psia)

V_{cf} = volume of air in canister after pressurization, L

PF = pressure reading of canister after pressurization (psia)

DF = dilution factor

14.696 = atmospheric pressure (psia)

ALPHA ANALYTICAL LABORATORIES, INC.

Alpha WORK GROUP REPORT (wk02)

Oct 26 2021, 03:02 pm

Work Group: WG1555826 for Department: 3 GC/MS

Created: 07-OCT-21 Due: Operator: AW

Sample	Client ID	C Product	Matrix	Stat	UA	HOLD	DUE	PR	Location
L2100177-202 DUMMY 202		S T015-SIM	AIR	DONE	U	1114	0307	NC	Can-2.7
L2153835-02 133_LSV-20		S T015-SIM	SOIL_VAPOR	DONE	U	1103	1011	S0	Can-6
L2154177-01 CAN 3544		S T015-SIM	AIR	DONE	I	1104	1012	NC	Can-1
L2154177-02 CAN 3539		S T015-SIM	AIR	DONE	I	1104	1012	NC	Can-1
L2154177-03 CAN 3554		S T015-SIM	AIR	DONE	I	1104	1012	NC	Can-1
L2154669-01 CAN 2563 SHELF 32		S T015-SIM	AIR	DONE	U	1105	1014	NC	Can-6
L2154669-02 CAN 2957 SHELF 49		S T015-SIM	AIR	DONE	U	1105	1014	NC	Can-6
L2154669-03 CAN 1609 SHELF 52		S T015-SIM	AIR	DONE	U	1105	1014	NC	Can-6
WG1555826-1 MS BFB Tune Standard		S T015-SIM	AIR	DONE	U				
WG1555826-2 Continuing Calibrati		S T015-SIM	AIR	DONE	U				
WG1555826-3 Laboratory Control S		S T015-SIM	AIR	DONE	U				
WG1555826-4 Laboratory Method Bl		S T015-SIM	AIR	DONE	U				
WG1555826-5 Duplicate Sample		S T015-SIM	AIR	DONE	U				
Comments:									
L2100177-202	Use for L2153889-01								
WG1555826-5	L2100177-202								

Alpha Analytical Air Lab Instrument Run Log

Instrument ID: Airpiano3

Internal Standard/Surrogate IDs: SS20-028 / SS21-026

Date: 09/26/21

Internal Standard/Surrogate Volume: 100 ml

Analyst Initials: TS

Sequence File Name: 210926.S

SIM ICAL# 18243

Full Scan ICAL# 18242

APH ICAL# 18240

PIANO ICAL# 18053

AS Position #	Sample ID	Acquisition Method	Data File ID	Standard ID or Batch ID #, ICAL Ref #	Comment (s)	Product/ sublist	Leak Check Pass ? Y/ N
1	BA3092601	TO15_SFS.qgm	R317975.qgd	250 mL			NA
1	BA3092602	TO15_SFS.qgm	R317976.qgd	250 mL			NA
1	BA3092603	TO15_SFS.qgm	R317977.qgd	250 mL			NA
1	TA3092601	TO15_SFS.qgm	R317978.qgd	250 mL	TUNE		NA
5	ITO15-SIMSTD0.02	TO15_SFS.qgm	R317979.qgd	50 mL SS21-031D	SIM ONLY	DEFAULT	NA
5	ITO15-SIMSTD0.05	TO15_SFS.qgm	R317980.qgd	125 mL SS21-031D	SIM ONLY	DEFAULT	NA
5	ITO15-SIMSTD0.1	TO15_SFS.qgm	R317981.qgd	250 mL SS21-031D	SIM ONLY	DEFAULT	NA
6	ITO15-SIMSTD0.2	TO15_SFS.qgm	R317982.qgd	50 mL SS21-031C		DEFAULT	NA
6	ITO15-SIMSTD0.5	TO15_SFS.qgm	R317983.qgd	125 mL SS21-031C		DEFAULT	NA
6	ITO15-SIMSTD1.0	TO15_SFS.qgm	R317984.qgd	250 mL SS21-031C		DEFAULT	NA
7	ITO15-SIMSTD5.0	TO15_SFS.qgm	R317985.qgd	125 mL SS21-031B		DEFAULT	NA
7	ITO15-SIMSTD010	TO15_SFS.qgm	R317986.qgd	250 mL SS21-031B		DEFAULT	NA
8	ITO15-SIMSTD020	TO15_SFS.qgm	R317987.qgd	50 mL SS21-031A		DEFAULT	NA
8	ITO15-SIMSTD050	TO15_SFS.qgm	R317988.qgd	125 mL SS21-031A		DEFAULT	NA
8	ITO15-LLSTD100	TO15_SFS.qgm	R317989.qgd	250 mL SS21-031A	LL ONLY	DEFAULT	NA
1	BA3092601	TO15_SFS.qgm	R317990.qgd	250 mL			NA
1	BA3092602	TO15_SFS.qgm	R317991.qgd	250 mL			NA
2	CTO15-LLSTD010	TO15_SFS.qgm	R317992.qgd	250 mL SS21-027C	LL ICV	DEFAULT _ ICV_ AP2	NA
2	CTO15-SIMSTD5.0	TO15_SFS.qgm	R317993.qgd	125 mL SS21-027C	SIM ICV	DEFAULT _ ICV_ AP2	NA

Alpha Analytical Air Lab Instrument Run Log

Date(s) of Initial Calibration: Refer to Initial Calibration Summary Form 6

Date Acquired: see Instrument Performance Check Summary and/or quantitation report.

Sample ID information: L1301234-01,3,250,250 { Lab sample ID, dept #, actual volume analyzed (mL), nominal volume analyzed (mL) }

Dilution Factor: See Form 1 report, or divide nominal volume by actual volume analyzed

Alpha Analytical Air Lab Instrument Run Log

Instrument ID: Airpiano3

Internal Standard/Surrogate IDs: SS20-028 / SS21-026

Date: 10/07/21

Internal Standard/Surrogate Volume: 100 ml

Analyst Initials: AW

Sequence File Name: 211007.S

SIM ICAL# 18332

Full Scan ICAL# 18331

APH ICAL# 18333

PIANO ICAL#

AS Position #	Sample ID	Acquisition Method	Data File ID	Standard ID or Batch ID #, ICAL Ref #	Comment (s)	Product/ sublist	Leak Check Pass? Y/N
1	TA3100701	TO15_SFS.qgm	R318221.qgd	250 mL	TUNE		NA
2	CAPH-10STD10	TO15_SFS.qgm	R318222.qgd	125 mL SS21-030B2	APH CC		NA
3	CA3100701	TO15_SFS.qgm	R318223.qgd	250 mL SS21-031G	LL CC		NA
4	CTO15-LLSTD10	TO15_SFS.qgm	R318224.qgd	250 mL SS21-027C	LL LCS		NA
4	CTO15-SIMSTD5	TO15_SFS.qgm	R318225.qgd	125 mL SS21-027C	SIM LCS		NA
1	BA3100701	TO15_SFS.qgm	R318226.qgd	250 mL	LL BLANK		NA
1	BA3100702	TO15_SFS.qgm	R318227.qgd	250 mL	SIM BLANK		NA
1	L2154669-01,3,250,250	TO15_SFS.qgm	R318228.qgd	250 mL		LL/SIM/APH	Y
2	L2154669-02,3,250,250	TO15_SFS.qgm	R318229.qgd	250 mL		LL/SIM/APH	Y
3	L2154669-03,3,250,250	TO15_SFS.qgm	R318230.qgd	250 mL		LL/SIM/APH	Y
4	L2154177-01,3,250,250	TO15_SFS.qgm	R318231.qgd	250 mL		LL/SIM	Y
5	L2154177-02,3,250,250	TO15_SFS.qgm	R318232.qgd	250 mL		LL/SIM	Y
6	L2154177-03,3,250,250	TO15_SFS.qgm	R318233.qgd	250 mL		LL/SIM	Y
7	L2153835-03,3,250,250	TO15_SFS.qgm	R318234.qgd	WG1555827,ICAL18331		40 COMPOUNDS LIST	Y
8	L2153835-01,3,250,250	TO15_SFS.qgm	R318235.qgd	WG1555827,ICAL18331		40 COMPOUNDS LIST	Y
9	L2153835-02D,3,35,250	TO15_SFS.qgm	R318236.qgd	WG1555827,ICAL18331	NT	40 COMPOUNDS LIST	Y
10	L2153889-01,3,250,250	TO15_SFS.qgm	R318237.qgd	WG1555827,ICAL18331		NY	Y
10	L2153889-01DUP,3,250,250	TO15_SFS.qgm	R318238.qgd	WG1555827,ICAL18331	LL DUP	NY	Y
11	L2153889-02,3,250,250	TO15_SFS.qgm	R318239.qgd	WG1555827,ICAL18331		NY	Y
12	L2154105-01,3,250,250	TO15_SFS.qgm	R318240.qgd	WG1555827,ICAL18331		NY	Y
13	L2154105-02D,3,180,250	TO15_SFS.qgm	R318241.qgd	WG1555827,ICAL18331	T	NY	Y

Alpha Analytical Air Lab Instrument Run Log

14	L2154105-03D,3,190,250	TO15_SFS.qgm	R318242.qgd	WG1555827,ICAL18331	T	NY	Y
15	L2154105-04,3,250,250	TO15_SFS.qgm	R318243.qgd	WG1555827,ICAL18331		NY	Y
16	L2154105-05,3,250,250	TO15_SFS.qgm	R318244.qgd	WG1555827,ICAL18331		NY	Y
1	L2154105-06,3,250,250	TO15_SFS.qgm	R318245.qgd	WG1555827,ICAL18331		NY	Y

Date(s) of Initial Calibration: Refer to Initial Calibration Summary Form 6

Date Acquired: see Instrument Performance Check Summary and/or quantitation report.

Sample ID information: L1301234-01,3,250,250 { Lab sample ID, dept #, actual volume analyzed (mL), nominal volume analyzed (mL) }

Dilution Factor: See Form 1 report, or divide nominal volume by actual volume analyzed

JOB: L2266234 REPORT STYLE: Data Usability Report
0010: Alpha Analytical Report Cover Page - OK
0015: Sample Cross Reference Summary - OK
0060: Case Narrative - OK
0100: Volatiles Cover Page - OK
0110: Volatiles Sample Results - OK
0120: Volatiles Method Blank Report - OK
0130: Volatiles LCS Report - OK
1180: Inorganics Cover Page - OK
1200: Wet Chemistry Sample Results - OK
1250: Wet Chemistry Duplicate Report - OK
5100: Sample Receipt & Container Information Report - OK
5200: Glossary - OK
5400: References - OK



ANALYTICAL REPORT

Lab Number:	L2266234
Client:	Langan Engineering & Environmental 300 Kimball Drive 4th Floor Parsippany, NJ 07054-2172
ATTN:	Jessica Friscia
Phone:	(973) 560-4900
Project Name:	990 ROSSVILLE
Project Number:	100849501
Report Date:	12/05/22

The original project report/data package is held by Alpha Analytical. This report/data package is paginated and should be reproduced only in its entirety. Alpha Analytical holds no responsibility for results and/or data that are not consistent with the original.

Certifications & Approvals: MA (M-MA086), NH NELAP (2064), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NJ (MA935), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-17-00196).

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L2266234-01	208_FB-3	WATER	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:45	11/23/22
L2266234-02	209_DUP-4	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 09:00	11/23/22
L2266234-03	210_214_215_LSB-33_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 07:40	11/23/22
L2266234-04	211_LSB-33_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 07:55	11/23/22
L2266234-05	212_LSB-33_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:00	11/23/22
L2266234-06	213_LSB-33_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:05	11/23/22
L2266234-07	216_LSB-34_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:10	11/23/22
L2266234-08	217_LSB-34_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:15	11/23/22
L2266234-09	218_LSB-34_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:20	11/23/22
L2266234-10	219_LSB-34_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:25	11/23/22
L2266234-11	220_LSB-35_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:50	11/23/22
L2266234-12	221_LSB-35_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:55	11/23/22
L2266234-13	222_LSB-35_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 09:05	11/23/22
L2266234-14	223_LSB-35_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 09:10	11/23/22
L2266234-15	224_LSB-36_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:25	11/23/22
L2266234-16	225_LSB-36_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:30	11/23/22
L2266234-17	226_LSB-36_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:35	11/23/22
L2266234-18	227_LSB-36_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/23/22 08:40	11/23/22

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively.

When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances, the specific failure is not narrated but noted in the associated QC Outlier Summary Report, located directly after the Case Narrative. QC information is also incorporated in the Data Usability Assessment table (Format 11) of our Data Merger tool, where it can be reviewed in conjunction with the sample result, associated regulatory criteria and any associated data usability implications.

Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

HOLD POLICY - For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Alpha Project Manager and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Project Management at 800-624-9220 with any questions.

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Case Narrative (continued)

Report Submission

December 05, 2022: This is a preliminary report.

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

Sample Receipt

L2266234-01 through -18: Discrepancies were noted between the sample labels and chain of custody. The Client IDs were specified by the client.

L2266234-07 through -18: The analyses performed were specified by the client.

L2266234-09: The collection date and time on the chain of custody was 23-NOV-22 08:20; however, the collection date/time on the container label was 23-NOV-22 08:15. At the client's request, the collection date/time is reported as 23-NOV-22 08:20.

L2266234-18: The collection date and time on the chain of custody was 23-NOV-22 08:40; however, the collection date/time on the container label was 23-NOV-22 08:35. At the client's request, the collection date/time is reported as 23-NOV-22 08:40.

Volatile Organics

L2266234-10, -14, and -16: The sample was analyzed as a High Level Methanol in order to quantitate results within the calibration range. The result should be considered estimated, and is qualified with an E flag, for any compound that exceeded the calibration on the initial Low Level analysis. The results of both analyses are reported.

L2266234-13: The sample was analyzed as a High Level Methanol based upon screen results. The sample was then analyzed as a Low Level in order to achieve lower reporting limits. The results of both analyses are reported. Differences were noted between the results of the analyses which have been attributed to vial discrepancies.

L2266234-16: The sample was received in appropriate containers (vials) for the Volatile Organics by EPA

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Case Narrative (continued)

Method 5035/8260 analysis; however, they could not be used for analysis. With the client's authorization, a sample aliquot was taken from an unpreserved container (jar) and preserved appropriately. Any reported concentrations that are below 200 ug/kg may be biased low due to the sample not being collected according to 5035-L/5035A-L low-level specifications.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Caitlin Walukevich

Title: Technical Director/Representative

Date: 12/05/22

ORGANICS

VOLATILES

Project Name: 990 ROSSVILLE**Lab Number:** L2266234**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-07
 Client ID: 216_LSB-34_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:10
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 12/03/22 17:29

Analyst: JIC

Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	5100		ug/kg	26	10.	1
Vinyl chloride	ND		ug/kg	52	17.	1
trans-1,2-Dichloroethene	ND		ug/kg	78	7.1	1
Trichloroethene	180		ug/kg	26	7.1	1
cis-1,2-Dichloroethene	750		ug/kg	52	9.1	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	94		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-08
Client ID: 217_LSB-34_4.5-5
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:15
Date Received: 11/23/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 12/05/22 11:09
Analyst: NLK
Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	3600		ug/kg	14	5.6	1
Vinyl chloride	1500		ug/kg	28	9.5	1
trans-1,2-Dichloroethene	38	J	ug/kg	42	3.9	1
Trichloroethene	1500		ug/kg	14	3.9	1
cis-1,2-Dichloroethene	18000	E	ug/kg	28	5.0	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	94		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	92		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2266234**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-08 D
 Client ID: 217_LSB-34_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:15
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 12/03/22 20:11

Analyst: JIC

Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	15000		ug/kg	140	25.	5

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	94		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-09
 Client ID: 218_LSB-34_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:20
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/05/22 11:28
 Analyst: NLK
 Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	1400		ug/kg	15	6.0	1
Vinyl chloride	1500		ug/kg	30	10.	1
trans-1,2-Dichloroethene	21	J	ug/kg	46	4.2	1
Trichloroethene	640		ug/kg	15	4.2	1
cis-1,2-Dichloroethene	19000	E	ug/kg	30	5.3	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	89		70-130
Dibromofluoromethane	98		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2266234**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-09 D
 Client ID: 218_LSB-34_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:20
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 12/03/22 20:38

Analyst: JIC

Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	15000		ug/kg	300	53.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-10
 Client ID: 219_LSB-34_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:25
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/03/22 17:56
 Analyst: JIC
 Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	320		ug/kg	12	4.8	1
Vinyl chloride	ND		ug/kg	24	8.2	1
trans-1,2-Dichloroethene	ND		ug/kg	37	3.4	1
Trichloroethene	63		ug/kg	12	3.4	1
cis-1,2-Dichloroethene	440		ug/kg	24	4.3	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-10
Client ID: 219_LSB-34_9.5-10
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:25
Date Received: 11/23/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 12/05/22 10:49
Analyst: NLK
Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	100		ug/kg	0.22	0.09	1
Vinyl chloride	1.2		ug/kg	0.43	0.14	1
trans-1,2-Dichloroethene	0.35	J	ug/kg	0.65	0.06	1
Trichloroethene	34		ug/kg	0.22	0.06	1
cis-1,2-Dichloroethene	320	E	ug/kg	0.43	0.08	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	91		70-130
4-Bromofluorobenzene	90		70-130
Dibromofluoromethane	94		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-11
 Client ID: 220_LSB-35_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:50
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/03/22 13:55
 Analyst: JIC
 Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	6.0		ug/kg	0.27	0.10	1
Vinyl chloride	ND		ug/kg	0.53	0.18	1
trans-1,2-Dichloroethene	ND		ug/kg	0.80	0.07	1
Trichloroethene	0.28		ug/kg	0.27	0.07	1
cis-1,2-Dichloroethene	ND		ug/kg	0.53	0.09	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	97		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-12
 Client ID: 221_LSB-35_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:55
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 12/03/22 14:22

Analyst: JIC

Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	12		ug/kg	0.43	0.17	1
Vinyl chloride	ND		ug/kg	0.85	0.29	1
trans-1,2-Dichloroethene	ND		ug/kg	1.3	0.12	1
Trichloroethene	0.75		ug/kg	0.43	0.12	1
cis-1,2-Dichloroethene	0.35	J	ug/kg	0.85	0.15	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	96		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-13
 Client ID: 222_LSB-35_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 09:05
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 12/03/22 18:23

Analyst: JIC

Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	700		ug/kg	17	6.8	1
Vinyl chloride	ND		ug/kg	35	12.	1
trans-1,2-Dichloroethene	ND		ug/kg	52	4.8	1
Trichloroethene	41		ug/kg	17	4.8	1
cis-1,2-Dichloroethene	7.1	J	ug/kg	35	6.1	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-13
 Client ID: 222_LSB-35_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 09:05
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/05/22 09:12
 Analyst: NLK
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	32		ug/kg	0.20	0.08	1
Vinyl chloride	ND		ug/kg	0.39	0.13	1
trans-1,2-Dichloroethene	ND		ug/kg	0.59	0.05	1
Trichloroethene	1.9		ug/kg	0.20	0.05	1
cis-1,2-Dichloroethene	0.79		ug/kg	0.39	0.07	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	91		70-130
4-Bromofluorobenzene	89		70-130
Dibromofluoromethane	96		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2266234**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-14
 Client ID: 223_LSB-35_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 09:10
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/03/22 18:50
 Analyst: JIC
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	630		ug/kg	13	5.2	1
Vinyl chloride	ND		ug/kg	27	8.9	1
trans-1,2-Dichloroethene	ND		ug/kg	40	3.6	1
Trichloroethene	45		ug/kg	13	3.6	1
cis-1,2-Dichloroethene	8.6	J	ug/kg	27	4.7	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	95		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-14
Client ID: 223_LSB-35_9.5-10
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 09:10
Date Received: 11/23/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 12/05/22 09:31
Analyst: NLK
Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	140	E	ug/kg	0.21	0.08	1
Vinyl chloride	ND		ug/kg	0.41	0.14	1
trans-1,2-Dichloroethene	ND		ug/kg	0.62	0.06	1
Trichloroethene	8.2		ug/kg	0.21	0.06	1
cis-1,2-Dichloroethene	2.8		ug/kg	0.41	0.07	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	92		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	91		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-15
 Client ID: 224_LSB-36_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:25
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/05/22 12:27
 Analyst: NLK
 Percent Solids: 84%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	1800		ug/kg	16	6.2	1
Vinyl chloride	6900		ug/kg	32	10.	1
trans-1,2-Dichloroethene	ND		ug/kg	47	4.3	1
Trichloroethene	57		ug/kg	16	4.3	1
cis-1,2-Dichloroethene	7400		ug/kg	32	5.5	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	95		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	88		70-130
Dibromofluoromethane	97		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-16
 Client ID: 225_LSB-36_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:30
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/03/22 14:48
 Analyst: JIC
 Percent Solids: 82%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	2.0		ug/kg	0.38	0.15	1
Vinyl chloride	300	E	ug/kg	0.76	0.25	1
trans-1,2-Dichloroethene	1.0	J	ug/kg	1.1	0.10	1
Trichloroethene	ND		ug/kg	0.38	0.10	1
cis-1,2-Dichloroethene	280	E	ug/kg	0.76	0.13	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	111		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	100		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-16
Client ID: 225_LSB-36_4.5-5
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:30
Date Received: 11/23/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 12/05/22 08:52
Analyst: NLK
Percent Solids: 82%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	71		ug/kg	32	12.	1
Vinyl chloride	1700		ug/kg	64	22.	1
trans-1,2-Dichloroethene	16	J	ug/kg	96	8.8	1
Trichloroethene	ND		ug/kg	32	8.8	1
cis-1,2-Dichloroethene	3800		ug/kg	64	11.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	92		70-130
Dibromofluoromethane	97		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2266234-17
 Client ID: 226_LSB-36_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:35
 Date Received: 11/23/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 12/04/22 16:36
 Analyst: JIC
 Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	3500		ug/kg	14	5.4	1
Vinyl chloride	ND		ug/kg	27	9.2	1
trans-1,2-Dichloroethene	ND		ug/kg	41	3.8	1
Trichloroethene	200		ug/kg	14	3.8	1
cis-1,2-Dichloroethene	1400		ug/kg	27	4.8	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	92		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	92		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-18
Client ID: 227_LSB-36_9.5-10
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:40
Date Received: 11/23/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 12/03/22 19:17
Analyst: JIC
Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	2600		ug/kg	17	6.7	1
Vinyl chloride	36		ug/kg	34	11.	1
trans-1,2-Dichloroethene	ND		ug/kg	51	4.6	1
Trichloroethene	280		ug/kg	17	4.6	1
cis-1,2-Dichloroethene	5600		ug/kg	34	6.0	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	94		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 12/04/22 14:59
Analyst: KJD

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 17 Batch: WG1719284-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	91		70-130
Dibromofluoromethane	88		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 12/03/22 13:28
Analyst: LAC

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 11-12,16 Batch: WG1719287-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	94		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
 Analytical Date: 12/03/22 13:28
 Analyst: LAC

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 07-10,13-14,18 Batch: WG1719289-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	94		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 12/05/22 07:33
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 10,13-14 Batch: WG1719464-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	92		70-130
4-Bromofluorobenzene	89		70-130
Dibromofluoromethane	103		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
 Analytical Date: 12/05/22 07:33
 Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 08-09,15-16 Batch: WG1719468-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	89		70-130
Dibromofluoromethane	103		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 17 Batch: WG1719284-3 WG1719284-4								
Tetrachloroethene	113		112		70-130	1		30
Vinyl chloride	103		98		67-130	5		30
trans-1,2-Dichloroethene	95		94		70-130	1		30
Trichloroethene	104		104		70-130	0		30
cis-1,2-Dichloroethene	95		93		70-130	2		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	82		82		70-130
Toluene-d8	98		97		70-130
4-Bromofluorobenzene	93		97		70-130
Dibromofluoromethane	90		89		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 11-12,16 Batch: WG1719287-3 WG1719287-4								
Tetrachloroethene	104		92		70-130	12		30
Vinyl chloride	102		91		67-130	11		30
trans-1,2-Dichloroethene	105		92		70-130	13		30
Trichloroethene	97		90		70-130	7		30
cis-1,2-Dichloroethene	103		93		70-130	10		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	96		95		70-130
Toluene-d8	97		96		70-130
4-Bromofluorobenzene	95		95		70-130
Dibromofluoromethane	93		92		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 07-10,13-14,18 Batch: WG1719289-3 WG1719289-4								
Tetrachloroethene	104		92		70-130	12		30
Vinyl chloride	102		91		67-130	11		30
trans-1,2-Dichloroethene	105		92		70-130	13		30
Trichloroethene	97		90		70-130	7		30
cis-1,2-Dichloroethene	103		93		70-130	10		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	96		95		70-130
Toluene-d8	97		96		70-130
4-Bromofluorobenzene	96		95		70-130
Dibromofluoromethane	93		92		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 10,13-14 Batch: WG1719464-3 WG1719464-4								
Tetrachloroethene	113		112		70-130	1		30
Vinyl chloride	107		109		67-130	2		30
trans-1,2-Dichloroethene	101		97		70-130	4		30
Trichloroethene	105		106		70-130	1		30
cis-1,2-Dichloroethene	96		101		70-130	5		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	88		87		70-130
Toluene-d8	96		95		70-130
4-Bromofluorobenzene	90		91		70-130
Dibromofluoromethane	89		90		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 08-09,15-16 Batch: WG1719468-3 WG1719468-4								
Tetrachloroethene	113		112		70-130	1		30
Vinyl chloride	107		109		67-130	2		30
trans-1,2-Dichloroethene	101		97		70-130	4		30
Trichloroethene	105		106		70-130	1		30
cis-1,2-Dichloroethene	96		101		70-130	5		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	88		87		70-130
Toluene-d8	96		95		70-130
4-Bromofluorobenzene	90		91		70-130
Dibromofluoromethane	90		90		70-130

INORGANICS & MISCELLANEOUS

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-07

Client ID: 216_LSB-34_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:10

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	89.3		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-08

Client ID: 217_LSB-34_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:15

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.4		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-09

Client ID: 218_LSB-34_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:20

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.6		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2266234-10**Client ID:** 219_LSB-34_9.5-10**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/23/22 08:25**Date Received:** 11/23/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.0		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-11

Client ID: 220_LSB-35_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:50

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.8		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-12

Client ID: 221_LSB-35_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:55

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.8		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-13

Client ID: 222_LSB-35_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 09:05

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	89.0		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2266234-14**Client ID:** 223_LSB-35_9.5-10**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/23/22 09:10**Date Received:** 11/23/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	89.3		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-15

Client ID: 224_LSB-36_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:25

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	84.0		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2266234-16**Client ID:** 225_LSB-36_4.5-5**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/23/22 08:30**Date Received:** 11/23/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	81.6		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2266234**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2266234-17**Client ID:** 226_LSB-36_6.5-7**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/23/22 08:35**Date Received:** 11/23/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.0		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2266234

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2266234-18

Client ID: 227_LSB-36_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/23/22 08:40

Date Received: 11/23/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	86.7		%	0.100	NA	1	-	12/03/22 09:05	121,2540G	RI



Lab Duplicate Analysis *Batch Quality Control*

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 07-18 QC Batch ID: WG1718896-1 QC Sample: L2266234-07 Client ID: 216_LSB-34_2.5-3						
Solids, Total	89.3	89.3	%	0		20

Project Name: 990 ROSSVILLE**Lab Number:** L2266234**Project Number:** 100849501**Report Date:** 12/05/22**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

Cooler Information

Cooler	Custody Seal
A	Absent
B	Absent

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2266234-01A	Vial HCl preserved	A	NA		4.7	Y	Absent		HOLD-8260(14)
L2266234-01B	Vial HCl preserved	A	NA		4.7	Y	Absent		HOLD-8260(14)
L2266234-01C	Vial HCl preserved	A	NA		4.7	Y	Absent		HOLD-8260(14)
L2266234-02A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14)
L2266234-02B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-02C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-02D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM()
L2266234-02E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-03A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14)
L2266234-03A1	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14)
L2266234-03A2	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14)
L2266234-03B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-03B1	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-03B2	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-03C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-03C1	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-03C2	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-03D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM()
L2266234-03D1	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM()
L2266234-03D2	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM()
L2266234-03E	Glass 500ml/16oz unpreserved	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-04A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14)

Project Name: 990 ROSSVILLE
Project Number: 100849501

Serial_No:12052214:44
Lab Number: L2266234
Report Date: 12/05/22

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2266234-04B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-04C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-04D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM()
L2266234-04E	Glass 500ml/16oz unpreserved	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-05A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14)
L2266234-05B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-05C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-05D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM()
L2266234-05E	Glass 500ml/16oz unpreserved	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-06A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14)
L2266234-06B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-06C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14)
L2266234-06D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM()
L2266234-06E	Glass 500ml/16oz unpreserved	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-07A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-07B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-07C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-07D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-07E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-08A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-08B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-08C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-08D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-08E	Vial Large Septa unpreserved (4oz)	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-09A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-09B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-09C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-09D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)

Project Name: 990 ROSSVILLE
Project Number: 100849501

Serial_No:12052214:44
Lab Number: L2266234
Report Date: 12/05/22

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2266234-09E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-10A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-10B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-10C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-10D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-10E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-11A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-11B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-11C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-11D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-11E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-12A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-12B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-12C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-12D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-12E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-13A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260H(14),NYTCL-8260HLW(14)
L2266234-13B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260H(14),NYTCL-8260HLW(14)
L2266234-13C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260H(14),NYTCL-8260HLW(14)
L2266234-13D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-13E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-14A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-14B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-14C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-14D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)

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Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2266234-14E	Vial Large Septa unpreserved (4oz)	A	NA		4.7	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-15A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-15B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-15C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-15D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-15E	Vial Large Septa unpreserved (4oz)	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-16A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-16A9	Vial MeOH preserved split	B	NA		2.5	Y	Absent		NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-16B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-16C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2266234-16D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-16E	Vial Large Septa unpreserved (4oz)	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-17A	Vial MeOH preserved	B	NA		2.5	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-17B	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-17C	Vial water preserved	B	NA		2.5	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-17D	Plastic 120ml unpreserved	B	NA		2.5	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-17E	Vial Large Septa unpreserved (4oz)	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)
L2266234-18A	Vial MeOH preserved	A	NA		4.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-18B	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-18C	Vial water preserved	A	NA		4.7	Y	Absent	23-NOV-22 23:32	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2266234-18D	Plastic 120ml unpreserved	A	NA		4.7	Y	Absent		HOLD-WETCHEM(),TS(7)
L2266234-18E	Vial Large Septa unpreserved (4oz)	B	NA		2.5	Y	Absent		HOLD-CONTINGENCY(14)

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GLOSSARY

Acronyms

DL	- Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the limit of quantitation (LOQ). The DL includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
EDL	- Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).
EMPC	- Estimated Maximum Possible Concentration: The concentration that results from the signal present at the retention time of an analyte when the ions meet all of the identification criteria except the ion abundance ratio criteria. An EMPC is a worst-case estimate of the concentration.
EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LOD	- Limit of Detection: This value represents the level to which a target analyte can reliably be detected for a specific analyte in a specific matrix by a specific method. The LOD includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
LOQ	- Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
	Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available. For Method 332.0, the spike recovery is calculated using the native concentration, including estimated values.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NDPA/DPA	- N-Nitrosodiphenylamine/Diphenylamine.
NI	- Not Ignitable.
NP	- Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.
NR	- No Results: Term is utilized when 'No Target Compounds Requested' is reported for the analysis of Volatile or Semivolatile Organic TIC only requests.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.
STLP	- Semi-dynamic Tank Leaching Procedure per EPA Method 1315.
TEF	- Toxic Equivalency Factors: The values assigned to each dioxin and furan to evaluate their toxicity relative to 2,3,7,8-TCDD.
TEQ	- Toxic Equivalent: The measure of a sample's toxicity derived by multiplying each dioxin and furan by its corresponding TEF and then summing the resulting values.
TIC	- Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.

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Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Chlordane: The target compound Chlordane (CAS No. 57-74-9) is reported for GC ECD analyses. Per EPA, this compound "refers to a mixture of chlordane isomers, other chlorinated hydrocarbons and numerous other components." (Reference: USEPA Toxicological Review of Chlordane, In Support of Summary Information on the Integrated Risk Information System (IRIS), December 1997.)

Difference: With respect to Total Oxidizable Precursor (TOP) Assay analysis, the difference is defined as the Post-Treatment value minus the Pre-Treatment value.

Final pH: As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

Frozen Date/Time: With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

Gasoline Range Organics (GRO): Gasoline Range Organics (GRO) results include all chromatographic peaks eluting from Methyl tert butyl ether through Naphthalene, with the exception of GRO analysis in support of State of Ohio programs, which includes all chromatographic peaks eluting from Hexane through Dodecane.

Initial pH: As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

PAH Total: With respect to Alkylated PAH analyses, the 'PAHs, Total' result is defined as the summation of results for all or a subset of the following compounds: Naphthalene, C1-C4 Naphthalenes, 2-Methylnaphthalene, 1-Methylnaphthalene, Biphenyl, Acenaphthylene, Acenaphthene, Fluorene, C1-C3 Fluorenes, Phenanthrene, C1-C4 Phenanthrenes/Anthracenes, Anthracene, Fluoranthene, Pyrene, C1-C4 Fluoranthenes/Pyrenes, Benz(a)anthracene, Chrysene, C1-C4 Chrysenes, Benzo(b)fluoranthene, Benzo(j)+(k)fluoranthene, Benzo(e)pyrene, Benzo(a)pyrene, Perylene, Indeno(1,2,3-cd)pyrene, Dibenz(ah)+(ac)anthracene, Benzo(g,h,i)perylene. If a 'Total' result is requested, the results of its individual components will also be reported.

PFAS Total: With respect to PFAS analyses, the 'PFAS, Total (5)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA and PFOS. In addition, the 'PFAS, Total (6)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA, PFDA and PFOS. For MassDEP DW compliance analysis only, the 'PFAS, Total (6)' result is defined as the summation of results at or above the RL. Note: If a 'Total' result is requested, the results of its individual components will also be reported.

Total: With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

Data Qualifiers

- A** - Spectra identified as "Aldol Condensates" are byproducts of the extraction/concentration procedures when acetone is introduced in the process.
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).
- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- F** - The ratio of quantifier ion response to qualifier ion response falls outside of the laboratory criteria. Results are considered to be an estimated maximum concentration.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively

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Data Qualifiers

Identified Compounds (TICs).

- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- V** - The surrogate associated with this target analyte has a recovery outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)
- Z** - The batch matrix spike and/or duplicate associated with this target analyte has a recovery/RPD outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)

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Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2266234
Report Date: 12/05/22

REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - VI, 2018.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Certification Information

The following analytes are not included in our Primary NELAP Scope of Accreditation:

Westborough Facility

EPA 624/624.1: m/p-xylene, o-xylene, Naphthalene

EPA 625/625.1: alpha-Terpineol

EPA 8260C/8260D: NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.

EPA 8270D/8270E: NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine, alpha-Terpineol; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.

SM4500: NPW: Amenable Cyanide; SCM: Total Phosphorus, TKN, NO₂, NO₃.

Mansfield Facility

SM 2540D: TSS

EPA 8082A: NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.

EPA TO-15: Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene,

3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.

Biological Tissue Matrix: EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

Westborough Facility:

Drinking Water

EPA 300.0: Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,**

EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B, SM4500NO2-B

EPA 332: Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.

Microbiology: **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.**

Non-Potable Water

SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH: Ammonia-N and Kjeldahl-N, **EPA 350.1:** Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **SM4500P-E, SM4500P-B, E, SM4500SO4-E, SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D, EPA 300:** Chloride, Sulfate, Nitrate.

EPA 624.1: Volatile Halocarbons & Aromatics,

EPA 608.3: Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs

EPA 625.1: SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.

Microbiology: **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, EPA 1600, EPA 1603, SM9222D.**

Mansfield Facility:

Drinking Water

EPA 200.7: Al, Ba, Cd, Cr, Cu, Fe, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg.**

EPA 522, EPA 537.1.

Non-Potable Water

EPA 200.7: Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.

EPA 200.8: Al, Sb, As, Be, Cd, Cr, Cu, Fe, Pb, Mn, Ni, K, Se, Ag, Na, TL, Zn.

EPA 245.1 Hg.

SM2340B

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

 NEW JERSEY CHAIN OF CUSTODY		Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105		Page <u>1</u> of <u>2</u>		Date Rec'd in Lab <u>11/23/22</u>		ALPHA Job # <u>62266234</u>	
Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193		Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288		Project Information Project Name: <u>890 Rossville</u> Project Location: <u>990 Rossville, Staten Island NY</u> Project # <u>100849501</u> (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☒ Other <u>NYS DEC EQUIS EDD</u>		Billing Information ☐ Same as Client Info PO #	
Client Information Client: <u>LANGAN</u> Address: <u>300 Kimball Dr</u> <u>Parsippany NJ 07054</u> Phone: <u>973-560-4900</u> Fax: <u>" - 4901</u> Email: <u>JFrisca@langan.com</u>		Project Manager: <u>Jessica Friscia</u> ALPHAQuote #: Turn-Around Time Standard ☐ Due Date: Rush (only if pre approved) ☐ # of Days:		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SLOS</u>		Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:			
These samples have been previously analyzed by Alpha ☐		For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.		ANALYSIS	
ALPHA Lab ID (Lab Use Only)		Sample ID		Collection Date Time		Sample Matrix		Sampler's Initials	
66234-01		208/FB-3		11/23 8:45		L1Q		KSG	
02		209/POP-4		11/23 9:00		501L		X X	
03		210/LSB-33-2.5-3		7:40		X		X	
04		211/LSB-33-4.5-5		7:55		X		X	
05		212/LSB-33-6.5-7		4:58.00		X		X	
06		213/LSB-33-9.5-10		8:05		X		X	
03		214/LSB-33-2.5-3-MS		7:45		X		X	
03		215/LSB-33-2.5-3-MSD		7:50		X		X	
07		216/LSB-34-2.5-3		8:10		X		X	
08		217/LSB-34-4.5-5		8:15		X		X	
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type V.P. A		Preservative A A	
Form No: 01-14 HC (rev. 30-Sept-2013)		Relinquished By: <u>Paul Mazzella</u>		Date/Time <u>11/23 10:30</u>		Received By: <u>Paul Mazzella</u>		Date/Time <u>11/23/22 13:00</u>	

 NEW JERSEY CHAIN OF CUSTODY		Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105		Page <u>2</u> of <u>2</u>		Date Rec'd in Lab <u>11/23/22</u>		ALPHA Job # <u>62266234</u>																					
Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193		Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288		Project Information Project Name: <u>990 Rossville</u> Project Location: <u>990 Rossville, Staten Island NY</u> Project # <u>100849501</u> (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☒ Other <u>NYS DEC EQUIS EDD</u>		Billing Information ☐ Same as Client Info PO #																					
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These samples have been previously analyzed by Alpha ☐		For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.		ANALYSIS <table border="1"> <tr> <td>HELD CVOCS</td> <td>HELD TELP VOCs</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>X</td> <td>X</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> </table>		HELD CVOCS	HELD TELP VOCs									X	X								
HELD CVOCS	HELD TELP VOCs																												
X	X																												
ALPHA Lab ID (Lab Use Only)		Sample ID		Collection Date Time		Sample Matrix		Sampler's Initials																					
<u>62234-09</u>		<u>218/LSB-34-6.5-7</u>		<u>11/23 8:20</u>		<u>Soil</u>		<u>KSG</u>																					
<u>10</u>		<u>219/LSB-34-9.5-10</u>		<u>8:25</u>																									
<u>11</u>		<u>220/LSB-35-2.5-3</u>		<u>8:50</u>																									
<u>12</u>		<u>221/LSB-35-4.5-5</u>		<u>8:55</u>																									
<u>13</u>		<u>222/LSB-35-6.5-7</u>		<u>9:05</u>																									
<u>14</u>		<u>223/LSB-35-9.5-10</u>		<u>9:10</u>																									
<u>15</u>		<u>224/LSB-36-2.5-3</u>		<u>8:25</u>																									
<u>16</u>		<u>225/LSB-36-4.5-5</u>		<u>8:30</u>																									
<u>17</u>		<u>226/LSB-36-6.5-7</u>		<u>8:35</u>																									
<u>18</u>		<u>227/LSB-36-9.5-10</u>		<u>8:40</u>																									
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>VP</u> <u>K</u> Preservative <u>A</u> <u>A</u>		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)																					
Relinquished By: <u>Paul Mazzella</u>		Date/Time <u>11/23 10:30</u>		Received By: <u>Paul Mazzella</u>		Date/Time <u>11/23/22 11:25</u>																							

JOB: L2265659 REPORT STYLE: Data Usability Report
0010: Alpha Analytical Report Cover Page - OK
0015: Sample Cross Reference Summary - OK
0060: Case Narrative - OK
0100: Volatiles Cover Page - OK
0110: Volatiles Sample Results - OK
0120: Volatiles Method Blank Report - OK
0130: Volatiles LCS Report - OK
0150: Volatiles Matrix Spike Report - OK
1180: Inorganics Cover Page - OK
1200: Wet Chemistry Sample Results - OK
1250: Wet Chemistry Duplicate Report - OK
5100: Sample Receipt & Container Information Report - OK
5200: Glossary - OK
5400: References - OK



ANALYTICAL REPORT

Lab Number:	L2265659
Client:	Langan Engineering & Environmental 300 Kimball Drive 4th Floor Parsippany, NJ 07054-2172
ATTN:	Jessica Friscia
Phone:	(973) 560-4900
Project Name:	990 ROSSVILLE
Project Number:	100849501
Report Date:	12/05/22

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NJ (MA935), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-17-00196).

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L2265659-01	139_LSB_23_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 09:35	11/21/22
L2265659-02	140_LSB_23_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 09:40	11/21/22
L2265659-03	141_LSB_23_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 09:45	11/21/22
L2265659-04	142_LSB_23_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 09:50	11/21/22
L2265659-05	143_LSB_24_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 10:10	11/21/22
L2265659-06	144_LSB_24_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 10:15	11/21/22
L2265659-07	145_LSB_24_6.5-7	WATER	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 10:25	11/21/22
L2265659-08	148_LSB_24_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 10:40	11/21/22
L2265659-09	149_LSB_25_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 10:55	11/21/22
L2265659-10	150_LSB_25_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 11:00	11/21/22
L2265659-11	151_LSB_25_4.5-5-DUP-1	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 11:02	11/21/22
L2265659-12	152_LSB_25_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 11:15	11/21/22
L2265659-13	153_LSB_25_9.5-10.0	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 11:20	11/21/22
L2265659-14	154_LSB_26_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:05	11/21/22
L2265659-15	155_LSB_26_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:10	11/21/22
L2265659-16	156_LSB_26_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:15	11/21/22
L2265659-17	157_LSB_26_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:20	11/21/22
L2265659-18	158_FB-1	WATER	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 11:30	11/21/22
L2265659-19	159_LSB_27_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:35	11/21/22
L2265659-20	160_LSB_27_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:40	11/21/22
L2265659-21	161_LSB_27_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:45	11/21/22
L2265659-22	162_LSB_27_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:50	11/21/22
L2265659-23	WC-1	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/21/22 12:25	11/21/22

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively.

When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances, the specific failure is not narrated but noted in the associated QC Outlier Summary Report, located directly after the Case Narrative. QC information is also incorporated in the Data Usability Assessment table (Format 11) of our Data Merger tool, where it can be reviewed in conjunction with the sample result, associated regulatory criteria and any associated data usability implications.

Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

HOLD POLICY - For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Alpha Project Manager and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Project Management at 800-624-9220 with any questions.

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Case Narrative (continued)

Report Submission

December 05, 2022: This is a preliminary report. The Volatile Organics analyte list has been amended on L2265659-01 through -22.

November 28, 2022: This preliminary report includes the results of the TCLP Volatiles analysis performed on L2265659-23.

November 22, 2022: This is a preliminary report.

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

Sample Receipt

L2265659-23: A sample identified as "WC-1" was received, but not listed on the Chain of Custody. At the client's request, this sample was analyzed.

L2265659-23: The sample was received in an inappropriate container for the TCLP Volatiles analysis.

Volatile Organics

L2265659-05: The sample was analyzed as a High Level Methanol in order to quantitate results within the calibration range. The result should be considered estimated, and is qualified with an E flag, for any compound that exceeded the calibration on the initial Low Level analysis. The results of both analyses are reported.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:

Melissa Sturgis Melissa Sturgis

Title: Technical Director/Representative

Date: 12/05/22

ORGANICS

VOLATILES

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-01
 Client ID: 139_LSB_23_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 09:35
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 13:29
 Analyst: LAC
 Percent Solids: 81%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	23		ug/kg	19	7.3	1
Vinyl chloride	9900		ug/kg	37	12.	1
trans-1,2-Dichloroethene	62		ug/kg	56	5.1	1
Trichloroethene	ND		ug/kg	19	5.1	1
cis-1,2-Dichloroethene	9900		ug/kg	37	6.5	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	94		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-02
 Client ID: 140_LSB_23_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 09:40
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 10:33
 Analyst: NLK
 Percent Solids: 90%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	650		ug/kg	14	5.4	1
Vinyl chloride	1300		ug/kg	28	9.3	1
trans-1,2-Dichloroethene	5.1	J	ug/kg	42	3.8	1
Trichloroethene	120		ug/kg	14	3.8	1
cis-1,2-Dichloroethene	3500		ug/kg	28	4.8	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	87		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-03

Date Collected: 11/21/22 09:45

Client ID: 141_LSB_23_6.5-7

Date Received: 11/21/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/22/22 10:53

Analyst: NLK

Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	2400		ug/kg	14	5.6	1
Vinyl chloride	600		ug/kg	29	9.6	1
trans-1,2-Dichloroethene	10	J	ug/kg	43	3.9	1
Trichloroethene	460		ug/kg	14	3.9	1
cis-1,2-Dichloroethene	3400		ug/kg	29	5.0	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	93		70-130
Dibromofluoromethane	88		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-04
 Client ID: 142_LSB_23_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 09:50
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 11:12
 Analyst: NLK
 Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	4200		ug/kg	13	5.0	1
Vinyl chloride	720		ug/kg	26	8.5	1
trans-1,2-Dichloroethene	16	J	ug/kg	38	3.5	1
Trichloroethene	820		ug/kg	13	3.5	1
cis-1,2-Dichloroethene	3700		ug/kg	26	4.5	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	92		70-130
Dibromofluoromethane	88		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-05
 Client ID: 143_LSB_24_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:10
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 11:32
 Analyst: NLK
 Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	7.1	J	ug/kg	16	6.2	1
Vinyl chloride	920		ug/kg	31	10.	1
trans-1,2-Dichloroethene	ND		ug/kg	47	4.3	1
Trichloroethene	ND		ug/kg	16	4.3	1
cis-1,2-Dichloroethene	1000		ug/kg	31	5.5	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-05
 Client ID: 143_LSB_24_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:10
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 15:56
 Analyst: LAC
 Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	0.53		ug/kg	0.26	0.10	1
Vinyl chloride	240	E	ug/kg	0.52	0.17	1
trans-1,2-Dichloroethene	0.32	J	ug/kg	0.77	0.07	1
Trichloroethene	ND		ug/kg	0.26	0.07	1
cis-1,2-Dichloroethene	52		ug/kg	0.52	0.09	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	92		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	97		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-06
 Client ID: 144_LSB_24_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:15
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 11:51
 Analyst: NLK
 Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	1400		ug/kg	16	6.3	1
Vinyl chloride	1200		ug/kg	32	11.	1
trans-1,2-Dichloroethene	7.3	J	ug/kg	48	4.4	1
Trichloroethene	280		ug/kg	16	4.4	1
cis-1,2-Dichloroethene	2800		ug/kg	32	5.7	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-07
 Client ID: 145_LSB_24_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:25
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 12:11
 Analyst: NLK
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	2000		ug/kg	14	5.7	1
Vinyl chloride	130		ug/kg	29	9.7	1
trans-1,2-Dichloroethene	ND		ug/kg	44	4.0	1
Trichloroethene	320		ug/kg	14	4.0	1
cis-1,2-Dichloroethene	2100		ug/kg	29	5.1	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	87		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-08
 Client ID: 148_LSB_24_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:40
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 12:50
 Analyst: NLK
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	3600		ug/kg	12	4.8	1
Vinyl chloride	240		ug/kg	25	8.3	1
trans-1,2-Dichloroethene	11	J	ug/kg	37	3.4	1
Trichloroethene	840		ug/kg	12	3.4	1
cis-1,2-Dichloroethene	3600		ug/kg	25	4.3	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	87		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-09

Date Collected: 11/21/22 10:55

Client ID: 149_LSB_25_2.5-3

Date Received: 11/21/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/22/22 12:31

Analyst: NLK

Percent Solids: 83%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	530		ug/kg	17	6.5	1
Vinyl chloride	4600		ug/kg	33	11.	1
trans-1,2-Dichloroethene	17	J	ug/kg	50	4.6	1
Trichloroethene	ND		ug/kg	17	4.6	1
cis-1,2-Dichloroethene	700		ug/kg	33	5.8	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	105		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	94		70-130
Dibromofluoromethane	89		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-10
 Client ID: 150_LSB_25_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:00
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 09:34
 Analyst: NLK
 Percent Solids: 64%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	50		ug/kg	35	14.	1
Vinyl chloride	8900		ug/kg	69	23.	1
trans-1,2-Dichloroethene	19	J	ug/kg	100	9.5	1
Trichloroethene	ND		ug/kg	35	9.5	1
cis-1,2-Dichloroethene	780		ug/kg	69	12.	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	89		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-11
 Client ID: 151_LSB_25_4.5-5-DUP-1
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:02
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 09:54
 Analyst: NLK
 Percent Solids: 80%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	4200		ug/kg	18	7.2	1
Vinyl chloride	4600		ug/kg	36	12.	1
trans-1,2-Dichloroethene	11	J	ug/kg	55	5.0	1
Trichloroethene	76		ug/kg	18	5.0	1
cis-1,2-Dichloroethene	720		ug/kg	36	6.4	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	93		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-12 D2
 Client ID: 152_LSB_25_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:15
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 13:10
 Analyst: LAC
 Percent Solids: 83%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	170000	E	ug/kg	180	72.	10
Vinyl chloride	1100		ug/kg	370	120	10
trans-1,2-Dichloroethene	ND		ug/kg	550	50.	10
Trichloroethene	710		ug/kg	180	50.	10
cis-1,2-Dichloroethene	2100		ug/kg	370	64.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	92		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	90		70-130
Dibromofluoromethane	88		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-12 D
 Client ID: 152_LSB_25_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:15
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/22/22 10:13

Analyst: NLK

Percent Solids: 83%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

Tetrachloroethene	170000		ug/kg	1800	720	100

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	94		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-13
 Client ID: 153_LSB_25_9.5-10.0
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:20
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 09:21
 Analyst: NLK
 Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	5600		ug/kg	19	7.6	1
Vinyl chloride	ND		ug/kg	39	13.	1
trans-1,2-Dichloroethene	ND		ug/kg	58	5.3	1
Trichloroethene	370		ug/kg	19	5.3	1
cis-1,2-Dichloroethene	2100		ug/kg	39	6.8	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-14 D2
 Client ID: 154_LSB_26_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:05
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 13:22
 Analyst: LAC
 Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	59000		ug/kg	150	57.	10
Vinyl chloride	1700		ug/kg	290	98.	10
trans-1,2-Dichloroethene	140	J	ug/kg	440	40.	10
Trichloroethene	6700		ug/kg	150	40.	10
cis-1,2-Dichloroethene	120000	E	ug/kg	290	51.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-14 D
 Client ID: 154_LSB_26_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:05
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/22/22 10:15

Analyst: NLK

Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	120000		ug/kg	2900	510	100

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-15 D2
 Client ID: 155_LSB_26_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:10
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 13:49
 Analyst: LAC
 Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	27000		ug/kg	59	23.	5
Vinyl chloride	600		ug/kg	120	39.	5
trans-1,2-Dichloroethene	27	J	ug/kg	180	16.	5
Trichloroethene	920		ug/kg	59	16.	5
cis-1,2-Dichloroethene	47000	E	ug/kg	120	20.	5

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-15 D
 Client ID: 155_LSB_26_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:10
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 10:42
 Analyst: NLK
 Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	51000		ug/kg	1200	200	50

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-16
 Client ID: 156_LSB_26_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:15
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 14:16
 Analyst: LAC
 Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	6800		ug/kg	15	5.8	1
Vinyl chloride	34		ug/kg	30	10.	1
trans-1,2-Dichloroethene	ND		ug/kg	45	4.1	1
Trichloroethene	280		ug/kg	15	4.1	1
cis-1,2-Dichloroethene	4200		ug/kg	30	5.2	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-17
 Client ID: 157_LSB_26_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:20
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 09:48
 Analyst: NLK
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	5500		ug/kg	18	7.1	1
Vinyl chloride	33	J	ug/kg	36	12.	1
trans-1,2-Dichloroethene	ND		ug/kg	54	5.0	1
Trichloroethene	350		ug/kg	18	5.0	1
cis-1,2-Dichloroethene	3100		ug/kg	36	6.3	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-18

Date Collected: 11/21/22 11:30

Client ID: 158_FB-1

Date Received: 11/21/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Water

Analytical Method: 1,8260D

Analytical Date: 11/22/22 08:35

Analyst: PID

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by GC/MS - Westborough Lab						
Tetrachloroethene	ND		ug/l	0.50	0.18	1
Vinyl chloride	ND		ug/l	1.0	0.07	1
trans-1,2-Dichloroethene	ND		ug/l	2.5	0.70	1
Trichloroethene	ND		ug/l	0.50	0.18	1
cis-1,2-Dichloroethene	ND		ug/l	2.5	0.70	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	109		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	103		70-130
Dibromofluoromethane	105		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-19

Date Collected: 11/21/22 12:35

Client ID: 159_LSB_27_2.5-3

Date Received: 11/21/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/22/22 14:43

Analyst: LAC

Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	740		ug/kg	14	5.5	1
Vinyl chloride	2700		ug/kg	28	9.4	1
trans-1,2-Dichloroethene	26	J	ug/kg	42	3.8	1
Trichloroethene	120		ug/kg	14	3.8	1
cis-1,2-Dichloroethene	27000	E	ug/kg	28	4.9	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-19 D
 Client ID: 159_LSB_27_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:35
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 11:36
 Analyst: NLK
 Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	12000		ug/kg	280	49.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-20
 Client ID: 160_LSB_27_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:40
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 17:27
 Analyst: LAC
 Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	780		ug/kg	15	5.9	1
Vinyl chloride	2800		ug/kg	30	10.	1
trans-1,2-Dichloroethene	25	J	ug/kg	45	4.1	1
Trichloroethene	120		ug/kg	15	4.1	1
cis-1,2-Dichloroethene	28000	E	ug/kg	30	5.2	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-20 D
 Client ID: 160_LSB_27_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:40
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/22/22 12:02

Analyst: NLK

Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	27000		ug/kg	600	100	20

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-21

Date Collected: 11/21/22 12:45

Client ID: 161_LSB_27_6.5-7

Date Received: 11/21/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/22/22 15:37

Analyst: LAC

Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	3000		ug/kg	15	5.9	1
Vinyl chloride	280		ug/kg	30	10.	1
trans-1,2-Dichloroethene	6.8	J	ug/kg	45	4.1	1
Trichloroethene	420		ug/kg	15	4.1	1
cis-1,2-Dichloroethene	6800		ug/kg	30	5.3	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-22
 Client ID: 162_LSB_27_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:50
 Date Received: 11/21/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/22/22 16:04
 Analyst: LAC
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	3500		ug/kg	14	5.3	1
Vinyl chloride	ND		ug/kg	27	9.1	1
trans-1,2-Dichloroethene	ND		ug/kg	41	3.7	1
Trichloroethene	460		ug/kg	14	3.7	1
cis-1,2-Dichloroethene	4200		ug/kg	27	4.8	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**SAMPLE RESULTS**

Lab ID: L2265659-23

Date Collected: 11/21/22 12:25

Client ID: WC-1

Date Received: 11/21/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 07:54

Analyst: MCM

TCLP/SPLP Ext. Date: 11/27/22 11:24

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
TCLP Volatiles by EPA 1311 - Westborough Lab						
Chloroform	3.1	J	ug/l	7.5	2.2	10
Carbon tetrachloride	ND		ug/l	5.0	1.3	10
Tetrachloroethene	57		ug/l	5.0	1.8	10
Chlorobenzene	ND		ug/l	5.0	1.8	10
1,2-Dichloroethane	ND		ug/l	5.0	1.3	10
Benzene	ND		ug/l	5.0	1.6	10
Vinyl chloride	2.2	J	ug/l	10	0.71	10
1,1-Dichloroethene	ND		ug/l	5.0	1.7	10
Trichloroethene	ND		ug/l	5.0	1.8	10
1,4-Dichlorobenzene	ND		ug/l	25	1.9	10
2-Butanone	ND		ug/l	50	19.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	96		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	93		70-130
dibromofluoromethane	105		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/22/22 07:55
Analyst: PID

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by GC/MS - Westborough Lab for sample(s): 18 Batch: WG1715277-5					
Tetrachloroethene	ND		ug/l	0.50	0.18
Vinyl chloride	ND		ug/l	1.0	0.07
trans-1,2-Dichloroethene	ND		ug/l	2.5	0.70
Trichloroethene	ND		ug/l	0.50	0.18
cis-1,2-Dichloroethene	ND		ug/l	2.5	0.70

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	108		70-130
Toluene-d8	101		70-130
4-Bromofluorobenzene	102		70-130
Dibromofluoromethane	104		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/22/22 08:18
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 05 Batch: WG1715481-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/22/22 08:18
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 01-12 Batch: WG1715483-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
 Analytical Date: 11/22/22 08:54
 Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 13-17,19-22 Batch: WG1715507-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
 Analytical Date: 11/28/22 06:45
 Analyst: MCM
 TCLP/SPLP Extraction Date: 11/27/22 11:24

Extraction Date: 11/27/22 11:24

Parameter	Result	Qualifier	Units	RL	MDL
TCLP Volatiles by EPA 1311 - Westborough Lab for sample(s): 23 Batch: WG1716661-5					
Chloroform	3.0	J	ug/l	7.5	2.2
Carbon tetrachloride	ND		ug/l	5.0	1.3
Tetrachloroethene	ND		ug/l	5.0	1.8
Chlorobenzene	ND		ug/l	5.0	1.8
1,2-Dichloroethane	ND		ug/l	5.0	1.3
Benzene	ND		ug/l	5.0	1.6
Vinyl chloride	ND		ug/l	10	0.71
1,1-Dichloroethene	ND		ug/l	5.0	1.7
Trichloroethene	ND		ug/l	5.0	1.8
1,4-Dichlorobenzene	ND		ug/l	25	1.9
2-Butanone	ND		ug/l	50	19.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	95		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	91		70-130
dibromofluoromethane	106		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by GC/MS - Westborough Lab Associated sample(s): 18 Batch: WG1715277-3 WG1715277-4								
Tetrachloroethene	88		96		70-130	9		20
Vinyl chloride	100		110		55-140	10		20
trans-1,2-Dichloroethene	93		97		70-130	4		20
Trichloroethene	94		96		70-130	2		20
cis-1,2-Dichloroethene	96		100		70-130	4		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	101		103		70-130
Toluene-d8	100		103		70-130
4-Bromofluorobenzene	97		100		70-130
Dibromofluoromethane	98		99		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 05 Batch: WG1715481-3 WG1715481-4								
Tetrachloroethene	115		110		70-130	4		30
Vinyl chloride	107		101		67-130	6		30
trans-1,2-Dichloroethene	96		93		70-130	3		30
Trichloroethene	103		101		70-130	2		30
cis-1,2-Dichloroethene	94		90		70-130	4		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	90		90		70-130
Toluene-d8	99		98		70-130
4-Bromofluorobenzene	95		94		70-130
Dibromofluoromethane	87		89		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 01-12 Batch: WG1715483-3 WG1715483-4								
Tetrachloroethene	115		110		70-130	4		30
Vinyl chloride	107		101		67-130	6		30
trans-1,2-Dichloroethene	96		93		70-130	3		30
Trichloroethene	103		101		70-130	2		30
cis-1,2-Dichloroethene	94		90		70-130	4		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	90		90		70-130
Toluene-d8	99		98		70-130
4-Bromofluorobenzene	95		94		70-130
Dibromofluoromethane	87		89		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 13-17,19-22 Batch: WG1715507-3 WG1715507-4								
Tetrachloroethene	106		102		70-130	4		30
Vinyl chloride	104		100		67-130	4		30
trans-1,2-Dichloroethene	101		98		70-130	3		30
Trichloroethene	92		90		70-130	2		30
cis-1,2-Dichloroethene	98		97		70-130	1		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	97		98		70-130
Toluene-d8	100		100		70-130
4-Bromofluorobenzene	94		97		70-130
Dibromofluoromethane	91		92		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
TCLP Volatiles by EPA 1311 - Westborough Lab Associated sample(s): 23 Batch: WG1716661-3 WG1716661-4								
Chloroform	93		94		70-130	1		20
Carbon tetrachloride	88		100		63-132	13		20
Tetrachloroethene	96		95		70-130	1		20
Chlorobenzene	91		91		75-130	0		25
1,2-Dichloroethane	84		87		70-130	4		20
Benzene	92		92		70-130	0		25
Vinyl chloride	91		91		55-140	0		20
1,1-Dichloroethene	93		92		61-145	1		25
Trichloroethene	93		92		70-130	1		25
1,4-Dichlorobenzene	88		88		70-130	0		20
2-Butanone	64		66		63-138	3		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	92		96		70-130
Toluene-d8	95		95		70-130
4-Bromofluorobenzene	89		89		70-130
dibromofluoromethane	98		100		70-130

Matrix Spike Analysis**Batch Quality Control****Project Name:** 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 01-12 QC Batch ID: WG1715483-6 WG1715483-7 QC Sample: L2265659-07 Client ID: 145_LSB_24_6.5-7												
Tetrachloroethene	2000	2900	4800	98		4800	96		70-130	1		30
Vinyl chloride	130	2900	3400	113		3300	110		67-130	2		30
trans-1,2-Dichloroethene	ND	2900	3100	106		3000	104		70-130	2		30
Trichloroethene	320	2900	3400	108		3400	106		70-130	1		30
cis-1,2-Dichloroethene	2100	2900	4800	93		4700	90		70-130	1		30

Surrogate	MS % Recovery	Qualifier	MSD % Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	90		90		70-130
4-Bromofluorobenzene	91		92		70-130
Dibromofluoromethane	89		89		70-130
Toluene-d8	98		98		70-130

INORGANICS & MISCELLANEOUS

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-01**Client ID:** 139_LSB_23_2.5-3**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 09:35**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	80.6		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-02

Client ID: 140_LSB_23_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 09:40

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	90.1		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-03

Client ID: 141_LSB_23_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 09:45

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.4		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-04**Client ID:** 142_LSB_23_9.5-10**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 09:50**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.7		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-05

Client ID: 143_LSB_24_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:10

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.1		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-06

Client ID: 144_LSB_24_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:15

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.4		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-07**Client ID:** 145_LSB_24_6.5-7**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 10:25**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.5		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-08

Client ID: 148_LSB_24_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 10:40

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.7		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-09**Client ID:** 149_LSB_25_2.5-3**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 10:55**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	83.0		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-10

Client ID: 150_LSB_25_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:00

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	64.4		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-11

Client ID: 151_LSB_25_4.5-5-DUP-1

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:02

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	80.1		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-12**Client ID:** 152_LSB_25_6.5-7**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 11:15**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	83.2		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-13

Client ID: 153_LSB_25_9.5-10.0

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 11:20

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.4		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-14

Client ID: 154_LSB_26_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:05

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	86.0		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-15**Client ID:** 155_LSB_26_4.5-5**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 12:10**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.8		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-16**Client ID:** 156_LSB_26_6.5-7**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 12:15**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	86.8		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-17

Client ID: 157_LSB_26_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:20

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.8		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-19**Client ID:** 159_LSB_27_2.5-3**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 12:35**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	86.3		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-20**Client ID:** 160_LSB_27_4.5-5**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 12:40**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	86.8		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265659**Report Date:** 12/05/22**SAMPLE RESULTS****Lab ID:** L2265659-21**Client ID:** 161_LSB_27_6.5-7**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/21/22 12:45**Date Received:** 11/21/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.8		%	0.100	NA	1	-	11/22/22 04:13	121,2540G	JD



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265659

Report Date: 12/05/22

SAMPLE RESULTS

Lab ID: L2265659-22

Client ID: 162_LSB_27_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/21/22 12:50

Date Received: 11/21/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	89.2		%	0.100	NA	1	-	11/22/22 04:58	121,2540G	JD



Lab Duplicate Analysis *Batch Quality Control*

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 01-17,19-21 QC Batch ID: WG1715134-1 QC Sample: L2265659-07 Client ID: 145_LSB_24_6.5-7						
Solids, Total	88.5	87.3	%	1		20
General Chemistry - Westborough Lab Associated sample(s): 22 QC Batch ID: WG1715142-1 QC Sample: L2264676-12 Client ID: DUP Sample						
Solids, Total	90.4	91.2	%	1		20

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

Cooler Information**Cooler** **Custody Seal**

A Absent

B Absent

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2265659-01A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-01B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-01C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-01D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-01E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-02A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-02B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-02C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-02D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-02E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-03A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-03B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-03C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-03D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-03E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-04A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-04B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-04C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-04D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-04E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-05A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265659-05B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260H(14),NYTCL-8260HLW(14)

Project Name: 990 ROSSVILLE
Project Number: 100849501

Serial_No:12052215:30
Lab Number: L2265659
Report Date: 12/05/22

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2265659-05C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265659-05D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-05E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-06A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-06B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-06C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-06D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-06E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-07A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-07A1	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-07A2	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-07B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-07B1	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-07B2	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-07C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-07C1	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-07C2	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-07D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-07E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-07E1	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-07E2	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-08A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-08B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-08C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-08D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-08E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-09A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-09B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**Container Information**

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2265659-09C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-09D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-09E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-10A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-10B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-10C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-10D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-10E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-11A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-11B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-11C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-11D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-11E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-12A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-12B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-12C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-12D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-12E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-13A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-13B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-13C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-13D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-13E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-14A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-14B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-14C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-14D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-14E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)

Project Name: 990 ROSSVILLE**Lab Number:** L2265659**Project Number:** 100849501**Report Date:** 12/05/22**Container Information**

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2265659-15A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-15B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-15C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-15D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-15E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-16A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-16B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-16C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-16D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-16E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-17A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-17B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-17C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-17D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-17E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-18A	Vial HCl preserved	B	NA		3.2	Y	Absent		NYTCL-8260(14)
L2265659-18B	Vial HCl preserved	B	NA		3.2	Y	Absent		NYTCL-8260(14)
L2265659-18C	Vial HCl preserved	B	NA		3.2	Y	Absent		NYTCL-8260(14)
L2265659-19A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-19B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-19C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-19D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-19E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-20A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-20B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-20C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-20D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-20E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)

Project Name: 990 ROSSVILLE
Project Number: 100849501

Serial_No:12052215:30
Lab Number: L2265659
Report Date: 12/05/22

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2265659-21A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-21B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-21C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-21D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-21E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-22A	Vial MeOH preserved	B	NA		3.2	Y	Absent		NYTCL-8260HLW(14)
L2265659-22B	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-22C	Vial water preserved	B	NA		3.2	Y	Absent	22-NOV-22 05:03	NYTCL-8260HLW(14)
L2265659-22D	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-22E	Plastic 120ml unpreserved	B	NA		3.2	Y	Absent		TS(7)
L2265659-23A	Vial Large Septa unpreserved (4oz)	A	NA		3.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265659-23X	Vial unpreserved Extracts	A	NA		3.7	Y	Absent		TCLP-VOA(14)
L2265659-23Y	Vial unpreserved Extracts	A	NA		3.7	Y	Absent		TCLP-VOA(14)

Project Name: 990 ROSSVILLE
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GLOSSARY

Acronyms

DL	- Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the limit of quantitation (LOQ). The DL includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
EDL	- Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).
EMPC	- Estimated Maximum Possible Concentration: The concentration that results from the signal present at the retention time of an analyte when the ions meet all of the identification criteria except the ion abundance ratio criteria. An EMPC is a worst-case estimate of the concentration.
EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LOD	- Limit of Detection: This value represents the level to which a target analyte can reliably be detected for a specific analyte in a specific matrix by a specific method. The LOD includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
LOQ	- Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.) Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available. For Method 332.0, the spike recovery is calculated using the native concentration, including estimated values.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NDPA/DPA	- N-Nitrosodiphenylamine/Diphenylamine.
NI	- Not Ignitable.
NP	- Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.
NR	- No Results: Term is utilized when 'No Target Compounds Requested' is reported for the analysis of Volatile or Semivolatile Organic TIC only requests.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.
STLP	- Semi-dynamic Tank Leaching Procedure per EPA Method 1315.
TEF	- Toxic Equivalency Factors: The values assigned to each dioxin and furan to evaluate their toxicity relative to 2,3,7,8-TCDD.
TEQ	- Toxic Equivalent: The measure of a sample's toxicity derived by multiplying each dioxin and furan by its corresponding TEF and then summing the resulting values.
TIC	- Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.

Report Format: DU Report with 'J' Qualifiers



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Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Chlordane: The target compound Chlordane (CAS No. 57-74-9) is reported for GC ECD analyses. Per EPA, this compound "refers to a mixture of chlordane isomers, other chlorinated hydrocarbons and numerous other components." (Reference: USEPA Toxicological Review of Chlordane, In Support of Summary Information on the Integrated Risk Information System (IRIS), December 1997.)

Difference: With respect to Total Oxidizable Precursor (TOP) Assay analysis, the difference is defined as the Post-Treatment value minus the Pre-Treatment value.

Final pH: As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

Frozen Date/Time: With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

Gasoline Range Organics (GRO): Gasoline Range Organics (GRO) results include all chromatographic peaks eluting from Methyl tert butyl ether through Naphthalene, with the exception of GRO analysis in support of State of Ohio programs, which includes all chromatographic peaks eluting from Hexane through Dodecane.

Initial pH: As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

PAH Total: With respect to Alkylated PAH analyses, the 'PAHs, Total' result is defined as the summation of results for all or a subset of the following compounds: Naphthalene, C1-C4 Naphthalenes, 2-Methylnaphthalene, 1-Methylnaphthalene, Biphenyl, Acenaphthylene, Acenaphthene, Fluorene, C1-C3 Fluorenes, Phenanthrene, C1-C4 Phenanthrenes/Anthracenes, Anthracene, Fluoranthene, Pyrene, C1-C4 Fluoranthenes/Pyrenes, Benz(a)anthracene, Chrysene, C1-C4 Chrysenes, Benzo(b)fluoranthene, Benzo(j)+(k)fluoranthene, Benzo(e)pyrene, Benzo(a)pyrene, Perylene, Indeno(1,2,3-cd)pyrene, Dibenz(ah)+(ac)anthracene, Benzo(g,h,i)perylene. If a 'Total' result is requested, the results of its individual components will also be reported.

PFAS Total: With respect to PFAS analyses, the 'PFAS, Total (5)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA and PFOS. In addition, the 'PFAS, Total (6)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA, PFDA and PFOS. For MassDEP DW compliance analysis only, the 'PFAS, Total (6)' result is defined as the summation of results at or above the RL. Note: If a 'Total' result is requested, the results of its individual components will also be reported.

Total: With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

Data Qualifiers

- A** - Spectra identified as "Aldol Condensates" are byproducts of the extraction/concentration procedures when acetone is introduced in the process.
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).
- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- F** - The ratio of quantifier ion response to qualifier ion response falls outside of the laboratory criteria. Results are considered to be an estimated maximum concentration.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively

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Data Qualifiers

Identified Compounds (TICs).

- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- V** - The surrogate associated with this target analyte has a recovery outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)
- Z** - The batch matrix spike and/or duplicate associated with this target analyte has a recovery/RPD outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)

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Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265659
Report Date: 12/05/22

REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - VI, 2018.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Alpha Analytical, Inc.

ID No.:17873

Facility: **Company-wide**

Revision 19

Department: **Quality Assurance**

Published Date: 4/2/2021 1:14:23 PM

Title: **Certificate/Approval Program Summary**

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Certification Information

The following analytes are not included in our Primary NELAP Scope of Accreditation:

Westborough Facility**EPA 624/624.1:** m/p-xylene, o-xylene, Naphthalene**EPA 625/625.1:** alpha-Terpineol**EPA 8260C/8260D:** NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.**EPA 8270D/8270E:** NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine, alpha-Terpineol; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.**SM4500:** NPW: Amenable Cyanide; SCM: Total Phosphorus, TKN, NO₂, NO₃.**Mansfield Facility****SM 2540D:** TSS**EPA 8082A:** NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.**EPA TO-15:** Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene,

3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.

Biological Tissue Matrix: EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

Westborough Facility:**Drinking Water****EPA 300.0:** Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,****EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B, SM4500NO2-B****EPA 332:** Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.**Microbiology:** **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.****Non-Potable Water****SM4500H-B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH:** Ammonia-N and Kjeldahl-N, **EPA 350.1:**Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **SM4500P-E, SM4500P-B, E, SM4500SO4-E,****SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D, EPA 300:** Chloride, Sulfate, Nitrate.**EPA 624.1:** Volatile Halocarbons & Aromatics,**EPA 608.3:** Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II,

Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs

EPA 625.1: SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.**Microbiology:** **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, EPA 1600, EPA 1603, SM9222D.****Mansfield Facility:****Drinking Water****EPA 200.7:** Al, Ba, Cd, Cr, Cu, Fe, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg.****EPA 522, EPA 537.1.****Non-Potable Water****EPA 200.7:** Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.**EPA 200.8:** Al, Sb, As, Be, Cd, Cr, Cu, Fe, Pb, Mn, Ni, K, Se, Ag, Na, TL, Zn.**EPA 245.1 Hg.****SM2340B**

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

 NEW JERSEY CHAIN OF CUSTODY	Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105		Page <u>1</u> of <u>3</u>		Date Rec'd in Lab <u>11/21/22</u>		ALPHA Job # <u>L2265659</u>								
	Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193		Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288		Project Information Project Name: <u>990 Rossville</u> Project Location: <u>990 Rossville, Staten Island NY</u> Project # <u>100849501</u> (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUS (3 File) ☐ EQUS (4 File) ☒ Other <u>EQUS EDD</u>		Billing Information ☐ Same as Client Info PO #						
	Client Information Client: <u>LANGAN</u> Address: <u>300 Kimball Dr</u> <u>Parsippany NJ 07054</u> Phone: <u>973-560-4900</u> Fax: <u>" " 4901</u> Email: <u>Jfriscia@langan.com</u>		Project Manager: <u>Jessica Friscia</u> ALPHAQuote #: Turn-Around Time Standard ☐ Due Date: <u>1 Day TAT</u> Rush (only if pre approved) ☒ # of Days:		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SCOS</u>		Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:								
These samples have been previously analyzed by Alpha ☐						ANALYSIS				Sample Filtration ☐ Done ☐ Lab to do Preservation ☐ Lab to do (Please Specify below)					
For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.						Sample Specific Comments					
ALPHA Lab ID (Lab Use Only)		Sample ID		Collection		Sample Matrix		Sampler's Initials		C/VOCs		HELD TOLP/VOC		Total Bottles	
				Date	Time										
<u>65659-01</u>		<u>139/LSB-23-2.5-3</u>		<u>11/21</u>	<u>9:35</u>	<u>Soil</u>		<u>KSG</u>		<u>X</u>	<u>X</u>				
<u>02</u>		<u>140/LSB-23-4.5-5</u>			<u>9:40</u>					<u>X</u>	<u>X</u>				
<u>03</u>		<u>141/LSB-23-6.5-7</u>			<u>9:45</u>					<u>X</u>	<u>X</u>				
<u>04</u>		<u>142/LSB-23-9.5-10</u>			<u>9:50</u>					<u>X</u>	<u>X</u>				
<u>05</u>		<u>143/LSB-24-2.5-3</u>			<u>10:10</u>					<u>X</u>	<u>X</u>				
<u>06</u>		<u>144/LSB-24-4.5-5</u>			<u>10:15</u>					<u>X</u>	<u>X</u>				
<u>07</u>		<u>145/LSB-24-6.5-7</u>			<u>10:25</u>					<u>X</u>	<u>X</u>				
<u>- 07 08</u>		<u>146/LSB-24-6.5-7-MS</u>			<u>10:30</u>					<u>X</u>					
<u>- 07 09</u>		<u>147/LSB-24-6.5-7-MSD</u>			<u>10:35</u>					<u>X</u>					
<u>- 08 10</u>		<u>148/LSB-24-9.5-10</u>			<u>10:40</u>					<u>X</u>	<u>X</u>				
Preservative Code: <u>MK</u> A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code <u>11/21</u> P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>VP A</u>		Preservative <u>A A</u>		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)					
Relinquished By: <u>R.A. Bolyard</u> <u>Tyler McKenna</u> <u>Chadwick</u>		Date/Time <u>11/21</u> <u>11/21/22 1756</u> <u>11/21/22 2110</u> <u>11/21/22 2310</u>		Received By: <u>Tyler McKenna</u> <u>Chadwick</u> <u>Chadwick</u>		Date/Time <u>11/21/22 1340</u> <u>11/21/22 1930</u> <u>11/21/22 2110</u> <u>11/21/22 2310</u>									

 NEW JERSEY CHAIN OF CUSTODY	Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105	Page <u>2</u>	Date Rec'd in Lab <u>11/21/22</u>	ALPHA Job # <u>L2265659</u>							
		of <u>3</u>									
Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193	Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288	Project Information Project Name: <u>990 Rossville</u> Project Location: <u>990 Rossville, Staten Island NY</u> Project # <u>100849501</u> (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☒ Other <u>NYSPEC EQUIS EDD</u>		Billing Information ☐ Same as Client Info PO #					
Client Information Client: <u>LANGAN</u> Address: <u>300 Kimball Dr</u> <u>Parsippany NJ 07054</u> Phone: <u>973-560-4900</u> Fax: <u>973-560-4901</u> Email: <u>Jfriscia@langan.com</u>		Project Manager: <u>Jessica Friscia</u> ALPHAQuote #: Turn-Around Time Standard ☐ Due Date: <u>1 Day</u> Rush (only if pre approved) ☒ # of Days: <u>TAT</u>		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SCOS</u>		Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:					
These samples have been previously analyzed by Alpha ☐						ANALYSIS		Sample Filtration ☐ Done ☐ Lab to do Preservation ☐ Lab to do (Please Specify below)			
For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.						CVOCS HELD TUP VA	
ALPHA Lab ID (Lab Use Only)	Sample ID	Collection		Sample Matrix	Sampler's Initials					Sample Specific Comments	
		Date	Time								
65659-09	149/LSB-25-2.5-3	11/21	10:55	Soil	KSG	X	X				
-10	150/LSB-25-4.5-5		11:00			X	X				
-11	151/LSB-25-4.5-5-DUP-1		11:02			X	X				
-12	152/LSB-25-6.5-7		11:15			X	X				
-13	153/LSB-25-9.5-10		11:20			X	X				
-14	154/LSB-26-2.5-3		12:05			X	X				
-15	155/LSB-26-4.5-5		12:10			X	X				
-16	156/LSB-26-6.5-7		12:15			X	X				
-17	157/LSB-26-9.5-10		12:20			X	X				
-18	158/FB-1		11:30	water		X	X				
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>VIP A</u> Preservative <u>A A</u>		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)			
Relinquished By: <u>K.A. Boly</u> <u>Tyler M/Ken</u> <u>11/21/22 2110</u> <u>11/21/22 2300</u>		Date/Time <u>11/21</u> <u>11/21/22 1750</u> <u>11/21/22 2110</u> <u>11/21/22 2300</u>		Received By: <u>Tyler M/Ken</u> <u>(Signature)</u> <u>(Signature)</u>		Date/Time <u>11/21/22 1340</u> <u>11/21/22 1930</u> <u>11/21/22 2110</u> <u>11/21/22 2310</u>					
Form No: 01-14 HC (rev. 30-Sept-2013)											

 NEW JERSEY CHAIN OF CUSTODY Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193 Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288	Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105		Page <u>3</u> of <u>3</u>		Date Rec'd in Lab <u>11/21/22</u>		ALPHA Job # <u>L7765659</u>			
	Project Information Project Name: <u>990 Rossville</u> Project Location: <u>990 Rossville, Staten Island, NY</u> Project # <u>100849501</u> (Use Project name as Project #) ☐				Deliverables ☐ NJ Full / Reduced ☐ EQuIS (1 File) ☐ EQuIS (4 File) ☒ Other <u>NYSDEC EQuIS ERD</u>				Billing Information ☐ Same as Client Info PO #	
	Client Information Client: <u>LANGAN</u> Address: <u>300 Kimball Dr</u> <u>Parsippany NJ 07054</u> Phone: <u>973-560-5600</u> Fax: <u>973-560-4901</u> Email: <u>jfriscia@lengan.com</u>				Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SCOS</u>				Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:	
Turn-Around Time Standard ☐ Due Date: <u>1 Day</u> Rush (only if pre approved) ☒ # of Days: <u>TAT</u>				ANALYSIS						
These samples have been previously analyzed by Alpha ☐				Sample Filtration ☐ Done ☐ Lab to do Preservation ☐ Lab to do (Please Specify below)				Total Bottles		
For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.					ANALYSIS CVOCs HELD TCEP VOC	
ALPHA Lab ID (Lab Use Only)		Sample ID		Collection Date Time		Sample Matrix Sampler's Initials				
<u>65659-19</u>		<u>159/L5B-27-2.5-3</u>		<u>11/21 12:35</u>		<u>Soil KSG</u>				
<u>-20</u>		<u>160/L5B-27-4.5-5</u>		<u>12:40</u>		<u>1</u>				
<u>-21</u>		<u>161/L5B-27-6.5-7</u>		<u>12:45</u>		<u>1</u>				
<u>-22</u>		<u>162/L5B-27-9.5-10</u>		<u>12:50</u>		<u>1</u>				
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>V.P</u> <u>A</u> Preservative <u>A</u> <u>A</u>				
Form No: 01-14 HC (rev. 30-Sept-2013)		Relinquished By: <u>K.A. Doherty</u> <u>Tyler M. Kenne</u> <u>11/21/22 2110</u> <u>11/21/22 2310</u>		Date/Time <u>11/21</u> <u>11/21/22 1756</u> <u>11/21/22 2110</u> <u>11/21/22 2310</u>		Received By: <u>Tyler M. Kenne</u> <u>11/21/22 1340</u> <u>11/21/22 1930</u> <u>11/21/22 2110</u> <u>11/21/22 2310</u>				
Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)										

JOB: L2265979 REPORT STYLE: Data Usability Report
0010: Alpha Analytical Report Cover Page - OK
0015: Sample Cross Reference Summary - OK
0060: Case Narrative - OK
0100: Volatiles Cover Page - OK
0110: Volatiles Sample Results - OK
0120: Volatiles Method Blank Report - OK
0130: Volatiles LCS Report - OK
0150: Volatiles Matrix Spike Report - OK
1180: Inorganics Cover Page - OK
1200: Wet Chemistry Sample Results - OK
1250: Wet Chemistry Duplicate Report - OK
5100: Sample Receipt & Container Information Report - OK
5200: Glossary - OK
5400: References - OK



ANALYTICAL REPORT

Lab Number:	L2265979
Client:	Langan Engineering & Environmental 300 Kimball Drive 4th Floor Parsippany, NJ 07054-2172
ATTN:	Jessica Friscia
Phone:	(973) 560-4900
Project Name:	990 ROSSVILLE
Project Number:	100849501
Report Date:	11/30/22

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Certifications & Approvals: MA (M-MA086), NH NELAP (2064), CT (PH-0574), IL (200077), ME (MA00086), MD (348), NJ (MA935), NY (11148), NC (25700/666), PA (68-03671), RI (LAO00065), TX (T104704476), VT (VT-0935), VA (460195), USDA (Permit #P330-17-00196).

Eight Walkup Drive, Westborough, MA 01581-1019
508-898-9220 (Fax) 508-898-9193 800-624-9220 - www.alphalab.com



Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L2265979-01	163/FB-2	WATER	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 11:25	11/22/22
L2265979-02	164/WC-2	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:45	11/22/22
L2265979-03	165/LSB-28_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 08:55	11/22/22
L2265979-04	166/167/168/LSB-28_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 09:00	11/22/22
L2265979-05	169/LSB-28_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 09:20	11/22/22
L2265979-06	170/LSB-28_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 09:25	11/22/22
L2265979-07	171/LSB-29_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 08:20	11/22/22
L2265979-08	172/LSB-29_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 08:25	11/22/22
L2265979-09	183/LSB-31_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:25	11/22/22
L2265979-10	184/LSB-32_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:30	11/22/22
L2265979-11	185/DUP-2	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:35	11/22/22
L2265979-12	186/LSB-32_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:40	11/22/22
L2265979-13	187/LSB-32_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:45	11/22/22
L2265979-14	188/LSB-32_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:50	11/22/22
L2265979-15	189/LSB-38_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 11:45	11/22/22
L2265979-16	190/LSB-38_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 11:50	11/22/22
L2265979-17	191/LSB-38_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 11:55	11/22/22
L2265979-18	192/LSB-38_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:00	11/22/22
L2265979-19	173/DUP-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 08:30	11/22/22
L2265979-20	174/LSB-29_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 08:40	11/22/22
L2265979-21	175/LSB-29_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 08:45	11/22/22
L2265979-22	176/LSB-30_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 09:32	11/22/22
L2265979-23	177/LSB-30_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 09:36	11/22/22
L2265979-24	178/LSB-30_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 09:43	11/22/22

Alpha Sample ID	Client ID	Matrix	Sample Location	Collection Date/Time	Receive Date
L2265979-25	179/LSB-30_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 09:48	11/22/22
L2265979-26	180/LSB-31_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:00	11/22/22
L2265979-27	181/LSB-31_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:05	11/22/22
L2265979-28	182/206/207/LSB-31_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:10	11/22/22
L2265979-29	193/LSB-37_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 13:10	11/22/22
L2265979-30	194/LSB-37_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 13:15	11/22/22
L2265979-31	195/LSB-37_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 13:20	11/22/22
L2265979-32	196/LSB-37_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 10:25	11/22/22
L2265979-33	197/LSB-39_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:10	11/22/22
L2265979-34	198/LSB-39_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:15	11/22/22
L2265979-35	199/LSB-39_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:20	11/22/22
L2265979-36	200/LSB-39_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:25	11/22/22
L2265979-37	201/LSB-40_2.5-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:30	11/22/22
L2265979-38	202/LSB-40_4.5-5	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:35	11/22/22
L2265979-39	203/LSB-40_6.5-7	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:40	11/22/22
L2265979-40	204/LSB-40_9.5-10	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:45	11/22/22
L2265979-41	205/WC-3	SOIL	990 ROSSVILLE, STATEN ISLAND, NY	11/22/22 12:50	11/22/22

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Case Narrative

The samples were received in accordance with the Chain of Custody and no significant deviations were encountered during the preparation or analysis unless otherwise noted. Sample Receipt, Container Information, and the Chain of Custody are located at the back of the report.

Results contained within this report relate only to the samples submitted under this Alpha Lab Number and meet NELAP requirements for all NELAP accredited parameters unless otherwise noted in the following narrative. The data presented in this report is organized by parameter (i.e. VOC, SVOC, etc.). Sample specific Quality Control data (i.e. Surrogate Spike Recovery) is reported at the end of the target analyte list for each individual sample, followed by the Laboratory Batch Quality Control at the end of each parameter. Tentatively Identified Compounds (TICs), if requested, are reported for compounds identified to be present and are not part of the method/program Target Compound List, even if only a subset of the TCL are being reported. If a sample was re-analyzed or re-extracted due to a required quality control corrective action and if both sets of data are reported, the Laboratory ID of the re-analysis or re-extraction is designated with an "R" or "RE", respectively.

When multiple Batch Quality Control elements are reported (e.g. more than one LCS), the associated samples for each element are noted in the grey shaded header line of each data table. Any Laboratory Batch, Sample Specific % recovery or RPD value that is outside the listed Acceptance Criteria is bolded in the report. In reference to questions H (CAM) or 4 (RCP) when "NO" is checked, the performance criteria for CAM and RCP methods allow for some quality control failures to occur and still be within method compliance. In these instances, the specific failure is not narrated but noted in the associated QC Outlier Summary Report, located directly after the Case Narrative. QC information is also incorporated in the Data Usability Assessment table (Format 11) of our Data Merger tool, where it can be reviewed in conjunction with the sample result, associated regulatory criteria and any associated data usability implications.

Soil/sediments, solids and tissues are reported on a dry weight basis unless otherwise noted. Definitions of all data qualifiers and acronyms used in this report are provided in the Glossary located at the back of the report.

HOLD POLICY - For samples submitted on hold, Alpha's policy is to hold samples (with the exception of Air canisters) free of charge for 21 calendar days from the date the project is completed. After 21 calendar days, we will dispose of all samples submitted including those put on hold unless you have contacted your Alpha Project Manager and made arrangements for Alpha to continue to hold the samples. Air canisters will be disposed after 3 business days from the date the project is completed.

Please contact Project Management at 800-624-9220 with any questions.

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Case Narrative (continued)

Report Submission

November 30, 2022: This is a preliminary report.

All non-detect (ND) or estimated concentrations (J-qualified) have been quantitated to the limit noted in the MDL column.

Sample Receipt

The analyses performed were specified by the client.

L2265979-01: A sample identified as "163/FB-2" for TCLP Volatile Organics was listed on the Chain of Custody, but not received. This was verified by the client.

L2265979-01 through -41: Discrepancies were noted between the sample labels and chain of custody. At the client's request, all samples are identified as listed on the chain of custody.

Volatile Organics

L2265979-11 and -21: The sample was analyzed as a High Level Methanol in order to quantitate results within the calibration range. The result should be considered estimated, and is qualified with an E flag, for any compound that exceeded the calibration on the initial Low Level analysis. The results of both analyses are reported. Differences were noted between the results of the analyses which have been attributed to vial discrepancies.

L2265979-18: The sample was analyzed as a High Level Methanol based upon screen results. The sample was then analyzed as a Low Level in order to achieve lower reporting limits. The results of both analyses are reported. Differences were noted between the results of the analyses which have been attributed to vial discrepancies.

L2265979-18: The surrogate recovery is below the acceptance criteria for dibromofluoromethane (41%), possibly due to the matrix effect caused by the high pH of the sample (>10).

L2265979-25 and -34: The sample was analyzed as a High Level Methanol in order to quantitate results within the calibration range. The result should be considered estimated, and is qualified with an E flag, for any

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Case Narrative (continued)

compound that exceeded the calibration on the initial Low Level analysis. The results of both analyses are reported.

The WG1717453-6/-7 MS/MSD recoveries, performed on L2265979-28, are outside the acceptance criteria for tetrachloroethene (0%/0%). The unacceptable percent recoveries are attributed to the elevated concentrations of target compounds present in the native sample.

I, the undersigned, attest under the pains and penalties of perjury that, to the best of my knowledge and belief and based upon my personal inquiry of those responsible for providing the information contained in this analytical report, such information is accurate and complete. This certificate of analysis is not complete unless this page accompanies any and all pages of this report.

Authorized Signature:



Cristin Walker

Title: Technical Director/Representative

Date: 11/30/22

ORGANICS

VOLATILES

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-02

Date Collected: 11/22/22 10:45

Client ID: 164/WC-2

Date Received: 11/22/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/30/22 15:03

Analyst: LAC

TCLP/SPLP Ext. Date: 11/29/22 11:05

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
TCLP Volatiles by EPA 1311 - Westborough Lab						
Chloroform	3.7	J	ug/l	7.5	2.2	10
Carbon tetrachloride	ND		ug/l	5.0	1.3	10
Tetrachloroethene	300		ug/l	5.0	1.8	10
Chlorobenzene	ND		ug/l	5.0	1.8	10
1,2-Dichloroethane	ND		ug/l	5.0	1.3	10
Benzene	ND		ug/l	5.0	1.6	10
Vinyl chloride	8.8	J	ug/l	10	0.71	10
1,1-Dichloroethene	ND		ug/l	5.0	1.7	10
Trichloroethene	6.0		ug/l	5.0	1.8	10
1,4-Dichlorobenzene	ND		ug/l	25	1.9	10
2-Butanone	ND		ug/l	50	19.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	115		70-130
Toluene-d8	92		70-130
4-Bromofluorobenzene	85		70-130
dibromofluoromethane	120		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-03

Date Collected: 11/22/22 08:55

Client ID: 165/LSB-28_2.5-3

Date Received: 11/22/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 13:44

Analyst: NLK

Percent Solids: 84%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	ND		ug/kg	18	6.9	1
Vinyl chloride	430		ug/kg	35	12.	1
trans-1,2-Dichloroethene	58		ug/kg	53	4.8	1
Trichloroethene	34		ug/kg	18	4.8	1
cis-1,2-Dichloroethene	2200		ug/kg	35	6.2	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	109		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	113		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-04
Client ID: 166/167/168/LSB-28_4.5-5
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:00
Date Received: 11/22/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 11/30/22 05:29
Analyst: JIC
Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	58		ug/kg	15	6.1	1
Vinyl chloride	240		ug/kg	31	10.	1
trans-1,2-Dichloroethene	160		ug/kg	46	4.2	1
Trichloroethene	480		ug/kg	15	4.2	1
cis-1,2-Dichloroethene	4600		ug/kg	31	5.4	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	111		70-130
Toluene-d8	109		70-130
4-Bromofluorobenzene	114		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-05
 Client ID: 169/LSB-28_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:20
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 14:36
 Analyst: NLK
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	1200		ug/kg	15	5.9	1
Vinyl chloride	150		ug/kg	30	10.	1
trans-1,2-Dichloroethene	48		ug/kg	45	4.1	1
Trichloroethene	380		ug/kg	15	4.1	1
cis-1,2-Dichloroethene	2400		ug/kg	30	5.3	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	110		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	114		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-06
 Client ID: 170/LSB-28_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:25
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 03:44
 Analyst: JIC
 Percent Solids: 90%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	1700		ug/kg	12	4.6	1
Vinyl chloride	65		ug/kg	24	7.9	1
trans-1,2-Dichloroethene	12	J	ug/kg	35	3.2	1
Trichloroethene	560		ug/kg	12	3.2	1
cis-1,2-Dichloroethene	3200		ug/kg	24	4.1	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	114		70-130
Toluene-d8	109		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	89		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-07 D2
 Client ID: 171/LSB-29_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:20
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 03:06
 Analyst: JIC
 Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	55000	E	ug/kg	65	25.	4
Vinyl chloride	12000		ug/kg	130	44.	4
trans-1,2-Dichloroethene	66	J	ug/kg	200	18.	4
Trichloroethene	5600		ug/kg	65	18.	4
cis-1,2-Dichloroethene	40000	E	ug/kg	130	23.	4

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-07 D
 Client ID: 171/LSB-29_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:20
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 17:26
 Analyst: NLK
 Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	60000		ug/kg	160	64.	10
cis-1,2-Dichloroethene	46000		ug/kg	320	57.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	104		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	107		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-08 D2
 Client ID: 172/LSB-29_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:25
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 04:10
 Analyst: JIC
 Percent Solids: 82%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	2000000	E	ug/kg	2000	800	100
Vinyl chloride	3900	J	ug/kg	4100	1400	100
trans-1,2-Dichloroethene	ND		ug/kg	6100	560	100
Trichloroethene	38000		ug/kg	2000	560	100
cis-1,2-Dichloroethene	49000		ug/kg	4100	710	100

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	109		70-130
Toluene-d8	110		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	87		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-08 D
 Client ID: 172/LSB-29_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:25
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 15:29

Analyst: NLK

Percent Solids: 82%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

Tetrachloroethene	2300000		ug/kg	10000	4000	500

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	109		70-130
Toluene-d8	107		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-09
 Client ID: 183/LSB-31_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:25
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 03:33
 Analyst: JIC
 Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	2500		ug/kg	16	6.5	1
Vinyl chloride	110		ug/kg	33	11.	1
trans-1,2-Dichloroethene	ND		ug/kg	50	4.5	1
Trichloroethene	220		ug/kg	16	4.5	1
cis-1,2-Dichloroethene	6900		ug/kg	33	5.8	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-10
 Client ID: 184/LSB-32_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:30
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 04:37
 Analyst: JIC
 Percent Solids: 82%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	170		ug/kg	17	6.8	1
Vinyl chloride	570		ug/kg	35	12.	1
trans-1,2-Dichloroethene	17	J	ug/kg	52	4.8	1
Trichloroethene	24		ug/kg	17	4.8	1
cis-1,2-Dichloroethene	6000		ug/kg	35	6.1	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	112		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	114		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-11
Client ID: 185/DUP-2
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:35
Date Received: 11/22/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 11/28/22 16:21
Analyst: NLK
Percent Solids: 84%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	37		ug/kg	16	6.2	1
Vinyl chloride	480		ug/kg	32	11.	1
trans-1,2-Dichloroethene	ND		ug/kg	48	4.4	1
Trichloroethene	ND		ug/kg	16	4.4	1
cis-1,2-Dichloroethene	1200		ug/kg	32	5.6	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	110		70-130
Toluene-d8	109		70-130
4-Bromofluorobenzene	114		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-11
Client ID: 185/DUP-2
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:35
Date Received: 11/22/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 11/30/22 03:18
Analyst: JIC
Percent Solids: 84%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	1.7		ug/kg	0.29	0.11	1
Vinyl chloride	99		ug/kg	0.58	0.20	1
trans-1,2-Dichloroethene	0.18	J	ug/kg	0.88	0.08	1
Trichloroethene	0.18	J	ug/kg	0.29	0.08	1
cis-1,2-Dichloroethene	200	E	ug/kg	0.58	0.10	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	112		70-130
Toluene-d8	111		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-12

Date Collected: 11/22/22 10:40

Client ID: 186/LSB-32_4.5-5

Date Received: 11/22/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 16:47

Analyst: NLK

Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	370		ug/kg	25	9.7	1
Vinyl chloride	1200		ug/kg	50	17.	1
trans-1,2-Dichloroethene	ND		ug/kg	74	6.8	1
Trichloroethene	56		ug/kg	25	6.8	1
cis-1,2-Dichloroethene	3100		ug/kg	50	8.7	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	109		70-130
Toluene-d8	109		70-130
4-Bromofluorobenzene	115		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-13

Client ID: 187/LSB-32_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:45

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 12:52

Analyst: NLK

Percent Solids: 82%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	3.9		ug/kg	0.20	0.08	1
Vinyl chloride	38		ug/kg	0.39	0.13	1
trans-1,2-Dichloroethene	1.4		ug/kg	0.59	0.05	1
Trichloroethene	21		ug/kg	0.20	0.05	1
cis-1,2-Dichloroethene	82		ug/kg	0.39	0.07	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	106		70-130
Toluene-d8	109		70-130
4-Bromofluorobenzene	117		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-14
 Client ID: 188/LSB-32_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:50
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 05:03
 Analyst: JIC
 Percent Solids: 90%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	5700		ug/kg	18	7.0	1
Vinyl chloride	120		ug/kg	36	12.	1
trans-1,2-Dichloroethene	13	J	ug/kg	53	4.9	1
Trichloroethene	900		ug/kg	18	4.9	1
cis-1,2-Dichloroethene	9300		ug/kg	36	6.2	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	108		70-130
Toluene-d8	110		70-130
4-Bromofluorobenzene	116		70-130
Dibromofluoromethane	87		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-15
 Client ID: 189/LSB-38_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 11:45
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 13:18
 Analyst: NLK
 Percent Solids: 84%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	1.5		ug/kg	0.20	0.08	1
Vinyl chloride	0.24	J	ug/kg	0.41	0.14	1
trans-1,2-Dichloroethene	ND		ug/kg	0.61	0.06	1
Trichloroethene	0.06	J	ug/kg	0.20	0.06	1
cis-1,2-Dichloroethene	0.12	J	ug/kg	0.41	0.07	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	107		70-130
Toluene-d8	108		70-130
4-Bromofluorobenzene	117		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-16

Client ID: 190/LSB-38_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 11:50

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 11:43

Analyst: NLK

Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	6.0		ug/kg	0.22	0.08	1
Vinyl chloride	0.23	J	ug/kg	0.43	0.14	1
trans-1,2-Dichloroethene	ND		ug/kg	0.64	0.06	1
Trichloroethene	0.19	J	ug/kg	0.22	0.06	1
cis-1,2-Dichloroethene	3.4		ug/kg	0.43	0.08	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	102		70-130
Dibromofluoromethane	111		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-17
 Client ID: 191/LSB-38_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 11:55
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 02:39
 Analyst: JIC
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	5900		ug/kg	15	6.1	1
Vinyl chloride	ND		ug/kg	31	10.	1
trans-1,2-Dichloroethene	ND		ug/kg	46	4.2	1
Trichloroethene	400		ug/kg	15	4.2	1
cis-1,2-Dichloroethene	5000		ug/kg	31	5.4	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-18
Client ID: 192/LSB-38_9.5-10
Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:00
Date Received: 11/22/22
Field Prep: Not Specified

Sample Depth:

Matrix: Soil
Analytical Method: 1,8260D
Analytical Date: 11/28/22 13:02
Analyst: NLK
Percent Solids: 91%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	750		ug/kg	11	4.4	1
Vinyl chloride	16	J	ug/kg	22	7.5	1
trans-1,2-Dichloroethene	ND		ug/kg	33	3.0	1
Trichloroethene	43		ug/kg	11	3.0	1
cis-1,2-Dichloroethene	66		ug/kg	22	3.9	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	107		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	101		70-130
Dibromofluoromethane	105		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-18
 Client ID: 192/LSB-38_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:00
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/29/22 23:06
 Analyst: JIC
 Percent Solids: 91%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	120		ug/kg	0.23	0.09	1
Vinyl chloride	2.4		ug/kg	0.46	0.15	1
trans-1,2-Dichloroethene	ND		ug/kg	0.69	0.06	1
Trichloroethene	4.8		ug/kg	0.23	0.06	1
cis-1,2-Dichloroethene	28		ug/kg	0.46	0.08	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	41	Q	70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-19 D2
 Client ID: 173/DUP-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:30
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 04:00
 Analyst: JIC
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	39000	E	ug/kg	41	16.	2
Vinyl chloride	400		ug/kg	83	28.	2
trans-1,2-Dichloroethene	ND		ug/kg	120	11.	2
Trichloroethene	2900		ug/kg	41	11.	2
cis-1,2-Dichloroethene	8400		ug/kg	83	14.	2

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-19 D
 Client ID: 173/DUP-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:30
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 13:29
 Analyst: NLK
 Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

Tetrachloroethene	45000		ug/kg	210	81.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	108		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	108		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-20

Date Collected: 11/22/22 08:40

Client ID: 174/LSB-29_6.5-7

Date Received: 11/22/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 13:55

Analyst: NLK

Percent Solids: 89%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	4800		ug/kg	20	7.8	1
Vinyl chloride	72		ug/kg	40	13.	1
trans-1,2-Dichloroethene	ND		ug/kg	60	5.4	1
Trichloroethene	720		ug/kg	20	5.4	1
cis-1,2-Dichloroethene	2900		ug/kg	40	7.0	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	105		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	103		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-21
 Client ID: 175/LSB-29_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:45
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 14:21
 Analyst: NLK
 Percent Solids: 90%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	1300		ug/kg	19	7.5	1
Vinyl chloride	ND		ug/kg	38	13.	1
trans-1,2-Dichloroethene	ND		ug/kg	57	5.2	1
Trichloroethene	100		ug/kg	19	5.2	1
cis-1,2-Dichloroethene	320		ug/kg	38	6.7	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	110		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	108		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-21
 Client ID: 175/LSB-29_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:45
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/29/22 23:33
 Analyst: JIC
 Percent Solids: 90%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	220	E	ug/kg	0.26	0.10	1
Vinyl chloride	3.7		ug/kg	0.52	0.17	1
trans-1,2-Dichloroethene	0.21	J	ug/kg	0.78	0.07	1
Trichloroethene	18		ug/kg	0.26	0.07	1
cis-1,2-Dichloroethene	110		ug/kg	0.52	0.09	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-22 D2
 Client ID: 176/LSB-30_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:32
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 04:27
 Analyst: JIC
 Percent Solids: 84%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	200000	E	ug/kg	140	56.	10
Vinyl chloride	560		ug/kg	280	95.	10
trans-1,2-Dichloroethene	ND		ug/kg	430	39.	10
Trichloroethene	2500		ug/kg	140	39.	10
cis-1,2-Dichloroethene	9000		ug/kg	280	50.	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	101		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-22 D
 Client ID: 176/LSB-30_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:32
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 14:48
 Analyst: NLK
 Percent Solids: 84%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

Tetrachloroethene	220000		ug/kg	1400	560	100

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	111		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	108		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-23 D2
 Client ID: 177/LSB-30_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:36
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 04:54
 Analyst: JIC
 Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	13000		ug/kg	60	24.	4
Vinyl chloride	5300		ug/kg	120	40.	4
trans-1,2-Dichloroethene	100	J	ug/kg	180	16.	4
Trichloroethene	4300		ug/kg	60	16.	4
cis-1,2-Dichloroethene	45000	E	ug/kg	120	21.	4

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-23 D
 Client ID: 177/LSB-30_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:36
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 15:14

Analyst: NLK

Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	52000		ug/kg	600	100	20

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	110		70-130
Toluene-d8	99		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	112		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-24 D2
 Client ID: 178/LSB-30_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:43
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/29/22 23:59

Analyst: JIC

Percent Solids: 80%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

Vinyl chloride	24000		ug/kg	390	130	10

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-24 D
 Client ID: 178/LSB-30_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:43
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 15:41
 Analyst: NLK
 Percent Solids: 80%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	6200		ug/kg	39	15.	2
Vinyl chloride	33000	E	ug/kg	78	26.	2
trans-1,2-Dichloroethene	35	J	ug/kg	120	11.	2
Trichloroethene	93		ug/kg	39	11.	2
cis-1,2-Dichloroethene	14000		ug/kg	78	14.	2

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	105		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	108		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-25

Date Collected: 11/22/22 09:48

Client ID: 179/LSB-30_9.5-10

Date Received: 11/22/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 12:09

Analyst: NLK

Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	17		ug/kg	0.28	0.11	1
Vinyl chloride	190	E	ug/kg	0.57	0.19	1
trans-1,2-Dichloroethene	0.12	J	ug/kg	0.85	0.08	1
Trichloroethene	4.2		ug/kg	0.28	0.08	1
cis-1,2-Dichloroethene	59		ug/kg	0.57	0.10	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	108		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	111		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-25

Date Collected: 11/22/22 09:48

Client ID: 179/LSB-30_9.5-10

Date Received: 11/22/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/30/22 00:26

Analyst: JIC

Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	110		ug/kg	13	5.1	1
Vinyl chloride	150		ug/kg	26	8.8	1
trans-1,2-Dichloroethene	ND		ug/kg	39	3.6	1
Trichloroethene	17		ug/kg	13	3.6	1
cis-1,2-Dichloroethene	350		ug/kg	26	4.6	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-26
 Client ID: 180/LSB-31_2.5-3
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:00
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 05:20
 Analyst: JIC
 Percent Solids: 81%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	7800		ug/kg	18	7.0	1
Vinyl chloride	3300		ug/kg	36	12.	1
trans-1,2-Dichloroethene	ND		ug/kg	54	4.9	1
Trichloroethene	81		ug/kg	18	4.9	1
cis-1,2-Dichloroethene	4900		ug/kg	36	6.3	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	95		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	93		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-27
 Client ID: 181/LSB-31_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:05
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 05:47
 Analyst: JIC
 Percent Solids: 83%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	110		ug/kg	17	6.6	1
Vinyl chloride	3400		ug/kg	34	11.	1
trans-1,2-Dichloroethene	17	J	ug/kg	51	4.6	1
Trichloroethene	ND		ug/kg	17	4.6	1
cis-1,2-Dichloroethene	11000	E	ug/kg	34	5.9	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	99		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	96		70-130
Dibromofluoromethane	94		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-27 D
 Client ID: 181/LSB-31_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:05
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/28/22 16:34
 Analyst: NLK
 Percent Solids: 83%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

cis-1,2-Dichloroethene	11000		ug/kg	170	30.	5

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	111		70-130
Toluene-d8	98		70-130
4-Bromofluorobenzene	98		70-130
Dibromofluoromethane	112		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-28 D2
 Client ID: 182/206/207/LSB-31_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:10
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 06:13
 Analyst: JIC
 Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	260000	E	ug/kg	300	120	20
Vinyl chloride	2700		ug/kg	600	200	20
trans-1,2-Dichloroethene	ND		ug/kg	900	82.	20
Trichloroethene	1200		ug/kg	300	82.	20
cis-1,2-Dichloroethene	14000		ug/kg	600	100	20

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	94		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-28 D
 Client ID: 182/206/207/LSB-31_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:10
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/28/22 17:00

Analyst: NLK

Percent Solids: 88%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

Tetrachloroethene	270000		ug/kg	1500	590	100

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	108		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	111		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-33

Date Collected: 11/22/22 12:10

Client ID: 197/LSB-39_2.5-3

Date Received: 11/22/22

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/30/22 02:02

Analyst: JIC

Percent Solids: 86%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	3700		ug/kg	16	6.2	1
Vinyl chloride	ND		ug/kg	32	11.	1
trans-1,2-Dichloroethene	ND		ug/kg	48	4.4	1
Trichloroethene	ND		ug/kg	16	4.4	1
cis-1,2-Dichloroethene	ND		ug/kg	32	5.6	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	93		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	89		70-130
Dibromofluoromethane	89		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-34
 Client ID: 198/LSB-39_4.5-5
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:15
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/29/22 21:49
 Analyst: JIC
 Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	320	E	ug/kg	0.33	0.13	1
Vinyl chloride	ND		ug/kg	0.66	0.22	1
trans-1,2-Dichloroethene	ND		ug/kg	0.99	0.09	1
Trichloroethene	ND		ug/kg	0.33	0.09	1
cis-1,2-Dichloroethene	ND		ug/kg	0.66	0.12	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	93		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	93		70-130
Dibromofluoromethane	89		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-34

Client ID: 198/LSB-39_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:15

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/30/22 11:41

Analyst: NLK

Percent Solids: 85%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	1000		ug/kg	14	5.7	1
Vinyl chloride	ND		ug/kg	29	9.7	1
trans-1,2-Dichloroethene	ND		ug/kg	43	4.0	1
Trichloroethene	ND		ug/kg	14	4.0	1
cis-1,2-Dichloroethene	ND		ug/kg	29	5.1	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	103		70-130
Toluene-d8	96		70-130
4-Bromofluorobenzene	92		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-35
 Client ID: 199/LSB-39_6.5-7
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:20
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/29/22 22:08
 Analyst: JIC
 Percent Solids: 87%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 Low - Westborough Lab						
Tetrachloroethene	140		ug/kg	0.28	0.11	1
Vinyl chloride	ND		ug/kg	0.55	0.18	1
trans-1,2-Dichloroethene	ND		ug/kg	0.83	0.08	1
Trichloroethene	ND		ug/kg	0.28	0.08	1
cis-1,2-Dichloroethene	ND		ug/kg	0.55	0.10	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	92		70-130
4-Bromofluorobenzene	92		70-130
Dibromofluoromethane	92		70-130

Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-36
 Client ID: 200/LSB-39_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:25
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil
 Analytical Method: 1,8260D
 Analytical Date: 11/30/22 12:00
 Analyst: NLK
 Percent Solids: 83%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor
Volatile Organics by EPA 5035 High - Westborough Lab						
Tetrachloroethene	15000	E	ug/kg	21	8.4	1
Vinyl chloride	ND		ug/kg	43	14.	1
trans-1,2-Dichloroethene	ND		ug/kg	64	5.8	1
Trichloroethene	ND		ug/kg	21	5.8	1
cis-1,2-Dichloroethene	ND		ug/kg	43	7.4	1

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	98		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	92		70-130
Dibromofluoromethane	87		70-130

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**SAMPLE RESULTS**

Lab ID: L2265979-36 D
 Client ID: 200/LSB-39_9.5-10
 Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:25
 Date Received: 11/22/22
 Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Analytical Method: 1,8260D

Analytical Date: 11/30/22 02:22

Analyst: JIC

Percent Solids: 83%

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor

Volatile Organics by EPA 5035 High - Westborough Lab

Tetrachloroethene	13000		ug/kg	43	17.	2

Surrogate	% Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	94		70-130
Toluene-d8	94		70-130
4-Bromofluorobenzene	91		70-130
Dibromofluoromethane	88		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/28/22 08:57
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 13,15 Batch: WG1717102-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	109		70-130
Toluene-d8	109		70-130
4-Bromofluorobenzene	114		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/28/22 08:57
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 03,05,08,11-12 Batch: WG1717107-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	109		70-130
Toluene-d8	109		70-130
4-Bromofluorobenzene	114		70-130
Dibromofluoromethane	90		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/28/22 11:04
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 16,25 Batch: WG1717229-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	105		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	99		70-130
Dibromofluoromethane	104		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
 Analytical Date: 11/28/22 11:04
 Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 07,18-24,27-28 Batch: WG1717230-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	105		70-130
Toluene-d8	100		70-130
4-Bromofluorobenzene	100		70-130
Dibromofluoromethane	104		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/29/22 21:18
Analyst: AJK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 07,09,17,19,22-28 Batch: WG1717453-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/29/22 21:18
Analyst: AJK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 18,21 Batch: WG1717460-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		70-130
Toluene-d8	97		70-130
4-Bromofluorobenzene	97		70-130
Dibromofluoromethane	91		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/29/22 21:14
Analyst: AJK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 11 Batch: WG1717466-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	111		70-130
Toluene-d8	110		70-130
4-Bromofluorobenzene	115		70-130
Dibromofluoromethane	89		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
 Analytical Date: 11/29/22 21:14
 Analyst: AJK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 04,06,08,10,14 Batch: WG1717471-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	110		70-130
Toluene-d8	110		70-130
4-Bromofluorobenzene	115		70-130
Dibromofluoromethane	89		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/29/22 19:52
Analyst: AJK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 Low - Westborough Lab for sample(s): 34-35 Batch: WG1717481-5					
Tetrachloroethene	ND		ug/kg	0.50	0.20
Vinyl chloride	ND		ug/kg	1.0	0.34
trans-1,2-Dichloroethene	ND		ug/kg	1.5	0.14
Trichloroethene	ND		ug/kg	0.50	0.14
cis-1,2-Dichloroethene	ND		ug/kg	1.0	0.18

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	93		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/29/22 19:52
Analyst: AJK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s):				33,36	Batch: WG1717482-5
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	100		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	93		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
Analytical Date: 11/30/22 08:18
Analyst: NLK

Parameter	Result	Qualifier	Units	RL	MDL
Volatile Organics by EPA 5035 High - Westborough Lab for sample(s): 34,36 Batch: WG1717662-5					
Tetrachloroethene	ND		ug/kg	25	9.8
Vinyl chloride	ND		ug/kg	50	17.
trans-1,2-Dichloroethene	ND		ug/kg	75	6.8
Trichloroethene	ND		ug/kg	25	6.8
cis-1,2-Dichloroethene	ND		ug/kg	50	8.8

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	102		70-130
Toluene-d8	95		70-130
4-Bromofluorobenzene	95		70-130
Dibromofluoromethane	95		70-130

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Method Blank Analysis
Batch Quality Control

Analytical Method: 1,8260D
 Analytical Date: 11/30/22 07:31
 Analyst: MCM
 TCLP/SPLP Extraction Date: 11/29/22 11:05

Extraction Date: 11/29/22 11:05

Parameter	Result	Qualifier	Units	RL	MDL
TCLP Volatiles by EPA 1311 - Westborough Lab for sample(s): 02 Batch: WG1717733-5					
Chloroform	4.4	J	ug/l	7.5	2.2
Carbon tetrachloride	ND		ug/l	5.0	1.3
Tetrachloroethene	ND		ug/l	5.0	1.8
Chlorobenzene	ND		ug/l	5.0	1.8
1,2-Dichloroethane	ND		ug/l	5.0	1.3
Benzene	ND		ug/l	5.0	1.6
Vinyl chloride	ND		ug/l	10	0.71
1,1-Dichloroethene	ND		ug/l	5.0	1.7
Trichloroethene	ND		ug/l	5.0	1.8
1,4-Dichlorobenzene	ND		ug/l	25	1.9
2-Butanone	ND		ug/l	50	19.

Surrogate	%Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	119		70-130
Toluene-d8	93		70-130
4-Bromofluorobenzene	86		70-130
dibromofluoromethane	123		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 13,15 Batch: WG1717102-3 WG1717102-4								
Tetrachloroethene	91		91		70-130	0		30
Vinyl chloride	112		110		67-130	2		30
trans-1,2-Dichloroethene	90		91		70-130	1		30
Trichloroethene	94		95		70-130	1		30
cis-1,2-Dichloroethene	89		89		70-130	0		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	106		107		70-130
Toluene-d8	110		111		70-130
4-Bromofluorobenzene	115		114		70-130
Dibromofluoromethane	92		92		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 03,05,08,11-12 Batch: WG1717107-3 WG1717107-4								
Tetrachloroethene	91		91		70-130	0		30
Vinyl chloride	112		110		67-130	2		30
trans-1,2-Dichloroethene	90		91		70-130	1		30
Trichloroethene	94		95		70-130	1		30
cis-1,2-Dichloroethene	89		89		70-130	0		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	106		107		70-130
Toluene-d8	110		110		70-130
4-Bromofluorobenzene	115		114		70-130
Dibromofluoromethane	92		92		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 16,25 Batch: WG1717229-3 WG1717229-4								
Tetrachloroethene	104		100		70-130	4		30
Vinyl chloride	106		105		67-130	1		30
trans-1,2-Dichloroethene	103		101		70-130	2		30
Trichloroethene	112		111		70-130	1		30
cis-1,2-Dichloroethene	102		99		70-130	3		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	97		97		70-130
Toluene-d8	102		101		70-130
4-Bromofluorobenzene	98		99		70-130
Dibromofluoromethane	99		97		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 07,18-24,27-28 Batch: WG1717230-3 WG1717230-4								
Tetrachloroethene	104		100		70-130	4		30
Vinyl chloride	106		105		67-130	1		30
trans-1,2-Dichloroethene	103		101		70-130	2		30
Trichloroethene	112		111		70-130	1		30
cis-1,2-Dichloroethene	102		99		70-130	3		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	97		97		70-130
Toluene-d8	102		101		70-130
4-Bromofluorobenzene	98		99		70-130
Dibromofluoromethane	99		97		70-130

Lab Control Sample Analysis **Batch Quality Control**

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 07,09,17,19,22-28 Batch: WG1717453-3 WG1717453-4								
Tetrachloroethene	105		103		70-130	2		30
Vinyl chloride	103		104		67-130	1		30
trans-1,2-Dichloroethene	103		101		70-130	2		30
Trichloroethene	93		94		70-130	1		30
cis-1,2-Dichloroethene	101		101		70-130	0		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	95		98		70-130
Toluene-d8	98		98		70-130
4-Bromofluorobenzene	92		93		70-130
Dibromofluoromethane	93		93		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 18,21 Batch: WG1717460-3 WG1717460-4								
Tetrachloroethene	105		103		70-130	2		30
Vinyl chloride	103		104		67-130	1		30
trans-1,2-Dichloroethene	103		101		70-130	2		30
Trichloroethene	93		94		70-130	1		30
cis-1,2-Dichloroethene	101		101		70-130	0		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	95		98		70-130
Toluene-d8	98		98		70-130
4-Bromofluorobenzene	92		93		70-130
Dibromofluoromethane	93		93		70-130

Lab Control Sample Analysis Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 11 Batch: WG1717466-3 WG1717466-4								
Tetrachloroethene	93		90		70-130	3		30
Vinyl chloride	115		113		67-130	2		30
trans-1,2-Dichloroethene	93		90		70-130	3		30
Trichloroethene	96		92		70-130	4		30
cis-1,2-Dichloroethene	91		90		70-130	1		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	107		108		70-130
Toluene-d8	110		111		70-130
4-Bromofluorobenzene	115		115		70-130
Dibromofluoromethane	89		91		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 04,06,08,10,14 Batch: WG1717471-3 WG1717471-4								
Tetrachloroethene	93		90		70-130	3		30
Vinyl chloride	115		113		67-130	2		30
trans-1,2-Dichloroethene	93		90		70-130	3		30
Trichloroethene	96		92		70-130	4		30
cis-1,2-Dichloroethene	91		90		70-130	1		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	107		108		70-130
Toluene-d8	110		111		70-130
4-Bromofluorobenzene	115		115		70-130
Dibromofluoromethane	89		91		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 Low - Westborough Lab Associated sample(s): 34-35 Batch: WG1717481-3 WG1717481-4								
Tetrachloroethene	125		127		70-130	2		30
Vinyl chloride	114		113		67-130	1		30
trans-1,2-Dichloroethene	106		102		70-130	4		30
Trichloroethene	119		118		70-130	1		30
cis-1,2-Dichloroethene	107		105		70-130	2		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	89		90		70-130
Toluene-d8	96		96		70-130
4-Bromofluorobenzene	93		93		70-130
Dibromofluoromethane	92		90		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 33,36 Batch: WG1717482-3 WG1717482-4								
Tetrachloroethene	125		127		70-130	2		30
Vinyl chloride	114		113		67-130	1		30
trans-1,2-Dichloroethene	106		102		70-130	4		30
Trichloroethene	119		118		70-130	1		30
cis-1,2-Dichloroethene	107		105		70-130	2		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	90		90		70-130
Toluene-d8	96		96		70-130
4-Bromofluorobenzene	93		93		70-130
Dibromofluoromethane	92		91		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab Associated sample(s): 34,36 Batch: WG1717662-3 WG1717662-4								
Tetrachloroethene	112		112		70-130	0		30
Vinyl chloride	102		102		67-130	0		30
trans-1,2-Dichloroethene	94		91		70-130	3		30
Trichloroethene	103		104		70-130	1		30
cis-1,2-Dichloroethene	94		94		70-130	0		30

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	86		86		70-130
Toluene-d8	97		94		70-130
4-Bromofluorobenzene	89		92		70-130
Dibromofluoromethane	88		90		70-130

Lab Control Sample Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	LCS %Recovery	Qual	LCSD %Recovery	Qual	%Recovery Limits	RPD	Qual	RPD Limits
TCLP Volatiles by EPA 1311 - Westborough Lab Associated sample(s): 02 Batch: WG1717733-3 WG1717733-4								
Chloroform	110		110		70-130	0		20
Carbon tetrachloride	110		110		63-132	0		20
Tetrachloroethene	110		110		70-130	0		20
Chlorobenzene	100		100		75-130	0		25
1,2-Dichloroethane	110		110		70-130	0		20
Benzene	99		100		70-130	1		25
Vinyl chloride	90		92		55-140	2		20
1,1-Dichloroethene	96		100		61-145	4		25
Trichloroethene	100		100		70-130	0		25
1,4-Dichlorobenzene	100		100		70-130	0		20
2-Butanone	97		100		63-138	3		20

Surrogate	LCS %Recovery	Qual	LCSD %Recovery	Qual	Acceptance Criteria
1,2-Dichloroethane-d4	108		106		70-130
Toluene-d8	94		96		70-130
4-Bromofluorobenzene	83		87		70-130
dibromofluoromethane	108		104		70-130

Matrix Spike Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab L2265979-28 Client ID: 182/206/207/LSB-31_6.5-7 Associated sample(s): 07,09,17,19,22-28 QC Batch ID: WG1717453-6 WG1717453-7 QC Sample:												
Tetrachloroethene	260000E	60000	200000E	0	Q	200000E	0	Q	70-130	2		30
Vinyl chloride	2700	60000	60000	95		57000	91		67-130	4		30
trans-1,2-Dichloroethene	ND	60000	50000	83		49000	82		70-130	1		30
Trichloroethene	1200	60000	43000	69	Q	42000	67	Q	70-130	3		30
cis-1,2-Dichloroethene	14000	60000	63000	82		62000	80		70-130	2		30

Surrogate	MS % Recovery	Qualifier	MSD % Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	97		94		70-130
4-Bromofluorobenzene	92		94		70-130
Dibromofluoromethane	92		92		70-130
Toluene-d8	96		96		70-130

Matrix Spike Analysis

Batch Quality Control

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

Parameter	Native Sample	MS Added	MS Found	MS %Recovery	Qual	MSD Found	MSD %Recovery	Qual	Recovery Limits	RPD	Qual	RPD Limits
Volatile Organics by EPA 5035 High - Westborough Lab 04 Client ID: 166/167/168/LSB-28_4.5-5 Associated sample(s): 04,06,08,10,14 QC Batch ID: WG1717471-6 WG1717471-7 QC Sample: L2265979-												
Tetrachloroethene	58	3100	1800	57	Q	1700	53	Q	70-130	8		30
Vinyl chloride	240	3100	3600	107		3400	102		67-130	4		30
trans-1,2-Dichloroethene	160	3100	2500	75		2400	72		70-130	4		30
Trichloroethene	480	3100	2600	68	Q	2400	62	Q	70-130	7		30
cis-1,2-Dichloroethene	4600	3100	6400	57	Q	6000	46	Q	70-130	5		30

Surrogate	MS % Recovery	Qualifier	MSD % Recovery	Qualifier	Acceptance Criteria
1,2-Dichloroethane-d4	112		106		70-130
4-Bromofluorobenzene	116		116		70-130
Dibromofluoromethane	90		88		70-130
Toluene-d8	111		111		70-130

INORGANICS & MISCELLANEOUS

Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-03

Client ID: 165/LSB-28_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:55

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	84.0		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-04

Client ID: 166/167/168/LSB-28_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:00

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	84.7		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-05

Client ID: 169/LSB-28_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:20

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.5		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-06

Client ID: 170/LSB-28_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:25

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	90.0		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-07

Client ID: 171/LSB-29_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:20

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.0		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-08

Client ID: 172/LSB-29_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:25

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	81.8		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-09

Client ID: 183/LSB-31_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:25

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.1		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-10

Client ID: 184/LSB-32_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:30

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	82.3		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-11**Client ID:** 185/DUP-2**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 10:35**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	83.6		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-12**Client ID:** 186/LSB-32_4.5-5**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 10:40**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.7		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-13

Client ID: 187/LSB-32_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:45

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	81.7		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-14

Client ID: 188/LSB-32_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:50

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	90.0		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-15

Client ID: 189/LSB-38_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 11:45

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	83.9		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-16

Client ID: 190/LSB-38_4.5-5

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 11:50

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.3		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-17

Client ID: 191/LSB-38_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 11:55

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.6		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-18

Client ID: 192/LSB-38_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:00

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	90.9		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-19**Client ID:** 173/DUP-3**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 08:30**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	88.6		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-20

Client ID: 174/LSB-29_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:40

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	89.4		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-21

Client ID: 175/LSB-29_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 08:45

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	90.0		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-22

Client ID: 176/LSB-30_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:32

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	83.6		%	0.100	NA	1	-	11/23/22 14:44	121,2540G	MF



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-23**Client ID:** 177/LSB-30_4.5-5**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 09:36**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	84.9		%	0.100	NA	1	-	11/23/22 15:07	121,2540G	MF



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-24**Client ID:** 178/LSB-30_6.5-7**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 09:43**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	79.8		%	0.100	NA	1	-	11/23/22 15:07	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-25

Client ID: 179/LSB-30_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 09:48

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.6		%	0.100	NA	1	-	11/23/22 15:07	121,2540G	MF



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-26**Client ID:** 180/LSB-31_2.5-3**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 10:00**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	80.8		%	0.100	NA	1	-	11/23/22 15:07	121,2540G	MF



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-27**Client ID:** 181/LSB-31_4.5-5**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 10:05**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	82.6		%	0.100	NA	1	-	11/23/22 15:07	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-28

Client ID: 182/206/207/LSB-31_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 10:10

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	87.9		%	0.100	NA	1	-	11/23/22 15:07	121,2540G	MF



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-33

Client ID: 197/LSB-39_2.5-3

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:10

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	85.8		%	0.100	NA	1	-	11/29/22 16:39	121,2540G	SB



Project Name: 990 ROSSVILLE**Project Number:** 100849501**Lab Number:** L2265979**Report Date:** 11/30/22**SAMPLE RESULTS****Lab ID:** L2265979-34**Client ID:** 198/LSB-39_4.5-5**Sample Location:** 990 ROSSVILLE, STATEN ISLAND, NY**Date Collected:** 11/22/22 12:15**Date Received:** 11/22/22**Field Prep:** Not Specified**Sample Depth:****Matrix:** Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	84.8		%	0.100	NA	1	-	11/29/22 16:39	121,2540G	SB



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-35

Client ID: 199/LSB-39_6.5-7

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:20

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	86.5		%	0.100	NA	1	-	11/29/22 16:39	121,2540G	SB



Project Name: 990 ROSSVILLE

Project Number: 100849501

Lab Number: L2265979

Report Date: 11/30/22

SAMPLE RESULTS

Lab ID: L2265979-36

Client ID: 200/LSB-39_9.5-10

Sample Location: 990 ROSSVILLE, STATEN ISLAND, NY

Date Collected: 11/22/22 12:25

Date Received: 11/22/22

Field Prep: Not Specified

Sample Depth:

Matrix: Soil

Parameter	Result	Qualifier	Units	RL	MDL	Dilution Factor	Date Prepared	Date Analyzed	Analytical Method	Analyst
General Chemistry - Westborough Lab										
Solids, Total	83.1		%	0.100	NA	1	-	11/29/22 16:39	121,2540G	SB



Lab Duplicate Analysis *Batch Quality Control*

Project Name: 990 ROSSVILLE
Project Number: 100849501

Lab Number: L2265979
Report Date: 11/30/22

Parameter	Native Sample	Duplicate Sample	Units	RPD	Qual	RPD Limits
General Chemistry - Westborough Lab Associated sample(s): 03-22 QC Batch ID: WG1715966-1 QC Sample: L2265979-04 Client ID: 166/167/168/LSB-28_4.5-5						
Solids, Total	84.7	84.6	%	0		20
General Chemistry - Westborough Lab Associated sample(s): 23-28 QC Batch ID: WG1715977-1 QC Sample: L2265979-28 Client ID: 182/206/207/LSB-31_6.5-7						
Solids, Total	87.9	87.8	%	0		20
General Chemistry - Westborough Lab Associated sample(s): 33-36 QC Batch ID: WG1717234-1 QC Sample: L2265979-33 Client ID: 197/LSB-39_2.5-3						
Solids, Total	85.8	85.5	%	0		20

Project Name: 990 ROSSVILLE**Lab Number:** L2265979**Project Number:** 100849501**Report Date:** 11/30/22**Sample Receipt and Container Information**

Were project specific reporting limits specified?

YES

Cooler Information**Cooler Custody Seal**

A Absent

B Absent

C Absent

Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2265979-01A	Vial HCl preserved	C	NA		3.3	Y	Absent		HOLD-8260(14)
L2265979-01B	Vial HCl preserved	C	NA		3.3	Y	Absent		HOLD-8260(14)
L2265979-01C	Vial HCl preserved	C	NA		3.3	Y	Absent		HOLD-8260(14)
L2265979-02A	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		TCLP-EXT-ZHE(14)
L2265979-02Y	Vial unpreserved Extracts	A	NA		2.7	Y	Absent		TCLP-VOA(14)
L2265979-02Z	Vial unpreserved Extracts	A	NA		2.7	Y	Absent		TCLP-VOA(14)
L2265979-03A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-03B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-03C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-03D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-03E	Vial Large Septa unpreserved (4oz)	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-04A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-04A1	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-04A2	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-04B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-04B1	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-04B2	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-04C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-04C1	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-04C2	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-04D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)

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L2265979-04D1	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-04D2	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-04E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-05A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-05B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-05C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-05D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-05E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-06A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-06B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-06C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-06D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-06E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-07A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-07B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-07C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-07D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-07E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-08A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-08B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-08C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:17	NYTCL-8260HLW(14)
L2265979-08D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-08E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-09A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-09B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-09C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-09D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-09E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)

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L2265979-10A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-10B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-10C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-10D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-10E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-11A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14),NYTCL-8260H(14)
L2265979-11B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14),NYTCL-8260H(14)
L2265979-11C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14),NYTCL-8260H(14)
L2265979-11D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-11E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-12A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-12B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-12C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-12D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-12E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-13A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-13B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-13C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-13D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-13E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-14A	Vial MeOH preserved	B	NA		4.1	Y	Absent		NYTCL-8260HLW(14)
L2265979-14B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-14C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-14D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		TS(7)
L2265979-14E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-15A	Vial MeOH preserved	B	NA		4.1	Y	Absent		NYTCL-8260HLW(14)
L2265979-15B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-15C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)

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L2265979-15D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		TS(7)
L2265979-15E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-16A	Vial MeOH preserved	B	NA		4.1	Y	Absent		NYTCL-8260HLW(14)
L2265979-16B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-16C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-16D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		TS(7)
L2265979-16E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-17A	Vial MeOH preserved	B	NA		4.1	Y	Absent		NYTCL-8260HLW(14)
L2265979-17B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-17C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-17D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		TS(7)
L2265979-17E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-18A	Vial MeOH preserved	A	NA		2.7	Y	Absent		NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265979-18B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265979-18C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265979-18D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		TS(7)
L2265979-18E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-19A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-19B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-19C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-19D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-19E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-20A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-20B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-20C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-20D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-20E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-21A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14),NYTCL-8260H(14)

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L2265979-21B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14),NYTCL-8260H(14)
L2265979-21C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14),NYTCL-8260H(14)
L2265979-21D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-21E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-22A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-22B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-22C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-22D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-22E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-23A	Vial MeOH preserved	B	NA		4.1	Y	Absent		NYTCL-8260HLW(14)
L2265979-23B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-23C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-23D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		TS(7)
L2265979-23E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-24A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-24B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-24C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-24D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-24E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-25A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265979-25B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265979-25C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260H(14),NYTCL-8260HLW(14)
L2265979-25D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-25E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-26A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-26B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-26C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-26D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)

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L2265979-26E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-27A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-27B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-27C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-27D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-27E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-28A	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-28A1	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-28A2	Vial MeOH preserved	C	NA		3.3	Y	Absent		NYTCL-8260HLW(14)
L2265979-28B	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-28B1	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-28B2	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-28C	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-28C1	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-28C2	Vial water preserved	C	NA		3.3	Y	Absent	23-NOV-22 09:12	NYTCL-8260HLW(14)
L2265979-28D	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-28D1	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-28D2	Plastic 120ml unpreserved	C	NA		3.3	Y	Absent		TS(7)
L2265979-28E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-29A	Vial MeOH preserved	A	NA		2.7	Y	Absent		HOLD-8260HLW(14)
L2265979-29B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	HOLD-8260HLW(14)
L2265979-29C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	HOLD-8260HLW(14)
L2265979-29D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		HOLD-WETCHEM()
L2265979-29E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-30A	Vial MeOH preserved	A	NA		2.7	Y	Absent		HOLD-8260HLW(14)
L2265979-30B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	HOLD-8260HLW(14)
L2265979-30C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	HOLD-8260HLW(14)
L2265979-30D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		HOLD-WETCHEM()

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L2265979-30E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-31A	Vial MeOH preserved	A	NA		2.7	Y	Absent		HOLD-8260HLW(14)
L2265979-31B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	HOLD-8260HLW(14)
L2265979-31C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:12	HOLD-8260HLW(14)
L2265979-31D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		HOLD-WETCHEM()
L2265979-31E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-32A	Vial MeOH preserved	A	NA		2.7	Y	Absent		HOLD-8260HLW(14)
L2265979-32B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-32C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-32D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		HOLD-WETCHEM()
L2265979-32E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-33A	Vial MeOH preserved	A	NA		2.7	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-33B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-33C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-33D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		HOLD-WETCHEM(),TS(7)
L2265979-33E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-34A	Vial MeOH preserved	B	NA		4.1	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2265979-34B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14)
L2265979-34C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14),NYTCL-8260H(14),NYTCL-8260H(14)
L2265979-34D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		HOLD-WETCHEM(),TS(7)
L2265979-34E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-35A	Vial MeOH preserved	B	NA		4.1	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-35B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-35C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-35D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		HOLD-WETCHEM(),TS(7)
L2265979-35E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-36A	Vial MeOH preserved	B	NA		4.1	Y	Absent		HOLD-8260HLW(14),NYTCL-8260HLW(14)

Project Name: 990 ROSSVILLE
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Container Information

Container ID	Container Type	Cooler	Initial pH	Final pH	Temp deg C	Pres	Seal	Frozen Date/Time	Analysis(*)
L2265979-36B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-36C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14),NYTCL-8260HLW(14)
L2265979-36D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		HOLD-WETCHEM(),TS(7)
L2265979-36E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-37A	Vial MeOH preserved	A	NA		2.7	Y	Absent		HOLD-8260HLW(14)
L2265979-37B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-37C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-37D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		HOLD-WETCHEM()
L2265979-37E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-38A	Vial MeOH preserved	A	NA		2.7	Y	Absent		HOLD-8260HLW(14)
L2265979-38B	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-38C	Vial water preserved	A	NA		2.7	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-38D	Plastic 120ml unpreserved	A	NA		2.7	Y	Absent		HOLD-WETCHEM()
L2265979-38E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-39A	Vial MeOH preserved	B	NA		4.1	Y	Absent		HOLD-8260HLW(14)
L2265979-39B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-39C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-39D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		HOLD-WETCHEM()
L2265979-39E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-40A	Vial MeOH preserved	B	NA		4.1	Y	Absent		HOLD-8260HLW(14)
L2265979-40B	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-40C	Vial water preserved	B	NA		4.1	Y	Absent	23-NOV-22 09:17	HOLD-8260HLW(14)
L2265979-40D	Plastic 120ml unpreserved	B	NA		4.1	Y	Absent		HOLD-WETCHEM()
L2265979-40E	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)
L2265979-41A	Vial Large Septa unpreserved (4oz)	A	NA		2.7	Y	Absent		HOLD-CONTINGENCY(14)

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GLOSSARY

Acronyms

DL	- Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the limit of quantitation (LOQ). The DL includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
EDL	- Estimated Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The EDL includes any adjustments from dilutions, concentrations or moisture content, where applicable. The use of EDLs is specific to the analysis of PAHs using Solid-Phase Microextraction (SPME).
EMPC	- Estimated Maximum Possible Concentration: The concentration that results from the signal present at the retention time of an analyte when the ions meet all of the identification criteria except the ion abundance ratio criteria. An EMPC is a worst-case estimate of the concentration.
EPA	- Environmental Protection Agency.
LCS	- Laboratory Control Sample: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LCSD	- Laboratory Control Sample Duplicate: Refer to LCS.
LFB	- Laboratory Fortified Blank: A sample matrix, free from the analytes of interest, spiked with verified known amounts of analytes or a material containing known and verified amounts of analytes.
LOD	- Limit of Detection: This value represents the level to which a target analyte can reliably be detected for a specific analyte in a specific matrix by a specific method. The LOD includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
LOQ	- Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.) Limit of Quantitation: The value at which an instrument can accurately measure an analyte at a specific concentration. The LOQ includes any adjustments from dilutions, concentrations or moisture content, where applicable. (DoD report formats only.)
MDL	- Method Detection Limit: This value represents the level to which target analyte concentrations are reported as estimated values, when those target analyte concentrations are quantified below the reporting limit (RL). The MDL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
MS	- Matrix Spike Sample: A sample prepared by adding a known mass of target analyte to a specified amount of matrix sample for which an independent estimate of target analyte concentration is available. For Method 332.0, the spike recovery is calculated using the native concentration, including estimated values.
MSD	- Matrix Spike Sample Duplicate: Refer to MS.
NA	- Not Applicable.
NC	- Not Calculated: Term is utilized when one or more of the results utilized in the calculation are non-detect at the parameter's reporting unit.
NDPA/DPA	- N-Nitrosodiphenylamine/Diphenylamine.
NI	- Not Ignitable.
NP	- Non-Plastic: Term is utilized for the analysis of Atterberg Limits in soil.
NR	- No Results: Term is utilized when 'No Target Compounds Requested' is reported for the analysis of Volatile or Semivolatile Organic TIC only requests.
RL	- Reporting Limit: The value at which an instrument can accurately measure an analyte at a specific concentration. The RL includes any adjustments from dilutions, concentrations or moisture content, where applicable.
RPD	- Relative Percent Difference: The results from matrix and/or matrix spike duplicates are primarily designed to assess the precision of analytical results in a given matrix and are expressed as relative percent difference (RPD). Values which are less than five times the reporting limit for any individual parameter are evaluated by utilizing the absolute difference between the values; although the RPD value will be provided in the report.
SRM	- Standard Reference Material: A reference sample of a known or certified value that is of the same or similar matrix as the associated field samples.
STLP	- Semi-dynamic Tank Leaching Procedure per EPA Method 1315.
TEF	- Toxic Equivalency Factors: The values assigned to each dioxin and furan to evaluate their toxicity relative to 2,3,7,8-TCDD.
TEQ	- Toxic Equivalent: The measure of a sample's toxicity derived by multiplying each dioxin and furan by its corresponding TEF and then summing the resulting values.
TIC	- Tentatively Identified Compound: A compound that has been identified to be present and is not part of the target compound list (TCL) for the method and/or program. All TICs are qualitatively identified and reported as estimated concentrations.

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Footnotes

- 1 - The reference for this analyte should be considered modified since this analyte is absent from the target analyte list of the original method.

Terms

Analytical Method: Both the document from which the method originates and the analytical reference method. (Example: EPA 8260B is shown as 1,8260B.) The codes for the reference method documents are provided in the References section of the Addendum.

Chlordane: The target compound Chlordane (CAS No. 57-74-9) is reported for GC ECD analyses. Per EPA, this compound "refers to a mixture of chlordane isomers, other chlorinated hydrocarbons and numerous other components." (Reference: USEPA Toxicological Review of Chlordane, In Support of Summary Information on the Integrated Risk Information System (IRIS), December 1997.)

Difference: With respect to Total Oxidizable Precursor (TOP) Assay analysis, the difference is defined as the Post-Treatment value minus the Pre-Treatment value.

Final pH: As it pertains to Sample Receipt & Container Information section of the report, Final pH reflects pH of container determined after adjustment at the laboratory, if applicable. If no adjustment required, value reflects Initial pH.

Frozen Date/Time: With respect to Volatile Organics in soil, Frozen Date/Time reflects the date/time at which associated Reagent Water-preserved vials were initially frozen. Note: If frozen date/time is beyond 48 hours from sample collection, value will be reflected in 'bold'.

Gasoline Range Organics (GRO): Gasoline Range Organics (GRO) results include all chromatographic peaks eluting from Methyl tert butyl ether through Naphthalene, with the exception of GRO analysis in support of State of Ohio programs, which includes all chromatographic peaks eluting from Hexane through Dodecane.

Initial pH: As it pertains to Sample Receipt & Container Information section of the report, Initial pH reflects pH of container determined upon receipt, if applicable.

PAH Total: With respect to Alkylated PAH analyses, the 'PAHs, Total' result is defined as the summation of results for all or a subset of the following compounds: Naphthalene, C1-C4 Naphthalenes, 2-Methylnaphthalene, 1-Methylnaphthalene, Biphenyl, Acenaphthylene, Acenaphthene, Fluorene, C1-C3 Fluorenes, Phenanthrene, C1-C4 Phenanthrenes/Anthracenes, Anthracene, Fluoranthene, Pyrene, C1-C4 Fluoranthenes/Pyrenes, Benz(a)anthracene, Chrysene, C1-C4 Chrysenes, Benzo(b)fluoranthene, Benzo(j)+(k)fluoranthene, Benzo(e)pyrene, Benzo(a)pyrene, Perylene, Indeno(1,2,3-cd)pyrene, Dibenz(ah)+(ac)anthracene, Benzo(g,h,i)perylene. If a 'Total' result is requested, the results of its individual components will also be reported.

PFAS Total: With respect to PFAS analyses, the 'PFAS, Total (5)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA and PFOS. In addition, the 'PFAS, Total (6)' result is defined as the summation of results for: PFHpA, PFHxS, PFOA, PFNA, PFDA and PFOS. For MassDEP DW compliance analysis only, the 'PFAS, Total (6)' result is defined as the summation of results at or above the RL. Note: If a 'Total' result is requested, the results of its individual components will also be reported.

Total: With respect to Organic analyses, a 'Total' result is defined as the summation of results for individual isomers or Aroclors. If a 'Total' result is requested, the results of its individual components will also be reported. This is applicable to 'Total' results for methods 8260, 8081 and 8082.

Data Qualifiers

- A** - Spectra identified as "Aldol Condensates" are byproducts of the extraction/concentration procedures when acetone is introduced in the process.
- B** - The analyte was detected above the reporting limit in the associated method blank. Flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For MCP-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank. For DOD-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte at less than ten times (10x) the concentration found in the blank AND the analyte was detected above one-half the reporting limit (or above the reporting limit for common lab contaminants) in the associated method blank. For NJ-Air-related projects, flag only applies to associated field samples that have detectable concentrations of the analyte above the reporting limit. For NJ-related projects (excluding Air), flag only applies to associated field samples that have detectable concentrations of the analyte, which was detected above the reporting limit in the associated method blank or above five times the reporting limit for common lab contaminants (Phthalates, Acetone, Methylene Chloride, 2-Butanone).
- C** - Co-elution: The target analyte co-elutes with a known lab standard (i.e. surrogate, internal standards, etc.) for co-extracted analyses.
- D** - Concentration of analyte was quantified from diluted analysis. Flag only applies to field samples that have detectable concentrations of the analyte.
- E** - Concentration of analyte exceeds the range of the calibration curve and/or linear range of the instrument.
- F** - The ratio of quantifier ion response to qualifier ion response falls outside of the laboratory criteria. Results are considered to be an estimated maximum concentration.
- G** - The concentration may be biased high due to matrix interferences (i.e. co-elution) with non-target compound(s). The result should be considered estimated.
- H** - The analysis of pH was performed beyond the regulatory-required holding time of 15 minutes from the time of sample collection.
- I** - The lower value for the two columns has been reported due to obvious interference.
- J** - Estimated value. The Target analyte concentration is below the quantitation limit (RL), but above the Method Detection Limit (MDL) or Estimated Detection Limit (EDL) for SPME-related analyses. This represents an estimated concentration for Tentatively

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Data Qualifiers

Identified Compounds (TICs).

- M** - Reporting Limit (RL) exceeds the MCP CAM Reporting Limit for this analyte.
- ND** - Not detected at the method detection limit (MDL) for the sample, or estimated detection limit (EDL) for SPME-related analyses.
- NJ** - Presumptive evidence of compound. This represents an estimated concentration for Tentatively Identified Compounds (TICs), where the identification is based on a mass spectral library search.
- P** - The RPD between the results for the two columns exceeds the method-specified criteria.
- Q** - The quality control sample exceeds the associated acceptance criteria. For DOD-related projects, LCS and/or Continuing Calibration Standard exceedences are also qualified on all associated sample results. Note: This flag is not applicable for matrix spike recoveries when the sample concentration is greater than 4x the spike added or for batch duplicate RPD when the sample concentrations are less than 5x the RL. (Metals only.)
- R** - Analytical results are from sample re-analysis.
- RE** - Analytical results are from sample re-extraction.
- S** - Analytical results are from modified screening analysis.
- V** - The surrogate associated with this target analyte has a recovery outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)
- Z** - The batch matrix spike and/or duplicate associated with this target analyte has a recovery/RPD outside the QC acceptance limits. (Applicable to MassDEP DW Compliance samples only.)

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REFERENCES

- 1 Test Methods for Evaluating Solid Waste: Physical/Chemical Methods. EPA SW-846. Third Edition. Updates I - VI, 2018.
- 121 Standard Methods for the Examination of Water and Wastewater. APHA-AWWA-WEF. Standard Methods Online.

LIMITATION OF LIABILITIES

Alpha Analytical performs services with reasonable care and diligence normal to the analytical testing laboratory industry. In the event of an error, the sole and exclusive responsibility of Alpha Analytical shall be to re-perform the work at it's own expense. In no event shall Alpha Analytical be held liable for any incidental, consequential or special damages, including but not limited to, damages in any way connected with the use of, interpretation of, information or analysis provided by Alpha Analytical.

We strongly urge our clients to comply with EPA protocol regarding sample volume, preservation, cooling, containers, sampling procedures, holding time and splitting of samples in the field.



Certification Information

The following analytes are not included in our Primary NELAP Scope of Accreditation:

Westborough Facility

EPA 624/624.1: m/p-xylene, o-xylene, Naphthalene

EPA 625/625.1: alpha-Terpineol

EPA 8260C/8260D: NPW: 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene, Azobenzene; SCM: Iodomethane (methyl iodide), 1,2,4,5-Tetramethylbenzene; 4-Ethyltoluene.

EPA 8270D/8270E: NPW: Dimethylnaphthalene, 1,4-Diphenylhydrazine, alpha-Terpineol; SCM: Dimethylnaphthalene, 1,4-Diphenylhydrazine.

SM4500: NPW: Amenable Cyanide; SCM: Total Phosphorus, TKN, NO₂, NO₃.

Mansfield Facility

SM 2540D: TSS

EPA 8082A: NPW: PCB: 1, 5, 31, 87, 101, 110, 141, 151, 153, 180, 183, 187.

EPA TO-15: Halothane, 2,4,4-Trimethyl-2-pentene, 2,4,4-Trimethyl-1-pentene, Thiophene, 2-Methylthiophene,

3-Methylthiophene, 2-Ethylthiophene, 1,2,3-Trimethylbenzene, Indan, Indene, 1,2,4,5-Tetramethylbenzene, Benzothiophene, 1-Methylnaphthalene.

Biological Tissue Matrix: EPA 3050B

The following analytes are included in our Massachusetts DEP Scope of Accreditation

Westborough Facility:

Drinking Water

EPA 300.0: Chloride, Nitrate-N, Fluoride, Sulfate; **EPA 353.2:** Nitrate-N, Nitrite-N; **SM4500NO3-F:** Nitrate-N, Nitrite-N; **SM4500F-C, SM4500CN-CE,**

EPA 180.1, SM2130B, SM4500CI-D, SM2320B, SM2540C, SM4500H-B, SM4500NO2-B

EPA 332: Perchlorate; **EPA 524.2:** THMs and VOCs; **EPA 504.1:** EDB, DBCP.

Microbiology: **SM9215B; SM9223-P/A, SM9223B-Colilert-QT, SM9222D.**

Non-Potable Water

SM4500H,B, EPA 120.1, SM2510B, SM2540C, SM2320B, SM4500CL-E, SM4500F-BC, SM4500NH3-BH: Ammonia-N and Kjeldahl-N, **EPA 350.1:**

Ammonia-N, **LACHAT 10-107-06-1-B:** Ammonia-N, **EPA 351.1, SM4500NO3-F, EPA 353.2:** Nitrate-N, **SM4500P-E, SM4500P-B, E, SM4500SO4-E,**

SM5220D, EPA 410.4, SM5210B, SM5310C, SM4500CL-D, EPA 1664, EPA 420.1, SM4500-CN-CE, SM2540D, EPA 300: Chloride, Sulfate, Nitrate.

EPA 624.1: Volatile Halocarbons & Aromatics,

EPA 608.3: Chlordane, Toxaphene, Aldrin, alpha-BHC, beta-BHC, gamma-BHC, delta-BHC, Dieldrin, DDD, DDE, DDT, Endosulfan I, Endosulfan II, Endosulfan sulfate, Endrin, Endrin Aldehyde, Heptachlor, Heptachlor Epoxide, PCBs

EPA 625.1: SVOC (Acid/Base/Neutral Extractables), **EPA 600/4-81-045:** PCB-Oil.

Microbiology: **SM9223B-Colilert-QT; Enterolert-QT, SM9221E, EPA 1600, EPA 1603, SM9222D.**

Mansfield Facility:

Drinking Water

EPA 200.7: Al, Ba, Cd, Cr, Cu, Fe, Mn, Ni, Na, Ag, Ca, Zn. **EPA 200.8:** Al, Sb, As, Ba, Be, Cd, Cr, Cu, Pb, Mn, Ni, Se, Ag, TL, Zn. **EPA 245.1 Hg.**

EPA 522, EPA 537.1.

Non-Potable Water

EPA 200.7: Al, Sb, As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, K, Se, Ag, Na, Sr, TL, Ti, V, Zn.

EPA 200.8: Al, Sb, As, Be, Cd, Cr, Cu, Fe, Pb, Mn, Ni, K, Se, Ag, Na, TL, Zn.

EPA 245.1 Hg.

SM2340B

For a complete listing of analytes and methods, please contact your Alpha Project Manager.

 NEW JERSEY CHAIN OF CUSTODY		Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105		Page 1 of 5		Date Rec'd in Lab 11/23/22		ALPHA Job # L2265979	
Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193		Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288		Project Information Project Name: 990 Rossville Project Location: 990 Rossville, Staten Island NY Project # 106 849 501 (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☐ Other NYSDOL EQUIS EPT		Billing Information ☐ Same as Client Info PO #	
Client Information Client: LANGAN Address: 300 Kimball Dr Parsippany NJ 07054 Phone: 973 560 4900 Fax: 973 560 4901 Email: JFrisco@Langan.com		Project Manager: Jessica Frisco ALPHAQuote #: Turn-Around Time Standard ☐ Due Date: Rush (only if pre approved) ☐ # of Days:		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other SCOS		Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:			
These samples have been previously analyzed by Alpha ☐				ANALYSIS				Sample Filtration ☐ Done ☐ Lab to do Preservation ☐ Lab to do (Please Specify below)	
For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.		HELD VOCs HELD TCLP VOCs		Sample Specific Comments	
ALPHA Lab ID (Lab Use Only)		Sample ID		Collection Date Time		Sample Matrix Sampler's Initials		Total Bottles	
65979-01		163/FB-2		11/22 11:25		Liquid KSG		X X	
02		164/WC-2		10:45		Soil		X	
03		165/LSB-28-2.5-3		8:55				X X	
04		166/LSB-28-4.5-5		9:00				X X	
↓		167/LSB-28-4.5-5-MS		9:05				X X	
↓		168/LSB-28-4.5-5-MSD		9:10				X X	
05		169/LSB-28-6.5-7		9:20				X X	
06		170/LSB-28-9.5-10		9:25				X X	
07		171/LSB-29-2.5-3		8:20				X X	
08		172/LSB-29-4.5-5		8:25				X X	
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type V P A Preservative A A		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)	
Relinquished By: K.A. [Signature] [Signature] [Signature]		Date/Time 11/22 2:45 11-22-22 1900 11-23-22 11/23/22 0215		Received By: [Signature] [Signature] [Signature]		Date/Time 11-22-22 1450 11-22-22 214 11/23/22 0025 11/23/22 0215			

 NEW JERSEY CHAIN OF CUSTODY		Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105		Page <u>2</u> of <u>5</u>		Date Rec'd in Lab <u>11/23/22</u>		ALPHA Job # <u>2265979</u>	
Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193		Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288		Project Information Project Name: <u>990 Russell</u> Project Location: <u>990 Russell, Staten Island, NY</u> Project # <u>100549501</u> (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☒ Other <u>NYSDOC EQUIS EDD</u>		Billing Information ☐ Same as Client Info PO #	
Client Information Client: <u>LANGAN</u> Address: <u>300 Kimball Dr</u> <u>Persippany NJ 07054</u> Phone: <u>973-560-4900</u> Fax: <u>973-560-4901</u> Email: <u>Jfriscia@langan.com</u>		Project Manager: <u>Jessica Friscia</u> ALPHAQuote #: Turn-Around Time: Standard ☐ Due Date: Rush (only if pre approved) ☐ # of Days:		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SCOS</u>		Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:			
These samples have been previously analyzed by Alpha ☐		For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.		ANALYSIS HEAD VOCs HEAD TEL VOCs	
ALPHA Lab ID (Lab Use Only)		Sample ID		Collection Date Time		Sample Matrix		Sampler's Initials	
<u>65979-09</u>		<u>183/LSB-31-9.5-10</u>		<u>11/22 10:25</u>		<u>Soil</u>		<u>Kyle</u>	
<u>10</u>		<u>184/LSB-32-2.5-3</u>		<u>10:30</u>					
<u>11</u>		<u>185/LSB-32-4.5-5</u>		<u>10:35</u>					
<u>12</u>		<u>186/LSB-32-4.5-5</u>		<u>10:40</u>					
<u>13</u>		<u>187/LSB-32-6.5-7</u>		<u>10:45</u>					
<u>14</u>		<u>188/LSB-32-9.5-10</u>		<u>10:50</u>					
<u>15</u>		<u>189/LSB-38-2.5-3</u>		<u>11:45</u>					
<u>16</u>		<u>190/LSB-38-4.5-5</u>		<u>11:50</u>					
<u>17</u>		<u>191/LSB-38-6.5-7</u>		<u>11:55</u>					
<u>18</u>		<u>192/LSB-38-9.5-10</u>		<u>12:00</u>					
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code: P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>V.P</u> <u>A</u>		Preservative <u>A</u> <u>A</u>	
Form No: 01-14 HC (rev. 30-Sept-2013)		Relinquished By: <u>K.A. Friscia</u> <u>Jessica Friscia</u> <u>Yes</u>		Date/Time <u>11/22 2:45</u> <u>11-22-22 1900</u> <u>11-23-22</u> <u>11/23/22 0215</u>		Received By: <u>777 (AAL)</u> <u>SPR</u> <u>24mm</u>		Date/Time <u>11-22-22 1450</u> <u>11-22-22 2100</u> <u>11/23/22 0025</u> <u>11/23/22 0215</u>	
Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)									

 NEW JERSEY CHAIN OF CUSTODY	Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105		Page <u>3</u> of <u>5</u>		Date Rec'd in Lab <u>11/23/22</u>		ALPHA Job # <u>U2265979</u>																						
	Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193		Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288		Project Information Project Name: <u>990 Rossville</u> Project Location: <u>990 Rossville, Staten Island NY</u> Project # <u>100849501</u> (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☒ Other <u>NY DEC EQUISED</u>																						
	Client Information Client: <u>LANOAN</u> Address: <u>300 Kimball Dr</u> <u>Parsippany NJ 07054</u> Phone: <u>973 560 4900</u> Fax: <u>973 560 4901</u> Email: <u>Jfriscia@lanoan.com</u>		Billing Information ☐ Same as Client Info PO #		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SCOS</u>		Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:																						
These samples have been previously analyzed by Alpha ☐		For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.		ANALYSIS <table border="1" style="width:100%; border-collapse: collapse;"> <tr> <td style="writing-mode: vertical-rl; transform: rotate(180deg);">HELD VOCs</td> <td style="writing-mode: vertical-rl; transform: rotate(180deg);">HELD TELP VOCs</td> <td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td><td></td> </tr> </table>		HELD VOCs	HELD TELP VOCs																		
HELD VOCs	HELD TELP VOCs																												
Sample Filtration ☐ Done ☐ Lab to do Preservation ☐ Lab to do (Please Specify below)		Sample Specific Comments		Total Bottles																									
ALPHA Lab ID (Lab Use Only)		Sample ID				Collection Date Time		Sample Matrix		Sampler's Initials																			
65979-		19				173 / ~~LANOAN~~ <u>LANOAN</u> <u>APR 3</u>		11/22		8:30		Soil		KSG		X		X											
		20				174 / LSB-29-6.5-7				8:40																			
		21				175 / LSB-29-9.5-10				8:45																			
		22				176 / LSB-30-2.5-3				9:32																			
		23				177 / LSB-30-4.5-5				9:36																			
		24				178 / LSB-30-6.5-7				9:43																			
		25				179 / LSB-30-9.5-10				9:48																			
		26				180 / LSB-31-2.5-3				10:00																			
		27		181 / LSB-31-4.5-5				10:05																					
		28		182 / LSB-31-6.5-7				10:10																					
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>VP</u> <u>A</u>		Preservative <u>A</u> <u>A</u>		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)																			
Form No: 01-14 HC (rev. 30-Sept-2013)		Relinquished By: <u>K. A. Gelfoy</u> <u>M. L. Lanoan</u> <u>J. Friscia</u>		Date/Time <u>11/22 12:14:85</u> <u>11-22-22 1900</u> <u>11-23-22</u> <u>11/23/22 02:15</u>		Received By: <u>M. L. Lanoan</u> <u>J. Friscia</u> <u>W. Lanoan</u>		Date/Time <u>11-22-22 1450</u> <u>11-22-22 2100</u> <u>11/23/22 0215</u> <u>11/23/22 0215</u>																					

 ALPHA ANALYTICAL Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193	NEW JERSEY CHAIN OF CUSTODY Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288	Service Centers Mahwah, NJ 07430: 35 Whitney Rd, Suite 5 Albany, NY 12205: 14 Walker Way Tonawanda, NY 14150: 275 Cooper Ave, Suite 105	Page <u>4</u> of <u>5</u>		Date Rec'd in Lab <u>11/23/22</u>		ALPHA Job # <u>17265979</u>	
			Project Information Project Name: <u>990 Rossville</u> Project Location: <u>990 Rossville, Staten Island NY</u> Project # <u>100849581</u> (Use Project name as Project #) ☐		Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☒ Other <u>NYSDEC EQUIS EPC</u>		Billing Information ☐ Same as Client Info PO #	
Client Information Client: <u>LANGAN</u> Address: <u>300 Finball Dr</u> <u>Passaic, NY 07054</u> Phone: <u>973 560 4100</u> Fax: <u>" 4901</u> Email: <u>Jfriscia@langan.com</u>		Project Manager: <u>Jessica Friscia</u> ALPHAQuote #: Turn-Around Time Standard ☐ Due Date: Rush (only if pre approved) ☐ # of Days:		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SLOS</u>		Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:		
These samples have been previously analyzed by Alpha ☐		ANALYSIS		Sample Filtration ☐ Done ☐ Lab to do Preservation ☐ Lab to do (Please Specify below)		Total Bottles		
For EPH, selection is REQUIRED: ☐ Category 1 ☐ Category 2		For VOC, selection is REQUIRED: ☐ 1,4-Dioxane ☐ 8011		Other project specific requirements/comments: Please specify Metals or TAL.				
ALPHA Lab ID (Lab Use Only)	Sample ID	Collection Date Time		Sample Matrix	Sampler's Initials	HELD CUOB HELD TELPVOG		Sample Specific Comments
<u>65079-29</u>	<u>193/LSB-37-2.5-3</u>	<u>11/22</u>	<u>13:10</u>	<u>Soil</u>	<u>KSG</u>	<u>X</u>	<u>X</u>	
<u>30</u>	<u>194/LSB-37-4.5-5</u>		<u>13:15</u>					
<u>31</u>	<u>195/LSB-37-6.5-7</u>		<u>13:20</u>					
<u>32</u>	<u>196/LSB-37-9.5-10</u>		<u>12:25</u>					
<u>33</u>	<u>197/LSB-39-2.5-3</u>		<u>12:10</u>					
<u>34</u>	<u>198/LSB-39-4.5-5</u>		<u>12:15</u>					
<u>35</u>	<u>199/LSB-39-6.5-7</u>		<u>12:20</u>					
<u>36</u>	<u>200/LSB-39-9.5-10</u>		<u>12:25</u>					
<u>37</u>	<u>201/LSB-40-2.5-3</u>		<u>12:30</u>					
<u>38</u>	<u>202/LSB-40-4.5-5</u>		<u>12:35</u>					
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>VP A</u> Preservative <u>A A</u>		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)
Form No: 01-14 HC (rev. 30-Sept-2013)		Relinquished By:		Date/Time	Received By:		Date/Time	
		<u>K.A. Bolger</u>		<u>11/22 14:45</u>	<u>M.L. (AL)</u>		<u>11-22-22 1450</u>	
		<u>yes</u>		<u>11-23-22</u>	<u>yes</u>		<u>11-23-22 0215</u>	
		<u>yes</u>		<u>11/23/20215</u>	<u>yes</u>		<u>11/23/22 0215</u>	

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Westborough, MA 01581 8 Walkup Dr. TEL: 508-898-9220 FAX: 508-898-9193 <u>LANGAN</u>		Mansfield, MA 02048 320 Forbes Blvd TEL: 508-822-9300 FAX: 508-822-3288		Project Information Project Name: <u>990 Rossville</u> Project Location: <u>990 Rossville, Staten Island NY</u> Project # <u>100849501</u> (Use Project name as Project #) ☐				Deliverables ☐ NJ Full / Reduced ☐ EQUIS (1 File) ☐ EQUIS (4 File) ☒ Other <u>NYS DEC EQUIS</u>		Billing Information ☐ Same as Client Info PO #	
Client Information Client: <u>300 Winball Dr</u> Address: <u>Parsippany NJ 07054</u> Phone: <u>973-560-4900</u> Fax: <u>973-560-4901</u> Email: <u>Jfriscia@langan.com</u>		Project Manager: <u>Jessica Friscia</u> ALPHAQuote #: Turn-Around Time Standard ☐ Due Date: Rush (only if pre approved) ☐ # of Days:		Regulatory Requirement ☐ SRS Residential/Non Residential ☐ SRS Impact to Groundwater ☐ NJ Ground Water Quality Standards ☐ NJ IGW SPLP Leachate Criteria ☒ Other <u>SCOS</u>				Site Information Is this site impacted by Petroleum? Yes ☐ Petroleum Product:			
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ALPHA Lab ID (Lab Use Only)		Sample ID		Collection Date Time		Sample Matrix Sampler's Initials		Sample Specific Comments			
65979-39		~~203/LSB-40-63~~		11/22 14:45		50.1 K30		X X			
40		204/LSB-40-9.5-10		11/22 12:45		50.1		X X			
41		205/WC-3		11/22 12:50		50.1		X X			
28		206/LSB-31-6.5-7-MS		11/22 10:15		50.1		X X			
✓		207/LSB-31-6.5-7-MSD		11/22 10:20		50.1		X X			
Preservative Code: A = None B = HCl C = HNO ₃ D = H ₂ SO ₄ E = NaOH F = MeOH G = NaHSO ₄ H = Na ₂ S ₂ O ₃ K/E = Zn Ac/NaOH O = Other		Container Code P = Plastic A = Amber Glass V = Vial G = Glass B = Bacteria Cup C = Cube O = Other E = Encore D = BOD Bottle		Westboro: Certification No: MA935 Mansfield: Certification No: MA015		Container Type <u>V/P</u> <u>A</u> Preservative <u>A</u> <u>A</u>		Please print clearly, legibly and completely. Samples can not be logged in and turnaround time clock will not start until any ambiguities are resolved. BY EXECUTING THIS COC, THE CLIENT HAS READ AND AGREES TO BE BOUND BY ALPHA'S TERMS & CONDITIONS. (See reverse side.)			
Relinquished By: <u>K. A. [Signature]</u> <u>[Signature]</u> <u>[Signature]</u>		Date/Time <u>11/22 14:45</u> <u>11-22-22 1900</u> <u>11-23-22</u> <u>11/23/22 0215</u>		Received By: <u>[Signature]</u> <u>[Signature]</u> <u>[Signature]</u>		Date/Time <u>11-22-22 1450</u> <u>11-22-22 2100</u> <u>11/23/22 0025</u> <u>11/23/22 0215</u>					