



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

LAB CHRONICLE

OrderID:	P4473	OrderDate:	10/21/2024 3:15:00 PM
Client:	Yannuzzi Group, Inc.	Project:	86 Davidson Road, Piscataway, NJ
Contact:	Rafael Nunez	Location:	K61

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P4473-01	TS-1	SOIL	VOC-TCLVOA-10	8260D	10/18/24		10/24/24	10/21/24

Hit Summary Sheet SW-846

SDG No.: P4473

Client: Yannuzzi Group, Inc.

Sample ID	Client ID	Matrix	Parameter	Concentration	C	MDL	RDL	Units
Client ID: P4473-01	TS-1 TS-1	SOIL	Ethanol, 2-(trimethylsilyl)-	* 11.3	J	0	0	ug/Kg
Total Tics :				11.3				
Total Concentration:				11.3				



SAMPLE DATA

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	10/18/24	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	10/21/24	
Client Sample ID:	TS-1		SDG No.:	P4473	
Lab Sample ID:	P4473-01		Matrix:	SOIL	
Analytical Method:	SW8260		% Solid:	48.8	
Sample Wt/Vol:	4.99	Units: g	Final Vol:	5000	uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10	
GC Column:	RXI-624	ID : 0.25	Level :	LOW	
Prep Method :					

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020005.D	1		10/24/24 12:36	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
TARGETS						
75-71-8	Dichlorodifluoromethane	3.40	U	3.40	10.3	ug/Kg
74-87-3	Chloromethane	2.40	U	2.40	10.3	ug/Kg
75-01-4	Vinyl Chloride	1.60	U	1.60	10.3	ug/Kg
74-83-9	Bromomethane	2.10	U	2.10	10.3	ug/Kg
75-00-3	Chloroethane	2.10	U	2.10	10.3	ug/Kg
75-69-4	Trichlorofluoromethane	1.90	U	1.90	10.3	ug/Kg
76-13-1	1,1,2-Trichlorotrifluoroethane	2.20	U	2.20	10.3	ug/Kg
75-35-4	1,1-Dichloroethene	1.60	U	1.60	10.3	ug/Kg
67-64-1	Acetone	12.8	U	12.8	51.3	ug/Kg
75-15-0	Carbon Disulfide	2.60	U	2.60	10.3	ug/Kg
1634-04-4	Methyl tert-butyl Ether	1.40	U	1.40	10.3	ug/Kg
79-20-9	Methyl Acetate	3.70	U	3.70	10.3	ug/Kg
75-09-2	Methylene Chloride	7.00	U	7.00	20.5	ug/Kg
156-60-5	trans-1,2-Dichloroethene	1.70	U	1.70	10.3	ug/Kg
75-34-3	1,1-Dichloroethane	1.30	U	1.30	10.3	ug/Kg
110-82-7	Cyclohexane	1.40	U	1.40	10.3	ug/Kg
78-93-3	2-Butanone	11.7	U	11.7	51.3	ug/Kg
56-23-5	Carbon Tetrachloride	1.80	U	1.80	10.3	ug/Kg
156-59-2	cis-1,2-Dichloroethene	1.30	U	1.30	10.3	ug/Kg
74-97-5	Bromochloromethane	5.00	U	5.00	10.3	ug/Kg
67-66-3	Chloroform	1.40	U	1.40	10.3	ug/Kg
71-55-6	1,1,1-Trichloroethane	1.60	U	1.60	10.3	ug/Kg
108-87-2	Methylcyclohexane	1.80	U	1.80	10.3	ug/Kg
71-43-2	Benzene	1.50	U	1.50	10.3	ug/Kg
107-06-2	1,2-Dichloroethane	1.30	U	1.30	10.3	ug/Kg
79-01-6	Trichloroethene	1.50	U	1.50	10.3	ug/Kg
78-87-5	1,2-Dichloropropane	1.40	U	1.40	10.3	ug/Kg
75-27-4	Bromodichloromethane	1.10	U	1.10	10.3	ug/Kg
108-10-1	4-Methyl-2-Pentanone	8.90	U	8.90	51.3	ug/Kg
108-88-3	Toluene	1.40	U	1.40	10.3	ug/Kg

Report of Analysis

Client:	Yannuzzi Group, Inc.	Date Collected:	10/18/24
Project:	86 Davidson Road, Piscataway, NJ	Date Received:	10/21/24
Client Sample ID:	TS-1	SDG No.:	P4473
Lab Sample ID:	P4473-01	Matrix:	SOIL
Analytical Method:	SW8260	% Solid:	48.8
Sample Wt/Vol:	4.99	Units:	g
Soil Aliquot Vol:			uL
GC Column:	RXI-624	Final Vol:	5000
Prep Method :	ID : 0.25	Test:	VOC-TCLVOA-10
		Level :	LOW

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020005.D	1		10/24/24 12:36	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
10061-02-6	t-1,3-Dichloropropene	1.20	U	1.20	10.3	ug/Kg
10061-01-5	cis-1,3-Dichloropropene	1.20	U	1.20	10.3	ug/Kg
79-00-5	1,1,2-Trichloroethane	1.70	U	1.70	10.3	ug/Kg
591-78-6	2-Hexanone	9.80	U	9.80	51.3	ug/Kg
124-48-1	Dibromochloromethane	1.30	U	1.30	10.3	ug/Kg
106-93-4	1,2-Dibromoethane	1.60	U	1.60	10.3	ug/Kg
127-18-4	Tetrachloroethene	1.80	U	1.80	10.3	ug/Kg
108-90-7	Chlorobenzene	1.50	U	1.50	10.3	ug/Kg
100-41-4	Ethyl Benzene	1.30	U	1.30	10.3	ug/Kg
179601-23-1	m/p-Xylenes	2.80	U	2.80	20.5	ug/Kg
95-47-6	o-Xylene	1.40	U	1.40	10.3	ug/Kg
100-42-5	Styrene	1.20	U	1.20	10.3	ug/Kg
75-25-2	Bromoform	1.70	U	1.70	10.3	ug/Kg
98-82-8	Isopropylbenzene	1.40	U	1.40	10.3	ug/Kg
79-34-5	1,1,2,2-Tetrachloroethane	2.30	U	2.30	10.3	ug/Kg
541-73-1	1,3-Dichlorobenzene	1.50	U	1.50	10.3	ug/Kg
106-46-7	1,4-Dichlorobenzene	1.60	U	1.60	10.3	ug/Kg
95-50-1	1,2-Dichlorobenzene	1.20	U	1.20	10.3	ug/Kg
96-12-8	1,2-Dibromo-3-Chloropropane	3.20	U	3.20	10.3	ug/Kg
120-82-1	1,2,4-Trichlorobenzene	1.60	U	1.60	10.3	ug/Kg
87-61-6	1,2,3-Trichlorobenzene	1.60	U	1.60	10.3	ug/Kg

SURROGATES

17060-07-0	1,2-Dichloroethane-d4	52.2	70 (50) - 130 (163)	104%	SPK: 50
1868-53-7	Dibromofluoromethane	48.8	70 (54) - 130 (147)	98%	SPK: 50
2037-26-5	Toluene-d8	50.4	70 (58) - 130 (134)	101%	SPK: 50
460-00-4	4-Bromofluorobenzene	35.3	70 (29) - 130 (146)	71%	SPK: 50

INTERNAL STANDARDS

363-72-4	Pentafluorobenzene	210000	7.713
540-36-3	1,4-Difluorobenzene	420000	8.615
3114-55-4	Chlorobenzene-d5	347000	11.42
3855-82-1	1,4-Dichlorobenzene-d4	98400	13.346

TENTATIVE IDENTIFIED COMPOUNDS

A
B
C
D
E
F
G

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	10/18/24	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	10/21/24	
Client Sample ID:	TS-1		SDG No.:	P4473	
Lab Sample ID:	P4473-01		Matrix:	SOIL	
Analytical Method:	SW8260		% Solid:	48.8	
Sample Wt/Vol:	4.99	Units: g	Final Vol:	5000	uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10	
GC Column:	RXI-624	ID : 0.25	Level :	LOW	
Prep Method :					

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020005.D	1		10/24/24 12:36	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
002916-68-9	Ethanol, 2-(trimethylsilyl)-	11.3	J		6.89	ug/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

M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

N = Presumptive Evidence of a Compound

* = Values outside of QC limits

D = Dilution

() = Laboratory InHouse Limit

A = Aldol-Condensation Reaction Products



QC SUMMARY

Surrogate Summary

SDG No.: P4473

Client: Yannuzzi Group, Inc.

Analytical Method: SW8260D

Lab Sample ID	Client ID	Parameter	Spike	Result	RecoveryQual	Limits	
						Low	High
P4473-01	TS-1	1,2-Dichloroethane-d4	50	52.3	104	70 (50)	130 (163)
		Dibromofluoromethane	50	48.8	98	70 (54)	130 (147)
		Toluene-d8	50	50.4	101	70 (58)	130 (134)
		4-Bromofluorobenzene	50	35.3	71	70 (29)	130 (146)
VY1024SBL01	VY1024SBL01	1,2-Dichloroethane-d4	50	55.7	111	70 (50)	130 (163)
		Dibromofluoromethane	50	48.9	98	70 (54)	130 (147)
		Toluene-d8	50	50.4	101	70 (58)	130 (134)
		4-Bromofluorobenzene	50	39.8	80	70 (29)	130 (146)
VY1024SBS01	VY1024SBS01	1,2-Dichloroethane-d4	50	50.5	101	70 (50)	130 (163)
		Dibromofluoromethane	50	51.2	102	70 (54)	130 (147)
		Toluene-d8	50	50.4	101	70 (58)	130 (134)
		4-Bromofluorobenzene	50	48.9	98	70 (29)	130 (146)
VY1024SBSD01	VY1024SBSD01	1,2-Dichloroethane-d4	50	52.3	105	70 (50)	130 (163)
		Dibromofluoromethane	50	51.7	103	70 (54)	130 (147)
		Toluene-d8	50	49.6	99	70 (58)	130 (134)
		4-Bromofluorobenzene	50	48.3	97	70 (29)	130 (146)

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: P4473

Client: Yannuzzi Group, Inc.

Analytical Method: SW8260D

Datafile : VY020003.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits High	RPD
VY1024SBS01	Dichlorodifluoromethane	20	17.0	ug/Kg	85			40 (64)	160 (136)	
	Chloromethane	20	19.3	ug/Kg	97			40 (70)	160 (130)	
	Vinyl chloride	20	20.6	ug/Kg	103			70 (72)	130 (129)	
	Bromomethane	20	21.9	ug/Kg	110			40 (58)	160 (141)	
	Chloroethane	20	22.0	ug/Kg	110			40 (69)	160 (130)	
	Trichlorofluoromethane	20	21.1	ug/Kg	106			40 (69)	160 (134)	
	1,1,2-Trichlorotrifluoroethane	20	21.5	ug/Kg	108			70 (81)	130 (123)	
	1,1-Dichloroethene	20	18.7	ug/Kg	94			70 (79)	130 (121)	
	Acetone	100	110	ug/Kg	110			40 (60)	160 (131)	
	Carbon disulfide	20	13.7	ug/Kg	69			40 (45)	160 (154)	
	Methyl tert-butyl Ether	20	21.4	ug/Kg	107			70 (77)	130 (129)	
	Methyl Acetate	20	20.4	ug/Kg	102			70 (69)	130 (149)	
	Methylene Chloride	20	21.3	ug/Kg	106			70 (56)	130 (174)	
	trans-1,2-Dichloroethene	20	19.9	ug/Kg	100			70 (80)	130 (123)	
	1,1-Dichloroethane	20	23.6	ug/Kg	118			70 (82)	130 (123)	
	Cyclohexane	20	19.2	ug/Kg	96			70 (76)	130 (122)	
	2-Butanone	100	110	ug/Kg	110			40 (69)	160 (131)	
	Carbon Tetrachloride	20	21.6	ug/Kg	108			70 (76)	130 (129)	
	cis-1,2-Dichloroethene	20	22.0	ug/Kg	110			70 (82)	130 (123)	
	Bromochloromethane	20	20.7	ug/Kg	104			70 (80)	130 (127)	
	Chloroform	20	24.5	ug/Kg	123			70 (82)	130 (125)	
	1,1,1-Trichloroethane	20	23.0	ug/Kg	115			70 (80)	130 (126)	
	Methylcyclohexane	20	18.9	ug/Kg	95			70 (77)	130 (123)	
	Benzene	20	21.8	ug/Kg	109			70 (84)	130 (121)	
	1,2-Dichloroethane	20	23.2	ug/Kg	116			70 (81)	130 (126)	
	Trichloroethene	20	21.3	ug/Kg	106			70 (83)	130 (122)	
	1,2-Dichloropropane	20	23.4	ug/Kg	117			70 (83)	130 (122)	
	Bromodichloromethane	20	23.5	ug/Kg	117			70 (82)	130 (123)	
	4-Methyl-2-Pentanone	100	110	ug/Kg	110			40 (70)	160 (135)	
	Toluene	20	21.8	ug/Kg	109			70 (83)	130 (122)	
	t-1,3-Dichloropropene	20	20.7	ug/Kg	104			70 (78)	130 (124)	
	cis-1,3-Dichloropropene	20	21.5	ug/Kg	108			70 (81)	130 (122)	
	1,1,2-Trichloroethane	20	23.2	ug/Kg	116			70 (82)	130 (125)	
	2-Hexanone	100	110	ug/Kg	110			40 (66)	160 (138)	
	Dibromochloromethane	20	22.4	ug/Kg	112			70 (79)	130 (125)	
	1,2-Dibromoethane	20	21.6	ug/Kg	108			70 (80)	130 (125)	
	Tetrachloroethene	20	19.7	ug/Kg	99			70 (83)	130 (125)	
	Chlorobenzene	20	22.0	ug/Kg	110			70 (84)	130 (122)	
	Ethyl Benzene	20	22.2	ug/Kg	111			70 (82)	130 (124)	
	m/p-Xylenes	40	43.3	ug/Kg	108			70 (83)	130 (124)	
	o-Xylene	20	22.1	ug/Kg	111			70 (83)	130 (123)	
	Styrene	20	21.9	ug/Kg	110			70 (82)	130 (124)	
	Bromoform	20	21.0	ug/Kg	105			70 (75)	130 (127)	
	Isopropylbenzene	20	22.9	ug/Kg	115			70 (82)	130 (124)	
	1,1,2,2-Tetrachloroethane	20	23.4	ug/Kg	117			70 (77)	130 (127)	
	1,3-Dichlorobenzene	20	22.3	ug/Kg	112			70 (83)	130 (122)	
	1,4-Dichlorobenzene	20	21.8	ug/Kg	109			70 (84)	130 (121)	
	1,2-Dichlorobenzene	20	21.8	ug/Kg	109			70 (83)	130 (124)	

() = LABORATORY INHOUSE LIMIT

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: P4473

Client: Yannuzzi Group, Inc.

Analytical Method: SW8260D

Datafile : VY020003.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits High	RPD
VY1024SBS01	1,2-Dibromo-3-Chloropropane	20	18.1	ug/Kg	91			40 (66)	160 (134)	
	1,2,4-Trichlorobenzene	20	20.3	ug/Kg	102			70 (78)	130 (127)	
	1,2,3-Trichlorobenzene	20	20.0	ug/Kg	100			70 (70)	130 (137)	

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: P4473

Client: Yannuzzi Group, Inc.

Analytical Method: SW8260D

Datafile : VY020004.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits High	RPD
VY1024SBSD01	Dichlorodifluoromethane	20	16.4	ug/Kg	82	4		40 (64)	160 (136)	30 (20)
	Chloromethane	20	17.5	ug/Kg	88	10		40 (70)	160 (130)	30 (20)
	Vinyl chloride	20	17.4	ug/Kg	87	17		70 (72)	130 (129)	30 (20)
	Bromomethane	20	19.4	ug/Kg	97	13		40 (58)	160 (141)	30 (20)
	Chloroethane	20	18.5	ug/Kg	93	17		40 (69)	160 (130)	30 (20)
	Trichlorofluoromethane	20	18.9	ug/Kg	95	11		40 (69)	160 (134)	30 (20)
	1,1,2-Trichlorotrifluoroethane	20	19.6	ug/Kg	98	10		70 (81)	130 (123)	30 (20)
	1,1-Dichloroethene	20	17.5	ug/Kg	88	7		70 (79)	130 (121)	30 (20)
	Acetone	100	100	ug/Kg	100	10		40 (60)	160 (131)	30 (20)
	Carbon disulfide	20	12.1	ug/Kg	61	12		40 (45)	160 (154)	30 (20)
	Methyl tert-butyl Ether	20	19.7	ug/Kg	99	8		70 (77)	130 (129)	30 (20)
	Methyl Acetate	20	19.4	ug/Kg	97	5		70 (69)	130 (149)	30 (20)
	Methylene Chloride	20	19.2	ug/Kg	96	10		70 (56)	130 (174)	30 (20)
	trans-1,2-Dichloroethene	20	17.0	ug/Kg	85	16		70 (80)	130 (123)	30 (20)
	1,1-Dichloroethane	20	20.6	ug/Kg	103	14		70 (82)	130 (123)	30 (20)
	Cyclohexane	20	17.1	ug/Kg	86	11		70 (76)	130 (122)	30 (20)
	2-Butanone	100	100	ug/Kg	100	10		40 (69)	160 (131)	30 (20)
	Carbon Tetrachloride	20	18.9	ug/Kg	95	13		70 (76)	130 (129)	30 (20)
	cis-1,2-Dichloroethene	20	18.9	ug/Kg	95	15		70 (82)	130 (123)	30 (20)
	Bromochloromethane	20	20.2	ug/Kg	101	3		70 (80)	130 (127)	30 (20)
	Chloroform	20	21.0	ug/Kg	105	16		70 (82)	130 (125)	30 (20)
	1,1,1-Trichloroethane	20	20.2	ug/Kg	101	13		70 (80)	130 (126)	30 (20)
	Methylcyclohexane	20	16.3	ug/Kg	81	16		70 (77)	130 (123)	30 (20)
	Benzene	20	18.5	ug/Kg	93	16		70 (84)	130 (121)	30 (20)
	1,2-Dichloroethane	20	19.7	ug/Kg	99	16		70 (81)	130 (126)	30 (20)
	Trichloroethene	20	17.7	ug/Kg	89	17		70 (83)	130 (122)	30 (20)
	1,2-Dichloropropane	20	19.8	ug/Kg	99	17		70 (83)	130 (122)	30 (20)
	Bromodichloromethane	20	20.1	ug/Kg	101	15		70 (82)	130 (123)	30 (20)
	4-Methyl-2-Pentanone	100	100	ug/Kg	100	10		40 (70)	160 (135)	30 (20)
	Toluene	20	18.3	ug/Kg	92	17		70 (83)	130 (122)	30 (20)
	t-1,3-Dichloropropene	20	18.0	ug/Kg	90	14		70 (78)	130 (124)	30 (20)
	cis-1,3-Dichloropropene	20	18.7	ug/Kg	94	14		70 (81)	130 (122)	30 (20)
	1,1,2-Trichloroethane	20	20.1	ug/Kg	101	14		70 (82)	130 (125)	30 (20)
	2-Hexanone	100	100	ug/Kg	100	10		40 (66)	160 (138)	30 (20)
	Dibromochloromethane	20	19.0	ug/Kg	95	16		70 (79)	130 (125)	30 (20)
	1,2-Dibromoethane	20	18.1	ug/Kg	91	17		70 (80)	130 (125)	30 (20)
	Tetrachloroethene	20	17.7	ug/Kg	89	11		70 (83)	130 (125)	30 (20)
	Chlorobenzene	20	19.2	ug/Kg	96	14		70 (84)	130 (122)	30 (20)
	Ethyl Benzene	20	19.0	ug/Kg	95	16		70 (82)	130 (124)	30 (20)
	m/p-Xylenes	40	37.8	ug/Kg	95	13		70 (83)	130 (124)	30 (20)
	o-Xylene	20	18.9	ug/Kg	95	16		70 (83)	130 (123)	30 (20)
	Styrene	20	18.8	ug/Kg	94	16		70 (82)	130 (124)	30 (20)
	Bromoform	20	18.4	ug/Kg	92	13		70 (75)	130 (127)	30 (20)
	Isopropylbenzene	20	20.2	ug/Kg	101	13		70 (82)	130 (124)	30 (20)
	1,1,2,2-Tetrachloroethane	20	21.6	ug/Kg	108	8		70 (77)	130 (127)	30 (20)
	1,3-Dichlorobenzene	20	19.0	ug/Kg	95	16		70 (83)	130 (122)	30 (20)
	1,4-Dichlorobenzene	20	19.1	ug/Kg	96	13		70 (84)	130 (121)	30 (20)
	1,2-Dichlorobenzene	20	19.3	ug/Kg	97	12		70 (83)	130 (124)	30 (20)

() = LABORATORY INHOUSE LIMIT

Laboratory Control Sample/Laboratory Control Sample Duplicate Summary

SW-846

SDG No.: P4473

Client: Yannuzzi Group, Inc.

Analytical Method: SW8260D

Datafile : VY020004.D

Lab Sample ID	Parameter	Spike	Result	Unit	Rec	RPD	Qual	Low	Limits High	RPD
VY1024SBSD01	1,2-Dibromo-3-Chloropropane	20	19.5	ug/Kg	98	7		40 (66)	160 (134)	30 (20)
	1,2,4-Trichlorobenzene	20	17.8	ug/Kg	89	14		70 (78)	130 (127)	30 (20)
	1,2,3-Trichlorobenzene	20	17.4	ug/Kg	87	14		70 (70)	130 (137)	30 (20)

VOLATILE METHOD BLANK SUMMARY

EPA SAMPLE NO.

VY1024SBL01

Lab Name: CHEMTECH

Contract: YANN01

Lab Code: CHEM Case No.: P4473

SAS No.: P4473 SDG NO.: P4473

Lab File ID: VY020002.D

Lab Sample ID: VY1024SBL01

Date Analyzed: 10/24/2024

Time Analyzed: 10:58

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

Heated Purge: (Y/N) Y

Instrument ID: MSVOA_Y

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED
VY1024SBS01	VY1024SBS01	VY020003.D	10/24/2024
VY1024SBSD01	VY1024SBSD01	VY020004.D	10/24/2024
TS-1	P4473-01	VY020005.D	10/24/2024

COMMENTS: _____

VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: CHEMTECH Contract: YANN01
Lab Code: CHEM Case No.: P4473 SAS No.: P4473 SDG NO.: P4473
Lab File ID: VY019826.D BFB Injection Date: 10/09/2024
Instrument ID: MSVOA_Y BFB Injection Time: 09:33
GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: Y/N Y

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	22.4
75	30.0 - 60.0% of mass 95	56
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.3
173	Less than 2.0% of mass 174	0.9 (1.1) 1
174	50.0 - 100.0% of mass 95	76.9
175	5.0 - 9.0% of mass 174	5.6 (7.3) 1
176	95.0 - 101.0% of mass 174	73.9 (96.2) 1
177	5.0 - 9.0% of mass 176	4.8 (6.5) 2

1-Value is % mass 174

2-Value is % mass 176

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDIC005	VSTDIC005	VY019827.D	10/09/2024	10:18
VSTDIC010	VSTDIC010	VY019828.D	10/09/2024	10:41
VSTDIC020	VSTDIC020	VY019829.D	10/09/2024	11:04
VSTDIC050	VSTDIC050	VY019830.D	10/09/2024	11:26
VSTDIC100	VSTDIC100	VY019831.D	10/09/2024	11:49
VSTDIC150	VSTDIC150	VY019832.D	10/09/2024	12:11

VOLATILE ORGANIC INSTRUMENT PERFORMANCE CHECK
BROMOFLUOROBENZENE (BFB)

Lab Name: CHEMTECH Contract: YANN01
Lab Code: CHEM Case No.: P4473 SAS No.: P4473 SDG NO.: P4473
Lab File ID: VY020000.D BFB Injection Date: 10/24/2024
Instrument ID: MSVOA_Y BFB Injection Time: 09:35
GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: Y/N Y

m/e	ION ABUNDANCE CRITERIA	% RELATIVE ABUNDANCE
50	15.0 - 40.0% of mass 95	24
75	30.0 - 60.0% of mass 95	59.3
95	Base Peak, 100% relative abundance	100
96	5.0 - 9.0% of mass 95	6.6
173	Less than 2.0% of mass 174	1 (1.4) 1
174	50.0 - 100.0% of mass 95	71.1
175	5.0 - 9.0% of mass 174	5.6 (7.9) 1
176	95.0 - 101.0% of mass 174	68.6 (96.5) 1
177	5.0 - 9.0% of mass 176	4.9 (7.2) 2

1-Value is % mass 174

2-Value is % mass 176

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	TIME ANALYZED
VSTDCCC050	VSTDCCC050	VY020001.D	10/24/2024	10:18
VY1024SBL01	VY1024SBL01	VY020002.D	10/24/2024	10:58
VY1024SBS01	VY1024SBS01	VY020003.D	10/24/2024	11:43
VY1024SBSD01	VY1024SBSD01	VY020004.D	10/24/2024	12:06
TS-1	P4473-01	VY020005.D	10/24/2024	12:36

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name: CHEMTECH Contract: YANN01
Lab Code: CHEM Case No.: P4473 SAS No.: P4473 SDG NO.: P4473
Lab File ID: VY020001.D Date Analyzed: 10/24/2024
Instrument ID: MSVOA_Y Time Analyzed: 10:18
GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: (Y/N) Y

	IS1 AREA #	RT #	IS2 AREA #	RT #	IS3 AREA #	RT #
12 HOUR STD	232783	7.71	418258	8.62	359637	11.42
UPPER LIMIT	465566	8.213	836516	9.116	719274	11.92
LOWER LIMIT	116392	7.213	209129	8.116	179819	10.92
EPA SAMPLE NO.						
TS-1	210153	7.71	419528	8.62	347384	11.42
VY1024SBL01	208622	7.71	444864	8.62	385664	11.42
VY1024SBS01	204148	7.71	362700	8.62	311120	11.41
VY1024SBSD01	225293	7.71	405827	8.62	339542	11.41

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

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

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

VOLATILE INTERNAL STANDARD AREA AND RT SUMMARY

Lab Name: CHEMTECH Contract: YANN01
Lab Code: CHEM Case No.: P4473 SAS No.: P4473 SDG NO.: P4473
Lab File ID: VY020001.D Date Analyzed: 10/24/2024
Instrument ID: MSVOA_Y Time Analyzed: 10:18
GC Column: RXI-624 ID: 0.25 (mm) Heated Purge: (Y/N) Y

	IS4 AREA #	RT #				
12 HOUR STD	173628	13.346				
UPPER LIMIT	347256	13.846				
LOWER LIMIT	86814	12.846				
EPA SAMPLE NO.						
TS-1	98425	13.35				
VY1024SBL01	125898	13.35				
VY1024SBS01	144922	13.35				
VY1024SBSD01	155771	13.35				

IS4 = 1,4-Dichlorobenzene-d4

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

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



QC SAMPLE DATA

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	
Client Sample ID:	VY1024SBL01		SDG No.:	P4473
Lab Sample ID:	VY1024SBL01		Matrix:	SOIL
Analytical Method:	SW8260		% Solid:	100
Sample Wt/Vol:	5	Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624	ID : 0.25	Level :	LOW
Prep Method :				

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020002.D	1		10/24/24 10:58	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
TARGETS						
75-71-8	Dichlorodifluoromethane	1.70	U	1.70	5.00	ug/Kg
74-87-3	Chloromethane	1.20	U	1.20	5.00	ug/Kg
75-01-4	Vinyl Chloride	0.77	U	0.77	5.00	ug/Kg
74-83-9	Bromomethane	1.00	U	1.00	5.00	ug/Kg
75-00-3	Chloroethane	1.00	U	1.00	5.00	ug/Kg
75-69-4	Trichlorofluoromethane	0.91	U	0.91	5.00	ug/Kg
76-13-1	1,1,2-Trichlorotrifluoroethane	1.10	U	1.10	5.00	ug/Kg
75-35-4	1,1-Dichloroethene	0.78	U	0.78	5.00	ug/Kg
67-64-1	Acetone	6.20	U	6.20	25.0	ug/Kg
75-15-0	Carbon Disulfide	1.30	U	1.30	5.00	ug/Kg
1634-04-4	Methyl tert-butyl Ether	0.67	U	0.67	5.00	ug/Kg
79-20-9	Methyl Acetate	1.80	U	1.80	5.00	ug/Kg
75-09-2	Methylene Chloride	3.40	U	3.40	10.0	ug/Kg
156-60-5	trans-1,2-Dichloroethene	0.84	U	0.84	5.00	ug/Kg
75-34-3	1,1-Dichloroethane	0.63	U	0.63	5.00	ug/Kg
110-82-7	Cyclohexane	0.69	U	0.69	5.00	ug/Kg
78-93-3	2-Butanone	5.70	U	5.70	25.0	ug/Kg
56-23-5	Carbon Tetrachloride	0.87	U	0.87	5.00	ug/Kg
156-59-2	cis-1,2-Dichloroethene	0.61	U	0.61	5.00	ug/Kg
74-97-5	Bromochloromethane	2.40	U	2.40	5.00	ug/Kg
67-66-3	Chloroform	0.67	U	0.67	5.00	ug/Kg
71-55-6	1,1,1-Trichloroethane	0.78	U	0.78	5.00	ug/Kg
108-87-2	Methylcyclohexane	0.87	U	0.87	5.00	ug/Kg
71-43-2	Benzene	0.72	U	0.72	5.00	ug/Kg
107-06-2	1,2-Dichloroethane	0.61	U	0.61	5.00	ug/Kg
79-01-6	Trichloroethene	0.75	U	0.75	5.00	ug/Kg
78-87-5	1,2-Dichloropropane	0.66	U	0.66	5.00	ug/Kg
75-27-4	Bromodichloromethane	0.56	U	0.56	5.00	ug/Kg
108-10-1	4-Methyl-2-Pentanone	4.40	U	4.40	25.0	ug/Kg
108-88-3	Toluene	0.67	U	0.67	5.00	ug/Kg

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	
Client Sample ID:	VY1024SBL01		SDG No.:	P4473
Lab Sample ID:	VY1024SBL01		Matrix:	SOIL
Analytical Method:	SW8260		% Solid:	100
Sample Wt/Vol:	5	Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624	ID : 0.25	Level :	LOW
Prep Method :				

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020002.D	1		10/24/24 10:58	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
10061-02-6	t-1,3-Dichloropropene	0.60	U	0.60	5.00	ug/Kg
10061-01-5	cis-1,3-Dichloropropene	0.57	U	0.57	5.00	ug/Kg
79-00-5	1,1,2-Trichloroethane	0.84	U	0.84	5.00	ug/Kg
591-78-6	2-Hexanone	4.80	U	4.80	25.0	ug/Kg
124-48-1	Dibromochloromethane	0.65	U	0.65	5.00	ug/Kg
106-93-4	1,2-Dibromoethane	0.79	U	0.79	5.00	ug/Kg
127-18-4	Tetrachloroethene	0.89	U	0.89	5.00	ug/Kg
108-90-7	Chlorobenzene	0.74	U	0.74	5.00	ug/Kg
100-41-4	Ethyl Benzene	0.62	U	0.62	5.00	ug/Kg
179601-23-1	m/p-Xylenes	1.40	U	1.40	10.0	ug/Kg
95-47-6	o-Xylene	0.70	U	0.70	5.00	ug/Kg
100-42-5	Styrene	0.60	U	0.60	5.00	ug/Kg
75-25-2	Bromoform	0.81	U	0.81	5.00	ug/Kg
98-82-8	Isopropylbenzene	0.67	U	0.67	5.00	ug/Kg
79-34-5	1,1,2,2-Tetrachloroethane	1.10	U	1.10	5.00	ug/Kg
541-73-1	1,3-Dichlorobenzene	0.74	U	0.74	5.00	ug/Kg
106-46-7	1,4-Dichlorobenzene	0.80	U	0.80	5.00	ug/Kg
95-50-1	1,2-Dichlorobenzene	0.59	U	0.59	5.00	ug/Kg
96-12-8	1,2-Dibromo-3-Chloropropane	1.60	U	1.60	5.00	ug/Kg
120-82-1	1,2,4-Trichlorobenzene	0.79	U	0.79	5.00	ug/Kg
87-61-6	1,2,3-Trichlorobenzene	0.78	U	0.78	5.00	ug/Kg
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	55.7		70 (50) - 130 (163)	111%	SPK: 50
1868-53-7	Dibromofluoromethane	48.9		70 (54) - 130 (147)	98%	SPK: 50
2037-26-5	Toluene-d8	50.4		70 (58) - 130 (134)	101%	SPK: 50
460-00-4	4-Bromofluorobenzene	39.8		70 (29) - 130 (146)	80%	SPK: 50
INTERNAL STANDARDS						
363-72-4	Pentafluorobenzene	209000	7.707			
540-36-3	1,4-Difluorobenzene	445000	8.616			
3114-55-4	Chlorobenzene-d5	386000	11.42			
3855-82-1	1,4-Dichlorobenzene-d4	126000	13.346			

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	
Client Sample ID:	VY1024SBL01		SDG No.:	P4473
Lab Sample ID:	VY1024SBL01		Matrix:	SOIL
Analytical Method:	SW8260		% Solid:	100
Sample Wt/Vol:	5	Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624	ID : 0.25	Level :	LOW
Prep Method :				

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020002.D	1		10/24/24 10:58	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
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U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

E = Value Exceeds Calibration Range

Q = indicates LCS control criteria did not meet requirements

M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

N = Presumptive Evidence of a Compound

* = Values outside of QC limits

D = Dilution

() = Laboratory InHouse Limit

A = Aldol-Condensation Reaction Products

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	
Client Sample ID:	VY1024SBS01		SDG No.:	P4473
Lab Sample ID:	VY1024SBS01		Matrix:	SOIL
Analytical Method:	SW8260		% Solid:	100
Sample Wt/Vol:	5	Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624	ID : 0.25	Level :	LOW
Prep Method :				

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020003.D	1		10/24/24 11:43	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
TARGETS						
75-71-8	Dichlorodifluoromethane	17.0		1.70	5.00	ug/Kg
74-87-3	Chloromethane	19.3		1.20	5.00	ug/Kg
75-01-4	Vinyl Chloride	20.6		0.77	5.00	ug/Kg
74-83-9	Bromomethane	21.9		1.00	5.00	ug/Kg
75-00-3	Chloroethane	22.0		1.00	5.00	ug/Kg
75-69-4	Trichlorofluoromethane	21.1		0.91	5.00	ug/Kg
76-13-1	1,1,2-Trichlorotrifluoroethane	21.5		1.10	5.00	ug/Kg
75-35-4	1,1-Dichloroethene	18.7		0.78	5.00	ug/Kg
67-64-1	Acetone	110		6.20	25.0	ug/Kg
75-15-0	Carbon Disulfide	13.7		1.30	5.00	ug/Kg
1634-04-4	Methyl tert-butyl Ether	21.4		0.67	5.00	ug/Kg
79-20-9	Methyl Acetate	20.4		1.80	5.00	ug/Kg
75-09-2	Methylene Chloride	21.3		3.40	10.0	ug/Kg
156-60-5	trans-1,2-Dichloroethene	19.9		0.84	5.00	ug/Kg
75-34-3	1,1-Dichloroethane	23.6		0.63	5.00	ug/Kg
110-82-7	Cyclohexane	19.2		0.69	5.00	ug/Kg
78-93-3	2-Butanone	110		5.70	25.0	ug/Kg
56-23-5	Carbon Tetrachloride	21.6		0.87	5.00	ug/Kg
156-59-2	cis-1,2-Dichloroethene	22.0		0.61	5.00	ug/Kg
74-97-5	Bromochloromethane	20.7		2.40	5.00	ug/Kg
67-66-3	Chloroform	24.5		0.67	5.00	ug/Kg
71-55-6	1,1,1-Trichloroethane	23.0		0.78	5.00	ug/Kg
108-87-2	Methylcyclohexane	18.9		0.87	5.00	ug/Kg
71-43-2	Benzene	21.8		0.72	5.00	ug/Kg
107-06-2	1,2-Dichloroethane	23.2		0.61	5.00	ug/Kg
79-01-6	Trichloroethene	21.3		0.75	5.00	ug/Kg
78-87-5	1,2-Dichloropropane	23.4		0.66	5.00	ug/Kg
75-27-4	Bromodichloromethane	23.5		0.56	5.00	ug/Kg
108-10-1	4-Methyl-2-Pentanone	110		4.40	25.0	ug/Kg
108-88-3	Toluene	21.8		0.67	5.00	ug/Kg

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	
Client Sample ID:	VY1024SBS01		SDG No.:	P4473
Lab Sample ID:	VY1024SBS01		Matrix:	SOIL
Analytical Method:	SW8260		% Solid:	100
Sample Wt/Vol:	5	Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624	ID : 0.25	Level :	LOW
Prep Method :				

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020003.D	1		10/24/24 11:43	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
10061-02-6	t-1,3-Dichloropropene	20.7		0.60	5.00	ug/Kg
10061-01-5	cis-1,3-Dichloropropene	21.5		0.57	5.00	ug/Kg
79-00-5	1,1,2-Trichloroethane	23.2		0.84	5.00	ug/Kg
591-78-6	2-Hexanone	110		4.80	25.0	ug/Kg
124-48-1	Dibromochloromethane	22.4		0.65	5.00	ug/Kg
106-93-4	1,2-Dibromoethane	21.6		0.79	5.00	ug/Kg
127-18-4	Tetrachloroethene	19.7		0.89	5.00	ug/Kg
108-90-7	Chlorobenzene	22.0		0.74	5.00	ug/Kg
100-41-4	Ethyl Benzene	22.2		0.62	5.00	ug/Kg
179601-23-1	m/p-Xylenes	43.3		1.40	10.0	ug/Kg
95-47-6	o-Xylene	22.1		0.70	5.00	ug/Kg
100-42-5	Styrene	21.9		0.60	5.00	ug/Kg
75-25-2	Bromoform	21.0		0.81	5.00	ug/Kg
98-82-8	Isopropylbenzene	22.9		0.67	5.00	ug/Kg
79-34-5	1,1,2,2-Tetrachloroethane	23.4		1.10	5.00	ug/Kg
541-73-1	1,3-Dichlorobenzene	22.3		0.74	5.00	ug/Kg
106-46-7	1,4-Dichlorobenzene	21.8		0.80	5.00	ug/Kg
95-50-1	1,2-Dichlorobenzene	21.8		0.59	5.00	ug/Kg
96-12-8	1,2-Dibromo-3-Chloropropane	18.1		1.60	5.00	ug/Kg
120-82-1	1,2,4-Trichlorobenzene	20.3		0.79	5.00	ug/Kg
87-61-6	1,2,3-Trichlorobenzene	20.0		0.78	5.00	ug/Kg
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	50.5		70 (50) - 130 (163)	101%	SPK: 50
1868-53-7	Dibromofluoromethane	51.2		70 (54) - 130 (147)	102%	SPK: 50
2037-26-5	Toluene-d8	50.4		70 (58) - 130 (134)	101%	SPK: 50
460-00-4	4-Bromofluorobenzene	48.9		70 (29) - 130 (146)	98%	SPK: 50
INTERNAL STANDARDS						
363-72-4	Pentafluorobenzene	204000	7.713			
540-36-3	1,4-Difluorobenzene	363000	8.616			
3114-55-4	Chlorobenzene-d5	311000	11.414			
3855-82-1	1,4-Dichlorobenzene-d4	145000	13.347			

Report of Analysis

Client:	Yannuzzi Group, Inc.	Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ	Date Received:	
Client Sample ID:	VY1024SBS01	SDG No.:	P4473
Lab Sample ID:	VY1024SBS01	Matrix:	SOIL
Analytical Method:	SW8260	% Solid:	100
Sample Wt/Vol:	5 Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:	uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624 ID : 0.25	Level :	LOW
Prep Method :			

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020003.D	1		10/24/24 11:43	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
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U = Not Detected
 LOQ = Limit of Quantitation
 MDL = Method Detection Limit
 LOD = Limit of Detection
 E = Value Exceeds Calibration Range
 Q = indicates LCS control criteria did not meet requirements
 M = MS/MSD acceptance criteria did not meet requirements

J = Estimated Value
 B = Analyte Found in Associated Method Blank
 N = Presumptive Evidence of a Compound
 * = Values outside of QC limits
 D = Dilution
 () = Laboratory InHouse Limit
 A = Aldol-Condensation Reaction Products

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	
Client Sample ID:	VY1024SBSD01	SDG No.:	P4473	
Lab Sample ID:	VY1024SBSD01	Matrix:	SOIL	
Analytical Method:	SW8260	% Solid:	100	
Sample Wt/Vol:	5	Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624	ID : 0.25	Level :	LOW
Prep Method :				

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020004.D	1		10/24/24 12:06	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
TARGETS						
75-71-8	Dichlorodifluoromethane	16.4		1.70	5.00	ug/Kg
74-87-3	Chloromethane	17.5		1.20	5.00	ug/Kg
75-01-4	Vinyl Chloride	17.4		0.77	5.00	ug/Kg
74-83-9	Bromomethane	19.4		1.00	5.00	ug/Kg
75-00-3	Chloroethane	18.5		1.00	5.00	ug/Kg
75-69-4	Trichlorofluoromethane	18.9		0.91	5.00	ug/Kg
76-13-1	1,1,2-Trichlorotrifluoroethane	19.6		1.10	5.00	ug/Kg
75-35-4	1,1-Dichloroethene	17.5		0.78	5.00	ug/Kg
67-64-1	Acetone	100		6.20	25.0	ug/Kg
75-15-0	Carbon Disulfide	12.1		1.30	5.00	ug/Kg
1634-04-4	Methyl tert-butyl Ether	19.7		0.67	5.00	ug/Kg
79-20-9	Methyl Acetate	19.4		1.80	5.00	ug/Kg
75-09-2	Methylene Chloride	19.2		3.40	10.0	ug/Kg
156-60-5	trans-1,2-Dichloroethene	17.0		0.84	5.00	ug/Kg
75-34-3	1,1-Dichloroethane	20.6		0.63	5.00	ug/Kg
110-82-7	Cyclohexane	17.1		0.69	5.00	ug/Kg
78-93-3	2-Butanone	100		5.70	25.0	ug/Kg
56-23-5	Carbon Tetrachloride	18.9		0.87	5.00	ug/Kg
156-59-2	cis-1,2-Dichloroethene	18.9		0.61	5.00	ug/Kg
74-97-5	Bromochloromethane	20.2		2.40	5.00	ug/Kg
67-66-3	Chloroform	21.0		0.67	5.00	ug/Kg
71-55-6	1,1,1-Trichloroethane	20.2		0.78	5.00	ug/Kg
108-87-2	Methylcyclohexane	16.3		0.87	5.00	ug/Kg
71-43-2	Benzene	18.5		0.72	5.00	ug/Kg
107-06-2	1,2-Dichloroethane	19.7		0.61	5.00	ug/Kg
79-01-6	Trichloroethene	17.7		0.75	5.00	ug/Kg
78-87-5	1,2-Dichloropropane	19.8		0.66	5.00	ug/Kg
75-27-4	Bromodichloromethane	20.1		0.56	5.00	ug/Kg
108-10-1	4-Methyl-2-Pentanone	100		4.40	25.0	ug/Kg
108-88-3	Toluene	18.3		0.67	5.00	ug/Kg

Report of Analysis

Client:	Yannuzzi Group, Inc.		Date Collected:	
Project:	86 Davidson Road, Piscataway, NJ		Date Received:	
Client Sample ID:	VY1024SBSD01	SDG No.:	P4473	
Lab Sample ID:	VY1024SBSD01	Matrix:	SOIL	
Analytical Method:	SW8260	% Solid:	100	
Sample Wt/Vol:	5	Units: g	Final Vol:	5000 uL
Soil Aliquot Vol:		uL	Test:	VOC-TCLVOA-10
GC Column:	RXI-624	ID : 0.25	Level :	LOW
Prep Method :				

File ID/Qc Batch:	Dilution:	Prep Date	Date Analyzed	Prep Batch ID
VY020004.D	1		10/24/24 12:06	VY102424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units(Dry Weight)
10061-02-6	t-1,3-Dichloropropene	18.0		0.60	5.00	ug/Kg
10061-01-5	cis-1,3-Dichloropropene	18.7		0.57	5.00	ug/Kg
79-00-5	1,1,2-Trichloroethane	20.1		0.84	5.00	ug/Kg
591-78-6	2-Hexanone	100		4.80	25.0	ug/Kg
124-48-1	Dibromochloromethane	19.0		0.65	5.00	ug/Kg
106-93-4	1,2-Dibromoethane	18.1		0.79	5.00	ug/Kg
127-18-4	Tetrachloroethene	17.7		0.89	5.00	ug/Kg
108-90-7	Chlorobenzene	19.2		0.74	5.00	ug/Kg
100-41-4	Ethyl Benzene	19.0		0.62	5.00	ug/Kg
179601-23-1	m/p-Xylenes	37.8		1.40	10.0	ug/Kg
95-47-6	o-Xylene	18.9		0.70	5.00	ug/Kg
100-42-5	Styrene	18.8		0.60	5.00	ug/Kg
75-25-2	Bromoform	18.4		0.81	5.00	ug/Kg
98-82-8	Isopropylbenzene	20.2		0.67	5.00	ug/Kg
79-34-5	1,1,2,2-Tetrachloroethane	21.6		1.10	5.00	ug/Kg
541-73-1	1,3-Dichlorobenzene	19.0		0.74	5.00	ug/Kg
106-46-7	1,4-Dichlorobenzene	19.1		0.80	5.00	ug/Kg
95-50-1	1,2-Dichlorobenzene	19.3		0.59	5.00	ug/Kg
96-12-8	1,2-Dibromo-3-Chloropropane	19.5		1.60	5.00	ug/Kg
120-82-1	1,2,4-Trichlorobenzene	17.8		0.79	5.00	ug/Kg
87-61-6	1,2,3-Trichlorobenzene	17.4		0.78	5.00	ug/Kg
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	52.3		70 (50) - 130 (163)	105%	SPK: 50
1868-53-7	Dibromofluoromethane	51.7		70 (54) - 130 (147)	103%	SPK: 50
2037-26-5	Toluene-d8	49.6		70 (58) - 130 (134)	99%	SPK: 50
460-00-4	4-Bromofluorobenzene	48.3		70 (29) - 130 (146)	97%	SPK: 50
INTERNAL STANDARDS						
363-72-4	Pentafluorobenzene	225000	7.707			
540-36-3	1,4-Difluorobenzene	406000	8.616			
3114-55-4	Chlorobenzene-d5	340000	11.414			
3855-82-1	1,4-Dichlorobenzene-d4	156000	13.347			



CALIBRATION SUMMARY

VOLATILE ORGANICS INITIAL CALIBRATION DATA

Lab Name:	<u>CHEMTECH</u>	Contract:	<u>YANN01</u>
Lab Code:	<u>CHEM</u>	Case No.:	<u>P4473</u>
Instrument ID:	<u>MSVOA_Y</u>	SAS No.:	<u>P4473</u>
Heated Purge: (Y/N)	<u>Y</u>	SDG No.:	<u>P4473</u>
GC Column:	<u>RXI-624</u>	Calibration Date(s):	<u>10/09/2024</u>
ID:	<u>0.25</u> (mm)	Calibration Time(s):	<u>10:18</u>
			<u>12:11</u>

LAB FILE ID:	RRF005 = VY019827.D			RRF010 = VY019828.D		RRF020 = VY019829.D		
	RRF050 = VY019830.D			RRF100 = VY019831.D		RRF150 = VY019832.D		
COMPOUND	RRF005	RRF010	RRF020	RRF050	RRF100	RRF150	RRF	% RSD
Dichlorodifluoromethane	0.500	0.498	0.410	0.458	0.434	0.492	0.465	8.1
Chloromethane	0.643	0.637	0.517	0.616	0.550	0.671	0.606	9.8
Vinyl Chloride	0.707	0.685	0.579	0.688	0.624	0.716	0.667	8
Bromomethane	0.458	0.447	0.357	0.433	0.390	0.447	0.422	9.4
Chloroethane	0.493	0.469	0.390	0.456	0.408	0.472	0.448	8.9
Trichlorofluoromethane	1.101	1.016	0.868	1.000	0.915	1.051	0.992	8.7
1,1,2-Trichlorotrifluoroethane	0.619	0.611	0.509	0.581	0.535	0.606	0.577	7.8
1,1-Dichloroethene	0.588	0.558	0.453	0.550	0.499	0.570	0.536	9.4
Acetone	0.196	0.156	0.134	0.170	0.152	0.153	0.160	12.9
Carbon Disulfide	1.501	1.392	1.193	1.552	1.404	1.586	1.438	10
Methyl tert-butyl Ether	1.719	1.559	1.334	1.574	1.443	1.617	1.541	8.8
Methyl Acetate	0.393	0.334	0.301	0.350	0.321	0.372	0.345	9.7
Methylene Chloride	0.869	0.695	0.551	0.619	0.543	0.603	0.647	18.9
trans-1,2-Dichloroethene	0.630	0.597	0.511	0.605	0.547	0.612	0.584	7.7
1,1-Dichloroethane	1.288	1.219	1.025	1.202	1.084	1.214	1.172	8.3
Cyclohexane	1.262	1.098	0.863	1.009	0.915	1.024	1.029	13.8
2-Butanone	0.251	0.217	0.186	0.222	0.201	0.211	0.215	10.2
Carbon Tetrachloride	0.525	0.505	0.446	0.527	0.495	0.559	0.510	7.5
cis-1,2-Dichloroethene	0.777	0.766	0.628	0.740	0.669	0.749	0.721	8.2
Bromochloromethane	0.607	0.470	0.502	0.529	0.483	0.504	0.516	9.5
Chloroform	1.318	1.238	1.055	1.225	1.102	1.229	1.195	8.1
1,1,1-Trichloroethane	1.118	1.091	0.915	1.067	0.978	1.112	1.047	7.9
Methylcyclohexane	0.629	0.584	0.512	0.629	0.581	0.658	0.599	8.6
Benzene	1.512	1.474	1.283	1.488	1.361	1.514	1.439	6.6
1,2-Dichloroethane	0.448	0.399	0.368	0.430	0.398	0.436	0.413	7.3
Trichloroethene	0.381	0.340	0.300	0.366	0.333	0.370	0.348	8.7
1,2-Dichloropropane	0.390	0.375	0.322	0.366	0.337	0.371	0.360	7.1
Bromodichloromethane	0.549	0.524	0.456	0.543	0.501	0.560	0.522	7.4
4-Methyl-2-Pentanone	0.281	0.247	0.220	0.269	0.254	0.275	0.258	8.7
Toluene	0.930	0.892	0.800	0.940	0.866	0.960	0.898	6.5

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

VOLATILE ORGANICS INITIAL CALIBRATION DATA

Lab Name:	<u>CHEMTECH</u>	Contract:	<u>YANN01</u>
Lab Code:	<u>CHEM</u>	Case No.:	<u>P4473</u>
Instrument ID:	<u>MSVOA_Y</u>	SAS No.:	<u>P4473</u>
Heated Purge: (Y/N)	<u>Y</u>	SDG No.:	<u>P4473</u>
GC Column:	<u>RXI-624</u>	Calibration Date(s):	<u>10/09/2024</u>
ID:	<u>0.25 (mm)</u>	Calibration Time(s):	<u>10:18</u>
			<u>12:11</u>

LAB FILE ID:		RRF005 = VY019827.D		RRF010 = VY019828.D		RRF020 = VY019829.D		
		RRF050 = VY019830.D		RRF100 = VY019831.D		RRF150 = VY019832.D		
COMPOUND	RRF005	RRF010	RRF020	RRF050	RRF100	RRF150	RRF	% RSD
t-1,3-Dichloropropene	0.477	0.448	0.408	0.497	0.464	0.524	0.470	8.6
cis-1,3-Dichloropropene	0.577	0.537	0.489	0.579	0.542	0.603	0.554	7.3
1,1,2-Trichloroethane	0.280	0.257	0.230	0.269	0.248	0.271	0.259	6.9
2-Hexanone	0.193	0.173	0.160	0.197	0.185	0.197	0.184	8.1
Dibromochloromethane	0.348	0.317	0.294	0.344	0.328	0.364	0.333	7.5
1,2-Dibromoethane	0.244	0.234	0.207	0.246	0.226	0.248	0.234	6.7
Tetrachloroethene	0.379	0.366	0.316	0.368	0.328	0.377	0.356	7.6
Chlorobenzene	1.226	1.167	1.032	1.171	1.064	1.202	1.144	6.8
Ethyl Benzene	2.177	2.100	1.861	2.164	1.953	2.209	2.077	6.7
m/p-Xylenes	0.802	0.781	0.691	0.796	0.720	0.813	0.767	6.5
o-Xylene	0.750	0.756	0.665	0.769	0.700	0.783	0.737	6.1
Styrene	1.276	1.238	1.120	1.304	1.191	1.333	1.244	6.3
Bromoform	0.208	0.198	0.180	0.220	0.204	0.232	0.207	8.7
Isopropylbenzene	4.420	4.371	3.794	4.268	3.912	4.470	4.206	6.7
1,1,2,2-Tetrachloroethane	0.796	0.737	0.664	0.763	0.719	0.805	0.747	7
1,3-Dichlorobenzene	1.968	1.892	1.598	1.819	1.651	1.887	1.802	8.1
1,4-Dichlorobenzene	1.928	1.831	1.572	1.801	1.635	1.856	1.771	7.8
1,2-Dichlorobenzene	1.716	1.620	1.416	1.612	1.474	1.663	1.584	7.3
1,2-Dibromo-3-Chloropropane	0.133	0.115	0.100	0.121	0.118	0.129	0.119	9.7
1,2,4-Trichlorobenzene	0.860	0.832	0.758	0.965	0.886	1.027	0.888	10.8
1,2,3-Trichlorobenzene	0.716	0.698	0.634	0.823	0.761	0.872	0.751	11.5
1,2-Dichloroethane-d4	0.701	0.656	0.566	0.581	0.583	0.607	0.616	8.5
Dibromofluoromethane	0.356	0.335	0.300	0.321	0.326	0.341	0.330	5.8
Toluene-d8	1.299	1.254	1.134	1.185	1.191	1.246	1.218	4.9
4-Bromofluorobenzene	0.498	0.438	0.402	0.426	0.427	0.450	0.440	7.4

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

VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: CHEMTECH Contract: YANN01

Lab Code: CHEM Case No.: P4473 SAS No.: P4473 SDG No.: P4473

Instrument ID: MSVOA_Y Calibration Date/Time: 10/24/2024 10:18

Lab File ID: VY020001.D Init. Calib. Date(s): 10/09/2024 10/09/2024

Heated Purge: (Y/N) Y Init. Calib. Time(s): 10:18 12:11

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

COMPOUND	RRF	RRF050	MIN RRF	%D	MAX%D
Dichlorodifluoromethane	0.465	0.385		-17.2	20
Chloromethane	0.606	0.616	0.1	1.65	20
Vinyl Chloride	0.667	0.723		8.4	20
Bromomethane	0.422	0.474		12.32	20
Chloroethane	0.448	0.514		14.73	20
Trichlorofluoromethane	0.992	1.061		6.96	20
1,1,2-Trichlorotrifluoroethane	0.577	0.607		5.2	20
1,1-Dichloroethene	0.536	0.540		0.75	20
Acetone	0.160	0.197		23.13	20
Carbon Disulfide	1.438	1.222		-15.02	20
Methyl tert-butyl Ether	1.541	1.677		8.82	20
Methyl Acetate	0.345	0.408		18.26	20
Methylene Chloride	0.647	0.646		-0.16	20
trans-1,2-Dichloroethene	0.584	0.604		3.42	20
1,1-Dichloroethane	1.172	1.376	0.1	17.41	20
Cyclohexane	1.029	1.055		2.53	20
2-Butanone	0.215	0.247		14.88	20
Carbon Tetrachloride	0.510	0.563		10.39	20
cis-1,2-Dichloroethene	0.721	0.811		12.48	20
Bromochloromethane	0.516	0.582		12.79	20
Chloroform	1.195	1.407		17.74	20
1,1,1-Trichloroethane	1.047	1.211		15.66	20
Methylcyclohexane	0.599	0.622		3.84	20
Benzene	1.439	1.575		9.45	20
1,2-Dichloroethane	0.413	0.467		13.07	20
Trichloroethene	0.348	0.365		4.89	20
1,2-Dichloropropane	0.360	0.413		14.72	20
Bromodichloromethane	0.522	0.599		14.75	20
4-Methyl-2-Pentanone	0.258	0.295		14.34	20
Toluene	0.898	1.011		12.58	20
t-1,3-Dichloropropene	0.470	0.517		10	20
cis-1,3-Dichloropropene	0.554	0.620		11.91	20
1,1,2-Trichloroethane	0.259	0.289		11.58	20
2-Hexanone	0.184	0.213		15.76	20
Dibromochloromethane	0.333	0.368		10.51	20
1,2-Dibromoethane	0.234	0.249		6.41	20
Tetrachloroethene	0.356	0.355		-0.28	20
Chlorobenzene	1.144	1.257	0.3	9.88	20

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

VOLATILE CONTINUING CALIBRATION CHECK

Lab Name: CHEMTECH Contract: YANN01

Lab Code: CHEM Case No.: P4473 SAS No.: P4473 SDG No.: P4473

Instrument ID: MSVOA_Y Calibration Date/Time: 10/24/2024 10:18

Lab File ID: VY020001.D Init. Calib. Date(s): 10/09/2024 10/09/2024

Heated Purge: (Y/N) Y Init. Calib. Time(s): 10:18 12:11

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

COMPOUND	RRF	RRF050	MIN RRF	%D	MAX%D
Ethyl Benzene	2.077	2.358		13.53	20
m/p-Xylenes	0.767	0.851		10.95	20
o-Xylene	0.737	0.821		11.4	20
Styrene	1.244	1.418		13.99	20
Bromoform	0.207	0.224	0.1	8.21	20
Isopropylbenzene	4.206	4.678		11.22	20
1,1,2,2-Tetrachloroethane	0.747	0.836	0.3	11.91	20
1,3-Dichlorobenzene	1.802	1.911		6.05	20
1,4-Dichlorobenzene	1.771	1.877		5.99	20
1,2-Dichlorobenzene	1.584	1.692		6.82	20
1,2-Dibromo-3-Chloropropane	0.119	0.117		-1.68	20
1,2,4-Trichlorobenzene	0.888	0.871		-1.91	20
1,2,3-Trichlorobenzene	0.751	0.724		-3.6	20
1,2-Dichloroethane-d4	0.616	0.638		3.57	20
Dibromofluoromethane	0.330	0.338		2.42	20
Toluene-d8	1.218	1.217		-0.08	20
4-Bromofluorobenzene	0.440	0.448		1.82	20

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