

Phone: (908) 789 8900 Fax: (908) 789 8922

LAB CHRONICLE

OrderID: Client: Contact:	O1233 Louis Berger U.S., Inc., A WSP Company Jonathan Ganz			OrderDate: Project: Location:	1/19/2023 1:53:00 PM NYCDDC Phase II SCI Arthur Kill Road CEQR N11,VOA Ref. #2 Soil,VOA Ref. #3 Water			
LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
01233-10	WC-38	SOIL			01/18/23			01/19/23
			Diesel Range Organics Gasoline Range Organics	8015D 8015D		01/20/23	01/23/23 01/23/23	





<u>SAMPLE</u> <u>DATA</u>



Client:	Louis Berge	er U.S., Inc., A	WSP Com	pany		Date Collected:	01/18/23	
Project:	NYCDDC P	Phase II SCI A	rthur Kill F	Road CEOR		Date Received:	01/19/23	
Client Sample ID:	WC-38			···· <		SDG No.:	01233	
Lab Sample ID:	01233-10					Matrix:	SOIL	
Analytical Method	: 8015D GRO)				% Solid:	84.9 Dec	canted:
Sample Wt/Vol:	5.01 U	Units: g				Final Vol:	5	mL
Soil Aliquot Vol:		uL				Test:	Gasoline Range O	rganics
Extraction Type:						Injection Volume :		-
GPC Factor :		PH :				2		
Prep Method :	SW3541							
File ID/Oc Batch:	Dilution					Date Analyzed	Pren Bate	
FRO 10/QC Batch.	500					01/22/22 12:02		
FB029139.D	500					01/23/23 13.02	FB012523	
CAS Number	Parameter	(Conc.	Qualifier	MDL		LOQ / CRQL	Units(Dry Weight)
TARGETS GRO	GRO	1	142000		2130		26400) ug/kg
SURROGATES 98-08-8	Alpha,Alpha,Alpha-	-Trifluoroto 2	29.7		50 - 150		148%	SPK: 20

Comments:

U = Not Detected

- LOQ = Limit of Quantitation
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- concentrations between the two GC columns
- 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
- S = Indicates estimated value where valid five-point calibration
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- () = Laboratory InHouse Limit



<u>QC</u> SUMMARY

A B C D E F



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

SOIL GASOLINE RANGE ORGANICS SURROGATE RECOVERY

Lab Name:	Chemtech			Cli	ent:	Louis Berger	U.S., In	nc., A WSP Con	npany
Lab Code:	CHEM	Case No.	01233	SA	S No.:	01233	SDC	G No.: 012	33
EP/ SAMPL	A E NO		S1		S2	S	3	S4	ТОТ
SAMPL	E NO.		AAA-TFT						OUT
VBF0123S2			94						0
BSF0123S1			93						0
WC-38			148						0
BSF0123S2			91						0

QC LIMITS

For Water : 50-150 For Soil : 50-150

AAA-TFT

Column to be used to flag recovery values * Values outside of contract required QC limits

D Surrogate Diluted Out

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SOIL GASOLINE RANGE ORGANICS LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICAT

Lab Name:	Lab Name: Chemtech		Client:	Louis Berger U.S., Inc., A WSP Company			
Lab Code:	CHEM	Cas No:	01233	SAS No :	01233	SDG No:	01233
Matrix Spike - H	EPA Sample No :	BSF0123S1		Datafile:	FB029158.D		

A B C D E F

COMPOUND	SPIKE ADDED ug/kg	CONCENTRATION ug/kg	LCS/LCSD CONCENTRATION ug/kg	% REC	QC LIMITS
GRO	180	0	150	83	50-150

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SOIL GASOLINE RANGE ORGANICS LABORATORY CONTROL SPIKE/LABORATORY CONTROL SPIKE DUPLICAT

Lab Name:	Chemtech			Client:	Louis Berger U.S., Inc., A WSP Company		
Lab Code:	СНЕМ	Cas No:	01233	SAS No :	01233	SDG No:	01233
Matrix Spike - El	PA Sample No :	BSF0123S2		Datafile:	FB029160.D		

COMPOUND	SPIKE ADDED ug/kg	CONCENTRATION ug/kg	LCS/LCSD CONCENTRATION ug/kg	% REC	QC LIMITS
GRO	180	0	162	90	50-150

LCS/LCSD % Recovery RPD : 7.7

A B C D E F



METHOD BLANK SUMMARY

B C D E

	EPA SAMPLE NO.
	VBF0123S2
Lab Name: CHEMTECH	Contract: loui01
Lab Code: CHEM Case No.: 01233	SAS No.: 01233 SDG NO.: 01233
Lab File ID: FB029157.D	Lab Sample ID: VBF0123S2
Date Analyzed: 01/23/23	Time Analyzed: 11:45
GC Column: <u>RTX-502.2</u> ID: <u>0.53</u> (mm)	Heated Purge: (Y/N) Y
Instrument ID: FB	

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

EPA SAMPLE NO.	LAB SAMPLE ID	LAB FILE ID	DATE ANALYZED	
BSF0123S1	BSF0123S1	FB029158.D	01/23/23	
WC-38	01233-10	FB029159.D	01/23/23	
BSF0123S2	BSF0123S2	FB029160.D	01/23/23	





<u>QC SAMPLE</u> <u>DATA</u>



Client:	Louis Berger U.S., I	nc., A WSP Co	ompany		Date Collected:		
Project:	NYCDDC Phase II	SCI Arthur Ki	ll Road CEQR		Date Received:		
Client Sample ID:	VBF0123S2				SDG No.:	01233	
Lab Sample ID:	VBF0123S2				Matrix:	SOIL	
Analytical Method	: 8015D GRO				% Solid:	100 Dec	canted:
Sample Wt/Vol:	5 Units:	g			Final Vol:	5	mL
Soil Aliquot Vol:		uL			Test:	Gasoline Range O	rganics
Extraction Type:					Injection Volume :		
GPC Factor :		PH :					
Prep Method :	SW3541						
File ID/Qc Batch:	Dilution:				Date Analyzed	Prep Bate	h ID
FB029157.D	50				01/23/23 11:45	FB012323	3
CAS Number	Parameter	Conc.	Qualifier	MDL		LOQ / CRQL	Units(Dry Weight)
TARGETS GRO	GRO	181	U	181		2250	ug/kg
SURROGATES 98-08-8	Alpha,Alpha,Alpha-Trifluo	roto 18.7		50 - 150		94%	SPK: 20

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B C D

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Client:	Louis Berger U.S.,	Inc., A WSP Co	ompany		Date Collected:		
Project:	NYCDDC Phase I	I SCI Arthur Kil	l Road CEQR		Date Received:		
Client Sample ID:	BSF0123S1				SDG No.:	01233	
Lab Sample ID:	BSF0123S1				Matrix:	SOIL	
Analytical Method	: 8015D GRO				% Solid:	100 Dec	canted:
Sample Wt/Vol:	5 Units:	g			Final Vol:	5	mL
Soil Aliquot Vol:		uL			Test:	Gasoline Range O	rganics
Extraction Type:					Injection Volume :		
GPC Factor :		PH :					
Prep Method :	SW3541						
File ID/Qc Batch:	Dilution:				Date Analyzed	Prep Bate	h ID
FB029158.D	1				01/23/23 12:22	FB012323	;
CAS Number	Parameter	Conc.	Qualifier	MDL		LOQ / CRQL	Units(Dry Weight)
TARGETS GRO	GRO	150		4.00		45.0	ug/kg
SURROGATES 98-08-8	Alpha,Alpha,Alpha-Triflu	oroto 18.6		50 - 150		93%	SPK: 20

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Client:	Louis Berger U	.S., Inc., A WSP C	Company		Date Collected:		
Project:	NYCDDC Pha	se II SCI Arthur K	ill Road CEQR		Date Received:		
Client Sample ID:	BSF0123S2				SDG No.:	01233	
Lab Sample ID:	BSF0123S2				Matrix:	SOIL	
Analytical Method	: 8015D GRO				% Solid:	100 Dec	canted:
Sample Wt/Vol:	5 Uni	its: g			Final Vol:	5	mL
Soil Aliquot Vol:		uL			Test:	Gasoline Range O	rganics
Extraction Type:					Injection Volume :		
GPC Factor :		PH :					
Prep Method :	SW3541						
File ID/Qc Batch:	Dilution:				Date Analyzed	Prep Bate	h ID
FB029160.D	1				01/23/23 13:39	FB012323	3
CAS Number	Parameter	Conc.	Qualifier	MDL		LOQ / CRQL	Units(Dry Weight)
TARGETS GRO	GRO	162		4.00		45.0	ug/kg
SURROGATES 98-08-8	Alpha,Alpha,Alpha-Tr	ifluoroto 18.1		50 - 150		91%	SPK: 20

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<u>CALIBRATION</u> <u>SUMMARY</u>



GASOLINE RANGE ORGANICS INITIAL CALIBRATION SUMMARY

Lab Name:	Chemtech			Contract:	loui01		
ProjectID:	NYCDDC Phase II SCI Arthur Kill Road CEQR						
Lab Code:	CHEM	Case No.:	01233	SAS No.:	01233	SDG No.:	O1233

Calibration Sequence : FB011723			Test : Gasoline Ra	est : Gasoline Range Organics			
Concentration (PPB)		Area Count	Reference Factor	File ID			
45		622989	13844	FB029115.D			
90		1667787	18531	FB029116.D			
180		3442113	19123	FB029117.D			
450		8424970	18722	FB029118.D			
900		16352397	18169	FB029119.D			
AVG RF: 17678		•	6 RSD : 12.279	AVG RT : 8.7888			



GASOLINE RANGE ORGANICS CONTINUING CALIBRATION SUMMARY

20 PPB GRO STD

Lab Name:	Chemtech			Contract:	loui01		
ProjectID:	NYCDDC Phase II SCI Arthur Kill Road CEQR						
Lab Code:	СНЕМ	Case No.:	01233	SAS No.:	01233	SDG No.: 01233	
DataFile:	FB029155.D		Analyst Name:	AJ/MA		Analyst Date: 01-23-2023	

Conc. (PPB)	Area Count	RF	Average RF	%D
180	2892916	16072	17678	9.085



GASOLINE RANGE ORGANICS CONTINUING CALIBRATION SUMMARY

20 PPB GRO STD

20 PPB GRO STD							
Lab Name:	Chemtech			Contract:	loui01		
ProjectID:	NYCDDC Phase II	SCI Arthur Kill Ro	ad CEQR				
Lab Code:	CHEM	Case No.:	01233	SAS No.:	01233	SDG No.:	01233
DataFile:	FB029161.D		Analyst Name:	AJ/MA		Analyst Date: 01-23-20	023

Conc. (PPB)	Area Count	RF	Average RF	%D
180	2573729	14298	17678	19.12



Analytical Sequence

Client:	Louis Berger U.S., Inc., A WSP Company			SDG No.: 01233
Project: NYCDDC Phase II SCI Arthur Kill Road CEQR			oad CEQR	Instrument ID: FID_B
GC Colum	m: RTX-502.2	ID: 0.53	(mm)	

THE ANALYTICAL SEQUENCE OF PERFORMANCE EVALUATION MIXTURES, BLANKS, SAMPLES, AND STANDARDS IS GIVEN BELOW:

MEAN SUROGATE RT FROM INITIAL CALIBRATION 8.7888									
EPA SAMPLE NO.	LAB SAMPLE ID	DATE AND TIME ANALYZED	DATAFILE	RT	#				
20 PPB GRO STD	20 PPB GRO STD	23 Jan 2023 10:27	FB029155.D	8.792					
VBF0123S2	VBF0123S2	23 Jan 2023 11:45	FB029157.D	8.794					
BSF0123S1	BSF0123S1	23 Jan 2023 12:22	FB029158.D	8.793					
WC-38	01233-10	23 Jan 2023 13:02	FB029159.D	8.804					
BSF0123S2	BSF0123S2	23 Jan 2023 13:39	FB029160.D	8.795					
20 PPB GRO STD	20 PPB GRO STD	23 Jan 2023 14:16	FB029161.D	8.794					