

ANALYTICAL RESULTS SUMMARY

VOLATILE ORGANICS GENERAL CHEMISTRY METALS SEMI-VOLATILE ORGANICS

PROJECT NAME: FORMER SCHLUMBERGER SITE PRINCETON NJ

JACOBS ENGINEERING GROUP, INC.

412 Mt. Kemble Ave

Downtown Building

Morristown, NJ - 07960

Phone No: 9732670555

ORDER ID: P3596

ATTENTION: Mary I. Murphy







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DATA OF KNOWN QUALITY CONFORMANCE/NON-CONFORMANCE SUMMARY QUESTIONNAIRE

Labora	atory Name :	Alliance Technical Group LLC	Client :	JACOBS Engine	ering	Grou	p, Inc.		
Projec	t Location:	Princeton Junction, NJ	Project Number :	D3779922					
Labora	atory Sample II	D(s): <u>P3596</u>	Sampling Date(s):	08/13/2024					
List DI	KQP Methods l	Used (e.g., 8260,8270, et Cetra)	6020B,7196A,7470A,8260E),8270-Modified	,8270	E, 200).7		
1	specified QA/0 explain any cr	ytical method referenced in this la QC performance criteria followed, iteria falling outside of acceptable of Known Quality performance sta	including the requirement to guidelines, as specified in the		V	Yes		No	
1A	Were the meth	hod specified handling, preservati	on, and holding time requirem	nents met?	$\overline{\checkmark}$	Yes		No	
1B		Was the EPH method conducted of respective DKQ methods)	without significant modificatio	ns (see		Yes		No	✓ N/A
2		oles received by the laboratory in a the associated chain-of-custody d		at	$\overline{\mathbf{V}}$	Yes		No	
3	Were samples	s received at an appropriate tempe	erature (4±2° C)?		$\overline{\mathbf{A}}$	Yes		No	□ N/A
4	Were all QA/C standards ac	QC performance criteria specified hieved?	in the NJDEP DKQP			Yes	$\overline{\mathbf{V}}$	No	
5		ing limits specified or referenced of to the laboratory prior to sample			$\overline{\mathbf{V}}$	Yes		No	
	b)Were these	reporting limits met?			$\overline{\mathbf{V}}$	Yes		No	□ N/A
6	results report	ytical method referenced in this la ted for all constituents identified in he DKQP documents and/or site-s	the method-specific analyte		$\overline{\mathbf{A}}$	Yes		No	
7	Are project-sp	ecific matrix spikes and/or labora	tory duplicates included in this	s data set?		Yes		No	

Notes: For all questions to which the response was "No" (with the exception of question #7), additional information should be provided in an attached narrative. If the answer to question #1, #1A, or #1B is "No", the data package does not meet the requirements for "Data of Known Quality."



Cover Page

Order ID: P3596

Project ID: Former Schlumberger Site Princeton NJ

Client: JACOBS Engineering Group, Inc.

Lab Sample Number

Client Sample Number

P3596-01 918-J-WS-081324 P3596-02 918-J-WS-081324-FD P3596-03 TB-01-081324

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

Signature :		
Jighature .	 Date:	10/28/2024

NYDOH CERTIFICATION NO - 11376

NJDEP CERTIFICATION NO - 20012



CASE NARRATIVE

JACOBS Engineering Group, Inc.

Project Name: Former Schlumberger Site Princeton NJ

Project # N/A

Chemtech Project # P3596 Test Name: VOCMS Group6

A. Number of Samples and Date of Receipt:

3 Water samples were received on 08/13/2024.

B. Parameters

According to the Chain of Custody document, the following analyses were requested: Hexavalent Chromium, Mercury, Metals Group4, SVOCMS Group3, SVOCMS Group6 and VOCMS Group6. This data package contains results for VOCMS Group6.

C. Analytical Techniques:

The analysis performed on instrument MSVOA_N were done using GC column RXI-624SIL MS 30m 0.25mm 1.4 um. Cat#13868.The analysis of VOCMS Group6 was based on method 8260D.

D. QA/ QC Samples:

The Holding Times were met for all analysis.

The Surrogate recoveries met the acceptable criteria.

The Internal Standards Areas met the acceptable requirements.

The Retention Times were acceptable for all samples.

The RPD met criteria.

The Blank Spike met requirements for all samples.

The Blank Spike Duplicate met requirements for all samples.

The Blank analysis did not indicate the presence of lab contamination.

The Initial Calibration met the requirements

The Continuous Calibration met the requirements.

The Tuning criteria met requirements.

E. Additional Comments:

This data package has been revised due to parameter list changed Samples for MS/MSD for VOC analysis were not provided with this set of samples. The Blank Spike Duplicate is reported with the data.

Please use %D calculated based on Avg RF and CCRF for all compounds using Average Response Factor when the %RSD value for a compound is <15% for the Initial Calibration curve and use %D calculated based on Amount added and Calculated amount for all compounds using Linear Regression when the %RSD value for a compound is > 15% for the Initial Calibration curve for SW-846 analysis.





F. Manual Integration Comments:

Please refer to the Manual integration Report included with the Run Logs for information on the manual integrations performed.

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Signature	





CASE NARRATIVE

JACOBS Engineering Group, Inc.

Project Name: Former Schlumberger Site Princeton NJ

Project # N/A

Chemtech Project # P3596 Test Name: SVOCMS Group3

A. Number of Samples and Date of Receipt:

3 Water samples were received on 08/13/2024.

B. Parameters

According to the Chain of Custody document, the following analyses were requested: Hexavalent Chromium, Mercury, Metals Group4, SVOCMS Group3, SVOCMS Group6 and VOCMS Group6. This data package contains results for SVOCMS Group3.

C. Analytical Techniques:

The samples were analyzed on instrument BNA_N using GC Column ZB-SemiVolatiles Guardian which is 30 meters, 0.25 mm ID, 0.5 um df, Catalog # 7HG-G027-17-GGAThe analysis of SVOCMS Group3 was based on method 8270-Modified and extraction was done based on method 3510.

D. QA/ QC Samples:

The Holding Times were met for all analysis.

The Surrogate recoveries met the acceptable criteria.

The Internal Standards Areas met the acceptable requirements.

The Retention Times were acceptable for all samples

The RPD met criteria.

The Blank Spike met requirements for all samples.

The Blank Spike Duplicate met requirements for all samples.

The Blank analysis did not indicate the presence of lab contamination.

The Initial Calibration met the requirements.

The Continuous Calibration File ID BN033465.D met the requirements except for 2,4,6-Tribromophenol, The above failure compound not associated with the client parameters list, therefore no corrective action was taken.

The Tuning criteria met requirements.

E. Additional Comments:

The Sample 918-J-WS-081324, have the concentration of target compound below method detection limits; therefore it is not reported as Hit in Form1.

The Form 6 is not included in the data package because the Initial Calibration was performed using 7 points.





Please use %D calculated based on Avg RF and CCRF for all compounds using Average Response Factor when the %RSD value for a compound is <15% for the Initial Calibration curve and use %D calculated based on Amount added and Calculated amount for all compounds using Linear Regression when the %RSD value for a compound is > 15% for the Initial Calibration curve for SW-846 analysis.

F. Manual Integration Comments:

Please refer to the Manual integration Report included with the Run Logs for information on the manual integrations performed.

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CASE NARRATIVE

JACOBS Engineering Group, Inc.

Project Name: Former Schlumberger Site Princeton NJ

Project # N/A

Chemtech Project # P3596 Test Name: SVOCMS Group6

A. Number of Samples and Date of Receipt:

3 Water samples were received on 08/13/2024.

B. Parameters

According to the Chain of Custody document, the following analyses were requested: Hexavalent Chromium, Mercury, Metals Group4, SVOCMS Group3, SVOCMS Group6 and VOCMS Group6. This data package contains results for SVOCMS Group6.

C. Analytical Techniques:

The samples were analyzed on instrument BNA_M using GC Column ZB-SemiVolatiles Guardian which is 30 meters, 0.25 mm ID, 0.5 um df, Catalog # 7HG-G027-17-GGAThe analysis of SVOCMS Group6 was based on method 8270E and extraction was done based on method 3510.

D. QA/ QC Samples:

The Holding Times were met for all analysis.

The Surrogate recoveries met the acceptable criteria except for 918-J-WS-081324-FD [2,4,6-Tribromophenol - 114%], this compound did not meet the NJDKQP criteria but met the in-house criteria.

The Internal Standards Areas met the acceptable requirements.

The Retention Times were acceptable for all samples.

The RPD met criteria.

The Blank Spike met requirements for all samples.

The Blank Spike Duplicate met requirements for all samples.

The Blank analysis did not indicate the presence of lab contamination.

The % RSD is greater than 15% in the Initial Calibration (Method 8270-BM081024.M) for Benzaldehyde, this compound is passing on Quadratic regression.

The Continuous Calibration File ID BM047290.D met the requirements except for Terphenyl-d14, Which is not our target compound, therefore no corrective action taken.

The Tuning criteria met requirements.



E. Additional Comments:

This data package has been revised due to parameter list changed.

The Form 6 is not included in the data package because the Initial Calibration was performed using 8 points.

Please use %D calculated based on Avg RF and CCRF for all compounds using Average Response Factor when the %RSD value for a compound is <15% for the Initial Calibration curve and use %D calculated based on Amount added and Calculated amount for all compounds using Linear Regression when the %RSD value for a compound is > 15% for the Initial Calibration curve for SW-846 analysis.

F. Manual Integration Comments:

Please refer to the Manual integration Report included with the Run Logs for information on the manual integrations performed.

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authorized release of the data contained in this hard copy data package.

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Signature			



CASE NARRATIVE

JACOBS Engineering Group, Inc.

Project Name: Former Schlumberger Site Princeton NJ

Project # N/A

Chemtech Project # P3596 Test Name: Metals Group5

A. Number of Samples and Date of Receipt:

3 Water samples were received on 08/13/2024.

B. Parameters:

According to the Chain of Custody document, the following analyses were requested: Hexavalent Chromium, Mercury, Metals Group4, Metals Group5, SVOCMS Group3, SVOCMS Group6 and VOCMS Group6. This data package contains results for Metals Group5.

C. Analytical Techniques:

The analysis and digestion of Metals Group5 was based on method 200.7.

D. QA/ QC Samples:

The Holding Times were met for all analysis.

The Blank Spike met requirements for all samples.

The Duplicate analysis met criteria for all samples.

The Blank analysis did not indicate the presence of lab contamination.

The Calibration met the requirements.

E. Additional Comments:

This Data Package has been revised due to Metals Group5 test added as per Client Request.

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





CASE NARRATIVE

JACOBS Engineering Group, Inc.

Project Name: Former Schlumberger Site Princeton NJ

Project # N/A

Chemtech Project # P3596

Test Name: Metals Group4, Mercury

A. Number of Samples and Date of Receipt:

3 Water samples were received on 08/13/2024.

B. Parameters:

According to the Chain of Custody document, the following analyses were requested: Hexavalent Chromium, Mercury, Metals Group4, SVOCMS Group3, SVOCMS Group6 and VOCMS Group6. This data package contains results for Metals Group4, Mercury.

C. Analytical Techniques:

The analysis of Metals Group4 was based on method 6020B, digestion based on method 3010 (waters). The analysis and digestion of Mercury was based on method 7470A.

D. QA/ QC Samples:

The Holding Times were met for all analysis.

The Blank Spike met requirements for all samples.

The Duplicate (918-J-WS-081324-FDDUP) analysis met criteria for all samples except for Arsenic due to sample matrix interference.

The Matrix Spike (918-J-WS-081324-FDMS) analysis met criteria for all samples except for Silver due to Chemical Interference during Digestion Process.

The Matrix Spike Duplicate (918-J-WS-081324-FDMSD) analysis met criteria for all samples except for Silver due to Chemical Interference during Digestion Process.

The Blank analysis did not indicate the presence of lab contamination.

The Calibration met the requirements.

The Serial Dilution (918-J-WS-081324-FDL) met criteria for all samples except for Aluminum, Iron, and Manganese due to sample matrix interference.

E. Additional Comments:

This Data Package has been revised due to Parameter List Change.

Collision cell is being used to remove potential interferences. The analytes Na, Mg, Al, K, V, Cr, Mn, Fe, Co, Ni, Cu, Zn, As are being analyzed with collision cell and analytes Be, B, Ca, Ti, Se, Sr, Zr, Mo, Ag, Cd, Sn, Sb, Ba, Tl, Pb, U are being analyzed with Non-Collision Cell. Helium gas is used for the Collision Cell analysis.



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

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CASE NARRATIVE

JACOBS Engineering Group, Inc.

Project Name: Former Schlumberger Site Princeton NJ

Project # N/A

Chemtech Project # P3596

Test Name: Hexavalent Chromium

A. Number of Samples and Date of Receipt:

3 Water samples were received on 08/13/2024.

B. Parameters:

According to the Chain of Custody document, the following analyses were requested: Hexavalent Chromium, Mercury, Metals Group4, SVOCMS Group3, SVOCMS Group6 and VOCMS Group6. This data package contains results for Hexavalent Chromium.

C. Analytical Techniques:

The analysis of Hexavalent Chromium was based on method 7196A.

D. QA/ QC Samples:

The Holding Times were met for all analysis.

The Blank Spike met requirements for all samples.

The Duplicate analysis met criteria for all samples.

The Matrix Spike analysis met criteria for all samples.

The Matrix Spike Duplicate analysis met criteria for all samples.

The Blank analysis did not indicate the presence of lab contamination.

The Calibration met the requirements.

E. Additional Comments:

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DATA REPORTING QUALIFIERS- INORGANIC

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

- J Indicates the reported value was obtained from a reading that was less than the Contract Required Detection Limit (CRDL), but greater than or equal to the Instrument Detection Limit (IDL).
- U Indicates the analyte was analyzed for, but not detected.
- ND Indicates the analyte was analyzed for, but not detected
- E Indicates the reported value is estimated because of the presence of interference
- M Indicates Duplicate injection precision not met.
- N Indicates the spiked sample recovery is not within control limits.
- S Indicates the reported value was determined by the Method of Standard Addition (MSA).
- * Indicates that the duplicate analysis is not within control limits.
- + Indicates the correlation coefficient for the MSA is less than 0.995.
- D Indicates the reported value is from a secondary analysis with a dilution factor. The original analysis exceeded the calibration range.
- M Method qualifiers
 - **"P"** for ICP instrument
 - "PM" for ICP when Microwave Digestion is used
 - "CV" for Manual Cold Vapor AA
 - "AV" for automated Cold Vapor AA
 - "CA" for MIDI-Distillation Spectrophotometric "AS" for Semi –Automated Spectrophotometric
 - "C" for Manual Spectrophotometric
 - **"T"** for Titrimetric
 - "NR" for analyte not required to be analyzed
- OR Indicates the analyte's concentration exceeds the calibrated range of the
 - instrument for that specific analysis.
- Q Indicates the LCS did not meet the control limits requirements
- H Sample Analysis Out Of Hold Time



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. " $10\mathrm{U}$ ". 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.
В	Indicates the analyte was found in the blank as well as the sample report as "12 B".
E	Indicates the analyte's concentration exceeds the calibrated range of the instrument for that specific analysis.
D	This flag identifies all compounds identified in an analysis at a secondary dilution factor.
P	This flag is used for Pesticide/PCB target analyte when there is >25% difference for detected concentrations between the two GC columns. The lower of the two values is reported on Form 1 and flagged with a "P".
N	This flag indicates presumptive evidence of a compound. This is only used for tentatively identified compounds (TICs), where the identification is based on a mass spectral library search. It applies to all TIC results. For generic characterization of a TIC, such as chlorinated hydrocarbon, the flag is not used.
A	This flag indicates that a Tentatively Identified Compound is a suspected aldol-condensation product.
Q	Indicates the LCS did not meet the control limits requirements



APPENDIX A

QA REVIEW GENERAL DOCUMENTATION

Project #: P3596

	Completed
For thorough review, the report must have the following:	
GENERAL:	
Are all original paperwork present (chain of custody, record of communication, airbill, sample management lab chronicle, login page)	<u> </u>
Check chain-of-custody for proper relinquish/return of samples	<u> </u>
Is the chain of custody signed and complete	<u>✓</u>
Check internal chain-of-custody for proper relinquish/return of samples /sample extracts	√ √ √
Collect information for each project id from server. Were all requirements followed	<u> </u>
COVER PAGE:	
Do numbers of samples correspond to the number of samples in the Chain of Custody on login page	<u> </u>
Do lab numbers and client Ids on cover page agree with the Chain of Custody	<u> </u>
CHAIN OF CUSTODY:	
Do requested analyses on Chain of Custody agree with form I results	<u> </u>
Do requested analyses on Chain of Custody agree with the log-in page	<u> </u>
Were the correct method log-in for analysis according to the Analytical Request and Chain of Castody	' ' ' ' '
Were the samples received within hold time	<u> </u>
Were any problems found with the samples at arrival recorded in the Sample Management Laboratory Chronicle	<u> </u>
ANALYTICAL:	
Was method requirement followed?	<u> </u>
Was client requirement followed?	<u> </u>
Does the case narrative summarize all QC failure?	<u> </u>
All runlogs and manual integration are reviewed for requirements	<u> </u>
All manual calculations and /or hand notations verified	<u> </u>

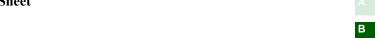
QA Review Signature: SOHIL JODHANI Date: 10/28/2024



Hit Summary Sheet SW-846

SDG No.: P3596

Client: JACOBS Engineering Group, Inc.



Sample ID	Client ID	Matrix	Parameter	Concentration	on	C	MDL	RDL	Units
Client ID:	918-J-WS-081324								
P3596-01	918-J-WS-081324	Water	Acetone	4.90		J	1.40	5.00	ug/L
			Total Voc:	4	4.90				
			Total Concentration:	4	1.90				
Client ID:	918-J-WS-081324-	·FD							
P3596-02	918-J-WS-081324-	-F Water	Acetone	5.10			1.40	5.00	ug/L
			Total Voc:	5	5.10				
			Total Concentration:	5	5.10				
Client ID:	TB-01-081324								
P3596-03	TB-01-081324	Water	Acetone	2.10		J	1.40	5.00	ug/L
			Total Voc:	2	2.10				
			Total Concentration:	2	2.10				











SAMPLE DATA



Test:

Level:

LOW

Report of Analysis

JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Matrix: Water Lab Sample ID: P3596-01

Analytical Method: SW8260 % Solid:

> uL ID: 0.25

RXI-624

5 Final Vol: 5000 uL Sample Wt/Vol: Units: mL

Soil Aliquot Vol: VOCMS Group6

GC Column: Prep Method:

Client:

File ID/Qc Batch: Dilution: Prep Date Date Analyzed Prep Batch ID

VN083309.D 1 08/14/24 18:29 VN081424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
75-71-8	Dichlorodifluoromethane	0.21	U	0.21	1.00	ug/L
74-87-3	Chloromethane	0.35	U	0.35	1.00	ug/L
75-01-4	Vinyl Chloride	0.34	U	0.34	1.00	ug/L
74-83-9	Bromomethane	1.40	U	1.40	5.00	ug/L
75-00-3	Chloroethane	0.56	U	0.56	1.00	ug/L
76-13-1	1,1,2-Trichlorotrifluoroethane	0.25	U	0.25	1.00	ug/L
75-35-4	1,1-Dichloroethene	0.26	U	0.26	1.00	ug/L
67-64-1	Acetone	4.90	J	1.40	5.00	ug/L
75-15-0	Carbon Disulfide	0.32	U	0.32	1.00	ug/L
1634-04-4	Methyl tert-butyl Ether	0.16	U	0.16	1.00	ug/L
75-09-2	Methylene Chloride	0.32	U	0.32	1.00	ug/L
156-60-5	trans-1,2-Dichloroethene	0.25	U	0.25	1.00	ug/L
75-34-3	1,1-Dichloroethane	0.23	U	0.23	1.00	ug/L
110-82-7	Cyclohexane	1.60	U	1.60	5.00	ug/L
78-93-3	2-Butanone	1.30	U	1.30	5.00	ug/L
56-23-5	Carbon Tetrachloride	0.25	U	0.25	1.00	ug/L
156-59-2	cis-1,2-Dichloroethene	0.25	U	0.25	1.00	ug/L
67-66-3	Chloroform	0.26	U	0.26	1.00	ug/L
71-55-6	1,1,1-Trichloroethane	0.19	U	0.19	1.00	ug/L
108-87-2	Methylcyclohexane	0.19	U	0.19	1.00	ug/L
71-43-2	Benzene	0.16	U	0.16	1.00	ug/L
107-06-2	1,2-Dichloroethane	0.24	U	0.24	1.00	ug/L
79-01-6	Trichloroethene	0.32	U	0.32	1.00	ug/L
75-27-4	Bromodichloromethane	0.24	U	0.24	1.00	ug/L
108-88-3	Toluene	0.18	U	0.18	1.00	ug/L
79-00-5	1,1,2-Trichloroethane	0.21	U	0.21	1.00	ug/L
124-48-1	Dibromochloromethane	0.18	U	0.18	1.00	ug/L
127-18-4	Tetrachloroethene	0.25	U	0.25	1.00	ug/L
108-90-7	Chlorobenzene	0.13	U	0.13	1.00	ug/L
100-41-4	Ethyl Benzene	0.16	U	0.16	1.00	ug/L



Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected:

918-J-WS-081324

oup, Inc. Date Collected: 08/13/24

SDG No.:

P3596

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Lab Sample ID: P3596-01 Matrix: Water

Analytical Method: SW8260 % Solid: 0

Sample Wt/Vol: 5 Units: mL Final Vol: 5000 uL

Soil Aliquot Vol: uL Test: VOCMS Group6

GC Column: RXI-624 ID: 0.25 Level: LOW

Prep Method:

Client Sample ID:

File ID/Qc Batch: Dilution: Prep Date Date Analyzed Prep Batch ID VN083309.D 1 08/14/24 18:29 VN081424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
179601-23-1	m/p-Xylenes	0.31	U	0.31	2.00	ug/L
1330-20-7	Total Xylenes	0.45	U	0.45	3.00	ug/L
95-47-6	o-Xylene	0.14	U	0.14	1.00	ug/L
98-82-8	Isopropylbenzene	0.13	U	0.13	1.00	ug/L
106-46-7	1,4-Dichlorobenzene	0.27	U	0.27	1.00	ug/L
95-50-1	1,2-Dichlorobenzene	0.19	U	0.19	1.00	ug/L
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	59.1		70 (74) - 130 (125)	118%	SPK: 50
1868-53-7	Dibromofluoromethane	54.5		70 (75) - 130 (124)	109%	SPK: 50
2037-26-5	Toluene-d8	53.9		70 (86) - 130 (113)	108%	SPK: 50
460-00-4	4-Bromofluorobenzene	57.9		70 (77) - 130 (121)	116%	SPK: 50
INTERNAL STA	ANDARDS					
363-72-4	Pentafluorobenzene	128000	8.224			
540-36-3	1,4-Difluorobenzene	253000	9.1			
3114-55-4	Chlorobenzene-d5	263000	11.865			
3855-82-1	1.4-Dichlorobenzene-d4	116000	13.794			

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

JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596

Lab Sample ID: P3596-02 Matrix: Water

Analytical Method: SW8260 % Solid: 0

Sample Wt/Vol: 5 Units: mL Final Vol: 5000 uL

Soil Aliquot Vol: uL Test: VOCMS Group6

GC Column: RXI-624 ID: 0.25 Level: LOW

Prep Method:

Client:

File ID/Qc Batch: Dilution: Prep Date Date Analyzed Prep Batch ID

VN083310.D 1 08/14/24 18:54 VN081424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
75-71-8	Dichlorodifluoromethane	0.21	U	0.21	1.00	ug/L
74-87-3	Chloromethane	0.35	U	0.35	1.00	ug/L
75-01-4	Vinyl Chloride	0.34	U	0.34	1.00	ug/L
74-83-9	Bromomethane	1.40	U	1.40	5.00	ug/L
75-00-3	Chloroethane	0.56	U	0.56	1.00	ug/L
76-13-1	1,1,2-Trichlorotrifluoroethane	0.25	U	0.25	1.00	ug/L
75-35-4	1,1-Dichloroethene	0.26	U	0.26	1.00	ug/L
67-64-1	Acetone	5.10		1.40	5.00	ug/L
75-15-0	Carbon Disulfide	0.32	U	0.32	1.00	ug/L
1634-04-4	Methyl tert-butyl Ether	0.16	U	0.16	1.00	ug/L
75-09-2	Methylene Chloride	0.32	U	0.32	1.00	ug/L
156-60-5	trans-1,2-Dichloroethene	0.25	U	0.25	1.00	ug/L
75-34-3	1,1-Dichloroethane	0.23	U	0.23	1.00	ug/L
110-82-7	Cyclohexane	1.60	U	1.60	5.00	ug/L
78-93-3	2-Butanone	1.30	U	1.30	5.00	ug/L
56-23-5	Carbon Tetrachloride	0.25	U	0.25	1.00	ug/L
156-59-2	cis-1,2-Dichloroethene	0.25	U	0.25	1.00	ug/L
67-66-3	Chloroform	0.26	U	0.26	1.00	ug/L
71-55-6	1,1,1-Trichloroethane	0.19	U	0.19	1.00	ug/L
108-87-2	Methylcyclohexane	0.19	U	0.19	1.00	ug/L
71-43-2	Benzene	0.16	U	0.16	1.00	ug/L
107-06-2	1,2-Dichloroethane	0.24	U	0.24	1.00	ug/L
79-01-6	Trichloroethene	0.32	U	0.32	1.00	ug/L
75-27-4	Bromodichloromethane	0.24	U	0.24	1.00	ug/L
108-88-3	Toluene	0.18	U	0.18	1.00	ug/L
79-00-5	1,1,2-Trichloroethane	0.21	U	0.21	1.00	ug/L
124-48-1	Dibromochloromethane	0.18	U	0.18	1.00	ug/L
127-18-4	Tetrachloroethene	0.25	U	0.25	1.00	ug/L
108-90-7	Chlorobenzene	0.13	U	0.13	1.00	ug/L
100-41-4	Ethyl Benzene	0.16	U	0.16	1.00	ug/L

LOW



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

Level:

Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596

Lab Sample ID: P3596-02 Matrix: Water

Analytical Method: SW8260 % Solid: 0

ID: 0.25

RXI-624

Sample Wt/Vol: 5 Units: mL Final Vol: 5000 uL

Soil Aliquot Vol: uL Test: VOCMS Group6

Prep Method:

GC Column:

File ID/Qc Batch: Dilution: Prep Date Date Analyzed Prep Batch ID VN083310.D 1 08/14/24 18:54 VN081424

Qualifier **MDL** LOQ / CRQL Units **CAS Number Parameter** Conc. 179601-23-1 0.31 U 0.31 2.00 m/p-Xylenes ug/L 1330-20-7 Total Xylenes 0.45 U 0.45 3.00 ug/L U o-Xylene 0.14 0.14 1.00 95-47-6 ug/L U 98-82-8 Isopropylbenzene 0.13 0.13 1.00 ug/L 0.27 U 106-46-7 1,4-Dichlorobenzene 0.27 1.00 ug/L 0.19 U 0.19 95-50-1 1,2-Dichlorobenzene 1.00 ug/L SURROGATES 1.2-Dichloroethane-d4 17060-07-0 59.4 70 (74) - 130 (125) 119% SPK: 50 Dibromofluoromethane 54.6 70 (75) - 130 (124) 109% SPK: 50 1868-53-7 54.3 109% SPK: 50 2037-26-5 Toluene-d8 70 (86) - 130 (113) 460-00-4 4-Bromofluorobenzene 56.0 70 (77) - 130 (121) 112% SPK: 50 INTERNAL STANDARDS 8.224 363-72-4 Pentafluorobenzene 123000 1,4-Difluorobenzene 9.106 540-36-3 243000 3114-55-4 Chlorobenzene-d5 249000 11.865 3855-82-1 1,4-Dichlorobenzene-d4 107000 13.794

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 OC limits

D = Dilution

() = Laboratory InHouse Limit

A = Aldol-Condensation Reaction Products



Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: TB-01-081324 SDG No.: P3596

Lab Sample ID: P3596-03 Matrix: Water

Analytical Method: SW8260 % Solid: 0

Sample Wt/Vol: 5 Units: mL Final Vol: 5000 uL

Soil Aliquot Vol: uL Test: VOCMS Group6

GC Column: RXI-624 ID: 0.25 Level: LOW

Prep Method:

File ID/Qc Batch: Dilution: Prep Date Date Analyzed Prep Batch ID

VN083307.D 1 08/14/24 17:41 VN081424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
75-71-8	Dichlorodifluoromethane	0.21	U	0.21	1.00	ug/L
74-87-3	Chloromethane	0.35	U	0.35	1.00	ug/L
75-01-4	Vinyl Chloride	0.34	U	0.34	1.00	ug/L
74-83-9	Bromomethane	1.40	U	1.40	5.00	ug/L
75-00-3	Chloroethane	0.56	U	0.56	1.00	ug/L
76-13-1	1,1,2-Trichlorotrifluoroethane	0.25	U	0.25	1.00	ug/L
75-35-4	1,1-Dichloroethene	0.26	U	0.26	1.00	ug/L
67-64-1	Acetone	2.10	J	1.40	5.00	ug/L
75-15-0	Carbon Disulfide	0.32	U	0.32	1.00	ug/L
1634-04-4	Methyl tert-butyl Ether	0.16	U	0.16	1.00	ug/L
75-09-2	Methylene Chloride	0.32	U	0.32	1.00	ug/L
156-60-5	trans-1,2-Dichloroethene	0.25	U	0.25	1.00	ug/L
75-34-3	1,1-Dichloroethane	0.23	U	0.23	1.00	ug/L
110-82-7	Cyclohexane	1.60	U	1.60	5.00	ug/L
78-93-3	2-Butanone	1.30	U	1.30	5.00	ug/L
56-23-5	Carbon Tetrachloride	0.25	U	0.25	1.00	ug/L
156-59-2	cis-1,2-Dichloroethene	0.25	U	0.25	1.00	ug/L
67-66-3	Chloroform	0.26	U	0.26	1.00	ug/L
71-55-6	1,1,1-Trichloroethane	0.19	U	0.19	1.00	ug/L
108-87-2	Methylcyclohexane	0.19	U	0.19	1.00	ug/L
71-43-2	Benzene	0.16	U	0.16	1.00	ug/L
107-06-2	1,2-Dichloroethane	0.24	U	0.24	1.00	ug/L
79-01-6	Trichloroethene	0.32	U	0.32	1.00	ug/L
75-27-4	Bromodichloromethane	0.24	U	0.24	1.00	ug/L
108-88-3	Toluene	0.18	U	0.18	1.00	ug/L
79-00-5	1,1,2-Trichloroethane	0.21	U	0.21	1.00	ug/L
124-48-1	Dibromochloromethane	0.18	U	0.18	1.00	ug/L
127-18-4	Tetrachloroethene	0.25	U	0.25	1.00	ug/L
108-90-7	Chlorobenzene	0.13	U	0.13	1.00	ug/L
100-41-4	Ethyl Benzene	0.16	U	0.16	1.00	ug/L



Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24 Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

P3596 Client Sample ID: TB-01-081324 SDG No.:

Lab Sample ID: P3596-03 Matrix: Water

Analytical Method: SW8260 % Solid:

Final Vol: Sample Wt/Vol: 5 Units: mL5000 uL Test: VOCMS Group6

ID: 0.25 LOW GC Column: RXI-624 Level:

uL

Prep Method:

Soil Aliquot Vol:

File ID/Qc Batch: Dilution: Prep Date Date Analyzed Prep Batch ID VN083307.D 1 08/14/24 17:41 VN081424

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
179601-23-1	m/p-Xylenes	0.31	U	0.31	2.00	ug/L
1330-20-7	Total Xylenes	0.45	U	0.45	3.00	ug/L
95-47-6	o-Xylene	0.14	U	0.14	1.00	ug/L
98-82-8	Isopropylbenzene	0.13	U	0.13	1.00	ug/L
106-46-7	1,4-Dichlorobenzene	0.27	U	0.27	1.00	ug/L
95-50-1	1,2-Dichlorobenzene	0.19	U	0.19	1.00	ug/L
SURROGATES						
17060-07-0	1,2-Dichloroethane-d4	57.1		70 (74) - 130 (125)	114%	SPK: 50
1868-53-7	Dibromofluoromethane	53.8		70 (75) - 130 (124)	108%	SPK: 50
2037-26-5	Toluene-d8	53.6		70 (86) - 130 (113)	107%	SPK: 50
460-00-4	4-Bromofluorobenzene	56.3		70 (77) - 130 (121)	113%	SPK: 50
INTERNAL STAI	NDARDS					
363-72-4	Pentafluorobenzene	129000	8.23			
540-36-3	1,4-Difluorobenzene	250000	9.1			
3114-55-4	Chlorobenzene-d5	255000	11.865			
3855-82-1	1,4-Dichlorobenzene-d4	110000	13.794			

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



LAB CHRONICLE

P3596 OrderID:

JACOBS Engineering Group, Inc.

Client:

Mary I. Murphy Contact:

8/13/2024 1:10:00 PM OrderDate:

Former Schlumberger Site Princeton NJ Project:

Location: D21,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P3596-01	918-J-WS-081324	Water			08/13/24			08/13/24
			VOCMS Group6	8260-Low			08/14/24	
P3596-02	918-J-WS-081324-FD	Water			08/13/24			08/13/24
			VOCMS Group6	8260-Low			08/14/24	
P3596-03	TB-01-081324	Water			08/13/24			08/13/24
			VOCMS Group6	8260-Low			08/14/24	

P3596 26 of 59 Revised





Hit Summary Sheet SW-846

SDG No.: P3596

Client: JACOBS Engineering Group, Inc.

Sample ID	Client ID		Parameter	Concentration	\mathbf{C}	MDL	RDL	Units
Client ID:	918-J-WS-081324							
P3596-01	918-J-WS-081324	WATER	Fluorene	0.110		0.02	0.1	ug/L
P3596-01	918-J-WS-081324	WATER	Phenanthrene	0.050	J	0.02	0.1	ug/L
P3596-01	918-J-WS-081324	WATER	Anthracene	0.030	J	0.02	0.1	ug/L
P3596-01	918-J-WS-081324	WATER	Fluoranthene	0.080	J	0.02	0.1	ug/L
P3596-01	918-J-WS-081324	WATER	Pyrene	0.050	J	0.02	0.1	ug/L
P3596-01	918-J-WS-081324	WATER	Benzo(a)anthracene	0.030	J	0.02	0.1	ug/L
P3596-01	918-J-WS-081324	WATER	Chrysene	0.040	J	0.03	0.1	ug/L
P3596-01	918-J-WS-081324	WATER	Benzo(b)fluoranthene	0.040	J	0.03	0.1	ug/L
			Total Svoc:		0.	43		
			Total Concentration:		0	.43		
Client ID :	918-J-WS-081324-FD							
P3596-02	918-J-WS-081324-FD	WATER	Fluorene	0.040	J	0.02	0.11	ug/L
P3596-02	918-J-WS-081324-FD	WATER	Phenanthrene	0.040	J	0.02	0.11	ug/L
P3596-02	918-J-WS-081324-FD	WATER	Fluoranthene	0.060	J	0.02	0.11	ug/L
P3596-02	918-J-WS-081324-FD	WATER	Pyrene	0.040	J	0.02	0.11	ug/L
P3596-02	918-J-WS-081324-FD	WATER	Chrysene	0.030	J	0.03	0.11	ug/L
P3596-02	918-J-WS-081324-FD	WATER	Benzo(b)fluoranthene	0.030	J	0.03	0.11	ug/L
			Total Svoc:		0.	24		
			Total Concentration:		0	.24		











SAMPLE DATA

Test:





Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24 Date Received: Project: Former Schlumberger Site Princeton NJ 08/13/24

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Lab Sample ID: P3596-01 Matrix: Water SW8270SIM % Solid: 0 Analytical Method:

uL

Sample Wt/Vol: 990 Units: mL Final Vol: 1000 uL

SVOCMS Group3 Soil Aliquot Vol: Level: Extraction Type: Decanted: N LOW

Injection Volume: GPC Factor: GPC Cleanup: Ν PH:

SW3510C Prep Method:

File ID/Qc Batch: Dilution: Prep Date Prep Batch ID Date Analyzed 1 BN033458.D 08/14/24 08:45 08/17/24 08:27 PB162723

BN033438.D	I	08/14/24 0	18:45	08/1//24 08:2/	PB102/23	
CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
91-20-3	Naphthalene	0.020	U	0.020	0.10	ug/L
91-57-6	2-Methylnaphthalene	0.030	U	0.030	0.10	ug/L
208-96-8	Acenaphthylene	0.020	U	0.020	0.10	ug/L
83-32-9	Acenaphthene	0.020	U	0.020	0.10	ug/L
86-73-7	Fluorene	0.11		0.020	0.10	ug/L
85-01-8	Phenanthrene	0.050	J	0.020	0.10	ug/L
120-12-7	Anthracene	0.030	J	0.020	0.10	ug/L
206-44-0	Fluoranthene	0.080	J	0.020	0.10	ug/L
129-00-0	Pyrene	0.050	J	0.020	0.10	ug/L
56-55-3	Benzo(a)anthracene	0.030	J	0.020	0.10	ug/L
218-01-9	Chrysene	0.040	J	0.030	0.10	ug/L
205-99-2	Benzo(b)fluoranthene	0.040	J	0.030	0.10	ug/L
207-08-9	Benzo(k)fluoranthene	0.030	U	0.030	0.10	ug/L
50-32-8	Benzo(a)pyrene	0.060	U	0.060	0.10	ug/L
193-39-5	Indeno(1,2,3-cd)pyrene	0.040	U	0.040	0.10	ug/L
53-70-3	Dibenzo(a,h)anthracene	0.040	U	0.040	0.10	ug/L
191-24-2	Benzo(g,h,i)perylene	0.040	U	0.040	0.10	ug/L
123-91-1	1,4-Dioxane	0.070	U	0.070	0.20	ug/L
SURROGATES						
7297-45-2	2-Methylnaphthalene-d10	0.29		30 (20) - 150 (139)	74%	SPK: 0.4
93951-69-0	Fluoranthene-d10	0.40		30 (30) - 150 (150)	100%	SPK: 0.4
4165-60-0	Nitrobenzene-d5	0.36		30 (27) - 130 (123)	90%	SPK: 0.4
321-60-8	2-Fluorobiphenyl	0.35		30 (34) - 130 (132)	88%	SPK: 0.4
1718-51-0	Terphenyl-d14	0.48		30 (35) - 130 (157)	120%	SPK: 0.4
INTERNAL STA						
3855-82-1	1,4-Dichlorobenzene-d4	7350	7.559			
1146-65-2	Naphthalene-d8	20100	10.325			
15067-26-2	Acenaphthene-d10	10100	14.199			
1517-22-2	Phenanthrene-d10	21200	16.942			
2506			20 of 50			ı



Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Lab Sample ID: P3596-01 Matrix: Water
Analytical Method: SW8270SIM % Solid: 0

Sample Wt/Vol: 990 Units: mL Final Vol: 1000 uL

Soil Aliquot Vol: uL Test: SVOCMS Group3

Extraction Type: Decanted: N Level: LOW

Injection Volume: GPC Factor: 1.0 GPC Cleanup: N PH:

Prep Method: SW3510C

 File ID/Qc Batch:
 Dilution:
 Prep Date
 Date Analyzed
 Prep Batch ID

 BN033458.D
 1
 08/14/24 08:45
 08/17/24 08:27
 PB162723

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
1719-03-5	Chrysene-d12	18500	21.148			
1520-96-3	Pervlene-d12	19500	23 323			

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

Test:





Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24 Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596

Lab Sample ID: P3596-02 Matrix: Water % Solid: 0 Analytical Method: SW8270SIM

uL

Sample Wt/Vol: 950 Units: Final Vol: 1000 uL mL

SVOCMS Group3 Soil Aliquot Vol: Level: Extraction Type: Decanted: N LOW

Injection Volume: GPC Factor: GPC Cleanup: PH:

SW3510C Prep Method:

Dilution: File ID/Qc Batch: Prep Date Date Analyzed Prep Batch ID RN033450 D 08/14/24 08:45 08/17/24 00:04 PR162723

BN033459.D	1	08/14/24 0	08:45	08/17/24 09:04	PB162723	
CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
91-20-3	Naphthalene	0.030	U	0.030	0.11	ug/L
91-57-6	2-Methylnaphthalene	0.030	U	0.030	0.11	ug/L
208-96-8	Acenaphthylene	0.020	U	0.020	0.11	ug/L
83-32-9	Acenaphthene	0.020	U	0.020	0.11	ug/L
86-73-7	Fluorene	0.040	J	0.020	0.11	ug/L
85-01-8	Phenanthrene	0.040	J	0.020	0.11	ug/L
120-12-7	Anthracene	0.030	U	0.030	0.11	ug/L
206-44-0	Fluoranthene	0.060	J	0.020	0.11	ug/L
129-00-0	Pyrene	0.040	J	0.020	0.11	ug/L
56-55-3	Benzo(a)anthracene	0.020	U	0.020	0.11	ug/L
218-01-9	Chrysene	0.030	J	0.030	0.11	ug/L
205-99-2	Benzo(b)fluoranthene	0.030	J	0.030	0.11	ug/L
207-08-9	Benzo(k)fluoranthene	0.040	U	0.040	0.11	ug/L
50-32-8	Benzo(a)pyrene	0.060	U	0.060	0.11	ug/L
193-39-5	Indeno(1,2,3-cd)pyrene	0.040	U	0.040	0.11	ug/L
53-70-3	Dibenzo(a,h)anthracene	0.040	U	0.040	0.11	ug/L
191-24-2	Benzo(g,h,i)perylene	0.040	U	0.040	0.11	ug/L
123-91-1	1,4-Dioxane	0.070	U	0.070	0.21	ug/L
SURROGATES						
7297-45-2	2-Methylnaphthalene-d10	0.28		30 (20) - 150 (139)	71%	SPK: 0.4
93951-69-0	Fluoranthene-d10	0.40		30 (30) - 150 (150)	99%	SPK: 0.4
4165-60-0	Nitrobenzene-d5	0.34		30 (27) - 130 (123)	85%	SPK: 0.4
321-60-8	2-Fluorobiphenyl	0.32		30 (34) - 130 (132)	79%	SPK: 0.4
1718-51-0	Terphenyl-d14	0.49		30 (35) - 130 (157)	122%	SPK: 0.4
INTERNAL STA	ANDARDS					
3855-82-1	1,4-Dichlorobenzene-d4	6780	7.559			
1146-65-2	Naphthalene-d8	18500	10.325			
15067-26-2	Acenaphthene-d10	9150	14.199			
1517-22-2	Phenanthrene-d10	18700	16.942			
20500			04 - 6 50			_



Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596

Lab Sample ID: P3596-02 Matrix: Water
Analytical Method: SW8270SIM % Solid: 0

Sample Wt/Vol: 950 Units: mL Final Vol: 1000 uL

Soil Aliquot Vol: uL Test: SVOCMS Group3

Extraction Type: Decanted: N Level: LOW

Injection Volume: GPC Factor: 1.0 GPC Cleanup: N PH:

Prep Method: SW3510C

 File ID/Qc Batch:
 Dilution:
 Prep Date
 Date Analyzed
 Prep Batch ID

 BN033459.D
 1
 08/14/24 08:45
 08/17/24 09:04
 PB162723

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
1719-03-5	Chrysene-d12	15900	21.148			
1520-96-3	Pervlene-d12	16800	23 32			

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



LAB CHRONICLE

OrderID: P3596

Client: JACOBS Engineering Group, Inc.

Contact: Mary I. Murphy

OrderDate: 8/13/2024 1:10:00 PM

Project: Former Schlumberger Site Princeton NJ

Location: D21,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P3596-01	918-J-WS-081324	Water			08/13/24			08/13/24
			SVOCMS Group3	8270-Modifie d		08/14/24	08/17/24	
P3596-02	918-J-WS-081324-F	Water		-	08/13/24			08/13/24
	D		SVOCMS Group3	8270-Modifie d		08/14/24	08/17/24	

P3596 Revised

A

В

C





Hit Summary Sheet SW-846

SDG No.: P3596

Client: JACOBS Engineering Group, Inc.

Sample ID Client ID Matrix Parameter Concentration C MDL RDL Units

Client ID:

0.000

Total Svoc: 0.00
Total Concentration: 0.00







В



SAMPLE DATA



Client:

Project:

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

Date Received:

08/13/24

Report of Analysis

JACOBS Engineering Group, Inc.

Date Collected: 08/13/24

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Lab Sample ID: P3596-01 Matrix: Water

Analytical Method: SW8270 % Solid: 0

Former Schlumberger Site Princeton NJ

 $Sample \ Wt/Vol: \qquad 970 \qquad Units: \quad mL \qquad \qquad Final \ Vol: \qquad 1000 \qquad uL$

Soil Aliquot Vol: uL Test: SVOCMS Group6

Extraction Type: Decanted: N Level: LOW

Injection Volume : GPC Factor : 1.0 GPC Cleanup : N PH :

Prep Method: SW3510C

 File ID/Qc Batch:
 Dilution:
 Prep Date
 Date Analyzed
 Prep Batch ID

 BM047300.D
 1
 08/14/24 08:25
 08/21/24 16:26
 PB162722

DIVIO47500.D	1	06/14/24 06.23		00/21/24 10.20	1 D102/22	
CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
110-86-1	Pyridine	1.60	U	1.60	5.20	ug/L
100-52-7	Benzaldehyde	4.10	U	4.10	10.3	ug/L
95-48-7	2-Methylphenol	1.20	U	1.20	5.20	ug/L
65794-96-9	3+4-Methylphenols	1.20	U	1.20	10.3	ug/L
67-72-1	Hexachloroethane	1.00	U	1.00	5.20	ug/L
98-95-3	Nitrobenzene	1.30	U	1.30	5.20	ug/L
91-20-3	Naphthalene	1.10	U	1.10	5.20	ug/L
87-68-3	Hexachlorobutadiene	1.30	U	1.30	5.20	ug/L
91-57-6	2-Methylnaphthalene	1.20	U	1.20	5.20	ug/L
88-06-2	2,4,6-Trichlorophenol	0.92	U	0.92	5.20	ug/L
95-95-4	2,4,5-Trichlorophenol	1.00	U	1.00	5.20	ug/L
208-96-8	Acenaphthylene	1.10	U	1.10	5.20	ug/L
83-32-9	Acenaphthene	0.84	U	0.84	5.20	ug/L
132-64-9	Dibenzofuran	0.96	U	0.96	5.20	ug/L
121-14-2	2,4-Dinitrotoluene	1.60	U	1.60	5.20	ug/L
86-73-7	Fluorene	0.99	U	0.99	5.20	ug/L
118-74-1	Hexachlorobenzene	1.20	U	1.20	5.20	ug/L
87-86-5	Pentachlorophenol	1.90	U	1.90	10.3	ug/L
85-01-8	Phenanthrene	0.92	U	0.92	5.20	ug/L
120-12-7	Anthracene	1.10	U	1.10	5.20	ug/L
86-74-8	Carbazole	1.20	U	1.20	5.20	ug/L
84-74-2	Di-n-butylphthalate	1.50	U	1.50	5.20	ug/L
206-44-0	Fluoranthene	1.30	U	1.30	5.20	ug/L
129-00-0	Pyrene	1.10	U	1.10	5.20	ug/L
56-55-3	Benzo(a)anthracene	0.97	U	0.97	5.20	ug/L
218-01-9	Chrysene	0.89	U	0.89	5.20	ug/L
117-81-7	Bis(2-ethylhexyl)phthalate	1.90	U	1.90	5.20	ug/L
205-99-2	Benzo(b)fluoranthene	1.20	U	1.20	5.20	ug/L
207-08-9	Benzo(k)fluoranthene	1.20	U	1.20	5.20	ug/L

08/13/24



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

Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected:

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Lab Sample ID: P3596-01 Matrix: Water

Analytical Method: SW8270 % Solid: 0

Sample Wt/Vol: 970 Units: mL Final Vol: 1000 uL

Soil Aliquot Vol: uL Test: SVOCMS Group6

Extraction Type: Decanted: N Level: LOW

Injection Volume : GPC Factor : 1.0 GPC Cleanup : N PH :

Prep Method: SW3510C

 File ID/Qc Batch:
 Dilution:
 Prep Date
 Date Analyzed
 Prep Batch ID

 BM047300.D
 1
 08/14/24 08:25
 08/21/24 16:26
 PB162722

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
50-32-8	Benzo(a)pyrene	1.70	U	1.70	5.20	ug/L
193-39-5	Indeno(1,2,3-cd)pyrene	1.10	U	1.10	5.20	ug/L
53-70-3	Dibenzo(a,h)anthracene	1.20	U	1.20	5.20	ug/L
191-24-2	Benzo(g,h,i)perylene	1.20	U	1.20	5.20	ug/L
123-91-1	1,4-Dioxane	1.30	U	1.30	5.20	ug/L
90-12-0	1-Methylnaphthalene	0.89	U	0.89	5.20	ug/L
SURROGATES						
367-12-4	2-Fluorophenol	54.5		15 (10) - 110 (139)	36%	SPK: 150
13127-88-3	Phenol-d6	31.8		15 (10) - 110 (134)	21%	SPK: 150
4165-60-0	Nitrobenzene-d5	75.7		30 (49) - 130 (133)	76%	SPK: 100
321-60-8	2-Fluorobiphenyl	78.3		30 (52) - 130 (132)	78%	SPK: 100
118-79-6	2,4,6-Tribromophenol	164		15 (44) - 110 (137)	110%	SPK: 150
1718-51-0	Terphenyl-d14	102		30 (48) - 130 (125)	102%	SPK: 100
INTERNAL STA	ANDARDS					
3855-82-1	1,4-Dichlorobenzene-d4	184000	7.351			
1146-65-2	Naphthalene-d8	678000	10.11			
15067-26-2	Acenaphthene-d10	451000	14.01			
1517-22-2	Phenanthrene-d10	1020000	16.78			
1719-03-5	Chrysene-d12	1110000	21.021			
1520-96-3	Perylene-d12	1130000	23.709			

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



Lab Sample ID:

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

Matrix:

Water

Report of Analysis

. . .

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596

Analytical Method: SW8270 % Solid: 0

Sample Wt/Vol: 960 Units: mL Final Vol: 1000 uL

Soil Aliquot Vol: uL Test: SVOCMS Group6

Extraction Type: Decanted: N Level: LOW

Injection Volume : GPC Factor : 1.0 GPC Cleanup : N PH :

Prep Method: SW3510C

P3596-02

 File ID/Qc Batch:
 Dilution:
 Prep Date
 Date Analyzed
 Prep Batch ID

 BM047298.D
 1
 08/14/24 08:25
 08/21/24 15:06
 PB162722

DW047276.D				00/21/24 13:00 1 1 102/22		
CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
TARGETS						
110-86-1	Pyridine	1.60	U	1.60	5.20	ug/L
100-52-7	Benzaldehyde	4.20	U	4.20	10.4	ug/L
95-48-7	2-Methylphenol	1.20	U	1.20	5.20	ug/L
65794-96-9	3+4-Methylphenols	1.20	U	1.20	10.4	ug/L
67-72-1	Hexachloroethane	1.10	U	1.10	5.20	ug/L
98-95-3	Nitrobenzene	1.30	U	1.30	5.20	ug/L
91-20-3	Naphthalene	1.10	U	1.10	5.20	ug/L
87-68-3	Hexachlorobutadiene	1.30	U	1.30	5.20	ug/L
91-57-6	2-Methylnaphthalene	1.20	U	1.20	5.20	ug/L
88-06-2	2,4,6-Trichlorophenol	0.93	U	0.93	5.20	ug/L
95-95-4	2,4,5-Trichlorophenol	1.10	U	1.10	5.20	ug/L
208-96-8	Acenaphthylene	1.10	U	1.10	5.20	ug/L
83-32-9	Acenaphthene	0.84	U	0.84	5.20	ug/L
132-64-9	Dibenzofuran	0.97	U	0.97	5.20	ug/L
121-14-2	2,4-Dinitrotoluene	1.60	U	1.60	5.20	ug/L
86-73-7	Fluorene	1.00	U	1.00	5.20	ug/L
118-74-1	Hexachlorobenzene	1.20	U	1.20	5.20	ug/L
87-86-5	Pentachlorophenol	1.90	U	1.90	10.4	ug/L
85-01-8	Phenanthrene	0.93	U	0.93	5.20	ug/L
120-12-7	Anthracene	1.10	U	1.10	5.20	ug/L
86-74-8	Carbazole	1.20	U	1.20	5.20	ug/L
84-74-2	Di-n-butylphthalate	1.50	U	1.50	5.20	ug/L
206-44-0	Fluoranthene	1.30	U	1.30	5.20	ug/L
129-00-0	Pyrene	1.10	U	1.10	5.20	ug/L
56-55-3	Benzo(a)anthracene	0.98	U	0.98	5.20	ug/L
218-01-9	Chrysene	0.90	U	0.90	5.20	ug/L
117-81-7	Bis(2-ethylhexyl)phthalate	2.00	U	2.00	5.20	ug/L
205-99-2	Benzo(b)fluoranthene	1.20	U	1.20	5.20	ug/L
207-08-9	Benzo(k)fluoranthene	1.20	U	1.20	5.20	ug/L



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Report of Analysis

Client: JACOBS Engineering Group, Inc.

Units:

mL

Date Collected: 08/13/24

Final Vol:

08/13/24

1000

uL

Project: Former Schlumberger Site Princeton NJ Date Received:

Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596

Lab Sample ID: P3596-02 Matrix: Water

Analytical Method: SW8270 % Solid: 0

Soil Aliquot Vol: uL Test: SVOCMS Group6

Extraction Type: Decanted: N Level: LOW

Injection Volume: GPC Factor: 1.0 GPC Cleanup: N PH:

Prep Method: SW3510C

960

Sample Wt/Vol:

 File ID/Qc Batch:
 Dilution:
 Prep Date
 Date Analyzed
 Prep Batch ID

 BM047298.D
 1
 08/14/24 08:25
 08/21/24 15:06
 PB162722

CAS Number	Parameter	Conc.	Qualifier	MDL	LOQ / CRQL	Units
50-32-8	Benzo(a)pyrene	1.70	U	1.70	5.20	ug/L
193-39-5	Indeno(1,2,3-cd)pyrene	1.10	U	1.10	5.20	ug/L
53-70-3	Dibenzo(a,h)anthracene	1.20	U	1.20	5.20	ug/L
191-24-2	Benzo(g,h,i)perylene	1.20	U	1.20	5.20	ug/L
123-91-1	1,4-Dioxane	1.30	U	1.30	5.20	ug/L
90-12-0	1-Methylnaphthalene	0.90	U	0.90	5.20	ug/L
SURROGATES						
367-12-4	2-Fluorophenol	54.0		15 (10) - 110 (139)	36%	SPK: 150
13127-88-3	Phenol-d6	32.9		15 (10) - 110 (134)	22%	SPK: 150
4165-60-0	Nitrobenzene-d5	72.3		30 (49) - 130 (133)	72%	SPK: 100
321-60-8	2-Fluorobiphenyl	77.4		30 (52) - 130 (132)	77%	SPK: 100
118-79-6	2,4,6-Tribromophenol	171	*	15 (44) - 110 (137)	114%	SPK: 150
1718-51-0	Terphenyl-d14	102		30 (48) - 130 (125)	102%	SPK: 100
INTERNAL STA	ANDARDS					
3855-82-1	1,4-Dichlorobenzene-d4	190000	7.352			
1146-65-2	Naphthalene-d8	707000	10.11			
15067-26-2	Acenaphthene-d10	486000	14.016			
1517-22-2	Phenanthrene-d10	1100000	16.78			
1719-03-5	Chrysene-d12	1200000	21.021			
1520-96-3	Perylene-d12	1270000	23.715			

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



LAB CHRONICLE

OrderID: P3596

Client: JACOBS Engineering Group, Inc.

Contact: Mary I. Murphy

OrderDate: 8/13/2024 1:10:00 PM

Project: Former Schlumberger Site Princeton NJ

Location: D21,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P3596-01	918-J-WS-081324	Water			08/13/24			08/13/24
			SVOCMS Group3	8270-Modified		08/14/24	08/17/24	
			SVOCMS Group6	8270E		08/14/24	08/21/24	
P3596-02	918-J-WS-081324-FD	Water			08/13/24			08/13/24
			SVOCMS Group3	8270-Modified		08/14/24	08/17/24	
			SVOCMS Group6	8270E		08/14/24	08/21/24	

P3596 **40 of 59** Revised





P3596

SDG No.:

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

Fax: 908 789 8922

Hit Summary Sheet SW-846



Client:	JACOBS Engineering Group	o, Inc.		Project ID):	Former Schlumberger Site Princeton NJ		
Sample ID	Client ID	Matrix	Parameter	Concentration	C	MDL	RDL	Units
Client ID:	918-J-WS-081324							
P3596-01	918-J-WS-081324	Water	Dissolved Silica	5030		64.0	428	ug/L
Client ID:	918-J-WS-081324-FD							
P3596-02	918-J-WS-081324-FD	Water	Dissolved Silica	5240		64.0	428	ug/L













SAMPLE DATA

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

Fax: 908 789 8922

Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24 Project: Date Received: Former Schlumberger Site Princeton NJ 08/13/24 Client Sample ID: 918-J-WS-081324 SDG No.: P3596 Lab Sample ID: P3596-01 Matrix: Water Level (low/med): % Solid: low

Cas	Parameter	Conc.	Qua. DF	MDL	LOQ / CRQL	Units	Prep Date	Date Ana.	Ana Met.	Prep Met.
Dissolved	Dissolved	5030	1	64.0	428	ug/L	10/24/24 11:45	10/24/24 22:07	EPA 200.7	
Silica	Silica									

Color Before: Colorless Clarity Before:

Clear Clear Texture:

Color After:

Colorless

Clarity After:

Artifacts:

Comments:

Metals Group5

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

D = Dilution

Q = indicates LCS control criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

* = indicates the duplicate analysis is not within control limits.

E = Indicates the reported value is estimated because of the presence

of interference.

OR = Over Range

N =Spiked sample recovery not within control limits

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

Fax: 908 789 8922

Report of Analysis



Cas	Parameter	Conc.	Qua. DF MD	L LOQ / CRQL	Units	Prep Date	Date Ana.	Ana Met.	Prep Met.
Dissolved	Dissolved	5240	1 64.0	428	ug/L	10/24/24 11:45	10/24/24 22:11	EPA 200.7	
Silica	Silica								

Color Before: Colorless

Clarity Before:

Clear

Texture:

Color After: Colorless

Clarity After:

Clear

Artifacts:

Comments:

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

D = Dilution

Q = indicates LCS control criteria did not meet requirements

Metals Group5

J = Estimated Value

B = Analyte Found in Associated Method Blank

* = indicates the duplicate analysis is not within control limits.

E = Indicates the reported value is estimated because of the presence

of interference.

OR = Over Range

N =Spiked sample recovery not within control limits



LAB CHRONICLE

OrderID: P3596

Client: JACOBS Engineering Group, Inc.

Contact: Mary I. Murphy

OrderDate: 8/13/2024 1:10:00 PM

Project: Former Schlumberger Site Princeton NJ

Location: D21,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P3596-01	918-J-WS-081324	Water			08/13/24			08/13/24
			Mercury	7470A		08/18/24	08/19/24	
			Metals Group4	6020B		09/04/24	09/04/24	
			Metals Group5	200.7		10/24/24	10/24/24	
P3596-02	918-J-WS-081324-FD	Water			08/13/24			08/13/24
			Mercury	7470A		08/18/24	08/19/24	
			Metals Group4	6020B		09/04/24	09/04/24	
			Metals Group5	200.7		10/24/24	10/24/24	

P3596 **45 of 59** Revised

A

В

C



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

Fax: 908 789 8922

Hit Summary Sheet SW-846

SDG No.: P3596 **Order ID:** P3596

Client: JACOBS Engineering Group, Inc. Project ID: Former Schlumberger Site Princeton NJ

Client:	JACOBS Engineering Group	p, Inc.		Project ID) :	Former Schlumbe	rger Site Princetor	n NJ
Sample ID	Client ID	Matrix	Parameter	Concentration	C	MDL	RDL	Units
Client ID:	918-J-WS-081324							
P3596-01	918-J-WS-081324	Water	Aluminum	108		1.98	20.0	ug/L
P3596-01	918-J-WS-081324	Water	Antimony	0.34	J	0.11	2.00	ug/L
P3596-01	918-J-WS-081324	Water	Arsenic	2.21		0.090	1.00	ug/L
P3596-01	918-J-WS-081324	Water	Barium	58.1		0.30	10.0	ug/L
P3596-01	918-J-WS-081324	Water	Calcium	19000		62.5	500	ug/L
P3596-01	918-J-WS-081324	Water	Chromium	2.24		0.40	2.00	ug/L
P3596-01	918-J-WS-081324	Water	Cobalt	0.72	J	0.062	1.00	ug/L
P3596-01	918-J-WS-081324	Water	Copper	78.5		0.40	2.00	ug/L
P3596-01	918-J-WS-081324	Water	Iron	3570		9.60	50.0	ug/L
P3596-01	918-J-WS-081324	Water	Lead	1.81		0.11	1.00	ug/L
P3596-01	918-J-WS-081324	Water	Magnesium	3420		26.6	500	ug/L
P3596-01	918-J-WS-081324	Water	Manganese	510		0.24	1.00	ug/L
P3596-01	918-J-WS-081324	Water	Nickel	14.0		0.18	1.00	ug/L
P3596-01	918-J-WS-081324	Water	Potassium	2760		46.1	500	ug/L
P3596-01	918-J-WS-081324	Water	Sodium	68100		85.8	500	ug/L
P3596-01	918-J-WS-081324	Water	Vanadium	1.06	J	0.072	5.00	ug/L
P3596-01	918-J-WS-081324	Water	Zinc	28.7		0.56	5.00	ug/L
Client ID:	918-J-WS-081324-FD							
P3596-02	918-J-WS-081324-FD	Water	Aluminum	88.2		1.98	20.0	ug/L
P3596-02	918-J-WS-081324-FD	Water	Antimony	0.23	J	0.11	2.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Arsenic	1.74		0.090	1.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Barium	57.6		0.30	10.0	ug/L
P3596-02	918-J-WS-081324-FD	Water	Calcium	19100		62.5	500	ug/L
P3596-02	918-J-WS-081324-FD	Water	Chromium	1.21	J	0.40	2.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Cobalt	0.74	J	0.062	1.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Copper	3.59		0.40	2.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Iron	3340		9.60	50.0	ug/L
P3596-02	918-J-WS-081324-FD	Water	Lead	1.75		0.11	1.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Magnesium	3440		26.6	500	ug/L
P3596-02	918-J-WS-081324-FD	Water	Manganese	511		0.24	1.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Nickel	1.28		0.18	1.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Potassium	2770		46.1	500	ug/L
P3596-02	918-J-WS-081324-FD	Water	Sodium	68300		85.8	500	ug/L
P3596-02	918-J-WS-081324-FD	Water	Vanadium	0.98	J	0.072	5.00	ug/L
P3596-02	918-J-WS-081324-FD	Water	Zinc	36.8		0.56	5.00	ug/L



 $284 \; Sheffield \; Street, \; Mountainside, \; New \; Jersey \; 07092, \; Phone: \; 908 \; 789 \; 8900, \\$

Fax: 908 789 8922

Hit Summary Sheet SW-846

SDG No.: P3596 **Order ID:** P3596

Client: JACOBS Engineering Group, Inc. Project ID: Former Schlumberger Site Princeton NJ

Sample ID Client ID Matrix Parameter Concentration C MDL RDL Units

9

В











SAMPLE DATA



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

Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Lab Sample ID: P3596-01 Matrix: Water

Level (low/med): low % Solid: 0

Cas	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Prep Date	Date Ana.	Ana Met.	Prep Met.
7429-90-5	Aluminum	108		1	1.98	20.0	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-36-0	Antimony	0.34	J	1	0.11	2.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-38-2	Arsenic	2.21	*	1	0.090	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-39-3	Barium	58.1		1	0.30	10.0	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-41-7	Beryllium	0.16	U	1	0.16	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-43-9	Cadmium	0.30	U	1	0.30	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-70-2	Calcium	19000		1	62.5	500	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-47-3	Chromium	2.24		1	0.40	2.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-48-4	Cobalt	0.72	J	1	0.062	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-50-8	Copper	78.5		1	0.40	2.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7439-89-6	Iron	3570		1	9.60	50.0	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7439-92-1	Lead	1.81		1	0.11	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7439-95-4	Magnesium	3420		1	26.6	500	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7439-96-5	Manganese	510		1	0.24	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7439-97-6	Mercury	0.081	U	1	0.081	0.20	ug/L	08/18/24 13:50	08/19/24 11:18	SW7470A	L
7440-02-0	Nickel	14.0		1	0.18	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-09-7	Potassium	2760		1	46.1	500	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7782-49-2	Selenium	1.38	U	1	1.38	5.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-22-4	Silver	0.077	UN	1	0.077	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-23-5	Sodium	68100		1	85.8	500	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-28-0	Thallium	0.085	U	1	0.085	1.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-62-2	Vanadium	1.06	J	1	0.072	5.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A
7440-66-6	Zinc	28.7		1	0.56	5.00	ug/L	09/04/24 12:30	09/04/24 15:20	SW6020	3010A

Color Before: Colorless Clarity Before: Clear Texture:

Color After: Colorless Clarity After: Clear Artifacts:

Comments: Mercury

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

D = Dilution

Q = indicates LCS control criteria did not meet requirements

J = Estimated Value

B = Analyte Found in Associated Method Blank

* = indicates the duplicate analysis is not within control limits.

E = Indicates the reported value is estimated because of the presence of interference.

OR = Over Range

N = Spiked sample recovery not within control limits



Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24 Project: Date Received: Former Schlumberger Site Princeton NJ 08/13/24 Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596 Lab Sample ID: P3596-02 Matrix: Water Level (low/med): % Solid: 0 low

Cas	Parameter	Conc.	Qua.	DF	MDL	LOQ / CRQL	Units	Prep Date	Date Ana.	Ana Met.	Prep Met.
7429-90-5	Aluminum	88.2		1	1.98	20.0	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-36-0	Antimony	0.23	J	1	0.11	2.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-38-2	Arsenic	1.74	*	1	0.090	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-39-3	Barium	57.6		1	0.30	10.0	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-41-7	Beryllium	0.16	U	1	0.16	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-43-9	Cadmium	0.30	U	1	0.30	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-70-2	Calcium	19100		1	62.5	500	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-47-3	Chromium	1.21	J	1	0.40	2.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-48-4	Cobalt	0.74	J	1	0.062	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-50-8	Copper	3.59		1	0.40	2.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7439-89-6	Iron	3340		1	9.60	50.0	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7439-92-1	Lead	1.75		1	0.11	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7439-95-4	Magnesium	3440		1	26.6	500	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7439-96-5	Manganese	511		1	0.24	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7439-97-6	Mercury	0.081	U	1	0.081	0.20	ug/L	08/18/24 13:50	08/19/24 11:20	SW7470A	<u>.</u>
7440-02-0	Nickel	1.28		1	0.18	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-09-7	Potassium	2770		1	46.1	500	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7782-49-2	Selenium	1.38	U	1	1.38	5.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-22-4	Silver	0.077	UN	1	0.077	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-23-5	Sodium	68300		1	85.8	500	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-28-0	Thallium	0.085	U	1	0.085	1.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-62-2	Vanadium	0.98	J	1	0.072	5.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A
7440-66-6	Zinc	36.8		1	0.56	5.00	ug/L	09/04/24 12:30	09/04/24 15:23	SW6020	3010A

Color Before: Colorless Clarity Before: Clear Texture:

Color After: Colorless Clarity After: Clear Artifacts:

Comments: Mercury

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B = Analyte Found in Associated Method Blank

* = indicates the duplicate analysis is not within control limits.

E = Indicates the reported value is estimated because of the presence of interference.

OR = Over Range

N = Spiked sample recovery not within control limits





LAB CHRONICLE

OrderID: P3596

Client: JACOBS Engineering Group, Inc.

Contact: Mary I. Murphy

OrderDate: 8/13/2024 1:10:00 PM

Project: Former Schlumberger Site Princeton NJ

Location: D21,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P3596-01	918-J-WS-081324	Water			08/13/24			08/13/24
			Mercury	7470A		08/18/24	08/19/24	
			Metals Group4	6020B		09/04/24	09/04/24	
P3596-02	918-J-WS-081324-FD	Water			08/13/24			08/13/24
			Mercury	7470A		08/18/24	08/19/24	
			Metals Group4	6020B		09/04/24	09/04/24	









SAMPLE DATA





Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24 11:15

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Client Sample ID: 918-J-WS-081324 SDG No.: P3596

Lab Sample ID: P3596-01 Matrix: WATER

% Solid: 0

Dissolved Hexavalent 0.0030 U 1 0.0030 0.010 mg/L 08/13/24 16:29 7196A	Parameter	Conc. Q	Qua.	DF MDL	LOQ / CRQL	Units	Prep Date	Date Ana.	Ana Met.
	Dissolved Hexavalent	0.0030 U	U	1 0.0030	0.010	mg/L		08/13/24 16:29	7196A

Comments:

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

D = Dilution

Q = indicates LCS control criteria did not meet requirements

H = Sample Analysis Out Of Hold Time

J = Estimated Value

B = Analyte Found in Associated Method Blank

* = indicates the duplicate analysis is not within control limits.

E = Indicates the reported value is estimated because of the presence of interference.

OR = Over Range

N =Spiked sample recovery not within control limits





Report of Analysis

Client: JACOBS Engineering Group, Inc. Date Collected: 08/13/24 11:20

Project: Former Schlumberger Site Princeton NJ Date Received: 08/13/24

Client Sample ID: 918-J-WS-081324-FD SDG No.: P3596

Lab Sample ID: P3596-02 Matrix: WATER

% Solid: 0

Parameter	Conc. Q	Qua.	DF MDL	LOQ / CRQL	Units	Prep Date	Date Ana. Ana Met.
Dissolved Hexavalent	0.0030	U	1 0.0030	0.010	mg/L		08/13/24 16:33 7196A
Chromium							

Comments:

U = Not Detected

LOQ = Limit of Quantitation

MDL = Method Detection Limit

LOD = Limit of Detection

D = Dilution

Q = indicates LCS control criteria did not meet requirements

H = Sample Analysis Out Of Hold Time

J = Estimated Value

B = Analyte Found in Associated Method Blank

* = indicates the duplicate analysis is not within control limits.

E = Indicates the reported value is estimated because of the presence of interference.

OR = Over Range

N =Spiked sample recovery not within control limits





LAB CHRONICLE

OrderID: P3596

P3596

Client: JACOBS Engineering Group, Inc.

Contact: Mary I. Murphy

OrderDate: 8/13/2024 1:10:00 PM

Project: Former Schlumberger Site Princeton NJ

Location: D21,VOA Ref. #3 Water

LabID	ClientID	Matrix	Test	Method	Sample Date	Prep Date	Anal Date	Received
P3596-01	918-J-WS-081324	WATER			08/13/24			08/13/24
					11:15			
			Hexavalent Chromium	7196A			08/13/24	
							16:29	
P3596-02	918-J-WS-081324-F	WATER			08/13/24			08/13/24
	D				11:20			
			Hexavalent Chromium	7196A			08/13/24	
							16:33	





SHIPPING DOCUMENTS



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

CHEMTECH PROJECT NO.

QUOTE NO.

P3594

COC Number 2041313

44

W= 1 × .	CLIENT INFORMATION	W P		CLIENT	PROJECT I	NFORM	ATION						CLIEN	IT BILL	ING INF	ORMATION	91
COMPANY:	Jacobs	PROJEC	CT NA	ME:	STC PT	7				BILLT	0: M	lary	Morp	shy		PO#:	
ADDRESS: 4	412 Mt Kemble Ave Suite #100	PROJECT NO.: D3779972 LOCATION: Prince ben Tracking								BILL TO: Mary Murphy PO#:							
CITY MOL	PROJECT MANAGER: Many Murphy							CITY					STAT	ΓE:	ZIP:		
	John Ynfants				hy@ In					ATTE	NTION:				PHC	NE:	
	Vehil 1-		-	1						1			1013	AN	ALYSIS		R. R. C. L.
	DATA TURNAROUND INFORMATION	PHONE:)936-6 TA DELIV	ERABLE II	AX:	ATION		711		141		1	ļ.	أسرا	والتعارا	
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CHEMTECH	DDQ IFEE		SAMP TYP		AMPLE LECTION	TES	1/		2/	-	SERVA	TIVES		ota i	Carrier II	_	MMENTS y Preservatives
SAMPLE ID	PROJECT SAMPLE IDENTIFICATION	SAMPLE MATRIX		DAT	T	# OF BOTTLES	A/E	E	B/E	E	5	6	7	8	9	A-HCI B-HN03 C-H2SO4	D-NaOH E-ICE F-OTHER
1.	918-J-WS-081324	WS	1	8-13	4 115	8	2	4	1	T							
2.	918-J-45-081324-FD	WS		X 8-13-1	1120	8	2	4	l	1							
3.	TB-01-081324	DI		X 8 13	4 1700	1											
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P3596 ⁰²³	WHITE - CHEMTER	CH COPY FOR	R RETUR		57 of	59- CHE	СНЕМТ итесн с		PINK -	SAMPLE		ld Samp	nng			U YES	□ NO Revi





CAS EPA CLP Contract Connecticut DOD ELAP (L-A-B) Maine Maryland New Hampshire New Jersey New York Pennsylvania Soil Permit Texas	License No.
CAS EPA CLP Contract	68HERH20D0011
Connecticut	PH-0830
DOD FLAP (L-A-B)	L2219
505 22 11 (2772)	
Maine	2024021
Maryland	296
New Hampshire	255423
New Jersev	20012
New York	11376
Pennsylvania	68-00548
Soil Permit	525-24-234-08441
Taylan	T104704488



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

Fax: 908 789 8922

LOGIN REPORT/SAMPLE TRANSFER

Order ID: P3596

JACO05

Order Date: 8/13/2024 1:10:00 PM

Project Mgr: Yazmeen

Client Name: JACOBS Engineering Grou

Project Name: Former Schlumberger Site I

Report Type: Level 4

Client Contact: Mary I. Murphy

Invoice Contact: Mary I. Murphy

Receive DateTime: 8/13/2024 12:00:00 AM

EDD Type: CH2MHILL

Invoice Name: JACOBS Engineering Grou

Purchase Order:

ำนง05

Hard Copy Date:

Date Signoff: 8/13/2024 3:37:47 PM

LAB ID	CLIENT ID	MATRIX SAMPLE DATE	SAMPLE TIME	TEST	TEST GROUP	METHOD	FA	X DATE	DUE DATES
P3596-01	918-J-WS-081324	Water 08/13/2024	11:15						
				VOCMS Group6		8260-Low	10 Bus. Days		
P3596-02	918-J-WS-081324-FD	Water 08/13/2024	11:20						
				VOCMS Group6		8260-Low	10 Bus. Days		
P3596-03	TB-01-081324	Water 08/13/2024	12:00						
				VOCMS Group6		8260-Low	10 Bus. Days		

Relinguished By:

Date / Time: 8 1312

Storage Area: VOA Refridgerator Room