



ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062

Tuesday, December 5, 2023

John Renda  
Anchor QEA, LLC  
6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

RE: A311089 - Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon - 000029-02.84 T-01.001E

Thank you for using Apex Laboratories. We greatly appreciate your business and strive to provide the highest quality services to the environmental industry.

Enclosed are the results of analyses for work order A311089, which was received by the laboratory on 9/14/2023 at 8:15:00AM.

If you have any questions concerning this report or the services we offer, please feel free to contact me by email at: [dthomas@apex-labs.com](mailto:dthomas@apex-labs.com), or by phone at 503-718-2323.

Please note: All samples will be disposed of within 30 days of sample receipt, unless prior arrangements have been made.

Cooler Receipt Information	
<u>Acceptable Receipt Temperature is less than, or equal to, 6 degC (not frozen), or received on ice the same day as sampling.</u>	
(See Cooler Receipt Form for details)	
Cooler#1    3.6    degC	Cooler#2    3.9    degC

This Final Report is the official version of the data results for this sample submission, unless superseded by a subsequent, labeled amended report.

All other deliverables derived from this data, including Electronic Data Deliverables (EDDs), CLP-like forms, client requested summary sheets, and all other products are considered secondary to this report.



Apex Laboratories

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Darwin Thomas, Business Development Director



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Portland, OR 97219

Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**

Project Number: **000029-02.84 T-01.001E**

Project Manager: **John Renda**

**Report ID:**

**A3I1089 - 12 05 23 0550**

## ANALYTICAL REPORT FOR SAMPLES

### SAMPLE INFORMATION

Client Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
GS-091323-15	A3I1089-01	WG	09/13/23 08:40	09/14/23 08:15
GS-091323-16	A3I1089-02	WG	09/13/23 10:10	09/14/23 08:15
GS-091323-17	A3I1089-03	WG	09/13/23 10:30	09/14/23 08:15
GS-091323-18	A3I1089-04	WG	09/13/23 10:40	09/14/23 08:15
GS-091323-19	A3I1089-05	WG	09/13/23 12:40	09/14/23 08:15
GS-091323-20	A3I1089-06	WG	09/13/23 15:05	09/14/23 08:15
TB-091323	A3I1089-07	W	09/13/23 15:30	09/14/23 08:15

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

### Diesel and/or Oil Hydrocarbons by NWTPH-Dx

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-15 (A3I1089-01)			Matrix: WG		Batch: 23I0768			
Diesel	442	96.2	192	ug/L	1	09/26/23 01:59	NWTPH-Dx	F-11
Oil	259	192	385	ug/L	1	09/26/23 01:59	NWTPH-Dx	J
Surrogate: o-Terphenyl (Surr)		Recovery: 109 %		Limits: 50-150 %	1	09/26/23 01:59	NWTPH-Dx	
GS-091323-16 (A3I1089-02)			Matrix: WG		Batch: 23I0768			
Diesel	1420	96.2	192	ug/L	1	09/26/23 02:19	NWTPH-Dx	F-13
Oil	ND	192	385	ug/L	1	09/26/23 02:19	NWTPH-Dx	
Surrogate: o-Terphenyl (Surr)		Recovery: 114 %		Limits: 50-150 %	1	09/26/23 02:19	NWTPH-Dx	
GS-091323-17 (A3I1089-03)			Matrix: WG		Batch: 23I0768			
Diesel	ND	96.2	192	ug/L	1	09/26/23 03:01	NWTPH-Dx	
Oil	ND	192	385	ug/L	1	09/26/23 03:01	NWTPH-Dx	
Surrogate: o-Terphenyl (Surr)		Recovery: 107 %		Limits: 50-150 %	1	09/26/23 03:01	NWTPH-Dx	
GS-091323-18 (A3I1089-04)			Matrix: WG		Batch: 23I0768			
Diesel	ND	96.2	192	ug/L	1	09/26/23 03:21	NWTPH-Dx	
Oil	260	192	385	ug/L	1	09/26/23 03:21	NWTPH-Dx	J
Surrogate: o-Terphenyl (Surr)		Recovery: 110 %		Limits: 50-150 %	1	09/26/23 03:21	NWTPH-Dx	
GS-091323-19 (A3I1089-05)			Matrix: WG		Batch: 23I0812			
Diesel	ND	95.2	190	ug/L	1	09/27/23 02:22	NWTPH-Dx	
Oil	ND	190	381	ug/L	1	09/27/23 02:22	NWTPH-Dx	
Surrogate: o-Terphenyl (Surr)		Recovery: 83 %		Limits: 50-150 %	1	09/27/23 02:22	NWTPH-Dx	
GS-091323-20 (A3I1089-06)			Matrix: WG		Batch: 23I0812			
Diesel	836	96.2	192	ug/L	1	09/27/23 02:45	NWTPH-Dx	F-13
Oil	ND	192	385	ug/L	1	09/27/23 02:45	NWTPH-Dx	
Surrogate: o-Terphenyl (Surr)		Recovery: 88 %		Limits: 50-150 %	1	09/27/23 02:45	NWTPH-Dx	

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Gasoline Range Hydrocarbons (Benzene through Naphthalene) by NWTPH-Gx

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-15 (A3I1089-01RE1)		Matrix: WG		Batch: 23I0764				
Gasoline Range Organics	ND	50.0	100	ug/L	1	09/24/23 15:43	NWTPH-Gx (MS)	
Surrogate: 4-Bromofluorobenzene (Sur)		Recovery: 96 %	Limits: 50-150 %	1	09/24/23 15:43	NWTPH-Gx (MS)		
1,4-Difluorobenzene (Sur)		102 %	50-150 %	1	09/24/23 15:43	NWTPH-Gx (MS)		
GS-091323-16 (A3I1089-02RE1)		Matrix: WG		Batch: 23I0764				
Gasoline Range Organics	174	50.0	100	ug/L	1	09/24/23 16:05	NWTPH-Gx (MS)	
Surrogate: 4-Bromofluorobenzene (Sur)		Recovery: 96 %	Limits: 50-150 %	1	09/24/23 16:05	NWTPH-Gx (MS)		
1,4-Difluorobenzene (Sur)		100 %	50-150 %	1	09/24/23 16:05	NWTPH-Gx (MS)		
GS-091323-17 (A3I1089-03RE1)		Matrix: WG		Batch: 23I0764				
Gasoline Range Organics	ND	50.0	100	ug/L	1	09/24/23 16:28	NWTPH-Gx (MS)	
Surrogate: 4-Bromofluorobenzene (Sur)		Recovery: 94 %	Limits: 50-150 %	1	09/24/23 16:28	NWTPH-Gx (MS)		
1,4-Difluorobenzene (Sur)		99 %	50-150 %	1	09/24/23 16:28	NWTPH-Gx (MS)		
GS-091323-18 (A3I1089-04RE1)		Matrix: WG		Batch: 23I0764				
Gasoline Range Organics	ND	50.0	100	ug/L	1	09/24/23 16:51	NWTPH-Gx (MS)	
Surrogate: 4-Bromofluorobenzene (Sur)		Recovery: 95 %	Limits: 50-150 %	1	09/24/23 16:51	NWTPH-Gx (MS)		
1,4-Difluorobenzene (Sur)		101 %	50-150 %	1	09/24/23 16:51	NWTPH-Gx (MS)		
GS-091323-19 (A3I1089-05RE1)		Matrix: WG		Batch: 23I0764				
Gasoline Range Organics	ND	50.0	100	ug/L	1	09/24/23 17:13	NWTPH-Gx (MS)	
Surrogate: 4-Bromofluorobenzene (Sur)		Recovery: 97 %	Limits: 50-150 %	1	09/24/23 17:13	NWTPH-Gx (MS)		
1,4-Difluorobenzene (Sur)		101 %	50-150 %	1	09/24/23 17:13	NWTPH-Gx (MS)		
GS-091323-20 (A3I1089-06RE1)		Matrix: WG		Batch: 23I0764				
Gasoline Range Organics	65.5	50.0	100	ug/L	1	09/24/23 17:36	NWTPH-Gx (MS)	J
Surrogate: 4-Bromofluorobenzene (Sur)		Recovery: 96 %	Limits: 50-150 %	1	09/24/23 17:36	NWTPH-Gx (MS)		
1,4-Difluorobenzene (Sur)		101 %	50-150 %	1	09/24/23 17:36	NWTPH-Gx (MS)		

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ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550****ANALYTICAL SAMPLE RESULTS****Volatile Organic Compounds by EPA 8260D**

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-15 (A311089-01RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
Acetone	ND	10.0	20.0	ug/L	1	09/24/23 15:43	EPA 8260D	
Acrylonitrile	ND	1.00	2.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Benzene	ND	0.100	0.200	ug/L	1	09/24/23 15:43	EPA 8260D	
Bromobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Bromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Bromoform	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Bromomethane	ND	5.00	5.00	ug/L	1	09/24/23 15:43	EPA 8260D	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	09/24/23 15:43	EPA 8260D	
n-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Carbon disulfide	ND	5.00	10.0	ug/L	1	09/24/23 15:43	EPA 8260D	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Chlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Chloroethane	ND	5.00	5.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Chloroform	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Chloromethane	ND	2.50	5.00	ug/L	1	09/24/23 15:43	EPA 8260D	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Dibromomethane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	

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Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-15 (A311089-01RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Ethylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	09/24/23 15:43	EPA 8260D	
2-Hexanone	ND	5.00	10.0	ug/L	1	09/24/23 15:43	EPA 8260D	
Isopropylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Methylene chloride	ND	5.00	10.0	ug/L	1	09/24/23 15:43	EPA 8260D	
4-Methyl-2-pentanone (MiBK)	ND	5.00	10.0	ug/L	1	09/24/23 15:43	EPA 8260D	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Naphthalene	ND	2.50	5.00	ug/L	1	09/24/23 15:43	EPA 8260D	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Styrene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
Toluene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	09/24/23 15:43	EPA 8260D	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
Vinyl chloride	ND	0.100	0.200	ug/L	1	09/24/23 15:43	EPA 8260D	
m,p-Xylene	ND	0.500	1.00	ug/L	1	09/24/23 15:43	EPA 8260D	
o-Xylene	ND	0.250	0.500	ug/L	1	09/24/23 15:43	EPA 8260D	

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Project Number: **000029-02.84 T-01.001E**

Project Manager: **John Renda**

**Report ID:**

**A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

### Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-15 (A311089-01RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
Surrogate: 1,4-Difluorobenzene (Surr)		Recovery: 100 %	Limits: 80-120 %	1	09/24/23 15:43	EPA 8260D		
Toluene-d8 (Surr)		102 %	80-120 %	1	09/24/23 15:43	EPA 8260D		
4-Bromofluorobenzene (Surr)		102 %	80-120 %	1	09/24/23 15:43	EPA 8260D		
<b>GS-091323-16 (A311089-02RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
Acetone	ND	10.0	20.0	ug/L	1	09/24/23 16:05	EPA 8260D	
Acrylonitrile	ND	1.00	2.00	ug/L	1	09/24/23 16:05	EPA 8260D	
<b>Benzene</b>	<b>5.13</b>	0.100	0.200	ug/L	1	09/24/23 16:05	EPA 8260D	
Bromobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
Bromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Bromoform	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Bromomethane	ND	5.00	5.00	ug/L	1	09/24/23 16:05	EPA 8260D	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	09/24/23 16:05	EPA 8260D	
n-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Carbon disulfide	ND	5.00	10.0	ug/L	1	09/24/23 16:05	EPA 8260D	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Chlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
Chloroethane	ND	5.00	5.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Chloroform	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Chloromethane	ND	2.50	5.00	ug/L	1	09/24/23 16:05	EPA 8260D	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
Dibromomethane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	

Apex Laboratories

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Darwin Thomas, Business Development Director



## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-16 (A311089-02RE1)		Matrix: WG			Batch: 2310764			
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Ethylbenzene	0.340	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	J
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	09/24/23 16:05	EPA 8260D	
2-Hexanone	ND	5.00	10.0	ug/L	1	09/24/23 16:05	EPA 8260D	
Isopropylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Methylene chloride	ND	5.00	10.0	ug/L	1	09/24/23 16:05	EPA 8260D	
4-Methyl-2-pentanone (MIBK)	ND	5.00	10.0	ug/L	1	09/24/23 16:05	EPA 8260D	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Naphthalene	32.5	2.50	5.00	ug/L	1	09/24/23 16:05	EPA 8260D	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
Styrene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
Toluene	1.09	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	09/24/23 16:05	EPA 8260D	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	

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Darwin Thomas, Business Development Director

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

**Anchor QEA, LLC**

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-16 (A311089-02RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	
Vinyl chloride	ND	0.100	0.200	ug/L	1	09/24/23 16:05	EPA 8260D	
<b>m,p-Xylene</b>	<b>0.850</b>	0.500	1.00	ug/L	1	09/24/23 16:05	EPA 8260D	<b>J</b>
<b>o-Xylene</b>	<b>2.09</b>	0.250	0.500	ug/L	1	09/24/23 16:05	EPA 8260D	
<i>Surrogate: 1,4-Difluorobenzene (Surr)</i>		<i>Recovery: 100 %</i>		<i>Limits: 80-120 %</i>	<i>1</i>	<i>09/24/23 16:05</i>	<i>EPA 8260D</i>	
<i>Toluene-d8 (Surr)</i>		<i>102 %</i>		<i>80-120 %</i>	<i>1</i>	<i>09/24/23 16:05</i>	<i>EPA 8260D</i>	
<i>4-Bromofluorobenzene (Surr)</i>		<i>102 %</i>		<i>80-120 %</i>	<i>1</i>	<i>09/24/23 16:05</i>	<i>EPA 8260D</i>	
<b>GS-091323-17 (A311089-03RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
Acetone	ND	10.0	20.0	ug/L	1	09/24/23 16:28	EPA 8260D	
Acrylonitrile	ND	1.00	2.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Benzene	ND	0.100	0.200	ug/L	1	09/24/23 16:28	EPA 8260D	
Bromobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Bromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Bromoform	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Bromomethane	ND	5.00	5.00	ug/L	1	09/24/23 16:28	EPA 8260D	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	09/24/23 16:28	EPA 8260D	
n-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Carbon disulfide	ND	5.00	10.0	ug/L	1	09/24/23 16:28	EPA 8260D	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Chlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Chloroethane	ND	5.00	5.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Chloroform	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Chloromethane	ND	2.50	5.00	ug/L	1	09/24/23 16:28	EPA 8260D	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Dibromomethane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-17 (A311089-03RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
1,2-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Ethylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	09/24/23 16:28	EPA 8260D	
2-Hexanone	ND	5.00	10.0	ug/L	1	09/24/23 16:28	EPA 8260D	
Isopropylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Methylene chloride	ND	5.00	10.0	ug/L	1	09/24/23 16:28	EPA 8260D	
4-Methyl-2-pentanone (MiBK)	ND	5.00	10.0	ug/L	1	09/24/23 16:28	EPA 8260D	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Naphthalene	ND	2.50	5.00	ug/L	1	09/24/23 16:28	EPA 8260D	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Styrene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
Toluene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	

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Darwin Thomas, Business Development Director

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-17 (A311089-03RE1)		Matrix: WG			Batch: 2310764			
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	09/24/23 16:28	EPA 8260D	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
Vinyl chloride	ND	0.100	0.200	ug/L	1	09/24/23 16:28	EPA 8260D	
m,p-Xylene	ND	0.500	1.00	ug/L	1	09/24/23 16:28	EPA 8260D	
o-Xylene	ND	0.250	0.500	ug/L	1	09/24/23 16:28	EPA 8260D	
Surrogate: 1,4-Difluorobenzene (Surr)		Recovery: 99 %		Limits: 80-120 %	1	09/24/23 16:28	EPA 8260D	
Toluene-d8 (Surr)		102 %		80-120 %	1	09/24/23 16:28	EPA 8260D	
4-Bromofluorobenzene (Surr)		102 %		80-120 %	1	09/24/23 16:28	EPA 8260D	
GS-091323-18 (A311089-04RE1)		Matrix: WG			Batch: 2310764			
Acetone	ND	10.0	20.0	ug/L	1	09/24/23 16:51	EPA 8260D	
Acrylonitrile	ND	1.00	2.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Benzene	ND	0.100	0.200	ug/L	1	09/24/23 16:51	EPA 8260D	
Bromobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Bromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Bromoform	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Bromomethane	ND	5.00	5.00	ug/L	1	09/24/23 16:51	EPA 8260D	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	09/24/23 16:51	EPA 8260D	
n-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Carbon disulfide	ND	5.00	10.0	ug/L	1	09/24/23 16:51	EPA 8260D	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Chlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Chloroethane	ND	5.00	5.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Chloroform	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Chloromethane	ND	2.50	5.00	ug/L	1	09/24/23 16:51	EPA 8260D	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-18 (A311089-04RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Dibromomethane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Ethylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	09/24/23 16:51	EPA 8260D	
2-Hexanone	ND	5.00	10.0	ug/L	1	09/24/23 16:51	EPA 8260D	
Isopropylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Methylene chloride	ND	5.00	10.0	ug/L	1	09/24/23 16:51	EPA 8260D	
4-Methyl-2-pentanone (MIBK)	ND	5.00	10.0	ug/L	1	09/24/23 16:51	EPA 8260D	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Naphthalene	ND	2.50	5.00	ug/L	1	09/24/23 16:51	EPA 8260D	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Styrene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	

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Darwin Thomas, Business Development Director



## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062

## Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

## Report ID:

A311089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-18 (A311089-04RE1)		Matrix: WG			Batch: 2310764			
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
Toluene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	09/24/23 16:51	EPA 8260D	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
Vinyl chloride	ND	0.100	0.200	ug/L	1	09/24/23 16:51	EPA 8260D	
m,p-Xylene	ND	0.500	1.00	ug/L	1	09/24/23 16:51	EPA 8260D	
o-Xylene	ND	0.250	0.500	ug/L	1	09/24/23 16:51	EPA 8260D	
Surrogate: 1,4-Difluorobenzene (Surr)		Recovery: 101 %		Limits: 80-120 %	1	09/24/23 16:51	EPA 8260D	
Toluene-d8 (Surr)		103 %		80-120 %	1	09/24/23 16:51	EPA 8260D	
4-Bromofluorobenzene (Surr)		103 %		80-120 %	1	09/24/23 16:51	EPA 8260D	
GS-091323-19 (A311089-05RE1)		Matrix: WG			Batch: 2310764			
Acetone	ND	10.0	20.0	ug/L	1	09/24/23 17:13	EPA 8260D	
Acrylonitrile	ND	1.00	2.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Benzene	ND	0.100	0.200	ug/L	1	09/24/23 17:13	EPA 8260D	
Bromobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Bromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Bromoform	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Bromomethane	ND	5.00	5.00	ug/L	1	09/24/23 17:13	EPA 8260D	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	09/24/23 17:13	EPA 8260D	
n-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Carbon disulfide	ND	5.00	10.0	ug/L	1	09/24/23 17:13	EPA 8260D	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	

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Darwin Thomas, Business Development Director



## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-19 (A311089-05RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
Chlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Chloroethane	ND	5.00	5.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Chloroform	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Chloromethane	ND	2.50	5.00	ug/L	1	09/24/23 17:13	EPA 8260D	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Dibromomethane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
<b>1,2-Dichlorobenzene</b>	<b>1.11</b>	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Ethylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	09/24/23 17:13	EPA 8260D	
2-Hexanone	ND	5.00	10.0	ug/L	1	09/24/23 17:13	EPA 8260D	
Isopropylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Methylene chloride	ND	5.00	10.0	ug/L	1	09/24/23 17:13	EPA 8260D	
4-Methyl-2-pentanone (MIBK)	ND	5.00	10.0	ug/L	1	09/24/23 17:13	EPA 8260D	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	

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Darwin Thomas, Business Development Director



## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

**Anchor QEA, LLC**

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-19 (A311089-05RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
Naphthalene	ND	2.50	5.00	ug/L	1	09/24/23 17:13	EPA 8260D	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Styrene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
Toluene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	09/24/23 17:13	EPA 8260D	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
Vinyl chloride	ND	0.100	0.200	ug/L	1	09/24/23 17:13	EPA 8260D	
m,p-Xylene	ND	0.500	1.00	ug/L	1	09/24/23 17:13	EPA 8260D	
o-Xylene	ND	0.250	0.500	ug/L	1	09/24/23 17:13	EPA 8260D	
Surrogate: 1,4-Difluorobenzene (Surr)		Recovery: 101 %		Limits: 80-120 %	1	09/24/23 17:13	EPA 8260D	
Toluene-d8 (Surr)		103 %		80-120 %	1	09/24/23 17:13	EPA 8260D	
4-Bromofluorobenzene (Surr)		102 %		80-120 %	1	09/24/23 17:13	EPA 8260D	
<b>GS-091323-20 (A311089-06RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
Acetone	ND	10.0	20.0	ug/L	1	09/24/23 17:36	EPA 8260D	
Acrylonitrile	ND	1.00	2.00	ug/L	1	09/24/23 17:36	EPA 8260D	
<b>Benzene</b>	<b>0.230</b>	0.100	0.200	ug/L	1	09/24/23 17:36	EPA 8260D	
Bromobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Bromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Bromoform	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Bromomethane	ND	5.00	5.00	ug/L	1	09/24/23 17:36	EPA 8260D	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	09/24/23 17:36	EPA 8260D	

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Darwin Thomas, Business Development Director

Page 15 of 62



**ANALYTICAL REPORT****Apex Laboratories, LLC**6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550****ANALYTICAL SAMPLE RESULTS****Volatile Organic Compounds by EPA 8260D**

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-20 (A311089-06RE1)</b>		<b>Matrix: WG</b>			<b>Batch: 2310764</b>			
n-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Carbon disulfide	ND	5.00	10.0	ug/L	1	09/24/23 17:36	EPA 8260D	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Chlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Chloroethane	ND	5.00	5.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Chloroform	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Chloromethane	ND	2.50	5.00	ug/L	1	09/24/23 17:36	EPA 8260D	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Dibromomethane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Ethylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	09/24/23 17:36	EPA 8260D	
2-Hexanone	ND	5.00	10.0	ug/L	1	09/24/23 17:36	EPA 8260D	

Apex Laboratories

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Darwin Thomas, Business Development Director





## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062

## Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-20 (A311089-06RE1)		Matrix: WG			Batch: 2310764			
Isopropylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Methylene chloride	ND	5.00	10.0	ug/L	1	09/24/23 17:36	EPA 8260D	
4-Methyl-2-pentanone (MiBK)	ND	5.00	10.0	ug/L	1	09/24/23 17:36	EPA 8260D	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Naphthalene	ND	2.50	5.00	ug/L	1	09/24/23 17:36	EPA 8260D	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Styrene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
Toluene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	09/24/23 17:36	EPA 8260D	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	
Vinyl chloride	ND	0.100	0.200	ug/L	1	09/24/23 17:36	EPA 8260D	
m,p-Xylene	0.710	0.500	1.00	ug/L	1	09/24/23 17:36	EPA 8260D	J
o-Xylene	0.270	0.250	0.500	ug/L	1	09/24/23 17:36	EPA 8260D	J
Surrogate: 1,4-Difluorobenzene (Surr)		Recovery: 99 %		Limits: 80-120 %	1	09/24/23 17:36	EPA 8260D	
Toluene-d8 (Surr)		102 %		80-120 %	1	09/24/23 17:36	EPA 8260D	
4-Bromofluorobenzene (Surr)		103 %		80-120 %	1	09/24/23 17:36	EPA 8260D	

## TB-091323 (A311089-07)

Matrix: W

Batch: 2310764

Acetone	ND	10.0	20.0	ug/L	1	09/24/23 15:20	EPA 8260D
Acrylonitrile	ND	1.00	2.00	ug/L	1	09/24/23 15:20	EPA 8260D
Benzene	ND	0.100	0.200	ug/L	1	09/24/23 15:20	EPA 8260D
Bromobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D

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Darwin Thomas, Business Development Director

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>TB-091323 (A311089-07)</b>		<b>Matrix: W</b>			<b>Batch: 2310764</b>			
Bromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Bromoform	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Bromomethane	ND	5.00	5.00	ug/L	1	09/24/23 15:20	EPA 8260D	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	09/24/23 15:20	EPA 8260D	
n-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Carbon disulfide	ND	5.00	10.0	ug/L	1	09/24/23 15:20	EPA 8260D	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Chlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Chloroethane	ND	5.00	5.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Chloroform	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Chloromethane	ND	2.50	5.00	ug/L	1	09/24/23 15:20	EPA 8260D	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Dibromomethane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	

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Darwin Thomas, Business Development Director

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

**Anchor QEA, LLC**

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>TB-091323 (A311089-07)</b>		<b>Matrix: W</b>			<b>Batch: 2310764</b>			
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Ethylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	09/24/23 15:20	EPA 8260D	
2-Hexanone	ND	5.00	10.0	ug/L	1	09/24/23 15:20	EPA 8260D	
Isopropylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Methylene chloride	ND	5.00	10.0	ug/L	1	09/24/23 15:20	EPA 8260D	
4-Methyl-2-pentanone (MiBK)	ND	5.00	10.0	ug/L	1	09/24/23 15:20	EPA 8260D	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Naphthalene	ND	2.50	5.00	ug/L	1	09/24/23 15:20	EPA 8260D	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Styrene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
Toluene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	09/24/23 15:20	EPA 8260D	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
Vinyl chloride	ND	0.100	0.200	ug/L	1	09/24/23 15:20	EPA 8260D	
m,p-Xylene	ND	0.500	1.00	ug/L	1	09/24/23 15:20	EPA 8260D	
o-Xylene	ND	0.250	0.500	ug/L	1	09/24/23 15:20	EPA 8260D	
Surrogate: 1,4-Difluorobenzene (Surr)		Recovery: 99 %		Limits: 80-120 %	1	09/24/23 15:20	EPA 8260D	
Toluene-d8 (Surr)		103 %		80-120 %	1	09/24/23 15:20	EPA 8260D	
4-Bromofluorobenzene (Surr)		102 %		80-120 %	1	09/24/23 15:20	EPA 8260D	

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Darwin Thomas, Business Development Director

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-15 (A3I1089-01RE2)		Matrix: WG			Batch: 23I0493			
Acenaphthene	0.914	0.0190	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Acenaphthylene	1.71	0.0190	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Anthracene	1.99	0.0190	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Benz(a)anthracene	0.0523	0.00951	0.0190	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Benzo(a)pyrene	0.0304	0.00951	0.0190	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Benzo(b+j)fluoranthene(s)	0.0300	0.00951	0.0190	ug/L	1	09/18/23 19:28	EPA 8270E LVI	M-05
Benzo(k)fluoranthene	0.0466	0.00951	0.0190	ug/L	1	09/18/23 19:28	EPA 8270E LVI	M-05
Benzo(g,h,i)perylene	0.0319	0.0190	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	J
Chrysene	0.0204	0.00951	0.0190	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Dibenz(a,h)anthracene	ND	0.00951	0.0190	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Fluoranthene	0.0942	0.0190	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Fluorene	0.286	0.0190	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Indeno(1,2,3-cd)pyrene	0.0219	0.00951	0.0190	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
1-Methylnaphthalene	0.101	0.0380	0.0761	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
2-Methylnaphthalene	ND	0.0380	0.0761	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Naphthalene	0.129	0.0380	0.0761	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Phenanthrene	0.256	0.0380	0.0761	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Pyrene	0.154	0.0190	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Dibenzofuran	ND	0.0380	0.0380	ug/L	1	09/18/23 19:28	EPA 8270E LVI	
Surrogate: Acenaphthylene-d8 (Surr)		Recovery: 100 %		Limits: 78-134 %	1	09/18/23 19:28	EPA 8270E LVI	
Benzo(a)pyrene-d12 (Surr)		118 %		80-132 %	1	09/18/23 19:28	EPA 8270E LVI	

GS-091323-16 (A3I1089-02RE1)

Matrix: WG

Batch: 23I0493

Acenaphthene	59.7	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	M-04
Acenaphthylene	8.25	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Anthracene	12.2	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Benz(a)anthracene	ND	0.846	1.69	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Benzo(a)pyrene	ND	0.846	1.69	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Benzo(b+j)fluoranthene(s)	ND	0.846	1.69	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Benzo(k)fluoranthene	ND	0.846	1.69	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Benzo(g,h,i)perylene	ND	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Chrysene	ND	0.846	1.69	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Dibenz(a,h)anthracene	ND	0.846	1.69	ug/L	100	09/16/23 01:02	EPA 8270E LVI	

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Darwin Thomas, Business Development Director



## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

## Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-16 (A3I1089-02RE1)		Matrix: WG			Batch: 23I0493			
Fluoranthene	20.0	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Fluorene	31.3	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Indeno(1,2,3-cd)pyrene	ND	0.846	1.69	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
1-Methylnaphthalene	27.5	3.38	6.77	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
2-Methylnaphthalene	3.76	3.38	6.77	ug/L	100	09/16/23 01:02	EPA 8270E LVI	J
Naphthalene	25.5	3.38	6.77	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Phenanthrene	46.6	3.38	6.77	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Pyrene	22.4	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	
Dibenzofuran	3.26	1.69	3.38	ug/L	100	09/16/23 01:02	EPA 8270E LVI	J
Surrogate: Acenaphthylene-d8 (Surr)		Recovery: %		Limits: 78-134 %	100	09/16/23 01:02	EPA 8270E LVI	S-01
Benzo(a)pyrene-d12 (Surr)		84 %		80-132 %	100	09/16/23 01:02	EPA 8270E LVI	S-05
GS-091323-17 (A3I1089-03RE2)		Matrix: WG			Batch: 23I0493			
Acenaphthene	0.0513	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	M-02
Acenaphthylene	0.0233	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	J
Anthracene	0.0219	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	J
Benz(a)anthracene	ND	0.00950	0.0190	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Benzo(a)pyrene	ND	0.00950	0.0190	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Benzo(b+j)fluoranthene(s)	ND	0.00950	0.0190	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Benzo(k)fluoranthene	ND	0.00950	0.0190	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Benzo(g,h,i)perylene	ND	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Chrysene	ND	0.00950	0.0190	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Dibenz(a,h)anthracene	ND	0.00950	0.0190	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Fluoranthene	ND	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Fluorene	0.0280	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	J
Indeno(1,2,3-cd)pyrene	ND	0.00950	0.0190	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
1-Methylnaphthalene	ND	0.0380	0.0760	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
2-Methylnaphthalene	ND	0.0380	0.0760	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Naphthalene	ND	0.0380	0.0760	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Phenanthrene	ND	0.0380	0.0760	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Pyrene	ND	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Dibenzofuran	ND	0.0190	0.0380	ug/L	1	09/18/23 20:00	EPA 8270E LVI	
Surrogate: Acenaphthylene-d8 (Surr)		Recovery: 98 %		Limits: 78-134 %	1	09/18/23 20:00	EPA 8270E LVI	

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A3I1089 - 12 05 23 0550**

## ANALYTICAL SAMPLE RESULTS

**Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)**

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-17 (A3I1089-03RE2)		Matrix: WG			Batch: 23I0493			
Surrogate: Benzo(a)pyrene-d12 (Surr)		Recovery: 116 %	Limits: 80-132 %	1	09/18/23 20:00		EPA 8270E LVI	
GS-091323-18 (A3I1089-04RE2)		Matrix: WG			Batch: 23I0493			
Acenaphthene	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Acenaphthylene	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Anthracene	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Benz(a)anthracene	ND	0.0110	0.0219	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Benzo(a)pyrene	ND	0.0110	0.0219	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Benzo(b+j)fluoranthene(s)	ND	0.0110	0.0219	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Benzo(k)fluoranthene	ND	0.0110	0.0219	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Benzo(g,h,i)perylene	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Chrysene	ND	0.0110	0.0219	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Dibenz(a,h)anthracene	ND	0.0110	0.0219	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Fluoranthene	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Fluorene	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Indeno(1,2,3-cd)pyrene	ND	0.0110	0.0219	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
1-Methylnaphthalene	ND	0.0439	0.0878	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
2-Methylnaphthalene	ND	0.0439	0.0878	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Naphthalene	ND	0.0439	0.0878	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Phenanthrene	ND	0.0439	0.0878	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Pyrene	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Dibenzofuran	ND	0.0219	0.0439	ug/L	1	09/19/23 12:06	EPA 8270E LVI	
Surrogate: Acenaphthylene-d8 (Surr)		Recovery: 93 %	Limits: 78-134 %	1	09/19/23 12:06		EPA 8270E LVI	
Benzo(a)pyrene-d12 (Surr)		111 %	80-132 %	1	09/19/23 12:06		EPA 8270E LVI	
GS-091323-19 (A3I1089-05RE2)		Matrix: WG			Batch: 23I0493			
Acenaphthene	0.0828	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Acenaphthylene	0.0243	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	J
Anthracene	0.0267	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	J
Benz(a)anthracene	ND	0.00935	0.0187	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Benzo(a)pyrene	ND	0.00935	0.0187	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Benzo(b+j)fluoranthene(s)	ND	0.00935	0.0187	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Benzo(k)fluoranthene	ND	0.00935	0.0187	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Benzo(g,h,i)perylene	ND	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	

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Darwin Thomas, Business Development Director





## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-19 (A3I1089-05RE2)		Matrix: WG			Batch: 23I0493			
Chrysene	ND	0.00935	0.0187	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Dibenz(a,h)anthracene	ND	0.00935	0.0187	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Fluoranthene	0.0187	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	J
Fluorene	0.0262	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	J
Indeno(1,2,3-cd)pyrene	ND	0.00935	0.0187	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
1-Methylnaphthalene	ND	0.0374	0.0748	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
2-Methylnaphthalene	ND	0.0374	0.0748	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Naphthalene	ND	0.0374	0.0748	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Phenanthrene	ND	0.0374	0.0748	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Pyrene	0.0229	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	J
Dibenzofuran	ND	0.0187	0.0374	ug/L	1	09/19/23 12:38	EPA 8270E LVI	
Surrogate: Acenaphthylene-d8 (Surr)		Recovery: 93 %		Limits: 78-134 %	1	09/19/23 12:38	EPA 8270E LVI	
Benzo(a)pyrene-d12 (Surr)		113 %		80-132 %	1	09/19/23 12:38	EPA 8270E LVI	
GS-091323-20 (A3I1089-06RE1)		Matrix: WG			Batch: 23I0493			
Acenaphthene	59.7	0.188	0.375	ug/L	10	09/18/23 09:41	EPA 8270E LVI	
GS-091323-20 (A3I1089-06RE2)		Matrix: WG			Batch: 23I0493			
Acenaphthylene	4.03	0.0188	0.0375	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Anthracene	2.63	0.0188	0.0375	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Benz(a)anthracene	0.187	0.00938	0.0188	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Benzo(a)pyrene	0.0380	0.00938	0.0188	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Benzo(b+j)fluoranthene(s)	0.0380	0.00938	0.0188	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Benzo(k)fluoranthene	0.0281	0.00938	0.0188	ug/L	1	09/19/23 13:11	EPA 8270E LVI	M-05
Benzo(g,h,i)perylene	ND	0.0188	0.0375	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Chrysene	0.170	0.00938	0.0188	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Dibenz(a,h)anthracene	ND	0.00938	0.0188	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Fluoranthene	6.77	0.0188	0.0375	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Fluorene	17.9	0.0188	0.0375	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Indeno(1,2,3-cd)pyrene	ND	0.00938	0.0188	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
1-Methylnaphthalene	2.96	0.0375	0.0750	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
2-Methylnaphthalene	0.0788	0.0375	0.0750	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Naphthalene	1.03	0.0375	0.0750	ug/L	1	09/19/23 13:11	EPA 8270E LVI	

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# ANALYTICAL REPORT

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Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

### Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-20 (A3I1089-06RE2)		Matrix: WG			Batch: 23I0493			
Phenanthrene	1.12	0.0375	0.0750	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Pyrene	6.37	0.0188	0.0375	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Dibenzofuran	0.204	0.0188	0.0375	ug/L	1	09/19/23 13:11	EPA 8270E LVI	
Surrogate: Acenaphthylene-d8 (Surr)		Recovery: 94 %		Limits: 78-134 %	1	09/19/23 13:11	EPA 8270E LVI	
Benzo(a)pyrene-d12 (Surr)		120 %		80-132 %	1	09/19/23 13:11	EPA 8270E LVI	

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Total Metals by EPA 6020B (ICPMS)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-15 (A3I1089-01)				Matrix: WG				
Batch: 23I0737								
Aluminum	66.5	25.0	50.0	ug/L	1	09/23/23 02:43	EPA 6020B	J
Antimony	ND	0.500	1.00	ug/L	1	09/23/23 02:43	EPA 6020B	
Arsenic	1.14	0.500	1.00	ug/L	1	09/23/23 02:43	EPA 6020B	
Barium	54.3	1.00	2.00	ug/L	1	09/23/23 02:43	EPA 6020B	
Beryllium	ND	0.100	0.200	ug/L	1	09/23/23 02:43	EPA 6020B	
Cadmium	ND	0.100	0.200	ug/L	1	09/23/23 02:43	EPA 6020B	
Chromium	ND	1.00	2.00	ug/L	1	09/23/23 02:43	EPA 6020B	
Copper	ND	1.00	2.00	ug/L	1	09/23/23 02:43	EPA 6020B	
Iron	7630	25.0	50.0	ug/L	1	09/23/23 02:43	EPA 6020B	
Lead	0.161	0.110	0.200	ug/L	1	09/23/23 02:43	EPA 6020B	
Mercury	ND	0.0400	0.0800	ug/L	1	09/23/23 02:43	EPA 6020B	
Nickel	253	1.00	2.00	ug/L	1	09/23/23 02:43	EPA 6020B	
Selenium	ND	0.500	1.00	ug/L	1	09/23/23 02:43	EPA 6020B	
Silver	ND	0.100	0.200	ug/L	1	09/23/23 02:43	EPA 6020B	
Thallium	ND	0.100	0.200	ug/L	1	09/23/23 02:43	EPA 6020B	
Zinc	8.69	2.00	4.00	ug/L	1	09/23/23 02:43	EPA 6020B	
GS-091323-15 (A3I1089-01RE1)				Matrix: WG				
Batch: 23I0737								
Manganese	5680	5.00	10.0	ug/L	10	09/25/23 19:39	EPA 6020B	
Vanadium	1090	10.0	20.0	ug/L	10	09/25/23 19:39	EPA 6020B	
GS-091323-16 (A3I1089-02)				Matrix: WG				
Batch: 23I0737								
Aluminum	ND	25.0	50.0	ug/L	1	09/23/23 02:58	EPA 6020B	
Antimony	ND	0.500	1.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Arsenic	1.72	0.500	1.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Barium	33.5	1.00	2.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Beryllium	ND	0.100	0.200	ug/L	1	09/23/23 02:58	EPA 6020B	
Cadmium	ND	0.100	0.200	ug/L	1	09/23/23 02:58	EPA 6020B	
Chromium	ND	1.00	2.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Copper	ND	1.00	2.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Iron	18500	25.0	50.0	ug/L	1	09/23/23 02:58	EPA 6020B	

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## ANALYTICAL REPORT

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ORELAP ID: OR100062

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6720 SW Macadam Ave. Suite 125

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Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Total Metals by EPA 6020B (ICPMS)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-16 (A3I1089-02)		Matrix: WG						
Lead	ND	0.110	0.200	ug/L	1	09/23/23 02:58	EPA 6020B	
Manganese	2190	0.500	1.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Mercury	ND	0.0400	0.0800	ug/L	1	09/23/23 02:58	EPA 6020B	
Nickel	6.32	1.00	2.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Selenium	ND	0.500	1.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Silver	ND	0.100	0.200	ug/L	1	09/23/23 02:58	EPA 6020B	
Thallium	ND	0.100	0.200	ug/L	1	09/23/23 02:58	EPA 6020B	
Vanadium	ND	1.00	2.00	ug/L	1	09/23/23 02:58	EPA 6020B	
Zinc	3.47	2.00	4.00	ug/L	1	09/23/23 02:58	EPA 6020B	J
GS-091323-17 (A3I1089-03)		Matrix: WG						
Batch: 23I0737								
Aluminum	38.6	25.0	50.0	ug/L	1	09/23/23 03:03	EPA 6020B	J
Antimony	ND	0.500	1.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Arsenic	1.03	0.500	1.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Barium	34.5	1.00	2.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Beryllium	ND	0.100	0.200	ug/L	1	09/23/23 03:03	EPA 6020B	
Cadmium	ND	0.100	0.200	ug/L	1	09/23/23 03:03	EPA 6020B	
Chromium	ND	1.00	2.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Copper	ND	1.00	2.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Iron	16300	25.0	50.0	ug/L	1	09/23/23 03:03	EPA 6020B	
Lead	ND	0.110	0.200	ug/L	1	09/23/23 03:03	EPA 6020B	
Manganese	668	0.500	1.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Mercury	ND	0.0400	0.0800	ug/L	1	09/23/23 03:03	EPA 6020B	
Nickel	ND	1.00	2.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Selenium	ND	0.500	1.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Silver	ND	0.100	0.200	ug/L	1	09/23/23 03:03	EPA 6020B	
Thallium	ND	0.100	0.200	ug/L	1	09/23/23 03:03	EPA 6020B	
Vanadium	ND	1.00	2.00	ug/L	1	09/23/23 03:03	EPA 6020B	
Zinc	ND	2.00	4.00	ug/L	1	09/23/23 03:03	EPA 6020B	
GS-091323-18 (A3I1089-04)		Matrix: WG						
Batch: 23I0737								
Aluminum	61.1	25.0	50.0	ug/L	1	09/23/23 03:09	EPA 6020B	

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## ANALYTICAL REPORT

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503-718-2323  
ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Total Metals by EPA 6020B (ICPMS)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-18 (A3I1089-04)		Matrix: WG						
Antimony	ND	0.500	1.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Arsenic	3.65	0.500	1.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Barium	25.3	1.00	2.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Beryllium	ND	0.100	0.200	ug/L	1	09/23/23 03:09	EPA 6020B	
Cadmium	ND	0.100	0.200	ug/L	1	09/23/23 03:09	EPA 6020B	
Chromium	ND	1.00	2.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Copper	ND	1.00	2.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Iron	11800	25.0	50.0	ug/L	1	09/23/23 03:09	EPA 6020B	
Lead	0.125	0.110	0.200	ug/L	1	09/23/23 03:09	EPA 6020B	J
Manganese	1550	0.500	1.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Mercury	ND	0.0400	0.0800	ug/L	1	09/23/23 03:09	EPA 6020B	
Nickel	ND	1.00	2.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Selenium	ND	0.500	1.00	ug/L	1	09/23/23 03:09	EPA 6020B	
Silver	ND	0.100	0.200	ug/L	1	09/23/23 03:09	EPA 6020B	
Thallium	ND	0.100	0.200	ug/L	1	09/23/23 03:09	EPA 6020B	
Vanadium	1.05	1.00	2.00	ug/L	1	09/23/23 03:09	EPA 6020B	J
Zinc	3.50	2.00	4.00	ug/L	1	09/23/23 03:09	EPA 6020B	J
GS-091323-19 (A3I1089-05)		Matrix: WG						
Batch: 23I0737								
Aluminum	228	25.0	50.0	ug/L	1	09/23/23 03:14	EPA 6020B	
Antimony	ND	0.500	1.00	ug/L	1	09/23/23 03:14	EPA 6020B	
Arsenic	0.649	0.500	1.00	ug/L	1	09/23/23 03:14	EPA 6020B	J
Barium	28.5	1.00	2.00	ug/L	1	09/23/23 03:14	EPA 6020B	
Beryllium	ND	0.100	0.200	ug/L	1	09/23/23 03:14	EPA 6020B	
Cadmium	ND	0.100	0.200	ug/L	1	09/23/23 03:14	EPA 6020B	
Chromium	ND	1.00	2.00	ug/L	1	09/23/23 03:14	EPA 6020B	
Copper	ND	1.00	2.00	ug/L	1	09/23/23 03:14	EPA 6020B	
Iron	5520	25.0	50.0	ug/L	1	09/23/23 03:14	EPA 6020B	
Lead	0.236	0.110	0.200	ug/L	1	09/23/23 03:14	EPA 6020B	
Manganese	197	0.500	1.00	ug/L	1	09/23/23 03:14	EPA 6020B	
Mercury	ND	0.0400	0.0800	ug/L	1	09/23/23 03:14	EPA 6020B	
Nickel	ND	1.00	2.00	ug/L	1	09/23/23 03:14	EPA 6020B	

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Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## ANALYTICAL SAMPLE RESULTS

## Total Metals by EPA 6020B (ICPMS)

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
GS-091323-19 (A3I1089-05)		Matrix: WG						
Selenium	ND	0.500	1.00	ug/L	1	09/23/23 03:14	EPA 6020B	
Silver	ND	0.100	0.200	ug/L	1	09/23/23 03:14	EPA 6020B	
Thallium	ND	0.100	0.200	ug/L	1	09/23/23 03:14	EPA 6020B	
Vanadium	ND	1.00	2.00	ug/L	1	09/23/23 03:14	EPA 6020B	
Zinc	ND	2.00	4.00	ug/L	1	09/23/23 03:14	EPA 6020B	
GS-091323-20 (A3I1089-06)		Matrix: WG						
Batch: 23I0737								
Aluminum	ND	25.0	50.0	ug/L	1	09/23/23 03:19	EPA 6020B	
Antimony	ND	0.500	1.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Arsenic	3.35	0.500	1.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Barium	130	1.00	2.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Beryllium	ND	0.100	0.200	ug/L	1	09/23/23 03:19	EPA 6020B	
Cadmium	ND	0.100	0.200	ug/L	1	09/23/23 03:19	EPA 6020B	
Chromium	16.6	1.00	2.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Copper	ND	1.00	2.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Iron	34200	25.0	50.0	ug/L	1	09/23/23 03:19	EPA 6020B	
Lead	ND	0.110	0.200	ug/L	1	09/23/23 03:19	EPA 6020B	
Mercury	ND	0.0400	0.0800	ug/L	1	09/23/23 03:19	EPA 6020B	
Nickel	9.94	1.00	2.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Selenium	ND	0.500	1.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Silver	ND	0.100	0.200	ug/L	1	09/23/23 03:19	EPA 6020B	
Thallium	ND	0.100	0.200	ug/L	1	09/23/23 03:19	EPA 6020B	
Vanadium	ND	1.00	2.00	ug/L	1	09/23/23 03:19	EPA 6020B	
Zinc	ND	2.00	4.00	ug/L	1	09/23/23 03:19	EPA 6020B	
GS-091323-20 (A3I1089-06RE1)		Matrix: WG						
Batch: 23I0737								
Manganese	10600	5.00	10.0	ug/L	10	09/25/23 19:49	EPA 6020B	

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**ANALYTICAL REPORT****Apex Laboratories, LLC**6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A3I1089 - 12 05 23 0550****ANALYTICAL SAMPLE RESULTS****Total Cyanide by Flow Analysis (Aqueous)**

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-15 (A3I1089-01)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0817</b>		
Total Cyanide	<b>0.434</b>	0.00500	0.00500	mg/L	1	09/26/23 16:26	EPA 335.4	
<b>GS-091323-16 (A3I1089-02)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0817</b>		
Total Cyanide	<b>0.0533</b>	0.00500	0.00500	mg/L	1	09/26/23 16:28	EPA 335.4	
<b>GS-091323-17 (A3I1089-03)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0817</b>		
Total Cyanide	<b>0.0322</b>	0.00500	0.00500	mg/L	1	09/26/23 16:36	EPA 335.4	
<b>GS-091323-18 (A3I1089-04)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0817</b>		
Total Cyanide	ND	0.00500	0.00500	mg/L	1	09/26/23 16:38	EPA 335.4	
<b>GS-091323-19 (A3I1089-05)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0817</b>		
Total Cyanide	<b>0.0226</b>	0.00500	0.00500	mg/L	1	09/26/23 16:40	EPA 335.4	
<b>GS-091323-20 (A3I1089-06)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0817</b>		
Total Cyanide	<b>0.283</b>	0.00500	0.00500	mg/L	1	09/26/23 16:42	EPA 335.4	

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Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-15 (A3I1089-01)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0791</b>		
Available Cyanide	ND	0.00100	0.00200	mg/L	1	09/25/23 15:08	D6888-09	
<b>GS-091323-16 (A3I1089-02)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0791</b>		
Available Cyanide	ND	0.00100	0.00200	mg/L	1	09/25/23 15:09	D6888-09	
<b>GS-091323-17 (A3I1089-03)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0791</b>		
Available Cyanide	ND	0.00100	0.00200	mg/L	1	09/25/23 15:11	D6888-09	
<b>GS-091323-18 (A3I1089-04)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0791</b>		
Available Cyanide	ND	0.00100	0.00200	mg/L	1	09/25/23 15:14	D6888-09	
<b>GS-091323-19 (A3I1089-05)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0791</b>		
Available Cyanide	ND	0.00100	0.00200	mg/L	1	09/25/23 15:16	D6888-09	
<b>GS-091323-20 (A3I1089-06)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0791</b>		
Available Cyanide	ND	0.00100	0.00200	mg/L	1	09/25/23 15:17	D6888-09	

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## ANALYTICAL SAMPLE RESULTS

## Free Cyanide by Microdiffusion/Colorimetric Spectrophotometry

Analyte	Sample Result	Detection Limit	Reporting Limit	Units	Dilution	Date Analyzed	Method Ref.	Notes
<b>GS-091323-15 (A3I1089-01)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0730</b>		
Free Cyanide	ND	0.00250	0.00500	mg/L	1	09/22/23 19:04	D4282-02	
<b>GS-091323-16 (A3I1089-02)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0730</b>		
Free Cyanide	ND	0.00250	0.00500	mg/L	1	09/22/23 19:13	D4282-02	
<b>GS-091323-17 (A3I1089-03)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0730</b>		
Free Cyanide	ND	0.00250	0.00500	mg/L	1	09/22/23 19:14	D4282-02	
<b>GS-091323-18 (A3I1089-04)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0730</b>		
Free Cyanide	ND	0.00250	0.00500	mg/L	1	09/22/23 19:22	D4282-02	
<b>GS-091323-19 (A3I1089-05)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0730</b>		
Free Cyanide	ND	0.00250	0.00500	mg/L	1	09/22/23 19:22	D4282-02	
<b>GS-091323-20 (A3I1089-06)</b>				<b>Matrix: WG</b>		<b>Batch: 23I0730</b>		
Free Cyanide	ND	0.00250	0.00500	mg/L	1	09/22/23 19:22	D4282-02	

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A3I1089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Diesel and/or Oil Hydrocarbons by NWTPH-Dx

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 23I0768 - EPA 3510C (Fuels/Acid Ext.)						Water						
Blank (23I0768-BLK1)			Prepared: 09/25/23 06:40		Analyzed: 09/25/23 17:22							
NWTPH-Dx												
Diesel	ND	100	200	ug/L	1	---	---	---	---	---	---	
Oil	ND	200	400	ug/L	1	---	---	---	---	---	---	
Surr: o-Terphenyl (Surr)		Recovery: 103 %		Limits: 50-150 %		Dilution: 1x						
LCS (23I0768-BS1)			Prepared: 09/25/23 06:40		Analyzed: 09/25/23 17:43							
NWTPH-Dx												
Diesel	892	100	200	ug/L	1	1250	---	71	36-132%	---	---	
Surr: o-Terphenyl (Surr)		Recovery: 107 %		Limits: 50-150 %		Dilution: 1x						
LCS Dup (23I0768-BSD1)			Prepared: 09/25/23 06:40		Analyzed: 09/25/23 18:04							
NWTPH-Dx												
Diesel	861	100	200	ug/L	1	1250	---	69	36-132%	4	30%	
Surr: o-Terphenyl (Surr)		Recovery: 107 %		Limits: 50-150 %		Dilution: 1x						
Matrix Spike (23I0768-MS1)			Prepared: 09/25/23 06:40		Analyzed: 09/25/23 19:47							
QC Source Sample: Non-SDG (A3I0964-03)												
NWTPH-Dx												
Diesel	6390	95.2	190	ug/L	1	1190	5420	81	36-132%	---	---	
Surr: o-Terphenyl (Surr)		Recovery: 102 %		Limits: 50-150 %		Dilution: 1x						
Matrix Spike Dup (23I0768-MSD1)			Prepared: 09/25/23 06:40		Analyzed: 09/25/23 20:08							
QC Source Sample: Non-SDG (A3I0964-03)												
Diesel	6800	95.2	190	ug/L	1	1190	5420	116	36-132%	6	30%	
Surr: o-Terphenyl (Surr)		Recovery: 106 %		Limits: 50-150 %		Dilution: 1x						
Batch 23I0812 - EPA 3510C (Fuels/Acid Ext.)						Water						
Blank (23I0812-BLK1)			Prepared: 09/26/23 06:38		Analyzed: 09/26/23 19:21							
NWTPH-Dx												
Diesel	ND	100	200	ug/L	1	---	---	---	---	---	---	
Oil	ND	200	400	ug/L	1	---	---	---	---	---	---	

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## QUALITY CONTROL (QC) SAMPLE RESULTS

## Diesel and/or Oil Hydrocarbons by NWTPH-Dx

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes	
Batch 23I0812 - EPA 3510C (Fuels/Acid Ext.)							Water						
Blank (23I0812-BLK1)			Prepared: 09/26/23 06:38		Analyzed: 09/26/23 19:21								
Surr: o-Terphenyl (Surr)		Recovery: 92 %		Limits: 50-150 %		Dilution: 1x							
LCS (23I0812-BS1)			Prepared: 09/26/23 06:38		Analyzed: 09/26/23 19:45								
NWTPH-Dx													
Diesel	994	100	200	ug/L	1	1250	---	80	36-132%	---	---		
Surr: o-Terphenyl (Surr)		Recovery: 86 %		Limits: 50-150 %		Dilution: 1x							
LCS Dup (23I0812-BSD1)			Prepared: 09/26/23 06:38		Analyzed: 09/26/23 20:08								Q-19
NWTPH-Dx													
Diesel	987	100	200	ug/L	1	1250	---	79	36-132%	0.7	30%		
Surr: o-Terphenyl (Surr)		Recovery: 87 %		Limits: 50-150 %		Dilution: 1x							

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## QUALITY CONTROL (QC) SAMPLE RESULTS

## Gasoline Range Hydrocarbons (Benzene through Naphthalene) by NWTPH-Gx

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 23I0616 - EPA 5030C						Water						
Blank (23I0616-BLK1)			Prepared: 09/20/23 12:00			Analyzed: 09/20/23 14:36						
<u>NWTPH-Gx (MS)</u>												
Gasoline Range Organics	ND	50.0	100	ug/L	1	---	---	---	---	---	---	
Surr: 4-Bromofluorobenzene (Sur)		Recovery:	88 %	Limits:	50-150 %		Dilution:	1x				
1,4-Difluorobenzene (Sur)			118 %		50-150 %			"				
LCS (23I0616-BS2)			Prepared: 09/20/23 12:00			Analyzed: 09/20/23 13:59						
<u>NWTPH-Gx (MS)</u>												
Gasoline Range Organics	578	50.0	100	ug/L	1	500	---	116	80-120%	---	---	
Surr: 4-Bromofluorobenzene (Sur)		Recovery:	90 %	Limits:	50-150 %		Dilution:	1x				
1,4-Difluorobenzene (Sur)			114 %		50-150 %			"				
Duplicate (23I0616-DUP1)			Prepared: 09/20/23 12:00			Analyzed: 09/20/23 20:02						
<u>QC Source Sample: Non-SDG (A3I1165-04)</u>												
Gasoline Range Organics	2600	50.0	100	ug/L	1	---	3540	---	---	31	30%	Q-17
Surr: 4-Bromofluorobenzene (Sur)		Recovery:	97 %	Limits:	50-150 %		Dilution:	1x				
1,4-Difluorobenzene (Sur)			114 %		50-150 %			"				
Duplicate (23I0616-DUP2)			Prepared: 09/20/23 12:00			Analyzed: 09/20/23 21:32						
<u>QC Source Sample: GS-091323-16 (A3I1089-02)</u>												
<u>NWTPH-Gx (MS)</u>												
Gasoline Range Organics	ND	2500	5000	ug/L	50	---	ND	---	---	---	30%	
Surr: 4-Bromofluorobenzene (Sur)		Recovery:	89 %	Limits:	50-150 %		Dilution:	1x				
1,4-Difluorobenzene (Sur)			120 %		50-150 %			"				

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A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Gasoline Range Hydrocarbons (Benzene through Naphthalene) by NWTPH-Gx

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
Blank (2310764-BLK1)			Prepared: 09/24/23 11:11   Analyzed: 09/24/23 14:34									
<u>NWTPH-Gx (MS)</u>												
Gasoline Range Organics	ND	50.0	100	ug/L	1	---	---	---	---	---	---	
Surr: 4-Bromofluorobenzene (Sur)		Recovery: 94 %		Limits: 50-150 %		Dilution: 1x						
1,4-Difluorobenzene (Sur)		99 %		50-150 %		"						
LCS (2310764-BS2)			Prepared: 09/24/23 11:11   Analyzed: 09/24/23 13:27									
<u>NWTPH-Gx (MS)</u>												
Gasoline Range Organics	434	50.0	100	ug/L	1	500	---	87	80-120%	---	---	
Surr: 4-Bromofluorobenzene (Sur)		Recovery: 96 %		Limits: 50-150 %		Dilution: 1x						
1,4-Difluorobenzene (Sur)		100 %		50-150 %		"						
Duplicate (2310764-DUP1)			Prepared: 09/24/23 11:11   Analyzed: 09/24/23 22:31									
<u>QC Source Sample: Non-SDG (A311094-03)</u>												
Gasoline Range Organics	3470	2500	5000	ug/L	50	---	3810	---	---	9	30%	
Surr: 4-Bromofluorobenzene (Sur)		Recovery: 96 %		Limits: 50-150 %		Dilution: 1x						
1,4-Difluorobenzene (Sur)		102 %		50-150 %		"						

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## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
Blank (2310764-BLK1)			Prepared: 09/24/23 11:11		Analyzed: 09/24/23 14:34							
EPA 8260D												
Acetone	ND	10.0	20.0	ug/L	1	---	---	---	---	---	---	
Acrylonitrile	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
Benzene	ND	0.100	0.200	ug/L	1	---	---	---	---	---	---	
Bromobenzene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Bromochloromethane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Bromodichloromethane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Bromoform	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Bromomethane	ND	5.00	5.00	ug/L	1	---	---	---	---	---	---	
2-Butanone (MEK)	ND	5.00	10.0	ug/L	1	---	---	---	---	---	---	
n-Butylbenzene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
sec-Butylbenzene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
tert-Butylbenzene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Carbon disulfide	ND	5.00	10.0	ug/L	1	---	---	---	---	---	---	
Carbon tetrachloride	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Chlorobenzene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Chloroethane	ND	5.00	5.00	ug/L	1	---	---	---	---	---	---	
Chloroform	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Chloromethane	ND	2.50	5.00	ug/L	1	---	---	---	---	---	---	
2-Chlorotoluene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
4-Chlorotoluene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Dibromochloromethane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,2-Dibromo-3-chloropropane	ND	2.50	5.00	ug/L	1	---	---	---	---	---	---	
1,2-Dibromoethane (EDB)	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Dibromomethane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,2-Dichlorobenzene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
1,3-Dichlorobenzene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
1,4-Dichlorobenzene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Dichlorodifluoromethane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,1-Dichloroethane	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
1,2-Dichloroethane (EDC)	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
1,1-Dichloroethene	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
cis-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
trans-1,2-Dichloroethene	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	

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Darwin Thomas, Business Development Director

Page 36 of 62



## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

## Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
Blank (2310764-BLK1)						Prepared: 09/24/23 11:11 Analyzed: 09/24/23 14:34						
1,2-Dichloropropane	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
1,3-Dichloropropane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
2,2-Dichloropropane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,1-Dichloropropene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
cis-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
trans-1,3-Dichloropropene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Ethylbenzene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Hexachlorobutadiene	ND	2.50	5.00	ug/L	1	---	---	---	---	---	---	
2-Hexanone	ND	5.00	10.0	ug/L	1	---	---	---	---	---	---	
Isopropylbenzene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
4-Isopropyltoluene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Methylene chloride	ND	5.00	10.0	ug/L	1	---	---	---	---	---	---	
4-Methyl-2-pentanone (MIBK)	ND	5.00	10.0	ug/L	1	---	---	---	---	---	---	
Methyl tert-butyl ether (MTBE)	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Naphthalene	ND	2.50	5.00	ug/L	1	---	---	---	---	---	---	
n-Propylbenzene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Styrene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,1,1,2-Tetrachloroethane	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
1,1,2,2-Tetrachloroethane	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Tetrachloroethene (PCE)	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
Toluene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,2,3-Trichlorobenzene	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
1,2,4-Trichlorobenzene	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
1,1,1-Trichloroethane	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
1,1,2-Trichloroethane	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Trichloroethene (TCE)	ND	0.200	0.400	ug/L	1	---	---	---	---	---	---	
Trichlorofluoromethane	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
1,2,3-Trichloropropane	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,2,4-Trimethylbenzene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
1,3,5-Trimethylbenzene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Vinyl chloride	ND	0.100	0.200	ug/L	1	---	---	---	---	---	---	
m,p-Xylene	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
o-Xylene	ND	0.250	0.500	ug/L	1	---	---	---	---	---	---	
Surr: 1,4-Difluorobenzene (Surr) Recovery: 98 % Limits: 80-120 % Dilution: 1x												

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Darwin Thomas, Business Development Director

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## ANALYTICAL REPORT

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6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
Blank (2310764-BLK1)			Prepared: 09/24/23 11:11		Analyzed: 09/24/23 14:34							
Surr: Toluene-d8 (Surr)		Recovery: 103 %		Limits: 80-120 %		Dilution: 1x						
4-Bromofluorobenzene (Surr)		102 %		80-120 %		"						
LCS (2310764-BS1)			Prepared: 09/24/23 11:11		Analyzed: 09/24/23 13:49							
EPA 8260D												
Acetone	37.6	10.0	20.0	ug/L	1	40.0	---	94	80-120%	---	---	
Acrylonitrile	19.2	1.00	2.00	ug/L	1	20.0	---	96	80-120%	---	---	
Benzene	20.6	0.100	0.200	ug/L	1	20.0	---	103	80-120%	---	---	
Bromobenzene	20.5	0.250	0.500	ug/L	1	20.0	---	103	80-120%	---	---	
Bromochloromethane	21.1	0.500	1.00	ug/L	1	20.0	---	106	80-120%	---	---	
Bromodichloromethane	20.8	0.500	1.00	ug/L	1	20.0	---	104	80-120%	---	---	
Bromoform	19.7	0.500	1.00	ug/L	1	20.0	---	99	80-120%	---	---	
Bromomethane	22.6	5.00	5.00	ug/L	1	20.0	---	113	80-120%	---	---	
2-Butanone (MEK)	39.1	5.00	10.0	ug/L	1	40.0	---	98	80-120%	---	---	
n-Butylbenzene	23.6	0.500	1.00	ug/L	1	20.0	---	118	80-120%	---	---	
sec-Butylbenzene	24.0	0.500	1.00	ug/L	1	20.0	---	120	80-120%	---	---	
tert-Butylbenzene	23.0	0.500	1.00	ug/L	1	20.0	---	115	80-120%	---	---	
Carbon disulfide	22.2	5.00	10.0	ug/L	1	20.0	---	111	80-120%	---	---	
Carbon tetrachloride	20.9	0.500	1.00	ug/L	1	20.0	---	105	80-120%	---	---	
Chlorobenzene	21.3	0.250	0.500	ug/L	1	20.0	---	107	80-120%	---	---	
Chloroethane	20.3	5.00	5.00	ug/L	1	20.0	---	101	80-120%	---	---	
Chloroform	20.2	0.500	1.00	ug/L	1	20.0	---	101	80-120%	---	---	
Chloromethane	18.8	2.50	5.00	ug/L	1	20.0	---	94	80-120%	---	---	
2-Chlorotoluene	21.3	0.500	1.00	ug/L	1	20.0	---	107	80-120%	---	---	
4-Chlorotoluene	22.7	0.500	1.00	ug/L	1	20.0	---	114	80-120%	---	---	
Dibromochloromethane	22.3	0.500	1.00	ug/L	1	20.0	---	112	80-120%	---	---	
1,2-Dibromo-3-chloropropane	20.7	2.50	5.00	ug/L	1	20.0	---	103	80-120%	---	---	
1,2-Dibromoethane (EDB)	21.5	0.250	0.500	ug/L	1	20.0	---	107	80-120%	---	---	
Dibromomethane	20.6	0.500	1.00	ug/L	1	20.0	---	103	80-120%	---	---	
1,2-Dichlorobenzene	22.0	0.250	0.500	ug/L	1	20.0	---	110	80-120%	---	---	
1,3-Dichlorobenzene	22.2	0.250	0.500	ug/L	1	20.0	---	111	80-120%	---	---	
1,4-Dichlorobenzene	20.8	0.250	0.500	ug/L	1	20.0	---	104	80-120%	---	---	
Dichlorodifluoromethane	20.6	0.500	1.00	ug/L	1	20.0	---	103	80-120%	---	---	
1,1-Dichloroethane	20.7	0.200	0.400	ug/L	1	20.0	---	104	80-120%	---	---	

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Darwin Thomas, Business Development Director

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Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

## Anchor QEA, LLC

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Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
LCS (2310764-BS1)						Prepared: 09/24/23 11:11 Analyzed: 09/24/23 13:49						
1,2-Dichloroethane (EDC)	21.1	0.200	0.400	ug/L	1	20.0	---	105	80-120%	---	---	
1,1-Dichloroethene	22.4	0.200	0.400	ug/L	1	20.0	---	112	80-120%	---	---	
cis-1,2-Dichloroethene	21.0	0.200	0.400	ug/L	1	20.0	---	105	80-120%	---	---	
trans-1,2-Dichloroethene	22.5	0.200	0.400	ug/L	1	20.0	---	113	80-120%	---	---	
1,2-Dichloropropane	20.6	0.250	0.500	ug/L	1	20.0	---	103	80-120%	---	---	
1,3-Dichloropropane	21.3	0.500	1.00	ug/L	1	20.0	---	107	80-120%	---	---	
2,2-Dichloropropane	21.9	0.500	1.00	ug/L	1	20.0	---	110	80-120%	---	---	
1,1-Dichloropropene	21.0	0.500	1.00	ug/L	1	20.0	---	105	80-120%	---	---	
cis-1,3-Dichloropropene	22.3	0.500	1.00	ug/L	1	20.0	---	112	80-120%	---	---	
trans-1,3-Dichloropropene	22.7	0.500	1.00	ug/L	1	20.0	---	113	80-120%	---	---	
Ethylbenzene	22.3	0.250	0.500	ug/L	1	20.0	---	111	80-120%	---	---	
Hexachlorobutadiene	21.9	2.50	5.00	ug/L	1	20.0	---	110	80-120%	---	---	
2-Hexanone	42.2	5.00	10.0	ug/L	1	40.0	---	105	80-120%	---	---	
Isopropylbenzene	21.8	0.500	1.00	ug/L	1	20.0	---	109	80-120%	---	---	
4-Isopropyltoluene	23.1	0.500	1.00	ug/L	1	20.0	---	115	80-120%	---	---	
Methylene chloride	23.2	5.00	10.0	ug/L	1	20.0	---	116	80-120%	---	---	
4-Methyl-2-pentanone (MiBK)	43.6	5.00	10.0	ug/L	1	40.0	---	109	80-120%	---	---	
Methyl tert-butyl ether (MTBE)	21.6	0.500	1.00	ug/L	1	20.0	---	108	80-120%	---	---	
Naphthalene	20.5	2.50	5.00	ug/L	1	20.0	---	102	80-120%	---	---	
n-Propylbenzene	22.7	0.250	0.500	ug/L	1	20.0	---	113	80-120%	---	---	
Styrene	20.2	0.500	1.00	ug/L	1	20.0	---	101	80-120%	---	---	
1,1,1,2-Tetrachloroethane	21.3	0.200	0.400	ug/L	1	20.0	---	106	80-120%	---	---	
1,1,2,2-Tetrachloroethane	21.2	0.250	0.500	ug/L	1	20.0	---	106	80-120%	---	---	
Tetrachloroethene (PCE)	21.2	0.200	0.400	ug/L	1	20.0	---	106	80-120%	---	---	
Toluene	21.2	0.500	1.00	ug/L	1	20.0	---	106	80-120%	---	---	
1,2,3-Trichlorobenzene	22.1	1.00	2.00	ug/L	1	20.0	---	110	80-120%	---	---	
1,2,4-Trichlorobenzene	21.7	1.00	2.00	ug/L	1	20.0	---	109	80-120%	---	---	
1,1,1-Trichloroethane	21.4	0.200	0.400	ug/L	1	20.0	---	107	80-120%	---	---	
1,1,2-Trichloroethane	21.1	0.250	0.500	ug/L	1	20.0	---	105	80-120%	---	---	
Trichloroethene (TCE)	21.0	0.200	0.400	ug/L	1	20.0	---	105	80-120%	---	---	
Trichlorofluoromethane	21.2	1.00	2.00	ug/L	1	20.0	---	106	80-120%	---	---	
1,2,3-Trichloropropane	20.8	0.500	1.00	ug/L	1	20.0	---	104	80-120%	---	---	
1,2,4-Trimethylbenzene	24.2	0.500	1.00	ug/L	1	20.0	---	121	80-120%	---	---	Q-56
1,3,5-Trimethylbenzene	24.0	0.500	1.00	ug/L	1	20.0	---	120	80-120%	---	---	

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
LCS (2310764-BS1)						Prepared: 09/24/23 11:11 Analyzed: 09/24/23 13:49						
Vinyl chloride	21.1	0.100	0.200	ug/L	1	20.0	---	106	80-120%	---	---	
m,p-Xylene	47.9	0.500	1.00	ug/L	1	40.0	---	120	80-120%	---	---	
o-Xylene	22.7	0.250	0.500	ug/L	1	20.0	---	114	80-120%	---	---	
Surr: 1,4-Difluorobenzene (Surr)												
			Recovery:	99 %	Limits:	80-120 %	Dilution:	1x				
Toluene-d8 (Surr)				101 %		80-120 %		"				
4-Bromofluorobenzene (Surr)				97 %		80-120 %		"				

## Duplicate (2310764-DUP1)

Prepared: 09/24/23 11:11 Analyzed: 09/24/23 22:31

## QC Source Sample: Non-SDG (A311094-03)

Acetone	ND	500	1000	ug/L	50	---	ND	---	---	---	30%
Acrylonitrile	ND	50.0	100	ug/L	50	---	ND	---	---	---	30%
Benzene	ND	5.00	10.0	ug/L	50	---	ND	---	---	---	30%
Bromobenzene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%
Bromochloromethane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
Bromodichloromethane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
Bromoform	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
Bromomethane	ND	250	250	ug/L	50	---	ND	---	---	---	30%
2-Butanone (MEK)	ND	250	500	ug/L	50	---	ND	---	---	---	30%
n-Butylbenzene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
sec-Butylbenzene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
tert-Butylbenzene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
Carbon disulfide	ND	250	500	ug/L	50	---	ND	---	---	---	30%
Carbon tetrachloride	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
Chlorobenzene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%
Chloroethane	ND	250	250	ug/L	50	---	ND	---	---	---	30%
Chloroform	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
Chloromethane	ND	125	250	ug/L	50	---	ND	---	---	---	30%
2-Chlorotoluene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
4-Chlorotoluene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
Dibromochloromethane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
1,2-Dibromo-3-chloropropane	ND	125	250	ug/L	50	---	ND	---	---	---	30%
1,2-Dibromoethane (EDB)	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%
Dibromomethane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%
1,2-Dichlorobenzene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%

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## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
Duplicate (2310764-DUP1)			Prepared: 09/24/23 11:11		Analyzed: 09/24/23 22:31							
QC Source Sample: Non-SDG (A311094-03)												
1,3-Dichlorobenzene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	
1,4-Dichlorobenzene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	
Dichlorodifluoromethane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
1,1-Dichloroethane	ND	10.0	20.0	ug/L	50	---	ND	---	---	---	30%	
1,2-Dichloroethane (EDC)	ND	10.0	20.0	ug/L	50	---	ND	---	---	---	30%	
1,1-Dichloroethene	23.5	10.0	20.0	ug/L	50	---	20.0	---	---	16	30%	
cis-1,2-Dichloroethene	12500	10.0	20.0	ug/L	50	---	12400	---	---	0.8	30%	E
trans-1,2-Dichloroethene	39.0	10.0	20.0	ug/L	50	---	37.5	---	---	4	30%	
1,2-Dichloropropane	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	
1,3-Dichloropropane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
2,2-Dichloropropane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
1,1-Dichloropropene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
cis-1,3-Dichloropropene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
trans-1,3-Dichloropropene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
Ethylbenzene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	
Hexachlorobutadiene	ND	125	250	ug/L	50	---	ND	---	---	---	30%	
2-Hexanone	ND	250	500	ug/L	50	---	ND	---	---	---	30%	
Isopropylbenzene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
4-Isopropyltoluene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
Methylene chloride	ND	250	500	ug/L	50	---	ND	---	---	---	30%	
4-Methyl-2-pentanone (MiBK)	ND	250	500	ug/L	50	---	ND	---	---	---	30%	
Methyl tert-butyl ether (MTBE)	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
Naphthalene	ND	125	250	ug/L	50	---	ND	---	---	---	30%	
n-Propylbenzene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	
Styrene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
1,1,1,2-Tetrachloroethane	ND	10.0	20.0	ug/L	50	---	ND	---	---	---	30%	
1,1,2,2-Tetrachloroethane	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	
Tetrachloroethene (PCE)	800	10.0	20.0	ug/L	50	---	796	---	---	0.4	30%	
Toluene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
1,2,3-Trichlorobenzene	ND	50.0	100	ug/L	50	---	ND	---	---	---	30%	
1,2,4-Trichlorobenzene	ND	50.0	100	ug/L	50	---	ND	---	---	---	30%	
1,1,1-Trichloroethane	ND	10.0	20.0	ug/L	50	---	ND	---	---	---	30%	
1,1,2-Trichloroethane	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	

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Darwin Thomas, Business Development Director

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C												Water
Duplicate (2310764-DUP1)												Prepared: 09/24/23 11:11 Analyzed: 09/24/23 22:31
QC Source Sample: Non-SDG (A311094-03)												
Trichloroethene (TCE)	74.0	10.0	20.0	ug/L	50	---	71.0	---	---	4	30%	
Trichlorofluoromethane	ND	50.0	100	ug/L	50	---	ND	---	---	---	30%	
1,2,3-Trichloropropane	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
1,2,4-Trimethylbenzene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
1,3,5-Trimethylbenzene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
Vinyl chloride	ND	5.00	10.0	ug/L	50	---	ND	---	---	---	30%	
m,p-Xylene	ND	25.0	50.0	ug/L	50	---	ND	---	---	---	30%	
o-Xylene	ND	12.5	25.0	ug/L	50	---	ND	---	---	---	30%	
Surr: 1,4-Difluorobenzene (Surr)												Recovery: 100 % Limits: 80-120 % Dilution: 1x
Toluene-d8 (Surr)												103 % 80-120 % "
4-Bromofluorobenzene (Surr)												104 % 80-120 % "

## Matrix Spike (2310764-MS1)

Prepared: 09/24/23 11:11 Analyzed: 09/24/23 23:39

QC Source Sample: Non-SDG (A311115-02)

EPA 8260D												
Acetone	47.6	10.0	20.0	ug/L	1	40.0	ND	119	39-160%	---	---	
Acrylonitrile	21.4	1.00	2.00	ug/L	1	20.0	ND	107	63-135%	---	---	
Benzene	23.0	0.100	0.200	ug/L	1	20.0	ND	115	79-120%	---	---	
Bromobenzene	21.4	0.250	0.500	ug/L	1	20.0	ND	107	80-120%	---	---	
Bromochloromethane	23.6	0.500	1.00	ug/L	1	20.0	ND	118	78-123%	---	---	
Bromodichloromethane	23.6	0.500	1.00	ug/L	1	20.0	ND	118	79-125%	---	---	
Bromoform	20.8	0.500	1.00	ug/L	1	20.0	ND	104	66-130%	---	---	
Bromomethane	27.6	5.00	5.00	ug/L	1	20.0	ND	138	53-141%	---	---	
2-Butanone (MEK)	43.8	5.00	10.0	ug/L	1	40.0	ND	110	56-143%	---	---	
n-Butylbenzene	24.4	0.500	1.00	ug/L	1	20.0	ND	122	75-128%	---	---	
sec-Butylbenzene	24.9	0.500	1.00	ug/L	1	20.0	ND	125	77-126%	---	---	
tert-Butylbenzene	23.6	0.500	1.00	ug/L	1	20.0	ND	118	78-124%	---	---	
Carbon disulfide	28.4	5.00	10.0	ug/L	1	20.0	ND	142	64-133%	---	---	Q-01
Carbon tetrachloride	24.3	0.500	1.00	ug/L	1	20.0	ND	122	72-136%	---	---	
Chlorobenzene	22.5	0.250	0.500	ug/L	1	20.0	ND	112	80-120%	---	---	
Chloroethane	24.3	5.00	5.00	ug/L	1	20.0	ND	122	60-138%	---	---	
Chloroform	22.7	0.500	1.00	ug/L	1	20.0	ND	113	79-124%	---	---	
Chloromethane	21.8	2.50	5.00	ug/L	1	20.0	ND	109	50-139%	---	---	

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
Matrix Spike (2310764-MS1)			Prepared: 09/24/23 11:11		Analyzed: 09/24/23 23:39							
QC Source Sample: Non-SDG (A311115-02)												
2-Chlorotoluene	22.0	0.500	1.00	ug/L	1	20.0	ND	110	79-122%	---	---	
4-Chlorotoluene	22.7	0.500	1.00	ug/L	1	20.0	ND	113	78-122%	---	---	
Dibromochloromethane	22.8	0.500	1.00	ug/L	1	20.0	ND	114	74-126%	---	---	
1,2-Dibromo-3-chloropropane	21.0	2.50	5.00	ug/L	1	20.0	ND	105	62-128%	---	---	
1,2-Dibromoethane (EDB)	22.1	0.250	0.500	ug/L	1	20.0	ND	110	77-121%	---	---	
Dibromomethane	22.6	0.500	1.00	ug/L	1	20.0	ND	113	79-123%	---	---	
1,2-Dichlorobenzene	22.5	0.250	0.500	ug/L	1	20.0	ND	112	80-120%	---	---	
1,3-Dichlorobenzene	22.8	0.250	0.500	ug/L	1	20.0	ND	114	80-120%	---	---	
1,4-Dichlorobenzene	21.8	0.250	0.500	ug/L	1	20.0	ND	109	79-120%	---	---	
Dichlorodifluoromethane	25.0	0.500	1.00	ug/L	1	20.0	ND	125	32-152%	---	---	
1,1-Dichloroethane	24.1	0.200	0.400	ug/L	1	20.0	0.620	118	77-125%	---	---	
1,2-Dichloroethane (EDC)	23.5	0.200	0.400	ug/L	1	20.0	ND	117	73-128%	---	---	
1,1-Dichloroethene	28.6	0.200	0.400	ug/L	1	20.0	ND	143	71-131%	---	---	Q-01
cis-1,2-Dichloroethene	29.0	0.200	0.400	ug/L	1	20.0	5.89	116	78-123%	---	---	
trans-1,2-Dichloroethene	28.0	0.200	0.400	ug/L	1	20.0	ND	140	75-124%	---	---	Q-01
1,2-Dichloropropane	22.7	0.250	0.500	ug/L	1	20.0	ND	114	78-122%	---	---	
1,3-Dichloropropane	21.8	0.500	1.00	ug/L	1	20.0	ND	109	80-120%	---	---	
2,2-Dichloropropane	21.1	0.500	1.00	ug/L	1	20.0	ND	105	60-139%	---	---	
1,1-Dichloropropene	23.5	0.500	1.00	ug/L	1	20.0	ND	118	79-125%	---	---	
cis-1,3-Dichloropropene	19.9	0.500	1.00	ug/L	1	20.0	ND	99	75-124%	---	---	
trans-1,3-Dichloropropene	22.8	0.500	1.00	ug/L	1	20.0	ND	114	73-127%	---	---	
Ethylbenzene	23.6	0.250	0.500	ug/L	1	20.0	ND	118	79-121%	---	---	
Hexachlorobutadiene	22.5	2.50	5.00	ug/L	1	20.0	ND	112	66-134%	---	---	
2-Hexanone	42.3	5.00	10.0	ug/L	1	40.0	ND	106	57-139%	---	---	
Isopropylbenzene	22.7	0.500	1.00	ug/L	1	20.0	ND	114	72-131%	---	---	
4-Isopropyltoluene	23.6	0.500	1.00	ug/L	1	20.0	ND	118	77-127%	---	---	
Methylene chloride	26.2	5.00	10.0	ug/L	1	20.0	ND	131	74-124%	---	---	Q-01
4-Methyl-2-pentanone (MiBK)	46.1	5.00	10.0	ug/L	1	40.0	ND	115	67-130%	---	---	
Methyl tert-butyl ether (MTBE)	23.8	0.500	1.00	ug/L	1	20.0	ND	119	71-124%	---	---	
Naphthalene	19.9	2.50	5.00	ug/L	1	20.0	ND	99	61-128%	---	---	
n-Propylbenzene	24.0	0.250	0.500	ug/L	1	20.0	ND	120	76-126%	---	---	
Styrene	20.7	0.500	1.00	ug/L	1	20.0	ND	104	78-123%	---	---	
1,1,1,2-Tetrachloroethane	22.4	0.200	0.400	ug/L	1	20.0	ND	112	78-124%	---	---	

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## ANALYTICAL REPORT

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503-718-2323

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Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Volatile Organic Compounds by EPA 8260D

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310764 - EPA 5030C						Water						
Matrix Spike (2310764-MS1)			Prepared: 09/24/23 11:11		Analyzed: 09/24/23 23:39							
QC Source Sample: Non-SDG (A311115-02)												
1,1,2,2-Tetrachloroethane	22.4	0.250	0.500	ug/L	1	20.0	ND	112	71-121%	---	---	
Tetrachloroethene (PCE)	24.2	0.200	0.400	ug/L	1	20.0	1.08	115	74-129%	---	---	
Toluene	22.5	0.500	1.00	ug/L	1	20.0	ND	113	80-121%	---	---	
1,2,3-Trichlorobenzene	22.1	1.00	2.00	ug/L	1	20.0	ND	110	69-129%	---	---	
1,2,4-Trichlorobenzene	20.4	1.00	2.00	ug/L	1	20.0	ND	102	69-130%	---	---	
1,1,1-Trichloroethane	25.2	0.200	0.400	ug/L	1	20.0	0.310	124	74-131%	---	---	
1,1,2-Trichloroethane	22.0	0.250	0.500	ug/L	1	20.0	ND	110	80-120%	---	---	
Trichloroethene (TCE)	24.5	0.200	0.400	ug/L	1	20.0	1.69	114	79-123%	---	---	
Trichlorofluoromethane	27.6	1.00	2.00	ug/L	1	20.0	ND	138	65-141%	---	---	
1,2,3-Trichloropropane	21.9	0.500	1.00	ug/L	1	20.0	ND	110	73-122%	---	---	
1,2,4-Trimethylbenzene	24.5	0.500	1.00	ug/L	1	20.0	ND	123	76-124%	---	---	Q-54
1,3,5-Trimethylbenzene	24.9	0.500	1.00	ug/L	1	20.0	ND	125	75-124%	---	---	Q-01
Vinyl chloride	25.4	0.100	0.200	ug/L	1	20.0	ND	127	58-137%	---	---	
m,p-Xylene	50.8	0.500	1.00	ug/L	1	40.0	ND	127	80-121%	---	---	Q-01
o-Xylene	23.1	0.250	0.500	ug/L	1	20.0	ND	116	78-122%	---	---	
Surr: 1,4-Difluorobenzene (Surr)		Recovery: 103 %		Limits: 80-120 %		Dilution: 1x						
Toluene-d8 (Surr)		100 %		80-120 %		"						
4-Bromofluorobenzene (Surr)		94 %		80-120 %		"						

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 23I0493 - EPA 3511 (Bottle Extraction)						Water						
Blank (23I0493-BLK1)			Prepared: 09/15/23 13:22		Analyzed: 09/15/23 16:25							
EPA 8270E LVI												
Acenaphthene	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Acenaphthylene	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Anthracene	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Benz(a)anthracene	ND	0.00800	0.0160	ug/L	1	---	---	---	---	---	---	
Benzo(a)pyrene	ND	0.00800	0.0160	ug/L	1	---	---	---	---	---	---	
Benzo(b+j)fluoranthene(s)	ND	0.00800	0.0160	ug/L	1	---	---	---	---	---	---	
Benzo(k)fluoranthene	ND	0.00800	0.0160	ug/L	1	---	---	---	---	---	---	
Benzo(g,h,i)perylene	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Chrysene	ND	0.00800	0.0160	ug/L	1	---	---	---	---	---	---	
Dibenz(a,h)anthracene	ND	0.00800	0.0160	ug/L	1	---	---	---	---	---	---	
Fluoranthene	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Fluorene	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Indeno(1,2,3-cd)pyrene	ND	0.00800	0.0160	ug/L	1	---	---	---	---	---	---	
1-Methylnaphthalene	ND	0.0320	0.0640	ug/L	1	---	---	---	---	---	---	
2-Methylnaphthalene	ND	0.0320	0.0640	ug/L	1	---	---	---	---	---	---	
Naphthalene	ND	0.0320	0.0640	ug/L	1	---	---	---	---	---	---	
Phenanthrene	ND	0.0320	0.0640	ug/L	1	---	---	---	---	---	---	
Pyrene	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Carbazole	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Dibenzofuran	ND	0.0160	0.0320	ug/L	1	---	---	---	---	---	---	
Surr: Acenaphthylene-d8 (Surr)		Recovery: 101 %		Limits: 78-134 %		Dilution: 1x						
Benzo(a)pyrene-d12 (Surr)		111 %		80-132 %		"						

LCS (2310493-BS1)

Prepared: 09/15/23 13:22 Analyzed: 09/15/23 16:58

## EPA 8270E LVI

Acenaphthene	1.73	0.0160	0.0320	ug/L	1	1.60	---	108	80-120%	---	---
Acenaphthylene	1.79	0.0160	0.0320	ug/L	1	1.60	---	112	80-124%	---	---
Anthracene	1.79	0.0160	0.0320	ug/L	1	1.60	---	112	80-123%	---	---
Benz(a)anthracene	1.84	0.00800	0.0160	ug/L	1	1.60	---	115	80-122%	---	---
Benzo(a)pyrene	1.88	0.00800	0.0160	ug/L	1	1.60	---	117	80-129%	---	---
Benzo(b+j)fluoranthene(s)	1.85	0.00800	0.0160	ug/L	1	1.60	---	116	80-124%	---	---
Benzo(k)fluoranthene	1.88	0.00800	0.0160	ug/L	1	1.60	---	117	80-125%	---	---
Benzo(g,h,i)perylene	1.79	0.0160	0.0320	ug/L	1	1.60	---	112	80-120%	---	---

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Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310493 - EPA 3511 (Bottle Extraction)						Water						
LCS (2310493-BS1)						Prepared: 09/15/23 13:22 Analyzed: 09/15/23 16:58						
Chrysene	1.77	0.00800	0.0160	ug/L	1	1.60	---	111	80-120%	---	---	
Dibenz(a,h)anthracene	1.76	0.00800	0.0160	ug/L	1	1.60	---	110	80-120%	---	---	
Fluoranthene	1.97	0.0160	0.0320	ug/L	1	1.60	---	123	80-126%	---	---	
Fluorene	1.81	0.0160	0.0320	ug/L	1	1.60	---	113	77-127%	---	---	
Indeno(1,2,3-cd)pyrene	1.79	0.00800	0.0160	ug/L	1	1.60	---	112	80-121%	---	---	
1-Methylnaphthalene	1.71	0.0320	0.0640	ug/L	1	1.60	---	107	53-148%	---	---	
2-Methylnaphthalene	1.66	0.0320	0.0640	ug/L	1	1.60	---	104	48-150%	---	---	
Naphthalene	1.81	0.0320	0.0640	ug/L	1	1.60	---	113	78-120%	---	---	
Phenanthrene	1.71	0.0320	0.0640	ug/L	1	1.60	---	107	80-120%	---	---	
Pyrene	1.99	0.0160	0.0320	ug/L	1	1.60	---	125	80-125%	---	---	
Carbazole	1.75	0.0160	0.0320	ug/L	1	1.60	---	109	65-141%	---	---	
Dibenzofuran	1.71	0.0160	0.0320	ug/L	1	1.60	---	107	76-121%	---	---	
Surr: Acenaphthylene-d8 (Surr) Recovery: 97 % Limits: 78-134 % Dilution: 1x												
Benzo(a)pyrene-d12 (Surr) 113 % 80-132 % "												

LCS Dup (2310493-BSD1)				Prepared: 09/15/23 13:22    Analyzed: 09/15/23 17:31								Q-19
EPA 8270E LVI												
Acenaphthene	1.74	0.0160	0.0320	ug/L	1	1.60	---	109	80-120%	0.6	30%	
Acenaphthylene	1.78	0.0160	0.0320	ug/L	1	1.60	---	112	80-124%	0.3	30%	
Anthracene	1.79	0.0160	0.0320	ug/L	1	1.60	---	112	80-123%	0.04	30%	
Benz(a)anthracene	1.87	0.00800	0.0160	ug/L	1	1.60	---	117	80-122%	1	30%	
Benzo(a)pyrene	1.89	0.00800	0.0160	ug/L	1	1.60	---	118	80-129%	0.6	30%	
Benzo(b+j)fluoranthene(s)	1.87	0.00800	0.0160	ug/L	1	1.60	---	117	80-124%	1	30%	
Benzo(k)fluoranthene	1.90	0.00800	0.0160	ug/L	1	1.60	---	119	80-125%	1	30%	
Benzo(g,h,i)perylene	1.80	0.0160	0.0320	ug/L	1	1.60	---	112	80-120%	0.8	30%	
Chrysene	1.78	0.00800	0.0160	ug/L	1	1.60	---	111	80-120%	0.2	30%	
Dibenz(a,h)anthracene	1.78	0.00800	0.0160	ug/L	1	1.60	---	111	80-120%	1	30%	
Fluoranthene	2.01	0.0160	0.0320	ug/L	1	1.60	---	126	80-126%	2	30%	
Fluorene	1.84	0.0160	0.0320	ug/L	1	1.60	---	115	77-127%	2	30%	
Indeno(1,2,3-cd)pyrene	1.81	0.00800	0.0160	ug/L	1	1.60	---	113	80-121%	1	30%	
1-Methylnaphthalene	1.67	0.0320	0.0640	ug/L	1	1.60	---	104	53-148%	3	30%	
2-Methylnaphthalene	1.63	0.0320	0.0640	ug/L	1	1.60	---	102	48-150%	2	30%	
Naphthalene	1.82	0.0320	0.0640	ug/L	1	1.60	---	114	78-120%	0.09	30%	
Phenanthrene	1.75	0.0320	0.0640	ug/L	1	1.60	---	109	80-120%	2	30%	

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ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
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503-718-2323  
ORELAP ID: OR100062

Anchor QEA, LLC

6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

Project: Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon

Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

QUALITY CONTROL (QC) SAMPLE RESULTS

Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 23I0493 - EPA 3511 (Bottle Extraction)						Water						
LCS Dup (23I0493-BSD1)			Prepared: 09/15/23 13:22 Analyzed: 09/15/23 17:31								Q-19	
Pyrene	1.99	0.0160	0.0320	ug/L	1	1.60	---	124	80-125%	0.4	30%	
Carbazole	1.77	0.0160	0.0320	ug/L	1	1.60	---	111	65-141%	2	30%	
Dibenzofuran	1.76	0.0160	0.0320	ug/L	1	1.60	---	110	76-121%	3	30%	
Surr: Acenaphthylene-d8 (Surr)		Recovery: 99 %		Limits: 78-134 %		Dilution: 1x						
Benzo(a)pyrene-d12 (Surr)		112 %		80-132 %		"						

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Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Total Metals by EPA 6020B (ICPMS)

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310737 - EPA 3015A						Water						
Blank (2310737-BLK1)			Prepared: 09/22/23 10:19		Analyzed: 09/23/23 02:33							
EPA 6020B												
Aluminum	ND	25.0	50.0	ug/L	1	---	---	---	---	---	---	
Antimony	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Arsenic	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Barium	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
Beryllium	ND	0.100	0.200	ug/L	1	---	---	---	---	---	---	
Cadmium	ND	0.100	0.200	ug/L	1	---	---	---	---	---	---	
Chromium	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
Copper	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
Iron	ND	25.0	50.0	ug/L	1	---	---	---	---	---	---	
Lead	ND	0.110	0.200	ug/L	1	---	---	---	---	---	---	
Manganese	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Mercury	ND	0.0400	0.0800	ug/L	1	---	---	---	---	---	---	
Nickel	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
Selenium	ND	0.500	1.00	ug/L	1	---	---	---	---	---	---	
Silver	ND	0.100	0.200	ug/L	1	---	---	---	---	---	---	
Thallium	ND	0.100	0.200	ug/L	1	---	---	---	---	---	---	
Vanadium	ND	1.00	2.00	ug/L	1	---	---	---	---	---	---	
Zinc	ND	2.00	4.00	ug/L	1	---	---	---	---	---	---	

## LCS (2310737-BS1)

Prepared: 09/22/23 10:19 Analyzed: 09/23/23 02:38

EPA 6020B												
Aluminum	2810	25.0	50.0	ug/L	1	2780	---	101	80-120%	---	---	
Antimony	27.5	0.500	1.00	ug/L	1	27.8	---	99	80-120%	---	---	
Arsenic	52.6	0.500	1.00	ug/L	1	55.6	---	95	80-120%	---	---	
Barium	55.7	1.00	2.00	ug/L	1	55.6	---	100	80-120%	---	---	
Beryllium	26.5	0.100	0.200	ug/L	1	27.8	---	95	80-120%	---	---	
Cadmium	52.8	0.100	0.200	ug/L	1	55.6	---	95	80-120%	---	---	
Chromium	55.2	1.00	2.00	ug/L	1	55.6	---	99	80-120%	---	---	
Copper	57.1	1.00	2.00	ug/L	1	55.6	---	103	80-120%	---	---	
Iron	2890	25.0	50.0	ug/L	1	2780	---	104	80-120%	---	---	
Lead	54.5	0.110	0.200	ug/L	1	55.6	---	98	80-120%	---	---	
Manganese	55.7	0.500	1.00	ug/L	1	55.6	---	100	80-120%	---	---	
Mercury	1.05	0.0400	0.0800	ug/L	1	1.11	---	95	80-120%	---	---	

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Total Metals by EPA 6020B (ICPMS)

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 23I0737 - EPA 3015A						Water						
LCS (23I0737-BS1)						Prepared: 09/22/23 10:19 Analyzed: 09/23/23 02:38						
Nickel	56.8	1.00	2.00	ug/L	1	55.6	---	102	80-120%	---	---	
Selenium	26.1	0.500	1.00	ug/L	1	27.8	---	94	80-120%	---	---	
Silver	29.8	0.100	0.200	ug/L	1	27.8	---	107	80-120%	---	---	
Thallium	26.7	0.100	0.200	ug/L	1	27.8	---	96	80-120%	---	---	
Vanadium	55.2	1.00	2.00	ug/L	1	55.6	---	99	80-120%	---	---	
Zinc	55.0	2.00	4.00	ug/L	1	55.6	---	99	80-120%	---	---	

## Duplicate (23I0737-DUP1)

Prepared: 09/22/23 10:19 Analyzed: 09/23/23 02:48

QC Source Sample: GS-091323-15 (A3I1089-01)

## EPA 6020B

Aluminum	54.4	25.0	50.0	ug/L	1	---	66.5	---	---	20	20%	
Antimony	ND	0.500	1.00	ug/L	1	---	ND	---	---	---	20%	
Arsenic	1.21	0.500	1.00	ug/L	1	---	1.14	---	---	7	20%	
Barium	55.4	1.00	2.00	ug/L	1	---	54.3	---	---	2	20%	
Beryllium	ND	0.100	0.200	ug/L	1	---	ND	---	---	---	20%	
Cadmium	0.106	0.100	0.200	ug/L	1	---	ND	---	---	---	20%	J
Chromium	ND	1.00	2.00	ug/L	1	---	ND	---	---	---	20%	
Copper	ND	1.00	2.00	ug/L	1	---	ND	---	---	---	20%	
Iron	7740	25.0	50.0	ug/L	1	---	7630	---	---	1	20%	
Lead	0.181	0.110	0.200	ug/L	1	---	0.161	---	---	12	20%	J
Mercury	ND	0.0400	0.0800	ug/L	1	---	ND	---	---	---	20%	
Nickel	254	1.00	2.00	ug/L	1	---	253	---	---	0.7	20%	
Selenium	ND	0.500	1.00	ug/L	1	---	ND	---	---	---	20%	
Silver	ND	0.100	0.200	ug/L	1	---	ND	---	---	---	20%	
Thallium	ND	0.100	0.200	ug/L	1	---	ND	---	---	---	20%	
Zinc	8.23	2.00	4.00	ug/L	1	---	8.69	---	---	6	20%	

## Duplicate (23I0737-DUP2)

Prepared: 09/22/23 10:19 Analyzed: 09/25/23 19:44

QC Source Sample: GS-091323-15 (A3I1089-01RE1)

## EPA 6020B

Manganese	5720	5.00	10.0	ug/L	10	---	5680	---	---	0.8	20%	Q-16
Vanadium	1080	10.0	20.0	ug/L	10	---	1090	---	---	0.8	20%	Q-16

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Portland, OR 97219

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Total Metals by EPA 6020B (ICPMS)

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 23I0737 - EPA 3015A						Water						
Matrix Spike (23I0737-MS1)			Prepared: 09/22/23 10:19    Analyzed: 09/23/23 02:53									
QC Source Sample: GS-091323-15 (A3I1089-01)												
EPA 6020B												
Aluminum	2840	25.0	50.0	ug/L	1	2780	66.5	100	75-125%	---	---	
Antimony	29.3	0.500	1.00	ug/L	1	27.8	ND	106	75-125%	---	---	
Arsenic	55.4	0.500	1.00	ug/L	1	55.6	1.14	98	75-125%	---	---	
Barium	110	1.00	2.00	ug/L	1	55.6	54.3	101	75-125%	---	---	
Beryllium	27.2	0.100	0.200	ug/L	1	27.8	ND	98	75-125%	---	---	
Cadmium	55.5	0.100	0.200	ug/L	1	55.6	ND	100	75-125%	---	---	
Chromium	55.7	1.00	2.00	ug/L	1	55.6	ND	100	75-125%	---	---	
Copper	56.8	1.00	2.00	ug/L	1	55.6	ND	102	75-125%	---	---	
Iron	10500	25.0	50.0	ug/L	1	2780	7630	103	75-125%	---	---	
Lead	54.2	0.110	0.200	ug/L	1	55.6	0.161	97	75-125%	---	---	
Manganese	5300	0.500	1.00	ug/L	1	55.6	5280	45	75-125%	---	---	E, Q-65
Mercury	1.08	0.0400	0.0800	ug/L	1	1.11	ND	97	75-125%	---	---	
Nickel	310	1.00	2.00	ug/L	1	55.6	253	103	75-125%	---	---	
Selenium	27.8	0.500	1.00	ug/L	1	27.8	ND	100	75-125%	---	---	
Silver	30.4	0.100	0.200	ug/L	1	27.8	ND	109	75-125%	---	---	
Thallium	27.0	0.100	0.200	ug/L	1	27.8	ND	97	75-125%	---	---	
Vanadium	1050	1.00	2.00	ug/L	1	55.6	1000	93	75-125%	---	---	E
Zinc	63.2	2.00	4.00	ug/L	1	55.6	8.69	98	75-125%	---	---	

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

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A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Total Cyanide by Flow Analysis (Aqueous)

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310817 - Lachat Micro Dist - aqueous						Water						
Blank (2310817-BLK1)			Prepared: 09/26/23 08:54   Analyzed: 09/26/23 15:58									
<u>EPA 335.4</u>												
Total Cyanide	ND	0.00500	0.00500	mg/L	1	---	---	---	---	---	---	
LCS (2310817-BS1)			Prepared: 09/26/23 08:54   Analyzed: 09/26/23 16:00									
<u>EPA 335.4</u>												
Total Cyanide	0.249	0.00500	0.00500	mg/L	1	0.250	---	100	90-110%	---	---	
Duplicate (2310817-DUP2)			Prepared: 09/26/23 08:54   Analyzed: 09/26/23 17:40									
<u>QC Source Sample: Non-SDG (A311074-12RE1)</u>												
Total Cyanide	2.60	0.0500	0.0500	mg/L	10	---	2.56	---	---	2	10%	Q-16
Matrix Spike (2310817-MS1)			Prepared: 09/26/23 08:54   Analyzed: 09/26/23 16:50									
<u>QC Source Sample: Non-SDG (A311199-01)</u>												
<u>EPA 335.4</u>												
Total Cyanide	0.298	0.00500	0.00500	mg/L	1	0.250	0.0383	104	90-110%	---	---	
Matrix Spike (2310817-MS3)			Prepared: 09/26/23 08:54   Analyzed: 09/26/23 17:42									
<u>QC Source Sample: Non-SDG (A311074-12RE1)</u>												
<u>EPA 335.4</u>												
Total Cyanide	2.75	0.0500	0.0500	mg/L	10	0.250	2.56	76	90-110%	---	---	Q-03, Q-16
Matrix Spike Dup (2310817-MSD1)			Prepared: 09/26/23 08:54   Analyzed: 09/26/23 16:52									
<u>QC Source Sample: Non-SDG (A311199-01)</u>												
Total Cyanide	0.290	0.00500	0.00500	mg/L	1	0.250	0.0383	101	90-110%	3	10%	

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Project Manager: John Renda

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A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Available Cyanide by FIA, Ligand Exchange and Amperometric Detection

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310791 - Method Prep: Aq						Water						
Blank (2310791-BLK1)			Prepared: 09/25/23 11:23		Analyzed: 09/25/23 15:03							
<u>D6888-09</u>												
Available Cyanide	ND	0.00100	0.00200	mg/L	1	---	---	---	---	---	---	
LCS (2310791-BS1)			Prepared: 09/25/23 11:23		Analyzed: 09/25/23 15:05							
<u>D6888-09</u>												
Available Cyanide	0.0283	0.00100	0.00200	mg/L	1	0.0250	---	113	90-117%	---	---	
Matrix Spike (2310791-MS1)			Prepared: 09/25/23 11:23		Analyzed: 09/25/23 15:31							
<u>QC Source Sample: Non-SDG (A311199-01)</u>												
<u>D6888-09</u>												
Available Cyanide	0.0253	0.00101	0.00201	mg/L	1	0.0251	ND	101	82-130%	---	---	
Matrix Spike (2310791-MS2)			Prepared: 09/25/23 11:23		Analyzed: 09/25/23 15:55							
<u>QC Source Sample: Non-SDG (A311285-02)</u>												
<u>D6888-09</u>												
Available Cyanide	0.0200	0.00101	0.00201	mg/L	1	0.0251	ND	80	82-130%	---	---	Q-02
Matrix Spike Dup (2310791-MSD1)			Prepared: 09/25/23 11:23		Analyzed: 09/25/23 15:32							
<u>QC Source Sample: Non-SDG (A311199-01)</u>												
Available Cyanide	0.0259	0.00101	0.00201	mg/L	1	0.0251	ND	103	82-130%	2	11%	
Matrix Spike Dup (2310791-MSD2)			Prepared: 09/25/23 11:23		Analyzed: 09/25/23 15:56							
<u>QC Source Sample: Non-SDG (A311285-02)</u>												
Available Cyanide	0.0195	0.00101	0.00201	mg/L	1	0.0251	ND	78	82-130%	2	11%	Q-02

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Project Manager: John Renda

Report ID:

A311089 - 12 05 23 0550

## QUALITY CONTROL (QC) SAMPLE RESULTS

## Free Cyanide by Microdiffusion/Colorimetric Spectrophotometry

Analyte	Result	Detection Limit	Reporting Limit	Units	Dilution	Spike Amount	Source Result	% REC	% REC Limits	RPD	RPD Limit	Notes
Batch 2310730 - Microdiffusion						Water						
Blank (2310730-BLK1)			Prepared: 09/22/23 13:30		Analyzed: 09/22/23 18:53							
<u>D4282-02</u>												
Free Cyanide	ND	0.00250	0.00500	mg/L	1	---	---	---	---	---	---	
LCS (2310730-BS1)			Prepared: 09/22/23 13:30		Analyzed: 09/22/23 18:53							
<u>D4282-02</u>												
Free Cyanide	0.0648	0.00250	0.00500	mg/L	1	0.0667	---	97	74-120%	---	---	
LCS Dup (2310730-BSD1)			Prepared: 09/22/23 13:30		Analyzed: 09/22/23 18:53							
<u>D4282-02</u>												
Free Cyanide	0.0501	0.00250	0.00500	mg/L	1	0.0667	---	75	74-120%	26	20%	Q-24
Duplicate (2310730-DUP1)			Prepared: 09/22/23 13:30		Analyzed: 09/22/23 19:04							
<u>QC Source Sample: GS-091323-15 (A311089-01)</u>												
<u>D4282-02</u>												
Free Cyanide	ND	0.00250	0.00500	mg/L	1	---	ND	---	---	---	20%	
Matrix Spike (2310730-MS1)			Prepared: 09/22/23 13:30		Analyzed: 09/22/23 19:12							
<u>QC Source Sample: GS-091323-15 (A311089-01)</u>												
<u>D4282-02</u>												
Free Cyanide	0.0618	0.00250	0.00500	mg/L	1	0.0667	ND	93	74-120%	---	---	

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Darwin Thomas, Business Development Director

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**ANALYTICAL REPORT****Apex Laboratories, LLC**6700 S.W. Sandburg Street  
Tigard, OR 97223  
503-718-2323  
ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550****SAMPLE PREPARATION INFORMATION****Diesel and/or Oil Hydrocarbons by NWTPH-Dx****Prep: EPA 3510C (Fuels/Acid Ext.)**

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
<b>Batch: 2310768</b>							
A311089-01	WG	NWTPH-Dx	09/13/23 08:40	09/25/23 11:04	1040mL/5mL	1000mL/5mL	0.96
A311089-02	WG	NWTPH-Dx	09/13/23 10:10	09/25/23 11:04	1040mL/5mL	1000mL/5mL	0.96
A311089-03	WG	NWTPH-Dx	09/13/23 10:30	09/25/23 11:04	1040mL/5mL	1000mL/5mL	0.96
A311089-04	WG	NWTPH-Dx	09/13/23 10:40	09/25/23 11:04	1040mL/5mL	1000mL/5mL	0.96
<b>Batch: 2310812</b>							
A311089-05	WG	NWTPH-Dx	09/13/23 12:40	09/26/23 06:40	1050mL/5mL	1000mL/5mL	0.95
A311089-06	WG	NWTPH-Dx	09/13/23 15:05	09/26/23 06:40	1040mL/5mL	1000mL/5mL	0.96

**Gasoline Range Hydrocarbons (Benzene through Naphthalene) by NWTPH-Gx****Prep: EPA 5030C**

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
<b>Batch: 2310764</b>							
A311089-01RE1	WG	NWTPH-Gx (MS)	09/13/23 08:40	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-02RE1	WG	NWTPH-Gx (MS)	09/13/23 10:10	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-03RE1	WG	NWTPH-Gx (MS)	09/13/23 10:30	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-04RE1	WG	NWTPH-Gx (MS)	09/13/23 10:40	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-05RE1	WG	NWTPH-Gx (MS)	09/13/23 12:40	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-06RE1	WG	NWTPH-Gx (MS)	09/13/23 15:05	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00

**Volatile Organic Compounds by EPA 8260D****Prep: EPA 5030C**

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
<b>Batch: 2310764</b>							
A311089-01RE1	WG	EPA 8260D	09/13/23 08:40	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-02RE1	WG	EPA 8260D	09/13/23 10:10	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-03RE1	WG	EPA 8260D	09/13/23 10:30	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-04RE1	WG	EPA 8260D	09/13/23 10:40	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-05RE1	WG	EPA 8260D	09/13/23 12:40	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-06RE1	WG	EPA 8260D	09/13/23 15:05	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00
A311089-07	W	EPA 8260D	09/13/23 15:30	09/24/23 12:58	5mL/5mL	5mL/5mL	1.00

**Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)**

Apex Laboratories

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Darwin Thomas, Business Development Director

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**ANALYTICAL REPORT****Apex Laboratories, LLC**

6700 S.W. Sandburg Street

Tigard, OR 97223

503-718-2323

ORELAP ID: OR100062

**Anchor QEA, LLC**

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550****SAMPLE PREPARATION INFORMATION****Polyaromatic Hydrocarbons (PAHs) by EPA 8270E (Large Volume Injection)****Prep: EPA 3511 (Bottle Extraction)**

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
Batch: 2310493							
A311089-01RE2	WG	EPA 8270E LVI	09/13/23 08:40	09/15/23 13:33	105.15mL/5mL	125mL/5mL	1.19
A311089-02RE1	WG	EPA 8270E LVI	09/13/23 10:10	09/15/23 13:33	118.23mL/5mL	125mL/5mL	1.06
A311089-03RE2	WG	EPA 8270E LVI	09/13/23 10:30	09/15/23 13:33	105.21mL/5mL	125mL/5mL	1.19
A311089-04RE2	WG	EPA 8270E LVI	09/13/23 10:40	09/15/23 13:33	91.15mL/5mL	125mL/5mL	1.37
A311089-05RE2	WG	EPA 8270E LVI	09/13/23 12:40	09/15/23 13:33	106.93mL/5mL	125mL/5mL	1.17
A311089-06RE1	WG	EPA 8270E LVI	09/13/23 15:05	09/15/23 13:33	106.66mL/5mL	125mL/5mL	1.17
A311089-06RE2	WG	EPA 8270E LVI	09/13/23 15:05	09/15/23 13:33	106.66mL/5mL	125mL/5mL	1.17

**Total Metals by EPA 6020B (ICPMS)****Prep: EPA 3015A**

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
Batch: 2310737							
A311089-01	WG	EPA 6020B	09/13/23 08:40	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00
A311089-01RE1	WG	EPA 6020B	09/13/23 08:40	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00
A311089-02	WG	EPA 6020B	09/13/23 10:10	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00
A311089-03	WG	EPA 6020B	09/13/23 10:30	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00
A311089-04	WG	EPA 6020B	09/13/23 10:40	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00
A311089-05	WG	EPA 6020B	09/13/23 12:40	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00
A311089-06	WG	EPA 6020B	09/13/23 15:05	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00
A311089-06RE1	WG	EPA 6020B	09/13/23 15:05	09/22/23 10:19	45mL/50mL	45mL/50mL	1.00

**Total Cyanide by Flow Analysis (Aqueous)****Prep: Lachat Micro Dist - aqueous**

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
Batch: 2310817							
A311089-01	WG	EPA 335.4	09/13/23 08:40	09/26/23 08:54	6mL/6mL	6mL/6mL	1.00
A311089-02	WG	EPA 335.4	09/13/23 10:10	09/26/23 08:54	6mL/6mL	6mL/6mL	1.00
A311089-03	WG	EPA 335.4	09/13/23 10:30	09/26/23 08:54	6mL/6mL	6mL/6mL	1.00
A311089-04	WG	EPA 335.4	09/13/23 10:40	09/26/23 08:54	6mL/6mL	6mL/6mL	1.00
A311089-05	WG	EPA 335.4	09/13/23 12:40	09/26/23 08:54	6mL/6mL	6mL/6mL	1.00
A311089-06	WG	EPA 335.4	09/13/23 15:05	09/26/23 08:54	6mL/6mL	6mL/6mL	1.00

**Available Cyanide by FIA, Ligand Exchange and Amperometric Detection**

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## ANALYTICAL REPORT

Apex Laboratories, LLC

6700 S.W. Sandburg Street  
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ORELAP ID: OR100062**Anchor QEA, LLC**6720 SW Macadam Ave. Suite 125  
Portland, OR 97219Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**Project Number: **000029-02.84 T-01.001E**Project Manager: **John Renda****Report ID:****A311089 - 12 05 23 0550**

## SAMPLE PREPARATION INFORMATION

## Available Cyanide by FIA, Ligand Exchange and Amperometric Detection

Prep: Method Prep: Ag

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
<u>Batch: 2310791</u>							
A311089-01	WG	D6888-09	09/13/23 08:40	09/25/23 11:23	5mL/5mL	5mL/5mL	1.00
A311089-02	WG	D6888-09	09/13/23 10:10	09/25/23 11:23	5mL/5mL	5mL/5mL	1.00
A311089-03	WG	D6888-09	09/13/23 10:30	09/25/23 11:23	5mL/5mL	5mL/5mL	1.00
A311089-04	WG	D6888-09	09/13/23 10:40	09/25/23 11:23	5mL/5mL	5mL/5mL	1.00
A311089-05	WG	D6888-09	09/13/23 12:40	09/25/23 11:23	5mL/5mL	5mL/5mL	1.00
A311089-06	WG	D6888-09	09/13/23 15:05	09/25/23 11:23	5mL/5mL	5mL/5mL	1.00

## Free Cyanide by Microdiffusion/Colorimetric Spectrophotometry

Prep: Microdiffusion

Lab Number	Matrix	Method	Sampled	Prepared	Sample Initial/Final	Default Initial/Final	RL Prep Factor
<u>Batch: 2310730</u>							
A311089-01	WG	D4282-02	09/13/23 08:40	09/22/23 13:30	3mL/3mL	3mL/3mL	1.00
A311089-02	WG	D4282-02	09/13/23 10:10	09/22/23 13:30	3mL/3mL	3mL/3mL	1.00
A311089-03	WG	D4282-02	09/13/23 10:30	09/22/23 13:30	3mL/3mL	3mL/3mL	1.00
A311089-04	WG	D4282-02	09/13/23 10:40	09/22/23 13:30	3mL/3mL	3mL/3mL	1.00
A311089-05	WG	D4282-02	09/13/23 12:40	09/22/23 13:30	3mL/3mL	3mL/3mL	1.00
A311089-06	WG	D4282-02	09/13/23 15:05	09/22/23 13:30	3mL/3mL	3mL/3mL	1.00

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ORELAP ID: OR100062

**Anchor QEA, LLC**

6720 SW Macadam Ave. Suite 125  
Portland, OR 97219

Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**

Project Number: **000029-02.84 T-01.001E**

Project Manager: **John Renda**

**Report ID:**

**A3I1089 - 12 05 23 0550**

## QUALIFIER DEFINITIONS

### **Client Sample and Quality Control (QC) Sample Qualifier Definitions:**

#### **Apex Laboratories**

- E** Estimated Value. The result is above the calibration range of the instrument.
- F-11** The hydrocarbon pattern indicates possible weathered diesel, mineral oil, or a contribution from a related component.
- F-13** The chromatographic pattern does not resemble the fuel standard used for quantitation
- J** Estimated Result. Result detected below the lowest point of the calibration curve, but above the specified MDL.
- M-02** Due to matrix interference, this analyte cannot be accurately quantified. The reported result is estimated.
- M-04** Due to matrix interference, this analyte cannot be accurately quantified. The reported result may contain a high bias.
- M-05** Estimated results. Peak separation for structural isomers is insufficient for accurate quantification.
- Q-01** Spike recovery and/or RPD is outside acceptance limits.
- Q-02** Spike recovery is outside of established control limits due to matrix interference.
- Q-03** Spike recovery and/or RPD is outside control limits due to the high concentration of analyte present in the sample.
- Q-16** Reanalysis of an original Batch QC sample.
- Q-17** RPD between original and duplicate sample, or spike duplicates, is outside of established control limits.
- Q-19** Blank Spike Duplicate (BSD) sample analyzed in place of Matrix Spike/Duplicate samples due to limited sample amount available for analysis.
- Q-24** The RPD for this spike and spike duplicate is above established control limits. Recoveries for both the spike and spike duplicate are within control limits.
- Q-54** Daily Continuing Calibration Verification recovery for this analyte failed the +/-20% criteria listed in EPA method 8260/8270 by +1%. The results are reported as Estimated Values.
- Q-56** Daily CCV/LCS recovery for this analyte was above the +/-20% criteria listed in EPA 8260
- Q-65** Spike recovery is estimated due to the high analyte concentration of the source sample.
- S-01** Surrogate recovery for this sample is not available due to sample dilution required from high analyte concentration and/or matrix interference.
- S-05** Surrogate recovery is estimated due to sample dilution required for high analyte concentration and/or matrix interference.

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### REPORTING NOTES AND CONVENTIONS:

**Abbreviations:**

DET Analyte DETECTED at or above the detection or reporting limit.  
ND Analyte NOT DETECTED at or above the detection or reporting limit.  
NR Result Not Reported  
RPD Relative Percent Difference. RPDs for Matrix Spikes and Matrix Spike Duplicates are based on concentration, not recovery.

**Detection Limits: Limit of Detection (LOD)**

Limits of Detection (LODs) are normally set at a level of one half the validated Limit of Quantitation (LOQ).  
If no value is listed ("-----"), then the data has not been evaluated below the Reporting Limit.

**Reporting Limits: Limit of Quantitation (LOQ)**

Validated Limits of Quantitation (LOQs) are reported as the Reporting Limits for all analyses where the LOQ, MRL, PQL or CRL are requested. The LOQ represents a level at or above the low point of the calibration curve, that has been validated according to Apex Laboratories' comprehensive LOQ policies and procedures.

**Reporting Conventions:**

Basis: Results for soil samples are generally reported on a 100% dry weight basis.

The Result Basis is listed following the units as "dry", "wet", or " " (blank) designation.

"dry" Sample results and Reporting Limits are reported on a dry weight basis. (i.e. "ug/kg dry")  
See Percent Solids section for details of dry weight analysis.

"wet" Sample results and Reporting Limits for this analysis are normally dry weight corrected, but have not been modified in this case.

" " Results without 'wet' or 'dry' designation are not normally dry weight corrected. These results are considered 'As Received'.

Results for Volatiles analyses on soils and sediments that are reported on a "dry weight" basis include the water miscible solvent (WMS) correction referenced in the EPA 8000 Method guidance documents. Solid and Liquid samples reported on an "As Received" basis do not have the WMS correction applied, as dry weight was not performed.

**QC Source:**

In cases where there is insufficient sample provided for Sample Duplicates and/or Matrix Spikes, a Lab Control Sample Duplicate (LCS Dup) may be analyzed to demonstrate accuracy and precision of the extraction batch.

Non-Client Batch QC Samples (Duplicates and Matrix Spike/Duplicates) may not be included in this report. Please request a Full QC report if this data is required.

**Miscellaneous Notes:**

" --- " QC results are not applicable. For example, % Recoveries for Blanks and Duplicates, % RPD for Blanks, Blank Spikes and Matrix Spikes, etc.

" \*\*\* " Used to indicate a possible discrepancy with the Sample and Sample Duplicate results when the %RPD is not available. In this case, either the Sample or the Sample Duplicate has a reportable result for this analyte, while the other is Non Detect (ND).

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ORELAP ID: OR100062

**Anchor QEA, LLC**

6720 SW Macadam Ave. Suite 125

Portland, OR 97219

Project: **Gasco-MGP Only Mon.Wells 3Q 2023 Perf. Mon**

Project Number: **000029-02.84 T-01.001E**

Project Manager: **John Renda**

**Report ID:**

**A311089 - 12 05 23 0550**

### REPORTING NOTES AND CONVENTIONS (Cont.):

**Blanks:**

Standard practice is to evaluate the results from Blank QC Samples down to a level equal to ½ the Reporting Limit (RL).

-For Blank hits falling between ½ the RL and the RL (J flagged hits), the associated sample and QC data will receive a 'B-02' qualifier.

-For Blank hits above the RL, the associated sample and QC data will receive a 'B' qualifier, per Apex Laboratories' Blank Policy.

For further details, please request a copy of this document.

-Sample results flagged with a 'B' or 'B-02' qualifier are potentially biased high if the sample results are less than ten times the level found in the blank for inorganic analyses, or less than five times the level found in the blank for organic analyses.

'B' and 'B-02' qualifications are only applied to sample results detected above the Reporting Level, if results are not reported to the MDL.

**Preparation Notes:**

**Mixed Matrix Samples:**

**Water Samples:**

Water samples containing significant amounts of sediment are decanted or separated prior to extraction, and only the water portion analyzed, unless otherwise directed by the client.

**Soil and Sediment Samples:**

Soil and Sediment samples containing significant amounts of water are decanted prior to extraction, and only the solid portion analyzed, unless otherwise directed by the client.

**Sampling and Preservation Notes:**

Certain regulatory programs, such as National Pollutant Discharge Elimination System (NPDES), require that activities such as sample filtration (for dissolved metals, orthophosphate, hexavalent chromium, etc.) and testing of short hold analytes (pH, Dissolved Oxygen, etc.) be performed in the field (on-site) within a short time window. In addition, sample matrix spikes are required for some analyses, and sufficient volume must be provided, and billable site specific QC requested, if this is required. All regulatory permits should be reviewed to ensure that these requirements are being met.

Data users should be aware of which regulations pertain to the samples they submit for testing. If related sample collection activities are not approved for a particular regulatory program, results should be considered estimates. Apex Laboratories will qualify these analytes according to the most stringent requirements, however results for samples that are for non-regulatory purposes may be acceptable.

Samples that have been filtered and preserved at Apex Laboratories per client request are listed in the preparation section of the report with the date and time of filtration listed.

Apex Laboratories maintains detailed records on sample receipt, including client label verification, cooler temperature, sample preservation, hold time compliance and field filtration. Data is qualified as necessary, and the lack of qualification indicates compliance with required parameters.

Apex Laboratories

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**Report ID:**

**A3I1089 - 12 05 23 0550**

### LABORATORY ACCREDITATION INFORMATION

**ORELAP Certification ID: OR100062 (Primary Accreditation)** -

**EPA ID: OR01039**

All methods and analytes reported from work performed at Apex Laboratories are included on Apex Laboratories' ORELAP Scope of Certification, with the exception of any analyte(s) listed below:

**Apex Laboratories**

Matrix	Analysis	TNI_ID	Analyte	TNI_ID	Accreditation
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All reported analytes are included in Apex Laboratories' current ORELAP scope.

**Secondary Accreditations**

Apex Laboratories also maintains reciprocal accreditation with non-TNI states (Washington DOE), as well as other state specific accreditations not listed here.

**Subcontract Laboratory Accreditations**

Subcontracted data falls outside of Apex Laboratories' Scope of Accreditation.  
Please see the Subcontract Laboratory report for full details, or contact your Project Manager for more information.

**Field Testing Parameters**

Results for Field Tested data are provided by the client or sampler, and fall outside of Apex Laboratories' Scope of Accreditation.

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Project Number: 000029-02.84 T-01.001E

Project Manager: John Renda

Report ID:

A3I1089 - 12 05 23 0550

## APEX LABS COOLER RECEIPT FORM

Client: Anchor QEA Element WO#: A3 I 1089Project/Project #: Gasco-MGP only Mon. Wells 3Q 2023 Perf. Mon.  
000029-02.84  
T-01.001E

## Delivery Info:

Date/time received: 9/14/23@ 815 By: JSDelivered by: Apex ☒ Client ☐ ESS ☐ FedEx ☐ UPS ☐ Swift ☐ Senvoy ☐ SDS ☐ Other ☐Cooler Inspection Date/time inspected: 9/14/23@ 930 By: JSChain of Custody included? Yes ☒ No ☐ Custody seals? Yes ☐ No ☒Signed/dated by client? Yes ☒ No ☐Signed/dated by Apex? Yes ☒ No ☐

	Cooler #1	Cooler #2	Cooler #3	Cooler #4	Cooler #5	Cooler #6	Cooler #7
Temperature (°C)	<u>3.6</u>	<u>3.9</u>					
Received on ice? (Y/N)	<u>y</u>	<u>y</u>					
Temp. blanks? (Y/N)	<u>N</u>	<u>N</u>					
Ice type: (Gel/Real/Other)	<u>Real</u>	<u>Real</u>					
Condition (In/Out):	<u>In</u>	<u>In</u>					

Cooler out of temp? (Y/N) N Possible reason why: \_\_\_\_\_Green dots applied to out of temperature samples? Yes ☒ No ☐Out of temperature samples form initiated? Yes ☒ No ☐Sample Inspection: Date/time inspected: 9/14/23@ 1022 By: JSAll samples intact? Yes ☒ No ☐ Comments: \_\_\_\_\_Bottle labels/COCs agree? Yes ☒ No ☐ Comments: \_\_\_\_\_COC/container discrepancies form initiated? Yes ☐ No ☒Containers/volumes received appropriate for analysis? Yes ☒ No ☐ Comments: \_\_\_\_\_Do VOA vials have visible headspace? Yes ☐ No ☒ NA ☐

Comments: \_\_\_\_\_

Water samples: pH checked: Yes ☒ No ☐ NA ☐ pH appropriate? Yes ☒ No ☐ NA ☐ Strip ID: A23A348 ☒Comments: 65-091323-15, 16, 17, 19, 20 pH 9-NaOH PolyAdditional information: TB #3379Labeled by: JSWitness: DSSCooler Inspected by: JS

Form Y-003 R-01 -

Apex Laboratories

The results in this report apply to the samples analyzed in accordance with the chain of custody document(s) and updated by any subsequent written communications. This analytical report must be reproduced in its entirety.

Darwin Thomas, Business Development Director

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