

Wellhead Closure Checklist

COGCC Rule 911.a.(4) Environmental Site Closure Assessment Field Form

Additional attachments (optional):		Pit Closure		Tank Battery Closure		Flowline Closure 8-9-22	Partially Buried Vault Closure
Site Name & COGCC Facility Number: <i>State 36-954</i>		Date: <i>5-11-22</i>					Remediation Project #: <i>22374</i>
Associated Wells: <i>2</i> <i>05-123-17799</i>		Age of Site: <i>Years</i>					Number of Photos Attached: <i>1</i>
Location: (GPS coordinates of wellhead or southeastern most wellhead for multiple) <i>40.264601 / -104.493002</i>						Estimated Facility Size (acres):	
General Condition of Site: (General observations regarding housekeeping, corrosion, waste management, etc.) <i>Overall good condition</i>							
USCS Soil Type: <i>SM</i>				Estimated Depth to Groundwater: <i>2.20'</i>			
Hydrocarbon Impacted Soils / Spills: (Note estimated size and if impact appears to be surficial or extends to an unknown depth) <i>None observed</i>							
Salt Crusted Soils or Impacted Vegetation: (Note estimated size and if impact appears to be surficial or extends to an unknown depth) <i>None observed</i>							
Wellhead(s)							
Well API	<i>05-123-17799</i>						
Age	<i>Years</i>						
Condition of surface around wellhead	<i>Good - for Cans</i>						
PID Readings	<i>N/A - Excavated upon arrival</i>						
Condition of subsurface (detaining present)	<i>Good - no slurry, no odor</i>						
PID Readings	<i>2.4</i>	<i>2.9</i>	<i>2.8</i>	<i>2.4</i>	<i>3.4</i>		
Sample taken? Location/Sample ID#	<i>WH-SS-01</i>	<i>WH-SS-02</i>	<i>WH-SS-03</i>	<i>WH-SS-04</i>	<i>WH-F6-01</i>		
Photo Number(s)	<i>See photography</i>						
Other observations regarding wellheads: <i>well casing cut/capped after assessment</i>							
Summary							
Was impacted soil identified? <i>(No)</i> Yes - less than 10 cubic yards Yes - more than 10 cubic yards							
Total number of samples field screened: <i>5</i>				Total number of samples collected: <i>5</i>			
Highest PID Reading: <i>3.4</i>				Total number of samples submitted to lab for analysis: <i>1</i>			
If more than 10 cubic yards of impacted soil were observed:							
Vertical extent:				Estimated spill volume:			
Lateral extent: <i>N/A</i>				Volume of soil removed:			
Is additional investigation required? <i>N/A</i>							
Was groundwater encountered during the investigation? <i>(No)</i> Yes - not impacted or in contact with impacted soils Yes - groundwater impacted and/or in contact with impacted soils							
Measured depth to groundwater:				Was remedial groundwater removal conducted? Yes No			
Date Groundwater was encountered:				Commencement date of removal:			
Sheen on groundwater? Yes No				Volume of groundwater removed prior to sampling:			
Free product observed? Yes No				Volume of groundwater removed post sampling:			
Total number of samples collected:				Total Volume of groundwater removed:			
Total number of samples submitted to lab for analysis:							



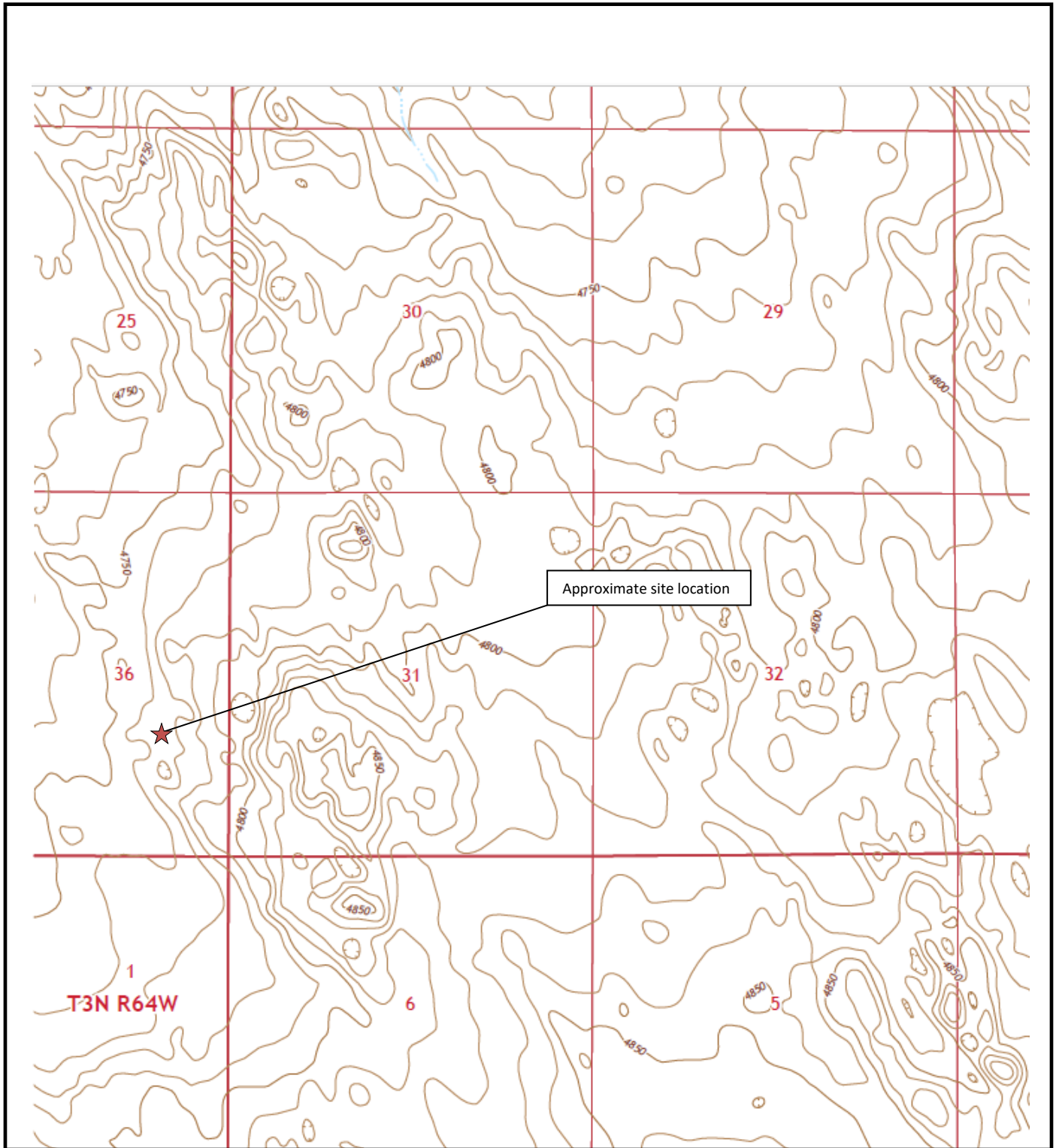
FIGURES

Figure 1: Topographic Site Location Map

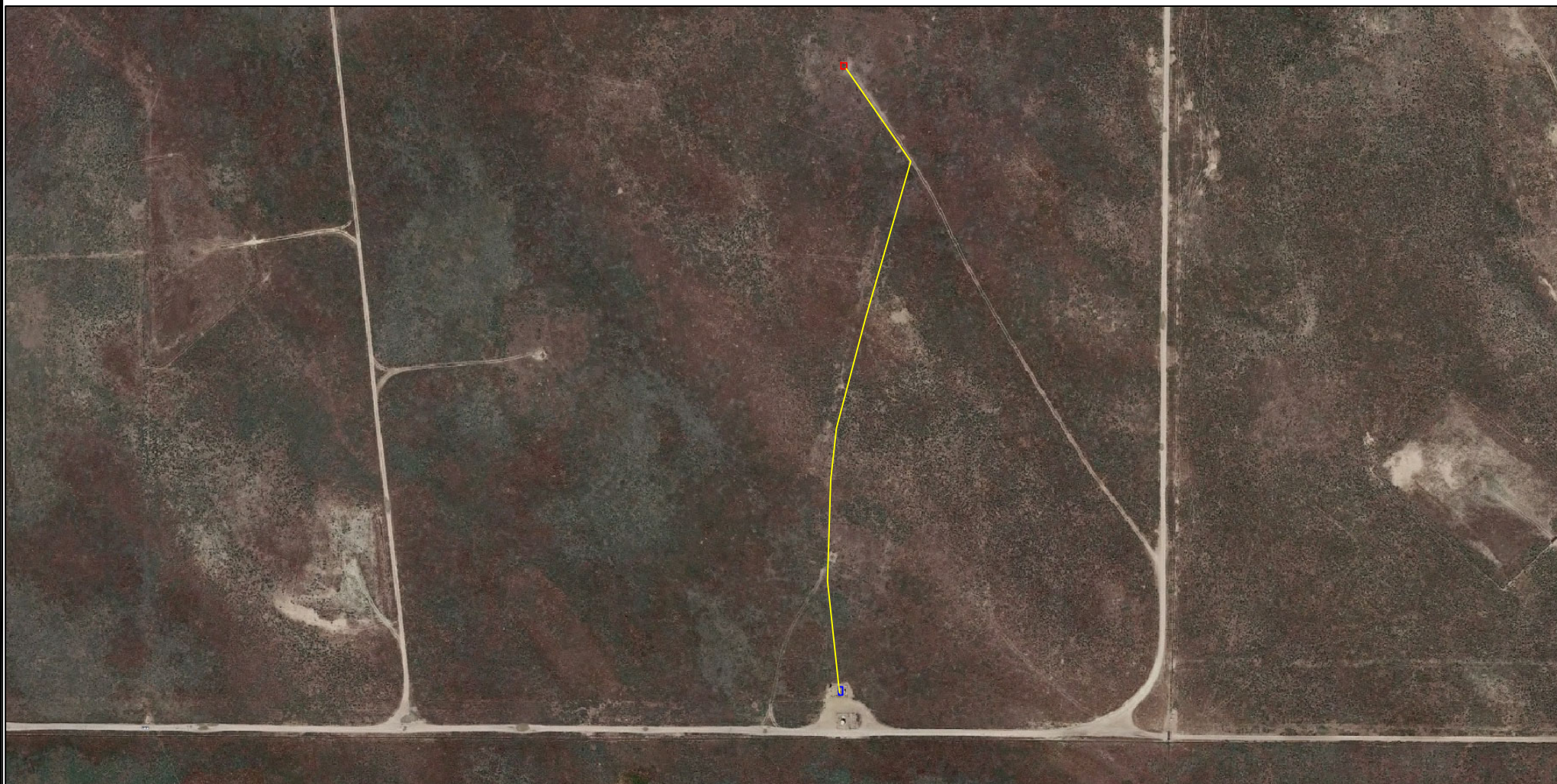
Figure 2: Aerial Site Location Map

Figure 3: Soil Analytical Map

Figure 4: Polycyclic Aromatic Hydrocarbons Map

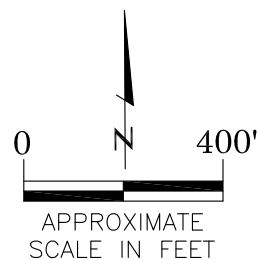


	<p>Topographic Site Location Map State #36-914 Closure Assessment 40.266601 / -104.493002 NE¼ SE ¼ SEC.36 T4N R64W 6PM Weld County, Colorado API # 05-123-17799 Remediation # 22374</p>	<p>EAGLE ENVIRONMENTAL CONSULTING, INC.</p>
<p>Source: USGS 7.5 Minute Topographic Map: Hardin, CO Quadrangle 2022</p>	<p>Figure 1</p>	



LEGEND

- FORMER STTE #36-914 WELLHEAD (PLUGGED AND ABANDONED)
- ASSOCIATED SEPARATOR
- APPROXIMATE FLOWLINE LOCATION



AERIAL SITE LOCATION MAP

SPIKE #36-914
 CLOSURE ASSESSMENT
 40.266601 / -104.493002
 NE¼ SE¼ SEC.36 T4N R64W 6PM
 WELD COUNTY, COLORADO
 API # 05-123-17799
 REMEDIATION # 22374

DATE:

09/19/22

FIG. NO.

2

DRAWN BY:

AMN



EAGLE
 ENVIRONMENTAL
 CONSULTING, INC.

8000 W 44th Ave, Wheat Ridge, CO 80033
 Ph: 303-433-0479 • F: 303-325-5449



LEGEND

- INITIAL ASSESSMENT BOUNDARIES
- SS-02 APPROXIMATE LOCATION OF SOIL SAMPLES FIELD SCREENED, ONLY, WITH PHOTOIONIZATION DETECTOR
- SS-02 APPROXIMATE LOCATION OF SOIL SAMPLES SUBMITTED FOR LABORATORY ANALYSIS

PARAMETERS

SAMPLE LOCATION
DATE
DEPTH (FEET)
B = BENZENE (mg/kg)
T = TOLUENE (mg/kg)
E = ETHYLBENZENE (mg/kg)
X = TOTAL XYLENES (mg/kg)
G = TPH-GRO (mg/kg)
D = TPH-DRO (mg/kg)
R = TPH-RRO (mg/kg)
1,2,4-TMB = 1,2,4 TRIMETHYLBENZENE (mg/kg)
1,3,5-TMB = 1,3,5 TRIMETHYLBENZENE (mg/kg)
Brn= BORON (mg/L)
EC = SPECIFIC CONDUCTANCE (mmhos/cm)
SAR= SODIUM ADSORPTION RATIO
pH = pH (pH UNITS)

mg/kg = MILLIGRAMS PER KILOGRAM
mg/L = MILLIGRAMS PER LITER
mmhos/cm = MILLIMHOS PER CENTIMETER

TPH-GRO = TOTAL PETROLEUM HYDROCARBONS - GASOLINE RANGE ORGANICS
TPH-DRO = TOTAL PETROLEUM HYDROCARBONS - DIESEL RANGE ORGANICS
TPH-RRO = TOTAL PETROLEUM HYDROCARBONS - RESIDUAL RANGE ORGANICS

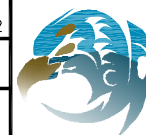
NOTES:
VALUES PRESENTED WITH A LESS THAN SYMBOL (<) DID NOT CONTAIN CONCENTRATIONS AT OR ABOVE LABORATORY DETECTION LIMITS

VALUES PRESENTED IN **BOLD** EXCEED COGCC TABLE 915-1 REGULATORY LIMITS

COGCC = COLORADO OIL AND GAS CONSERVATION COMMISSION

SOIL ANALYTICAL MAP
SPIKE #36-914
CLOSURE ASSESSMENT
40.266601 / -104.493002
NE¼ SE¼ SEC.36 T4N R64W 6PM
WELD COUNTY, COLORADO
API # 05-123-17799
REMEDATION # 22374

DATE:
09/19/22
DRAWN BY:
AMN
FIG.
NO. 3



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LEGEND

- INITIAL ASSESSMENT BOUNDARIES
- SS-02 APPROXIMATE LOCATION OF SOIL SAMPLES FIELD SCREENED, ONLY, WITH PHOTOIONIZATION DETECTOR
- SS-02 APPROXIMATE LOCATION OF SOIL SAMPLES SUBMITTED FOR LABORATORY ANALYSIS

PARAMETERS

SAMPLE LOCATION
DATE SAMPLE COLLECTED
APPROXIMATE DEPTH
POLYCYCLIC AROMATIC HYDROCARBONS (PAHs) (mg/kg)

mg/kg = MILLIGRAMS PER KILOGRAM

ND = NON-DETECT

NOTES:

VALUES PRESENTED WITH A LESS THAN SYMBOL (<) DID NOT CONTAIN CONCENTRATIONS AT OR ABOVE LABORATORY DETECTION LIMITS

VALUES PRESENTED IN **BOLD** CONTAIN CONCENTRATIONS EXCEEDING COGCC TABLE 915-1 REGULATORY LIMITS.

COGCC = COLORADO OIL AND GAS CONSERVATION COMMISSION

POLYCYCLIC AROMATIC HYDROCARBONS MAP

SPIKE #36-914
CLOSURE ASSESSMENT
40.266601 / -104.493002
NE¼ SE¼ SEC.36 T4N R64W 6PM
WELD COUNTY, COLORADO
API # 05-123-17799
REMEDIAL # 22374

DATE:
09/19/22

DRAWN BY:
AMN

FIG.
NO. 4



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TABLES

Table 1: Photoionization Detector Reading Summary

Table 2: Soil Analytical Results Summary

Table 3: Polycyclic Aromatic Hydrocarbons Analytical Results Summary

TABLE 1
PHOTOIONIZATION DETECTOR READING SUMMARY
STATE #36-914
CLOSURE ASSESSMENT
40.26601 / -104.493002
NESE SEC.36 T4N R64W 6PM
WELD COUNTY, COLORADO
API # 05-123-17799
REMEDATION # 22374

Sample Location (Latitude/Longitude)	Date	Approximate Depth (feet)	PID Reading (ppm-v)	Lab Submission (Y/N)
WH-SS-01 @ 5' (40.266622 / -104.493014)	05/11/22	5	2.4	N
WH-SS-02 @ 5' (40.266605 / -104.493000)	05/11/22	5	2.9	N
WH-SS-03 @ 5' (40.266591 / -104.493026)	05/11/22	5	2.8	N
WH-SS-04 @ 5' (40.266608 / -104.493040)	05/11/22	5	2.4	N
WH-FS-01 @ 6' (40.266606 / -104.493017)	05/11/22	6	3.4	Y
(Y/N) = Yes or No ppm-v = parts per million by volume PID = photoionization detector				

TABLE 2
SOIL ANALYTICAL RESULTS SUMMARY
JOHNSON #30-15
CLOSURE ASSESSMENT
40.286970 / -104.588960
NE1/4 SEC.30 T4N R64W 6PM
WELD COUNTY, COLORADO
API # 05-123-23936
REMEDATION # 21824

Sample Location (Latitude/Longitude)	Date	Approximate Depth (feet)	PID Reading (ppm-v)	Benzene (mg/kg)	Toluene (mg/kg)	Ethylbenzene (mg/kg)	Total Xylenes (mg/kg)	TPH-GRO (mg/kg)	TPH-DRO (mg/kg)	TPH-RRO (mg/kg)	1,2,4-TMB (mg/kg)	1,3,5-TMB (mg/kg)	Boron (mg/L)	Specific Conductance (mmhos/cm)	pH (pH units)	SAR
COGCC Table 915-1 Residential Screening Levels (mg/kg)				1.20	490	5.8	58	500			30	27	2	<4	6-8.3	<6
COGCC Table 915-1 Protection of Groundwater Soil Screening Levels				0.0026	0.69	0.78	9.9	--			0.0081	0.0087	--	--	--	--
WH-FS-01 @ 6' (40.266606 / -104.493017)	05/11/22	6	3.4	<0.00200	<0.00200	<0.00200	<0.00200	<0.200	<25.0	<100	<0.00200	<0.00200	<0.0996	0.304	7.83	0.388
<p>COGCC = Colorado Oil and Gas Conservation Commission mg/kg = milligrams per kilogram mmhos/cm = millimhos per centimeter PID = Photoionization Detector ppm-v = parts per million by volume mg/L = milligrams per liter SAR = Sodium Adsorption Ratio Note: Values presented with a less than symbol (<) did not contain concentrations at or above the laboratory MDL and/or reporting limit. Note: Values presented in BOLD contained concentrations exceeding COGCC Table 915-1 Regulatory Limits. Values with asterisk (*) exceed COGCC Table 915-1 protection of groundwater soil screening levels for that compound</p>																
<p>TPH-GRO = Total Petroleum Hydrocarbons - Gasoline Range Organics TPH-DRO = Total Petroleum Hydrocarbons - Diesel Range Organics TPH-RRO = Total Petroleum Hydrocarbons - Residual Range Organics 1,2,4-TMB = 1,2,4-Trimethylbenzene 1,3,5-TMB = 1,3,5-Trimethylbenzene MDL = Minimum Detection Limits</p>																

TABLE 3
PAH ANALYTICAL RESULTS SUMMARY
JOHNSON #30-15
CLOSURE ASSESSMENT
40.286970 / -104.588960
NE1/4 SEC.30 T4N R64W 6PM
WELD COUNTY, COLORADO
API # 05-123-23936
REMEDIATION # 21824

Sample Location (Latitude/Longitude)	Date	Approximate Depth (feet)	PID Reading (ppm- v)	1-Methyl- naphthalene (mg/kg)	2-Methyl- naphthalene (mg/kg)	Acenaphthene (mg/kg)	Anthracene (mg/kg)	Benzo(a)- anthracene (mg/kg)	Benzo(a)- pyrene (mg/kg)	Benzo(b)- fluoranthene (mg/kg)	Benzo(k)- fluoranthene (mg/kg)	Chrysene (mg/kg)	Dibenzo(a,h)- anthracene (mg/kg)	Fluoranthene (mg/kg)	Fluorene (mg/kg)	Indeno(1,2,3- cd)-pyrene (mg/kg)	Naphthalene (mg/kg)	Pyrene (mg/kg)
COGCC Table 915-1 Residential Screening Levels				18	24	360	1,800	1.1	0.11	1.1	11	110	0.11	240	240	1.1	2	180
COGCC Table 915-1 Protection of Groundwater Soil Screening Levels				0.006	0.019	0.55	5.8	0.011	0.24	0.3	2.9	9	0.096	8.9	0.54	0.98	0.0038	1.3
WH-FS-01 @ 6' (40.266606 / -104.493017)	05/11/22	6	3.4	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067	<0.00067
COGCC = Colorado Oil and Gas Conservation Commission PID = Photoionization Detector mg/kg = milligrams per kilogram ppm-v = parts per million by volume Note: Values presented with a less than symbol (<) did not contain concentrations at or above the laboratory reporting limit. Note: Values presented in BOLD contained concentrations exceeding COGCC Table 915-1 Regulatory Limits. Values with asterisk (*) exceed COGCC Table 915-1 protection of groundwater soil screening levels for that compound																		



ATTACHMENT A

Photo Log

State #36-914
API # 05-123-22374
Remediation # 17799

Closure Assessment

May 2022



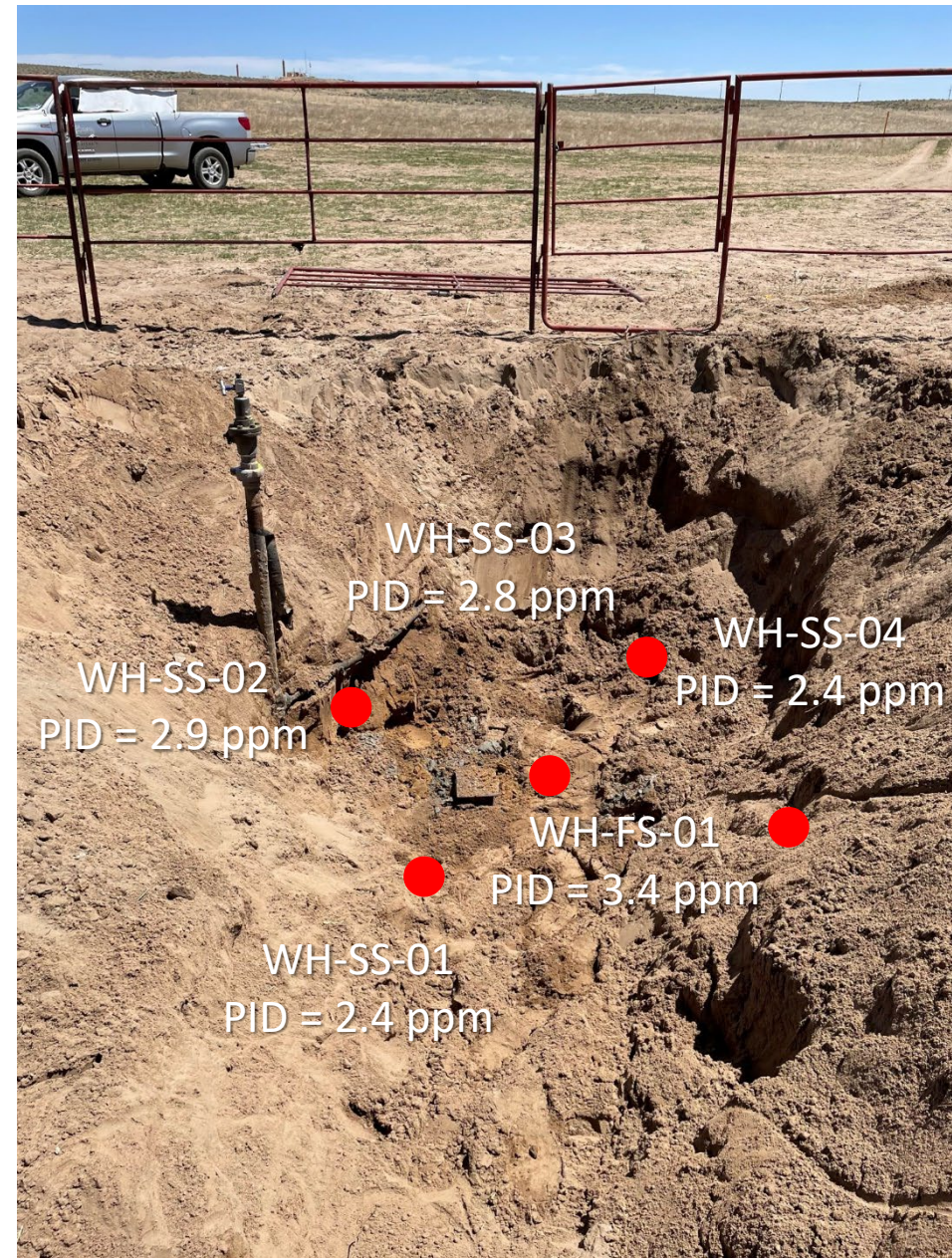
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ENVIRONMENTAL
CONSULTING, INC.

8000 W 44th Ave, Wheat Ridge, CO 80033
Ph: 303-433-0479 • F: 303-325-5449



Wellhead Excavation – 05/11/22

Looking southeast
No petroleum hydrocarbon staining or odor observed





ATTACHMENT B

Laboratory Analytical Report



May 18, 2022

Eagle Environmental Consulting, Inc.

Martin C Eckert III

8000 W 44th Ave

Wheat Ridge CO 80033

Project Name - Noble - State #36-9I4

Project Number - [none]

Attached are your analytical results for Noble - State #36-9I4 received by Origins Laboratory, Inc. May 11, 2022. This project is associated with Origins project number Y205284-01.

The analytical results in the following report were analyzed under the guidelines of EPA Methods. These methods are identified as follows; "SW" are defined in SW-846, "EPA" are defined in 40CFR part 136 and "SM" are defined in the most current revision of Standard Methods For the Examination of Water and Wastewater.

The analytical results apply specifically to the samples and analyses specified per the attached Chain of Custody. As such, this report shall not be reproduced except in full, without the written approval of Origin's laboratory.

Unless otherwise noted, the analytical results for all soil samples are reported on a wet weight basis. All analytical analyses were performed under NELAP guidelines unless noted by a data qualifier.

Any holding time exceedances, deviations from the method specifications or deviations from Origins Laboratory's Standard Operating Procedures are outlined in the case narrative.

Thank you for selecting Origins for your analytical needs. Please contact us with any questions concerning this report, or if we can help with anything at all.

Origins Laboratory, Inc.
303.433.1322
o-squad@oelabinc.com



1725 Elk Place, Denver, CO 80211 | Phone: 303.433.1322 | Fax: 303.265.9645

Eagle Environmental Consulting, Inc.

8000 W 44th Ave

Wheat Ridge CO 80033

Martin C Eckert III

Project Number: [none]

Project: Noble - State #36-914

CROSS REFERENCE REPORT

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
WH-FS-01@6'	Y205284-01	Soil	May 11, 2022 13:34	05/11/2022 15:10

Origins Laboratory, Inc.



The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

[illegible]

Origins Laboratory, Inc.

Byron

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

Eagle Environmental Consulting, Inc.
8000 W 44th Ave
Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Origins Laboratory

F-012207-01-R1
Effective Date: 01/09/12

Sample Receipt Checklist

Origins Work Order: Y205284

Client: Eagle

Client Project ID: State 36-914

Checklist Completed by: SG

Shipped Via: HD
(UPS, FedEx, Hand Delivered, Pick-up, etc.)

Date/time completed: 5/12/22

Airbill #: N/A

Matrix(s) Received: (Check all that apply): X Soil/Solid Water Other:

Cooler Number/Temperature: 1, 21 °C °C °C (Describe) °C

Thermometer ID: T004

Requirement Description	Yes	No	N/A	Comments (if any)
If samples require cooling, was the temperature between 0°C to ≤ 6°C ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is there ice present (document if blue ice is used)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are custody seals present on cooler? (if so, document in comments if they are signed and dated, broken or intact)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are custody seals present on each sample container? (if so, document in comments if they are signed and dated, broken or intact)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are short holding time analytes or samples with HTs due within 48 hours present ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is a chain-of-custody (COC) present and filled out completely ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client with date and time recorded ⁽¹⁾ ?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace (> ¼ inch bubble) present? If yes, contact client and note in narrative.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Are samples preserved that require preservation and was it checked ⁽¹⁾ ? (note ID of confirmation instrument used in comments) / (preservation is not confirmed for subcontracted analyses in order to insure sample integrity) (pH < 2 for samples preserved with HNO ₃ , HCL, H ₂ SO ₄) / (pH > 10 for samples preserved with NaAsO ₂ +NaOH, ZnAc+NaOH)	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Additional Comments (if any):				

⁽¹⁾If NO, then contact the client before proceeding with analysis and note date/time and person contacted as well as the corrective action to in the additional comments (above) and the case narrative.

Reviewed by (Project Manager) 912

Date/Time Reviewed 5/13/22

Origins Laboratory, Inc.

J. Bynon

The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

Eagle Environmental Consulting, Inc.
8000 W 44th Ave
Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

WH-FS-01@6'

5/11/2022 1:34:00PM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
---------	--------	---------------------	-----------------	-------	----------	-------	----------	----------	-------

Origins Laboratory, Inc.
Y205284-01 (Soil)

Boron (DTPA Sorbitol)

Boron	ND	0.0996	mg/L	1	B2E1304	05/13/2022	05/16/2022	
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DRO/ORO by EPA 8015D

Diesel (C10-C28)	ND	25.0	mg/kg	1	B2E1317	05/13/2022	05/16/2022	U
Residual Range Organics (C28-C40)	ND	100	"	"	"	"	"	U

Surrogate: o-Terphenyl	65.6 %	50-150		"	"	"
------------------------	--------	--------	--	---	---	---

GBTEX+TMBs by 8260D

1,2,4-Trimethylbenzene	ND	0.00200	mg/kg	1	B2E1212	05/12/2022	05/12/2022	U
1,3,5-Trimethylbenzene	ND	0.00200	"	"	"	"	"	U
Benzene	ND	0.00200	"	"	"	"	"	U
Ethylbenzene	ND	0.00200	"	"	"	"	"	U
Toluene	ND	0.00200	"	"	"	"	"	U
Xylenes, total	ND	0.00200	"	"	"	"	"	U
Gasoline Range Hydrocarbons	ND	0.200	"	"	"	"	"	U

Surrogate: 1,2-Dichloroethane-d4	103 %	70-130		"	"	"
----------------------------------	-------	--------	--	---	---	---

Origins Laboratory, Inc.



The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

Eagle Environmental Consulting, Inc.
8000 W 44th Ave
Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

WH-FS-01@6'

5/11/2022 1:34:00PM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
---------	--------	---------------------	-----------------	-------	----------	-------	----------	----------	-------

Origins Laboratory, Inc.
Y205284-01 (Soil)

GBTEX+TMBs by 8260D

Surrogate: Toluene-d8	101 %		70-130			B2E12 12	05/12/2022	05/12/2022
Surrogate: 4-Bromofluorobenzene	96.1 %		70-130			"	"	"

Metals by Saturated Paste by EPA 6010

Calcium	ND	0.499	meq/L	10	[CALC]	05/13/2022	05/16/2022
Magnesium	ND	0.823	"	"	"	"	"
Sodium	ND	0.435	"	"	"	"	"

PAH by 8270D SIM

1-Methylnaphthalene	ND	0.000364	0.00067	mg/Kg	1	L616509	05/17/2022	05/17/2022
2-Methylnaphthalene	ND	0.000645	0.00067	"	"	"	"	"
Acenaphthene	ND	0.000304	0.00067	"	"	"	"	"
Anthracene	ND	0.000334	0.00067	"	"	"	"	"
Benzo(a)anthracene	ND	0.000493	0.00067	"	"	"	"	"
Benzo(a)pyrene	ND	0.000468	0.00067	"	"	"	"	"
Benzo(b)fluoranthene	ND	0.000585	0.00067	"	"	"	"	"
Benzo(k)fluoranthene	ND	0.000437	0.00067	"	"	"	"	"
Chrysene	ND	0.000624	0.00067	"	"	"	"	"
Dibenz(a,h)anthracene	ND	0.000614	0.00067	"	"	"	"	"
Fluoranthene	ND	0.000394	0.00067	"	"	"	"	"

Origins Laboratory, Inc.



The results in this report apply to the samples analyzed in accordance with the chain of custody document. This analytical report must be reproduced in its entirety.

Eagle Environmental Consulting, Inc.
8000 W 44th Ave
Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

WH-FS-01@6'

5/11/2022 1:34:00PM

Analyte	Result	Min Detection Limit	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Notes
---------	--------	---------------------	-----------------	-------	----------	-------	----------	----------	-------

Waypoint Analytical, Inc.
Y205284-01 (Soil)

PAH by 8270D SIM

Fluorene	ND	0.000286	0.00067	mg/Kg	1	L616509	05/17/2022	05/17/2022
Indeno(1,2,3-cd)pyrene	ND	0.000627	0.00067	"	"	"	"	"
Naphthalene	ND	0.000484	0.00067	"	"	"	"	"
Pyrene	ND	0.000643	0.00067	"	"	"	"	"

Surrogate: 2-Fluorobiphenyl	55.5 %	33-115	"	"	"
Surrogate: 4-Terphenyl-d14	79.1 %	33-122	"	"	"
Surrogate: Nitrobenzene-d5	49.7 %	29-110	"	"	"

pH in Soil by 9045D

pH	7.83	pH Units	1	B2E1303	05/13/2022	05/14/2022
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SAR by 20B Saturated Paste

SAR	0.388	SAR	1	B2E1302	05/13/2022	05/16/2022
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Specific Conductance Mod. 9050A

Specific Conductance (EC)	0.304	0.00500	mmhos/cm	1	B2E1303	05/13/2022	05/14/2022
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Eagle Environmental Consulting, Inc.
8000 W 44th Ave
Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B2E1212 - EPA 5030 (soil)										
Blank (B2E1212-BLK1)					Prepared: 05/12/2022 Analyzed: 05/12/2022					
1,2,4-Trimethylbenzene	ND	0.00200	mg/kg							U
1,3,5-Trimethylbenzene	ND	0.00200	"							U
Benzene	ND	0.00200	"							U
Ethylbenzene	ND	0.00200	"							U
Naphthalene	ND	0.0100	"							U
Toluene	ND	0.00200	"							U
Xylenes, total	ND	0.00200	"							U
Gasoline Range Hydrocarbons	ND	0.200	"							U
Surrogate: 1,2-Dichloroethane-d4	0.13		"	0.125	103		70-130			
Surrogate: Toluene-d8	0.13		"	0.125	104		70-130			
Surrogate: 4-Bromofluorobenzene	0.12		"	0.125	92.3		70-130			

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Eagle Environmental Consulting, Inc.
8000 W 44th Ave
Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2E1212 - EPA 5030 (soil)

LCS (B2E1212-BS1)

Prepared: 05/12/2022 Analyzed: 05/12/2022

1,2,4-Trimethylbenzene	0.0948	0.00200	mg/kg	0.100		94.8	70-130			
1,3,5-Trimethylbenzene	0.0954	0.00200	"	0.100		95.4	70-130			
Benzene	0.0960	0.00200	"	0.100		96.0	70-130			
Ethylbenzene	0.0990	0.00200	"	0.100		99.0	70-130			
Naphthalene	0.0952	0.0100	"	0.100		95.2	70-130			
Toluene	0.103	0.00200	"	0.100		103	70-130			
o-Xylene	0.0962	0.00200	"	0.100		96.2	70-130			
m,p-Xylene	0.201	0.00400	"	0.200		100	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.12		"	0.125		97.6	70-130			
Surrogate: Toluene-d8	0.12		"	0.125		97.2	70-130			
Surrogate: 4-Bromofluorobenzene	0.13		"	0.125		103	70-130			

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Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2E1212 - EPA 5030 (soil)

Matrix Spike (B2E1212-MS1)		Source: Y205311-01			Prepared: 05/12/2022 Analyzed: 05/12/2022					
1,2,4-Trimethylbenzene	0.105	0.00200	mg/kg	0.100	ND	105	70-130			
1,3,5-Trimethylbenzene	0.106	0.00200	"	0.100	ND	106	70-130			
Benzene	0.101	0.00200	"	0.100	ND	101	70-130			
Ethylbenzene	0.108	0.00200	"	0.100	ND	108	70-130			
Naphthalene	0.104	0.0100	"	0.100	ND	104	70-130			
Toluene	0.107	0.00200	"	0.100	ND	107	70-130			
o-Xylene	0.106	0.00200	"	0.100	ND	106	70-130			
m,p-Xylene	0.220	0.00400	"	0.200	ND	110	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.12		"	0.125		96.5	70-130			
Surrogate: Toluene-d8	0.12		"	0.125		97.5	70-130			
Surrogate: 4-Bromofluorobenzene	0.13		"	0.125		105	70-130			

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Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control

Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B2E1212 - EPA 5030 (soil)										
Matrix Spike Dup (B2E1212-MSD1)		Source: Y205311-01			Prepared: 05/12/2022 Analyzed: 05/12/2022					
1,2,4-Trimethylbenzene	0.102	0.00200	mg/kg	0.100	ND	102	70-130	2.60	20	
1,3,5-Trimethylbenzene	0.103	0.00200	"	0.100	ND	103	70-130	3.23	20	
Benzene	0.0998	0.00200	"	0.100	ND	99.8	70-130	0.778	20	
Ethylbenzene	0.106	0.00200	"	0.100	ND	106	70-130	1.74	20	
Naphthalene	0.102	0.0100	"	0.100	ND	102	70-130	2.05	20	
Toluene	0.105	0.00200	"	0.100	ND	105	70-130	1.64	20	
o-Xylene	0.104	0.00200	"	0.100	ND	104	70-130	1.61	20	
m,p-Xylene	0.218	0.00400	"	0.200	ND	109	70-130	1.08	20	
Surrogate: 1,2-Dichloroethane-d4	0.12		"	0.125		95.6	70-130			
Surrogate: Toluene-d8	0.12		"	0.125		96.7	70-130			
Surrogate: 4-Bromofluorobenzene	0.13		"	0.125		105	70-130			

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Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Volatile Organic Compounds by GC/MS SW846 8260D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch B2E1317 - EPA 3550B										
Blank (B2E1317-BLK1)					Prepared: 05/13/2022 Analyzed: 05/16/2022					
Diesel (C10-C28)	ND	25.0	mg/kg							U
Residual Range Organics (C28-C40)	ND	100	"							U
Surrogate: o-Terphenyl	16		"	24.9		64.6	50-150			

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Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2E1317 - EPA 3550B

LCS (B2E1317-BS1)

Prepared: 05/13/2022 Analyzed: 05/16/2022

Diesel (C10-C28)	1000	50.0	mg/kg	1000		100	70-130			
Residual Range Organics (C28-C40)	833	200	"	1000		83.3	70-130			
Surrogate: o-Terphenyl	33		"	49.8		65.4	50-150			

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Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2E1317 - EPA 3550B

Matrix Spike (B2E1317-MS1)		Source: Y205281-01			Prepared: 05/13/2022 Analyzed: 05/16/2022					
Diesel (C10-C28)	1070	50.0	mg/kg	1000	ND	107	70-130			
Residual Range Organics (C28-C40)	920	200	"	1000	ND	92.0	70-130			
Surrogate: o-Terphenyl	33		"	49.8		66.6	50-150			

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Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

Extractable Petroleum Hydrocarbons by 8015D - Quality Control
Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2E1317 - EPA 3550B

Matrix Spike Dup (B2E1317-MSD1)		Source: Y205281-01			Prepared: 05/13/2022 Analyzed: 05/16/2022					
Diesel (C10-C28)	1080	50.0	mg/kg	1000	ND	108	70-130	0.871	35	
Residual Range Organics (C28-C40)	882	200	"	1000	ND	88.2	70-130	4.20	35	
Surrogate: o-Terphenyl	33		"	49.8		65.7	50-150			

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Project Number: [none]
Project: Noble - State #36-914

Extractable Petroleum Hydrocarbons by 8015D - Quality Control

Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Saturated Paste - Quality Control

Origins Laboratory, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch B2E1303 - NO PREP

Blank (B2E1303-BLK1)

Prepared: 05/13/2022 Analyzed: 05/14/2022

pH	0.00		pH Units
Specific Conductance (EC)	0.00460	0.0300	mmhos/cm

Duplicate (B2E1303-DUP1)

Source: Y205274-14

Prepared: 05/13/2022 Analyzed: 05/14/2022

pH	8.29		pH Units	8.38	1.08	25
Specific Conductance (EC)	0.267	0.0300	mmhos/cm	0.264	1.24	25

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Wheat Ridge CO 80033

Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

PAH by 8270D SIM - Quality Control
Waypoint Analytical, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch L616509 - 3550B

MSD (L 89097-MSD-L616509)		Source: 89097			Prepared: 05/17/2022 Analyzed: 05/17/2022					
Fluorene	0.111	0.000286	mg/Kg	0.165	<0.000286	67.2	30-130	3.6	30	
Indeno(1,2,3-cd)pyrene	0.117	0.000627	"	0.165	<0.000627	70.9	30-130	29.2	30	
Naphthalene	0.0943	0.000484	"	0.165	<0.000484	57.1	30-130	5.3	30	
Pyrene	0.135	0.000643	"	0.165	<0.000643	81.8	30-130	3.7	30	
Dibenz(a,h)anthracene	0.125	0.000614	"	0.165	<0.000614	75.7	30-130	24.2	30	
Chrysene	0.107	0.000624	"	0.165	<0.000624	64.8	30-130	0	30	
Fluoranthene	0.139	0.000394	"	0.165	<0.000394	84.2	30-130	4.4	30	
Benzo(b)fluoranthene	0.102	0.000585	"	0.165	<0.000585	61.8	30-130	1.9	30	
Benzo(a)pyrene	0.118	0.000468	"	0.165	<0.000468	71.5	30-130	4.3	30	
Benzo(a)anthracene	0.119	0.000493	"	0.165	<0.000493	72.1	30-130	6.9	30	
Acenaphthene	0.117	0.000304	"	0.165	<0.000304	70.9	30-130	3.4	30	
2-Methylnaphthalene	0.0967	0.000645	"	0.165	<0.000645	58.6	30-130	4.7	30	
1-Methylnaphthalene	0.0966	0.000364	"	0.165	<0.000364	58.5	30-130	5.6	30	
Benzo(k)fluoranthene	0.111	0.000437	"	0.165	<0.000437	67.2	30-130	13.7	30	
Anthracene	0.126	0.000334	"	0.165	<0.000334	76.3	30-130	5.7	30	
Surrogate: Nitrobenzene-d5	56		"	0.33	168	56	29-110			
Surrogate: 4-Terphenyl-d14	88.4		"	0.33	246	88.4	33-122			
Surrogate: 2-Fluorobiphenyl	61.8		"	0.33	184	61.8	33-115			

MS (L 89097-MS-L616509)		Source: 89097			Prepared: 05/17/2022 Analyzed: 05/17/2022					
2-Methylnaphthalene	0.0922	0.000645	mg/Kg	0.165	<0.000645	55.8	30-130			
Fluorene	0.107	0.000286	"	0.165	<0.000286	64.8	30-130			
1-Methylnaphthalene	0.0913	0.000364	"	0.165	<0.000364	55.3	30-130			
Pyrene	0.13	0.000643	"	0.165	<0.000643	78.7	30-130			
Indeno(1,2,3-cd)pyrene	0.0871	0.000627	"	0.165	<0.000627	52.7	30-130			
Fluoranthene	0.133	0.000394	"	0.165	<0.000394	80.6	30-130			
Dibenz(a,h)anthracene	0.098	0.000614	"	0.165	<0.000614	59.3	30-130			

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Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

PAH by 8270D SIM - Quality Control
Waypoint Analytical, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
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Batch L616509 - 3550B

MS (L 89097-MS-L616509)		Source: 89097			Prepared: 05/17/2022 Analyzed: 05/17/2022					
Acenaphthene	0.113	0.000304	mg/Kg	0.165	<0.000304	68.4	30-130			
Benzo(k)fluoranthene	0.0967	0.000437	"	0.165	<0.000437	58.6	30-130			
Benzo(b)fluoranthene	0.1	0.000585	"	0.165	<0.000585	60.6	30-130			
Benzo(a)pyrene	0.113	0.000468	"	0.165	<0.000468	68.4	30-130			
Benzo(a)anthracene	0.111	0.000493	"	0.165	<0.000493	67.2	30-130			
Anthracene	0.119	0.000334	"	0.165	<0.000334	72.1	30-130			
Chrysene	0.107	0.000624	"	0.165	<0.000624	64.8	30-130			
Naphthalene	0.0894	0.000484	"	0.165	<0.000484	54.1	30-130			
Surrogate: Nitrobenzene-d5	53.6		"	0.33	168	53.6	29-110			
Surrogate: 2-Fluorobiphenyl	60.3		"	0.33	184	60.3	33-115			
Surrogate: 4-Terphenyl-d14	87.8		"	0.33	246	87.8	33-122			

LCS (LCS-L616509)

Prepared: 05/17/2022 Analyzed: 05/17/2022

Chrysene	0.0987	0.000624	mg/Kg	0.167		59.1	30-130			
Fluoranthene	0.128	0.000394	"	0.167		76.6	30-130			
Fluorene	0.106	0.000286	"	0.167		63.4	30-130			
Indeno(1,2,3-cd)pyrene	0.113	0.000627	"	0.167		67.6	30-130			
Naphthalene	0.089	0.000484	"	0.167		53.2	30-130			
Pyrene	0.125	0.000643	"	0.167		74.8	30-130			
Benzo(k)fluoranthene	0.0999	0.000437	"	0.167		59.8	30-130			
1-Methylnaphthalene	0.0913	0.000364	"	0.167		54.6	30-130			
Benzo(a)pyrene	0.109	0.000468	"	0.167		65.2	30-130			
Benzo(a)anthracene	0.111	0.000493	"	0.167		66.4	30-130			
Anthracene	0.117	0.000334	"	0.167		70	30-130			
Acenaphthene	0.11	0.000304	"	0.167		65.8	30-130			
2-Methylnaphthalene	0.0917	0.000645	"	0.167		54.9	30-130			
Dibenz(a,h)anthracene	0.124	0.000614	"	0.167		74.2	30-130			

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Martin C Eckert III
Project Number: [none]
Project: Noble - State #36-914

PAH by 8270D SIM - Quality Control
Waypoint Analytical, Inc.

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes
Batch L616509 - 3550B										
LCS (LCS-L616509)					Prepared: 05/17/2022 Analyzed: 05/17/2022					
Benzo(b)fluoranthene	0.1	0.000585	mg/Kg	0.167		59.8	30-130			
Surrogate: Nitrobenzene-d5	59.1		"	0.333		59.1	29-110			
Surrogate: 4-Terphenyl-d14	93.3		"	0.333		93.3	33-122			
Surrogate: 2-Fluorobiphenyl	66.9		"	0.333		66.9	33-115			
LRB (LRB-L616509)					Prepared: 05/17/2022 Analyzed: 05/17/2022					
Dibenz(a,h)anthracene	ND	0.00067	mg/Kg				-			
Fluoranthene	ND	0.00067	"				-			
Fluorene	ND	0.00067	"				-			
Indeno(1,2,3-cd)pyrene	ND	0.00067	"				-			
Naphthalene	ND	0.00067	"				-			
Chrysene	ND	0.00067	"				-			
Pyrene	ND	0.00067	"				-			
Acenaphthene	ND	0.00067	"				-			
Benzo(k)fluoranthene	ND	0.00067	"				-			
Benzo(b)fluoranthene	ND	0.00067	"				-			
Benzo(a)pyrene	ND	0.00067	"				-			
Anthracene	ND	0.00067	"				-			
2-Methylnaphthalene	ND	0.00067	"				-			
1-Methylnaphthalene	ND	0.00067	"				-			
Benzo(a)anthracene	ND	0.00067	"				-			
Surrogate: Nitrobenzene-d5	55.8		"	0.333		55.8	29-110			
Surrogate: 4-Terphenyl-d14	85.5		"	0.333		85.5	33-122			
Surrogate: 2-Fluorobiphenyl	60		"	0.333		60	33-115			

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8000 W 44th Ave

Wheat Ridge CO 80033

Martin C Eckert III

Project Number: [none]

Project: Noble - State #36-914

Notes and Definitions

U Sample is Non-Detect.

ND Analyte NOT DETECTED at or above the reporting limit

RPD Relative Percent Difference

All soil results are reported on a wet weight basis.

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