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DATA REPORTING QUALIFIERS- ORGANIC

For reporting results, the following " Results Qualifiers" are used:

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

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LAB CHRONICLE

OrderID:	P4718	**OrderDate:**	11/5/2024 1:31:00 PM
Client:	Portal Partners Tri-Venture	**Project:**	Amtrak Sawtooth Bridges 2024
Contact:	Joseph Krupansky	**Location:**	L21,VOA Ref. #2 Soil,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P4718-01	**WB-307-SB01**	**SOIL**			**11/04/24**			**11/05/24**
			PCB	8082A		11/06/24	11/06/24	
			EPH	NJEPH		11/08/24	11/08/24	
P4718-02	**WB-307-SB02**	**SOIL**			**11/04/24**			**11/05/24**
			PCB	8082A		11/06/24	11/06/24	
			EPH	NJEPH		11/08/24	11/08/24	
P4718-04	**WB-307-SW**	**WATER**			**11/04/24**			**11/05/24**
			PCB	8082A		11/06/24	11/06/24	
			EPH	NJEPH		11/09/24	11/11/24	

QC SUMMARY

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SOIL EPH SURROGATE RECOVERY

Lab Name: CHEMTECH Contract: PORT06

Lab Code: CHEM CASE No.: P4718 SAS No.: P4718 SDG No.: P4718

Run Number: FC110824AL

Client SAMPLE NO.	1-chlorooctadecane (SURR)			TOT OUT
WB-307-SB01	70			0
WB-307-SB01MS	71			0
WB-307-SB01MSD	72			0
WB-307-SB02	60			0
PB164790BL	86			0
PB164790BS	76			0
PB164790BSD	80			0

	QC LIMITS
1-chlorooctadecane (SURR)	(40-140)

Column to be used to flag recovery values
* Values outside of contract required QC Limits
D Surrogate diluted out

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SOIL EPH SURROGATE RECOVERY

Lab Name: CHEMTECH Contract: PORT06

Lab Code: CHEM CASE No.: P4718 SAS No.: P4718 SDG No.: P4718

Run Number: FC111124AL

Client SAMPLE NO.	1-chlorooctadecane (SURR)			TOT OUT
WB-307-SW	100			0
PB164847BL	92			0
PB164847BS	80			0
PB164847BSD	91			0

	QC LIMITS
1-chlorooctadecane (SURR)	(40-140)

Column to be used to flag recovery values
* Values outside of contract required QC Limits
D Surrogate diluted out

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SOIL EPH SURROGATE RECOVERY

Lab Name: CHEMTECH Contract: PORT06

Lab Code: CHEM CASE No.: P4718 SAS No.: P4718 SDG No.: P4718

Run Number: FD110824AR

Client SAMPLE NO.	2-Bromonaphthalene (SURR)	2-Flurobiphenyl (SURR)	ortho-Terphenyl (SURR)	TOT OUT
WB-307-SB01	83	67	57	0
WB-307-SB01MS	119	108	68	0
WB-307-SB01MSD	119	108	70	0
WB-307-SB02	93	94	55	0
PB164790BL	92	63	81	0
PB164790BS	90	70	75	0
PB164790BSD	91	71	75	0

	QC LIMITS
2-Bromonaphthalene (SURR)	(40-140)
2-Flurobiphenyl (SURR)	(40-140)
ortho-Terphenyl (SURR)	(40-140)

Column to be used to flag recovery values
* Values outside of contract required QC Limits
D Surrogate diluted out

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SOIL EPH SURROGATE RECOVERY

Lab Name: CHEMTECH Contract: PORT06

Lab Code: CHEM CASE No.: P4718 SAS No.: P4718 SDG No.: P4718

Run Number: FD111124AR

Client SAMPLE NO.	2-Bromonaphthalene (SURR)	2-Flurobiphenyl (SURR)	ortho-Terphenyl (SURR)	TOT OUT
WB-307-SW	120	122	116	0
PB164847BL	103	72	92	0
PB164847BS	96	76	81	0
PB164847BSD	94	75	79	0

	QC LIMITS
2-Bromonaphthalene (SURR)	(40-140)
2-Flurobiphenyl (SURR)	(40-140)
ortho-Terphenyl (SURR)	(40-140)

Column to be used to flag recovery values
* Values outside of contract required QC Limits
D Surrogate diluted out

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SOIL EPH SURROGATE RECOVERY

	QC LIMITS
2-Bromonaphthalene (SURR)	(40-140)
2-Flurobiphenyl (SURR)	(40-140)
ortho-Terphenyl (SURR)	(40-140)

Column to be used to flag recovery values
* Values outside of contract required QC Limits
D Surrogate diluted out

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SOLID EPH MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : P4718-01MS **Datafile:** FC067675.D

Client ID : WB-307-SB01MS

COMPOUND	SPIKE ADDED mg/kg	SAMPLE CONCENTRATION mg/kg	MS/MSD CONCENTRATION mg/kg	% REC	Qual	QC LIMITS
Aliphatic C9-C12	12.8	0.83	10.4	75		(40-140)
Aliphatic C12-C16	8.5	17.0	28.9	139		(40-140)
Aliphatic C16-C21	12.8	0.48	14.3	108		(40-140)
Aliphatic C21-C28	17.1	0	18.8	110		(40-140)
Aliphatic C28-C40	25.6	3.53	35.3	124		(40-140)

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SOLID EPH MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : P4718-01MSD **Datafile:** FC067676.D

Client ID : WB-307-SB01MSD

COMPOUND	SPIKE ADDED mg/kg	SAMPLE CONCENTRATION mg/kg	MS/MSD CONCENTRATION mg/kg	% REC	Qual	RPD |	QC LIMITS	QC Limit Of RPD
Aliphatic C9-C12	12.8	0.83	10.3	74		1.21 |	(40-140)	25
Aliphatic C12-C16	8.5	17.0	28.7	137		1.45 |	(40-140)	25
Aliphatic C16-C21	12.8	0.48	14.2	107		0.93 |	(40-140)	25
Aliphatic C21-C28	17.1	0	18.8	110		0 |	(40-140)	25
Aliphatic C28-C40	25.6	3.53	35.3	124		0 |	(40-140)	25

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SOLID EPH MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : P4718-01MS **Datafile:** FD048678.D

Client ID : WB-307-SB01MS

COMPOUND	SPIKE ADDED mg/kg	SAMPLE CONCENTRATION mg/kg	MS/MSD CONCENTRATION mg/kg	% REC	Qual	QC LIMITS
Aromatic C10-C12	8.5	0	7.34	86		(40-140)
Aromatic C12-C16	12.8	5.14	21.2	125		(40-140)
Aromatic C16-C21	21.3	1.85	26.1	113		(40-140)
Aromatic C21-C36	34.1	2.94	41.2	112		(40-140)

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SOLID EPH MATRIX SPIKE/MATRIX SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : P4718-01MSD **Datafile:** FD048679.D

Client ID : WB-307-SB01MSD

COMPOUND	SPIKE ADDED mg/kg	SAMPLE CONCENTRATION mg/kg	MS/MSD CONCENTRATION mg/kg	% REC	Qual	RPD |	QC LIMITS	QC Limit Of RPD
Aromatic C10-C12	8.5	0	7.47	88		1.73 |	(40-140)	25
Aromatic C12-C16	12.8	5.14	17.1	93		28.9 *|	(40-140)	25
Aromatic C16-C21	21.3	1.85	26.6	115		1.75 |	(40-140)	25
Aromatic C21-C36	34.2	2.94	43.0	117		4.37 |	(40-140)	25

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SOLID EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164790BS **Datafile:** FC067671.D

Client ID : PB164790BS

COMPOUND	SPIKE ADDED mg/kg	LCS/LCSD CONCENTRATION mg/kg	% REC	Qual	QC LIMITS
Aliphatic C9-C12	10.0	5.28	53		(40-140)
Aliphatic C12-C16	6.7	4.52	68		(40-140)
Aliphatic C16-C21	10.0	8.05	80		(40-140)
Aliphatic C21-C28	13.3	11.0	82		(40-140)
Aliphatic C28-C40	20.0	18.9	94		(40-140)

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SOLID EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164790BSD **Datafile:** FC067672.D

Client ID : PB164790BSD

COMPOUND	SPIKE ADDED mg/kg	LCS/LCSD CONCENTRATION mg/kg	% REC	Qual	RPD |	QC LIMITS	QC Limit Of RPD
Aliphatic C9-C12	10	5.31	53		0.66|	(40-140)	50
Aliphatic C12-C16	6.7	4.55	68		0.76|	(40-140)	50
Aliphatic C16-C21	10	8.11	81		0.84|	(40-140)	50
Aliphatic C21-C28	13.3	11.1	83		1|	(40-140)	50
Aliphatic C28-C40	20.0	18.9	95		0.09|	(40-140)	50

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WATER EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164847BS **Datafile:** FC067695.D

Client ID : PB164847BS

COMPOUND	SPIKE ADDED ug/l	LCS/LCSD CONCENTRATION ug/l	% REC	Qual	QC LIMITS
Aliphatic C9-C12	300	164	55		(40-140)
Aliphatic C12-C16	200	143	72		(40-140)
Aliphatic C16-C21	300	256	85		(40-140)
Aliphatic C21-C28	400	360	90		(40-140)
Aliphatic C28-C40	600	602	100		(40-140)

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WATER EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164847BSD **Datafile:** FC067696.D

Client ID : PB164847BSD

COMPOUND	SPIKE ADDED ug/l	LCS/LCSD CONCENTRATION ug/l	% REC	Qual	RPD |	QC LIMITS	QC Limit Of RPD
Aliphatic C9-C12	300	179	60		8.7|	(40-140)	50
Aliphatic C12-C16	200	155	78		8.1|	(40-140)	50
Aliphatic C16-C21	300	279	93		8.6|	(40-140)	50
Aliphatic C21-C28	400	395	99		9.3|	(40-140)	50
Aliphatic C28-C40	600	660	110		9.5|	(40-140)	50

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SOLID EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164790BS **Datafile:** FD048674.D

Client ID : PB164790BS

COMPOUND	SPIKE ADDED mg/kg	LCS/LCSD CONCENTRATION mg/kg	% REC	Qual	QC LIMITS
Aromatic C10-C12	6.7	3.28	49		(40-140)
Aromatic C12-C16	10.0	6.04	60		(40-140)
Aromatic C16-C21	16.7	12.7	76		(40-140)
Aromatic C21-C36	26.7	20.3	76		(40-140)

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SOLID EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164790BSD **Datafile:** FD048675.D

Client ID : PB164790BSD

COMPOUND	SPIKE ADDED mg/kg	LCS/LCSD CONCENTRATION mg/kg	% REC	Qual	RPD |	QC LIMITS	QC Limit Of RPD
Aromatic C10-C12	6.7	3.32	50		1.3|	(40-140)	50
Aromatic C12-C16	10	6.08	61		0.76|	(40-140)	50
Aromatic C16-C21	16.7	12.8	77		0.88|	(40-140)	50
Aromatic C21-C36	26.6	20.5	77		0.98|	(40-140)	50

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WATER EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164847BS **Datafile:** FD048699.D

Client ID : PB164847BS

COMPOUND	SPIKE ADDED ug/l	LCS/LCSD CONCENTRATION ug/l	% REC	Qual	QC LIMITS
Aromatic C10-C12	200	106	53		(40-140)
Aromatic C12-C16	300	195	65		(40-140)
Aromatic C16-C21	500	412	82		(40-140)
Aromatic C21-C36	800	669	84		(40-140)

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WATER EPH LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICATE RECOVERY

Lab Name: Chemtech **Client:** Portal Partners Tri-Venture

Lab Code: CHEM **Cas No:** P4718 **SAS No :** P4718 **SDG No:** P4718

Sample No : PB164847BSD **Datafile:** FD048700.D

Client ID : PB164847BSD

COMPOUND	SPIKE ADDED ug/l	LCS/LCSD CONCENTRATION ug/l	% REC	Qual	RPD |	QC LIMITS	QC Limit Of RPD
Aromatic C10-C12	200	104	52		1.9|	(40-140)	50
Aromatic C12-C16	300	191	64		2.1|	(40-140)	50
Aromatic C16-C21	500	394	79		4.5|	(40-140)	50
Aromatic C21-C36	800	657	82		1.8|	(40-140)	50

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4B

METHOD BLANK SUMMARY

EPA SAMPLE NO.

PB164790BL

Lab Name: CHEMTECH Contract: PORT06

Lab Code: CHEM Case No.: P4718 SAS No.: P4718 SDG NO.: P4718

Instrument ID: FID_C Lab Sample ID: PB164790BL

Matrix: (soil/water) Solid Date Extracted: 11/8/2024 8:47:00 A

Level: (low/med) low

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

EPA SAMPLE NO.	LAB SAMPLE ID
WB-307-SB01	P4718-01
WB-307-SB01MS	P4718-01MS
WB-307-SB02	P4718-02
WB-307-SB01MSD	P4718-01MSD
PB164790BS	PB164790BS
PB164790BSD	PB164790BSD

COMMENTS:

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4B

METHOD BLANK SUMMARY

EPA SAMPLE NO.

PB164847BL

Lab Name: CHEMTECH Contract: PORT06

Lab Code: CHEM Case No.: P4718 SAS No.: P4718 SDG NO.: P4718

Instrument ID: FID_C Lab Sample ID: PB164847BL

Matrix: (soil/water) Water Date Extracted: 11/9/2024 8:38:00 A

Level: (low/med) low

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

EPA SAMPLE NO.	LAB SAMPLE ID
PB164847BS	PB164847BS
PB164847BSD	PB164847BSD
WB-307-SW	P4718-04

COMMENTS:

SAMPLE DATA

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Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SB01	SDG No.:	P4718
Lab Sample ID:	P4718-01	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.06 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

Prep Date :	Date Analyzed :	Prep Batch ID
11/08/24 08:47	11/08/24 18:08	PB164790

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units(Dry Weight)	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	0.83	J	1	0.49	1.28	mg/kg	FC067673.D
Aliphatic C12-C16	Aliphatic C12-C16	17.0		1	0.31	0.85	mg/kg	FC067673.D
Aliphatic C16-C21	Aliphatic C16-C21	0.48	J	1	0.38	1.28	mg/kg	FC067673.D
Aliphatic C21-C28	Aliphatic C21-C28	1.02	U	1	1.02	1.71	mg/kg	FC067673.D
Aliphatic C28-C40	Aliphatic C28-C40	3.53		1	2.30	2.56	mg/kg	FC067673.D
Aromatic C10-C12	Aromatic C10-C12	0.38	U	1	0.38	0.85	mg/kg	FD048676.D
Aromatic C12-C16	Aromatic C12-C16	5.14		1	0.44	1.28	mg/kg	FD048676.D
Aromatic C16-C21	Aromatic C16-C21	1.85	J	1	1.23	2.13	mg/kg	FD048676.D
Aromatic C21-C36	Aromatic C21-C36	2.94	J	1	2.56	3.41	mg/kg	FD048676.D
Total AliphaticEPH	Total AliphaticEPH	21.8			4.50	7.68	mg/kg	
Total AromaticEPH	Total AromaticEPH	9.93			4.61	7.67	mg/kg	
Total EPH	Total EPH	31.8			9.11	15.4	mg/kg	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SB01	SDG No.:	P4718
Lab Sample ID:	P4718-01	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.06 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067673.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter		Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS							
Aliphatic C9-C12	Aliphatic C9-C12		0.83	J	0.49	1.28	mg/kg
Aliphatic C12-C16	Aliphatic C12-C16		17.0		0.31	0.85	mg/kg
Aliphatic C16-C21	Aliphatic C16-C21		0.48	J	0.38	1.28	mg/kg
Aliphatic C21-C28	Aliphatic C21-C28		1.02	U	1.02	1.71	mg/kg
Aliphatic C28-C40	Aliphatic C28-C40		3.53		2.30	2.56	mg/kg
SURROGATES							
3383-33-2	1-chlorooctadecane (SURR)		35.1		40 - 140	70%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)		0.00		40 - 140	0%	SPK: 50

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Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	P4718-01	Acq On:	08 Nov 2024 18:08
Client Sample ID:	WB-307-SB01	Operator:	YP/AJ
Data file:	FC067673.D	Misc:	
Instrument:	FID_C	ALS Vial:	14
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.171	6.450	1317742	9.727	300	ug/ml
Aliphatic C12-C16	6.451	9.841	26229341	199.187	200	ug/ml
Aliphatic C16-C21	9.842	13.199	710513	5.584	300	ug/ml
Aliphatic C21-C28	13.200	16.853	635825	5.295	400	ug/ml
Aliphatic C28-C40	16.854	21.698	4180404	41.352	600	ug/ml
Aliphatic EPH	3.171	21.698	33073825	261.145		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.931	12.931	3796139	35.15		ug/ml
Aliphatic C9-C28	3.171	16.853	28893421	219.793	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067673.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 18:08
Operator : YP/AJ
Sample : P4718-01
Misc :
ALS Vial : 14 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB01

Integration File: autoint1.e
Quant Time: Nov 09 01:37:36 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
12) S 1-chlorooctadecane (S...	12.931	3796139	35.153 ug/ml
Spiked Amount 50.000		Recovery = 70.31%	
Target Compounds			

(f)=RT Delta > 1/2 Window (m)=manual int.

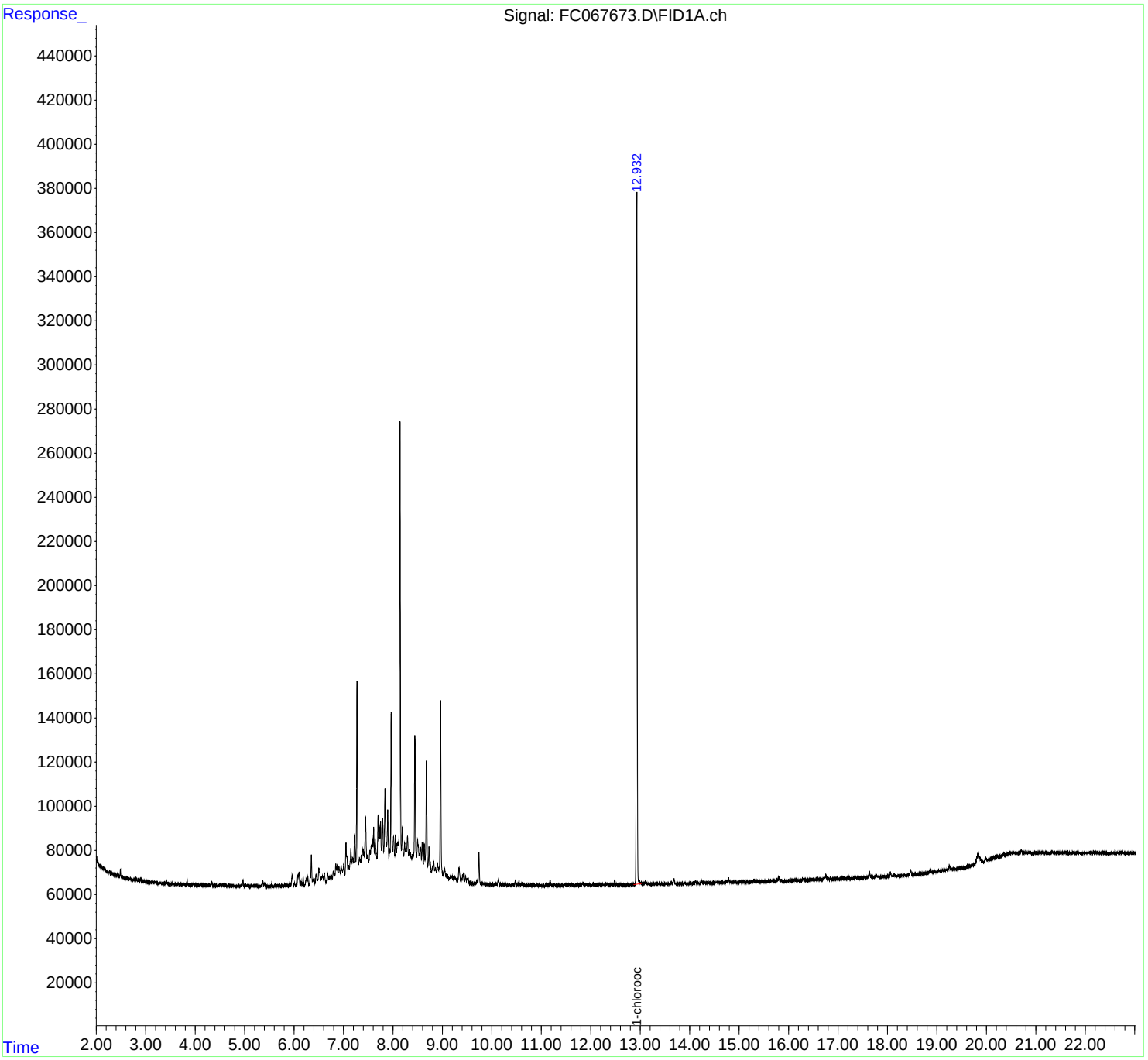
Quantitation Report (QT Reviewed)

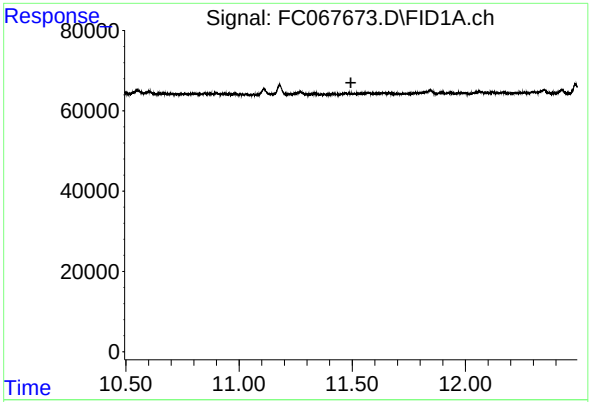
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067673.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 18:08
Operator : YP/AJ
Sample : P4718-01
Misc :
ALS Vial : 14 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB01

Integration File: autoint1.e
Quant Time: Nov 09 01:37:36 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

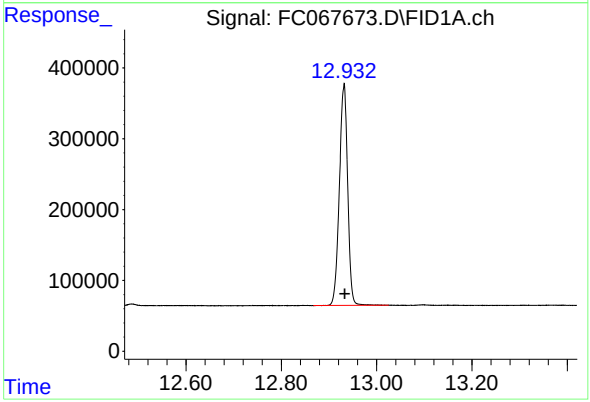




#9 ortho-Terphenyl (SURR)

R.T.: 0.000 min
Exp R.T. : 11.494 min
Response: 0
Conc: N.D.

Instrument :
FID_C
ClientSampleId :
WB-307-SB01



#12 1-chlorooctadecane (SURR)

R.T.: 12.931 min
Delta R.T.: -0.002 min
Response: 3796139
Conc: 35.15 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067673.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 18:08
Sample : P4718-01
Misc :
ALS Vial : 14 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.272	3.221	3.326	BV	538	6890	0.18%	0.019%
2	3.354	3.326	3.408	PV	111	3100	0.08%	0.008%
3	3.425	3.408	3.514	PV	869	8819	0.23%	0.024%
4	3.536	3.514	3.561	VV	237	3375	0.09%	0.009%
5	3.594	3.561	3.624	VV	299	6461	0.17%	0.017%
6	3.641	3.624	3.651	VV	324	2801	0.07%	0.008%
7	3.662	3.651	3.748	VV	423	6644	0.17%	0.018%
8	3.761	3.748	3.801	VV	427	5729	0.15%	0.015%
9	3.837	3.801	3.896	PV	1760	20841	0.54%	0.056%
10	3.937	3.896	3.951	PV	737	8948	0.23%	0.024%
11	3.965	3.951	4.011	VV	1033	11962	0.31%	0.032%
12	4.032	4.011	4.058	VV	377	5102	0.13%	0.014%
13	4.110	4.058	4.129	VV	743	14032	0.36%	0.038%
14	4.139	4.129	4.209	VV	302	7867	0.20%	0.021%
15	4.250	4.209	4.261	PV	243	3208	0.08%	0.009%
16	4.269	4.261	4.277	VV	186	1315	0.03%	0.004%
17	4.302	4.277	4.317	VV	257	3986	0.10%	0.011%
18	4.336	4.317	4.386	VV	1923	21753	0.57%	0.059%
19	4.402	4.386	4.427	VV	259	4192	0.11%	0.011%
20	4.446	4.427	4.477	VV	237	4704	0.12%	0.013%
21	4.503	4.477	4.520	VV	865	10855	0.28%	0.029%
22	4.534	4.520	4.545	VV	461	4871	0.13%	0.013%
23	4.559	4.545	4.573	VV	830	8642	0.22%	0.023%
24	4.589	4.573	4.606	VV	1347	13142	0.34%	0.035%
25	4.618	4.606	4.632	VV	331	3478	0.09%	0.009%

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26	4.644	4.632	4.683	VV	189	4749	0.12%	0.013%
27	4.706	4.683	4.733	VV	292	5854	0.15%	0.016%
28	4.747	4.733	4.778	VV	172	3289	0.09%	0.009%
29	4.786	4.778	4.798	VV	160	1673	0.04%	0.005%
30	4.806	4.798	4.841	VV	210	2782	0.07%	0.008%
31	4.891	4.841	4.908	PV	276	5610	0.15%	0.015%
32	4.967	4.908	4.995	VV	3003	43363	1.13%	0.117%
33	5.021	4.995	5.060	VV	851	14822	0.39%	0.040%
34	5.074	5.060	5.110	VV	499	6710	0.17%	0.018%
35	5.139	5.110	5.147	PV	183	2273	0.06%	0.006%
36	5.164	5.147	5.184	VV	301	4868	0.13%	0.013%
37	5.191	5.184	5.247	VV	280	7539	0.20%	0.020%
38	5.259	5.247	5.304	VV	240	5990	0.16%	0.016%
39	5.314	5.304	5.347	VV	197	3513	0.09%	0.009%
40	5.369	5.347	5.451	VV	2565	52029	1.35%	0.140%
41	5.467	5.451	5.483	VV	272	3051	0.08%	0.008%
42	5.550	5.483	5.576	VV	1568	21378	0.56%	0.058%
43	5.626	5.576	5.641	VV	325	6416	0.17%	0.017%
44	5.662	5.641	5.692	VV	482	9247	0.24%	0.025%
45	5.716	5.692	5.729	VV	344	5128	0.13%	0.014%
46	5.759	5.729	5.791	VV	789	12328	0.32%	0.033%
47	5.810	5.791	5.841	VV	775	10734	0.28%	0.029%
48	5.859	5.841	5.886	VV	770	10652	0.28%	0.029%
49	5.915	5.886	5.937	VV	1361	23214	0.60%	0.063%
50	5.961	5.937	5.992	VV	5110	86258	2.24%	0.233%
51	6.009	5.992	6.054	VV	1668	27706	0.72%	0.075%
52	6.100	6.054	6.123	VV	6589	142416	3.70%	0.385%
53	6.141	6.123	6.161	VV	2375	31296	0.81%	0.084%
54	6.184	6.161	6.211	VV	4309	55145	1.43%	0.149%
55	6.245	6.211	6.262	VV	3256	60105	1.56%	0.162%
56	6.278	6.262	6.300	VV	4314	57311	1.49%	0.155%
57	6.350	6.300	6.371	VV	14299	219235	5.70%	0.592%
58	6.384	6.371	6.395	VV	3125	39497	1.03%	0.107%
59	6.407	6.395	6.422	VV	3664	42485	1.10%	0.115%
60	6.446	6.422	6.466	VV	5227	96359	2.51%	0.260%
61	6.502	6.466	6.535	VV	8204	201477	5.24%	0.544%
62	6.575	6.535	6.594	VV	4701	135950	3.53%	0.367%
63	6.612	6.594	6.644	VV	6181	117592	3.06%	0.317%
64	6.680	6.644	6.696	VV	5777	116500	3.03%	0.315%
65	6.750	6.722	6.773	VV	4537	129291	3.36%	0.349%
66	6.793	6.773	6.826	VV	6792	172300	4.48%	0.465%
67	6.845	6.826	6.859	VV	10184	156244	4.06%	0.422%
68	6.871	6.859	6.890	VV	8969	145209	3.78%	0.392%
69	6.909	6.890	6.935	VV	8785	194660	5.06%	0.526%

70	6.953	6.935	6.980	VV	9445	209618	5.45%	0.566%
71	7.007	6.980	7.028	VV	10732	227975	5.93%	0.616%
72	7.051	7.028	7.089	VV	19520	443559	11.53%	1.198%
73	7.150	7.116	7.168	VV	17180	379599	9.87%	1.025%
74	7.185	7.168	7.204	VV	12416	254262	6.61%	0.686%
75	7.224	7.204	7.250	VV	22866	453874	11.80%	1.225%
76	7.273	7.250	7.303	VV	93393	1178583	30.65%	3.182%
77	7.325	7.303	7.348	VV	12478	315329	8.20%	0.851%
78	7.392	7.348	7.418	VV	16715	601401	15.64%	1.624%
79	7.446	7.418	7.475	VV	31407	690700	17.96%	1.865%
80	7.534	7.511	7.544	VV	16202	283595	7.37%	0.766%
81	7.582	7.544	7.594	VV	21070	540032	14.04%	1.458%
82	7.610	7.594	7.625	VV	26624	393148	10.22%	1.061%
83	7.640	7.625	7.677	VV	21591	528332	13.74%	1.426%
84	7.699	7.677	7.714	VV	31923	498608	12.96%	1.346%
85	7.727	7.714	7.738	VV	26614	345861	8.99%	0.934%
86	7.750	7.738	7.767	VV	29509	413252	10.75%	1.116%
87	7.793	7.767	7.813	VV	30463	603362	15.69%	1.629%
88	7.839	7.813	7.867	VV	43998	876713	22.80%	2.367%
89	7.894	7.867	7.919	VV	34553	704241	18.31%	1.901%
90	7.964	7.919	7.989	VV	78940	1287360	33.47%	3.476%
91	8.013	7.989	8.034	VV	22077	505794	13.15%	1.366%
92	8.053	8.034	8.071	VV	23181	402913	10.48%	1.088%
93	8.093	8.071	8.110	VV	19498	431323	11.22%	1.165%
94	8.143	8.110	8.171	VV	210630	2746547	71.42%	7.416%
95	8.191	8.171	8.217	VV	26767	531630	13.82%	1.435%
96	8.237	8.217	8.252	VV	19521	348537	9.06%	0.941%
97	8.262	8.252	8.271	VV	16418	178501	4.64%	0.482%
98	8.294	8.271	8.315	VV	22471	491463	12.78%	1.327%
99	8.333	8.315	8.371	VV	16451	494674	12.86%	1.336%
100	8.387	8.371	8.402	VV	14340	241728	6.29%	0.653%
101	8.443	8.402	8.480	VV	67445	1224732	31.85%	3.307%
102	8.498	8.480	8.534	VV	21171	549741	14.29%	1.484%
103	8.558	8.534	8.575	VV	17283	373933	9.72%	1.010%
104	8.631	8.613	8.648	VV	19176	301582	7.84%	0.814%
105	8.678	8.648	8.705	VV	56889	899385	23.39%	2.428%
106	8.728	8.705	8.745	VV	17678	311416	8.10%	0.841%
107	8.753	8.745	8.778	VV	11051	175695	4.57%	0.474%
108	8.824	8.778	8.844	VV	11166	332340	8.64%	0.897%
109	8.860	8.844	8.878	VV	8225	148643	3.87%	0.401%
110	8.901	8.878	8.923	VV	9932	225305	5.86%	0.608%
111	8.963	8.923	9.024	VV	84649	1276163	33.18%	3.446%
112	9.046	9.024	9.069	VV	7901	165414	4.30%	0.447%

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113	9.089	9.069	9.133	VV	5240	168947	4.39%	0.456%
114	9.164	9.133	9.174	VV	3989	91041	2.37%	0.246%
115	9.196	9.174	9.230	VV	4372	127639	3.32%	0.345%
116	9.245	9.230	9.308	VV	3796	147344	3.83%	0.398%
117	9.380	9.368	9.394	VV	3601	51907	1.35%	0.140%
118	9.418	9.394	9.444	VV	5002	107436	2.79%	0.290%
119	9.466	9.444	9.485	VV	4711	80415	2.09%	0.217%
120	9.518	9.485	9.549	VV	3835	101757	2.65%	0.275%
121	9.571	9.549	9.634	VV	1641	63621	1.65%	0.172%
122	9.659	9.634	9.673	VV	1605	30388	0.79%	0.082%
123	9.695	9.673	9.714	VV	2036	39792	1.03%	0.107%
124	9.739	9.714	9.785	VV	14960	204271	5.31%	0.552%
125	9.808	9.785	9.825	VV	1151	25770	0.67%	0.070%
126	9.840	9.825	9.891	VV	1213	32927	0.86%	0.089%
127	9.898	9.891	9.938	VV	701	16504	0.43%	0.045%
128	9.951	9.938	9.998	VV	600	19512	0.51%	0.053%
129	10.013	9.998	10.038	VV	584	11533	0.30%	0.031%
130	10.127	10.038	10.153	VV	2495	66064	1.72%	0.178%
131	10.173	10.153	10.192	VV	905	15281	0.40%	0.041%
132	10.216	10.192	10.240	VV	772	16818	0.44%	0.045%
133	10.270	10.240	10.308	VV	773	17797	0.46%	0.048%
134	10.338	10.308	10.351	VV	405	8077	0.21%	0.022%
135	10.374	10.351	10.394	VV	473	9359	0.24%	0.025%
136	10.412	10.394	10.439	VV	506	10957	0.28%	0.030%
137	10.477	10.439	10.514	VV	2697	43643	1.13%	0.118%
138	10.551	10.514	10.579	VV	1163	27443	0.71%	0.074%
139	10.602	10.579	10.640	VV	896	18193	0.47%	0.049%
140	10.668	10.640	10.717	VV	349	12657	0.33%	0.034%
141	10.759	10.717	10.773	VV	282	7292	0.19%	0.020%
142	10.798	10.773	10.831	VV	354	8191	0.21%	0.022%
143	10.848	10.831	10.883	VV	363	8231	0.21%	0.022%
144	10.895	10.883	10.918	VV	470	6783	0.18%	0.018%
145	10.934	10.918	10.967	VV	253	5393	0.14%	0.015%
146	10.983	10.967	11.017	VV	204	4149	0.11%	0.011%
147	11.031	11.017	11.056	VV	148	1572	0.04%	0.004%
148	11.065	11.056	11.072	VV	129	463	0.01%	0.001%
149	11.110	11.072	11.146	PV	1500	21868	0.57%	0.059%
150	11.179	11.146	11.214	VV	2433	34000	0.88%	0.092%
151	11.225	11.214	11.236	VV	168	1827	0.05%	0.005%
152	11.271	11.236	11.308	VV	687	13535	0.35%	0.037%
153	11.334	11.308	11.354	VV	370	4614	0.12%	0.012%
154	11.414	11.354	11.444	VV	137	3937	0.10%	0.011%
155	11.472	11.444	11.517	VV	332	9164	0.24%	0.025%

156	11.568	11.517	11.596	VV	431	11521	0.30%	0.031%
157	11.634	11.596	11.714	VV	367	15760	0.41%	0.043%
158	11.751	11.714	11.760	VV	229	4592	0.12%	0.012%
159	11.784	11.760	11.797	VV	392	6383	0.17%	0.017%
160	11.844	11.797	11.874	VV	1009	24330	0.63%	0.066%
161	11.895	11.874	11.909	VV	408	5982	0.16%	0.016%
162	11.934	11.909	11.953	VV	419	7268	0.19%	0.020%
163	11.989	11.953	12.018	VV	329	9546	0.25%	0.026%
164	12.064	12.018	12.111	VV	640	20275	0.53%	0.055%
165	12.121	12.111	12.151	VV	454	8065	0.21%	0.022%
166	12.166	12.151	12.199	VV	438	8161	0.21%	0.022%
167	12.259	12.199	12.284	VV	334	13274	0.35%	0.036%
168	12.299	12.284	12.316	VV	502	8016	0.21%	0.022%
169	12.347	12.316	12.387	VV	1085	20665	0.54%	0.056%
170	12.396	12.387	12.400	VV	142	1114	0.03%	0.003%
171	12.426	12.400	12.464	VV	950	15967	0.42%	0.043%
172	12.486	12.464	12.539	VV	2456	35632	0.93%	0.096%
173	12.555	12.539	12.587	VV	287	6315	0.16%	0.017%
174	12.601	12.587	12.621	VV	289	4174	0.11%	0.011%
175	12.632	12.621	12.718	VV	170	2384	0.06%	0.006%
176	12.768	12.718	12.792	PV	274	6888	0.18%	0.019%
177	12.807	12.792	12.828	VV	185	3071	0.08%	0.008%
178	12.847	12.828	12.865	VV	299	4192	0.11%	0.011%
179	12.931	12.865	13.066	VV	310496	3845852	100.00%	10.384%
180	13.097	13.066	13.133	VV	1190	25994	0.68%	0.070%
181	13.148	13.133	13.158	VV	530	7047	0.18%	0.019%
182	13.166	13.158	13.201	VV	497	9040	0.24%	0.024%
183	13.210	13.201	13.246	VV	378	7461	0.19%	0.020%
184	13.260	13.246	13.286	VV	327	6108	0.16%	0.016%
185	13.308	13.286	13.334	VV	438	9691	0.25%	0.026%
186	13.366	13.334	13.382	VV	494	11168	0.29%	0.030%
187	13.391	13.382	13.419	VV	440	6811	0.18%	0.018%
188	13.443	13.419	13.478	VV	291	7875	0.20%	0.021%
189	13.534	13.478	13.574	VV	437	16722	0.43%	0.045%
190	13.630	13.574	13.653	VV	913	20711	0.54%	0.056%
191	13.683	13.653	13.761	VV	2602	42996	1.12%	0.116%
192	13.771	13.761	13.811	VV	235	4968	0.13%	0.013%
193	13.828	13.811	13.845	VV	175	2571	0.07%	0.007%
194	13.855	13.845	13.870	VV	135	1376	0.04%	0.004%
195	13.901	13.870	13.938	PV	344	8853	0.23%	0.024%
196	13.950	13.938	13.962	VV	253	3051	0.08%	0.008%
197	13.976	13.962	13.998	VV	244	3388	0.09%	0.009%
198	14.018	13.998	14.041	VV	228	2988	0.08%	0.008%
199	14.119	14.041	14.148	VV	1069	20827	0.54%	0.056%

rteres

200	14.158	14.148	14.174	VV	260	3303	0.09%	0.009%
201	14.182	14.174	14.198	VV	230	2486	0.06%	0.007%
202	14.209	14.198	14.220	VV	177	1929	0.05%	0.005%
203	14.245	14.220	14.284	VV	1145	17711	0.46%	0.048%
204	14.302	14.284	14.324	VV	265	4347	0.11%	0.012%
205	14.336	14.324	14.361	VV	218	4216	0.11%	0.011%
206	14.444	14.361	14.466	VV	285	12312	0.32%	0.033%
207	14.476	14.466	14.480	VV	244	1633	0.04%	0.004%
208	14.492	14.480	14.517	VV	323	5516	0.14%	0.015%
209	14.538	14.517	14.574	VV	316	8160	0.21%	0.022%
210	14.590	14.574	14.658	VV	314	10305	0.27%	0.028%
211	14.669	14.658	14.678	VV	207	2245	0.06%	0.006%
212	14.696	14.678	14.708	VV	289	4034	0.10%	0.011%
213	14.741	14.708	14.761	VV	963	15865	0.41%	0.043%
214	14.785	14.761	14.861	VV	2314	43243	1.12%	0.117%
215	14.864	14.861	14.881	VV	271	2188	0.06%	0.006%
216	14.901	14.881	14.927	VV	216	3829	0.10%	0.010%
217	14.985	14.927	15.007	PV	299	6624	0.17%	0.018%
218	15.028	15.007	15.053	VV	194	4216	0.11%	0.011%
219	15.074	15.053	15.108	VV	216	4585	0.12%	0.012%
220	15.115	15.108	15.140	VV	180	1714	0.04%	0.005%
221	15.166	15.140	15.186	VV	271	4703	0.12%	0.013%
222	15.205	15.186	15.262	VV	316	10685	0.28%	0.029%
223	15.303	15.262	15.338	VV	963	20080	0.52%	0.054%
224	15.351	15.338	15.401	VV	380	9334	0.24%	0.025%
225	15.434	15.401	15.454	VV	239	4121	0.11%	0.011%
226	15.485	15.454	15.504	VV	244	5023	0.13%	0.014%
227	15.513	15.504	15.554	VV	290	6066	0.16%	0.016%
228	15.563	15.554	15.576	VV	186	2216	0.06%	0.006%
229	15.618	15.576	15.651	VV	412	12432	0.32%	0.034%
230	15.670	15.651	15.734	VV	419	14037	0.36%	0.038%
231	15.765	15.734	15.781	VV	731	12077	0.31%	0.033%
232	15.804	15.781	15.838	VV	1895	31352	0.82%	0.085%
233	15.842	15.838	15.956	VV	478	11253	0.29%	0.030%
234	15.987	15.956	16.055	PV	404	12279	0.32%	0.033%
235	16.062	16.055	16.068	VV	103	699	0.02%	0.002%
236	16.159	16.068	16.178	VV	365	14325	0.37%	0.039%
237	16.187	16.178	16.202	VV	234	2666	0.07%	0.007%
238	16.285	16.202	16.397	VV	989	29610	0.77%	0.080%
239	16.451	16.397	16.569	VV	348	21704	0.56%	0.059%
240	16.589	16.569	16.651	VV	395	12439	0.32%	0.034%
241	16.719	16.651	16.728	VV	699	14203	0.37%	0.038%
242	16.753	16.728	16.824	VV	2080	38892	1.01%	0.105%

rteres

243	16.846	16.824	16.887	VV	256	7603	0.20%	0.021%
244	16.931	16.887	16.951	VV	354	9353	0.24%	0.025%
245	16.980	16.951	17.015	VV	470	10391	0.27%	0.028%
246	17.078	17.015	17.122	PV	418	15435	0.40%	0.042%
247	17.203	17.122	17.248	VV	1456	36497	0.95%	0.099%
248	17.263	17.248	17.278	VV	171	2468	0.06%	0.007%
249	17.311	17.278	17.438	VV	524	25589	0.67%	0.069%
250	17.480	17.438	17.503	PV	429	10181	0.26%	0.027%
251	17.528	17.503	17.553	VV	307	6784	0.18%	0.018%
252	17.571	17.553	17.591	VV	347	6610	0.17%	0.018%
253	17.637	17.591	17.721	VV	2436	56806	1.48%	0.153%
254	17.770	17.721	17.841	VV	984	33103	0.86%	0.089%
255	17.919	17.841	17.944	VV	339	12931	0.34%	0.035%
256	18.060	17.944	18.109	VV	2122	52292	1.36%	0.141%
257	18.136	18.109	18.194	VV	807	18627	0.48%	0.050%
258	18.210	18.194	18.231	VV	302	4419	0.11%	0.012%
259	18.264	18.231	18.284	PV	200	4127	0.11%	0.011%
260	18.328	18.284	18.354	VV	308	9226	0.24%	0.025%
261	18.370	18.354	18.385	VV	156	1913	0.05%	0.005%
262	18.469	18.385	18.537	VV	2362	44327	1.15%	0.120%
263	18.563	18.537	18.591	PV	276	4783	0.12%	0.013%
264	18.607	18.591	18.637	VV	259	4958	0.13%	0.013%
265	18.649	18.637	18.661	VV	206	1542	0.04%	0.004%
266	18.670	18.661	18.679	VV	62	603	0.02%	0.002%
267	18.737	18.679	18.754	PV	205	3352	0.09%	0.009%
268	18.781	18.754	18.794	VV	87	1870	0.05%	0.005%
269	18.867	18.794	18.918	VV	1551	29604	0.77%	0.080%
270	18.968	18.918	18.987	VV	239	6247	0.16%	0.017%
271	18.999	18.987	19.007	VV	200	1889	0.05%	0.005%
272	19.121	19.007	19.148	VV	369	22772	0.59%	0.061%
273	19.173	19.148	19.181	VV	360	6306	0.16%	0.017%
274	19.251	19.181	19.311	VV	2094	58470	1.52%	0.158%
275	19.365	19.311	19.391	VV	558	17068	0.44%	0.046%
276	19.409	19.391	19.428	VV	334	5732	0.15%	0.015%
277	19.445	19.428	19.458	VV	369	5016	0.13%	0.014%
278	19.495	19.458	19.503	VV	529	10973	0.29%	0.030%
279	19.552	19.503	19.565	VV	529	17570	0.46%	0.047%
280	19.627	19.565	19.649	VV	1410	39558	1.03%	0.107%
281	19.671	19.649	19.704	VV	967	28566	0.74%	0.077%
282	19.838	19.704	19.936	VV	5730	384716	10.00%	1.039%
283	19.991	19.936	20.015	VV	3348	119980	3.12%	0.324%
284	20.222	20.015	20.238	VV	3601	405667	10.55%	1.095%
285	20.347	20.238	20.371	VV	4357	299145	7.78%	0.808%

rteres

286	20.467	20.371	20.488	VV	4432	290246	7.55%	0.784%
287	20.512	20.488	20.542	VV	4443	143078	3.72%	0.386%
288	20.552	20.542	20.557	VV	4218	37272	0.97%	0.101%
289	20.576	20.557	20.617	VV	4259	146841	3.82%	0.396%
290	20.710	20.617	20.798	VV	4705	443231	11.52%	1.197%
291	20.810	20.798	20.851	VV	3676	112777	2.93%	0.304%
292	20.858	20.851	20.894	VV	3449	86767	2.26%	0.234%
293	20.900	20.894	20.911	VV	3288	31941	0.83%	0.086%
294	20.942	20.911	20.957	VV	3154	86111	2.24%	0.232%
295	20.984	20.957	21.011	VV	3100	97576	2.54%	0.263%
296	21.030	21.011	21.077	VV	3039	115921	3.01%	0.313%
297	21.130	21.077	21.194	VV	2974	195597	5.09%	0.528%
298	21.202	21.194	21.232	VV	2532	55992	1.46%	0.151%
299	21.241	21.232	21.269	VV	2389	50291	1.31%	0.136%
300	21.323	21.269	21.384	VV	2361	153324	3.99%	0.414%
301	21.388	21.384	21.414	VV	2084	35127	0.91%	0.095%
302	21.435	21.414	21.449	VV	1870	38930	1.01%	0.105%
303	21.472	21.449	21.521	VV	1805	73583	1.91%	0.199%
304	21.595	21.521	21.657	VV	1895	126568	3.29%	0.342%
305	21.669	21.657	21.688	VV	1298	21765	0.57%	0.059%
306	21.718	21.688	21.734	VV	1095	29637	0.77%	0.080%
307	21.755	21.734	21.779	VV	1105	27236	0.71%	0.074%
308	21.795	21.779	21.862	VV	920	38897	1.01%	0.105%
309	21.867	21.862	21.939	VV	675	18973	0.49%	0.051%
310	21.948	21.939	21.980	VV	207	3296	0.09%	0.009%

Sum of corrected areas: 37037709

Aliphatic EPH 102324.M Sat Nov 09 02:44:53 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SB01	SDG No.:	P4718
Lab Sample ID:	P4718-01	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.06 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048676.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	0.38	U	0.38	0.85	mg/kg
Aromatic C12-C16	Aromatic C12-C16	5.14		0.44	1.28	mg/kg
Aromatic C16-C21	Aromatic C16-C21	1.85	J	1.23	2.13	mg/kg
Aromatic C21-C36	Aromatic C21-C36	2.94	J	2.56	3.41	mg/kg
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	41.5		40 - 140	83%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	33.7		40 - 140	67%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	28.4		40 - 140	57%	SPK: 50

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

Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	P4718-01	Acq On:	08 Nov 2024 18:08
Client Sample ID:	WB-307-SB01	Operator:	YP/AJ
Data file:	FD048676.D	Misc:	
Instrument:	FID_D	ALS Vial:	59
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.092	5.810	477690	2.711	200	ug/ml
Aromatic C12-C16	5.811	8.415	10679892	60.245	300	ug/ml
Aromatic C16-C21	8.416	12.678	3553615	21.691	500	ug/ml
Aromatic C21-C36	12.679	18.083	5254713	34.409	800	ug/ml
Aromatic EPH	4.092	18.083	19965910	119.056		ug/ml
ortho-Terphenyl (SURR)	11.254	11.254	4831009	28.36		ug/ml
2-Bromonaphthalene (SURR)	7.369	7.369	6306207	41.55		ug/ml
2-Flurobiphenyl (SURR)	8.219	8.219	3305686	33.67		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048676.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 18:08
Operator : YP/AJ
Sample : P4718-01
Misc :
ALS Vial : 59 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SB01

Integration File: sample.E
Quant Time: Nov 09 01:07:46 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
4) S 2-Bromonaphthalene (S...	7.369	6306207	41.549 ug/ml
Spiked Amount 50.000		Recovery =	83.10%
6) S 2-Flurobiphenyl (SURR)	8.219	3305686	33.666 ug/ml
Spiked Amount 50.000	Range 0 - 131	Recovery =	67.33%
11) S ortho-Terphenyl (SURR)	11.254	4831009	28.361 ug/ml
Spiked Amount 50.000		Recovery =	56.72%
Target Compounds			

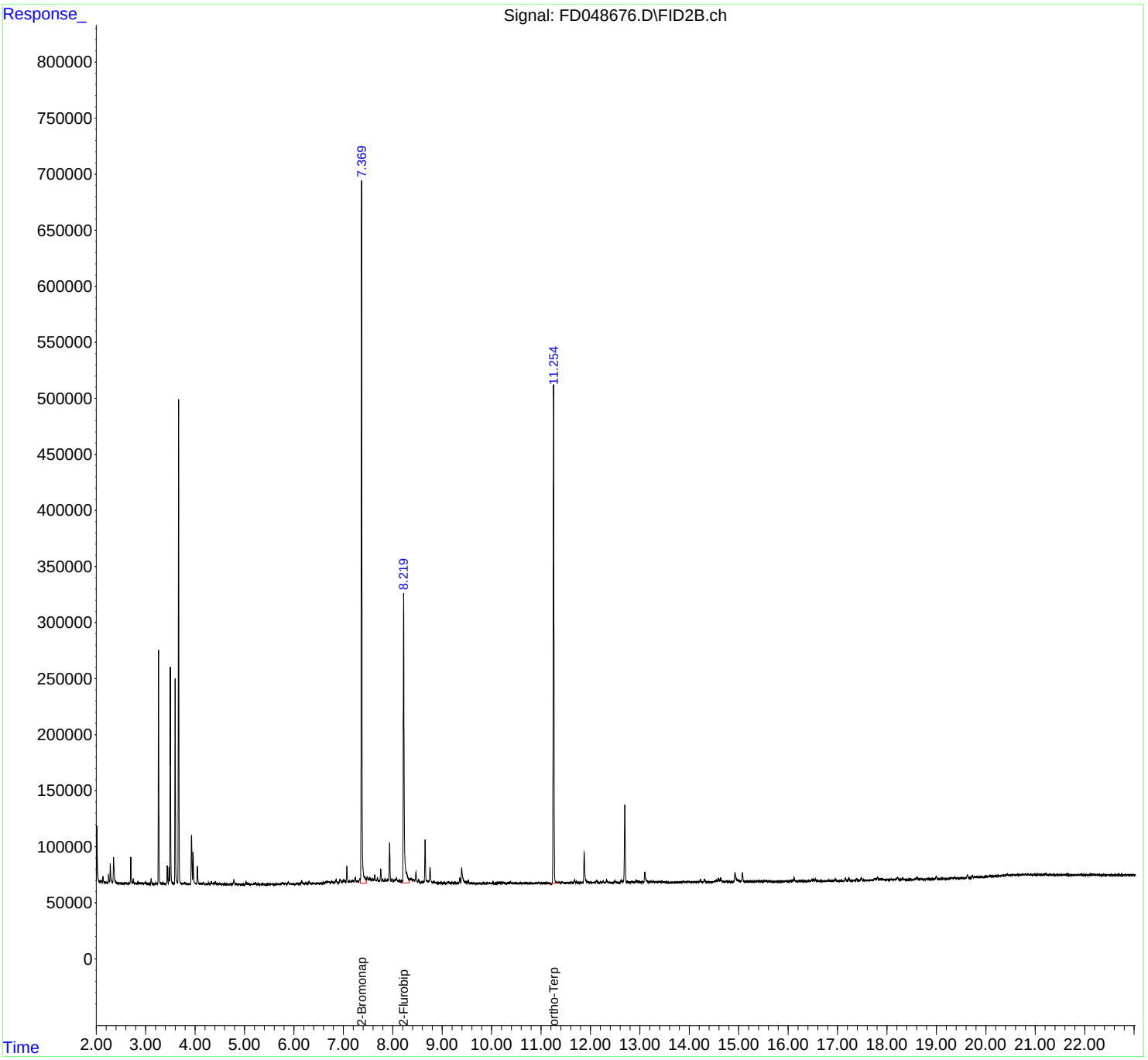
(f)=RT Delta > 1/2 Window (m)=manual int.

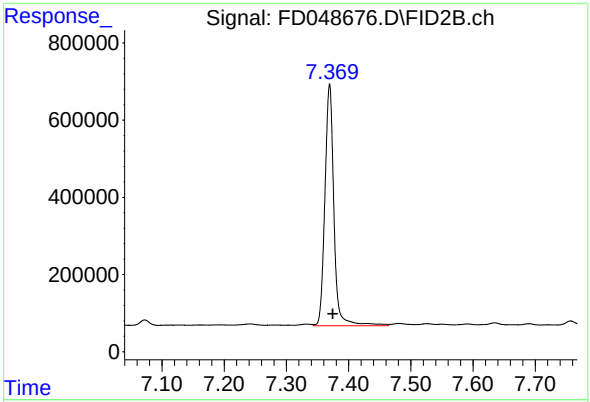
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048676.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 18:08
Operator : YP/AJ
Sample : P4718-01
Misc :
ALS Vial : 59 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SB01

Integration File: sample.E
Quant Time: Nov 09 01:07:46 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

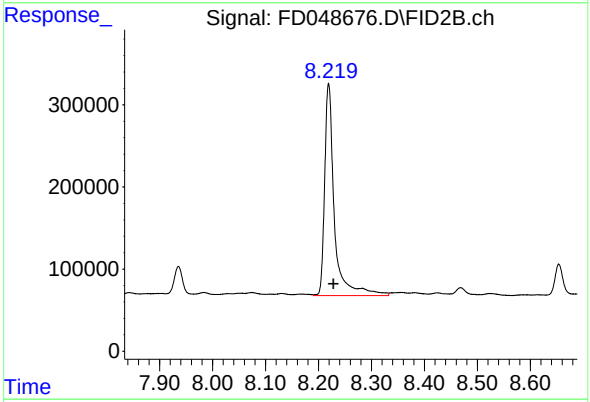




#4 2-Bromonaphthalene (SURR)

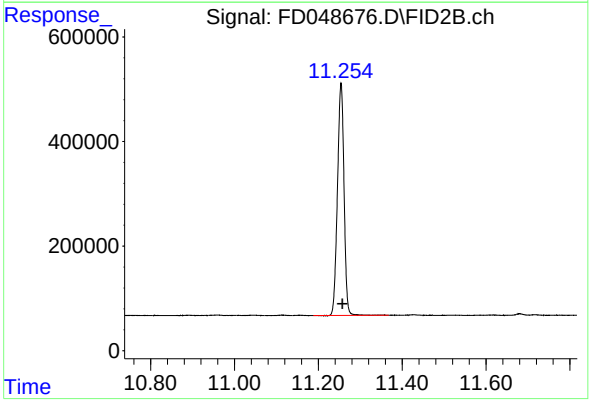
R.T.: 7.369 min
Delta R.T.: -0.005 min
Response: 6306207
Conc: 41.55 ug/ml

Instrument :
FID_D
ClientSampleId :
WB-307-SB01



#6 2-Flurobiphenyl (SURR)

R.T.: 8.219 min
Delta R.T.: -0.009 min
Response: 3305686
Conc: 33.67 ug/ml



#11 ortho-Terphenyl (SURR)

R.T.: 11.254 min
Delta R.T.: -0.003 min
Response: 4831009
Conc: 28.36 ug/ml

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048676.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 18:08
Sample : P4718-01
Misc :
ALS Vial : 59 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.166	4.146	4.194	PV	1750	19713	0.32%	0.070%
2	4.199	4.194	4.215	VV	228	1895	0.03%	0.007%
3	4.218	4.215	4.248	VV	150	1346	0.02%	0.005%
4	4.271	4.248	4.307	PV	1513	13867	0.22%	0.049%
5	4.326	4.307	4.350	VV	2625	32195	0.52%	0.114%
6	4.361	4.350	4.368	VV	794	7110	0.11%	0.025%
7	4.382	4.368	4.397	VV	1539	16797	0.27%	0.060%
8	4.412	4.397	4.455	VV	2385	30974	0.50%	0.110%
9	4.462	4.455	4.475	VV	299	2583	0.04%	0.009%
10	4.489	4.475	4.515	VV	867	10743	0.17%	0.038%
11	4.527	4.515	4.552	VV	453	5202	0.08%	0.018%
12	4.558	4.552	4.583	VV	176	1211	0.02%	0.004%
13	4.597	4.583	4.630	VV	507	6165	0.10%	0.022%
14	4.635	4.630	4.657	VV	198	1448	0.02%	0.005%
15	4.663	4.657	4.678	PV	228	1663	0.03%	0.006%
16	4.708	4.678	4.729	VV	482	7563	0.12%	0.027%
17	4.735	4.729	4.742	VV	335	2145	0.03%	0.008%
18	4.784	4.742	4.821	VV	4584	65848	1.06%	0.234%
19	4.842	4.821	4.879	VV	1161	13444	0.22%	0.048%
20	4.897	4.879	4.909	VV	253	3644	0.06%	0.013%
21	4.912	4.909	4.949	VV	247	4704	0.08%	0.017%
22	4.976	4.958	4.999	VV	530	5428	0.09%	0.019%
23	5.031	4.999	5.116	PV	2131	55777	0.89%	0.198%
24	5.123	5.116	5.133	VV	447	3503	0.06%	0.012%
25	5.150	5.133	5.164	VV	427	5714	0.09%	0.020%
26	5.190	5.164	5.207	PV	1278	16205	0.26%	0.058%
27	5.227	5.207	5.245	VV	1771	19580	0.31%	0.070%
28	5.265	5.245	5.270	VV	339	3222	0.05%	0.011%
29	5.282	5.270	5.318	VV	604	9206	0.15%	0.033%
30	5.322	5.318	5.329	VV	257	1304	0.02%	0.005%
31	5.334	5.329	5.340	VV	374	1796	0.03%	0.006%
32	5.348	5.340	5.358	VV	495	4488	0.07%	0.016%
33	5.364	5.358	5.397	VV	680	7533	0.12%	0.027%
34	5.401	5.397	5.413	VV	205	1080	0.02%	0.004%
35	5.426	5.413	5.442	PV	229	2465	0.04%	0.009%
36	5.458	5.442	5.465	VV	401	3388	0.05%	0.012%

rteres

37	5.474	5.465	5.500	VV	464	5860	0.09%	0.021%
38	5.535	5.524	5.549	VV	436	4295	0.07%	0.015%
39	5.562	5.549	5.570	VV	432	3573	0.06%	0.013%
40	5.573	5.570	5.579	VV	207	1035	0.02%	0.004%
41	5.586	5.579	5.602	VV	276	2872	0.05%	0.010%
42	5.610	5.602	5.617	VV	276	1257	0.02%	0.004%
43	5.635	5.617	5.645	VV	398	3950	0.06%	0.014%
44	5.707	5.645	5.717	VV	537	14893	0.24%	0.053%
45	5.768	5.717	5.807	VV	1493	49006	0.79%	0.174%
46	5.821	5.807	5.844	VV	1667	20055	0.32%	0.071%
47	5.847	5.844	5.855	VV	478	2562	0.04%	0.009%
48	5.886	5.855	5.919	VV	1911	41170	0.66%	0.146%
49	5.940	5.919	5.965	VV	815	17550	0.28%	0.062%
50	5.979	5.965	5.994	VV	1003	11339	0.18%	0.040%
51	5.998	5.994	6.017	VV	434	3331	0.05%	0.012%
52	6.047	6.017	6.060	PV	982	17230	0.28%	0.061%
53	6.074	6.060	6.100	VV	1086	16486	0.26%	0.059%
54	6.119	6.100	6.135	VV	956	14346	0.23%	0.051%
55	6.159	6.135	6.192	VV	3619	59336	0.95%	0.211%
56	6.197	6.192	6.217	VV	869	9967	0.16%	0.035%
57	6.239	6.217	6.262	VV	1823	30310	0.49%	0.108%
58	6.306	6.262	6.328	VV	2694	57064	0.92%	0.203%
59	6.341	6.328	6.358	VV	1116	17516	0.28%	0.062%
60	6.377	6.358	6.390	VV	1359	20733	0.33%	0.074%
61	6.403	6.390	6.434	VV	1202	22432	0.36%	0.080%
62	6.472	6.434	6.524	VV	1330	49319	0.79%	0.175%
63	6.535	6.524	6.562	VV	1194	23027	0.37%	0.082%
64	6.566	6.562	6.575	VV	861	6082	0.10%	0.022%
65	6.593	6.575	6.607	VV	2065	28594	0.46%	0.102%
66	6.650	6.607	6.679	VV	2480	82316	1.32%	0.292%
67	6.691	6.679	6.700	VV	2690	32258	0.52%	0.115%
68	6.712	6.700	6.742	VV	2649	46889	0.75%	0.167%
69	6.772	6.742	6.795	VV	2642	69438	1.11%	0.247%
70	6.812	6.795	6.825	VV	2224	34398	0.55%	0.122%
71	6.853	6.825	6.892	VV	4487	100462	1.61%	0.357%
72	6.933	6.892	6.960	VV	4822	116102	1.86%	0.412%
73	6.971	6.960	6.982	VV	2517	30239	0.49%	0.107%
74	7.006	6.982	7.023	VV	4607	79481	1.27%	0.282%
75	7.032	7.023	7.047	VV	2893	38144	0.61%	0.135%
76	7.072	7.047	7.095	VV	16081	200997	3.22%	0.714%
77	7.125	7.095	7.141	VV	2838	69858	1.12%	0.248%
78	7.161	7.141	7.172	VV	2905	49797	0.80%	0.177%
79	7.194	7.172	7.213	VV	3341	73822	1.18%	0.262%
80	7.242	7.213	7.267	VV	5596	122027	1.96%	0.433%
81	7.280	7.267	7.301	VV	2891	53634	0.86%	0.190%
82	7.305	7.301	7.311	VV	2544	14681	0.24%	0.052%
83	7.332	7.311	7.345	VV	5182	79007	1.27%	0.281%
84	7.370	7.345	7.422	VV	629305	6234340	100.00%	22.142%
85	7.429	7.422	7.465	VV	6819	143248	2.30%	0.509%
86	7.481	7.465	7.506	VV	7018	130656	2.10%	0.464%
87	7.526	7.506	7.542	VV	6431	108240	1.74%	0.384%
88	7.550	7.542	7.571	VV	5007	71748	1.15%	0.255%
89	7.591	7.571	7.608	VV	5607	95952	1.54%	0.341%

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90	7.635	7.608	7.655	VV	8602	148719	2.39%	0.528%
91	7.667	7.655	7.673	VV	3547	37524	0.60%	0.133%
92	7.690	7.673	7.709	VV	6263	94041	1.51%	0.334%
93	7.721	7.709	7.735	VV	3292	49627	0.80%	0.176%
94	7.757	7.735	7.779	VV	13240	181648	2.91%	0.645%
95	7.797	7.779	7.825	VV	4464	95154	1.53%	0.338%
96	7.842	7.825	7.863	VV	4949	87203	1.40%	0.310%
97	7.877	7.863	7.883	VV	3639	41569	0.67%	0.148%
98	7.897	7.883	7.912	VV	3908	64244	1.03%	0.228%
99	7.936	7.912	7.965	VV	36749	450681	7.23%	1.601%
100	7.984	7.965	8.011	VV	4995	98347	1.58%	0.349%
101	8.030	8.011	8.038	VV	3652	51049	0.82%	0.181%
102	8.056	8.038	8.062	VV	4068	54807	0.88%	0.195%
103	8.074	8.062	8.100	VV	4929	90449	1.45%	0.321%
104	8.108	8.100	8.117	VV	2984	27876	0.45%	0.099%
105	8.130	8.117	8.150	VV	3708	61193	0.98%	0.217%
106	8.168	8.150	8.191	VV	2928	64458	1.03%	0.229%
107	8.219	8.191	8.273	VV	259386	3167083	50.80%	11.248%
108	8.283	8.273	8.334	VV	10142	244465	3.92%	0.868%
109	8.358	8.334	8.370	VV	4883	102103	1.64%	0.363%
110	8.382	8.370	8.408	VV	4656	88552	1.42%	0.314%
111	8.425	8.408	8.446	VV	4515	83443	1.34%	0.296%
112	8.468	8.446	8.508	VV	10793	186775	3.00%	0.663%
113	8.523	8.508	8.565	VV	3649	84026	1.35%	0.298%
114	8.585	8.565	8.590	VV	2044	26265	0.42%	0.093%
115	8.594	8.590	8.602	VV	2108	13483	0.22%	0.048%
116	8.613	8.602	8.628	VV	2196	30699	0.49%	0.109%
117	8.654	8.628	8.721	VV	39569	506486	8.12%	1.799%
118	8.754	8.721	8.802	VV	14933	246545	3.95%	0.876%
119	8.817	8.802	8.824	VV	1741	21407	0.34%	0.076%
120	8.836	8.824	8.863	VV	2060	36676	0.59%	0.130%
121	8.891	8.863	8.911	VV	1428	31357	0.50%	0.111%
122	8.949	8.911	8.957	VV	1207	27671	0.44%	0.098%
123	8.963	8.957	8.974	VV	1196	10910	0.17%	0.039%
124	8.990	8.974	9.008	VV	1199	19308	0.31%	0.069%
125	9.014	9.008	9.018	VV	812	4581	0.07%	0.016%
126	9.034	9.018	9.044	VV	1123	15072	0.24%	0.054%
127	9.053	9.044	9.075	VV	1246	16973	0.27%	0.060%
128	9.081	9.075	9.095	VV	761	8023	0.13%	0.028%
129	9.117	9.095	9.161	VV	2002	48954	0.79%	0.174%
130	9.169	9.161	9.179	VV	945	9257	0.15%	0.033%
131	9.196	9.179	9.202	VV	1050	12528	0.20%	0.044%
132	9.207	9.202	9.226	VV	1168	12365	0.20%	0.044%
133	9.256	9.226	9.272	VV	1285	24500	0.39%	0.087%
134	9.277	9.272	9.296	VV	851	10959	0.18%	0.039%
135	9.305	9.296	9.320	VV	867	10528	0.17%	0.037%
136	9.356	9.320	9.375	VV	5556	73281	1.18%	0.260%
137	9.394	9.375	9.470	VV	14555	294554	4.72%	1.046%
138	9.474	9.470	9.480	VV	1520	9076	0.15%	0.032%
139	9.484	9.480	9.510	VV	1494	22465	0.36%	0.080%
140	9.528	9.510	9.580	VV	3534	57743	0.93%	0.205%
141	9.598	9.580	9.608	VV	771	10557	0.17%	0.037%

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142	9.619	9.608	9.642	VV	815	13437	0.22%	0.048%
143	9.647	9.642	9.663	VV	588	6305	0.10%	0.022%
144	9.677	9.663	9.687	VV	602	7476	0.12%	0.027%
145	9.702	9.687	9.713	VV	622	7553	0.12%	0.027%
146	9.728	9.713	9.736	VV	521	6161	0.10%	0.022%
147	9.742	9.736	9.747	VV	494	3037	0.05%	0.011%
148	9.760	9.747	9.787	VV	652	10355	0.17%	0.037%
149	9.792	9.787	9.796	VV	274	1542	0.02%	0.005%
150	9.799	9.796	9.815	VV	315	2873	0.05%	0.010%
151	9.840	9.815	9.865	VV	682	13007	0.21%	0.046%
152	9.875	9.865	9.888	VV	575	6524	0.10%	0.023%
153	9.916	9.888	9.932	VV	786	15583	0.25%	0.055%
154	9.948	9.932	9.978	VV	794	15723	0.25%	0.056%
155	9.983	9.978	9.991	VV	493	3359	0.05%	0.012%
156	10.028	9.991	10.064	VV	1568	30369	0.49%	0.108%
157	10.071	10.064	10.080	VV	373	3280	0.05%	0.012%
158	10.094	10.080	10.101	VV	618	5247	0.08%	0.019%
159	10.124	10.101	10.139	VV	981	16191	0.26%	0.058%
160	10.157	10.139	10.179	VV	1023	19378	0.31%	0.069%
161	10.192	10.179	10.218	VV	1110	18009	0.29%	0.064%
162	10.235	10.218	10.240	VV	1009	10645	0.17%	0.038%
163	10.244	10.240	10.248	VV	1059	4668	0.07%	0.017%
164	10.258	10.248	10.296	VV	1243	22234	0.36%	0.079%
165	10.336	10.296	10.350	VV	672	16936	0.27%	0.060%
166	10.382	10.350	10.411	VV	1455	31680	0.51%	0.113%
167	10.415	10.411	10.427	VV	714	4248	0.07%	0.015%
168	10.434	10.427	10.461	VV	456	7085	0.11%	0.025%
169	10.482	10.461	10.501	VV	472	8692	0.14%	0.031%
170	10.505	10.501	10.524	VV	346	3408	0.05%	0.012%
171	10.531	10.524	10.547	VV	287	3402	0.05%	0.012%
172	10.563	10.547	10.604	VV	582	14878	0.24%	0.053%
173	10.612	10.604	10.636	VV	370	6006	0.10%	0.021%
174	10.651	10.636	10.662	VV	734	7825	0.13%	0.028%
175	10.680	10.662	10.699	VV	887	13947	0.22%	0.050%
176	10.708	10.699	10.731	VV	567	8076	0.13%	0.029%
177	10.740	10.731	10.762	VV	538	7847	0.13%	0.028%
178	10.765	10.762	10.776	VV	475	3104	0.05%	0.011%
179	10.786	10.776	10.803	VV	391	4993	0.08%	0.018%
180	10.810	10.803	10.822	VV	364	3446	0.06%	0.012%
181	10.826	10.822	10.842	VV	332	2676	0.04%	0.010%
182	10.849	10.842	10.855	VV	264	1651	0.03%	0.006%
183	10.863	10.855	10.868	VV	396	2052	0.03%	0.007%
184	10.892	10.868	10.917	VV	821	13785	0.22%	0.049%
185	10.958	10.917	10.979	VV	1159	24148	0.39%	0.086%
186	11.000	10.979	11.018	VV	611	10389	0.17%	0.037%
187	11.044	11.018	11.090	VV	887	17952	0.29%	0.064%
188	11.114	11.090	11.137	VV	953	13796	0.22%	0.049%
189	11.155	11.137	11.177	VV	629	10061	0.16%	0.036%
190	11.182	11.177	11.224	VV	187	2011	0.03%	0.007%
191	11.254	11.224	11.326	PV	444396	4848719	77.77%	17.221%
192	11.352	11.326	11.369	VV	1107	23840	0.38%	0.085%
193	11.382	11.369	11.397	VV	921	13826	0.22%	0.049%
194	11.427	11.397	11.462	VV	1743	38353	0.62%	0.136%

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195	11.471	11.462	11.492	VV	598	8843	0.14%	0.031%
196	11.526	11.492	11.549	VV	813	20549	0.33%	0.073%
197	11.557	11.549	11.564	VV	541	4178	0.07%	0.015%
198	11.588	11.564	11.597	VV	768	12306	0.20%	0.044%
199	11.618	11.597	11.638	VV	1148	20037	0.32%	0.071%
200	11.680	11.638	11.703	VV	3593	55497	0.89%	0.197%
201	11.718	11.703	11.749	VV	1621	26655	0.43%	0.095%
202	11.755	11.749	11.772	VV	647	8182	0.13%	0.029%
203	11.777	11.772	11.797	VV	786	9229	0.15%	0.033%
204	11.816	11.797	11.822	VV	681	8939	0.14%	0.032%
205	11.833	11.822	11.850	VV	1075	15504	0.25%	0.055%
206	11.873	11.850	11.944	VV	27641	409912	6.58%	1.456%
207	11.950	11.944	11.983	VV	1441	26039	0.42%	0.092%
208	11.994	11.983	12.035	VV	907	26953	0.43%	0.096%
209	12.040	12.035	12.052	VV	966	8893	0.14%	0.032%
210	12.057	12.052	12.060	VV	909	4091	0.07%	0.015%
211	12.065	12.060	12.077	VV	1025	9158	0.15%	0.033%
212	12.093	12.077	12.105	VV	1151	16437	0.26%	0.058%
213	12.123	12.105	12.145	VV	2775	41252	0.66%	0.147%
214	12.155	12.145	12.182	VV	910	14656	0.24%	0.052%
215	12.202	12.182	12.238	VV	1388	28806	0.46%	0.102%
216	12.259	12.238	12.300	VV	1832	37404	0.60%	0.133%
217	12.326	12.300	12.364	VV	2698	58398	0.94%	0.207%
218	12.367	12.364	12.382	VV	819	8310	0.13%	0.030%
219	12.388	12.382	12.429	VV	763	15657	0.25%	0.056%
220	12.438	12.429	12.442	VV	621	3999	0.06%	0.014%
221	12.450	12.442	12.467	VV	646	7532	0.12%	0.027%
222	12.494	12.467	12.532	VV	2048	45146	0.72%	0.160%
223	12.542	12.532	12.572	VV	827	15727	0.25%	0.056%
224	12.581	12.572	12.588	VV	594	4897	0.08%	0.017%
225	12.592	12.588	12.595	VV	604	2213	0.04%	0.008%
226	12.617	12.595	12.646	VV	2357	48680	0.78%	0.173%
227	12.695	12.646	12.735	VV	70100	891768	14.30%	3.167%
228	12.742	12.735	12.779	VV	1452	28802	0.46%	0.102%
229	12.784	12.779	12.796	VV	938	8261	0.13%	0.029%
230	12.801	12.796	12.810	VV	809	6352	0.10%	0.023%
231	12.829	12.810	12.841	VV	1203	18448	0.30%	0.066%
232	12.851	12.841	12.898	VV	1265	33538	0.54%	0.119%
233	12.925	12.898	12.942	VV	2476	41305	0.66%	0.147%
234	12.949	12.942	12.977	VV	1567	28405	0.46%	0.101%
235	12.987	12.977	13.009	VV	1124	19279	0.31%	0.068%
236	13.014	13.009	13.026	VV	921	8630	0.14%	0.031%
237	13.034	13.026	13.053	VV	946	14257	0.23%	0.051%
238	13.065	13.053	13.076	VV	971	12434	0.20%	0.044%
239	13.100	13.076	13.187	VV	10110	211374	3.39%	0.751%
240	13.199	13.187	13.219	VV	1182	20032	0.32%	0.071%
241	13.245	13.219	13.255	VV	1223	24475	0.39%	0.087%
242	13.273	13.255	13.305	VV	1359	31897	0.51%	0.113%
243	13.325	13.305	13.332	VV	1083	14769	0.24%	0.052%
244	13.339	13.332	13.352	VV	985	10668	0.17%	0.038%
245	13.372	13.352	13.377	VV	1218	15184	0.24%	0.054%
246	13.402	13.377	13.433	VV	1607	39637	0.64%	0.141%

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247	13.452	13.433	13.472	VV	1523	26896	0.43%	0.096%
248	13.494	13.472	13.515	VV	1114	24996	0.40%	0.089%
249	13.523	13.515	13.536	VV	713	8001	0.13%	0.028%
250	13.546	13.536	13.568	VV	782	12215	0.20%	0.043%
251	13.573	13.568	13.595	VV	746	8372	0.13%	0.030%
252	13.600	13.595	13.609	VV	382	2775	0.04%	0.010%
253	13.625	13.609	13.635	VV	429	5972	0.10%	0.021%
254	13.641	13.635	13.650	VV	605	3753	0.06%	0.013%
255	13.662	13.650	13.689	VV	601	10941	0.18%	0.039%
256	13.702	13.689	13.709	VV	640	6849	0.11%	0.024%
257	13.714	13.709	13.720	VV	698	4148	0.07%	0.015%
258	13.726	13.720	13.740	VV	589	5966	0.10%	0.021%
259	13.745	13.740	13.750	VV	594	3032	0.05%	0.011%
260	13.755	13.750	13.764	VV	598	4415	0.07%	0.016%
261	13.781	13.764	13.799	VV	625	10299	0.17%	0.037%
262	13.808	13.799	13.830	VV	705	11714	0.19%	0.042%
263	13.854	13.830	13.869	VV	1108	20995	0.34%	0.075%
264	13.883	13.869	13.924	VV	1452	32988	0.53%	0.117%
265	13.935	13.924	13.947	VV	918	10578	0.17%	0.038%
266	13.974	13.947	13.995	VV	1572	29807	0.48%	0.106%
267	13.999	13.995	14.030	VV	837	14782	0.24%	0.052%
268	14.069	14.030	14.072	VV	815	18476	0.30%	0.066%
269	14.075	14.072	14.090	VV	768	7516	0.12%	0.027%
270	14.104	14.090	14.135	VV	987	22645	0.36%	0.080%
271	14.139	14.135	14.144	VV	854	3963	0.06%	0.014%
272	14.154	14.144	14.160	VV	828	7855	0.13%	0.028%
273	14.169	14.160	14.197	VV	928	18557	0.30%	0.066%
274	14.227	14.197	14.275	VV	2992	62755	1.01%	0.223%
275	14.307	14.275	14.335	VV	3162	55088	0.88%	0.196%
276	14.351	14.335	14.369	VV	837	14584	0.23%	0.052%
277	14.387	14.369	14.422	VV	1178	25272	0.41%	0.090%
278	14.428	14.422	14.442	VV	733	7565	0.12%	0.027%
279	14.445	14.442	14.454	VV	562	3544	0.06%	0.013%
280	14.461	14.454	14.472	VV	626	5662	0.09%	0.020%
281	14.507	14.472	14.527	VV	1630	34047	0.55%	0.121%
282	14.546	14.527	14.567	VV	2066	39072	0.63%	0.139%
283	14.591	14.567	14.610	VV	3842	64235	1.03%	0.228%
284	14.634	14.610	14.695	VV	4508	105108	1.69%	0.373%
285	14.701	14.695	14.709	VV	859	6295	0.10%	0.022%
286	14.717	14.709	14.722	VV	1084	7231	0.12%	0.026%
287	14.750	14.722	14.778	VV	1695	39348	0.63%	0.140%
288	14.784	14.778	14.794	VV	947	7743	0.12%	0.027%
289	14.798	14.794	14.804	VV	827	4959	0.08%	0.018%
290	14.816	14.804	14.840	VV	1110	20154	0.32%	0.072%
291	14.846	14.840	14.862	VV	893	9249	0.15%	0.033%
292	14.872	14.862	14.892	VV	751	11680	0.19%	0.041%
293	14.924	14.892	15.012	VV	9241	241173	3.87%	0.857%
294	15.017	15.012	15.045	VV	1528	25385	0.41%	0.090%
295	15.076	15.045	15.107	VV	8989	136207	2.18%	0.484%
296	15.115	15.107	15.141	VV	1223	18245	0.29%	0.065%
297	15.175	15.141	15.181	VV	989	20696	0.33%	0.074%
298	15.189	15.181	15.222	VV	1078	24043	0.39%	0.085%
299	15.252	15.222	15.257	VV	1202	20769	0.33%	0.074%

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300	15.261	15.257	15.267	VV	1174	6545	0.10%	0.023%
301	15.271	15.267	15.287	VV	1181	12775	0.20%	0.045%
302	15.292	15.287	15.307	VV	1098	11957	0.19%	0.042%
303	15.311	15.307	15.324	VV	840	8939	0.14%	0.032%
304	15.394	15.324	15.437	VV	1149	69036	1.11%	0.245%
305	15.457	15.437	15.495	VV	1159	34781	0.56%	0.124%
306	15.522	15.495	15.541	VV	1394	32445	0.52%	0.115%
307	15.560	15.541	15.599	VV	1872	43640	0.70%	0.155%
308	15.619	15.599	15.684	VV	1276	49451	0.79%	0.176%
309	15.720	15.684	15.745	VV	835	25204	0.40%	0.090%
310	15.760	15.745	15.780	VV	846	15152	0.24%	0.054%
311	15.806	15.780	15.826	VV	927	20448	0.33%	0.073%
312	15.844	15.826	15.869	VV	842	17483	0.28%	0.062%
313	15.895	15.869	15.910	VV	827	17990	0.29%	0.064%
314	15.936	15.910	15.986	VV	1303	45449	0.73%	0.161%
315	15.996	15.986	16.012	VV	1068	14861	0.24%	0.053%
316	16.040	16.012	16.066	VV	1485	36234	0.58%	0.129%
317	16.120	16.066	16.180	VV	3804	113648	1.82%	0.404%
318	16.189	16.180	16.196	VV	1102	9315	0.15%	0.033%
319	16.244	16.196	16.262	VV	1368	45502	0.73%	0.162%
320	16.272	16.262	16.325	VV	1185	38294	0.61%	0.136%
321	16.336	16.325	16.372	VV	890	24105	0.39%	0.086%
322	16.403	16.372	16.447	VV	1409	50609	0.81%	0.180%
323	16.478	16.447	16.489	VV	1869	37254	0.60%	0.132%
324	16.506	16.489	16.528	VV	2487	46614	0.75%	0.166%
325	16.549	16.528	16.577	VV	2887	57887	0.93%	0.206%
326	16.584	16.577	16.635	VV	1540	42312	0.68%	0.150%
327	16.670	16.635	16.688	VV	1142	32564	0.52%	0.116%
328	16.714	16.688	16.725	VV	1128	22789	0.37%	0.081%
329	16.736	16.725	16.762	VV	1114	21050	0.34%	0.075%
330	16.814	16.762	16.845	VV	1698	59362	0.95%	0.211%
331	16.871	16.845	16.914	VV	1397	48969	0.79%	0.174%
332	16.953	16.914	16.989	VV	2950	73020	1.17%	0.259%
333	17.021	16.989	17.053	VV	1189	41370	0.66%	0.147%
334	17.067	17.053	17.080	VV	1337	19137	0.31%	0.068%
335	17.083	17.080	17.105	VV	1235	17160	0.28%	0.061%
336	17.114	17.105	17.132	VV	1160	17773	0.29%	0.063%
337	17.160	17.132	17.203	VV	3777	83423	1.34%	0.296%
338	17.230	17.203	17.272	VV	3365	78314	1.26%	0.278%
339	17.285	17.272	17.295	VV	1262	15919	0.26%	0.057%
340	17.388	17.295	17.422	VV	3180	129287	2.07%	0.459%
341	17.478	17.422	17.520	VV	3773	115492	1.85%	0.410%
342	17.530	17.520	17.552	VV	1524	27568	0.44%	0.098%
343	17.559	17.552	17.579	VV	1475	22611	0.36%	0.080%
344	17.585	17.579	17.638	VV	1516	48736	0.78%	0.173%
345	17.679	17.638	17.695	VV	1649	50616	0.81%	0.180%
346	17.747	17.695	17.790	VV	3134	127014	2.04%	0.451%
347	17.809	17.790	17.839	VV	4057	82825	1.33%	0.294%
348	17.855	17.839	17.870	VV	2433	41054	0.66%	0.146%
349	17.897	17.870	17.994	VV	2740	163874	2.63%	0.582%
350	18.001	17.994	18.007	VV	1826	14166	0.23%	0.050%
351	18.015	18.007	18.037	VV	1846	30674	0.49%	0.109%

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352	18.076	18.037	18.130	VV	2501	113886	1.83%	0.404%
353	18.217	18.130	18.250	VBA	4163	174789	2.80%	0.621%
					Sum of corrected areas:		28156500	

Aromatic EPH 102324.M Sat Nov 09 03:28:13 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SB02	SDG No.:	P4718
Lab Sample ID:	P4718-02	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	77.6
Sample Wt/Vol:	30.01 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

Prep Date :	Date Analyzed :	Prep Batch ID
11/08/24 08:47	11/08/24 20:33	PB164790

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units(Dry Weight)	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	0.49	U	1	0.49	1.29	mg/kg	FC067677.D
Aliphatic C12-C16	Aliphatic C12-C16	0.64	J	1	0.31	0.86	mg/kg	FC067677.D
Aliphatic C16-C21	Aliphatic C16-C21	0.57	J	1	0.39	1.29	mg/kg	FC067677.D
Aliphatic C21-C28	Aliphatic C21-C28	1.03	U	1	1.03	1.72	mg/kg	FC067677.D
Aliphatic C28-C40	Aliphatic C28-C40	3.42		1	2.32	2.58	mg/kg	FC067677.D
Aromatic C10-C12	Aromatic C10-C12	0.39	U	1	0.39	0.86	mg/kg	FD048680.D
Aromatic C12-C16	Aromatic C12-C16	0.47	J	1	0.44	1.29	mg/kg	FD048680.D
Aromatic C16-C21	Aromatic C16-C21	4.38		1	1.24	2.15	mg/kg	FD048680.D
Aromatic C21-C36	Aromatic C21-C36	2.58	U	1	2.58	3.44	mg/kg	FD048680.D
Total AliphaticEPH	Total AliphaticEPH	4.62	J		4.54	7.74	mg/kg	
Total AromaticEPH	Total AromaticEPH	4.85	J		4.64	7.74	mg/kg	
Total EPH	Total EPH	9.47	J		9.18	15.5	mg/kg	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SB02	SDG No.:	P4718
Lab Sample ID:	P4718-02	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	77.6
Sample Wt/Vol:	30.01 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067677.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter		Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS							
Aliphatic C9-C12	Aliphatic C9-C12		0.49	U	0.49	1.29	mg/kg
Aliphatic C12-C16	Aliphatic C12-C16		0.64	J	0.31	0.86	mg/kg
Aliphatic C16-C21	Aliphatic C16-C21		0.57	J	0.39	1.29	mg/kg
Aliphatic C21-C28	Aliphatic C21-C28		1.03	U	1.03	1.72	mg/kg
Aliphatic C28-C40	Aliphatic C28-C40		3.42		2.32	2.58	mg/kg
SURROGATES							
3383-33-2	1-chlorooctadecane (SURR)		29.9		40 - 140	60%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)		0.00		40 - 140	0%	SPK: 50

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

Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	P4718-02	Acq On:	08 Nov 2024 20:33
Client Sample ID:	WB-307-SB02	Operator:	YP/AJ
Data file:	FC067677.D	Misc:	
Instrument:	FID_C	ALS Vial:	18
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.171	6.450	646558	4.773	300	ug/ml
Aliphatic C12-C16	6.451	9.841	973014	7.389	200	ug/ml
Aliphatic C16-C21	9.842	13.199	838042	6.587	300	ug/ml
Aliphatic C21-C28	13.200	16.853	712818	5.936	400	ug/ml
Aliphatic C28-C40	16.854	21.698	4020788	39.773	600	ug/ml
Aliphatic EPH	3.171	21.698	7191220	64.457		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.929	12.929	3231090	29.92		ug/ml
Aliphatic C9-C28	3.171	16.853	3170432	24.685	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067677.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 20:33
Operator : YP/AJ
Sample : P4718-02
Misc :
ALS Vial : 18 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB02

Integration File: autoint1.e
Quant Time: Nov 09 01:38:21 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
12) S 1-chlorooctadecane (S...	12.929	3231090	29.921 ug/ml
Spiked Amount 50.000		Recovery = 59.84%	
Target Compounds			

(f)=RT Delta > 1/2 Window (m)=manual int.

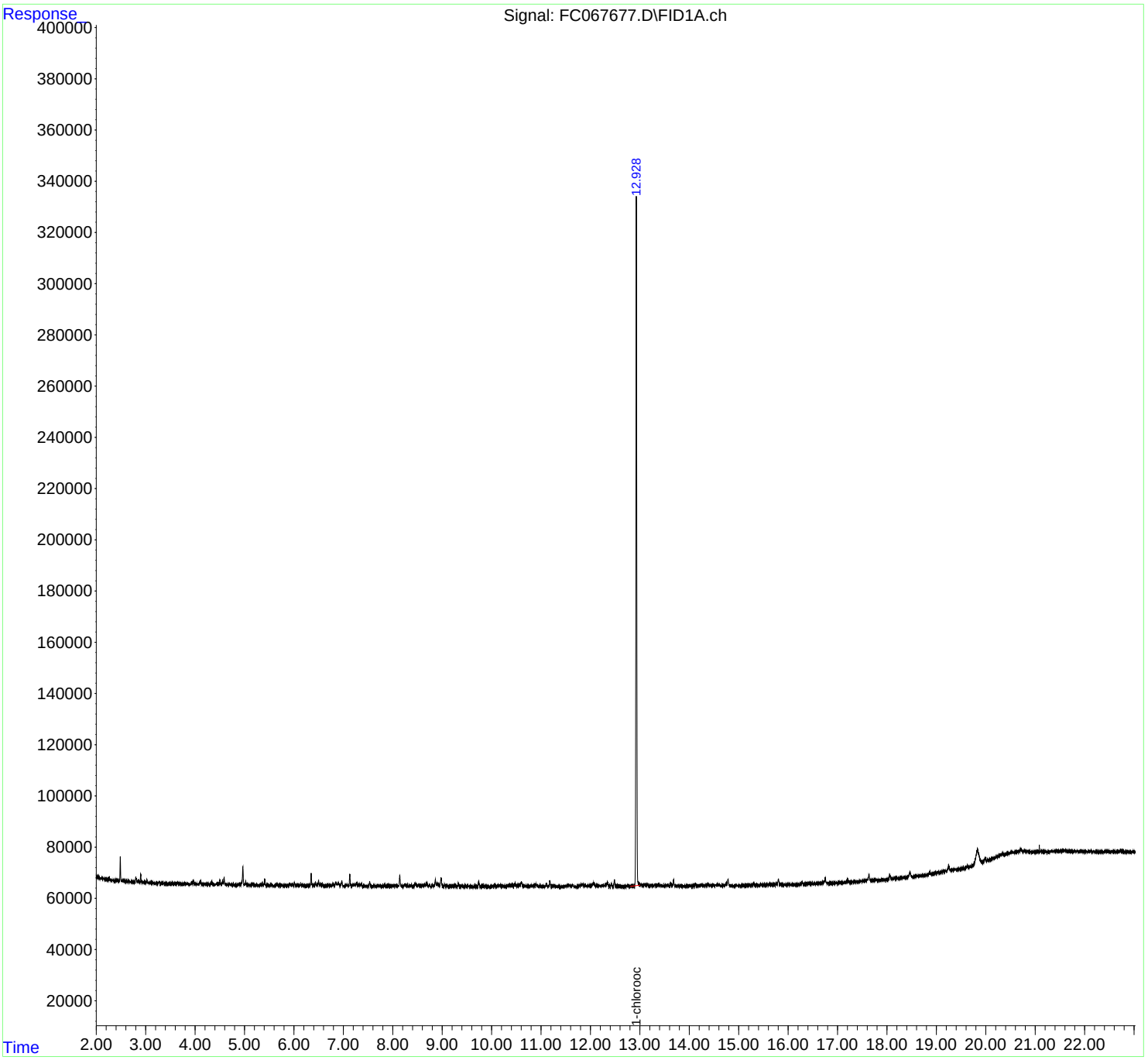
Quantitation Report (QT Reviewed)

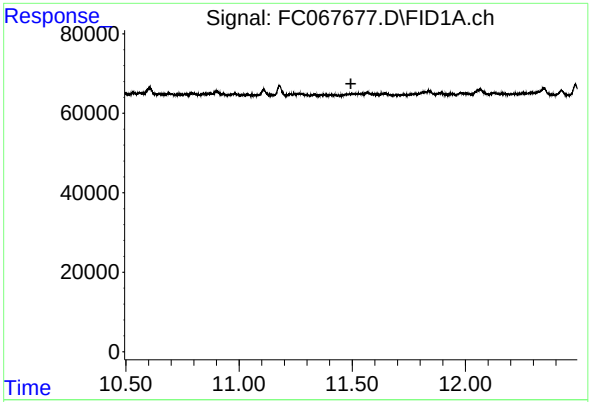
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067677.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 20:33
Operator : YP/AJ
Sample : P4718-02
Misc :
ALS Vial : 18 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB02

Integration File: autoint1.e
Quant Time: Nov 09 01:38:21 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

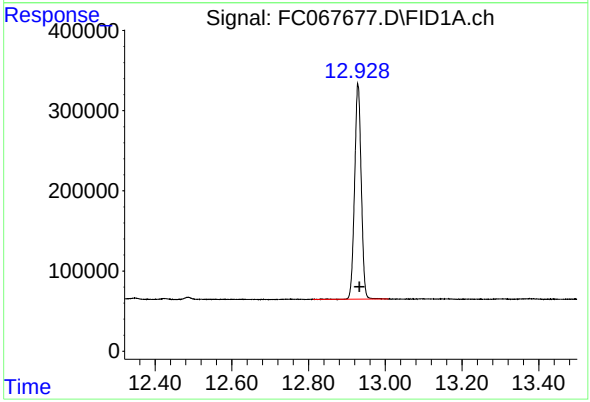




#9 ortho-Terphenyl (SURR)

R.T.: 0.000 min
Exp R.T. : 11.494 min
Response: 0
Conc: N.D.

Instrument :
FID_C
ClientSampleId :
WB-307-SB02



#12 1-chlorooctadecane (SURR)

R.T.: 12.929 min
Delta R.T.: -0.004 min
Response: 3231090
Conc: 29.92 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067677.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 20:33
Sample : P4718-02
Misc :
ALS Vial : 18 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.177	3.154	3.223	BV	32	-273	-0.01%	-0.003%
2	3.236	3.223	3.249	PV	104	898	0.03%	0.009%
3	3.272	3.249	3.358	VV	622	9222	0.28%	0.087%
4	3.369	3.358	3.380	PV	122	1040	0.03%	0.010%
5	3.389	3.380	3.434	VV	146	2670	0.08%	0.025%
6	3.444	3.434	3.460	VV	104	1045	0.03%	0.010%
7	3.471	3.460	3.518	VV	132	2548	0.08%	0.024%
8	3.538	3.518	3.560	PV	286	4303	0.13%	0.041%
9	3.593	3.560	3.622	VV	582	7403	0.23%	0.070%
10	3.642	3.622	3.663	VV	359	4877	0.15%	0.046%
11	3.677	3.663	3.687	VV	139	1539	0.05%	0.015%
12	3.728	3.687	3.741	VV	176	3762	0.11%	0.036%
13	3.763	3.741	3.828	VV	236	6262	0.19%	0.059%
14	3.846	3.828	3.859	VV	249	2983	0.09%	0.028%
15	3.865	3.859	3.897	VV	146	2359	0.07%	0.022%
16	3.936	3.897	3.948	PV	710	8336	0.25%	0.079%
17	3.964	3.948	4.018	VV	1799	20812	0.63%	0.197%
18	4.030	4.018	4.057	VV	315	3527	0.11%	0.033%
19	4.111	4.057	4.131	VV	1449	22344	0.68%	0.212%
20	4.145	4.131	4.198	VV	221	5604	0.17%	0.053%
21	4.200	4.198	4.228	VV	165	1452	0.04%	0.014%
22	4.253	4.228	4.314	VV	214	7962	0.24%	0.075%
23	4.335	4.314	4.361	VV	1324	14804	0.45%	0.140%
24	4.374	4.361	4.392	VV	292	3615	0.11%	0.034%
25	4.404	4.392	4.421	VV	151	2183	0.07%	0.021%

rteres

26	4.448	4.421	4.470	VV	549	8147	0.25%	0.077%
27	4.502	4.470	4.523	VV	2071	24144	0.73%	0.229%
28	4.535	4.523	4.541	VV	434	3733	0.11%	0.035%
29	4.558	4.541	4.572	VV	1943	19642	0.60%	0.186%
30	4.588	4.572	4.631	VV	3016	31644	0.96%	0.300%
31	4.662	4.658	4.674	VV	173	1334	0.04%	0.013%
32	4.702	4.674	4.724	VV	423	6943	0.21%	0.066%
33	4.740	4.724	4.763	VV	169	3306	0.10%	0.031%
34	4.775	4.763	4.789	VV	243	2753	0.08%	0.026%
35	4.804	4.789	4.842	VV	245	3766	0.11%	0.036%
36	4.888	4.842	4.909	PV	458	7609	0.23%	0.072%
37	4.966	4.909	4.998	VV	7297	93850	2.86%	0.889%
38	5.023	4.998	5.068	VV	1535	19121	0.58%	0.181%
39	5.075	5.068	5.111	VV	187	2637	0.08%	0.025%
40	5.159	5.111	5.179	VV	433	6967	0.21%	0.066%
41	5.193	5.179	5.218	VV	273	4205	0.13%	0.040%
42	5.260	5.218	5.278	VV	200	4796	0.15%	0.045%
43	5.288	5.278	5.303	VV	152	1198	0.04%	0.011%
44	5.335	5.303	5.348	PV	287	4281	0.13%	0.041%
45	5.369	5.348	5.383	VV	816	9365	0.28%	0.089%
46	5.410	5.383	5.434	VV	2612	32780	1.00%	0.311%
47	5.466	5.434	5.487	VV	716	9013	0.27%	0.085%
48	5.550	5.487	5.584	VV	564	12667	0.39%	0.120%
49	5.618	5.584	5.633	VV	207	3760	0.11%	0.036%
50	5.660	5.633	5.690	VV	550	9828	0.30%	0.093%
51	5.714	5.690	5.751	VV	302	6480	0.20%	0.061%
52	5.778	5.751	5.795	VV	233	3181	0.10%	0.030%
53	5.823	5.795	5.845	PV	242	3953	0.12%	0.037%
54	5.874	5.845	5.885	VV	286	4455	0.14%	0.042%
55	5.920	5.885	5.946	VV	623	13391	0.41%	0.127%
56	5.967	5.946	5.988	VV	808	10223	0.31%	0.097%
57	6.009	5.988	6.038	VV	1453	16954	0.52%	0.161%
58	6.070	6.038	6.114	VV	612	11969	0.36%	0.113%
59	6.141	6.114	6.177	VV	657	13169	0.40%	0.125%
60	6.188	6.177	6.224	VV	299	4809	0.15%	0.046%
61	6.240	6.224	6.251	VV	207	2558	0.08%	0.024%
62	6.272	6.251	6.297	VV	219	3916	0.12%	0.037%
63	6.349	6.297	6.381	VV	5015	60244	1.83%	0.571%
64	6.390	6.381	6.413	VV	408	6643	0.20%	0.063%
65	6.433	6.413	6.452	VV	1313	15847	0.48%	0.150%
66	6.467	6.452	6.480	VV	790	8470	0.26%	0.080%
67	6.498	6.480	6.521	VV	2206	25498	0.78%	0.242%
68	6.533	6.521	6.552	VV	800	9201	0.28%	0.087%
69	6.571	6.552	6.595	VV	1180	13640	0.42%	0.129%

70	6.624	6.595	6.645	VV	268	5492	0.17%	0.052%
71	6.675	6.645	6.700	VV	322	5849	0.18%	0.055%
72	6.719	6.700	6.733	VV	292	4293	0.13%	0.041%
73	6.745	6.733	6.770	VV	302	3958	0.12%	0.037%
74	6.791	6.770	6.821	VV	1099	15079	0.46%	0.143%
75	6.844	6.821	6.878	VV	1699	30676	0.93%	0.291%
76	6.896	6.878	6.938	VV	1162	27785	0.85%	0.263%
77	6.970	6.938	6.994	VV	2107	32274	0.98%	0.306%
78	7.007	6.994	7.030	VV	344	4440	0.14%	0.042%
79	7.053	7.030	7.063	VV	438	5700	0.17%	0.054%
80	7.076	7.063	7.094	VV	560	6246	0.19%	0.059%
81	7.131	7.094	7.164	VV	4738	55121	1.68%	0.522%
82	7.194	7.164	7.224	VV	677	14713	0.45%	0.139%
83	7.238	7.224	7.250	VV	996	10313	0.31%	0.098%
84	7.270	7.250	7.293	VV	1689	23064	0.70%	0.218%
85	7.308	7.293	7.318	VV	464	5347	0.16%	0.051%
86	7.335	7.318	7.348	VV	778	10265	0.31%	0.097%
87	7.362	7.348	7.401	VV	1084	13963	0.42%	0.132%
88	7.430	7.401	7.463	VV	292	6571	0.20%	0.062%
89	7.480	7.463	7.504	VV	228	2665	0.08%	0.025%
90	7.532	7.504	7.564	PV	1930	22006	0.67%	0.208%
91	7.616	7.564	7.658	VV	349	9445	0.29%	0.089%
92	7.676	7.658	7.687	VV	262	2854	0.09%	0.027%
93	7.698	7.687	7.715	VV	290	3977	0.12%	0.038%
94	7.723	7.715	7.744	VV	190	2661	0.08%	0.025%
95	7.750	7.744	7.764	VV	150	1338	0.04%	0.013%
96	7.791	7.764	7.812	VV	300	4545	0.14%	0.043%
97	7.837	7.812	7.871	VV	940	12137	0.37%	0.115%
98	7.893	7.871	7.913	VV	649	8112	0.25%	0.077%
99	7.930	7.913	7.950	VV	353	4756	0.14%	0.045%
100	7.961	7.950	7.981	VV	337	3940	0.12%	0.037%
101	7.996	7.981	8.024	VV	240	4459	0.14%	0.042%
102	8.047	8.024	8.068	VV	631	8675	0.26%	0.082%
103	8.088	8.068	8.111	VV	373	6718	0.20%	0.064%
104	8.141	8.111	8.213	VV	4393	61143	1.86%	0.579%
105	8.238	8.213	8.274	VV	748	18224	0.55%	0.173%
106	8.290	8.274	8.318	VV	617	9574	0.29%	0.091%
107	8.334	8.318	8.358	VV	609	7734	0.24%	0.073%
108	8.374	8.358	8.415	VV	891	9705	0.30%	0.092%
109	8.448	8.415	8.469	PV	1343	20125	0.61%	0.191%
110	8.489	8.469	8.537	VV	845	21244	0.65%	0.201%
111	8.560	8.537	8.574	VV	492	9846	0.30%	0.093%
112	8.599	8.574	8.615	VV	875	15379	0.47%	0.146%

rteres

113	8.628	8.615	8.644	VV	824	10870	0.33%	0.103%
114	8.652	8.644	8.661	VV	583	5490	0.17%	0.052%
115	8.682	8.661	8.720	VV	1343	29411	0.89%	0.279%
116	8.742	8.720	8.774	VV	693	9902	0.30%	0.094%
117	8.793	8.774	8.816	VV	533	7654	0.23%	0.073%
118	8.861	8.816	8.882	VV	2896	40675	1.24%	0.385%
119	8.898	8.882	8.942	VV	1565	34679	1.06%	0.328%
120	8.977	8.942	9.027	VV	3613	65932	2.01%	0.625%
121	9.049	9.027	9.074	VV	1012	12535	0.38%	0.119%
122	9.097	9.074	9.131	VV	617	9049	0.28%	0.086%
123	9.179	9.131	9.224	VV	457	11873	0.36%	0.112%
124	9.263	9.224	9.304	VV	727	18523	0.56%	0.175%
125	9.326	9.304	9.366	VV	1658	24151	0.73%	0.229%
126	9.402	9.366	9.415	VV	260	5340	0.16%	0.051%
127	9.423	9.415	9.443	VV	192	2181	0.07%	0.021%
128	9.467	9.443	9.491	VV	670	8643	0.26%	0.082%
129	9.521	9.491	9.561	VV	598	9520	0.29%	0.090%
130	9.614	9.561	9.625	VV	193	4217	0.13%	0.040%
131	9.660	9.625	9.718	VV	588	10145	0.31%	0.096%
132	9.740	9.718	9.784	VV	2297	30117	0.92%	0.285%
133	9.816	9.784	9.850	VV	523	12887	0.39%	0.122%
134	9.861	9.850	9.869	VV	330	2854	0.09%	0.027%
135	9.885	9.869	9.929	VV	293	6610	0.20%	0.063%
136	10.016	9.929	10.033	PV	441	9900	0.30%	0.094%
137	10.060	10.033	10.078	VV	669	11649	0.35%	0.110%
138	10.130	10.078	10.150	VV	794	20409	0.62%	0.193%
139	10.167	10.150	10.189	VV	736	11882	0.36%	0.113%
140	10.218	10.189	10.238	VV	545	11899	0.36%	0.113%
141	10.252	10.238	10.284	VV	368	8187	0.25%	0.078%
142	10.293	10.284	10.311	VV	257	3411	0.10%	0.032%
143	10.338	10.311	10.351	VV	734	11327	0.34%	0.107%
144	10.373	10.351	10.391	VV	686	13434	0.41%	0.127%
145	10.415	10.391	10.450	VV	857	21047	0.64%	0.199%
146	10.477	10.450	10.512	VV	1294	28145	0.86%	0.267%
147	10.532	10.512	10.548	VV	761	12134	0.37%	0.115%
148	10.563	10.548	10.581	VV	776	12630	0.38%	0.120%
149	10.604	10.581	10.677	VV	2068	46957	1.43%	0.445%
150	10.691	10.677	10.712	VV	607	9340	0.28%	0.088%
151	10.728	10.712	10.741	VV	360	5058	0.15%	0.048%
152	10.761	10.741	10.778	VV	466	7192	0.22%	0.068%
153	10.795	10.778	10.827	VV	616	12864	0.39%	0.122%
154	10.844	10.827	10.858	VV	540	7867	0.24%	0.075%
155	10.872	10.858	10.880	VV	570	6756	0.21%	0.064%

rteres

156	10.901	10.880	10.922	VV	1174	18576	0.57%	0.176%
157	10.930	10.922	10.951	VV	491	5922	0.18%	0.056%
158	10.981	10.951	11.007	VV	522	10384	0.32%	0.098%
159	11.032	11.007	11.077	VV	265	6990	0.21%	0.066%
160	11.109	11.077	11.147	VV	1535	23625	0.72%	0.224%
161	11.178	11.147	11.208	VV	2532	34451	1.05%	0.326%
162	11.272	11.208	11.317	VV	507	20269	0.62%	0.192%
163	11.335	11.317	11.351	PV	366	3881	0.12%	0.037%
164	11.366	11.351	11.383	VV	211	3165	0.10%	0.030%
165	11.407	11.383	11.448	VV	235	5585	0.17%	0.053%
166	11.534	11.448	11.551	VV	545	22802	0.69%	0.216%
167	11.567	11.551	11.618	VV	874	18093	0.55%	0.171%
168	11.644	11.618	11.678	VV	549	13133	0.40%	0.124%
169	11.778	11.678	11.787	VV	449	14934	0.45%	0.141%
170	11.839	11.787	11.872	VV	1137	36437	1.11%	0.345%
171	11.890	11.872	11.917	VV	640	12677	0.39%	0.120%
172	11.937	11.917	11.958	VV	415	8377	0.25%	0.079%
173	11.981	11.958	12.027	VV	668	18914	0.58%	0.179%
174	12.065	12.027	12.105	VV	1587	40091	1.22%	0.380%
175	12.124	12.105	12.154	VV	725	14602	0.44%	0.138%
176	12.168	12.154	12.206	VV	480	11929	0.36%	0.113%
177	12.221	12.206	12.233	VV	450	5965	0.18%	0.057%
178	12.255	12.233	12.284	VV	618	15418	0.47%	0.146%
179	12.347	12.284	12.395	VV	1825	50521	1.54%	0.479%
180	12.424	12.395	12.454	VV	1277	18831	0.57%	0.178%
181	12.486	12.454	12.525	VV	2814	38809	1.18%	0.368%
182	12.534	12.525	12.613	VV	269	10549	0.32%	0.100%
183	12.620	12.613	12.651	VV	187	3342	0.10%	0.032%
184	12.655	12.651	12.671	VV	154	1135	0.03%	0.011%
185	12.681	12.671	12.701	VV	91	873	0.03%	0.008%
186	12.755	12.701	12.768	PV	364	7908	0.24%	0.075%
187	12.771	12.768	12.793	VV	355	3459	0.11%	0.033%
188	12.806	12.793	12.824	VV	258	3235	0.10%	0.031%
189	12.850	12.824	12.874	VV	546	8504	0.26%	0.081%
190	12.929	12.874	13.068	VV	268897	3286696	100.00%	31.133%
191	13.095	13.068	13.133	VV	824	24475	0.74%	0.232%
192	13.146	13.133	13.189	VV	701	18629	0.57%	0.176%
193	13.215	13.189	13.269	VV	485	16554	0.50%	0.157%
194	13.302	13.269	13.334	VV	654	19103	0.58%	0.181%
195	13.376	13.334	13.413	VV	845	27737	0.84%	0.263%
196	13.429	13.413	13.457	VV	402	8134	0.25%	0.077%
197	13.478	13.457	13.513	VV	371	9910	0.30%	0.094%
198	13.553	13.513	13.576	VV	535	14198	0.43%	0.134%
199	13.628	13.576	13.656	VV	1257	26613	0.81%	0.252%

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200	13.682	13.656	13.724	VV	2457	38035	1.16%	0.360%
201	13.740	13.724	13.751	VV	240	3100	0.09%	0.029%
202	13.759	13.751	13.771	VV	211	1769	0.05%	0.017%
203	13.776	13.771	13.808	VV	176	2019	0.06%	0.019%
204	13.819	13.808	13.884	VV	74	1598	0.05%	0.015%
205	13.939	13.884	13.963	VV	247	8297	0.25%	0.079%
206	13.975	13.963	14.001	VV	236	3588	0.11%	0.034%
207	14.017	14.001	14.041	VV	257	3913	0.12%	0.037%
208	14.048	14.041	14.059	VV	122	986	0.03%	0.009%
209	14.118	14.059	14.161	VV	972	23922	0.73%	0.227%
210	14.171	14.161	14.194	VV	402	6297	0.19%	0.060%
211	14.210	14.194	14.222	VV	390	5521	0.17%	0.052%
212	14.243	14.222	14.284	VV	590	12796	0.39%	0.121%
213	14.338	14.284	14.356	VV	458	13640	0.42%	0.129%
214	14.384	14.356	14.432	VV	588	18550	0.56%	0.176%
215	14.443	14.432	14.471	VV	409	7314	0.22%	0.069%
216	14.500	14.471	14.519	VV	490	9782	0.30%	0.093%
217	14.558	14.519	14.578	VV	565	16555	0.50%	0.157%
218	14.592	14.578	14.674	VV	647	20003	0.61%	0.189%
219	14.740	14.674	14.759	VV	1117	24022	0.73%	0.228%
220	14.784	14.759	14.854	VV	2637	49869	1.52%	0.472%
221	14.867	14.854	14.924	VV	239	5402	0.16%	0.051%
222	14.954	14.924	15.047	PV	300	12353	0.38%	0.117%
223	15.091	15.047	15.128	VV	196	4204	0.13%	0.040%
224	15.136	15.128	15.148	VV	90	845	0.03%	0.008%
225	15.165	15.148	15.181	VV	133	2113	0.06%	0.020%
226	15.213	15.181	15.235	VV	257	5591	0.17%	0.053%
227	15.303	15.235	15.381	VV	984	26727	0.81%	0.253%
228	15.389	15.381	15.411	VV	178	2553	0.08%	0.024%
229	15.442	15.411	15.461	VV	317	7151	0.22%	0.068%
230	15.481	15.461	15.568	VV	390	16185	0.49%	0.153%
231	15.611	15.568	15.637	VV	453	13718	0.42%	0.130%
232	15.658	15.637	15.731	VV	492	15935	0.48%	0.151%
233	15.763	15.731	15.777	VV	894	12197	0.37%	0.116%
234	15.803	15.777	15.951	VV	2464	52099	1.59%	0.494%
235	16.009	15.951	16.070	VV	180	7217	0.22%	0.068%
236	16.085	16.070	16.098	PV	122	1294	0.04%	0.012%
237	16.120	16.098	16.150	VV	142	2845	0.09%	0.027%
238	16.160	16.150	16.184	VV	124	1634	0.05%	0.015%
239	16.191	16.184	16.208	VV	134	681	0.02%	0.006%
240	16.215	16.208	16.220	PV	66	338	0.01%	0.003%
241	16.284	16.220	16.315	VV	1053	20075	0.61%	0.190%
242	16.360	16.315	16.391	VV	288	8196	0.25%	0.078%

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243	16.409	16.391	16.420	VV	253	2501	0.08%	0.024%
244	16.445	16.420	16.472	VV	264	6239	0.19%	0.059%
245	16.504	16.472	16.527	VV	282	7001	0.21%	0.066%
246	16.538	16.527	16.551	VV	219	2727	0.08%	0.026%
247	16.581	16.551	16.616	VV	301	8269	0.25%	0.078%
248	16.638	16.616	16.664	VV	312	7921	0.24%	0.075%
249	16.672	16.664	16.691	VV	366	4873	0.15%	0.046%
250	16.750	16.691	16.781	VV	2221	46821	1.42%	0.444%
251	16.796	16.781	16.808	VV	285	3797	0.12%	0.036%
252	16.822	16.808	16.836	VV	220	3132	0.10%	0.030%
253	16.853	16.836	16.905	VV	240	6359	0.19%	0.060%
254	16.915	16.905	16.923	VV	210	1394	0.04%	0.013%
255	16.932	16.923	16.954	VV	136	1965	0.06%	0.019%
256	16.957	16.954	16.972	VV	150	676	0.02%	0.006%
257	16.991	16.972	17.004	VV	105	1111	0.03%	0.011%
258	17.201	17.004	17.257	PV	1396	34788	1.06%	0.330%
259	17.279	17.257	17.294	VV	242	3191	0.10%	0.030%
260	17.304	17.294	17.321	VV	241	3035	0.09%	0.029%
261	17.342	17.321	17.396	VV	213	6472	0.20%	0.061%
262	17.418	17.396	17.431	VV	261	3725	0.11%	0.035%
263	17.463	17.431	17.491	VV	348	8517	0.26%	0.081%
264	17.635	17.491	17.699	VV	2493	67552	2.06%	0.640%
265	17.736	17.699	17.747	VV	257	5626	0.17%	0.053%
266	17.775	17.747	17.804	VV	317	8555	0.26%	0.081%
267	17.818	17.804	17.838	VV	185	2313	0.07%	0.022%
268	17.846	17.838	17.881	VV	148	1630	0.05%	0.015%
269	17.926	17.881	17.941	PV	164	3619	0.11%	0.034%
270	18.059	17.941	18.126	VV	1667	30294	0.92%	0.287%
271	18.147	18.126	18.157	VV	156	1857	0.06%	0.018%
272	18.189	18.157	18.198	VV	148	2526	0.08%	0.024%
273	18.210	18.198	18.224	VV	171	1319	0.04%	0.012%
274	18.322	18.224	18.331	VV	294	8086	0.25%	0.077%
275	18.339	18.331	18.384	VV	238	4777	0.15%	0.045%
276	18.467	18.384	18.539	VV	2200	49615	1.51%	0.470%
277	18.606	18.539	18.624	VV	239	6379	0.19%	0.060%
278	18.730	18.624	18.747	VV	137	6569	0.20%	0.062%
279	18.865	18.747	18.896	PV	1267	24007	0.73%	0.227%
280	19.076	18.896	19.086	VV	401	38165	1.16%	0.362%
281	19.158	19.086	19.168	VV	589	23745	0.72%	0.225%
282	19.250	19.168	19.291	VV	2214	74006	2.25%	0.701%
283	19.298	19.291	19.317	VV	642	9450	0.29%	0.090%
284	19.325	19.317	19.334	VV	638	5656	0.17%	0.054%
285	19.367	19.334	19.391	VV	620	18752	0.57%	0.178%

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286	19.486	19.391	19.514	VV	708	39394	1.20%	0.373%
287	19.558	19.514	19.574	VV	656	20569	0.63%	0.195%
288	19.625	19.574	19.647	VV	1267	34851	1.06%	0.330%
289	19.831	19.647	19.936	VV	6993	477634	14.53%	4.524%
290	19.987	19.936	20.014	VV	3290	117609	3.58%	1.114%
291	20.052	20.014	20.061	VV	2401	65740	2.00%	0.623%
292	20.345	20.061	20.368	VV	4072	567962	17.28%	5.380%
293	20.455	20.368	20.467	VV	3809	217338	6.61%	2.059%
294	20.520	20.467	20.538	VV	4143	167603	5.10%	1.588%
295	20.597	20.538	20.634	VV	3944	224369	6.83%	2.125%
296	20.709	20.634	20.758	VV	4616	299311	9.11%	2.835%
297	20.797	20.758	20.902	VV	3720	300657	9.15%	2.848%
298	20.920	20.902	20.964	VV	3031	109000	3.32%	1.033%
299	20.975	20.964	20.987	VV	2782	38049	1.16%	0.360%
300	21.048	20.987	21.058	VV	2764	116687	3.55%	1.105%
301	21.084	21.058	21.148	VV	3372	146989	4.47%	1.392%
302	21.158	21.148	21.188	VV	2595	57893	1.76%	0.548%
303	21.195	21.188	21.241	VV	2291	69146	2.10%	0.655%
304	21.251	21.241	21.268	VV	1997	31494	0.96%	0.298%
305	21.344	21.268	21.353	VV	2079	103815	3.16%	0.983%
306	21.372	21.353	21.383	VV	2007	35176	1.07%	0.333%
307	21.426	21.383	21.444	VV	1897	68905	2.10%	0.653%
308	21.452	21.444	21.461	VV	1883	18085	0.55%	0.171%
309	21.470	21.461	21.480	VV	1850	20826	0.63%	0.197%
310	21.494	21.480	21.524	VV	1721	44311	1.35%	0.420%
311	21.597	21.524	21.660	VV	1845	125099	3.81%	1.185%
312	21.671	21.660	21.731	VV	1213	42904	1.31%	0.406%
313	21.749	21.731	21.797	VV	915	32475	0.99%	0.308%
314	21.808	21.797	21.839	VV	794	17542	0.53%	0.166%
315	21.867	21.839	21.928	VV	595	23641	0.72%	0.224%
316	21.945	21.928	21.984	VV	261	5218	0.16%	0.049%

Sum of corrected areas: 10556793

Aliphatic EPH 102324.M Sat Nov 09 02:16:11 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SB02	SDG No.:	P4718
Lab Sample ID:	P4718-02	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	77.6
Sample Wt/Vol:	30.01 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048680.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	0.39	U	0.39	0.86	mg/kg
Aromatic C12-C16	Aromatic C12-C16	0.47	J	0.44	1.29	mg/kg
Aromatic C16-C21	Aromatic C16-C21	4.38		1.24	2.15	mg/kg
Aromatic C21-C36	Aromatic C21-C36	2.58	U	2.58	3.44	mg/kg
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	46.7		40 - 140	93%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	46.9		40 - 140	94%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	27.3		40 - 140	55%	SPK: 50

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

Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	P4718-02	Acq On:	08 Nov 2024 20:33
Client Sample ID:	WB-307-SB02	Operator:	YP/AJ
Data file:	FD048680.D	Misc:	
Instrument:	FID_D	ALS Vial:	63
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.092	5.810	631885	3.586	200	ug/ml
Aromatic C12-C16	5.811	8.415	970946	5.477	300	ug/ml
Aromatic C16-C21	8.416	12.678	8348133	50.955	500	ug/ml
Aromatic C21-C36	12.679	18.083	3081630	20.179	800	ug/ml
Aromatic EPH	4.092	18.083	13032594	80.198		ug/ml
ortho-Terphenyl (SURR)	11.253	11.253	4649411	27.29		ug/ml
2-Bromonaphthalene (SURR)	7.369	7.369	7093904	46.74		ug/ml
2-Flurobiphenyl (SURR)	8.219	8.219	4606055	46.91		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048680.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 20:33
Operator : YP/AJ
Sample : P4718-02
Misc :
ALS Vial : 63 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SB02

Integration File: sample.E
Quant Time: Nov 09 01:08:29 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
4) S 2-Bromonaphthalene (S...	7.369	7093904	46.738 ug/ml
Spiked Amount 50.000		Recovery =	93.48%
6) S 2-Flurobiphenyl (SURR)	8.219	4606055	46.909 ug/ml
Spiked Amount 50.000	Range 0 - 131	Recovery =	93.82%
11) S ortho-Terphenyl (SURR)	11.253	4649411	27.295 ug/ml
Spiked Amount 50.000		Recovery =	54.59%
Target Compounds			

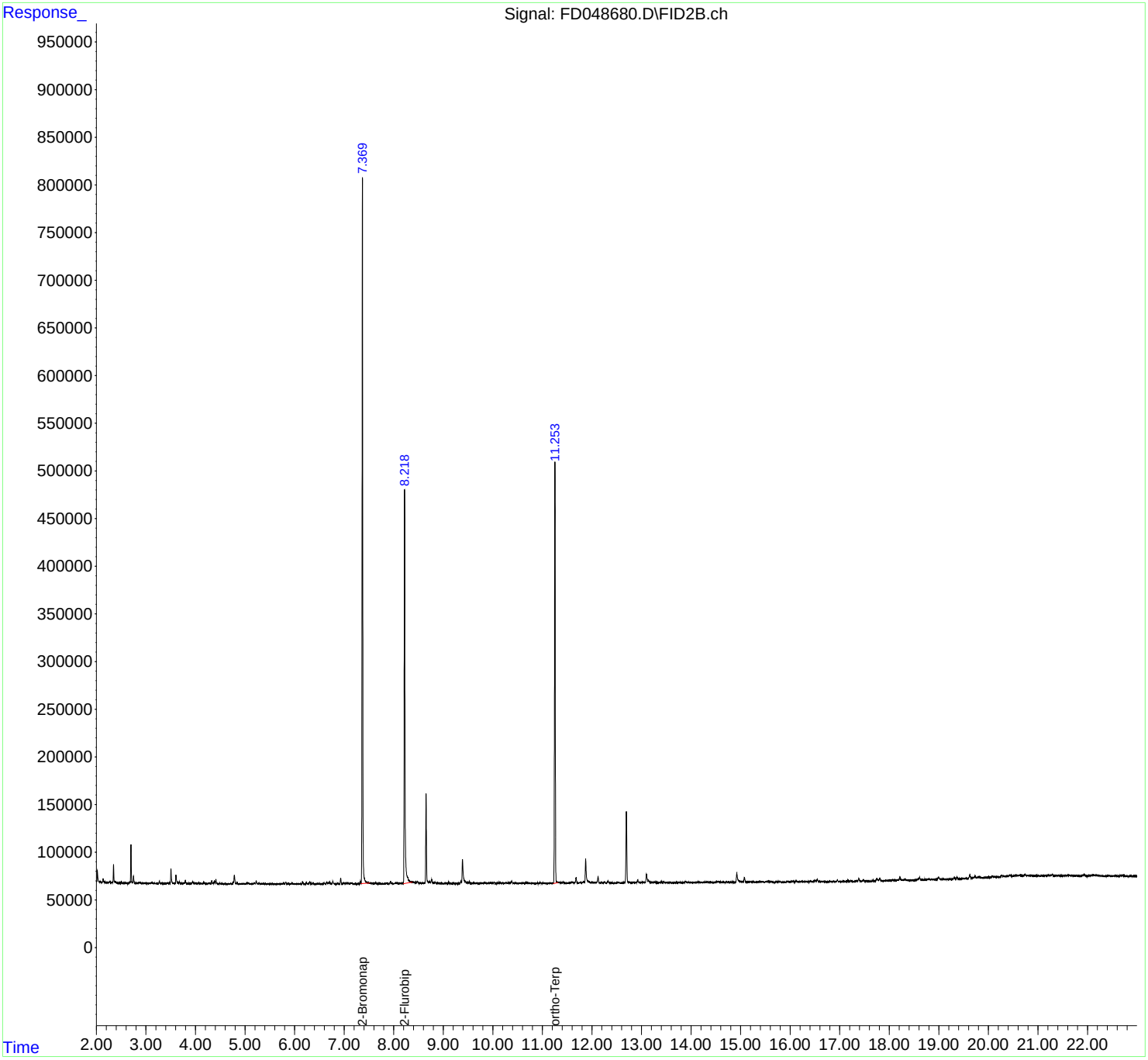
(f)=RT Delta > 1/2 Window (m)=manual int.

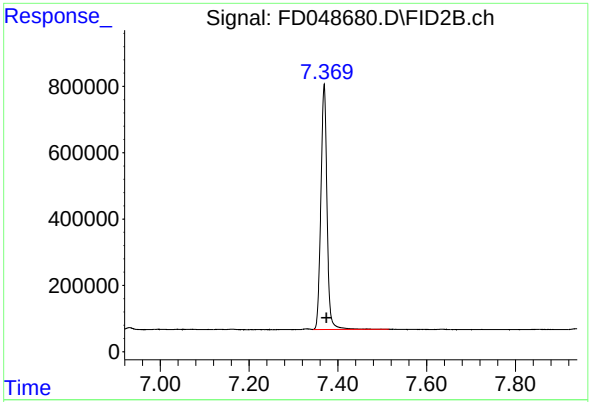
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048680.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 20:33
Operator : YP/AJ
Sample : P4718-02
Misc :
ALS Vial : 63 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SB02

Integration File: sample.E
Quant Time: Nov 09 01:08:29 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

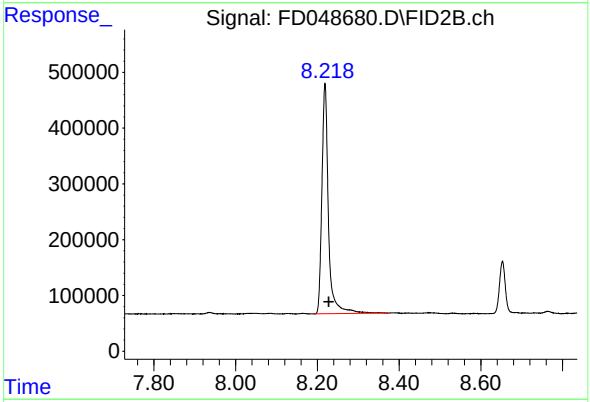




#4 2-Bromonaphthalene (SURR)

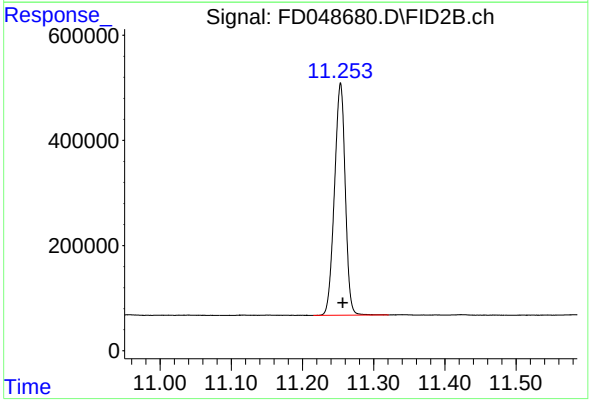
R.T.: 7.369 min
Delta R.T.: -0.006 min
Response: 7093904
Conc: 46.74 ug/ml

Instrument :
FID_D
ClientSampleId :
WB-307-SB02



#6 2-Flurobiphenyl (SURR)

R.T.: 8.219 min
Delta R.T.: -0.009 min
Response: 4606055
Conc: 46.91 ug/ml



#11 ortho-Terphenyl (SURR)

R.T.: 11.253 min
Delta R.T.: -0.004 min
Response: 4649411
Conc: 27.29 ug/ml

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048680.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 20:33
Sample : P4718-02
Misc :
ALS Vial : 63 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.062	4.042	4.086	BV	634	8110	0.11%	0.032%
2	4.093	4.086	4.117	VV	215	3530	0.05%	0.014%
3	4.124	4.117	4.133	VV	249	1543	0.02%	0.006%
4	4.166	4.133	4.208	PV	2331	30095	0.42%	0.121%
5	4.218	4.208	4.254	VV	387	5800	0.08%	0.023%
6	4.275	4.254	4.305	VV	807	13294	0.19%	0.053%
7	4.328	4.305	4.352	VV	3472	42152	0.59%	0.169%
8	4.383	4.352	4.397	VV	3125	38615	0.54%	0.155%
9	4.412	4.397	4.449	VV	4782	51543	0.72%	0.206%
10	4.458	4.449	4.473	VV	296	3051	0.04%	0.012%
11	4.487	4.473	4.508	VV	787	9627	0.13%	0.039%
12	4.525	4.508	4.568	VV	899	11483	0.16%	0.046%
13	4.574	4.568	4.581	PV	200	1018	0.01%	0.004%
14	4.598	4.581	4.621	VV	701	9636	0.14%	0.039%
15	4.624	4.621	4.641	VV	235	1475	0.02%	0.006%
16	4.658	4.641	4.666	PV	242	1619	0.02%	0.006%
17	4.673	4.666	4.684	VV	218	1695	0.02%	0.007%
18	4.705	4.684	4.733	VV	871	10476	0.15%	0.042%
19	4.784	4.733	4.819	VV	9502	136869	1.92%	0.548%
20	4.840	4.819	4.867	VV	2109	25044	0.35%	0.100%
21	4.870	4.867	4.888	VV	262	2029	0.03%	0.008%
22	4.900	4.888	4.913	VV	331	3272	0.05%	0.013%
23	4.922	4.913	4.941	VV	224	3075	0.04%	0.012%
24	4.947	4.941	4.962	VV	255	2148	0.03%	0.009%
25	4.977	4.962	4.999	VV	791	7377	0.10%	0.030%
26	5.010	4.999	5.019	VV	230	1426	0.02%	0.006%
27	5.037	5.019	5.084	VV	1415	32810	0.46%	0.131%
28	5.088	5.084	5.114	VV	552	6890	0.10%	0.028%
29	5.119	5.114	5.124	VV	219	1123	0.02%	0.004%
30	5.125	5.124	5.135	VV	285	1395	0.02%	0.006%
31	5.155	5.135	5.172	VV	571	8256	0.12%	0.033%
32	5.190	5.172	5.208	VV	1231	15856	0.22%	0.064%
33	5.225	5.208	5.263	VV	3584	41916	0.59%	0.168%
34	5.283	5.263	5.324	VV	1014	16002	0.22%	0.064%
35	5.343	5.324	5.357	VV	610	8502	0.12%	0.034%
36	5.362	5.357	5.365	VV	578	2435	0.03%	0.010%

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37	5.369	5.365	5.395	VV	608	6411	0.09%	0.026%
38	5.398	5.395	5.430	VV	358	4701	0.07%	0.019%
39	5.440	5.430	5.459	VV	398	4981	0.07%	0.020%
40	5.477	5.459	5.504	VV	706	10093	0.14%	0.040%
41	5.508	5.504	5.513	VV	320	1649	0.02%	0.007%
42	5.533	5.513	5.548	VV	519	7058	0.10%	0.028%
43	5.553	5.548	5.565	VV	500	2445	0.03%	0.010%
44	5.590	5.577	5.619	VV	156	2208	0.03%	0.009%
45	5.640	5.619	5.651	PV	266	2858	0.04%	0.011%
46	5.670	5.657	5.684	VV	303	2827	0.04%	0.011%
47	5.697	5.684	5.701	VV	361	2622	0.04%	0.011%
48	5.707	5.701	5.722	VV	469	3803	0.05%	0.015%
49	5.734	5.722	5.752	VV	501	6298	0.09%	0.025%
50	5.781	5.752	5.804	VV	1164	20854	0.29%	0.084%
51	5.820	5.804	5.875	VV	2167	33508	0.47%	0.134%
52	5.885	5.875	5.902	VV	677	7296	0.10%	0.029%
53	5.914	5.902	5.919	VV	354	2353	0.03%	0.009%
54	5.950	5.919	5.989	VV	1071	21044	0.29%	0.084%
55	5.994	5.989	6.000	VV	258	1267	0.02%	0.005%
56	6.007	6.000	6.024	VV	389	2563	0.04%	0.010%
57	6.029	6.024	6.037	VV	176	1115	0.02%	0.004%
58	6.060	6.037	6.065	VV	558	6909	0.10%	0.028%
59	6.070	6.065	6.090	VV	499	5061	0.07%	0.020%
60	6.097	6.090	6.127	VV	291	4558	0.06%	0.018%
61	6.130	6.127	6.136	VV	253	1193	0.02%	0.005%
62	6.160	6.136	6.209	VV	2856	39552	0.55%	0.158%
63	6.214	6.209	6.219	VV	387	1447	0.02%	0.006%
64	6.238	6.219	6.258	VV	1497	17573	0.25%	0.070%
65	6.276	6.258	6.288	VV	1087	10760	0.15%	0.043%
66	6.306	6.288	6.329	VV	2778	33296	0.47%	0.133%
67	6.337	6.329	6.358	VV	896	9661	0.14%	0.039%
68	6.377	6.358	6.418	VV	1634	18977	0.27%	0.076%
69	6.424	6.418	6.441	VV	207	1921	0.03%	0.008%
70	6.452	6.441	6.470	VV	309	4104	0.06%	0.016%
71	6.480	6.470	6.494	VV	328	3896	0.05%	0.016%
72	6.497	6.494	6.506	VV	278	1472	0.02%	0.006%
73	6.519	6.506	6.533	VV	382	4120	0.06%	0.017%
74	6.537	6.533	6.556	VV	336	3485	0.05%	0.014%
75	6.562	6.556	6.576	VV	557	3565	0.05%	0.014%
76	6.593	6.576	6.619	VV	1494	19380	0.27%	0.078%
77	6.647	6.619	6.684	VV	1950	46353	0.65%	0.186%
78	6.695	6.684	6.704	VV	1672	16358	0.23%	0.066%
79	6.713	6.704	6.743	VV	1707	22473	0.31%	0.090%
80	6.772	6.743	6.795	VV	3029	41132	0.58%	0.165%
81	6.804	6.795	6.814	VV	460	4170	0.06%	0.017%
82	6.818	6.814	6.835	VV	411	3041	0.04%	0.012%
83	6.844	6.835	6.853	PV	420	2433	0.03%	0.010%
84	6.873	6.853	6.902	VV	866	13640	0.19%	0.055%
85	6.931	6.902	6.963	VV	6335	72564	1.02%	0.291%
86	6.994	6.963	7.022	VV	1319	25779	0.36%	0.103%
87	7.039	7.022	7.051	VV	1292	13474	0.19%	0.054%
88	7.072	7.051	7.093	VV	1152	20406	0.29%	0.082%
89	7.108	7.093	7.117	VV	665	6690	0.09%	0.027%

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90	7.135	7.117	7.148	VV	1099	14445	0.20%	0.058%
91	7.162	7.148	7.182	VV	1575	17427	0.24%	0.070%
92	7.185	7.182	7.202	VV	424	2329	0.03%	0.009%
93	7.220	7.202	7.249	VV	402	6764	0.09%	0.027%
94	7.281	7.260	7.286	VV	503	4631	0.06%	0.019%
95	7.288	7.286	7.299	VV	434	2270	0.03%	0.009%
96	7.330	7.299	7.343	VV	2633	30662	0.43%	0.123%
97	7.369	7.343	7.463	VV	737077	7136534	100.00%	28.590%
98	7.470	7.463	7.492	VV	1732	26600	0.37%	0.107%
99	7.497	7.492	7.542	VV	1572	36363	0.51%	0.146%
100	7.551	7.542	7.559	VV	1011	9142	0.13%	0.037%
101	7.565	7.559	7.611	VV	897	21989	0.31%	0.088%
102	7.636	7.611	7.667	VV	1317	21293	0.30%	0.085%
103	7.692	7.667	7.702	VV	568	7366	0.10%	0.030%
104	7.711	7.702	7.715	VV	462	2232	0.03%	0.009%
105	7.725	7.715	7.751	VV	576	8959	0.13%	0.036%
106	7.767	7.751	7.794	VV	432	7999	0.11%	0.032%
107	7.799	7.794	7.809	VV	399	2700	0.04%	0.011%
108	7.822	7.809	7.831	VV	364	3351	0.05%	0.013%
109	7.850	7.831	7.870	VV	851	13985	0.20%	0.056%
110	7.875	7.870	7.897	VV	607	7781	0.11%	0.031%
111	7.907	7.897	7.917	VV	425	4435	0.06%	0.018%
112	7.936	7.917	7.959	VV	2923	35564	0.50%	0.142%
113	7.966	7.959	7.984	VV	660	8576	0.12%	0.034%
114	7.988	7.984	8.007	VV	605	4827	0.07%	0.019%
115	8.030	8.007	8.037	VV	1246	13596	0.19%	0.054%
116	8.049	8.037	8.067	VV	1320	19646	0.28%	0.079%
117	8.085	8.067	8.115	VV	1235	21049	0.29%	0.084%
118	8.129	8.115	8.149	VV	983	13236	0.19%	0.053%
119	8.165	8.149	8.182	VV	1289	14378	0.20%	0.058%
120	8.185	8.182	8.194	VV	558	2800	0.04%	0.011%
121	8.219	8.194	8.377	VV	413392	4734105	66.34%	18.965%
122	8.392	8.377	8.408	VV	2202	35962	0.50%	0.144%
123	8.422	8.408	8.436	VV	1951	27906	0.39%	0.112%
124	8.442	8.436	8.452	VV	1719	15939	0.22%	0.064%
125	8.475	8.452	8.515	VV	2300	59911	0.84%	0.240%
126	8.533	8.515	8.560	VV	1383	24579	0.34%	0.098%
127	8.585	8.560	8.610	VV	1146	23491	0.33%	0.094%
128	8.653	8.610	8.701	VV	94931	987640	13.84%	3.957%
129	8.707	8.701	8.720	VV	1957	20628	0.29%	0.083%
130	8.733	8.720	8.744	VV	2039	25259	0.35%	0.101%
131	8.764	8.744	8.799	VV	4856	80490	1.13%	0.322%
132	8.814	8.799	8.825	VV	1391	17420	0.24%	0.070%
133	8.836	8.825	8.865	VV	1816	25975	0.36%	0.104%
134	8.886	8.865	8.914	VV	1181	20741	0.29%	0.083%
135	8.925	8.914	8.935	VV	629	7466	0.10%	0.030%
136	8.944	8.935	8.955	VV	768	7797	0.11%	0.031%
137	8.960	8.955	8.964	VV	730	3698	0.05%	0.015%
138	8.968	8.964	9.012	VV	781	13437	0.19%	0.054%
139	9.033	9.012	9.040	VV	878	9948	0.14%	0.040%
140	9.049	9.040	9.080	VV	846	13657	0.19%	0.055%
141	9.085	9.080	9.090	VV	365	1804	0.03%	0.007%

142	9.111	9.090	9.139	VV	1990	25225	0.35%	0.101%
143	9.143	9.139	9.160	VV	386	3837	0.05%	0.015%
144	9.165	9.160	9.170	VV	337	1544	0.02%	0.006%
145	9.190	9.170	9.210	VV	581	10729	0.15%	0.043%
146	9.216	9.210	9.237	VV	499	4511	0.06%	0.018%
147	9.253	9.237	9.276	PV	873	11887	0.17%	0.048%
148	9.280	9.276	9.290	VV	336	2166	0.03%	0.009%
149	9.296	9.290	9.300	VV	343	2032	0.03%	0.008%
150	9.318	9.300	9.326	VV	536	6938	0.10%	0.028%
151	9.355	9.326	9.369	VV	3237	37816	0.53%	0.151%
152	9.388	9.369	9.509	VV	25736	463698	6.50%	1.858%
153	9.529	9.509	9.566	VV	1842	36349	0.51%	0.146%
154	9.599	9.566	9.617	VV	998	22902	0.32%	0.092%
155	9.621	9.617	9.650	VV	834	12762	0.18%	0.051%
156	9.670	9.650	9.715	VV	712	18968	0.27%	0.076%
157	9.730	9.715	9.739	VV	451	4544	0.06%	0.018%
158	9.754	9.739	9.758	VV	561	4935	0.07%	0.020%
159	9.775	9.758	9.784	VV	669	8463	0.12%	0.034%
160	9.796	9.784	9.813	VV	677	10082	0.14%	0.040%
161	9.837	9.813	9.865	VV	1117	24587	0.34%	0.098%
162	9.873	9.865	9.884	VV	734	6813	0.10%	0.027%
163	9.895	9.884	9.900	VV	684	5971	0.08%	0.024%
164	9.917	9.900	9.934	VV	981	15927	0.22%	0.064%
165	9.948	9.934	9.973	VV	1128	19687	0.28%	0.079%
166	9.979	9.973	9.992	VV	805	7826	0.11%	0.031%
167	9.997	9.992	10.012	VV	688	7256	0.10%	0.029%
168	10.027	10.012	10.061	VV	2014	25123	0.35%	0.101%
169	10.065	10.061	10.072	VV	440	2350	0.03%	0.009%
170	10.084	10.072	10.089	VV	416	3391	0.05%	0.014%
171	10.122	10.089	10.135	VV	1312	21924	0.31%	0.088%
172	10.146	10.135	10.178	VV	1177	20819	0.29%	0.083%
173	10.195	10.178	10.219	VV	1168	17337	0.24%	0.069%
174	10.266	10.219	10.297	VV	1055	34493	0.48%	0.138%
175	10.308	10.297	10.325	VV	919	11650	0.16%	0.047%
176	10.343	10.325	10.350	VV	938	10595	0.15%	0.042%
177	10.381	10.350	10.410	VV	2751	49629	0.70%	0.199%
178	10.418	10.410	10.426	VV	703	5930	0.08%	0.024%
179	10.431	10.426	10.438	VV	645	3978	0.06%	0.016%
180	10.442	10.438	10.446	VV	544	2469	0.03%	0.010%
181	10.449	10.446	10.453	VV	577	1896	0.03%	0.008%
182	10.455	10.453	10.459	VV	462	1665	0.02%	0.007%
183	10.469	10.459	10.494	VV	636	10709	0.15%	0.043%
184	10.503	10.494	10.509	VV	499	3223	0.05%	0.013%
185	10.512	10.509	10.521	VV	429	2453	0.03%	0.010%
186	10.526	10.521	10.530	VV	393	1749	0.02%	0.007%
187	10.541	10.530	10.556	VV	665	7815	0.11%	0.031%
188	10.569	10.556	10.581	VV	738	8423	0.12%	0.034%
189	10.590	10.581	10.625	VV	763	14998	0.21%	0.060%
190	10.628	10.625	10.635	VV	662	3359	0.05%	0.013%
191	10.648	10.635	10.660	VV	719	9411	0.13%	0.038%
192	10.678	10.660	10.697	VV	1488	22336	0.31%	0.089%
193	10.716	10.697	10.731	VV	701	10213	0.14%	0.041%
194	10.747	10.731	10.780	VV	615	10354	0.15%	0.041%

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195	10.795	10.780	10.802	VV	423	3635	0.05%	0.015%
196	10.807	10.802	10.822	VV	418	3816	0.05%	0.015%
197	10.828	10.822	10.837	VV	272	1818	0.03%	0.007%
198	10.842	10.837	10.864	VV	376	3423	0.05%	0.014%
199	10.891	10.864	10.909	VV	706	10158	0.14%	0.041%
200	10.914	10.909	10.926	VV	335	2486	0.03%	0.010%
201	10.958	10.926	10.988	VV	1323	24114	0.34%	0.097%
202	10.994	10.988	10.999	VV	424	2191	0.03%	0.009%
203	11.003	10.999	11.009	VV	460	2652	0.04%	0.011%
204	11.012	11.009	11.022	VV	539	3121	0.04%	0.013%
205	11.039	11.022	11.067	VV	705	11886	0.17%	0.048%
206	11.072	11.067	11.092	VV	319	2481	0.03%	0.010%
207	11.118	11.092	11.137	VV	725	9593	0.13%	0.038%
208	11.154	11.137	11.190	VV	651	13003	0.18%	0.052%
209	11.200	11.190	11.215	VV	381	3596	0.05%	0.014%
210	11.254	11.215	11.322	PV	442680	4684552	65.64%	18.767%
211	11.340	11.322	11.369	VV	1402	30047	0.42%	0.120%
212	11.371	11.369	11.377	VV	881	4124	0.06%	0.017%
213	11.387	11.377	11.398	VV	951	9833	0.14%	0.039%
214	11.403	11.398	11.406	VV	687	3556	0.05%	0.014%
215	11.422	11.406	11.452	VV	1433	24533	0.34%	0.098%
216	11.456	11.452	11.461	VV	619	2656	0.04%	0.011%
217	11.468	11.461	11.497	VV	696	9934	0.14%	0.040%
218	11.510	11.497	11.515	VV	567	4927	0.07%	0.020%
219	11.524	11.515	11.534	VV	668	5951	0.08%	0.024%
220	11.543	11.534	11.552	VV	678	6422	0.09%	0.026%
221	11.583	11.552	11.594	VV	1253	22225	0.31%	0.089%
222	11.598	11.594	11.603	VV	1160	6566	0.09%	0.026%
223	11.612	11.603	11.636	VV	1419	19647	0.28%	0.079%
224	11.679	11.636	11.705	VV	5970	88888	1.25%	0.356%
225	11.724	11.705	11.742	VV	825	15178	0.21%	0.061%
226	11.756	11.742	11.764	VV	987	11364	0.16%	0.046%
227	11.778	11.764	11.797	VV	1136	16557	0.23%	0.066%
228	11.834	11.797	11.852	VV	2107	44687	0.63%	0.179%
229	11.873	11.852	11.974	VV	25701	416730	5.84%	1.669%
230	11.991	11.974	12.000	VV	1083	15141	0.21%	0.061%
231	12.023	12.000	12.057	VV	1164	31371	0.44%	0.126%
232	12.064	12.057	12.075	VV	852	8136	0.11%	0.033%
233	12.098	12.075	12.102	VV	1390	17854	0.25%	0.072%
234	12.123	12.102	12.173	VV	6748	99797	1.40%	0.400%
235	12.195	12.173	12.218	VV	1301	20663	0.29%	0.083%
236	12.224	12.218	12.227	VV	364	1760	0.02%	0.007%
237	12.257	12.227	12.286	VV	1694	27960	0.39%	0.112%
238	12.323	12.286	12.374	VV	2365	50397	0.71%	0.202%
239	12.397	12.374	12.422	VV	660	11770	0.16%	0.047%
240	12.427	12.422	12.435	VV	313	1816	0.03%	0.007%
241	12.452	12.442	12.466	VV	301	3579	0.05%	0.014%
242	12.472	12.466	12.490	VV	449	4902	0.07%	0.020%
243	12.508	12.490	12.560	VV	911	26260	0.37%	0.105%
244	12.575	12.560	12.580	VV	386	3904	0.05%	0.016%
245	12.586	12.580	12.600	VV	400	3431	0.05%	0.014%
246	12.621	12.600	12.633	VV	685	9509	0.13%	0.038%

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247	12.694	12.633	12.737	VV	75374	953706	13.36%	3.821%
248	12.747	12.737	12.802	VV	1133	27745	0.39%	0.111%
249	12.808	12.802	12.815	VV	485	2478	0.03%	0.010%
250	12.829	12.815	12.834	VV	422	4273	0.06%	0.017%
251	12.859	12.834	12.864	VV	723	10586	0.15%	0.042%
252	12.867	12.864	12.878	VV	706	4914	0.07%	0.020%
253	12.882	12.878	12.899	VV	643	5948	0.08%	0.024%
254	12.924	12.899	12.951	VV	3658	52654	0.74%	0.211%
255	12.977	12.951	12.988	VV	759	13960	0.20%	0.056%
256	13.001	12.988	13.020	VV	775	13318	0.19%	0.053%
257	13.025	13.020	13.045	VV	675	8108	0.11%	0.032%
258	13.052	13.045	13.065	VV	943	9367	0.13%	0.038%
259	13.071	13.065	13.078	VV	821	5769	0.08%	0.023%
260	13.101	13.078	13.179	VV	9609	203564	2.85%	0.815%
261	13.181	13.179	13.193	VV	879	7392	0.10%	0.030%
262	13.201	13.193	13.227	VV	860	13806	0.19%	0.055%
263	13.240	13.227	13.255	VV	688	10624	0.15%	0.043%
264	13.267	13.255	13.308	VV	856	21103	0.30%	0.085%
265	13.314	13.308	13.337	VV	720	9133	0.13%	0.037%
266	13.359	13.337	13.368	VV	595	8338	0.12%	0.033%
267	13.400	13.368	13.424	VV	1372	27357	0.38%	0.110%
268	13.449	13.424	13.489	VV	1555	28766	0.40%	0.115%
269	13.492	13.489	13.537	VV	314	7481	0.10%	0.030%
270	13.543	13.537	13.547	VV	345	1430	0.02%	0.006%
271	13.563	13.547	13.569	VV	323	2746	0.04%	0.011%
272	13.592	13.569	13.600	VV	363	4697	0.07%	0.019%
273	13.609	13.600	13.636	VV	326	4514	0.06%	0.018%
274	13.654	13.636	13.659	PV	354	2753	0.04%	0.011%
275	13.664	13.659	13.678	VV	328	2953	0.04%	0.012%
276	13.696	13.678	13.705	VV	384	3595	0.05%	0.014%
277	13.713	13.705	13.720	VV	411	2457	0.03%	0.010%
278	13.746	13.720	13.753	VV	341	5359	0.08%	0.021%
279	13.774	13.753	13.799	VV	513	9088	0.13%	0.036%
280	13.806	13.799	13.813	VV	281	1464	0.02%	0.006%
281	13.821	13.813	13.826	VV	269	1005	0.01%	0.004%
282	13.888	13.826	13.919	VV	1056	32595	0.46%	0.131%
283	13.925	13.919	13.955	VV	598	10763	0.15%	0.043%
284	13.958	13.955	13.965	VV	381	2047	0.03%	0.008%
285	13.972	13.965	13.992	VV	381	4954	0.07%	0.020%
286	14.006	13.992	14.025	VV	458	6817	0.10%	0.027%
287	14.028	14.025	14.035	VV	273	1302	0.02%	0.005%
288	14.043	14.035	14.048	VV	411	2073	0.03%	0.008%
289	14.067	14.048	14.079	VV	509	6860	0.10%	0.027%
290	14.090	14.079	14.117	VV	531	9294	0.13%	0.037%
291	14.151	14.117	14.160	VV	803	14092	0.20%	0.056%
292	14.166	14.160	14.198	VV	661	12212	0.17%	0.049%
293	14.207	14.198	14.239	VV	634	10956	0.15%	0.044%
294	14.258	14.239	14.277	VV	633	10257	0.14%	0.041%
295	14.292	14.277	14.298	VV	716	7229	0.10%	0.029%
296	14.321	14.298	14.349	VV	896	23253	0.33%	0.093%
297	14.354	14.349	14.377	VV	750	8151	0.11%	0.033%
298	14.394	14.377	14.401	VV	661	7245	0.10%	0.029%
299	14.406	14.401	14.440	VV	680	8329	0.12%	0.033%

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300	14.446	14.440	14.478	VV	344	4241	0.06%	0.017%
301	14.514	14.478	14.527	VV	1123	18816	0.26%	0.075%
302	14.544	14.527	14.570	VV	1280	22579	0.32%	0.090%
303	14.593	14.570	14.621	VV	1466	23367	0.33%	0.094%
304	14.646	14.621	14.688	VV	809	18073	0.25%	0.072%
305	14.712	14.688	14.730	VV	887	14884	0.21%	0.060%
306	14.738	14.730	14.775	VV	690	13635	0.19%	0.055%
307	14.784	14.775	14.792	VV	322	3107	0.04%	0.012%
308	14.797	14.792	14.802	VV	281	1354	0.02%	0.005%
309	14.821	14.802	14.834	VV	666	8669	0.12%	0.035%
310	14.843	14.834	14.854	VV	594	5206	0.07%	0.021%
311	14.857	14.854	14.871	VV	561	3593	0.05%	0.014%
312	14.877	14.871	14.889	VV	237	1523	0.02%	0.006%
313	14.923	14.889	15.050	VV	9067	225040	3.15%	0.902%
314	15.076	15.050	15.113	VV	5332	83600	1.17%	0.335%
315	15.118	15.113	15.151	VV	736	11146	0.16%	0.045%
316	15.173	15.151	15.182	VV	578	8556	0.12%	0.034%
317	15.186	15.182	15.190	VV	637	2534	0.04%	0.010%
318	15.197	15.190	15.219	VV	612	8553	0.12%	0.034%
319	15.221	15.219	15.229	VV	474	2481	0.03%	0.010%
320	15.262	15.229	15.289	VV	1134	21077	0.30%	0.084%
321	15.305	15.289	15.320	VV	334	5205	0.07%	0.021%
322	15.328	15.320	15.330	VV	329	1436	0.02%	0.006%
323	15.371	15.330	15.382	VV	712	17040	0.24%	0.068%
324	15.389	15.382	15.409	VV	833	11214	0.16%	0.045%
325	15.412	15.409	15.424	VV	845	6554	0.09%	0.026%
326	15.428	15.424	15.435	VV	715	3594	0.05%	0.014%
327	15.451	15.435	15.469	VV	769	11438	0.16%	0.046%
328	15.474	15.469	15.495	VV	501	6584	0.09%	0.026%
329	15.520	15.495	15.538	VV	794	14438	0.20%	0.058%
330	15.562	15.538	15.594	VV	1479	29316	0.41%	0.117%
331	15.605	15.594	15.668	VV	839	22281	0.31%	0.089%
332	15.685	15.668	15.689	VV	272	2763	0.04%	0.011%
333	15.721	15.689	15.746	VV	913	20692	0.29%	0.083%
334	15.786	15.746	15.814	VV	874	24108	0.34%	0.097%
335	15.819	15.814	15.845	VV	398	3996	0.06%	0.016%
336	15.853	15.845	15.877	VV	294	2770	0.04%	0.011%
337	15.883	15.877	15.890	PV	190	1280	0.02%	0.005%
338	15.906	15.890	15.910	VV	201	1423	0.02%	0.006%
339	15.942	15.910	15.969	VV	878	19701	0.28%	0.079%
340	15.975	15.969	15.985	VV	533	3803	0.05%	0.015%
341	15.988	15.985	16.005	VV	380	3431	0.05%	0.014%
342	16.017	16.005	16.024	VV	465	3572	0.05%	0.014%
343	16.042	16.024	16.080	VV	880	18041	0.25%	0.072%
344	16.085	16.080	16.096	VV	364	2265	0.03%	0.009%
345	16.122	16.096	16.168	VV	1914	34196	0.48%	0.137%
346	16.176	16.168	16.195	VV	508	6189	0.09%	0.025%
347	16.225	16.195	16.271	VV	897	31157	0.44%	0.125%
348	16.287	16.271	16.304	VV	741	10504	0.15%	0.042%
349	16.331	16.304	16.337	VV	538	9357	0.13%	0.037%
350	16.347	16.337	16.356	VV	632	5622	0.08%	0.023%
351	16.361	16.356	16.373	VV	482	4073	0.06%	0.016%

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352	16.419	16.373	16.447	VV	942	27340	0.38%	0.110%
353	16.475	16.447	16.482	VV	981	13627	0.19%	0.055%
354	16.505	16.482	16.524	VV	1822	32268	0.45%	0.129%
355	16.547	16.524	16.574	VV	2936	45794	0.64%	0.183%
356	16.584	16.574	16.649	VV	659	21869	0.31%	0.088%
357	16.669	16.649	16.727	VV	422	9283	0.13%	0.037%
358	16.739	16.727	16.743	VV	141	1141	0.02%	0.005%
359	16.755	16.743	16.779	VV	296	2319	0.03%	0.009%
360	16.812	16.779	16.838	VV	693	12436	0.17%	0.050%
361	16.843	16.838	16.858	PV	252	1136	0.02%	0.005%
362	16.876	16.858	16.906	PV	511	7876	0.11%	0.032%
363	16.913	16.906	16.926	VV	368	3115	0.04%	0.012%
364	16.952	16.926	16.985	VV	2191	31771	0.45%	0.127%
365	16.991	16.985	17.013	VV	270	3307	0.05%	0.013%
366	17.034	17.013	17.050	VV	461	4576	0.06%	0.018%
367	17.075	17.050	17.099	VV	547	9356	0.13%	0.037%
368	17.114	17.099	17.127	VV	383	3761	0.05%	0.015%
369	17.159	17.127	17.186	VV	1336	23635	0.33%	0.095%
370	17.192	17.186	17.204	VV	455	4199	0.06%	0.017%
371	17.232	17.204	17.279	VV	1146	21954	0.31%	0.088%
372	17.291	17.279	17.297	VV	273	2136	0.03%	0.009%
373	17.309	17.297	17.314	VV	271	2128	0.03%	0.009%
374	17.324	17.314	17.328	VV	430	2806	0.04%	0.011%
375	17.386	17.328	17.415	VV	3210	61029	0.86%	0.244%
376	17.422	17.415	17.429	VV	323	2092	0.03%	0.008%
377	17.433	17.429	17.446	VV	260	2129	0.03%	0.009%
378	17.477	17.446	17.518	VV	2003	35595	0.50%	0.143%
379	17.524	17.518	17.565	VV	267	6454	0.09%	0.026%
380	17.594	17.565	17.614	VV	267	4168	0.06%	0.017%
381	17.680	17.614	17.700	PV	669	11966	0.17%	0.048%
382	17.708	17.700	17.713	VV	240	1440	0.02%	0.006%
383	17.748	17.713	17.784	VV	2594	59448	0.83%	0.238%
384	17.808	17.784	17.877	VV	3391	59067	0.83%	0.237%
385	17.904	17.877	17.917	PV	269	3684	0.05%	0.015%
386	17.949	17.917	17.961	VV	412	7946	0.11%	0.032%
387	17.981	17.961	17.994	VV	362	5745	0.08%	0.023%
388	18.025	17.994	18.047	VV	389	9359	0.13%	0.037%
389	18.072	18.047	18.112	VV	581	12718	0.18%	0.051%
390	18.132	18.112	18.141	PV	250	2650	0.04%	0.011%
391	18.215	18.141	18.239	PV	3148	47907	0.67%	0.192%

Sum of corrected areas: 24961894

Aromatic EPH 102324.M Sat Nov 09 03:29:50 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SW	SDG No.:	P4718
Lab Sample ID:	P4718-04	Matrix:	Water
Analytical Method:	NJEPH	% Solid:	0
Sample Wt/Vol:	970 Units: mL	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :	SW3510		

Prep Date :	Date Analyzed :	Prep Batch ID
11/09/24 08:38	11/11/24 17:10	PB164847

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	5.94	U	1	5.94	30.9	ug/l	FC067697.D
Aliphatic C12-C16	Aliphatic C12-C16	3.72	U	1	3.72	20.6	ug/l	FC067697.D
Aliphatic C16-C21	Aliphatic C16-C21	5.30	U	1	5.30	30.9	ug/l	FC067697.D
Aliphatic C21-C28	Aliphatic C21-C28	9.25	U	1	9.25	41.2	ug/l	FC067697.D
Aliphatic C28-C40	Aliphatic C28-C40	17.5	U	1	17.5	61.9	ug/l	FC067697.D
Aromatic C10-C12	Aromatic C10-C12	5.65	J	1	3.42	20.6	ug/l	FD048701.D
Aromatic C12-C16	Aromatic C12-C16	3.80	U	1	3.80	30.9	ug/l	FD048701.D
Aromatic C16-C21	Aromatic C16-C21	29.1	J	1	13.1	51.5	ug/l	FD048701.D
Aromatic C21-C36	Aromatic C21-C36	37.7	J	1	26.0	82.5	ug/l	FD048701.D
Total AliphaticEPH	Total AliphaticEPH	41.7	U		41.7	186	ug/l	
Total AromaticEPH	Total AromaticEPH	72.5	J		46.3	186	ug/l	
Total EPH	Total EPH	88.0	U		88.0	371	ug/l	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SW	SDG No.:	P4718
Lab Sample ID:	P4718-04	Matrix:	Water
Analytical Method:	NJEPH	% Solid:	0
Sample Wt/Vol:	970 Units: mL	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :	SW3510		

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067697.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	5.94	U	5.94	30.9	ug/l
Aliphatic C12-C16	Aliphatic C12-C16	3.72	U	3.72	20.6	ug/l
Aliphatic C16-C21	Aliphatic C16-C21	5.30	U	5.30	30.9	ug/l
Aliphatic C21-C28	Aliphatic C21-C28	9.25	U	9.25	41.2	ug/l
Aliphatic C28-C40	Aliphatic C28-C40	17.5	U	17.5	61.9	ug/l
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	49.8		40 - 140	100%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	P4718-04	Acq On:	11 Nov 2024 17:10
Client Sample ID:	WB-307-SW	Operator:	YP/AJ
Data file:	FC067697.D	Misc:	
Instrument:	FID_C	ALS Vial:	14
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.170	6.450	120461	0.889	300	ug/ml
Aliphatic C12-C16	6.451	9.840	77247	0.587	200	ug/ml
Aliphatic C16-C21	9.841	13.198	96418	0.758	300	ug/ml
Aliphatic C21-C28	13.199	16.853	0	0	400	ug/ml
Aliphatic C28-C40	16.854	21.695	233456	2.309	600	ug/ml
Aliphatic EPH	3.170	21.695	527582	4.543		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.932	12.932	5378094	49.8		ug/ml
Aliphatic C9-C28	3.170	16.853	294126	2.234	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067697.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 17:10
Operator : YP/AJ
Sample : P4718-04
Misc :
ALS Vial : 14 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SW

Integration File: autoint1.e
Quant Time: Nov 11 20:45:29 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
12) S 1-chlorooctadecane (S...	12.932	5378094	49.803 ug/ml
Spiked Amount 50.000		Recovery = 99.61%	
Target Compounds			

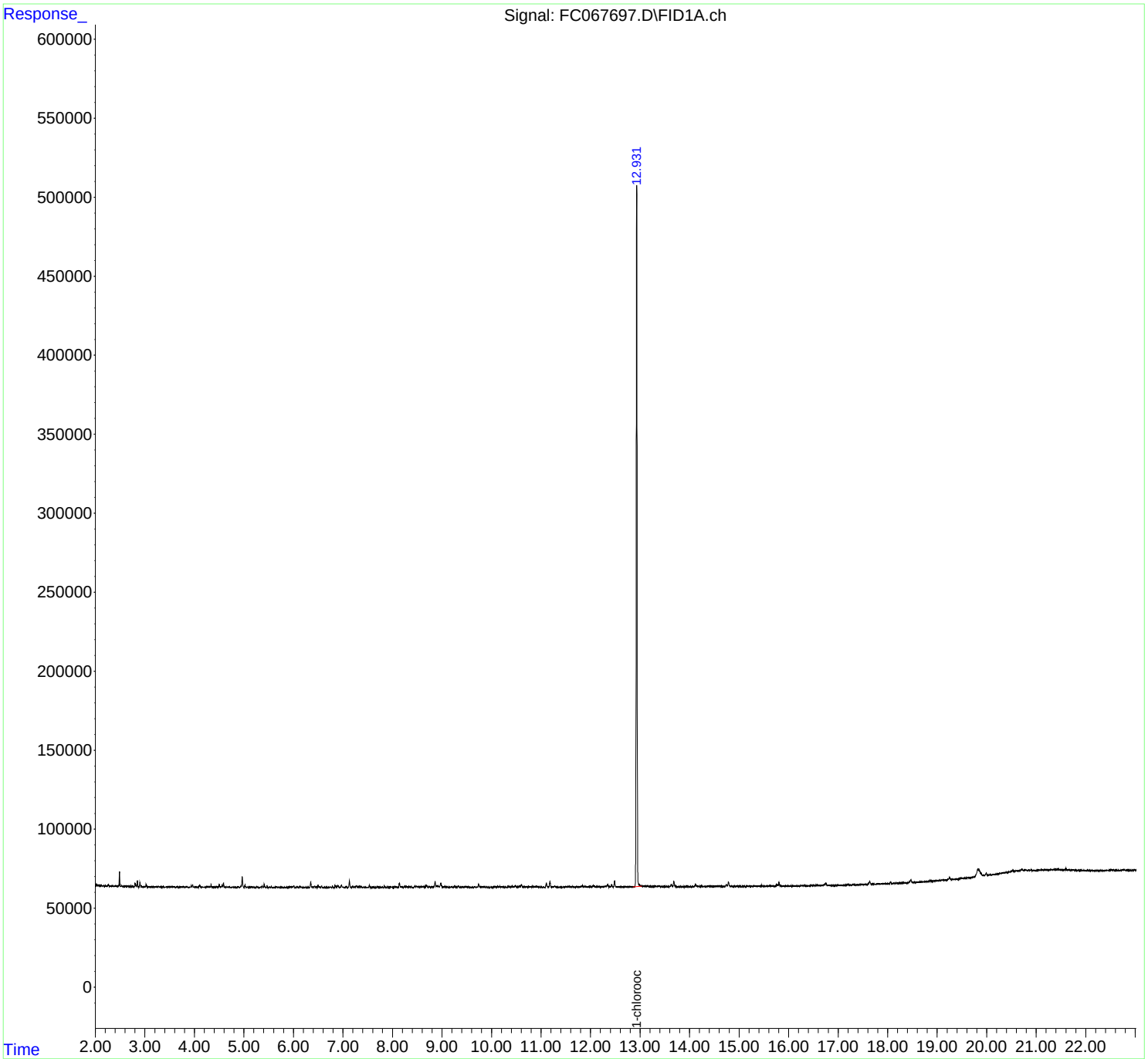
(f)=RT Delta > 1/2 Window (m)=manual int.

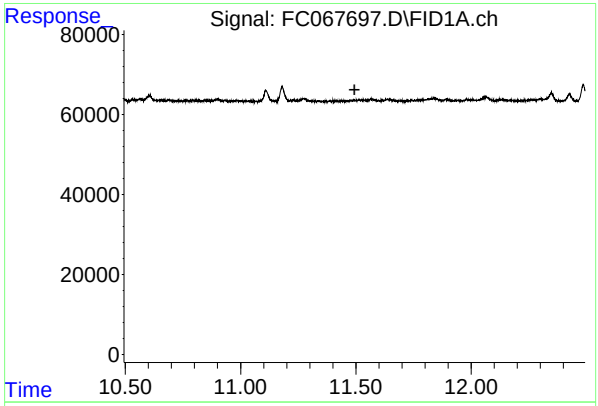
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067697.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 17:10
Operator : YP/AJ
Sample : P4718-04
Misc :
ALS Vial : 14 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SW

Integration File: autoint1.e
Quant Time: Nov 11 20:45:29 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

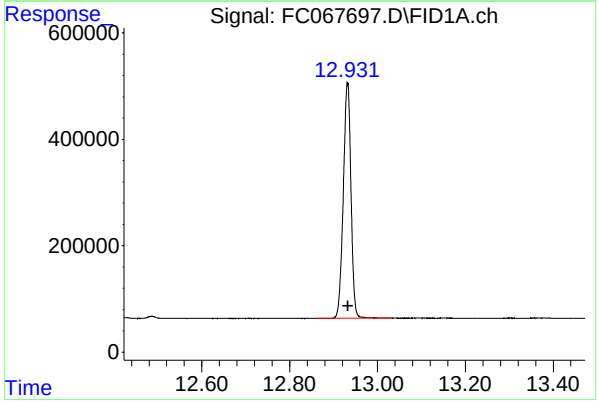




#9 ortho-Terphenyl (SURR)

R.T.: 0.000 min
Exp R.T. : 11.494 min
Response: 0
Conc: N.D.

Instrument :
FID_C
ClientSampleId :
WB-307-SW



#12 1-chlorooctadecane (SURR)

R.T.: 12.932 min
Delta R.T.: -0.001 min
Response: 5378094
Conc: 49.80 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067697.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 17:10
Sample : P4718-04
Misc :
ALS Vial : 14 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.966	4.844	5.004	BV	6651	86580	1.61%	1.466%
2	6.350	6.295	6.377	BB	3242	33881	0.63%	0.574%
3	7.131	7.084	7.155	BB	4150	42856	0.80%	0.726%
4	8.862	8.832	8.882	BV	3358	34391	0.64%	0.582%
5	11.180	11.155	11.209	BB	3570	46203	0.86%	0.782%
6	12.486	12.460	12.530	BB	4036	50215	0.93%	0.850%
7	12.932	12.860	13.035	BB	442777	5378094	100.00%	91.067%
8	19.827	19.724	19.939	BB	4758	233456	4.34%	3.953%
			Sum of corrected areas:			5905676		

Aliphatic EPH 102324.M Tue Nov 12 01:27:24 2024

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Fax : 908 789 8922

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	11/04/24
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	11/05/24
Client Sample ID:	WB-307-SW	SDG No.:	P4718
Lab Sample ID:	P4718-04	Matrix:	Water
Analytical Method:	NJEPH	% Solid:	0
Sample Wt/Vol:	970 Units: mL	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :	SW3510		

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048701.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	5.65	J	3.42	20.6	ug/l
Aromatic C12-C16	Aromatic C12-C16	3.80	U	3.80	30.9	ug/l
Aromatic C16-C21	Aromatic C16-C21	29.1	J	13.1	51.5	ug/l
Aromatic C21-C36	Aromatic C21-C36	37.7	J	26.0	82.5	ug/l
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	60.1		40 - 140	120%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	61.2		40 - 140	122%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	58.0		40 - 140	116%	SPK: 50

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Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	P4718-04	Acq On:	11 Nov 2024 17:10
Client Sample ID:	WB-307-SW	Operator:	YP/AJ
Data file:	FD048701.D	Misc:	
Instrument:	FID_D	ALS Vial:	65
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.090	5.808	483118	2.742	200	ug/ml
Aromatic C12-C16	5.809	8.414	268910	1.517	300	ug/ml
Aromatic C16-C21	8.415	12.677	2309075	14.094	500	ug/ml
Aromatic C21-C36	12.678	18.084	2795519	18.306	800	ug/ml
Aromatic EPH	4.090	18.084	5856622	36.659		ug/ml
2-Bromonaphthalene (SURR)	7.370	7.370	9127435	60.14		ug/ml
2-Flurobiphenyl (SURR)	8.220	8.220	6008831	61.19		ug/ml
ortho-Terphenyl (SURR)	11.258	11.258	9885211	58.03		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048701.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 17:10
Operator : YP/AJ
Sample : P4718-04
Misc :
ALS Vial : 65 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SW

Integration File: autoint1.e
Quant Time: Nov 11 20:47:06 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
4) S 2-Bromonaphthalene (S...	7.370	9127435	60.136 ug/ml
Spiked Amount 50.000		Recovery = 120.27%	
6) S 2-Flurobiphenyl (SURR)	8.220	6008831	61.195 ug/ml
Spiked Amount 50.000 Range 0 - 131		Recovery = 122.39%	
11) S ortho-Terphenyl (SURR)	11.258	9885211	58.032 ug/ml
Spiked Amount 50.000		Recovery = 116.06%	
Target Compounds			

(f)=RT Delta > 1/2 Window (m)=manual int.

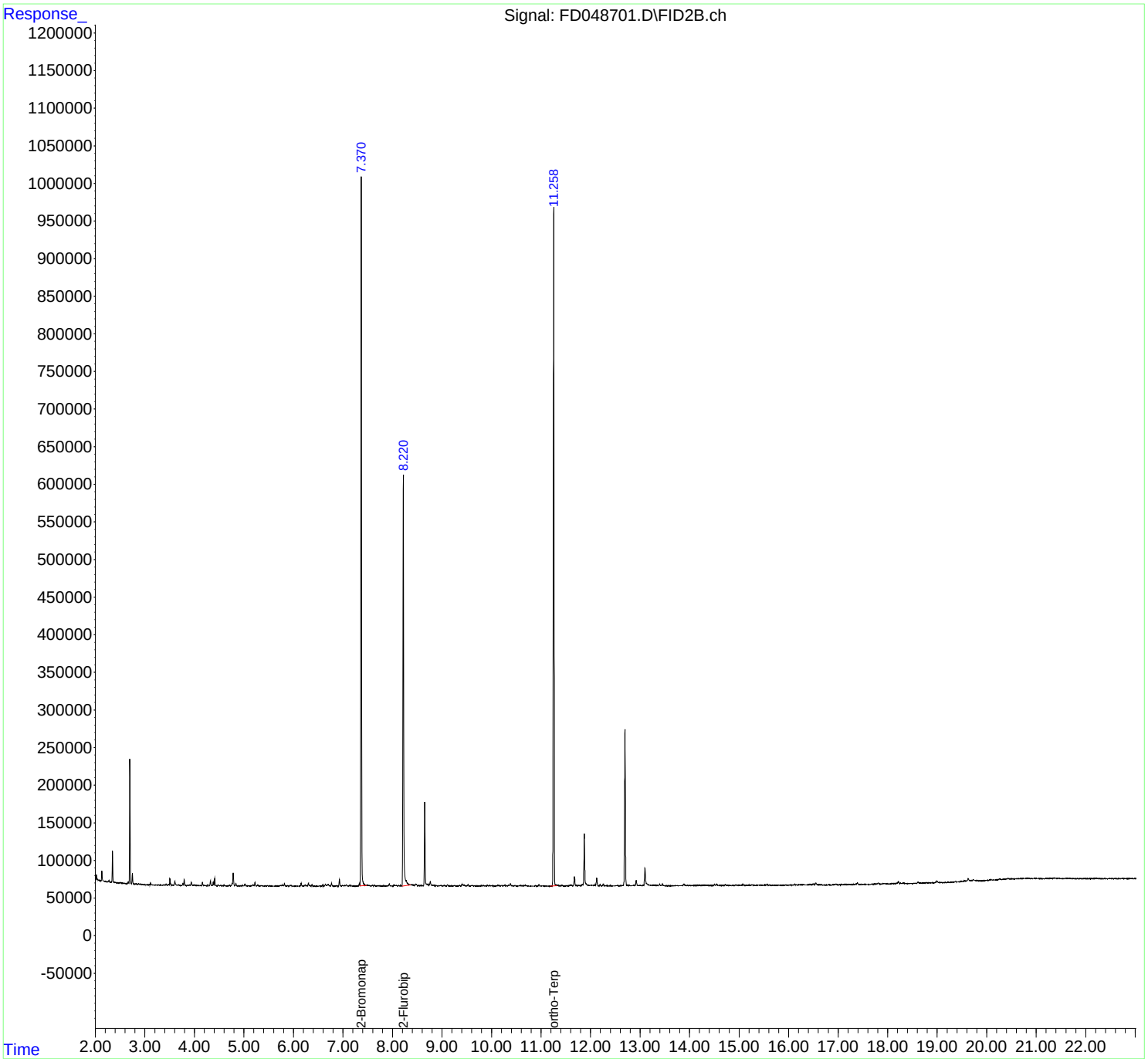
Quantitation Report (QT Reviewed)

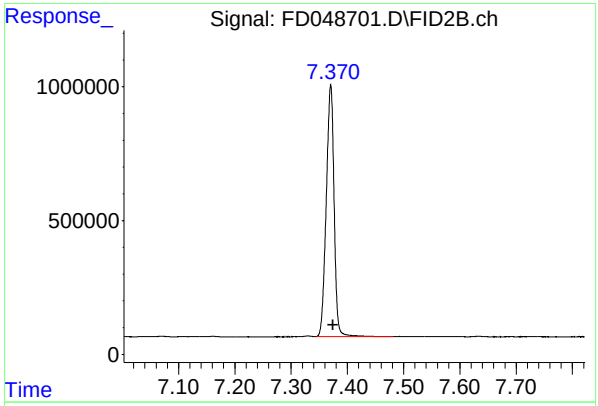
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048701.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 17:10
Operator : YP/AJ
Sample : P4718-04
Misc :
ALS Vial : 65 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SW

Integration File: autoint1.e
Quant Time: Nov 11 20:47:06 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

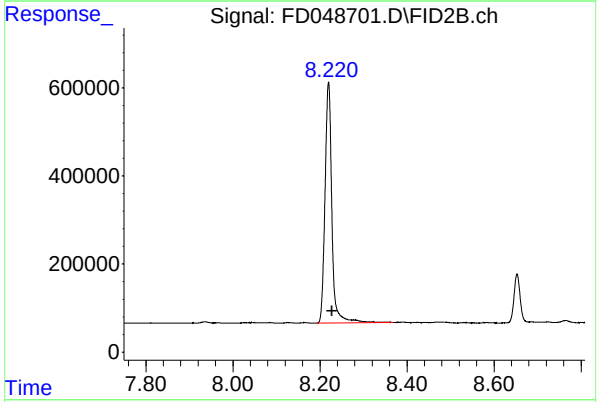




#4 2-Bromonaphthalene (SURR)

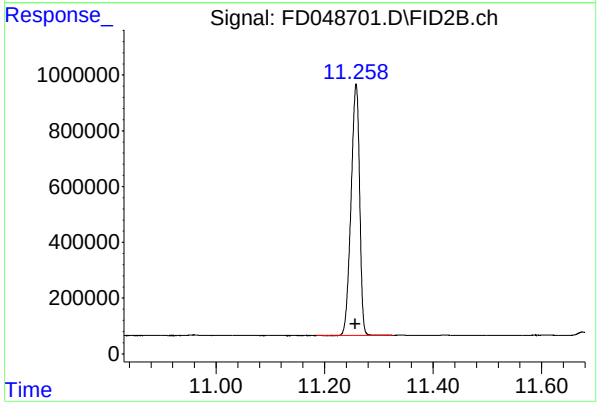
R.T.: 7.370 min
Delta R.T.: -0.004 min
Response: 9127435
Conc: 60.14 ug/ml

Instrument :
FID_D
ClientSampleId :
WB-307-SW



#6 2-Flurobiphenyl (SURR)

R.T.: 8.220 min
Delta R.T.: -0.008 min
Response: 6008831
Conc: 61.19 ug/ml



#11 ortho-Terphenyl (SURR)

R.T.: 11.258 min
Delta R.T.: 0.000 min
Response: 9885211
Conc: 58.03 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048701.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 17:10
Sample : P4718-04
Misc :
ALS Vial : 65 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.505	3.491	3.571	VB	8956	91243	0.92%	0.293%
2	3.605	3.574	3.658	BV	5261	60249	0.61%	0.193%
3	3.794	3.778	3.838	VV	8187	74778	0.76%	0.240%
4	3.938	3.888	3.964	BV	4021	50659	0.51%	0.163%
5	4.325	4.291	4.361	PV	6723	76954	0.78%	0.247%
6	4.381	4.361	4.394	VV	5039	47510	0.48%	0.152%
7	4.410	4.394	4.461	VV	9917	95043	0.96%	0.305%
8	4.783	4.728	4.814	VV	17134	215717	2.18%	0.692%
9	5.224	5.204	5.251	VV	5076	47894	0.48%	0.154%
10	6.156	5.994	6.179	BV	4102	46201	0.47%	0.148%
11	6.303	6.285	6.324	PV	3906	36065	0.36%	0.116%
12	6.770	6.741	6.821	VB	3887	53110	0.54%	0.170%
13	6.930	6.897	6.971	PV	9088	95970	0.97%	0.308%
14	7.330	7.254	7.344	PV	2960	37564	0.38%	0.121%
15	7.370	7.344	7.481	VV	947930	9127435	92.33%	29.297%
16	8.220	8.191	8.368	PV	550716	6008831	60.79%	19.287%
17	8.653	8.612	8.701	PV	109807	1106259	11.19%	3.551%
18	8.764	8.739	8.791	VV	5290	68246	0.69%	0.219%
19	11.258	11.184	11.326	BV	900995	9885211	100.00%	31.729%
20	11.676	11.635	11.728	VV	12265	152691	1.54%	0.490%
21	11.875	11.847	11.971	VB	68834	848910	8.59%	2.725%
22	12.124	12.078	12.178	BV	10303	132969	1.35%	0.427%
23	12.696	12.641	12.733	PV	206456	2338717	23.66%	7.507%
24	12.921	12.774	12.958	BV	7235	88666	0.90%	0.285%
25	13.097	13.031	13.218	BB	23038	368136	3.72%	1.182%

Sum of corrected areas: 31155027

Aromatic EPH 102324.M Tue Nov 12 03:26:51 2024

CALIBRATION SUMMARY

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

Inital Calibration Report for SequenceID : FC102324AL

AreaCount

Parameter Range	FC067506.D	FC067507.D	FC067508.D	FC067509.D	FC067510.D	
Aliphatic C9-C12	39022992.000	19933185.000	8061570.000	4198329.000	2101198.000	
Aliphatic C12-C16	25467967.000	12990634.000	5208245.000	2702045.000	1358541.000	
Aliphatic C16-C21	36713606.000	18782701.000	7526010.000	3934678.000	1979840.000	
Aliphatic C21-C28	45946180.000	23609090.000	9458827.000	4951672.000	2510279.000	
Aliphatic C28-C40	56250650.000	29316600.000	11954663.000	6283522.000	3289360.000	
Aliphatic EPH	203401395.000	104632210.000	42209315.000	22070246.000	11239218.000	

AVG Response Factor

Parameter Range	AVG RF	% RSD				
Aliphatic C9-C12	135469.6413332	3.265				
Aliphatic C12-C16	131681.73	2.772				
Aliphatic C16-C21	127235.0919996	3.261				
Aliphatic C21-C28	120090.3975	3.678				
Aliphatic C28-C40	101093.1949996	6.133				
Aliphatic EPH	118799.912222	4.081				

Concentration

Parameter Range	FC067506.D	FC067507.D	FC067508.D	FC067509.D	FC067510.D	
Aliphatic C9-C12	300.000	150.000	60.000	30.000	15.000	
Aliphatic C12-C16	200.000	100.000	40.000	20.000	10.000	
Aliphatic C16-C21	300.000	150.000	60.000	30.000	15.000	
Aliphatic C21-C28	400.000	200.000	80.000	40.000	20.000	
Aliphatic C28-C40	600.000	300.000	120.000	60.000	30.000	
Aliphatic EPH	1800.000	900.000	360.000	180.000	90.000	

Response Factor

Parameter Range	FC067506.D	FC067507.D	FC067508.D	FC067509.D	FC067510.D	
Aliphatic C9-C12	130076.640000	132887.900000	134359.500000	139944.300000	140079.866666	
Aliphatic C12-C16	127339.835000	129906.340000	130206.125000	135102.250000	135854.100000	
Aliphatic C16-C21	122378.686666	125218.006666	125433.500000	131155.933333	131989.333333	

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

Inital Calibration Report for SequenceID : FC102324AL

Aliphatic C21-C28	114865.450000	118045.450000	118235.337500	123791.800000	125513.950000	
Aliphatic C28-C40	93751.083333	97722.000000	99622.191666	104725.366666	109645.333333	
Aliphatic EPH	113000.775000	116258.011111	117248.097222	122612.477777	124880.200000	

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067506.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 15:12
Operator : YP/AJ
Sample : 100 PPM ALIPHATIC HC STD1
Misc :
ALS Vial : 11 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1

Integration File: autoint1.e
Quant Time: Oct 23 17:19:34 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:19:01 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9)	S ortho-Terphenyl (SURR)	11.506	14037783	98.632 ug/ml
Spiked Amount	50.000		Recovery =	197.26%
12)	S 1-chlorooctadecane (S...	12.941	10490435	99.221 ug/ml
Spiked Amount	50.000		Recovery =	198.44%
	Target Compounds			
1)	T n-Nonane (C9)	3.278	12920314	98.296 ug/ml
2)	T n-Decane (C10)	4.343	13085907	98.393 ug/ml
3)	T A~Naphthalene (C11.7)	5.922	14394132	98.923 ug/ml
4)	T n-Dodecane (C12)	6.360	13016771	98.452 ug/ml
5)	T A~2-methylnaphthalene...	6.979	13836866	99.334 ug/ml
6)	T n-Tetradecane (C14)	8.152	12659193	98.737 ug/ml
7)	T n-Hexadecane (C16)	9.751	12808774	99.036 ug/ml
8)	T n-Octadecane (C18)	11.193	12738874	98.786 ug/ml
10)	T n-Eicosane (C20)	12.499	12105735	98.678 ug/ml
11)	T n-Heneicosane (C21)	13.110	11868997	98.838 ug/ml
13)	T n-Docosane (C22)	13.695	11751176	98.736 ug/ml
14)	T n-Tetracosane (C24)	14.797	11637443	98.776 ug/ml
15)	T n-Hexacosane (C26)	15.816	11410589	98.652 ug/ml
16)	T n-Octacosane (C28)	16.765	11146972	98.035 ug/ml
17)	T n-Tricontane (C30)	17.651	11224678	97.103 ug/ml
18)	T n-Dotriacontane (C32)	18.483	10806351	96.387 ug/ml
19)	T n-Tetratriacontane (C34)	19.263	9619727	96.453 ug/ml
20)	T n-Hexatriacontane (C36)	20.002	8494635	97.259 ug/ml
21)	T n-Octatriacontane (C38)	20.726	8112623	97.297 ug/ml
22)	T n-Tetracontane (C40)	21.614	7992636	97.524 ug/ml

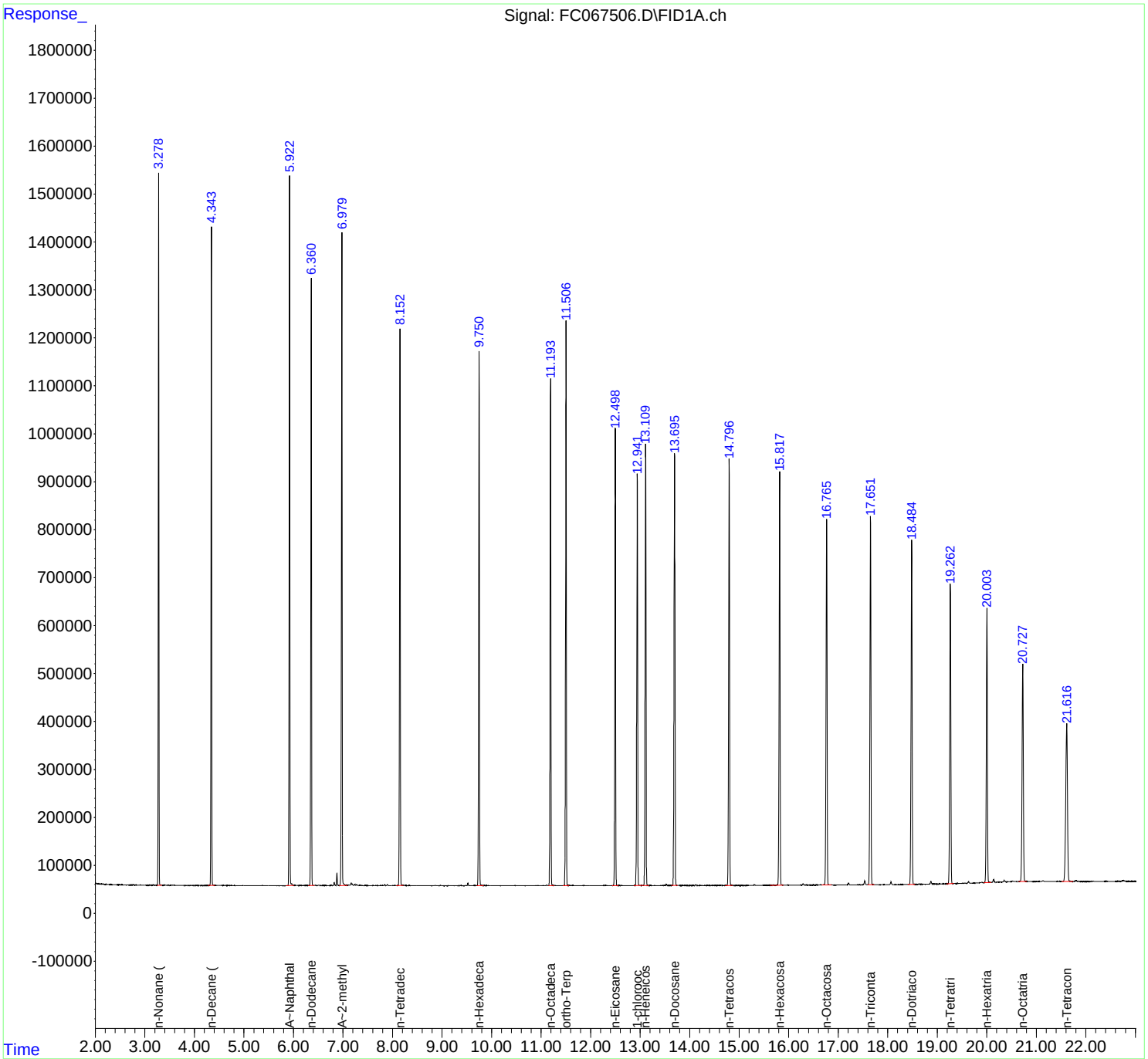
(f)=RT Delta > 1/2 Window (m)=manual int.

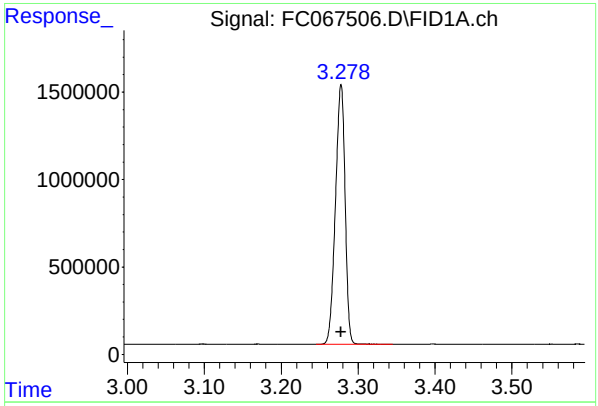
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067506.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 15:12
Operator : YP/AJ
Sample : 100 PPM ALIPHATIC HC STD1
Misc :
ALS Vial : 11 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1

Integration File: autoint1.e
Quant Time: Oct 23 17:19:34 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:19:01 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

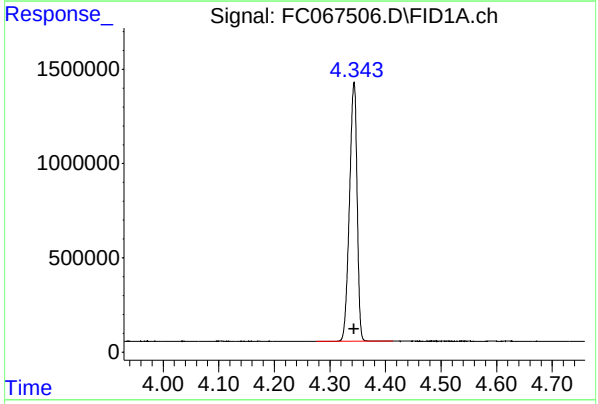




#1 n-Nonane (C9)

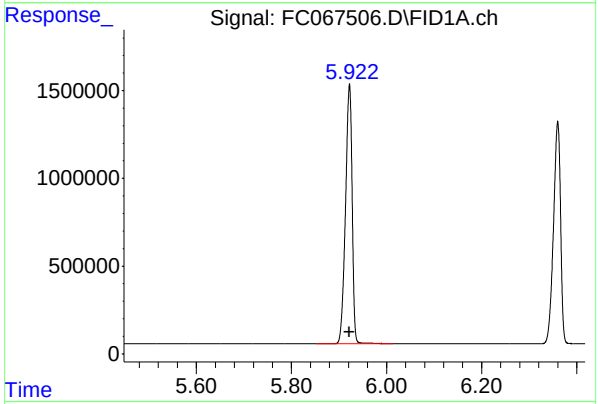
R.T.: 3.278 min
Delta R.T.: 0.000 min
Response: 12920314
Conc: 98.30 ug/ml

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1



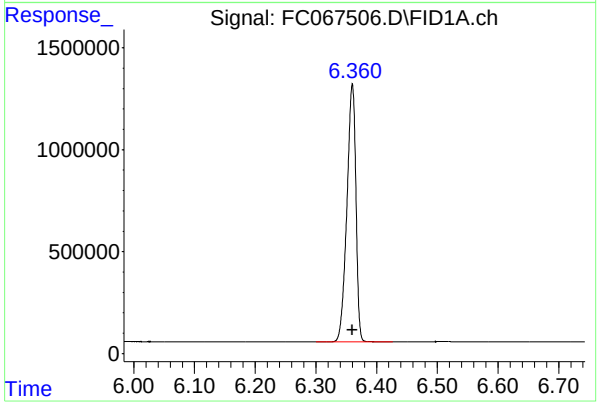
#2 n-Decane (C10)

R.T.: 4.343 min
Delta R.T.: 0.000 min
Response: 13085907
Conc: 98.39 ug/ml



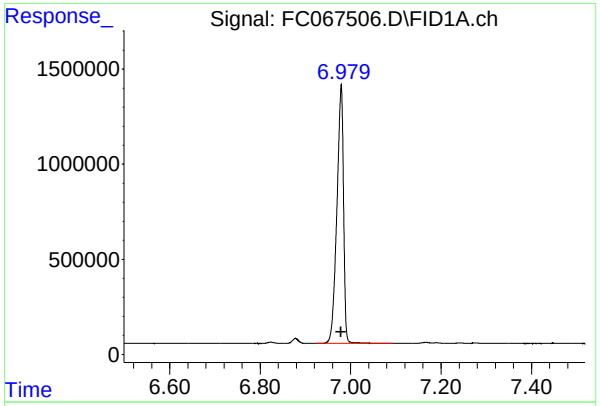
#3 A~Naphthalene (C11.7)

R.T.: 5.922 min
Delta R.T.: 0.000 min
Response: 14394132
Conc: 98.92 ug/ml



#4 n-Dodecane (C12)

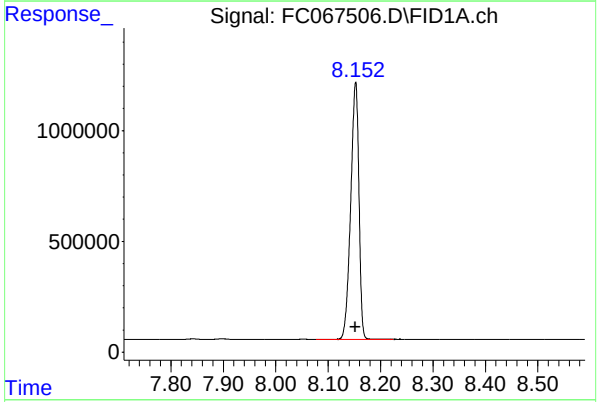
R.T.: 6.360 min
Delta R.T.: 0.000 min
Response: 13016771
Conc: 98.45 ug/ml



#5 A~2-methylnaphthalene (C12.89)

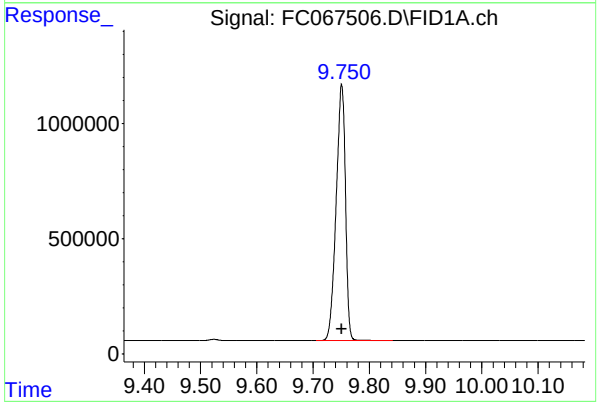
R.T.: 6.979 min
Delta R.T.: 0.000 min
Response: 13836866
Conc: 99.33 ug/ml

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1



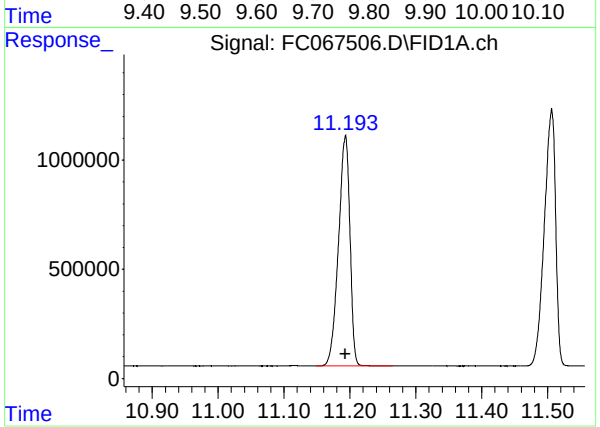
#6 n-Tetradecane (C14)

R.T.: 8.152 min
Delta R.T.: 0.000 min
Response: 12659193
Conc: 98.74 ug/ml



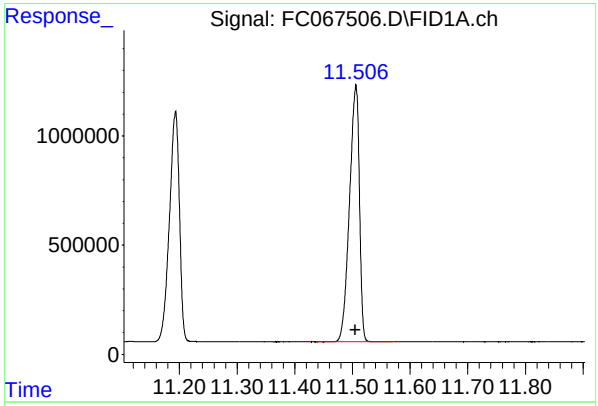
#7 n-Hexadecane (C16)

R.T.: 9.751 min
Delta R.T.: 0.000 min
Response: 12808774
Conc: 99.04 ug/ml



#8 n-Octadecane (C18)

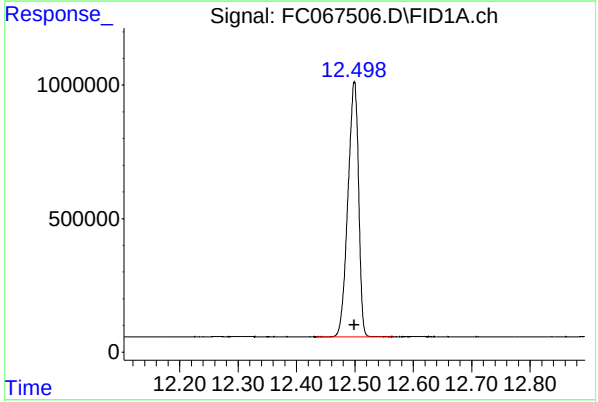
R.T.: 11.193 min
Delta R.T.: 0.000 min
Response: 12738874
Conc: 98.79 ug/ml



#9 ortho-Terphenyl (SURR)

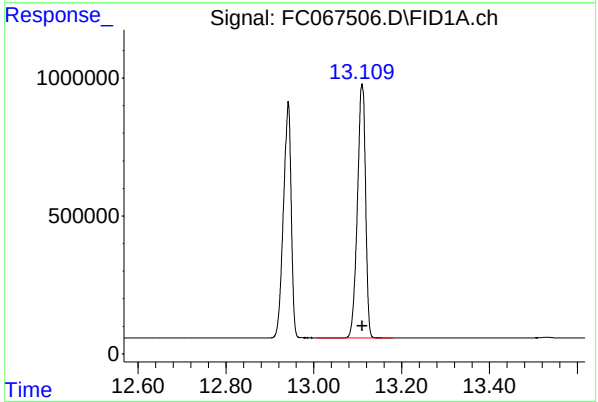
R.T.: 11.506 min
Delta R.T.: 0.000 min
Response: 14037783
Conc: 98.63 ug/ml

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1



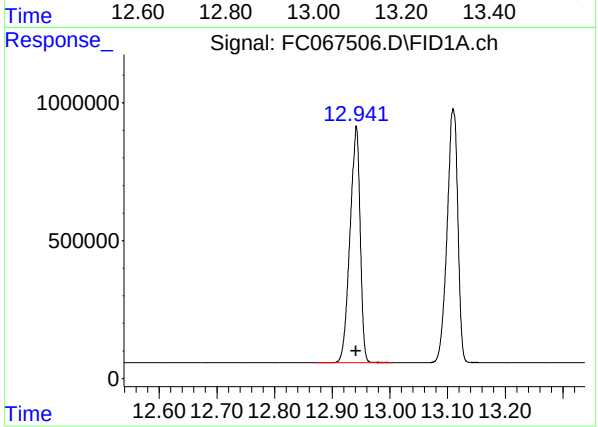
#10 n-Eicosane (C20)

R.T.: 12.499 min
Delta R.T.: 0.000 min
Response: 12105735
Conc: 98.68 ug/ml



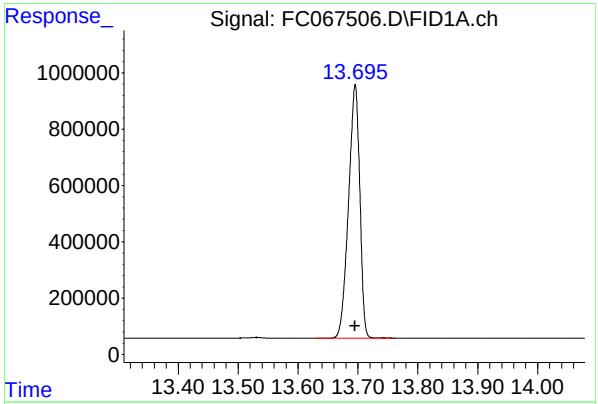
#11 n-Heneicosane (C21)

R.T.: 13.110 min
Delta R.T.: 0.000 min
Response: 11868997
Conc: 98.84 ug/ml



#12 1-chlorooctadecane (SURR)

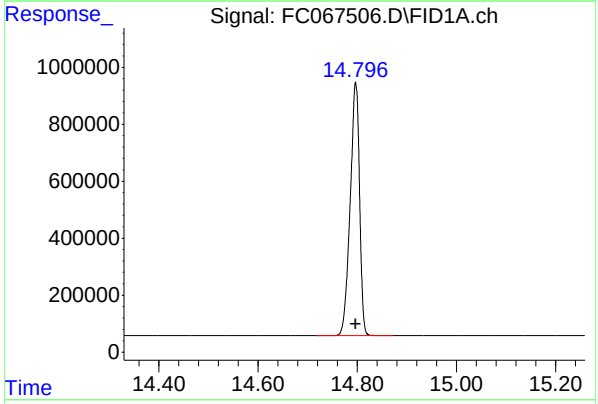
R.T.: 12.941 min
Delta R.T.: 0.000 min
Response: 10490435
Conc: 99.22 ug/ml



#13 n-Docosane (C22)

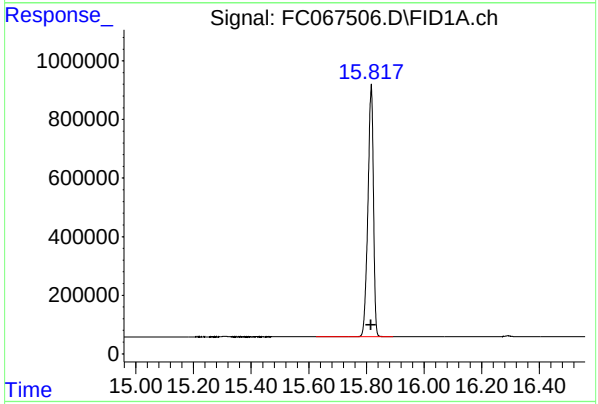
R.T.: 13.695 min
Delta R.T.: 0.000 min
Response: 11751176
Conc: 98.74 ug/ml

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1



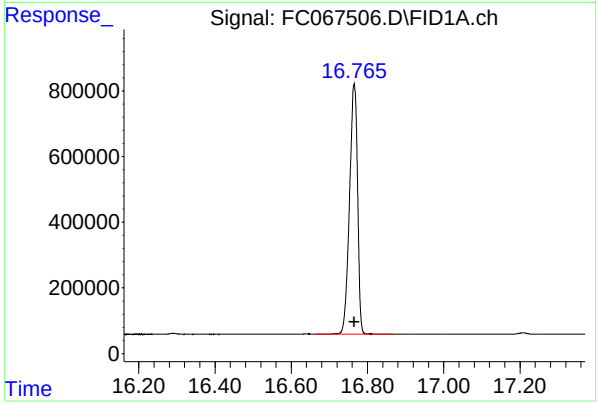
#14 n-Tetracosane (C24)

R.T.: 14.797 min
Delta R.T.: 0.000 min
Response: 11637443
Conc: 98.78 ug/ml



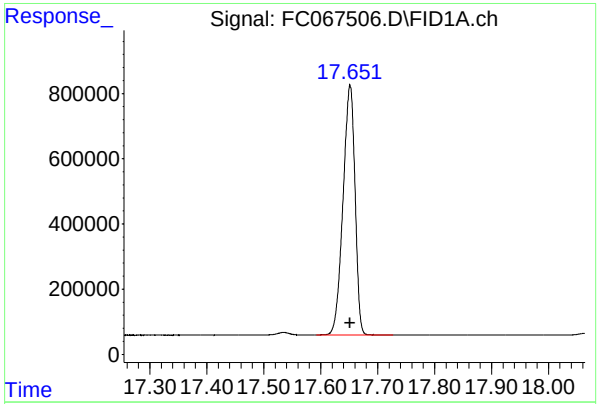
#15 n-Hexacosane (C26)

R.T.: 15.816 min
Delta R.T.: 0.000 min
Response: 11410589
Conc: 98.65 ug/ml



#16 n-Octacosane (C28)

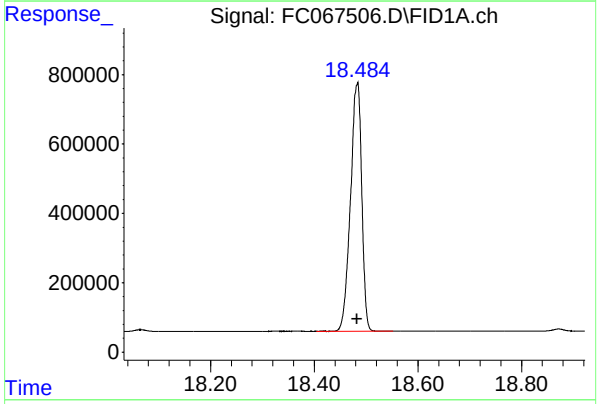
R.T.: 16.765 min
Delta R.T.: 0.000 min
Response: 11146972
Conc: 98.03 ug/ml



#17 n-Tricontane (C30)

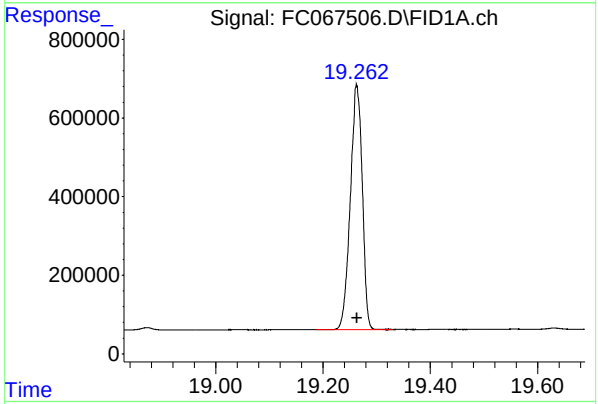
R.T.: 17.651 min
Delta R.T.: 0.000 min
Response: 11224678
Conc: 97.10 ug/ml

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1



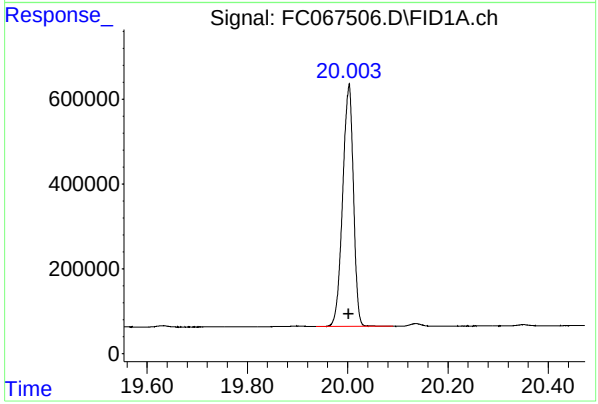
#18 n-Dotriacontane (C32)

R.T.: 18.483 min
Delta R.T.: 0.000 min
Response: 10806351
Conc: 96.39 ug/ml



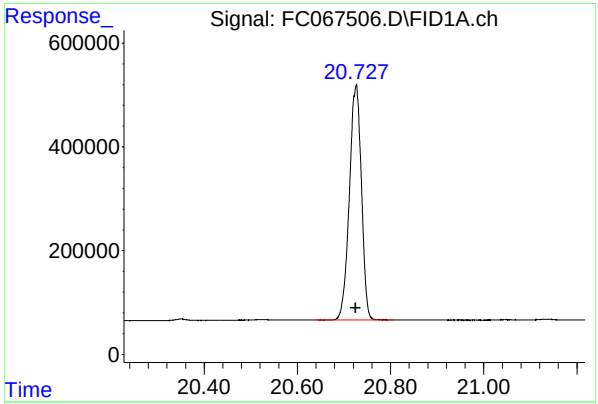
#19 n-Tetratriacontane (C34)

R.T.: 19.263 min
Delta R.T.: 0.000 min
Response: 9619727
Conc: 96.45 ug/ml



#20 n-Hexatriacontane (C36)

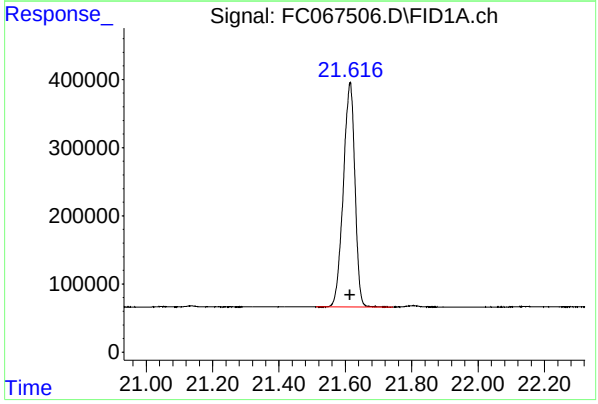
R.T.: 20.002 min
Delta R.T.: 0.000 min
Response: 8494635
Conc: 97.26 ug/ml



#21 n-Octatriacontane (C38)

R.T.: 20.726 min
Delta R.T.: 0.000 min
Response: 8112623
Conc: 97.30 ug/ml

Instrument :
FID_C
ClientSampleId :
100 PPM ALIPHATIC HC STD1



#22 n-Tetracontane (C40)

R.T.: 21.614 min
Delta R.T.: 0.000 min
Response: 7992636
Conc: 97.52 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067506.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 15:12
Sample : 100 PPM ALIPHATIC HC STD1
Misc :
ALS Vial : 11 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.278	3.245	3.345	BB	1482982	12920314	89.76%	5.044%
2	4.343	4.275	4.414	BB	1378444	13085907	90.91%	5.108%
3	5.922	5.852	6.014	BB	1478546	14394132	100.00%	5.619%
4	6.360	6.300	6.427	BB	1268307	13016771	90.43%	5.081%
5	6.979	6.924	7.094	BV	1345672	13836866	96.13%	5.402%
6	8.152	8.077	8.224	BB	1158926	12659193	87.95%	4.942%
7	9.751	9.705	9.842	BB	1114390	12808774	88.99%	5.000%
8	11.193	11.149	11.265	BV	1059950	12738874	88.50%	4.973%
9	11.506	11.437	11.570	BB	1165644	14037783	97.52%	5.480%
10	12.499	12.434	12.565	BB	956464	12105735	84.10%	4.726%
11	12.941	12.872	13.005	BB	861029	10490435	72.88%	4.095%
12	13.110	13.005	13.180	BB	919632	11868997	82.46%	4.633%
13	13.695	13.630	13.759	BB	900624	11751176	81.64%	4.587%
14	14.797	14.717	14.872	BB	888415	11637443	80.85%	4.543%
15	15.816	15.625	15.892	BB	863938	11410589	79.27%	4.454%
16	16.765	16.665	16.867	BB	761325	11146972	77.44%	4.352%
17	17.651	17.592	17.727	BB	765890	11224678	77.98%	4.382%
18	18.483	18.404	18.552	BB	712666	10806351	75.07%	4.219%
19	19.263	19.187	19.330	BB	619243	9619727	66.83%	3.755%
20	20.002	19.937	20.090	BB	565569	8494635	59.01%	3.316%
21	20.726	20.640	20.805	BB	451489	8112623	56.36%	3.167%
22	21.614	21.512	21.744	BB	329592	7992636	55.53%	3.120%
			Sum of corrected areas:			256160611		

Aliphatic EPH 102324.M Wed Oct 23 18:20:49 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067507.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 15:48
Operator : YP/AJ
Sample : 50 PPM ALIPHATIC HC STD2
Misc :
ALS Vial : 12 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2

Integration File: autoint1.e
Quant Time: Oct 23 17:21:14 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:19:01 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9) S	ortho-Terphenyl (SURR)	11.500	7186867	50.330 ug/ml
Spiked Amount	50.000		Recovery =	100.66%
12) S	1-chlorooctadecane (S...	12.937	5350584	50.403 ug/ml
Spiked Amount	50.000		Recovery =	100.81%
	Target Compounds			
1) T	n-Nonane (C9)	3.275	6596270	50.122 ug/ml
2) T	n-Decane (C10)	4.340	6686022	50.181 ug/ml
3) T	A~Naphthalene (C11.7)	5.918	7350672	50.344 ug/ml
4) T	n-Dodecane (C12)	6.356	6650893	50.202 ug/ml
5) T	A~2-methylnaphthalene...	6.974	7049073	50.402 ug/ml
6) T	n-Tetradecane (C14)	8.149	6466785	50.292 ug/ml
7) T	n-Hexadecane (C16)	9.747	6523849	50.293 ug/ml
8) T	n-Octadecane (C18)	11.188	6511575	50.329 ug/ml
10) T	n-Eicosane (C20)	12.495	6199533	50.355 ug/ml
11) T	n-Heneicosane (C21)	13.105	6071593	50.372 ug/ml
13) T	n-Docosane (C22)	13.691	6022373	50.399 ug/ml
14) T	n-Tetracosane (C24)	14.793	5967985	50.435 ug/ml
15) T	n-Hexacosane (C26)	15.812	5860085	50.441 ug/ml
16) T	n-Octacosane (C28)	16.761	5758647	50.429 ug/ml
17) T	n-Tricontane (C30)	17.647	5830292	50.290 ug/ml
18) T	n-Dotriacontane (C32)	18.477	5634053	50.168 ug/ml
19) T	n-Tetratriacontane (C34)	19.260	5024380	50.251 ug/ml
20) T	n-Hexatriacontane (C36)	19.998	4430530	50.483 ug/ml
21) T	n-Octatriacontane (C38)	20.720	4230730	50.491 ug/ml
22) T	n-Tetracontane (C40)	21.606	4166615	50.557 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

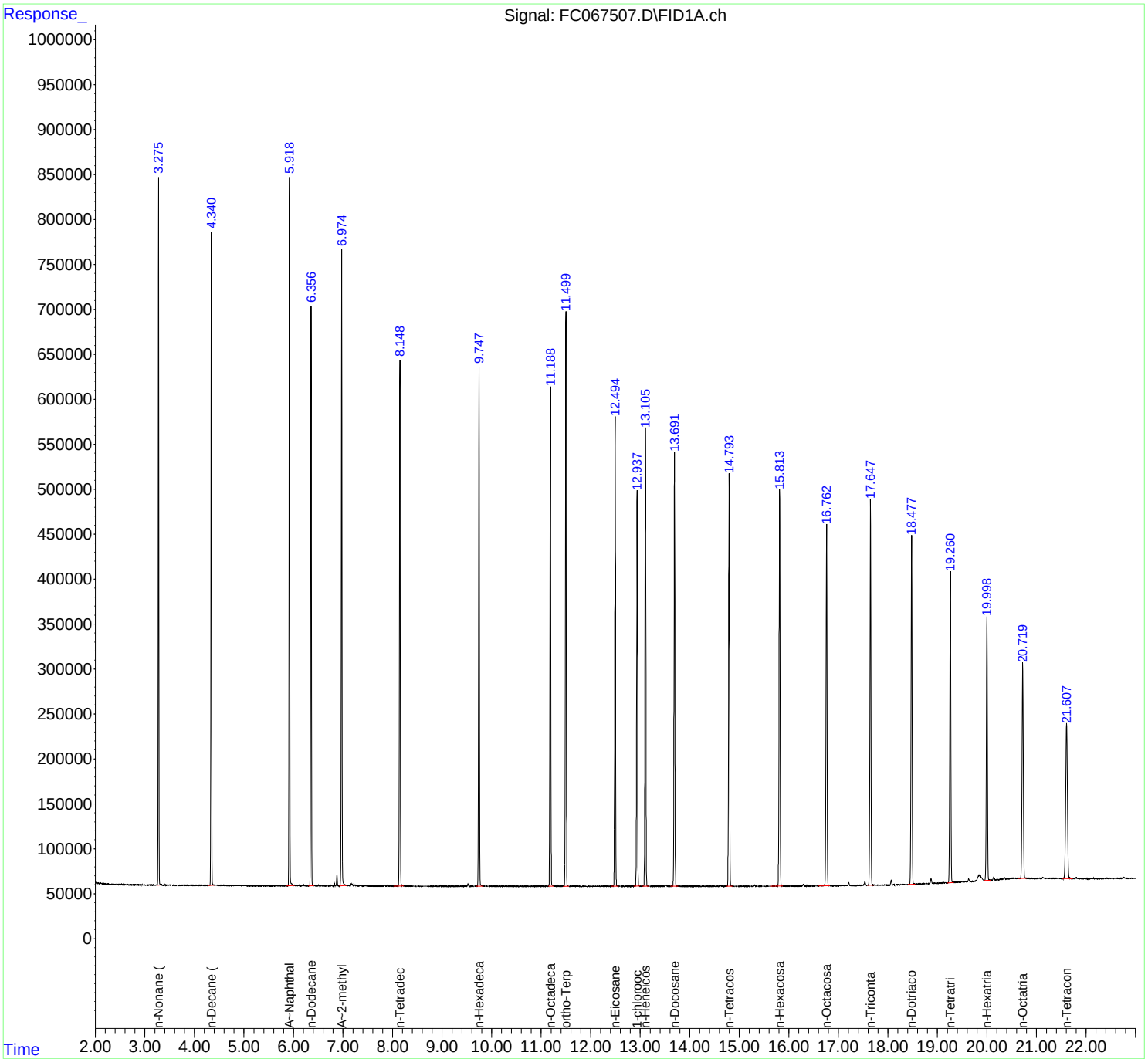
Quantitation Report (QT Reviewed)

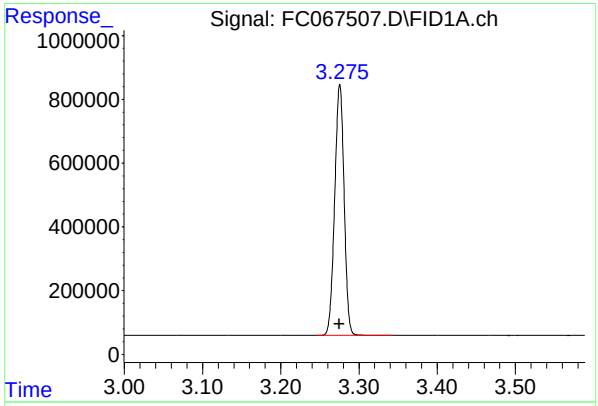
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067507.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 15:48
Operator : YP/AJ
Sample : 50 PPM ALIPHATIC HC STD2
Misc :
ALS Vial : 12 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2

Integration File: autoint1.e
Quant Time: Oct 23 17:21:14 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:19:01 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

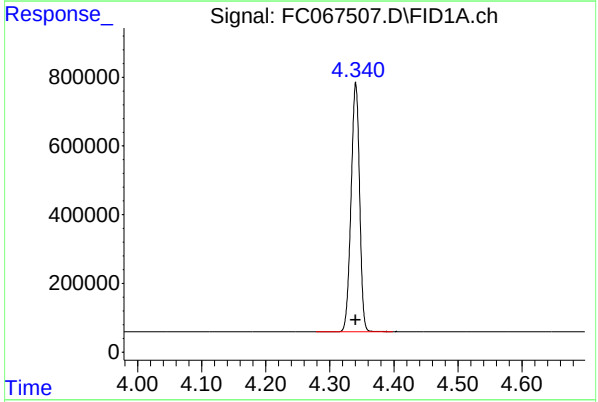




#1 n-Nonane (C9)

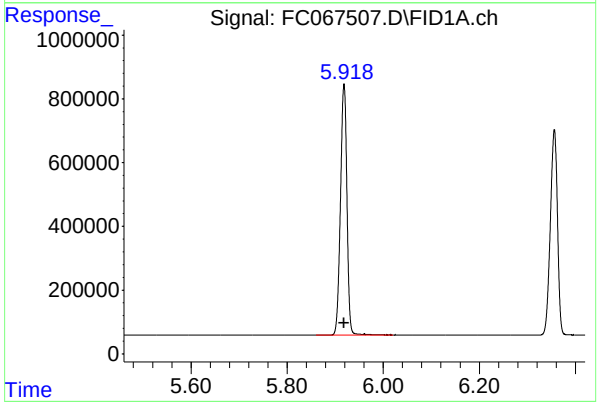
R.T.: 3.275 min
Delta R.T.: 0.000 min
Response: 6596270
Conc: 50.12 ug/ml

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2



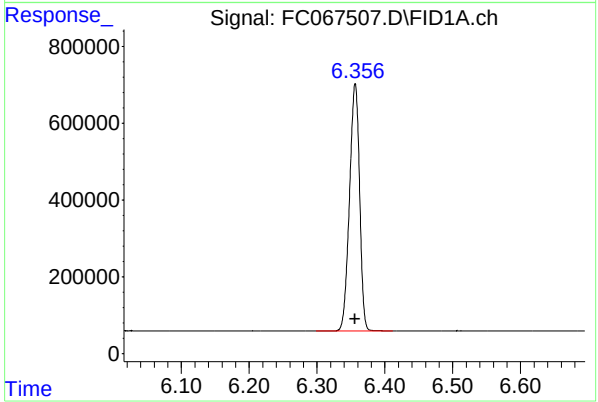
#2 n-Decane (C10)

R.T.: 4.340 min
Delta R.T.: 0.000 min
Response: 6686022
Conc: 50.18 ug/ml



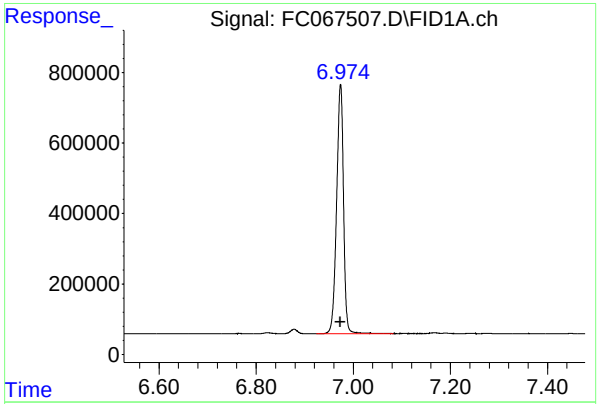
#3 A~Naphthalene (C11.7)

R.T.: 5.918 min
Delta R.T.: 0.000 min
Response: 7350672
Conc: 50.34 ug/ml



#4 n-Dodecane (C12)

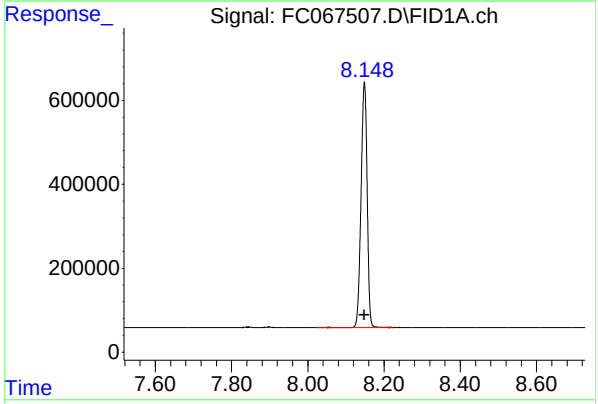
R.T.: 6.356 min
Delta R.T.: 0.000 min
Response: 6650893
Conc: 50.20 ug/ml



#5 A~2-methylnaphthalene (C12.89)

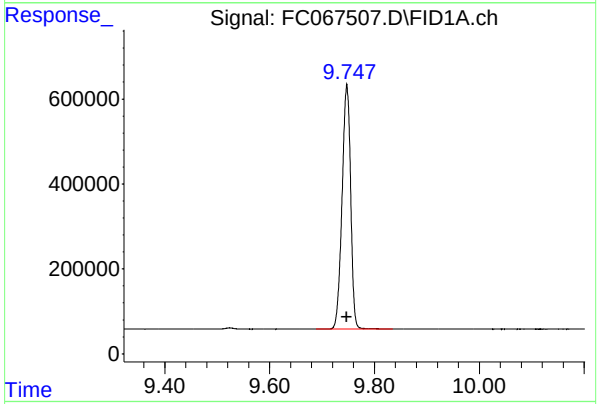
R.T.: 6.974 min
Delta R.T.: 0.000 min
Response: 7049073
Conc: 50.40 ug/ml

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2



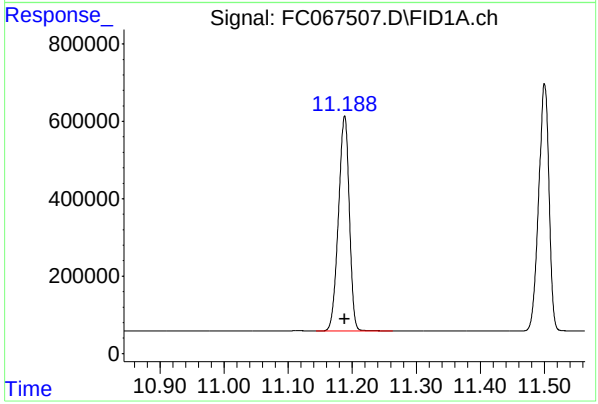
#6 n-Tetradecane (C14)

R.T.: 8.149 min
Delta R.T.: 0.000 min
Response: 6466785
Conc: 50.29 ug/ml



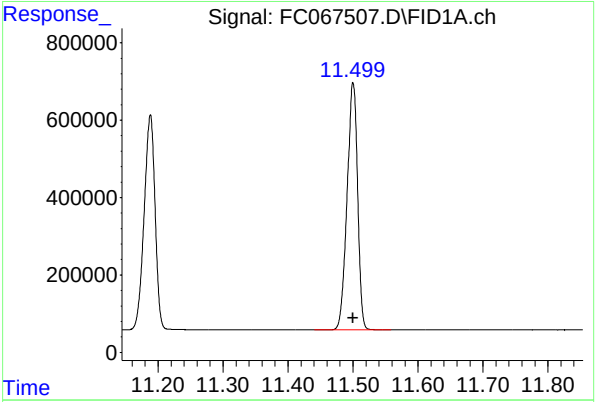
#7 n-Hexadecane (C16)

R.T.: 9.747 min
Delta R.T.: 0.000 min
Response: 6523849
Conc: 50.29 ug/ml



#8 n-Octadecane (C18)

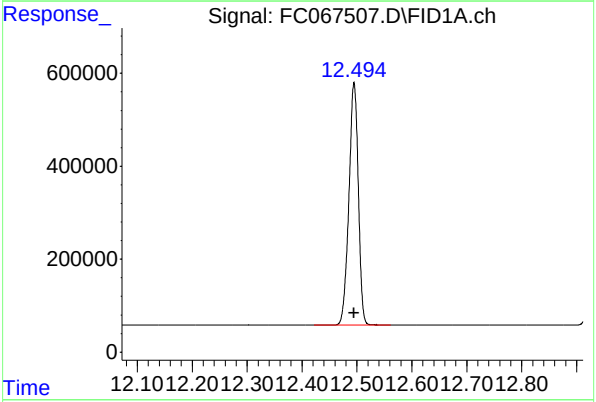
R.T.: 11.188 min
Delta R.T.: 0.000 min
Response: 6511575
Conc: 50.33 ug/ml



#9 ortho-Terphenyl (SURR)

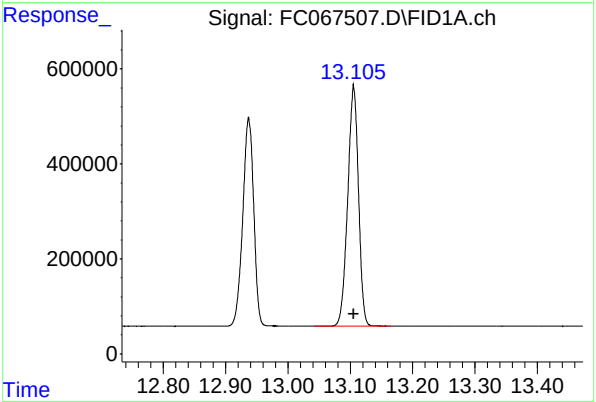
R.T.: 11.500 min
Delta R.T.: 0.000 min
Response: 7186867
Conc: 50.33 ug/ml

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2



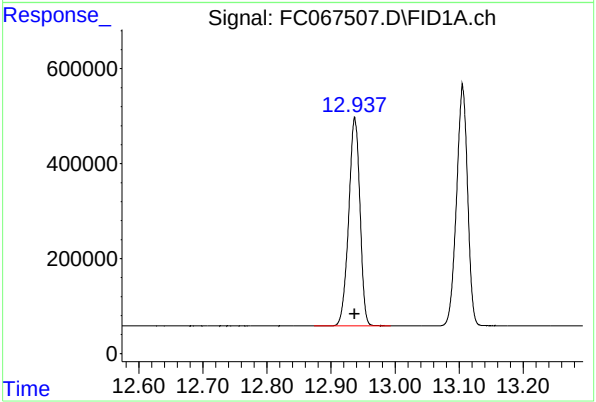
#10 n-Eicosane (C20)

R.T.: 12.495 min
Delta R.T.: 0.000 min
Response: 6199533
Conc: 50.36 ug/ml



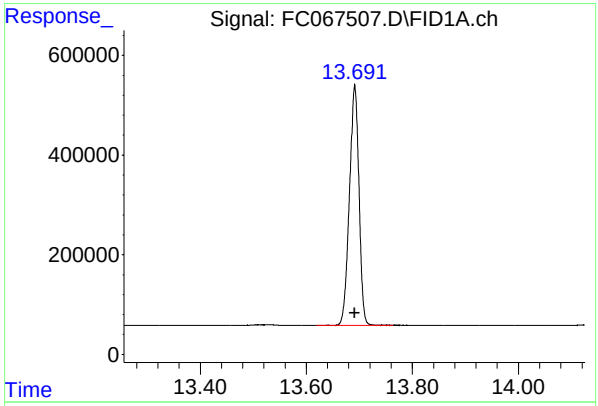
#11 n-Heneicosane (C21)

R.T.: 13.105 min
Delta R.T.: 0.000 min
Response: 6071593
Conc: 50.37 ug/ml



#12 1-chlorooctadecane (SURR)

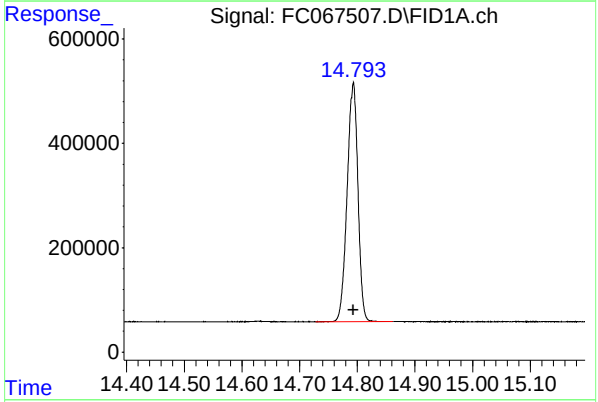
R.T.: 12.937 min
Delta R.T.: 0.000 min
Response: 5350584
Conc: 50.40 ug/ml



#13 n-Docosane (C22)

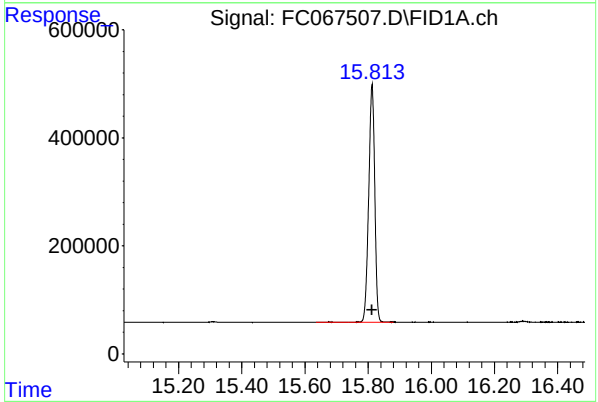
R.T.: 13.691 min
Delta R.T.: 0.000 min
Response: 6022373
Conc: 50.40 ug/ml

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2



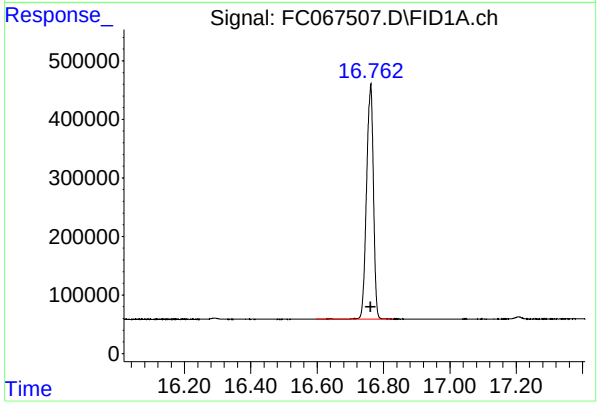
#14 n-Tetracosane (C24)

R.T.: 14.793 min
Delta R.T.: 0.000 min
Response: 5967985
Conc: 50.43 ug/ml



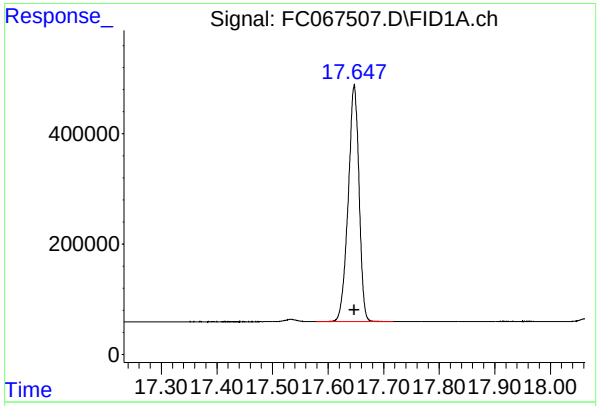
#15 n-Hexacosane (C26)

R.T.: 15.812 min
Delta R.T.: 0.000 min
Response: 5860085
Conc: 50.44 ug/ml



#16 n-Octacosane (C28)

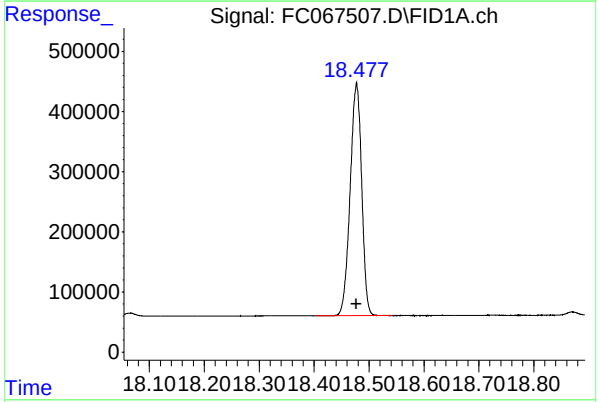
R.T.: 16.761 min
Delta R.T.: 0.000 min
Response: 5758647
Conc: 50.43 ug/ml



#17 n-Tricontane (C30)

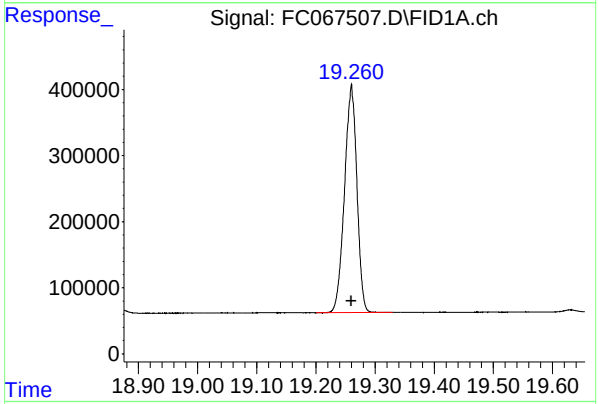
R.T.: 17.647 min
Delta R.T.: 0.000 min
Response: 5830292
Conc: 50.29 ug/ml

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2



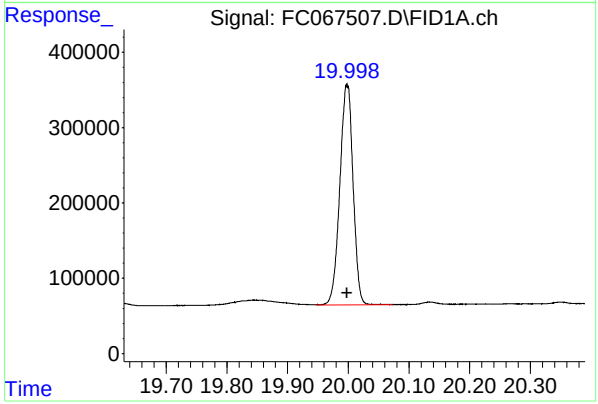
#18 n-Dotriacontane (C32)

R.T.: 18.477 min
Delta R.T.: 0.000 min
Response: 5634053
Conc: 50.17 ug/ml



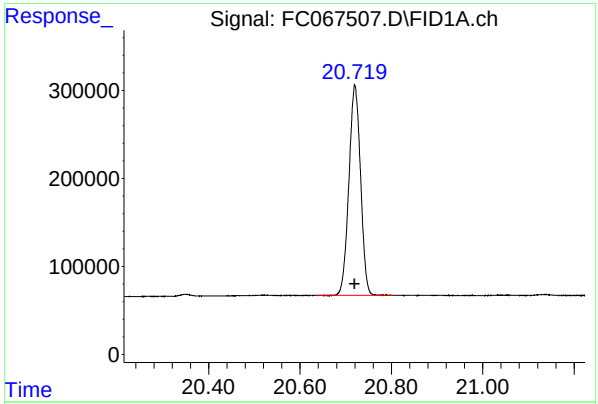
#19 n-Tetratriacontane (C34)

R.T.: 19.260 min
Delta R.T.: 0.000 min
Response: 5024380
Conc: 50.25 ug/ml



#20 n-Hexatriacontane (C36)

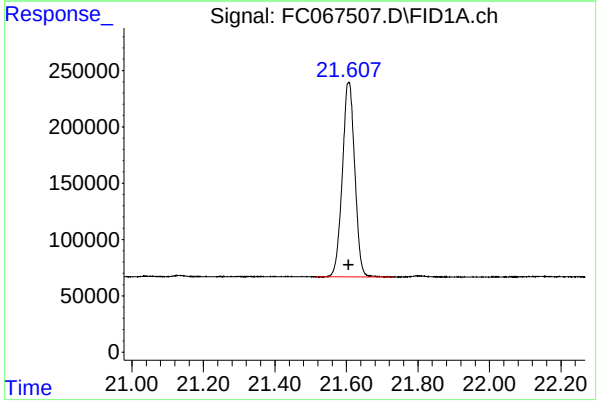
R.T.: 19.998 min
Delta R.T.: 0.000 min
Response: 4430530
Conc: 50.48 ug/ml



#21 n-Octatriacontane (C38)

R.T.: 20.720 min
Delta R.T.: 0.000 min
Response: 4230730
Conc: 50.49 ug/ml

Instrument :
FID_C
ClientSampleId :
50 PPM ALIPHATIC HC STD2



#22 n-Tetracontane (C40)

R.T.: 21.606 min
Delta R.T.: 0.000 min
Response: 4166615
Conc: 50.56 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067507.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 15:48
Sample : 50 PPM ALIPHATIC HC STD2
Misc :
ALS Vial : 12 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.275	3.245	3.343	BB	787475	6596270	89.74%	5.014%
2	4.340	4.278	4.398	BB	725048	6686022	90.96%	5.082%
3	5.918	5.860	6.020	BB	788107	7350672	100.00%	5.587%
4	6.356	6.298	6.412	BB	647440	6650893	90.48%	5.055%
5	6.974	6.923	7.082	BB	708667	7049073	95.90%	5.358%
6	8.149	8.022	8.223	BB	584678	6466785	87.98%	4.915%
7	9.747	9.688	9.835	BB	574143	6523849	88.75%	4.958%
8	11.188	11.143	11.263	BB	557552	6511575	88.58%	4.949%
9	11.500	11.440	11.558	BB	638489	7186867	97.77%	5.462%
10	12.495	12.422	12.562	BB	521546	6199533	84.34%	4.712%
11	12.937	12.873	12.993	BB	438883	5350584	72.79%	4.067%
12	13.105	13.042	13.165	BB	507791	6071593	82.60%	4.615%
13	13.691	13.618	13.763	BB	482823	6022373	81.93%	4.577%
14	14.793	14.728	14.862	BB	460497	5967985	81.19%	4.536%
15	15.812	15.635	15.878	BB	438034	5860085	79.72%	4.454%
16	16.761	16.597	16.828	BB	395517	5758647	78.34%	4.377%
17	17.647	17.578	17.717	BB	427620	5830292	79.32%	4.431%
18	18.477	18.403	18.543	BB	385150	5634053	76.65%	4.282%
19	19.260	19.200	19.330	BB	345032	5024380	68.35%	3.819%
20	19.998	19.947	20.073	VB	291698	4430530	60.27%	3.367%
21	20.720	20.635	20.803	BB	239127	4230730	57.56%	3.216%
22	21.606	21.515	21.730	BB	172709	4166615	56.68%	3.167%

Sum of corrected areas: 131569405

Aliphatic EPH 102324.M Wed Oct 23 18:21:16 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067508.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 16:25
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD3
Misc :
ALS Vial : 13 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3

Integration File: autoint1.e
Quant Time: Oct 23 17:17:15 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:16:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9) S	ortho-Terphenyl (SURR)	11.496	2885453	20.000 ug/ml
Spiked Amount	50.000		Recovery =	40.00%
12) S	1-chlorooctadecane (S...	12.935	2131037	20.000 ug/ml
Spiked Amount	50.000		Recovery =	40.00%
	Target Compounds			
1) T	n-Nonane (C9)	3.275	2673666	20.000 ug/ml
2) T	n-Decane (C10)	4.339	2702691	20.000 ug/ml
3) T	A~Naphthalene (C11.7)	5.916	2941492	20.000 ug/ml
4) T	n-Dodecane (C12)	6.354	2685213	20.000 ug/ml
5) T	A~2-methylnaphthalene...	6.971	2804469	20.000 ug/ml
6) T	n-Tetradecane (C14)	8.146	2596600	20.000 ug/ml
7) T	n-Hexadecane (C16)	9.745	2611645	20.000 ug/ml
8) T	n-Octadecane (C18)	11.185	2610385	20.000 ug/ml
10) T	n-Eicosane (C20)	12.492	2486010	20.000 ug/ml
11) T	n-Heneicosane (C21)	13.103	2429615	20.000 ug/ml
13) T	n-Docosane (C22)	13.688	2410406	20.000 ug/ml
14) T	n-Tetracosane (C24)	14.790	2385181	20.000 ug/ml
15) T	n-Hexacosane (C26)	15.809	2344463	20.000 ug/ml
16) T	n-Octacosane (C28)	16.757	2318777	20.000 ug/ml
17) T	n-Tricontane (C30)	17.644	2378909	20.000 ug/ml
18) T	n-Dotriacontane (C32)	18.475	2323289	20.000 ug/ml
19) T	n-Tetratriacontane (C34)	19.258	2065430	20.000 ug/ml
20) T	n-Hexatriacontane (C36)	19.995	1794670	20.000 ug/ml
21) T	n-Octatriacontane (C38)	20.718	1712685	20.000 ug/ml
22) T	n-Tetracontane (C40)	21.604	1679680	20.000 ug/ml

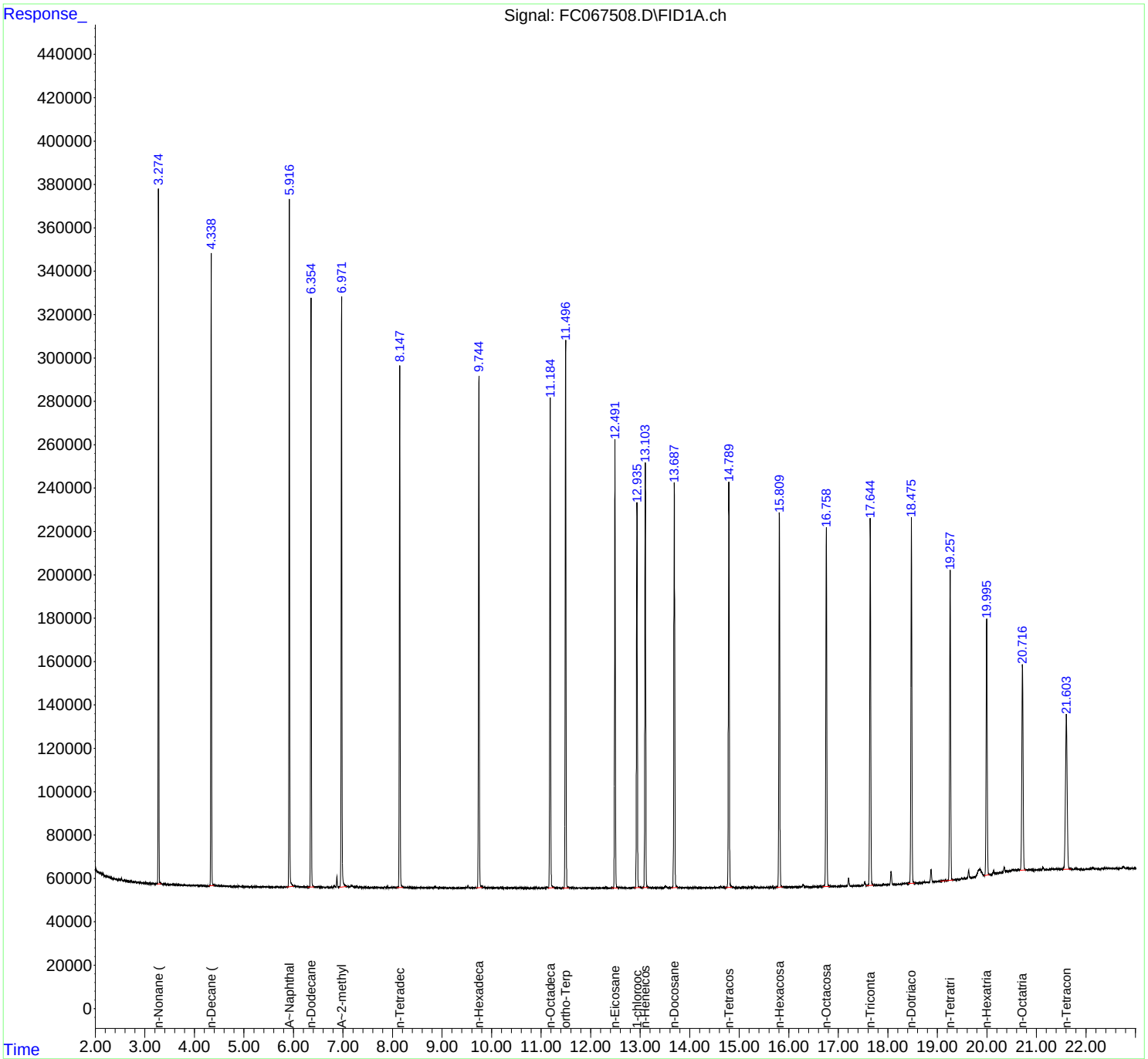
(f)=RT Delta > 1/2 Window (m)=manual int.

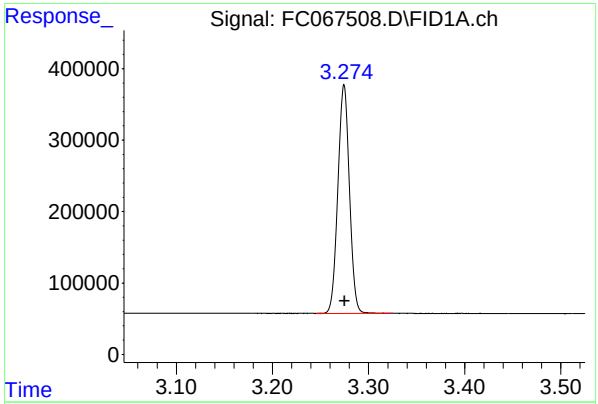
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067508.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 16:25
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD3
Misc :
ALS Vial : 13 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3

Integration File: autoint1.e
Quant Time: Oct 23 17:17:15 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:16:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

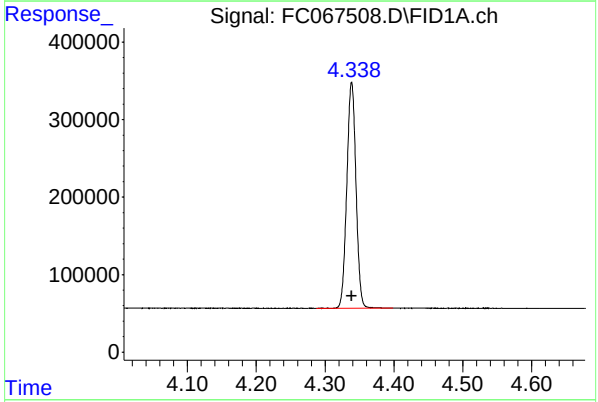




#1 n-Nonane (C9)

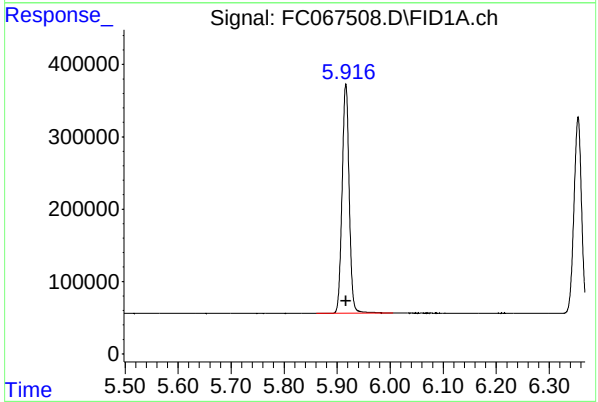
R.T.: 3.275 min
Delta R.T.: 0.000 min
Response: 2673666
Conc: 20.00 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3



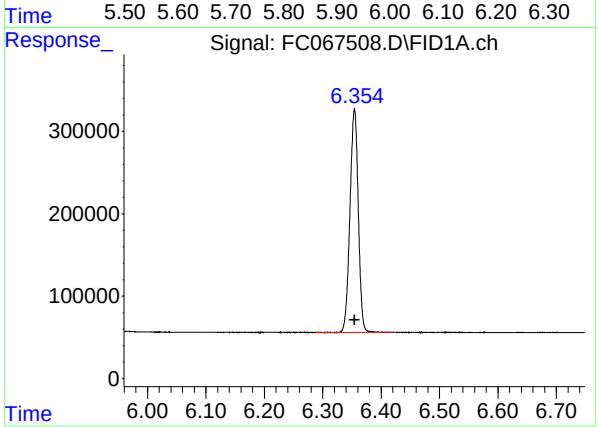
#2 n-Decane (C10)

R.T.: 4.339 min
Delta R.T.: 0.000 min
Response: 2702691
Conc: 20.00 ug/ml



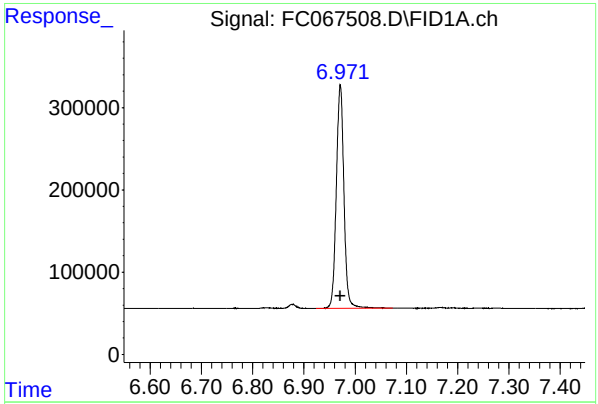
#3 A~Naphthalene (C11.7)

R.T.: 5.916 min
Delta R.T.: 0.000 min
Response: 2941492
Conc: 20.00 ug/ml



#4 n-Dodecane (C12)

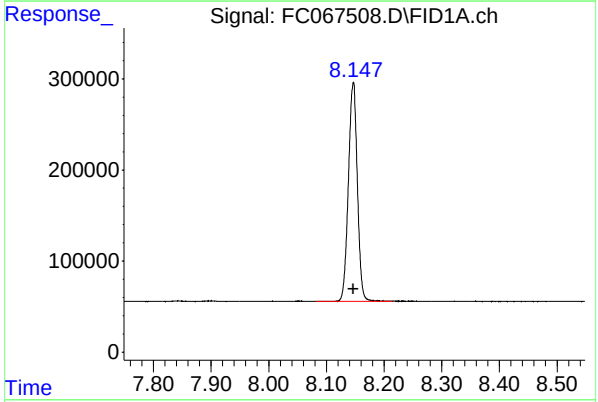
R.T.: 6.354 min
Delta R.T.: 0.000 min
Response: 2685213
Conc: 20.00 ug/ml



#5 A~2-methylnaphthalene (C12.89)

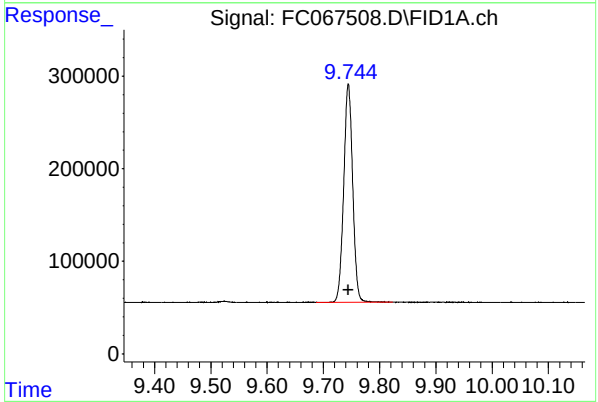
R.T.: 6.971 min
Delta R.T.: 0.000 min
Response: 2804469
Conc: 20.00 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3



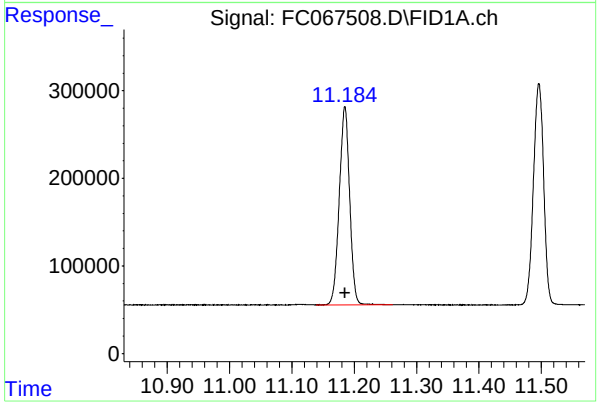
#6 n-Tetradecane (C14)

R.T.: 8.146 min
Delta R.T.: 0.000 min
Response: 2596600
Conc: 20.00 ug/ml



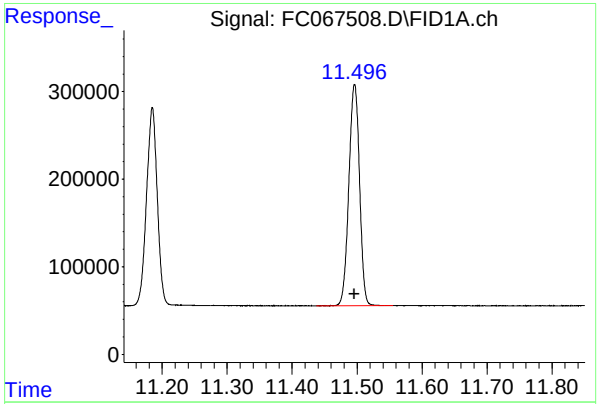
#7 n-Hexadecane (C16)

R.T.: 9.745 min
Delta R.T.: 0.000 min
Response: 2611645
Conc: 20.00 ug/ml



#8 n-Octadecane (C18)

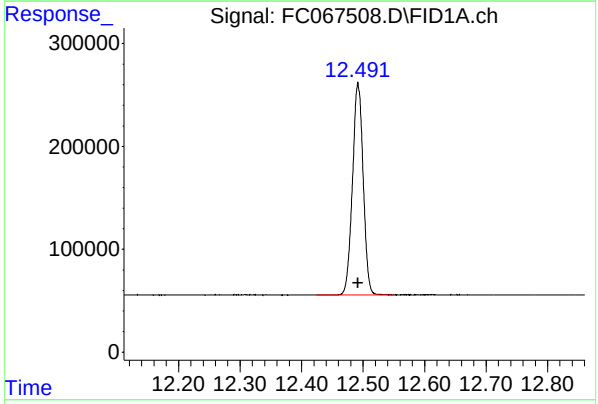
R.T.: 11.185 min
Delta R.T.: 0.000 min
Response: 2610385
Conc: 20.00 ug/ml



#9 ortho-Terphenyl (SURR)

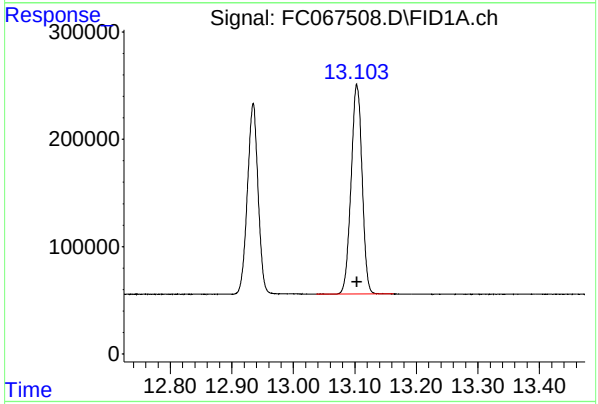
R.T.: 11.496 min
Delta R.T.: 0.000 min
Response: 2885453
Conc: 20.00 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3



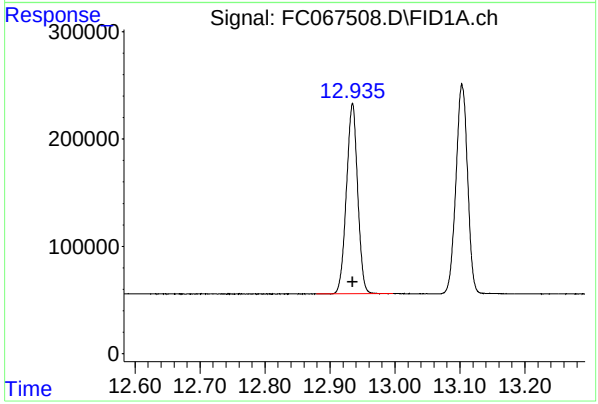
#10 n-Eicosane (C20)

R.T.: 12.492 min
Delta R.T.: 0.000 min
Response: 2486010
Conc: 20.00 ug/ml



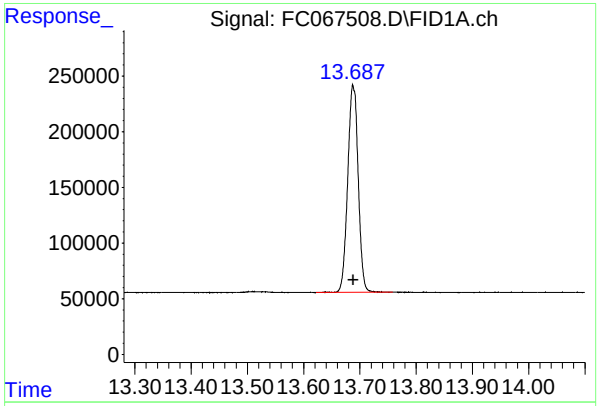
#11 n-Heneicosane (C21)

R.T.: 13.103 min
Delta R.T.: 0.000 min
Response: 2429615
Conc: 20.00 ug/ml



#12 1-chlorooctadecane (SURR)

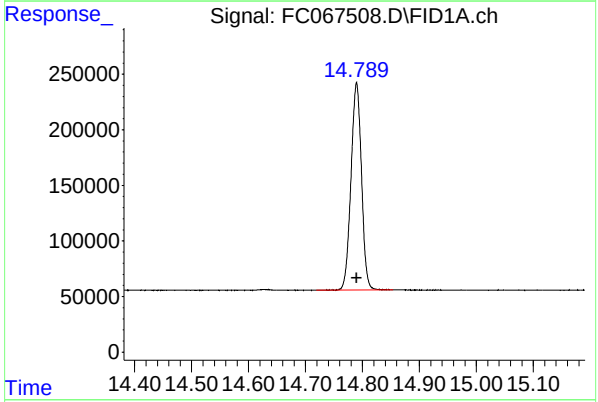
R.T.: 12.935 min
Delta R.T.: 0.000 min
Response: 2131037
Conc: 20.00 ug/ml



#13 n-Docosane (C22)

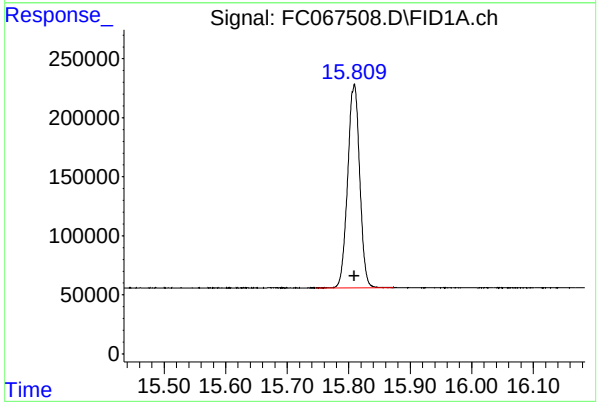
R.T.: 13.688 min
Delta R.T.: 0.000 min
Response: 2410406
Conc: 20.00 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3



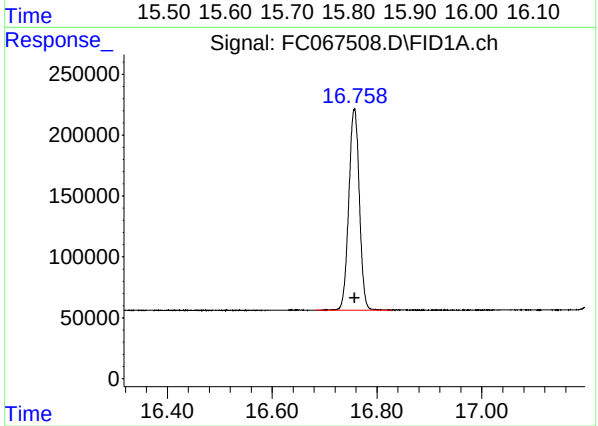
#14 n-Tetracosane (C24)

R.T.: 14.790 min
Delta R.T.: 0.000 min
Response: 2385181
Conc: 20.00 ug/ml



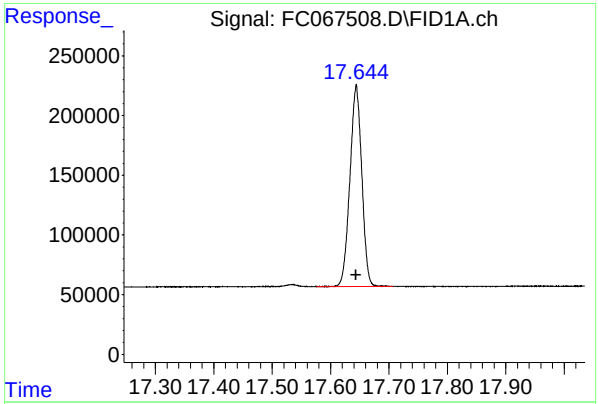
#15 n-Hexacosane (C26)

R.T.: 15.809 min
Delta R.T.: 0.000 min
Response: 2344463
Conc: 20.00 ug/ml



#16 n-Octacosane (C28)

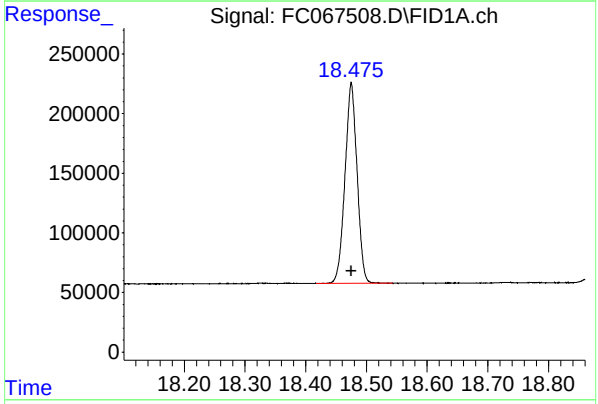
R.T.: 16.757 min
Delta R.T.: 0.000 min
Response: 2318777
Conc: 20.00 ug/ml



#17 n-Tricontane (C30)

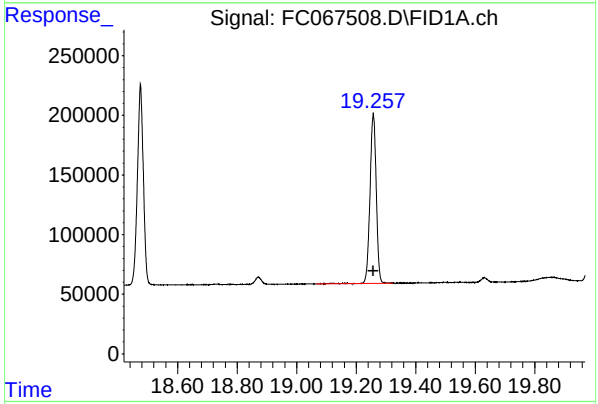
R.T.: 17.644 min
Delta R.T.: 0.000 min
Response: 2378909
Conc: 20.00 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3



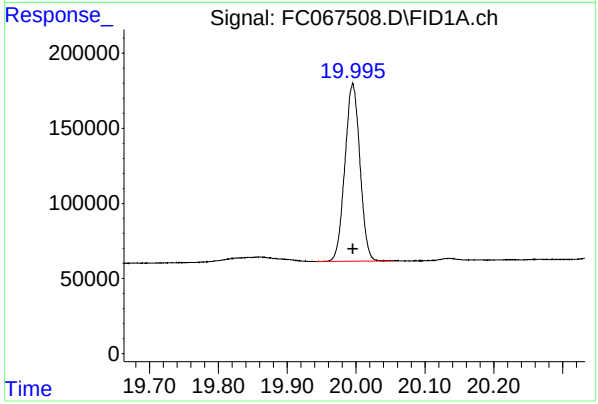
#18 n-Dotriacontane (C32)

R.T.: 18.475 min
Delta R.T.: 0.000 min
Response: 2323289
Conc: 20.00 ug/ml



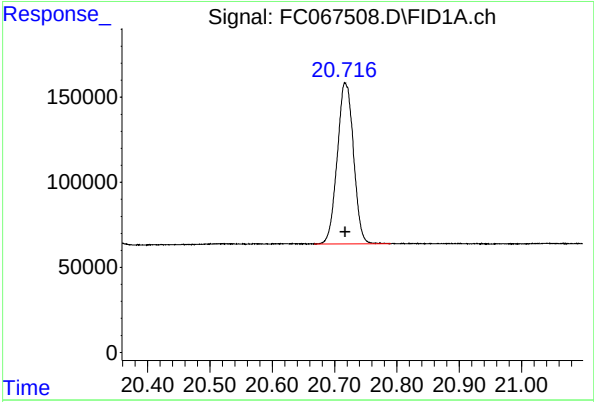
#19 n-Tetratriacontane (C34)

R.T.: 19.258 min
Delta R.T.: 0.000 min
Response: 2065430
Conc: 20.00 ug/ml



#20 n-Hexatriacontane (C36)

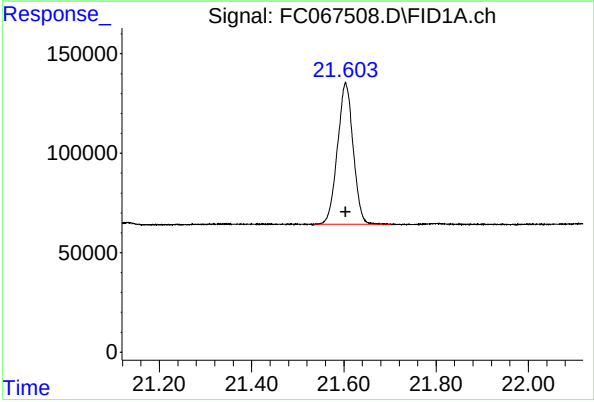
R.T.: 19.995 min
Delta R.T.: 0.000 min
Response: 1794670
Conc: 20.00 ug/ml



#21 n-Octatriacontane (C38)

R.T.: 20.718 min
Delta R.T.: 0.000 min
Response: 1712685
Conc: 20.00 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD3



#22 n-Tetracontane (C40)

R.T.: 21.604 min
Delta R.T.: 0.000 min
Response: 1679680
Conc: 20.00 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067508.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 16:25
Sample : 20 PPM ALIPHATIC HC STD3
Misc :
ALS Vial : 13 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.275	3.245	3.325	BB	321230	2673666	90.89%	5.047%
2	4.339	4.287	4.399	BB	291890	2702691	91.88%	5.102%
3	5.916	5.860	6.005	BB	318035	2941492	100.00%	5.553%
4	6.354	6.289	6.420	BB	270407	2685213	91.29%	5.069%
5	6.971	6.924	7.074	BB	271627	2804469	95.34%	5.294%
6	8.146	8.082	8.215	BB	241446	2596600	88.27%	4.902%
7	9.745	9.687	9.824	BB	236243	2611645	88.79%	4.930%
8	11.185	11.139	11.262	BB	226739	2610385	88.74%	4.928%
9	11.496	11.437	11.555	BB	253146	2885453	98.09%	5.447%
10	12.492	12.424	12.549	BB	205716	2486010	84.52%	4.693%
11	12.935	12.879	12.997	BB	178352	2131037	72.45%	4.023%
12	13.103	13.037	13.162	BB	194305	2429615	82.60%	4.587%
13	13.688	13.622	13.759	BB	184039	2410406	81.95%	4.550%
14	14.790	14.719	14.854	BB	186782	2385181	81.09%	4.503%
15	15.809	15.747	15.872	BB	171744	2344463	79.70%	4.426%
16	16.757	16.684	16.830	BB	165164	2318777	78.83%	4.377%
17	17.644	17.575	17.707	BB	168160	2378909	80.87%	4.491%
18	18.475	18.417	18.544	BB	168488	2323289	78.98%	4.386%
19	19.258	19.065	19.324	BB	141960	2065430	70.22%	3.899%
20	19.995	19.942	20.054	PB	118336	1794670	61.01%	3.388%
21	20.718	20.667	20.790	BB	94381	1712685	58.23%	3.233%
22	21.604	21.535	21.702	BB	71304	1679680	57.10%	3.171%
			Sum of corrected areas:			52971767		

Aliphatic EPH 102324.M Wed Oct 23 18:21:40 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067509.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 17:02
Operator : YP/AJ
Sample : 10 PPM ALIPHATIC HC STD4
Misc :
ALS Vial : 14 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4

Integration File: autoint1.e
Quant Time: Oct 23 17:42:18 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:42:09 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9)	S ortho-Terphenyl (SURR)	11.495	1516253	10.457 ug/ml
Spiked Amount	50.000		Recovery =	20.91%
12)	S 1-chlorooctadecane (S...	12.934	1104370	10.299 ug/ml
Spiked Amount	50.000		Recovery =	20.60%
	Target Compounds			
1)	T n-Nonane (C9)	3.274	1392325	10.429 ug/ml
2)	T n-Decane (C10)	4.338	1408883	10.425 ug/ml
3)	T A~Naphthalene (C11.7)	5.916	1523229	10.321 ug/ml
4)	T n-Dodecane (C12)	6.353	1397121	10.404 ug/ml
5)	T A~2-methylnaphthalene...	6.971	1445653	10.250 ug/ml
6)	T n-Tetradecane (C14)	8.146	1348794	10.363 ug/ml
7)	T n-Hexadecane (C16)	9.744	1353251	10.321 ug/ml
8)	T n-Octadecane (C18)	11.184	1362847	10.395 ug/ml
10)	T n-Eicosane (C20)	12.491	1299257	10.409 ug/ml
11)	T n-Heneicosane (C21)	13.102	1272574	10.413 ug/ml
13)	T n-Docosane (C22)	13.687	1260218	10.404 ug/ml
14)	T n-Tetracosane (C24)	14.789	1251574	10.427 ug/ml
15)	T n-Hexacosane (C26)	15.808	1226594	10.413 ug/ml
16)	T n-Octacosane (C28)	16.756	1213286	10.461 ug/ml
17)	T n-Tricontane (C30)	17.643	1249088	10.570 ug/ml
18)	T n-Dotriacontane (C32)	18.474	1225099	10.667 ug/ml
19)	T n-Tetratriacontane (C34)	19.257	1087201	10.641 ug/ml
20)	T n-Hexatriacontane (C36)	19.995	941330	10.535 ug/ml
21)	T n-Octatriacontane (C38)	20.719	898154	10.530 ug/ml
22)	T n-Tetracontane (C40)	21.604	882650	10.523 ug/ml

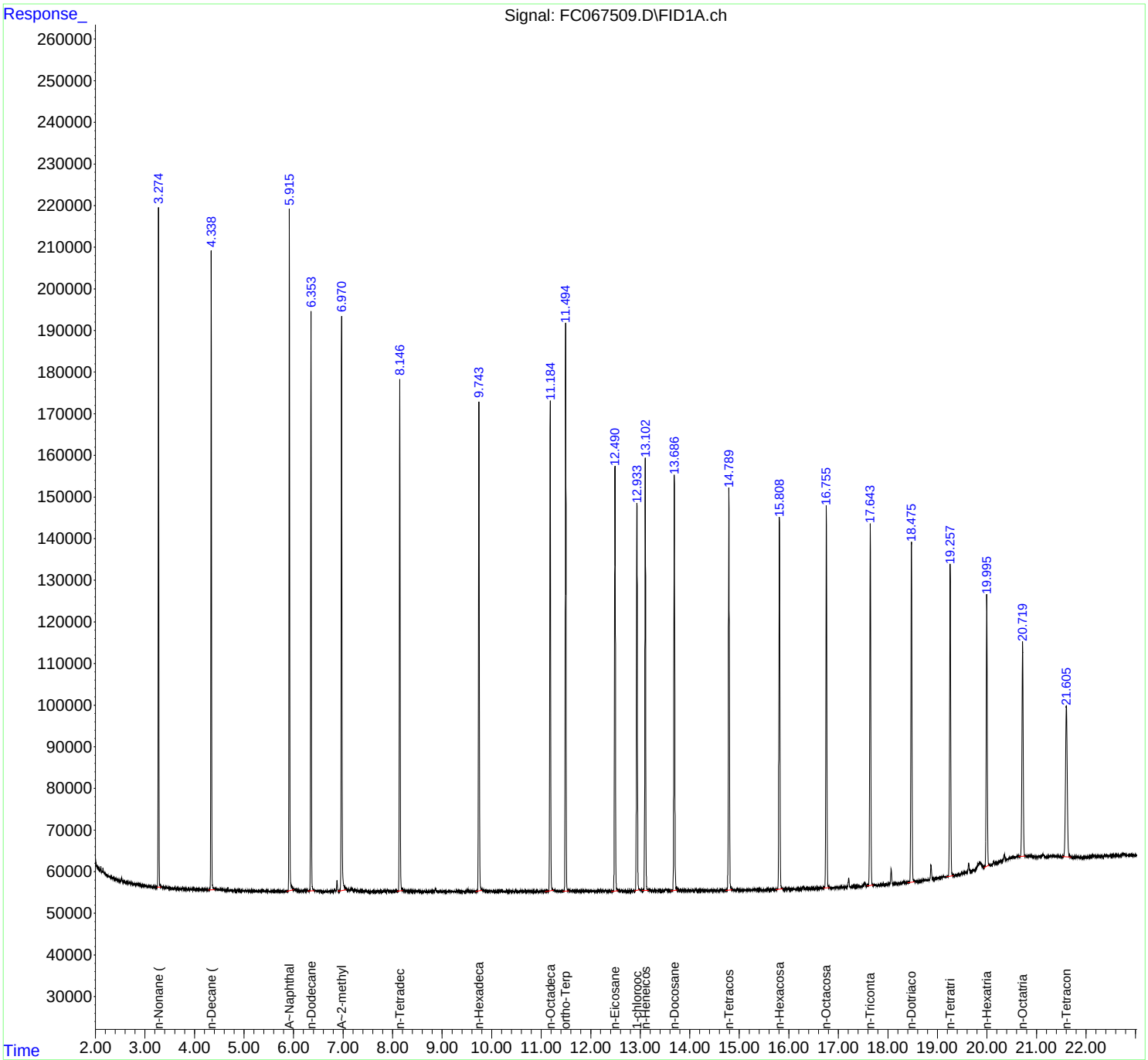
(f)=RT Delta > 1/2 Window (m)=manual int.

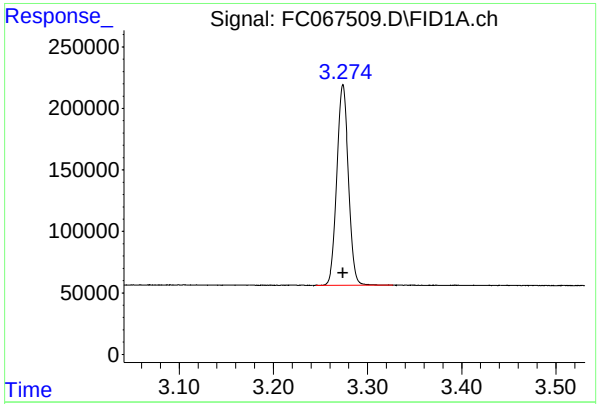
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067509.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 17:02
Operator : YP/AJ
Sample : 10 PPM ALIPHATIC HC STD4
Misc :
ALS Vial : 14 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4

Integration File: autoint1.e
Quant Time: Oct 23 17:42:18 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:42:09 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

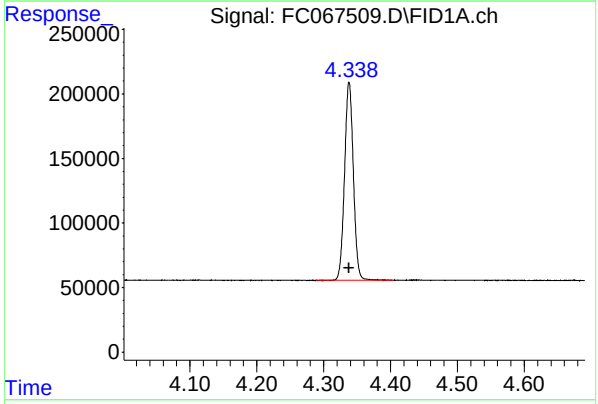




#1 n-Nonane (C9)

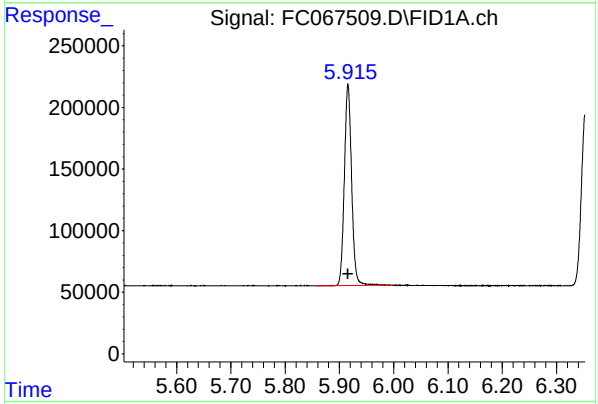
R.T.: 3.274 min
Delta R.T.: 0.000 min
Response: 1392325
Conc: 10.43 ug/ml

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4



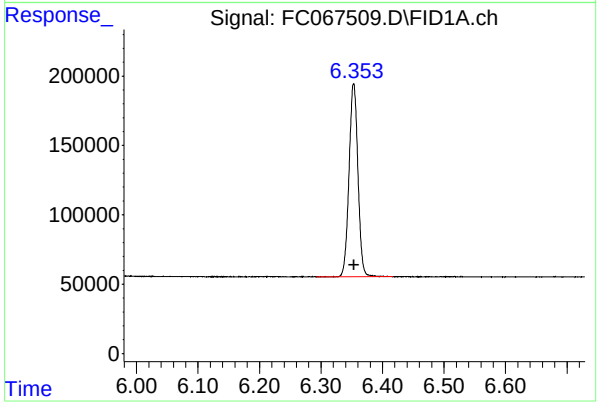
#2 n-Decane (C10)

R.T.: 4.338 min
Delta R.T.: 0.000 min
Response: 1408883
Conc: 10.42 ug/ml



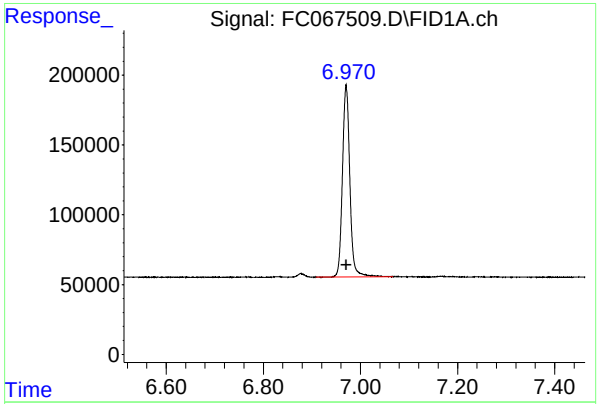
#3 A~Naphthalene (C11.7)

R.T.: 5.916 min
Delta R.T.: 0.000 min
Response: 1523229
Conc: 10.32 ug/ml



#4 n-Dodecane (C12)

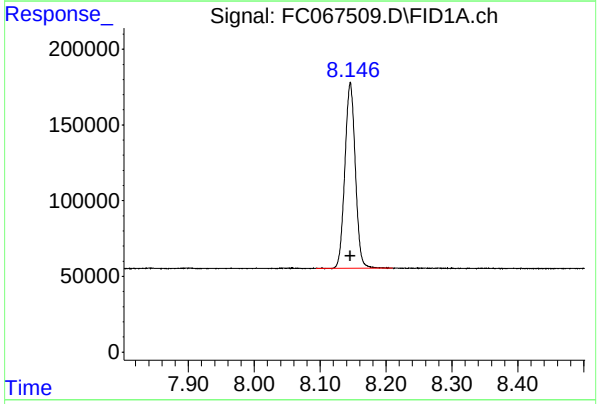
R.T.: 6.353 min
Delta R.T.: 0.000 min
Response: 1397121
Conc: 10.40 ug/ml



#5 A~2-methylnaphthalene (C12.89)

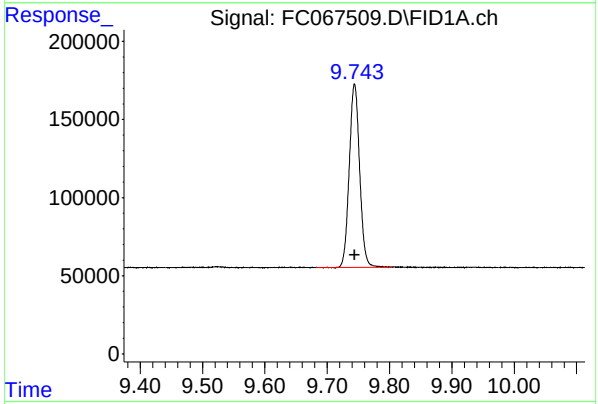
R.T.: 6.971 min
Delta R.T.: 0.000 min
Response: 1445653
Conc: 10.25 ug/ml

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4



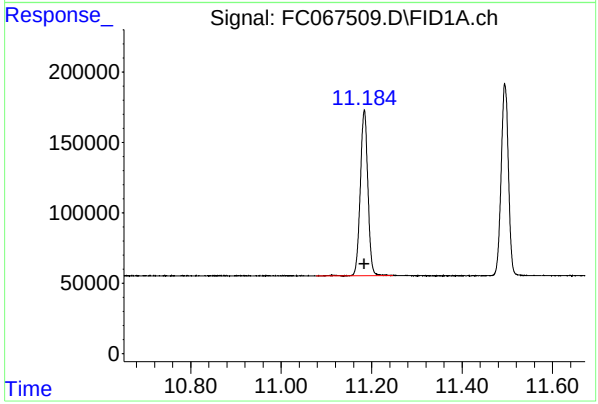
#6 n-Tetradecane (C14)

R.T.: 8.146 min
Delta R.T.: 0.000 min
Response: 1348794
Conc: 10.36 ug/ml



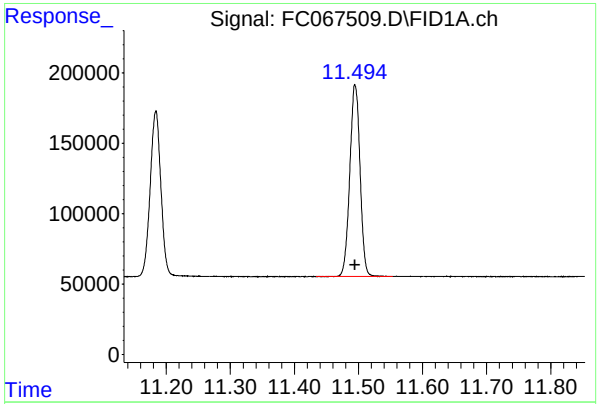
#7 n-Hexadecane (C16)

R.T.: 9.744 min
Delta R.T.: 0.000 min
Response: 1353251
Conc: 10.32 ug/ml



#8 n-Octadecane (C18)

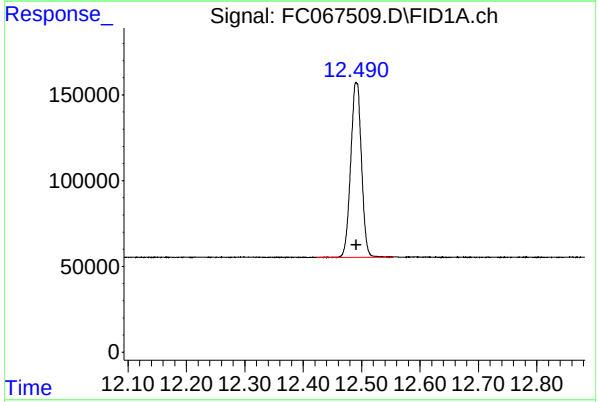
R.T.: 11.184 min
Delta R.T.: 0.000 min
Response: 1362847
Conc: 10.39 ug/ml



#9 ortho-Terphenyl (SURR)

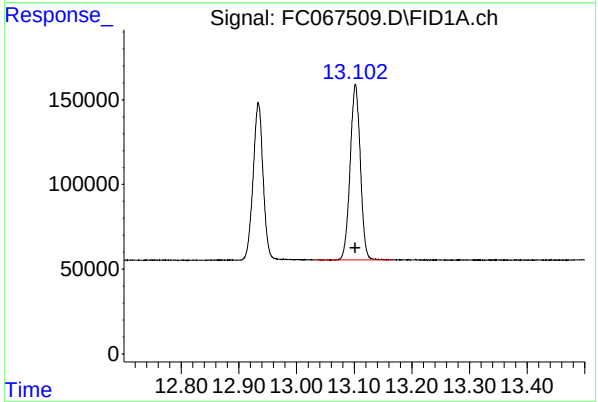
R.T.: 11.495 min
Delta R.T.: 0.000 min
Response: 1516253
Conc: 10.46 ug/ml

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4



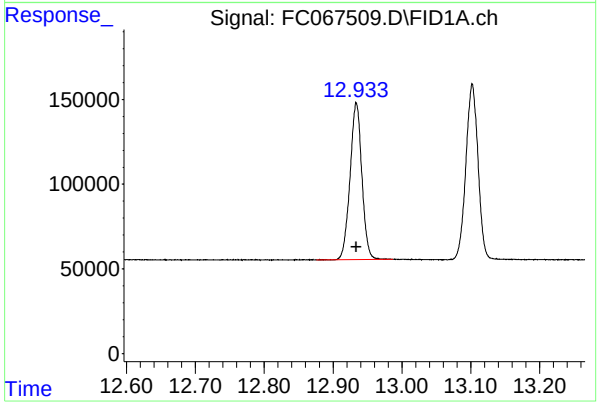
#10 n-Eicosane (C20)

R.T.: 12.491 min
Delta R.T.: 0.000 min
Response: 1299257
Conc: 10.41 ug/ml



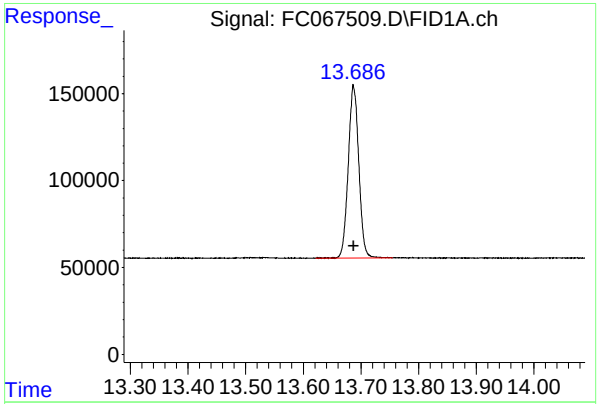
#11 n-Heneicosane (C21)

R.T.: 13.102 min
Delta R.T.: 0.000 min
Response: 1272574
Conc: 10.41 ug/ml



#12 1-chlorooctadecane (SURR)

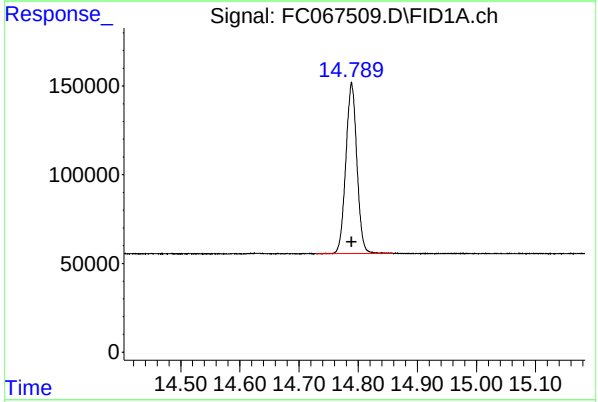
R.T.: 12.934 min
Delta R.T.: 0.000 min
Response: 1104370
Conc: 10.30 ug/ml



#13 n-Docosane (C22)

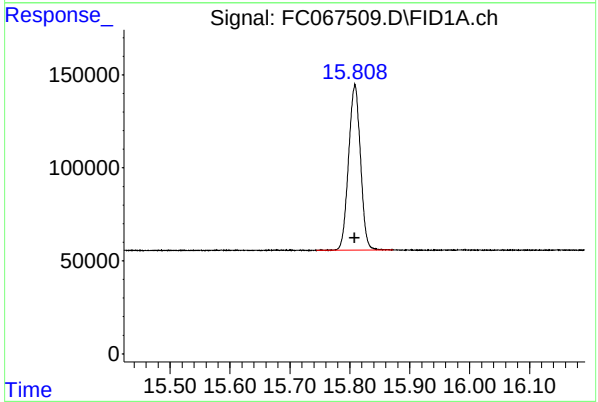
R.T.: 13.687 min
Delta R.T.: 0.000 min
Response: 1260218
Conc: 10.40 ug/ml

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4



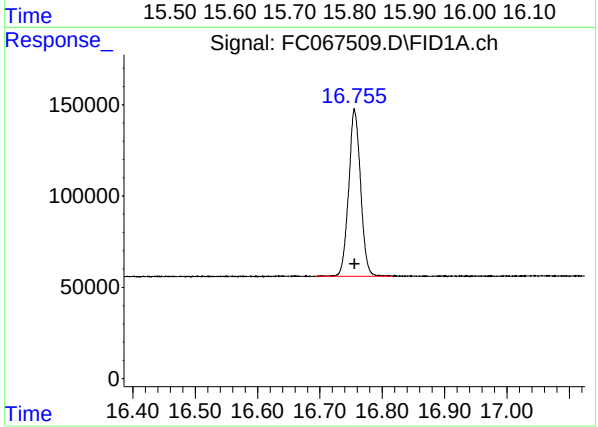
#14 n-Tetracosane (C24)

R.T.: 14.789 min
Delta R.T.: 0.000 min
Response: 1251574
Conc: 10.43 ug/ml



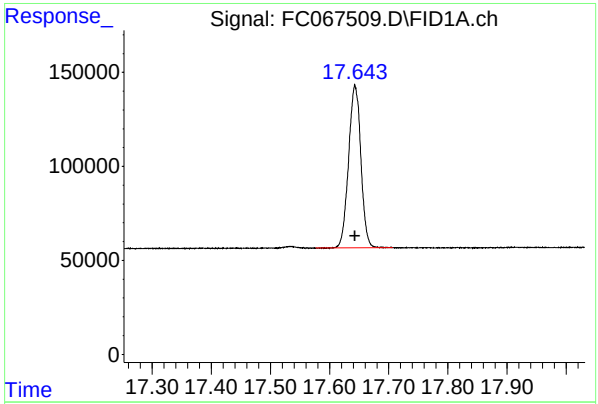
#15 n-Hexacosane (C26)

R.T.: 15.808 min
Delta R.T.: 0.000 min
Response: 1226594
Conc: 10.41 ug/ml



#16 n-Octacosane (C28)

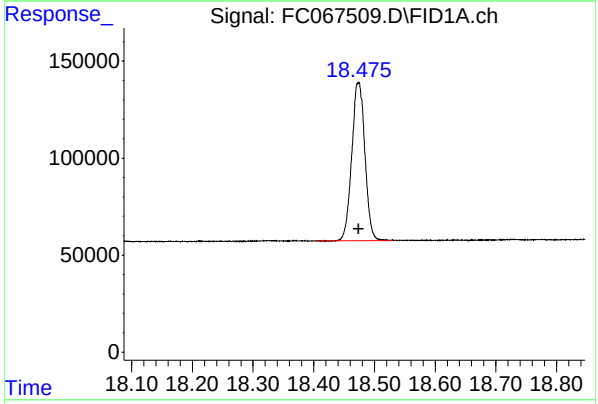
R.T.: 16.756 min
Delta R.T.: 0.000 min
Response: 1213286
Conc: 10.46 ug/ml



#17 n-Tricontane (C30)

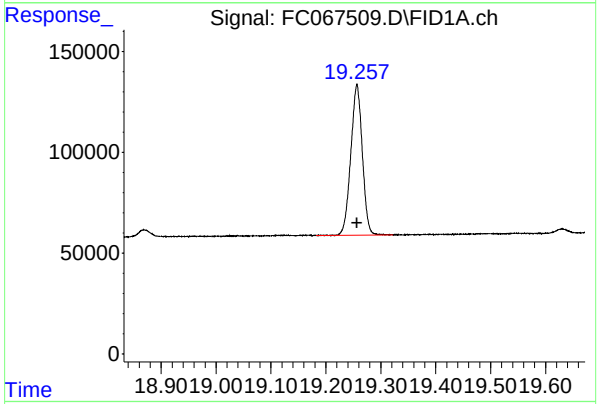
R.T.: 17.643 min
Delta R.T.: 0.000 min
Response: 1249088
Conc: 10.57 ug/ml

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4



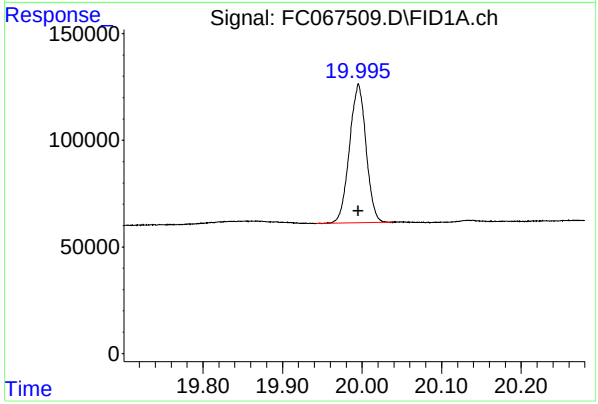
#18 n-Dotriacontane (C32)

R.T.: 18.474 min
Delta R.T.: 0.000 min
Response: 1225099
Conc: 10.67 ug/ml



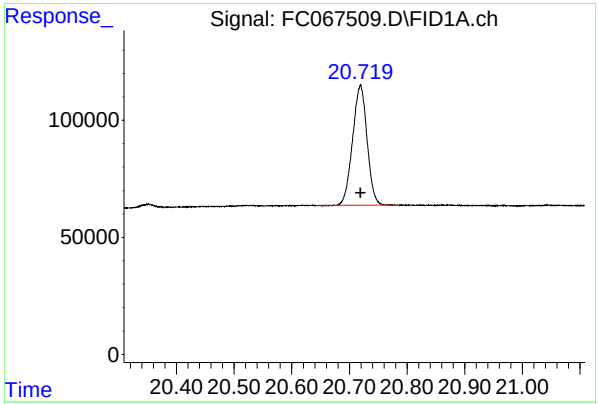
#19 n-Tetratriacontane (C34)

R.T.: 19.257 min
Delta R.T.: 0.000 min
Response: 1087201
Conc: 10.64 ug/ml



#20 n-Hexatriacontane (C36)

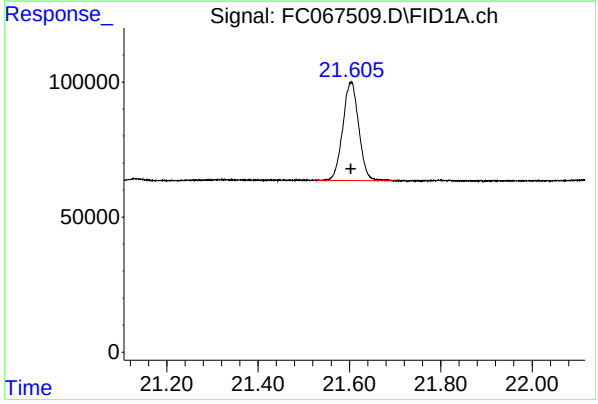
R.T.: 19.995 min
Delta R.T.: 0.000 min
Response: 941330
Conc: 10.53 ug/ml



#21 n-Octatriacontane (C38)

R.T.: 20.719 min
Delta R.T.: 0.000 min
Response: 898154
Conc: 10.53 ug/ml

Instrument :
FID_C
ClientSampleId :
10 PPM ALIPHATIC HC STD4



#22 n-Tetracontane (C40)

R.T.: 21.604 min
Delta R.T.: 0.000 min
Response: 882650
Conc: 10.52 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067509.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 17:02
Sample : 10 PPM ALIPHATIC HC STD4
Misc :
ALS Vial : 14 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.274	3.245	3.327	BB	163023	1392325	91.41%	5.034%
2	4.338	4.289	4.404	BB	153448	1408883	92.49%	5.094%
3	5.916	5.857	5.999	BB	163420	1523229	100.00%	5.507%
4	6.353	6.292	6.417	BB	139335	1397121	91.72%	5.051%
5	6.971	6.909	7.067	BB	137359	1445653	94.91%	5.227%
6	8.146	8.094	8.210	BB	122199	1348794	88.55%	4.876%
7	9.744	9.682	9.805	BB	117477	1353251	88.84%	4.892%
8	11.184	11.077	11.247	BB	117457	1362847	89.47%	4.927%
9	11.495	11.434	11.554	BB	135385	1516253	99.54%	5.482%
10	12.491	12.422	12.554	BB	101975	1299257	85.30%	4.697%
11	12.934	12.875	12.987	BB	92846	1104370	72.50%	3.993%
12	13.102	13.034	13.167	BB	103848	1272574	83.54%	4.601%
13	13.687	13.622	13.755	BB	98770	1260218	82.73%	4.556%
14	14.789	14.729	14.859	BB	96250	1251574	82.17%	4.525%
15	15.808	15.744	15.872	BB	89337	1226594	80.53%	4.435%
16	16.756	16.694	16.817	BB	91173	1213286	79.65%	4.386%
17	17.643	17.577	17.707	BB	85908	1249088	82.00%	4.516%
18	18.474	18.404	18.530	BB	81392	1225099	80.43%	4.429%
19	19.257	19.182	19.322	BB	75084	1087201	71.37%	3.931%
20	19.995	19.942	20.039	BB	65222	941330	61.80%	3.403%
21	20.719	20.642	20.775	BB	51277	898154	58.96%	3.247%
22	21.604	21.527	21.695	BB	35971	882650	57.95%	3.191%
			Sum of corrected areas:			27659751		

Aliphatic EPH 102324.M Wed Oct 23 18:21:58 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067510.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 17:38
Operator : YP/AJ
Sample : 5 PPM ALIPHATIC HC STD5
Misc :
ALS Vial : 15 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5

Integration File: autoint1.e
Quant Time: Oct 23 18:12:12 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:02 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9)	S ortho-Terphenyl (SURR)	11.494	768220	5.236 ug/ml
Spiked Amount	50.000		Recovery =	10.47%
12)	S 1-chlorooctadecane (S...	12.933	555182	5.141 ug/ml
Spiked Amount	50.000		Recovery =	10.28%
	Target Compounds			
1)	T n-Nonane (C9)	3.275	697792	5.180 ug/ml
2)	T n-Decane (C10)	4.339	703136	5.161 ug/ml
3)	T A~Naphthalene (C11.7)	5.917	752949	5.081 ug/ml
4)	T n-Dodecane (C12)	6.354	700270	5.170 ug/ml
5)	T A~2-methylnaphthalene...	6.971	709834	5.026 ug/ml
6)	T n-Tetradecane (C14)	8.146	678328	5.168 ug/ml
7)	T n-Hexadecane (C16)	9.744	680213	5.149 ug/ml
8)	T n-Octadecane (C18)	11.184	680709	5.152 ug/ml
10)	T n-Eicosane (C20)	12.491	658066	5.215 ug/ml
11)	T n-Heneicosane (C21)	13.102	641065	5.194 ug/ml
13)	T n-Docosane (C22)	13.687	638712	5.216 ug/ml
14)	T n-Tetracosane (C24)	14.789	629495	5.193 ug/ml
15)	T n-Hexacosane (C26)	15.808	620443	5.211 ug/ml
16)	T n-Octacosane (C28)	16.758	621629	5.284 ug/ml
17)	T n-Tricontane (C30)	17.643	658247	5.446 ug/ml
18)	T n-Dotriacontane (C32)	18.474	660916	5.586 ug/ml
19)	T n-Tetratriacontane (C34)	19.256	574804	5.489 ug/ml
20)	T n-Hexatriacontane (C36)	19.994	488556	5.367 ug/ml
21)	T n-Octatriacontane (C38)	20.718	459107	5.301 ug/ml
22)	T n-Tetracontane (C40)	21.603	447730	5.267 ug/ml

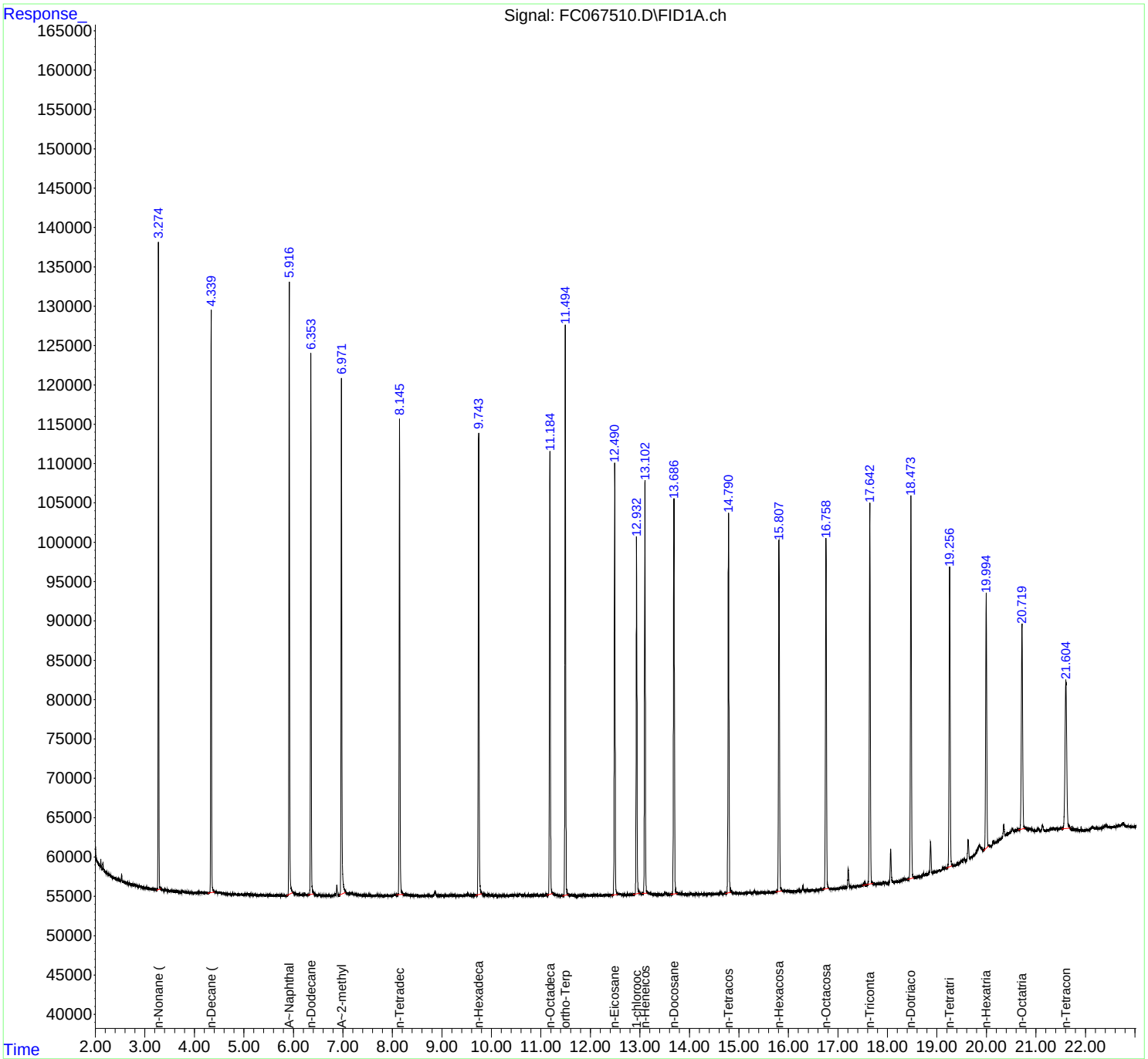
(f)=RT Delta > 1/2 Window (m)=manual int.

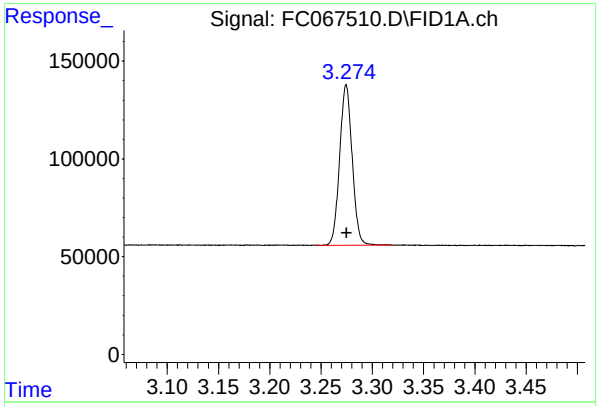
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067510.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 17:38
Operator : YP/AJ
Sample : 5 PPM ALIPHATIC HC STD5
Misc :
ALS Vial : 15 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5

Integration File: autoint1.e
Quant Time: Oct 23 18:12:12 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:02 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

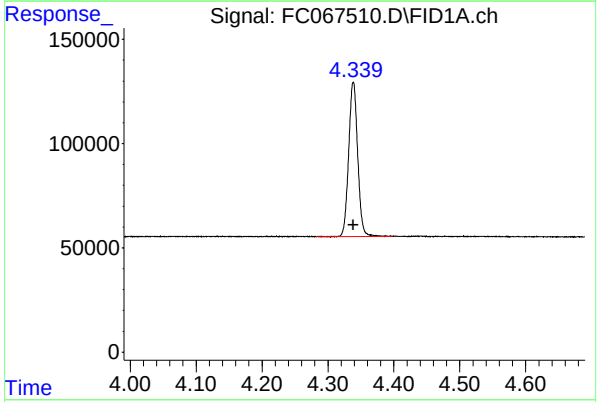




#1 n-Nonane (C9)

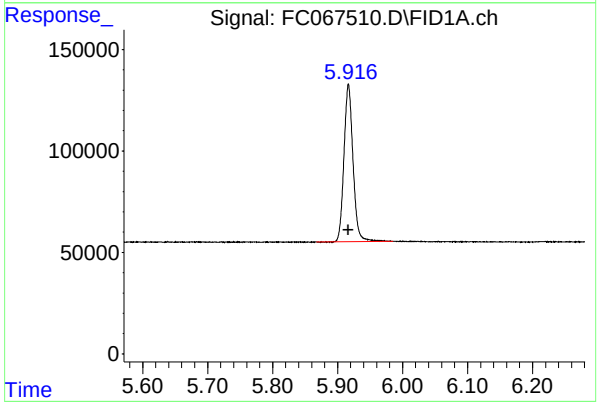
R.T.: 3.275 min
Delta R.T.: 0.000 min
Response: 697792
Conc: 5.18 ug/ml

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5



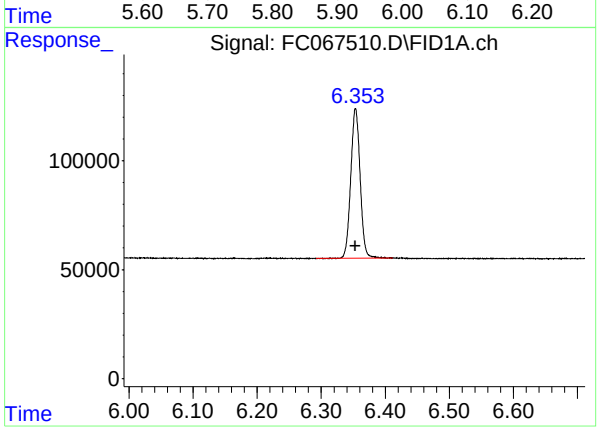
#2 n-Decane (C10)

R.T.: 4.339 min
Delta R.T.: 0.000 min
Response: 703136
Conc: 5.16 ug/ml



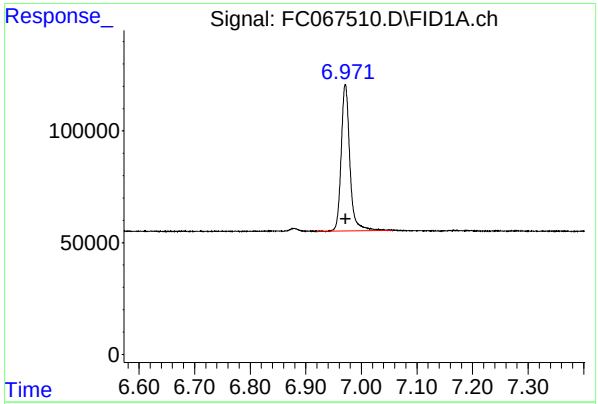
#3 A~Naphthalene (C11.7)

R.T.: 5.917 min
Delta R.T.: 0.000 min
Response: 752949
Conc: 5.08 ug/ml



#4 n-Dodecane (C12)

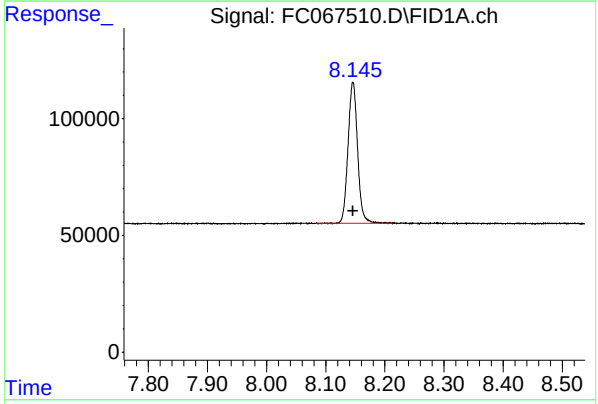
R.T.: 6.354 min
Delta R.T.: 0.000 min
Response: 700270
Conc: 5.17 ug/ml



#5 A~2-methylnaphthalene (C12.89)

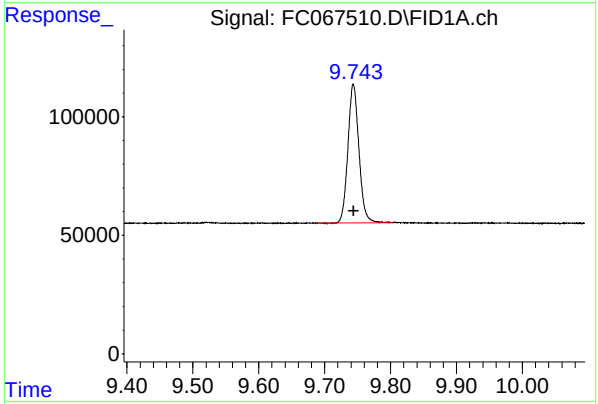
R.T.: 6.971 min
Delta R.T.: 0.000 min
Response: 709834
Conc: 5.03 ug/ml

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5



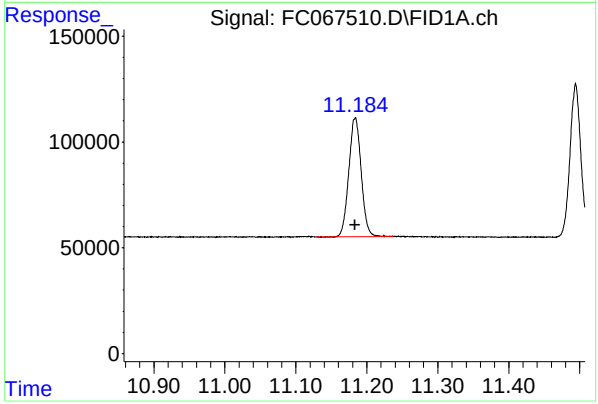
#6 n-Tetradecane (C14)

R.T.: 8.146 min
Delta R.T.: 0.000 min
Response: 678328
Conc: 5.17 ug/ml



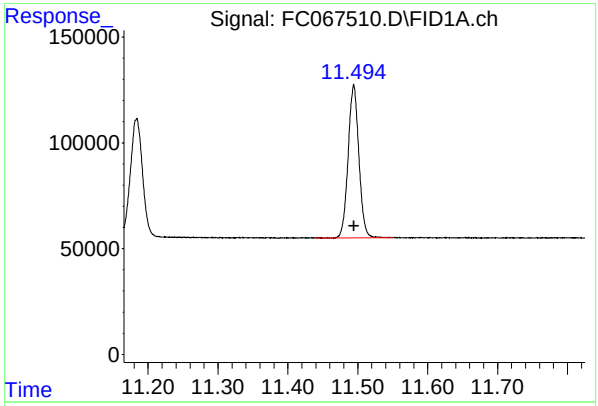
#7 n-Hexadecane (C16)

R.T.: 9.744 min
Delta R.T.: 0.000 min
Response: 680213
Conc: 5.15 ug/ml



#8 n-Octadecane (C18)

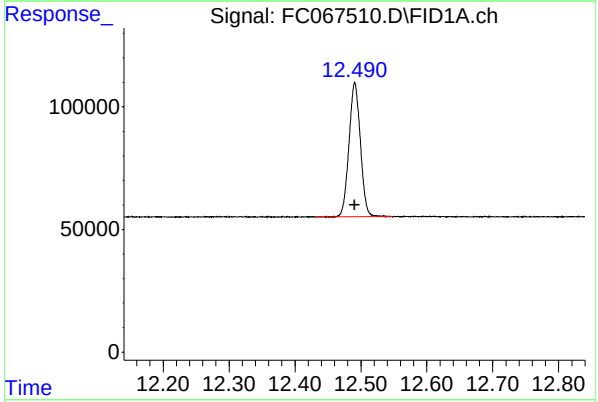
R.T.: 11.184 min
Delta R.T.: 0.000 min
Response: 680709
Conc: 5.15 ug/ml



#9 ortho-Terphenyl (SURR)

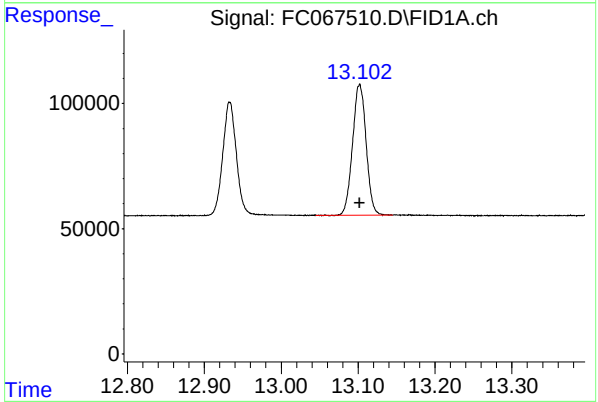
R.T.: 11.494 min
Delta R.T.: 0.000 min
Response: 768220
Conc: 5.24 ug/ml

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5



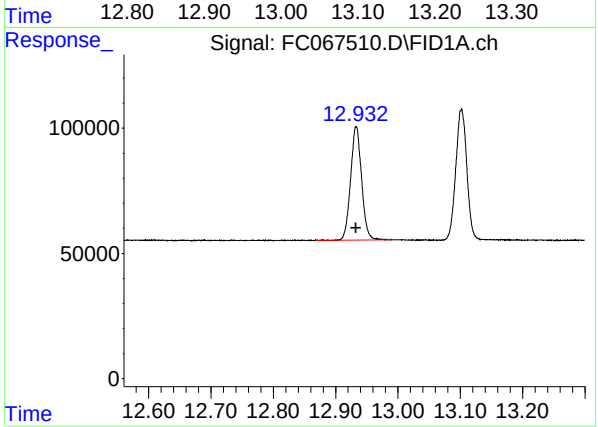
#10 n-Eicosane (C20)

R.T.: 12.491 min
Delta R.T.: 0.000 min
Response: 658066
Conc: 5.22 ug/ml



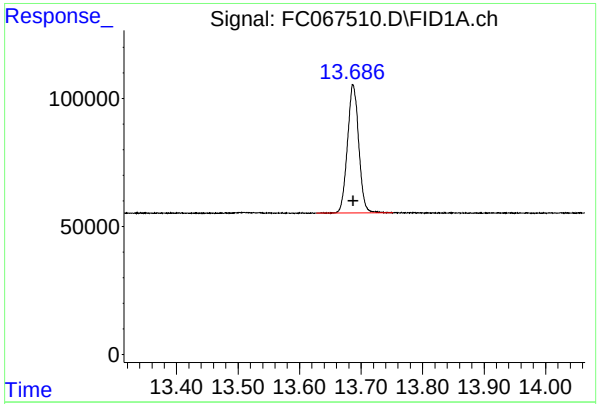
#11 n-Heneicosane (C21)

R.T.: 13.102 min
Delta R.T.: 0.000 min
Response: 641065
Conc: 5.19 ug/ml



#12 1-chlorooctadecane (SURR)

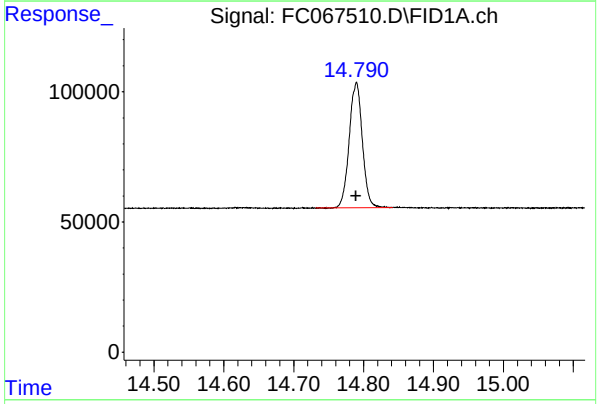
R.T.: 12.933 min
Delta R.T.: 0.000 min
Response: 555182
Conc: 5.14 ug/ml



#13 n-Docosane (C22)

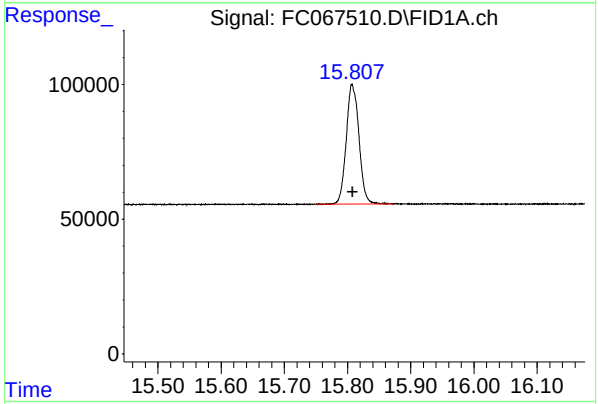
R.T.: 13.687 min
Delta R.T.: 0.000 min
Response: 638712
Conc: 5.22 ug/ml

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5



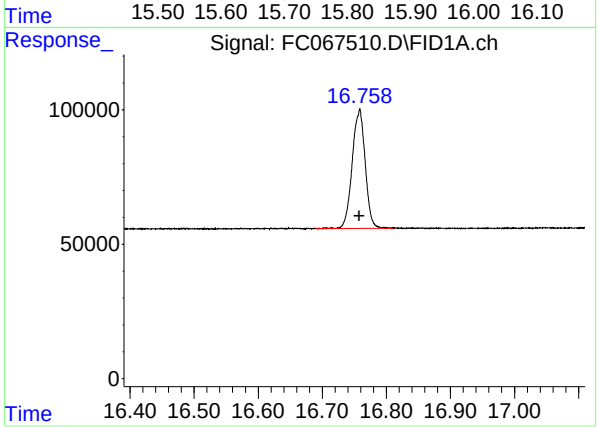
#14 n-Tetracosane (C24)

R.T.: 14.789 min
Delta R.T.: 0.000 min
Response: 629495
Conc: 5.19 ug/ml



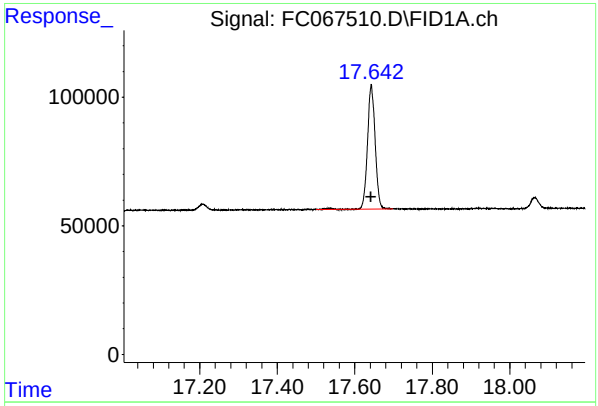
#15 n-Hexacosane (C26)

R.T.: 15.808 min
Delta R.T.: 0.000 min
Response: 620443
Conc: 5.21 ug/ml



#16 n-Octacosane (C28)

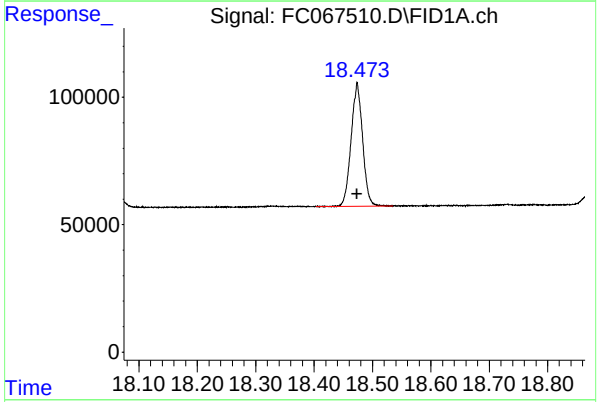
R.T.: 16.758 min
Delta R.T.: 0.000 min
Response: 621629
Conc: 5.28 ug/ml



#17 n-Tricontane (C30)

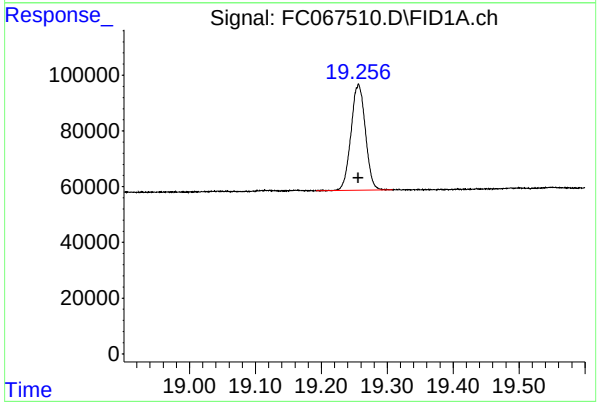
R.T.: 17.643 min
Delta R.T.: 0.000 min
Response: 658247
Conc: 5.45 ug/ml

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5



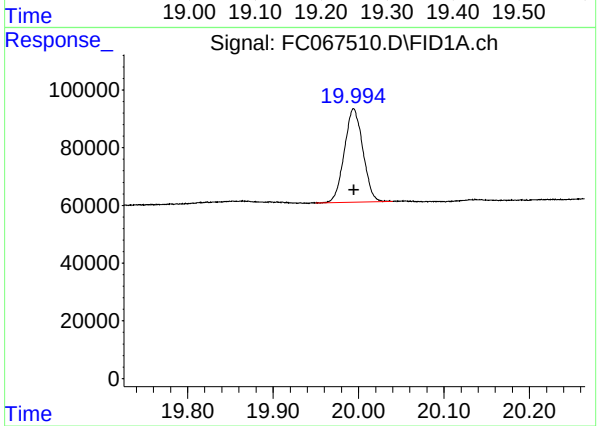
#18 n-Dotriacontane (C32)

R.T.: 18.474 min
Delta R.T.: 0.000 min
Response: 660916
Conc: 5.59 ug/ml



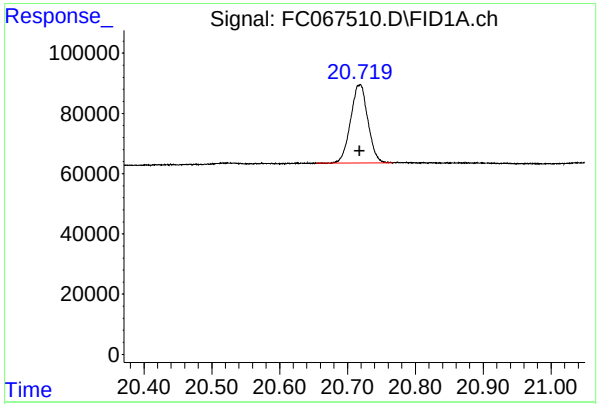
#19 n-Tetratriacontane (C34)

R.T.: 19.256 min
Delta R.T.: 0.000 min
Response: 574804
Conc: 5.49 ug/ml



#20 n-Hexatriacontane (C36)

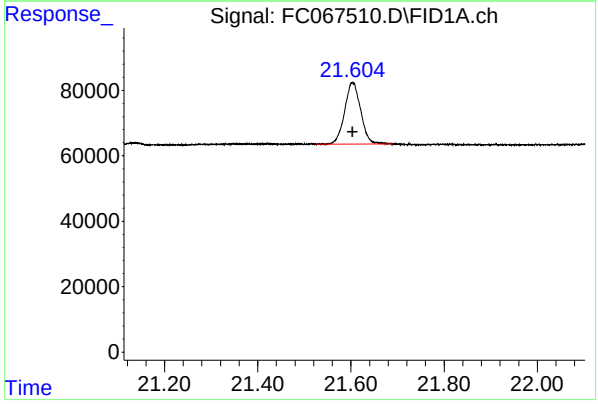
R.T.: 19.994 min
Delta R.T.: 0.000 min
Response: 488556
Conc: 5.37 ug/ml



#21 n-Octatriacontane (C38)

R.T.: 20.718 min
Delta R.T.: 0.000 min
Response: 459107
Conc: 5.30 ug/ml

Instrument :
FID_C
ClientSampleId :
5 PPM ALIPHATIC HC STD5



#22 n-Tetracontane (C40)

R.T.: 21.603 min
Delta R.T.: 0.000 min
Response: 447730
Conc: 5.27 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067510.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 17:38
Sample : 5 PPM ALIPHATIC HC STD5
Misc :
ALS Vial : 15 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.275	3.245	3.320	BB	82274	697792	90.83%	4.975%
2	4.339	4.282	4.399	BB	74065	703136	91.53%	5.013%
3	5.917	5.867	5.985	BB	77688	752949	98.01%	5.368%
4	6.354	6.292	6.412	BB	68794	700270	91.15%	4.993%
5	6.971	6.919	7.057	BB	65640	709834	92.40%	5.061%
6	8.146	8.084	8.214	BB	60655	678328	88.30%	4.836%
7	9.744	9.687	9.804	BB	58521	680213	88.54%	4.850%
8	11.184	11.129	11.237	BB	55995	680709	88.61%	4.853%
9	11.494	11.440	11.550	BB	71976	768220	100.00%	5.477%
10	12.491	12.432	12.549	BB	54755	658066	85.66%	4.692%
11	12.933	12.869	12.992	BB	45156	555182	72.27%	3.958%
12	13.102	13.045	13.145	BB	52087	641065	83.45%	4.571%
13	13.687	13.627	13.752	BB	50083	638712	83.14%	4.554%
14	14.789	14.732	14.842	BB	47789	629495	81.94%	4.488%
15	15.808	15.750	15.872	BB	43825	620443	80.76%	4.424%
16	16.758	16.690	16.810	BB	44656	621629	80.92%	4.432%
17	17.643	17.500	17.699	BB	47945	658247	85.68%	4.693%
18	18.474	18.404	18.535	BB	48459	660916	86.03%	4.712%
19	19.256	19.192	19.309	BB	38187	574804	74.82%	4.098%
20	19.994	19.950	20.040	BB	32420	488556	63.60%	3.483%
21	20.718	20.654	20.767	BB	25975	459107	59.76%	3.273%
22	21.603	21.525	21.690	BB	18849	447730	58.28%	3.192%
			Sum of corrected areas:			14025400		

Aliphatic EPH 102324.M Wed Oct 23 18:22:16 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067511.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 18:14
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD ICV
Misc :
ALS Vial : 16 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV

Integration File: autoint1.e
Quant Time: Oct 23 18:51:58 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9) S	ortho-Terphenyl (SURR)	11.496	2853188	19.445 ug/ml
Spiked Amount	50.000		Recovery =	38.89%
12) S	1-chlorooctadecane (S...	12.935	2112213	19.560 ug/ml
Spiked Amount	50.000		Recovery =	39.12%
	Target Compounds			
1) T	n-Nonane (C9)	3.274	2613683	19.401 ug/ml
2) T	n-Decane (C10)	4.339	2649286	19.445 ug/ml
3) T	A~Naphthalene (C11.7)	5.916	2894144	19.530 ug/ml
4) T	n-Dodecane (C12)	6.354	2640477	19.495 ug/ml
5) T	A~2-methylnaphthalene...	6.971	2771002	19.622 ug/ml
6) T	n-Tetradecane (C14)	8.147	2559793	19.502 ug/ml
7) T	n-Hexadecane (C16)	9.744	2585935	19.575 ug/ml
8) T	n-Octadecane (C18)	11.185	2593351	19.630 ug/ml
10) T	n-Eicosane (C20)	12.493	2466507	19.548 ug/ml
11) T	n-Heneicosane (C21)	13.103	2414000	19.560 ug/ml
13) T	n-Docosane (C22)	13.688	2390568	19.523 ug/ml
14) T	n-Tetracosane (C24)	14.790	2369147	19.546 ug/ml
15) T	n-Hexacosane (C26)	15.809	2326770	19.544 ug/ml
16) T	n-Octacosane (C28)	16.757	2297199	19.526 ug/ml
17) T	n-Tricontane (C30)	17.643	2353840	19.474 ug/ml
18) T	n-Dotriacontane (C32)	18.474	2301371	19.450 ug/ml
19) T	n-Tetratriacontane (C34)	19.258	2044186	19.519 ug/ml
20) T	n-Hexatriacontane (C36)	19.996	1784212	19.601 ug/ml
21) T	n-Octatriacontane (C38)	20.719	1698313	19.610 ug/ml
22) T	n-Tetracontane (C40)	21.604	1661417	19.544 ug/ml

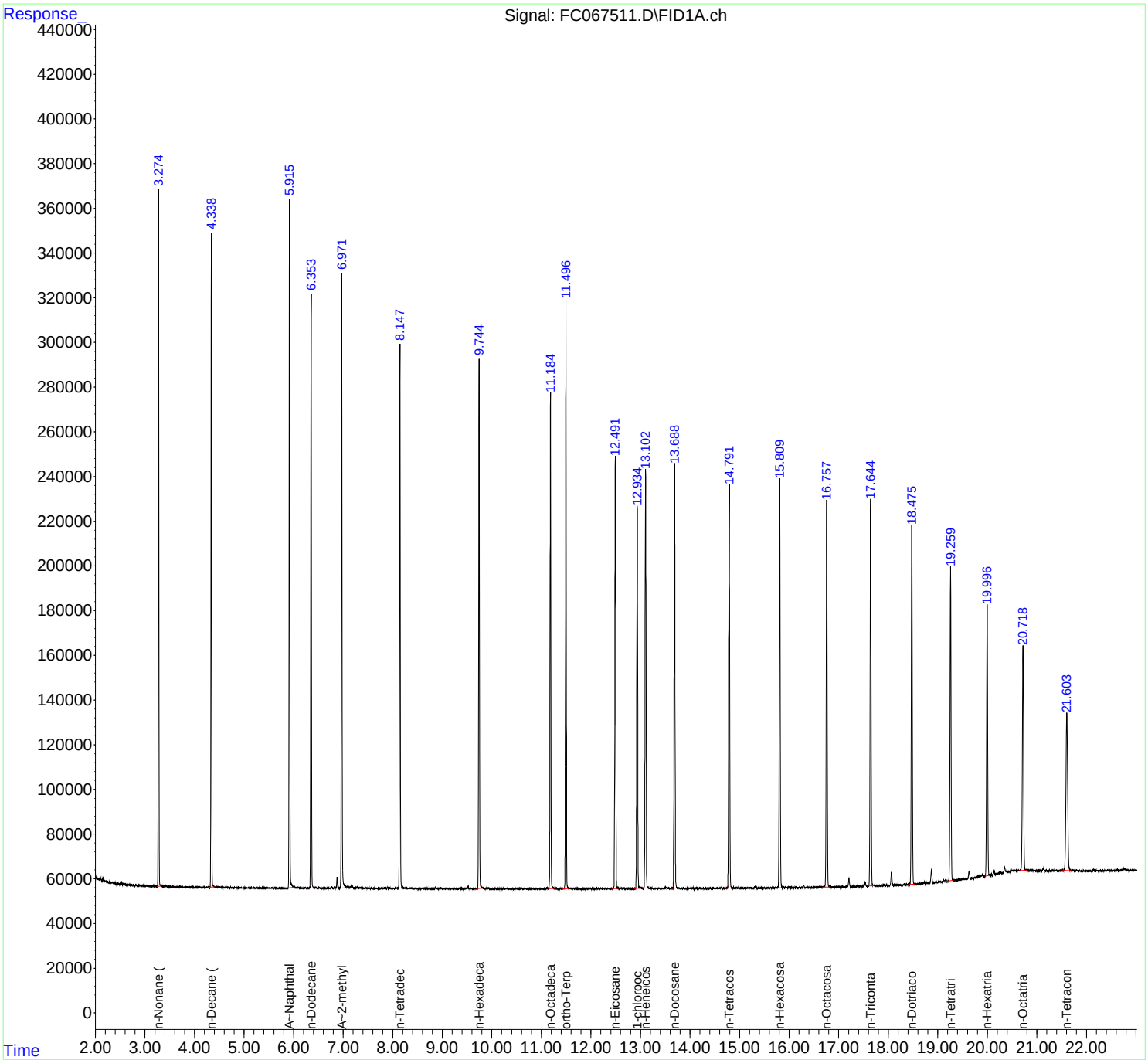
(f)=RT Delta > 1/2 Window (m)=manual int.

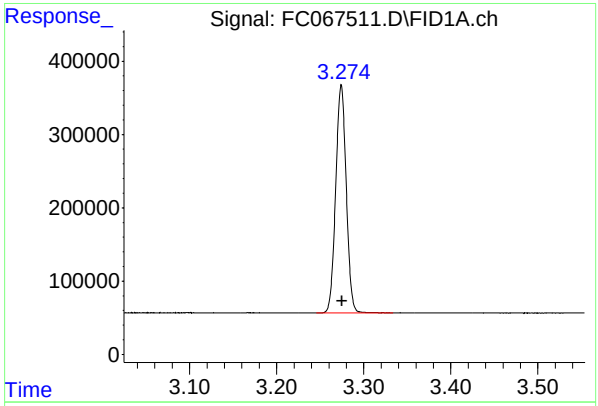
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067511.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 18:14
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD ICV
Misc :
ALS Vial : 16 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV

Integration File: autoint1.e
Quant Time: Oct 23 18:51:58 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

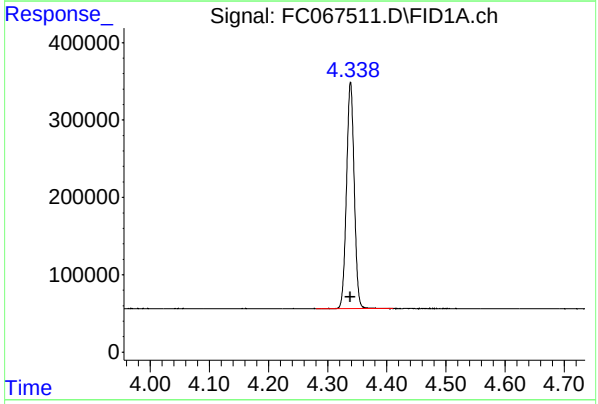




#1 n-Nonane (C9)

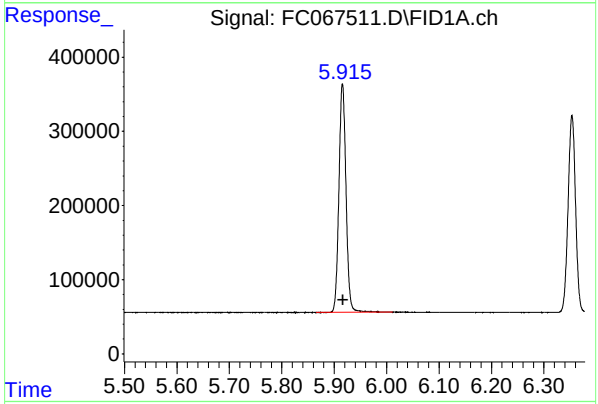
R.T.: 3.274 min
Delta R.T.: 0.000 min
Response: 2613683
Conc: 19.40 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV



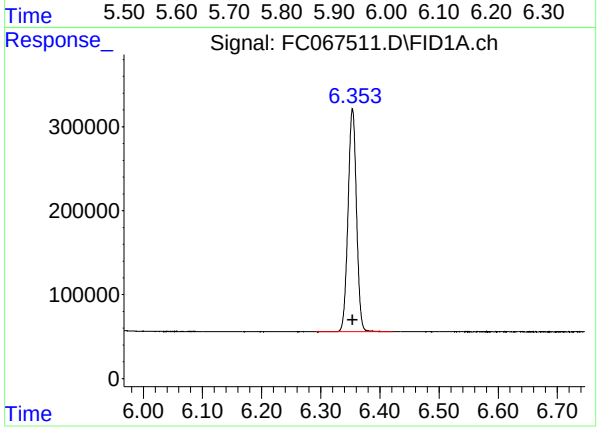
#2 n-Decane (C10)

R.T.: 4.339 min
Delta R.T.: 0.000 min
Response: 2649286
Conc: 19.44 ug/ml



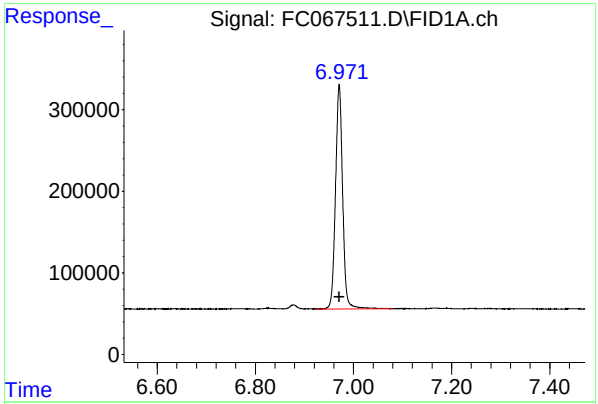
#3 A~Naphthalene (C11.7)

R.T.: 5.916 min
Delta R.T.: 0.000 min
Response: 2894144
Conc: 19.53 ug/ml



#4 n-Dodecane (C12)

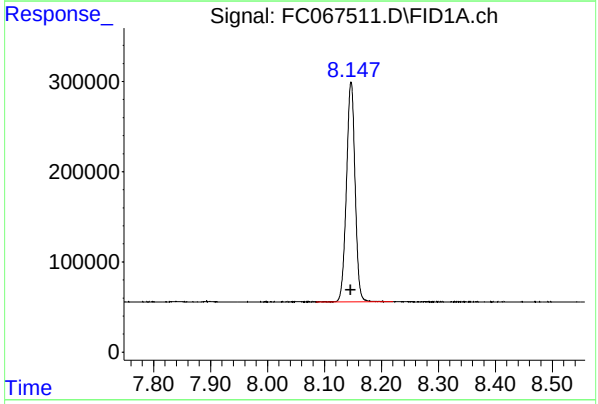
R.T.: 6.354 min
Delta R.T.: 0.000 min
Response: 2640477
Conc: 19.50 ug/ml



#5 A~2-methylnaphthalene (C12.89)

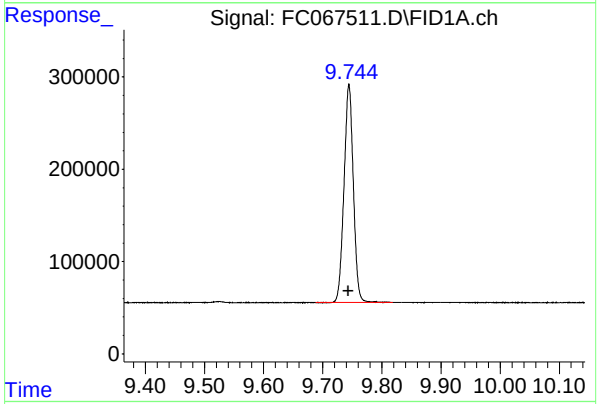
R.T.: 6.971 min
Delta R.T.: 0.000 min
Response: 2771002
Conc: 19.62 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV



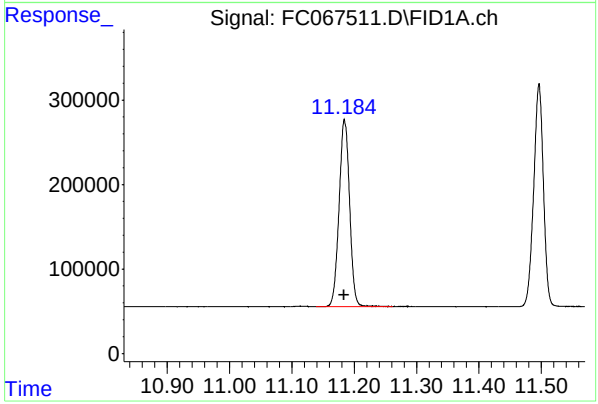
#6 n-Tetradecane (C14)

R.T.: 8.147 min
Delta R.T.: 0.000 min
Response: 2559793
Conc: 19.50 ug/ml



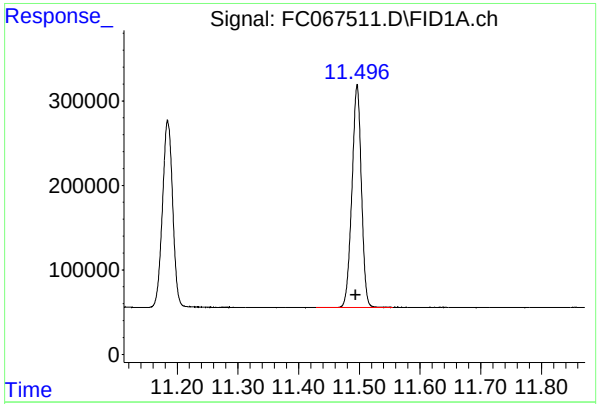
#7 n-Hexadecane (C16)

R.T.: 9.744 min
Delta R.T.: 0.000 min
Response: 2585935
Conc: 19.58 ug/ml



#8 n-Octadecane (C18)

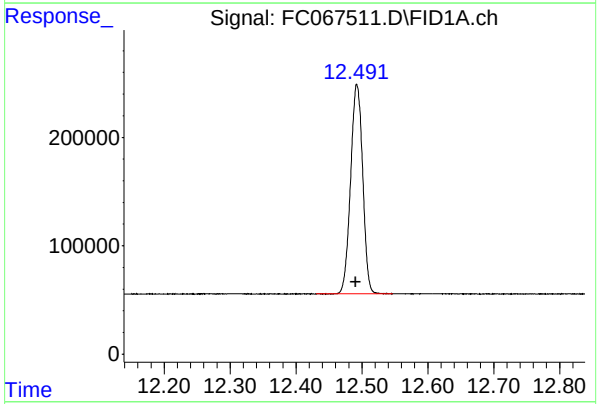
R.T.: 11.185 min
Delta R.T.: 0.000 min
Response: 2593351
Conc: 19.63 ug/ml



#9 ortho-Terphenyl (SURR)

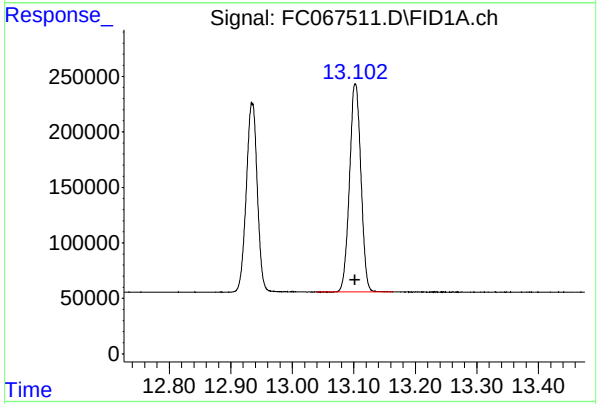
R.T.: 11.496 min
Delta R.T.: 0.002 min
Response: 2853188
Conc: 19.44 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV



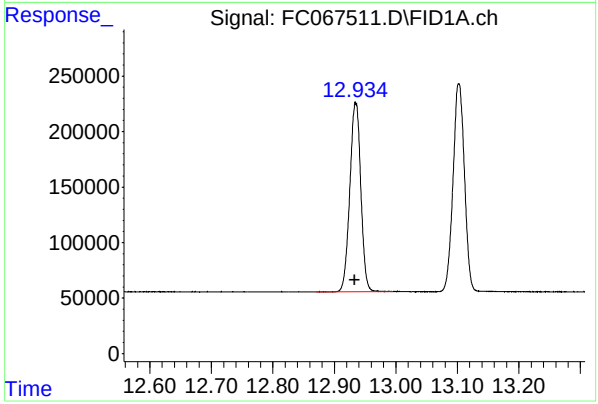
#10 n-Eicosane (C20)

R.T.: 12.493 min
Delta R.T.: 0.002 min
Response: 2466507
Conc: 19.55 ug/ml



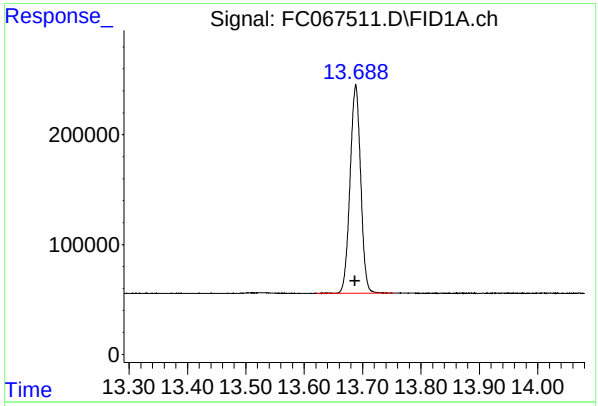
#11 n-Heneicosane (C21)

R.T.: 13.103 min
Delta R.T.: 0.000 min
Response: 2414000
Conc: 19.56 ug/ml



#12 1-chlorooctadecane (SURR)

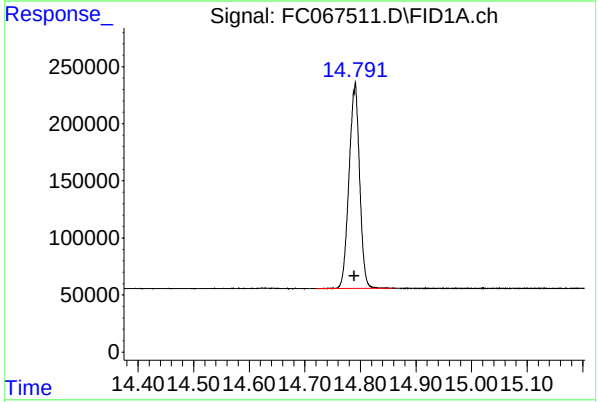
R.T.: 12.935 min
Delta R.T.: 0.002 min
Response: 2112213
Conc: 19.56 ug/ml



#13 n-Docosane (C22)

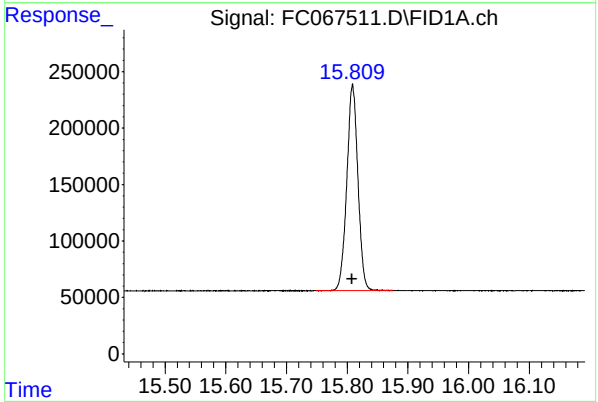
R.T.: 13.688 min
Delta R.T.: 0.000 min
Response: 2390568
Conc: 19.52 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV



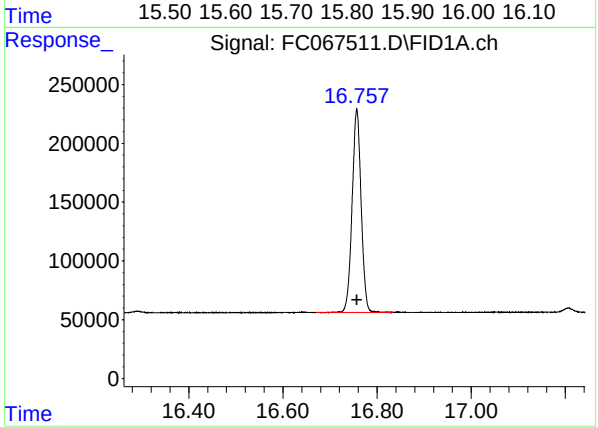
#14 n-Tetracosane (C24)

R.T.: 14.790 min
Delta R.T.: 0.000 min
Response: 2369147
Conc: 19.55 ug/ml



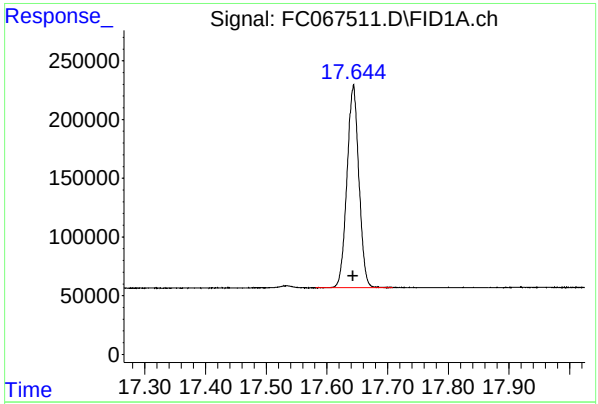
#15 n-Hexacosane (C26)

R.T.: 15.809 min
Delta R.T.: 0.001 min
Response: 2326770
Conc: 19.54 ug/ml



#16 n-Octacosane (C28)

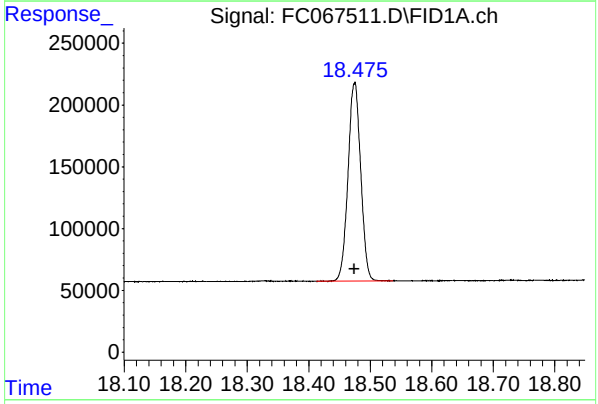
R.T.: 16.757 min
Delta R.T.: 0.000 min
Response: 2297199
Conc: 19.53 ug/ml



#17 n-Tricontane (C30)

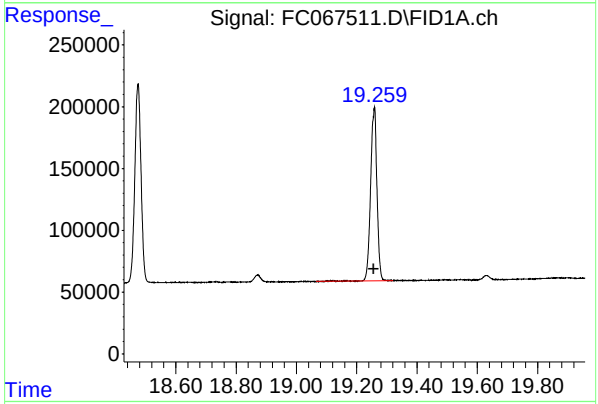
R.T.: 17.643 min
Delta R.T.: 0.000 min
Response: 2353840
Conc: 19.47 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV



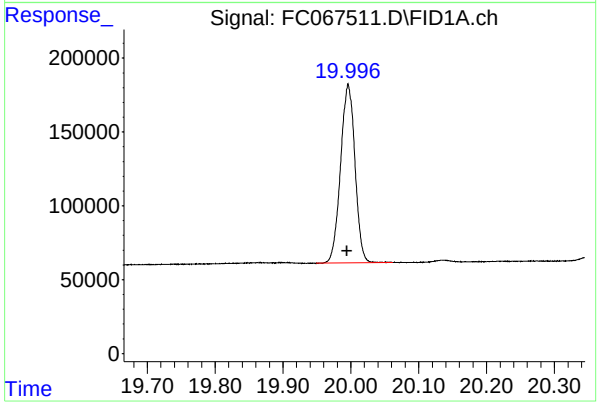
#18 n-Dotriacontane (C32)

R.T.: 18.474 min
Delta R.T.: 0.000 min
Response: 2301371
Conc: 19.45 ug/ml



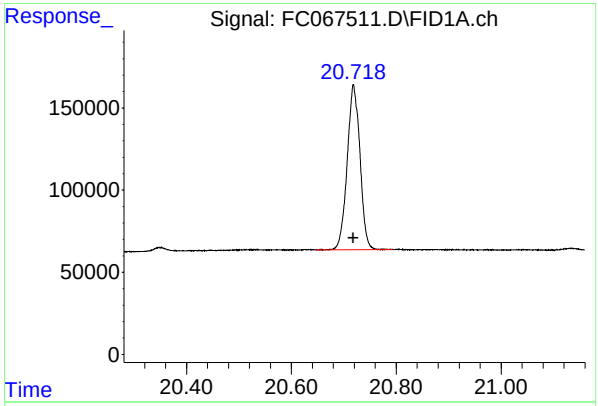
#19 n-Tetratriacontane (C34)

R.T.: 19.258 min
Delta R.T.: 0.002 min
Response: 2044186
Conc: 19.52 ug/ml



#20 n-Hexatriacontane (C36)

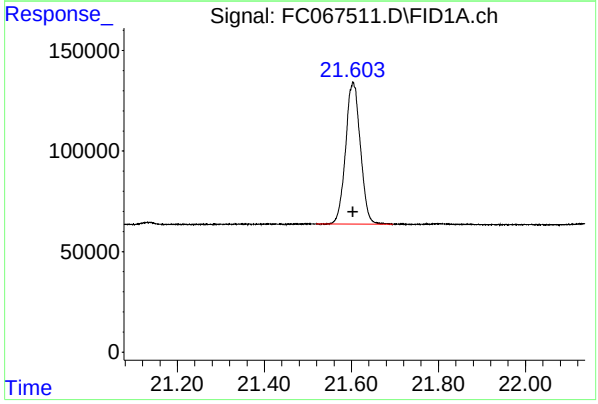
R.T.: 19.996 min
Delta R.T.: 0.002 min
Response: 1784212
Conc: 19.60 ug/ml



#21 n-Octatriacontane (C38)

R.T.: 20.719 min
Delta R.T.: 0.000 min
Response: 1698313
Conc: 19.61 ug/ml

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD ICV



#22 n-Tetracontane (C40)

R.T.: 21.604 min
Delta R.T.: 0.000 min
Response: 1661417
Conc: 19.54 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC102324AL\
Data File : FC067511.D
Signal(s) : FID1A.ch
Acq On : 23 Oct 2024 18:14
Sample : 20 PPM ALIPHATIC HC STD ICV
Misc :
ALS Vial : 16 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.274	3.245	3.334	BB	310826	2613683	90.31%	4.990%
2	4.339	4.280	4.410	BB	292955	2649286	91.54%	5.058%
3	5.916	5.865	6.012	BB	308318	2894144	100.00%	5.525%
4	6.354	6.292	6.422	BB	265716	2640477	91.24%	5.041%
5	6.971	6.924	7.080	BB	274073	2771002	95.75%	5.290%
6	8.147	8.085	8.220	BB	244098	2559793	88.45%	4.887%
7	9.744	9.689	9.819	BB	236009	2585935	89.35%	4.937%
8	11.185	11.139	11.262	BB	218367	2593351	89.61%	4.951%
9	11.496	11.429	11.555	BB	264747	2853188	98.58%	5.447%
10	12.493	12.430	12.547	BB	193698	2466507	85.22%	4.709%
11	12.935	12.870	12.995	BB	169232	2112213	72.98%	4.032%
12	13.103	13.039	13.164	BB	187529	2414000	83.41%	4.609%
13	13.688	13.620	13.752	BB	190590	2390568	82.60%	4.564%
14	14.790	14.720	14.859	BB	178398	2369147	81.86%	4.523%
15	15.809	15.749	15.875	BB	181908	2326770	80.40%	4.442%
16	16.757	16.670	16.834	BB	173028	2297199	79.37%	4.386%
17	17.643	17.582	17.709	BB	172064	2353840	81.33%	4.494%
18	18.474	18.412	18.537	BB	160280	2301371	79.52%	4.394%
19	19.258	19.065	19.320	BB	140731	2044186	70.63%	3.903%
20	19.996	19.949	20.062	BB	120232	1784212	61.65%	3.406%
21	20.719	20.647	20.794	BB	100162	1698313	58.68%	3.242%
22	21.604	21.519	21.695	BB	70657	1661417	57.41%	3.172%
			Sum of corrected areas:			52380600		

Aliphatic EPH 102324.M Wed Oct 23 18:53:21 2024

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

Inital Calibration Report for SequenceID : FD102324AR

AreaCount

Parameter Range	FD048568.D	FD048569.D	FD048570.D	FD048571.D	FD048572.D	
Aromatic C10-C12	34560081.000	17413124.000	7062069.000	3602660.000	1773971.000	
Aromatic C12-C16	51756513.000	26214353.000	10660566.000	5474983.000	2683618.000	
Aromatic C16-C21	64464447.000	32614919.000	13171585.000	6675037.000	3268126.000	
Aromatic C21-C36	134161995.000	67904676.000	27627174.000	14154223.000	6877987.000	
Aromatic EPH	284943036.000	144147072.000	58521394.000	29906903.000	14603702.000	

AVG Response Factor

Parameter Range	AVG RF	% RSD				
Aromatic C10-C12	176202.694	1.627				
Aromatic C12-C16	177273.4926664	2.167				
Aromatic C16-C21	163832.55	1.288				
Aromatic C21-C36	152713.1526664	2.017				
Aromatic EPH	161887.4688884	1.816				

Concentration

Parameter Range	FD048568.D	FD048569.D	FD048570.D	FD048571.D	FD048572.D	
Aromatic C10-C12	200.000	100.000	40.000	20.000	10.000	
Aromatic C12-C16	300.000	150.000	60.000	30.000	15.000	
Aromatic C16-C21	400.000	200.000	80.000	40.000	20.000	
Aromatic C21-C36	900.000	450.000	180.000	90.000	45.000	
Aromatic EPH	1800.000	900.000	360.000	180.000	90.000	

Response Factor

Parameter Range	FD048568.D	FD048569.D	FD048570.D	FD048571.D	FD048572.D	
Aromatic C10-C12	172800.405000	174131.240000	176551.725000	180133.000000	177397.100000	
Aromatic C12-C16	172521.710000	174762.353333	177676.100000	182499.433333	178907.866666	
Aromatic C16-C21	161161.117500	163074.595000	164644.812500	166875.925000	163406.300000	
Aromatic C21-C36	149068.883333	150899.280000	153484.300000	157269.144444	152844.155555	
Aromatic EPH	158301.686666	160163.413333	162559.427777	166149.461111	162263.355555	

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048568.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 15:12
Operator : YP/AJ
Sample : 100 PPM AROMATIC HC STD1
Misc :
ALS Vial : 61 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1

Integration File: autoint1.e
Quant Time: Oct 23 17:13:28 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:09:25 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4)	S 2-Bromonaphthalene (S...	7.379	14919837	98.962 ug/ml
	Spiked Amount 50.000		Recovery = 197.92%	
6)	S 2-Flurobiphenyl (SURR)	8.230	10015694	100.124 ug/ml
	Spiked Amount 50.000 Range 0 - 131		Recovery = 200.25%#	
11)	S ortho-Terphenyl (SURR)	11.267	16385129	98.289 ug/ml
	Spiked Amount 50.000		Recovery = 196.58%	
	Target Compounds			
1)	T 1,2,3-Trimethylbenzen...	4.199	16947170	98.911 ug/ml
2)	T Naphthalene (C11.7)	5.719	17612911	98.941 ug/ml
3)	T 2-Methylnaphthalene (...	6.767	17624448	99.004 ug/ml
5)	T Acenaphthylene (C15.06)	8.034	17045088	98.400 ug/ml
7)	T Acenaphthene (C15.5)	8.331	17086977	98.169 ug/ml
8)	T Flouorene (C16.55)	9.109	16673063	98.964 ug/ml
9)	T Phenanthrene (C19.36)	10.496	16410378	99.314 ug/ml
10)	T Anthracene (C19.43)	10.573	15569819	98.435 ug/ml
12)	T Fluoranthene (C21.85)	12.302	15981856	98.532 ug/ml
13)	T Pyrene (C20.8)	12.596	15811187	98.991 ug/ml
14)	T Benzo[a]anthracene (C...	14.466	14979852	100.189 ug/ml
15)	T Chrysene (C27.41)	14.512	15332543	97.081 ug/ml
16)	T benzo[b]fluoranthene ...	16.016	15350623	99.928 ug/ml
17)	T Bnezo[k]fluoranthene ...	16.054	14161475	97.899 ug/ml
18)	T Benzo[a]pyrene (C31.34)	16.395	14921521	99.306 ug/ml
19)	T Indeno[1,2,3-cd]pyren...	17.761	14261058	103.933 ug/ml
20)	T Dibenz[a,h]anthracene...	17.801	14330700	95.355 ug/ml
21)	T Benzo[g,h,i]perylene ...	18.019	14842367	98.211 ug/ml

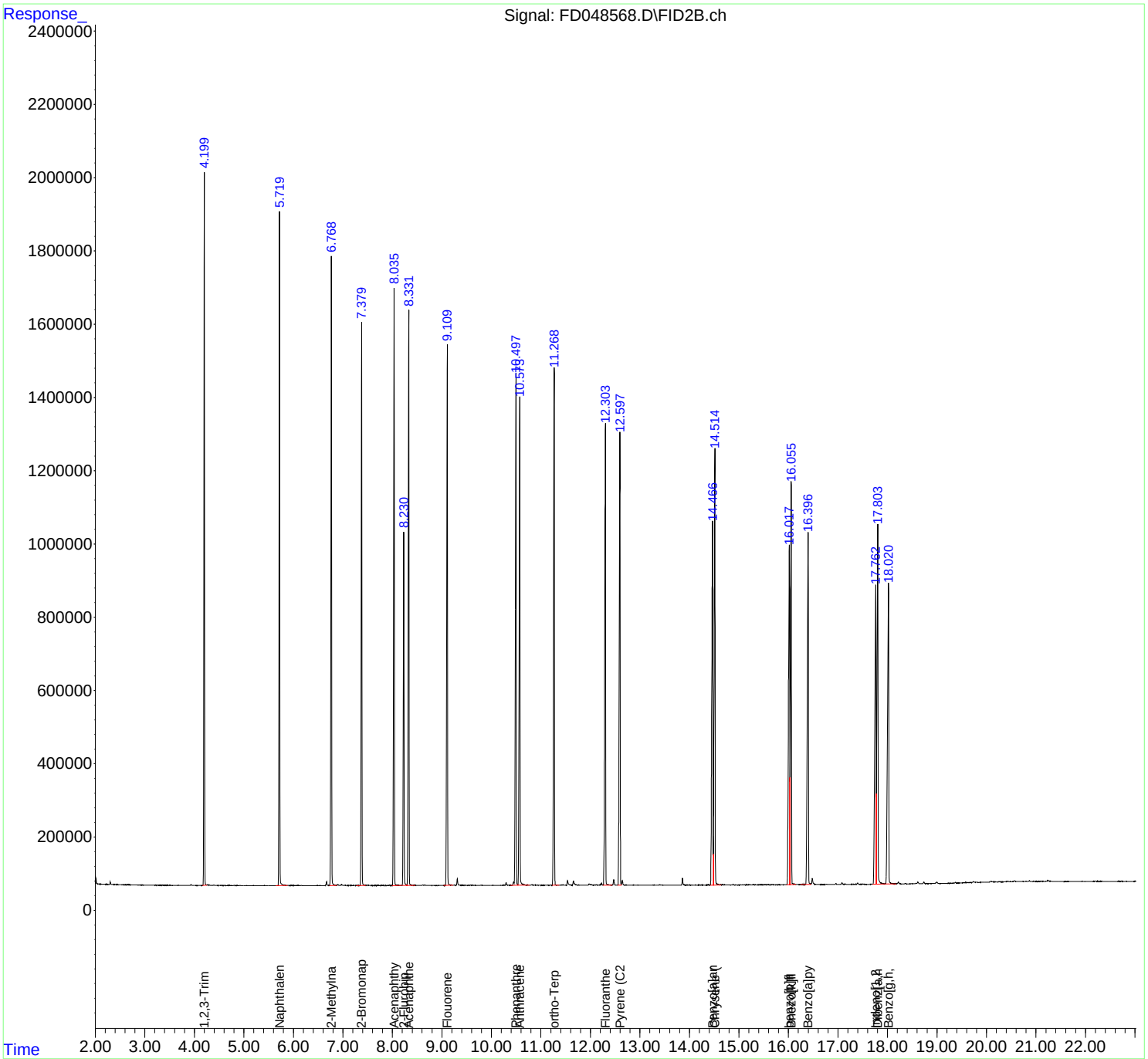
(f)=RT Delta > 1/2 Window (m)=manual int.

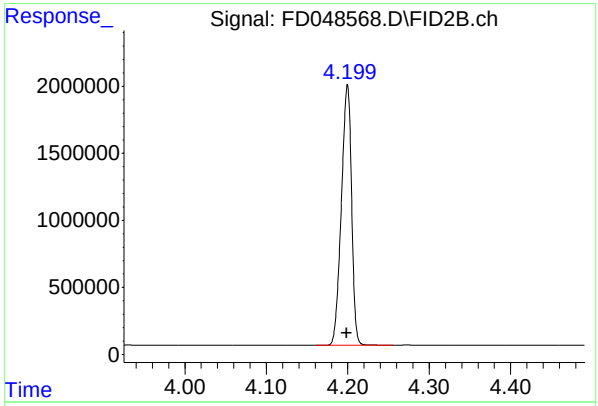
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048568.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 15:12
Operator : YP/AJ
Sample : 100 PPM AROMATIC HC STD1
Misc :
ALS Vial : 61 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1

Integration File: autoint1.e
Quant Time: Oct 23 17:13:28 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:09:25 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

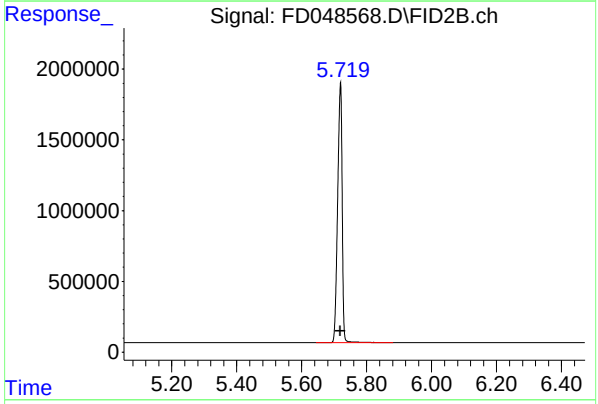




#1 1,2,3-Trimethylbenzene (C10.1)

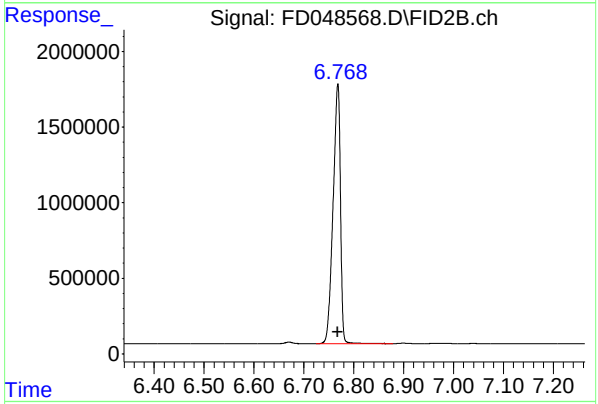
R.T.: 4.199 min
Delta R.T.: 0.000 min
Response: 16947170
Conc: 98.91 ug/ml

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1



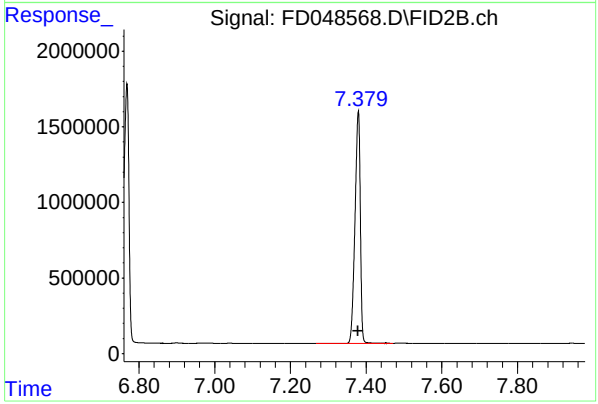
#2 Naphthalene (C11.7)

R.T.: 5.719 min
Delta R.T.: 0.000 min
Response: 17612911
Conc: 98.94 ug/ml



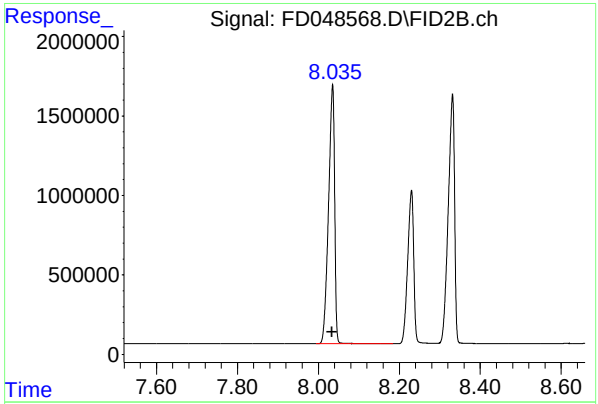
#3 2-Methylnaphthalene (C12.89)

R.T.: 6.767 min
Delta R.T.: 0.000 min
Response: 17624448
Conc: 99.00 ug/ml



#4 2-Bromonaphthalene (SURR)

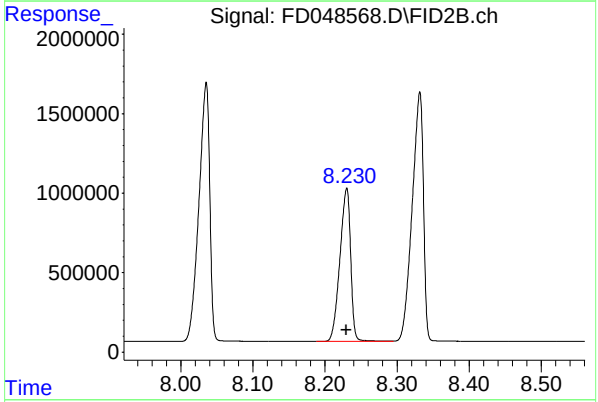
R.T.: 7.379 min
Delta R.T.: 0.000 min
Response: 14919837
Conc: 98.96 ug/ml



#5 Acenaphthylene (C15.06)

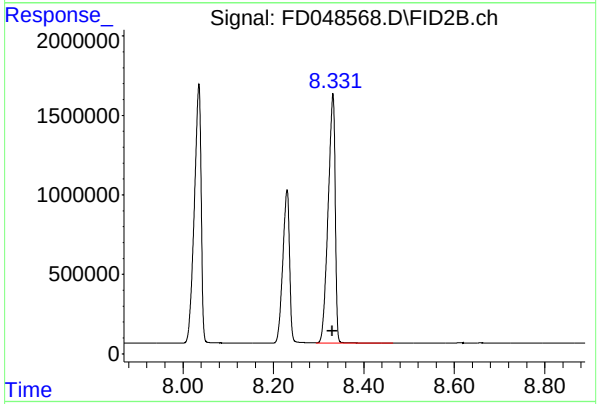
R.T.: 8.034 min
Delta R.T.: 0.000 min
Response: 17045088
Conc: 98.40 ug/ml

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1



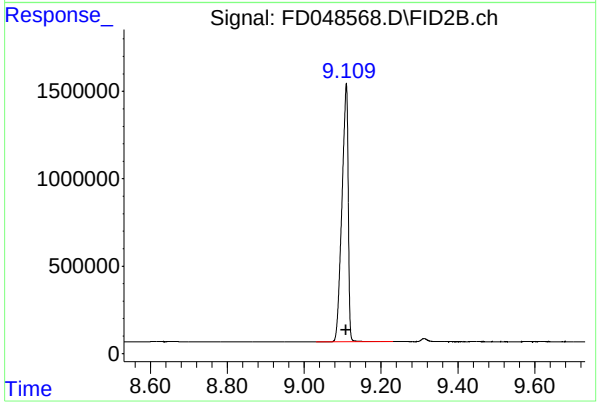
#6 2-Flurobiphenyl (SURR)

R.T.: 8.230 min
Delta R.T.: 0.000 min
Response: 10015694
Conc: 100.12 ug/ml



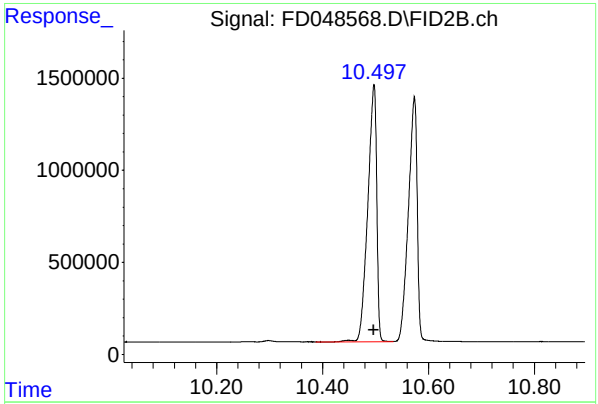
#7 Acenaphthene (C15.5)

R.T.: 8.331 min
Delta R.T.: 0.000 min
Response: 17086977
Conc: 98.17 ug/ml



#8 Flouorene (C16.55)

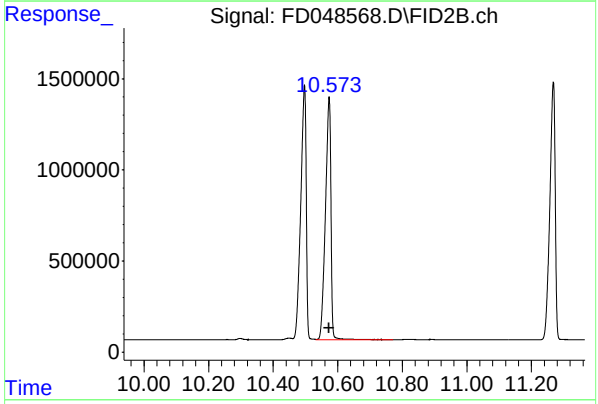
R.T.: 9.109 min
Delta R.T.: 0.000 min
Response: 16673063
Conc: 98.96 ug/ml



#9 Phenanthrene (C19.36)

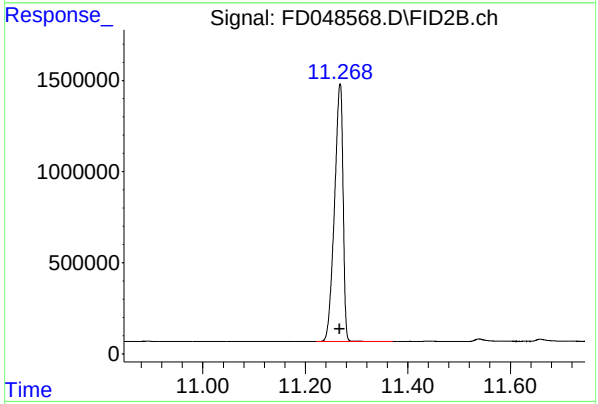
R.T.: 10.496 min
Delta R.T.: 0.000 min
Response: 16410378
Conc: 99.31 ug/ml

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1



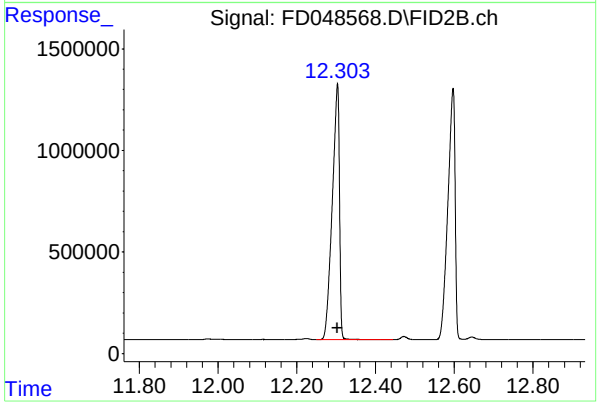
#10 Anthracene (C19.43)

R.T.: 10.573 min
Delta R.T.: 0.000 min
Response: 15569819
Conc: 98.44 ug/ml



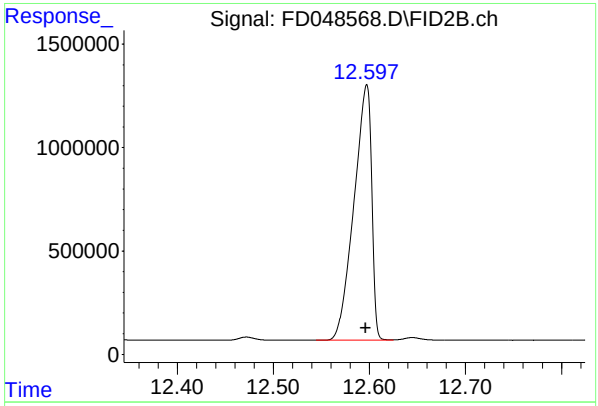
#11 ortho-Terphenyl (SURR)

R.T.: 11.267 min
Delta R.T.: 0.000 min
Response: 16385129
Conc: 98.29 ug/ml



#12 Fluoranthene (C21.85)

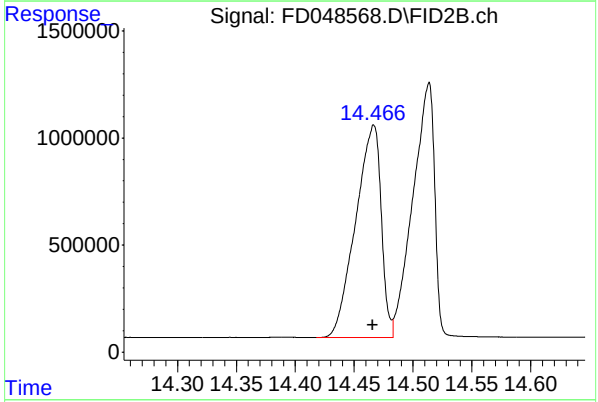
R.T.: 12.302 min
Delta R.T.: 0.000 min
Response: 15981856
Conc: 98.53 ug/ml



#13 Pyrene (C20.8)

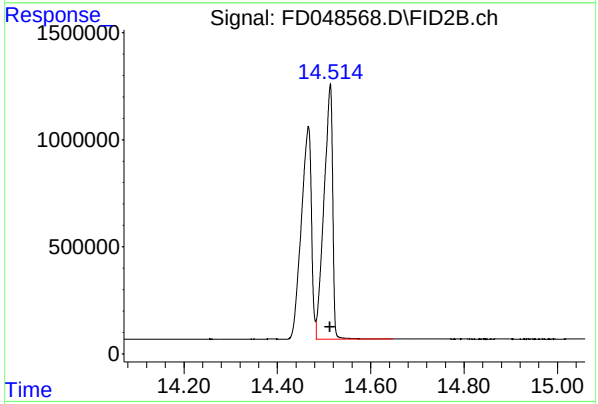
R.T.: 12.596 min
Delta R.T.: 0.000 min
Response: 15811187
Conc: 98.99 ug/ml

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1



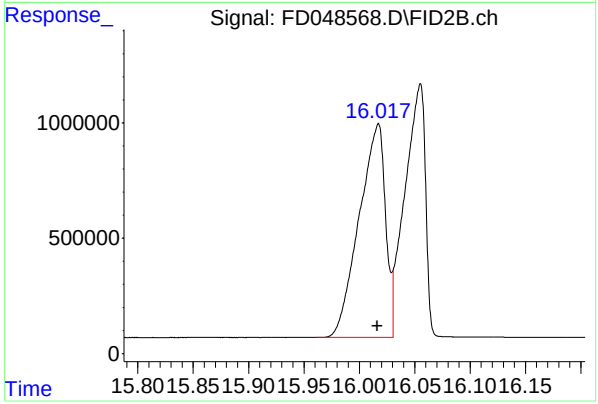
#14 Benzo[a]anthracene (C26.37)

R.T.: 14.466 min
Delta R.T.: 0.000 min
Response: 14979852
Conc: 100.19 ug/ml



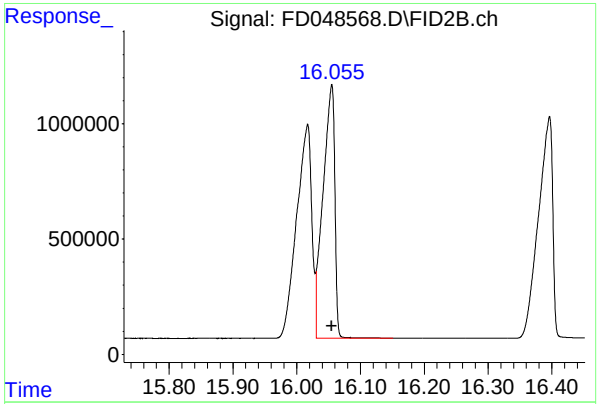
#15 Chrysene (C27.41)

R.T.: 14.512 min
Delta R.T.: 0.000 min
Response: 15332543
Conc: 97.08 ug/ml



#16 benzo[b]fluoranthene (C30.41)

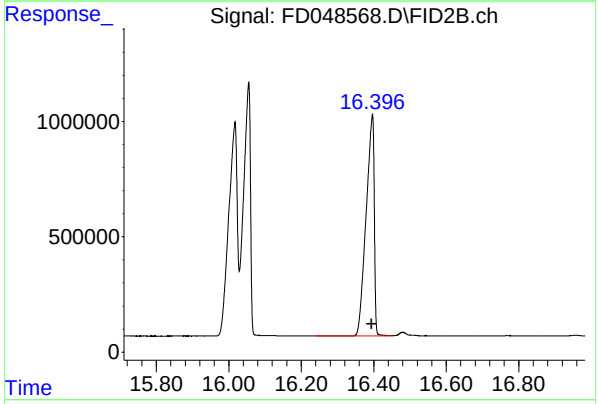
R.T.: 16.016 min
Delta R.T.: 0.000 min
Response: 15350623
Conc: 99.93 ug/ml



#17 Bnezo[k]fluoranthene (C30.14)

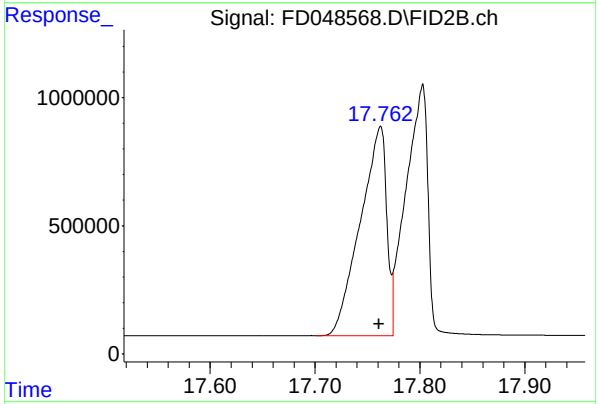
R.T.: 16.054 min
Delta R.T.: -0.001 mi
Response: 14161475
Conc: 97.90 ug/m

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1



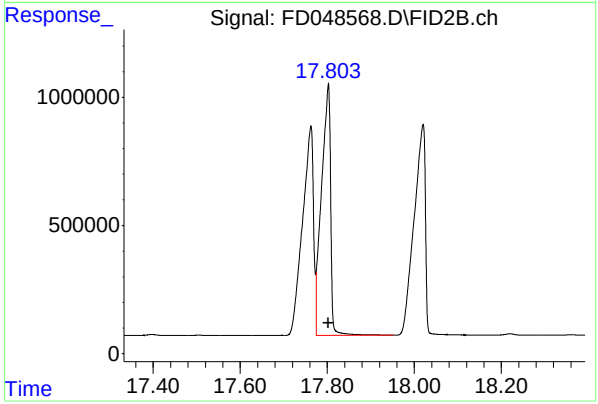
#18 Benzo[a]pyrene (C31.34)

R.T.: 16.395 min
Delta R.T.: 0.000 min
Response: 14921521
Conc: 99.31 ug/ml



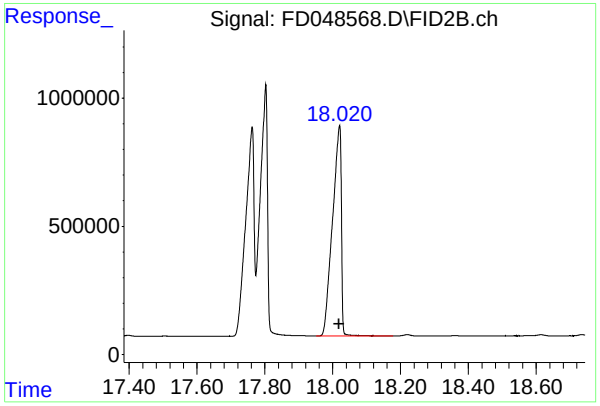
#19 Indeno[1,2,3-cd]pyrene (C35.01)

R.T.: 17.761 min
Delta R.T.: 0.000 min
Response: 14261058
Conc: 103.93 ug/ml



#20 Dibenz[a,h]anthracene (C30.36)

R.T.: 17.801 min
Delta R.T.: -0.002 min
Response: 14330700
Conc: 95.35 ug/ml



#21 Benzo[g,h,i]perylene (C34.01)

R.T.: 18.019 min
Delta R.T.: 0.000 mi
Response: 14842367
Conc: 98.21 ug/m

Instrument :
FID_D
ClientSampleId :
100 PPM AROMATIC HC STD1

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048568.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 15:12
Sample : 100 PPM AROMATIC HC STD1
Misc :
ALS Vial : 61 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.199	4.161	4.256	BV	1903452	16947170	96.16%	5.194%
2	5.719	5.644	5.881	BV	1794310	17612911	99.93%	5.398%
3	6.767	6.724	6.878	PV	1721582	17624448	100.00%	5.402%
4	7.379	7.268	7.471	PV	1511924	14919837	84.65%	4.573%
5	8.034	7.994	8.184	BB	1618840	17045088	96.71%	5.224%
6	8.230	8.188	8.294	BV	985430	10015694	56.83%	3.070%
7	8.331	8.294	8.464	VB	1571009	17086977	96.95%	5.237%
8	9.109	9.031	9.231	BB	1435050	16673063	94.60%	5.110%
9	10.496	10.388	10.533	BV	1431777	16410378	93.11%	5.030%
10	10.573	10.533	10.771	VB	1362012	15569819	88.34%	4.772%
11	11.267	11.221	11.371	BV	1423748	16385129	92.97%	5.022%
12	12.302	12.249	12.444	VV	1225147	15981856	90.68%	4.898%
13	12.596	12.544	12.624	BV	1267297	15811187	89.71%	4.846%
14	14.466	14.418	14.483	PV	976483	14979852	84.99%	4.591%
15	14.512	14.483	14.648	VB	1164623	15332543	87.00%	4.699%
16	16.016	15.961	16.031	BV	945594	15350623	87.10%	4.705%
17	16.054	16.031	16.151	VB	1101985	14161475	80.35%	4.340%
18	16.395	16.241	16.453	BV	941300	14921521	84.66%	4.573%
19	17.761	17.701	17.774	BV	810590	14261058	80.92%	4.371%
20	17.801	17.774	17.951	VV	963681	14330700	81.31%	4.392%
21	18.019	17.951	18.178	VV	811340	14842367	84.21%	4.549%

Sum of corrected areas: 326263695

Aromatic EPH 102324.M Wed Oct 23 18:16:59 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048569.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 15:48
Operator : YP/AJ
Sample : 50 PPM AROMATIC HC STD2
Misc :
ALS Vial : 62 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2

Integration File: autoint1.e
Quant Time: Oct 23 17:15:21 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:09:25 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4)	S 2-Bromonaphthalene (S...	7.375	7529591	49.962 ug/ml
	Spiked Amount 50.000		Recovery = 99.92%	
6)	S 2-Flurobiphenyl (SURR)	8.225	5021501	50.132 ug/ml
	Spiked Amount 50.000 Range 0 - 131		Recovery = 100.26%	
11)	S ortho-Terphenyl (SURR)	11.261	8334280	49.996 ug/ml
	Spiked Amount 50.000		Recovery = 99.99%	
	Target Compounds			
1)	T 1,2,3-Trimethylbenzen...	4.196	8539641	49.894 ug/ml
2)	T Naphthalene (C11.7)	5.715	8873483	49.898 ug/ml
3)	T 2-Methylnaphthalene (...	6.762	8891978	49.967 ug/ml
5)	T Acenaphthylene (C15.06)	8.029	8649197	49.954 ug/ml
7)	T Acenaphthene (C15.5)	8.324	8673178	49.886 ug/ml
8)	T Flouorene (C16.55)	9.102	8428307	50.018 ug/ml
9)	T Phenanthrene (C19.36)	10.489	8272929	50.044 ug/ml
10)	T Anthracene (C19.43)	10.565	7888616	49.915 ug/ml
12)	T Fluoranthene (C21.85)	12.294	8076662	49.863 ug/ml
13)	T Pyrene (C20.8)	12.587	8025067	50.162 ug/ml
14)	T Benzo[a]anthracene (C...	14.456	7527575	50.230 ug/ml
15)	T Chrysene (C27.41)	14.500	7833293	49.731 ug/ml
16)	T benzo[b]fluoranthene ...	16.005	7671770	49.961 ug/ml
17)	T Bnezo[k]fluoranthene ...	16.039	7231888	49.599 ug/ml
18)	T Benzo[a]pyrene (C31.34)	16.381	7547267	50.152 ug/ml
19)	T Indeno[1,2,3-cd]pyren...	17.747	6949708	50.431 ug/ml
20)	T Dibenz[a,h]anthracene...	17.785	7539487	49.466 ug/ml
21)	T Benzo[g,h,i]perylene ...	18.000	7527026	49.870 ug/ml

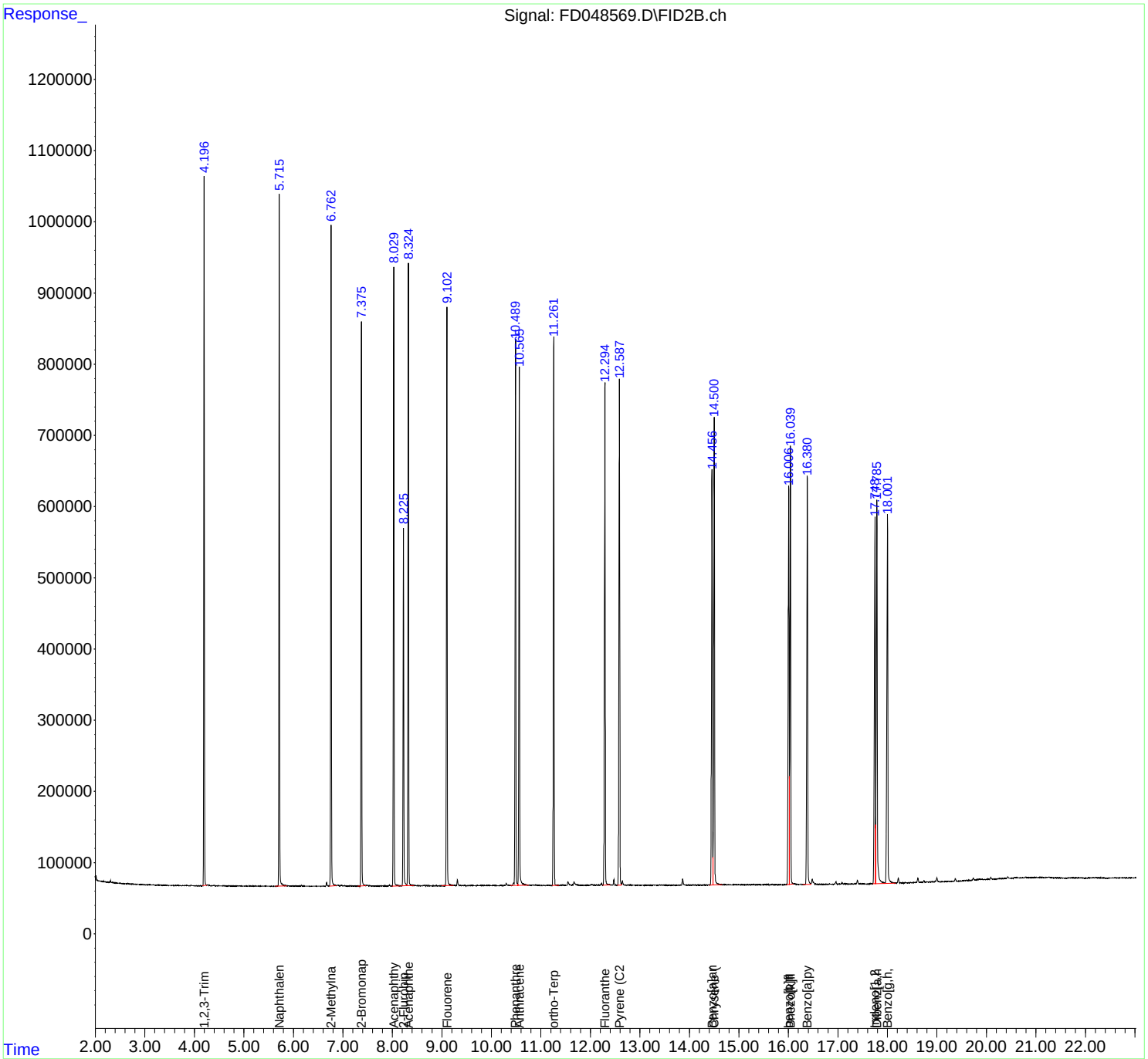
(f)=RT Delta > 1/2 Window (m)=manual int.

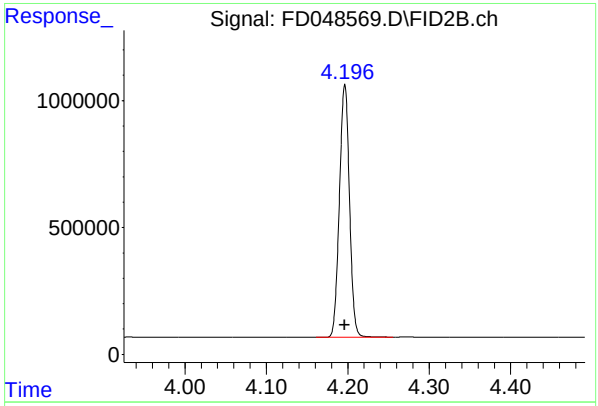
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048569.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 15:48
Operator : YP/AJ
Sample : 50 PPM AROMATIC HC STD2
Misc :
ALS Vial : 62 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2

Integration File: autoint1.e
Quant Time: Oct 23 17:15:21 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:09:25 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

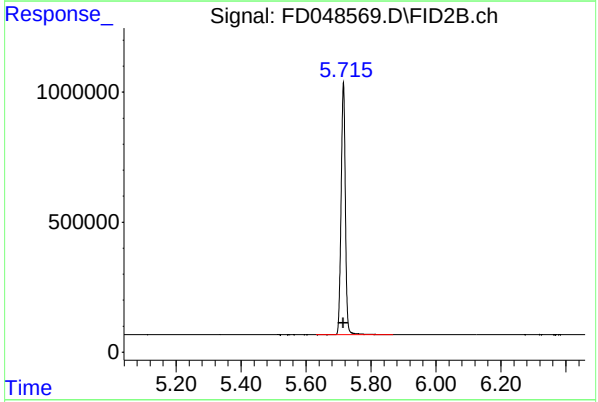




#1 1,2,3-Trimethylbenzene (C10.1)

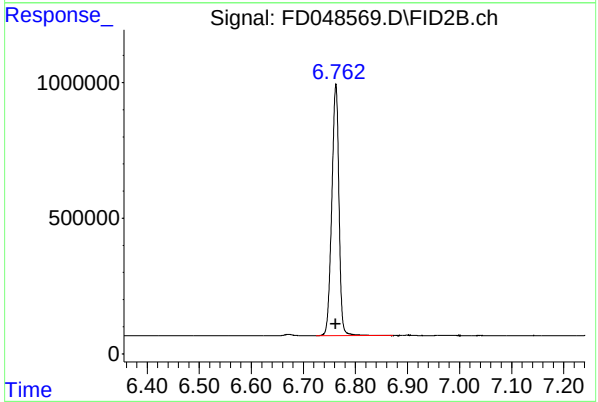
R.T.: 4.196 min
Delta R.T.: 0.000 min
Response: 8539641
Conc: 49.89 ug/ml

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2



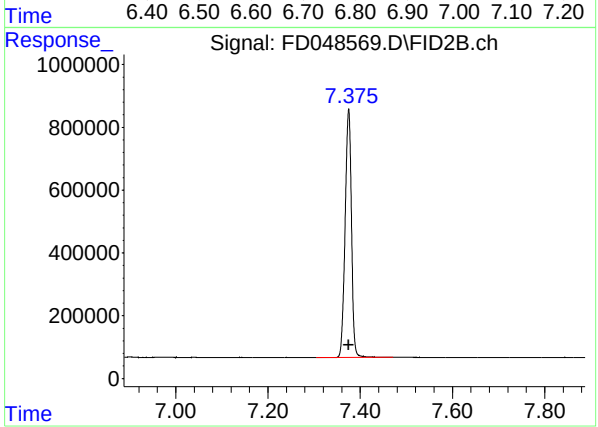
#2 Naphthalene (C11.7)

R.T.: 5.715 min
Delta R.T.: 0.000 min
Response: 8873483
Conc: 49.90 ug/ml



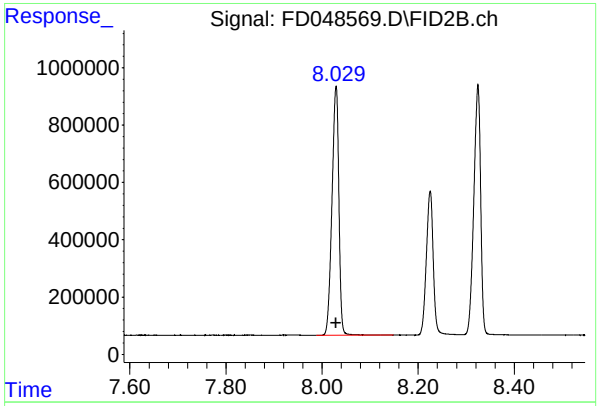
#3 2-Methylnaphthalene (C12.89)

R.T.: 6.762 min
Delta R.T.: 0.000 min
Response: 8891978
Conc: 49.97 ug/ml



#4 2-Bromonaphthalene (SURR)

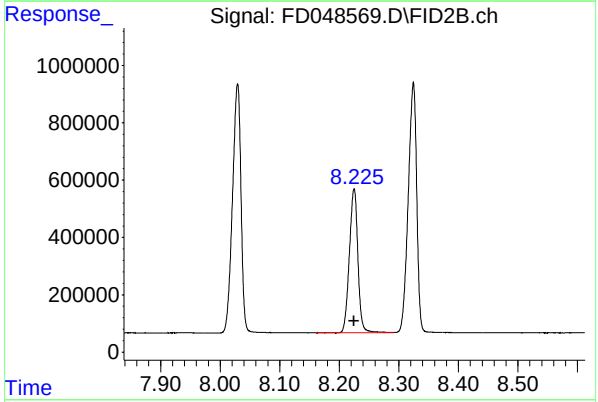
R.T.: 7.375 min
Delta R.T.: 0.000 min
Response: 7529591
Conc: 49.96 ug/ml



#5 Acenaphthylene (C15.06)

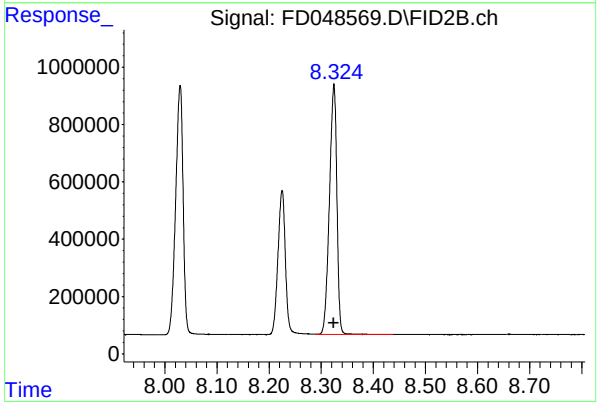
R.T.: 8.029 min
Delta R.T.: 0.000 min
Response: 8649197
Conc: 49.95 ug/ml

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2



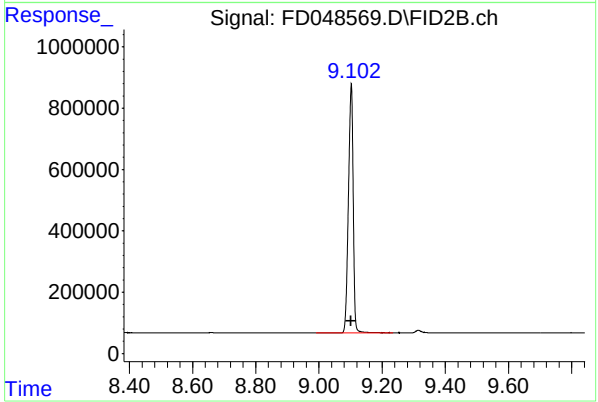
#6 2-Flurobiphenyl (SURR)

R.T.: 8.225 min
Delta R.T.: 0.000 min
Response: 5021501
Conc: 50.13 ug/ml



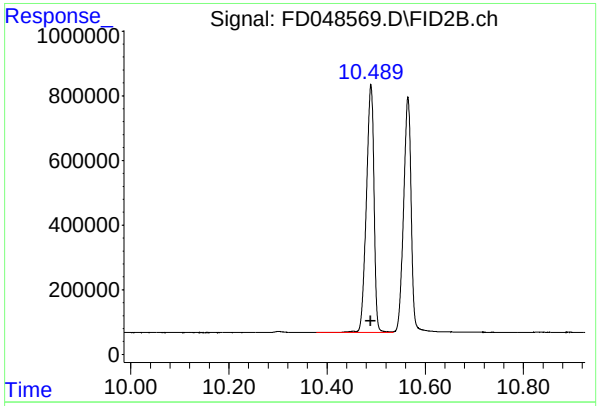
#7 Acenaphthene (C15.5)

R.T.: 8.324 min
Delta R.T.: 0.000 min
Response: 8673178
Conc: 49.89 ug/ml



#8 Flouorene (C16.55)

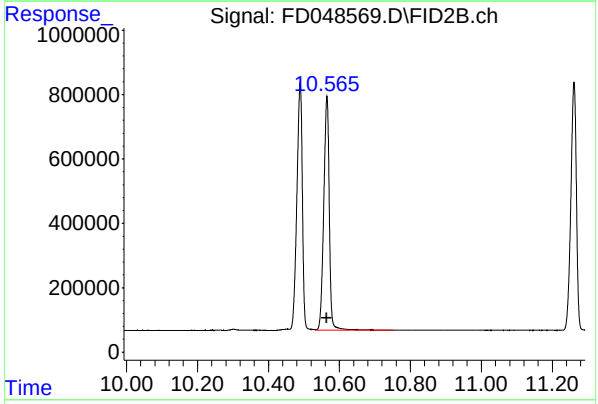
R.T.: 9.102 min
Delta R.T.: 0.000 min
Response: 8428307
Conc: 50.02 ug/ml



#9 Phenanthrene (C19.36)

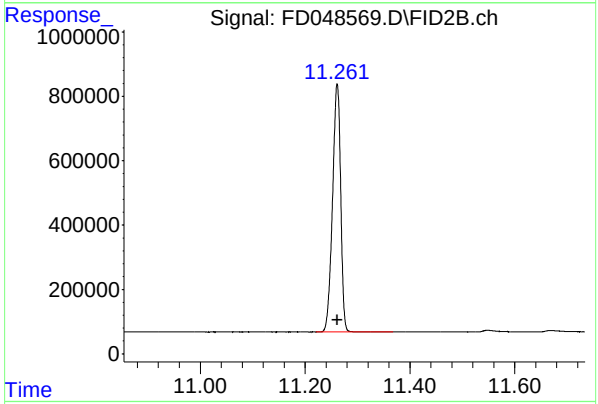
R.T.: 10.489 min
Delta R.T.: 0.000 min
Response: 8272929
Conc: 50.04 ug/ml

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2



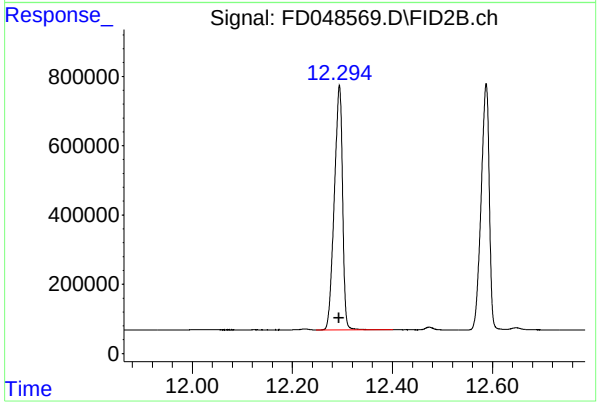
#10 Anthracene (C19.43)

R.T.: 10.565 min
Delta R.T.: 0.000 min
Response: 7888616
Conc: 49.92 ug/ml



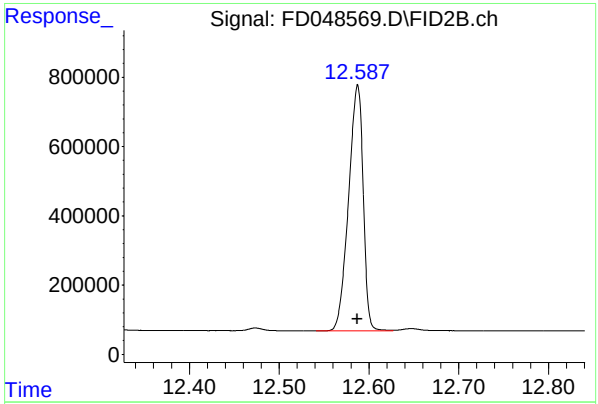
#11 ortho-Terphenyl (SURR)

R.T.: 11.261 min
Delta R.T.: 0.000 min
Response: 8334280
Conc: 50.00 ug/ml



#12 Fluoranthene (C21.85)

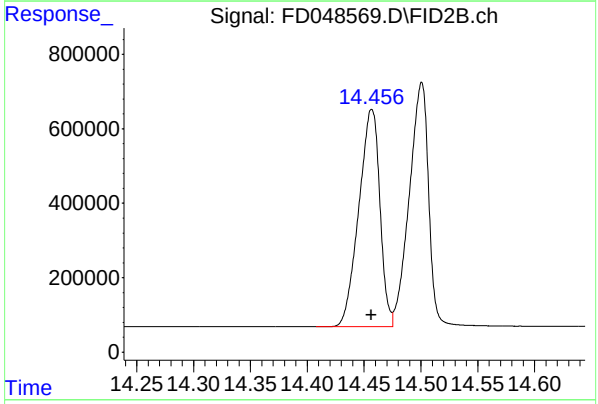
R.T.: 12.294 min
Delta R.T.: 0.000 min
Response: 8076662
Conc: 49.86 ug/ml



#13 Pyrene (C20.8)

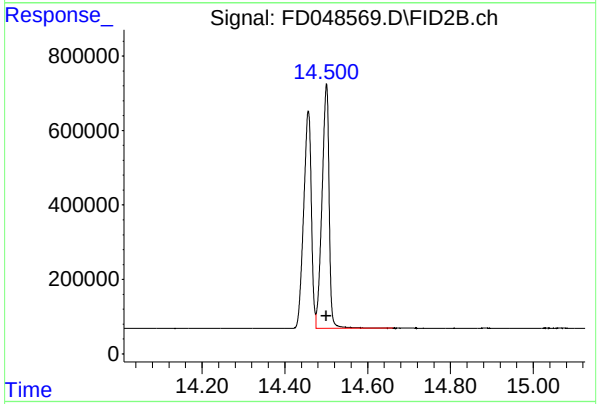
R.T.: 12.587 min
Delta R.T.: 0.000 min
Response: 8025067
Conc: 50.16 ug/ml

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2



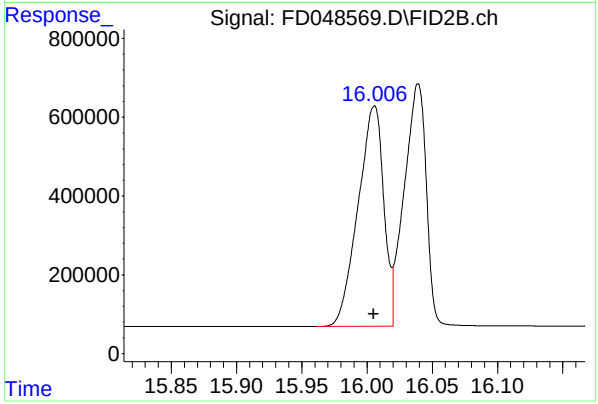
#14 Benzo[a]anthracene (C26.37)

R.T.: 14.456 min
Delta R.T.: 0.000 min
Response: 7527575
Conc: 50.23 ug/ml



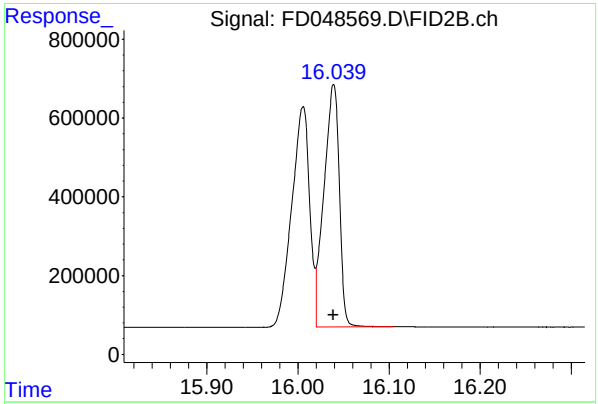
#15 Chrysene (C27.41)

R.T.: 14.500 min
Delta R.T.: 0.000 min
Response: 7833293
Conc: 49.73 ug/ml



#16 benzo[b]fluoranthene (C30.41)

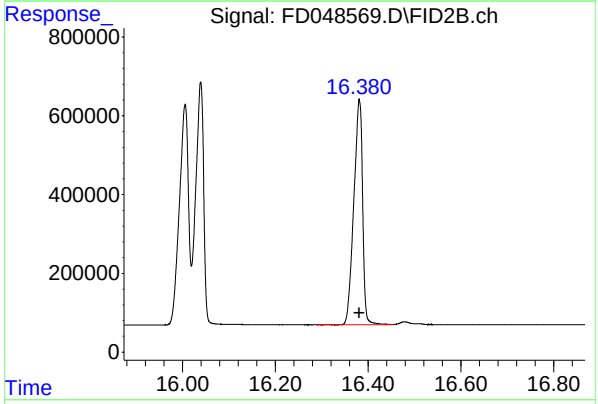
R.T.: 16.005 min
Delta R.T.: 0.000 min
Response: 7671770
Conc: 49.96 ug/ml



#17 Bnezo[k]fluoranthene (C30.14)

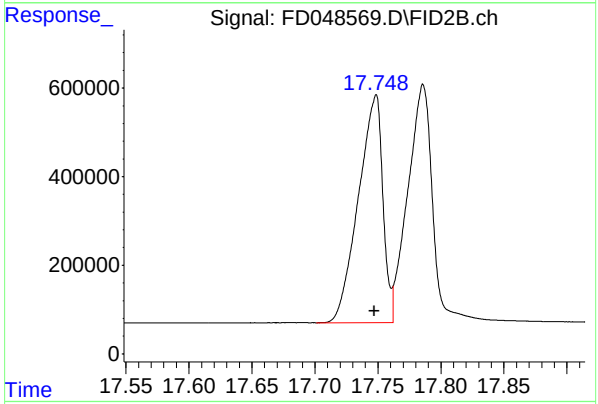
R.T.: 16.039 min
Delta R.T.: 0.000 min
Response: 7231888
Conc: 49.60 ug/ml

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2



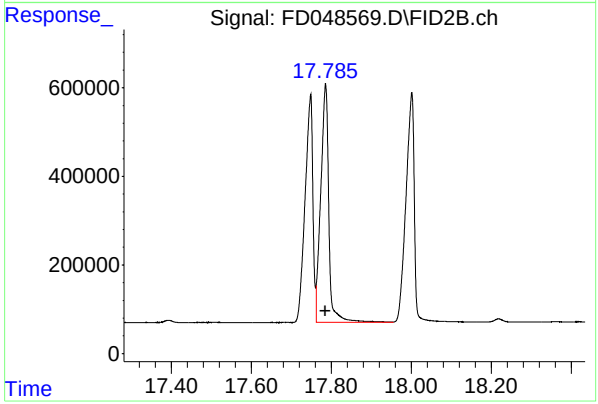
#18 Benzo[a]pyrene (C31.34)

R.T.: 16.381 min
Delta R.T.: 0.000 min
Response: 7547267
Conc: 50.15 ug/ml



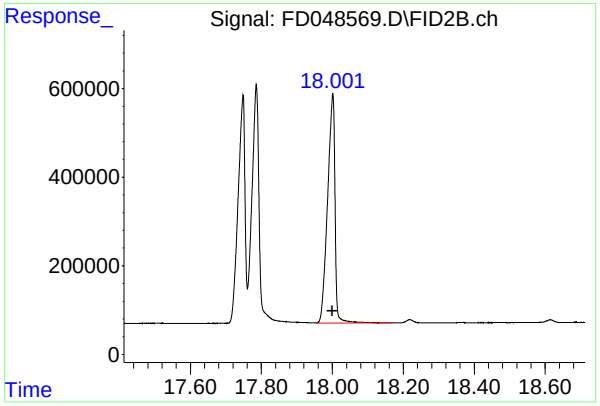
#19 Indeno[1,2,3-cd]pyrene (C35.01)

R.T.: 17.747 min
Delta R.T.: 0.000 min
Response: 6949708
Conc: 50.43 ug/ml



#20 Dibenz[a,h]anthracene (C30.36)

R.T.: 17.785 min
Delta R.T.: 0.000 min
Response: 7539487
Conc: 49.47 ug/ml



#21 Benzo[g,h,i]perylene (C34.01)

R.T.: 18.000 min
Delta R.T.: 0.000 mi
Response: 7527026
Conc: 49.87 ug/m

Instrument :
FID_D
ClientSampleId :
50 PPM AROMATIC HC STD2

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048569.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 15:48
Sample : 50 PPM AROMATIC HC STD2
Misc :
ALS Vial : 62 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.196	4.161	4.255	BV	998732	8539641	96.04%	5.175%
2	5.715	5.631	5.868	BB	961300	8873483	99.79%	5.377%
3	6.762	6.724	6.872	PV	916254	8891978	100.00%	5.388%
4	7.375	7.304	7.471	BB	788165	7529591	84.68%	4.562%
5	8.029	7.988	8.148	BB	861509	8649197	97.27%	5.241%
6	8.225	8.161	8.290	BV	502069	5021501	56.47%	3.043%
7	8.324	8.290	8.438	VB	874209	8673178	97.54%	5.255%
8	9.102	8.991	9.234	BV	799296	8428307	94.79%	5.107%
9	10.489	10.378	10.534	BV	757282	8272929	93.04%	5.013%
10	10.565	10.534	10.751	VB	727764	7888616	88.72%	4.780%
11	11.261	11.221	11.368	BB	773174	8334280	93.73%	5.050%
12	12.294	12.247	12.401	PB	711390	8076662	90.83%	4.894%
13	12.587	12.541	12.627	BV	714458	8025067	90.25%	4.863%
14	14.456	14.408	14.475	PV	588127	7527575	84.66%	4.561%
15	14.500	14.475	14.661	VB	663541	7833293	88.09%	4.747%
16	16.005	15.961	16.020	BV	559367	7671770	86.28%	4.649%
17	16.039	16.020	16.104	VV	611862	7231888	81.33%	4.382%
18	16.381	16.288	16.453	BV	574389	7547267	84.88%	4.573%
19	17.747	17.701	17.762	BV	512967	6949708	78.16%	4.211%
20	17.785	17.762	17.954	VV	532723	7539487	84.79%	4.568%
21	18.000	17.954	18.171	VV	519884	7527026	84.65%	4.561%

Sum of corrected areas: 165032443

Aromatic EPH 102324.M Wed Oct 23 18:18:22 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048570.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 16:25
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD3
Misc :
ALS Vial : 63 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3

Integration File: autoint1.e
Quant Time: Oct 23 17:10:51 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:09:25 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.372	3046545	20.000 ug/ml
Spiked Amount	50.000		Recovery =	40.00%
6) S	2-Flurobiphenyl (SURR)	8.222	1998164	20.000 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	40.00%
11) S	ortho-Terphenyl (SURR)	11.258	3391146	20.000 ug/ml
Spiked Amount	50.000		Recovery =	40.00%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.195	3464073	20.000 ug/ml
2) T	Naphthalene (C11.7)	5.713	3597996	20.000 ug/ml
3) T	2-Methylnaphthalene (...	6.760	3595810	20.000 ug/ml
5) T	Acenaphthylene (C15.06)	8.025	3519888	20.000 ug/ml
7) T	Acenaphthene (C15.5)	8.319	3544868	20.000 ug/ml
8) T	Flouorene (C16.55)	9.097	3404430	20.000 ug/ml
9) T	Phenanthrene (C19.36)	10.485	3327445	20.000 ug/ml
10) T	Anthracene (C19.43)	10.560	3212978	20.000 ug/ml
12) T	Fluoranthene (C21.85)	12.288	3291616	20.000 ug/ml
13) T	Pyrene (C20.8)	12.581	3226732	20.000 ug/ml
14) T	Benzo[a]anthracene (C...	14.451	2984688	20.000 ug/ml
15) T	Chrysene (C27.41)	14.492	3250919	20.000 ug/ml
16) T	benzo[b]fluoranthene ...	15.997	3074553	20.000 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.027	3023398	20.000 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.372	3026012	20.000 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.737	2636324	20.000 ug/ml
20) T	Dibenz[a,h]anthracene...	17.777	3263027	20.000 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.987	3076637	20.000 ug/ml

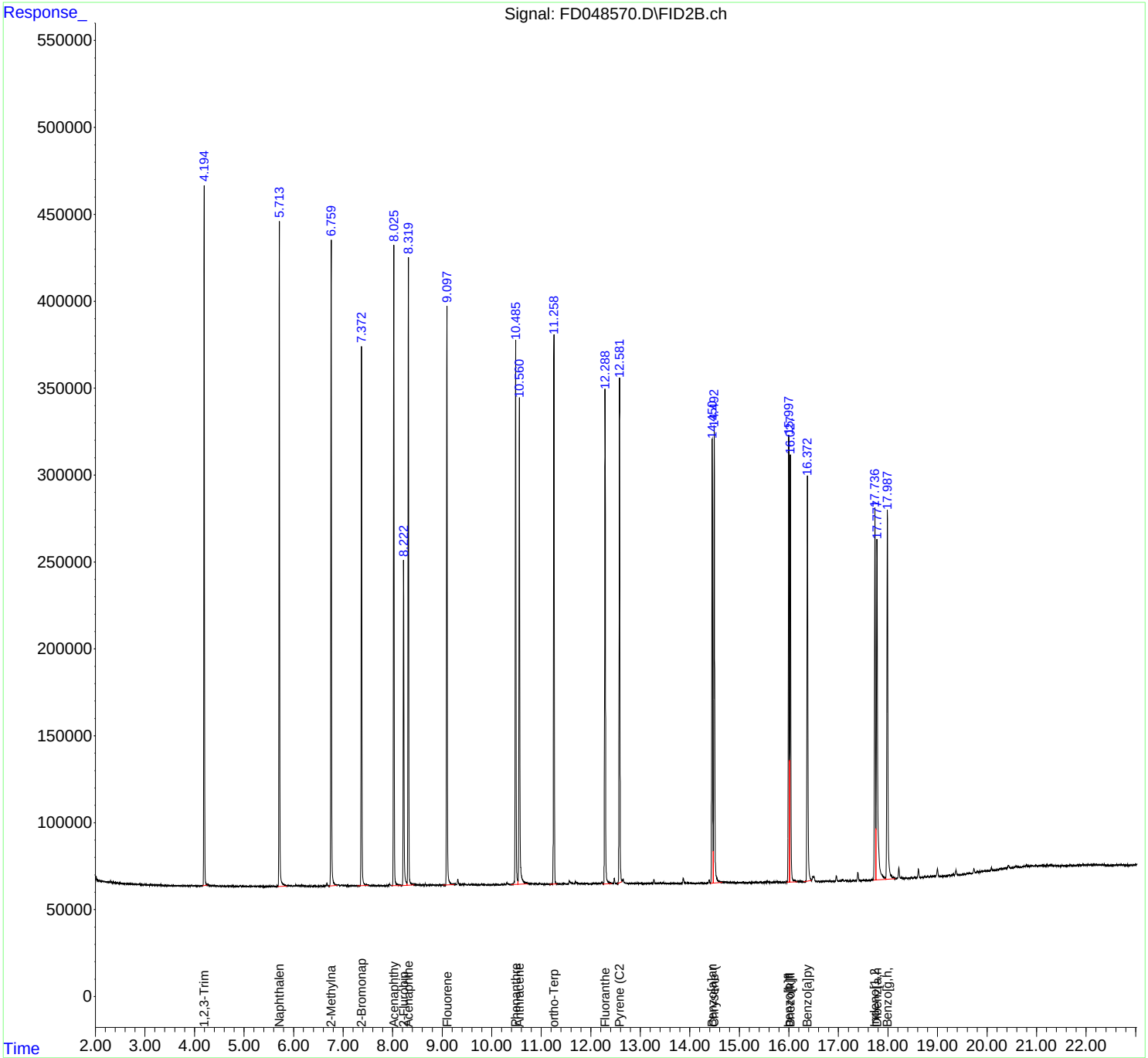
(f)=RT Delta > 1/2 Window (m)=manual int.

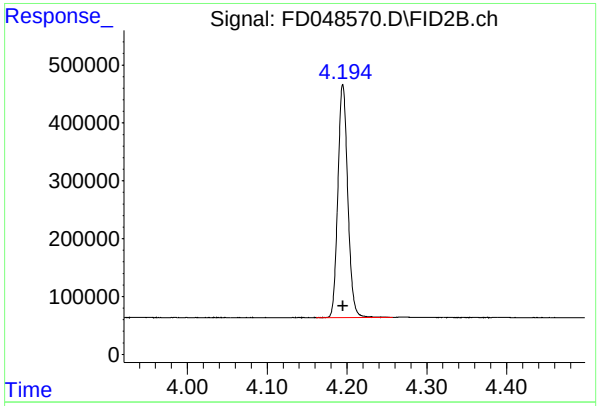
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048570.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 16:25
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD3
Misc :
ALS Vial : 63 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3

Integration File: autoint1.e
Quant Time: Oct 23 17:10:51 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:09:25 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

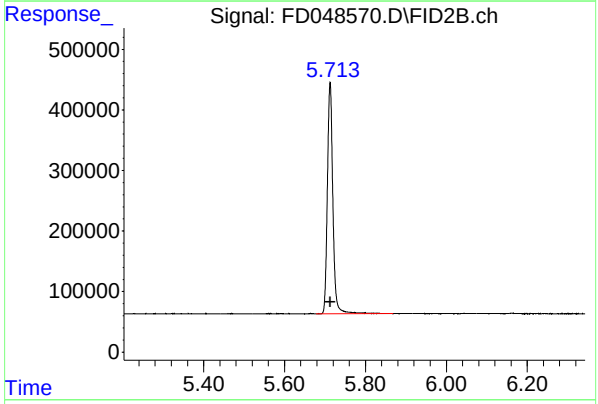




#1 1,2,3-Trimethylbenzene (C10.1)

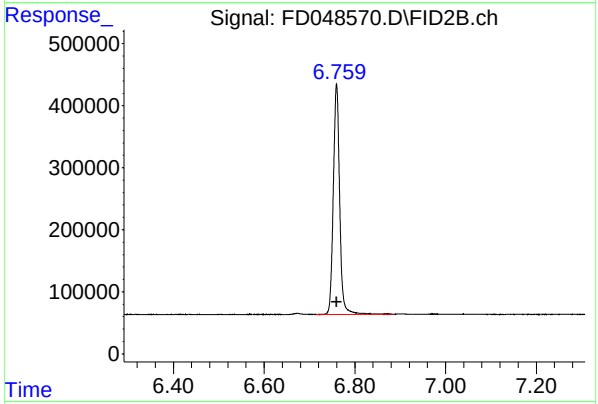
R.T.: 4.195 min
Delta R.T.: 0.000 min
Response: 3464073
Conc: 20.00 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3



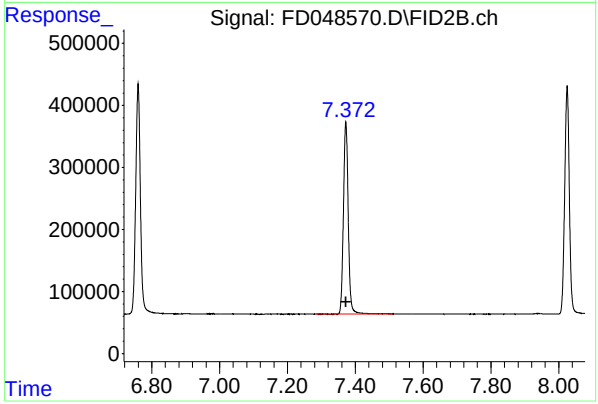
#2 Naphthalene (C11.7)

R.T.: 5.713 min
Delta R.T.: 0.000 min
Response: 3597996
Conc: 20.00 ug/ml



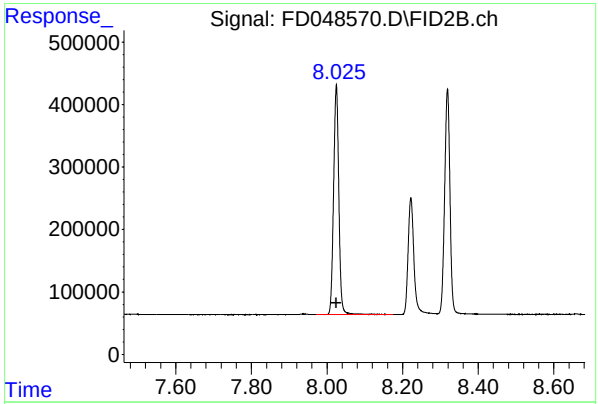
#3 2-Methylnaphthalene (C12.89)

R.T.: 6.760 min
Delta R.T.: 0.000 min
Response: 3595810
Conc: 20.00 ug/ml



#4 2-Bromonaphthalene (SURR)

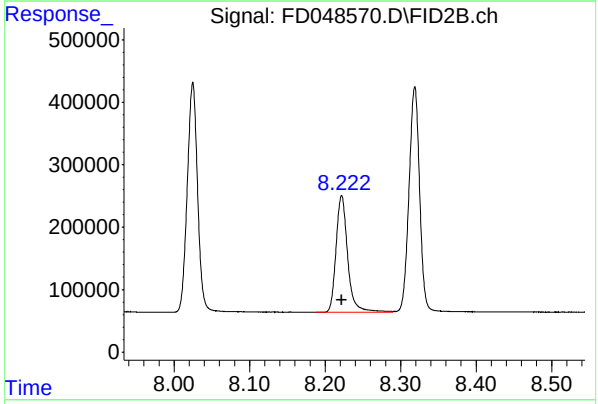
R.T.: 7.372 min
Delta R.T.: 0.000 min
Response: 3046545
Conc: 20.00 ug/ml



#5 Acenaphthylene (C15.06)

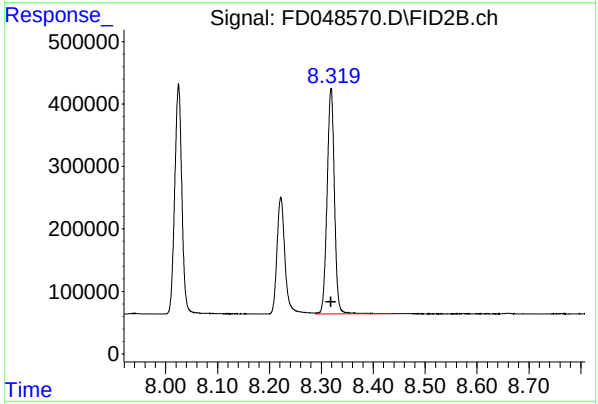
R.T.: 8.025 min
Delta R.T.: 0.000 min
Response: 3519888
Conc: 20.00 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3



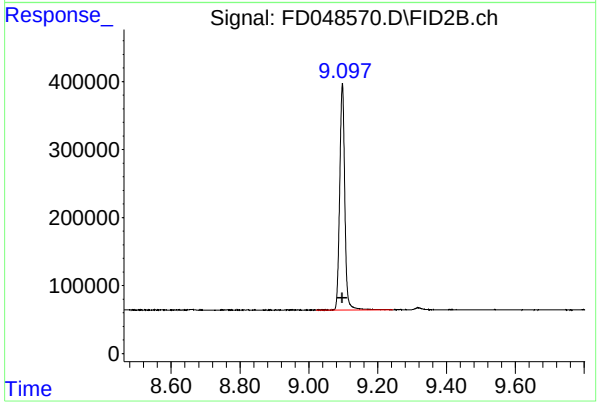
#6 2-Flurobiphenyl (SURR)

R.T.: 8.222 min
Delta R.T.: 0.000 min
Response: 1998164
Conc: 20.00 ug/ml



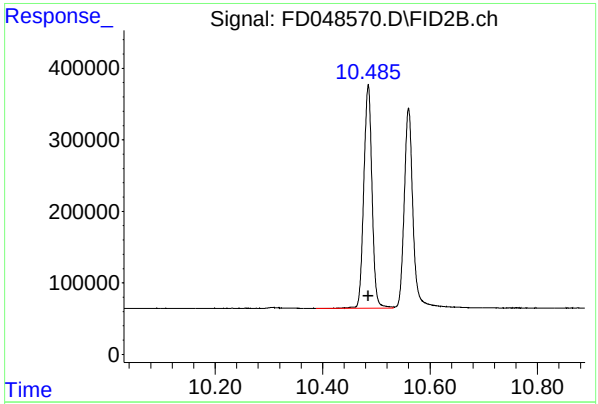
#7 Acenaphthene (C15.5)

R.T.: 8.319 min
Delta R.T.: 0.000 min
Response: 3544868
Conc: 20.00 ug/ml



#8 Flouorene (C16.55)

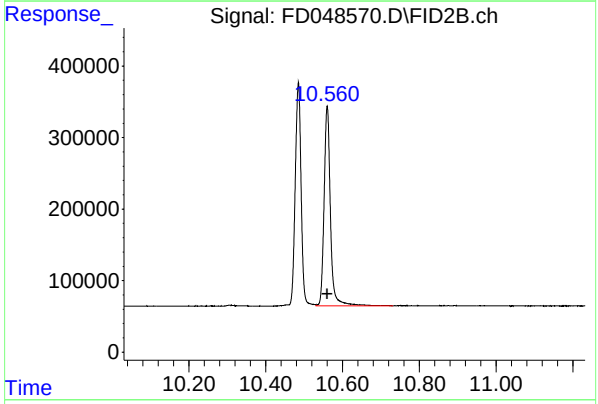
R.T.: 9.097 min
Delta R.T.: 0.000 min
Response: 3404430
Conc: 20.00 ug/ml



#9 Phenanthrene (C19.36)

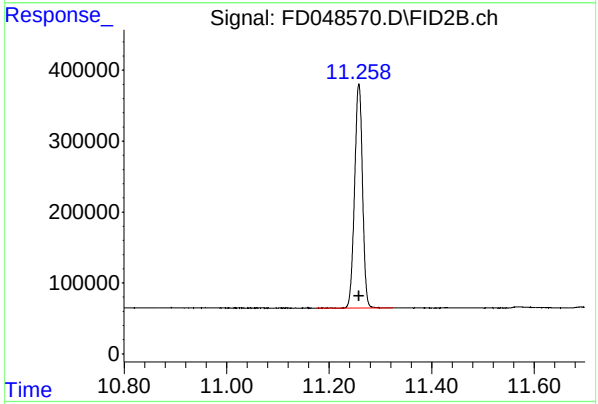
R.T.: 10.485 min
Delta R.T.: 0.000 min
Response: 3327445
Conc: 20.00 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3



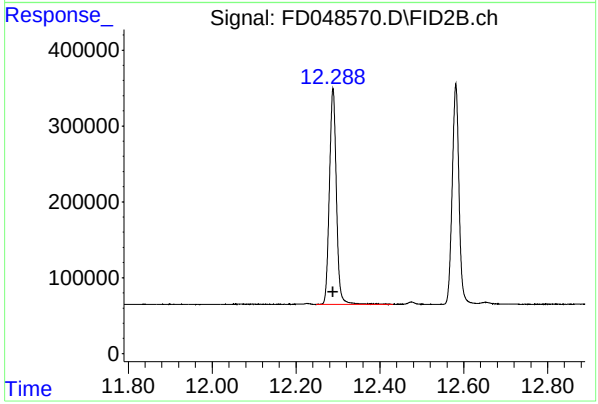
#10 Anthracene (C19.43)

R.T.: 10.560 min
Delta R.T.: 0.000 min
Response: 3212978
Conc: 20.00 ug/ml



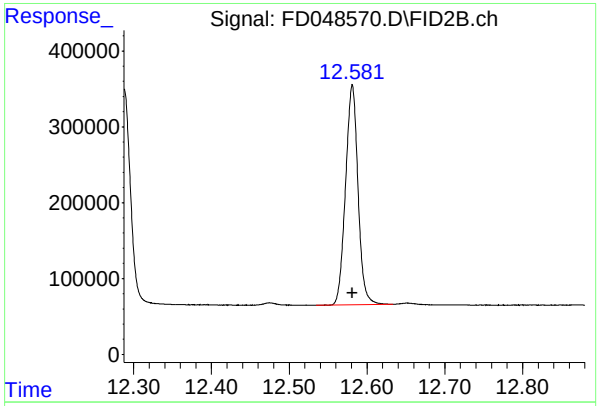
#11 ortho-Terphenyl (SURR)

R.T.: 11.258 min
Delta R.T.: 0.000 min
Response: 3391146
Conc: 20.00 ug/ml



#12 Fluoranthene (C21.85)

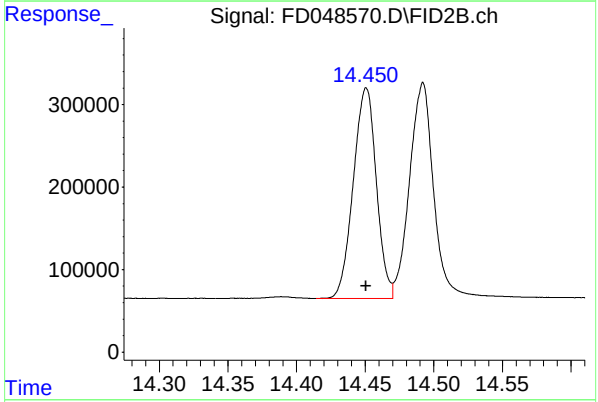
R.T.: 12.288 min
Delta R.T.: 0.000 min
Response: 3291616
Conc: 20.00 ug/ml



#13 Pyrene (C20.8)

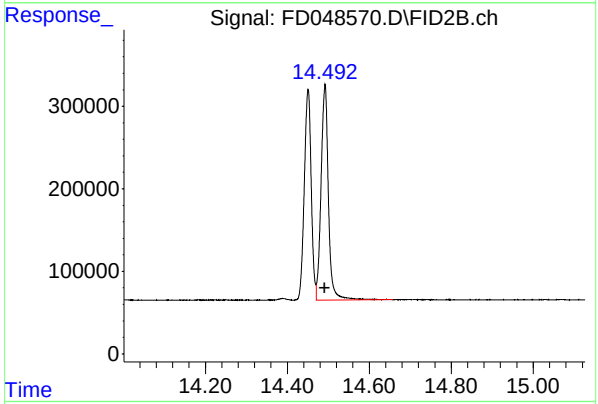
R.T.: 12.581 min
Delta R.T.: 0.000 min
Response: 3226732
Conc: 20.00 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3



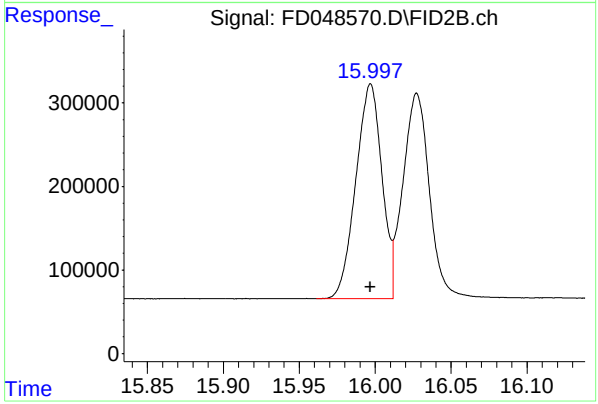
#14 Benzo[a]anthracene (C26.37)

R.T.: 14.451 min
Delta R.T.: 0.000 min
Response: 2984688
Conc: 20.00 ug/ml



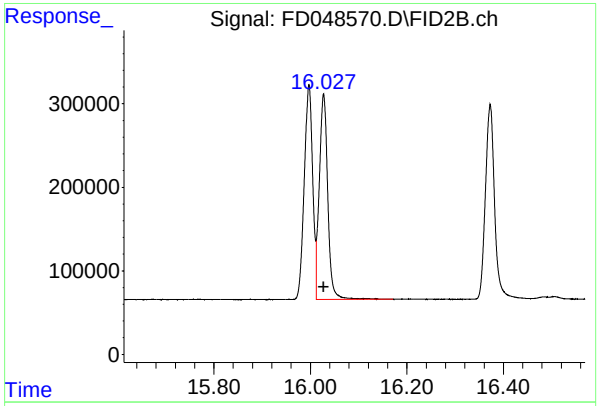
#15 Chrysene (C27.41)

R.T.: 14.492 min
Delta R.T.: 0.000 min
Response: 3250919
Conc: 20.00 ug/ml



#16 benzo[b]fluoranthene (C30.41)

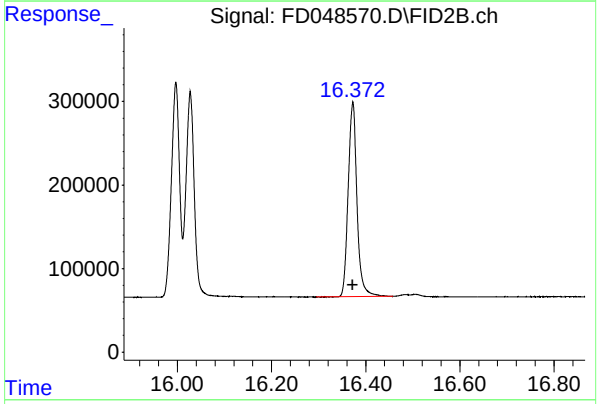
R.T.: 15.997 min
Delta R.T.: 0.000 min
Response: 3074553
Conc: 20.00 ug/ml



#17 Bnezo[k]fluoranthene (C30.14)

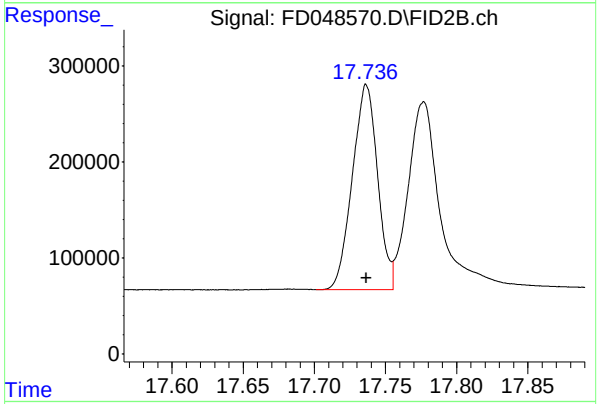
R.T.: 16.027 min
Delta R.T.: 0.000 min
Response: 3023398
Conc: 20.00 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3



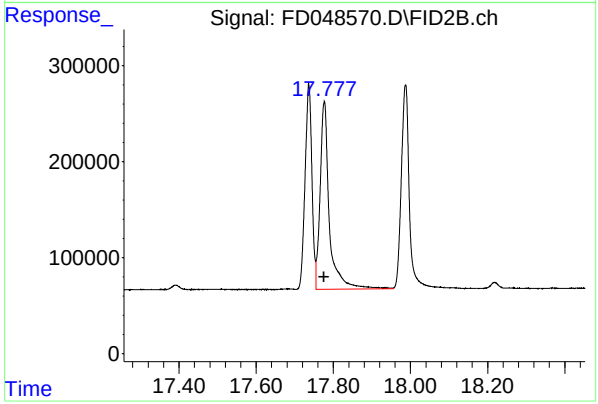
#18 Benzo[a]pyrene (C31.34)

R.T.: 16.372 min
Delta R.T.: 0.000 min
Response: 3026012
Conc: 20.00 ug/ml



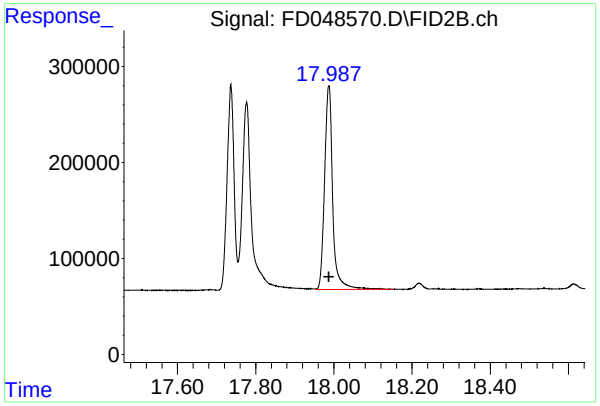
#19 Indeno[1,2,3-cd]pyrene (C35.01)

R.T.: 17.737 min
Delta R.T.: 0.000 min
Response: 2636324
Conc: 20.00 ug/ml



#20 Dibenz[a,h]anthracene (C30.36)

R.T.: 17.777 min
Delta R.T.: 0.000 min
Response: 3263027
Conc: 20.00 ug/ml



#21 Benzo[g,h,i]perylene (C34.01)

R.T.: 17.987 min
Delta R.T.: 0.000 mi
Response: 3076637
Conc: 20.00 ug/m

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD3

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048570.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 16:25
Sample : 20 PPM AROMATIC HC STD3
Misc :
ALS Vial : 63 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.195	4.161	4.257	BV	402734	3464073	96.28%	5.174%
2	5.713	5.678	5.868	PB	378310	3597996	100.00%	5.374%
3	6.760	6.714	6.884	PV	369607	3595810	99.94%	5.370%
4	7.372	7.284	7.511	BB	309427	3046545	84.67%	4.550%
5	8.025	7.971	8.174	BV	366415	3519888	97.83%	5.257%
6	8.222	8.188	8.290	PV	185974	1998164	55.54%	2.984%
7	8.319	8.290	8.438	VB	358996	3544868	98.52%	5.294%
8	9.097	9.021	9.244	BB	332486	3404430	94.62%	5.084%
9	10.485	10.388	10.531	BV	311516	3327445	92.48%	4.970%
10	10.560	10.531	10.731	VB	280274	3212978	89.30%	4.799%
11	11.258	11.174	11.324	BB	316403	3391146	94.25%	5.065%
12	12.288	12.248	12.431	PB	284432	3291616	91.48%	4.916%
13	12.581	12.534	12.633	PV	290024	3226732	89.68%	4.819%
14	14.451	14.414	14.470	PV	256334	2984688	82.95%	4.458%
15	14.492	14.470	14.658	VB	259225	3250919	90.35%	4.855%
16	15.997	15.961	16.012	BV	257955	3074553	85.45%	4.592%
17	16.027	16.012	16.171	VB	245800	3023398	84.03%	4.515%
18	16.372	16.294	16.458	BV	230365	3026012	84.10%	4.519%
19	17.737	17.701	17.755	BV	213338	2636324	73.27%	3.937%
20	17.777	17.755	17.954	VV	197036	3263027	90.69%	4.873%
21	17.987	17.954	18.151	VB	213971	3076637	85.51%	4.595%
			Sum of corrected areas:			66957247		

Aromatic EPH 102324.M Wed Oct 23 18:18:39 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048571.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 17:02
Operator : YP/AJ
Sample : 10 PPM AROMATIC HC STD4
Misc :
ALS Vial : 64 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4

Integration File: autoint1.e
Quant Time: Oct 23 17:44:21 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:44:12 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.373	1535833	10.143 ug/ml
Spiked Amount	50.000		Recovery =	20.29%
6) S	2-Flurobiphenyl (SURR)	8.224	998081	9.973 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	19.95%
11) S	ortho-Terphenyl (SURR)	11.257	1758096	10.404 ug/ml
Spiked Amount	50.000		Recovery =	20.81%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.196	1780007	10.297 ug/ml
2) T	Naphthalene (C11.7)	5.714	1822653	10.186 ug/ml
3) T	2-Methylnaphthalene (...	6.760	1826622	10.197 ug/ml
5) T	Acenaphthylene (C15.06)	8.025	1809718	10.335 ug/ml
7) T	Acenaphthene (C15.5)	8.318	1838643	10.425 ug/ml
8) T	Flouorene (C16.55)	9.098	1719817	10.154 ug/ml
9) T	Phenanthrene (C19.36)	10.484	1680489	10.124 ug/ml
10) T	Anthracene (C19.43)	10.560	1635709	10.260 ug/ml
12) T	Fluoranthene (C21.85)	12.288	1671203	10.236 ug/ml
13) T	Pyrene (C20.8)	12.581	1639022	10.183 ug/ml
14) T	Benzo[a]anthracene (C...	14.450	1472368	9.868 ug/ml
15) T	Chrysene (C27.41)	14.491	1725560	10.700 ug/ml
16) T	benzo[b]fluoranthene ...	15.995	1544713	10.045 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.026	1579300	10.611 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.374	1518079	10.066 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.737	1259393	9.340 ug/ml
20) T	Dibenz[a,h]anthracene...	17.779	1780079	11.209 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.986	1603528	10.461 ug/ml

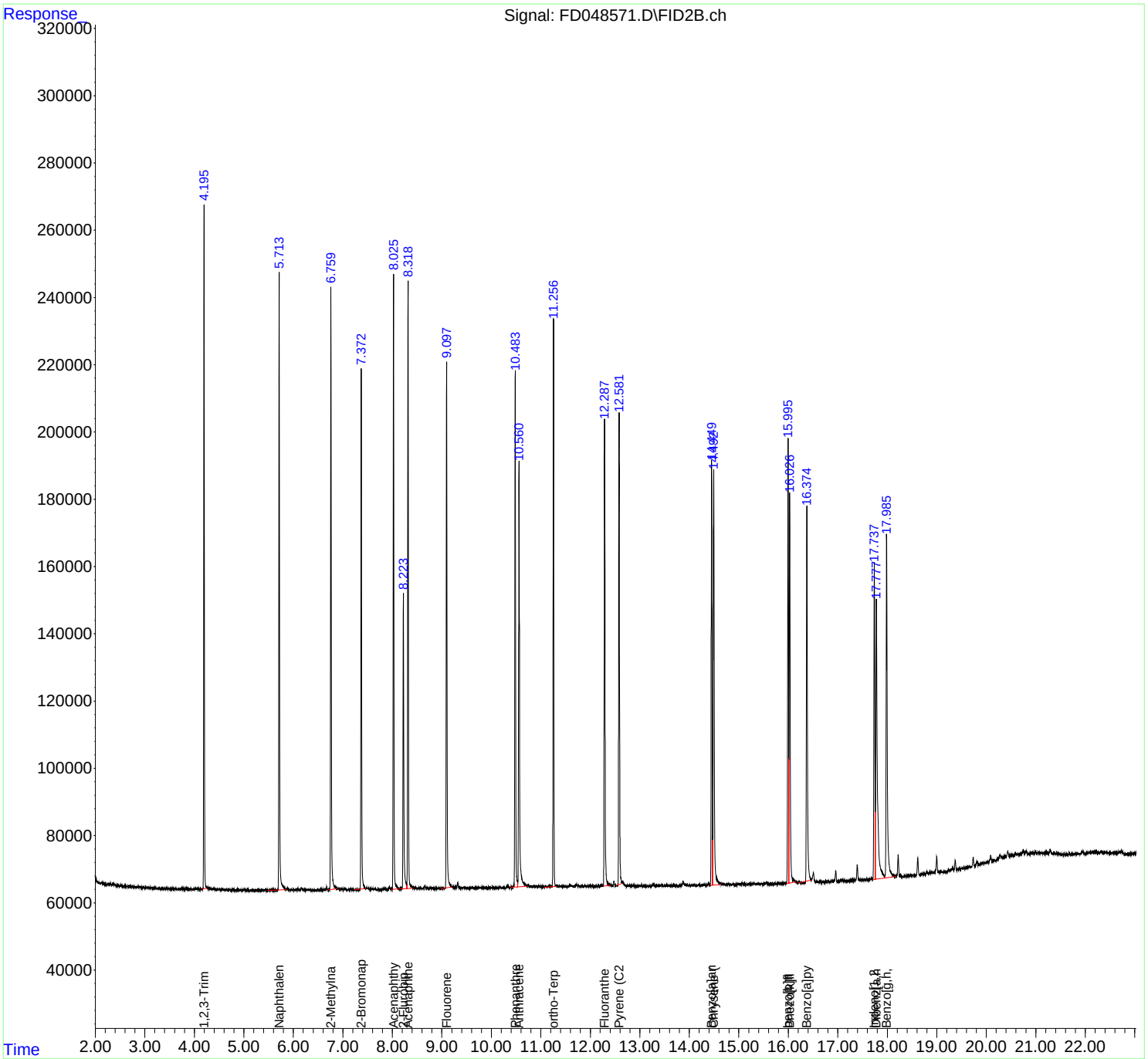
(f)=RT Delta > 1/2 Window (m)=manual int.

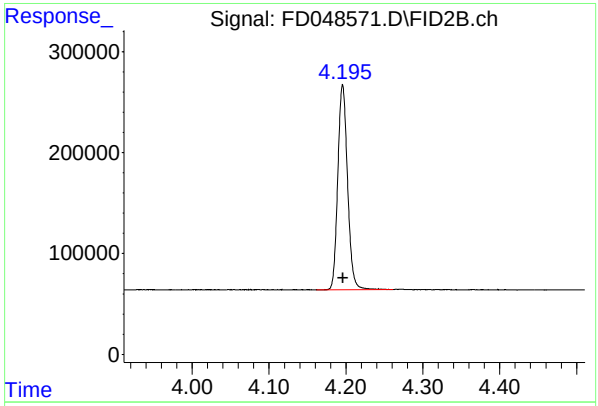
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048571.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 17:02
Operator : YP/AJ
Sample : 10 PPM AROMATIC HC STD4
Misc :
ALS Vial : 64 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4

Integration File: autoint1.e
Quant Time: Oct 23 17:44:21 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 17:44:12 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

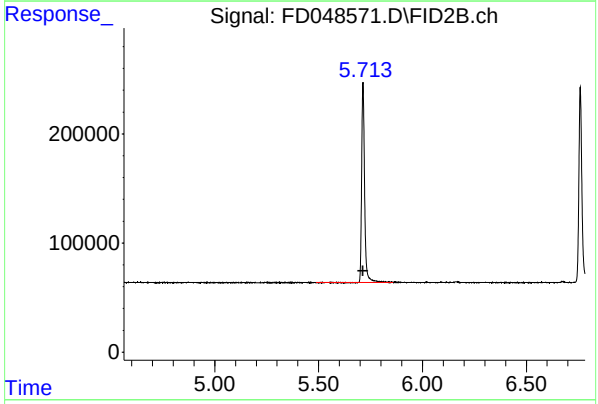




#1 1,2,3-Trimethylbenzene (C10.1)

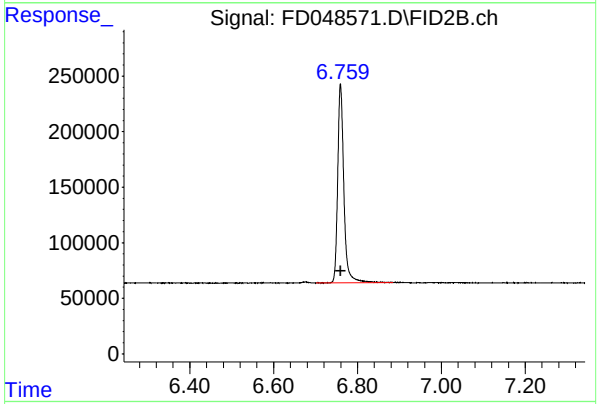
R.T.: 4.196 min
Delta R.T.: 0.000 min
Response: 1780007
Conc: 10.30 ug/ml

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4



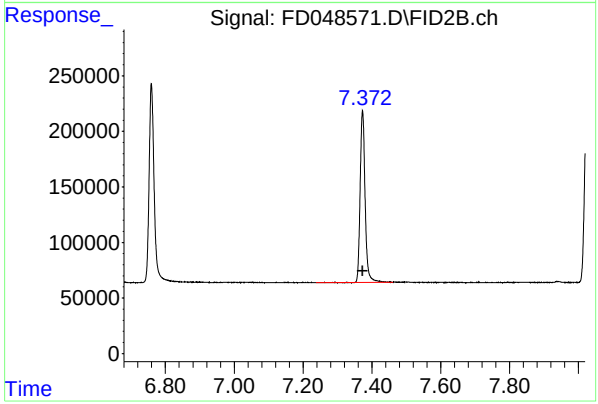
#2 Naphthalene (C11.7)

R.T.: 5.714 min
Delta R.T.: 0.000 min
Response: 1822653
Conc: 10.19 ug/ml



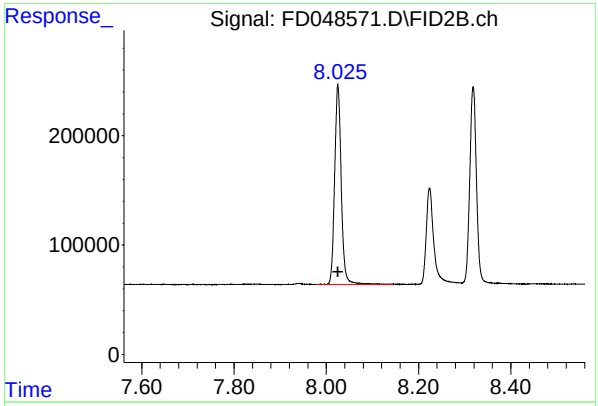
#3 2-Methylnaphthalene (C12.89)

R.T.: 6.760 min
Delta R.T.: 0.000 min
Response: 1826622
Conc: 10.20 ug/ml



#4 2-Bromonaphthalene (SURR)

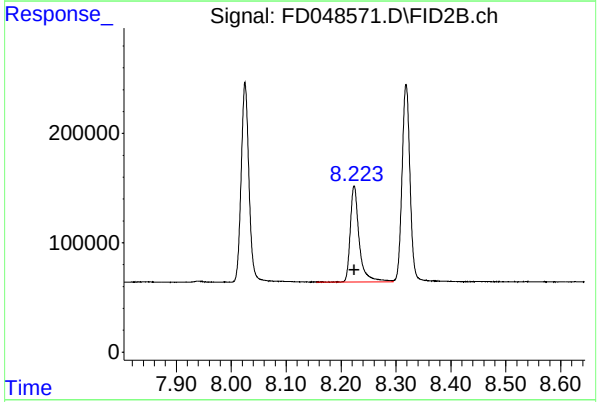
R.T.: 7.373 min
Delta R.T.: 0.000 min
Response: 1535833
Conc: 10.14 ug/ml



#5 Acenaphthylene (C15.06)

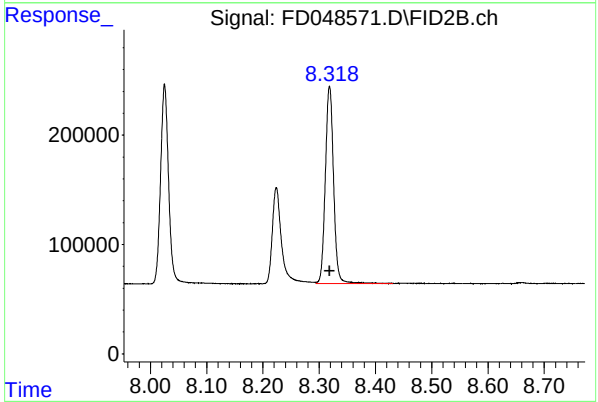
R.T.: 8.025 min
Delta R.T.: 0.000 min
Response: 1809718
Conc: 10.34 ug/ml

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4



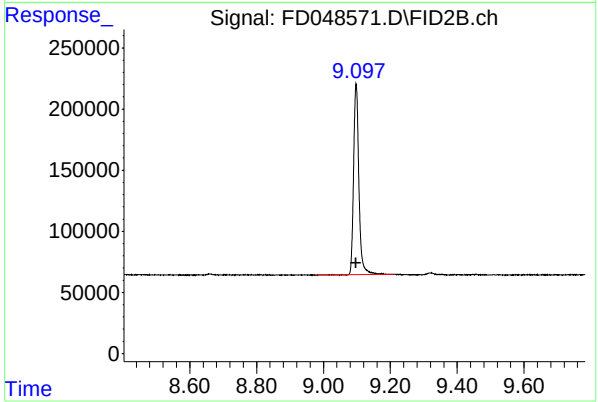
#6 2-Flurobiphenyl (SURR)

R.T.: 8.224 min
Delta R.T.: 0.000 min
Response: 998081
Conc: 9.97 ug/ml



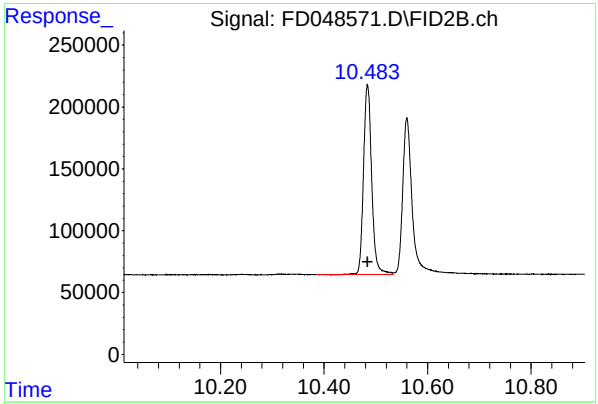
#7 Acenaphthene (C15.5)

R.T.: 8.318 min
Delta R.T.: 0.000 min
Response: 1838643
Conc: 10.43 ug/ml



#8 Flouorene (C16.55)

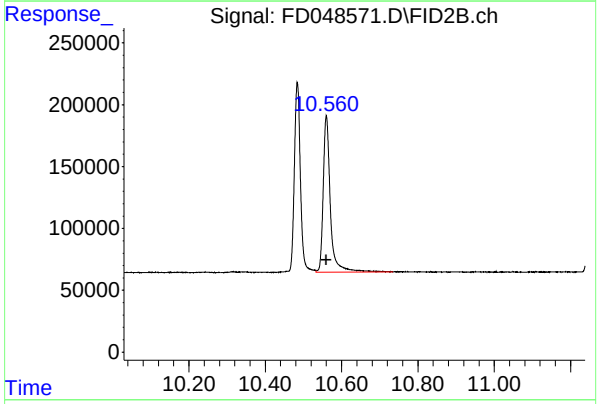
R.T.: 9.098 min
Delta R.T.: 0.000 min
Response: 1719817
Conc: 10.15 ug/ml



#9 Phenanthrene (C19.36)

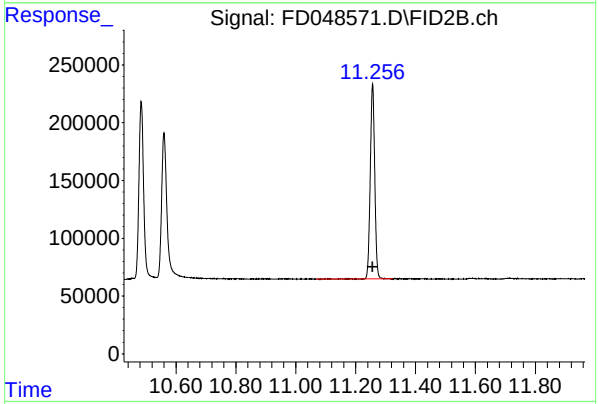
R.T.: 10.484 min
Delta R.T.: 0.000 min
Response: 1680489
Conc: 10.12 ug/ml

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4



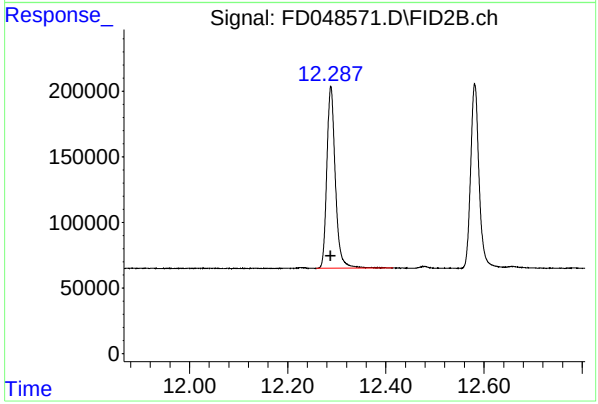
#10 Anthracene (C19.43)

R.T.: 10.560 min
Delta R.T.: 0.000 min
Response: 1635709
Conc: 10.26 ug/ml



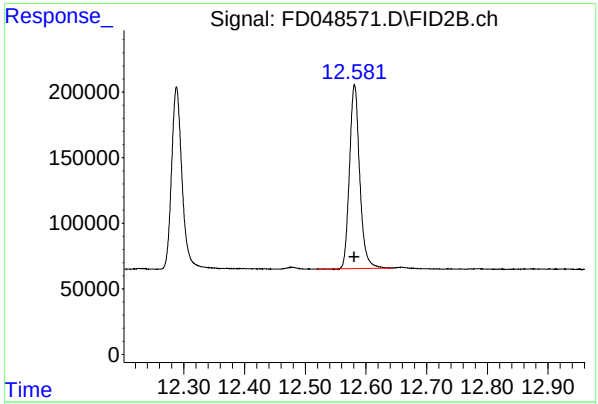
#11 ortho-Terphenyl (SURR)

R.T.: 11.257 min
Delta R.T.: 0.000 min
Response: 1758096
Conc: 10.40 ug/ml



#12 Fluoranthene (C21.85)

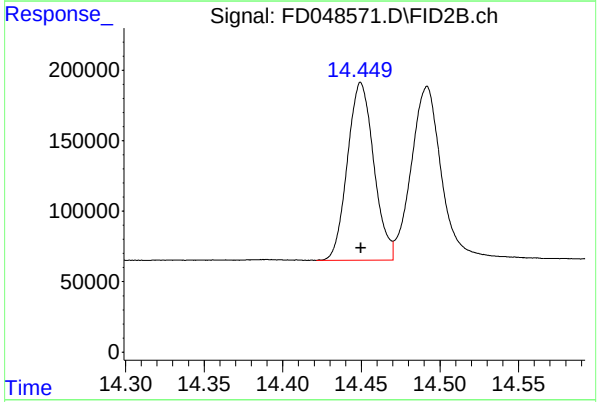
R.T.: 12.288 min
Delta R.T.: 0.000 min
Response: 1671203
Conc: 10.24 ug/ml



#13 Pyrene (C20.8)

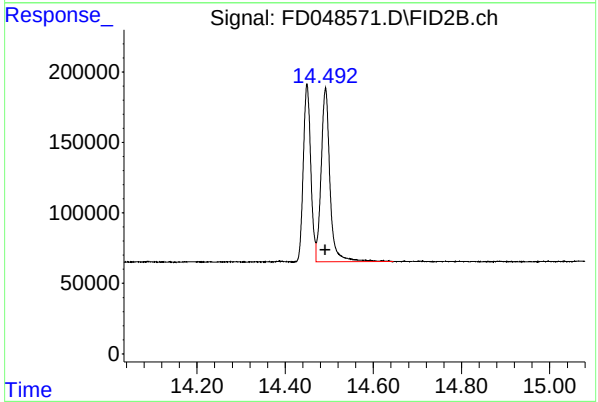
R.T.: 12.581 min
Delta R.T.: 0.000 min
Response: 1639022
Conc: 10.18 ug/ml

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4



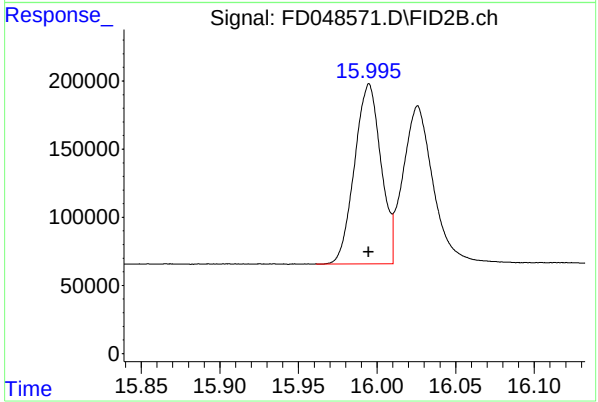
#14 Benzo[a]anthracene (C26.37)

R.T.: 14.450 min
Delta R.T.: 0.000 min
Response: 1472368
Conc: 9.87 ug/ml



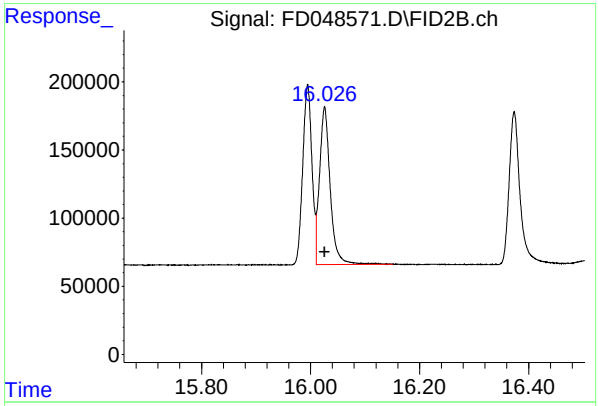
#15 Chrysene (C27.41)

R.T.: 14.491 min
Delta R.T.: 0.000 min
Response: 1725560
Conc: 10.70 ug/ml



#16 benzo[b]fluoranthene (C30.41)

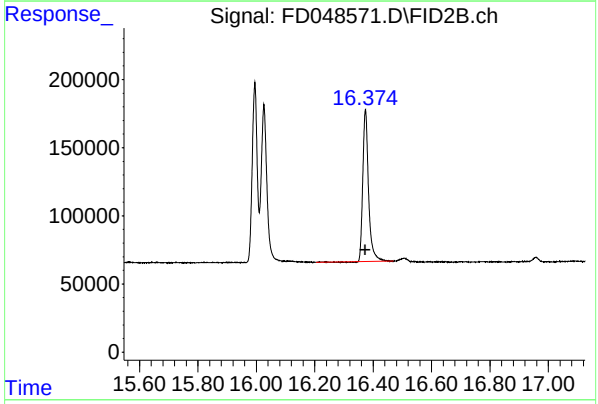
R.T.: 15.995 min
Delta R.T.: 0.000 min
Response: 1544713
Conc: 10.04 ug/ml



#17 Bnezo[k]fluoranthene (C30.14)

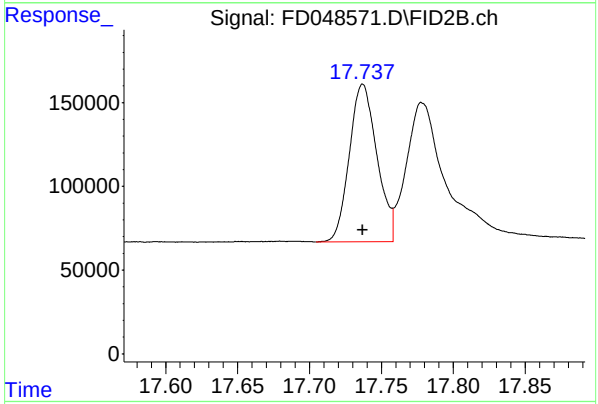
R.T.: 16.026 min
Delta R.T.: 0.000 min
Response: 1579300
Conc: 10.61 ug/ml

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4



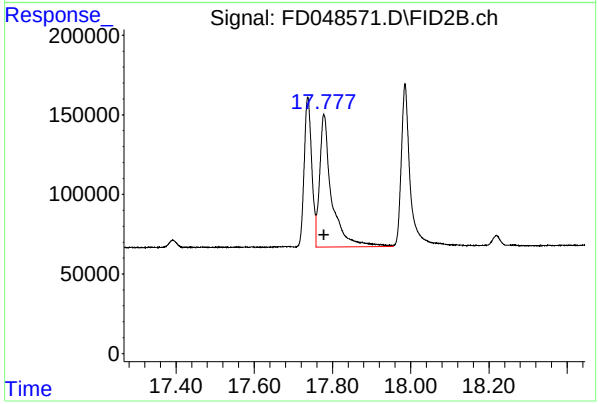
#18 Benzo[a]pyrene (C31.34)

R.T.: 16.374 min
Delta R.T.: 0.000 min
Response: 1518079
Conc: 10.07 ug/ml



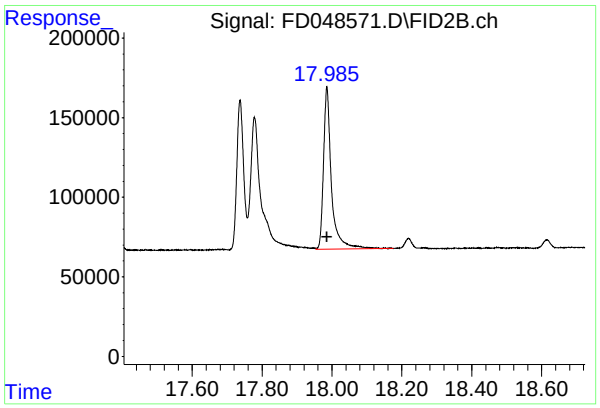
#19 Indeno[1,2,3-cd]pyrene (C35.01)

R.T.: 17.737 min
Delta R.T.: 0.000 min
Response: 1259393
Conc: 9.34 ug/ml



#20 Dibenz[a,h]anthracene (C30.36)

R.T.: 17.779 min
Delta R.T.: 0.000 min
Response: 1780079
Conc: 11.21 ug/ml



#21 Benzo[g,h,i]perylene (C34.01)

R.T.: 17.986 min
Delta R.T.: 0.000 mi
Response: 1603528
Conc: 10.46 ug/m

Instrument :
FID_D
ClientSampleId :
10 PPM AROMATIC HC STD4

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048571.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 17:02
Sample : 10 PPM AROMATIC HC STD4
Misc :
ALS Vial : 64 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.196	4.161	4.261	BV	201703	1780007	96.81%	5.205%
2	5.714	5.488	5.858	BB	181375	1822653	99.13%	5.330%
3	6.760	6.701	6.885	BB	175216	1826622	99.35%	5.341%
4	7.373	7.238	7.461	BB	154245	1535833	83.53%	4.491%
5	8.025	7.978	8.145	BB	181606	1809718	98.43%	5.292%
6	8.224	8.155	8.295	BV	87703	998081	54.28%	2.918%
7	8.318	8.295	8.431	VV	180640	1838643	100.00%	5.376%
8	9.098	8.978	9.208	BB	155949	1719817	93.54%	5.029%
9	10.484	10.385	10.533	BV	153275	1680489	91.40%	4.914%
10	10.560	10.533	10.735	VB	125868	1635709	88.96%	4.783%
11	11.257	11.068	11.325	BB	168238	1758096	95.62%	5.141%
12	12.288	12.258	12.415	BB	138726	1671203	90.89%	4.887%
13	12.581	12.518	12.645	BV	140018	1639022	89.14%	4.793%
14	14.450	14.421	14.470	PV	124977	1472368	80.08%	4.305%
15	14.491	14.470	14.645	VB	122848	1725560	93.85%	5.046%
16	15.995	15.961	16.010	BV	131640	1544713	84.01%	4.517%
17	16.026	16.010	16.151	VB	114804	1579300	85.89%	4.618%
18	16.374	16.205	16.468	BV	111460	1518079	82.57%	4.439%
19	17.737	17.705	17.758	BV	94271	1259393	68.50%	3.683%
20	17.779	17.758	17.955	VV	83223	1780079	96.81%	5.205%
21	17.986	17.955	18.175	VB	101691	1603528	87.21%	4.689%
			Sum of corrected areas:			34198912		

Aromatic EPH 102324.M Wed Oct 23 18:19:08 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048572.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 17:38
Operator : YP/AJ
Sample : 5 PPM AROMATIC HC STD5
Misc :
ALS Vial : 65 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5

Integration File: autoint1.e
Quant Time: Oct 23 18:14:13 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:05 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.375	765966	5.047 ug/ml
Spiked Amount	50.000		Recovery =	10.09%
6) S	2-Flurobiphenyl (SURR)	8.228	453280	4.616 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	9.23%
11) S	ortho-Terphenyl (SURR)	11.257	878976	5.160 ug/ml
Spiked Amount	50.000		Recovery =	10.32%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.197	891941	5.127 ug/ml
2) T	Naphthalene (C11.7)	5.716	882030	4.943 ug/ml
3) T	2-Methylnaphthalene (...	6.762	888953	4.970 ug/ml
5) T	Acenaphthylene (C15.06)	8.026	887785	5.056 ug/ml
7) T	Acenaphthene (C15.5)	8.319	906880	5.113 ug/ml
8) T	Flouorene (C16.55)	9.101	838419	4.960 ug/ml
9) T	Phenanthrene (C19.36)	10.487	812730	4.917 ug/ml
10) T	Anthracene (C19.43)	10.565	809302	5.061 ug/ml
12) T	Fluoranthene (C21.85)	12.291	849157	5.160 ug/ml
13) T	Pyrene (C20.8)	12.583	807675	5.014 ug/ml
14) T	Benzo[a]anthracene (C...	14.453	671281	4.591 ug/ml
15) T	Chrysene (C27.41)	14.493	886842	5.391 ug/ml
16) T	benzo[b]fluoranthene ...	15.998	725025	4.769 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.030	780831	5.195 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.381	746043	4.957 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.744	565150	4.331 ug/ml
20) T	Dibenz[a,h]anthracene...	17.787	892102	5.482 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.990	761556	4.974 ug/ml

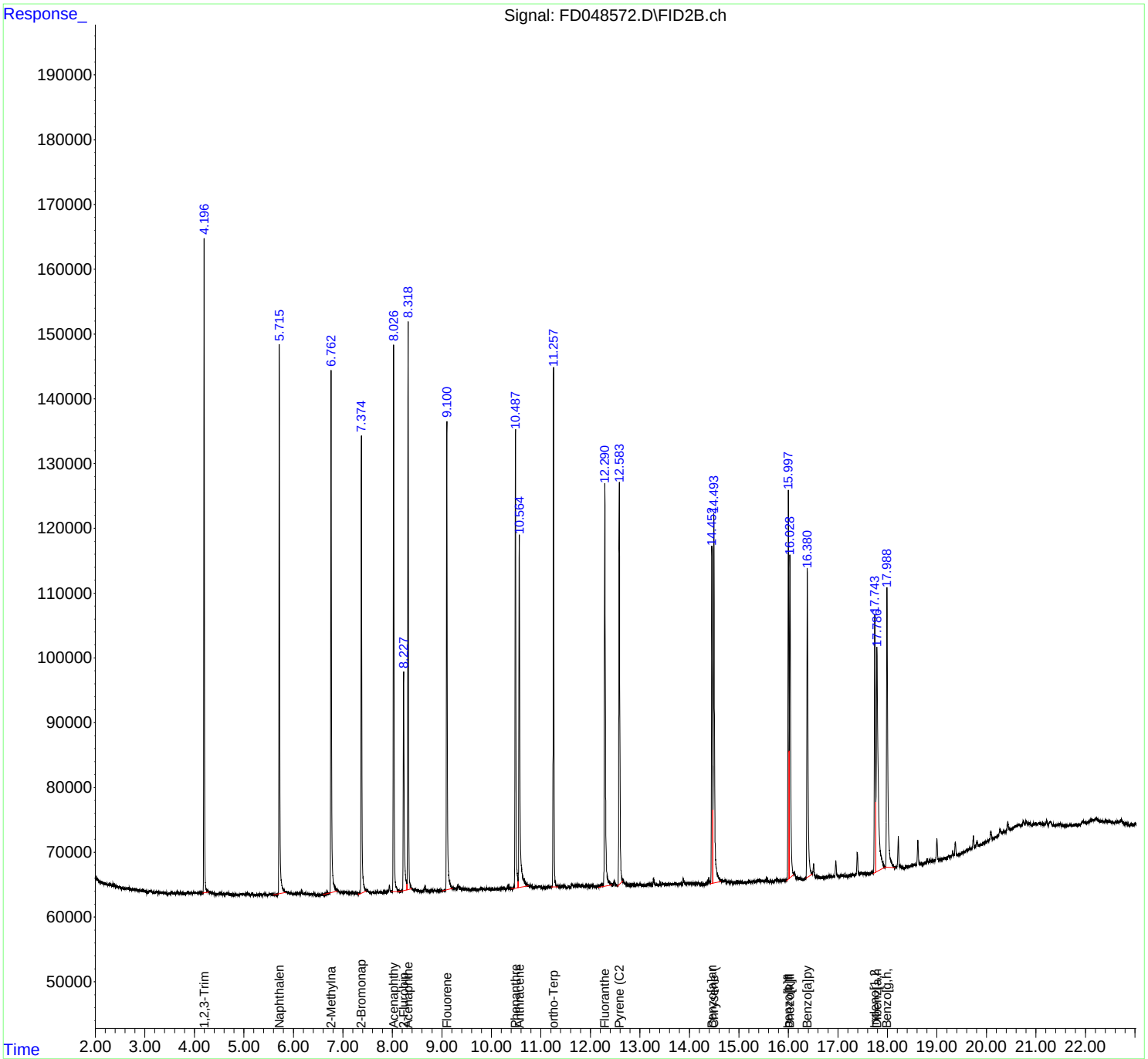
(f)=RT Delta > 1/2 Window (m)=manual int.

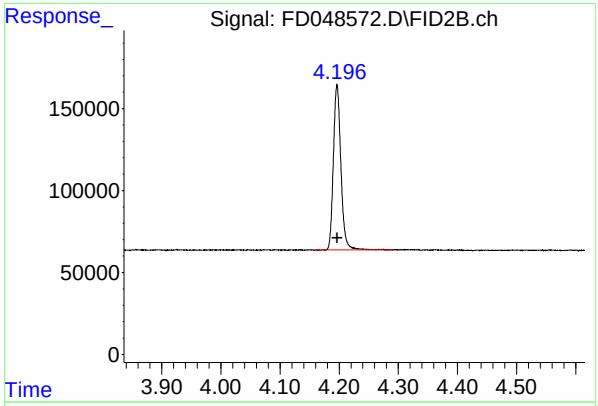
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048572.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 17:38
Operator : YP/AJ
Sample : 5 PPM AROMATIC HC STD5
Misc :
ALS Vial : 65 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5

Integration File: autoint1.e
Quant Time: Oct 23 18:14:13 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:05 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

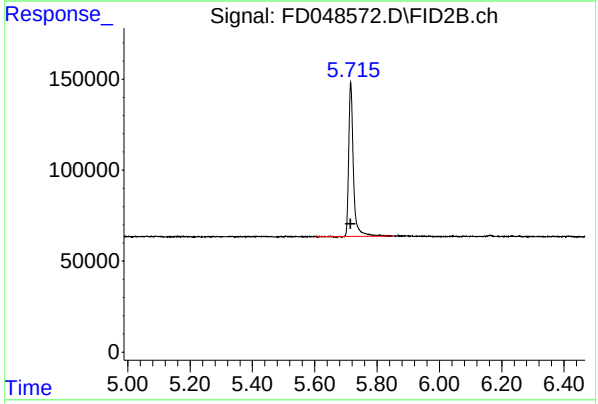




#1 1,2,3-Trimethylbenzene (C10.1)

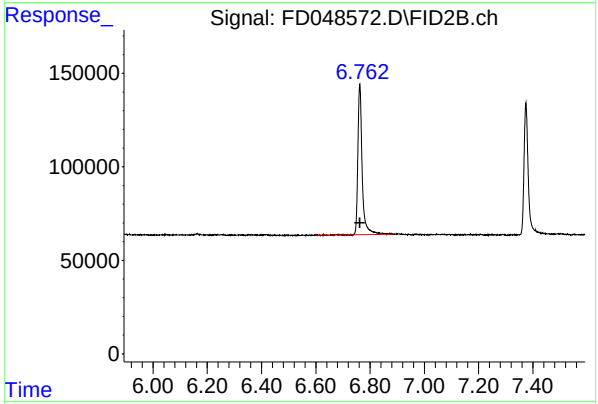
R.T.: 4.197 min
Delta R.T.: 0.000 min
Response: 891941
Conc: 5.13 ug/ml

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5



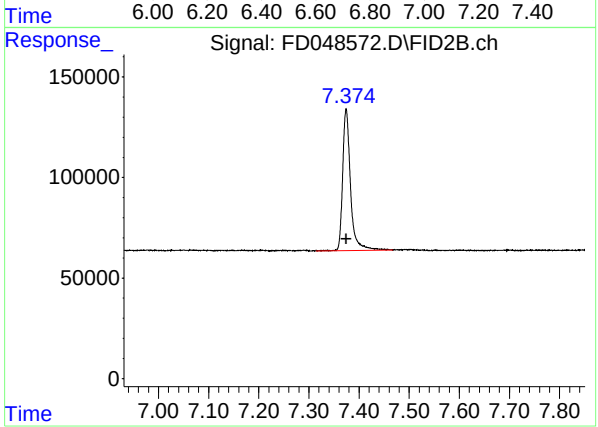
#2 Naphthalene (C11.7)

R.T.: 5.716 min
Delta R.T.: 0.000 min
Response: 882030
Conc: 4.94 ug/ml



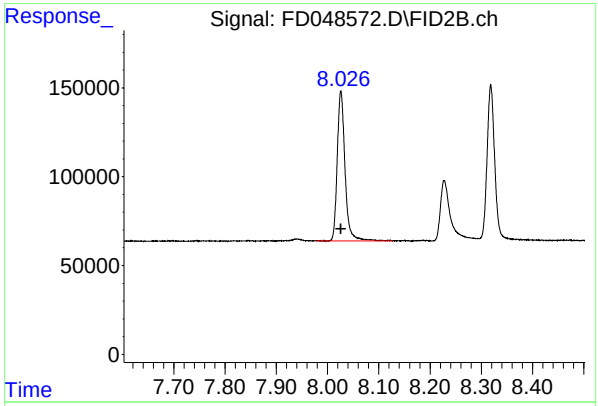
#3 2-Methylnaphthalene (C12.89)

R.T.: 6.762 min
Delta R.T.: 0.000 min
Response: 888953
Conc: 4.97 ug/ml



#4 2-Bromonaphthalene (SURR)

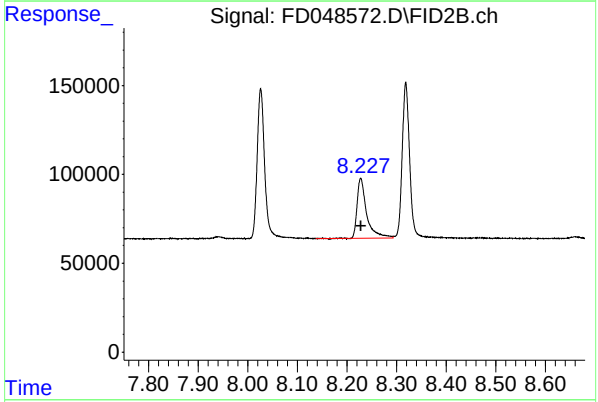
R.T.: 7.375 min
Delta R.T.: 0.000 min
Response: 765966
Conc: 5.05 ug/ml



#5 Acenaphthylene (C15.06)

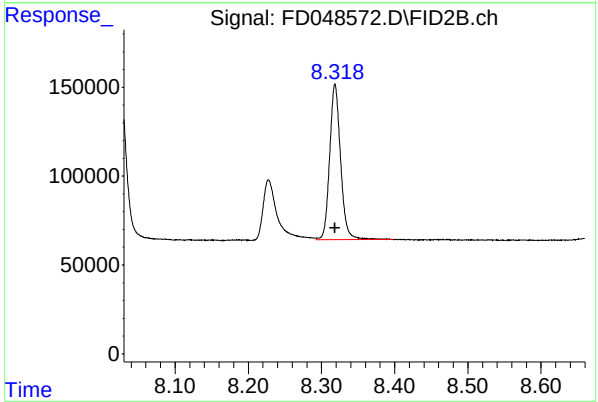
R.T.: 8.026 min
Delta R.T.: 0.000 min
Response: 887785
Conc: 5.06 ug/ml

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5



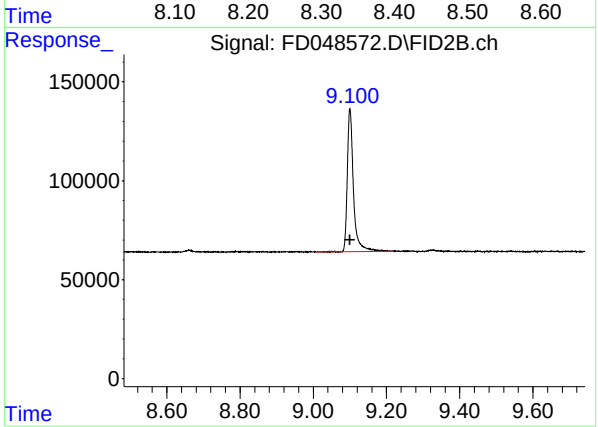
#6 2-Flurobiphenyl (SURR)

R.T.: 8.228 min
Delta R.T.: 0.000 min
Response: 453280
Conc: 4.62 ug/ml



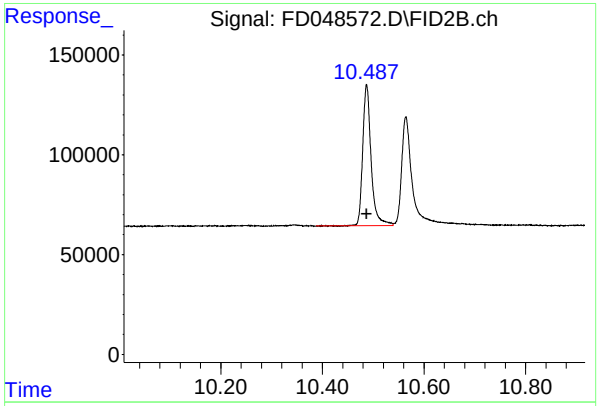
#7 Acenaphthene (C15.5)

R.T.: 8.319 min
Delta R.T.: 0.000 min
Response: 906880
Conc: 5.11 ug/ml



#8 Flouorene (C16.55)

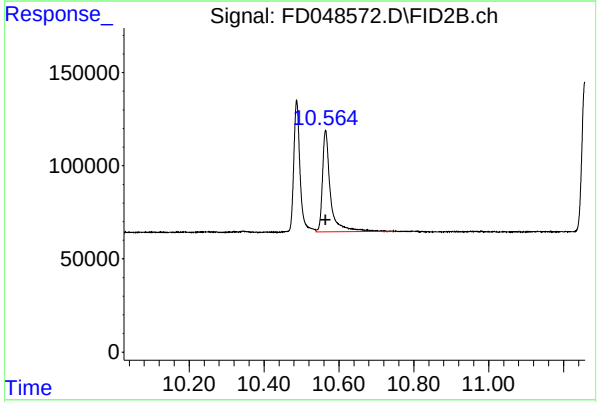
R.T.: 9.101 min
Delta R.T.: 0.000 min
Response: 838419
Conc: 4.96 ug/ml



#9 Phenanthrene (C19.36)

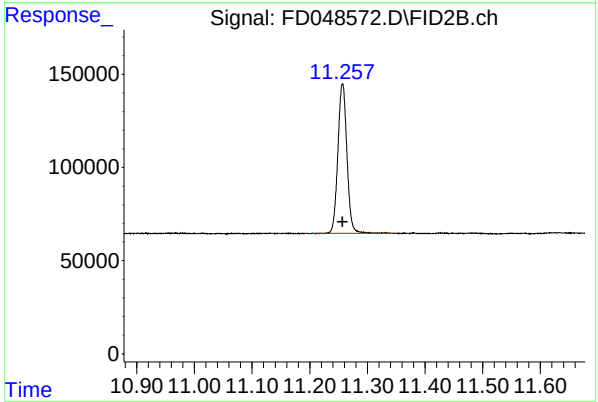
R.T.: 10.487 min
Delta R.T.: 0.000 min
Response: 812730
Conc: 4.92 ug/ml

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5



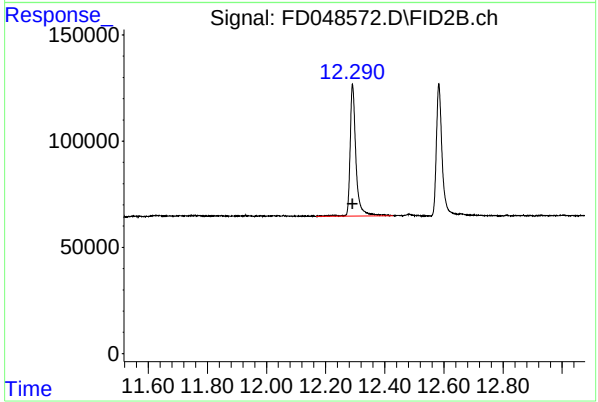
#10 Anthracene (C19.43)

R.T.: 10.565 min
Delta R.T.: 0.000 min
Response: 809302
Conc: 5.06 ug/ml



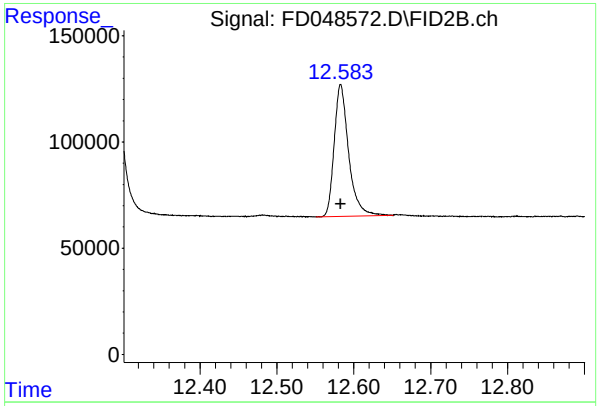
#11 ortho-Terphenyl (SURR)

R.T.: 11.257 min
Delta R.T.: 0.000 min
Response: 878976
Conc: 5.16 ug/ml



#12 Fluoranthene (C21.85)

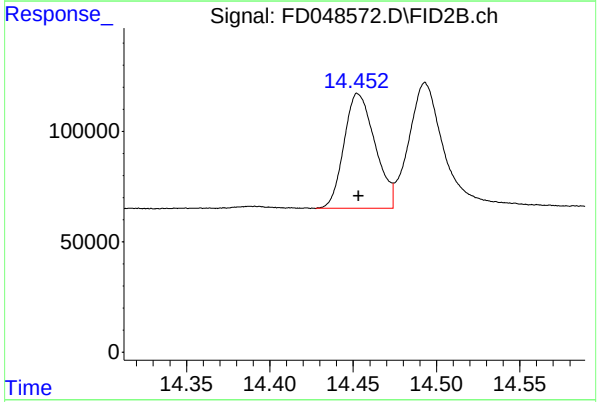
R.T.: 12.291 min
Delta R.T.: 0.000 min
Response: 849157
Conc: 5.16 ug/ml



#13 Pyrene (C20.8)

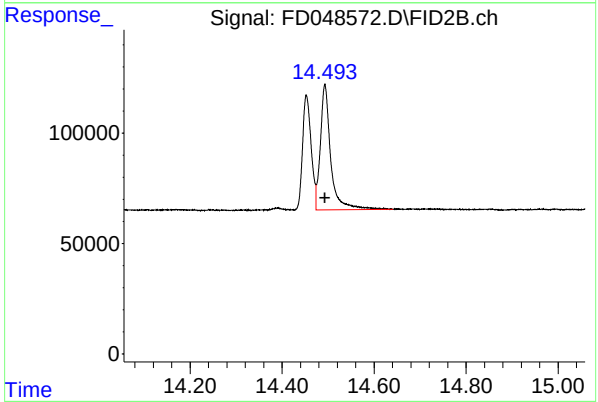
R.T.: 12.583 min
Delta R.T.: 0.000 min
Response: 807675
Conc: 5.01 ug/ml

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5



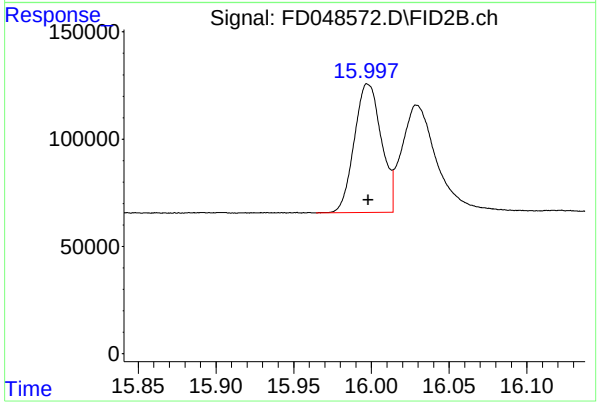
#14 Benzo[a]anthracene (C26.37)

R.T.: 14.453 min
Delta R.T.: 0.000 min
Response: 671281
Conc: 4.59 ug/ml



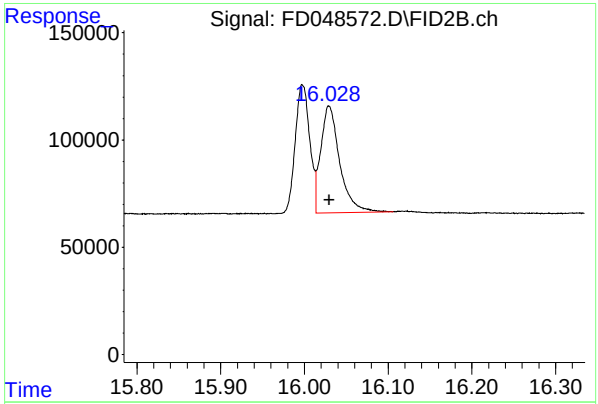
#15 Chrysene (C27.41)

R.T.: 14.493 min
Delta R.T.: 0.000 min
Response: 886842
Conc: 5.39 ug/ml



#16 benzo[b]fluoranthene (C30.41)

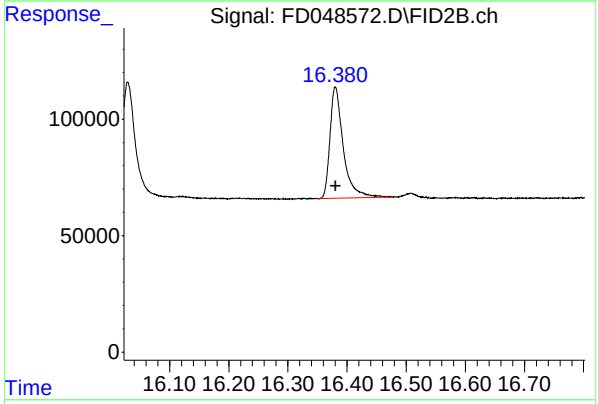
R.T.: 15.998 min
Delta R.T.: 0.000 min
Response: 725025
Conc: 4.77 ug/ml



#17 Bnezo[k]fluoranthene (C30.14)

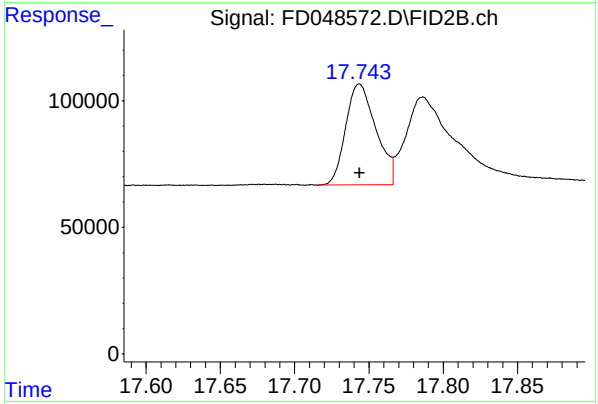
R.T.: 16.030 min
Delta R.T.: 0.000 min
Response: 780831
Conc: 5.20 ug/ml

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5



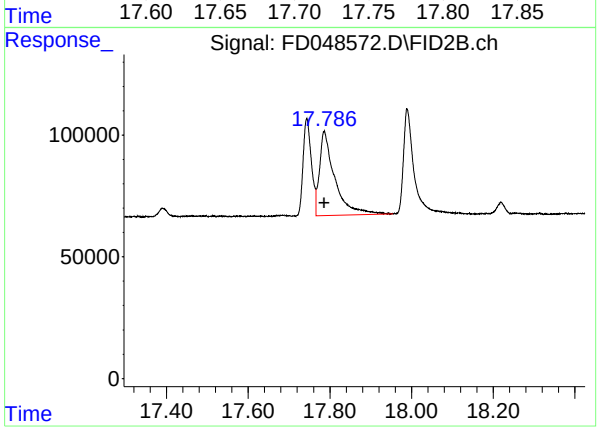
#18 Benzo[a]pyrene (C31.34)

R.T.: 16.381 min
Delta R.T.: 0.000 min
Response: 746043
Conc: 4.96 ug/ml



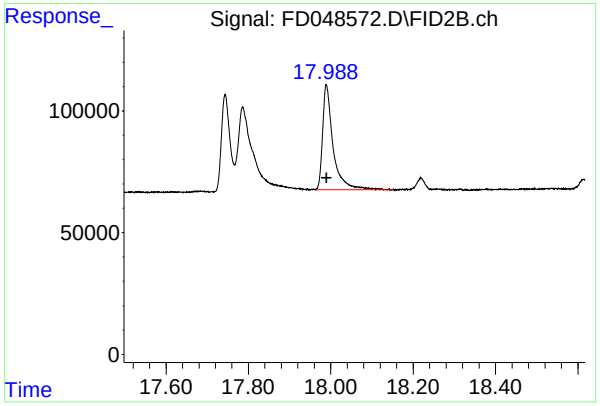
#19 Indeno[1,2,3-cd]pyrene (C35.01)

R.T.: 17.744 min
Delta R.T.: 0.000 min
Response: 565150
Conc: 4.33 ug/ml



#20 Dibenz[a,h]anthracene (C30.36)

R.T.: 17.787 min
Delta R.T.: 0.000 min
Response: 892102
Conc: 5.48 ug/ml



#21 Benzo[g,h,i]perylene (C34.01)

R.T.: 17.990 min
Delta R.T.: 0.000 mi
Response: 761556
Conc: 4.97 ug/m

Instrument :
FID_D
ClientSampleId :
5 PPM AROMATIC HC STD5

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048572.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 17:38
Sample : 5 PPM AROMATIC HC STD5
Misc :
ALS Vial : 65 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.197	4.161	4.291	BB	99856	891941	98.35%	5.340%
2	5.716	5.604	5.851	BB	84500	882030	97.26%	5.281%
3	6.762	6.601	6.884	BB	80288	888953	98.02%	5.322%
4	7.375	7.314	7.468	BB	70282	765966	84.46%	4.586%
5	8.026	7.978	8.128	BB	83372	887785	97.89%	5.315%
6	8.228	8.138	8.293	BV	33723	453280	49.98%	2.714%
7	8.319	8.293	8.398	VB	87190	906880	100.00%	5.430%
8	9.101	9.008	9.218	BB	71759	838419	92.45%	5.020%
9	10.487	10.388	10.539	BV	70612	812730	89.62%	4.866%
10	10.565	10.539	10.744	VB	54403	809302	89.24%	4.846%
11	11.257	11.211	11.344	BB	80592	878976	96.92%	5.263%
12	12.291	12.168	12.428	BB	61860	849157	93.64%	5.084%
13	12.583	12.551	12.651	BV	61467	807675	89.06%	4.836%
14	14.453	14.428	14.474	PV	51289	671281	74.02%	4.019%
15	14.493	14.474	14.641	VB	56549	886842	97.79%	5.310%
16	15.998	15.964	16.014	BV	60013	725025	79.95%	4.341%
17	16.030	16.014	16.106	VV	49388	780831	86.10%	4.675%
18	16.381	16.348	16.478	BV	47621	746043	82.26%	4.467%
19	17.744	17.714	17.766	BV	39855	565150	62.32%	3.384%
20	17.787	17.766	17.954	VB	34397	892102	98.37%	5.341%
21	17.990	17.964	18.151	BB	42474	761556	83.98%	4.560%
			Sum of corrected areas:			16701921		

Aromatic EPH 102324.M Wed Oct 23 18:19:26 2024

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048573.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 18:14
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD ICV
Misc :
ALS Vial : 66 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV

Integration File: autoint1.e
Quant Time: Oct 23 18:50:32 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.372	3035391	19.999 ug/ml
Spiked Amount	50.000		Recovery =	40.00%
6) S	2-Flurobiphenyl (SURR)	8.222	2009011	20.460 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	40.92%
11) S	ortho-Terphenyl (SURR)	11.258	3418196	20.067 ug/ml
Spiked Amount	50.000		Recovery =	40.13%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.195	3511974	20.187 ug/ml
2) T	Naphthalene (C11.7)	5.713	3621999	20.299 ug/ml
3) T	2-Methylnaphthalene (...	6.760	3629138	20.290 ug/ml
5) T	Acenaphthylene (C15.06)	8.025	3549708	20.216 ug/ml
7) T	Acenaphthene (C15.5)	8.319	3566386	20.108 ug/ml
8) T	Flouorene (C16.55)	9.098	3449130	20.405 ug/ml
9) T	Phenanthrene (C19.36)	10.485	3337748	20.191 ug/ml
10) T	Anthracene (C19.43)	10.560	3166872	19.804 ug/ml
12) T	Fluoranthene (C21.85)	12.288	3304952	20.082 ug/ml
13) T	Pyrene (C20.8)	12.581	3231023	20.059 ug/ml
14) T	Benzo[a]anthracene (C...	14.450	2986450	20.425 ug/ml
15) T	Chrysene (C27.41)	14.492	3268283	19.869 ug/ml
16) T	benzo[b]fluoranthene ...	15.997	3076351	20.235 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.029	3007230	20.008 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.372	3055729	20.304 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.737	2639364	20.228 ug/ml
20) T	Dibenz[a,h]anthracene...	17.776	3309486	20.337 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.987	3030209	19.793 ug/ml

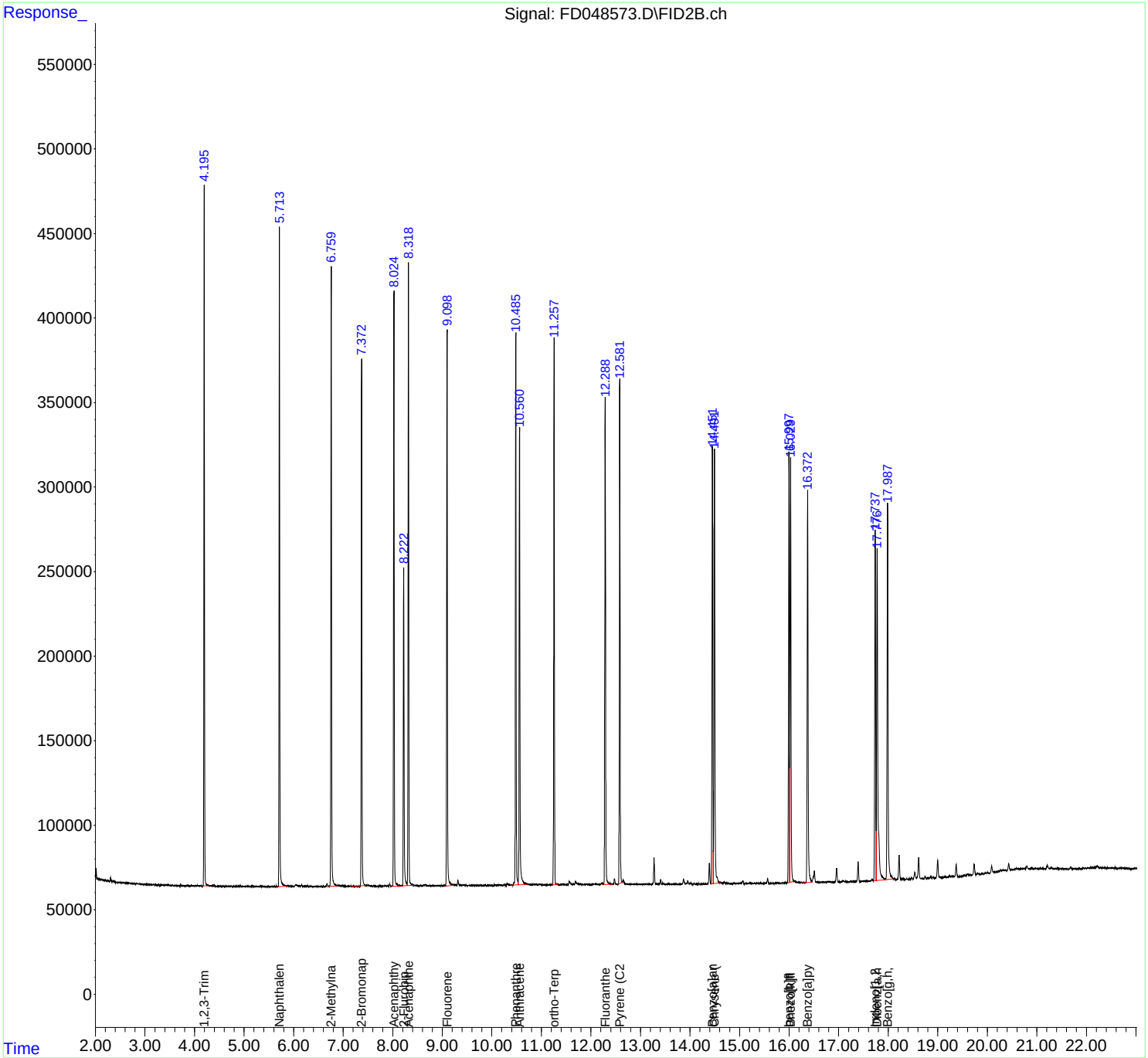
(f)=RT Delta > 1/2 Window (m)=manual int.

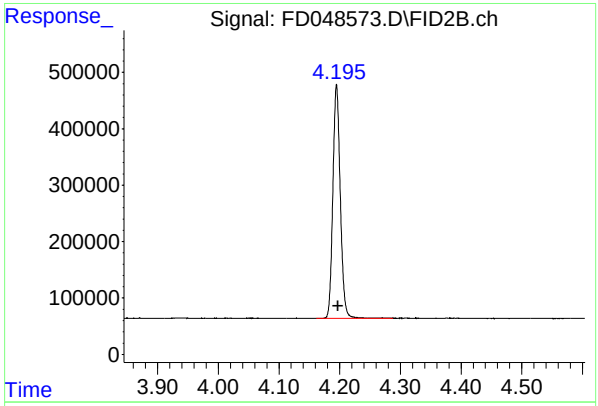
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048573.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 18:14
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD ICV
Misc :
ALS Vial : 66 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV

Integration File: autoint1.e
Quant Time: Oct 23 18:50:32 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

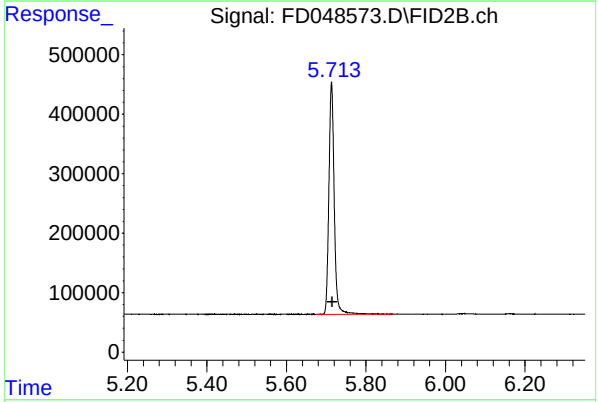




#1 1,2,3-Trimethylbenzene (C10.1)

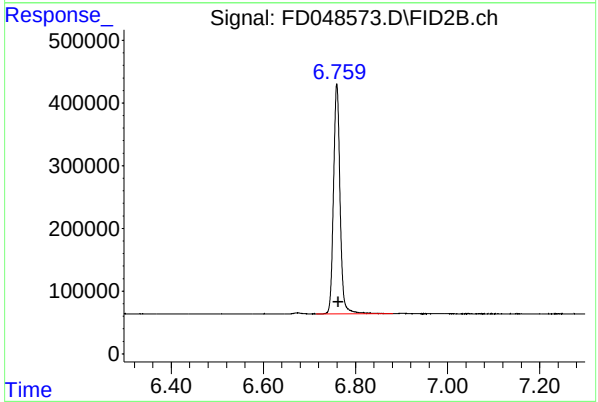
R.T.: 4.195 min
Delta R.T.: -0.002 min
Response: 3511974
Conc: 20.19 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV



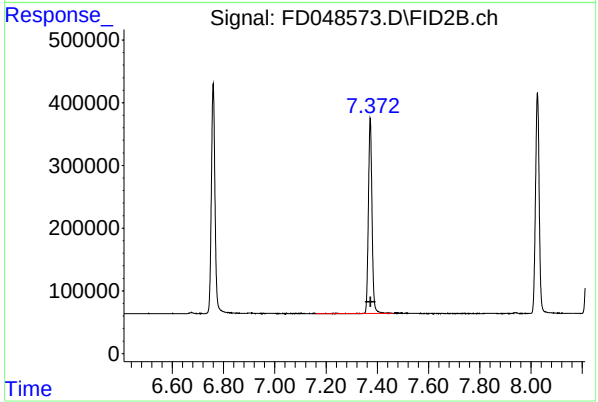
#2 Naphthalene (C11.7)

R.T.: 5.713 min
Delta R.T.: -0.002 min
Response: 3621999
Conc: 20.30 ug/ml



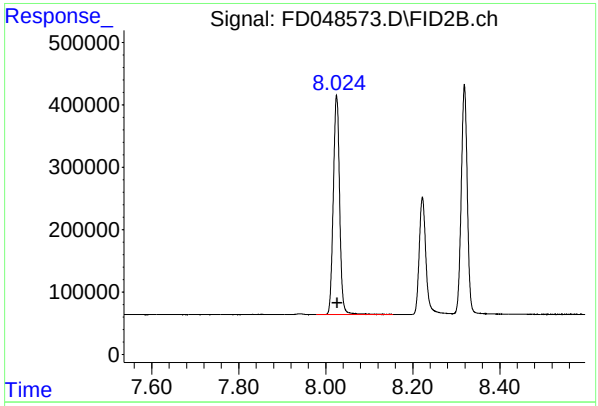
#3 2-Methylnaphthalene (C12.89)

R.T.: 6.760 min
Delta R.T.: -0.003 min
Response: 3629138
Conc: 20.29 ug/ml



#4 2-Bromonaphthalene (SURR)

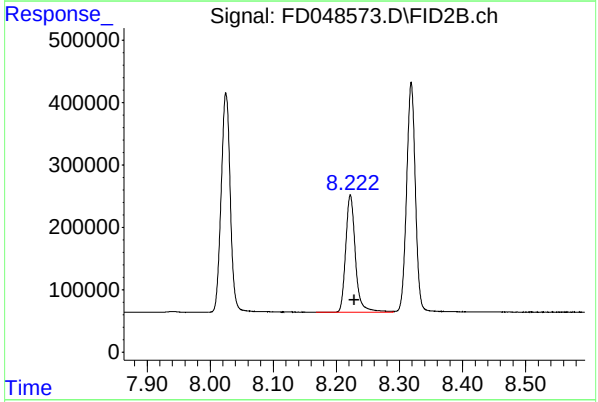
R.T.: 7.372 min
Delta R.T.: -0.002 min
Response: 3035391
Conc: 20.00 ug/ml



#5 Acenaphthylene (C15.06)

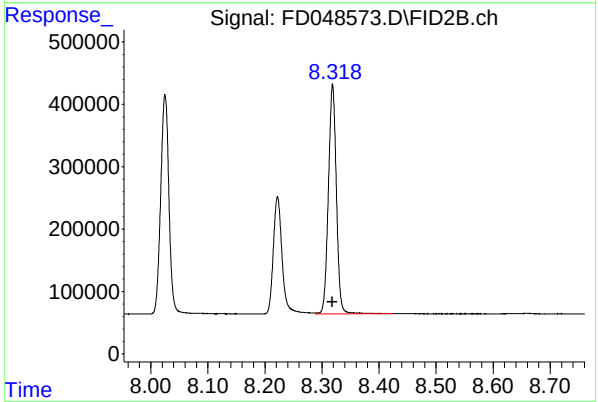
R.T.: 8.025 min
Delta R.T.: -0.001 min
Response: 3549708
Conc: 20.22 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV



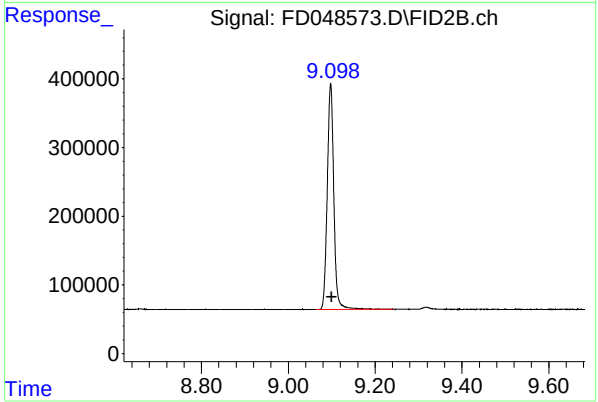
#6 2-Flurobiphenyl (SURR)

R.T.: 8.222 min
Delta R.T.: -0.006 min
Response: 2009011
Conc: 20.46 ug/ml



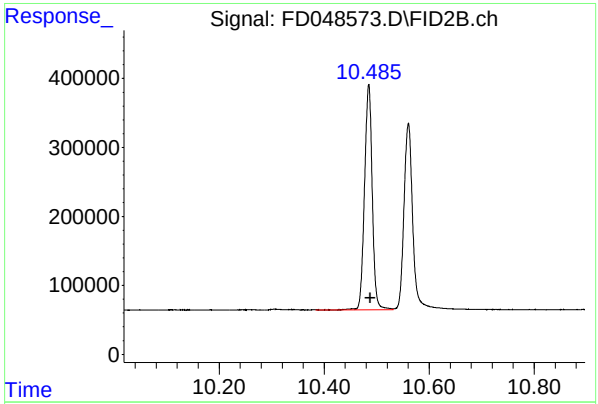
#7 Acenaphthene (C15.5)

R.T.: 8.319 min
Delta R.T.: 0.000 min
Response: 3566386
Conc: 20.11 ug/ml



#8 Flouorene (C16.55)

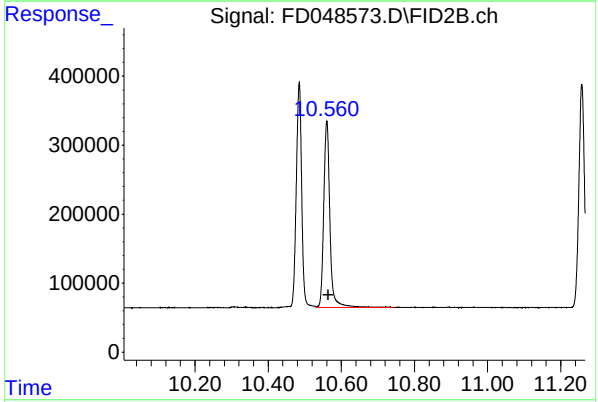
R.T.: 9.098 min
Delta R.T.: -0.003 min
Response: 3449130
Conc: 20.40 ug/ml



#9 Phenanthrene (C19.36)

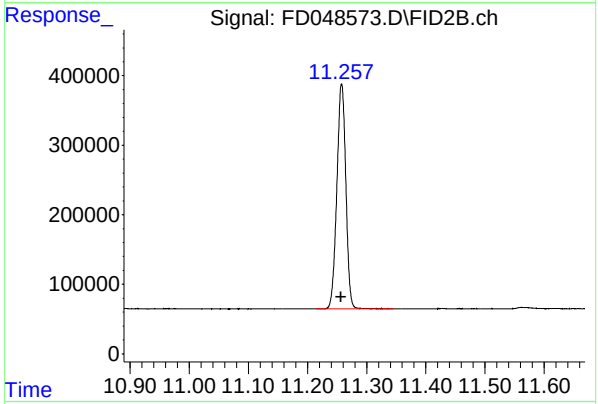
R.T.: 10.485 min
Delta R.T.: -0.003 min
Response: 3337748
Conc: 20.19 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV



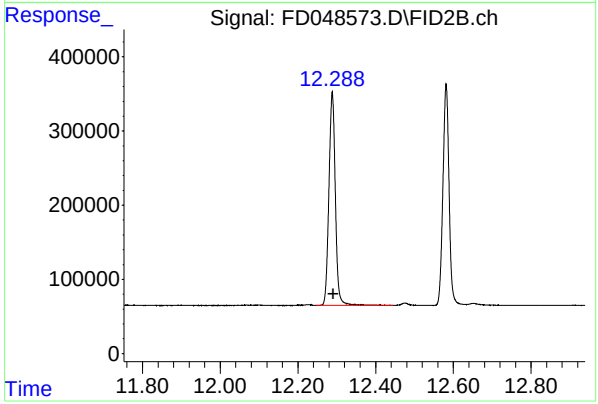
#10 Anthracene (C19.43)

R.T.: 10.560 min
Delta R.T.: -0.004 min
Response: 3166872
Conc: 19.80 ug/ml



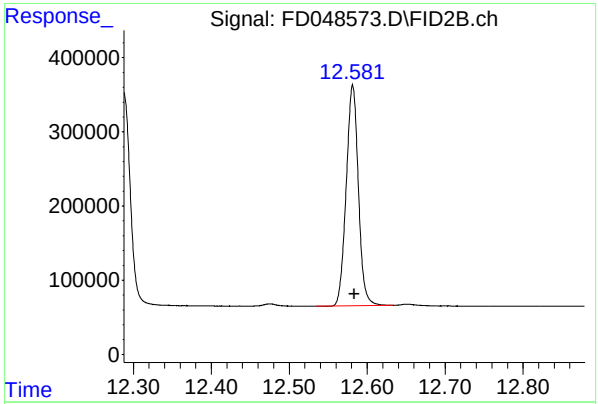
#11 ortho-Terphenyl (SURR)

R.T.: 11.258 min
Delta R.T.: 0.000 min
Response: 3418196
Conc: 20.07 ug/ml



#12 Fluoranthene (C21.85)

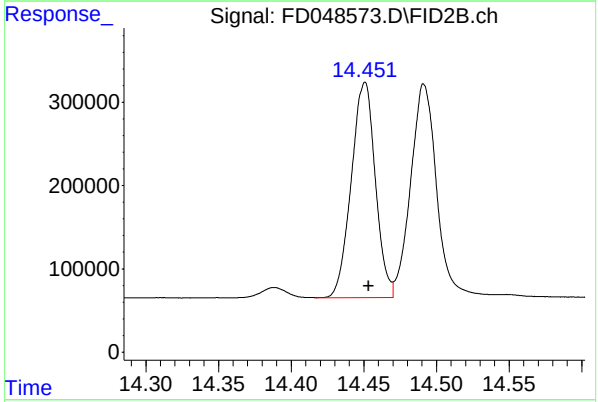
R.T.: 12.288 min
Delta R.T.: -0.003 min
Response: 3304952
Conc: 20.08 ug/ml



#13 Pyrene (C20.8)

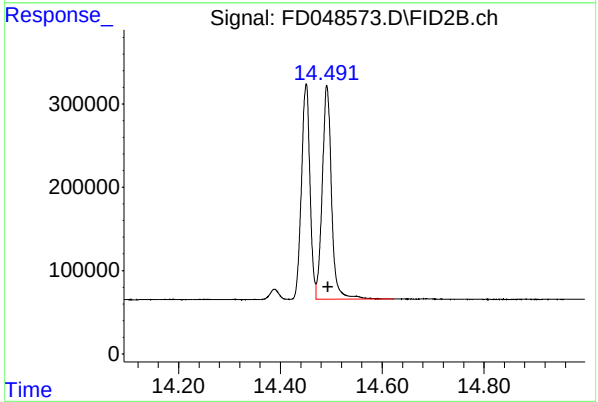
R.T.: 12.581 min
Delta R.T.: -0.002 min
Response: 3231023
Conc: 20.06 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV



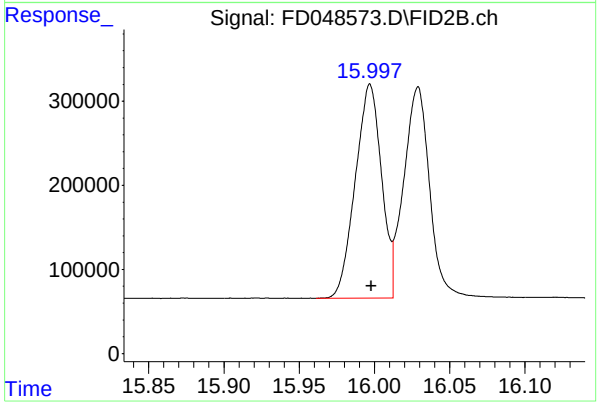
#14 Benzo[a]anthracene (C26.37)

R.T.: 14.450 min
Delta R.T.: -0.003 min
Response: 2986450
Conc: 20.42 ug/ml



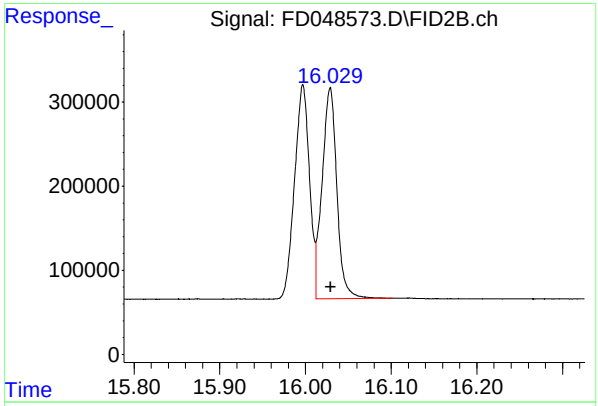
#15 Chrysene (C27.41)

R.T.: 14.492 min
Delta R.T.: -0.002 min
Response: 3268283
Conc: 19.87 ug/ml



#16 benzo[b]fluoranthene (C30.41)

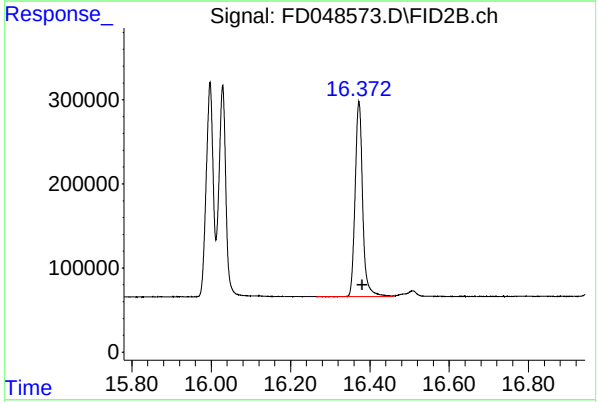
R.T.: 15.997 min
Delta R.T.: 0.000 min
Response: 3076351
Conc: 20.24 ug/ml



#17 Bnezo[k]fluoranthene (C30.14)

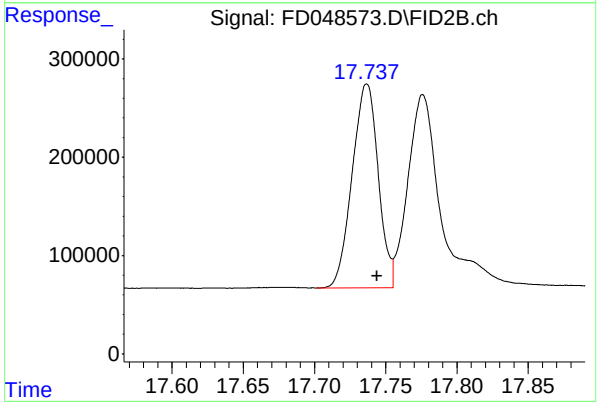
R.T.: 16.029 min
Delta R.T.: 0.000 min
Response: 3007230
Conc: 20.01 ug/ml

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV



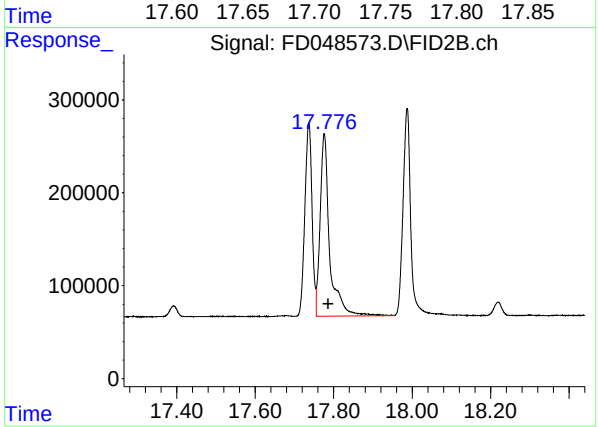
#18 Benzo[a]pyrene (C31.34)

R.T.: 16.372 min
Delta R.T.: -0.008 min
Response: 3055729
Conc: 20.30 ug/ml



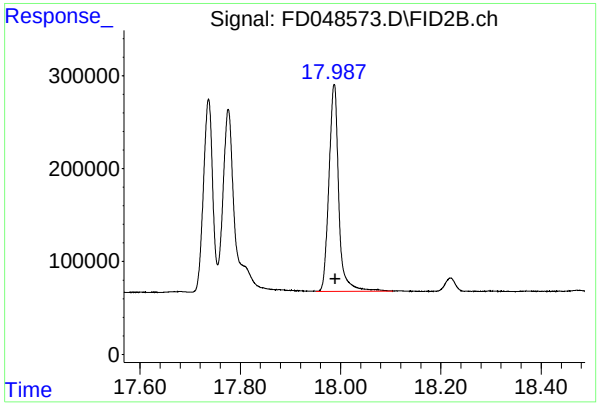
#19 Indeno[1,2,3-cd]pyrene (C35.01)

R.T.: 17.737 min
Delta R.T.: -0.007 min
Response: 2639364
Conc: 20.23 ug/ml



#20 Dibenz[a,h]anthracene (C30.36)

R.T.: 17.776 min
Delta R.T.: -0.011 min
Response: 3309486
Conc: 20.34 ug/ml



#21 Benzo[g,h,i]perylene (C34.01)

R.T.: 17.987 min
Delta R.T.: -0.003 mi
Response: 3030209
Conc: 19.79 ug/m

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD ICV

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD102324AR\
Data File : FD048573.D
Signal(s) : FID2B.ch
Acq On : 23 Oct 2024 18:14
Sample : 20 PPM AROMATIC HC STD ICV
Misc :
ALS Vial : 66 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.195	4.161	4.288	BB	411534	3511974	96.77%	5.226%
2	5.713	5.674	5.868	BB	387327	3621999	99.80%	5.390%
3	6.760	6.714	6.881	BV	365701	3629138	100.00%	5.400%
4	7.372	7.161	7.461	BB	308815	3035391	83.64%	4.517%
5	8.025	7.978	8.154	BB	351890	3549708	97.81%	5.282%
6	8.222	8.168	8.290	BV	187045	2009011	55.36%	2.989%
7	8.319	8.290	8.424	VB	365720	3566386	98.27%	5.307%
8	9.098	9.064	9.241	PB	328779	3449130	95.04%	5.132%
9	10.485	10.384	10.531	BV	326000	3337748	91.97%	4.967%
10	10.560	10.531	10.741	VB	271677	3166872	87.26%	4.712%
11	11.258	11.214	11.344	BB	324343	3418196	94.19%	5.086%
12	12.288	12.247	12.444	PB	286640	3304952	91.07%	4.918%
13	12.581	12.534	12.633	BV	297215	3231023	89.03%	4.808%
14	14.450	14.417	14.470	VV	260406	2986450	82.29%	4.444%
15	14.492	14.470	14.621	VB	257062	3268283	90.06%	4.863%
16	15.997	15.961	16.012	BV	254462	3076351	84.77%	4.578%
17	16.029	16.012	16.102	VV	249107	3007230	82.86%	4.475%
18	16.372	16.264	16.458	BV	231238	3055729	84.20%	4.547%
19	17.737	17.701	17.755	BV	208961	2639364	72.73%	3.927%
20	17.776	17.755	17.951	VV	196335	3309486	91.19%	4.924%
21	17.987	17.951	18.104	VV	224512	3030209	83.50%	4.509%
			Sum of corrected areas:			67204630		

Aromatic EPH 102324.M Wed Oct 23 18:51:40 2024

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

Continuing Calibration Report for SequenceID : FC110824AL

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FC067669.D**						
Aliphatic C9-C12	7432259.000	60.000	3.171	6.450	123870.983	135469.641	8.562
Aliphatic C12-C16	4908621.000	40.000	6.451	9.841	122715.525	131681.730	6.809
Aliphatic C16-C21	7119944.000	60.000	9.842	13.199	118665.733	127235.092	6.735
Aliphatic C21-C28	9135773.000	80.000	13.200	16.853	114197.163	120090.398	4.907
Aliphatic C28-C40	12707285.000	120.000	16.854	21.698	105894.042	101093.195	-4.749
Aliphatic EPH	41303882.000	360.000	3.171	21.698	114733.006	118799.912	3.423

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Fax : 908 789 8922

Lab Sample ID:	20 PPM ALIPHATIC HC S	Acq On:	08 Nov 2024 13:17
Client Sample ID:		Operator:	YP/AJ
Data file:	FC067669.D	Misc:	
Instrument:	FID_C	ALS Vial:	3
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aliphatic C9-C12	3.171	6.450	7432259.000	60.000	ug/ml
Aliphatic C12-C16	6.451	9.841	4908621.000	40.000	ug/ml
Aliphatic C16-C21	9.842	13.199	7119944.000	60.000	ug/ml
Aliphatic C21-C28	13.200	16.853	9135773.000	80.000	ug/ml
Aliphatic C28-C40	16.854	21.698	12707285.000	120.000	ug/ml
Aliphatic EPH	3.171	21.698	41303882.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067669.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 13:17
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 09 01:36:51 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9) S	ortho-Terphenyl (SURR)	11.492	2717082	18.517 ug/ml
Spiked Amount	50.000		Recovery =	37.03%
12) S	1-chlorooctadecane (S...	12.930	2012079	18.632 ug/ml
Spiked Amount	50.000		Recovery =	37.26%
	Target Compounds			
1) T	n-Nonane (C9)	3.271	2426226	18.009 ug/ml
2) T	n-Decane (C10)	4.335	2507371	18.403 ug/ml
3) T	A~Naphthalene (C11.7)	5.913	2726316	18.398 ug/ml
4) T	n-Dodecane (C12)	6.350	2498662	18.448 ug/ml
5) T	A~2-methylnaphthalene...	6.968	2607787	18.466 ug/ml
6) T	n-Tetradecane (C14)	8.143	2437230	18.568 ug/ml
7) T	n-Hexadecane (C16)	9.741	2471391	18.708 ug/ml
8) T	n-Octadecane (C18)	11.181	2472221	18.713 ug/ml
10) T	n-Eicosane (C20)	12.489	2346255	18.595 ug/ml
11) T	n-Heneicosane (C21)	13.099	2301468	18.648 ug/ml
13) T	n-Docosane (C22)	13.685	2288234	18.687 ug/ml
14) T	n-Tetracosane (C24)	14.786	2274121	18.762 ug/ml
15) T	n-Hexacosane (C26)	15.805	2256079	18.950 ug/ml
16) T	n-Octacosane (C28)	16.753	2317339	19.697 ug/ml
17) T	n-Tricontane (C30)	17.639	2551406	21.108 ug/ml
18) T	n-Dotriacontane (C32)	18.472	2591991	21.907 ug/ml
19) T	n-Tetratriacontane (C34)	19.253	2270153	21.677 ug/ml
20) T	n-Hexatriacontane (C36)	19.991	1899475	20.867 ug/ml
21) T	n-Octatriacontane (C38)	20.714	1747204	20.175 ug/ml
22) T	n-Tetracontane (C40)	21.598	1647056	19.375 ug/ml

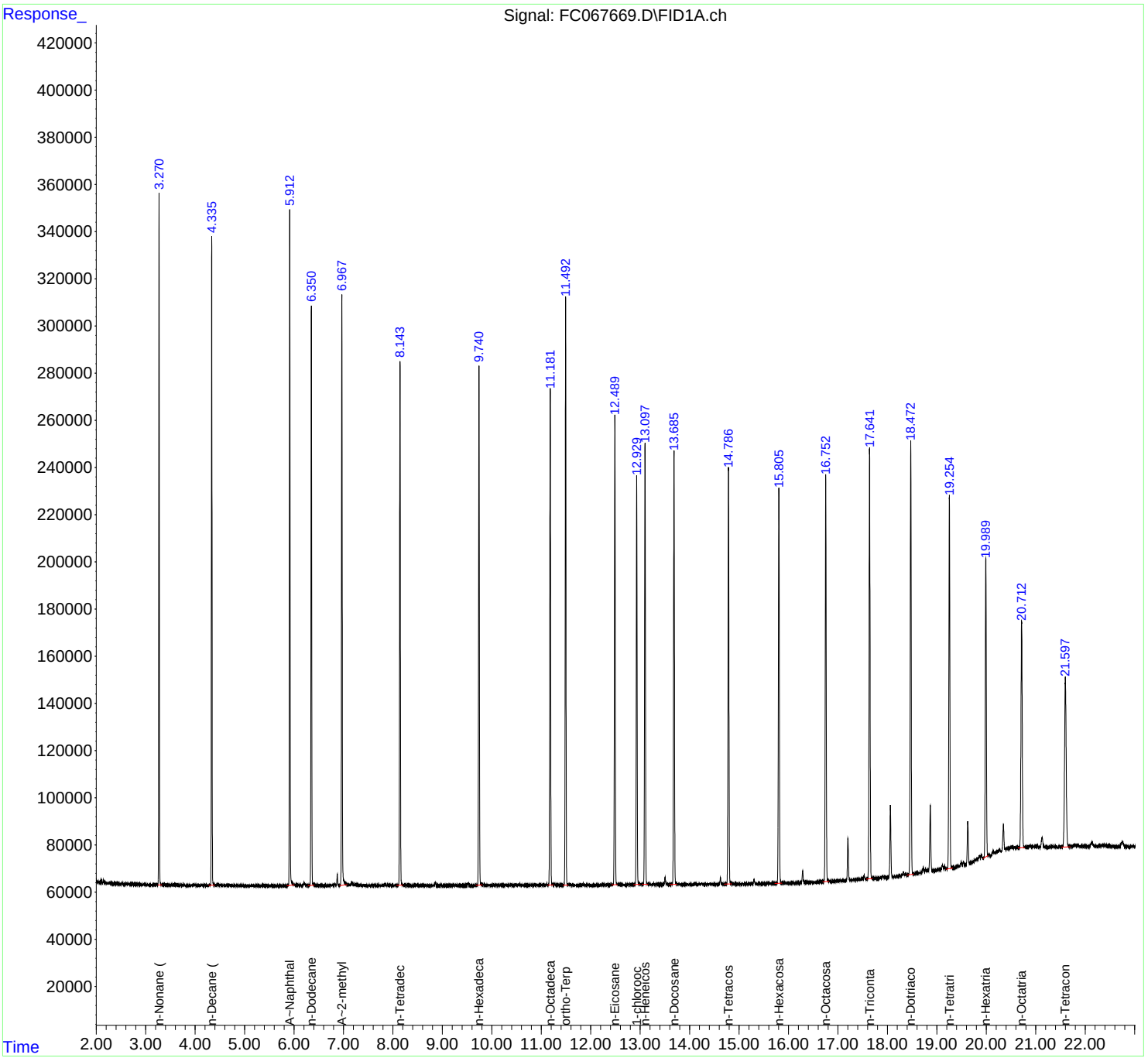
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067669.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 13:17
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 09 01:36:51 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067669.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 13:17
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 3 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.271	3.245	3.325	BB	292779	2426226	88.99%	4.723%
2	4.335	4.272	4.397	BB	274968	2507371	91.97%	4.881%
3	5.913	5.857	6.000	BB	284745	2726316	100.00%	5.308%
4	6.350	6.285	6.412	BB	245680	2498662	91.65%	4.864%
5	6.968	6.920	7.078	BB	249673	2607787	95.65%	5.077%
6	8.143	8.078	8.207	BB	223148	2437230	89.40%	4.745%
7	9.741	9.683	9.808	BB	217539	2471391	90.65%	4.811%
8	11.181	11.132	11.245	BB	206999	2472221	90.68%	4.813%
9	11.492	11.435	11.545	BB	250035	2717082	99.66%	5.290%
10	12.489	12.420	12.537	BB	195566	2346255	86.06%	4.568%
11	12.930	12.863	12.995	BB	172228	2012079	73.80%	3.917%
12	13.099	13.037	13.162	BB	186830	2301468	84.42%	4.480%
13	13.685	13.600	13.742	BB	183799	2288234	83.93%	4.455%
14	14.786	14.703	14.850	BB	176511	2274121	83.41%	4.427%
15	15.805	15.720	15.868	BB	167191	2256079	82.75%	4.392%
16	16.753	16.688	16.817	BB	171170	2317339	85.00%	4.511%
17	17.639	17.570	17.703	BB	181028	2551406	93.58%	4.967%
18	18.472	18.395	18.532	BB	183317	2591991	95.07%	5.046%
19	19.253	19.190	19.318	BB	157170	2270153	83.27%	4.419%
20	19.991	19.937	20.032	BV	125941	1899475	69.67%	3.698%
21	20.714	20.648	20.780	BB	95584	1747204	64.09%	3.401%
22	21.598	21.515	21.698	BB	71612	1647056	60.41%	3.206%

Sum of corrected areas: 51367147

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Continuing Calibration Report for SequenceID : FC110824AL

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FC067683.D**						
Aliphatic C9-C12	7306679.000	60.000	3.171	6.450	121777.983	135469.641	10.107
Aliphatic C12-C16	4818056.000	40.000	6.451	9.841	120451.400	131681.730	8.528
Aliphatic C16-C21	7034927.000	60.000	9.842	13.199	117248.783	127235.092	7.849
Aliphatic C21-C28	9100518.000	80.000	13.200	16.853	113756.475	120090.398	5.274
Aliphatic C28-C40	12781161.000	120.000	16.854	21.698	106509.675	101093.195	-5.358
Aliphatic EPH	41041341.000	360.000	3.171	21.698	114003.725	118799.912	4.037

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Fax : 908 789 8922

Lab Sample ID:	20 PPM ALIPHATIC HC S	Acq On:	09 Nov 2024 00:50
Client Sample ID:		Operator:	YP/AJ
Data file:	FC067683.D	Misc:	
Instrument:	FID_C	ALS Vial:	3
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aliphatic C9-C12	3.171	6.450	7306679.000	60.000	ug/ml
Aliphatic C12-C16	6.451	9.841	4818056.000	40.000	ug/ml
Aliphatic C16-C21	9.842	13.199	7034927.000	60.000	ug/ml
Aliphatic C21-C28	13.200	16.853	9100518.000	80.000	ug/ml
Aliphatic C28-C40	16.854	21.698	12781161.000	120.000	ug/ml
Aliphatic EPH	3.171	21.698	41041341.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067683.D
Signal(s) : FID1A.ch
Acq On : 09 Nov 2024 00:50
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 09 01:39:24 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9) S	ortho-Terphenyl (SURR)	11.490	2689810	18.332 ug/ml
Spiked Amount	50.000		Recovery =	36.66%
12) S	1-chlorooctadecane (S...	12.928	1991124	18.438 ug/ml
Spiked Amount	50.000		Recovery =	36.88%
	Target Compounds			
1) T	n-Nonane (C9)	3.271	2384500	17.700 ug/ml
2) T	n-Decane (C10)	4.335	2468586	18.119 ug/ml
3) T	A~Naphthalene (C11.7)	5.912	2687357	18.135 ug/ml
4) T	n-Dodecane (C12)	6.350	2453593	18.115 ug/ml
5) T	A~2-methylnaphthalene...	6.967	2561332	18.137 ug/ml
6) T	n-Tetradecane (C14)	8.141	2393285	18.233 ug/ml
7) T	n-Hexadecane (C16)	9.739	2424771	18.355 ug/ml
8) T	n-Octadecane (C18)	11.178	2435152	18.432 ug/ml
10) T	n-Eicosane (C20)	12.486	2321827	18.401 ug/ml
11) T	n-Heneicosane (C21)	13.097	2277948	18.458 ug/ml
13) T	n-Docosane (C22)	13.682	2271896	18.554 ug/ml
14) T	n-Tetracosane (C24)	14.784	2266851	18.702 ug/ml
15) T	n-Hexacosane (C26)	15.802	2244772	18.855 ug/ml
16) T	n-Octacosane (C28)	16.750	2316999	19.694 ug/ml
17) T	n-Tricontane (C30)	17.637	2559915	21.179 ug/ml
18) T	n-Dotriacontane (C32)	18.468	2608202	22.044 ug/ml
19) T	n-Tetratriacontane (C34)	19.251	2282255	21.792 ug/ml
20) T	n-Hexatriacontane (C36)	19.988	1910294	20.986 ug/ml
21) T	n-Octatriacontane (C38)	20.709	1768265	20.418 ug/ml
22) T	n-Tetracontane (C40)	21.593	1652230	19.436 ug/ml

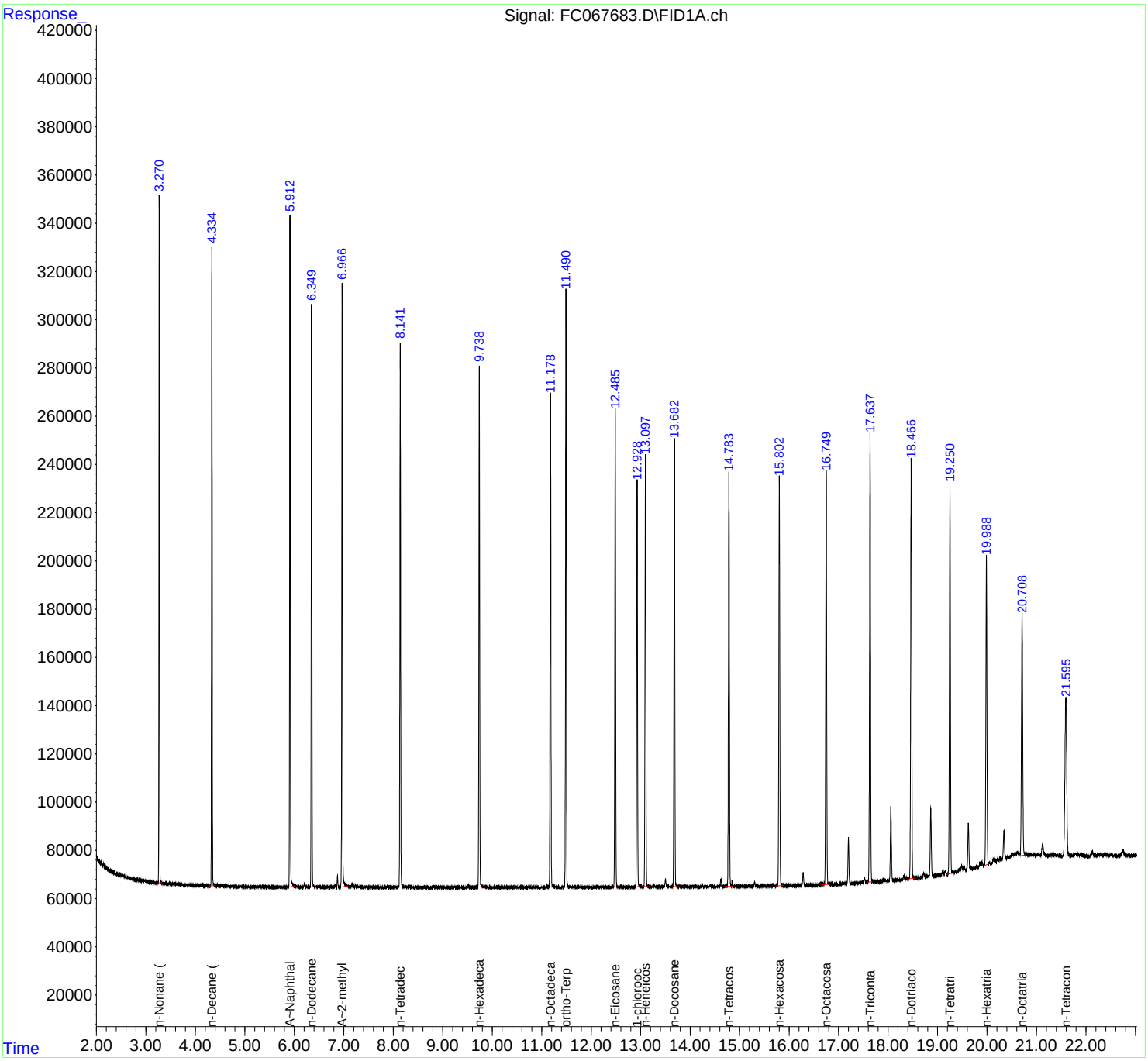
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067683.D
Signal(s) : FID1A.ch
Acq On : 09 Nov 2024 00:50
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 3 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 09 01:39:24 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067683.D
Signal(s) : FID1A.ch
Acq On : 09 Nov 2024 00:50
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 3 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.271	3.245	3.325	BB	284552	2384500	88.65%	4.678%
2	4.335	4.285	4.399	BB	265362	2468586	91.78%	4.843%
3	5.912	5.859	6.009	BB	278391	2687357	99.91%	5.272%
4	6.350	6.287	6.410	BB	241513	2453593	91.22%	4.814%
5	6.967	6.920	7.077	BB	250595	2561332	95.22%	5.025%
6	8.141	8.087	8.214	BB	225558	2393285	88.98%	4.695%
7	9.739	9.680	9.805	BB	216421	2424771	90.15%	4.757%
8	11.178	11.134	11.247	BB	205040	2435152	90.53%	4.778%
9	11.490	11.422	11.549	BB	248609	2689810	100.00%	5.277%
10	12.486	12.422	12.540	BB	197316	2321827	86.32%	4.555%
11	12.928	12.859	12.984	BB	168069	1991124	74.02%	3.906%
12	13.097	13.035	13.157	BB	178271	2277948	84.69%	4.469%
13	13.682	13.597	13.757	BB	184646	2271896	84.46%	4.457%
14	14.784	14.702	14.869	BB	171561	2266851	84.28%	4.447%
15	15.802	15.737	15.880	BB	170052	2244772	83.45%	4.404%
16	16.750	16.665	16.817	BB	170790	2316999	86.14%	4.546%
17	17.637	17.564	17.682	BB	186324	2559915	95.17%	5.022%
18	18.468	18.390	18.530	BB	173342	2608202	96.97%	5.117%
19	19.251	19.189	19.322	BB	160720	2282255	84.85%	4.478%
20	19.988	19.934	20.030	BV	128670	1910294	71.02%	3.748%
21	20.709	20.659	20.780	VB	100006	1768265	65.74%	3.469%
22	21.593	21.507	21.677	BB	63835	1652230	61.43%	3.242%
					Sum of corrected areas:	50970966		

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Continuing Calibration Report for SequenceID : FC111124AL

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FC067693.D**						
Aliphatic C9-C12	8271307.000	60.000	3.170	6.450	137855.117	135469.641	-1.761
Aliphatic C12-C16	5396973.000	40.000	6.451	9.840	134924.325	131681.730	-2.462
Aliphatic C16-C21	7819384.000	60.000	9.841	13.198	130323.067	127235.092	-2.427
Aliphatic C21-C28	9814622.000	80.000	13.199	16.853	122682.775	120090.398	-2.159
Aliphatic C28-C40	12463555.000	120.000	16.854	21.695	103862.958	101093.195	-2.740
Aliphatic EPH	43765841.000	360.000	3.170	21.695	121571.781	118799.912	-2.333

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

Lab Sample ID:	20 PPM ALIPHATIC HC S	Acq On:	11 Nov 2024 14:05
Client Sample ID:		Operator:	YP/AJ
Data file:	FC067693.D	Misc:	
Instrument:	FID_C	ALS Vial:	2
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aliphatic C9-C12	3.170	6.450	8271307.000	60.000	ug/ml
Aliphatic C12-C16	6.451	9.840	5396973.000	40.000	ug/ml
Aliphatic C16-C21	9.841	13.198	7819384.000	60.000	ug/ml
Aliphatic C21-C28	13.199	16.853	9814622.000	80.000	ug/ml
Aliphatic C28-C40	16.854	21.695	12463555.000	120.000	ug/ml
Aliphatic EPH	3.170	21.695	43765841.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067693.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 14:05
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 11 20:44:39 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9) S	ortho-Terphenyl (SURR)	11.491	2969962	20.241 ug/ml
Spiked Amount	50.000		Recovery =	40.48%
12) S	1-chlorooctadecane (S...	12.931	2175788	20.148 ug/ml
Spiked Amount	50.000		Recovery =	40.30%
	Target Compounds			
1) T	n-Nonane (C9)	3.271	2728843	20.256 ug/ml
2) T	n-Decane (C10)	4.335	2775779	20.373 ug/ml
3) T	A~Naphthalene (C11.7)	5.912	3015339	20.348 ug/ml
4) T	n-Dodecane (C12)	6.350	2766685	20.427 ug/ml
5) T	A~2-methylnaphthalene...	6.968	2864809	20.286 ug/ml
6) T	n-Tetradecane (C14)	8.143	2686691	20.468 ug/ml
7) T	n-Hexadecane (C16)	9.741	2710282	20.516 ug/ml
8) T	n-Octadecane (C18)	11.180	2718857	20.580 ug/ml
10) T	n-Eicosane (C20)	12.488	2578804	20.438 ug/ml
11) T	n-Heneicosane (C21)	13.099	2521723	20.433 ug/ml
13) T	n-Docosane (C22)	13.685	2496079	20.385 ug/ml
14) T	n-Tetracosane (C24)	14.787	2471040	20.386 ug/ml
15) T	n-Hexacosane (C26)	15.805	2430708	20.417 ug/ml
16) T	n-Octacosane (C28)	16.754	2416795	20.543 ug/ml
17) T	n-Tricontane (C30)	17.639	2513534	20.795 ug/ml
18) T	n-Dotriacontane (C32)	18.471	2459220	20.784 ug/ml
19) T	n-Tetratriacontane (C34)	19.253	2176002	20.778 ug/ml
20) T	n-Hexatriacontane (C36)	19.992	1874299	20.591 ug/ml
21) T	n-Octatriacontane (C38)	20.713	1756310	20.280 ug/ml
22) T	n-Tetracontane (C40)	21.597	1684190	19.812 ug/ml

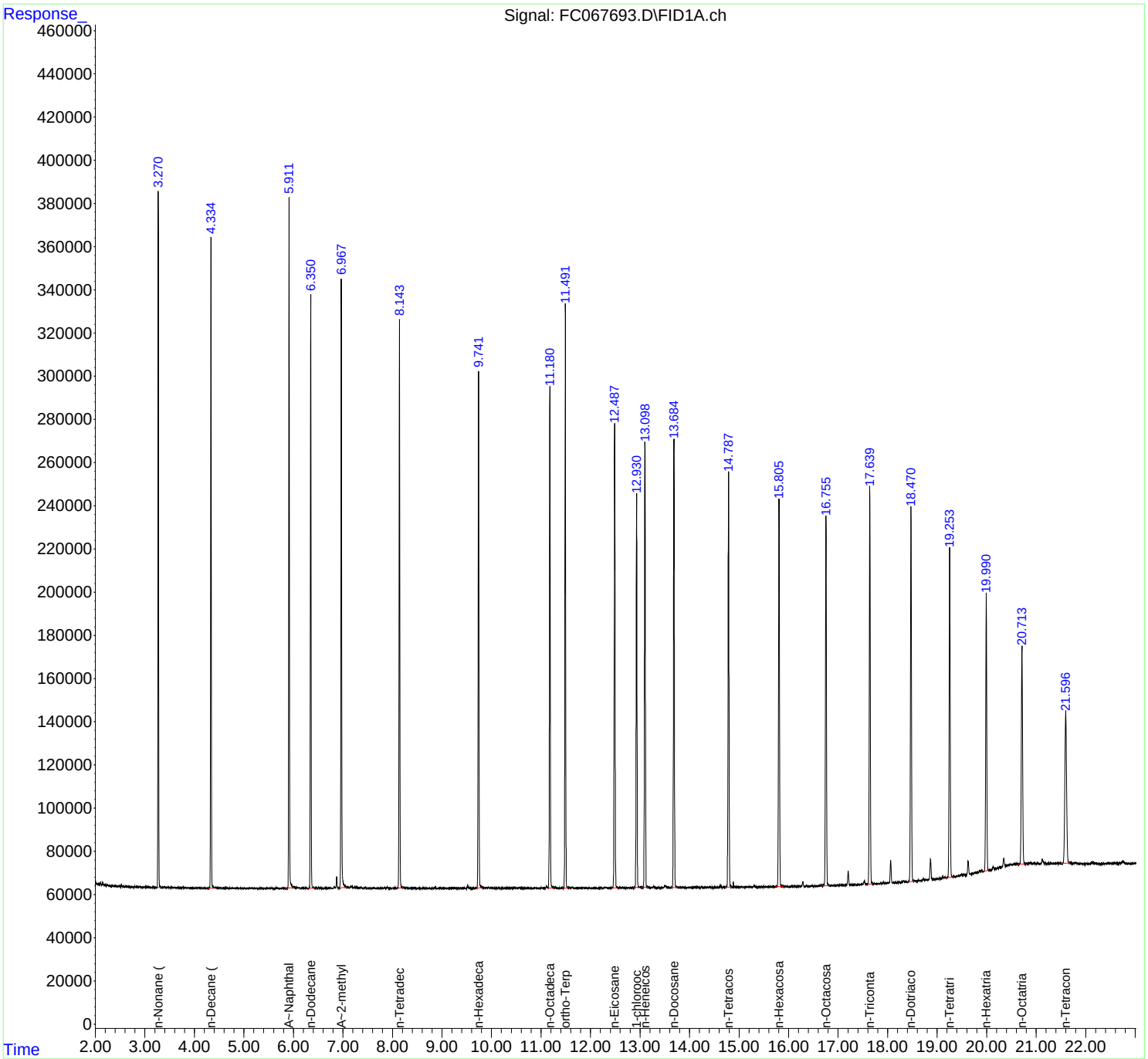
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067693.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 14:05
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 11 20:44:39 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067693.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 14:05
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 2 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.271	3.245	3.327	BB	321766	2728843	90.50%	4.980%
2	4.335	4.274	4.399	BB	299610	2775779	92.06%	5.066%
3	5.912	5.852	6.005	BB	319704	3015339	100.00%	5.503%
4	6.350	6.287	6.415	BB	274779	2766685	91.75%	5.049%
5	6.968	6.920	7.070	BB	280903	2864809	95.01%	5.229%
6	8.143	8.089	8.209	BB	261945	2686691	89.10%	4.903%
7	9.741	9.684	9.812	BB	238118	2710282	89.88%	4.947%
8	11.180	11.145	11.255	BB	232349	2718857	90.17%	4.962%
9	11.491	11.435	11.555	BB	269615	2969962	98.50%	5.420%
10	12.488	12.427	12.547	BB	212497	2578804	85.52%	4.707%
11	12.931	12.872	12.975	BB	182981	2175788	72.16%	3.971%
12	13.099	13.032	13.157	BB	204785	2521723	83.63%	4.602%
13	13.685	13.624	13.752	BB	206457	2496079	82.78%	4.556%
14	14.787	14.722	14.852	BB	192596	2471040	81.95%	4.510%
15	15.805	15.745	15.879	BB	179061	2430708	80.61%	4.436%
16	16.754	16.670	16.830	BB	170170	2416795	80.15%	4.411%
17	17.639	17.579	17.702	BB	183566	2513534	83.36%	4.587%
18	18.471	18.414	18.529	BB	172924	2459220	81.56%	4.488%
19	19.253	19.185	19.315	BB	151187	2176002	72.16%	3.971%
20	19.992	19.925	20.034	BB	127615	1874299	62.16%	3.421%
21	20.713	20.632	20.784	BB	100877	1756310	58.25%	3.205%
22	21.597	21.509	21.687	BB	70457	1684190	55.85%	3.074%
			Sum of corrected areas:			54791737		

Aliphatic EPH 102324.M Tue Nov 12 01:25:19 2024

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

Continuing Calibration Report for SequenceID : FC111124AL

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FC067701.D**						
Aliphatic C9-C12	8328348.000	60.000	3.170	6.450	138805.800	135469.641	-2.463
Aliphatic C12-C16	5483001.000	40.000	6.451	9.840	137075.025	131681.730	-4.096
Aliphatic C16-C21	7943258.000	60.000	9.841	13.198	132387.633	127235.092	-4.050
Aliphatic C21-C28	10046123.000	80.000	13.199	16.853	125576.538	120090.398	-4.568
Aliphatic C28-C40	13170565.000	120.000	16.854	21.695	109754.708	101093.195	-8.568
Aliphatic EPH	44971295.000	360.000	3.170	21.695	124920.264	118799.912	-5.152

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

Lab Sample ID:	20 PPM ALIPHATIC HC S	Acq On:	12 Nov 2024 01:09
Client Sample ID:		Operator:	YP/AJ
Data file:	FC067701.D	Misc:	
Instrument:	FID_C	ALS Vial:	2
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aliphatic C9-C12	3.170	6.450	8328348.000	60.000	ug/ml
Aliphatic C12-C16	6.451	9.840	5483001.000	40.000	ug/ml
Aliphatic C16-C21	9.841	13.198	7943258.000	60.000	ug/ml
Aliphatic C21-C28	13.199	16.853	10046123.000	80.000	ug/ml
Aliphatic C28-C40	16.854	21.695	13170565.000	120.000	ug/ml
Aliphatic EPH	3.170	21.695	44971295.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067701.D
Signal(s) : FID1A.ch
Acq On : 12 Nov 2024 01:09
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 2 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 12 02:16:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
9) S	ortho-Terphenyl (SURR)	11.498	2997509	20.429 ug/ml
Spiked Amount	50.000		Recovery =	40.86%
12) S	1-chlorooctadecane (S...	12.938	2253472	20.868 ug/ml
Spiked Amount	50.000		Recovery =	41.74%
	Target Compounds			
1) T	n-Nonane (C9)	3.273	2743811	20.367 ug/ml
2) T	n-Decane (C10)	4.338	2795802	20.520 ug/ml
3) T	A~Naphthalene (C11.7)	5.918	3049995	20.582 ug/ml
4) T	n-Dodecane (C12)	6.354	2788735	20.590 ug/ml
5) T	A~2-methylnaphthalene...	6.973	2921340	20.686 ug/ml
6) T	n-Tetradecane (C14)	8.147	2723280	20.747 ug/ml
7) T	n-Hexadecane (C16)	9.746	2759721	20.891 ug/ml
8) T	n-Octadecane (C18)	11.185	2754566	20.850 ug/ml
10) T	n-Eicosane (C20)	12.493	2623999	20.796 ug/ml
11) T	n-Heneicosane (C21)	13.105	2564693	20.781 ug/ml
13) T	n-Docosane (C22)	13.690	2547899	20.808 ug/ml
14) T	n-Tetracosane (C24)	14.793	2540144	20.957 ug/ml
15) T	n-Hexacosane (C26)	15.812	2484434	20.868 ug/ml
16) T	n-Octacosane (C28)	16.760	2473646	21.026 ug/ml
17) T	n-Tricontane (C30)	17.648	2611388	21.605 ug/ml
18) T	n-Dotriacontane (C32)	18.479	2587330	21.867 ug/ml
19) T	n-Tetratriacontane (C34)	19.261	2264456	21.622 ug/ml
20) T	n-Hexatriacontane (C36)	20.000	2006362	22.041 ug/mlm
21) T	n-Octatriacontane (C38)	20.726	1820814	21.025 ug/mlm
22) T	n-Tetracontane (C40)	21.612	1880215	22.117 ug/mlm

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067701.D
Signal(s) : FID1A.ch
Acq On : 12 Nov 2024 01:09
Operator : YP/AJ
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 2 Sample Multiplier: 1

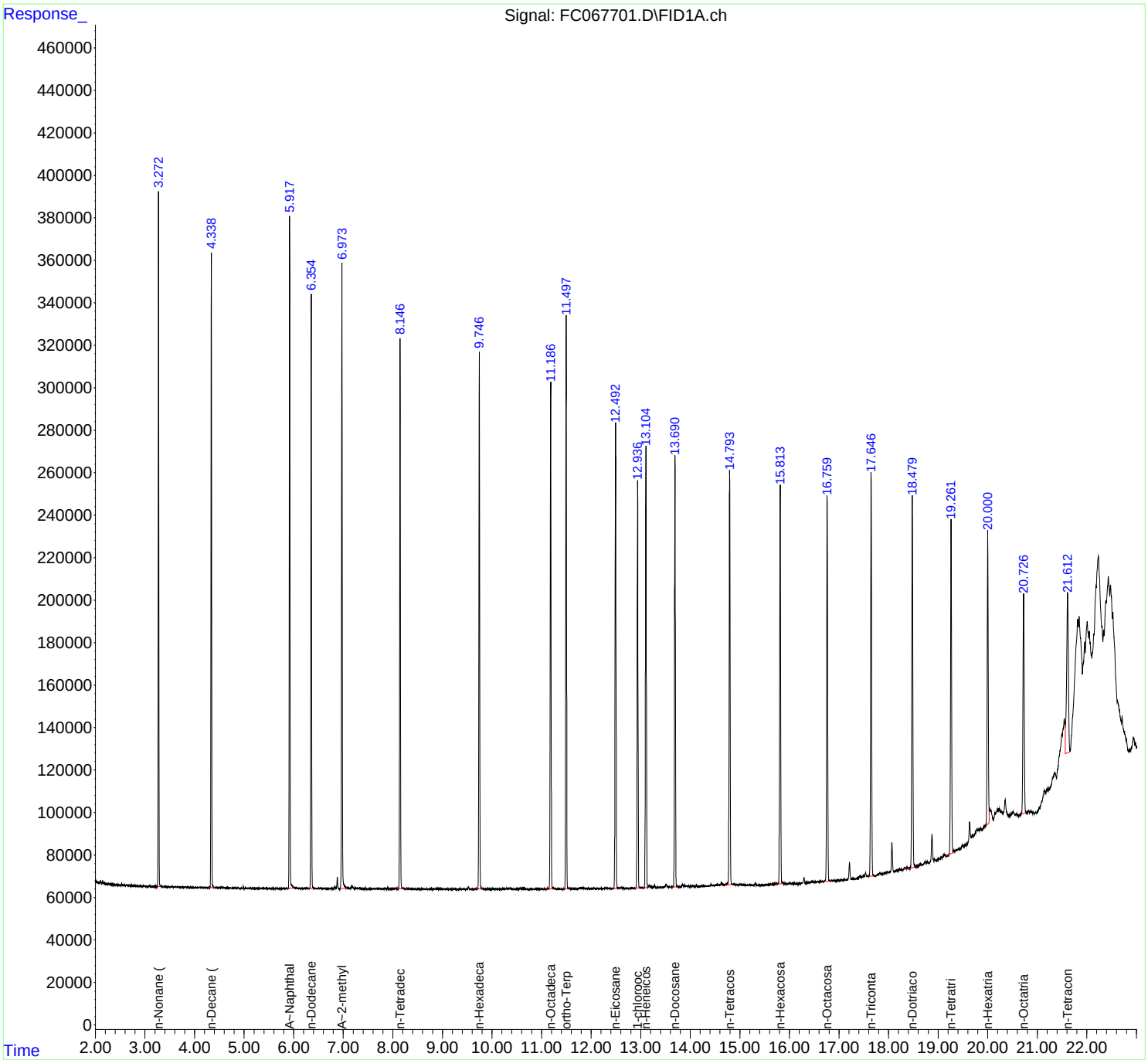
Instrument :
FID_C
ClientSampleId :
20 PPM ALIPHATIC HC STD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 12 02:16:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



Instrument :
FID_C
LabSampleId :
20 PPM ALIPHATIC HC STD

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC11112
Data File : FC067701.D
Signal(s) : FID1A.ch
Acq On : 12 Nov 2024 01:09
Sample : 20 PPM ALIPHATIC HC STD
Misc :
ALS Vial : 2 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.273	3.245	3.322	BB	325023	2743811	89.96%	4.812%
2	4.338	4.275	4.397	BB	300295	2795802	91.67%	4.903%
3	5.918	5.857	6.002	BB	315287	3049995	100.00%	5.349%
4	6.354	6.297	6.410	BB	279893	2788735	91.43%	4.891%
5	6.973	6.925	7.074	BB	293900	2921340	95.78%	5.124%
6	8.147	8.092	8.214	BB	258830	2723280	89.29%	4.776%
7	9.746	9.685	9.812	BB	251465	2759721	90.48%	4.840%
8	11.185	11.080	11.247	BB	236044	2754566	90.31%	4.831%
9	11.498	11.440	11.557	BB	268665	2997509	98.28%	5.257%
10	12.493	12.424	12.552	BB	218280	2623999	86.03%	4.602%
11	12.938	12.869	12.985	BB	191966	2253472	73.88%	3.952%
12	13.105	13.037	13.144	BV	207831	2564693	84.09%	4.498%
13	13.690	13.625	13.752	BB	202018	2547899	83.54%	4.469%
14	14.793	14.700	14.862	BB	194851	2540144	83.28%	4.455%
15	15.812	15.742	15.877	BB	185216	2484434	81.46%	4.357%
16	16.760	16.699	16.825	BB	180430	2473646	81.10%	4.338%
17	17.648	17.580	17.722	BB	188211	2611388	85.62%	4.580%
18	18.479	18.357	18.559	VV	173699	2587330	84.83%	4.538%
19	19.261	19.145	19.300	PV	157411	2264456	74.24%	3.971%
20	20.000	19.890	20.035	VV	143728	2483256	81.42%	4.355%
21	20.724	20.624	20.781	VV	105837	2063591	67.66%	3.619%
22	21.611	21.563	21.659	VV	76071	1984763	65.07%	3.481%
			Sum of corrected areas:			57017829		

Aliphatic EPH 102324.M Tue Nov 12 02:20:34 2024

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

Continuing Calibration Report for SequenceID : FD110824AR

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FD048672.D**						
Aromatic C10-C12	7919867.000	40.000	4.092	5.810	197996.675	176202.694	-12.369
Aromatic C12-C16	11889358.000	60.000	5.811	8.415	198155.967	177273.493	-11.780
Aromatic C16-C21	13817573.000	80.000	8.416	12.678	172719.663	163832.550	-5.425
Aromatic C21-C36	31272382.000	180.000	12.679	18.083	173735.456	152713.153	-13.766
Aromatic EPH	64899180.000	360.000	4.092	18.083	180275.500	161887.469	-11.359

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

Lab Sample ID:	20 PPM AROMATIC HC S	Acq On:	08 Nov 2024 13:17
Client Sample ID:		Operator:	YP/AJ
Data file:	FD048672.D	Misc:	
Instrument:	FID_D	ALS Vial:	53
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aromatic C10-C12	4.092	5.810	7919867.000	40.000	ug/ml
Aromatic C12-C16	5.811	8.415	11889358.000	60.000	ug/ml
Aromatic C16-C21	8.416	12.678	13817573.000	80.000	ug/ml
Aromatic C21-C36	12.679	18.083	31272382.000	180.000	ug/ml
Aromatic EPH	4.092	18.083	64899180.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048672.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 13:17
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 53 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Integration File: sample.E
Quant Time: Nov 09 01:07:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.369	3379477	22.266 ug/ml
Spiked Amount	50.000		Recovery =	44.53%
6) S	2-Flurobiphenyl (SURR)	8.220	2180511	22.207 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	44.41%
11) S	ortho-Terphenyl (SURR)	11.254	3833749	22.506 ug/ml
Spiked Amount	50.000		Recovery =	45.01%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.192	3916264	22.511 ug/ml
2) T	Naphthalene (C11.7)	5.710	4003603	22.437 ug/ml
3) T	2-Methylnaphthalene (...	6.757	4006272	22.398 ug/ml
5) T	Acenaphthylene (C15.06)	8.021	3887202	22.138 ug/ml
7) T	Acenaphthene (C15.5)	8.315	3995884	22.529 ug/ml
8) T	Flouorene (C16.55)	9.094	3762343	22.258 ug/ml
9) T	Phenanthrene (C19.36)	10.481	3674555	22.229 ug/ml
10) T	Anthracene (C19.43)	10.557	2749868	17.196 ug/ml
12) T	Fluoranthene (C21.85)	12.285	3709438	22.539 ug/ml
13) T	Pyrene (C20.8)	12.577	3630807	22.541 ug/ml
14) T	Benzo[a]anthracene (C...	14.448	3229386	22.086 ug/ml
15) T	Chrysene (C27.41)	14.489	3742648	22.753 ug/ml
16) T	benzo[b]fluoranthene ...	15.995	3501970	23.035 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.026	3434841	22.853 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.371	3444841	22.890 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.735	2831531	21.701 ug/ml
20) T	Dibenz[a,h]anthracene...	17.774	3833559	23.557 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.985	3544168	23.151 ug/ml

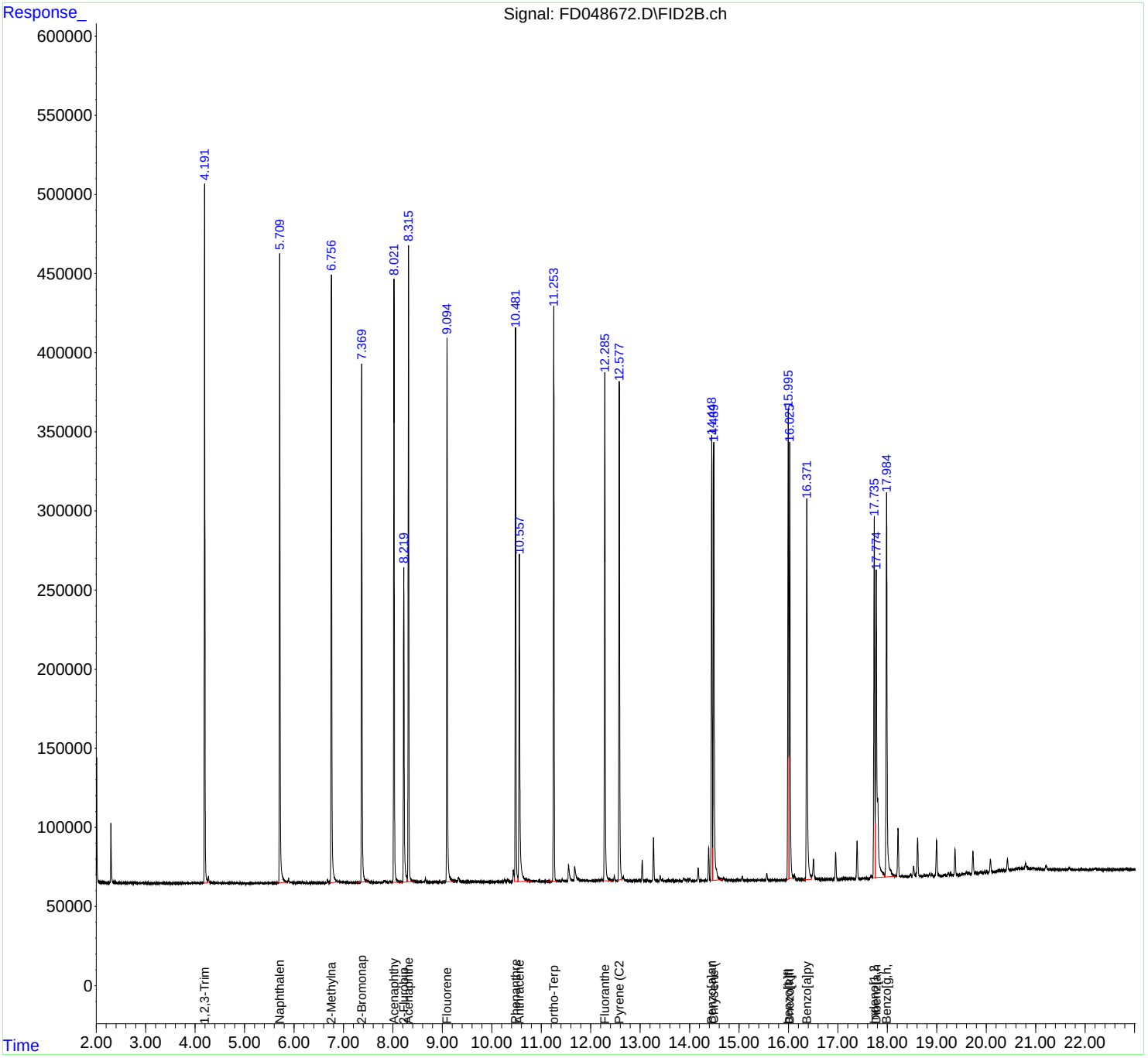
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048672.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 13:17
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 53 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Integration File: sample.E
Quant Time: Nov 09 01:07:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048672.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 13:17
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 53 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.192	4.161	4.254	BV	440366	3916264	97.75%	5.271%
2	5.710	5.648	5.868	BV	393915	4003603	99.93%	5.389%
3	6.757	6.721	6.894	BV	379996	4006272	100.00%	5.393%
4	7.369	7.272	7.478	PV	323589	3379477	84.35%	4.549%
5	8.021	7.981	8.171	BB	380804	3887202	97.03%	5.232%
6	8.220	8.171	8.287	BV	198045	2180511	54.43%	2.935%
7	8.315	8.287	8.438	VB	400204	3995884	99.74%	5.379%
8	9.094	8.978	9.248	BV	343003	3762343	93.91%	5.064%
9	10.481	10.458	10.530	VV	349347	3674555	91.72%	4.946%
10	10.557	10.530	10.798	VB	206668	2749868	68.64%	3.701%
11	11.254	11.118	11.315	BB	362302	3833749	95.69%	5.160%
12	12.285	12.246	12.428	PV	318390	3709438	92.59%	4.993%
13	12.577	12.528	12.640	PV	315350	3630807	90.63%	4.887%
14	14.448	14.416	14.468	PV	281877	3229386	80.61%	4.347%
15	14.489	14.468	14.668	VB	274969	3742648	93.42%	5.038%
16	15.995	15.961	16.010	BV	296863	3501970	87.41%	4.714%
17	16.026	16.010	16.097	VV	276797	3434841	85.74%	4.623%
18	16.371	16.308	16.464	BV	240273	3444841	85.99%	4.637%
19	17.735	17.701	17.754	BV	226259	2831531	70.68%	3.811%
20	17.774	17.754	17.950	VV	194710	3833559	95.69%	5.160%
21	17.985	17.950	18.168	VV	243852	3544168	88.47%	4.771%
			Sum of corrected areas:			74292918		

Aromatic EPH 102324.M Sat Nov 09 03:24:18 2024

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

Continuing Calibration Report for SequenceID : FD110824AR

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FD048686.D**						
Aromatic C10-C12	7558477.000	40.000	4.092	5.810	188961.925	176202.694	-7.241
Aromatic C12-C16	11312555.000	60.000	5.811	8.415	188542.583	177273.493	-6.357
Aromatic C16-C21	13328267.000	80.000	8.416	12.678	166603.338	163832.550	-1.691
Aromatic C21-C36	30539691.000	180.000	12.679	18.083	169664.950	152713.153	-11.100
Aromatic EPH	62738990.000	360.000	4.092	18.083	174274.972	161887.469	-7.652

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

Lab Sample ID:	20 PPM AROMATIC HC S	Acq On:	09 Nov 2024 00:50
Client Sample ID:		Operator:	YP/AJ
Data file:	FD048686.D	Misc:	
Instrument:	FID_D	ALS Vial:	53
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aromatic C10-C12	4.092	5.810	7558477.000	40.000	ug/ml
Aromatic C12-C16	5.811	8.415	11312555.000	60.000	ug/ml
Aromatic C16-C21	8.416	12.678	13328267.000	80.000	ug/ml
Aromatic C21-C36	12.679	18.083	30539691.000	180.000	ug/ml
Aromatic EPH	4.092	18.083	62738990.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048686.D
Signal(s) : FID2B.ch
Acq On : 09 Nov 2024 00:50
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 53 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Integration File: sample.E
Quant Time: Nov 09 01:31:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.368	3238811	21.339 ug/ml
Spiked Amount	50.000		Recovery =	42.68%
6) S	2-Flurobiphenyl (SURR)	8.218	2119854	21.589 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	43.18%
11) S	ortho-Terphenyl (SURR)	11.252	3665698	21.520 ug/ml
Spiked Amount	50.000		Recovery =	43.04%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.191	3731085	21.447 ug/ml
2) T	Naphthalene (C11.7)	5.709	3827392	21.450 ug/ml
3) T	2-Methylnaphthalene (...	6.755	3820158	21.358 ug/ml
5) T	Acenaphthylene (C15.06)	8.020	3709738	21.127 ug/ml
7) T	Acenaphthene (C15.5)	8.314	3782659	21.327 ug/ml
8) T	Flouorene (C16.55)	9.092	3639909	21.533 ug/ml
9) T	Phenanthrene (C19.36)	10.479	3555026	21.506 ug/ml
10) T	Anthracene (C19.43)	10.554	2613389	16.343 ug/ml
12) T	Fluoranthene (C21.85)	12.283	3617397	21.980 ug/ml
13) T	Pyrene (C20.8)	12.576	3519943	21.852 ug/ml
14) T	Benzo[a]anthracene (C...	14.445	3184930	21.782 ug/ml
15) T	Chrysene (C27.41)	14.487	3398424	20.660 ug/ml
16) T	benzo[b]fluoranthene ...	15.992	3430253	22.563 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.024	3374820	22.453 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.368	3386443	22.502 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.733	2982713	22.860 ug/ml
20) T	Dibenz[a,h]anthracene...	17.772	3835072	23.566 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.984	3329639	21.749 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

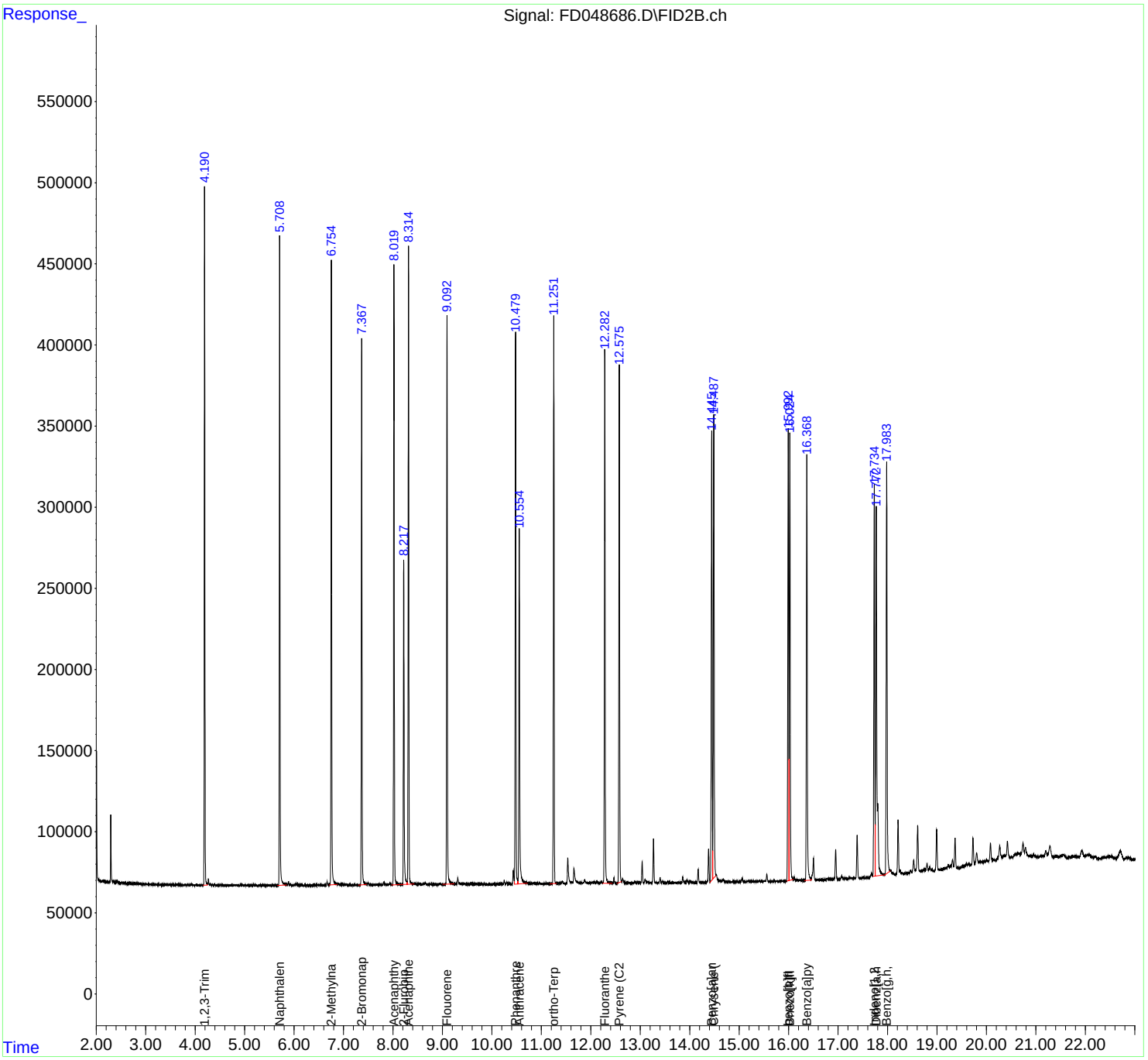
Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048686.D
Signal(s) : FID2B.ch
Acq On : 09 Nov 2024 00:50
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 53 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Integration File: sample.E
Quant Time: Nov 09 01:31:01 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048686.D
Signal(s) : FID2B.ch
Acq On : 09 Nov 2024 00:50
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 53 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.191	4.161	4.246	BV	428150	3731085	97.29%	5.199%
2	5.709	5.664	5.854	BB	399489	3827392	99.80%	5.333%
3	6.755	6.708	6.874	BV	383869	3820158	99.61%	5.323%
4	7.368	7.301	7.471	BV	336534	3238811	84.45%	4.513%
5	8.020	7.974	8.141	BB	380084	3709738	96.73%	5.169%
6	8.218	8.154	8.288	BV	199219	2119854	55.28%	2.954%
7	8.314	8.288	8.431	VB	394022	3782659	98.63%	5.271%
8	9.093	9.004	9.234	BB	345463	3639909	94.91%	5.072%
9	10.479	10.454	10.526	VV	337167	3555026	92.70%	4.954%
10	10.554	10.526	10.718	VB	218795	2613389	68.14%	3.642%
11	11.252	11.174	11.311	BB	347828	3665698	95.58%	5.108%
12	12.283	12.240	12.438	VV	325762	3617397	94.32%	5.041%
13	12.576	12.528	12.624	PV	317175	3519943	91.78%	4.905%
14	14.445	14.412	14.465	PV	275718	3184930	83.05%	4.438%
15	14.487	14.465	14.531	VV	285575	3398424	88.61%	4.736%
16	15.992	15.961	16.008	BV	276789	3430253	89.44%	4.780%
17	16.024	16.008	16.094	VV	277034	3374820	88.00%	4.703%
18	16.368	16.321	16.458	BV	260262	3386443	88.30%	4.719%
19	17.733	17.701	17.751	BV	243524	2982713	77.77%	4.156%
20	17.772	17.751	17.948	VV	226465	3835072	100.00%	5.344%
21	17.984	17.948	18.051	PV	254175	3329639	86.82%	4.640%
			Sum of corrected areas:			71763354		

Aromatic EPH 102324.M Sat Nov 09 03:27:18 2024

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

Continuing Calibration Report for SequenceID : FD111124AR

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FD048697.D**						
Aromatic C10-C12	7290867.000	40.000	4.090	5.808	182271.675	176202.694	-3.444
Aromatic C12-C16	10907854.000	60.000	5.809	8.414	181797.567	177273.493	-2.552
Aromatic C16-C21	13147714.000	80.000	8.415	12.677	164346.425	163832.550	-0.314
Aromatic C21-C36	28755761.000	180.000	12.678	18.084	159754.228	152713.153	-4.611
Aromatic EPH	60102196.000	360.000	4.090	18.084	166950.544	161887.469	-3.128

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

Lab Sample ID:	20 PPM AROMATIC HC S	Acq On:	11 Nov 2024 14:42
Client Sample ID:		Operator:	YP/AJ
Data file:	FD048697.D	Misc:	
Instrument:	FID_D	ALS Vial:	52
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aromatic C10-C12	4.090	5.808	7290867.000	40.000	ug/ml
Aromatic C12-C16	5.809	8.414	10907854.000	60.000	ug/ml
Aromatic C16-C21	8.415	12.677	13147714.000	80.000	ug/ml
Aromatic C21-C36	12.678	18.084	28755761.000	180.000	ug/ml
Aromatic EPH	4.090	18.084	60102196.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048697.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 14:42
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 52 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 11 20:46:10 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.369	3126804	20.601 ug/ml
Spiked Amount	50.000		Recovery =	41.20%
6) S	2-Flurobiphenyl (SURR)	8.218	2019103	20.563 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	41.13%
11) S	ortho-Terphenyl (SURR)	11.254	3516786	20.646 ug/ml
Spiked Amount	50.000		Recovery =	41.29%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.191	3623935	20.831 ug/ml
2) T	Naphthalene (C11.7)	5.709	3666932	20.551 ug/ml
3) T	2-Methylnaphthalene (...	6.756	3657697	20.449 ug/ml
5) T	Acenaphthylene (C15.06)	8.021	3597136	20.486 ug/ml
7) T	Acenaphthene (C15.5)	8.314	3653021	20.596 ug/ml
8) T	Flouorene (C16.55)	9.093	3476608	20.567 ug/ml
9) T	Phenanthrene (C19.36)	10.481	3370554	20.390 ug/ml
10) T	Anthracene (C19.43)	10.556	2965208	18.543 ug/ml
12) T	Fluoranthene (C21.85)	12.284	3388801	20.591 ug/ml
13) T	Pyrene (C20.8)	12.578	3335344	20.706 ug/ml
14) T	Benzo[a]anthracene (C...	14.448	3012377	20.602 ug/ml
15) T	Chrysene (C27.41)	14.489	3355029	20.396 ug/ml
16) T	benzo[b]fluoranthene ...	15.994	3215265	21.149 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.026	3181249	21.165 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.371	3195257	21.232 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.735	2698523	20.682 ug/ml
20) T	Dibenz[a,h]anthracene...	17.775	3436522	21.117 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.985	3272738	21.378 ug/ml

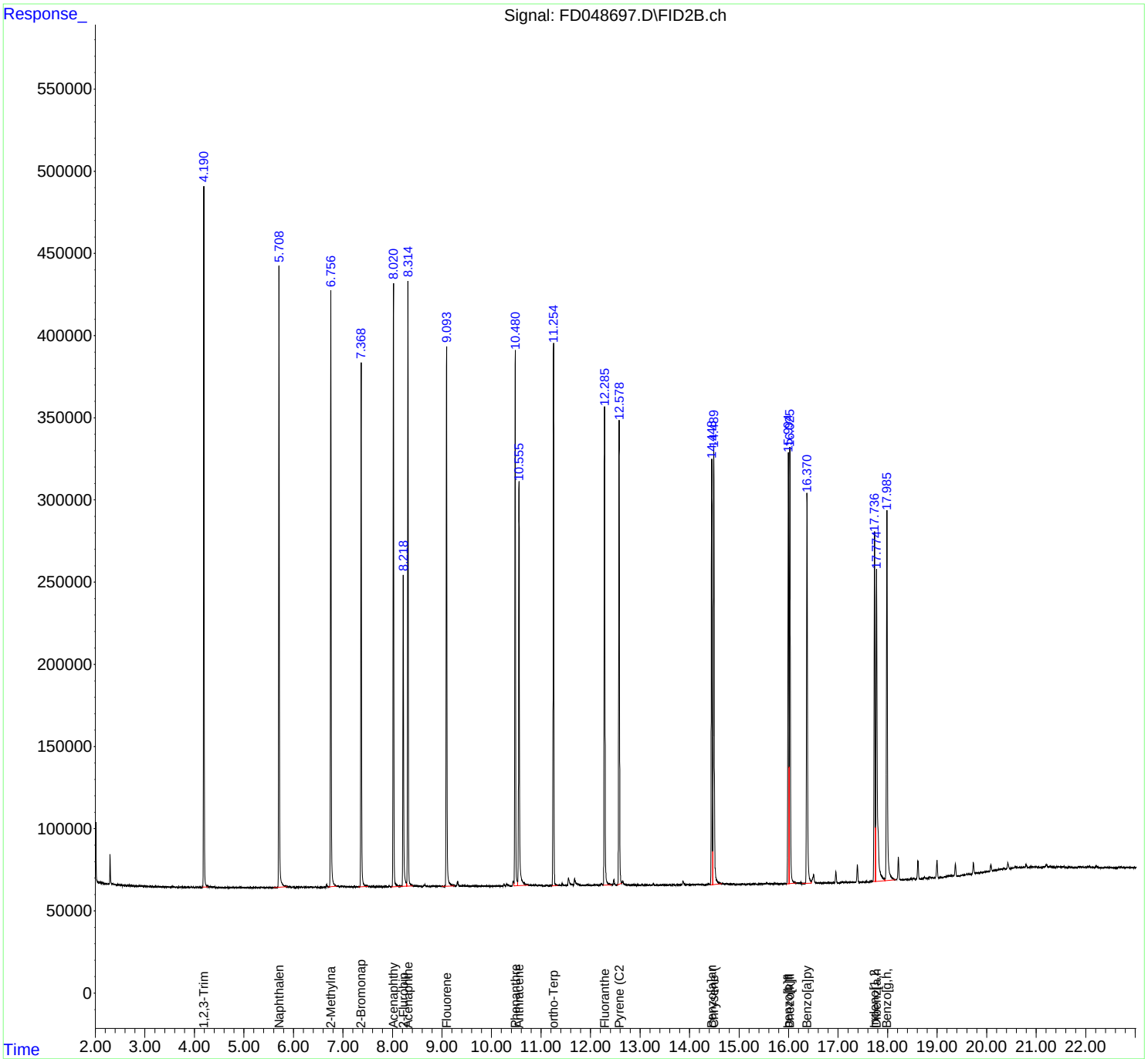
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048697.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 14:42
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 52 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Integration File: autoint1.e
Quant Time: Nov 11 20:46:10 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048697.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 14:42
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 52 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.191	4.161	4.281	BB	424111	3623935	98.83%	5.270%
2	5.709	5.598	5.878	BB	376368	3666932	100.00%	5.333%
3	6.756	6.701	6.881	BV	360108	3657697	99.75%	5.319%
4	7.369	7.315	7.511	BB	317355	3126804	85.27%	4.547%
5	8.021	7.978	8.161	BB	367235	3597136	98.10%	5.231%
6	8.218	8.165	8.288	BV	189111	2019103	55.06%	2.936%
7	8.314	8.288	8.418	VB	368215	3653021	99.62%	5.312%
8	9.093	8.995	9.255	BB	326354	3476608	94.81%	5.056%
9	10.481	10.453	10.528	VV	325910	3370554	91.92%	4.902%
10	10.556	10.528	10.741	VB	246005	2965208	80.86%	4.312%
11	11.254	11.214	11.341	PV	330146	3516786	95.91%	5.114%
12	12.284	12.251	12.425	PB	290969	3388801	92.42%	4.928%
13	12.578	12.531	12.633	BV	281521	3335344	90.96%	4.850%
14	14.448	14.413	14.467	PV	259955	3012377	82.15%	4.381%
15	14.489	14.467	14.648	VB	261631	3355029	91.49%	4.879%
16	15.994	15.961	16.010	BV	262932	3215265	87.68%	4.676%
17	16.026	16.010	16.161	VB	262552	3181249	86.76%	4.626%
18	16.371	16.275	16.459	BV	239135	3195257	87.14%	4.647%
19	17.735	17.701	17.754	BV	211873	2698523	73.59%	3.924%
20	17.775	17.754	17.949	VV	190137	3436522	93.72%	4.997%
21	17.985	17.949	18.168	VV	224138	3272738	89.25%	4.759%
			Sum of corrected areas:			68764886		

Aromatic EPH 102324.M Tue Nov 12 03:23:16 2024

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

Continuing Calibration Report for SequenceID : FD111124AR

Parameter	AreaCount	Conc.	RT_Min	RT_Max	Response Factor	AVGRF	%DEV
File ID :	**FD048705.D**						
Aromatic C10-C12	7212813.000	40.000	4.090	5.808	180320.325	176202.694	-2.337
Aromatic C12-C16	10865815.000	60.000	5.809	8.414	181096.917	177273.493	-2.157
Aromatic C16-C21	13319448.000	80.000	8.415	12.677	166493.100	163832.550	-1.624
Aromatic C21-C36	29488863.000	180.000	12.678	18.084	163827.017	152713.153	-7.278
Aromatic EPH	60886939.000	360.000	4.090	18.084	169130.386	161887.469	-4.474

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

Lab Sample ID:	20 PPM AROMATIC HC S	Acq On:	12 Nov 2024 01:09
Client Sample ID:		Operator:	YP/AJ
Data file:	FD048705.D	Misc:	
Instrument:	FID_D	ALS Vial:	52
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	Units
Aromatic C10-C12	4.090	5.808	7212813.000	40.000	ug/ml
Aromatic C12-C16	5.809	8.414	10865815.000	60.000	ug/ml
Aromatic C16-C21	8.415	12.677	13319448.000	80.000	ug/ml
Aromatic C21-C36	12.678	18.084	29488863.000	180.000	ug/ml
Aromatic EPH	4.090	18.084	60886939.000	360.000	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048705.D
Signal(s) : FID2B.ch
Acq On : 12 Nov 2024 01:09
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 52 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 12 02:23:52 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.394	3107836	20.476 ug/ml
Spiked Amount	50.000		Recovery =	40.95%
6) S	2-Flurobiphenyl (SURR)	8.250	2068266	21.064 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	42.13%
11) S	ortho-Terphenyl (SURR)	11.285	3495933	20.523 ug/ml
Spiked Amount	50.000		Recovery =	41.05%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.211	3560279	20.465 ug/ml
2) T	Naphthalene (C11.7)	5.735	3652534	20.470 ug/ml
3) T	2-Methylnaphthalene (...	6.784	3675188	20.547 ug/ml
5) T	Acenaphthylene (C15.06)	8.052	3583330	20.407 ug/ml
7) T	Acenaphthene (C15.5)	8.346	3607297	20.338 ug/ml
8) T	Flouorene (C16.55)	9.127	3511662	20.775 ug/ml
9) T	Phenanthrene (C19.36)	10.518	3407349	20.612 ug/mlm
10) T	Anthracene (C19.43)	10.593	3007294	18.806 ug/ml
12) T	Fluoranthene (C21.85)	12.326	3443193	20.921 ug/ml
13) T	Pyrene (C20.8)	12.620	3393143	21.065 ug/ml
14) T	Benzo[a]anthracene (C...	14.493	3190160	21.818 ug/ml
15) T	Chrysene (C27.41)	14.534	3402081	20.682 ug/mlm
16) T	benzo[b]fluoranthene ...	16.044	3291848	21.653 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.075	3185187	21.192 ug/mlm
18) T	Benzo[a]pyrene (C31.34)	16.420	3278070	21.782 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.788	2981586	22.851 ug/ml
20) T	Dibenz[a,h]anthracene...	17.827	3471909	21.335 ug/mlm
21) T	Benzo[g,h,i]perylene ...	18.039	3244829	21.195 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048705.D
Signal(s) : FID2B.ch
Acq On : 12 Nov 2024 01:09
Operator : YP/AJ
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 52 Sample Multiplier: 1

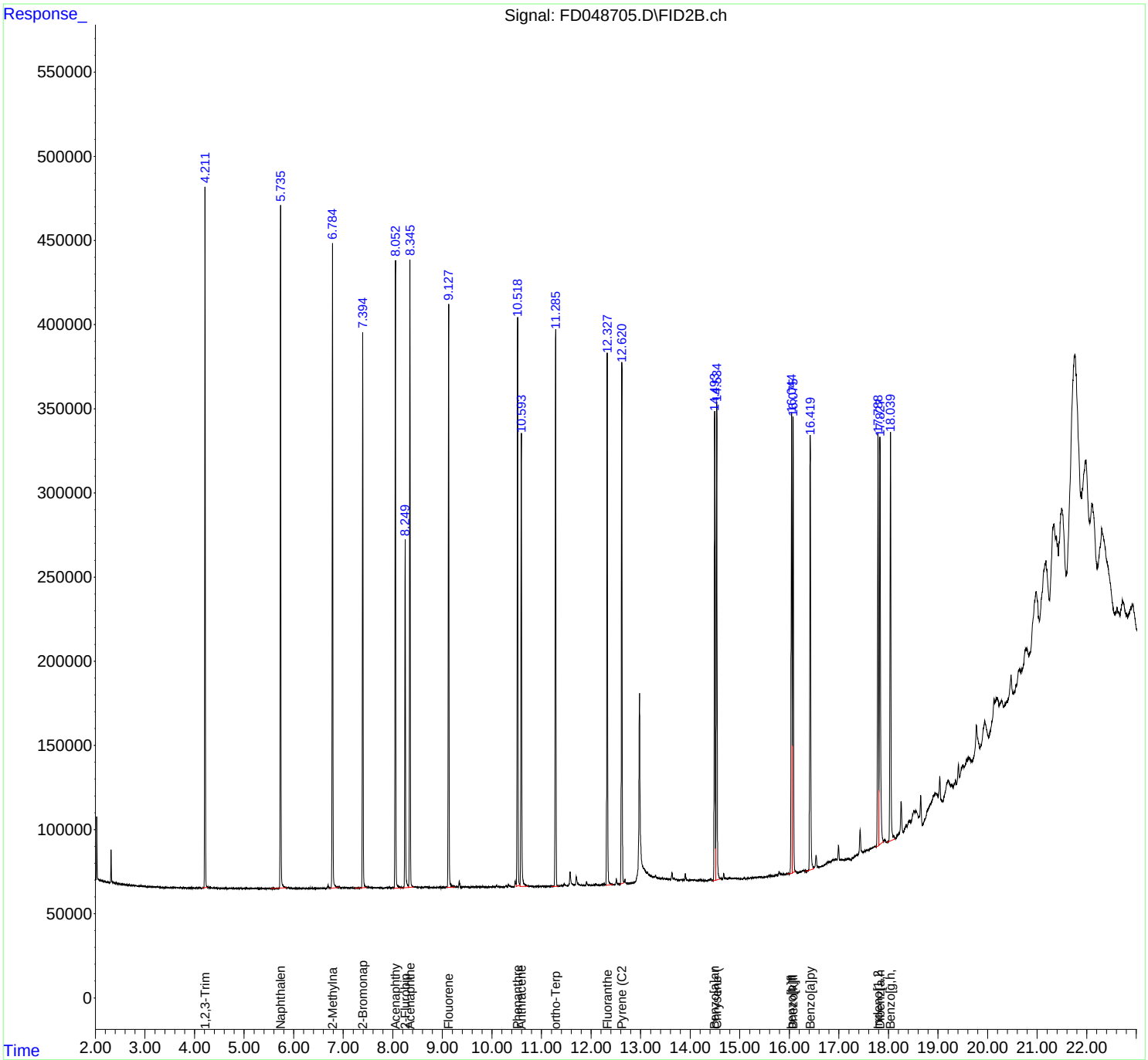
Instrument :
FID_D
ClientSampleId :
20 PPM AROMATIC HC STD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 12 02:23:52 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Instrument :
FID_D
LabSampleId :
20 PPM AROMATIC HC STD

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD11112
Data File : FD048705.D
Signal(s) : FID2B.ch
Acq On : 12 Nov 2024 01:09
Sample : 20 PPM AROMATIC HC STD
Misc :
ALS Vial : 52 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.211	4.161	4.263	BV	416118	3560279	96.87%	5.108%
2	5.735	5.541	5.868	BB	402998	3652534	99.38%	5.241%
3	6.784	6.738	6.908	BV	383207	3675188	100.00%	5.273%
4	7.394	7.238	7.478	BB	330847	3107836	84.56%	4.459%
5	8.052	8.014	8.181	BB	368778	3583330	97.50%	5.142%
6	8.250	8.188	8.315	BV	206014	2068266	56.28%	2.968%
7	8.346	8.315	8.431	VB	367987	3607297	98.15%	5.176%
8	9.127	9.078	9.264	BB	346285	3511662	95.55%	5.039%
9	10.518	10.491	10.563	VV	338813	3431813	93.38%	4.924%
10	10.593	10.563	10.738	VB	267851	3007294	81.83%	4.315%
11	11.285	11.201	11.341	BV	330142	3495933	95.12%	5.016%
12	12.326	12.294	12.444	PB	317993	3443193	93.69%	4.940%
13	12.620	12.581	12.663	BV	309788	3393143	92.33%	4.869%
14	14.493	14.449	14.512	PV	280816	3190160	86.80%	4.577%
15	14.534	14.512	14.648	VB	284503	3432685	93.40%	4.925%
16	16.044	15.961	16.059	BV	274332	3291848	89.57%	4.723%
17	16.075	16.059	16.171	VV	271436	3201289	87.11%	4.593%
18	16.420	16.319	16.491	PV	259405	3278070	89.19%	4.704%
19	17.788	17.737	17.806	PV	244696	2981586	81.13%	4.278%
20	17.827	17.806	17.901	VV	243903	3535273	96.19%	5.073%
21	18.039	17.964	18.134	PV	240340	3244829	88.29%	4.656%
			Sum of corrected areas:			69693507		

Aromatic EPH 102324.M Tue Nov 12 03:27:34 2024

QC SAMPLE DATA

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BL	SDG No.:	P4718
Lab Sample ID:	PB164790BL	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.02 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

Prep Date :	Date Analyzed :	Prep Batch ID
11/08/24 08:47	11/08/24 16:19	PB164790

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units(Dry Weight)	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	0.38	U	1	0.38	1.00	mg/kg	FC067670.D
Aliphatic C12-C16	Aliphatic C12-C16	0.24	U	1	0.24	0.67	mg/kg	FC067670.D
Aliphatic C16-C21	Aliphatic C16-C21	0.30	U	1	0.30	1.00	mg/kg	FC067670.D
Aliphatic C21-C28	Aliphatic C21-C28	0.80	U	1	0.80	1.33	mg/kg	FC067670.D
Aliphatic C28-C40	Aliphatic C28-C40	1.80	U	1	1.80	2.00	mg/kg	FC067670.D
Aromatic C10-C12	Aromatic C10-C12	0.30	U	1	0.30	0.67	mg/kg	FD048673.D
Aromatic C12-C16	Aromatic C12-C16	0.34	U	1	0.34	1.00	mg/kg	FD048673.D
Aromatic C16-C21	Aromatic C16-C21	0.96	U	1	0.96	1.67	mg/kg	FD048673.D
Aromatic C21-C36	Aromatic C21-C36	2.00	U	1	2.00	2.66	mg/kg	FD048673.D
Total AliphaticEPH	Total AliphaticEPH	3.52	U		3.52	5.99	mg/kg	
Total AromaticEPH	Total AromaticEPH	3.60	U		3.60	6.00	mg/kg	
Total EPH	Total EPH	7.12	U		7.12	12.0	mg/kg	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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Fax : 908 789 8922

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BL	SDG No.:	P4718
Lab Sample ID:	PB164790BL	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.02 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067670.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	0.38	U	0.38	1.00	mg/kg
Aliphatic C12-C16	Aliphatic C12-C16	0.24	U	0.24	0.67	mg/kg
Aliphatic C16-C21	Aliphatic C16-C21	0.30	U	0.30	1.00	mg/kg
Aliphatic C21-C28	Aliphatic C21-C28	0.80	U	0.80	1.33	mg/kg
Aliphatic C28-C40	Aliphatic C28-C40	1.80	U	1.80	2.00	mg/kg
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	42.9		40 - 140	86%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	PB164790BL	Acq On:	08 Nov 2024 16:19
Client Sample ID:	PB164790BL	Operator:	YP/AJ
Data file:	FC067670.D	Misc:	
Instrument:	FID_C	ALS Vial:	11
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.171	6.450	0	0	300	ug/ml
Aliphatic C12-C16	6.451	9.841	0	0	200	ug/ml
Aliphatic C16-C21	9.842	13.199	0	0	300	ug/ml
Aliphatic C21-C28	13.200	16.853	0	0	400	ug/ml
Aliphatic C28-C40	16.854	21.698	0	0	600	ug/ml
Aliphatic EPH	3.171	21.698	0	0		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.934	12.934	4629394	42.87		ug/ml
Aliphatic C9-C28	3.171	16.853	0	0	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067670.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 16:19
Operator : YP/AJ
Sample : PB164790BL
Misc :
ALS Vial : 11 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164790BL

Integration File: autoint1.e
Quant Time: Nov 09 01:37:03 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
12) S 1-chlorooctadecane (S...	12.934	4629394	42.869 ug/ml
Spiked Amount 50.000		Recovery = 85.74%	
Target Compounds			

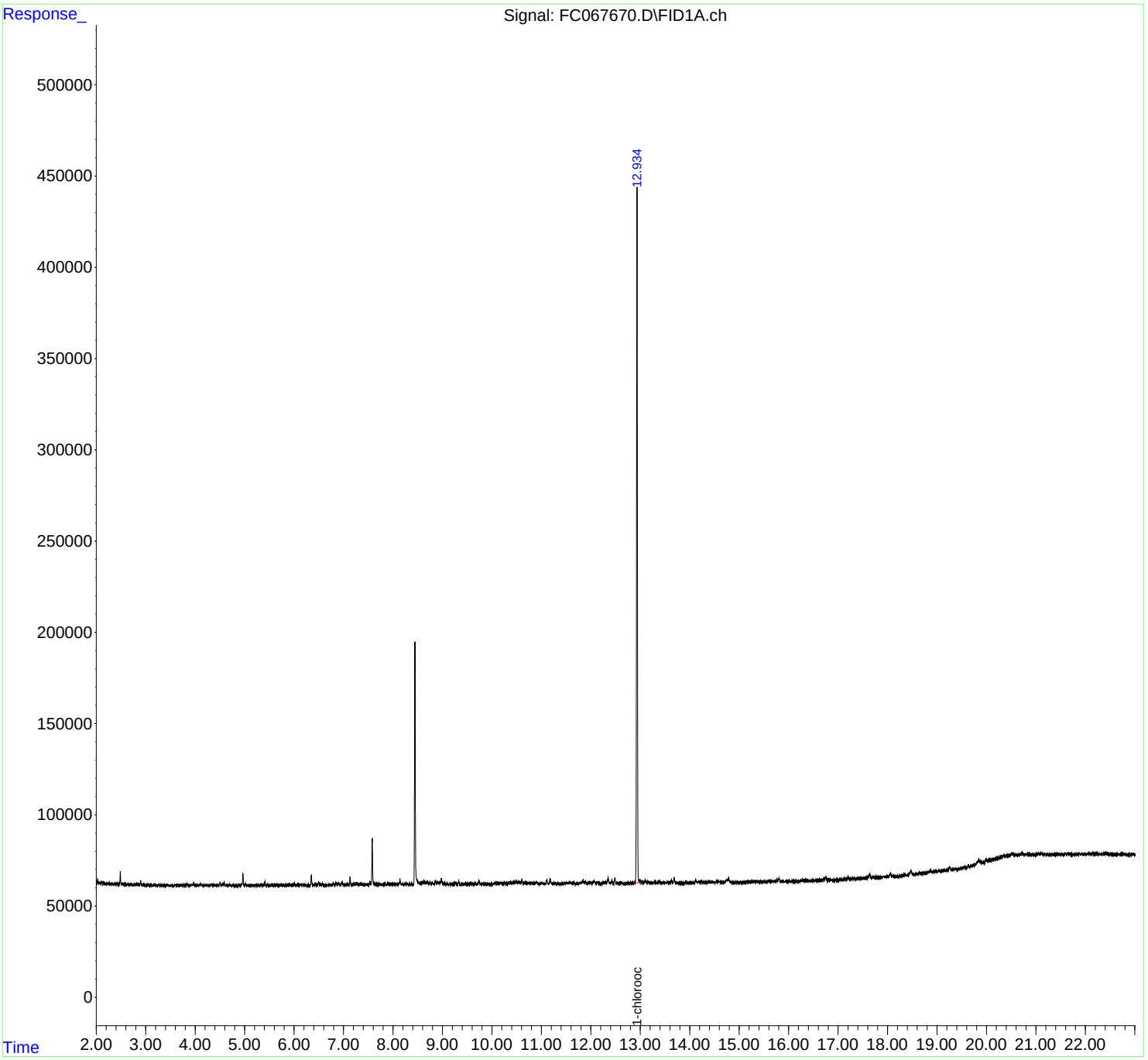
(f)=RT Delta > 1/2 Window (m)=manual int.

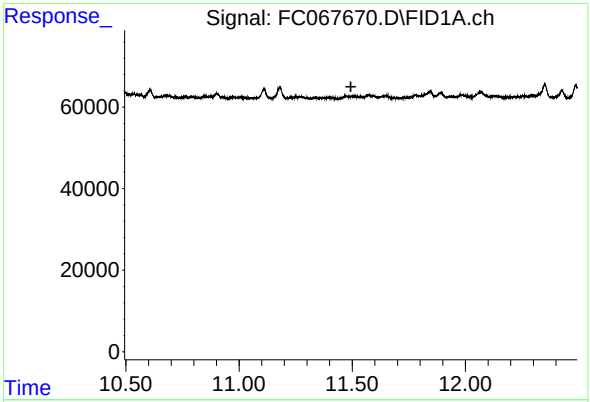
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067670.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 16:19
Operator : YP/AJ
Sample : PB164790BL
Misc :
ALS Vial : 11 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164790BL

Integration File: autoint1.e
Quant Time: Nov 09 01:37:03 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

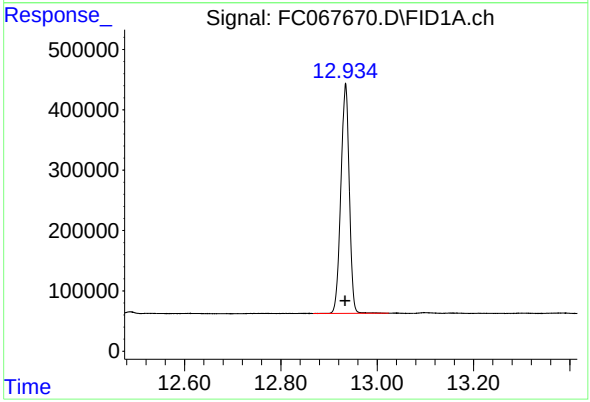




#9 ortho-Terphenyl (SURR)

R.T.: 0.000 min
Exp R.T. : 11.494 min
Response: 0
Conc: N.D.

Instrument :
FID_C
ClientSampleId :
PB164790BL



#12 1-chlorooctadecane (SURR)

R.T.: 12.934 min
Delta R.T.: 0.001 min
Response: 4629394
Conc: 42.87 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067670.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 16:19
Sample : PB164790BL
Misc :
ALS Vial : 11 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	12.934	12.867	13.024	BB	378871	4629394	100.00%	100.000%
			Sum of corrected areas:			4629394		

Aliphatic EPH 102324.M Sat Nov 09 02:11:55 2024

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Fax : 908 789 8922

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BL	SDG No.:	P4718
Lab Sample ID:	PB164790BL	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.02 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048673.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	0.30	U	0.30	0.67	mg/kg
Aromatic C12-C16	Aromatic C12-C16	0.34	U	0.34	1.00	mg/kg
Aromatic C16-C21	Aromatic C16-C21	0.96	U	0.96	1.67	mg/kg
Aromatic C21-C36	Aromatic C21-C36	2.00	U	2.00	2.66	mg/kg
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	46.2		40 - 140	92%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	31.6		40 - 140	63%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	40.7		40 - 140	81%	SPK: 50

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Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	PB164790BL	Acq On:	08 Nov 2024 16:19
Client Sample ID:	PB164790BL	Operator:	YP/AJ
Data file:	FD048673.D	Misc:	
Instrument:	FID_D	ALS Vial:	56
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.092	5.810	0	0	200	ug/ml
Aromatic C12-C16	5.811	8.415	0	0	300	ug/ml
Aromatic C16-C21	8.416	12.678	0	0	500	ug/ml
Aromatic C21-C36	12.679	18.083	0	0	800	ug/ml
Aromatic EPH	4.092	18.083	0	0		ug/ml
ortho-Terphenyl (SURR)	11.254	11.254	6932733	40.7		ug/ml
2-Bromonaphthalene (SURR)	7.367	7.367	7008484	46.18		ug/ml
2-Flurobiphenyl (SURR)	8.217	8.217	3100787	31.58		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048673.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 16:19
Operator : YP/AJ
Sample : PB164790BL
Misc :
ALS Vial : 56 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164790BL

Integration File: sample.E
Quant Time: Nov 09 01:07:13 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
4) S 2-Bromonaphthalene (S...	7.367	7008484	46.176 ug/ml
Spiked Amount 50.000		Recovery =	92.35%
6) S 2-Flurobiphenyl (SURR)	8.217	3100787	31.579 ug/ml
Spiked Amount 50.000	Range 0 - 131	Recovery =	63.16%
11) S ortho-Terphenyl (SURR)	11.254	6932733	40.699 ug/ml
Spiked Amount 50.000		Recovery =	81.40%
Target Compounds			

(f)=RT Delta > 1/2 Window (m)=manual int.

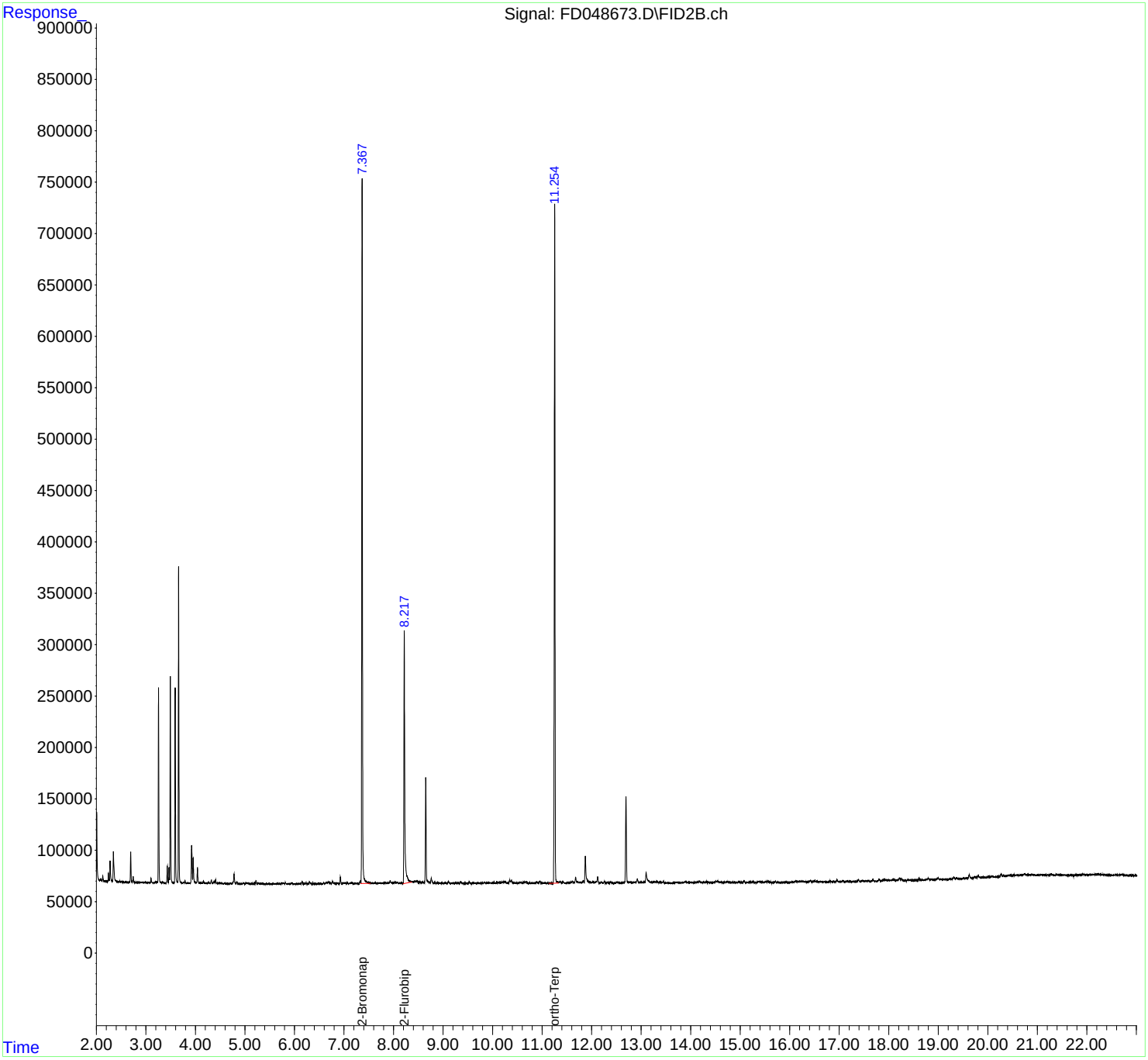
Quantitation Report (QT Reviewed)

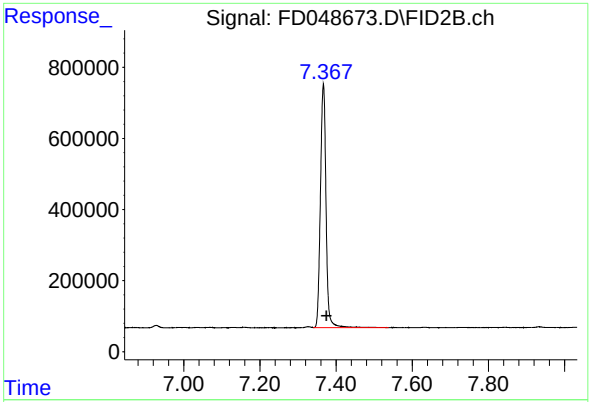
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048673.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 16:19
Operator : YP/AJ
Sample : PB164790BL
Misc :
ALS Vial : 56 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164790BL

Integration File: sample.E
Quant Time: Nov 09 01:07:13 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

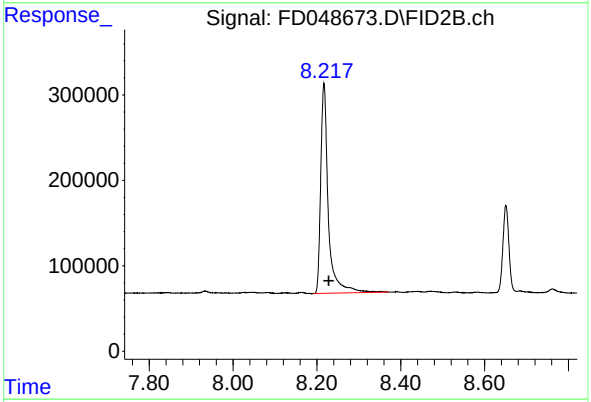




#4 2-Bromonaphthalene (SURR)

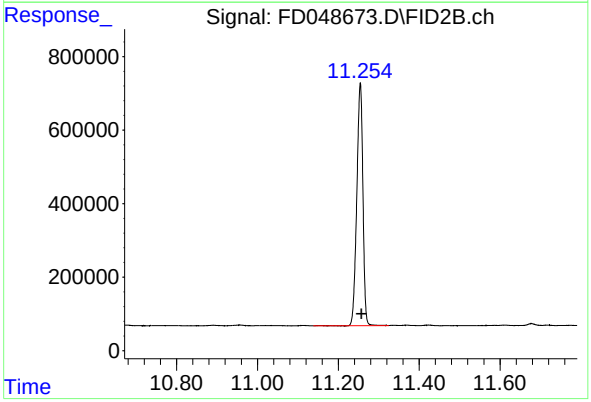
R.T.: 7.367 min
Delta R.T.: -0.008 min
Response: 7008484
Conc: 46.18 ug/ml

Instrument :
FID_D
ClientSampleId :
PB164790BL



#6 2-Flurobiphenyl (SURR)

R.T.: 8.217 min
Delta R.T.: -0.011 min
Response: 3100787
Conc: 31.58 ug/ml



#11 ortho-Terphenyl (SURR)

R.T.: 11.254 min
Delta R.T.: -0.003 min
Response: 6932733
Conc: 40.70 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048673.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 16:19
Sample : PB164790BL
Misc :
ALS Vial : 56 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	7.367	7.340	7.538	VV	688207	7008484	100.00%	41.125%
2	8.217	8.191	8.371	PV	245486	3100787	44.24%	18.195%
3	11.254	11.138	11.324	PV	662656	6932733	98.92%	40.680%

Sum of corrected areas: 17042004

Aromatic EPH 102324.M Sat Nov 09 03:24:37 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture		Date Collected:		
Project:	Amtrak Sawtooth Bridges 2024		Date Received:		
Client Sample ID:	PB164847BL		SDG No.:	P4718	
Lab Sample ID:	PB164847BL		Matrix:	Water	
Analytical Method:	NJEPH		% Solid:	0	
Sample Wt/Vol:	1000	Units: mL	Final Vol:	2000	uL
Soil Aliquot Vol:		uL	Test:	EPH	
Prep Method :	SW3510				

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048698.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	3.32	U	3.32	20.0	ug/l
Aromatic C12-C16	Aromatic C12-C16	3.69	U	3.69	30.0	ug/l
Aromatic C16-C21	Aromatic C16-C21	12.7	U	12.7	50.0	ug/l
Aromatic C21-C36	Aromatic C21-C36	25.2	U	25.2	80.0	ug/l
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	51.4		40 - 140	103%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	36.2		40 - 140	72%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	46.2		40 - 140	92%	SPK: 50

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Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	PB164847BL	Acq On:	11 Nov 2024 15:19
Client Sample ID:	PB164847BL	Operator:	YP/AJ
Data file:	FD048698.D	Misc:	
Instrument:	FID_D	ALS Vial:	62
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.090	5.808	0	0	200	ug/ml
Aromatic C12-C16	5.809	8.414	0	0	300	ug/ml
Aromatic C16-C21	8.415	12.677	0	0	500	ug/ml
Aromatic C21-C36	12.678	18.084	0	0	800	ug/ml
Aromatic EPH	4.090	18.084	0	0		ug/ml
ortho-Terphenyl (SURR)	11.257	11.257	7862791	46.16		ug/ml
2-Bromonaphthalene (SURR)	7.370	7.370	7793579	51.35		ug/ml
2-Flurobiphenyl (SURR)	8.219	8.219	3555602	36.21		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048698.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 15:19
Operator : YP/AJ
Sample : PB164847BL
Misc :
ALS Vial : 62 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164847BL

Integration File: autoint1.e
Quant Time: Nov 11 20:46:26 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
4) S 2-Bromonaphthalene (S...	7.370	7793579	51.348 ug/ml
Spiked Amount 50.000		Recovery = 102.70%	
6) S 2-Flurobiphenyl (SURR)	8.219	3555602	36.211 ug/ml
Spiked Amount 50.000 Range 0 - 131		Recovery = 72.42%	
11) S ortho-Terphenyl (SURR)	11.257	7862791	46.159 ug/ml
Spiked Amount 50.000		Recovery = 92.32%	
Target Compounds			

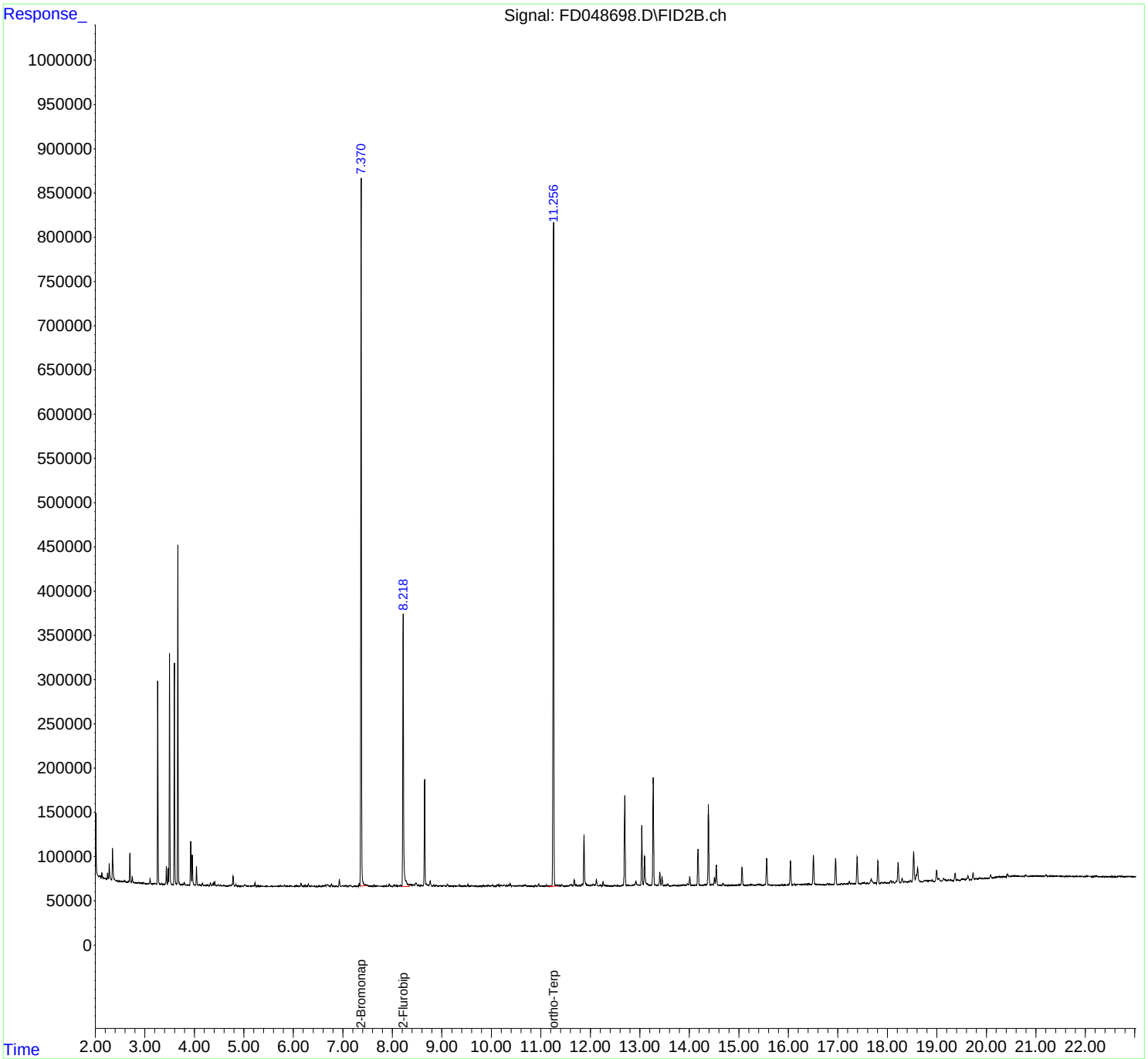
(f)=RT Delta > 1/2 Window (m)=manual int.

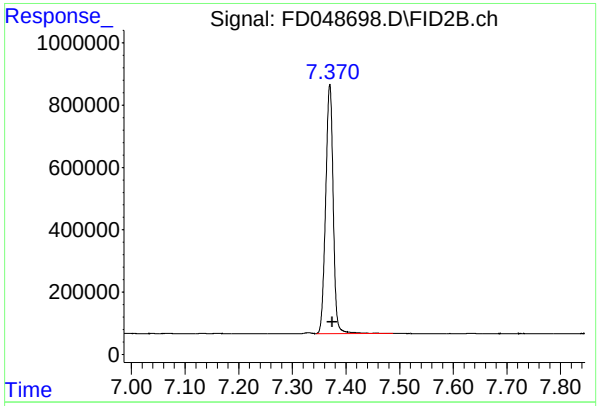
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048698.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 15:19
Operator : YP/AJ
Sample : PB164847BL
Misc :
ALS Vial : 62 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164847BL

Integration File: autoint1.e
Quant Time: Nov 11 20:46:26 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

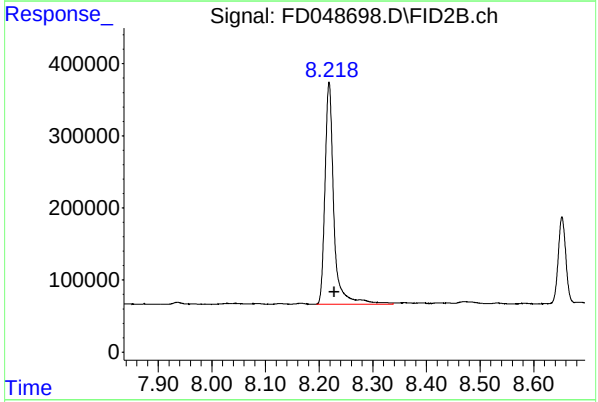




#4 2-Bromonaphthalene (SURR)

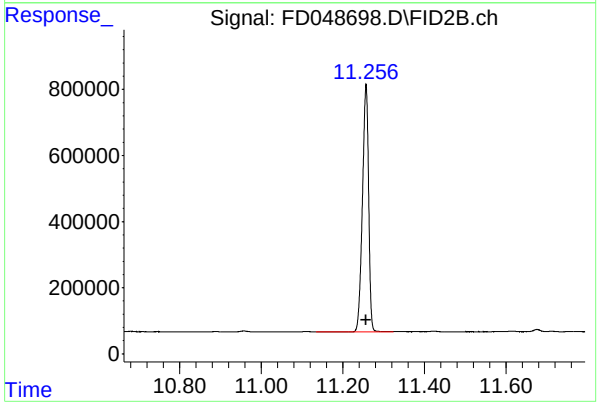
R.T.: 7.370 min
Delta R.T.: -0.005 min
Response: 7793579
Conc: 51.35 ug/ml

Instrument :
FID_D
ClientSampleId :
PB164847BL



#6 2-Flurobiphenyl (SURR)

R.T.: 8.219 min
Delta R.T.: -0.010 min
Response: 3555602
Conc: 36.21 ug/ml



#11 ortho-Terphenyl (SURR)

R.T.: 11.257 min
Delta R.T.: 0.000 min
Response: 7862791
Conc: 46.16 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048698.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 15:19
Sample : PB164847BL
Misc :
ALS Vial : 62 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	7.370	7.344	7.488	VB	805258	7793579	99.12%	49.779%
2	11.257	11.134	11.323	PV	753267	7862791	100.00%	50.221%

Sum of corrected areas: 15656370

Aromatic EPH 102324.M Tue Nov 12 03:23:37 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164847BL	SDG No.:	P4718
Lab Sample ID:	PB164847BL	Matrix:	Water
Analytical Method:	NJEPH	% Solid:	0
Sample Wt/Vol:	1000 Units: mL	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :	SW3510		

Prep Date :	Date Analyzed :	Prep Batch ID
11/09/24 08:38	11/11/24 15:19	PB164847

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	5.76	U	1	5.76	30.0	ug/l	FC067694.D
Aliphatic C12-C16	Aliphatic C12-C16	3.61	U	1	3.61	20.0	ug/l	FC067694.D
Aliphatic C16-C21	Aliphatic C16-C21	5.14	U	1	5.14	30.0	ug/l	FC067694.D
Aliphatic C21-C28	Aliphatic C21-C28	8.97	U	1	8.97	40.0	ug/l	FC067694.D
Aliphatic C28-C40	Aliphatic C28-C40	17.0	U	1	17.0	60.0	ug/l	FC067694.D
Aromatic C10-C12	Aromatic C10-C12	3.32	U	1	3.32	20.0	ug/l	FD048698.D
Aromatic C12-C16	Aromatic C12-C16	3.69	U	1	3.69	30.0	ug/l	FD048698.D
Aromatic C16-C21	Aromatic C16-C21	12.7	U	1	12.7	50.0	ug/l	FD048698.D
Aromatic C21-C36	Aromatic C21-C36	25.2	U	1	25.2	80.0	ug/l	FD048698.D
Total AliphaticEPH	Total AliphaticEPH	40.5	U		40.5	180	ug/l	
Total AromaticEPH	Total AromaticEPH	44.9	U		44.9	180	ug/l	
Total EPH	Total EPH	85.4	U		85.4	360	ug/l	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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Fax : 908 789 8922

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164847BL	SDG No.:	P4718
Lab Sample ID:	PB164847BL	Matrix:	Water
Analytical Method:	NJEPH	% Solid:	0
Sample Wt/Vol:	1000 Units: mL	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :	SW3510		

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067694.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	5.76	U	5.76	30.0	ug/l
Aliphatic C12-C16	Aliphatic C12-C16	3.61	U	3.61	20.0	ug/l
Aliphatic C16-C21	Aliphatic C16-C21	5.14	U	5.14	30.0	ug/l
Aliphatic C21-C28	Aliphatic C21-C28	8.97	U	8.97	40.0	ug/l
Aliphatic C28-C40	Aliphatic C28-C40	17.0	U	17.0	60.0	ug/l
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	45.8		40 - 140	92%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	PB164847BL	Acq On:	11 Nov 2024 15:19
Client Sample ID:	PB164847BL	Operator:	YP/AJ
Data file:	FC067694.D	Misc:	
Instrument:	FID_C	ALS Vial:	11
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.170	6.450	0	0	300	ug/ml
Aliphatic C12-C16	6.451	9.840	0	0	200	ug/ml
Aliphatic C16-C21	9.841	13.198	0	0	300	ug/ml
Aliphatic C21-C28	13.199	16.853	0	0	400	ug/ml
Aliphatic C28-C40	16.854	21.695	0	0	600	ug/ml
Aliphatic EPH	3.170	21.695	0	0		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.932	12.932	4947942	45.82		ug/ml
Aliphatic C9-C28	3.170	16.853	0	0	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067694.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 15:19
Operator : YP/AJ
Sample : PB164847BL
Misc :
ALS Vial : 11 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164847BL

Integration File: autoint1.e
Quant Time: Nov 11 20:44:52 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

Compound	R.T.	Response	Conc Units
System Monitoring Compounds			
12) S 1-chlorooctadecane (S...	12.932	4947942	45.819 ug/ml
Spiked Amount 50.000		Recovery = 91.64%	
Target Compounds			

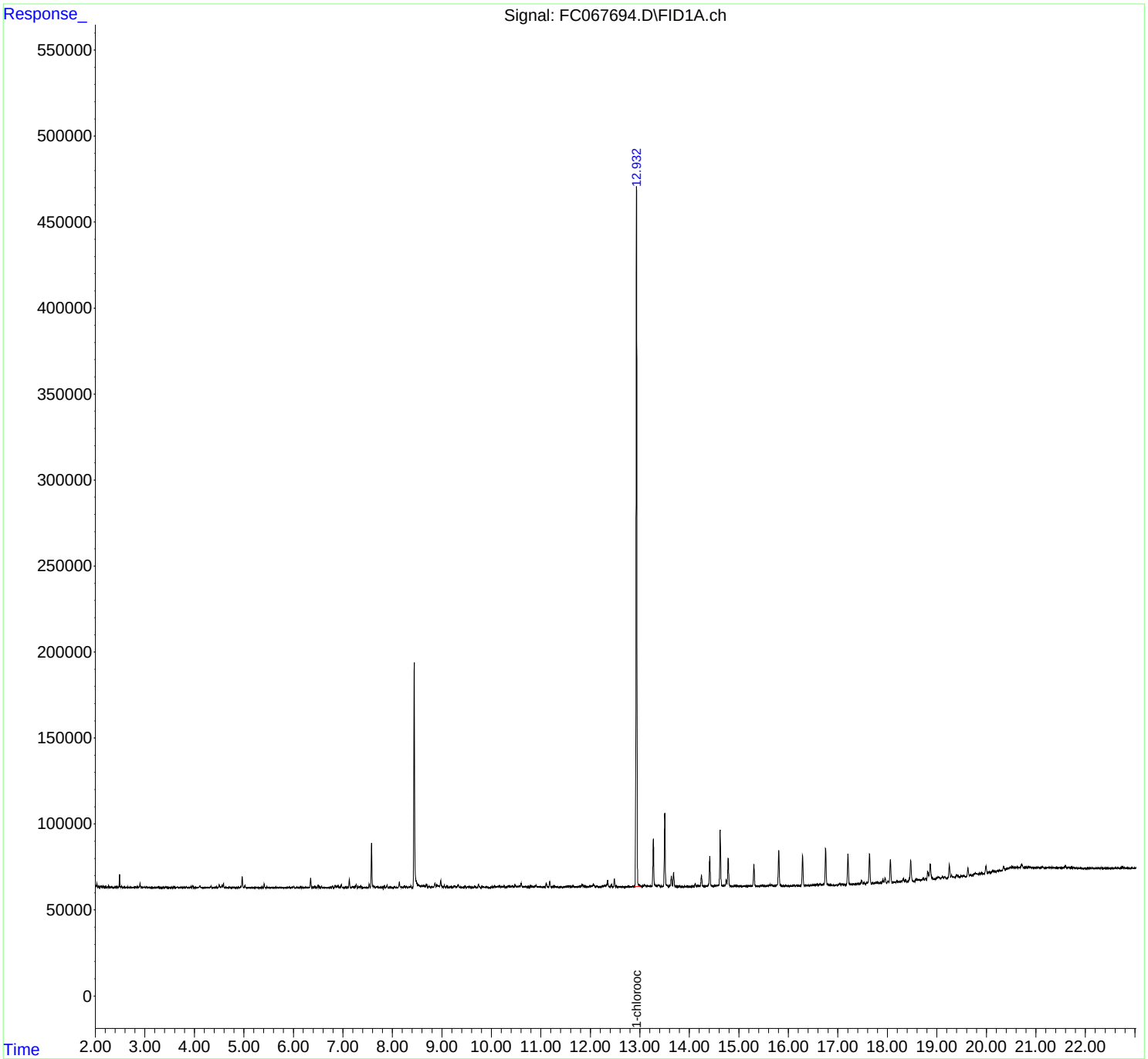
(f)=RT Delta > 1/2 Window (m)=manual int.

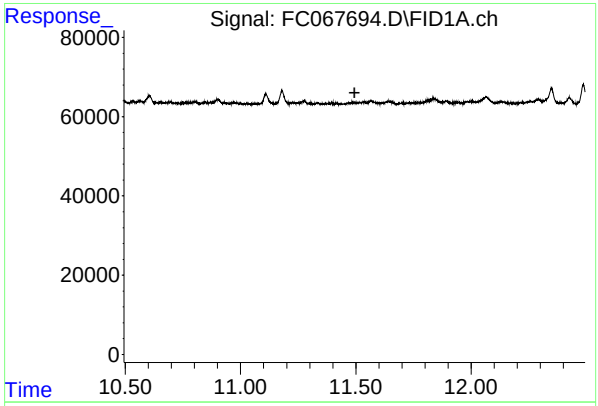
Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067694.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 15:19
Operator : YP/AJ
Sample : PB164847BL
Misc :
ALS Vial : 11 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164847BL

Integration File: autoint1.e
Quant Time: Nov 11 20:44:52 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

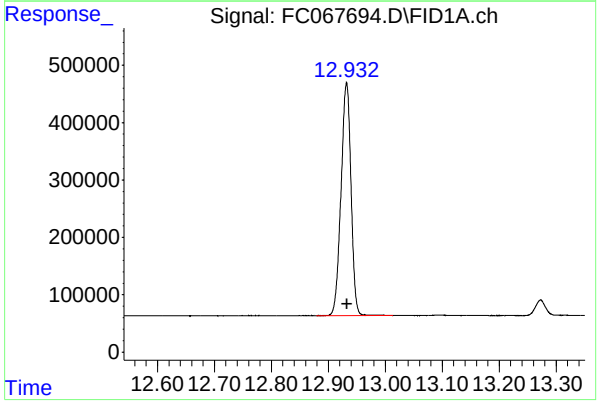




#9 ortho-Terphenyl (SURR)

R.T.: 0.000 min
Exp R.T. : 11.494 min
Response: 0
Conc: N.D.

Instrument :
FID_C
ClientSampleId :
PB164847BL



#12 1-chlorooctadecane (SURR)

R.T.: 12.932 min
Delta R.T.: -0.001 min
Response: 4947942
Conc: 45.82 ug/ml

rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067694.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 15:19
Sample : PB164847BL
Misc :
ALS Vial : 11 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	12.932	12.878	13.013	BB	406267	4947942	100.00%	100.000%

Sum of corrected areas: 4947942

Aliphatic EPH 102324.M Tue Nov 12 01:25:49 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BS	SDG No.:	P4718
Lab Sample ID:	PB164790BS	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.01 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048674.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	3.28		0.30	0.67	mg/kg
Aromatic C12-C16	Aromatic C12-C16	6.04		0.34	1.00	mg/kg
Aromatic C16-C21	Aromatic C16-C21	12.7		0.96	1.67	mg/kg
Aromatic C21-C36	Aromatic C21-C36	20.3		2.00	2.67	mg/kg
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	44.8		40 - 140	90%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	34.8		40 - 140	70%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	37.5		40 - 140	75%	SPK: 50

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Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	PB164790BS	Acq On:	08 Nov 2024 16:55
Client Sample ID:	PB164790BS	Operator:	YP/AJ
Data file:	FD048674.D	Misc:	
Instrument:	FID_D	ALS Vial:	57
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.092	5.810	8675577	49.236	200	ug/ml
Aromatic C12-C16	5.811	8.415	16061219	90.601	300	ug/ml
Aromatic C16-C21	8.416	12.678	31299494	191.046	500	ug/ml
Aromatic C21-C36	12.679	18.083	46599184	305.142	800	ug/ml
Aromatic EPH	4.092	18.083	102635474	636.025		ug/ml
ortho-Terphenyl (SURR)	11.255	11.255	6379432	37.45		ug/ml
2-Bromonaphthalene (SURR)	7.369	7.369	6793337	44.76		ug/ml
2-Flurobiphenyl (SURR)	8.219	8.219	3413584	34.76		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048674.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 16:55
Operator : YP/AJ
Sample : PB164790BS
Misc :
ALS Vial : 57 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164790BS

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:07:22 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.369	6793337	44.758 ug/ml
Spiked Amount	50.000		Recovery =	89.52%
6) S	2-Flurobiphenyl (SURR)	8.219	3413584	34.764 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	69.53%
11) S	ortho-Terphenyl (SURR)	11.255	6379432	37.451 ug/ml
Spiked Amount	50.000		Recovery =	74.90%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.191	3958170	22.752 ug/mlm
2) T	Naphthalene (C11.7)	5.708	4709623	26.394 ug/ml
3) T	2-Methylnaphthalene (...	6.755	4709799	26.332 ug/ml
5) T	Acenaphthylene (C15.06)	8.021	5586729	31.817 ug/ml
7) T	Acenaphthene (C15.5)	8.316	5764691	32.502 ug/ml
8) T	Flouorene (C16.55)	9.094	5897494	34.889 ug/ml
9) T	Phenanthrene (C19.36)	10.482	6029876	36.477 ug/ml
10) T	Anthracene (C19.43)	10.558	6099948	38.146 ug/ml
12) T	Fluoranthene (C21.85)	12.287	6307650	38.326 ug/mlm
13) T	Pyrene (C20.8)	12.580	6214680	38.582 ug/ml
14) T	Benzo[a]anthracene (C...	14.450	5847438	39.992 ug/ml
15) T	Chrysene (C27.41)	14.492	5925473	36.023 ug/ml
16) T	benzo[b]fluoranthene ...	15.998	5976532	39.312 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.031	5956234	39.628 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.373	5746993	38.187 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.739	5620185	43.074 ug/ml
20) T	Dibenz[a,h]anthracene...	17.777	5776617	35.497 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.991	5749712	37.557 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048674.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 16:55
Operator : YP/AJ
Sample : PB164790BS
Misc :
ALS Vial : 57 Sample Multiplier: 1

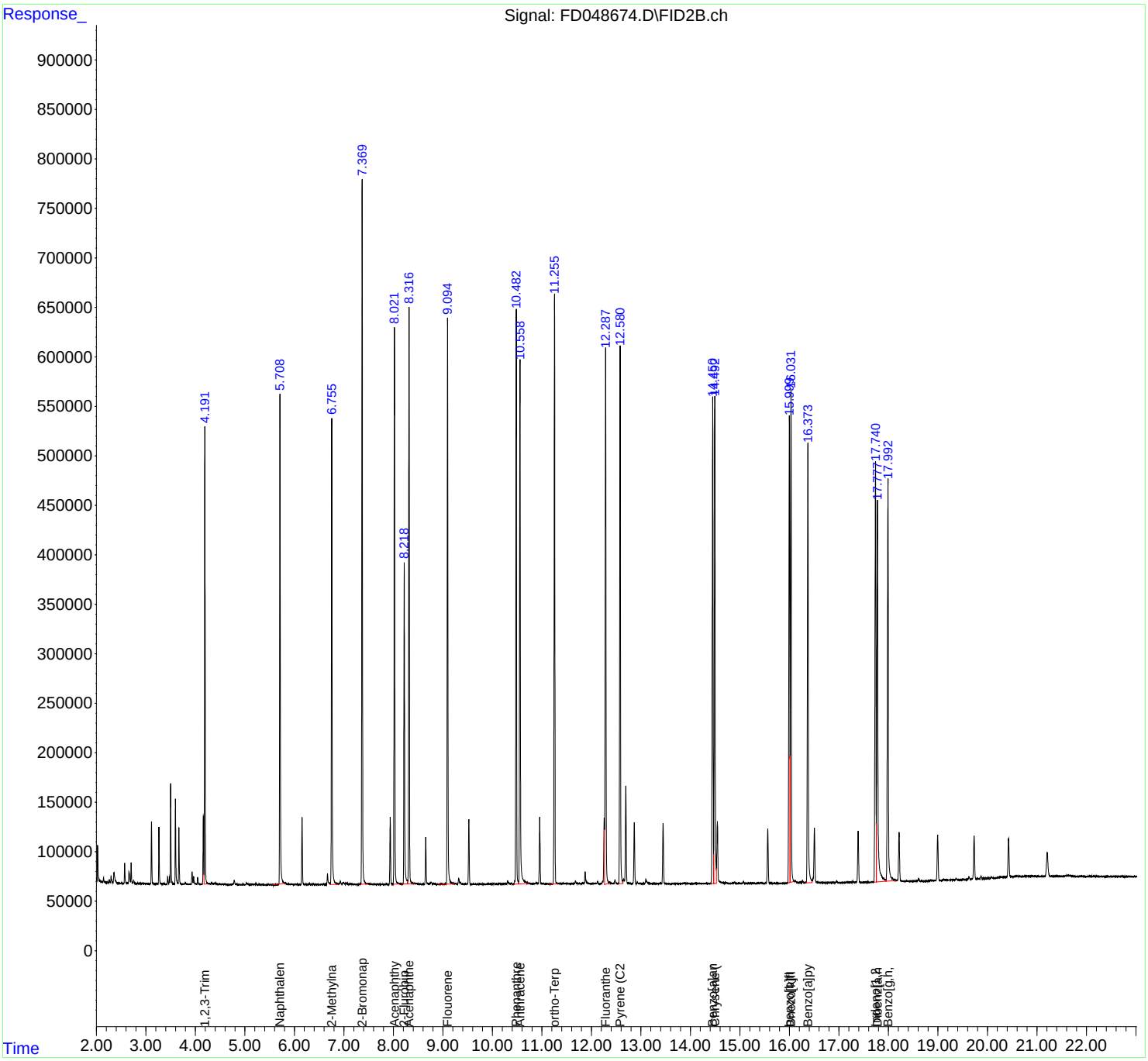
Instrument :
FID_D
ClientSampleId :
PB164790BS

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:07:22 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Instrument :
FID_D
ClientSampleId :
PB164790BS

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD11082
Data File : FD048674.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 16:55
Sample : PB164790BS
Misc :
ALS Vial : 57 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.191	4.176	4.255	M	462654	3965954	56.19%	3.327%
2	5.708	5.548	5.808	BV	494260	4709623	66.73%	3.950%
3	6.755	6.725	6.891	VV	469869	4709799	66.73%	3.950%
4	7.369	7.341	7.491	VB	702851	6793337	96.26%	5.698%
5	8.021	7.991	8.115	PV	561488	5586729	79.16%	4.686%
6	8.219	8.155	8.287	BV	324622	3413584	48.37%	2.863%
7	8.316	8.287	8.431	VB	576891	5764691	81.68%	4.835%
8	9.094	8.911	9.238	BV	572611	5897494	83.56%	4.947%
9	10.482	10.431	10.527	BV	575665	6029876	85.44%	5.058%
10	10.558	10.527	10.741	VV	529773	6099948	86.43%	5.116%
11	11.255	11.141	11.331	PV	593295	6379432	90.39%	5.351%
12	12.287	12.171	12.455	PV	545977	7057496	100.00%	5.920%
13	12.580	12.544	12.638	VV	548038	6214680	88.06%	5.213%
14	14.450	14.408	14.469	BV	497145	5847438	82.85%	4.905%
15	14.492	14.469	14.524	VV	489981	5925473	83.96%	4.970%
16	15.998	15.961	16.013	BV	467041	5976532	84.68%	5.013%
17	16.031	16.013	16.101	VV	500329	5956234	84.40%	4.996%
18	16.373	16.311	16.458	BV	447919	5746993	81.43%	4.820%
19	17.739	17.701	17.756	BV	420689	5620185	79.63%	4.714%
20	17.777	17.756	17.950	VV	386245	5776617	81.85%	4.845%
21	17.991	17.950	18.155	VV	405110	5749712	81.47%	4.823%
			Sum of corrected areas:			119221826		

Aromatic EPH 102324.M Sat Nov 09 03:25:28 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BS	SDG No.:	P4718
Lab Sample ID:	PB164790BS	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.01 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

Prep Date :	Date Analyzed :	Prep Batch ID
11/08/24 08:47	11/08/24 16:55	PB164790

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units(Dry Weight)	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	5.28		1	0.38	1.00	mg/kg	FC067671.D
Aliphatic C12-C16	Aliphatic C12-C16	4.52		1	0.24	0.67	mg/kg	FC067671.D
Aliphatic C16-C21	Aliphatic C16-C21	8.05		1	0.30	1.00	mg/kg	FC067671.D
Aliphatic C21-C28	Aliphatic C21-C28	11.0		1	0.80	1.33	mg/kg	FC067671.D
Aliphatic C28-C40	Aliphatic C28-C40	18.9		1	1.80	2.00	mg/kg	FC067671.D
Aromatic C10-C12	Aromatic C10-C12	3.28		1	0.30	0.67	mg/kg	FD048674.D
Aromatic C12-C16	Aromatic C12-C16	6.04		1	0.34	1.00	mg/kg	FD048674.D
Aromatic C16-C21	Aromatic C16-C21	12.7		1	0.96	1.67	mg/kg	FD048674.D
Aromatic C21-C36	Aromatic C21-C36	20.3		1	2.00	2.67	mg/kg	FD048674.D
Total AliphaticEPH	Total AliphaticEPH	47.8			3.52	6.00	mg/kg	
Total AromaticEPH	Total AromaticEPH	42.3			3.60	6.01	mg/kg	
Total EPH	Total EPH	90.1			7.12	12.0	mg/kg	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BS	SDG No.:	P4718
Lab Sample ID:	PB164790BS	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.01 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067671.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	5.28		0.38	1.00	mg/kg
Aliphatic C12-C16	Aliphatic C12-C16	4.52		0.24	0.67	mg/kg
Aliphatic C16-C21	Aliphatic C16-C21	8.05		0.30	1.00	mg/kg
Aliphatic C21-C28	Aliphatic C21-C28	11.0		0.80	1.33	mg/kg
Aliphatic C28-C40	Aliphatic C28-C40	18.9		1.80	2.00	mg/kg
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	38.1		40 - 140	76%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	PB164790BS	Acq On:	08 Nov 2024 16:55
Client Sample ID:	PB164790BS	Operator:	YP/AJ
Data file:	FC067671.D	Misc:	
Instrument:	FID_C	ALS Vial:	12
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.171	6.450	10737228	79.259	300	ug/ml
Aliphatic C12-C16	6.451	9.841	8940399	67.894	200	ug/ml
Aliphatic C16-C21	9.842	13.199	15360217	120.723	300	ug/ml
Aliphatic C21-C28	13.200	16.853	19908909	165.783	400	ug/ml
Aliphatic C28-C40	16.854	21.698	28687316	283.771	600	ug/ml
Aliphatic EPH	3.171	21.698	83634069	717.43		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.932	12.932	4113852	38.1		ug/ml
Aliphatic C9-C28	3.171	16.853	54946753	433.659	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067671.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 16:55
Operator : YP/AJ
Sample : PB164790BS
Misc :
ALS Vial : 12 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164790BS

Integration File: autoint1.e
Quant Time: Nov 09 01:37:12 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
12) S	1-chlorooctadecane (S...	12.932	4113852	38.095 ug/ml
Spiked Amount	50.000		Recovery =	76.19%
	Target Compounds			
1) T	n-Nonane (C9)	3.272	3001231	22.277 ug/ml
2) T	n-Decane (C10)	4.335	3653417	26.815 ug/ml
4) T	n-Dodecane (C12)	6.350	4082580	30.143 ug/ml
6) T	n-Tetradecane (C14)	8.143	4286216	32.654 ug/ml
7) T	n-Hexadecane (C16)	9.742	4654183	35.231 ug/ml
8) T	n-Octadecane (C18)	11.182	5038676	38.139 ug/ml
10) T	n-Eicosane (C20)	12.490	5243551	41.557 ug/ml
11) T	n-Heneicosane (C21)	13.101	5077990	41.146 ug/ml
13) T	n-Docosane (C22)	13.687	5072036	41.422 ug/ml
14) T	n-Tetracosane (C24)	14.787	5008883	41.324 ug/ml
15) T	n-Hexacosane (C26)	15.807	4932683	41.432 ug/ml
16) T	n-Octacosane (C28)	16.756	4895307	41.610 ug/ml
17) T	n-Tricontane (C30)	17.642	4925116	40.747 ug/ml
18) T	n-Dotriacontane (C32)	18.472	4883145	41.271 ug/ml
19) T	n-Tetratriacontane (C34)	19.255	4849736	46.308 ug/ml
20) T	n-Hexatriacontane (C36)	19.993	4702349	51.659 ug/ml
21) T	n-Octatriacontane (C38)	20.716	4684008	54.086 ug/ml
22) T	n-Tetracontane (C40)	21.602	4642962	54.616 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

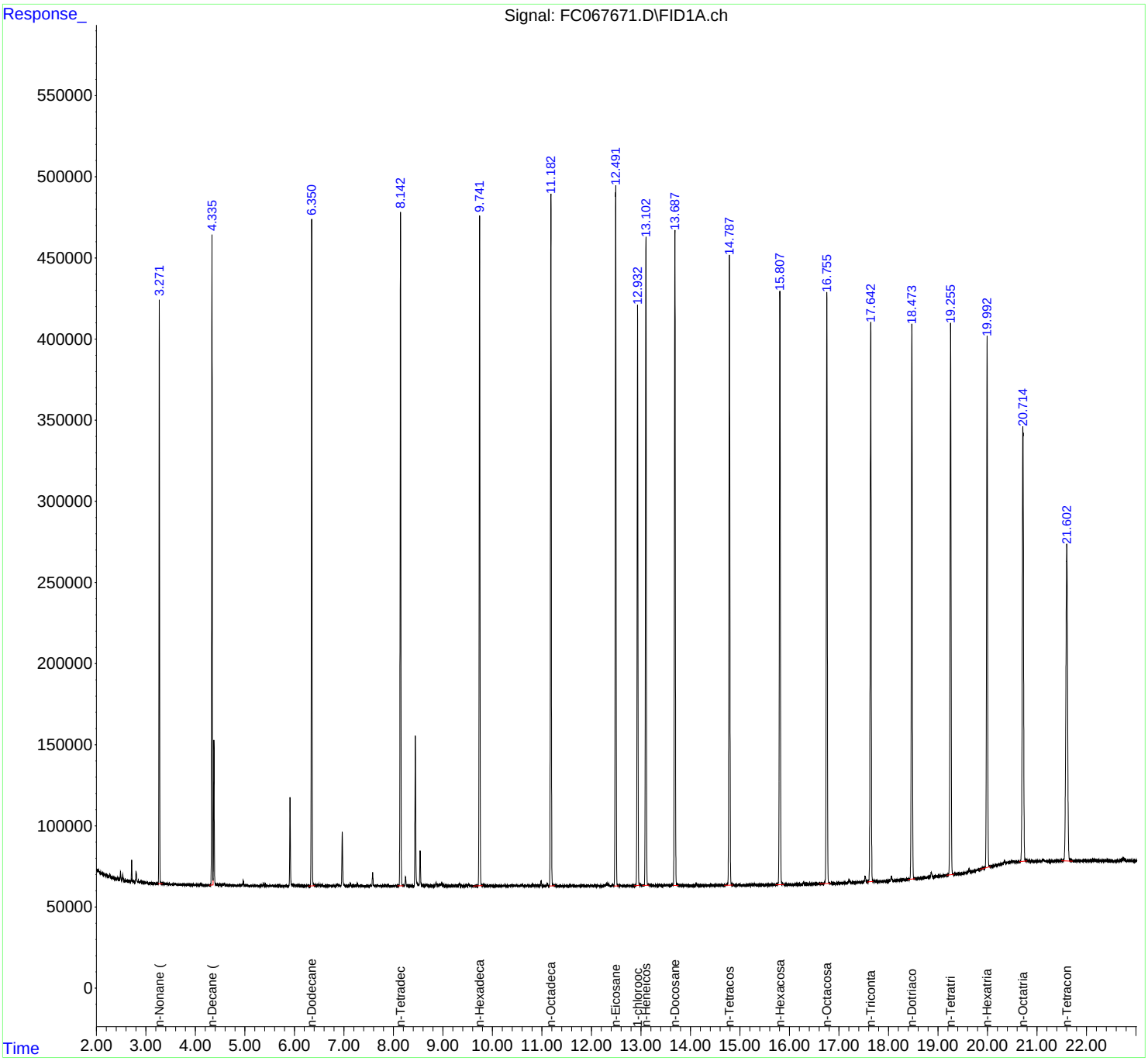
Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067671.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 16:55
Operator : YP/AJ
Sample : PB164790BS
Misc :
ALS Vial : 12 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164790BS

Integration File: autoint1.e
Quant Time: Nov 09 01:37:12 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067671.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 16:55
Sample : PB164790BS
Misc :
ALS Vial : 12 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.272	3.245	3.339	BB	358929	3001231	57.24%	3.420%
2	4.335	4.280	4.357	BV	400358	3653417	69.67%	4.164%
3	6.350	6.287	6.417	BV	411135	4082580	77.86%	4.653%
4	8.143	8.082	8.204	BB	414217	4286216	81.74%	4.885%
5	9.742	9.614	9.797	BB	413914	4654183	88.76%	5.304%
6	11.182	11.145	11.265	BB	425707	5038676	96.09%	5.742%
7	12.490	12.450	12.557	PB	427224	5243551	100.00%	5.976%
8	12.932	12.864	12.974	BB	357351	4113852	78.46%	4.688%
9	13.101	13.034	13.167	BB	397094	5077990	96.84%	5.787%
10	13.687	13.648	13.752	VB	404313	5072036	96.73%	5.780%
11	14.787	14.682	14.857	BB	385208	5008883	95.52%	5.708%
12	15.807	15.719	15.887	BB	365887	4932683	94.07%	5.621%
13	16.756	16.600	16.827	BB	364601	4895307	93.36%	5.579%
14	17.642	17.575	17.695	BB	344692	4925116	93.93%	5.613%
15	18.472	18.397	18.535	BB	341392	4883145	93.13%	5.565%
16	19.255	19.175	19.324	BV	338177	4849736	92.49%	5.527%
17	19.993	19.845	20.055	BB	326184	4702349	89.68%	5.359%
18	20.716	20.642	20.802	BB	266641	4684008	89.33%	5.338%
19	21.602	21.499	21.714	BB	195029	4642962	88.55%	5.291%
			Sum of corrected areas:			87747922		

Aliphatic EPH 102324.M Sat Nov 09 02:12:17 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture		Date Collected:		
Project:	Amtrak Sawtooth Bridges 2024		Date Received:		
Client Sample ID:	PB164847BS		SDG No.:	P4718	
Lab Sample ID:	PB164847BS		Matrix:	Water	
Analytical Method:	NJEPH		% Solid:	0	
Sample Wt/Vol:	1000	Units: mL	Final Vol:	2000	uL
Soil Aliquot Vol:		uL	Test:	EPH	
Prep Method :	SW3510				

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048699.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	106		3.32	20.0	ug/l
Aromatic C12-C16	Aromatic C12-C16	195		3.69	30.0	ug/l
Aromatic C16-C21	Aromatic C16-C21	412		12.7	50.0	ug/l
Aromatic C21-C36	Aromatic C21-C36	669		25.2	80.0	ug/l
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	48.2		40 - 140	96%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	38.1		40 - 140	76%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	40.5		40 - 140	81%	SPK: 50

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Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	PB164847BS	Acq On:	11 Nov 2024 15:56
Client Sample ID:	PB164847BS	Operator:	YP/AJ
Data file:	FD048699.D	Misc:	
Instrument:	FID_D	ALS Vial:	63
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.090	5.808	9365851	53.154	200	ug/ml
Aromatic C12-C16	5.809	8.414	17287027	97.516	300	ug/ml
Aromatic C16-C21	8.415	12.677	33820727	206.435	500	ug/ml
Aromatic C21-C36	12.678	18.084	51100831	334.62	800	ug/ml
Aromatic EPH	4.090	18.084	111574436	691.724		ug/ml
2-Flurobiphenyl (SURR)	8.218	8.218	3737514	38.06		ug/ml
ortho-Terphenyl (SURR)	11.256	11.256	6906333	40.54		ug/ml
2-Bromonaphthalene (SURR)	7.370	7.370	7311826	48.17		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048699.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 15:56
Operator : YP/AJ
Sample : PB164847BS
Misc :
ALS Vial : 63 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164847BS

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 11 20:46:38 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc	Units
	System Monitoring Compounds				
4)	S 2-Bromonaphthalene (S...	7.370	7311826	48.174	ug/ml
Spiked Amount	50.000		Recovery =	96.35%	
6)	S 2-Flurobiphenyl (SURR)	8.218	3737514	38.063	ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	76.13%	
11)	S ortho-Terphenyl (SURR)	11.256	6906333	40.544	ug/ml
Spiked Amount	50.000		Recovery =	81.09%	
	Target Compounds				
1)	T 1,2,3-Trimethylbenzen...	4.191	4198716	24.135	ug/mlm
2)	T Naphthalene (C11.7)	5.709	5136931	28.789	ug/ml
3)	T 2-Methylnaphthalene (...	6.755	5031320	28.129	ug/ml
5)	T Acenaphthylene (C15.06)	8.021	6036188	34.376	ug/ml
7)	T Acenaphthene (C15.5)	8.316	6219519	35.067	ug/ml
8)	T Flouorene (C16.55)	9.095	6395178	37.833	ug/ml
9)	T Phenanthrene (C19.36)	10.483	6554307	39.650	ug/ml
10)	T Anthracene (C19.43)	10.558	6492907	40.603	ug/ml
12)	T Fluoranthene (C21.85)	12.288	6978772	42.404	ug/mlm
13)	T Pyrene (C20.8)	12.581	6750132	41.906	ug/ml
14)	T Benzo[a]anthracene (C...	14.451	6420224	43.909	ug/ml
15)	T Chrysene (C27.41)	14.494	6549280	39.815	ug/ml
16)	T benzo[b]fluoranthene ...	16.000	6486083	42.663	ug/ml
17)	T Bnezo[k]fluoranthene ...	16.034	6702146	44.591	ug/ml
18)	T Benzo[a]pyrene (C31.34)	16.375	6261014	41.603	ug/ml
19)	T Indeno[1,2,3-cd]pyren...	17.743	6276470	48.104	ug/ml
20)	T Dibenz[a,h]anthracene...	17.780	6346574	38.999	ug/ml
21)	T Benzo[g,h,i]perylene ...	17.994	6059040	39.578	ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048699.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 15:56
Operator : YP/AJ
Sample : PB164847BS
Misc :
ALS Vial : 63 Sample Multiplier: 1

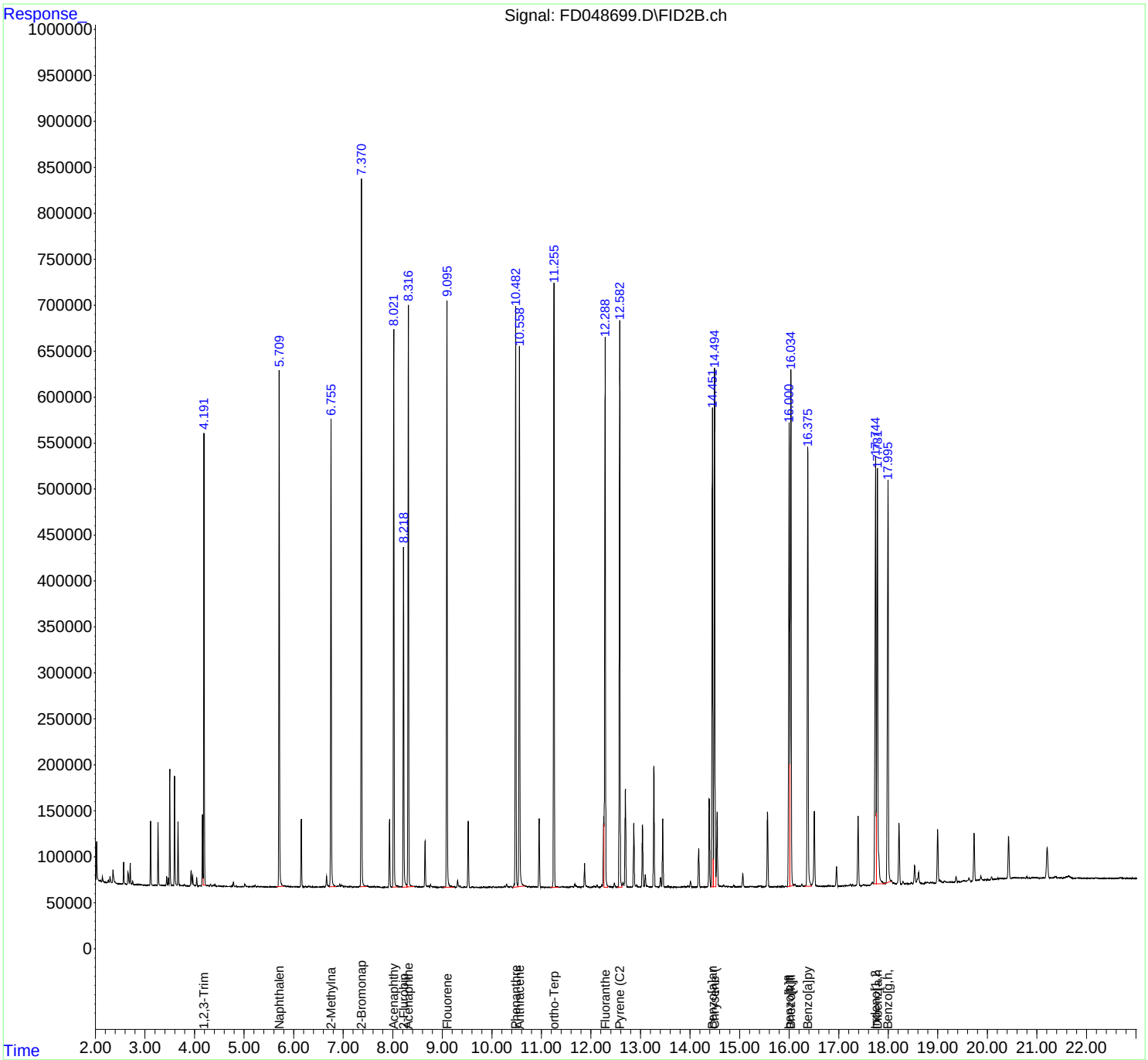
Instrument :
FID_D
ClientSampleId :
PB164847BS

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 11 20:46:38 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Instrument :
FID_D
ClientSampleId :
PB164847BS

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD11112
Data File : FD048699.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 15:56
Sample : PB164847BS
Misc :
ALS Vial : 63 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.191	4.173	4.248	M	492308	4228920	55.44%	3.265%
2	5.709	5.648	5.803	BV	555361	5136931	67.34%	3.966%
3	6.755	6.721	6.861	VV	504455	5031320	65.96%	3.884%
4	7.370	7.340	7.478	PV	774614	7311826	95.85%	5.645%
5	8.021	7.990	8.108	PV	608164	6036188	79.13%	4.660%
6	8.218	8.194	8.287	BV	368381	3737514	49.00%	2.885%
7	8.316	8.287	8.438	VB	640144	6219519	81.53%	4.802%
8	9.095	9.018	9.228	BV	634138	6395178	83.84%	4.937%
9	10.483	10.414	10.527	BV	622825	6554307	85.92%	5.060%
10	10.558	10.527	10.666	VV	584012	6492907	85.12%	5.013%
11	11.256	11.178	11.351	BV	658502	6906333	90.54%	5.332%
12	12.288	12.232	12.421	VB	597732	7628203	100.00%	5.889%
13	12.581	12.538	12.626	BV	611927	6750132	88.49%	5.211%
14	14.451	14.415	14.470	PV	522107	6420224	84.16%	4.957%
15	14.494	14.470	14.523	VV	563184	6549280	85.86%	5.056%
16	16.000	15.961	16.015	BV	508864	6486083	85.03%	5.007%
17	16.034	16.015	16.096	VV	565238	6702146	87.86%	5.174%
18	16.375	16.304	16.451	BV	478021	6261014	82.08%	4.834%
19	17.743	17.701	17.758	BV	474859	6276470	82.28%	4.846%
20	17.780	17.758	17.923	VV	454987	6346574	83.20%	4.900%
21	17.994	17.923	18.058	PV	437905	6059040	79.43%	4.678%
			Sum of corrected areas:			129530109		

Aromatic EPH 102324.M Tue Nov 12 03:25:30 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164847BS	SDG No.:	P4718
Lab Sample ID:	PB164847BS	Matrix:	Water
Analytical Method:	NJEPH	% Solid:	0
Sample Wt/Vol:	1000 Units: mL	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :	SW3510		

Prep Date :	Date Analyzed :	Prep Batch ID
11/09/24 08:38	11/11/24 15:56	PB164847

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	164		1	5.76	30.0	ug/l	FC067695.D
Aliphatic C12-C16	Aliphatic C12-C16	143		1	3.61	20.0	ug/l	FC067695.D
Aliphatic C16-C21	Aliphatic C16-C21	256		1	5.14	30.0	ug/l	FC067695.D
Aliphatic C21-C28	Aliphatic C21-C28	360		1	8.97	40.0	ug/l	FC067695.D
Aliphatic C28-C40	Aliphatic C28-C40	602		1	17.0	60.0	ug/l	FC067695.D
Aromatic C10-C12	Aromatic C10-C12	106		1	3.32	20.0	ug/l	FD048699.D
Aromatic C12-C16	Aromatic C12-C16	195		1	3.69	30.0	ug/l	FD048699.D
Aromatic C16-C21	Aromatic C16-C21	412		1	12.7	50.0	ug/l	FD048699.D
Aromatic C21-C36	Aromatic C21-C36	669		1	25.2	80.0	ug/l	FD048699.D
Total AliphaticEPH	Total AliphaticEPH	1530			40.5	180	ug/l	
Total AromaticEPH	Total AromaticEPH	1380			44.9	180	ug/l	
Total EPH	Total EPH	2910			85.4	360	ug/l	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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Fax : 908 789 8922

Report of Analysis

Client:	Portal Partners Tri-Venture		Date Collected:		
Project:	Amtrak Sawtooth Bridges 2024		Date Received:		
Client Sample ID:	PB164847BS		SDG No.:	P4718	
Lab Sample ID:	PB164847BS		Matrix:	Water	
Analytical Method:	NJEPH		% Solid:	0	
Sample Wt/Vol:	1000	Units: mL	Final Vol:	2000	uL
Soil Aliquot Vol:		uL	Test:	EPH	
Prep Method :	SW3510				

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067695.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	164		5.76	30.0	ug/l
Aliphatic C12-C16	Aliphatic C12-C16	143		3.61	20.0	ug/l
Aliphatic C16-C21	Aliphatic C16-C21	256		5.14	30.0	ug/l
Aliphatic C21-C28	Aliphatic C21-C28	360		8.97	40.0	ug/l
Aliphatic C28-C40	Aliphatic C28-C40	602		17.0	60.0	ug/l
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	40.2		40 - 140	80%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	PB164847BS	Acq On:	11 Nov 2024 15:56
Client Sample ID:	PB164847BS	Operator:	YP/AJ
Data file:	FC067695.D	Misc:	
Instrument:	FID_C	ALS Vial:	12
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.170	6.450	11176096	82.499	300	ug/ml
Aliphatic C12-C16	6.451	9.840	9420957	71.543	200	ug/ml
Aliphatic C16-C21	9.841	13.198	16310482	128.192	300	ug/ml
Aliphatic C21-C28	13.199	16.853	21643985	180.231	400	ug/ml
Aliphatic C28-C40	16.854	21.695	30449487	301.202	600	ug/ml
Aliphatic EPH	3.170	21.695	89001007	763.667		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.932	12.932	4338861	40.18		ug/ml
Aliphatic C9-C28	3.170	16.853	58551520	462.465	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067695.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 15:56
Operator : YP/AJ
Sample : PB164847BS
Misc :
ALS Vial : 12 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164847BS

Integration File: autoint1.e
Quant Time: Nov 11 20:45:03 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
12) S	1-chlorooctadecane (S...	12.932	4338861	40.179 ug/ml
Spiked Amount	50.000		Recovery =	80.36%
	Target Compounds			
1) T	n-Nonane (C9)	3.272	3105743	23.053 ug/ml
2) T	n-Decane (C10)	4.336	3802306	27.908 ug/ml
4) T	n-Dodecane (C12)	6.351	4268047	31.512 ug/ml
6) T	n-Tetradecane (C14)	8.143	4512592	34.379 ug/ml
7) T	n-Hexadecane (C16)	9.742	4908365	37.156 ug/ml
8) T	n-Octadecane (C18)	11.182	5339509	40.416 ug/ml
10) T	n-Eicosane (C20)	12.489	5579967	44.223 ug/ml
11) T	n-Heneicosane (C21)	13.101	5391006	43.682 ug/ml
13) T	n-Docosane (C22)	13.687	5431429	44.357 ug/ml
14) T	n-Tetracosane (C24)	14.787	5430032	44.799 ug/ml
15) T	n-Hexacosane (C26)	15.807	5402496	45.378 ug/ml
16) T	n-Octacosane (C28)	16.755	5380028	45.730 ug/ml
17) T	n-Tricontane (C30)	17.641	5352571	44.283 ug/ml
18) T	n-Dotriacontane (C32)	18.473	5262970	44.481 ug/ml
19) T	n-Tetratriacontane (C34)	19.255	5152235	49.197 ug/ml
20) T	n-Hexatriacontane (C36)	19.994	4961455	54.505 ug/ml
21) T	n-Octatriacontane (C38)	20.717	4904244	56.629 ug/ml
22) T	n-Tetracontane (C40)	21.601	4816012	56.652 ug/ml

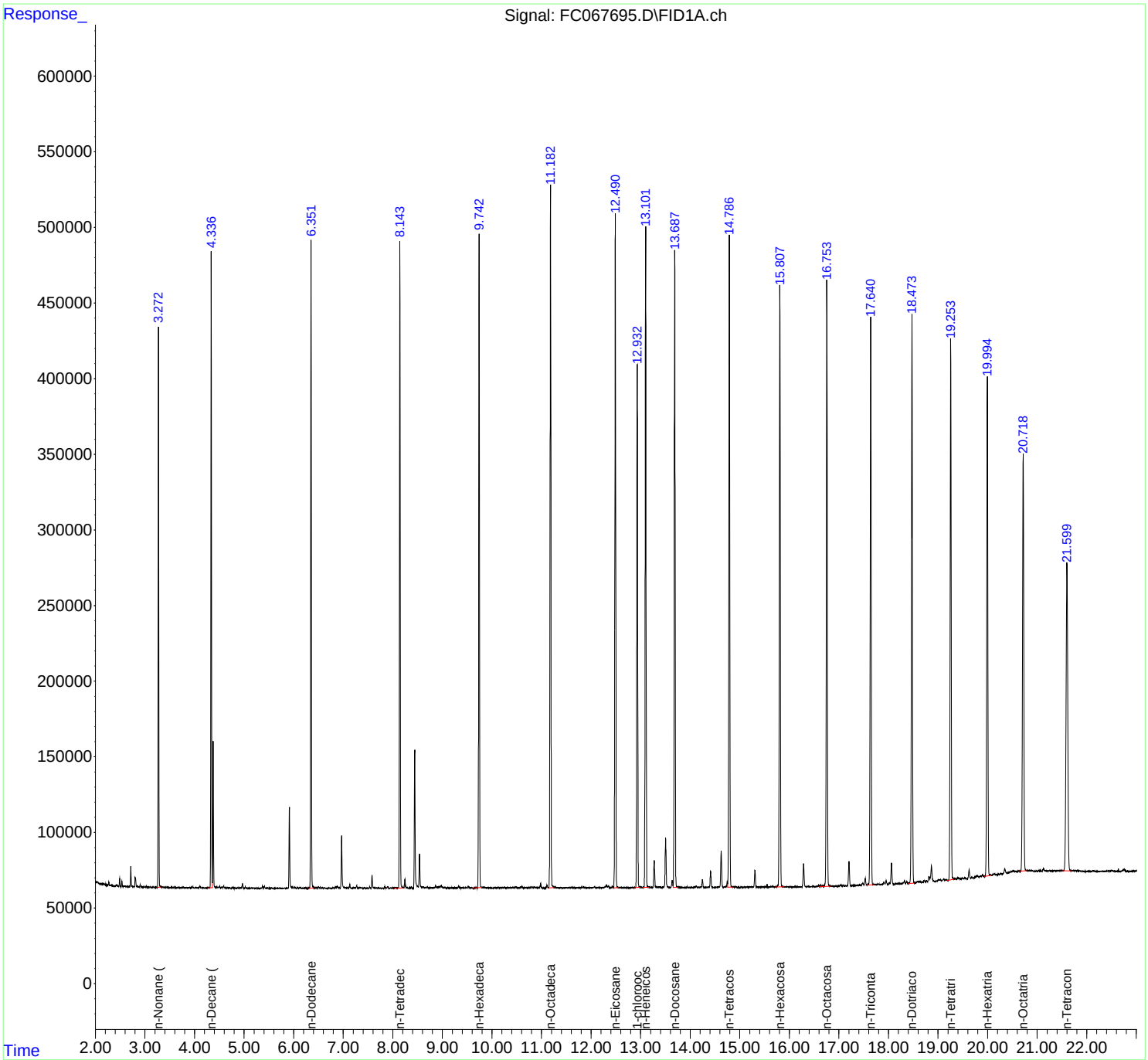
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067695.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 15:56
Operator : YP/AJ
Sample : PB164847BS
Misc :
ALS Vial : 12 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164847BS

Integration File: autoint1.e
Quant Time: Nov 11 20:45:03 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067695.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 15:56
Sample : PB164847BS
Misc :
ALS Vial : 12 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.272	3.245	3.327	BB	370092	3105743	55.66%	3.327%
2	4.336	4.280	4.358	BV	418589	3802306	68.14%	4.074%
3	6.351	6.292	6.414	BV	426292	4268047	76.49%	4.573%
4	8.143	8.015	8.215	BB	427412	4512592	80.87%	4.835%
5	9.742	9.615	9.802	BB	429261	4908365	87.96%	5.259%
6	11.182	11.135	11.255	PV	465762	5339509	95.69%	5.721%
7	12.489	12.450	12.554	PB	444437	5579967	100.00%	5.978%
8	12.932	12.865	12.982	BB	345383	4338861	77.76%	4.648%
9	13.101	13.032	13.167	BB	436341	5391006	96.61%	5.776%
10	13.687	13.654	13.755	VB	420904	5431429	97.34%	5.819%
11	14.787	14.754	14.857	VB	431755	5430032	97.31%	5.817%
12	15.807	15.715	15.885	BB	396592	5402496	96.82%	5.788%
13	16.755	16.610	16.835	BB	394316	5380028	96.42%	5.764%
14	17.641	17.575	17.714	BB	375644	5352571	95.92%	5.734%
15	18.473	18.400	18.535	BB	376347	5262970	94.32%	5.639%
16	19.255	19.189	19.320	BV	348852	5152235	92.33%	5.520%
17	19.994	19.930	20.079	BB	327267	4961455	88.92%	5.315%
18	20.717	20.635	20.790	BB	274105	4904244	87.89%	5.254%
19	21.601	21.504	21.700	BB	201330	4816012	86.31%	5.160%

Sum of corrected areas: 93339868

Aliphatic EPH 102324.M Tue Nov 12 01:26:28 2024

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Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BSD	SDG No.:	P4718
Lab Sample ID:	PB164790BSD	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.03 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

Prep Date :	Date Analyzed :	Prep Batch ID
11/08/24 08:47	11/08/24 17:32	PB164790

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units(Dry Weight)	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	5.31		1	0.38	1.00	mg/kg	FC067672.D
Aliphatic C12-C16	Aliphatic C12-C16	4.55		1	0.24	0.67	mg/kg	FC067672.D
Aliphatic C16-C21	Aliphatic C16-C21	8.11		1	0.30	1.00	mg/kg	FC067672.D
Aliphatic C21-C28	Aliphatic C21-C28	11.1		1	0.80	1.33	mg/kg	FC067672.D
Aliphatic C28-C40	Aliphatic C28-C40	18.9		1	1.80	2.00	mg/kg	FC067672.D
Aromatic C10-C12	Aromatic C10-C12	3.32		1	0.30	0.67	mg/kg	FD048675.D
Aromatic C12-C16	Aromatic C12-C16	6.08		1	0.34	1.00	mg/kg	FD048675.D
Aromatic C16-C21	Aromatic C16-C21	12.8		1	0.96	1.67	mg/kg	FD048675.D
Aromatic C21-C36	Aromatic C21-C36	20.5		1	2.00	2.66	mg/kg	FD048675.D
Total AliphaticEPH	Total AliphaticEPH	48.0			3.52	5.99	mg/kg	
Total AromaticEPH	Total AromaticEPH	42.7			3.60	6.00	mg/kg	
Total EPH	Total EPH	90.7			7.12	12.0	mg/kg	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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Fax : 908 789 8922

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BSD	SDG No.:	P4718
Lab Sample ID:	PB164790BSD	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.03 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067672.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	5.31		0.38	1.00	mg/kg
Aliphatic C12-C16	Aliphatic C12-C16	4.55		0.24	0.67	mg/kg
Aliphatic C16-C21	Aliphatic C16-C21	8.11		0.30	1.00	mg/kg
Aliphatic C21-C28	Aliphatic C21-C28	11.1		0.80	1.33	mg/kg
Aliphatic C28-C40	Aliphatic C28-C40	18.9		1.80	2.00	mg/kg
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	40.0		40 - 140	80%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	PB164790BSD	Acq On:	08 Nov 2024 17:32
Client Sample ID:	PB164790BSD	Operator:	YP/AJ
Data file:	FC067672.D	Misc:	
Instrument:	FID_C	ALS Vial:	13
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.171	6.450	10804603	79.757	300	ug/ml
Aliphatic C12-C16	6.451	9.841	8996124	68.317	200	ug/ml
Aliphatic C16-C21	9.842	13.199	15492501	121.763	300	ug/ml
Aliphatic C21-C28	13.200	16.853	20066511	167.095	400	ug/ml
Aliphatic C28-C40	16.854	21.698	28748582	284.377	600	ug/ml
Aliphatic EPH	3.171	21.698	84108321	721.309		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.932	12.932	4324971	40.05		ug/ml
Aliphatic C9-C28	3.171	16.853	55359739	436.932	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067672.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 17:32
Operator : YP/AJ
Sample : PB164790BSD
Misc :
ALS Vial : 13 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164790BSD

Integration File: autoint1.e
Quant Time: Nov 09 01:37:24 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
12) S	1-chlorooctadecane (S...	12.932	4324971	40.050 ug/ml
Spiked Amount	50.000		Recovery =	80.10%
	Target Compounds			
1) T	n-Nonane (C9)	3.272	3018558	22.406 ug/ml
2) T	n-Decane (C10)	4.336	3676514	26.984 ug/ml
4) T	n-Dodecane (C12)	6.351	4109531	30.342 ug/ml
6) T	n-Tetradecane (C14)	8.144	4310746	32.841 ug/ml
7) T	n-Hexadecane (C16)	9.742	4685378	35.468 ug/ml
8) T	n-Octadecane (C18)	11.182	5078899	38.444 ug/ml
10) T	n-Eicosane (C20)	12.489	5289322	41.920 ug/ml
11) T	n-Heneicosane (C21)	13.101	5124280	41.521 ug/ml
13) T	n-Docosane (C22)	13.686	5116690	41.786 ug/ml
14) T	n-Tetracosane (C24)	14.787	5054933	41.704 ug/ml
15) T	n-Hexacosane (C26)	15.806	4971810	41.760 ug/ml
16) T	n-Octacosane (C28)	16.755	4923078	41.846 ug/ml
17) T	n-Tricontane (C30)	17.642	4936312	40.839 ug/ml
18) T	n-Dotriacontane (C32)	18.474	4880655	41.249 ug/ml
19) T	n-Tetratriacontane (C34)	19.254	4852955	46.339 ug/ml
20) T	n-Hexatriacontane (C36)	19.994	4714626	51.794 ug/ml
21) T	n-Octatriacontane (C38)	20.717	4712530	54.416 ug/ml
22) T	n-Tetracontane (C40)	21.601	4651504	54.717 ug/ml

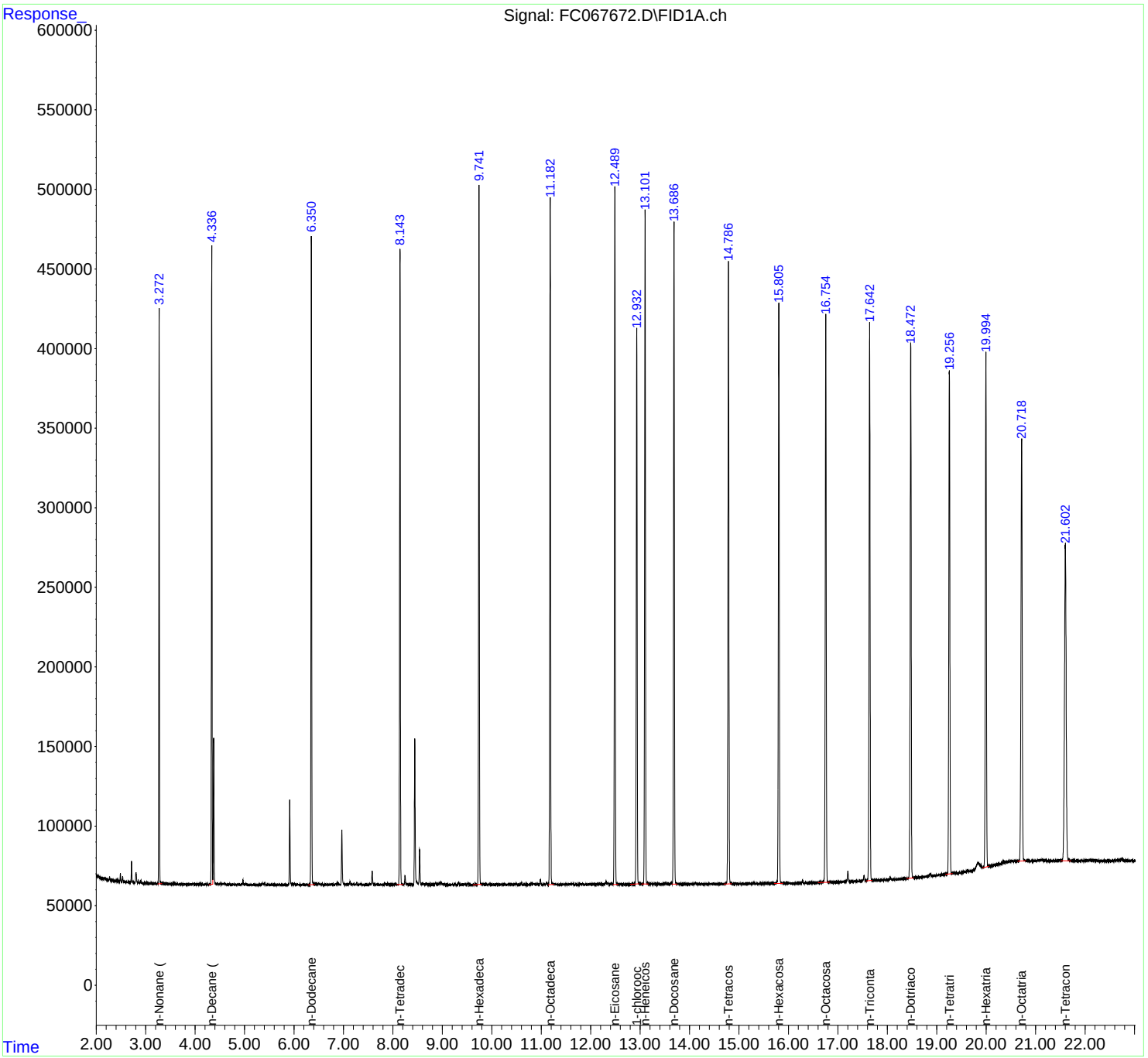
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067672.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 17:32
Operator : YP/AJ
Sample : PB164790BSD
Misc :
ALS Vial : 13 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164790BSD

Integration File: autoint1.e
Quant Time: Nov 09 01:37:24 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067672.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 17:32
Sample : PB164790BSD
Misc :
ALS Vial : 13 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.272	3.245	3.334	BB	360406	3018558	57.07%	3.413%
2	4.336	4.279	4.358	BV	402060	3676514	69.51%	4.157%
3	6.351	6.292	6.418	BV	407373	4109531	77.69%	4.647%
4	8.144	8.084	8.209	BB	399708	4310746	81.50%	4.875%
5	9.742	9.615	9.797	BB	438895	4685378	88.58%	5.298%
6	11.182	11.147	11.259	BB	431463	5078899	96.02%	5.743%
7	12.489	12.449	12.555	PB	436428	5289322	100.00%	5.981%
8	12.932	12.797	12.980	BB	346414	4324971	81.77%	4.891%
9	13.101	13.030	13.169	BB	424209	5124280	96.88%	5.795%
10	13.686	13.648	13.754	VB	413820	5116690	96.74%	5.786%
11	14.787	14.697	14.854	BB	389415	5054933	95.57%	5.716%
12	15.806	15.717	15.892	BB	365063	4971810	94.00%	5.622%
13	16.755	16.602	16.832	BB	357025	4923078	93.08%	5.567%
14	17.642	17.575	17.697	BB	350200	4936312	93.33%	5.582%
15	18.474	18.390	18.529	BB	335239	4880655	92.27%	5.519%
16	19.254	19.180	19.319	BB	315636	4852955	91.75%	5.488%
17	19.994	19.930	20.055	VB	323717	4714626	89.13%	5.331%
18	20.717	20.637	20.797	BB	265275	4712530	89.10%	5.329%
19	21.601	21.510	21.710	BB	198145	4651504	87.94%	5.260%
			Sum of corrected areas:			88433290		

Aliphatic EPH 102324.M Sat Nov 09 02:12:45 2024

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Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164790BSD	SDG No.:	P4718
Lab Sample ID:	PB164790BSD	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	100
Sample Wt/Vol:	30.03 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048675.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	3.32		0.30	0.67	mg/kg
Aromatic C12-C16	Aromatic C12-C16	6.08		0.34	1.00	mg/kg
Aromatic C16-C21	Aromatic C16-C21	12.8		0.96	1.67	mg/kg
Aromatic C21-C36	Aromatic C21-C36	20.5		2.00	2.66	mg/kg
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	45.3		40 - 140	91%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	35.3		40 - 140	71%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	37.6		40 - 140	75%	SPK: 50

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Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	PB164790BSD	Acq On:	08 Nov 2024 17:32
Client Sample ID:	PB164790BSD	Operator:	YP/AJ
Data file:	FD048675.D	Misc:	
Instrument:	FID_D	ALS Vial:	58
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.092	5.810	8774301	49.797	200	ug/ml
Aromatic C12-C16	5.811	8.415	16174778	91.242	300	ug/ml
Aromatic C16-C21	8.416	12.678	31495336	192.241	500	ug/ml
Aromatic C21-C36	12.679	18.083	47020005	307.898	800	ug/ml
Aromatic EPH	4.092	18.083	103464420	641.177		ug/ml
ortho-Terphenyl (SURR)	11.255	11.255	6405825	37.61		ug/ml
2-Bromonaphthalene (SURR)	7.369	7.369	6877746	45.31		ug/ml
2-Flurobiphenyl (SURR)	8.219	8.219	3464981	35.29		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048675.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 17:32
Operator : YP/AJ
Sample : PB164790BSD
Misc :
ALS Vial : 58 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164790BSD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:07:34 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.369	6877746	45.314 ug/ml
Spiked Amount	50.000		Recovery =	90.63%
6) S	2-Flurobiphenyl (SURR)	8.219	3464981	35.288 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	70.58%
11) S	ortho-Terphenyl (SURR)	11.255	6405825	37.606 ug/ml
Spiked Amount	50.000		Recovery =	75.21%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.191	3959594	22.760 ug/mlm
2) T	Naphthalene (C11.7)	5.709	4792890	26.861 ug/ml
3) T	2-Methylnaphthalene (...	6.756	4740853	26.505 ug/ml
5) T	Acenaphthylene (C15.06)	8.021	5623965	32.029 ug/ml
7) T	Acenaphthene (C15.5)	8.316	5809960	32.757 ug/ml
8) T	Flouorene (C16.55)	9.094	5934035	35.105 ug/ml
9) T	Phenanthrene (C19.36)	10.482	6081312	36.788 ug/ml
10) T	Anthracene (C19.43)	10.558	6151321	38.467 ug/ml
12) T	Fluoranthene (C21.85)	12.287	6271492	38.107 ug/mlm
13) T	Pyrene (C20.8)	12.580	6238203	38.728 ug/ml
14) T	Benzo[a]anthracene (C...	14.450	5902174	40.366 ug/ml
15) T	Chrysene (C27.41)	14.491	5958969	36.226 ug/ml
16) T	benzo[b]fluoranthene ...	15.998	6007655	39.516 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.031	5996900	39.899 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.373	5791779	38.485 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.740	5692040	43.624 ug/ml
20) T	Dibenz[a,h]anthracene...	17.777	5872433	36.086 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.990	5798055	37.873 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048675.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 17:32
Operator : YP/AJ
Sample : PB164790BSD
Misc :
ALS Vial : 58 Sample Multiplier: 1

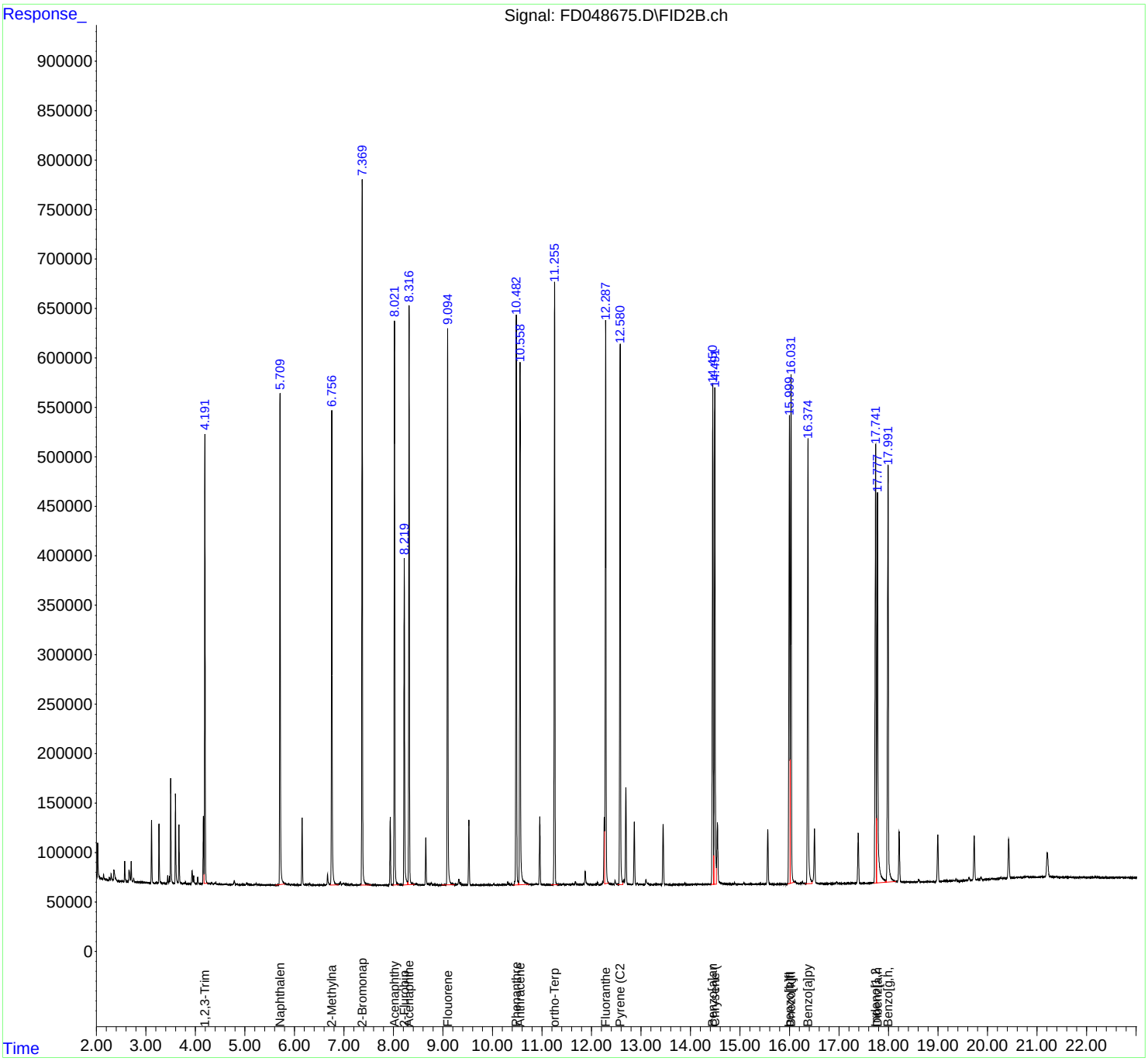
Instrument :
FID_D
ClientSampleId :
PB164790BSD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:07:34 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Instrument :
FID_D
ClientSampleId :
PB164790BSD

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD11082
Data File : FD048675.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 17:32
Sample : PB164790BSD
Misc :
ALS Vial : 58 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.191	4.175	4.245	M	454791	3981411	56.15%	3.312%
2	5.709	5.618	5.808	BV	493060	4792890	67.60%	3.987%
3	6.756	6.724	6.888	VV	473124	4740853	66.86%	3.944%
4	7.369	7.341	7.548	VB	703893	6877746	97.00%	5.721%
5	8.021	7.979	8.111	PV	570400	5623965	79.32%	4.678%
6	8.219	8.188	8.291	PV	328569	3464981	48.87%	2.882%
7	8.316	8.291	8.434	VB	585800	5809960	81.94%	4.833%
8	9.094	8.974	9.237	BV	562469	5934035	83.69%	4.936%
9	10.482	10.415	10.527	PV	574168	6081312	85.77%	5.059%
10	10.558	10.527	10.738	VV	527023	6151321	86.75%	5.117%
11	11.255	11.181	11.327	BV	604759	6405825	90.34%	5.329%
12	12.287	12.174	12.454	BB	573659	7090465	100.00%	5.898%
13	12.580	12.527	12.634	PV	553354	6238203	87.98%	5.189%
14	14.450	14.411	14.469	BV	508199	5902174	83.24%	4.910%
15	14.491	14.469	14.524	VV	499582	5958969	84.04%	4.957%
16	15.998	15.961	16.013	BV	465683	6007655	84.73%	4.998%
17	16.031	16.013	16.098	VV	513275	5996900	84.58%	4.989%
18	16.373	16.314	16.457	BV	452492	5791779	81.68%	4.818%
19	17.740	17.701	17.756	BV	446785	5692040	80.28%	4.735%
20	17.777	17.756	17.950	VV	396284	5872433	82.82%	4.885%
21	17.990	17.950	18.154	VV	422361	5798055	81.77%	4.823%
			Sum of corrected areas:			120212971		

Aromatic EPH 102324.M Sat Nov 09 03:26:16 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	PB164847BSD	SDG No.:	P4718
Lab Sample ID:	PB164847BSD	Matrix:	Water
Analytical Method:	NJEPH	% Solid:	0
Sample Wt/Vol:	1000 Units: mL	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :	SW3510		

Prep Date :	Date Analyzed :	Prep Batch ID
11/09/24 08:38	11/11/24 16:33	PB164847

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	179		1	5.76	30.0	ug/l	FC067696.D
Aliphatic C12-C16	Aliphatic C12-C16	155		1	3.61	20.0	ug/l	FC067696.D
Aliphatic C16-C21	Aliphatic C16-C21	279		1	5.14	30.0	ug/l	FC067696.D
Aliphatic C21-C28	Aliphatic C21-C28	395		1	8.97	40.0	ug/l	FC067696.D
Aliphatic C28-C40	Aliphatic C28-C40	660		1	17.0	60.0	ug/l	FC067696.D
Aromatic C10-C12	Aromatic C10-C12	104		1	3.32	20.0	ug/l	FD048700.D
Aromatic C12-C16	Aromatic C12-C16	191		1	3.69	30.0	ug/l	FD048700.D
Aromatic C16-C21	Aromatic C16-C21	394		1	12.7	50.0	ug/l	FD048700.D
Aromatic C21-C36	Aromatic C21-C36	657		1	25.2	80.0	ug/l	FD048700.D
Total AliphaticEPH	Total AliphaticEPH	1670			40.5	180	ug/l	
Total AromaticEPH	Total AromaticEPH	1350			44.9	180	ug/l	
Total EPH	Total EPH	3010			85.4	360	ug/l	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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

Report of Analysis

Client:	Portal Partners Tri-Venture		Date Collected:		
Project:	Amtrak Sawtooth Bridges 2024		Date Received:		
Client Sample ID:	PB164847BSD		SDG No.:	P4718	
Lab Sample ID:	PB164847BSD		Matrix:	Water	
Analytical Method:	NJEPH		% Solid:	0	
Sample Wt/Vol:	1000	Units: mL	Final Vol:	2000	uL
Soil Aliquot Vol:		uL	Test:	EPH	
Prep Method :	SW3510				

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067696.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	179		5.76	30.0	ug/l
Aliphatic C12-C16	Aliphatic C12-C16	155		3.61	20.0	ug/l
Aliphatic C16-C21	Aliphatic C16-C21	279		5.14	30.0	ug/l
Aliphatic C21-C28	Aliphatic C21-C28	395		8.97	40.0	ug/l
Aliphatic C28-C40	Aliphatic C28-C40	660		17.0	60.0	ug/l
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	45.7		40 - 140	91%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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

Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	PB164847BSD	Acq On:	11 Nov 2024 16:33
Client Sample ID:	PB164847BSD	Operator:	YP/AJ
Data file:	FC067696.D	Misc:	
Instrument:	FID_C	ALS Vial:	13
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.170	6.450	12153536	89.714	300	ug/ml
Aliphatic C12-C16	6.451	9.840	10228578	77.677	200	ug/ml
Aliphatic C16-C21	9.841	13.198	17798092	139.884	300	ug/ml
Aliphatic C21-C28	13.199	16.853	23724061	197.552	400	ug/ml
Aliphatic C28-C40	16.854	21.695	33396175	330.35	600	ug/ml
Aliphatic EPH	3.170	21.695	97300442	835.176		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.932	12.932	4938817	45.73		ug/ml
Aliphatic C9-C28	3.170	16.853	63904267	504.827	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067696.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 16:33
Operator : YP/AJ
Sample : PB164847BSD
Misc :
ALS Vial : 13 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164847BSD

Integration File: autoint1.e
Quant Time: Nov 11 20:45:16 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc	Units
	System Monitoring Compounds				
12) S	1-chlorooctadecane (S...	12.932	4938817	45.735	ug/ml
Spiked Amount	50.000		Recovery =	91.47%	
	Target Compounds				
1) T	n-Nonane (C9)	3.272	3375461	25.055	ug/ml
2) T	n-Decane (C10)	4.336	4134427	30.345	ug/ml
4) T	n-Dodecane (C12)	6.351	4643648	34.285	ug/ml
6) T	n-Tetradecane (C14)	8.143	4895072	37.293	ug/ml
7) T	n-Hexadecane (C16)	9.741	5333506	40.374	ug/ml
8) T	n-Octadecane (C18)	11.182	5822215	44.070	ug/ml
10) T	n-Eicosane (C20)	12.490	6086187	48.235	ug/ml
11) T	n-Heneicosane (C21)	13.101	5889690	47.723	ug/ml
13) T	n-Docosane (C22)	13.687	5941939	48.526	ug/ml
14) T	n-Tetracosane (C24)	14.788	5949354	49.083	ug/ml
15) T	n-Hexacosane (C26)	15.808	5924239	49.760	ug/ml
16) T	n-Octacosane (C28)	16.756	5908529	50.222	ug/ml
17) T	n-Tricontane (C30)	17.642	5876894	48.621	ug/ml
18) T	n-Dotriacontane (C32)	18.473	5775349	48.811	ug/ml
19) T	n-Tetratriacontane (C34)	19.255	5637909	53.834	ug/ml
20) T	n-Hexatriacontane (C36)	19.993	5438372	59.745	ug/ml
21) T	n-Octatriacontane (C38)	20.716	5371599	62.026	ug/ml
22) T	n-Tetracontane (C40)	21.601	5296052	62.299	ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

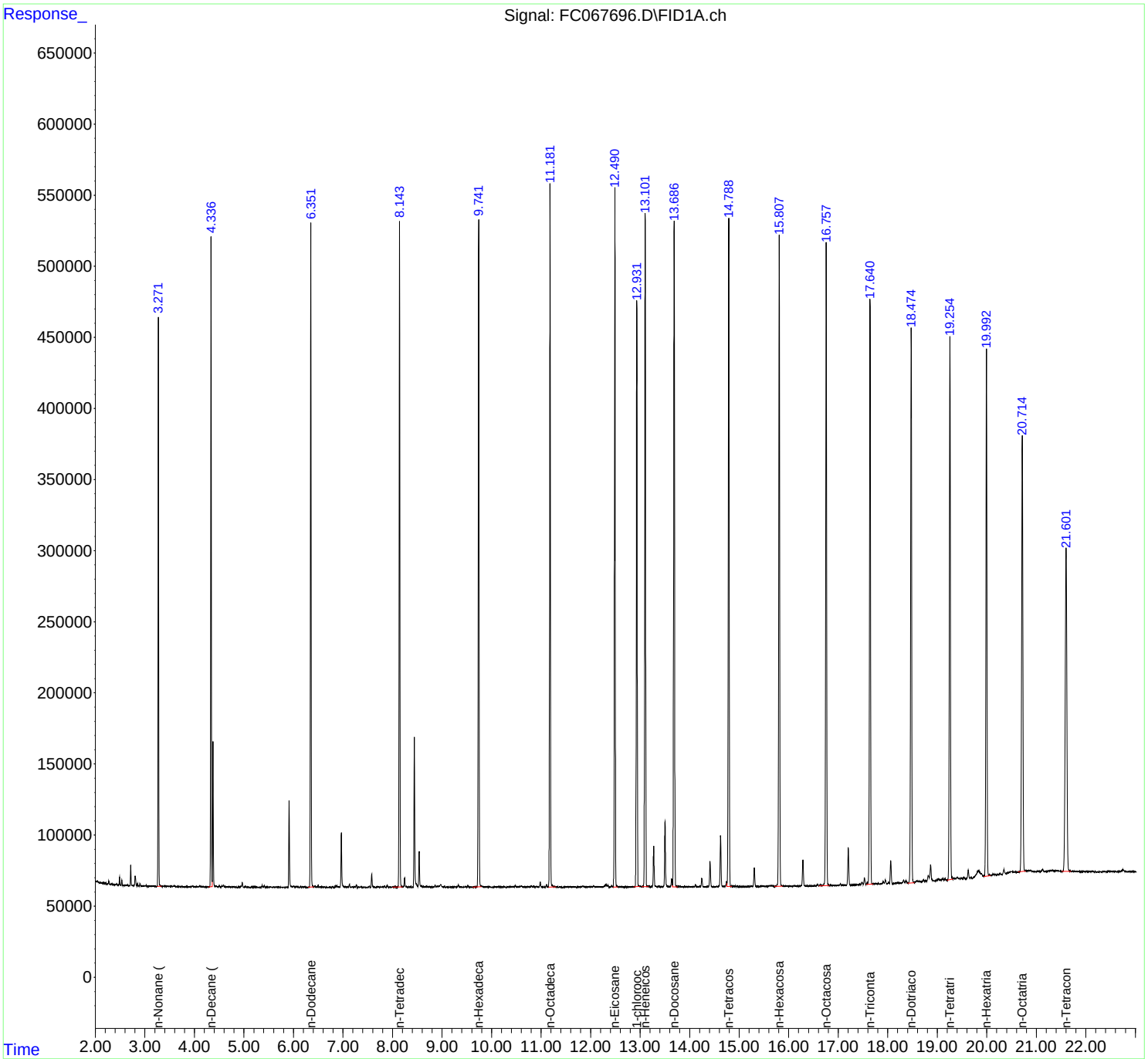
Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067696.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 16:33
Operator : YP/AJ
Sample : PB164847BSD
Misc :
ALS Vial : 13 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
PB164847BSD

Integration File: autoint1.e
Quant Time: Nov 11 20:45:16 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC111124AL\
Data File : FC067696.D
Signal(s) : FID1A.ch
Acq On : 11 Nov 2024 16:33
Sample : PB164847BSD
Misc :
ALS Vial : 13 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.272	3.245	3.338	BB	399869	3375461	55.46%	3.302%
2	4.336	4.280	4.358	BV	459984	4134427	67.93%	4.044%
3	6.351	6.295	6.417	BV	467652	4643648	76.30%	4.542%
4	8.143	8.002	8.207	BB	469431	4895072	80.43%	4.788%
5	9.741	9.625	9.798	BB	468885	5333506	87.63%	5.217%
6	11.182	11.148	11.295	BB	492731	5822215	95.66%	5.695%
7	12.490	12.452	12.552	PB	492802	6086187	100.00%	5.953%
8	12.932	12.863	12.990	BB	410571	4938817	81.15%	4.831%
9	13.101	13.030	13.173	BB	473466	5889690	96.77%	5.761%
10	13.687	13.652	13.752	VB	467342	5941939	97.63%	5.812%
11	14.788	14.753	14.853	VB	470583	5949354	97.75%	5.819%
12	15.808	15.710	15.880	BB	459077	5924239	97.34%	5.794%
13	16.756	16.615	16.827	BB	452658	5908529	97.08%	5.779%
14	17.642	17.562	17.707	PB	405003	5876894	96.56%	5.748%
15	18.473	18.407	18.543	BV	389678	5775349	94.89%	5.649%
16	19.255	19.193	19.320	BV	380343	5637909	92.63%	5.514%
17	19.993	19.942	20.080	VB	370532	5438372	89.36%	5.319%
18	20.716	20.630	20.788	BB	305836	5371599	88.26%	5.254%
19	21.601	21.510	21.707	BB	227054	5296052	87.02%	5.180%

Sum of corrected areas: 102239258

Aliphatic EPH 102324.M Tue Nov 12 01:27:11 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture		Date Collected:		
Project:	Amtrak Sawtooth Bridges 2024		Date Received:		
Client Sample ID:	PB164847BSD		SDG No.:	P4718	
Lab Sample ID:	PB164847BSD		Matrix:	Water	
Analytical Method:	NJEPH		% Solid:	0	
Sample Wt/Vol:	1000	Units: mL	Final Vol:	2000	uL
Soil Aliquot Vol:		uL	Test:	EPH	
Prep Method :	SW3510				

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048700.D	1	11/09/24	11/11/24	PB164847

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	104		3.32	20.0	ug/l
Aromatic C12-C16	Aromatic C12-C16	191		3.69	30.0	ug/l
Aromatic C16-C21	Aromatic C16-C21	394		12.7	50.0	ug/l
Aromatic C21-C36	Aromatic C21-C36	657		25.2	80.0	ug/l
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	47.2		40 - 140	94%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	37.3		40 - 140	75%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	39.5		40 - 140	79%	SPK: 50

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

Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	PB164847BSD	Acq On:	11 Nov 2024 16:33
Client Sample ID:	PB164847BSD	Operator:	YP/AJ
Data file:	FD048700.D	Misc:	
Instrument:	FID_D	ALS Vial:	64
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.090	5.808	9225507	52.357	200	ug/ml
Aromatic C12-C16	5.809	8.414	16957343	95.656	300	ug/ml
Aromatic C16-C21	8.415	12.677	32299299	197.148	500	ug/ml
Aromatic C21-C36	12.678	18.084	50218843	328.844	800	ug/ml
Aromatic EPH	4.090	18.084	108700992	674.006		ug/ml
2-Bromonaphthalene (SURR)	7.369	7.369	7162920	47.19		ug/ml
2-Flurobiphenyl (SURR)	8.218	8.218	3663603	37.31		ug/ml
ortho-Terphenyl (SURR)	11.256	11.256	6726567	39.49		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048700.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 16:33
Operator : YP/AJ
Sample : PB164847BSD
Misc :
ALS Vial : 64 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
PB164847BSD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 11 20:46:52 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.369	7162920	47.193 ug/ml
Spiked Amount	50.000		Recovery =	94.39%
6) S	2-Flurobiphenyl (SURR)	8.218	3663603	37.311 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	74.62%
11) S	ortho-Terphenyl (SURR)	11.256	6726567	39.489 ug/ml
Spiked Amount	50.000		Recovery =	78.98%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.191	4143255	23.816 ug/mlm
2) T	Naphthalene (C11.7)	5.708	5051101	28.308 ug/ml
3) T	2-Methylnaphthalene (...	6.755	4942431	27.632 ug/ml
5) T	Acenaphthylene (C15.06)	8.021	5919725	33.713 ug/ml
7) T	Acenaphthene (C15.5)	8.316	6095187	34.366 ug/ml
8) T	Flouorene (C16.55)	9.095	6276534	37.131 ug/ml
9) T	Phenanthrene (C19.36)	10.483	6388007	38.644 ug/ml
10) T	Anthracene (C19.43)	10.559	6331410	39.594 ug/ml
12) T	Fluoranthene (C21.85)	12.288	6764527	41.103 ug/mlm
13) T	Pyrene (C20.8)	12.581	6588574	40.903 ug/ml
14) T	Benzo[a]anthracene (C...	14.451	6290265	43.021 ug/ml
15) T	Chrysene (C27.41)	14.494	6416266	39.006 ug/ml
16) T	benzo[b]fluoranthene ...	15.999	6366342	41.876 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.033	6569676	43.709 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.375	6143108	40.819 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.743	6165507	47.253 ug/ml
20) T	Dibenz[a,h]anthracene...	17.780	6332908	38.915 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.994	5934771	38.766 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD111124AR\
Data File : FD048700.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 16:33
Operator : YP/AJ
Sample : PB164847BSD
Misc :
ALS Vial : 64 Sample Multiplier: 1

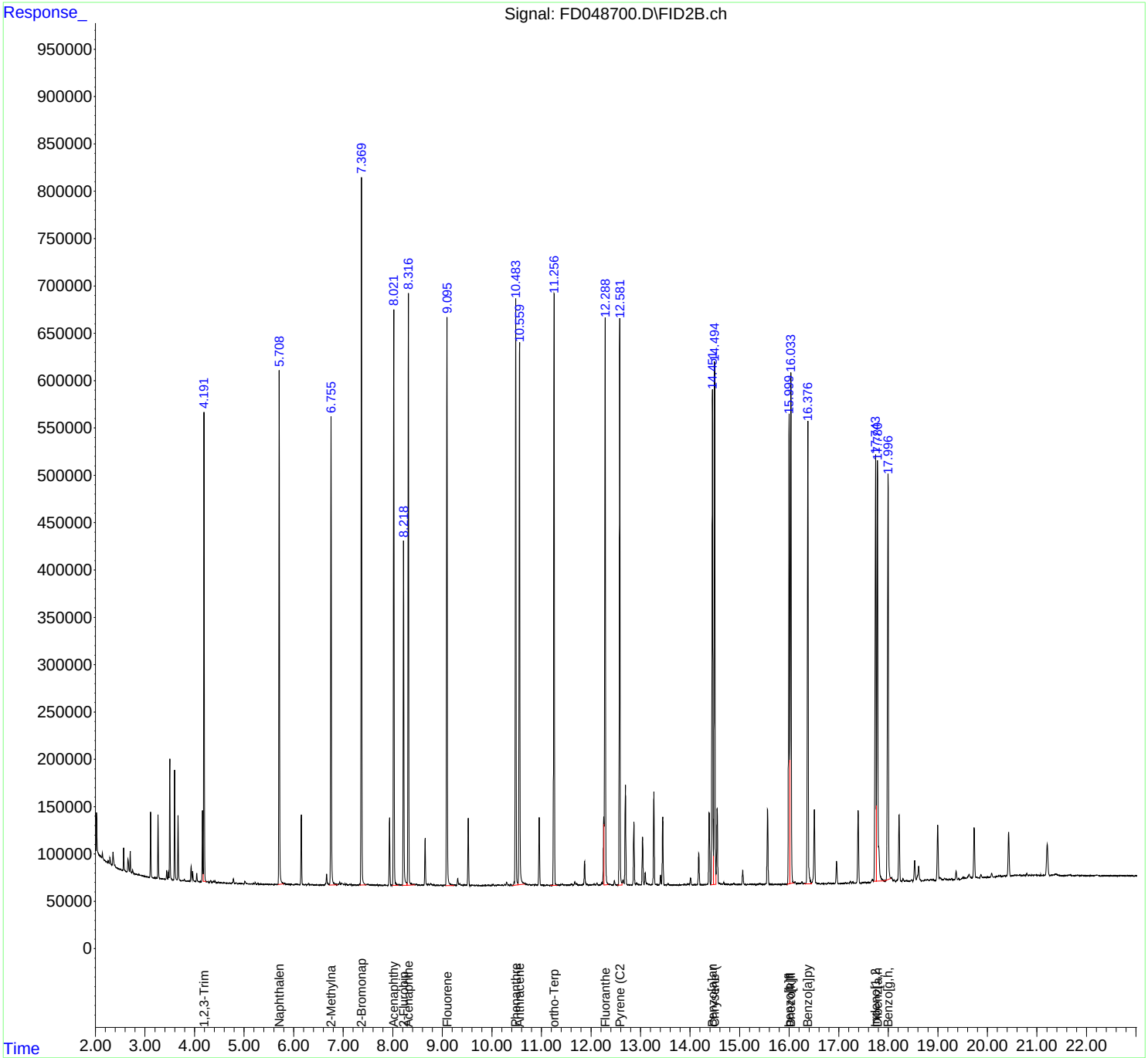
Instrument :
FID_D
ClientSampleId :
PB164847BSD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Integration File: autoint1.e
Quant Time: Nov 11 20:46:52 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Instrument :
FID_D
ClientSampleId :
PB164847BSD

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/12/2024
Supervised By :Ankita Jodhani 11/12/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD11112
Data File : FD048700.D
Signal(s) : FID2B.ch
Acq On : 11 Nov 2024 16:33
Sample : PB164847BSD
Misc :
ALS Vial : 64 Sample Multiplier: 1

Integration File: autoint1.e

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.191	4.174	4.247	M	496695	4174406	58.28%	3.306%
2	5.708	5.681	5.801	PV	536837	5051101	70.52%	4.001%
3	6.755	6.721	6.884	VV	491955	4942431	69.00%	3.915%
4	7.369	7.340	7.468	VV	742749	7162920	100.00%	5.673%
5	8.021	7.986	8.104	VV	605700	5919725	82.64%	4.689%
6	8.218	8.190	8.287	PV	361999	3663603	51.15%	2.902%
7	8.316	8.287	8.451	VV	620712	6095187	85.09%	4.828%
8	9.095	9.063	9.234	VV	598555	6276534	87.63%	4.971%
9	10.483	10.411	10.527	PV	625648	6388007	89.18%	5.060%
10	10.559	10.527	10.666	VV	566848	6331410	88.39%	5.015%
11	11.256	11.184	11.321	BV	629143	6726567	93.91%	5.328%
12	12.288	12.263	12.342	M	598254	6714774	93.74%	5.318%
13	12.581	12.534	12.628	BV	598646	6588574	91.98%	5.219%
14	14.451	14.415	14.470	PV	524902	6290265	87.82%	4.982%
15	14.494	14.470	14.523	VV	554627	6416266	89.58%	5.082%
16	15.999	15.961	16.014	BV	493570	6366342	88.88%	5.042%
17	16.033	16.014	16.097	VV	546563	6569676	91.72%	5.204%
18	16.375	16.308	16.452	BV	483449	6143108	85.76%	4.866%
19	17.743	17.701	17.759	BV	456104	6165507	86.08%	4.883%
20	17.780	17.759	17.924	VV	450605	6332908	88.41%	5.016%
21	17.994	17.924	18.053	PV	425390	5934771	82.85%	4.701%

Sum of corrected areas: 126254081

Aromatic EPH 102324.M Tue Nov 12 03:26:28 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	WB-307-SB01MS	SDG No.:	P4718
Lab Sample ID:	P4718-01MS	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.05 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

Prep Date :	Date Analyzed :	Prep Batch ID
11/08/24 08:47	11/08/24 19:21	PB164790

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units(Dry Weight)	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	10.4		1	0.49	1.28	mg/kg	FC067675.D
Aliphatic C12-C16	Aliphatic C12-C16	28.9	E	1	0.31	0.85	mg/kg	FC067675.D
Aliphatic C16-C21	Aliphatic C16-C21	14.3		1	0.38	1.28	mg/kg	FC067675.D
Aliphatic C21-C28	Aliphatic C21-C28	18.8		1	1.02	1.71	mg/kg	FC067675.D
Aliphatic C28-C40	Aliphatic C28-C40	35.3		1	2.30	2.56	mg/kg	FC067675.D
Aromatic C10-C12	Aromatic C10-C12	7.34		1	0.38	0.85	mg/kg	FD048678.D
Aromatic C12-C16	Aromatic C12-C16	21.2		1	0.44	1.28	mg/kg	FD048678.D
Aromatic C16-C21	Aromatic C16-C21	26.1		1	1.23	2.13	mg/kg	FD048678.D
Aromatic C21-C36	Aromatic C21-C36	41.2		1	2.56	3.41	mg/kg	FD048678.D
Total AliphaticEPH	Total AliphaticEPH	108			4.50	7.68	mg/kg	
Total AromaticEPH	Total AromaticEPH	95.8			4.61	7.67	mg/kg	
Total EPH	Total EPH	204			9.11	15.4	mg/kg	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	WB-307-SB01MS	SDG No.:	P4718
Lab Sample ID:	P4718-01MS	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.05 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067675.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	10.4		0.49	1.28	mg/kg
Aliphatic C12-C16	Aliphatic C12-C16	28.9	E	0.31	0.85	mg/kg
Aliphatic C16-C21	Aliphatic C16-C21	14.3		0.38	1.28	mg/kg
Aliphatic C21-C28	Aliphatic C21-C28	18.8		1.02	1.71	mg/kg
Aliphatic C28-C40	Aliphatic C28-C40	35.3		2.30	2.56	mg/kg
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	35.3		40 - 140	71%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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

Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	P4718-01MS	Acq On:	08 Nov 2024 19:21
Client Sample ID:	WB-307-SB01MS	Operator:	YP/AJ
Data file:	FC067675.D	Misc:	
Instrument:	FID_C	ALS Vial:	16
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.171	6.450	16449699	121.427	300	ug/ml
Aliphatic C12-C16	6.451	9.841	44529266	338.158	200	ug/ml
Aliphatic C16-C21	9.842	13.199	21266139	167.141	300	ug/ml
Aliphatic C21-C28	13.200	16.853	26477947	220.483	400	ug/ml
Aliphatic C28-C40	16.854	21.698	41766596	413.149	600	ug/ml
Aliphatic EPH	3.171	21.698	150489647	1260		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.931	12.931	3816372	35.34		ug/ml
Aliphatic C9-C28	3.171	16.853	108723051	847.209	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067675.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 19:21
Operator : YP/AJ
Sample : P4718-01MS
Misc :
ALS Vial : 16 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB01MS

Integration File: autoint1.e
Quant Time: Nov 09 01:37:56 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
12) S	1-chlorooctadecane (S...	12.931	3816372	35.341 ug/ml
Spiked Amount	50.000		Recovery =	70.68%
	Target Compounds			
1) T	n-Nonane (C9)	3.272	4028331	29.901 ug/ml
2) T	n-Decane (C10)	4.337	4920925	36.118 ug/ml
4) T	n-Dodecane (C12)	6.351	5720765	42.238 ug/ml
6) T	n-Tetradecane (C14)	8.146	9189897	70.013 ug/ml
7) T	n-Hexadecane (C16)	9.742	6678611	50.556 ug/ml
8) T	n-Octadecane (C18)	11.182	6814199	51.578 ug/ml
10) T	n-Eicosane (C20)	12.490	6888680	54.595 ug/ml
11) T	n-Heneicosane (C21)	13.101	6614678	53.597 ug/ml
13) T	n-Docosane (C22)	13.686	6592767	53.841 ug/ml
14) T	n-Tetracosane (C24)	14.787	6512227	53.727 ug/ml
15) T	n-Hexacosane (C26)	15.807	6412721	53.863 ug/ml
16) T	n-Octacosane (C28)	16.756	6354156	54.010 ug/ml
17) T	n-Tricontane (C30)	17.641	6391706	52.880 ug/ml
18) T	n-Dotriacontane (C32)	18.473	6329061	53.491 ug/ml
19) T	n-Tetratriacontane (C34)	19.255	6311830	60.269 ug/ml
20) T	n-Hexatriacontane (C36)	19.993	6147932	67.540 ug/ml
21) T	n-Octatriacontane (C38)	20.717	6182958	71.395 ug/ml
22) T	n-Tetracontane (C40)	21.602	6117535	71.962 ug/ml

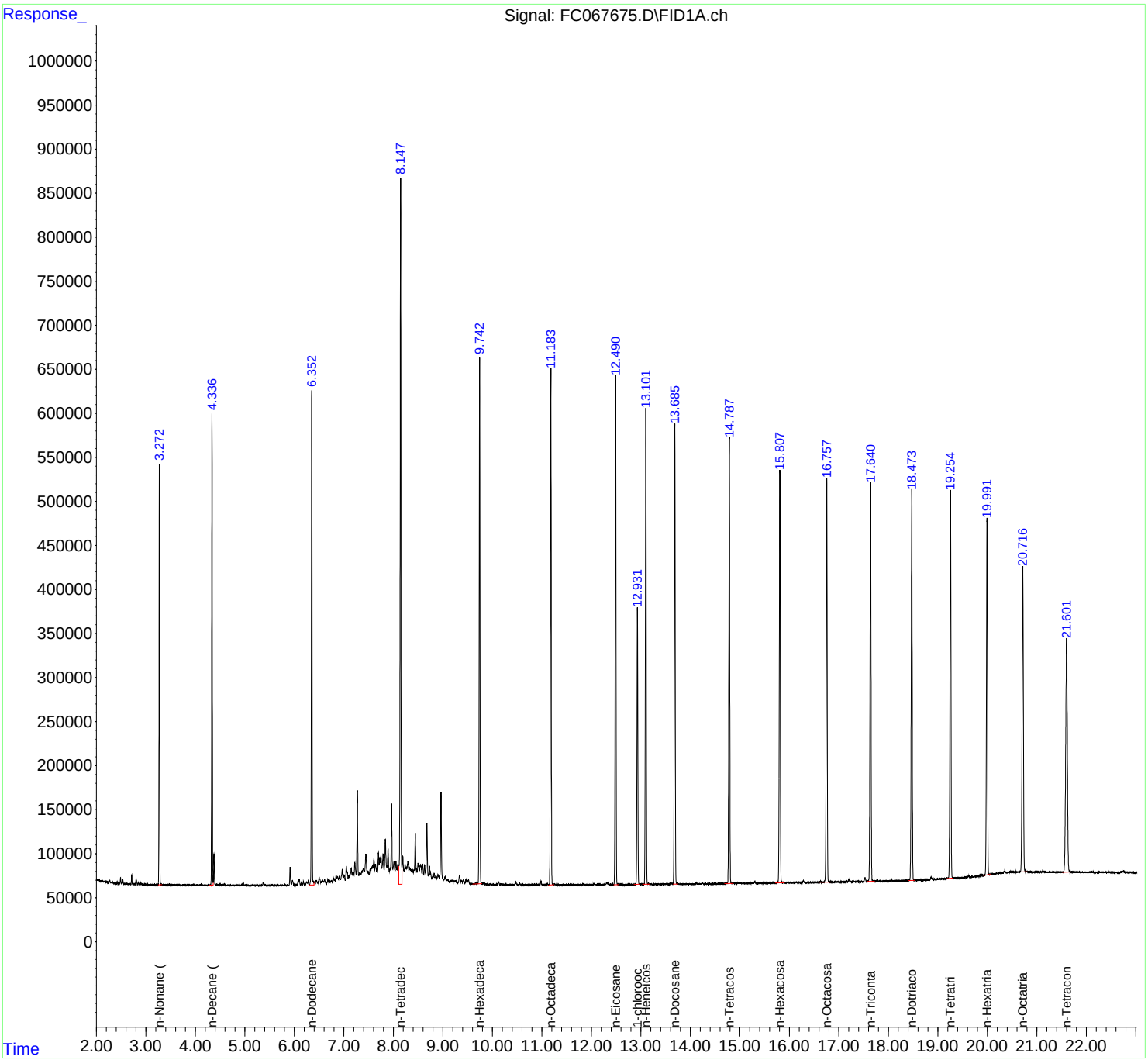
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067675.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 19:21
Operator : YP/AJ
Sample : P4718-01MS
Misc :
ALS Vial : 16 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB01MS

Integration File: autoint1.e
Quant Time: Nov 09 01:37:56 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067675.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 19:21
Sample : P4718-01MS
Misc :
ALS Vial : 16 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.272	3.204	3.357	BV	474677	4042307	43.75%	2.619%
2	3.368	3.357	3.378	VV	225	2151	0.02%	0.001%
3	3.395	3.378	3.438	VV	305	6701	0.07%	0.004%
4	3.471	3.438	3.501	VV	308	5846	0.06%	0.004%
5	3.510	3.501	3.521	PV	130	1265	0.01%	0.001%
6	3.548	3.521	3.565	VV	495	7847	0.08%	0.005%
7	3.590	3.565	3.631	VV	473	8410	0.09%	0.005%
8	3.642	3.631	3.688	VV	435	5804	0.06%	0.004%
9	3.699	3.688	3.745	VV	198	4179	0.05%	0.003%
10	3.763	3.745	3.797	PV	377	4486	0.05%	0.003%
11	3.809	3.797	3.819	VV	156	1124	0.01%	0.001%
12	3.851	3.819	3.904	VV	272	6785	0.07%	0.004%
13	3.938	3.904	3.950	PV	793	9124	0.10%	0.006%
14	3.965	3.950	3.987	VV	1272	12195	0.13%	0.008%
15	3.998	3.987	4.013	VV	154	1656	0.02%	0.001%
16	4.032	4.013	4.058	VV	526	5651	0.06%	0.004%
17	4.112	4.058	4.129	VV	995	16302	0.18%	0.011%
18	4.140	4.129	4.167	VV	285	4851	0.05%	0.003%
19	4.181	4.167	4.215	VV	222	3811	0.04%	0.002%
20	4.249	4.215	4.268	VV	323	4477	0.05%	0.003%
21	4.337	4.268	4.360	VV	535777	4933894	53.40%	3.197%
22	4.376	4.360	4.421	VV	35597	343549	3.72%	0.223%
23	4.435	4.421	4.467	VV	1314	20321	0.22%	0.013%
24	4.503	4.467	4.521	VV	1454	21703	0.23%	0.014%
25	4.533	4.521	4.543	VV	539	6055	0.07%	0.004%

rteres

26	4.558	4.543	4.572	VV	1140	12660	0.14%	0.008%
27	4.588	4.572	4.606	VV	2196	21318	0.23%	0.014%
28	4.618	4.606	4.632	VV	534	5414	0.06%	0.004%
29	4.645	4.632	4.655	VV	256	3044	0.03%	0.002%
30	4.662	4.655	4.691	VV	266	3941	0.04%	0.003%
31	4.707	4.691	4.732	VV	438	7143	0.08%	0.005%
32	4.744	4.732	4.763	VV	270	3547	0.04%	0.002%
33	4.774	4.763	4.783	VV	186	1711	0.02%	0.001%
34	4.804	4.783	4.843	VV	321	4858	0.05%	0.003%
35	4.854	4.843	4.878	PV	108	1288	0.01%	0.001%
36	4.888	4.878	4.906	VV	253	3288	0.04%	0.002%
37	4.967	4.906	4.997	VV	4208	58475	0.63%	0.038%
38	5.021	4.997	5.061	VV	1027	16515	0.18%	0.011%
39	5.074	5.061	5.113	VV	449	5852	0.06%	0.004%
40	5.168	5.113	5.216	PV	325	10960	0.12%	0.007%
41	5.230	5.216	5.248	VV	264	3294	0.04%	0.002%
42	5.257	5.248	5.270	VV	217	2252	0.02%	0.001%
43	5.280	5.270	5.308	VV	161	2754	0.03%	0.002%
44	5.333	5.308	5.346	VV	203	3443	0.04%	0.002%
45	5.369	5.346	5.399	VV	4086	50314	0.54%	0.033%
46	5.410	5.399	5.451	VV	1413	16662	0.18%	0.011%
47	5.466	5.451	5.501	VV	441	4987	0.05%	0.003%
48	5.519	5.501	5.527	VV	247	2006	0.02%	0.001%
49	5.549	5.527	5.590	VV	1590	17927	0.19%	0.012%
50	5.625	5.590	5.638	PV	339	4884	0.05%	0.003%
51	5.663	5.638	5.698	VV	473	9669	0.10%	0.006%
52	5.716	5.698	5.728	VV	298	3367	0.04%	0.002%
53	5.759	5.728	5.790	VV	930	13641	0.15%	0.009%
54	5.810	5.790	5.841	VV	872	12181	0.13%	0.008%
55	5.858	5.841	5.883	VV	874	11107	0.12%	0.007%
56	5.914	5.883	5.938	VV	20965	216282	2.34%	0.140%
57	5.961	5.938	5.992	VV	5875	103685	1.12%	0.067%
58	6.009	5.992	6.050	VV	1952	33419	0.36%	0.022%
59	6.099	6.050	6.123	VV	6934	159475	1.73%	0.103%
60	6.141	6.123	6.164	VV	2648	37245	0.40%	0.024%
61	6.183	6.164	6.210	VV	4751	58434	0.63%	0.038%
62	6.246	6.210	6.262	VV	3582	65876	0.71%	0.043%
63	6.278	6.262	6.300	VV	4691	63133	0.68%	0.041%
64	6.351	6.300	6.396	VV	561082	5749930	62.24%	3.725%
65	6.406	6.396	6.422	VV	4525	50831	0.55%	0.033%
66	6.445	6.422	6.466	VV	5816	112393	1.22%	0.073%
67	6.501	6.466	6.534	VV	9353	225373	2.44%	0.146%
68	6.549	6.534	6.556	VV	4049	50884	0.55%	0.033%
69	6.574	6.556	6.594	VV	5305	101006	1.09%	0.065%

rteres

70	6.611	6.594	6.644	VV	6721	130130	1.41%	0.084%
71	6.679	6.644	6.696	VV	6116	128803	1.39%	0.083%
72	6.708	6.696	6.721	VV	4930	68387	0.74%	0.044%
73	6.747	6.721	6.770	VV	5126	137359	1.49%	0.089%
74	6.792	6.770	6.826	VV	7742	199949	2.16%	0.130%
75	6.844	6.826	6.859	VV	11525	174180	1.89%	0.113%
76	6.871	6.859	6.889	VV	10115	159981	1.73%	0.104%
77	6.908	6.889	6.934	VV	9776	219017	2.37%	0.142%
78	6.968	6.934	6.988	VV	18002	373825	4.05%	0.242%
79	7.006	6.988	7.027	VV	11937	220576	2.39%	0.143%
80	7.051	7.027	7.088	VV	21494	501424	5.43%	0.325%
81	7.101	7.088	7.114	VV	10460	151525	1.64%	0.098%
82	7.149	7.114	7.168	VV	19258	443967	4.81%	0.288%
83	7.184	7.168	7.203	VV	14124	285794	3.09%	0.185%
84	7.223	7.203	7.248	VV	25588	504653	5.46%	0.327%
85	7.272	7.248	7.302	VV	106623	1365398	14.78%	0.885%
86	7.323	7.302	7.347	VV	14160	357252	3.87%	0.231%
87	7.393	7.347	7.417	VV	18859	681196	7.37%	0.441%
88	7.445	7.417	7.475	VV	35706	799750	8.66%	0.518%
89	7.488	7.475	7.510	VV	15835	310627	3.36%	0.201%
90	7.532	7.510	7.544	VV	18978	329119	3.56%	0.213%
91	7.582	7.544	7.592	VV	22184	577753	6.25%	0.374%
92	7.608	7.592	7.624	VV	30480	462419	5.01%	0.300%
93	7.639	7.624	7.677	VV	24267	612097	6.63%	0.397%
94	7.699	7.677	7.713	VV	36815	566126	6.13%	0.367%
95	7.726	7.713	7.738	VV	31496	413633	4.48%	0.268%
96	7.750	7.738	7.767	VV	33596	474911	5.14%	0.308%
97	7.792	7.767	7.812	VV	35658	705270	7.63%	0.457%
98	7.838	7.812	7.866	VV	52343	1025819	11.10%	0.665%
99	7.893	7.866	7.918	VV	41320	824872	8.93%	0.534%
100	7.963	7.918	7.988	VV	92665	1521997	16.47%	0.986%
101	8.012	7.988	8.034	VV	26783	592296	6.41%	0.384%
102	8.052	8.034	8.071	VV	27082	484928	5.25%	0.314%
103	8.094	8.071	8.108	VV	23572	479857	5.19%	0.311%
104	8.146	8.108	8.173	VV	796582	9238962	100.00%	5.986%
105	8.191	8.173	8.216	VV	33023	600463	6.50%	0.389%
106	8.238	8.216	8.271	VV	23788	663702	7.18%	0.430%
107	8.294	8.271	8.314	VV	26853	571389	6.18%	0.370%
108	8.333	8.314	8.372	VV	19697	612109	6.63%	0.397%
109	8.386	8.372	8.401	VV	17129	280037	3.03%	0.181%
110	8.443	8.401	8.479	VV	59526	1216133	13.16%	0.788%
111	8.498	8.479	8.526	VV	25193	579540	6.27%	0.375%
112	8.545	8.526	8.574	VV	22737	574991	6.22%	0.373%

rteres

113	8.591	8.574	8.613	VV	23663	418198	4.53%	0.271%
114	8.631	8.613	8.648	VV	23016	369464	4.00%	0.239%
115	8.677	8.648	8.704	VV	70410	1099243	11.90%	0.712%
116	8.728	8.704	8.745	VV	21516	382894	4.14%	0.248%
117	8.753	8.745	8.776	VV	13727	201548	2.18%	0.131%
118	8.823	8.776	8.842	VV	13808	405602	4.39%	0.263%
119	8.859	8.842	8.878	VV	10772	199747	2.16%	0.129%
120	8.900	8.878	8.923	VV	12169	280283	3.03%	0.182%
121	8.963	8.923	9.022	VV	106081	1591885	17.23%	1.031%
122	9.045	9.022	9.070	VV	9759	213802	2.31%	0.139%
123	9.086	9.070	9.131	VV	6386	205012	2.22%	0.133%
124	9.165	9.131	9.174	VV	4933	117087	1.27%	0.076%
125	9.197	9.174	9.230	VV	5538	159571	1.73%	0.103%
126	9.261	9.230	9.308	VV	4806	187657	2.03%	0.122%
127	9.336	9.308	9.367	VV	10902	236377	2.56%	0.153%
128	9.380	9.367	9.395	VV	4956	71913	0.78%	0.047%
129	9.418	9.395	9.443	VV	6482	132608	1.44%	0.086%
130	9.467	9.443	9.485	VV	6281	108132	1.17%	0.070%
131	9.518	9.485	9.560	VV	6209	156312	1.69%	0.101%
132	9.572	9.560	9.631	VV	1985	64854	0.70%	0.042%
133	9.657	9.631	9.674	VV	2050	44452	0.48%	0.029%
134	9.695	9.674	9.707	VV	2713	44099	0.48%	0.029%
135	9.742	9.707	9.831	VV	590948	6787379	73.46%	4.397%
136	9.840	9.831	9.901	VV	1765	51668	0.56%	0.033%
137	9.907	9.901	9.937	VV	1085	19414	0.21%	0.013%
138	9.965	9.937	9.991	VV	1203	30017	0.32%	0.019%
139	10.014	9.991	10.036	VV	813	18267	0.20%	0.012%
140	10.059	10.036	10.070	VV	821	14213	0.15%	0.009%
141	10.085	10.070	10.098	VV	1174	15556	0.17%	0.010%
142	10.127	10.098	10.154	VV	3246	60730	0.66%	0.039%
143	10.174	10.154	10.195	VV	1086	21195	0.23%	0.014%
144	10.216	10.195	10.238	VV	1088	21121	0.23%	0.014%
145	10.271	10.238	10.307	VV	896	22653	0.25%	0.015%
146	10.339	10.307	10.351	VV	587	11053	0.12%	0.007%
147	10.373	10.351	10.390	VV	659	12090	0.13%	0.008%
148	10.411	10.390	10.441	VV	820	17515	0.19%	0.011%
149	10.477	10.441	10.518	VV	3734	59765	0.65%	0.039%
150	10.550	10.518	10.581	VV	1610	35680	0.39%	0.023%
151	10.604	10.581	10.626	VV	1364	23349	0.25%	0.015%
152	10.655	10.626	10.663	VV	325	6198	0.07%	0.004%
153	10.693	10.663	10.718	VV	419	9824	0.11%	0.006%
154	10.724	10.718	10.749	VV	247	4331	0.05%	0.003%
155	10.759	10.749	10.772	VV	226	2770	0.03%	0.002%

rteres

156	10.803	10.772	10.828	VV	719	13414	0.15%	0.009%
157	10.848	10.828	10.880	VV	980	16115	0.17%	0.010%
158	10.900	10.880	10.921	VV	705	10968	0.12%	0.007%
159	10.932	10.921	10.956	VV	360	5251	0.06%	0.003%
160	10.983	10.956	11.021	VV	4348	53222	0.58%	0.034%
161	11.042	11.021	11.079	PV	138	3305	0.04%	0.002%
162	11.109	11.079	11.138	VV	1684	22255	0.24%	0.014%
163	11.182	11.138	11.254	VV	571856	6833384	73.96%	4.427%
164	11.272	11.254	11.317	VV	969	18147	0.20%	0.012%
165	11.334	11.317	11.353	VV	314	3621	0.04%	0.002%
166	11.404	11.353	11.441	PV	168	5508	0.06%	0.004%
167	11.479	11.441	11.513	VV	382	11764	0.13%	0.008%
168	11.542	11.513	11.554	VV	359	7126	0.08%	0.005%
169	11.568	11.554	11.607	VV	624	10830	0.12%	0.007%
170	11.636	11.607	11.734	VV	547	18841	0.20%	0.012%
171	11.845	11.734	11.871	VV	1308	41169	0.45%	0.027%
172	11.895	11.871	11.915	VV	475	8377	0.09%	0.005%
173	11.936	11.915	11.959	VV	454	7784	0.08%	0.005%
174	11.981	11.959	11.994	VV	517	7330	0.08%	0.005%
175	12.003	11.994	12.028	VV	417	5554	0.06%	0.004%
176	12.064	12.028	12.101	VV	1071	26139	0.28%	0.017%
177	12.130	12.101	12.155	VV	633	15989	0.17%	0.010%
178	12.171	12.155	12.211	VV	545	12343	0.13%	0.008%
179	12.311	12.211	12.330	VV	2535	54965	0.59%	0.036%
180	12.348	12.330	12.388	VV	1827	28899	0.31%	0.019%
181	12.425	12.388	12.448	VV	1335	19797	0.21%	0.013%
182	12.490	12.448	12.568	VV	577030	6898194	74.66%	4.469%
183	12.588	12.568	12.624	VV	444	10961	0.12%	0.007%
184	12.629	12.624	12.718	VV	228	3963	0.04%	0.003%
185	12.742	12.718	12.768	VV	358	6680	0.07%	0.004%
186	12.773	12.768	12.794	VV	302	3268	0.04%	0.002%
187	12.808	12.794	12.823	VV	290	3025	0.03%	0.002%
188	12.847	12.823	12.864	PV	303	5010	0.05%	0.003%
189	12.931	12.864	13.020	VV	314732	3859358	41.77%	2.500%
190	13.035	13.020	13.058	VV	563	8941	0.10%	0.006%
191	13.101	13.058	13.241	VV	540983	6658259	72.07%	4.314%
192	13.259	13.241	13.281	VV	334	5640	0.06%	0.004%
193	13.302	13.281	13.338	VV	429	10718	0.12%	0.007%
194	13.376	13.338	13.424	VV	603	18801	0.20%	0.012%
195	13.475	13.424	13.493	VV	585	12192	0.13%	0.008%
196	13.526	13.493	13.574	VV	1501	27405	0.30%	0.018%
197	13.588	13.574	13.600	VV	341	3910	0.04%	0.003%
198	13.630	13.600	13.647	VV	1326	19157	0.21%	0.012%
199	13.686	13.647	13.761	VV	517790	6613346	71.58%	4.285%

rteres

200	13.770	13.761	13.794	VV	455	5453	0.06%	0.004%
201	13.802	13.794	13.849	VV	192	4587	0.05%	0.003%
202	13.907	13.849	13.960	VV	431	13951	0.15%	0.009%
203	13.994	13.960	14.044	VV	223	8500	0.09%	0.006%
204	14.064	14.044	14.078	PV	178	2361	0.03%	0.002%
205	14.118	14.078	14.154	VV	1271	22229	0.24%	0.014%
206	14.162	14.154	14.168	VV	257	1823	0.02%	0.001%
207	14.185	14.168	14.214	VV	270	5829	0.06%	0.004%
208	14.244	14.214	14.283	VV	1482	22687	0.25%	0.015%
209	14.301	14.283	14.316	VV	335	4501	0.05%	0.003%
210	14.325	14.316	14.349	VV	262	4617	0.05%	0.003%
211	14.361	14.349	14.370	VV	277	3036	0.03%	0.002%
212	14.386	14.370	14.416	VV	281	6401	0.07%	0.004%
213	14.443	14.416	14.474	VV	355	7411	0.08%	0.005%
214	14.489	14.474	14.513	VV	339	5771	0.06%	0.004%
215	14.564	14.513	14.576	VV	389	10516	0.11%	0.007%
216	14.594	14.576	14.610	VV	434	5866	0.06%	0.004%
217	14.639	14.610	14.674	VV	361	9775	0.11%	0.006%
218	14.702	14.674	14.711	VV	350	6620	0.07%	0.004%
219	14.787	14.711	14.902	VV	506535	6544255	70.83%	4.240%
220	14.907	14.902	14.925	VV	304	2910	0.03%	0.002%
221	14.958	14.925	14.971	VV	311	6917	0.07%	0.004%
222	14.977	14.971	14.998	VV	303	3922	0.04%	0.003%
223	15.029	14.998	15.070	VV	298	8757	0.09%	0.006%
224	15.084	15.070	15.094	VV	196	1903	0.02%	0.001%
225	15.101	15.094	15.109	VV	82	662	0.01%	0.000%
226	15.115	15.109	15.121	VV	103	546	0.01%	0.000%
227	15.203	15.121	15.241	VV	365	15380	0.17%	0.010%
228	15.267	15.241	15.277	VV	360	6199	0.07%	0.004%
229	15.303	15.277	15.333	VV	1830	28873	0.31%	0.019%
230	15.347	15.333	15.408	VV	460	10989	0.12%	0.007%
231	15.431	15.408	15.463	PV	251	4155	0.04%	0.003%
232	15.486	15.463	15.507	VV	539	7282	0.08%	0.005%
233	15.520	15.507	15.554	VV	389	7125	0.08%	0.005%
234	15.557	15.554	15.571	VV	181	1261	0.01%	0.001%
235	15.623	15.571	15.639	VV	485	11804	0.13%	0.008%
236	15.671	15.639	15.734	VV	585	19367	0.21%	0.013%
237	15.807	15.734	15.884	VV	469038	6429515	69.59%	4.166%
238	15.893	15.884	15.928	VV	258	5004	0.05%	0.003%
239	15.939	15.928	15.955	VV	170	2648	0.03%	0.002%
240	15.985	15.955	16.063	VV	460	14778	0.16%	0.010%
241	16.109	16.063	16.121	PV	293	6344	0.07%	0.004%
242	16.168	16.121	16.202	VV	383	11836	0.13%	0.008%

rteres

243	16.252	16.202	16.264	VV	310	7324	0.08%	0.005%
244	16.284	16.264	16.314	VV	2267	32337	0.35%	0.021%
245	16.331	16.314	16.390	VV	291	6733	0.07%	0.004%
246	16.402	16.390	16.410	VV	165	1134	0.01%	0.001%
247	16.420	16.410	16.431	VV	113	1218	0.01%	0.001%
248	16.457	16.431	16.481	VV	354	8643	0.09%	0.006%
249	16.492	16.481	16.499	VV	309	2653	0.03%	0.002%
250	16.504	16.499	16.541	VV	247	4010	0.04%	0.003%
251	16.635	16.541	16.684	VV	559	21335	0.23%	0.014%
252	16.756	16.684	16.824	VV	454481	6368919	68.94%	4.126%
253	16.832	16.824	16.881	VV	358	8106	0.09%	0.005%
254	16.938	16.881	16.961	VV	242	8575	0.09%	0.006%
255	16.979	16.961	17.021	VV	490	8961	0.10%	0.006%
256	17.068	17.021	17.102	PV	434	10367	0.11%	0.007%
257	17.158	17.102	17.173	VV	515	10555	0.11%	0.007%
258	17.202	17.173	17.258	VV	2758	41843	0.45%	0.027%
259	17.307	17.258	17.378	PV	436	14393	0.16%	0.009%
260	17.384	17.378	17.406	VV	201	2350	0.03%	0.002%
261	17.429	17.406	17.445	VV	167	2137	0.02%	0.001%
262	17.487	17.445	17.498	VV	302	5227	0.06%	0.003%
263	17.529	17.498	17.566	VV	4727	71348	0.77%	0.046%
264	17.641	17.566	17.725	VV	452520	6411409	69.40%	4.154%
265	17.772	17.725	17.846	VV	995	33373	0.36%	0.022%
266	17.879	17.846	17.891	VV	133	2635	0.03%	0.002%
267	17.966	17.891	17.989	PV	344	10912	0.12%	0.007%
268	18.060	17.989	18.094	VV	2473	41941	0.45%	0.027%
269	18.137	18.094	18.163	VV	876	15303	0.17%	0.010%
270	18.174	18.163	18.237	VV	185	4869	0.05%	0.003%
271	18.247	18.237	18.256	PV	155	949	0.01%	0.001%
272	18.321	18.256	18.338	PV	337	9733	0.11%	0.006%
273	18.354	18.338	18.396	VV	346	6370	0.07%	0.004%
274	18.473	18.396	18.538	PV	447500	6336289	68.58%	4.105%
275	18.559	18.538	18.590	VV	338	6883	0.07%	0.004%
276	18.612	18.590	18.624	VV	314	3927	0.04%	0.003%
277	18.636	18.624	18.678	VV	184	3333	0.04%	0.002%
278	18.771	18.678	18.781	PV	182	8036	0.09%	0.005%
279	18.789	18.781	18.814	VV	117	1904	0.02%	0.001%
280	18.865	18.814	18.905	PV	2855	51049	0.55%	0.033%
281	18.917	18.905	18.927	VV	384	4008	0.04%	0.003%
282	18.961	18.927	18.994	VV	440	13289	0.14%	0.009%
283	19.067	18.994	19.084	VV	505	20911	0.23%	0.014%
284	19.108	19.084	19.133	VV	517	11384	0.12%	0.007%
285	19.255	19.133	19.324	VV	439071	6372995	68.98%	4.129%

rteres

286	19.347	19.324	19.384	VV	1033	29080	0.31%	0.019%
287	19.407	19.384	19.435	VV	726	19158	0.21%	0.012%
288	19.541	19.435	19.561	VV	970	54991	0.60%	0.036%
289	19.624	19.561	19.664	VV	2277	71968	0.78%	0.047%
290	19.679	19.664	19.699	VV	1096	20789	0.23%	0.013%
291	19.812	19.699	19.824	VV	1613	96043	1.04%	0.062%
292	19.855	19.824	19.868	VV	1913	45926	0.50%	0.030%
293	19.893	19.868	19.922	VV	2700	74540	0.81%	0.048%
294	19.993	19.922	20.059	VV	405618	6356122	68.80%	4.118%
295	20.091	20.059	20.101	VV	3097	77069	0.83%	0.050%
296	20.276	20.101	20.310	VV	4075	455434	4.93%	0.295%
297	20.345	20.310	20.375	VV	5557	182257	1.97%	0.118%
298	20.516	20.375	20.560	VV	4663	496497	5.37%	0.322%
299	20.571	20.560	20.585	VV	4471	61973	0.67%	0.040%
300	20.591	20.585	20.606	VV	4213	52660	0.57%	0.034%
301	20.717	20.606	20.902	VV	346920	6882570	74.50%	4.459%
302	20.923	20.902	20.944	VV	3264	80647	0.87%	0.052%
303	20.953	20.944	20.974	VV	3266	57426	0.62%	0.037%
304	21.019	20.974	21.078	VV	3292	195017	2.11%	0.126%
305	21.124	21.078	21.229	VV	3832	261629	2.83%	0.170%
306	21.245	21.229	21.261	VV	2305	43633	0.47%	0.028%
307	21.299	21.261	21.311	VV	2245	66819	0.72%	0.043%
308	21.331	21.311	21.340	VV	2273	37759	0.41%	0.024%
309	21.352	21.340	21.381	VV	2145	49986	0.54%	0.032%
310	21.395	21.381	21.412	VV	2055	36933	0.40%	0.024%
311	21.421	21.412	21.443	VV	1932	34817	0.38%	0.023%
312	21.454	21.443	21.478	VV	1851	37337	0.40%	0.024%
313	21.502	21.478	21.529	VV	1676	49242	0.53%	0.032%
314	21.601	21.529	21.736	VV	264952	6291016	68.09%	4.076%

Sum of corrected areas: 154349005

Aliphatic EPH 102324.M Sat Nov 09 02:15:09 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	WB-307-SB01MS	SDG No.:	P4718
Lab Sample ID:	P4718-01MS	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.05 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048678.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	7.34		0.38	0.85	mg/kg
Aromatic C12-C16	Aromatic C12-C16	21.2		0.44	1.28	mg/kg
Aromatic C16-C21	Aromatic C16-C21	26.1		1.23	2.13	mg/kg
Aromatic C21-C36	Aromatic C21-C36	41.2		2.56	3.41	mg/kg
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	59.5		40 - 140	119%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	53.8		40 - 140	108%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	34.1		40 - 140	68%	SPK: 50

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

Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	P4718-01MS	Acq On:	08 Nov 2024 19:21
Client Sample ID:	WB-307-SB01MS	Operator:	YP/AJ
Data file:	FD048678.D	Misc:	
Instrument:	FID_D	ALS Vial:	61
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.092	5.810	15149183	85.976	200	ug/ml
Aromatic C12-C16	5.811	8.415	44049972	248.486	300	ug/ml
Aromatic C16-C21	8.416	12.678	50121550	305.932	500	ug/ml
Aromatic C21-C36	12.679	18.083	73741714	482.877	800	ug/ml
Aromatic EPH	4.092	18.083	183062419	1120		ug/ml
ortho-Terphenyl (SURR)	11.254	11.254	5816816	34.15		ug/ml
2-Bromonaphthalene (SURR)	7.370	7.370	9027188	59.48		ug/ml
2-Flurobiphenyl (SURR)	8.220	8.220	5282948	53.8		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048678.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 19:21
Operator : YP/AJ
Sample : P4718-01MS
Misc :
ALS Vial : 61 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SB01MS

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:08:05 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.370	9027188	59.476 ug/ml
Spiked Amount	50.000		Recovery =	118.95%
6) S	2-Flurobiphenyl (SURR)	8.220	5282948	53.802 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	107.60%
11) S	ortho-Terphenyl (SURR)	11.254	5816816	34.148 ug/mlm
Spiked Amount	50.000		Recovery =	68.30%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.192	6498263	37.352 ug/mlm
2) T	Naphthalene (C11.7)	5.710	7326787	41.062 ug/ml
3) T	2-Methylnaphthalene (...	6.757	7157942	40.019 ug/ml
5) T	Acenaphthylene (C15.06)	8.023	8244470	46.953 ug/ml
7) T	Acenaphthene (C15.5)	8.319	8808345	49.663 ug/ml
8) T	Flouorene (C16.55)	9.097	8677332	51.334 ug/ml
9) T	Phenanthrene (C19.36)	10.484	8717052	52.733 ug/ml
10) T	Anthracene (C19.43)	10.559	8688054	54.331 ug/ml
12) T	Fluoranthene (C21.85)	12.291	8702831	52.880 ug/mlm
13) T	Pyrene (C20.8)	12.582	8665077	53.794 ug/ml
14) T	Benzo[a]anthracene (C...	14.452	8120307	55.537 ug/mlm
15) T	Chrysene (C27.41)	14.495	8113083	49.322 ug/ml
16) T	benzo[b]fluoranthene ...	16.000	8271984	54.411 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.035	8054797	53.590 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.376	7909563	52.557 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.743	8260670	63.311 ug/ml
20) T	Dibenz[a,h]anthracene...	17.780	7803439	47.952 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.995	8015248	52.356 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048678.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 19:21
Operator : YP/AJ
Sample : P4718-01MS
Misc :
ALS Vial : 61 Sample Multiplier: 1

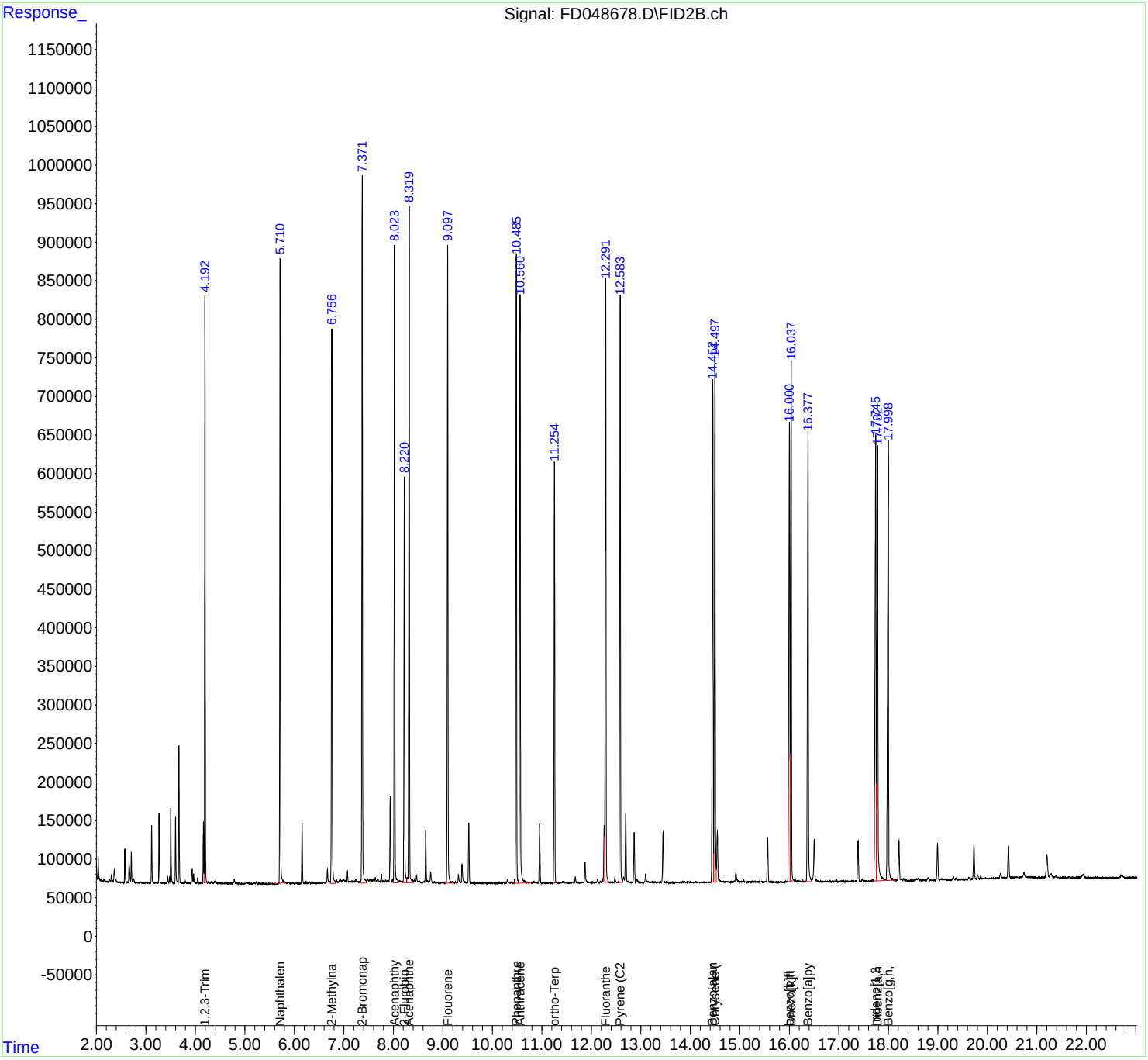
Instrument :
FID_D
ClientSampleId :
WB-307-SB01MS

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:08:05 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Instrument :
FID_D
ClientSampleId :
WB-307-SB01MS

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD11082
Data File : FD048678.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 19:21
Sample : P4718-01MS
Misc :
ALS Vial : 61 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.121	4.105	4.135	PV	191	2794	0.03%	0.001%
2	4.163	4.135	4.176	VV	79761	696858	7.81%	0.369%
3	4.193	4.176	4.251	VV	761559	6537071	73.24%	3.460%
4	4.270	4.251	4.301	VV	1752	30115	0.34%	0.016%
5	4.330	4.301	4.370	VV	2854	46572	0.52%	0.025%
6	4.384	4.370	4.398	VV	2163	22183	0.25%	0.012%
7	4.414	4.398	4.459	VV	3311	40025	0.45%	0.021%
8	4.468	4.459	4.477	VV	299	2224	0.02%	0.001%
9	4.489	4.477	4.516	VV	987	13706	0.15%	0.007%
10	4.527	4.516	4.569	VV	833	9732	0.11%	0.005%
11	4.600	4.569	4.652	PV	707	16026	0.18%	0.008%
12	4.657	4.652	4.688	VV	335	2717	0.03%	0.001%
13	4.703	4.688	4.740	VV	566	8837	0.10%	0.005%
14	4.786	4.740	4.825	VV	6020	89621	1.00%	0.047%
15	4.842	4.825	4.862	VV	1442	16525	0.19%	0.009%
16	4.902	4.870	4.922	VV	406	7849	0.09%	0.004%
17	4.929	4.922	4.939	VV	217	1520	0.02%	0.001%
18	4.953	4.939	4.966	VV	335	3069	0.03%	0.002%
19	4.974	4.966	4.989	VV	402	3525	0.04%	0.002%
20	4.992	4.989	4.998	VV	270	1145	0.01%	0.001%
21	5.032	4.998	5.062	VV	2140	35406	0.40%	0.019%
22	5.066	5.062	5.070	VV	664	3289	0.04%	0.002%
23	5.074	5.070	5.089	VV	747	6427	0.07%	0.003%
24	5.097	5.089	5.115	VV	520	5591	0.06%	0.003%
25	5.117	5.115	5.128	VV	361	2446	0.03%	0.001%
26	5.130	5.128	5.137	VV	332	1349	0.02%	0.001%
27	5.146	5.137	5.152	VV	331	2790	0.03%	0.001%
28	5.157	5.152	5.169	VV	400	2919	0.03%	0.002%
29	5.189	5.169	5.210	VV	1521	19232	0.22%	0.010%
30	5.227	5.210	5.253	VV	2219	25995	0.29%	0.014%
31	5.282	5.253	5.325	VV	695	16557	0.19%	0.009%
32	5.360	5.325	5.412	VV	614	15404	0.17%	0.008%
33	5.428	5.412	5.432	PV	204	1524	0.02%	0.001%
34	5.438	5.432	5.455	VV	225	1528	0.02%	0.001%
35	5.472	5.455	5.497	VV	446	6700	0.08%	0.004%
36	5.520	5.497	5.534	VV	442	5513	0.06%	0.003%

Instrument :
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ClientSampleId :
WB-307-SB01MS

Manual IntegrationsAPPROVED

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rteres

37	5.537	5.534	5.546	VV	322	2098	0.02%	0.001%
38	5.562	5.546	5.578	VV	370	4538		
39	5.610	5.589	5.642	VV	195	3385		
40	5.656	5.642	5.665	VV	244	2168		
41	5.710	5.665	5.808	VV	810216	7432210	83	
42	5.822	5.808	5.854	VV	2149	39161		
43	5.889	5.854	5.917	VV	2006	47548	0.53%	0.025%
44	5.938	5.917	5.945	VV	996	12150	0.14%	0.006%
45	5.950	5.945	5.961	VV	910	7013	0.08%	0.004%
46	5.980	5.961	6.012	VV	857	17831	0.20%	0.009%
47	6.045	6.012	6.058	VV	1220	23165	0.26%	0.012%
48	6.073	6.058	6.095	VV	1012	15243	0.17%	0.008%
49	6.122	6.095	6.130	VV	1011	13179	0.15%	0.007%
50	6.156	6.130	6.190	VV	78439	793435	8.89%	0.420%
51	6.200	6.190	6.215	VV	1118	12591	0.14%	0.007%
52	6.239	6.215	6.259	VV	1954	31709	0.36%	0.017%
53	6.305	6.259	6.326	VV	2827	56508	0.63%	0.030%
54	6.336	6.326	6.358	VV	987	16146	0.18%	0.009%
55	6.376	6.358	6.390	VV	1582	22090	0.25%	0.012%
56	6.400	6.390	6.431	VV	1085	19058	0.21%	0.010%
57	6.472	6.431	6.507	VV	1283	34682	0.39%	0.018%
58	6.525	6.507	6.531	VV	1152	12318	0.14%	0.007%
59	6.543	6.531	6.570	VV	1112	20658	0.23%	0.011%
60	6.593	6.570	6.613	VV	2032	32905	0.37%	0.017%
61	6.668	6.613	6.701	VV	18753	278303	3.12%	0.147%
62	6.708	6.701	6.725	VV	2860	35326	0.40%	0.019%
63	6.757	6.725	6.827	VV	718863	7191555	80.57%	3.807%
64	6.852	6.827	6.889	VV	4657	116090	1.30%	0.061%
65	6.908	6.889	6.916	VV	3822	52099	0.58%	0.028%
66	6.931	6.916	6.955	VV	6156	101525	1.14%	0.054%
67	6.975	6.955	6.980	VV	4761	59668	0.67%	0.032%
68	7.005	6.980	7.023	VV	5193	113046	1.27%	0.060%
69	7.039	7.023	7.053	VV	3816	59753	0.67%	0.032%
70	7.073	7.053	7.095	VV	16287	190500	2.13%	0.101%
71	7.126	7.095	7.146	VV	3048	82426	0.92%	0.044%
72	7.160	7.146	7.175	VV	3406	54610	0.61%	0.029%
73	7.194	7.175	7.210	VV	3289	61240	0.69%	0.032%
74	7.242	7.210	7.268	VV	5758	130116	1.46%	0.069%
75	7.281	7.268	7.312	VV	2853	65441	0.73%	0.035%
76	7.332	7.312	7.344	VV	4623	67530	0.76%	0.036%
77	7.371	7.344	7.421	VV	917343	8925878	100.00%	4.725%
78	7.429	7.421	7.465	VV	5640	115545	1.29%	0.061%
79	7.482	7.465	7.509	VV	6111	120657	1.35%	0.064%
80	7.525	7.509	7.541	VV	5736	91300	1.02%	0.048%
81	7.550	7.541	7.567	VV	4775	62122	0.70%	0.033%
82	7.589	7.567	7.611	VV	5157	102666	1.15%	0.054%
83	7.635	7.611	7.654	VV	8170	132447	1.48%	0.070%
84	7.658	7.654	7.667	VV	3336	24879	0.28%	0.013%
85	7.669	7.667	7.672	VV	3391	10645	0.12%	0.006%
86	7.689	7.672	7.712	VV	5950	95881	1.07%	0.051%
87	7.722	7.712	7.736	VV	3077	42061	0.47%	0.022%
88	7.758	7.736	7.780	VV	12586	168129	1.88%	0.089%
89	7.795	7.780	7.823	VV	4188	80919	0.91%	0.043%

Instrument :
FID_D
ClientSampleId :
WB-307-SB01MS

rteres

Manual IntegrationsAPPROVED

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Supervised By :Ankita Jodhani 11/11/2024

90	7.842	7.823	7.858	VV	4674	72905	0.82%	0.039%
91	7.902	7.858	7.911	VV	3588	103759		
92	7.937	7.911	7.967	VV	114137	1199599	13	
93	7.984	7.967	7.996	VV	4566	65580		
94	8.024	7.996	8.067	VV	828156	8225520	92	
95	8.073	8.067	8.104	VV	5999	101100		
96	8.109	8.104	8.116	VV	3311	24451	0.27%	0.013%
97	8.130	8.116	8.150	VV	4036	66670	0.75%	0.035%
98	8.166	8.150	8.192	VV	3140	69347	0.78%	0.037%
99	8.221	8.192	8.271	VV	526767	5344652	59.88%	2.829%
100	8.283	8.271	8.291	VV	7803	84437	0.95%	0.045%
101	8.319	8.291	8.374	VV	875803	8753867	98.07%	4.634%
102	8.380	8.374	8.407	VV	4688	78338	0.88%	0.041%
103	8.425	8.407	8.447	VV	4370	81866	0.92%	0.043%
104	8.468	8.447	8.504	VV	10719	171917	1.93%	0.091%
105	8.523	8.504	8.562	VV	3420	82491	0.92%	0.044%
106	8.583	8.562	8.598	VV	2082	38662	0.43%	0.020%
107	8.654	8.598	8.709	VV	69524	811839	9.10%	0.430%
108	8.726	8.709	8.733	VV	3435	42292	0.47%	0.022%
109	8.753	8.733	8.791	VV	15554	226299	2.54%	0.120%
110	8.804	8.791	8.819	VV	2232	30609	0.34%	0.016%
111	8.837	8.819	8.855	VV	1815	32383	0.36%	0.017%
112	8.890	8.855	8.921	VV	1536	41582	0.47%	0.022%
113	8.940	8.921	8.955	VV	1226	19974	0.22%	0.011%
114	8.971	8.955	9.001	VV	1238	28471	0.32%	0.015%
115	9.005	9.001	9.010	VV	783	4029	0.05%	0.002%
116	9.032	9.010	9.041	VV	1118	16810	0.19%	0.009%
117	9.053	9.041	9.067	VV	960	13482	0.15%	0.007%
118	9.097	9.067	9.179	VV	826364	8681396	97.26%	4.595%
119	9.184	9.179	9.232	VV	2014	48010	0.54%	0.025%
120	9.254	9.232	9.292	VV	1851	39640	0.44%	0.021%
121	9.315	9.292	9.345	VV	11137	153008	1.71%	0.081%
122	9.354	9.345	9.367	VV	2056	22232	0.25%	0.012%
123	9.386	9.367	9.462	VV	24762	378937	4.25%	0.201%
124	9.471	9.462	9.495	VV	1431	22230	0.25%	0.012%
125	9.524	9.495	9.585	VV	78611	860681	9.64%	0.456%
126	9.625	9.585	9.642	VV	815	22977	0.26%	0.012%
127	9.646	9.642	9.651	VV	579	2690	0.03%	0.001%
128	9.655	9.651	9.683	VV	650	7722	0.09%	0.004%
129	9.695	9.683	9.707	VV	620	5730	0.06%	0.003%
130	9.710	9.707	9.716	VV	457	2101	0.02%	0.001%
131	9.743	9.716	9.758	VV	723	8888	0.10%	0.005%
132	9.787	9.758	9.794	VV	476	7550	0.08%	0.004%
133	9.801	9.794	9.818	VV	600	6443	0.07%	0.003%
134	9.839	9.818	9.862	VV	748	13076	0.15%	0.007%
135	9.870	9.862	9.883	VV	566	5211	0.06%	0.003%
136	9.895	9.883	9.900	VV	549	4294	0.05%	0.002%
137	9.915	9.900	9.932	VV	797	9827	0.11%	0.005%
138	9.946	9.932	9.972	VV	728	12536	0.14%	0.007%
139	9.983	9.972	9.997	VV	566	7276	0.08%	0.004%
140	10.006	9.997	10.014	VV	620	5070	0.06%	0.003%
141	10.026	10.014	10.070	VV	1294	19058	0.21%	0.010%

Instrument :
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ClientSampleId :
WB-307-SB01MS

Manual IntegrationsAPPROVED

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rteres

142	10.113	10.088	10.118	PV	827	8576	0.10%	0.005%
143	10.139	10.118	10.173	VV	1006	23911		
144	10.196	10.173	10.218	VV	912	19817		
145	10.224	10.218	10.245	VV	1019	13502		
146	10.259	10.245	10.287	VV	1172	20348		
147	10.304	10.287	10.358	VV	5229	88040		
148	10.384	10.358	10.412	VV	1654	28207	0.32%	0.015%
149	10.452	10.412	10.456	VV	5713	47597	0.53%	0.025%
150	10.485	10.456	10.530	VV	816874	8683357	97.28%	4.596%
151	10.560	10.530	10.669	VV	762318	8676791	97.21%	4.593%
152	10.675	10.669	10.704	VV	2334	36780	0.41%	0.019%
153	10.710	10.704	10.734	VV	1400	21455	0.24%	0.011%
154	10.763	10.734	10.781	VV	1251	26847	0.30%	0.014%
155	10.785	10.781	10.819	VV	779	14999	0.17%	0.008%
156	10.836	10.819	10.871	VV	1604	36321	0.41%	0.019%
157	10.890	10.871	10.919	VV	1322	26830	0.30%	0.014%
158	10.956	10.919	10.991	VV	76897	851616	9.54%	0.451%
159	10.998	10.991	11.017	VV	587	7884	0.09%	0.004%
160	11.039	11.017	11.088	VV	1236	23750	0.27%	0.013%
161	11.111	11.088	11.130	VV	874	12468	0.14%	0.007%
162	11.149	11.130	11.174	VV	682	11749	0.13%	0.006%
163	11.180	11.174	11.218	VV	341	4091	0.05%	0.002%
164	11.254	11.218	11.333	PV	544276	5852749	65.57%	3.098%
165	11.345	11.333	11.362	VV	904	11844	0.13%	0.006%
166	11.383	11.362	11.389	VV	877	10625	0.12%	0.006%
167	11.425	11.389	11.446	VV	2073	41254	0.46%	0.022%
168	11.454	11.446	11.470	VV	972	11833	0.13%	0.006%
169	11.489	11.470	11.527	VV	889	22806	0.26%	0.012%
170	11.532	11.527	11.540	VV	345	2011	0.02%	0.001%
171	11.544	11.540	11.547	VV	301	1153	0.01%	0.001%
172	11.552	11.547	11.567	VV	364	2945	0.03%	0.002%
173	11.613	11.567	11.635	VV	1343	29095	0.33%	0.015%
174	11.644	11.635	11.648	VV	759	5416	0.06%	0.003%
175	11.676	11.648	11.700	VV	8149	102036	1.14%	0.054%
176	11.710	11.700	11.741	VV	1455	20306	0.23%	0.011%
177	11.758	11.741	11.765	VV	676	7701	0.09%	0.004%
178	11.773	11.765	11.789	VV	743	8749	0.10%	0.005%
179	11.837	11.789	11.850	VV	1298	30750	0.34%	0.016%
180	11.872	11.850	11.939	VV	26910	366876	4.11%	0.194%
181	11.947	11.939	11.983	VV	1064	22636	0.25%	0.012%
182	11.988	11.983	12.009	VV	844	10547	0.12%	0.006%
183	12.042	12.009	12.069	VV	818	22696	0.25%	0.012%
184	12.093	12.069	12.104	VV	1037	18637	0.21%	0.010%
185	12.124	12.104	12.152	VV	4380	59074	0.66%	0.031%
186	12.180	12.152	12.191	VV	1614	25304	0.28%	0.013%
187	12.197	12.191	12.209	VV	1455	14065	0.16%	0.007%
188	12.223	12.209	12.234	VV	4436	47501	0.53%	0.025%
189	12.258	12.234	12.265	VV	74662	725724	8.13%	0.384%
190	12.290	12.265	12.374	VV	780243	8845158	99.10%	4.682%
191	12.391	12.374	12.414	VV	1022	20656	0.23%	0.011%
192	12.423	12.414	12.429	VV	887	7186	0.08%	0.004%
193	12.435	12.429	12.454	VV	855	11168	0.13%	0.006%
194	12.475	12.454	12.547	VV	6639	116675	1.31%	0.062%

Instrument :
FID_D
ClientSampleId :
WB-307-SB01MS

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

					rteres			
195	12.583	12.547	12.631	VV	763654	8699647	97.47%	4.605%
196	12.650	12.631	12.669	VV	7781	125251		
197	12.695	12.669	12.728	VV	90889	1075310	12	
198	12.741	12.728	12.769	VV	1871	32463		
199	12.773	12.769	12.817	VV	905	22282		
200	12.865	12.817	12.895	VV	65456	819147		
201	12.922	12.895	12.974	VV	4833	97966	1.10%	0.052%
202	12.979	12.974	12.984	VV	857	4742	0.05%	0.003%
203	12.994	12.984	13.036	VV	1022	21236	0.24%	0.011%
204	13.059	13.036	13.066	VV	800	12537	0.14%	0.007%
205	13.096	13.066	13.171	VV	11505	208391	2.33%	0.110%
206	13.211	13.171	13.254	VV	1352	45999	0.52%	0.024%
207	13.273	13.254	13.289	VV	1010	17795	0.20%	0.009%
208	13.295	13.289	13.301	VV	891	5921	0.07%	0.003%
209	13.320	13.301	13.339	VV	1187	19425	0.22%	0.010%
210	13.351	13.339	13.371	VV	1026	16582	0.19%	0.009%
211	13.395	13.371	13.415	VV	1316	24548	0.28%	0.013%
212	13.448	13.415	13.500	VV	65174	817804	9.16%	0.433%
213	13.506	13.500	13.542	VV	709	13643	0.15%	0.007%
214	13.552	13.542	13.577	VV	384	6672	0.07%	0.004%
215	13.582	13.577	13.630	VV	354	7243	0.08%	0.004%
216	13.641	13.630	13.655	VV	292	3773	0.04%	0.002%
217	13.662	13.655	13.675	VV	420	3255	0.04%	0.002%
218	13.679	13.675	13.695	VV	373	3349	0.04%	0.002%
219	13.710	13.695	13.729	VV	500	6265	0.07%	0.003%
220	13.745	13.729	13.765	VV	411	7462	0.08%	0.004%
221	13.782	13.765	13.790	VV	539	5834	0.07%	0.003%
222	13.796	13.790	13.829	VV	470	6615	0.07%	0.004%
223	13.845	13.829	13.861	VV	909	13429	0.15%	0.007%
224	13.883	13.861	13.904	VV	1498	27232	0.31%	0.014%
225	13.924	13.904	13.950	VV	794	16402	0.18%	0.009%
226	13.973	13.950	13.989	VV	1434	18311	0.21%	0.010%
227	14.008	13.989	14.029	VV	818	14430	0.16%	0.008%
228	14.034	14.029	14.038	VV	582	2899	0.03%	0.002%
229	14.040	14.038	14.066	VV	590	6562	0.07%	0.003%
230	14.101	14.066	14.148	VV	954	29622	0.33%	0.016%
231	14.170	14.148	14.194	VV	978	18430	0.21%	0.010%
232	14.201	14.194	14.204	VV	537	2965	0.03%	0.002%
233	14.213	14.204	14.236	VV	598	7464	0.08%	0.004%
234	14.251	14.236	14.266	VV	359	4715	0.05%	0.002%
235	14.285	14.266	14.289	VV	483	4984	0.06%	0.003%
236	14.324	14.289	14.338	VV	756	16392	0.18%	0.009%
237	14.355	14.338	14.373	VV	835	12204	0.14%	0.006%
238	14.392	14.373	14.407	VV	674	10014	0.11%	0.005%
239	14.453	14.407	14.471	VV	651187	8155391	91.37%	4.317%
240	14.497	14.471	14.524	VV	680980	8131782	91.10%	4.304%
241	14.545	14.524	14.575	VV	66491	913549	10.23%	0.484%
242	14.587	14.575	14.630	VV	4036	81887	0.92%	0.043%
243	14.638	14.630	14.695	VV	1440	41691	0.47%	0.022%
244	14.702	14.695	14.707	VV	972	6376	0.07%	0.003%
245	14.719	14.707	14.737	VV	1024	16944	0.19%	0.009%
246	14.741	14.737	14.754	VV	935	8245	0.09%	0.004%

Instrument :
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WB-307-SB01MS

Manual IntegrationsAPPROVED

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Supervised By :Ankita Jodhani 11/11/2024

rteres

247	14.757	14.754	14.766	VV	825	5584	0.06%	0.003%
248	14.778	14.766	14.809	VV	855	16669		
249	14.816	14.809	14.822	VV	567	3970		
250	14.842	14.822	14.862	VV	751	14770		
251	14.885	14.862	14.899	VV	2265	32198		
252	14.920	14.899	15.008	VV	13992	274957		
253	15.015	15.008	15.040	VV	1143	16474	0.18%	0.009%
254	15.074	15.040	15.100	VV	3507	58288	0.65%	0.031%
255	15.118	15.100	15.147	VV	899	15673	0.18%	0.008%
256	15.166	15.147	15.179	VV	947	13765	0.15%	0.007%
257	15.202	15.179	15.221	VV	869	18297	0.20%	0.010%
258	15.225	15.221	15.229	VV	621	2715	0.03%	0.001%
259	15.259	15.229	15.285	VV	1182	27341	0.31%	0.014%
260	15.289	15.285	15.305	VV	831	9216	0.10%	0.005%
261	15.310	15.305	15.314	VV	819	4297	0.05%	0.002%
262	15.321	15.314	15.337	VV	867	9800	0.11%	0.005%
263	15.352	15.337	15.363	VV	824	10083	0.11%	0.005%
264	15.373	15.363	15.380	VV	769	7048	0.08%	0.004%
265	15.383	15.380	15.389	VV	755	3315	0.04%	0.002%
266	15.404	15.389	15.423	VV	883	14910	0.17%	0.008%
267	15.441	15.423	15.474	VV	796	18582	0.21%	0.010%
268	15.519	15.474	15.530	VV	956	21490	0.24%	0.011%
269	15.562	15.530	15.592	VV	57683	735834	8.24%	0.390%
270	15.600	15.592	15.662	VV	616	20463	0.23%	0.011%
271	15.709	15.662	15.717	VV	510	9802	0.11%	0.005%
272	15.723	15.717	15.737	VV	495	4696	0.05%	0.002%
273	15.747	15.737	15.759	VV	499	5685	0.06%	0.003%
274	15.782	15.759	15.795	VV	506	7885	0.09%	0.004%
275	15.799	15.795	15.803	VV	385	1508	0.02%	0.001%
276	15.810	15.803	15.830	VV	529	7359	0.08%	0.004%
277	15.834	15.830	15.853	VV	534	4505	0.05%	0.002%
278	15.872	15.865	15.882	VV	326	2155	0.02%	0.001%
279	15.905	15.882	15.910	VV	403	5020	0.06%	0.003%
280	15.932	15.910	15.962	VV	1159	25243	0.28%	0.013%
281	16.001	15.962	16.015	VV	595338	8196439	91.83%	4.339%
282	16.037	16.015	16.097	VV	676742	8251609	92.45%	4.368%
283	16.115	16.097	16.149	VV	4984	92090	1.03%	0.049%
284	16.153	16.149	16.160	VV	1451	8759	0.10%	0.005%
285	16.181	16.160	16.211	VV	1528	36687	0.41%	0.019%
286	16.216	16.211	16.223	VV	983	6956	0.08%	0.004%
287	16.260	16.223	16.305	VV	3106	73188	0.82%	0.039%
288	16.320	16.305	16.339	VV	1851	26738	0.30%	0.014%
289	16.378	16.339	16.450	VV	584743	7949382	89.06%	4.208%
290	16.503	16.450	16.533	VV	55517	870035	9.75%	0.461%
291	16.545	16.533	16.577	VV	3334	55878	0.63%	0.030%
292	16.583	16.577	16.598	VV	1223	13617	0.15%	0.007%
293	16.604	16.598	16.625	VV	969	12710	0.14%	0.007%
294	16.628	16.625	16.643	VV	801	7200	0.08%	0.004%
295	16.656	16.643	16.675	VV	882	14283	0.16%	0.008%
296	16.710	16.675	16.741	VV	1004	27339	0.31%	0.014%
297	16.754	16.741	16.758	VV	633	5662	0.06%	0.003%
298	16.767	16.758	16.774	VV	770	6490	0.07%	0.003%
299	16.810	16.774	16.840	VV	1344	38226	0.43%	0.020%

Instrument :
FID_D
ClientSampleId :
WB-307-SB01MS

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

rteres

300	16.877	16.840	16.905	VV	1132	32373	0.36%	0.017%
301	16.912	16.905	16.923	VV	927	8655		
302	16.950	16.923	16.989	VV	2777	57538		
303	16.997	16.989	17.002	VV	594	3916		
304	17.032	17.002	17.044	VV	932	17823		
305	17.071	17.044	17.116	VV	1521	40449		
306	17.123	17.116	17.134	VV	725	6465	0.07%	0.003%
307	17.136	17.134	17.146	VV	645	4386	0.05%	0.002%
308	17.160	17.146	17.167	VV	832	8348	0.09%	0.004%
309	17.192	17.167	17.198	VV	1034	15205	0.17%	0.008%
310	17.203	17.198	17.212	VV	883	6950	0.08%	0.004%
311	17.232	17.212	17.242	VV	1037	15662	0.18%	0.008%
312	17.244	17.242	17.252	VV	1103	6304	0.07%	0.003%
313	17.282	17.252	17.320	VV	1504	42538	0.48%	0.023%
314	17.389	17.320	17.441	VV	53316	783510	8.78%	0.415%
315	17.475	17.441	17.514	VV	3687	74537	0.84%	0.039%
316	17.534	17.514	17.571	VV	1165	34084	0.38%	0.018%
317	17.581	17.571	17.594	VV	919	11442	0.13%	0.006%
318	17.605	17.594	17.618	VV	919	11108	0.12%	0.006%
319	17.628	17.618	17.636	VV	816	7933	0.09%	0.004%
320	17.682	17.636	17.700	VV	2631	60069	0.67%	0.032%
321	17.745	17.700	17.758	VV	579612	8131468	91.10%	4.304%
322	17.782	17.758	17.954	VV	566005	8157183	91.39%	4.318%
323	17.998	17.954	18.130	VV	573336	8212704	92.01%	4.347%

Sum of corrected areas: 188915173

Aromatic EPH 102324.M Sat Nov 09 03:29:03 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	WB-307-SB01MSD	SDG No.:	P4718
Lab Sample ID:	P4718-01MSD	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.03 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

Prep Date :	Date Analyzed :	Prep Batch ID
11/08/24 08:47	11/08/24 19:57	PB164790

CAS Number	Parameter	Conc.	Qualifier	Dilution	MDL	LOQ / CRQL	Units(Dry Weight)	Datafile
TARGETS								
Aliphatic C9-C12	Aliphatic C9-C12	10.3		1	0.49	1.28	mg/kg	FC067676.D
Aliphatic C12-C16	Aliphatic C12-C16	28.7	E	1	0.31	0.85	mg/kg	FC067676.D
Aliphatic C16-C21	Aliphatic C16-C21	14.2		1	0.38	1.28	mg/kg	FC067676.D
Aliphatic C21-C28	Aliphatic C21-C28	18.8		1	1.02	1.71	mg/kg	FC067676.D
Aliphatic C28-C40	Aliphatic C28-C40	35.3		1	2.31	2.56	mg/kg	FC067676.D
Aromatic C10-C12	Aromatic C10-C12	7.47		1	0.38	0.85	mg/kg	FD048679.D
Aromatic C12-C16	Aromatic C12-C16	17.1		1	0.44	1.28	mg/kg	FD048679.D
Aromatic C16-C21	Aromatic C16-C21	26.6		1	1.23	2.13	mg/kg	FD048679.D
Aromatic C21-C36	Aromatic C21-C36	43.0		1	2.56	3.42	mg/kg	FD048679.D
Total AliphaticEPH	Total AliphaticEPH	107			4.51	7.68	mg/kg	
Total AromaticEPH	Total AromaticEPH	94.2			4.61	7.68	mg/kg	
Total EPH	Total EPH	201			9.12	15.4	mg/kg	

U = Not Detected
LOQ = Limit of Quantitation
MDL = Method Detection Limit
LOD = Limit of Detection
E = Value Exceeds Calibration Range
Q = indicates LCS control criteria did not meet requirements

J = Estimated Value
B = Analyte Found in Associated Method Blank
N = Presumptive Evidence of a Compound
* = Values outside of QC limits
D = Dilution

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	WB-307-SB01MSD	SDG No.:	P4718
Lab Sample ID:	P4718-01MSD	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.03 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FC067676.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aliphatic C9-C12	Aliphatic C9-C12	10.3		0.49	1.28	mg/kg
Aliphatic C12-C16	Aliphatic C12-C16	28.7	E	0.31	0.85	mg/kg
Aliphatic C16-C21	Aliphatic C16-C21	14.2		0.38	1.28	mg/kg
Aliphatic C21-C28	Aliphatic C21-C28	18.8		1.02	1.71	mg/kg
Aliphatic C28-C40	Aliphatic C28-C40	35.3		2.31	2.56	mg/kg
SURROGATES						
3383-33-2	1-chlorooctadecane (SURR)	36.2		40 - 140	72%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	0.00		40 - 140	0%	SPK: 50

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

Quantitation Report For Aliphatic EPH Range.

Lab Sample ID:	P4718-01MSD	Acq On:	08 Nov 2024 19:57
Client Sample ID:	WB-307-SB01MSD	Operator:	YP/AJ
Data file:	FC067676.D	Misc:	
Instrument:	FID_C	ALS Vial:	17
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aliphatic C9-C12	3.171	6.450	16310574	120.4	300	ug/ml
Aliphatic C12-C16	6.451	9.841	44318307	336.556	200	ug/ml
Aliphatic C16-C21	9.842	13.199	21203932	166.652	300	ug/ml
Aliphatic C21-C28	13.200	16.853	26474392	220.454	400	ug/ml
Aliphatic C28-C40	16.854	21.698	41781599	413.298	600	ug/ml
Aliphatic EPH	3.171	21.698	150088804	1260		ug/ml
ortho-Terphenyl (SURR)	0.000	0.000	0	0		ug/ml
1-chlorooctadecane (SURR)	12.931	12.931	3908382	36.19		ug/ml
Aliphatic C9-C28	3.171	16.853	108307205	844.062	1200	ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067676.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 19:57
Operator : YP/AJ
Sample : P4718-01MSD
Misc :
ALS Vial : 17 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB01MSD

Integration File: autoint1.e
Quant Time: Nov 09 01:38:09 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
12) S	1-chlorooctadecane (S...	12.931	3908382	36.193 ug/ml
Spiked Amount	50.000		Recovery =	72.39%
	Target Compounds			
1) T	n-Nonane (C9)	3.272	3996483	29.665 ug/ml
2) T	n-Decane (C10)	4.337	4877556	35.800 ug/ml
4) T	n-Dodecane (C12)	6.351	5684946	41.973 ug/ml
6) T	n-Tetradecane (C14)	8.146	9131061	69.564 ug/ml
7) T	n-Hexadecane (C16)	9.742	6630551	50.192 ug/ml
8) T	n-Octadecane (C18)	11.183	6786546	51.369 ug/ml
10) T	n-Eicosane (C20)	12.490	6862062	54.384 ug/ml
11) T	n-Heneicosane (C21)	13.101	6590913	53.405 ug/ml
13) T	n-Docosane (C22)	13.686	6576404	53.707 ug/ml
14) T	n-Tetracosane (C24)	14.787	6502715	53.648 ug/ml
15) T	n-Hexacosane (C26)	15.807	6405483	53.802 ug/ml
16) T	n-Octacosane (C28)	16.756	6351508	53.988 ug/ml
17) T	n-Tricontane (C30)	17.642	6378368	52.770 ug/ml
18) T	n-Dotriacontane (C32)	18.472	6316593	53.385 ug/ml
19) T	n-Tetratriacontane (C34)	19.255	6303514	60.190 ug/ml
20) T	n-Hexatriacontane (C36)	19.994	6151233	67.576 ug/ml
21) T	n-Octatriacontane (C38)	20.716	6171465	71.262 ug/ml
22) T	n-Tetracontane (C40)	21.601	6124568	72.045 ug/ml

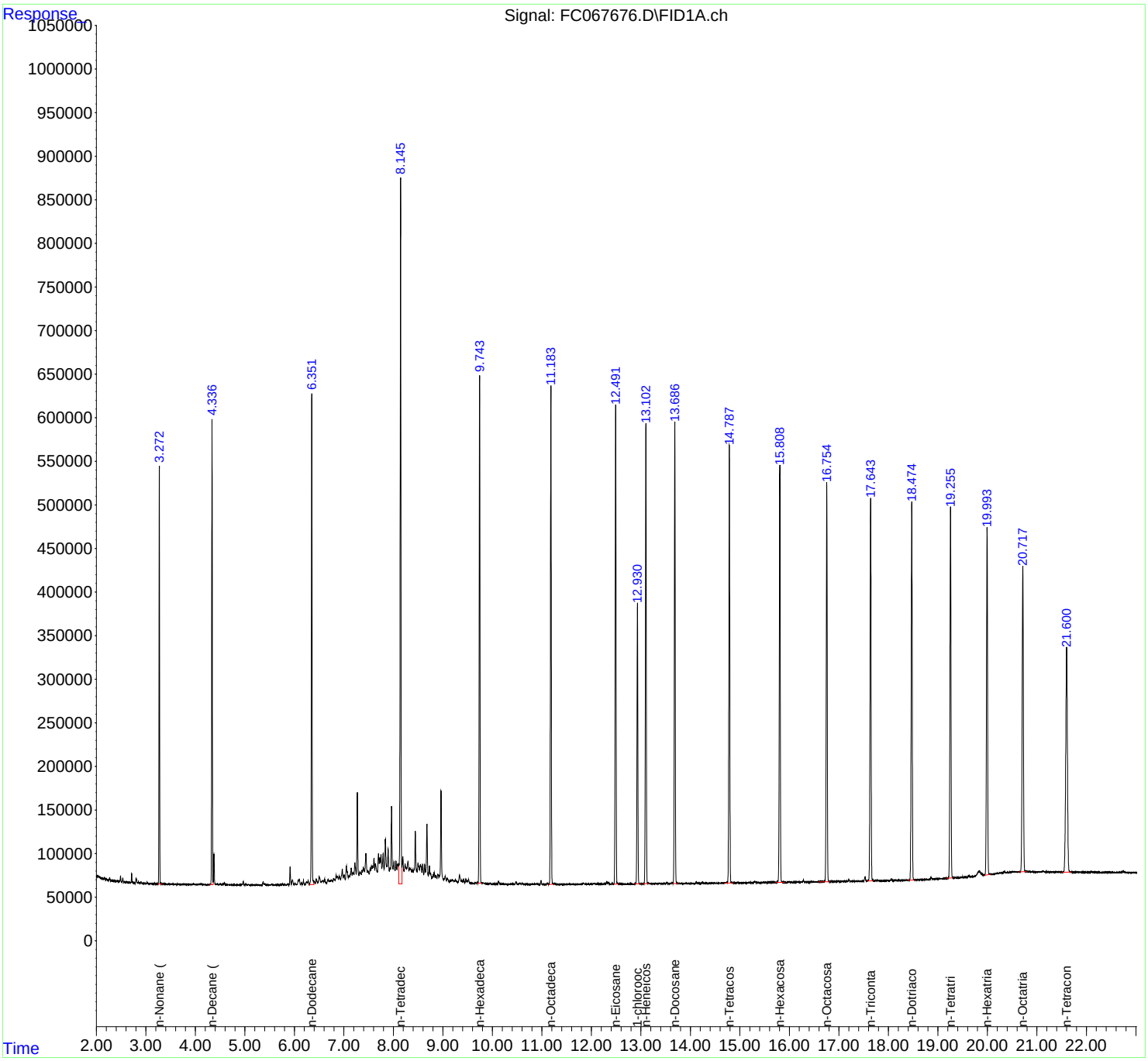
(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067676.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 19:57
Operator : YP/AJ
Sample : P4718-01MSD
Misc :
ALS Vial : 17 Sample Multiplier: 1

Instrument :
FID_C
ClientSampleId :
WB-307-SB01MSD

Integration File: autoint1.e
Quant Time: Nov 09 01:38:09 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:12:58 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 ul
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18um



rteres

Area Percent Report

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_C\Data\FC110824AL\
Data File : FC067676.D
Signal(s) : FID1A.ch
Acq On : 08 Nov 2024 19:57
Sample : P4718-01MSD
Misc :
ALS Vial : 17 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_C\Method\Aliphatic EPH 102324.M
Title : GC Extractables

Signal : FID1A.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	3.272	3.188	3.360	BV	475797	4002172	43.61%	2.599%
2	3.370	3.360	3.380	VV	167	1420	0.02%	0.001%
3	3.397	3.380	3.432	VV	272	4575	0.05%	0.003%
4	3.449	3.432	3.460	PV	204	2363	0.03%	0.002%
5	3.473	3.460	3.498	VV	318	3692	0.04%	0.002%
6	3.510	3.498	3.525	VV	163	1425	0.02%	0.001%
7	3.546	3.525	3.568	VV	420	7309	0.08%	0.005%
8	3.584	3.568	3.627	VV	401	6768	0.07%	0.004%
9	3.643	3.627	3.747	VV	466	6913	0.08%	0.004%
10	3.763	3.747	3.801	PV	243	3746	0.04%	0.002%
11	3.847	3.801	3.904	PV	256	5271	0.06%	0.003%
12	3.936	3.904	3.950	VV	801	8749	0.10%	0.006%
13	3.965	3.950	3.984	VV	1344	12445	0.14%	0.008%
14	3.996	3.984	4.011	PV	149	1941	0.02%	0.001%
15	4.030	4.011	4.052	VV	562	5660	0.06%	0.004%
16	4.061	4.052	4.070	PV	103	554	0.01%	0.000%
17	4.112	4.070	4.130	VV	954	14941	0.16%	0.010%
18	4.141	4.130	4.184	VV	349	5978	0.07%	0.004%
19	4.194	4.184	4.215	VV	116	1791	0.02%	0.001%
20	4.251	4.215	4.296	VV	199	4139	0.05%	0.003%
21	4.337	4.296	4.360	VV	534458	4886956	53.26%	3.173%
22	4.376	4.360	4.421	VV	35247	340717	3.71%	0.221%
23	4.435	4.421	4.471	VV	1241	19815	0.22%	0.013%
24	4.503	4.471	4.522	VV	1423	20430	0.22%	0.013%
25	4.558	4.522	4.572	VV	1177	17873	0.19%	0.012%

rteres

26	4.588	4.572	4.606	VV	2163	21572	0.24%	0.014%
27	4.616	4.606	4.638	VV	479	6692	0.07%	0.004%
28	4.645	4.638	4.693	VV	258	7944	0.09%	0.005%
29	4.707	4.693	4.731	VV	425	6263	0.07%	0.004%
30	4.746	4.731	4.763	VV	260	3524	0.04%	0.002%
31	4.805	4.763	4.838	VV	334	6903	0.08%	0.004%
32	4.856	4.838	4.870	PV	101	1443	0.02%	0.001%
33	4.890	4.870	4.911	VV	354	4458	0.05%	0.003%
34	4.967	4.911	4.997	VV	4241	58111	0.63%	0.038%
35	5.022	4.997	5.045	VV	1059	15086	0.16%	0.010%
36	5.052	5.045	5.060	VV	276	2360	0.03%	0.002%
37	5.075	5.060	5.114	VV	518	7306	0.08%	0.005%
38	5.161	5.114	5.186	PV	277	7534	0.08%	0.005%
39	5.193	5.186	5.217	VV	242	3686	0.04%	0.002%
40	5.228	5.217	5.242	VV	240	2574	0.03%	0.002%
41	5.258	5.242	5.272	VV	259	3196	0.03%	0.002%
42	5.282	5.272	5.292	VV	148	1372	0.01%	0.001%
43	5.301	5.292	5.325	VV	129	2043	0.02%	0.001%
44	5.369	5.325	5.399	VV	3858	51072	0.56%	0.033%
45	5.410	5.399	5.435	VV	1426	15574	0.17%	0.010%
46	5.440	5.435	5.455	VV	134	1809	0.02%	0.001%
47	5.466	5.455	5.482	VV	394	4114	0.04%	0.003%
48	5.550	5.482	5.589	VV	1508	23129	0.25%	0.015%
49	5.625	5.589	5.639	PV	314	5499	0.06%	0.004%
50	5.665	5.639	5.699	VV	519	9516	0.10%	0.006%
51	5.758	5.699	5.789	VV	946	17022	0.19%	0.011%
52	5.810	5.789	5.841	VV	835	12032	0.13%	0.008%
53	5.859	5.841	5.887	VV	847	11802	0.13%	0.008%
54	5.914	5.887	5.938	VV	20927	214327	2.34%	0.139%
55	5.962	5.938	5.993	VV	5885	103081	1.12%	0.067%
56	6.009	5.993	6.051	VV	1935	31976	0.35%	0.021%
57	6.100	6.051	6.123	VV	6989	157325	1.71%	0.102%
58	6.141	6.123	6.160	VV	2569	34494	0.38%	0.022%
59	6.183	6.160	6.211	VV	4501	60840	0.66%	0.040%
60	6.246	6.211	6.262	VV	3577	65153	0.71%	0.042%
61	6.278	6.262	6.300	VV	4703	62916	0.69%	0.041%
62	6.351	6.300	6.396	VV	563255	5715062	62.28%	3.711%
63	6.406	6.396	6.422	VV	4394	51254	0.56%	0.033%
64	6.445	6.422	6.467	VV	5829	112867	1.23%	0.073%
65	6.502	6.467	6.536	VV	9308	227109	2.47%	0.147%
66	6.549	6.536	6.556	VV	4008	46792	0.51%	0.030%
67	6.574	6.556	6.594	VV	5122	101574	1.11%	0.066%
68	6.612	6.594	6.644	VV	6970	128863	1.40%	0.084%
69	6.679	6.644	6.696	VV	6167	128262	1.40%	0.083%

rteres

70	6.708	6.696	6.721	VV	4957	67763	0.74%	0.044%
71	6.750	6.721	6.773	VV	5089	144210	1.57%	0.094%
72	6.793	6.773	6.825	VV	7698	190707	2.08%	0.124%
73	6.844	6.825	6.858	VV	11354	172879	1.88%	0.112%
74	6.872	6.858	6.890	VV	10094	165788	1.81%	0.108%
75	6.909	6.890	6.934	VV	9541	214976	2.34%	0.140%
76	6.968	6.934	6.990	VV	17960	379579	4.14%	0.246%
77	7.007	6.990	7.027	VV	11853	212072	2.31%	0.138%
78	7.051	7.027	7.089	VV	21626	497616	5.42%	0.323%
79	7.102	7.089	7.115	VV	10659	152876	1.67%	0.099%
80	7.150	7.115	7.167	VV	19493	435525	4.75%	0.283%
81	7.186	7.167	7.203	VV	13961	285642	3.11%	0.185%
82	7.223	7.203	7.249	VV	25259	502859	5.48%	0.326%
83	7.273	7.249	7.302	VV	105728	1349791	14.71%	0.876%
84	7.324	7.302	7.348	VV	14022	362086	3.95%	0.235%
85	7.365	7.348	7.373	VV	16158	226165	2.46%	0.147%
86	7.393	7.373	7.417	VV	18761	444244	4.84%	0.288%
87	7.445	7.417	7.475	VV	36030	795782	8.67%	0.517%
88	7.489	7.475	7.511	VV	15670	320024	3.49%	0.208%
89	7.533	7.511	7.544	VV	18618	319150	3.48%	0.207%
90	7.561	7.544	7.571	VV	20790	308520	3.36%	0.200%
91	7.609	7.571	7.625	VV	30514	730926	7.97%	0.475%
92	7.639	7.625	7.676	VV	24338	598937	6.53%	0.389%
93	7.699	7.676	7.714	VV	35841	582479	6.35%	0.378%
94	7.727	7.714	7.738	VV	30924	400335	4.36%	0.260%
95	7.750	7.738	7.767	VV	34332	477842	5.21%	0.310%
96	7.792	7.767	7.813	VV	35267	701933	7.65%	0.456%
97	7.838	7.813	7.866	VV	52045	1020485	11.12%	0.663%
98	7.894	7.866	7.918	VV	41201	821568	8.95%	0.533%
99	7.963	7.918	7.989	VV	90620	1526630	16.64%	0.991%
100	8.012	7.989	8.034	VV	26618	576950	6.29%	0.375%
101	8.052	8.034	8.071	VV	27256	480234	5.23%	0.312%
102	8.097	8.071	8.110	VV	22973	499756	5.45%	0.324%
103	8.146	8.110	8.173	VV	798252	9176332	100.00%	5.958%
104	8.191	8.173	8.218	VV	32475	622222	6.78%	0.404%
105	8.237	8.218	8.270	VV	23497	624669	6.81%	0.406%
106	8.295	8.270	8.315	VV	26752	586438	6.39%	0.381%
107	8.332	8.315	8.371	VV	19657	599310	6.53%	0.389%
108	8.386	8.371	8.401	VV	17015	287107	3.13%	0.186%
109	8.443	8.401	8.479	VV	61503	1209596	13.18%	0.785%
110	8.498	8.479	8.526	VV	24472	574060	6.26%	0.373%
111	8.545	8.526	8.574	VV	22773	575334	6.27%	0.374%
112	8.591	8.574	8.613	VV	23656	417257	4.55%	0.271%

rteres

113	8.631	8.613	8.648	VV	23264	366318	3.99%	0.238%
114	8.677	8.648	8.705	VV	69894	1096183	11.95%	0.712%
115	8.728	8.705	8.777	VV	21545	579086	6.31%	0.376%
116	8.824	8.777	8.842	VV	13872	399012	4.35%	0.259%
117	8.859	8.842	8.878	VV	10560	196410	2.14%	0.128%
118	8.899	8.878	8.925	VV	12254	285750	3.11%	0.186%
119	8.963	8.925	9.021	VV	107380	1573198	17.14%	1.021%
120	9.046	9.021	9.069	VV	9885	213675	2.33%	0.139%
121	9.090	9.069	9.132	VV	6527	208579	2.27%	0.135%
122	9.163	9.132	9.174	VV	4967	113916	1.24%	0.074%
123	9.196	9.174	9.230	VV	5498	157444	1.72%	0.102%
124	9.246	9.230	9.304	VV	4803	178448	1.94%	0.116%
125	9.336	9.304	9.367	VV	10693	242440	2.64%	0.157%
126	9.380	9.367	9.394	VV	4990	69721	0.76%	0.045%
127	9.418	9.394	9.443	VV	6279	134564	1.47%	0.087%
128	9.466	9.443	9.485	VV	6339	109360	1.19%	0.071%
129	9.519	9.485	9.561	VV	6090	156095	1.70%	0.101%
130	9.574	9.561	9.628	VV	1921	63175	0.69%	0.041%
131	9.657	9.628	9.674	VV	2108	46004	0.50%	0.030%
132	9.695	9.674	9.707	VV	2687	44694	0.49%	0.029%
133	9.742	9.707	9.793	VV	585850	6720263	73.23%	4.363%
134	9.805	9.793	9.901	VV	1931	92718	1.01%	0.060%
135	9.909	9.901	9.931	VV	1060	16592	0.18%	0.011%
136	9.964	9.931	9.997	VV	1202	34587	0.38%	0.022%
137	10.016	9.997	10.036	VV	863	16048	0.17%	0.010%
138	10.058	10.036	10.067	VV	791	12651	0.14%	0.008%
139	10.085	10.067	10.098	VV	1061	16388	0.18%	0.011%
140	10.126	10.098	10.154	VV	3219	59400	0.65%	0.039%
141	10.172	10.154	10.192	VV	1087	19308	0.21%	0.013%
142	10.216	10.192	10.239	VV	1146	21318	0.23%	0.014%
143	10.270	10.239	10.298	VV	905	19771	0.22%	0.013%
144	10.340	10.298	10.352	VV	585	12262	0.13%	0.008%
145	10.370	10.352	10.395	VV	660	13246	0.14%	0.009%
146	10.410	10.395	10.440	VV	835	17045	0.19%	0.011%
147	10.477	10.440	10.515	VV	3693	59312	0.65%	0.039%
148	10.549	10.515	10.577	VV	1539	35781	0.39%	0.023%
149	10.604	10.577	10.635	VV	1364	28063	0.31%	0.018%
150	10.645	10.635	10.653	VV	355	3353	0.04%	0.002%
151	10.669	10.653	10.681	VV	415	5651	0.06%	0.004%
152	10.695	10.681	10.717	VV	384	6988	0.08%	0.005%
153	10.727	10.717	10.744	VV	302	4179	0.05%	0.003%
154	10.759	10.744	10.773	VV	303	4188	0.05%	0.003%
155	10.801	10.773	10.828	VV	774	14899	0.16%	0.010%

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156	10.848	10.828	10.880	VV	982	17707	0.19%	0.011%
157	10.899	10.880	10.918	VV	746	12389	0.14%	0.008%
158	10.933	10.918	10.958	VV	472	6740	0.07%	0.004%
159	10.983	10.958	11.021	VV	4388	53452	0.58%	0.035%
160	11.041	11.021	11.072	VV	236	4678	0.05%	0.003%
161	11.110	11.072	11.141	VV	1604	22623	0.25%	0.015%
162	11.183	11.141	11.249	VV	569419	6807427	74.18%	4.420%
163	11.272	11.249	11.318	VV	931	20945	0.23%	0.014%
164	11.333	11.318	11.358	VV	303	3643	0.04%	0.002%
165	11.380	11.358	11.388	PV	175	1874	0.02%	0.001%
166	11.411	11.388	11.443	VV	188	3392	0.04%	0.002%
167	11.472	11.443	11.480	VV	310	4174	0.05%	0.003%
168	11.492	11.480	11.514	VV	309	5034	0.05%	0.003%
169	11.569	11.514	11.605	VV	688	17389	0.19%	0.011%
170	11.635	11.605	11.685	VV	474	14803	0.16%	0.010%
171	11.698	11.685	11.718	VV	197	3293	0.04%	0.002%
172	11.726	11.718	11.735	VV	220	1953	0.02%	0.001%
173	11.746	11.735	11.763	VV	296	4044	0.04%	0.003%
174	11.779	11.763	11.801	VV	422	7727	0.08%	0.005%
175	11.846	11.801	11.869	VV	1342	29727	0.32%	0.019%
176	11.894	11.869	11.917	VV	415	8698	0.09%	0.006%
177	11.939	11.917	11.955	VV	387	5978	0.07%	0.004%
178	11.988	11.955	12.022	VV	407	11681	0.13%	0.008%
179	12.064	12.022	12.102	VV	971	24819	0.27%	0.016%
180	12.130	12.102	12.153	VV	689	14490	0.16%	0.009%
181	12.177	12.153	12.226	VV	522	16091	0.18%	0.010%
182	12.262	12.226	12.275	VV	522	10196	0.11%	0.007%
183	12.311	12.275	12.329	VV	2523	42181	0.46%	0.027%
184	12.347	12.329	12.392	VV	1985	30940	0.34%	0.020%
185	12.425	12.392	12.451	VV	1331	18873	0.21%	0.012%
186	12.490	12.451	12.574	VV	552425	6879344	74.97%	4.467%
187	12.587	12.574	12.618	VV	396	8147	0.09%	0.005%
188	12.630	12.618	12.692	VV	290	5490	0.06%	0.004%
189	12.701	12.692	12.720	VV	107	849	0.01%	0.001%
190	12.745	12.720	12.756	PV	343	4437	0.05%	0.003%
191	12.773	12.756	12.795	VV	289	4578	0.05%	0.003%
192	12.807	12.795	12.831	VV	232	3031	0.03%	0.002%
193	12.850	12.831	12.860	VV	220	2649	0.03%	0.002%
194	12.931	12.860	12.978	VV	322828	3927201	42.80%	2.550%
195	12.984	12.978	13.020	VV	674	11804	0.13%	0.008%
196	13.035	13.020	13.059	VV	492	8227	0.09%	0.005%
197	13.101	13.059	13.189	VV	529666	6627385	72.22%	4.303%
198	13.218	13.189	13.248	VV	367	10339	0.11%	0.007%
199	13.257	13.248	13.277	VV	291	3400	0.04%	0.002%

rteres

200	13.305	13.277	13.340	VV	434	11859	0.13%	0.008%
201	13.364	13.340	13.418	VV	490	16640	0.18%	0.011%
202	13.440	13.418	13.455	VV	302	4854	0.05%	0.003%
203	13.474	13.455	13.498	VV	524	8733	0.10%	0.006%
204	13.526	13.498	13.595	VV	1443	29066	0.32%	0.019%
205	13.629	13.595	13.647	VV	1326	20693	0.23%	0.013%
206	13.686	13.647	13.793	VV	526705	6600336	71.93%	4.285%
207	13.808	13.793	13.854	VV	316	5553	0.06%	0.004%
208	13.907	13.854	13.938	PV	383	10004	0.11%	0.006%
209	13.981	13.938	14.035	VV	241	9696	0.11%	0.006%
210	14.118	14.035	14.162	VV	1281	26922	0.29%	0.017%
211	14.182	14.162	14.211	VV	320	7150	0.08%	0.005%
212	14.244	14.211	14.275	VV	1568	22373	0.24%	0.015%
213	14.300	14.275	14.321	PV	382	6354	0.07%	0.004%
214	14.334	14.321	14.341	VV	321	3445	0.04%	0.002%
215	14.350	14.341	14.368	VV	314	4176	0.05%	0.003%
216	14.376	14.368	14.421	VV	349	7435	0.08%	0.005%
217	14.445	14.421	14.461	VV	461	6329	0.07%	0.004%
218	14.493	14.461	14.511	VV	421	9494	0.10%	0.006%
219	14.533	14.511	14.544	VV	346	6041	0.07%	0.004%
220	14.558	14.544	14.611	VV	417	11917	0.13%	0.008%
221	14.639	14.611	14.668	VV	400	10418	0.11%	0.007%
222	14.692	14.668	14.711	VV	429	7892	0.09%	0.005%
223	14.739	14.711	14.748	VV	1403	18622	0.20%	0.012%
224	14.787	14.748	14.888	VV	500335	6512654	70.97%	4.229%
225	14.903	14.888	14.938	VV	306	6910	0.08%	0.004%
226	14.981	14.938	15.027	VV	364	14727	0.16%	0.010%
227	15.037	15.027	15.066	VV	293	3968	0.04%	0.003%
228	15.081	15.066	15.107	PV	171	2983	0.03%	0.002%
229	15.120	15.107	15.153	VV	222	4097	0.04%	0.003%
230	15.182	15.153	15.190	VV	242	4136	0.05%	0.003%
231	15.212	15.190	15.238	VV	403	7557	0.08%	0.005%
232	15.301	15.238	15.328	VV	1713	32884	0.36%	0.021%
233	15.351	15.328	15.443	VV	509	16905	0.18%	0.011%
234	15.449	15.443	15.458	VV	192	1441	0.02%	0.001%
235	15.487	15.458	15.528	VV	392	12051	0.13%	0.008%
236	15.534	15.528	15.548	VV	361	2698	0.03%	0.002%
237	15.554	15.548	15.574	VV	219	2642	0.03%	0.002%
238	15.617	15.574	15.651	VV	524	16767	0.18%	0.011%
239	15.674	15.651	15.725	VV	494	15607	0.17%	0.010%
240	15.735	15.725	15.741	VV	219	1910	0.02%	0.001%
241	15.807	15.741	15.911	VV	480091	6425036	70.02%	4.172%
242	15.981	15.911	16.038	VV	548	20561	0.22%	0.013%

rteres

243	16.047	16.038	16.065	VV	202	2225	0.02%	0.001%
244	16.122	16.065	16.140	VV	333	11713	0.13%	0.008%
245	16.163	16.140	16.178	VV	439	7108	0.08%	0.005%
246	16.184	16.178	16.215	VV	254	4227	0.05%	0.003%
247	16.285	16.215	16.371	VV	2311	46726	0.51%	0.030%
248	16.381	16.371	16.415	VV	122	1808	0.02%	0.001%
249	16.449	16.415	16.470	PV	390	9130	0.10%	0.006%
250	16.484	16.470	16.505	VV	346	5935	0.06%	0.004%
251	16.515	16.505	16.531	VV	236	3307	0.04%	0.002%
252	16.542	16.531	16.562	VV	334	3940	0.04%	0.003%
253	16.631	16.562	16.666	VV	644	20937	0.23%	0.014%
254	16.675	16.666	16.685	VV	285	2862	0.03%	0.002%
255	16.756	16.685	16.891	VV	457073	6369199	69.41%	4.135%
256	16.908	16.891	16.928	VV	332	4694	0.05%	0.003%
257	16.949	16.928	16.961	VV	309	3823	0.04%	0.002%
258	16.985	16.961	17.025	VV	543	8632	0.09%	0.006%
259	17.069	17.025	17.115	PV	388	10670	0.12%	0.007%
260	17.160	17.115	17.181	VV	396	10038	0.11%	0.007%
261	17.201	17.181	17.261	VV	2444	34563	0.38%	0.022%
262	17.314	17.261	17.338	VV	365	7430	0.08%	0.005%
263	17.349	17.338	17.381	VV	264	3981	0.04%	0.003%
264	17.483	17.381	17.500	VV	268	8853	0.10%	0.006%
265	17.528	17.500	17.568	VV	5028	72606	0.79%	0.047%
266	17.642	17.568	17.738	VV	434298	6409018	69.84%	4.161%
267	17.771	17.738	17.831	VV	1124	30008	0.33%	0.019%
268	17.844	17.831	17.856	VV	166	1395	0.02%	0.001%
269	17.877	17.856	17.891	VV	130	1462	0.02%	0.001%
270	17.919	17.891	17.955	PV	257	6500	0.07%	0.004%
271	17.970	17.955	18.005	VV	257	4829	0.05%	0.003%
272	18.058	18.005	18.094	VV	2297	35635	0.39%	0.023%
273	18.136	18.094	18.181	VV	926	16577	0.18%	0.011%
274	18.203	18.181	18.245	VV	200	3621	0.04%	0.002%
275	18.328	18.245	18.347	PV	258	8343	0.09%	0.005%
276	18.361	18.347	18.390	VV	333	4065	0.04%	0.003%
277	18.403	18.390	18.410	VV	70	558	0.01%	0.000%
278	18.472	18.410	18.528	VV	433383	6326387	68.94%	4.108%
279	18.559	18.528	18.578	VV	420	7938	0.09%	0.005%
280	18.607	18.578	18.658	PV	289	7307	0.08%	0.005%
281	18.732	18.658	18.745	PV	214	3735	0.04%	0.002%
282	18.772	18.745	18.785	VV	126	1819	0.02%	0.001%
283	18.866	18.785	18.927	PV	2423	45785	0.50%	0.030%
284	18.967	18.927	18.978	VV	405	8131	0.09%	0.005%
285	19.034	18.978	19.045	VV	437	13191	0.14%	0.009%

rteres

286	19.058	19.045	19.079	VV	481	8160	0.09%	0.005%
287	19.088	19.079	19.097	VV	386	3541	0.04%	0.002%
288	19.155	19.097	19.169	VV	544	17045	0.19%	0.011%
289	19.255	19.169	19.325	VV	426615	6359771	69.31%	4.129%
290	19.342	19.325	19.382	VV	977	27416	0.30%	0.018%
291	19.409	19.382	19.431	VV	736	17007	0.19%	0.011%
292	19.625	19.431	19.653	VV	2008	112788	1.23%	0.073%
293	19.834	19.653	19.939	VV	6830	511327	5.57%	0.332%
294	19.994	19.939	20.067	VV	397235	6336233	69.05%	4.114%
295	20.342	20.067	20.382	VV	5375	678532	7.39%	0.441%
296	20.408	20.382	20.418	VV	4106	86788	0.95%	0.056%
297	20.521	20.418	20.599	VV	4554	469054	5.11%	0.305%
298	20.631	20.599	20.641	VV	4119	101322	1.10%	0.066%
299	20.716	20.641	20.856	VV	356650	6684915	72.85%	4.340%
300	20.863	20.856	20.931	VV	3683	153004	1.67%	0.099%
301	20.987	20.931	21.009	VV	3083	142626	1.55%	0.093%
302	21.035	21.009	21.061	VV	3120	93672	1.02%	0.061%
303	21.124	21.061	21.205	VV	3526	243695	2.66%	0.158%
304	21.219	21.205	21.238	VV	2324	44980	0.49%	0.029%
305	21.245	21.238	21.269	VV	2191	39580	0.43%	0.026%
306	21.278	21.269	21.293	VV	2185	29910	0.33%	0.019%
307	21.337	21.293	21.390	VV	2104	115833	1.26%	0.075%
308	21.406	21.390	21.415	VV	1959	28240	0.31%	0.018%
309	21.422	21.415	21.439	VV	1915	26088	0.28%	0.017%
310	21.451	21.439	21.486	VV	1773	45571	0.50%	0.030%
311	21.499	21.486	21.513	VV	1523	23495	0.26%	0.015%
312	21.601	21.513	21.725	VV	258719	6279412	68.43%	4.077%

Sum of corrected areas: 154016003

Aliphatic EPH 102324.M Sat Nov 09 02:15:41 2024

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

Report of Analysis

Client:	Portal Partners Tri-Venture	Date Collected:	
Project:	Amtrak Sawtooth Bridges 2024	Date Received:	
Client Sample ID:	WB-307-SB01MSD	SDG No.:	P4718
Lab Sample ID:	P4718-01MSD	Matrix:	Solid
Analytical Method:	NJEPH	% Solid:	78
Sample Wt/Vol:	30.03 Units: g	Final Vol:	2000 uL
Soil Aliquot Vol:	uL	Test:	EPH
Prep Method :			

File ID :	Dilution:	Prep Date :	Date Analyzed :	Prep Batch ID
FD048679.D	1	11/08/24	11/08/24	PB164790

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
Aromatic C10-C12	Aromatic C10-C12	7.47		0.38	0.85	mg/kg
Aromatic C12-C16	Aromatic C12-C16	17.1		0.44	1.28	mg/kg
Aromatic C16-C21	Aromatic C16-C21	26.6		1.23	2.13	mg/kg
Aromatic C21-C36	Aromatic C21-C36	43.0		2.56	3.42	mg/kg
SURROGATES						
580-13-2	2-Bromonaphthalene (SURR)	59.3		40 - 140	119%	SPK: 50
321-60-8	2-Flurobiphenyl (SURR)	54.1		40 - 140	108%	SPK: 50
84-15-1	ortho-Terphenyl (SURR)	34.8		40 - 140	70%	SPK: 50

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

Quantitation Report For Aromatic EPH Range.

Lab Sample ID:	P4718-01MSD	Acq On:	08 Nov 2024 19:57
Client Sample ID:	WB-307-SB01MSD	Operator:	YP/AJ
Data file:	FD048679.D	Misc:	
Instrument:	FID_D	ALS Vial:	62
Dilution Factor:	1	Sample Multiplier:	1.00

Compound	R.T.		Response	Conc	highest_standard	Units
Aromatic C10-C12	4.092	5.810	15414686	87.483	200	ug/ml
Aromatic C12-C16	5.811	8.415	35557900	200.582	300	ug/ml
Aromatic C16-C21	8.416	12.678	51037520	311.522	500	ug/ml
Aromatic C21-C36	12.679	18.083	76903750	503.583	800	ug/ml
Aromatic EPH	4.092	18.083	178913856	1100		ug/ml
ortho-Terphenyl (SURR)	11.255	11.255	5919615	34.75		ug/ml
2-Bromonaphthalene (SURR)	7.371	7.371	9006133	59.34		ug/ml
2-Flurobiphenyl (SURR)	8.220	8.220	5315948	54.14		ug/ml

Quantitation Report (QT Reviewed)

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048679.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 19:57
Operator : YP/AJ
Sample : P4718-01MSD
Misc :
ALS Vial : 62 Sample Multiplier: 1

Instrument :
FID_D
ClientSampleId :
WB-307-SB01MSD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:08:18 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm

	Compound	R.T.	Response	Conc Units
	System Monitoring Compounds			
4) S	2-Bromonaphthalene (S...	7.371	9006133	59.337 ug/ml
Spiked Amount	50.000		Recovery =	118.67%
6) S	2-Flurobiphenyl (SURR)	8.220	5315948	54.138 ug/ml
Spiked Amount	50.000 Range	0 - 131	Recovery =	108.28%
11) S	ortho-Terphenyl (SURR)	11.255	5919615	34.752 ug/ml
Spiked Amount	50.000		Recovery =	69.50%
	Target Compounds			
1) T	1,2,3-Trimethylbenzen...	4.193	6568190	37.754 ug/mlm
2) T	Naphthalene (C11.7)	5.710	7452378	41.765 ug/ml
3) T	2-Methylnaphthalene (...	6.757	7223256	40.384 ug/ml
5) T	Acenaphthylene (C15.06)	8.023	8313389	47.345 ug/ml
7) T	Acenaphthene (C15.5)	8.319	8854960	49.926 ug/ml
8) T	Flouorene (C16.55)	9.097	8796279	52.038 ug/ml
9) T	Phenanthrene (C19.36)	10.485	8856092	53.574 ug/ml
10) T	Anthracene (C19.43)	10.561	8830937	55.224 ug/ml
12) T	Fluoranthene (C21.85)	12.290	8895805	54.053 ug/mlm
13) T	Pyrene (C20.8)	12.583	8808424	54.684 ug/ml
14) T	Benzo[a]anthracene (C...	14.452	8291503	56.707 ug/ml
15) T	Chrysene (C27.41)	14.495	8219557	49.969 ug/ml
16) T	benzo[b]fluoranthene ...	16.001	8357062	54.970 ug/ml
17) T	Bnezo[k]fluoranthene ...	16.035	8275011	55.055 ug/ml
18) T	Benzo[a]pyrene (C31.34)	16.377	8013954	53.250 ug/ml
19) T	Indeno[1,2,3-cd]pyren...	17.745	8329641	63.839 ug/ml
20) T	Dibenz[a,h]anthracene...	17.782	8119436	49.894 ug/ml
21) T	Benzo[g,h,i]perylene ...	17.997	8177839	53.418 ug/ml

(f)=RT Delta > 1/2 Window (m)=manual int.

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD110824AR\
Data File : FD048679.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 19:57
Operator : YP/AJ
Sample : P4718-01MSD
Misc :
ALS Vial : 62 Sample Multiplier: 1

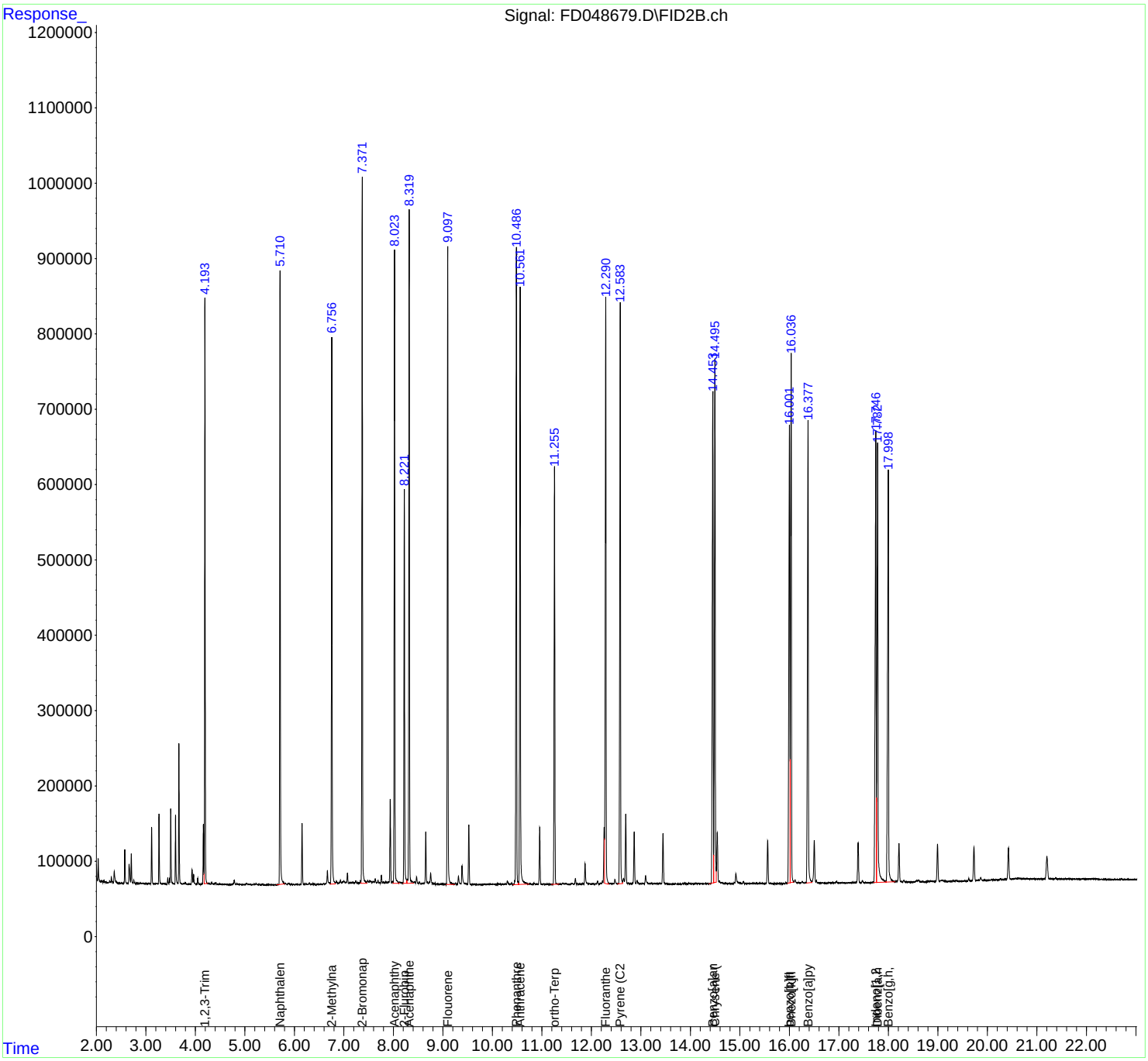
Instrument :
FID_D
ClientSampleId :
WB-307-SB01MSD

Manual Integrations APPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Integration File: sample.E
Quant Time: Nov 09 01:08:18 2024
Quant Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Quant Title : GC Extractables
QLast Update : Wed Oct 23 18:14:59 2024
Response via : Initial Calibration
Integrator: ChemStation

Volume Inj. : 1 µl
Signal Phase : Rxi-1ms
Signal Info : 20M x 0.18mm x 0.18µm



Instrument :
FID_D
ClientSampleId :
WB-307-SB01MSD

rteres

Area Percent Report

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

Data Path : Z:\pestpcbsrv\HPCHEM1\FID_D\Data\FD11082
Data File : FD048679.D
Signal(s) : FID2B.ch
Acq On : 08 Nov 2024 19:57
Sample : P4718-01MSD
Misc :
ALS Vial : 62 Sample Multiplier: 1

Integration File: sample.E

Method : Z:\pestpcbsrv\HPCHEM1\FID_D\methods\Aromatic EPH 102324.M
Title : GC Extractables

Signal : FID2B.ch

peak #	R.T. min	Start min	End min	PK TY	peak height	peak area	peak % max.	% of total
1	4.116	4.105	4.122	PV	425	2977	0.03%	0.002%
2	4.124	4.122	4.140	VV	445	3594	0.04%	0.002%
3	4.163	4.140	4.176	VV	79937	708844	7.83%	0.366%
4	4.193	4.176	4.256	VV	777656	6634343	73.32%	3.421%
5	4.270	4.256	4.303	VV	1822	30914	0.34%	0.016%
6	4.330	4.303	4.352	VV	3017	41728	0.46%	0.022%
7	4.359	4.352	4.367	VV	776	6666	0.07%	0.003%
8	4.384	4.367	4.398	VV	2122	23573	0.26%	0.012%
9	4.414	4.398	4.455	VV	3282	41612	0.46%	0.021%
10	4.467	4.455	4.474	VV	482	3986	0.04%	0.002%
11	4.489	4.474	4.514	VV	979	14605	0.16%	0.008%
12	4.524	4.514	4.545	VV	584	6695	0.07%	0.003%
13	4.550	4.545	4.571	VV	343	3766	0.04%	0.002%
14	4.599	4.571	4.633	VV	745	14467	0.16%	0.007%
15	4.639	4.633	4.665	VV	387	4225	0.05%	0.002%
16	4.705	4.665	4.720	PV	521	8130	0.09%	0.004%
17	4.726	4.720	4.730	VV	283	1287	0.01%	0.001%
18	4.736	4.730	4.742	VV	345	1886	0.02%	0.001%
19	4.785	4.742	4.819	VV	6130	92976	1.03%	0.048%
20	4.842	4.819	4.895	VV	1507	27303	0.30%	0.014%
21	4.901	4.895	4.925	VV	376	4620	0.05%	0.002%
22	4.950	4.925	4.962	VV	319	4749	0.05%	0.002%
23	4.982	4.962	4.997	VV	546	7298	0.08%	0.004%
24	5.004	4.997	5.010	VV	195	1382	0.02%	0.001%
25	5.030	5.010	5.102	VV	2137	48642	0.54%	0.025%
26	5.110	5.102	5.119	VV	516	3528	0.04%	0.002%
27	5.121	5.119	5.136	VV	423	2808	0.03%	0.001%
28	5.139	5.136	5.145	VV	330	1329	0.01%	0.001%
29	5.160	5.145	5.169	VV	383	4319	0.05%	0.002%
30	5.188	5.169	5.209	VV	1349	18111	0.20%	0.009%
31	5.226	5.209	5.257	VV	2203	26123	0.29%	0.013%
32	5.281	5.257	5.309	VV	788	12684	0.14%	0.007%
33	5.319	5.309	5.332	VV	301	3266	0.04%	0.002%
34	5.350	5.332	5.379	VV	680	11298	0.12%	0.006%
35	5.382	5.379	5.399	VV	333	2485	0.03%	0.001%
36	5.409	5.399	5.422	VV	236	1737	0.02%	0.001%

Instrument :
FID_D
ClientSampleId :
WB-307-SB01MSD

Manual IntegrationsAPPROVED

Reviewed By :Yogesh Patel 11/11/2024
Supervised By :Ankita Jodhani 11/11/2024

rteres

37	5.433	5.422	5.445	VV	398	3404	0.04%	0.002%
38	5.455	5.445	5.460	VV	316	2120		
39	5.470	5.460	5.501	VV	571	8534		
40	5.508	5.501	5.530	VV	469	6239		
41	5.543	5.530	5.574	VV	456	8566		
42	5.579	5.574	5.590	VV	366	1726		
43	5.605	5.590	5.614	PV	411	3885	0.04%	0.002%
44	5.628	5.614	5.645	VV	274	3969	0.04%	0.002%
45	5.654	5.645	5.668	VV	364	4158	0.05%	0.002%
46	5.710	5.668	5.808	VV	814364	7544129	83.37%	3.891%
47	5.821	5.808	5.843	VV	2340	35785	0.40%	0.018%
48	5.846	5.843	5.855	VV	1029	6761	0.07%	0.003%
49	5.893	5.855	5.916	VV	2161	52584	0.58%	0.027%
50	5.934	5.916	5.944	VV	1158	14164	0.16%	0.007%
51	5.949	5.944	5.969	VV	1058	11978	0.13%	0.006%
52	5.981	5.969	6.015	VV	1071	16199	0.18%	0.008%
53	6.035	6.015	6.057	VV	1295	22389	0.25%	0.012%
54	6.074	6.057	6.100	VV	1028	16852	0.19%	0.009%
55	6.125	6.100	6.132	VV	970	13739	0.15%	0.007%
56	6.156	6.132	6.187	VV	82051	803179	8.88%	0.414%
57	6.197	6.187	6.218	VV	1383	17014	0.19%	0.009%
58	6.240	6.218	6.259	VV	1878	28093	0.31%	0.014%
59	6.274	6.259	6.282	VV	1064	12000	0.13%	0.006%
60	6.304	6.282	6.325	VV	2747	42809	0.47%	0.022%
61	6.338	6.325	6.355	VV	1002	13747	0.15%	0.007%
62	6.377	6.355	6.389	VV	1730	21966	0.24%	0.011%
63	6.405	6.389	6.435	VV	1148	21653	0.24%	0.011%
64	6.474	6.435	6.500	VV	1161	29265	0.32%	0.015%
65	6.537	6.500	6.573	VV	1023	35495	0.39%	0.018%
66	6.592	6.573	6.613	VV	2194	33317	0.37%	0.017%
67	6.668	6.613	6.725	VV	19028	316137	3.49%	0.163%
68	6.757	6.725	6.826	VV	728028	7300621	80.68%	3.765%
69	6.853	6.826	6.886	VV	4629	113345	1.25%	0.058%
70	6.905	6.886	6.915	VV	3478	48334	0.53%	0.025%
71	6.932	6.915	6.954	VV	6176	100326	1.11%	0.052%
72	6.974	6.954	6.981	VV	4403	61740	0.68%	0.032%
73	7.004	6.981	7.026	VV	5099	113379	1.25%	0.058%
74	7.039	7.026	7.052	VV	3968	53763	0.59%	0.028%
75	7.073	7.052	7.097	VV	15865	197121	2.18%	0.102%
76	7.126	7.097	7.147	VV	3111	82546	0.91%	0.043%
77	7.162	7.147	7.179	VV	3318	56985	0.63%	0.029%
78	7.191	7.179	7.207	VV	3197	49615	0.55%	0.026%
79	7.241	7.207	7.268	VV	5765	130186	1.44%	0.067%
80	7.281	7.268	7.296	VV	2713	43237	0.48%	0.022%
81	7.303	7.296	7.311	VV	2368	19998	0.22%	0.010%
82	7.332	7.311	7.343	VV	4823	70204	0.78%	0.036%
83	7.371	7.343	7.420	VV	936263	9048841	100.00%	4.667%
84	7.430	7.420	7.463	VV	5545	116282	1.29%	0.060%
85	7.482	7.463	7.510	VV	6145	126787	1.40%	0.065%
86	7.526	7.510	7.540	VV	5711	83647	0.92%	0.043%
87	7.551	7.540	7.568	VV	4808	68074	0.75%	0.035%
88	7.591	7.568	7.607	VV	5047	91094	1.01%	0.047%
89	7.635	7.607	7.657	VV	8323	147160	1.63%	0.076%

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90	7.664	7.657	7.673	VV	3326	31956	0.35%	0.016%
91	7.690	7.673	7.709	VV	6183	88875		
92	7.724	7.709	7.735	VV	3087	45276		
93	7.758	7.735	7.780	VV	12822	170672		
94	7.796	7.780	7.829	VV	4169	88707		
95	7.843	7.829	7.858	VV	4697	63343		
96	7.874	7.858	7.880	VV	3182	40709	0.45%	0.021%
97	7.900	7.880	7.912	VV	3693	65373	0.72%	0.034%
98	7.937	7.912	7.965	VV	113597	1212813	13.40%	0.625%
99	7.984	7.965	7.996	VV	4580	68305	0.75%	0.035%
100	8.024	7.996	8.065	VV	842787	8339221	92.16%	4.301%
101	8.072	8.065	8.104	VV	5889	104786	1.16%	0.054%
102	8.109	8.104	8.117	VV	3131	23940	0.26%	0.012%
103	8.130	8.117	8.154	VV	3999	69952	0.77%	0.036%
104	8.166	8.154	8.190	VV	3003	55552	0.61%	0.029%
105	8.221	8.190	8.271	VV	525436	5420474	59.90%	2.795%
106	8.284	8.271	8.292	VV	7411	84603	0.93%	0.044%
107	8.319	8.292	8.373	VV	894111	8868199	98.00%	4.574%
108	8.381	8.373	8.407	VV	4556	75574	0.84%	0.039%
109	8.425	8.407	8.448	VV	4242	83311	0.92%	0.043%
110	8.468	8.448	8.506	VV	10806	174195	1.93%	0.090%
111	8.523	8.506	8.567	VV	3492	82502	0.91%	0.043%
112	8.584	8.567	8.602	VV	2038	35866	0.40%	0.018%
113	8.612	8.602	8.626	VV	2090	28935	0.32%	0.015%
114	8.654	8.626	8.711	VV	70684	789988	8.73%	0.407%
115	8.727	8.711	8.734	VV	3361	38747	0.43%	0.020%
116	8.753	8.734	8.790	VV	15513	221721	2.45%	0.114%
117	8.802	8.790	8.820	VV	2187	31269	0.35%	0.016%
118	8.838	8.820	8.864	VV	1929	34688	0.38%	0.018%
119	8.888	8.864	8.921	VV	1458	32477	0.36%	0.017%
120	8.940	8.921	8.947	VV	1048	12312	0.14%	0.006%
121	8.951	8.947	8.958	VV	1059	5849	0.06%	0.003%
122	8.978	8.958	9.000	VV	1227	22965	0.25%	0.012%
123	9.028	9.000	9.040	VV	1037	19099	0.21%	0.010%
124	9.052	9.040	9.064	VV	1028	12919	0.14%	0.007%
125	9.098	9.064	9.236	VV	845142	8856952	97.88%	4.568%
126	9.256	9.236	9.294	VV	1637	33091	0.37%	0.017%
127	9.315	9.294	9.345	VV	11344	154077	1.70%	0.079%
128	9.355	9.345	9.369	VV	1954	21909	0.24%	0.011%
129	9.386	9.369	9.460	VV	25151	382068	4.22%	0.197%
130	9.472	9.460	9.495	VV	1523	24213	0.27%	0.012%
131	9.525	9.495	9.562	VV	79935	862689	9.53%	0.445%
132	9.579	9.562	9.587	VV	445	5323	0.06%	0.003%
133	9.591	9.587	9.595	VV	466	1977	0.02%	0.001%
134	9.618	9.595	9.660	VV	726	20790	0.23%	0.011%
135	9.675	9.660	9.683	VV	416	4184	0.05%	0.002%
136	9.692	9.683	9.721	VV	380	5654	0.06%	0.003%
137	9.746	9.721	9.760	VV	430	6210	0.07%	0.003%
138	9.789	9.760	9.799	VV	511	7269	0.08%	0.004%
139	9.801	9.799	9.822	VV	395	3946	0.04%	0.002%
140	9.842	9.822	9.850	VV	740	9109	0.10%	0.005%
141	9.857	9.850	9.862	VV	505	3481	0.04%	0.002%

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142	9.869	9.862	9.899	VV	503	8732	0.10%	0.005%
143	9.906	9.899	9.912	VV	668	4491		
144	9.918	9.912	9.932	VV	763	7100		
145	9.946	9.932	9.978	VV	785	16202		
146	9.983	9.978	10.007	VV	562	8448		
147	10.027	10.007	10.067	VV	1011	19103		
148	10.073	10.067	10.084	VV	384	2769	0.03%	0.001%
149	10.107	10.084	10.127	VV	1030	18166	0.20%	0.009%
150	10.135	10.127	10.157	VV	1089	16442	0.18%	0.008%
151	10.162	10.157	10.180	VV	764	8533	0.09%	0.004%
152	10.199	10.180	10.217	VV	833	16094	0.18%	0.008%
153	10.222	10.217	10.245	VV	804	12024	0.13%	0.006%
154	10.260	10.245	10.285	VV	1187	20470	0.23%	0.011%
155	10.303	10.285	10.357	VV	5201	89128	0.98%	0.046%
156	10.383	10.357	10.411	VV	2054	32768	0.36%	0.017%
157	10.452	10.411	10.456	PV	5944	46465	0.51%	0.024%
158	10.485	10.456	10.530	VV	844613	8825855	97.54%	4.552%
159	10.561	10.530	10.670	VV	796596	8833920	97.62%	4.556%
160	10.678	10.670	10.705	VV	2407	38214	0.42%	0.020%
161	10.715	10.705	10.722	VV	1492	13442	0.15%	0.007%
162	10.723	10.722	10.729	VV	1296	4711	0.05%	0.002%
163	10.736	10.729	10.745	VV	1110	9000	0.10%	0.005%
164	10.759	10.745	10.819	VV	1399	34974	0.39%	0.018%
165	10.838	10.819	10.871	VV	1810	35063	0.39%	0.018%
166	10.889	10.871	10.916	VV	1166	23452	0.26%	0.012%
167	10.956	10.916	11.002	VV	75905	869547	9.61%	0.448%
168	11.008	11.002	11.014	VV	657	3724	0.04%	0.002%
169	11.038	11.014	11.065	VV	1437	23900	0.26%	0.012%
170	11.071	11.065	11.090	VV	503	5716	0.06%	0.003%
171	11.109	11.090	11.131	VV	902	12085	0.13%	0.006%
172	11.151	11.131	11.183	VV	785	13625	0.15%	0.007%
173	11.187	11.183	11.195	VV	271	1661	0.02%	0.001%
174	11.200	11.195	11.210	VV	277	1645	0.02%	0.001%
175	11.255	11.210	11.304	VV	555328	5940924	65.65%	3.064%
176	11.308	11.304	11.316	VV	1140	7127	0.08%	0.004%
177	11.325	11.316	11.369	VV	975	26331	0.29%	0.014%
178	11.388	11.369	11.394	VV	971	11052	0.12%	0.006%
179	11.424	11.394	11.444	VV	2181	40366	0.45%	0.021%
180	11.459	11.444	11.471	VV	1156	14875	0.16%	0.008%
181	11.488	11.471	11.526	VV	1247	27887	0.31%	0.014%
182	11.537	11.526	11.570	VV	512	11655	0.13%	0.006%
183	11.613	11.570	11.639	VV	1454	35162	0.39%	0.018%
184	11.676	11.639	11.698	VV	8070	107542	1.19%	0.055%
185	11.710	11.698	11.735	VV	1664	23719	0.26%	0.012%
186	11.754	11.735	11.764	VV	940	13381	0.15%	0.007%
187	11.770	11.764	11.789	VV	799	9916	0.11%	0.005%
188	11.838	11.789	11.849	VV	1467	35982	0.40%	0.019%
189	11.872	11.849	11.946	VV	27761	382893	4.23%	0.197%
190	11.960	11.946	11.974	VV	1132	16494	0.18%	0.009%
191	11.977	11.974	11.983	VV	904	4843	0.05%	0.002%
192	11.994	11.983	12.013	VV	998	15955	0.18%	0.008%
193	12.024	12.013	12.044	VV	1104	17440	0.19%	0.009%
194	12.050	12.044	12.058	VV	959	6429	0.07%	0.003%

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195	12.087	12.058	12.101	VV	1150	22038	0.24%	0.011%
196	12.125	12.101	12.148	VV	4351	64316		
197	12.183	12.148	12.195	VV	1679	31231		
198	12.223	12.195	12.234	VV	5031	64966		
199	12.258	12.234	12.265	VV	75799	737053		
200	12.290	12.265	12.373	VV	782031	9023530	9	
201	12.379	12.373	12.383	VV	1279	6465	0.07%	0.003%
202	12.391	12.383	12.410	VV	1404	20187	0.22%	0.010%
203	12.417	12.410	12.423	VV	1063	7599	0.08%	0.004%
204	12.436	12.423	12.452	VV	1060	16174	0.18%	0.008%
205	12.475	12.452	12.524	VV	6812	118315	1.31%	0.061%
206	12.534	12.524	12.545	VV	1086	12554	0.14%	0.006%
207	12.583	12.545	12.632	VV	773866	8866792	97.99%	4.573%
208	12.650	12.632	12.669	VV	8408	129997	1.44%	0.067%
209	12.695	12.669	12.725	VV	93261	1097338	12.13%	0.566%
210	12.742	12.725	12.772	VV	1999	43940	0.49%	0.023%
211	12.776	12.772	12.795	VV	1175	14735	0.16%	0.008%
212	12.803	12.795	12.809	VV	1088	7821	0.09%	0.004%
213	12.828	12.809	12.835	VV	1408	19487	0.22%	0.010%
214	12.865	12.835	12.893	VV	70147	833997	9.22%	0.430%
215	12.922	12.893	12.969	VV	5439	117025	1.29%	0.060%
216	12.992	12.969	13.007	VV	1289	25099	0.28%	0.013%
217	13.014	13.007	13.042	VV	1054	19613	0.22%	0.010%
218	13.095	13.042	13.172	VV	11640	244536	2.70%	0.126%
219	13.210	13.172	13.237	VV	1684	48015	0.53%	0.025%
220	13.239	13.237	13.255	VV	1111	10562	0.12%	0.005%
221	13.271	13.255	13.289	VV	1424	23713	0.26%	0.012%
222	13.294	13.289	13.303	VV	1116	8960	0.10%	0.005%
223	13.318	13.303	13.337	VV	1368	22340	0.25%	0.012%
224	13.353	13.337	13.365	VV	1234	17804	0.20%	0.009%
225	13.394	13.365	13.417	VV	1535	35127	0.39%	0.018%
226	13.448	13.417	13.499	VV	67856	846117	9.35%	0.436%
227	13.510	13.499	13.539	VV	1170	22227	0.25%	0.011%
228	13.541	13.539	13.572	VV	638	11228	0.12%	0.006%
229	13.576	13.572	13.580	VV	593	2389	0.03%	0.001%
230	13.587	13.580	13.600	VV	623	5932	0.07%	0.003%
231	13.608	13.600	13.637	VV	618	11420	0.13%	0.006%
232	13.642	13.637	13.647	VV	543	2708	0.03%	0.001%
233	13.661	13.647	13.667	VV	627	6526	0.07%	0.003%
234	13.672	13.667	13.677	VV	619	3056	0.03%	0.002%
235	13.705	13.677	13.724	VV	735	17122	0.19%	0.009%
236	13.728	13.724	13.733	VV	647	3380	0.04%	0.002%
237	13.740	13.733	13.774	VV	742	15377	0.17%	0.008%
238	13.784	13.774	13.799	VV	732	8120	0.09%	0.004%
239	13.806	13.799	13.811	VV	692	4149	0.05%	0.002%
240	13.814	13.811	13.819	VV	548	2426	0.03%	0.001%
241	13.845	13.819	13.861	VV	1108	21933	0.24%	0.011%
242	13.885	13.861	13.913	VV	2002	39591	0.44%	0.020%
243	13.918	13.913	13.952	VV	1086	18022	0.20%	0.009%
244	13.970	13.952	13.994	VV	1607	25711	0.28%	0.013%
245	14.003	13.994	14.031	VV	1065	20306	0.22%	0.010%
246	14.036	14.031	14.061	VV	874	13372	0.15%	0.007%

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247	14.067	14.061	14.080	VV	808	7774	0.09%	0.004%
248	14.107	14.080	14.114	VV	1310	19906		
249	14.116	14.114	14.143	VV	1230	18084		
250	14.165	14.143	14.197	VV	1451	33191		
251	14.205	14.197	14.249	VV	870	23257		
252	14.259	14.249	14.263	VV	804	6177		
253	14.272	14.263	14.292	VV	849	13281	0.15%	0.007%
254	14.313	14.292	14.338	VV	976	22554	0.25%	0.012%
255	14.353	14.338	14.374	VV	981	17114	0.19%	0.009%
256	14.393	14.374	14.403	VV	1046	16042	0.18%	0.008%
257	14.408	14.403	14.413	VV	915	5338	0.06%	0.003%
258	14.453	14.413	14.471	VV	656348	8343508	92.21%	4.303%
259	14.495	14.471	14.524	VV	696962	8310594	91.84%	4.286%
260	14.544	14.524	14.575	VV	68294	939667	10.38%	0.485%
261	14.585	14.575	14.632	VV	4067	93877	1.04%	0.048%
262	14.637	14.632	14.642	VV	1749	10071	0.11%	0.005%
263	14.646	14.642	14.665	VV	1754	22383	0.25%	0.012%
264	14.670	14.665	14.702	VV	1588	27083	0.30%	0.014%
265	14.716	14.702	14.768	VV	1452	43876	0.48%	0.023%
266	14.775	14.768	14.792	VV	1097	13802	0.15%	0.007%
267	14.795	14.792	14.819	VV	1009	11897	0.13%	0.006%
268	14.837	14.819	14.844	VV	918	11220	0.12%	0.006%
269	14.850	14.844	14.863	VV	975	9858	0.11%	0.005%
270	14.884	14.863	14.896	VV	2757	35590	0.39%	0.018%
271	14.919	14.896	15.027	VV	13992	326922	3.61%	0.169%
272	15.032	15.027	15.045	VV	1224	12579	0.14%	0.006%
273	15.073	15.045	15.099	VV	3824	67498	0.75%	0.035%
274	15.114	15.099	15.139	VV	1205	23508	0.26%	0.012%
275	15.161	15.139	15.231	VV	1344	58990	0.65%	0.030%
276	15.262	15.231	15.274	VV	1590	31580	0.35%	0.016%
277	15.279	15.274	15.289	VV	1205	9675	0.11%	0.005%
278	15.292	15.289	15.296	VV	1243	5237	0.06%	0.003%
279	15.301	15.296	15.314	VV	1273	13192	0.15%	0.007%
280	15.319	15.314	15.339	VV	1229	16187	0.18%	0.008%
281	15.356	15.339	15.374	VV	1262	23432	0.26%	0.012%
282	15.377	15.374	15.387	VV	1099	8596	0.09%	0.004%
283	15.402	15.387	15.412	VV	1469	19178	0.21%	0.010%
284	15.417	15.412	15.428	VV	1369	12003	0.13%	0.006%
285	15.442	15.428	15.473	VV	1381	31576	0.35%	0.016%
286	15.489	15.473	15.493	VV	1160	12415	0.14%	0.006%
287	15.498	15.493	15.502	VV	1151	5801	0.06%	0.003%
288	15.504	15.502	15.510	VV	1173	5602	0.06%	0.003%
289	15.520	15.510	15.528	VV	1489	14633	0.16%	0.008%
290	15.561	15.528	15.597	VV	57712	772681	8.54%	0.398%
291	15.607	15.597	15.612	VV	1331	11391	0.13%	0.006%
292	15.617	15.612	15.636	VV	1281	15831	0.17%	0.008%
293	15.640	15.636	15.657	VV	908	10469	0.12%	0.005%
294	15.663	15.657	15.688	VV	836	12622	0.14%	0.007%
295	15.709	15.688	15.752	VV	1035	33344	0.37%	0.017%
296	15.761	15.752	15.770	VV	1023	9481	0.10%	0.005%
297	15.774	15.770	15.782	VV	977	6499	0.07%	0.003%
298	15.792	15.782	15.810	VV	963	13820	0.15%	0.007%
299	15.830	15.810	15.855	VV	1086	23459	0.26%	0.012%

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300	15.887	15.855	15.906	VV	938	25533	0.28%	0.013%
301	15.932	15.906	15.959	VV	1862	43615		
302	16.001	15.959	16.015	VV	610703	8376197	92	
303	16.036	16.015	16.094	VV	706949	8428946	93	
304	16.116	16.094	16.142	VV	5853	111098		
305	16.145	16.142	16.164	VV	2038	24837		
306	16.181	16.164	16.207	VV	2163	48988	0.54%	0.025%
307	16.212	16.207	16.217	VV	1714	9694	0.11%	0.005%
308	16.259	16.217	16.303	VV	3930	111000	1.23%	0.057%
309	16.318	16.303	16.336	VV	2572	39059	0.43%	0.020%
310	16.377	16.336	16.454	VV	615259	8146995	90.03%	4.202%
311	16.503	16.454	16.533	VV	58410	906689	10.02%	0.468%
312	16.547	16.533	16.570	VV	3976	66017	0.73%	0.034%
313	16.579	16.570	16.601	VV	1817	29491	0.33%	0.015%
314	16.605	16.601	16.615	VV	1535	12710	0.14%	0.007%
315	16.623	16.615	16.627	VV	1531	10200	0.11%	0.005%
316	16.631	16.627	16.637	VV	1454	8594	0.09%	0.004%
317	16.654	16.637	16.667	VV	1625	26950	0.30%	0.014%
318	16.675	16.667	16.685	VV	1594	15524	0.17%	0.008%
319	16.695	16.685	16.700	VV	1484	12488	0.14%	0.006%
320	16.704	16.700	16.732	VV	1619	28549	0.32%	0.015%
321	16.748	16.732	16.753	VV	1405	15778	0.17%	0.008%
322	16.768	16.753	16.777	VV	1568	20529	0.23%	0.011%
323	16.808	16.777	16.848	VV	2260	77533	0.86%	0.040%
324	16.874	16.848	16.906	VV	1985	57872	0.64%	0.030%
325	16.949	16.906	16.985	VV	3229	95635	1.06%	0.049%
326	17.031	16.985	17.039	VV	1672	45209	0.50%	0.023%
327	17.047	17.039	17.055	VV	1614	14819	0.16%	0.008%
328	17.070	17.055	17.086	VV	1770	30651	0.34%	0.016%
329	17.096	17.086	17.102	VV	1595	15247	0.17%	0.008%
330	17.110	17.102	17.118	VV	1638	14266	0.16%	0.007%
331	17.127	17.118	17.135	VV	1552	14310	0.16%	0.007%
332	17.147	17.135	17.169	VV	1640	31276	0.35%	0.016%
333	17.184	17.169	17.204	VV	1675	31727	0.35%	0.016%
334	17.207	17.204	17.217	VV	1616	12189	0.13%	0.006%
335	17.247	17.217	17.257	VV	1917	40156	0.44%	0.021%
336	17.278	17.257	17.314	VV	2322	64437	0.71%	0.033%
337	17.319	17.314	17.323	VV	1743	8889	0.10%	0.005%
338	17.389	17.323	17.434	VV	54911	842906	9.32%	0.435%
339	17.439	17.434	17.447	VV	1771	13308	0.15%	0.007%
340	17.475	17.447	17.512	VV	4560	107101	1.18%	0.055%
341	17.519	17.512	17.528	VV	1913	16558	0.18%	0.009%
342	17.541	17.528	17.567	VV	2078	43832	0.48%	0.023%
343	17.583	17.567	17.620	VV	1853	55529	0.61%	0.029%
344	17.625	17.620	17.643	VV	1731	21681	0.24%	0.011%
345	17.690	17.643	17.702	VV	2437	74076	0.82%	0.038%
346	17.746	17.702	17.759	VV	601765	8361177	92.40%	4.312%
347	17.782	17.759	17.953	VV	585095	8440594	93.28%	4.353%
348	17.998	17.953	18.139	VV	549653	8497722	93.91%	4.382%

Sum of corrected areas: 193903623

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Manual Integration Report

Sequence:	FC102324AL	Instrument	FID_c

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason

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

Manual Integration Report

Sequence:	FC110824AL	Instrument	FID_c

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
P4721-01	FC067680.D	1-chlorooctadecane (SURR)	yogesh	11/11/2024 9:23:48 AM	Ankita	11/11/2024 9:54:58	Peak Integrated by Software

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Manual Integration Report

Sequence:	FC111124AL	Instrument	FID_c

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
P4721-01DL	FC067688.D	1-chlorooctadecane (SURR)	yogesh	11/12/2024 8:37:44 AM	Ankita	11/12/2024 10:07:19	Peak Integrated by Software
P4721-02DL	FC067690.D	1-chlorooctadecane (SURR)	yogesh	11/12/2024 8:37:47 AM	Ankita	11/12/2024 10:07:21	Peak Integrated by Software
P4721-02DL2	FC067691.D	1-chlorooctadecane (SURR)	yogesh	11/12/2024 8:37:48 AM	Ankita	11/12/2024 10:07:23	Peak Integrated by Software
P4791-02	FC067698.D	1-chlorooctadecane (SURR)	yogesh	11/12/2024 8:37:50 AM	Ankita	11/12/2024 10:07:25	Peak Integrated by Software
P4792-04	FC067699.D	1-chlorooctadecane (SURR)	yogesh	11/12/2024 8:37:51 AM	Ankita	11/12/2024 10:07:26	Peak Integrated by Software
20 PPM ALIPHATIC HC	FC067701.D	n-Hexatriacontane (C36)	yogesh	11/12/2024 8:37:53 AM	Ankita	11/12/2024 10:07:28	Peak Integrated by Software
20 PPM ALIPHATIC HC	FC067701.D	n-Octatriacontane (C38)	yogesh	11/12/2024 8:37:53 AM	Ankita	11/12/2024 10:07:28	Peak Integrated by Software
20 PPM ALIPHATIC HC	FC067701.D	n-Tetracontane (C40)	yogesh	11/12/2024 8:37:53 AM	Ankita	11/12/2024 10:07:28	Peak Integrated by Software

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Manual Integration Report

Sequence:	FD102324AR	Instrument	FID_d

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason

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

Manual Integration Report

Sequence:	FD110824AR	Instrument	FID_d

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
20 PPM AROMATIC HC	FD048669.D	Benzo[a]anthracene (C26.37)	yogesh	11/11/2024 9:24:04 AM	Ankita	11/11/2024 9:55:12	Peak Integrated by Software
20 PPM AROMATIC HC	FD048669.D	benzo[b]fluoranthene (C30.41)	yogesh	11/11/2024 9:24:04 AM	Ankita	11/11/2024 9:55:12	Peak Integrated by Software
20 PPM AROMATIC HC	FD048669.D	Bnezo[k]fluoranthene (C30.14)	yogesh	11/11/2024 9:24:04 AM	Ankita	11/11/2024 9:55:12	Peak Integrated by Software
20 PPM AROMATIC HC	FD048669.D	Fluoranthene (C21.85)	yogesh	11/11/2024 9:24:04 AM	Ankita	11/11/2024 9:55:12	Peak Integrated by Software
PB164790BS	FD048674.D	1,2,3-Trimethylbenzene (C10.1)	yogesh	11/11/2024 9:24:06 AM	Ankita	11/11/2024 9:55:14	Peak Integrated by Software
PB164790BS	FD048674.D	Fluoranthene (C21.85)	yogesh	11/11/2024 9:24:06 AM	Ankita	11/11/2024 9:55:14	Peak Integrated by Software
PB164790BSD	FD048675.D	1,2,3-Trimethylbenzene (C10.1)	yogesh	11/11/2024 9:24:08 AM	Ankita	11/11/2024 9:55:15	Peak Integrated by Software
PB164790BSD	FD048675.D	Fluoranthene (C21.85)	yogesh	11/11/2024 9:24:08 AM	Ankita	11/11/2024 9:55:15	Peak Integrated by Software
P4718-01MS	FD048678.D	1,2,3-Trimethylbenzene (C10.1)	yogesh	11/11/2024 9:24:10 AM	Ankita	11/11/2024 9:55:17	Peak Integrated by Software
P4718-01MS	FD048678.D	Benzo[a]anthracene (C26.37)	yogesh	11/11/2024 9:24:10 AM	Ankita	11/11/2024 9:55:17	Peak Integrated by Software
P4718-01MS	FD048678.D	Fluoranthene (C21.85)	yogesh	11/11/2024 9:24:10 AM	Ankita	11/11/2024 9:55:17	Peak Integrated by Software
P4718-01MS	FD048678.D	ortho-Terphenyl (SURR)	yogesh	11/11/2024 9:24:10 AM	Ankita	11/11/2024 9:55:17	Peak Integrated by Software
P4718-01MSD	FD048679.D	1,2,3-Trimethylbenzene (C10.1)	yogesh	11/11/2024 9:24:11 AM	Ankita	11/11/2024 9:55:18	Peak Integrated by Software

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Manual Integration Report

Sequence:	FD110824AR	Instrument	FID_d

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
P4718-01MSD	FD048679.D	Fluoranthene (C21.85)	yogesh	11/11/2024 9:24:11 AM	Ankita	11/11/2024 9:55:18	Peak Integrated by Software
P4721-01	FD048681.D	2-Bromonaphthalene (SURR)	yogesh	11/11/2024 9:24:13 AM	Ankita	11/11/2024 9:55:20	Peak Integrated by Software
P4721-01	FD048681.D	2-Flurobiphenyl (SURR)	yogesh	11/11/2024 9:24:13 AM	Ankita	11/11/2024 9:55:20	Peak Integrated by Software
P4721-01	FD048681.D	ortho-Terphenyl (SURR)	yogesh	11/11/2024 9:24:13 AM	Ankita	11/11/2024 9:55:20	Peak Integrated by Software
P4721-02	FD048682.D	2-Bromonaphthalene (SURR)	yogesh	11/11/2024 9:24:15 AM	Ankita	11/11/2024 9:55:21	Peak Integrated by Software
P4721-02	FD048682.D	2-Flurobiphenyl (SURR)	yogesh	11/11/2024 9:24:15 AM	Ankita	11/11/2024 9:55:21	Peak Integrated by Software
P4721-02	FD048682.D	ortho-Terphenyl (SURR)	yogesh	11/11/2024 9:24:15 AM	Ankita	11/11/2024 9:55:21	Peak Integrated by Software
P4721-03	FD048683.D	2-Bromonaphthalene (SURR)	yogesh	11/11/2024 9:24:17 AM	Ankita	11/11/2024 9:55:23	Peak Integrated by Software
P4721-03	FD048683.D	2-Flurobiphenyl (SURR)	yogesh	11/11/2024 9:24:17 AM	Ankita	11/11/2024 9:55:23	Peak Integrated by Software
P4721-03	FD048683.D	ortho-Terphenyl (SURR)	yogesh	11/11/2024 9:24:17 AM	Ankita	11/11/2024 9:55:23	Peak Integrated by Software
P4721-04	FD048684.D	2-Bromonaphthalene (SURR)	yogesh	11/11/2024 9:24:18 AM	Ankita	11/11/2024 9:55:24	Peak Integrated by Software
P4721-04	FD048684.D	2-Flurobiphenyl (SURR)	yogesh	11/11/2024 9:24:18 AM	Ankita	11/11/2024 9:55:24	Peak Integrated by Software
P4721-04	FD048684.D	ortho-Terphenyl (SURR)	yogesh	11/11/2024 9:24:18 AM	Ankita	11/11/2024 9:55:24	Peak Integrated by Software

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Manual Integration Report

Sequence:	FD110824AR	Instrument	FID_d

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason

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Manual Integration Report

Sequence:	FD111124AR	Instrument	FID_d

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
P4721-01DL	FD048691.D	2-Bromonaphthalene (SURR)	yogesh	11/12/2024 8:36:59 AM	Ankita	11/12/2024 10:06:46	Peak Integrated by Software
P4721-01DL	FD048691.D	2-Flurobiphenyl (SURR)	yogesh	11/12/2024 8:36:59 AM	Ankita	11/12/2024 10:06:46	Peak Integrated by Software
P4721-01DL	FD048691.D	ortho-Terphenyl (SURR)	yogesh	11/12/2024 8:36:59 AM	Ankita	11/12/2024 10:06:46	Peak Integrated by Software
P4721-02DL	FD048692.D	2-Bromonaphthalene (SURR)	yogesh	11/12/2024 8:37:01 AM	Ankita	11/12/2024 10:06:47	Peak Integrated by Software
P4721-02DL	FD048692.D	2-Flurobiphenyl (SURR)	yogesh	11/12/2024 8:37:01 AM	Ankita	11/12/2024 10:06:47	Peak Integrated by Software
P4721-03DL	FD048693.D	2-Bromonaphthalene (SURR)	yogesh	11/12/2024 8:37:03 AM	Ankita	11/12/2024 10:06:49	Peak Integrated by Software
P4721-03DL	FD048693.D	2-Flurobiphenyl (SURR)	yogesh	11/12/2024 8:37:03 AM	Ankita	11/12/2024 10:06:49	Peak Integrated by Software
P4721-03DL	FD048693.D	ortho-Terphenyl (SURR)	yogesh	11/12/2024 8:37:03 AM	Ankita	11/12/2024 10:06:49	Peak Integrated by Software
P4721-04DL	FD048694.D	2-Bromonaphthalene (SURR)	yogesh	11/12/2024 8:37:05 AM	Ankita	11/12/2024 10:06:50	Peak Integrated by Software
P4721-04DL	FD048694.D	2-Flurobiphenyl (SURR)	yogesh	11/12/2024 8:37:05 AM	Ankita	11/12/2024 10:06:50	Peak Integrated by Software
P4721-04DL	FD048694.D	ortho-Terphenyl (SURR)	yogesh	11/12/2024 8:37:05 AM	Ankita	11/12/2024 10:06:50	Peak Integrated by Software
P4721-04DL2	FD048695.D	2-Bromonaphthalene (SURR)	yogesh	11/12/2024 8:37:06 AM	Ankita	11/12/2024 10:06:52	Peak Integrated by Software
P4721-04DL2	FD048695.D	2-Flurobiphenyl (SURR)	yogesh	11/12/2024 8:37:06 AM	Ankita	11/12/2024 10:06:52	Peak Integrated by Software

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Manual Integration Report

Sequence:	FD111124AR	Instrument	FID_d

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason
P4721-04DL2	FD048695.D	ortho-Terphenyl (SURR)	yogesh	11/12/2024 8:37:06 AM	Ankita	11/12/2024 10:06:52	Peak Integrated by Software
PB164847BS	FD048699.D	1,2,3-Trimethylbenzene (C10.1)	yogesh	11/12/2024 8:37:08 AM	Ankita	11/12/2024 10:06:53	Peak Integrated by Software
PB164847BS	FD048699.D	Fluoranthene (C21.85)	yogesh	11/12/2024 8:37:08 AM	Ankita	11/12/2024 10:06:53	Peak Integrated by Software
PB164847BSD	FD048700.D	1,2,3-Trimethylbenzene (C10.1)	yogesh	11/12/2024 8:37:10 AM	Ankita	11/12/2024 10:06:55	Peak Integrated by Software
PB164847BSD	FD048700.D	Fluoranthene (C21.85)	yogesh	11/12/2024 8:37:10 AM	Ankita	11/12/2024 10:06:55	Peak Integrated by Software
P4791-02	FD048702.D	2-Bromonaphthalene (SURR)	yogesh	11/12/2024 8:37:12 AM	Ankita	11/12/2024 10:06:56	Peak Integrated by Software
P4791-02	FD048702.D	2-Flurobiphenyl (SURR)	yogesh	11/12/2024 8:37:12 AM	Ankita	11/12/2024 10:06:56	Peak Integrated by Software
P4791-02	FD048702.D	ortho-Terphenyl (SURR)	yogesh	11/12/2024 8:37:12 AM	Ankita	11/12/2024 10:06:56	Peak Integrated by Software
P4792-04	FD048703.D	ortho-Terphenyl (SURR)	yogesh	11/12/2024 8:37:14 AM	Ankita	11/12/2024 10:06:58	Peak Integrated by Software
20 PPM AROMATIC HC	FD048705.D	Bnezo[k]fluoranthene (C30.14)	yogesh	11/12/2024 8:37:15 AM	Ankita	11/12/2024 10:06:59	Peak Integrated by Software
20 PPM AROMATIC HC	FD048705.D	Chrysene (C27.41)	yogesh	11/12/2024 8:37:15 AM	Ankita	11/12/2024 10:06:59	Peak Integrated by Software
20 PPM AROMATIC HC	FD048705.D	Dibenz[a,h]anthracene (C30.36)	yogesh	11/12/2024 8:37:15 AM	Ankita	11/12/2024 10:06:59	Peak Integrated by Software
20 PPM AROMATIC HC	FD048705.D	Phenanthrene (C19.36)	yogesh	11/12/2024 8:37:15 AM	Ankita	11/12/2024 10:06:59	Peak Integrated by Software

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Manual Integration Report

Sequence:	FD111124AR	Instrument	FID_d

Sample ID	File ID	Parameter	Review By	Review On	Supervised By	Supervised On	Reason

284 Sheffield Street, Mountainside, New Jersey 07092, Phone : 908 789 8900,
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Instrument ID: FID_C

Daily Analysis Runlog For Sequence/QCBatch ID # FC102324AL

Review By	yogesh	Review On	10/23/2024 4:03:24 PM		
Supervise By	Ankita	Supervise On	10/24/2024 9:29:51 AM		
SubDirectory	FC102324AL	HP Acquire Method		HP Processing Method	FC102324AL

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23644,PP23646,PP23647,PP23648,PP23649
CCC	PP23647
Internal Standard/PEM	
ICV/I.BLK	PP23645,PP23650
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	MECL2	FC067504.D	23 Oct 2024 13:59	YP/AJ	Ok
2	I.BLK	FC067505.D	23 Oct 2024 14:35	YP/AJ	Ok
3	100 PPM ALIPHATIC HC STD1	FC067506.D	23 Oct 2024 15:12	YP/AJ	Ok
4	50 PPM ALIPHATIC HC STD2	FC067507.D	23 Oct 2024 15:48	YP/AJ	Ok
5	20 PPM ALIPHATIC HC STD3	FC067508.D	23 Oct 2024 16:25	YP/AJ	Ok
6	10 PPM ALIPHATIC HC STD4	FC067509.D	23 Oct 2024 17:02	YP/AJ	Ok
7	5 PPM ALIPHATIC HC STD5	FC067510.D	23 Oct 2024 17:38	YP/AJ	Ok
8	20 PPM ALIPHATIC HC STD ICV	FC067511.D	23 Oct 2024 18:14	YP/AJ	Ok
9	I.BLK	FC067512.D	23 Oct 2024 19:27	YP/AJ	Ok
10	20 PPM ALIPHATIC HC STD	FC067513.D	23 Oct 2024 20:03	YP/AJ	Ok

M : Manual Integration

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Instrument ID: FID_C

Daily Analysis Runlog For Sequence/QCBatch ID # FC110824AL

Review By	yogesh	Review On	11/8/2024 1:23:09 PM		
Supervise By	Ankita	Supervise On	11/11/2024 9:55:02 AM		
SubDirectory	FC110824AL	HP Acquire Method		HP Processing Method	FC102324AL

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23644,PP23646,PP23647,PP23648,PP23649
CCC	PP23647
Internal Standard/PEM	
ICV/I.BLK	PP23645,PP23650
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	MECL2	FC067667.D	08 Nov 2024 10:14	YP/AJ	Ok
2	I.BLK	FC067668.D	08 Nov 2024 12:41	YP/AJ	Ok
3	20 PPM ALIPHATIC HC STD	FC067669.D	08 Nov 2024 13:17	YP/AJ	Ok
4	PB164790BL	FC067670.D	08 Nov 2024 16:19	YP/AJ	Ok
5	PB164790BS	FC067671.D	08 Nov 2024 16:55	YP/AJ	Ok
6	PB164790BSD	FC067672.D	08 Nov 2024 17:32	YP/AJ	Ok
7	P4718-01	FC067673.D	08 Nov 2024 18:08	YP/AJ	Ok
8	P4718-01D	FC067674.D	08 Nov 2024 18:45	YP/AJ	Ok
9	P4718-01MS	FC067675.D	08 Nov 2024 19:21	YP/AJ	Ok
10	P4718-01MSD	FC067676.D	08 Nov 2024 19:57	YP/AJ	Ok
11	P4718-02	FC067677.D	08 Nov 2024 20:33	YP/AJ	Ok
12	P4771-05	FC067678.D	08 Nov 2024 21:10	YP/AJ	Dilution
13	P4771-07	FC067679.D	08 Nov 2024 21:46	YP/AJ	Ok
14	P4721-01	FC067680.D	08 Nov 2024 22:23	YP/AJ	Dilution
15	P4721-02	FC067681.D	08 Nov 2024 23:00	YP/AJ	Dilution
16	I.BLK	FC067682.D	08 Nov 2024 23:37	YP/AJ	Ok
17	20 PPM ALIPHATIC HC STD	FC067683.D	09 Nov 2024 00:50	YP/AJ	Ok

M : Manual Integration

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Instrument ID: FID_C

Daily Analysis Runlog For Sequence/QCBatch ID # FC111124AL

Review By	yogesh	Review On	11/11/2024 11:19:51 AM		
Supervise By	Ankita	Supervise On	11/12/2024 10:07:32 AM		
SubDirectory	FC111124AL	HP Acquire Method		HP Processing Method	FC102324AL

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23644,PP23646,PP23647,PP23648,PP23649
CCC	PP23647
Internal Standard/PEM	
ICV/I.BLK	PP23645,PP23650
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	MECL2	FC067684.D	11 Nov 2024 07:57	YP/AJ	Ok
2	I.BLK	FC067685.D	11 Nov 2024 08:33	YP/AJ	Ok
3	20 PPM ALIPHATIC HC STD	FC067686.D	11 Nov 2024 09:10	YP/AJ	Ok
4	P4771-05DL	FC067687.D	11 Nov 2024 09:48	YP/AJ	Ok
5	P4721-01DL	FC067688.D	11 Nov 2024 10:25	YP/AJ	Dilution
6	P4721-01DL2	FC067689.D	11 Nov 2024 11:02	YP/AJ	Ok
7	P4721-02DL	FC067690.D	11 Nov 2024 11:39	YP/AJ	Dilution
8	P4721-02DL2	FC067691.D	11 Nov 2024 12:15	YP/AJ	Ok,M
9	I.BLK	FC067692.D	11 Nov 2024 13:29	YP/AJ	Ok
10	20 PPM ALIPHATIC HC STD	FC067693.D	11 Nov 2024 14:05	YP/AJ	Ok
11	PB164847BL	FC067694.D	11 Nov 2024 15:19	YP/AJ	Ok
12	PB164847BS	FC067695.D	11 Nov 2024 15:56	YP/AJ	Ok
13	PB164847BSD	FC067696.D	11 Nov 2024 16:33	YP/AJ	Ok
14	P4718-04	FC067697.D	11 Nov 2024 17:10	YP/AJ	Ok
15	P4791-02	FC067698.D	11 Nov 2024 17:47	YP/AJ	Dilution
16	P4792-04	FC067699.D	11 Nov 2024 18:23	YP/AJ	Dilution
17	I.BLK	FC067700.D	12 Nov 2024 00:32	YP/AJ	Ok
18	20 PPM ALIPHATIC HC STD	FC067701.D	12 Nov 2024 01:09	YP/AJ	Ok,M

M : Manual Integration

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

Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD102324AR

Review By	yogesh	Review On	10/23/2024 4:04:27 PM		
Supervise By	Ankita	Supervise On	10/24/2024 9:29:45 AM		
SubDirectory	FD102324AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	MECL2	FD048566.D	23 Oct 2024 13:59	YP/AJ	Ok
2	I.BLK	FD048567.D	23 Oct 2024 14:35	YP/AJ	Ok
3	100 PPM AROMATIC HC STD1	FD048568.D	23 Oct 2024 15:12	YP/AJ	Ok
4	50 PPM AROMATIC HC STD2	FD048569.D	23 Oct 2024 15:48	YP/AJ	Ok
5	20 PPM AROMATIC HC STD3	FD048570.D	23 Oct 2024 16:25	YP/AJ	Ok
6	10 PPM AROMATIC HC STD4	FD048571.D	23 Oct 2024 17:02	YP/AJ	Ok
7	5 PPM AROMATIC HC STD5	FD048572.D	23 Oct 2024 17:38	YP/AJ	Ok
8	20 PPM AROMATIC HC STD ICV	FD048573.D	23 Oct 2024 18:14	YP/AJ	Ok
9	I.BLK	FD048574.D	23 Oct 2024 19:27	YP/AJ	Ok
10	20 PPM AROMATIC HC STD	FD048575.D	23 Oct 2024 20:03	YP/AJ	Ok

M : Manual Integration

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Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD110824AR

Review By	yogesh	Review On	11/8/2024 1:24:18 PM		
Supervise By	Ankita	Supervise On	11/11/2024 9:55:33 AM		
SubDirectory	FD110824AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	MECL2	FD048667.D	08 Nov 2024 10:14	YP/AJ	Ok
2	I.BLK	FD048668.D	08 Nov 2024 10:51	YP/AJ	Ok
3	20 PPM AROMATIC HC STD	FD048669.D	08 Nov 2024 11:28	YP/AJ	Ok,M
4	PP23948	FD048670.D	08 Nov 2024 12:05	YP/AJ	Ok
5	I.BLK	FD048671.D	08 Nov 2024 12:41	YP/AJ	Ok
6	20 PPM AROMATIC HC STD	FD048672.D	08 Nov 2024 13:17	YP/AJ	Ok
7	PB164790BL	FD048673.D	08 Nov 2024 16:19	YP/AJ	Ok
8	PB164790BS	FD048674.D	08 Nov 2024 16:55	YP/AJ	Ok,M
9	PB164790BSD	FD048675.D	08 Nov 2024 17:32	YP/AJ	Ok,M
10	P4718-01	FD048676.D	08 Nov 2024 18:08	YP/AJ	Ok
11	P4718-01D	FD048677.D	08 Nov 2024 18:45	YP/AJ	Ok
12	P4718-01MS	FD048678.D	08 Nov 2024 19:21	YP/AJ	Ok,M
13	P4718-01MSD	FD048679.D	08 Nov 2024 19:57	YP/AJ	Ok,M
14	P4718-02	FD048680.D	08 Nov 2024 20:33	YP/AJ	Ok
15	P4721-01	FD048681.D	08 Nov 2024 21:10	YP/AJ	Dilution
16	P4721-02	FD048682.D	08 Nov 2024 21:46	YP/AJ	Dilution
17	P4721-03	FD048683.D	08 Nov 2024 22:23	YP/AJ	Dilution
18	P4721-04	FD048684.D	08 Nov 2024 23:00	YP/AJ	Dilution
19	I.BLK	FD048685.D	08 Nov 2024 23:37	YP/AJ	Ok
20	20 PPM AROMATIC HC STD	FD048686.D	09 Nov 2024 00:50	YP/AJ	Ok

M : Manual Integration

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Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD111124AR

Review By	yogesh	Review On	11/11/2024 11:20:54 AM		
Supervise By	Ankita	Supervise On	11/12/2024 10:07:09 AM		
SubDirectory	FD111124AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	Data File Name	Date-Time	Operator	Status
1	MECL2	FD048687.D	11 Nov 2024 07:57	YP/AJ	Ok
2	I.BLK	FD048688.D	11 Nov 2024 08:33	YP/AJ	Ok
3	20 PPM AROMATIC HC STD	FD048689.D	11 Nov 2024 09:10	YP/AJ	Ok
4	P4721-06	FD048690.D	11 Nov 2024 09:48	YP/AJ	Ok
5	P4721-01DL	FD048691.D	11 Nov 2024 10:25	YP/AJ	Ok,M
6	P4721-02DL	FD048692.D	11 Nov 2024 11:02	YP/AJ	Ok,M
7	P4721-03DL	FD048693.D	11 Nov 2024 11:39	YP/AJ	Ok,M
8	P4721-04DL	FD048694.D	11 Nov 2024 12:15	YP/AJ	Dilution
9	P4721-04DL2	FD048695.D	11 Nov 2024 12:52	YP/AJ	Ok,M
10	I.BLK	FD048696.D	11 Nov 2024 14:05	YP/AJ	Ok
11	20 PPM AROMATIC HC STD	FD048697.D	11 Nov 2024 14:42	YP/AJ	Ok
12	PB164847BL	FD048698.D	11 Nov 2024 15:19	YP/AJ	Ok
13	PB164847BS	FD048699.D	11 Nov 2024 15:56	YP/AJ	Ok,M
14	PB164847BSD	FD048700.D	11 Nov 2024 16:33	YP/AJ	Ok,M
15	P4718-04	FD048701.D	11 Nov 2024 17:10	YP/AJ	Ok
16	P4791-02	FD048702.D	11 Nov 2024 17:47	YP/AJ	Dilution
17	P4792-04	FD048703.D	11 Nov 2024 18:23	YP/AJ	Dilution
18	I.BLK	FD048704.D	12 Nov 2024 00:32	YP/AJ	Ok
19	20 PPM AROMATIC HC STD	FD048705.D	12 Nov 2024 01:09	YP/AJ	Ok,M

M : Manual Integration

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Instrument ID: FID_C

Daily Analysis Runlog For Sequence/QCBatch ID # FC102324AL

Review By	yogesh	Review On	10/23/2024 4:03:24 PM		
Supervise By	Ankita	Supervise On	10/24/2024 9:29:51 AM		
SubDirectory	FC102324AL	HP Acquire Method		HP Processing Method	FC102324AL

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23644,PP23646,PP23647,PP23648,PP23649
CCC	PP23647
Internal Standard/PEM	
ICV/I.BLK	PP23645,PP23650
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	MECL2	MECL2	FC067504.D	23 Oct 2024 13:59		YP/AJ	Ok
2	I.BLK	I.BLK	FC067505.D	23 Oct 2024 14:35		YP/AJ	Ok
3	100 PPM ALIPHATIC H	100 PPM ALIPHATIC H	FC067506.D	23 Oct 2024 15:12		YP/AJ	Ok
4	50 PPM ALIPHATIC HC	50 PPM ALIPHATIC HC	FC067507.D	23 Oct 2024 15:48		YP/AJ	Ok
5	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067508.D	23 Oct 2024 16:25		YP/AJ	Ok
6	10 PPM ALIPHATIC HC	10 PPM ALIPHATIC HC	FC067509.D	23 Oct 2024 17:02		YP/AJ	Ok
7	5 PPM ALIPHATIC HC	5 PPM ALIPHATIC HC	FC067510.D	23 Oct 2024 17:38		YP/AJ	Ok
8	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067511.D	23 Oct 2024 18:14		YP/AJ	Ok
9	I.BLK	I.BLK	FC067512.D	23 Oct 2024 19:27		YP/AJ	Ok
10	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067513.D	23 Oct 2024 20:03		YP/AJ	Ok

M : Manual Integration

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Instrument ID: FID_C

Daily Analysis Runlog For Sequence/QCBatch ID # FC110824AL

Review By	yogesh	Review On	11/8/2024 1:23:09 PM		
Supervise By	Ankita	Supervise On	11/11/2024 9:55:02 AM		
SubDirectory	FC110824AL	HP Acquire Method		HP Processing Method	FC102324AL

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23644,PP23646,PP23647,PP23648,PP23649
CCC	PP23647
Internal Standard/PEM	
ICV/I.BLK	PP23645,PP23650
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	MECL2	MECL2	FC067667.D	08 Nov 2024 10:14		YP/AJ	Ok
2	I.BLK	I.BLK	FC067668.D	08 Nov 2024 12:41		YP/AJ	Ok
3	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067669.D	08 Nov 2024 13:17		YP/AJ	Ok
4	PB164790BL	PB164790BL	FC067670.D	08 Nov 2024 16:19		YP/AJ	Ok
5	PB164790BS	PB164790BS	FC067671.D	08 Nov 2024 16:55		YP/AJ	Ok
6	PB164790BSD	PB164790BSD	FC067672.D	08 Nov 2024 17:32		YP/AJ	Ok
7	P4718-01	WB-307-SB01	FC067673.D	08 Nov 2024 18:08		YP/AJ	Ok
8	P4718-01D	P4718-01D	FC067674.D	08 Nov 2024 18:45		YP/AJ	Ok
9	P4718-01MS	WB-307-SB01MS	FC067675.D	08 Nov 2024 19:21	FC067673.D	YP/AJ	Ok
10	P4718-01MSD	WB-307-SB01MSD	FC067676.D	08 Nov 2024 19:57	FC067673.D!FC067675.D	YP/AJ	Ok
11	P4718-02	WB-307-SB02	FC067677.D	08 Nov 2024 20:33		YP/AJ	Ok
12	P4771-05	P-1	FC067678.D	08 Nov 2024 21:10	need 2x dilution	YP/AJ	Dilution
13	P4771-07	P-2	FC067679.D	08 Nov 2024 21:46		YP/AJ	Ok
14	P4721-01	EX-2-TPH-1	FC067680.D	08 Nov 2024 22:23	need 50x & 200X dilution	YP/AJ	Dilution
15	P4721-02	EX-2-TPH-2	FC067681.D	08 Nov 2024 23:00	need 10x & 50X dilution	YP/AJ	Dilution
16	I.BLK	I.BLK	FC067682.D	08 Nov 2024 23:37		YP/AJ	Ok
17	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067683.D	09 Nov 2024 00:50		YP/AJ	Ok

M : Manual Integration

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Instrument ID: FID_C

Daily Analysis Runlog For Sequence/QCBatch ID # FC111124AL

Review By	yogesh	Review On	11/11/2024 11:19:51 AM		
Supervise By	Ankita	Supervise On	11/12/2024 10:07:32 AM		
SubDirectory	FC111124AL	HP Acquire Method		HP Processing Method	FC102324AL

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23644,PP23646,PP23647,PP23648,PP23649
CCC	PP23647
Internal Standard/PEM	
ICV/I.BLK	PP23645,PP23650
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	MECL2	MECL2	FC067684.D	11 Nov 2024 07:57		YP/AJ	Ok
2	I.BLK	I.BLK	FC067685.D	11 Nov 2024 08:33		YP/AJ	Ok
3	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067686.D	11 Nov 2024 09:10		YP/AJ	Ok
4	P4771-05DL	P-1DL	FC067687.D	11 Nov 2024 09:48		YP/AJ	Ok
5	P4721-01DL	EX-2-TPH-1DL	FC067688.D	11 Nov 2024 10:25	need further dilution	YP/AJ	Dilution
6	P4721-01DL2	EX-2-TPH-1DL2	FC067689.D	11 Nov 2024 11:02		YP/AJ	Ok
7	P4721-02DL	EX-2-TPH-2DL	FC067690.D	11 Nov 2024 11:39	need further dilution	YP/AJ	Dilution
8	P4721-02DL2	EX-2-TPH-2DL2	FC067691.D	11 Nov 2024 12:15		YP/AJ	Ok,M
9	I.BLK	I.BLK	FC067692.D	11 Nov 2024 13:29		YP/AJ	Ok
10	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067693.D	11 Nov 2024 14:05		YP/AJ	Ok
11	PB164847BL	PB164847BL	FC067694.D	11 Nov 2024 15:19		YP/AJ	Ok
12	PB164847BS	PB164847BS	FC067695.D	11 Nov 2024 15:56		YP/AJ	Ok
13	PB164847BSD	PB164847BSD	FC067696.D	11 Nov 2024 16:33		YP/AJ	Ok
14	P4718-04	WB-307-SW	FC067697.D	11 Nov 2024 17:10		YP/AJ	Ok
15	P4791-02	HINCHMAN-OILY-WAT	FC067698.D	11 Nov 2024 17:47	need 20x & 100x dilution	YP/AJ	Dilution
16	P4792-04	MANHOLE-WASTE-DR	FC067699.D	11 Nov 2024 18:23	need 20x & 100x dilution	YP/AJ	Dilution
17	I.BLK	I.BLK	FC067700.D	12 Nov 2024 00:32		YP/AJ	Ok
18	20 PPM ALIPHATIC HC	20 PPM ALIPHATIC HC	FC067701.D	12 Nov 2024 01:09		YP/AJ	Ok,M

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Instrument ID: FID_C

Daily Analysis Runlog For Sequence/QCBatch ID # FC111124AL

Review By	yogesh	Review On	11/11/2024 11:19:51 AM		
Supervise By	Ankita	Supervise On	11/12/2024 10:07:32 AM		
SubDirectory	FC111124AL	HP Acquire Method		HP Processing Method	FC102324AL

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23644,PP23646,PP23647,PP23648,PP23649
CCC	PP23647
Internal Standard/PEM	
ICV/I.BLK	PP23645,PP23650
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

M : Manual Integration

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Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD102324AR

Review By	yogesh	Review On	10/23/2024 4:04:27 PM		
Supervise By	Ankita	Supervise On	10/24/2024 9:29:45 AM		
SubDirectory	FD102324AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	MECL2	MECL2	FD048566.D	23 Oct 2024 13:59		YP/AJ	Ok
2	I.BLK	I.BLK	FD048567.D	23 Oct 2024 14:35		YP/AJ	Ok
3	100 PPM AROMATIC H	100 PPM AROMATIC H	FD048568.D	23 Oct 2024 15:12		YP/AJ	Ok
4	50 PPM AROMATIC HC	50 PPM AROMATIC HC	FD048569.D	23 Oct 2024 15:48		YP/AJ	Ok
5	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048570.D	23 Oct 2024 16:25		YP/AJ	Ok
6	10 PPM AROMATIC HC	10 PPM AROMATIC HC	FD048571.D	23 Oct 2024 17:02		YP/AJ	Ok
7	5 PPM AROMATIC HC	5 PPM AROMATIC HC	FD048572.D	23 Oct 2024 17:38		YP/AJ	Ok
8	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048573.D	23 Oct 2024 18:14		YP/AJ	Ok
9	I.BLK	I.BLK	FD048574.D	23 Oct 2024 19:27		YP/AJ	Ok
10	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048575.D	23 Oct 2024 20:03		YP/AJ	Ok

M : Manual Integration

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Fax : 908 789 8922

Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD110824AR

Review By	yogesh	Review On	11/8/2024 1:24:18 PM		
Supervise By	Ankita	Supervise On	11/11/2024 9:55:33 AM		
SubDirectory	FD110824AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	MECL2	MECL2	FD048667.D	08 Nov 2024 10:14		YP/AJ	Ok
2	I.BLK	I.BLK	FD048668.D	08 Nov 2024 10:51		YP/AJ	Ok
3	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048669.D	08 Nov 2024 11:28		YP/AJ	Ok,M
4	PP23948	PP23948	FD048670.D	08 Nov 2024 12:05		YP/AJ	Ok
5	I.BLK	I.BLK	FD048671.D	08 Nov 2024 12:41		YP/AJ	Ok
6	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048672.D	08 Nov 2024 13:17		YP/AJ	Ok
7	PB164790BL	PB164790BL	FD048673.D	08 Nov 2024 16:19		YP/AJ	Ok
8	PB164790BS	PB164790BS	FD048674.D	08 Nov 2024 16:55		YP/AJ	Ok,M
9	PB164790BSD	PB164790BSD	FD048675.D	08 Nov 2024 17:32		YP/AJ	Ok,M
10	P4718-01	WB-307-SB01	FD048676.D	08 Nov 2024 18:08		YP/AJ	Ok
11	P4718-01D	P4718-01D	FD048677.D	08 Nov 2024 18:45		YP/AJ	Ok
12	P4718-01MS	WB-307-SB01MS	FD048678.D	08 Nov 2024 19:21	FD048676.D	YP/AJ	Ok,M
13	P4718-01MSD	WB-307-SB01MSD	FD048679.D	08 Nov 2024 19:57	FD048676.D!FD048678.D	YP/AJ	Ok,M
14	P4718-02	WB-307-SB02	FD048680.D	08 Nov 2024 20:33		YP/AJ	Ok
15	P4721-01	EX-2-TPH-1	FD048681.D	08 Nov 2024 21:10	need 20x dilution	YP/AJ	Dilution
16	P4721-02	EX-2-TPH-2	FD048682.D	08 Nov 2024 21:46	need 10x dilution	YP/AJ	Dilution
17	P4721-03	EX-2-TPH-3	FD048683.D	08 Nov 2024 22:23	need 5x dilution	YP/AJ	Dilution
18	P4721-04	EX-11-TPH-1	FD048684.D	08 Nov 2024 23:00	need 5x & 20x dilution	YP/AJ	Dilution

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Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD110824AR

Review By	yogesh	Review On	11/8/2024 1:24:18 PM		
Supervise By	Ankita	Supervise On	11/11/2024 9:55:33 AM		
SubDirectory	FD110824AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

19	I.BLK	I.BLK	FD048685.D	08 Nov 2024 23:37		YP/AJ	Ok
20	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048686.D	09 Nov 2024 00:50		YP/AJ	Ok

M : Manual Integration

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

Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD111124AR

Review By	yogesh	Review On	11/11/2024 11:20:54 AM		
Supervise By	Ankita	Supervise On	11/12/2024 10:07:09 AM		
SubDirectory	FD111124AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

Sr#	SampleId	ClientID	Data File Name	Date-Time	Comment	Operator	Status
1	MECL2	MECL2	FD048687.D	11 Nov 2024 07:57		YP/AJ	Ok
2	I.BLK	I.BLK	FD048688.D	11 Nov 2024 08:33		YP/AJ	Ok
3	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048689.D	11 Nov 2024 09:10		YP/AJ	Ok
4	P4721-06	EX-11-TPH-3	FD048690.D	11 Nov 2024 09:48		YP/AJ	Ok
5	P4721-01DL	EX-2-TPH-1DL	FD048691.D	11 Nov 2024 10:25		YP/AJ	Ok,M
6	P4721-02DL	EX-2-TPH-2DL	FD048692.D	11 Nov 2024 11:02		YP/AJ	Ok,M
7	P4721-03DL	EX-2-TPH-3DL	FD048693.D	11 Nov 2024 11:39		YP/AJ	Ok,M
8	P4721-04DL	EX-11-TPH-1DL	FD048694.D	11 Nov 2024 12:15	need further dilution	YP/AJ	Dilution
9	P4721-04DL2	EX-11-TPH-1DL2	FD048695.D	11 Nov 2024 12:52		YP/AJ	Ok,M
10	I.BLK	I.BLK	FD048696.D	11 Nov 2024 14:05		YP/AJ	Ok
11	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048697.D	11 Nov 2024 14:42		YP/AJ	Ok
12	PB164847BL	PB164847BL	FD048698.D	11 Nov 2024 15:19		YP/AJ	Ok
13	PB164847BS	PB164847BS	FD048699.D	11 Nov 2024 15:56		YP/AJ	Ok,M
14	PB164847BSD	PB164847BSD	FD048700.D	11 Nov 2024 16:33		YP/AJ	Ok,M
15	P4718-04	WB-307-SW	FD048701.D	11 Nov 2024 17:10		YP/AJ	Ok
16	P4791-02	HINCHMAN-OILY-WAT	FD048702.D	11 Nov 2024 17:47	need 10x dilution	YP/AJ	Dilution
17	P4792-04	MANHOLE-WASTE-DR	FD048703.D	11 Nov 2024 18:23	need 2x & 20X dilution	YP/AJ	Dilution
18	I.BLK	I.BLK	FD048704.D	12 Nov 2024 00:32		YP/AJ	Ok

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

Instrument ID: FID_D

Daily Analysis Runlog For Sequence/QCBatch ID # FD111124AR

Review By	yogesh	Review On	11/11/2024 11:20:54 AM		
Supervise By	Ankita	Supervise On	11/12/2024 10:07:09 AM		
SubDirectory	FD111124AR	HP Acquire Method		HP Processing Method	FD102324AR

STD. NAME	STD REF.#
Tune/Reschk	
Initial Calibration Stds	PP23429,PP23519,PP23520,PP23521,PP23522
CCC	PP23520
Internal Standard/PEM	
ICV/I.BLK	PP23430,PP23523
Surrogate Standard	
MS/MSD Standard	
LCS Standard	

19	20 PPM AROMATIC HC	20 PPM AROMATIC HC	FD048705.D	12 Nov 2024 01:09		YP/AJ	Ok,M

M : Manual Integration

PERCENT SOLID

Supervisor: Iwona
Analyst: jignesh
Date: 11/6/2024

OVENTEMP IN Celsius(°C): 107
Time IN: 17:00
In Date: 11/05/2024
Weight Check 1.0g: 1.00
Weight Check 10g: 10.00
OvenID: M OVEN#1

OVENTEMP OUT Celsius(°C): 103
Time OUT: 08:00
Out Date: 11/06/2024
Weight Check 1.0g: 1.00
Weight Check 10g: 10.00
BalanceID: M SC-4
Thermometer ID: % SOLID- OVEN

QC: LB133300

Lab ID	Client SampleID	Dish #	Dish Wt(g) (A)	Sample Wt(g)	Dish + Sample Wt(g) (B)	Dish+Dry Sample Wt(g) (C)	% Solid	Comments
P4452-04	ETGI-285	1	1.00	1.00	2.00	2.00	100.0	CONCRETE sample
P4706-01	TR-04-110424	2	1.16	8.71	9.87	9.3	93.5	
P4706-02	TR-04-110424-E2	3	1.17	8.55	9.72	8.81	89.4	
P4707-01	HD-02-110424	4	1.18	8.57	9.75	9.21	93.7	
P4707-02	HD-02-110424-E2	5	1.14	8.40	9.54	9.07	94.4	
P4708-01	OR-02-110424	6	1.15	8.66	9.81	9.26	93.6	
P4708-02	OR-02-110424-E2	7	1.19	8.76	9.95	9.39	93.6	
P4709-01	HR-02-110424	8	1.16	8.71	9.87	8.79	87.6	
P4709-02	HR-02-110424-E2	9	1.14	8.82	9.96	8.76	86.4	
P4709-03	HR-03-110424	10	1.15	8.83	9.98	9.32	92.5	
P4709-04	HR-03-110424-E2	11	1.19	8.48	9.67	8.9	90.9	
P4718-01	WB-307-SB01	12	1.17	8.40	9.57	7.72	78.0	
P4718-02	WB-307-SB02	13	1.15	8.83	9.98	8.00	77.6	
P4719-01	BAYAVE-STOCKPILE	14	1.16	8.48	9.64	9.42	97.4	
P4719-02	BAYAVE-STOCKPILE-E2	15	1.17	8.67	9.84	9.3	93.8	

$$\% \text{ Solid} = \frac{(C-A) * 100}{(B-A)}$$

WORKLIST(Hardcopy Internal Chain)

VB 133300

WorkList Name : %1-110524 **WorkList ID :** 185126 **Department :** Wet-Chemistry **Date :** 11-05-2024 08:12:46

Sample	Customer Sample	Matrix	Test	Preservative	Customer	Raw Sample Storage Location	Collect Date	Method
P4452-04	ETGI-285	Solid	Percent Solids	Cool 4 deg C	PSEG03	K51	10/18/2024	Chemtech -SO
P4706-01	TR-04-110424	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4706-02	TR-04-110424-E2	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4707-01	HD-02-110424	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4707-02	HD-02-110424-E2	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4708-01	OR-02-110424	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4708-02	OR-02-110424-E2	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4709-01	HR-02-110424	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4709-02	HR-02-110424-E2	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4709-03	HR-03-110424	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4709-04	HR-03-110424-E2	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4718-01	WB-307-SB01	Solid	Percent Solids	Cool 4 deg C	PSEG05	L23	11/04/2024	Chemtech -SO
P4718-02	WB-307-SB02	Solid	Percent Solids	Cool 4 deg C	PORT06	L21	11/04/2024	Chemtech -SO
P4719-01	BAYAVE-STOCKPILE	Solid	Percent Solids	Cool 4 deg C	PORT06	L21	11/04/2024	Chemtech -SO
P4719-02	BAYAVE-STOCKPILE-E2	Solid	Percent Solids	Cool 4 deg C	PSEG03	K21	11/05/2024	Chemtech -SO
P4719-02	BAYAVE-STOCKPILE-E2	Solid	Percent Solids	Cool 4 deg C	PSEG03	K21	11/05/2024	Chemtech -SO

Date/Time 11/05/24 15:40

Raw Sample Received by: [signature]

Raw Sample Relinquished by: [signature]

Date/Time 11/05/24 17:10

Raw Sample Received by: [signature]

Raw Sample Relinquished by: [signature]

Alliance TECHNICAL GROUP

EXTRACTION LOGPAGE

PB164790

SOP ID: MNJDEP-EPH-7

Clean Up SOP #: N/A

Matrix : Solid

Weigh By: RJ

Balance check: RJ

Balance ID: EX-SC-2

pH Strip Lot#: N/A

Extraction By: RJ

Filter By: RJ

pH Meter ID: N/A

Hood ID: 3,7

Extraction Start Date : 11/08/2024

Extraction Start Time : 08:47

Extraction End Date : 11/08/2024

Extraction End Time : 16:10

Concentration By: EH

Supervisor By : rajesh

Extraction Method: ☐ Seperatory Funnel ☐ Continious Liquid/Liquid ☐ Sonication ☐ Waste Dilution ☑ Soxhlet

Standared Name	MLS USED	Concentration ug/mL	STD REF. # FROM LOG
Spike Sol 1	1.0ML	100 PPM	PP23916
Surrogate	1.0ML	100 PPM	PP23934
Fractionation Surrogate	1.0ML	100 PPM	PP23927
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A

Chemical Used	ML/SAMPLE USED	Lot Number
MeCl2/Acetone/1:1	N/A	EP2538
Baked Na2SO4	N/A	EP2556
Sand	N/A	E2865
Hexane	N/A	e3825
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A

Extraction Conformance/Non-Conformance Comments:

p4771-05,07 Added in batch at 10:30.

KD Bath ID: N/A

KD Bath Temperature: N/A

Envap ID: NEVAP-02

Envap Temperature: 40 °C

Date / Time	Prepped Sample Relinquished By/Location	Received By/Location
11/08/24	RP (Ext. Lab)	Y-P-PSH-HPLC
16:15	**Preparation Group**	**Analysis Group**

Alliance TECHNICAL GROUP

EXTRACTION LOGPAGE

PrepBatch ID : PB164790

Analytical Method: MNJDEP-EPH-7

Concentration Date: 11/08/2024

Sample ID	Client Sample ID	Test	g/mL	PH	Surr/Spike By:		Final Vol. (mL)	JarID	Comments	Prep Pos
					AddedBy	VerifiedBy				
PB164790BL	PB164790BL	EPH	30.02	N/A	ritesh	Evelyn	2			U1-1
PB164790BS	PB164790BS	EPH	30.01	N/A	ritesh	Evelyn	2			2
PB164790BSD	PB164790BSD	EPH	30.03	N/A	ritesh	Evelyn	2			3
P4718-01	WB-307-SB01	EPH	30.06	N/A	ritesh	Evelyn	2	E		4
P4718-01DUP	WB-307-SB01DUP	EPH	30.09	N/A	ritesh	Evelyn	2	E		5
P4718-01MS	WB-307-SB01MS	EPH	30.05	N/A	ritesh	Evelyn	2	E		6
P4718-01MSD	WB-307-SB01MSD	EPH	30.03	N/A	ritesh	Evelyn	2	E		U5-1
P4718-02	WB-307-SB02	EPH	30.01	N/A	ritesh	Evelyn	2	E		2
P4721-01	EX-2-TPH-1	EPH	30.10	N/A	ritesh	Evelyn	2	E		3
P4721-02	EX-2-TPH-2	EPH	30.04	N/A	ritesh	Evelyn	2	E		4
P4721-03	EX-2-TPH-3	EPH	30.02	N/A	ritesh	Evelyn	2	E		5
P4721-04	EX-11-TPH-1	EPH	30.09	N/A	ritesh	Evelyn	2	E		6
P4721-05	EX-11-TPH-2	EPH	30.05	N/A	ritesh	Evelyn	2	E		U6-1
P4721-06	EX-11-TPH-3	EPH	30.03	N/A	ritesh	Evelyn	2	E		2
P4721-07	EX-11-TPH-4	EPH	30.08	N/A	ritesh	Evelyn	2	E		3
P4721-08	EX-9-TPH-1	EPH	30.07	N/A	ritesh	Evelyn	2	E		4
P4721-09	EX-9-TPH-2	EPH	30.05	N/A	ritesh	Evelyn	2	E		5
P4721-10	EX-9-TPH-3	EPH	30.03	N/A	ritesh	Evelyn	2	E		6
P4721-11	EX-9-TPH-4	EPH	30.02	N/A	ritesh	Evelyn	2	E		U7-1
P4721-12	EX-9-TPH-5	EPH	30.06	N/A	ritesh	Evelyn	2	E		2
P4721-13	EX-9-TPH-6	EPH	30.02	N/A	ritesh	Evelyn	2	E		3
P4721-14	EX-9-TPH-7	EPH	30.04	N/A	ritesh	Evelyn	2	E		4
P4721-15	EX-9-TPH-8	EPH	30.08	N/A	ritesh	Evelyn	2	E		5
P4771-05	P-1	EPH	30.03	N/A	ritesh	Evelyn	2	E		6
P4771-07	P-2	EPH	30.09	N/A	ritesh	Evelyn	2	E		U1-1

* **Extracts relinquished on the same date as received.**

11/8/24

16/7/24 8:47

WORKLIST(Hardcopy Internal Chain)

WorkList Name : P4718 **WorkList ID :** 185238 **Department :** Extraction **Date :** 11-08-2024 08:10:00

Sample	Customer Sample	Matrix	Test	Preservative	Customer	Raw Sample Storage Location	Collect Date	Method
P4718-01	WB-307-SB01	Solid	EPH	Cool 4 deg C	PORT06	L21	11/04/2024	NJEPH
P4718-02	WB-307-SB02	Solid	EPH	Cool 4 deg C	PORT06	L21	11/04/2024	NJEPH
P4721-01	EX-2-TPH-1	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-02	EX-2-TPH-2	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-03	EX-2-TPH-3	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-04	EX-11-TPH-1	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-05	EX-11-TPH-2	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-06	EX-11-TPH-3	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-07	EX-11-TPH-4	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-08	EX-9-TPH-1	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-09	EX-9-TPH-2	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-10	EX-9-TPH-3	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-11	EX-9-TPH-4	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-12	EX-9-TPH-5	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-13	EX-9-TPH-6	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-14	EX-9-TPH-7	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH
P4721-15	EX-9-TPH-8	Solid	EPH	Cool 4 deg C	ENTA05	L23	11/05/2024	NJEPH

Date/Time 11/8/24 8:15

Raw Sample Received by: RJ (Ext Lab)

Raw Sample Relinquished by: JDCSM

Date/Time 11/8/24

Raw Sample Received by: JDCSM

Raw Sample Relinquished by: RJ (Ext Lab)

WORKLIST(Hardcopy Internal Chain)

WorkList Name : P4771 **WorkList ID :** 185255 **Department :** Extraction **Date :** 11-08-2024 10:30:46

Sample	Customer Sample	Matrix	Test	Preservative	Customer	Raw Sample Storage Location	Collect Date	Method
P4771-05	P-1	Solid	EPH	Cool 4 deg C	M2AS01	L32	11/07/2024	NJEPH
P4771-05	P-1	Solid	PCB	Cool 4 deg C	M2AS01	L32	11/07/2024	8082A
P4771-05	P-1	Solid	Pesticide-TCL	Cool 4 deg C	M2AS01	L32	11/07/2024	8081B
P4771-05	P-1	Solid	SVOC-TCL BNA -20	Cool 4 deg C	M2AS01	L32	11/07/2024	8270E
P4771-07	P-2	Solid	EPH	Cool 4 deg C	M2AS01	L32	11/07/2024	NJEPH
P4771-07	P-2	Solid	PCB	Cool 4 deg C	M2AS01	L32	11/07/2024	8082A
P4771-07	P-2	Solid	Pesticide-TCL	Cool 4 deg C	M2AS01	L32	11/07/2024	8081B
P4771-07	P-2	Solid	SVOC-TCL BNA -20	Cool 4 deg C	M2AS01	L32	11/07/2024	8270E

Date/Time 11/8/24 10:30
Raw Sample Received by: RJ (Ser Lab)
Raw Sample Relinquished by: JDCSM

Date/Time 11/8/24 11:00
Raw Sample Received by: JDCSM
Raw Sample Relinquished by: RJ (Ser Lab)

Alliance TECHNICAL GROUP

EXTRACTION LOGPAGE

PB164847

SOP ID: MNJDEP-EPH-7

Clean Up SOP #: N/A

Matrix : Water

Weigh By: N/A

Balance check: N/A

Balance ID: N/A

pH Strip Lot#: E3574

Extraction By: RS

Filter By: RS

pH Meter ID: N/A

Hood ID: 4,6,7

Extraction Start Date : 11/09/2024

Extraction Start Time : 08:38

Extraction End Date : 11/09/2024

Extraction End Time : 16:10

Concentration By: EH

Supervisor By : rajesh

Extraction Method: [√] Seperatory Funnel [ ] Continious Liquid/Liquid [ ] Sonication [ ] Waste Dilution [ ] Soxhlet

Standared Name	MLS USED	Concentration ug/mL	STD REF. # FROM LOG
Spike Sol 1	1.0ML	100 PPM	PP23916
Surrogate	1.0ML	100 PPM	PP23934
Fractionation Surrogate	1.0ML	100 PPM	PP23927
N/A	N/A	N/A	N/A
N/A	N/A	N/A	N/A

Chemical Used	ML/SAMPLE USED	Lot Number
Methylene Chloride	N/A	E3828
Baked Na2SO4	N/A	EP2546
Hexane	N/A	E3826
6N HCL	N/A	EP2517
EPH Cartridge	N/A	E3757
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A
N/A	N/A	N/A

Extraction Conformance/Non-Conformance Comments:

1.5ML Vial Lot # 2210673.

KD Bath ID: WATER BATH-1,2

KD Bath Temperature: 60 °C

Envap ID: NE VAP-02

Envap Temperature: 40 °C

Date / Time	Prepped Sample Relinquished By/Location	Received By/Location
11/11/24	RP (Extr Lab)	R. Patel/PCB Lab
9:05	Preparation Group	Analysis Group

Alliance TECHNICAL GROUP

EXTRACTION LOGPAGE

PrepBatch ID : PB164847

Analytical Method: MNJDEP-EPH-7

Concentration Date: 11/09/2024

Sample ID	Client Sample ID	Test	g / mL	PH	Surr/Spike By:		Final Vol. (mL)	JarID	Comments	Prep Pos
					AddedBy	VerifiedBy				
PB164847BL	PB164847BL	EPH	1000	<2	RUPESH	ritesh	2			
PB164847BS	PB164847BS	EPH	1000	<2	RUPESH	ritesh	2			
PB164847BSD	PB164847BSD	EPH	1000	<2	RUPESH	ritesh	2			
P4718-04	WB-307-SW	EPH	970	<2	RUPESH	ritesh	2	G		
P4791-02	HINCHMAN-OILY-WATER	EPH	1000	<2	RUPESH	ritesh	2	T		
P4792-04	MANHOLE-WASTE-DRUMS	EPH	1000	<2	RUPESH	ritesh	2	R		

* Extracts relinquished on the same date as received.

11/9/24

WORKLIST(Hardcopy Internal Chain)

WorkList Name : P4791 **WorkList ID :** 185306 **Department :** Extraction **Date :** 11-09-2024 08:24:16

Sample	Customer Sample	Matrix	Test	Preservative	Customer	Raw Sample Storage Location	Collect Date	Method
P4718-04	WB-307-SW	Water	EPH	1:1 HCl to pH < 2	PORT06	L21	11/04/2024	NJEPH
P4791-02	HINCHMAN-OILY-WATER	Water	EPH	1:1 HCl to pH < 2	PSEG03	L23	11/08/2024	NJEPH
P4792-04	MANHOLE-WASTE-DRUMS	Water	EPH	1:1 HCl to pH < 2	PSEG03	L21	11/08/2024	NJEPH

Date/Time 11/10/24 8:35

Raw Sample Received by: RJ (Ext Lab)

Raw Sample Relinquished by: RS (Ext-Lab)

Date/Time 11/10/24 9:05

Raw Sample Received by: RS (Ext-Lab)

Raw Sample Relinquished by: RJ (Ext. Lab

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

Prep Standard - Chemical Standard Summary

Order ID : P4718

Test : EPH

Prepbatch ID : PB164790,PB164847,

Sequence ID/Qc Batch ID: FC110824AL,FC111124AL,FD110824AR,FD111124AR,

Standard ID :

EP2517,EP2538,EP2546,EP2556,PP23429,PP23430,PP23519,PP23520,PP23521,PP23522,PP23523,PP23644,PP23645,PP23646,PP23647,PP23648,PP23649,PP23650,PP23916,PP23927,PP23934,

Chemical ID :

E2865,E3551,E3743,E3757,E3768,E3789,E3793,E3794,E3818,E3819,e3825,E3826,E3828,M5929,P10259,P 11137,P12362,P12972,P12979,P13004,P13005,P13017,P13023,P13024,P13025,P13046,P13049,P13051,P13098,P13100,P13101,P13102,P13258,P13259,P13267,P13270,P13278,P13299,P13423,P13427,P13461,P13462,P13625,P13626,P13627,P13645,P13718,P13719,P13720,P13721,P13722,P13723,P13724,P13725,P13726,P13727,W 3112,

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

Extractions STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
3319	6N HCL	EP2517	07/23/2024	12/08/2024	Rajesh Parikh	None	None	RUPESHKUMAR SHAH 07/23/2024

FROM 219.00000ml of M5929 + 781.00000ml of W3112 = Final Quantity: 1000.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
3868	METHELENE CHLORIDE+ACETONE	EP2538	09/17/2024	03/11/2025	Rajesh Parikh	None	None	RUPESHKUMAR SHAH 09/17/2024

FROM 8000.00000ml of E3793 + 8000.00000ml of E3794 = Final Quantity: 1600.000 ml

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

Extractions STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
3923	Baked Sodium Sulfate	EP2546	10/11/2024	01/03/2025	RUPESHKUMAR SHAH	Extraction_SCALE_2 (EX-SC-2)	None	Rajesh Parikh 10/11/2024

FROM 4000.00000gram of E3551 = Final Quantity: 4000.000 gram

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
3923	Baked Sodium Sulfate	EP2556	11/03/2024	01/03/2025	Rajesh Parikh	Extraction_SCALE_2 (EX-SC-2)	None	RUPESHKUMAR SHAH 11/03/2024

FROM 4000.00000gram of E3551 = Final Quantity: 4000.000 gram

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

Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
782	100 PPM Aromatic HC Working STD	PP23429	05/21/2024	11/16/2024	Yogesh Patel	None	None	Ankita Jodhani 05/24/2024

FROM 0.25000ml of P13004 + 0.62500ml of P13259 + 1.25000ml of P10259 + 22.87500ml of E3743 = Final Quantity: 25.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
2945	100 PPM Aromatic HC Working STD (Absolute)	PP23430	05/21/2024	11/16/2024	Yogesh Patel	None	None	Ankita Jodhani 05/24/2024

FROM 0.25000ml of P13005 + 0.62500ml of P13258 + 1.25000ml of P11137 + 22.87500ml of E3743 = Final Quantity: 25.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
787	50 PPM Aromatic HC STD	PP23519	07/15/2024	11/16/2024	Yogesh Patel	None	None	Ankita Jodhani 07/16/2024

FROM 0.50000ml of E3768 + 0.50000ml of PP23429 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
788	20 PPM Aromatic HC STD	PP23520	07/15/2024	11/16/2024	Yogesh Patel	None	None	Ankita Jodhani 07/16/2024

FROM 0.80000ml of E3768 + 0.20000ml of PP23429 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
789	10 PPM Aromatic HC STD	PP23521	07/15/2024	11/16/2024	Yogesh Patel	None	None	Ankita Jodhani 07/16/2024

FROM 0.90000ml of E3768 + 0.10000ml of PP23429 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
790	5 PPM Aromatic HC STD	PP23522	07/15/2024	11/16/2024	Yogesh Patel	None	None	Ankita Jodhani 07/16/2024

FROM 0.90000ml of E3768 + 0.10000ml of PP23519 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
2946	20 PPM Aromatic HC STD ICV (Absolute)	PP23523	07/15/2024	11/16/2024	Yogesh Patel	None	None	Ankita Jodhani 07/16/2024

FROM 0.80000ml of E3768 + 0.20000ml of PP23430 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
781	100 PPM Aliphatic HC Working STD (Restek)	PP23644	09/09/2024	02/13/2025	Yogesh Patel	None	None	Ankita Jodhani 09/10/2024

FROM 0.25000ml of P12972 + 0.25000ml of P13017 + 1.25000ml of P12362 + 23.25000ml of E3789 = Final Quantity: 25.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
2900	100 PPM Aliphatic HC STD (Absolute)	PP23645	09/09/2024	02/13/2025	Yogesh Patel	None	None	Ankita Jodhani 09/10/2024

FROM 0.25000ml of P12972 + 0.25000ml of P13017 + 2.50000ml of P13278 + 22.00000ml of E3789 = Final Quantity: 25.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
783	50 PPM Aliphatic HC STD	PP23646	09/09/2024	02/13/2025	Yogesh Patel	None	None	Ankita Jodhani 09/10/2024

FROM 0.50000ml of E3789 + 0.50000ml of PP23644 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
784	20 PPM Aliphatic HC STD	PP23647	09/09/2024	02/13/2025	Yogesh Patel	None	None	Ankita Jodhani 09/10/2024

FROM 0.80000ml of E3789 + 0.20000ml of PP23644 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
785	10 PPM Aliphatic HC STD	PP23648	09/09/2024	02/13/2025	Yogesh Patel	None	None	Ankita Jodhani 09/10/2024

FROM 0.90000ml of E3789 + 0.10000ml of PP23644 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
786	5 PPM Aliphatic HC STD	PP23649	09/09/2024	02/13/2025	Yogesh Patel	None	None	Ankita Jodhani 09/10/2024

FROM 0.90000ml of E3789 + 0.10000ml of PP23646 = Final Quantity: 1.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
2901	20 PPM Aliphaitic HC STD ICV (Absolute)	PP23650	09/09/2024	02/13/2025	Yogesh Patel	None	None	Ankita Jodhani 09/10/2024

FROM 0.80000ml of E3789 + 0.20000ml of PP23645 = Final Quantity: 1.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1330	100 PPM NJEPH Spike Solution	PP23916	10/25/2024	04/25/2025	Yogesh Patel	None	None	Ankita Jodhani 10/28/2024

FROM 5.00000ml of P13098 + 5.00000ml of P13100 + 5.00000ml of P13101 + 5.00000ml of P13102 + 5.00000ml of P13299 + 5.00000ml of P13423 + 5.00000ml of P13427 + 5.00000ml of P13625 + 5.00000ml of P13626 + 5.00000ml of P13627 + 5.00000ml of P13718 + 5.00000ml of P13719 + 5.00000ml of P13720 + 5.00000ml of P13721 + 5.00000ml of P13722 + 5.00000ml of P13723 + 5.00000ml of P13724 + 5.00000ml of P13725 + 5.00000ml of P13726 + 5.00000ml of P13727 = Final Quantity: 100.000 ml

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1331	100 PPM NJEPH Fractionating Surrogate	PP23927	10/29/2024	04/15/2025	Yogesh Patel	None	None	Ankita Jodhani 10/30/2024

FROM 1.25000ml of P13267 + 1.25000ml of P13270 + 1.25000ml of P13461 + 1.25000ml of P13462 + 195.00000ml of E3819 = Final Quantity: 200.000 ml

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Pest/Pcb STANDARD PREPARATION LOG

Recipe ID	NAME	NO.	Prep Date	Expiration Date	Prepared By	ScaleID	PipetteID	Supervised By
1339	100 PPM NJEPH Surrogate Spike	PP23934	10/30/2024	04/23/2025	Yogesh Patel	None	None	Ankita Jodhani 11/04/2024

FROM 1.25000ml of P12979 + 1.25000ml of P13023 + 1.25000ml of P13024 + 1.25000ml of P13025 + 1.25000ml of P13046 + 1.25000ml of P13049 + 1.25000ml of P13051 + 1.25000ml of P13645 + 490.00000ml of E3818 = Final Quantity: 500.000 ml

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-3382-05 / Sand, Purified (cs/4x2.5kg)	0000243821	12/31/2024	04/30/2020 / RAJESH	04/28/2020 / RAJESH	E2865

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
PCI Scientific Supply, Inc.	PC19631-100 / SODIUM SULFATE, ANHYDROUS, PEST GRADE, 1	313201	01/03/2025	01/03/2024 / Rajesh	07/20/2023 / Rajesh	E3551

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9644-A4 / Methylene Chloride,U-Resi, Cycle-Tainer (215L)	24C0162011	11/16/2024	05/16/2024 / Rajesh	04/26/2024 / Rajesh	E3743

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
phenomenex	SI500025-30 / Cleanert SPE Silica, 5000 mg/25 ml	Z0513CK1	03/04/2025	09/04/2024 / Rajesh	04/03/2024 / Rajesh	E3757

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9644-A4 / Methylene Chloride,U-Resi, Cycle-Tainer (215L)	24E2462004	01/08/2025	07/08/2024 / Rajesh	06/21/2024 / Rajesh	E3768

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9262-03 / Hexane, Ultra-Resi (cs/4x4L)	24C1862008	02/13/2025	08/13/2024 / Rajesh	08/13/2024 / Rajesh	E3789

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	9005-05 / Acetone Ultra (cs/4x4L)	24E0761004	03/11/2025	09/12/2024 / Rajesh	09/11/2024 / Rajesh	E3793

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9644-A4 / Methylene Chloride,U-Resi, Cycle-Tainer (215L)	24G2362009	03/17/2025	09/17/2024 / Rajesh	09/03/2024 / Rajesh	E3794

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9254-03 / Acetone, Ultra Resi (cs/4x4L)	24H1462005	04/23/2025	10/23/2024 / Rajesh	10/09/2024 / Rajesh	E3818

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9262-03 / Hexane, Ultra-Resi (cs/4x4L)	24G1962003	04/15/2025	10/15/2024 / Rajesh	10/09/2024 / Rajesh	E3819

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9262-03 / Hexane, Ultra-Resi (cs/4x4L)	24G1962003	11/06/2025	11/06/2024 / Rajesh	11/01/2024 / Rajesh	E3825

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9262-03 / Hexane, Ultra-Resi (cs/4x4L)	24G1962003	05/09/2025	11/09/2024 / Rajesh	11/07/2024 / Rajesh	E3826

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9644-A4 / Methylene Chloride,U-Resi, Cycle-Tainer (215L)	24G0862003	05/09/2025	11/09/2024 / Rajesh	11/04/2024 / Rajesh	E3828

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	BA-9530-33 / Hydrochloric Acid, Instra-Analyzed (cs/6x2.5L)	22G2862015	12/08/2024	06/24/2024 / Al-Terek	06/07/2024 / Al-Terek	M5929

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30541 / Custom NJEPH Aromatics Calibration Standard	A0165529	11/21/2024	05/21/2024 / yogesh	01/26/2021 / dhaval	P10259

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	95709 / NJ EPH Aromatic Hydrocarbons, 2000 PPM	060420	07/08/2024	01/08/2024 / yogesh	10/29/2021 / Abdul	P11137

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30540 / Custom NJEPH Aliphatics Calibration Standard	A0190424	03/09/2025	09/09/2024 / yogesh	03/16/2023 / Yogesh	P12362

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31098 / 1-Chlorooctadecane Standard	A0204989	03/09/2025	09/09/2024 / yogesh	12/20/2023 / Yogesh	P12972

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31098 / 1-Chlorooctadecane Standard	A0204989	04/30/2025	10/30/2024 / yogesh	12/20/2023 / Yogesh	P12979

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31097 / o-Terphenyl Standard	A0204177	11/21/2024	05/21/2024 / yogesh	12/21/2023 / Yogesh	P13004

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31097 / o-Terphenyl Standard	A0204177	11/21/2024	05/21/2024 / yogesh	12/21/2023 / Yogesh	P13005

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31097 / o-Terphenyl Standard	A0204177	03/09/2025	09/09/2024 / yogesh	12/21/2023 / Yogesh	P13017

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31097 / o-Terphenyl Standard	A0204177	04/30/2025	10/30/2024 / yogesh	12/21/2023 / Yogesh	P13023

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31097 / o-Terphenyl Standard	A0204177	04/30/2025	10/30/2024 / yogesh	12/21/2023 / Yogesh	P13024

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31097 / o-Terphenyl Standard	A0204177	04/30/2025	10/30/2024 / yogesh	12/21/2023 / Yogesh	P13025

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31098 / 1-Chlorooctadecane Standard	A0200707	04/30/2025	10/30/2024 / yogesh	12/26/2023 / Yogesh	P13046

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31098 / 1-Chlorooctadecane Standard	A0200707	04/30/2025	10/30/2024 / yogesh	12/26/2023 / Yogesh	P13049

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31098 / 1-Chlorooctadecane Standard	A0200707	04/30/2025	10/30/2024 / yogesh	12/26/2023 / Yogesh	P13051

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0203911	04/25/2025	10/25/2024 / yogesh	01/12/2024 / Yogesh	P13098

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0200008	04/25/2025	10/25/2024 / yogesh	01/12/2024 / Yogesh	P13100

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0200008	04/25/2025	10/25/2024 / yogesh	01/12/2024 / Yogesh	P13101

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0200008	04/25/2025	10/25/2024 / yogesh	01/12/2024 / Yogesh	P13102

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31480 / MA Fractionation Surrogate Spike Mix	A0206496	11/21/2024	05/21/2024 / yogesh	02/20/2024 / yogesh	P13258

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31480 / MA Fractionation Surrogate Spike Mix	A0206496	11/21/2024	05/21/2024 / yogesh	02/20/2024 / yogesh	P13259

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31480 / MA Fractionation Surrogate Spike Mix	A0206496	04/29/2025	10/29/2024 / yogesh	02/20/2024 / yogesh	P13267

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31480 / MA Fractionation Surrogate Spike Mix	A0206496	04/29/2025	10/29/2024 / yogesh	02/20/2024 / yogesh	P13270

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Absolute Standards, Inc.	95899 / NJ EPH Aliphatic n-Hydrocarbons-Revised, 1000 PPM	040524	03/09/2025	09/09/2024 / yogesh	04/11/2024 / yogesh	P13278

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0207239	04/25/2025	10/25/2024 / yogesh	04/23/2024 / yogesh	P13299

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0207239	04/25/2025	10/25/2024 / yogesh	07/16/2024 / Yogesh	P13423

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0207239	04/25/2025	10/25/2024 / yogesh	07/16/2024 / Yogesh	P13427

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31480 / MA Fractionation Surrogate Spike Mix	A0210831	04/29/2025	10/29/2024 / yogesh	07/23/2024 / yogesh	P13461

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31480 / MA Fractionation Surrogate Spike Mix	A0210831	04/29/2025	10/29/2024 / yogesh	07/23/2024 / yogesh	P13462

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0211112	04/25/2025	10/25/2024 / yogesh	10/16/2024 / yogesh	P13625

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0211112	04/25/2025	10/25/2024 / yogesh	10/16/2024 / yogesh	P13626

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30542 / Custom NJEPH Aliphatics Matrix Spike Mix	A0211112	04/25/2025	10/25/2024 / yogesh	10/16/2024 / yogesh	P13627

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	31097 / o-Terphenyl Standard	A0216631	04/30/2025	10/30/2024 / yogesh	10/16/2024 / yogesh	P13645

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13718

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13719

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Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13720

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13721

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13722

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13723

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13724

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13725

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

CHEMICAL RECEIPT LOG BOOK

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13726

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Restek	30543 / Custom NJEPH Aromatics Matrix Spike Mix	A0217838	04/25/2025	10/25/2024 / yogesh	10/24/2024 / yogesh	P13727

Supplier	ItemCode / ItemName	Lot #	Expiration Date	Date Opened / Opened By	Received Date / Received By	Chemtech Lot #
Seidler Chemical	DIW / DI Water	Daily Lab-Certified	07/03/2029	07/03/2024 / Iwona	07/03/2024 / Iwona	W3112

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

www.restek.com

CERTIFIED REFERENCE MATERIAL

ACCREDITED
ISO 17034 Accredited
Reference Material Producer
Certificate #3222.01

ACCREDITED
ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

Certificate of Analysis

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

DD
06/17/2021

Catalog No. : 30541 **Lot No.:** A0172403

Description : NJEPH Aromatics Calibration Standard

NJEPH Aromatics Calibration Standard 2,000µg/mL, Methylene Chloride, 1mL/ampul

P10758 to P10762 -(5)

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

Expiration Date : April 30, 2027 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	1,2,3-Trimethylbenzene **CAS #** 526-73-8 (Lot 8776.10-36) **Purity** 98%	2,010.0 µg/mL	+/- 11.7957 µg/mL +/- 90.5449 µg/mL +/- 100.4678 µg/mL	Gravimetric Unstressed Stressed
2	Naphthalene **CAS #** 91-20-3 (Lot MKBZ8680V) **Purity** 99%	2,006.0 µg/mL	+/- 11.7723 µg/mL +/- 90.3656 µg/mL +/- 100.2689 µg/mL	Gravimetric Unstressed Stressed
3	2-Methylnaphthalene **CAS #** 91-57-6 (Lot STBG8884) **Purity** 99%	2,008.0 µg/mL	+/- 11.7841 µg/mL +/- 90.4557 µg/mL +/- 100.3688 µg/mL	Gravimetric Unstressed Stressed
4	Acenaphthylene **CAS #** 208-96-8 (Lot N19U) **Purity** 95%	2,002.6 µg/mL	+/- 11.7524 µg/mL +/- 90.2125 µg/mL +/- 100.0989 µg/mL	Gravimetric Unstressed Stressed
5	Acenaphthene **CAS #** 83-32-9 (Lot MKCN0610) **Purity** 99%	2,000.0 µg/mL	+/- 11.7371 µg/mL +/- 90.0953 µg/mL +/- 99.9689 µg/mL	Gravimetric Unstressed Stressed
6	Fluorene **CAS #** 86-73-7 (Lot 10217947) **Purity** 99%	2,016.0 µg/mL	+/- 11.8310 µg/mL +/- 90.8161 µg/mL +/- 100.7687 µg/mL	Gravimetric Unstressed Stressed
7	Phenanthrene **CAS #** 85-01-8 (Lot MKCL7390) **Purity** 99%	2,012.0 µg/mL	+/- 11.8075 µg/mL +/- 90.6359 µg/mL +/- 100.5688 µg/mL	Gravimetric Unstressed Stressed

8	Anthracene		2,002.0	µg/mL	+/-	11.7489	µg/mL	Gravimetric
	CAS # 120-12-7	(Lot MKCM0015)			+/-	90.1854	µg/mL	Unstressed
	Purity 99%				+/-	100.0689	µg/mL	Stressed
9	Fluoranthene		2,003.0	µg/mL	+/-	11.7547	µg/mL	Gravimetric
	CAS # 206-44-0	(Lot MKCF7378)			+/-	90.2305	µg/mL	Unstressed
	Purity 99%				+/-	100.1189	µg/mL	Stressed
10	Pyrene		2,011.0	µg/mL	+/-	11.8017	µg/mL	Gravimetric
	CAS # 129-00-0	(Lot BCCB9880)			+/-	90.5909	µg/mL	Unstressed
	Purity 99%				+/-	100.5188	µg/mL	Stressed
11	Benz(a)anthracene		2,011.0	µg/mL	+/-	11.8014	µg/mL	Gravimetric
	CAS # 56-55-3	(Lot P0022018-0505)			+/-	90.5890	µg/mL	Unstressed
	Purity 98%				+/-	100.5168	µg/mL	Stressed
12	Chrysene		2,000.0	µg/mL	+/-	11.7371	µg/mL	Gravimetric
	CAS # 218-01-9	(Lot STBJ8094)			+/-	90.0953	µg/mL	Unstressed
	Purity 99%				+/-	99.9689	µg/mL	Stressed
13	Benzo(b)fluoranthene		2,006.0	µg/mL	+/-	11.7721	µg/mL	Gravimetric
	CAS # 205-99-2	(Lot 012012B)			+/-	90.3638	µg/mL	Unstressed
	Purity 97%				+/-	100.2669	µg/mL	Stressed
14	Benzo(k)fluoranthene		2,010.0	µg/mL	+/-	11.7958	µg/mL	Gravimetric
	CAS # 207-08-9	(Lot 012019K)			+/-	90.5458	µg/mL	Unstressed
	Purity 99%				+/-	100.4688	µg/mL	Stressed
15	Benzo(a)pyrene		2,004.0	µg/mL	+/-	11.7606	µg/mL	Gravimetric
	CAS # 50-32-8	(Lot RP210113)			+/-	90.2755	µg/mL	Unstressed
	Purity 99%				+/-	100.1689	µg/mL	Stressed
16	Indeno(1,2,3-cd)pyrene		2,010.0	µg/mL	+/-	11.7958	µg/mL	Gravimetric
	CAS # 193-39-5	(Lot 1-RAK-33-4)			+/-	90.5458	µg/mL	Unstressed
	Purity 99%				+/-	100.4688	µg/mL	Stressed
17	Dibenz(a,h)anthracene		2,017.0	µg/mL	+/-	11.8369	µg/mL	Gravimetric
	CAS # 53-70-3	(Lot ER032211-01)			+/-	90.8611	µg/mL	Unstressed
	Purity 99%				+/-	100.8187	µg/mL	Stressed
18	Benzo(g,h,i)perylene		2,003.0	µg/mL	+/-	11.7547	µg/mL	Gravimetric
	CAS # 191-24-2	(Lot 8GFYJ)			+/-	90.2305	µg/mL	Unstressed
	Purity 99%				+/-	100.1189	µg/mL	Stressed

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

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

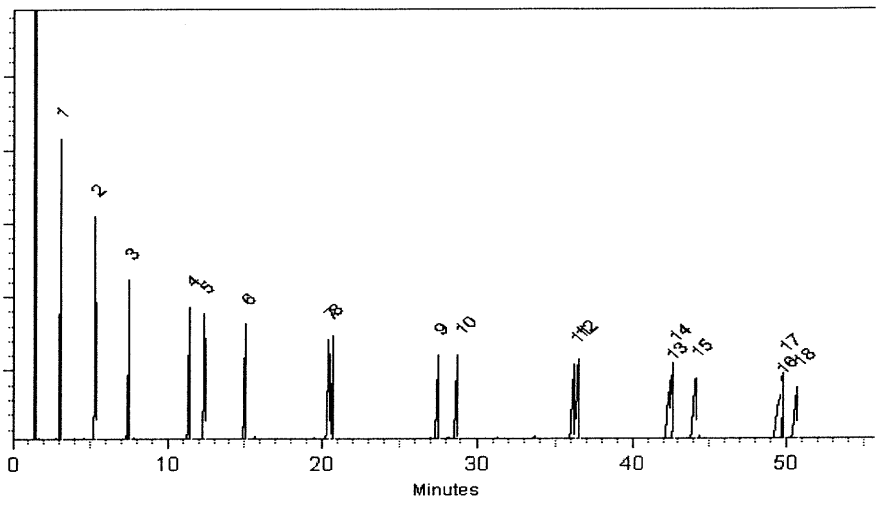
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



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

Lane Kibe - Mix Technician **Date Mixed:** 14-May-2021 **Balance:** B345965662

Alexis Shelow - Operations Tech I **Date Passed:** 18-May-2021

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified combined stressed uncertainty value (includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

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

Label Conditions	Standard Conditions	Non-Standard Conditions
25°C Nominal (Room Temperature)	< 60°C	≥ 60°C up to 7 days
10°C or colder (Refrigerate)	< 40°C	≥ 40°C up to 7 days
0°C or colder (Freezer) -20°C or colder (Deep Freezer)	< 25°C	≥ 25°C up to 7 days

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

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampules. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.

Sand
Purified
Washed and Ignited

avantor™ | J.T.Baker®

Material No.: 3382-05
Batch No.: 0000243821
Manufactured Date: 2018/04/09
Retest Date: 2025/04/07
Revision No: 1

Certificate of Analysis

Test	Specification	Result
Substances Soluble in HCl	<= 0.16 %	0.01

For Laboratory, Research or Manufacturing Use
Meets Reagent Specifications for testing USP/NF monographs

Country of Origin: US
Packaging Site: Paris Mfg Ctr & DC

E 2865

James T Ethier

Jamie Ethier
Vice President Global Quality

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone: 610.386.1700

PRODUCTOS QUIMICOS MONTERREY, S.A. DE C.V.

MIRADOR 201, COL. MIRADOR
MONTERREY, N.L. MEXICO
CP 64070
TEL +52 81 13 52 57 57
www.pqm.com.mx

CERTIFICATE OF ANALYSIS

PRODUCT :	SODIUM SULFATE CRYSTALS ANHYDROUS		
QUALITY :	ACS (CODE RMB3375)	FORMULA :	Na_2SO_4
SPECIFICATION NUMBER :	6399	RELEASE DATE:	ABR/21/2023
LOT NUMBER :	313201		

TEST	SPECIFICATIONS	LOT VALUES
Assay (Na_2SO_4)	Min. 99.0%	99.7 %
pH of a 5% solution at 25°C	5.2 - 9.2	6.1
Insoluble matter	Max. 0.01%	0.005 %
Loss on ignition	Max. 0.5%	0.1 %
Chloride (Cl)	Max. 0.001%	<0.001 %
Nitrogen compounds (as N)	Max. 5 ppm	<5 ppm
Phosphate (PO_4)	Max. 0.001%	<0.001 %
Heavy metals (as Pb)	Max. 5 ppm	<5 ppm
Iron (Fe)	Max. 0.001%	<0.001 %
Calcium (Ca)	Max. 0.01%	0.002 %
Magnesium (Mg)	Max. 0.005%	0.001 %
Potassium (K)	Max. 0.008%	0.003 %
Extraction-concentration suitability	Passes test	Passes test
Appearance	Passes test	Passes test
Identification	Passes test	Passes test
Solubility and foreing matter	Passes test	Passes test
Retained on US Standard No. 10 sieve	Max. 1%	0.1 %
Retained on US Standard No. 60 sieve	Min. 94%	97.3 %
Through US Standard No. 60 sieve	Max. 5%	2.5 %
Through US Standard No. 100 sieve	Max. 10%	0.1 %

COMMENTS

QC: PhC Irma Belmares

If you need further details, please call our factory or contact our local distributor.

RG-02-01, Ed. 3

Recd. by RB on 7/24/23 E3551

ULTRA RESI-ANALYZED
For Organic Residue Analysis
(dichloromethane)

avantor™ | J.T.B

Material No.: 926
Batch No.: 24C01E
Manufactured Date: 2024-C
Expiration Date: 2025-C
Revision I

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	< 1
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	2
Assay (CH_2Cl_2) (by GC, exclusive of preservative, corrected for water)	≥ 99.8 %	100.0 %
Color (APHA)	≤ 10	10
Residue after Evaporation	≤ 1.0 ppm	0.2 ppm
Titrable Acid (µeq/g)	≤ 0.3	< 0.1
Chloride (Cl)	≤ 10 ppm	< 5 ppm
Water (by KF, coulometric)	≤ 0.02 %	< 0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC
Manufacturer source batch: MG24A04224

E 3743

Ken Koehnlein
Sr. Manager, Quality Assurance

Cleanert EPH
5g/25ml 15/pkg
固相萃取产品
LOT#:Z0513CK1
MFG#:F04005
Made in China
CAT# SI500025-30
Agela Technologies
E3757

PO: PO1-8886 PRODUCT CODE: SHIP DATE: 6/21/2024

Methylene Chloride
ULTRA RESI-ANALYZED
For Organic Residue Analysis
(dichloromethane)

avantor™ | J.T.Baker

Material No.: 9266-A4
Batch No.: 24E2462004
Manufactured Date: 2024-04-10
Expiration Date: 2025-07-10
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	3
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	3
Assay (CH_2Cl_2) (by GC, exclusive of preservative, corrected for water)	≥ 99.8 %	100.0 %
Color (APHA)	≤ 10	5
Residue after Evaporation	≤ 1.0 ppm	0.1 ppm
Titrable Acid (µeq/g)	≤ 0.3	< 0.1
Chloride (Cl)	≤ 10 ppm	5 ppm
Water (by KF, coulometric)	≤ 0.02 %	< 0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC
Manufacturer source batch: MG24D10725

E 3768

JCroak
Jamie Croak
Director Quality Operations, Bioscience Production

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone 610.386.1700

Hexanes (95% n-hexane)
BAKER RESI-ANALYZED® Reagent
For Organic Residue Analysis

avantor | J.T.B

Material No.: 926
Batch No.: 24C186
Manufactured Date: 2024-0
Expiration Date: 2025-0
Revision N

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	< 1
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	1
ECD-Sensitive Impurities (as Ethylene Dibromide) – Single Impurity Peak (ng/mL)	≤ 5	1
Assay (Total Saturated C_6 Isomers) (by GC, corrected for water)	≥ 99.5 %	99.7 %
Assay (as n-Hexane) (by GC, corrected for water)	≥ 95 %	98 %
Color (APHA)	≤ 10	5
Residue after Evaporation	≤ 1.0 ppm	0.4 ppm
Substances Darkened by H_2SO_4	Passes Test	Passes Test
Water (by KF, coulometric)	≤ 0.05 %	< 0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

Recd. by RP on 8/13/24

E3789

JCroak

Jamie Croak
Director Quality Operations, Bioscience Product

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone 610.386.1700

Acetone
CMOS

avantor™ | J.T.Baker®

Material No.: 9005-05
Batch No.: 24E0761004
Manufactured Date: 2024-05-02
Retest Date: 2029-05-01
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay ($(CH_3)_2CO$) (by GC, corrected for water)	≥ 99.5 %	99.8 %
Color (APHA)	≤ 10	< 5
Residue after Evaporation	≤ 5 ppm	< 1 ppm
Titrable Acid (µeq/g)	≤ 0.3	0.1
Titrable Base (µeq/g)	≤ 0.5	0.1
Water (H_2O)	≤ 0.5 %	0.1 %
Solubility in H_2O	Passes Test	Passes Test
Chloride (Cl)	≤ 0.2 ppm	< 0.2 ppm
Phosphate (PO_4)	≤ 0.05 ppm	< 0.05 ppm
Trace Impurities - Aluminum (Al)	≤ 50.0 ppb	< 5.0 ppb
Arsenic and Antimony (as As)	≤ 5.0 ppb	< 5.0 ppb
Trace Impurities - Barium (Ba)	≤ 20.0 ppb	< 1.0 ppb
Trace Impurities - Beryllium (Be)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Bismuth (Bi)	≤ 20.0 ppb	< 10.0 ppb
Trace Impurities - Boron (B)	≤ 10.0 ppb	< 5.0 ppb
Trace Impurities - Cadmium (Cd)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Calcium (Ca)	≤ 25.0 ppb	3.6 ppb
Trace Impurities - Chromium (Cr)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Cobalt (Co)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Copper (Cu)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Gallium (Ga)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Germanium (Ge)	≤ 10.0 ppb	< 10.0 ppb
Trace Impurities - Gold (Au)	≤ 20 ppb	< 5 ppb
Trace Impurities - Iron (Fe)	≤ 20.0 ppb	< 1.0 ppb
Trace Impurities - Lead (Pb)	≤ 10.0 ppb	< 10.0 ppb
Trace Impurities - Lithium (Li)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Magnesium (Mg)	≤ 20 ppb	< 1 ppb
Trace Impurities - Manganese (Mn)	≤ 10.0 ppb	< 1.0 ppb

>>> Continued on page 2 >>>

Recd. by RP on 9/11/24

E3793

Acetone
CMOS

avantor™ | J.T.Baker®

Material No.: 9005-05
Batch No.: 24E0761004

Test	Specification	Result
Trace Impurities - Molybdenum (Mo)	≤ 10.0 ppb	< 5.0 ppb
Trace Impurities - Nickel (Ni)	≤ 10.0 ppb	< 5.0 ppb
Trace Impurities - Niobium (Nb)	≤ 50.0 ppb	< 1.0 ppb
Trace Impurities - Potassium (K)	≤ 10.0 ppb	< 10.0 ppb
Trace Impurities - Silicon (Si)	≤ 50 ppb	< 10 ppb
Trace Impurities - Silver (Ag)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Sodium (Na)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Strontium (Sr)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Tantalum (Ta)	≤ 50.0 ppb	< 5.0 ppb
Trace Impurities - Thallium (Tl)	≤ 10.0 ppb	< 5.0 ppb
Trace Impurities - Tin (Sn)	≤ 20.0 ppb	< 10.0 ppb
Trace Impurities - Titanium (Ti)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Vanadium (V)	≤ 10.0 ppb	< 1.0 ppb
Trace Impurities - Zinc (Zn)	≤ 20.0 ppb	7.9 ppb
Trace Impurities - Zirconium (Zr)	≤ 10.0 ppb	< 1.0 ppb
Particle Count - 0.5 µm and greater (Rion KS42AF)	≤ 100 par/ml	8 par/ml
Particle Count - 1.0 µm and greater (Rion KS42AF)	≤ 8 par/ml	2 par/ml

>>> Continued on page 3 >>>

Acetone
CMOS

avantor™ | J.T.Baker®

Material No.: 9005-05
Batch No.: 24E0761004

Test	Specification	Result

For Microelectronic Use

Country of Origin: USA
Packaging Site: Paris Mfg Ctr & DC

Michelle Bales
Sr. Manager, Quality Assurance

PO: PO2-329 PRODUCT CODE: SHIP DATE: 9/30/2024

Acetone
BAKER RESI-ANALYZED® Reagent
For Organic Residue Analysis

avantor | J.T.Baker

Material No.: 9254-03
Batch No.: 24H1462005
Manufactured Date: 2024-05-24
Expiration Date:2027-05-24
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
Assay ($(CH_3)_2CO$) (by GC, corrected forwater)	>= 99.4 %	99.8 %
Color (APHA)	<= 10	5
Residue after Evaporation	<= 1.0 ppm	0.2 ppm
Substances Reducing Permanganate	Passes Test	Passes Test
Titrable Acid (µeq/g)	<= 0.3	0.2
Titrable Base (µeq/g)	<= 0.6	<0.1
Water (H_2O)	<= 0.5 %	0.2 %
FID-Sensitive Impurities (as 2-Octanol)Single Impurity Peak (ng/mL)	<= 5	<1
ECD Sensitive Impurities (as HeptachlorEpoxide) Single Peak (pg/mL)	<= 10	1

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: United States
Packaging Site: Phillipsburg Mfg Ctr & DC

Recd. by RP on 10/9/24

E 3818

Jamie Croak
Director Quality Operations, Bioscience Production

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials,LLC
100 Matsonford Rd, Suite 200,Radnor,PA,19087.U.S.A.Phone 610.386.1700

PO: PO2-329 PRODUCT CODE: SHIP DATE: 9/30/2024

n-Hexane 95%
ULTRA RESI-ANALYZED
For Organic Residue Analysis

avantor™ | J.T.Baker®

Material No.: 9262-03
Batch No.: 24G1962003
Manufactured Date: 2024-05-23
Expiration Date: 2025-08-22
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	3
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	1
ECD-Sensitive Impurities (as Ethylene Dibromide) - Single Impurity Peak (ng/mL)	≤ 5	1
Assay (Total Saturated C_6 Isomers) (by GC, corrected for water)	≥ 99.5 %	99.7 %
Assay (as n-Hexane) (by GC, corrected for water)	≥ 95 %	98 %
Color (APHA)	≤ 10	5
Residue after Evaporation	≤ 1.0 ppm	0.1 ppm
Substances Darkened by H_2SO_4	Passes Test	Passes Test
Water (by KF, coulometric)	≤ 0.05 %	< 0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

Recd. by RP on 10/09/24

E 3819

Jamie Croak
Director Quality Operations, Bioscience Production

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700
Avantor Performance Materials, LLC
100 Matsonford Rd, Suite 200, Radnor, PA 19087. U.S.A. Phone 610.386.1700

n-Hexane 95%
ULTRA RESI-ANALYZED
For Organic Residue Analysis

avantor™ | J.T.Baker®

Material No.: 9262-03
Batch No.: 24G1962003
Manufactured Date: 2024-05-23
Expiration Date: 2025-08-22
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	3
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	1
ECD-Sensitive Impurities (as Ethylene Dibromide) - Single Impurity Peak (ng/mL)	≤ 5	1
Assay (Total Saturated C_6 Isomers) (by GC, corrected for water)	≥ 99.5 %	99.7 %
Assay (as n-Hexane) (by GC, corrected for water)	≥ 95 %	98 %
Color (APHA)	≤ 10	5
Residue after Evaporation	≤ 1.0 ppm	0.1 ppm
Substances Darkened by H_2SO_4	Passes Test	Passes Test
Water (by KF, coulometric)	≤ 0.05 %	< 0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

E3825

JCroak

Jamie Croak
Director Quality Operations, Bioscience Production

n-Hexane 95%
ULTRA RESI-ANALYZED
For Organic Residue Analysis

avantor™ | J.T.Baker®

Material No.: 9262-03
Batch No.: 24G1962003
Manufactured Date: 2024-05-23
Expiration Date: 2025-08-22
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol) Single Impurity Peak (ng/mL)	≤ 5	3
ECD Sensitive Impurities (as Heptachlor Epoxide) Single Peak (pg/mL)	≤ 10	1
ECD-Sensitive Impurities (as Ethylene Dibromide) - Single Impurity Peak (ng/mL)	≤ 5	1
Assay (Total Saturated C_6 Isomers) (by GC, corrected for water)	≥ 99.5 %	99.7 %
Assay (as n-Hexane) (by GC, corrected for water)	≥ 95 %	98 %
Color (APHA)	≤ 10	5
Residue after Evaporation	≤ 1.0 ppm	0.1 ppm
Substances Darkened by H_2SO_4	Passes Test	Passes Test
Water (by KF, coulometric)	≤ 0.05 %	< 0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: USA
Packaging Site: Phillipsburg Mfg Ctr & DC

E3826

Rec'd by RP on 11/7/24

Jamie Croak
Director Quality Operations, Bioscience Production

Methylene Chloride
ULTRA RESI-ANALYZED
For Organic Residue Analysis
(dichloromethane)

avantor™ | J.T.Baker

Material No.: 9266-A4
Batch No.: 24J0862003
Manufactured Date: 2024-09-12
Expiration Date:2025-12-12
Revision No.: 0

Certificate of Analysis

Test	Specification	Result
FID-Sensitive Impurities (as 2-Octanol)Single Impurity Peak (ng/mL)	<= 5	2
ECD Sensitive Impurities (as HeptachlorEpoxide) Single Peak (pg/mL)	<= 10	1
Assay (CH_2Cl_2) (by GC, exclusive of preservative, corrected for water)	>= 99.8 %	100.0 %
Color (APHA)	<= 10	5
Residue after Evaporation	<= 1.0 ppm	0.2 ppm
Titrable Acid (µeq/g)	<= 0.3	<0.1
Chloride (Cl)	<= 10 ppm	<5 ppm
Water (by KF, coulometric)	<= 0.02 %	<0.01 %

For Laboratory,Research,or Manufacturing Use
MEETS SPECIFICATIONS WITHIN THE EXPIRATION PERIOD

Country of Origin: United States
Packaging Site: Phillipsburg Mfg Ctr & DC

E 3828

JCroak

Jamie Croak
Director Quality Operations, Bioscience Production

For questions on this Certificate of Analysis please contact Technical Services at 855.282.6867 or +1.610.386.1700

Avantor Performance Materials LLC

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 95709
Lot Number: 060420
Description: NJ EPH Aromatic Hydrocarbons
18 components
Expiration Date: 060425
Recommended Storage: Refrigerate (4 °C)
Nominal Concentration (µg/mL): 2000
NIST Test ID#: 23060

Solvent(s):	Lot#
Methylene chloride	104929

5E-05 Balance Uncertainty
Weight(s) shown below were combined and diluted to (mL): 500.0 0.058 Flask Uncertainty

Formulated By: Benson Chan	060420 DATE
Reviewed By: Pedro L. Rentas	060420 DATE

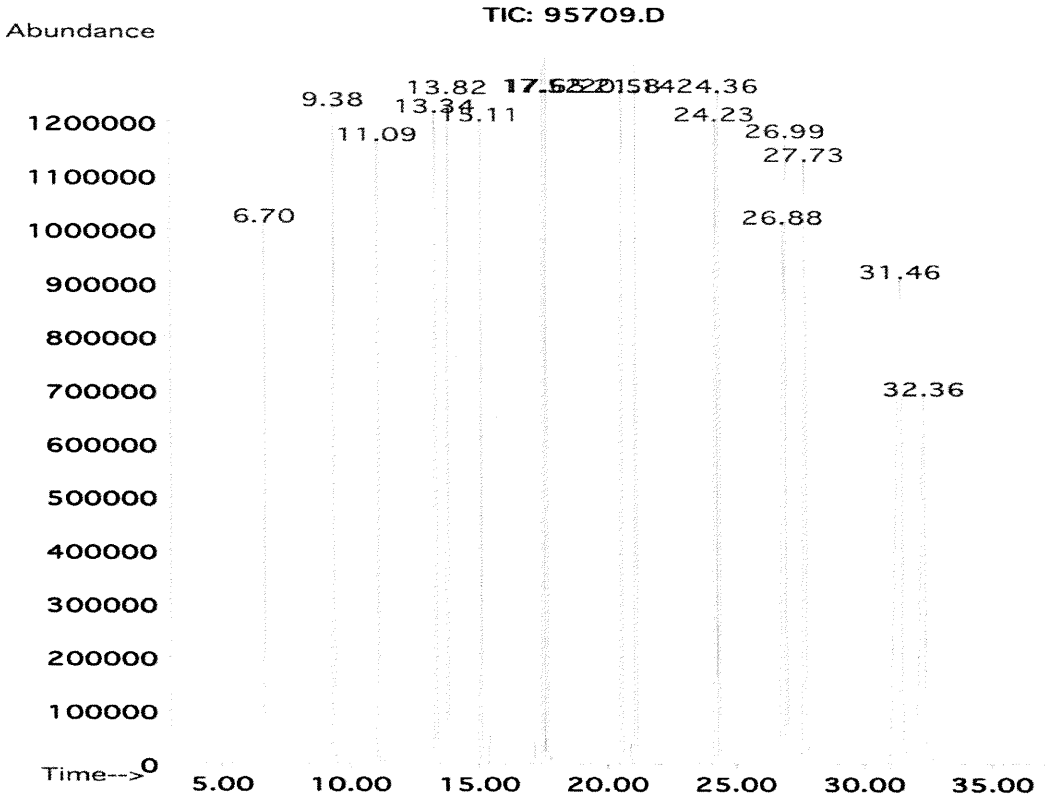
	Compound	RM#	Lot Number	Nominal Conc (µg/mL)	Purity (%)	Uncertainty Purity	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1.	Acenaphthene	1	MKBJ4871V	2000	99	0.2	1.01003	1.01010	2000.1	8.1	83-32-9	N/A	ipr-rat 600mg/kg
2.	Acenaphthylene	3	012014	2000	98	0.2	1.02033	1.02053	2000.4	8.2	208-96-8	N/A	N/A
3.	Anthracene	13	A0210580	2000	99	0.2	1.01003	1.01009	2000.1	8.1	120-12-7	0.2mg/m3 (8H)	ipr-mus 430mg/kg
4.	Benzo(a)anthracene	28	JY2TD-JT	2000	98	0.2	1.02033	1.02051	2000.3	8.2	56-55-3	N/A	N/A
5.	Benzo(a)pyrene	30	012012	2000	99.5	0.2	1.00495	1.00511	2000.3	8.1	50-32-8	0.2mg/m3 (8H)	scu-rat 50mg/kg
6.	Benzo(b)fluoranthene	31	012012b	2000	99	0.2	1.01003	1.01012	2000.2	8.1	205-99-2	N/A	N/A
7.	Benzo(k)fluoranthene	33	012012k	2000	99	0.2	1.01003	1.01018	2000.3	8.1	207-08-9	N/A	N/A
8.	Benzo(g,h,i)perylene	32	012018	2000	99	0.2	1.01003	1.01019	2000.3	8.1	191-24-2	N/A	N/A
9.	Chrysene	91	012015	2000	98	0.2	1.02033	1.02040	2000.1	8.2	218-01-9	0.2mg/m3	N/A
10.	Dibenzo(a,h)anthracene	112	012011	2000	98	0.2	1.02033	1.02050	2000.3	8.2	53-70-3	0.2mg/m3	N/A
11.	Fluoranthene	183	04221PV	2000	98	0.2	1.02033	1.02050	2000.3	8.2	206-44-0	N/A	orl-rat 2000mg/kg
12.	Fluorene	184	07211MV	2000	98	0.2	1.02033	1.02047	2000.3	8.2	86-73-7	N/A	ipr-mus 2 g/kg
13.	Indeno(1,2,3-cd)pyrene	202	012014	2000	99.9	0.2	1.00093	1.00119	2000.5	8.0	193-39-5	N/A	N/A
14.	2-Methylnaphthalene	214	MKBF3783V	2000	97	0.2	1.03085	1.03090	2000.1	8.3	91-57-6	N/A	orl-rat 1630mg/kg
15.	Naphthalene	222	MKBZ8680V	2000	100	0.2	0.99993	0.99999	2000.1	8.0	91-20-3	10 ppm (50mg/m3/8H)	orl-rat 490mg/kg
16.	Phenanthrene	248	03410PV	2000	99	0.2	1.01003	1.01030	2000.5	8.1	85-01-8	0.2mg/m3/8H	orl-mus 700mg/kg
17.	Pyrene	259	010197	2000	98	0.2	1.02033	1.02042	2000.2	8.2	129-00-0	0.2mg/m3/8H	orl-rat 2700mg/kg
18.	1,2,3-Trimethylbenzene	944	031097	2000	99	0.2	1.01003	1.01025	2000.4	8.1	526-73-8	N/A	N/A

P11137
&
P11141

AR 11/02/21

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

Method GC8MSD-2.M: Column:SPB-5 (30m X 0.25mm ID X 0.25µm film thickness) Temp 1 = 50°C (1min.), Temp 2 = 300°C (14min.), Rate = 10°C/min., Injector B= 250°C, Detector B = 275°C, Split Ratio = 100:1, Scan Rate = 2. Analysis performed by: Melissa Stonier.



Peak No.	Name	MSD RT (min.)
1	1,2,3-Trimethylbenzene	6.70
2	Naphthalene	9.38
3	2-Methylnaphthalene	11.09
4	Acenaphthylene	13.34
5	Acenaphthene	13.82
6	Fluorene	15.11
7	Phenanthrene	17.52
8	Anthracene	17.65
9	Fluoranthene	20.58
10	Pyrene	21.14
11	Chrysene	24.23
12	Benzo(a)anthracene	24.36
13	Benzo(b)fluoranthene/Benzo(k)fluoranthene	26.98
14	Benzo(a)pyrene	27.73
15	Indeno(1,2,3-cd)pyrene/Dibenzo(a,h)anthracene	31.46
16	Benzo(g,h,i)perylene	32.36

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

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

ACCREDITED
ISO 17034 Accredited
Reference Material Producer
Certificate #3222.01

ACCREDITED
ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

P12361 ↓ P12370 } Y.P. 03/16/23

Catalog No. : 30540 **Lot No.:** A0190424

Description : NJEPH Aliphatics Calibration Standard

Aliphatics Calibration Standard 2000µg/mL, Hexane/Carbon Disulfide (80:20), 1mL/ampul

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

Expiration Date : November 30, 2029 **Storage:** 25°C nominal

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	Grav. Conc. (weight/volume)	Expanded Uncertainty (95% C.L.; K=2)	
1	n-Nonane (C9) **CAS #** 111-84-2 (Lot SHBN5361) **Purity** 99%	2,014.0 µg/mL	+/- 11.8193 µg/mL +/- 50.0027 µg/mL +/- 59.9491 µg/mL	Gravimetric Unstressed Stressed
2	n-Decane (C10) **CAS #** 124-18-5 (Lot SHBN8619) **Purity** 99%	2,014.7 µg/mL	+/- 11.8232 µg/mL +/- 50.0193 µg/mL +/- 59.9689 µg/mL	Gravimetric Unstressed Stressed
3	Naphthalene **CAS #** 91-20-3 (Lot MKCH0219) **Purity** 99%	2,015.3 µg/mL	+/- 11.8271 µg/mL +/- 50.0358 µg/mL +/- 59.9888 µg/mL	Gravimetric Unstressed Stressed
4	n-Dodecane (C12) **CAS #** 112-40-3 (Lot SHBN7174) **Purity** 99%	2,008.0 µg/mL	+/- 11.7841 µg/mL +/- 49.8538 µg/mL +/- 59.7705 µg/mL	Gravimetric Unstressed Stressed
5	2-Methylnaphthalene **CAS #** 91-57-6 (Lot STBK0259) **Purity** 96%	2,007.0 µg/mL	+/- 11.7784 µg/mL +/- 49.8299 µg/mL +/- 59.7419 µg/mL	Gravimetric Unstressed Stressed
6	n-Tetradecane (C14) **CAS #** 629-59-4 (Lot STBK2282) **Purity** 99%	2,016.7 µg/mL	+/- 11.8349 µg/mL +/- 50.0689 µg/mL +/- 60.0284 µg/mL	Gravimetric Unstressed Stressed
7	n-Hexadecane (C16) **CAS #** 544-76-3 (Lot SHBM4146) **Purity** 98%	2,014.9 µg/mL	+/- 11.8244 µg/mL +/- 50.0246 µg/mL +/- 59.9753 µg/mL	Gravimetric Unstressed Stressed

8	n-Octadecane (C18) **CAS #** 593-45-3 **Purity** 97%	(Lot VZKOJ)	2,004.7	µg/mL	+/- 11.7645 +/- 49.7710 +/- 59.6712	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
9	n-Eicosane (C20) **CAS #** 112-95-8 **Purity** 99%	(Lot MKCF7888)	2,018.0	µg/mL	+/- 11.8428 +/- 50.1020 +/- 60.0681	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
10	n-Heneicosane (C21) **CAS #** 629-94-7 **Purity** 99%	(Lot MKCL3226)	2,000.7	µg/mL	+/- 11.7410 +/- 49.6717 +/- 59.5522	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
11	n-Docosane (C22) **CAS #** 629-97-0 **Purity** 99%	(Lot MKCL8918)	2,005.3	µg/mL	+/- 11.7684 +/- 49.7876 +/- 59.6911	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
12	n-Tetracosane (C24) **CAS #** 646-31-1 **Purity** 99%	(Lot MKCN2863)	2,018.0	µg/mL	+/- 11.8428 +/- 50.1020 +/- 60.0681	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
13	n-Hexacosane (C26) **CAS #** 630-01-3 **Purity** 99%	(Lot MKCD4540)	2,014.0	µg/mL	+/- 11.8193 +/- 50.0027 +/- 59.9491	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
14	n-Octacosane (C28) **CAS #** 630-02-4 **Purity** 99%	(Lot BCCG0084)	2,002.0	µg/mL	+/- 11.7489 +/- 49.7048 +/- 59.5919	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
15	n-Triacontane (C30) **CAS #** 638-68-6 **Purity** 97%	(Lot MKCQ9436)	2,011.1	µg/mL	+/- 11.8025 +/- 49.9316 +/- 59.8637	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
16	n-Dotriacontane (C32) **CAS #** 544-85-4 **Purity** 99%	(Lot BCBW0661)	2,012.0	µg/mL	+/- 11.8075 +/- 49.9531 +/- 59.8895	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
17	n-Tetratriacontane (C34) **CAS #** 14167-59-0 **Purity** 99%	(Lot OML4N)	2,006.7	µg/mL	+/- 11.7762 +/- 49.8207 +/- 59.7308	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
18	n-Hexatriacontane (C36) **CAS #** 630-06-8 **Purity** 99%	(Lot Z27H018)	2,017.3	µg/mL	+/- 11.8388 +/- 50.0855 +/- 60.0483	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
19	n-Octatriacontane (C38) **CAS #** 7194-85-6 **Purity** 96%	(Lot 0000145137)	2,017.3	µg/mL	+/- 11.8385 +/- 50.0842 +/- 60.0467	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed
20	n-Tetracontane (C40) **CAS #** 4181-95-7 **Purity** 99%	(Lot BSBME)	2,008.7	µg/mL	+/- 11.7880 +/- 49.8703 +/- 59.7903	µg/mL µg/mL µg/mL	Gravimetric Unstressed Stressed

Solvent: Hexane/Carbon disulfide (80:20)
CAS # 110-54-3/75-15-0
Purity 99%

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

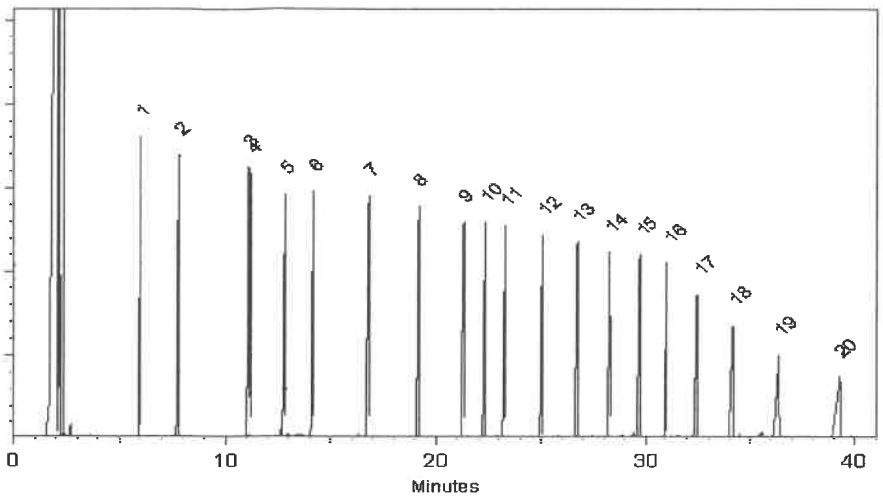
Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID



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

Morgan Craighead - Mix Technician

Date Mixed: 10-Oct-2022 **Balance:** 1128360905

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 20-Oct-2022

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified combined stressed uncertainty value (includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

k is a coverage factor of 2, which gives a level of confidence of approximately 95%.

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

Label Conditions	Standard Conditions	Non-Standard Conditions
25°C Nominal (Room Temperature)	< 60°C	≥ 60°C up to 7 days
10°C or colder (Refrigerate)	< 40°C	≥ 40°C up to 7 days
0°C or colder (Freezer) -20°C or colder (Deep Freezer)	< 25°C	≥ 25°C up to 7 days

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

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampules. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.

RESTEK
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Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

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CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

P12960 & P12991 Y.P. 12/21/2023

Catalog No. : 31098 **Lot No.:** A0204989

Description : 1-Chlorooctadecane Standard

1-Chlorooctadecane Standard 10,000µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : January 31, 2031 **Storage:** 10°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1-Chlorooctadecane	3386-33-2	14738400	99%	10,097.3 µg/mL	+/- 567.2675

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

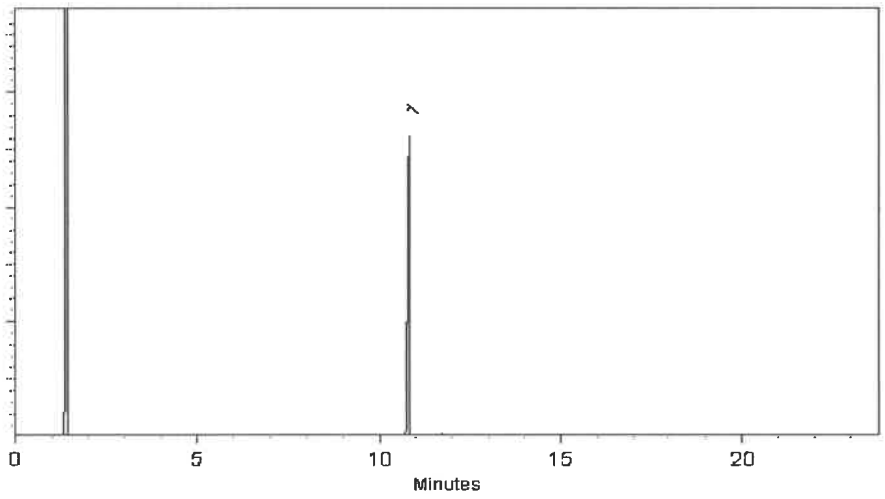
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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

Peter Robbins - Operations Technician I

Date Mixed: 02-Dec-2023 **Balance Serial #** B345965662

Christie Mills - Operations Lead Tech - ARM QC

Date Passed: 08-Dec-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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Certificate of Analysis

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ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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P12960 & P12991 Y.P. 12/21/2023

Catalog No. : 31098 **Lot No.:** A0204989

Description : 1-Chlorooctadecane Standard

1-Chlorooctadecane Standard 10,000µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : January 31, 2031 **Storage:** 10°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1-Chlorooctadecane	3386-33-2	14738400	99%	10,097.3 µg/mL	+/- 567.2675

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

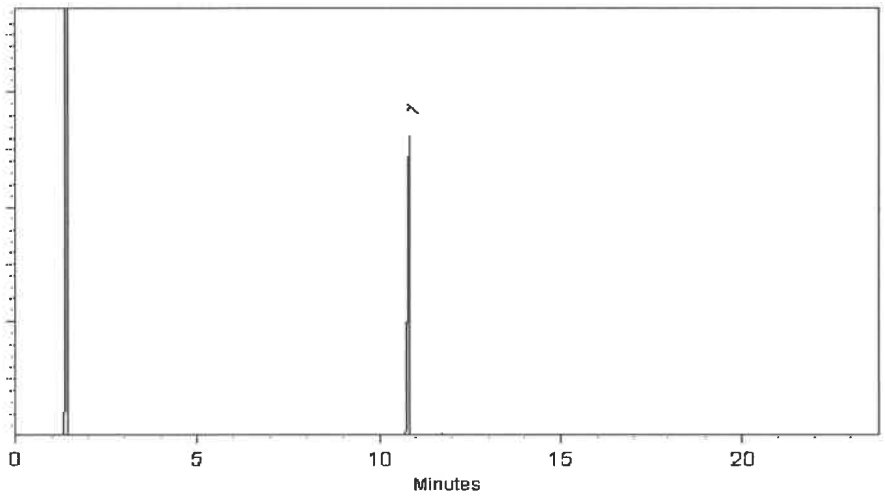
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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

Peter Robbins - Operations Technician I

Date Mixed: 02-Dec-2023 **Balance Serial #** B345965662

Christie Mills - Operations Lead Tech - ARM QC

Date Passed: 08-Dec-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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P12992 ↓ P13031 } Y.P. 12/21/2023

Catalog No. : 31097 **Lot No.:** A0204177

Description : o-Terphenyl Standard

o-Terphenyl Standard 10,000 µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : June 30, 2027 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	o-Terphenyl	84-15-1	GKSSA	99%	10,000.5 µg/mL	+/- 450.4278

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

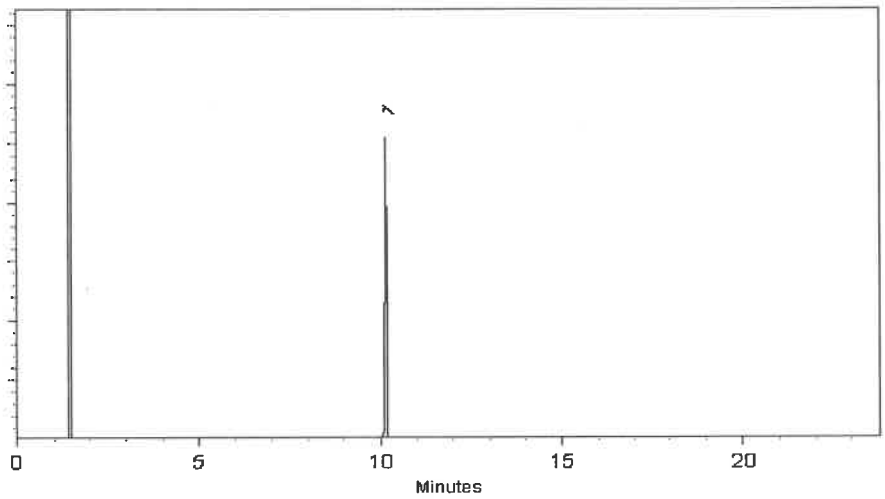
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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Laith Clemente - Operations Technician I

Date Mixed: 07-Nov-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 09-Nov-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

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P12992 ↓ P13031 } Y.P. 12/21/2023

Catalog No. : 31097 **Lot No.:** A0204177

Description : o-Terphenyl Standard

o-Terphenyl Standard 10,000 µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : June 30, 2027 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	o-Terphenyl	84-15-1	GKSSA	99%	10,000.5 µg/mL	+/- 450.4278

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

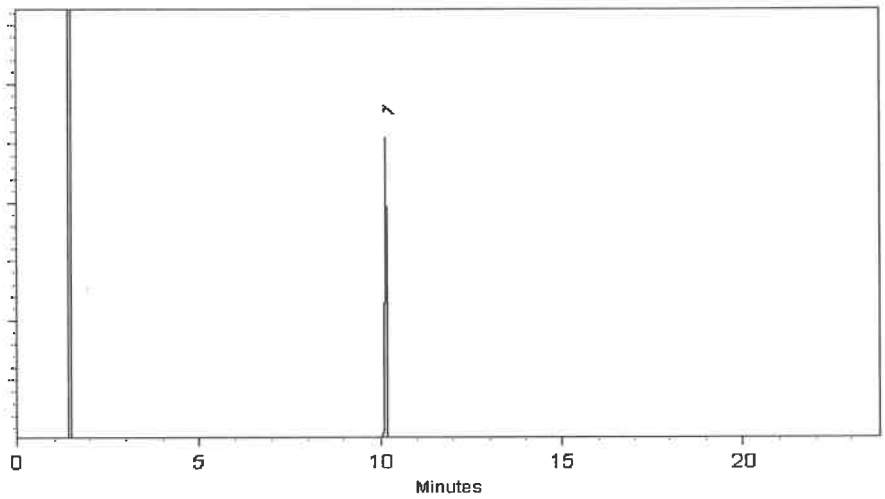
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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Laith Clemente - Operations Technician I

Date Mixed: 07-Nov-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 09-Nov-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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Manufacturing Notes:

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Handling Notes:

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P12992 ↓ P13031 } Y.P. 12/21/2023

Catalog No. : 31097 **Lot No.:** A0204177

Description : o-Terphenyl Standard

o-Terphenyl Standard 10,000 µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : June 30, 2027 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	o-Terphenyl	84-15-1	GKSSA	99%	10,000.5 µg/mL	+/- 450.4278

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

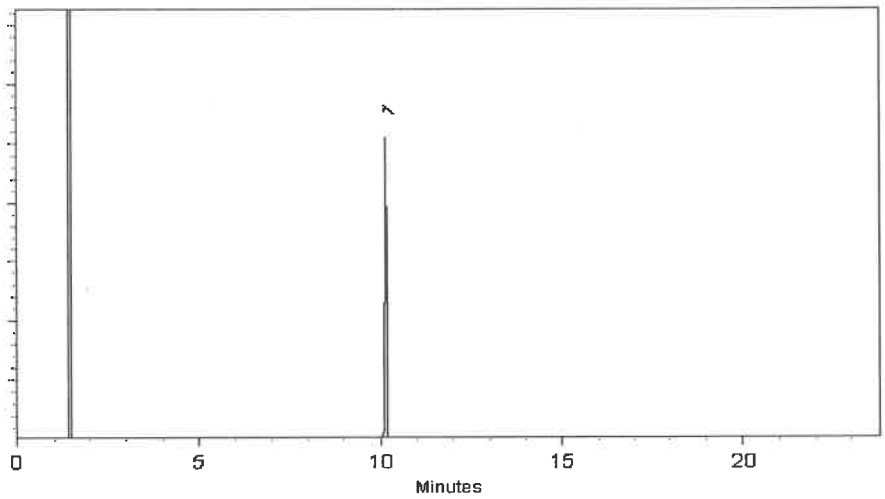
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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Laith Clemente - Operations Technician I

Date Mixed: 07-Nov-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 09-Nov-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

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  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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P12992 ↓ P13031 } Y.P. 12/21/2023

Catalog No. : 31097 **Lot No.:** A0204177

Description : o-Terphenyl Standard

o-Terphenyl Standard 10,000 µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : June 30, 2027 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	o-Terphenyl	84-15-1	GKSSA	99%	10,000.5 µg/mL	+/- 450.4278

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

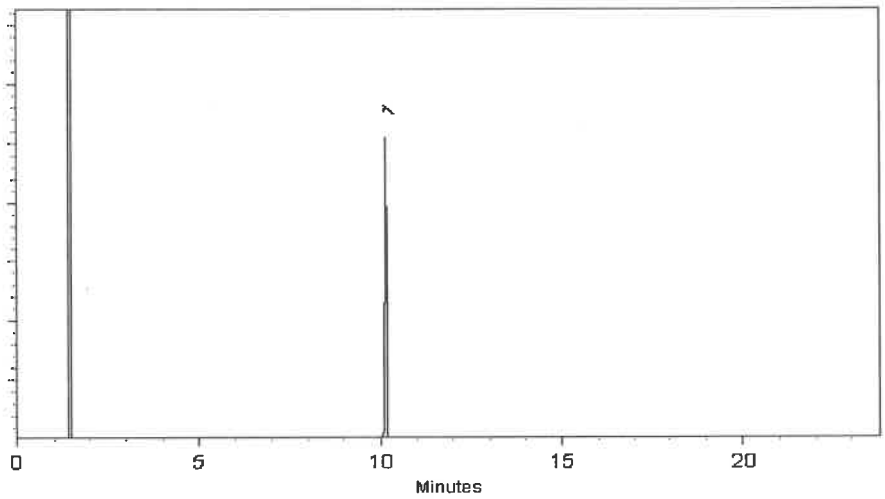
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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Laith Clemente - Operations Technician I

Date Mixed: 07-Nov-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 09-Nov-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

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- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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P12992 ↓ P13031 } Y.P. 12/21/2023

Catalog No. : 31097 **Lot No.:** A0204177

Description : o-Terphenyl Standard

o-Terphenyl Standard 10,000 µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : June 30, 2027 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	o-Terphenyl	84-15-1	GKSSA	99%	10,000.5 µg/mL	+/- 450.4278

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

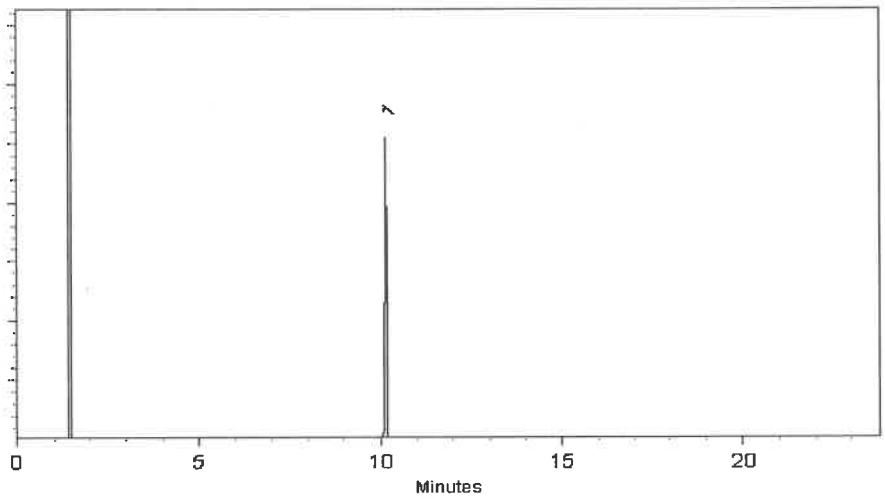
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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Laith Clemente - Operations Technician I

Date Mixed: 07-Nov-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 09-Nov-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

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- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

P12992 ↓ P13031 } Y.P. 12/21/2023

Catalog No. : 31097 **Lot No.:** A0204177

Description : o-Terphenyl Standard

o-Terphenyl Standard 10,000 µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : June 30, 2027 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	o-Terphenyl	84-15-1	GKSSA	99%	10,000.5 µg/mL	+/- 450.4278

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

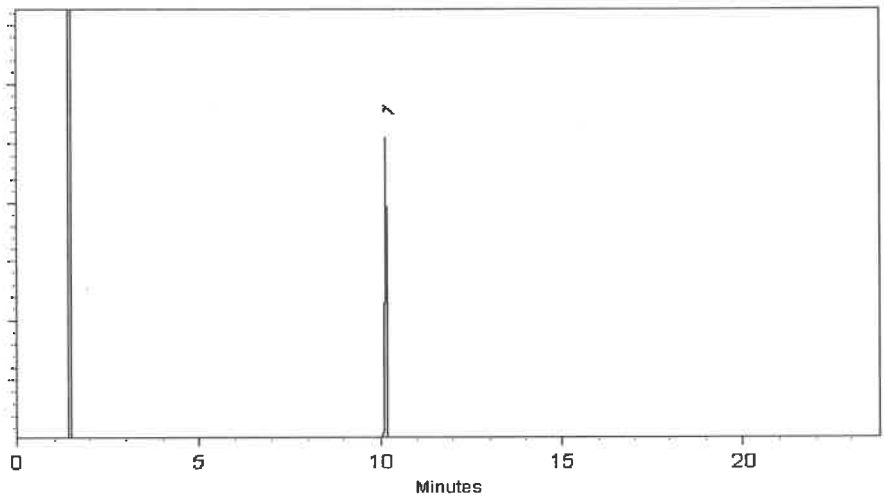
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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

Laith Clemente - Operations Technician I

Date Mixed: 07-Nov-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 09-Nov-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 31098 **Lot No.:** A0200707

P13044 & P13051 Y.P. 12/26/23

Description : 1-Chlorooctadecane Standard

1-Chlorooctadecane Standard 10,000µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1-Chlorooctadecane	3386-33-2	E230426RSRB	99%	10,018.0 µg/mL	+/- 562.8106

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

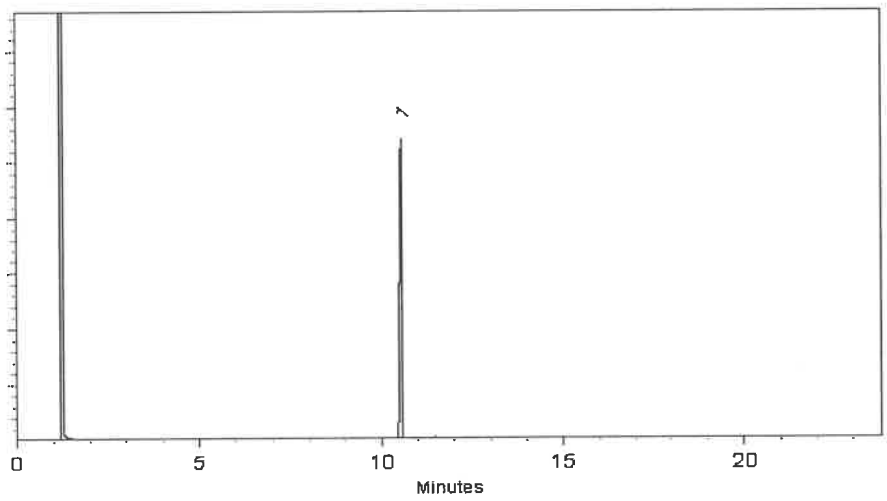
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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

Ashley Frantz - Quoting Technician

Date Mixed: 07-Aug-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 10-Aug-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

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Catalog No. : 31098 **Lot No.:** A0200707

P13044 & P13051 Y.P. 12/26/23

Description : 1-Chlorooctadecane Standard

1-Chlorooctadecane Standard 10,000µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1-Chlorooctadecane	3386-33-2	E230426RSRB	99%	10,018.0 µg/mL	+/- 562.8106

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

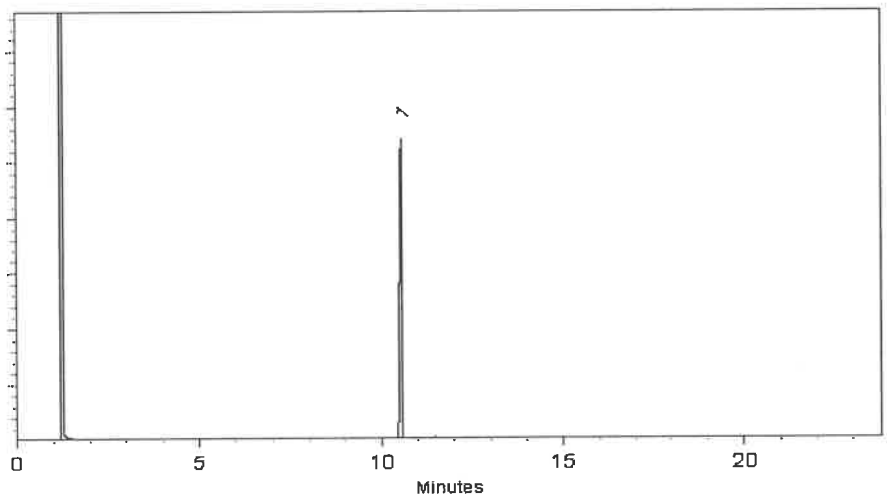
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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

Ashley Frantz - Quoting Technician

Date Mixed: 07-Aug-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 10-Aug-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

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Catalog No. : 31098 **Lot No.:** A0200707

P13044 & P13051 Y.P. 12/26/23

Description : 1-Chlorooctadecane Standard

1-Chlorooctadecane Standard 10,000µg/mL, Methylene Chloride, 1mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Ship: Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1-Chlorooctadecane	3386-33-2	E230426RSRB	99%	10,018.0 µg/mL	+/- 562.8106

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

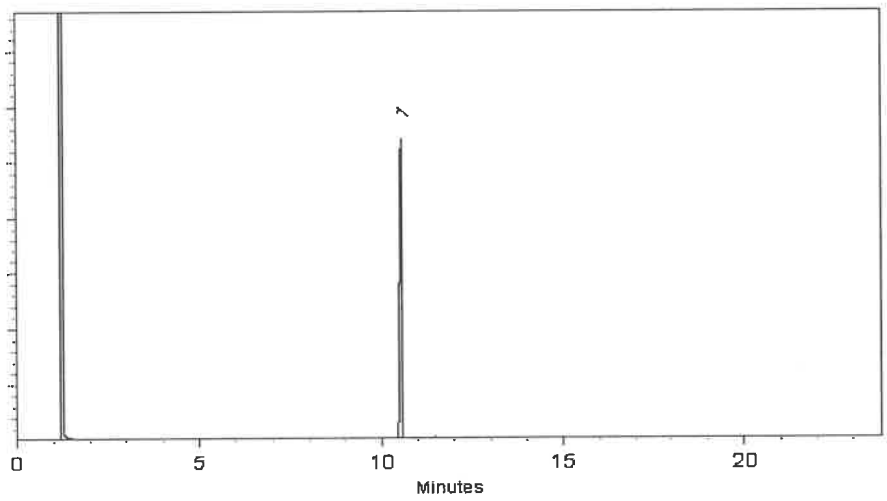
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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

Ashley Frantz - Quoting Technician

Date Mixed: 07-Aug-2023 **Balance Serial #** 1128360905

Dillan Murphy - Operations Technician I

Date Passed: 10-Aug-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

P13053 ↓ P13099 } Y.P. 01/12/24

Catalog No. : 30542 **Lot No.:** A0203911

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : November 30, 2030 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	200.0 µg/mL	+/- 5.1667
2	n-Decane (C10)	124-18-5	SHBQ1342	99%	200.0 µg/mL	+/- 5.1667
3	n-Dodecane (C12)	112-40-3	SHBP7054	99%	200.7 µg/mL	+/- 5.1839
4	n-Tetradecane (C14)	629-59-4	STBK5437	99%	200.7 µg/mL	+/- 5.1839
5	n-Hexadecane (C16)	544-76-3	SHBP8192	99%	200.3 µg/mL	+/- 5.1753
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	200.6 µg/mL	+/- 5.1815
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	200.1 µg/mL	+/- 5.1704
8	n-Henicosane (C21)	629-94-7	MKCL8682	99%	200.3 µg/mL	+/- 5.1753
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	200.0 µg/mL	+/- 5.1667
10	n-Tetracosane (C24)	646-31-1	MKCQ8345	99%	200.3 µg/mL	+/- 5.1753
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	200.0 µg/mL	+/- 5.1667
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	200.3 µg/mL	+/- 5.1753
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	200.5 µg/mL	+/- 5.1788
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	200.0 µg/mL	+/- 5.1667
15	n-Tetratriacontane (C34)	14167-59-0	D3MZN	99%	200.0 µg/mL	+/- 5.1667
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	200.0 µg/mL	+/- 5.1667
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	200.0 µg/mL	+/- 5.1667

18	n-Tetracontane (C40)	4181-95-7	OKEGA	99%	200.0 µg/mL	+/-	5.1667

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

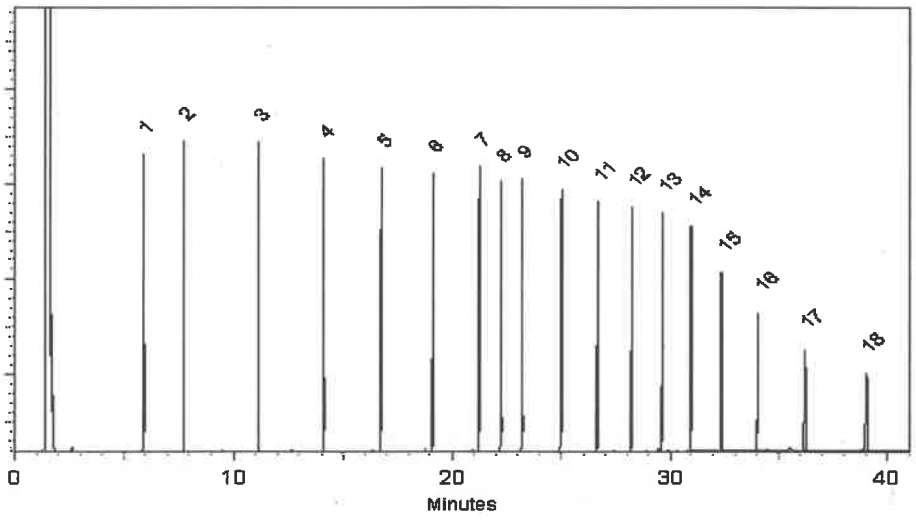
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Laith Clemente - Operations Technician I

Date Mixed: 31-Oct-2023 **Balance Serial #** B345965662

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 06-Nov-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30542 **Lot No.:** A0200008

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : August 31, 2030 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13100 & P13102 Y.P. 01/02/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	201.7 µg/mL	+/- 5.2098
2	n-Decane (C10)	124-18-5	SHBP4427	99%	201.3 µg/mL	+/- 5.2012
3	n-Dodecane (C12)	112-40-3	SHBN7174	99%	200.7 µg/mL	+/- 5.1839
4	n-Tetradecane (C14)	629-59-4	STBK5437	99%	201.0 µg/mL	+/- 5.1926
5	n-Hexadecane (C16)	544-76-3	SHBP8192	99%	201.7 µg/mL	+/- 5.2098
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	201.2 µg/mL	+/- 5.1984
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	201.4 µg/mL	+/- 5.2038
8	n-Heneicosane (C21)	629-94-7	MKCL3226	99%	201.3 µg/mL	+/- 5.2012
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	201.3 µg/mL	+/- 5.2012
10	n-Tetracosane (C24)	646-31-1	MKCQ8345	99%	201.3 µg/mL	+/- 5.2012
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	201.7 µg/mL	+/- 5.2098
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	201.0 µg/mL	+/- 5.1926
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	200.5 µg/mL	+/- 5.1788
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	201.3 µg/mL	+/- 5.2012
15	n-Tetratriacontane (C34)	14167-59-0	D3MZN	99%	200.7 µg/mL	+/- 5.1839
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	201.0 µg/mL	+/- 5.1926
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	201.3 µg/mL	+/- 5.1998

18	n-Tetracontane (C40)	4181-95-7	4LJYN	98%	200.6 µg/mL	+/-	5.1815

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

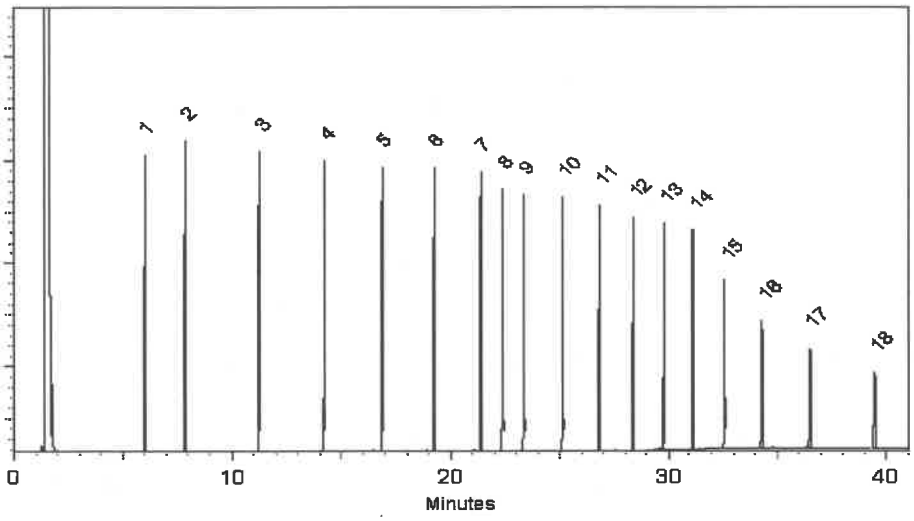
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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John Friedline - Operations Technician I

Date Mixed: 18-Jul-2023 **Balance Serial #** 1127510105

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 21-Jul-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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Certificate of Analysis

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ilac-MRA A2LA ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30542 **Lot No.:** A0200008

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : August 31, 2030 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13100 & P13102 Y.P. 01/02/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	201.7 µg/mL	+/- 5.2098
2	n-Decane (C10)	124-18-5	SHBP4427	99%	201.3 µg/mL	+/- 5.2012
3	n-Dodecane (C12)	112-40-3	SHBN7174	99%	200.7 µg/mL	+/- 5.1839
4	n-Tetradecane (C14)	629-59-4	STBK5437	99%	201.0 µg/mL	+/- 5.1926
5	n-Hexadecane (C16)	544-76-3	SHBP8192	99%	201.7 µg/mL	+/- 5.2098
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	201.2 µg/mL	+/- 5.1984
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	201.4 µg/mL	+/- 5.2038
8	n-Heneicosane (C21)	629-94-7	MKCL3226	99%	201.3 µg/mL	+/- 5.2012
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	201.3 µg/mL	+/- 5.2012
10	n-Tetracosane (C24)	646-31-1	MKCQ8345	99%	201.3 µg/mL	+/- 5.2012
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	201.7 µg/mL	+/- 5.2098
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	201.0 µg/mL	+/- 5.1926
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	200.5 µg/mL	+/- 5.1788
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	201.3 µg/mL	+/- 5.2012
15	n-Tetratriacontane (C34)	14167-59-0	D3MZN	99%	200.7 µg/mL	+/- 5.1839
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	201.0 µg/mL	+/- 5.1926
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	201.3 µg/mL	+/- 5.1998

18	n-Tetracontane (C40)	4181-95-7	4LJYN	98%	200.6 µg/mL	+/-	5.1815

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

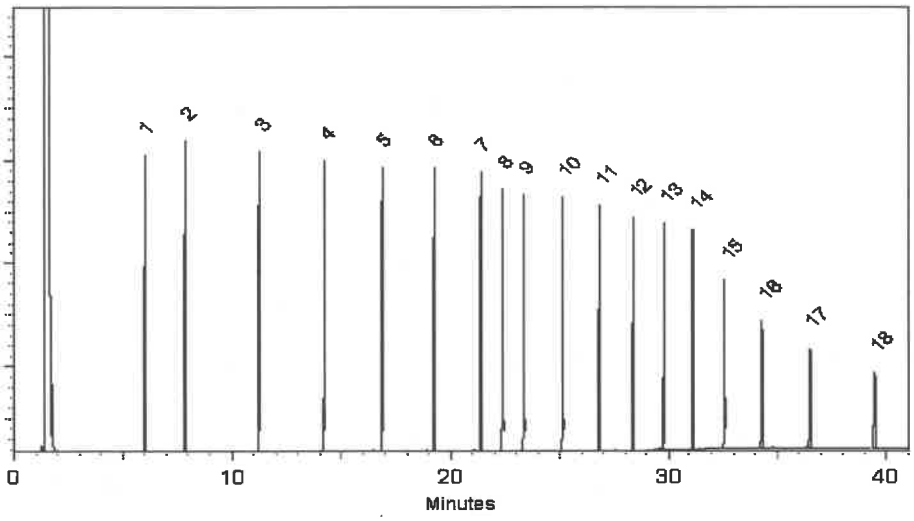
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

John Friedline - Operations Technician I

Date Mixed: 18-Jul-2023 **Balance Serial #** 1127510105

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 21-Jul-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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This Reference Material is intended for Laboratory Use Only as a standard for the qualitative and/or quantitative determination of the analyte(s) listed.

Catalog No. : 30542 **Lot No.:** A0200008

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : August 31, 2030 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13100 & P13102 Y.P. 01/02/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	201.7 µg/mL	+/- 5.2098
2	n-Decane (C10)	124-18-5	SHBP4427	99%	201.3 µg/mL	+/- 5.2012
3	n-Dodecane (C12)	112-40-3	SHBN7174	99%	200.7 µg/mL	+/- 5.1839
4	n-Tetradecane (C14)	629-59-4	STBK5437	99%	201.0 µg/mL	+/- 5.1926
5	n-Hexadecane (C16)	544-76-3	SHBP8192	99%	201.7 µg/mL	+/- 5.2098
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	201.2 µg/mL	+/- 5.1984
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	201.4 µg/mL	+/- 5.2038
8	n-Heneicosane (C21)	629-94-7	MKCL3226	99%	201.3 µg/mL	+/- 5.2012
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	201.3 µg/mL	+/- 5.2012
10	n-Tetracosane (C24)	646-31-1	MKCQ8345	99%	201.3 µg/mL	+/- 5.2012
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	201.7 µg/mL	+/- 5.2098
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	201.0 µg/mL	+/- 5.1926
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	200.5 µg/mL	+/- 5.1788
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	201.3 µg/mL	+/- 5.2012
15	n-Tetratriacontane (C34)	14167-59-0	D3MZN	99%	200.7 µg/mL	+/- 5.1839
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	201.0 µg/mL	+/- 5.1926
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	201.3 µg/mL	+/- 5.1998

18	n-Tetracontane (C40)	4181-95-7	4LJYN	98%	200.6 µg/mL	+/-	5.1815

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

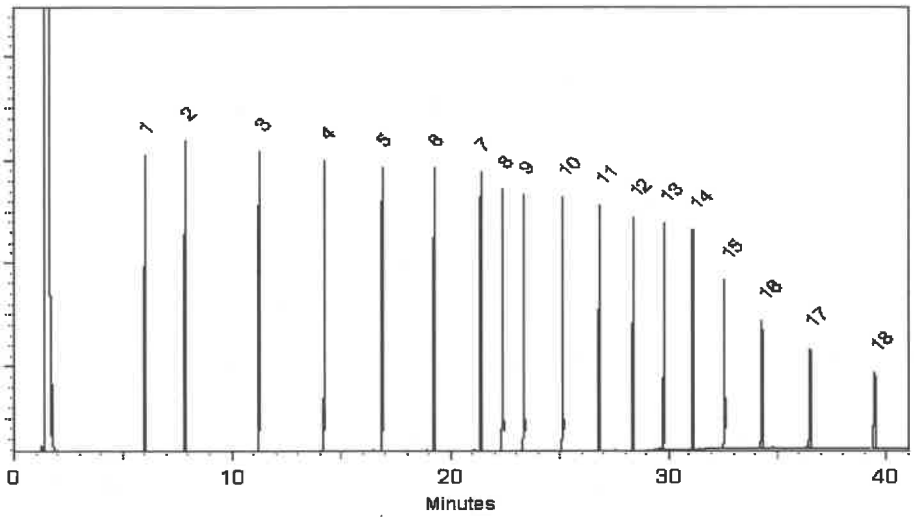
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

John Friedline - Operations Technician I

Date Mixed: 18-Jul-2023 **Balance Serial #** 1127510105

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 21-Jul-2023

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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Certificate of Analysis

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ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 31480 **Lot No.:** A0206496

P13258 ↓ P13277 } Y.P. 02/20/24

Description : MA Fractionation Surrogate Spike Mix

MA Fractionation Surrogate Spike Mix 4000µg/mL, Hexane, 1mL/ampul

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

Expiration Date : December 31, 2029 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2-Fluorobiphenyl	321-60-8	00021384	99%	4,008.5 µg/mL	+/- 180.5736
2	2-Bromonaphthalene	580-13-2	STBC5362V	99%	4,001.5 µg/mL	+/- 180.2582

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

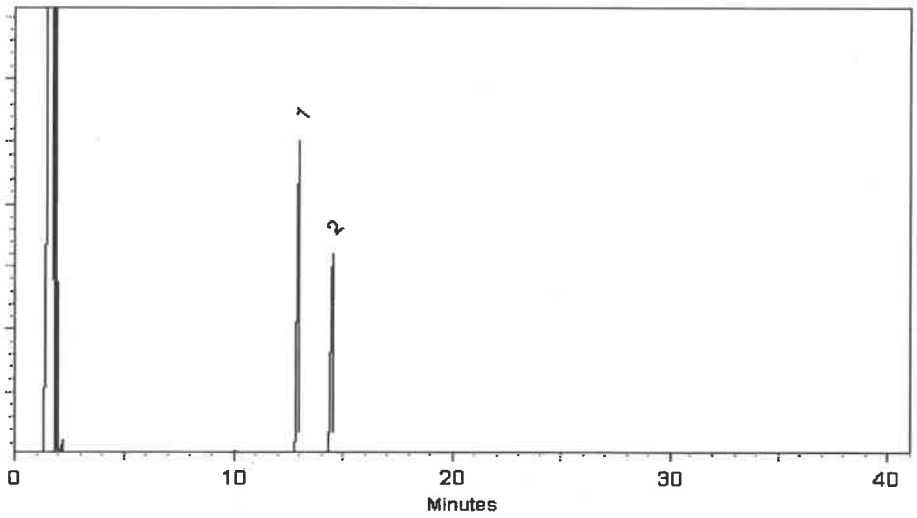
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Rebecca Gingerich - Operations Tech II

Date Mixed: 11-Jan-2024 **Balance Serial #** B345965662

Dillan Murphy - Operations Technician I

Date Passed: 15-Jan-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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- Compounds with a listed purity of less than 99% have been weight corrected to compensate for impurities and/or salts. A correction factor is used to calculate the amount of compound necessary to achieve the desired concentration of the parent compound in solution.
- Purity of isomeric compounds is reported as the sum of the isomers.
- Purity values are rounded to the nearest whole number.

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

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Catalog No. : 31480 **Lot No.:** A0206496

P13258 ↓ P13277 } Y.P. 02/20/24

Description : MA Fractionation Surrogate Spike Mix

MA Fractionation Surrogate Spike Mix 4000µg/mL, Hexane, 1mL/ampul

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

Expiration Date : December 31, 2029 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2-Fluorobiphenyl	321-60-8	00021384	99%	4,008.5 µg/mL	+/- 180.5736
2	2-Bromonaphthalene	580-13-2	STBC5362V	99%	4,001.5 µg/mL	+/- 180.2582

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

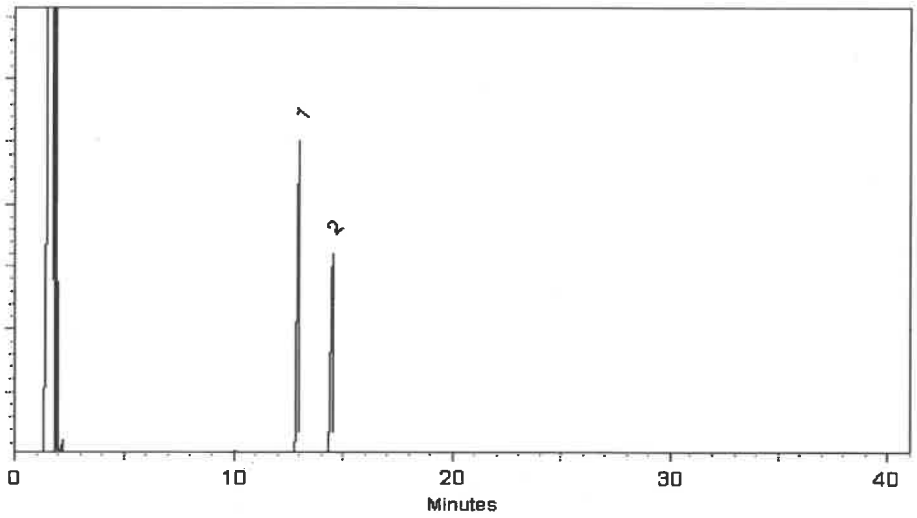
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 11-Jan-2024 **Balance Serial #** B345965662

Dillan Murphy - Operations Technician I

Date Passed: 15-Jan-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

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P13258 ↓ P13277 } Y.P. 02/20/24

Description : MA Fractionation Surrogate Spike Mix

MA Fractionation Surrogate Spike Mix 4000µg/mL, Hexane, 1mL/ampul

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

Expiration Date : December 31, 2029 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2-Fluorobiphenyl	321-60-8	00021384	99%	4,008.5 µg/mL	+/- 180.5736
2	2-Bromonaphthalene	580-13-2	STBC5362V	99%	4,001.5 µg/mL	+/- 180.2582

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

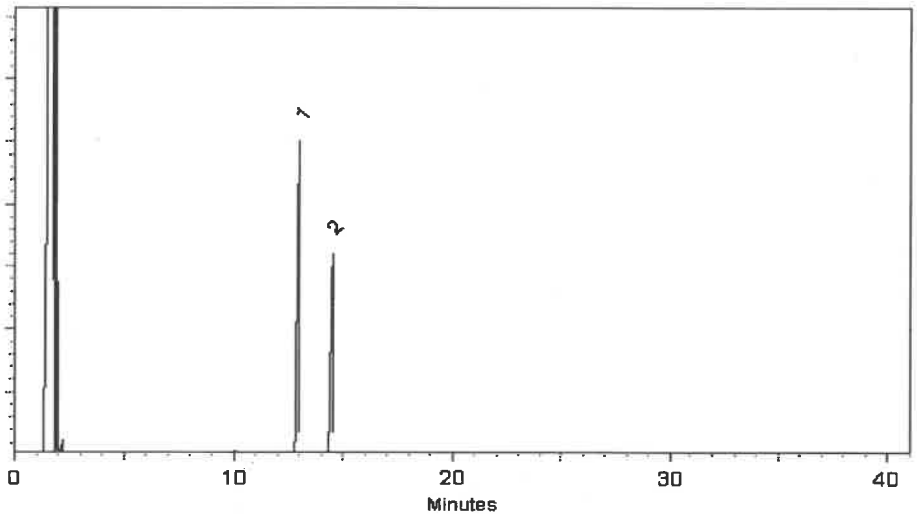
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Rebecca Gingerich - Operations Tech II

Date Mixed: 11-Jan-2024 **Balance Serial #** B345965662

Dillan Murphy - Operations Technician I

Date Passed: 15-Jan-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 31480 **Lot No.:** A0206496

P13258 ↓ P13277 } Y.P. 02/20/24

Description : MA Fractionation Surrogate Spike Mix

MA Fractionation Surrogate Spike Mix 4000µg/mL, Hexane, 1mL/ampul

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

Expiration Date : December 31, 2029 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2-Fluorobiphenyl	321-60-8	00021384	99%	4,008.5 µg/mL	+/- 180.5736
2	2-Bromonaphthalene	580-13-2	STBC5362V	99%	4,001.5 µg/mL	+/- 180.2582

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

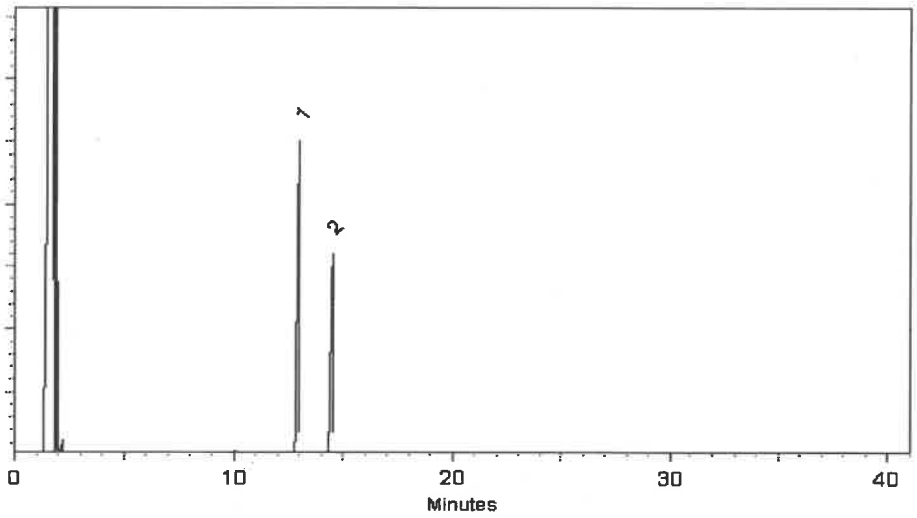
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Rebecca Gingerich - Operations Tech II

Date Mixed: 11-Jan-2024 **Balance Serial #** B345965662

Dillan Murphy - Operations Technician I

Date Passed: 15-Jan-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

Absolute Standards, Inc.
800-368-1131
www.absolutestandards.com

Certified Reference Material CRM

ANAB ISO 17034 Accredited
AR-1539 Certificate Number
https://Absolutestandards.com

CERTIFIED WEIGHT REPORT

Part Number: 95899
Lot Number: 040524
Description: NJ EPH Aliphatic n-Hydrocarbons - Revised
20 components
Expiration Date: 040534
Recommended Storage: Ambient (20 °C)
Nominal Concentration (µg/mL): 1000
NIST Test ID#: 6UTB

Solvent(s):	Lot#
Cyclohexane	28930

P13278 & P13287 } Y.P. 04111124

Formulated By:	Anthony Mahoney	040524 DATE
Reviewed By:	Pedro L. Rentas	040524 DATE

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

	Compound	(RM#) Part Number	Lot Number	Dil. Factor	Initial Vol. (mL)	Initial Conc.(ug/mL)	Nominal Conc (µg/mL)	Purity (%)	Purity Uncertainty	Uncertainty Pipette	Target Weight(g)	Actual Weight(g)	Actual Conc (µg/mL)	Expanded Uncertainty (+/-) (µg/mL)	SDS Information (Solvent Safety Info. On Attached pg.) CAS#	OSHA PEL (TWA)	LD50
1.	2-Methylnaphthalene	(0214)	MKBF3783V	NA	NA	NA	1000	97	0.2	NA	0.02579	0.02594	1005.7	5.7	91-57-6	N/A	orl-rat 1630mg/kg
2.	Naphthalene	(0222)	MKBZ8680V	NA	NA	NA	1000	100	0.2	NA	0.02502	0.02511	1003.7	5.7	91-20-3	10 ppm (50mg/m3/8H)	orl-rat 490mg/kg
3.	n-Nonane	95708	120222	1.00	25.00	1000.7	1000	NA	NA	0.013	NA	NA	1000.0	4.2	111-84-2	200 ppm (1050mg/m3/8H)	ivn-mus 218mg/kg
4.	n-Decane	95708	**120222**	1.00	25.00	1000.9	1000	NA	NA	0.013	NA	NA	1000.2	4.2	124-18-5	N/A	N/A
5.	n-Dodecane	95708	120222	1.00	25.00	1000.7	1000	NA	NA	0.013	NA	NA	1000.0	4.2	112-40-3	N/A	ivn-mus 3494mg/kg
6.	n-Tetradecane	95708	120222	1.00	25.00	1002.1	1000	NA	NA	0.013	NA	NA	1001.3	4.2	629-59-4	N/A	N/A
7.	n-Hexadecane	95708	120222	1.00	25.00	1000.5	1000	NA	NA	0.013	NA	NA	999.7	4.2	544-76-3	N/A	N/A
8.	n-Octadecane	95708	120222	1.00	25.00	1001.0	1000	NA	NA	0.013	NA	NA	1000.3	4.1	593-45-3	N/A	N/A
9.	n-Eicosane	95708	120222	1.00	25.00	1001.0	1000	NA	NA	0.013	NA	NA	1000.3	4.2	112-95-8	N/A	N/A
10.	n-Heneicosane	95708	120222	1.00	25.00	1002.4	1000	NA	NA	0.013	NA	NA	1001.6	4.2	629-94-7	N/A	N/A
11.	n-Docosane	95708	120222	1.00	25.00	1001.9	1000	NA	NA	0.013	NA	NA	1001.2	4.2	629-97-0	N/A	N/A
12.	n-Tetracosane	95708	120222	1.00	25.00	1000.8	1000	NA	NA	0.013	NA	NA	1000.1	4.2	646-31-1	N/A	N/A
13.	n-Hexacosane	95708	120222	1.00	25.00	1001.2	1000	NA	NA	0.013	NA	NA	1000.4	4.2	630-01-3	N/A	N/A
14.	n-Octacosane	95708	120222	1.00	25.00	1000.5	1000	NA	NA	0.013	NA	NA	999.8	4.2	630-02-4	N/A	N/A
15.	n-Triacontane	95708	120222	1.00	25.00	1000.5	1000	NA	NA	0.013	NA	NA	999.8	4.2	638-68-6	N/A	N/A
16.	n-Dotriacontane	95708	120222	1.00	25.00	1000.5	1000	NA	NA	0.013	NA	NA	999.8	4.3	544-85-4	N/A	ivn-mus 100mg/kg
17.	n-Tetratriacontane	95708	120222	1.00	25.00	1000.4	1000	NA	NA	0.013	NA	NA	999.7	4.2	14167-59-0	N/A	N/A
18.	n-Hexatriacontane	95708	120222	1.00	25.00	1001.5	1000	NA	NA	0.013	NA	NA	1000.8	4.2	630-06-8	N/A	N/A
19.	n-Octatriacontane	95708	120222	1.00	25.00	1000.3	1000	NA	NA	0.013	NA	NA	999.6	4.3	7194-85-6	N/A	N/A
20.	n-Tetracontane	95708	120222	1.00	25.00	1000.6	1000	NA	NA	0.013	NA	NA	999.9	4.3	4181-95-7	N/A	N/A

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

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30542 **Lot No.:** A0207239

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : February 28, 2031 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13288 → P13317 Y.P. 04/23/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	201.0 µg/mL	+/- 5.1926
2	n-Decane (C10)	124-18-5	SHBQ1342	99%	200.7 µg/mL	+/- 5.1839
3	n-Dodecane (C12)	112-40-3	SHBP7054	99%	200.7 µg/mL	+/- 5.1839
4	n-Tetradecane (C14)	629-59-4	STBL0465	99%	200.7 µg/mL	+/- 5.1839
5	n-Hexadecane (C16)	544-76-3	SHBM4146	98%	200.6 µg/mL	+/- 5.1815
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	199.9 µg/mL	+/- 5.1647
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	199.8 µg/mL	+/- 5.1621
8	n-Heneicosane (C21)	629-94-7	MKCL8682	99%	200.7 µg/mL	+/- 5.1839
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	200.0 µg/mL	+/- 5.1667
10	n-Tetracosane (C24)	646-31-1	MKCS9978	99%	200.7 µg/mL	+/- 5.1839
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	200.3 µg/mL	+/- 5.1753
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	200.3 µg/mL	+/- 5.1753
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	199.8 µg/mL	+/- 5.1621
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	201.0 µg/mL	+/- 5.1926
15	n-Tetratriacontane (C34)	14167-59-0	OML4N	99%	200.7 µg/mL	+/- 5.1839
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	200.0 µg/mL	+/- 5.1667
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	201.0 µg/mL	+/- 5.1915

18	n-Tetracontane (C40)	4181-95-7	OKEGA	99%	200.3 µg/mL	+/- 5.1753

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

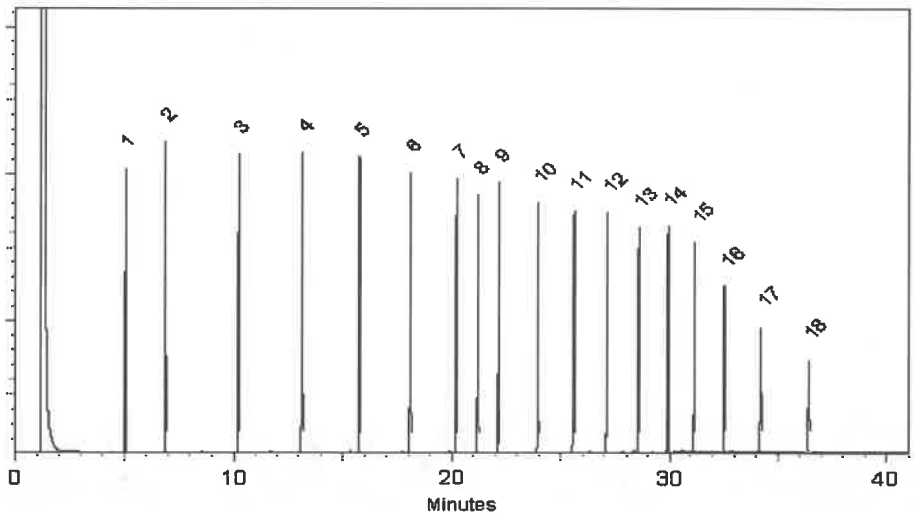
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Matt Fragassi - Mix Technician

Date Mixed: 31-Jan-2024 **Balance Serial #** 1128353505

Dillan Murphy - Operations Technician I

Date Passed: 02-Feb-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ACCREDITED
ISO 17034 Accredited
Reference Material Producer
Certificate #3222.01

ACCREDITED
ISO/IEC 17025 Accredited
Testing Laboratory
Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30542 **Lot No.:** A0207239

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : February 28, 2031 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13h17 & P13h29 } Y.P. 07116124.

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	201.0 µg/mL	+/- 5.1926
2	n-Decane (C10)	124-18-5	SHBQ1342	99%	200.7 µg/mL	+/- 5.1839
3	n-Dodecane (C12)	112-40-3	SHBP7054	99%	200.7 µg/mL	+/- 5.1839
4	n-Tetradecane (C14)	629-59-4	STBL0465	99%	200.7 µg/mL	+/- 5.1839
5	n-Hexadecane (C16)	544-76-3	SHBM4146	98%	200.6 µg/mL	+/- 5.1815
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	199.9 µg/mL	+/- 5.1647
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	199.8 µg/mL	+/- 5.1621
8	n-Heneicosane (C21)	629-94-7	MKCL8682	99%	200.7 µg/mL	+/- 5.1839
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	200.0 µg/mL	+/- 5.1667
10	n-Tetracosane (C24)	646-31-1	MKCS9978	99%	200.7 µg/mL	+/- 5.1839
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	200.3 µg/mL	+/- 5.1753
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	200.3 µg/mL	+/- 5.1753
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	199.8 µg/mL	+/- 5.1621
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	201.0 µg/mL	+/- 5.1926
15	n-Tetratriacontane (C34)	14167-59-0	OML4N	99%	200.7 µg/mL	+/- 5.1839
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	200.0 µg/mL	+/- 5.1667
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	201.0 µg/mL	+/- 5.1915

18	n-Tetracontane (C40)	4181-95-7	OKEGA	99%	200.3 µg/mL	+/-	5.1753

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

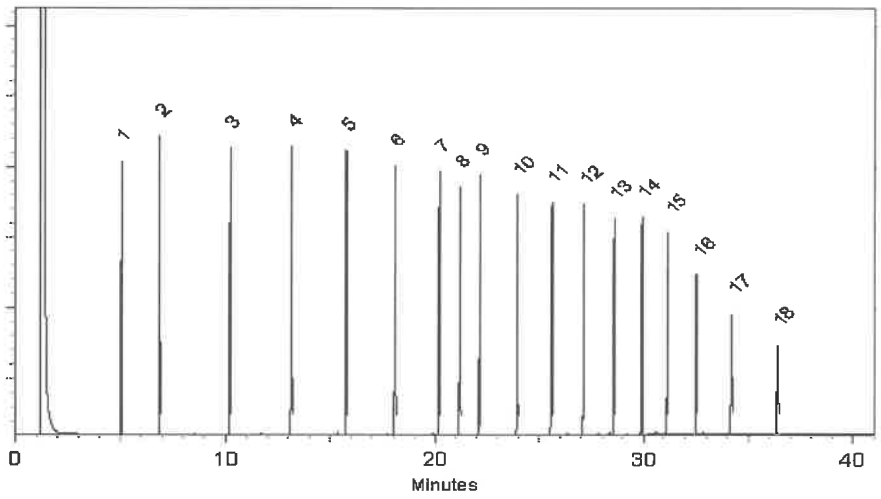
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Matt Fragassi - Mix Technician

Date Mixed: 31-Jan-2024 **Balance Serial #** 1128353505

Dillan Murphy - Operations Technician I

Date Passed: 02-Feb-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30542 **Lot No.:** A0207239

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : February 28, 2031 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13h17 & P13h29 } Y.P. 07116124.

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	201.0 µg/mL	+/- 5.1926
2	n-Decane (C10)	124-18-5	SHBQ1342	99%	200.7 µg/mL	+/- 5.1839
3	n-Dodecane (C12)	112-40-3	SHBP7054	99%	200.7 µg/mL	+/- 5.1839
4	n-Tetradecane (C14)	629-59-4	STBL0465	99%	200.7 µg/mL	+/- 5.1839
5	n-Hexadecane (C16)	544-76-3	SHBM4146	98%	200.6 µg/mL	+/- 5.1815
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	199.9 µg/mL	+/- 5.1647
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	199.8 µg/mL	+/- 5.1621
8	n-Heneicosane (C21)	629-94-7	MKCL8682	99%	200.7 µg/mL	+/- 5.1839
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	200.0 µg/mL	+/- 5.1667
10	n-Tetracosane (C24)	646-31-1	MKCS9978	99%	200.7 µg/mL	+/- 5.1839
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	200.3 µg/mL	+/- 5.1753
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	200.3 µg/mL	+/- 5.1753
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	199.8 µg/mL	+/- 5.1621
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	201.0 µg/mL	+/- 5.1926
15	n-Tetratriacontane (C34)	14167-59-0	OML4N	99%	200.7 µg/mL	+/- 5.1839
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	200.0 µg/mL	+/- 5.1667
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	201.0 µg/mL	+/- 5.1915

18	n-Tetracontane (C40)	4181-95-7	OKEGA	99%	200.3 µg/mL	+/-	5.1753

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

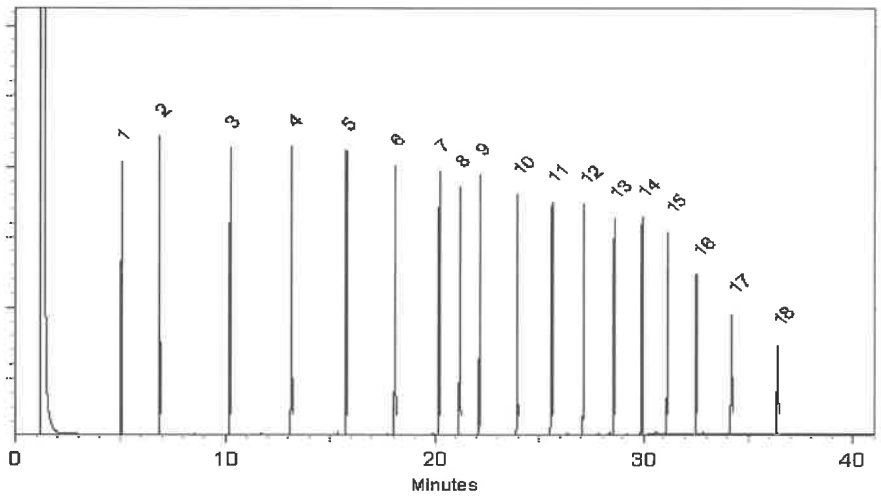
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Matt Fragassi - Mix Technician

Date Mixed: 31-Jan-2024 **Balance Serial #** 1128353505

Dillan Murphy - Operations Technician I

Date Passed: 02-Feb-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 31480 **Lot No.:** A0210831

Description : MA Fractionation Surrogate Spike Mix

MA Fractionation Surrogate Spike Mix 4000µg/mL, Hexane, 1mL/ampul

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

Expiration Date : March 31, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13457 ↓ P13476 Y.P. 07/23/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2-Fluorobiphenyl	321-60-8	00021384	99%	4,031.0 µg/mL	+/- 181.5871
2	2-Bromonaphthalene	580-13-2	STBC5362V	99%	4,037.5 µg/mL	+/- 181.8799

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

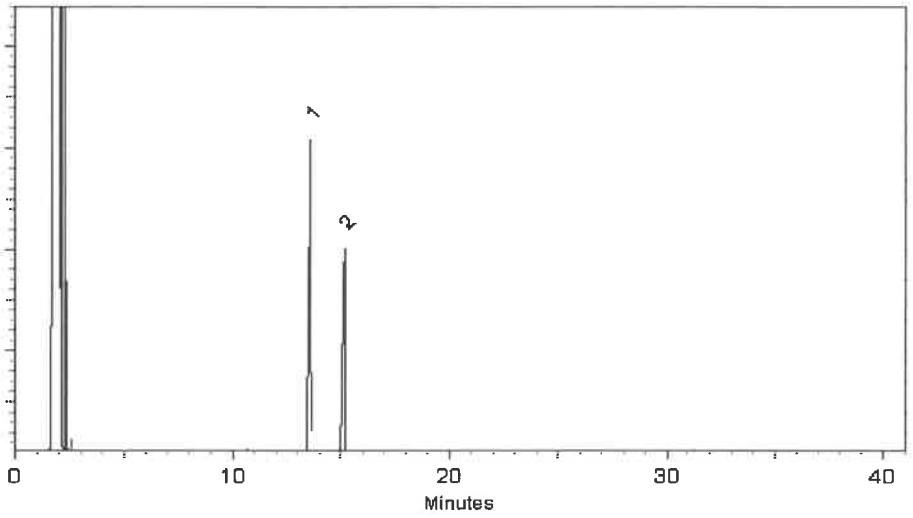
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Stacey Wanner - Operations Technician I

Date Mixed: 29-Apr-2024 **Balance Serial #** B345965662

Dillan Murphy - Operations Technician I

Date Passed: 30-Apr-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 31480 **Lot No.:** A0210831

Description : MA Fractionation Surrogate Spike Mix

MA Fractionation Surrogate Spike Mix 4000µg/mL, Hexane, 1mL/ampul

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

Expiration Date : March 31, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13457 ↓ P13476 Y.P. 07/23/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	2-Fluorobiphenyl	321-60-8	00021384	99%	4,031.0 µg/mL	+/- 181.5871
2	2-Bromonaphthalene	580-13-2	STBC5362V	99%	4,037.5 µg/mL	+/- 181.8799

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Hexane
CAS # 110-54-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

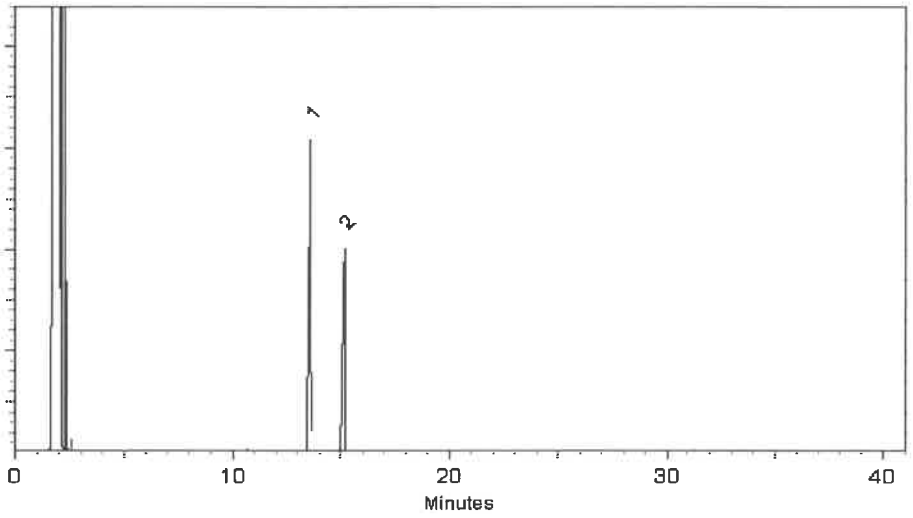
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Stacey Wanner - Operations Technician I

Date Mixed: 29-Apr-2024 **Balance Serial #** B345965662

Dillan Murphy - Operations Technician I

Date Passed: 30-Apr-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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Testing Laboratory
Certificate #3222.02

Certificate of Analysis

chromatographic plus

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30542 **Lot No.:** A0211112

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : June 30, 2031 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13625
↓
P13644
} Y.P. 10/16/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	200.9 µg/mL	+/- 5.1891
2	n-Decane (C10)	124-18-5	SHBQ1342	99%	200.7 µg/mL	+/- 5.1857
3	n-Dodecane (C12)	112-40-3	SHBP7054	99%	200.4 µg/mL	+/- 5.1771
4	n-Tetradecane (C14)	629-59-4	STBK5437	99%	200.7 µg/mL	+/- 5.1839
5	n-Hexadecane (C16)	544-76-3	SHBR0669	99%	200.6 µg/mL	+/- 5.1822
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	200.4 µg/mL	+/- 5.1782
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	200.4 µg/mL	+/- 5.1771
8	n-Heneicosane (C21)	629-94-7	MKCL3226	99%	200.5 µg/mL	+/- 5.1796
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	200.6 µg/mL	+/- 5.1814
10	n-Tetracosane (C24)	646-31-1	MKCS9978	99%	200.5 µg/mL	+/- 5.1805
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	200.5 µg/mL	+/- 5.1796
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	200.5 µg/mL	+/- 5.1796
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	200.4 µg/mL	+/- 5.1763
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	200.4 µg/mL	+/- 5.1779
15	n-Tetratriacontane (C34)	14167-59-0	D3MZN	99%	200.5 µg/mL	+/- 5.1805
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	200.6 µg/mL	+/- 5.1814
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	200.5 µg/mL	+/- 5.1808

18	n-Tetracontane (C40)	4181-95-7	OKEGA	99%	200.5 µg/mL	+/- 5.1805

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

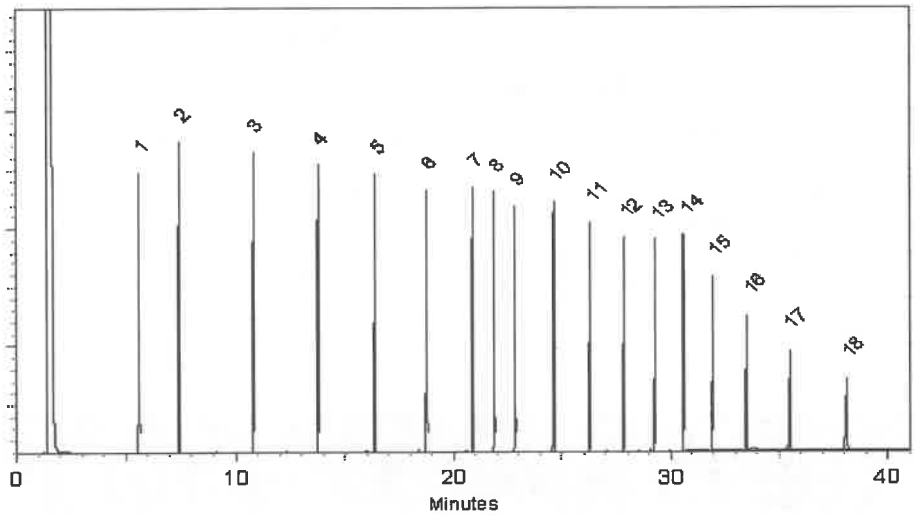
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Laith Clemente - Operations Technician I

Date Mixed: 07-May-2024 **Balance Serial #** 1128360905

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 09-May-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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- Purity of isomeric compounds is reported as the sum of the isomers.
- Purity values are rounded to the nearest whole number.

Certified Uncertainty Value Notes:

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Manufacturing Notes:

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Handling Notes:

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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30542 **Lot No.:** A0211112

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : June 30, 2031 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13625
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P13644
} Y.P. 10/16/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	200.9 µg/mL	+/- 5.1891
2	n-Decane (C10)	124-18-5	SHBQ1342	99%	200.7 µg/mL	+/- 5.1857
3	n-Dodecane (C12)	112-40-3	SHBP7054	99%	200.4 µg/mL	+/- 5.1771
4	n-Tetradecane (C14)	629-59-4	STBK5437	99%	200.7 µg/mL	+/- 5.1839
5	n-Hexadecane (C16)	544-76-3	SHBR0669	99%	200.6 µg/mL	+/- 5.1822
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	200.4 µg/mL	+/- 5.1782
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	200.4 µg/mL	+/- 5.1771
8	n-Heneicosane (C21)	629-94-7	MKCL3226	99%	200.5 µg/mL	+/- 5.1796
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	200.6 µg/mL	+/- 5.1814
10	n-Tetracosane (C24)	646-31-1	MKCS9978	99%	200.5 µg/mL	+/- 5.1805
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	200.5 µg/mL	+/- 5.1796
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	200.5 µg/mL	+/- 5.1796
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	200.4 µg/mL	+/- 5.1763
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	200.4 µg/mL	+/- 5.1779
15	n-Tetratriacontane (C34)	14167-59-0	D3MZN	99%	200.5 µg/mL	+/- 5.1805
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	200.6 µg/mL	+/- 5.1814
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	200.5 µg/mL	+/- 5.1808

18	n-Tetracontane (C40)	4181-95-7	OKEGA	99%	200.5 µg/mL	+/- 5.1805

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

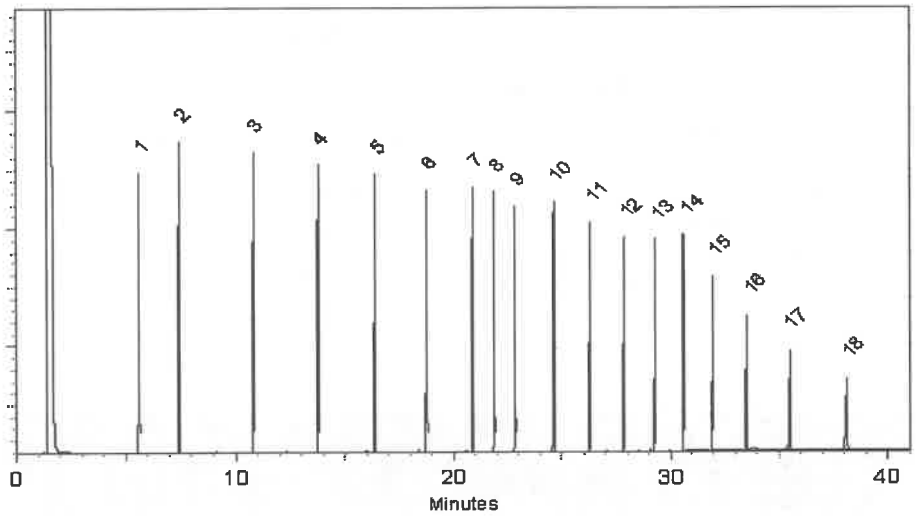
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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

Laith Clemente - Operations Technician I

Date Mixed: 07-May-2024 **Balance Serial #** 1128360905

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 09-May-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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Catalog No. : 30542 **Lot No.:** A0211112

Description : NJEPH Aliphatics Matrix Spike Mix

NJEPH Aliphatics Matrix Spike Mix 200 µg/mL, n-Pentane, 5mL/ampul

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

Expiration Date : June 30, 2031 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

P13625
↓
P13644
} Y.P. 10/16/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	n-Nonane (C9)	111-84-2	SHBP9752	99%	200.9 µg/mL	+/- 5.1891
2	n-Decane (C10)	124-18-5	SHBQ1342	99%	200.7 µg/mL	+/- 5.1857
3	n-Dodecane (C12)	112-40-3	SHBP7054	99%	200.4 µg/mL	+/- 5.1771
4	n-Tetradecane (C14)	629-59-4	STBK5437	99%	200.7 µg/mL	+/- 5.1839
5	n-Hexadecane (C16)	544-76-3	SHBR0669	99%	200.6 µg/mL	+/- 5.1822
6	n-Octadecane (C18)	593-45-3	UE5NG	98%	200.4 µg/mL	+/- 5.1782
7	n-Eicosane (C20)	112-95-8	MKCN8767	97%	200.4 µg/mL	+/- 5.1771
8	n-Heneicosane (C21)	629-94-7	MKCL3226	99%	200.5 µg/mL	+/- 5.1796
9	n-Docosane (C22)	629-97-0	MKCQ3882	99%	200.6 µg/mL	+/- 5.1814
10	n-Tetracosane (C24)	646-31-1	MKCS9978	99%	200.5 µg/mL	+/- 5.1805
11	n-Hexacosane (C26)	630-01-3	MKCQ4814	99%	200.5 µg/mL	+/- 5.1796
12	n-Octacosane (C28)	630-02-4	BCCG0084	99%	200.5 µg/mL	+/- 5.1796
13	n-Triacontane (C30)	638-68-6	MKCQ9436	97%	200.4 µg/mL	+/- 5.1763
14	n-Dotriacontane (C32)	544-85-4	BCBW0661	99%	200.4 µg/mL	+/- 5.1779
15	n-Tetratriacontane (C34)	14167-59-0	D3MZN	99%	200.5 µg/mL	+/- 5.1805
16	n-Hexatriacontane (C36)	630-06-8	Z27H018	99%	200.6 µg/mL	+/- 5.1814
17	n-Octatriacontane (C38)	7194-85-6	0000145137	96%	200.5 µg/mL	+/- 5.1808

18	n-Tetracontane (C40)	4181-95-7	OKEGA	99%	200.5 µg/mL	+/- 5.1805

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: n-Pentane
CAS # 109-66-0
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
40°C (hold 2 min.) to 330°C
@ 10°C/min. (hold 10 min.)

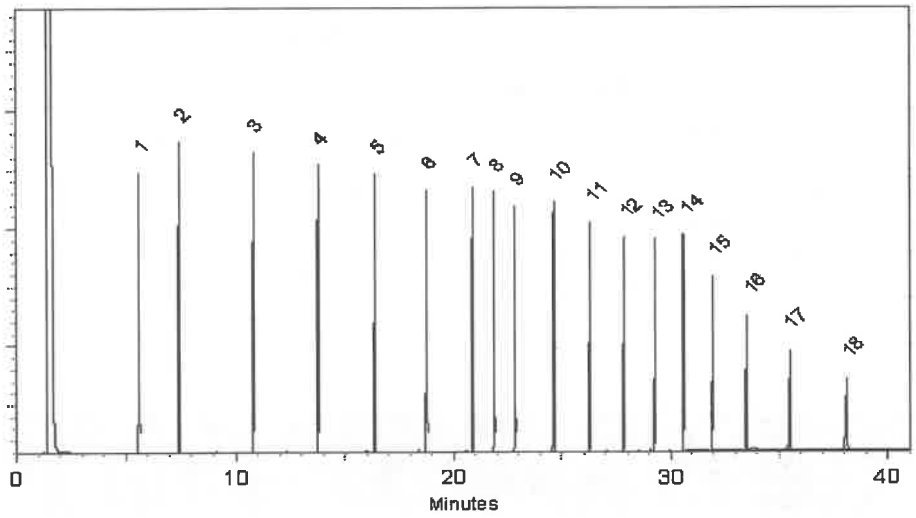
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
2 ml/min.

Inj. Vol
1µl



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Laith Clemente - Operations Technician I

Date Mixed: 07-May-2024 **Balance Serial #** 1128360905

Jennifer Pollino - Operations Tech III - ARM QC

Date Passed: 09-May-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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Catalog No. : 31097 **Lot No.:** A0216631

Description : o-Terphenyl Standard

o-Terphenyl Standard 10,000 µg/mL, Methylene Chloride, 1mL/ampul

P13645 ↓ P13694 } Y.P. 10/16/24

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

Expiration Date : April 30, 2028 **Storage:** 10°C or colder

Handling: Sonicate prior to use. **Ship:** Ambient

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	o-Terphenyl	84-15-1	GKSSA	99%	10,065.0 µg/mL	+/- 453.3336

* Expanded Uncertainty displayed in same units as Grav. Conc.

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

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

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

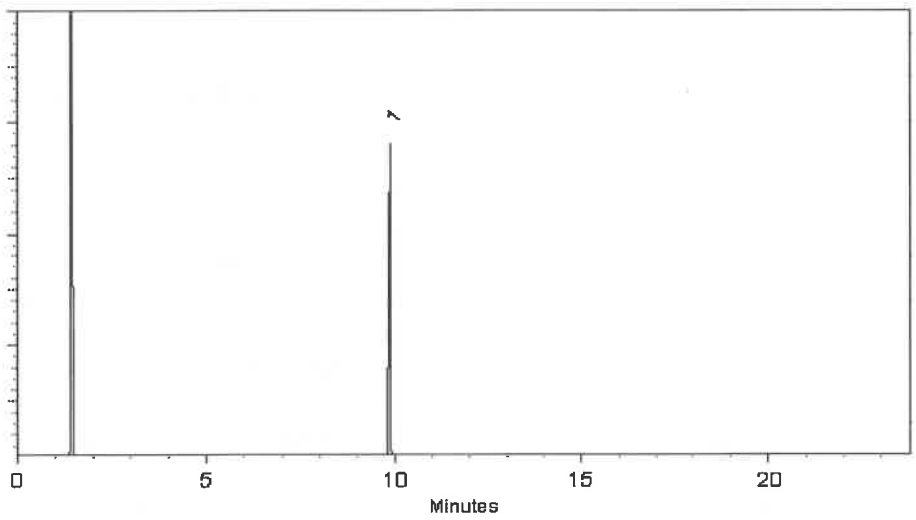
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
10 ml/min.

Inj. Vol
1µl



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Ven Kelley - Operations Tech I

Date Mixed: 17-Sep-2024 **Balance Serial #** 1128353505

Dillan Murphy - Operations Technician I

Date Passed: 23-Sep-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
2	Naphthalene	91-20-3	STBL1057	99%	200.0 µg/mL	+/- 9.0114
3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
6	Fluorene	86-73-7	10246250	98%	201.5 µg/mL	+/- 9.0784
7	Phenanthrene	85-01-8	MKCT3391	99%	201.2 µg/mL	+/- 9.0655
8	Anthracene	120-12-7	101492T18R	99%	200.0 µg/mL	+/- 9.0114
9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
12	Chrysene	218-01-9	RP240627ECS	99%	200.4 µg/mL	+/- 9.0294
13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
14	Benzo(k)fluoranthene	207-08-9	012022K	99%	201.6 µg/mL	+/- 9.0835
15	Benzo(a)pyrene	50-32-8	NQLXA	98%	199.9 µg/mL	+/- 9.0078
16	Indeno(1,2,3-cd)pyrene	193-39-5	12-JKL-118-9	97%	199.0 µg/mL	+/- 8.9683

17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

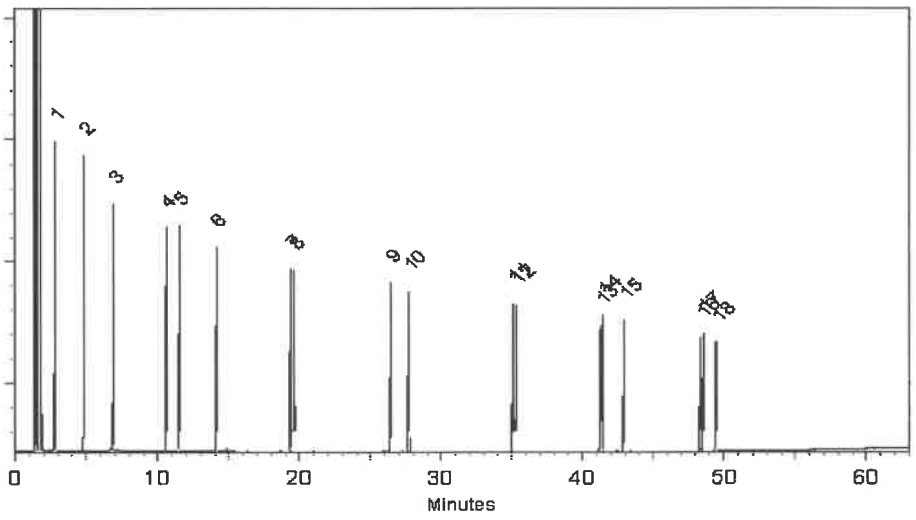
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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Handling Notes:

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ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

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Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
2	Naphthalene	91-20-3	STBL1057	99%	200.0 µg/mL	+/- 9.0114
3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
6	Fluorene	86-73-7	10246250	98%	201.5 µg/mL	+/- 9.0784
7	Phenanthrene	85-01-8	MKCT3391	99%	201.2 µg/mL	+/- 9.0655
8	Anthracene	120-12-7	101492T18R	99%	200.0 µg/mL	+/- 9.0114
9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
12	Chrysene	218-01-9	RP240627ECS	99%	200.4 µg/mL	+/- 9.0294
13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
14	Benzo(k)fluoranthene	207-08-9	012022K	99%	201.6 µg/mL	+/- 9.0835
15	Benzo(a)pyrene	50-32-8	NQLXA	98%	199.9 µg/mL	+/- 9.0078
16	Indeno(1,2,3-cd)pyrene	193-39-5	12-JKL-118-9	97%	199.0 µg/mL	+/- 8.9683

17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

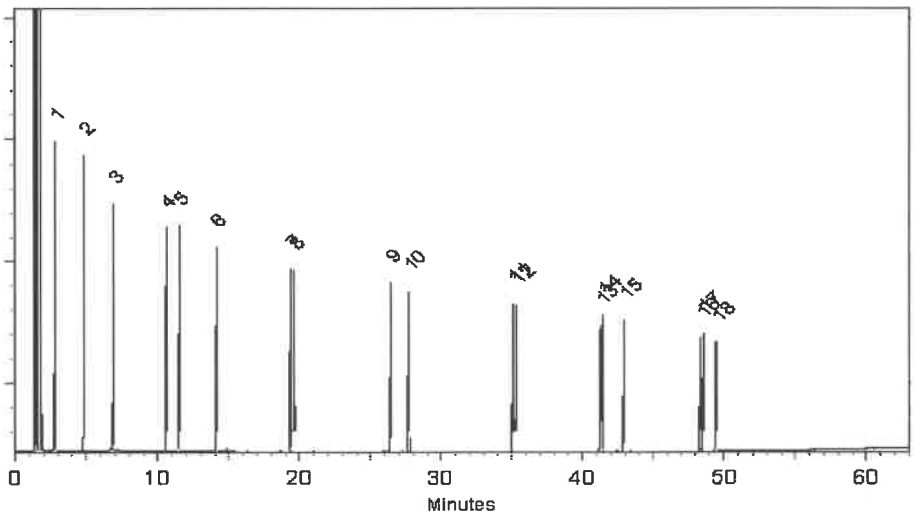
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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

Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

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CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ilac-MRA A2LA ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
2	Naphthalene	91-20-3	STBL1057	99%	200.0 µg/mL	+/- 9.0114
3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
6	Fluorene	86-73-7	10246250	98%	201.5 µg/mL	+/- 9.0784
7	Phenanthrene	85-01-8	MKCT3391	99%	201.2 µg/mL	+/- 9.0655
8	Anthracene	120-12-7	101492T18R	99%	200.0 µg/mL	+/- 9.0114
9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
12	Chrysene	218-01-9	RP240627ECS	99%	200.4 µg/mL	+/- 9.0294
13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
14	Benzo(k)fluoranthene	207-08-9	012022K	99%	201.6 µg/mL	+/- 9.0835
15	Benzo(a)pyrene	50-32-8	NQLXA	98%	199.9 µg/mL	+/- 9.0078
16	Indeno(1,2,3-cd)pyrene	193-39-5	12-JKL-118-9	97%	199.0 µg/mL	+/- 8.9683

17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

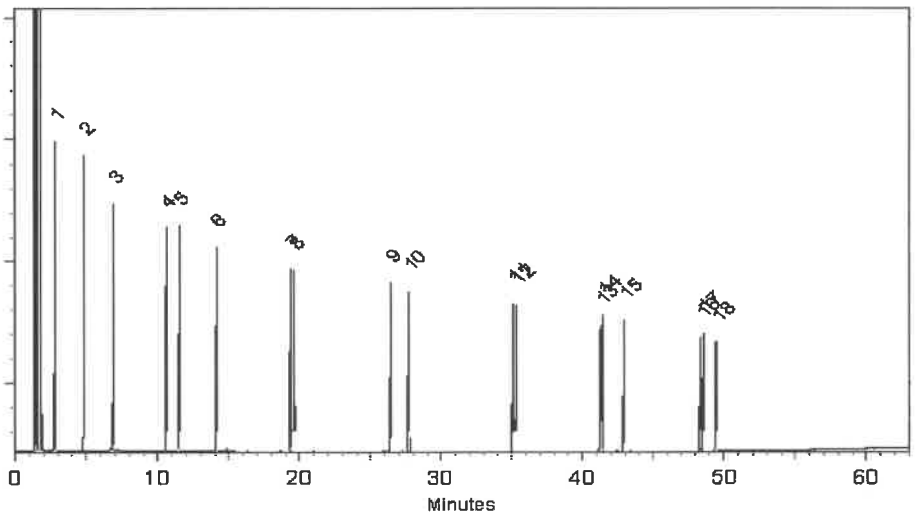
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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

Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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chromatographic plus

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ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
2	Naphthalene	91-20-3	STBL1057	99%	200.0 µg/mL	+/- 9.0114
3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
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7	Phenanthrene	85-01-8	MKCT3391	99%	201.2 µg/mL	+/- 9.0655
8	Anthracene	120-12-7	101492T18R	99%	200.0 µg/mL	+/- 9.0114
9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
12	Chrysene	218-01-9	RP240627ECS	99%	200.4 µg/mL	+/- 9.0294
13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
14	Benzo(k)fluoranthene	207-08-9	012022K	99%	201.6 µg/mL	+/- 9.0835
15	Benzo(a)pyrene	50-32-8	NQLXA	98%	199.9 µg/mL	+/- 9.0078
16	Indeno(1,2,3-cd)pyrene	193-39-5	12-JKL-118-9	97%	199.0 µg/mL	+/- 8.9683

17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

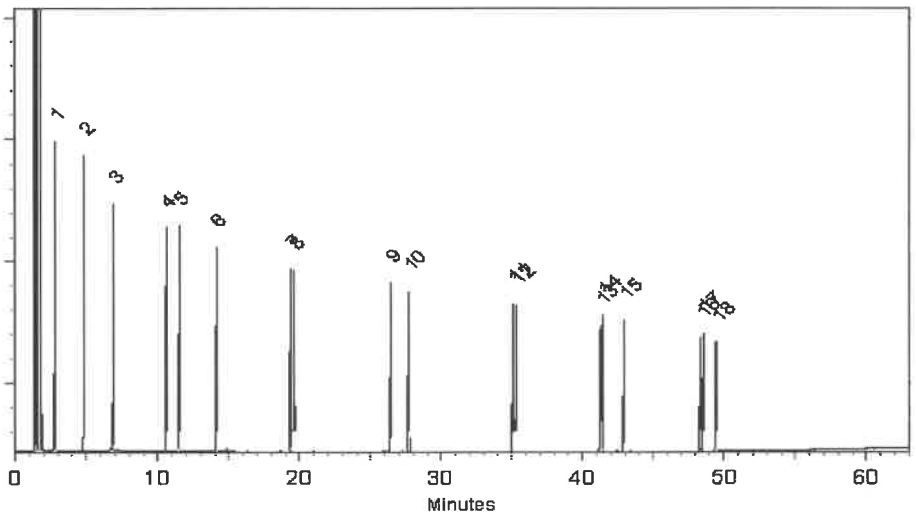
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

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Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
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3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
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9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
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* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

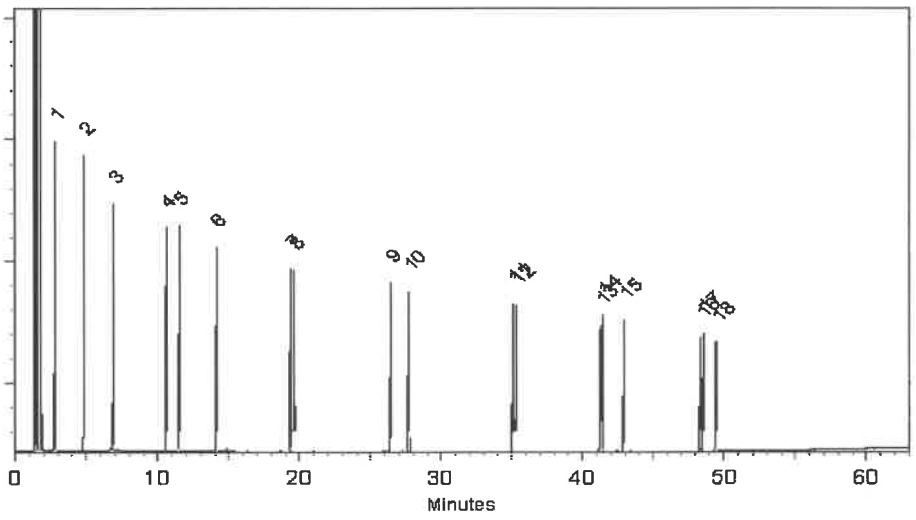
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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Manufacturing Notes:

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Handling Notes:

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Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ilac-MRA A2LA ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
2	Naphthalene	91-20-3	STBL1057	99%	200.0 µg/mL	+/- 9.0114
3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
6	Fluorene	86-73-7	10246250	98%	201.5 µg/mL	+/- 9.0784
7	Phenanthrene	85-01-8	MKCT3391	99%	201.2 µg/mL	+/- 9.0655
8	Anthracene	120-12-7	101492T18R	99%	200.0 µg/mL	+/- 9.0114
9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
12	Chrysene	218-01-9	RP240627ECS	99%	200.4 µg/mL	+/- 9.0294
13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
14	Benzo(k)fluoranthene	207-08-9	012022K	99%	201.6 µg/mL	+/- 9.0835
15	Benzo(a)pyrene	50-32-8	NQLXA	98%	199.9 µg/mL	+/- 9.0078
16	Indeno(1,2,3-cd)pyrene	193-39-5	12-JKL-118-9	97%	199.0 µg/mL	+/- 8.9683

17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

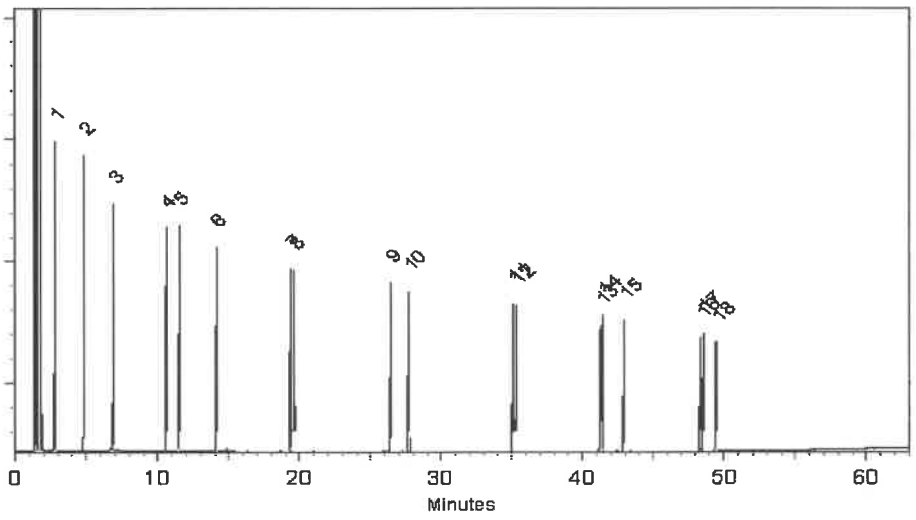
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
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ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

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Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
2	Naphthalene	91-20-3	STBL1057	99%	200.0 µg/mL	+/- 9.0114
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4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
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9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
12	Chrysene	218-01-9	RP240627ECS	99%	200.4 µg/mL	+/- 9.0294
13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
14	Benzo(k)fluoranthene	207-08-9	012022K	99%	201.6 µg/mL	+/- 9.0835
15	Benzo(a)pyrene	50-32-8	NQLXA	98%	199.9 µg/mL	+/- 9.0078
16	Indeno(1,2,3-cd)pyrene	193-39-5	12-JKL-118-9	97%	199.0 µg/mL	+/- 8.9683

17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

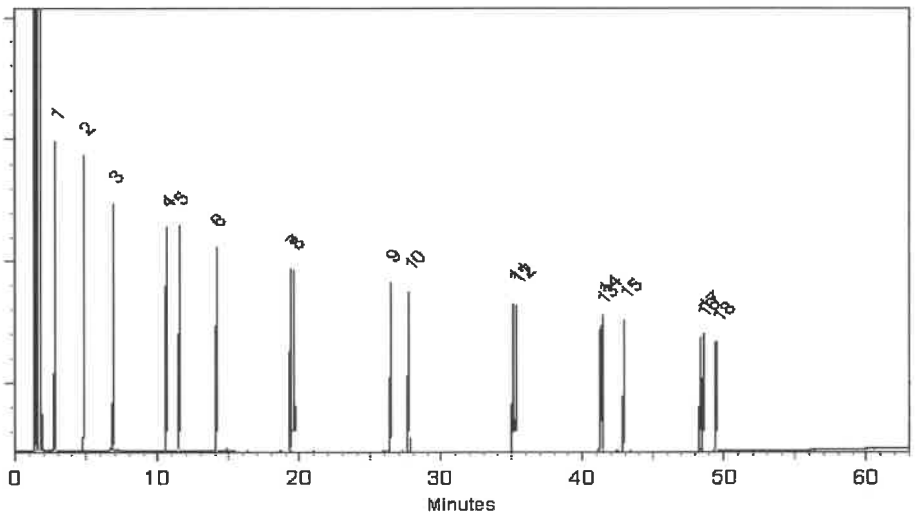
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

- Purity and/or chemical identity are determined by one or more of the following techniques: GC/FID, HPLC, GC/μECD, GC/MS, LC/MS, RI, and/or melting point.
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Certified Uncertainty Value Notes:

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Manufacturing Notes:

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Handling Notes:

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ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

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Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
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3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
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9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
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13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
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17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

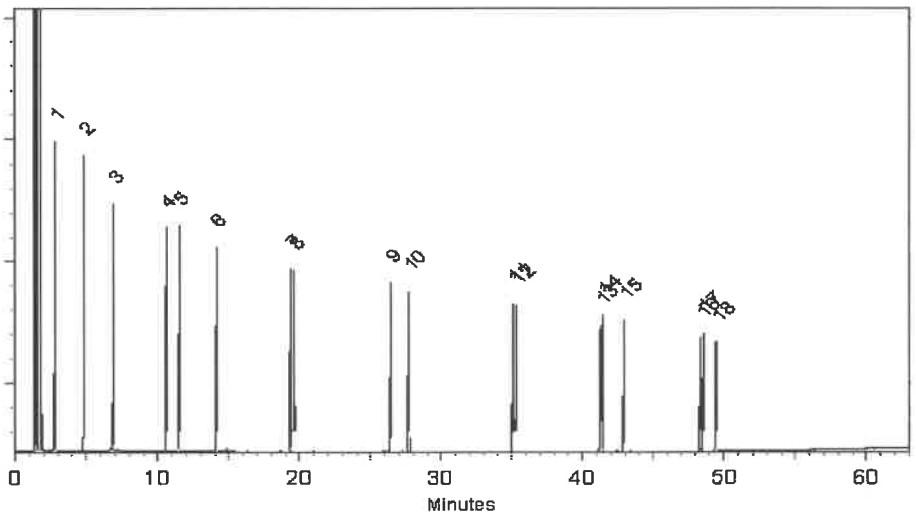
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
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Purity Notes:

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Certified Uncertainty Value Notes:

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Manufacturing Notes:

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Handling Notes:

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
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9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
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* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

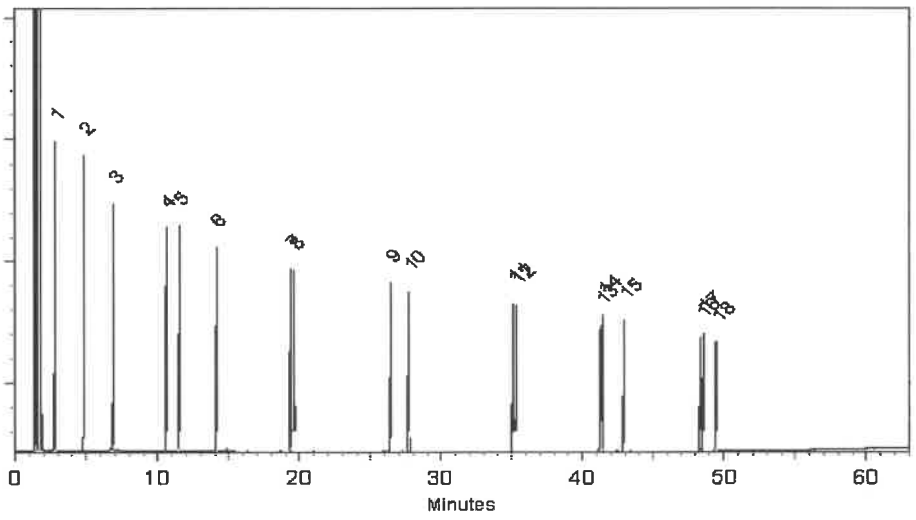
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

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Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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

Handling Notes:

- Stability of the unopened product, when stored in compliance with the recommended conditions, is guaranteed through the expiration displayed on the product label and certificate. Contact Restek for additional opened product stability information, with the knowledge/understanding that open product stability is subject to the specific handling and environmental conditions to which the product is exposed. For your convenience Restek supplies deactivated vials with most standards packed in 2mL ampuls. Larger volume deactivated vials are available through Restek as a custom ordered item. Additionally, Restek sells DMDCS for the purpose of glassware deactivation as catalog number 31861, which includes complete instructions.
- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

RESTEK
110 Benner Circle
Bellefonte, PA 16823-8812
Tel: 1-814-353-1300
Fax: 1-814-353-1309

www.restek.com

CERTIFIED REFERENCE MATERIAL

Certificate of Analysis

chromatographic plus

ilac-MRA A2LA ACCREDITED ISO 17034 Accredited Reference Material Producer Certificate #3222.01

ilac-MRA A2LA ACCREDITED ISO/IEC 17025 Accredited Testing Laboratory Certificate #3222.02

FOR LABORATORY USE ONLY-READ SDS PRIOR TO USE.

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

Catalog No. : 30543 **Lot No.:** A0217838

Description : NJEPH Aromatics Matrix Spike Mix

NJEPH Aromatics Matrix Spike Mix 200µg/mL, Acetone/Toluene (50:50), 5mL/ampul

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

Expiration Date : September 30, 2030 **Storage:** 10°C or colder

Handling: Sonication required. Mix is photosensitive. **Ship:** Ambient

P13717 ↓ P13727 Y.P 10/24/24

CERTIFIED VALUES

Elution Order	Compound	CAS #	Lot #	Purity	Grav. Conc. (weight/volume)	Expanded Uncertainty * (95% C.L.; K=2)
1	1,2,3-Trimethylbenzene	526-73-8	8776.10-38	99%	201.6 µg/mL	+/- 9.0835
2	Naphthalene	91-20-3	STBL1057	99%	200.0 µg/mL	+/- 9.0114
3	2-Methylnaphthalene	91-57-6	STBL3028	99%	200.4 µg/mL	+/- 9.0294
4	Acenaphthylene	208-96-8	214935V18H	95%	199.1 µg/mL	+/- 8.9717
5	Acenaphthene	83-32-9	MKCR7169	99%	200.4 µg/mL	+/- 9.0294
6	Fluorene	86-73-7	10246250	98%	201.5 µg/mL	+/- 9.0784
7	Phenanthrene	85-01-8	MKCT3391	99%	201.2 µg/mL	+/- 9.0655
8	Anthracene	120-12-7	101492T18R	99%	200.0 µg/mL	+/- 9.0114
9	Fluoranthene	206-44-0	MKCQ4728	99%	200.4 µg/mL	+/- 9.0294
10	Pyrene	129-00-0	BCCK2592	99%	200.0 µg/mL	+/- 9.0114
11	Benz(a)anthracene	56-55-3	I60012022BAA	99%	200.0 µg/mL	+/- 9.0114
12	Chrysene	218-01-9	RP240627ECS	99%	200.4 µg/mL	+/- 9.0294
13	Benzo(b)fluoranthene	205-99-2	052013B	99%	201.2 µg/mL	+/- 9.0655
14	Benzo(k)fluoranthene	207-08-9	012022K	99%	201.6 µg/mL	+/- 9.0835
15	Benzo(a)pyrene	50-32-8	NQLXA	98%	199.9 µg/mL	+/- 9.0078
16	Indeno(1,2,3-cd)pyrene	193-39-5	12-JKL-118-9	97%	199.0 µg/mL	+/- 8.9683

17	Dibenz(a,h)anthracene	53-70-3	2-ASA-59-1	99%	200.0	µg/mL	+/- 9.0114
18	Benzo(g,h,i)perylene	191-24-2	RP240625RSR	97%	199.0	µg/mL	+/- 8.9683

* Expanded Uncertainty displayed in same units as Grav. Conc.

Solvent: Acetone/Toluene (50:50)
CAS # 67-64-1/108-88-3
Purity 99%

Quality Confirmation Test

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

Carrier Gas:
hydrogen-constant pressure 10 psi.

Temp. Program:
100°C (hold 1 min.) to 330°C
@ 4°C/min. (hold 5 min.)

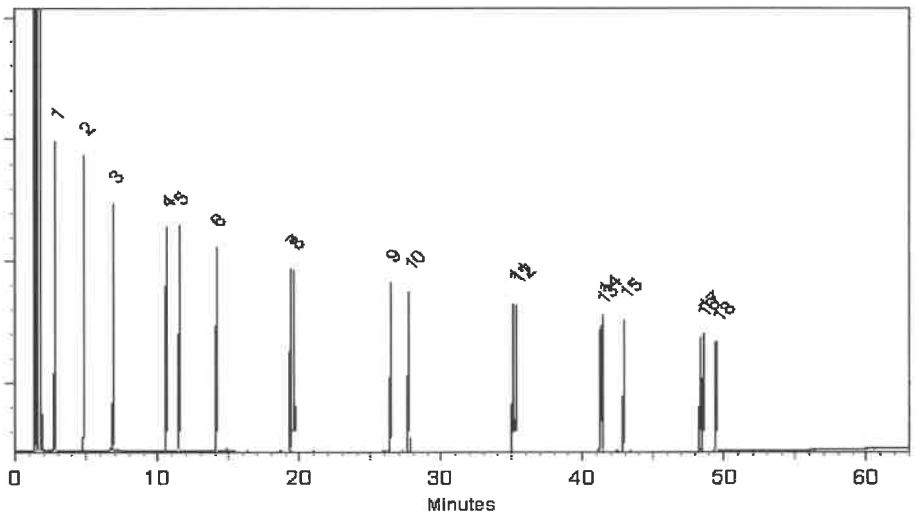
Inj. Temp:
250°C

Det. Temp:
330°C

Det. Type:
FID

Split Vent:
20 ml/min.

Inj. Vol
1µl



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

Rebecca Gingerich - Operations Tech II

Date Mixed: 14-Oct-2024 **Balance Serial #** 1128360905

Brittany Federinko - Operations Tech I

Date Passed: 21-Oct-2024

Manufactured under Restek's ISO 9001:2015 Registered Quality System Certificate #FM 80397

General Certified Reference Material Notes

Expiration Notes:

- Expiration date valid for unopened ampul stored in compliance with the recommended conditions.
- Uncertainty, concentration, and expiration of the CRM are based on the unopened product being stored according to the recommended condition found in the storage field.

Purity Notes:

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

Certified Uncertainty Value Notes:

- The uncertainties are determined in accordance with ISO 17034 and Guide 35. The certified expanded uncertainty value includes gravimetric uncertainty, homogeneity between-ampul uncertainty, storage stability uncertainty and shipping stability uncertainty and were combined using the following formula:

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

  k is a coverage factor of 2, which gives a level of confidence of approximately 95%.
- The packaged amount is the minimum sample size for which uncertainty is valid. The ampuls are over-filled to ensure that the minimum packaged amount can be sufficiently transferred.

Manufacturing Notes:

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Handling Notes:

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- If any undissolved material is visible inside the ampul, sonicate the unopened ampul until the material is completely dissolved.

SHIPPING DOCUMENTS

CHEMTECH
CHAIN OF CUSTODY RECORD

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

CHEMTECH PROJECT NO. / QUOTE NO. P4718

COC Number 2042034

CLIENT INFORMATION

REPORT TO BE SENT TO:

COMPANY: Glannett Fleming
ADDRESS: 1010 Adams Avenue
CITY Audobon STATE: PA ZIP: 19403
ATTENTION: Joe Krupansky
PHONE: 610-301-8362 FAX:

CLIENT PROJECT INFORMATION

PROJECT NAME: Amtrak's Dep. of SB
PROJECT NO.: 95000008.19 LOCATION: Kearny NJ
PROJECT MANAGER: Joe Krupansky
e-mail: QAQC@bamays-corb.
PHONE: 610-301-8362 FAX:

CLIENT BILLING INFORMATION

BILL TO: Chemtech PO#:
ADDRESS: 284 Sheffield St.
CITY Mountainside STATE: NJ ZIP: 07092
ATTENTION: Samantha PHONE:

DATA TURNAROUND INFORMATION

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

DATA DELIVERABLE INFORMATION

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

ANALYSIS

1 TCA VOC+TO
2 TCL PAH
3 TAL Metals
4 PCB's
5 Cr(III), Cr(VI)
6 EPH
7 TOX
8 FUNA TCLP
9 RCRA Reactivity

PRESERVATIVES

A B F

COMMENTS

← Specify Preservatives
A-HCl D-NaOH
B-HN03 E-ICE
C-H2SO4 F-OTHER

	CHEMTECH SAMPLE ID	PROJECT SAMPLE IDENTIFICATION	SAMPLE MATRIX	SAMPLE TYPE COMP	SAMPLE TYPE GRAB	SAMPLE COLLECTION DATE	SAMPLE COLLECTION TIME	# OF BOTTLES	1	2	3	4	5	6	7	8	9
1.		WB-307-SW	GW		X	11/04	8:20	7	X	X	X	X	X	X			
2.		WB-307-SB01	S	X		11/04	9:45	10	X	X	X	X	X	X			
3.		WB-307-SB02	S	X		11/04	10:45	10	X	X	X	X	X	X	X	X	X
4.		TB-11042024															
5.																	
6.																	
7.																	
8.																	
9.																	
10.																	

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

RELINQUISHED BY SAMPLER:	DATE/TIME:	RECEIVED BY:
1. Yasmeda	11/6/24 11:19	1.
2.		2.
3.	11.3.2024 12:15	3.

Conditions of bottles or coolers at receipt: ☐ COMPLIANT ☐ NON COMPLIANT ☒ COOLER TEMP 4.0 °C
Comments: No, ICE.

Page ____ of ____

CLIENT: ☐ Hand Delivered ☐ Other _____
CHEMTECH: ☐ Picked Up ☐ Field Sampling

Shipment Complete ☐ YES ☐ NO

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WHITE - CHEMTECH COPY FOR RETURN TO CLIENT YELLOW - CHEMTECH COPY PINK - SAMPLER COPY

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

Laboratory Certification

Certified By	License No.
CAS EPA CLP Contract	68HERH20D0011
Connecticut	PH-0830
DOD ELAP (ANAB)	L2219
Maine	2024021
Maryland	296
New Hampshire	255424 Rev 1
New Jersey	20012
New York	11376
Pennsylvania	68-00548
Soil Permit	525-24-234-08441
Texas	T104704488

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

LOGIN REPORT/SAMPLE TRANSFER

Order ID : P4718 PORT06
Client Name : Portal Partners Tri-Venture
Client Contact : Joseph Krupansky
Invoice Name : Portal Partners Tri-Venture
Invoice Contact : Joseph Krupansky

Order Date : 11/5/2024 1:31:00 PM
Project Name : Amtrak Sawtooth Bridges 2
Receive DateTime : 11/5/2024 12:15:00 PM
Purchase Order :

Project Mgr :
Report Type : NJ Reduced
EDD Type : EXCEL NJCLEANUP
Hard Copy Date :
Date Signoff :

LAB ID	CLIENT ID	MATRIX	SAMPLE DATE	SAMPLE TIME	TEST	TEST GROUP	METHOD	FAX DATE	DUE DATES
P4718-01	WB-307-SB01	Solid	11/04/2024	09:45					
					VOC-TCLVOA-10		8260D		10 Bus. Days
P4718-02	WB-307-SB02	Solid	11/04/2024	09:45					
					VOC-TCLVOA-10		8260D		10 Bus. Days
P4718-04	WB-307-SW	Water	11/04/2024	08:20					
					VOC-TCLVOA-10		8260-Low		10 Bus. Days
P4718-05	TB-11042024	Water	11/04/2024	00:00					
					VOC-TCLVOA-10		8260-Low		10 Bus. Days

Relinguished By :
Date / Time : 11.5.2024 1427

Received By :
Date / Time : 11-5-2024 14:27

Storage Area : **VOA Refridgerator Room**