



July 7, 2023

Mr. Jason Davidson  
PDC Energy Inc.  
4000 Burlington Ave  
Evans, Colorado 80620

**RE: Facility Closure Investigation and Environmental Report  
Margil 34A Tank Battery and Associated Wellheads.  
COGCC Remediation Project #25734  
Weld County, Colorado**

Mr. Davidson,

Entrada Consulting Group, Inc. (Entrada) has prepared this report for PDC Energy, Inc. (PDC) to present the results of recent facility closure investigation and soil sampling activities conducted at the Margil 34A tank battery and associated wellheads (Site) listed in the table below:

Well Name	API Number
Margil 34A	05-123-33831
Margil 11-34D	05-123-33838
Margil 12-34D	05-123-33841
Margil 21-34D	05-123-33835
Margil 34KD	05-123-33834

The Site is located 0.79 miles northeast of the intersection of Weld County Road 38 and Weld County Road 7, north of Mead in Weld County, Colorado. The center location coordinates of the Site are approximately 40.273504° latitude and -104.994409° longitude. A general location map is provided as Figure 1.

The Initial Form 27 Site Investigation and Remediation Workplan (Colorado Oil and Gas Conservation Commission [COGCC] Document Number 403185090) for facility closure at the Site was approved by the COGCC on November 7, 2022, and was assigned Remediation Project Number 25734. Entrada was retained by PDC to conduct facility closure field screening and to collect confirmation soil samples during decommissioning of the tank battery equipment and during cut and cap activities of the wellheads.

All investigation activities, field screening, and confirmation soil sampling activities discussed herein were conducted in accordance with COGCC 900 Series Rules and guidance documents. Discrete soil samples were collected and analyzed pursuant to Rule 915, following the general sample collection guidance in Rule 915.e.(2).

## **FACILITY CLOSURE SOIL SAMPLING ACTIVITIES**

On February 6, February 7, February 8, February 9, February 10, February 13, and April 3, 2023, Entrada personnel conducted field screening and collected soil samples related to facility decommissioning and wellhead cut and cap activities at the Site. Field screening consisted of inspecting soil for visual and olfactory evidence of hydrocarbon impact and use of a photoionization detector (PID) calibrated with 100 parts per million (ppm) isobutylene gas. The equipment investigated following decommissioning and removal included six above ground storage tanks (AST), two partially buried produced water tanks (PWV), six horizontal separators (SEP), two emission control devices (ECD), one meter house (MH), and five wellheads and associated flowlines and dump lines. The field screening and sample location information is summarized in Table 1. The facility closure field screening and soil sample location general overview map is provided on Figure 2. The facility closure checklists are provided in Attachment B.

### **Above Ground Storage Tanks (AST) and Partially Buried Produced Water Tanks (PWV)**

Following removal of the ASTs, one soil sample was collected for laboratory analysis from beneath the access hatch of each of the removed ASTs (AST01 through AST06) at depths of approximately 1 to 1.5 feet below ground surface (ft-bgs). Following removal of the PWV tanks, soil was field screened with the PID from the tank excavation floors and the sidewalls in each cardinal direction. Two soil samples, WDL01@3 and WDL02@3 were collected adjacent to the former water dump lines (WDL) at 3 ft-bgs from the west and east sidewalls, respectively. Three soil samples (PWV01@5, PWV01-2@5, and PWV02@5) were collected at 5 ft-bgs from the floor of the PWV excavations. PWV samples were submitted for analysis of analytes detailed below. No evidence of hydrocarbon impacts was observed. The AST and PWV field screening PID results, and soil sample locations are displayed on Figure 3.

### **Separators, ECD's, and Meter House**

Following removal of the separators, confirmation soil samples were collected from adjacent to the former flowline risers (SEP01-FL through SEP06-FL) and dump lines (SEP01-DL through SEP06-DL). Field screening was conducted beneath the former ECDs and meter house, and no evidence of hydrocarbon impacts was observed. The separator area field screening PID results, and soil sample locations are displayed on Figure 4.

## Wellheads

At each of the five wellheads, soil was excavated around the well to approximately 8 ft-bgs to 10 ft-bgs to perform cut and cap activities. Soil was collected from the surface around the wellheads in each cardinal direction and field screened with a PID. At each wellhead, one soil sample was collected from the excavation sidewall adjacent to the flowline riser (WH01-S through WH05-S) and one soil sample was collected from the floor of the excavation (WH01 through WH05) and submitted for laboratory analysis of analytes detailed below. No evidence of hydrocarbon impact was observed at any of the wellhead locations. The wellhead field screening locations and PID results, and soil sample locations are displayed on Figure 5.

## Flowlines and Dump Lines

Flowlines at the site were pulled from the subsurface at the wellheads and the inlet manifold of the separators. During the removal of dump lines at the Site, the lines were daylighted using a backhoe and pulled from the subsurface. Soil was field screened with the PID at all locations where lines were daylighted for removal and sampling depths were representative of flowline depths. No field evidence of hydrocarbon impact was observed during removal of the flowlines and dump lines. The dump line field screening location and PID results are displayed on Figure 5.

## Background Soil Samples

Two background soil samples were collected from two separate background borings (BKG02@5 and BKG03@5) to characterize background inorganic concentrations. Samples were collected from areas away from potential sources of impact related to the Site. The background sample locations are displayed on Figure 2.

## **FACILITY CLOSURE LABORATORY ANALYSIS**

### **Soil Analysis**

All soil samples were collected into 4-ounce jars, sealed, labeled, placed into ice-filled coolers for preservation, then submitted following chain-of-custody procedures to Summit Scientific (Summit) in Golden, Colorado, for analysis of the following parameters by the stated methods:

### All Facility Closure Samples (AST, SEP, PWV, WDL, WH)

- Benzene, toluene, ethylbenzene, total xylenes (BTEX), 1,2,4 trimethylbenzene (TMB), 1,3,5 TMB, and total petroleum hydrocarbons (TPH) as gasoline range organics (GRO) by Environmental Protection Agency (EPA) Method 8260B.

- TPH as diesel range organics (DRO) and TPH as oil range organics (ORO) by EPA Method 8015.

#### Wellhead Excavation Sidewall Soil Samples (WH01-S through WH05-S), and Floor of PWV Excavations

- Electrical conductivity (EC) by EPA Method 120.1 Saturated Paste Extraction, sodium adsorption ratio (SAR) by Calculated Analysis, pH by Saturated Paste Extraction and boron by EPA 6020B Hot Water Soluble Extraction.

#### PWV Soil Sample PWV01-2@5

- Complete Table 915-1 list:
  - BTEX, 1,2,4-TMB, 1,3,5 TMB, and TPH-GRO by the above stated methods.
  - TPH-DRO and TPH-ORO by the above stated methods.
  - Polycyclic aromatic hydrocarbons [PAHs (Table 915-1 list)] by EPA method 8270D SIM.
  - Metals (Table 915-1 list) by EPA Method 6020B with hexavalent chromium by EPA Method 7196.
  - EC, pH, SAR, and boron by the above stated methods.

#### Background Soil Samples

- EC, pH, SAR, and boron by the above stated methods.
- Arsenic, barium, and selenium by the above stated method for metals.

## **FACILITY CLOSURE ANALYTICAL RESULTS**

### **Soil Analytical Results**

COGCC Table 915-1 Protection to Groundwater Soil Screening Levels (GWSSLs) were used to determine soil compliance. All facility closure laboratory analytical results were compliant with their respective Table 915-1 GWSSLs except arsenic (6.03 mg/kg) and barium (87.4 mg/kg) in soil sample PWV01-2@5, which are below 1.25x their average background concentrations of 6.84 mg/kg and 127.5 mg/kg, respectively. The facility closure soil analytical results are summarized in Table 2, Table 3, and Table 4. The laboratory analytical reports are provided in Attachment C.

## **SUMMARY AND RECOMMENDATIONS**

All organics were reported as non-detect, except for a DRO concentration of 66 mg/kg in soil sample PWV01@5. A second sample, PWV01-2@5, was collected from this location and submitted for full Table 915-1 analysis. As stated above, all analytical

results are compliant with their respective standards, or below their respective average background concentrations.

In accordance with recent conditions of approval (COA) for Supplemental Form 27 Document Numbers 403324681 and 403324642, additional confirmation soil samples will be collected from the western former produced water vessel floor and from each former wellhead and will be submitted for analysis of PAHs by the above stated method. Following email correspondence with the COGCC (July 5, 2023), PDC will collect the additional confirmation soil samples at soil sample locations PWV02@5, WH01-S@4, WH02-S@4, WH03-S@4, WH04-S@4, and WH05-S@4. PAH results for the eastern PWV location are provided in Table 3, and the above-mentioned wellhead locations are at the former flowline risers, where sample depths are achievable with a hand auger, and are more likely to represent potential impacts than the former wellhead excavation floors.

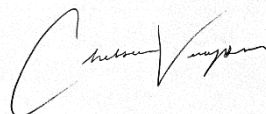
We appreciate the opportunity to assist PDC Energy Inc. Please contact me at (804) 513-0707 if you have any questions.

Sincerely,

**ENTRADA CONSULTING GROUP**



Ben Baugh, P.G.  
*Senior Project Geologist*



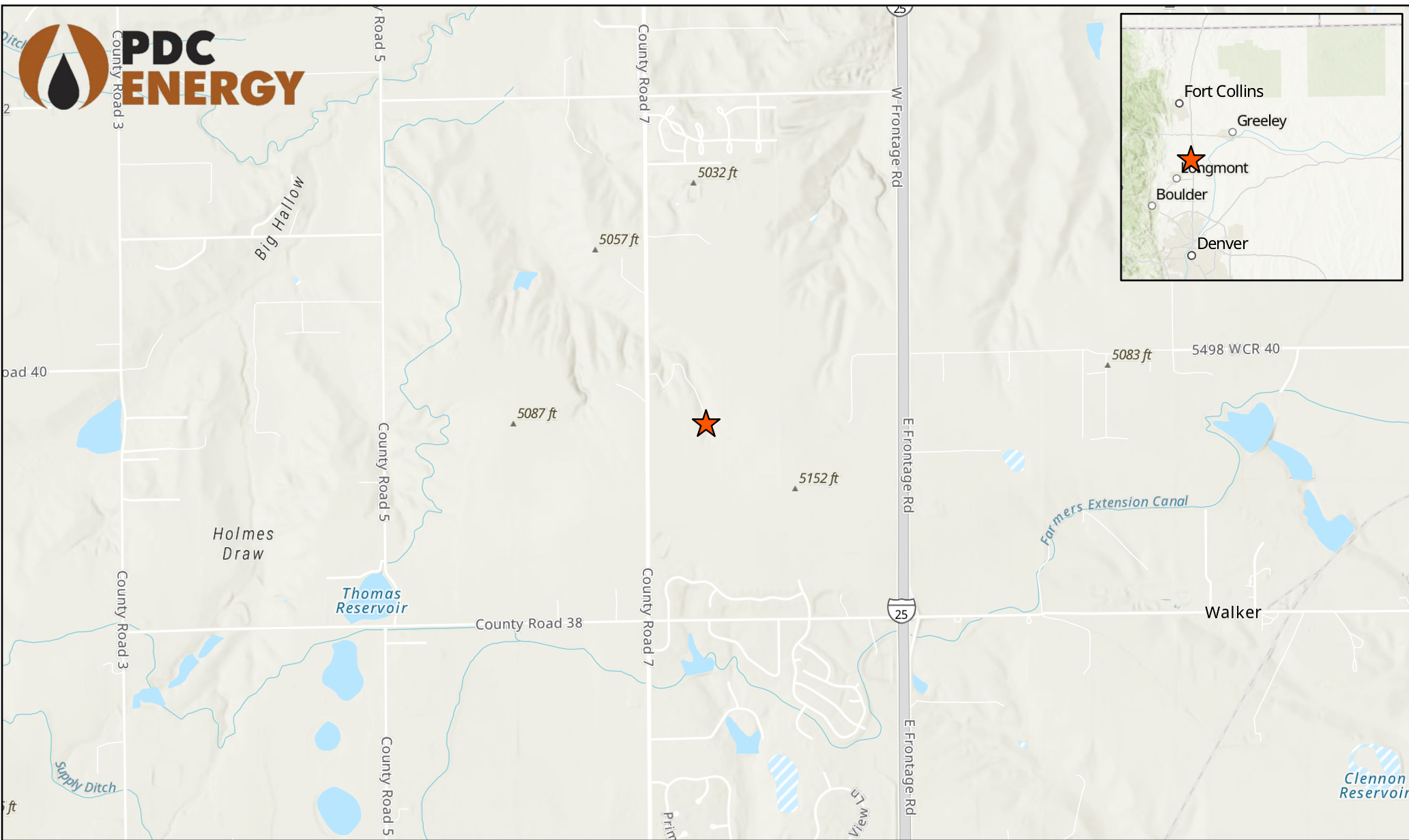
Chelsea Veryser  
*Project Geologist*

**Attachments:**

- Figure 1 – General Location Map**
- Figure 2 – Sampling Overview Map**
- Figure 3 – Tank Battery Soil Sample Location Map**
- Figure 4 – Separators Soil Sample Location Map**
- Figure 5 – Wellheads Soil Sample Location Map**
- Table 1 – Soil Sample and Field Screening Location Information**
- Table 2 – Soil Analytical Results Summary- Organics**
- Table 3 – Soil Analytical Results Summary- PAHs**
- Table 4 – Soil Analytical Results Summary- Inorganics**

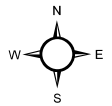
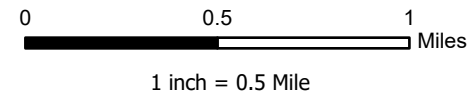
**Attachment A: Photographic Log**  
**Attachment B: Facility Closure Checklists**  
**Attachment C: Laboratory Analytical Reports**

## FIGURES



#### LEGEND

★ Site Location



Project No: 022-112

Map By: JW

Date: 03/01/2023

**MARGIL 34A**  
**GENERAL LOCATION MAP**  
PDC ENERGY  
NW 1/4 NW 1/4 & SW 1/4 NW 1/4 SECTION 34  
T4N R68W, 6TH PM  
WELD COUNTY, COLORADO

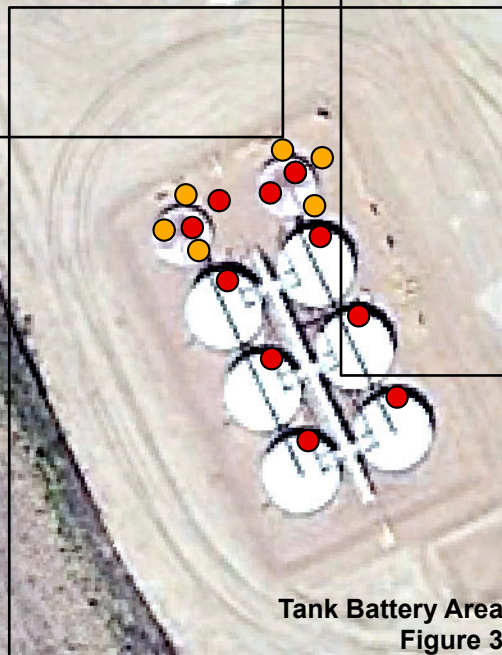
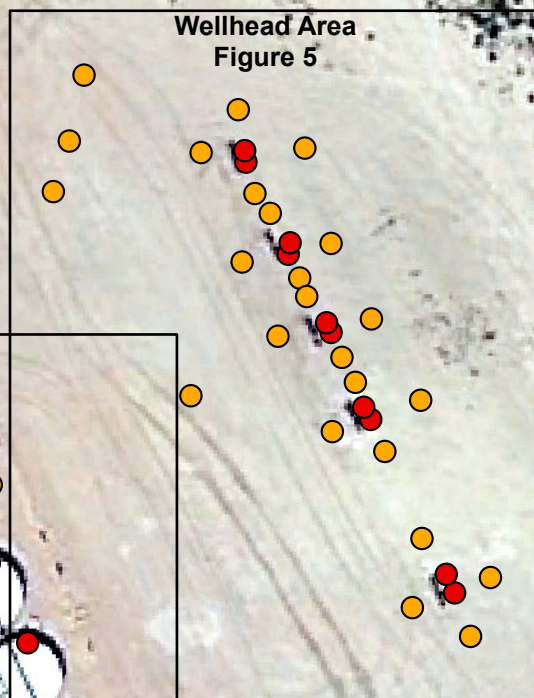


1843 Sunlight Dr.  
Longmont, CO 80504  
303.378.4036

Figure

1

BKG02@5	
4/3/2023	
Arsenic (mg/kg):	5.24
Barium (mg/kg):	130



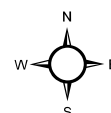
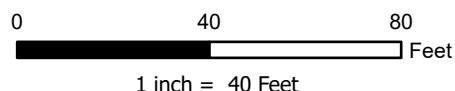
BKG03@5	
4/3/2023	
Arsenic (mg/kg):	5.71
Barium (mg/kg):	73.9

Maxar, Microsoft

## Legend

- Soil Sample
- Screening Location

NOTES:  
- GREEN - Above COGCC Table  
915-1 GWSSL, representative of  
background levels



Project No: 022-112

Map By: JW

Date: 04/30/2023

## MARGIL 34A PRODUCTION FACILITY SAMPLING OVERVIEW MAP

PDC ENERGY  
NW 1/4 NW 1/4 & SW 1/4 NW 1/4 SECTION 34  
T4N R68W, 6TH PM  
WELD COUNTY, COLORADO



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Figure

2

PWV01-2@5	
4/3/2023	
Arsenic (mg/kg):	6.03
Barium (mg/kg):	87.4

Produced Water Vessel

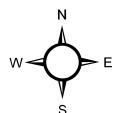
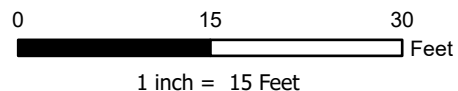
Above Ground Storage Tanks

LABEL LEGEND	
XXXX@X:	SAMPLE NAME @ DEPTH IN FEET
PID:	PHOTOIONIZATION DETECTOR
GREEN:	ABOVE COGCC TABLE 915-1 GWSSL, REPRESENTATIVE OF BACKGROUND LEVELS

## Legend

- Soil Sample
- Screening Location

NOTES:  
 - Sample Label (PID Result in ppm)  
 - ppm = parts per million



Project No: 022-112

Map By: JW

Date: 04/30/2023

**MARGIL 34A TANK BATTERY**  
**SOIL SAMPLE AND SCREENING LOCATIONS**  
 PDC ENERGY  
 NW 1/4 NW 1/4 & SW 1/4 NW 1/4 SECTION 34  
 T4N R68W, 6TH PM  
 WELD COUNTY, COLORADO



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Figure

3

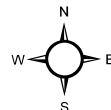
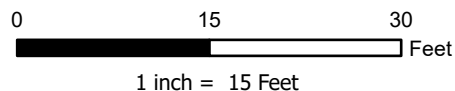


**LABEL LEGEND**  
 XXXX@X: SAMPLE NAME @ DEPTH IN FEET  
 PID: PHOTOIONIZATION DETECTOR

### Legend

- Soil Sample
- Screening Location

**NOTES:**  
 - Sample Label (PID Result in ppm)  
 - ppm = parts per million



Project No: 022-112

Map By: JW

Date: 03/14/2023

### MARGIL 34A SEPARATORS SOIL SAMPLE AND SCREENING LOCATIONS

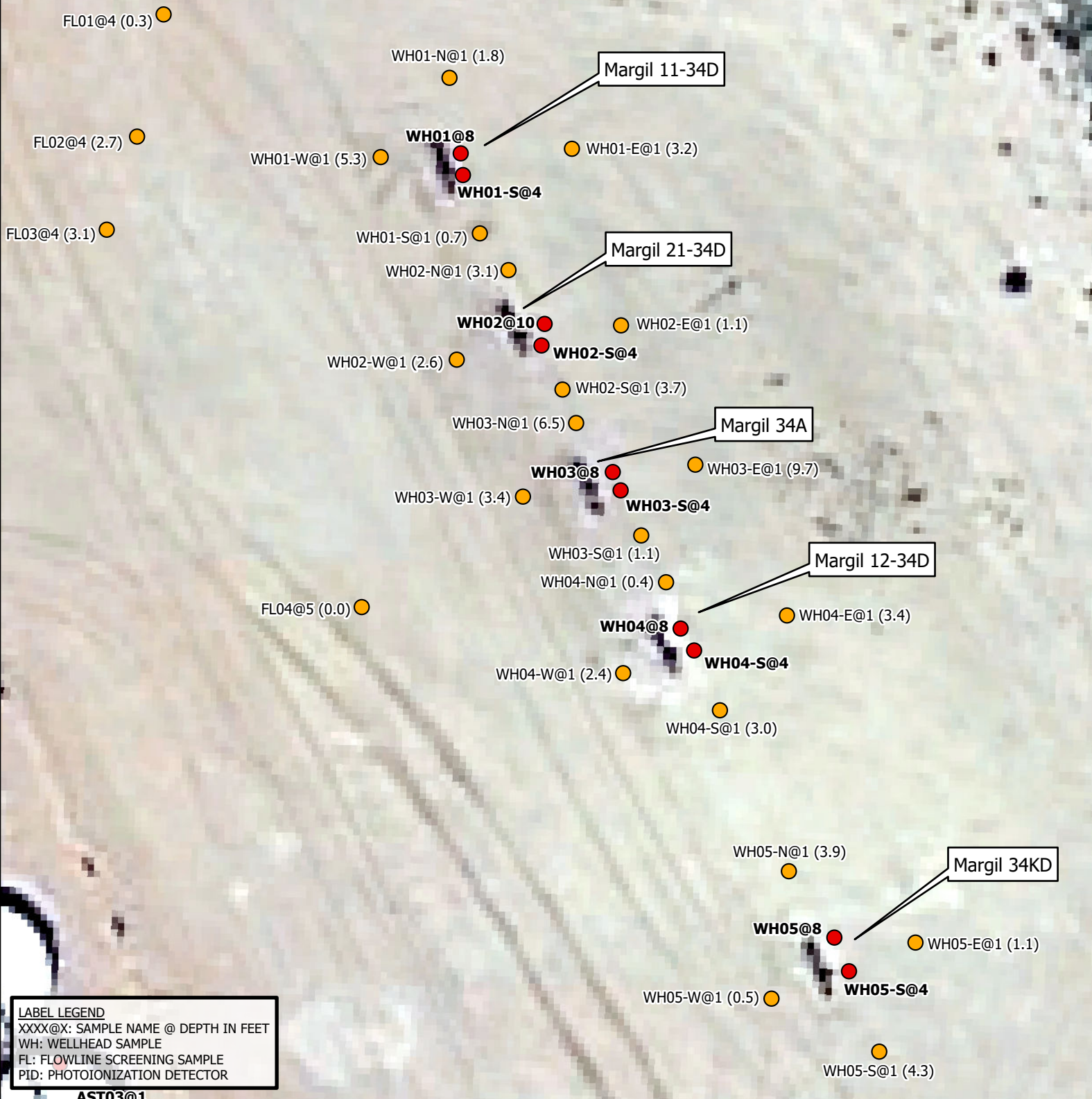
PDC ENERGY  
 NW 1/4 NW 1/4 & SW 1/4 NW 1/4 SECTION 34  
 T4N R68W, 6TH PM  
 WELD COUNTY, COLORADO



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Figure

4

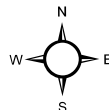
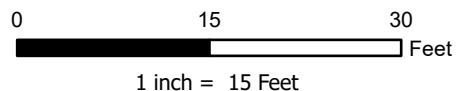


## Legend

- Soil Sample
- Screening Location

## NOTES:

- Sample Label (PID Result in ppm)
- ppm = parts per million



Project No: 022-112

Map By: JW

Date: 03/14/2023

**MARGIL 34A WELLHEADS**  
**SOIL SAMPLE AND SCREENING LOCATIONS**  
 PDC ENERGY  
 NW 1/4 NW 1/4 & SW 1/4 NW 1/4 SECTION 34  
 T4N R68W, 6TH PM  
 WELD COUNTY, COLORADO



1843 Sunlight Drive  
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Figure

5

## **TABLES**

**TABLE 1**  
**Soil Sample and Field Screening Information**  
**Margil 34A Production Facility and Wellheads. Weld County, CO**

Sample Information				
Sample ID	Depth	Sample Date	Latitude	Longitude
Units -->	ft-bgs	mm/dd/yyyy	Decimal Degree (NAD83)	
AST01@1	1	2/6/2023	40.273269	-104.994509
AST02@1	1	2/6/2023	40.273245	-104.994575
AST03@1	1	2/6/2023	40.273316	-104.994537
AST04@1.5	1.5	2/6/2023	40.273292	-104.994602
AST05@1	1	2/6/2023	40.273361	-104.994565
AST06@1.5	1.5	2/6/2023	40.273337	-104.994635
PWV01@5	5	2/7/2023	40.273398	-104.994584
PWV02@5	5	2/7/2023	40.273367	-104.994661
WDL01@3	3	2/7/2023	40.273387	-104.994602
WDL02@3	3	2/7/2023	40.273382	-104.994640
SEP01-DL@5	5	2/8/2023	40.273546	-104.994710
SEP01-FL@5	5	2/8/2023	40.273570	-104.994676
SEP02-DL@4	4	2/8/2023	40.273578	-104.994727
SEP02-FL@5	5	2/8/2023	40.273600	-104.994691
SEP03-DL@4	4	2/8/2023	40.273609	-104.994741
SEP03-FL@5	5	2/8/2023	40.273632	-104.994708
SEP04-DL@8	8	2/8/2023	40.273634	-104.994753
SEP04-FL@5	5	2/8/2023	40.273661	-104.994732
SEP05-DL@4	4	2/8/2023	40.273669	-104.994775
SEP05-FL@5	5	2/8/2023	40.273692	-104.994748
SEP06-FL@5	5	2/8/2023	40.273717	-104.994769
SEP06-DL@4	4	2/8/2023	40.273697	-104.994806
WH01-S@4	4	2/8/2023	40.273590	-104.994372
WH02-S@4	4	2/8/2023	40.273537	-104.994341
WH03-S@4	4	2/8/2023	40.273492	-104.994309
WH04-S@4	4	2/8/2023	40.273443	-104.994280
WH05-S@4	4	2/8/2023	40.273343	-104.994218
WH01@8	8	2/9/2023	40.273597	-104.994373
WH02@10	10	2/13/2023	40.273544	-104.994339
WH03@8	8	2/9/2023	40.273498	-104.994312
WH04@8	8	2/10/2023	40.273449	-104.994285
WH05@8	8	2/10/2023	40.273354	-104.994224
PWV01-E@3	3	2/7/2023	40.273406	-104.994564
PWV01-S@3	3	2/7/2023	40.273379	-104.994569
PWV01-N@3	3	2/7/2023	40.273411	-104.994593
PWV02-S@3	3	2/7/2023	40.273354	-104.994656
PWV02-W@3	3	2/7/2023	40.273366	-104.994682
PWV02-N@3	3	2/7/2023	40.273386	-104.994666
FL01@4	4	2/8/2023	40.273640	-104.994493
FL02@4	4	2/9/2023	40.273603	-104.994504
FL03@4	4	2/9/2023	40.273574	-104.994516

**TABLE 1**  
**Soil Sample and Field Screening Information**  
**Margil 34A Production Facility and Wellheads. Weld County, CO**

Sample Information				
Sample ID	Depth	Sample Date	Latitude	Longitude
Units -->	ft-bgs	mm/dd/yyyy	Decimal Degree (NAD83)	
FL04@5	5	2/13/2023	40.273457	-104.994414
WH01-N@1	1	2/9/2023	40.273620	-104.994377
WH01-E@1	1	2/9/2023	40.273598	-104.994328
WH01-S@1	1	2/9/2023	40.273572	-104.994365
WH01-W@1	1	2/9/2023	40.273596	-104.994405
WH02-N@1	1	2/9/2023	40.273561	-104.994354
WH02-E@1	1	2/9/2023	40.273543	-104.994309
WH02-S@1	1	2/9/2023	40.273524	-104.994332
WH02-W@1	1	2/9/2023	40.273533	-104.994375
WH03-N@1	1	2/9/2023	40.273513	-104.994327
WH03-E@1	1	2/9/2023	40.273500	-104.994279
WH03-S@1	1	2/9/2023	40.273478	-104.994301
WH03-W@1	1	2/9/2023	40.273490	-104.994349
WH04-N@1	1	2/9/2023	40.273464	-104.994291
WH04-E@1	1	2/9/2023	40.273453	-104.994242
WH04-S@1	1	2/9/2023	40.273424	-104.994270
WH04-W@1	1	2/9/2023	40.273436	-104.994309
WH05-N@1	1	2/9/2023	40.273374	-104.994242
WH05-E@1	1	2/9/2023	40.273352	-104.994191
WH05-S@1	1	2/9/2023	40.273318	-104.994206
WH05-W@1	1	2/9/2023	40.273335	-104.994249
MH01@0.5	0.5	2/13/2023	40.273762	-104.994782
ECD01@0.5	0.5	2/13/2023	40.273666	-104.994904
ECD02@0.5	0.5	2/13/2023	40.273639	-104.994889
PWV01-2@5	5	4/3/2023	40.273398	-104.994584
BKG02@5	5	4/3/2023	40.273407	-104.994988
BKG03@5	5	4/3/2023	40.273834	-104.994977

Notes:  
ft-bgs - feet below ground surface

**TABLE 2**  
**Soil Analytical Results Summary Table - Organics**  
**Margil 34A Production Facility and Wellheads, Weld County, CO**

Sample Information				BTEXN + TMBs							TPH			
Sample ID	Depth	Sample Date	PID Field Screening	Benzene	Toluene	Ethyl-benzene	Total Xylenes	Naphthalene	1,2,4-TMB	1,3,5-TMB	GRO	DRO	ORO	TPH
Units -->	ft-bgs	mm/dd/yyyy	ppm	mg/kg							mg/kg			
COGCC RSSL -->				1.2	490	5.8	58	2	30	27	500	500	500	500
COGCC GWSSL -->				0.0026	0.69	0.78	9.9	0.0038	0.0081	0.0087	500	500	500	500
AST01@1	1	2/6/2023	3.0	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
AST02@1	1	2/6/2023	3.5	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
AST03@1	1	2/6/2023	1.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
AST04@1.5	1.5	2/6/2023	5.9	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
AST05@1	1	2/6/2023	6.2	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
AST06@1.5	1.5	2/6/2023	3.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
PWV01@5	5	2/7/2023	0.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	66	<50	66
PWV01-2@5	5	4/3/2023	1.5	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	77	<50	77
PWV02@5	5	2/7/2023	0.5	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WDL02@3	3	2/7/2023	0.6	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WDL01@3	3	2/7/2023	0.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP01-DL@5	5	2/8/2023	0.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP01-FL@5	5	2/8/2023	1.8	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP02-DL@4	4	2/8/2023	1.5	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP02-FL@5	5	2/8/2023	0.4	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP03-DL@4	4	2/8/2023	8.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP03-FL@5	5	2/8/2023	0.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP04-DL@8	8	2/8/2023	0.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP04-FL@5	5	2/8/2023	0.4	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP05-DL@4	4	2/8/2023	0.5	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP05-FL@5	5	2/8/2023	8.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP06-FL@5	5	2/8/2023	0.4	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
SEP06-DL@4	5	2/8/2023	1.4	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH01-S@4	4	2/8/2023	0.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH02-S@4	4	2/8/2023	0.0	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH03-S@4	4	2/8/2023	0.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH04-S@4	4	2/8/2023	0.2	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH05-S@4	4	2/8/2023	0.1	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH01@8	8	2/9/2023	0.0	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH02@10	10	2/13/2023	0.0	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH03@8	8	2/9/2023	0.0	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH05@8	8	2/10/2023	1.1	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50
WH04@8	8	2/10/2023	2.3	<0.0020	<0.0050	<0.0050	<0.010	<0.0038	<0.0050	<0.0050	<0.50	<50	<50	<100.50

Notes:

GRO - Gasoline Range Organics  
DRO - Diesel Range Organics  
ORO - Oil Range Organics  
TPH - Total Petroleum Hydrocarbons  
PID - Photo Ionization Detector  
TMB - Trimethylbenzene  
ft-bgs - feet below ground surface

ppm - parts per million  
COGCC - Colorado Oil and Gas Conservation Commission  
BTEXN - Benzene, Toluene, Ethylbenzene, Xylenes, Naphthalene  
RSSL - Residential Soil Screening Level  
GWSSL - Groundwater Soil Screening Level  
< - indicates result is below the laboratory reporting limit  
mg/kg - milligrams per kilogram

**TABLE 3**  
**Soil Analytical Results Summary Table - PAHs**  
**Margil 34A Production Facility and Wellheads, Weld County, CO**

Sample Information				PAHs													
Sample ID	Depth	Sample Date	PID Field Screening	Acenaphthene	Anthracene	Benz(a)-anthracene	Benzo(b)-fluoranthene	Benzo(k)-fluoranthene	Benzo(a)pyrene	Chrysene	Dibenzo(a,h)anthracene	Fluoranthene	Fluorene	Indeno(1,2,3-cd)pyrene	1-methylnaphthalene	2-methylnaphthalene	Pyrene
Units -->	ft-bgs	mm/dd/yyyy	ppm	mg/kg													
COGCC RSSL -->				360	1800	1.1	1.1	11	0.11	110	0.11	240	240	1.1	18	24	180
COGCC GWSSL -->				0.55	5.8	0.011	0.3	2.9	0.24	9	0.096	8.9	0.54	0.98	0.006	0.019	1.3
PWV01-2@5	5	4/3/2023	1.5	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500	<0.00500

Notes:

ft-bgs - feet below ground surface  
 PID - Photo Ionization Detector  
 ppm - parts per million  
 mg/kg - milligrams per kilogram

COGCC - Colorado Oil and Gas Conservation Commission  
 RSSL - Residential Soil Screening Level  
 GWSSL - Groundwater Soil Screening Level  
 < - indicates result is below the laboratory reporting limit

**TABLE 4**  
**Soil Analytical Results Summary Table - Inorganics**  
**Margil 34A Production Facility and Wellheads, Weld County, CO**

Sample Information				Soil Suitability for Reclamation				Metals in Soils									
Sample ID	Depth	Sample Date	PID Field Screening	EC	SAR	pH	Boron	Arsenic	Barium	Cadmium	Chromium (VI)	Copper	Lead	Nickel	Selenium	Silver	Zinc
Units -->	ft-bgs	mm/dd/yyyy	ppm	mmhos/cm	Unitless	Unitless	mg/l	mg/kg									
COGCC RSSL -->				<4	<6	6.0 - 8.3	2	0.68	15000	71	0.3	3100	400	1500	390	390	23000
COGCC GWSSL -->				<4	<6	6.0 - 8.3	2	0.29	82	0.38	0.00067	46	14	26	0.26	0.8	370
1.25x Average Background				NA	NA	NA	NA	6.84	127.5	NA	NA	NA	NA	NA	NA	NA	NA
PWV01@5	5	2/7/2023	0.3	0.342	0.123	7.71	0.127										
PWV02@5	5	2/7/2023	0.5	0.299	0.287	7.85	0.0866										
PWV01-2@5	5	4/3/2023	1.5	0.508	0.801	7.98	0.129	6.03	87.4	0.163	<0.30	5.22	9.51	5.92	<0.260	0.0476	26.6
WH01-S@4	4	2/8/2023	0.3	0.298	0.495	8.19	0.157										
WH02-S@4	4	2/8/2023	0.0	0.285	0.717	8.18	0.145										
WH03-S@4	4	2/8/2023	0.3	0.330	0.959	8.18	0.325										
WH04-S@4	4	2/8/2023	0.2	1.47	1.87	7.83	0.118										
WH05-S@4	4	2/8/2023	0.1	0.330	1.14	8.26	0.237										
BKG02@5	5	4/3/2023	NA	0.341	1.15	8.20	0.343	5.24	130						<0.260		
BKG03@5	5	4/3/2023	NA	0.268	0.124	7.97	0.0152	5.71	73.9						<0.260		

Notes:

PID - Photo Ionization Detector  
 EC - Electrical Conductivity  
 SAR - Sodium adsorption ratio  
 ft-bgs - feet below ground surface  
 ppm - parts per million  
 mg/l - milligrams per liter

COGCC - Colorado Oil and Gas Conservation Commission  
 RSSL - Residential Soil Screening Level  
 GWSSL - Groundwater Soil Screening Level  
 mmhos/cm - millimeters of mercury per centimeter  
 Green- Above COGCC Table 915-1 GWSSL, representative of background levels

**ATTACHMENT A**  
**PHOTOGRAPHIC LOG**

## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



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## Margil 34A Production Facility and Associated Wellheads Photographic Log

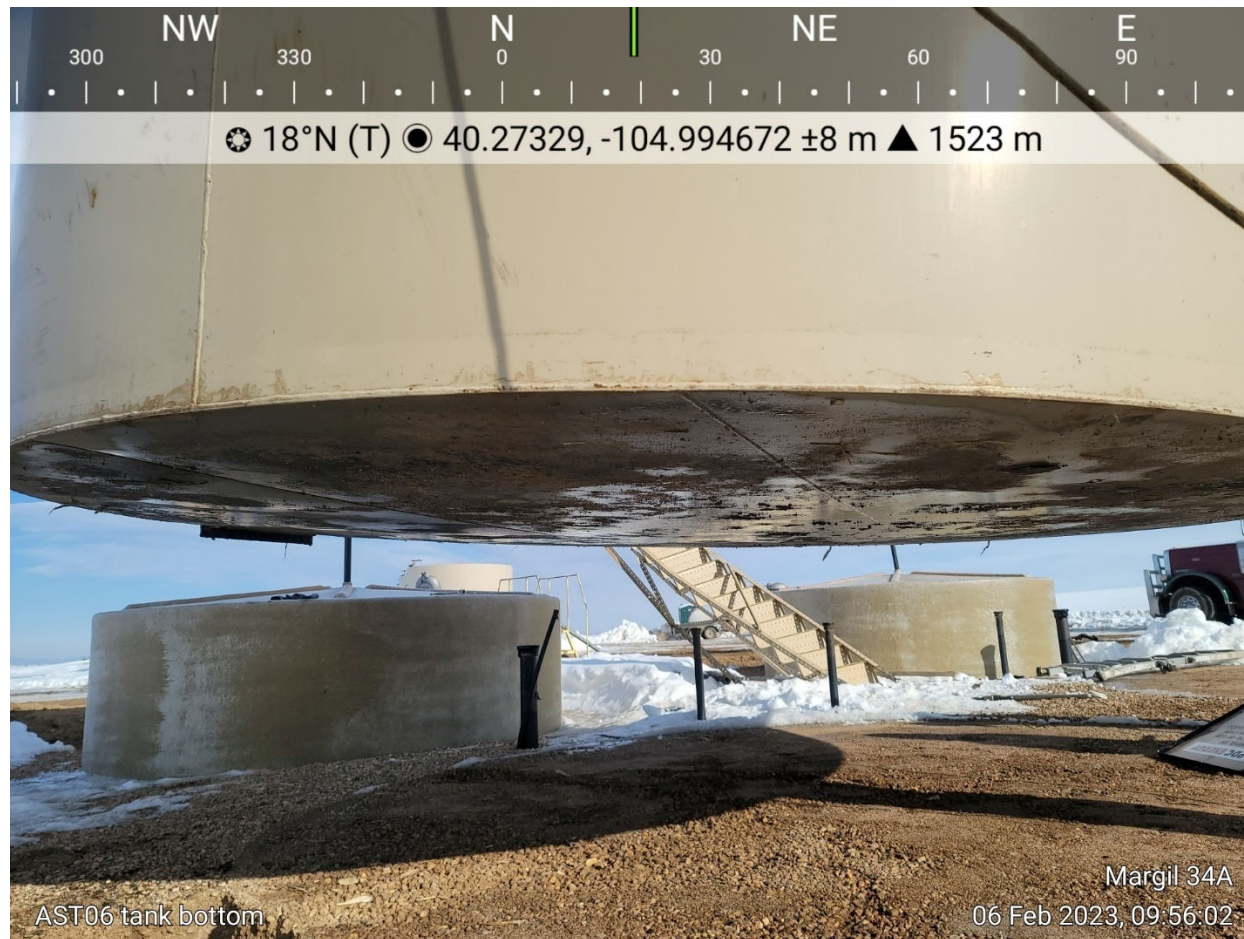


Entrada Consulting Group  
March 2023

## Margil 34A Production Facility and Associated Wellheads Photographic Log



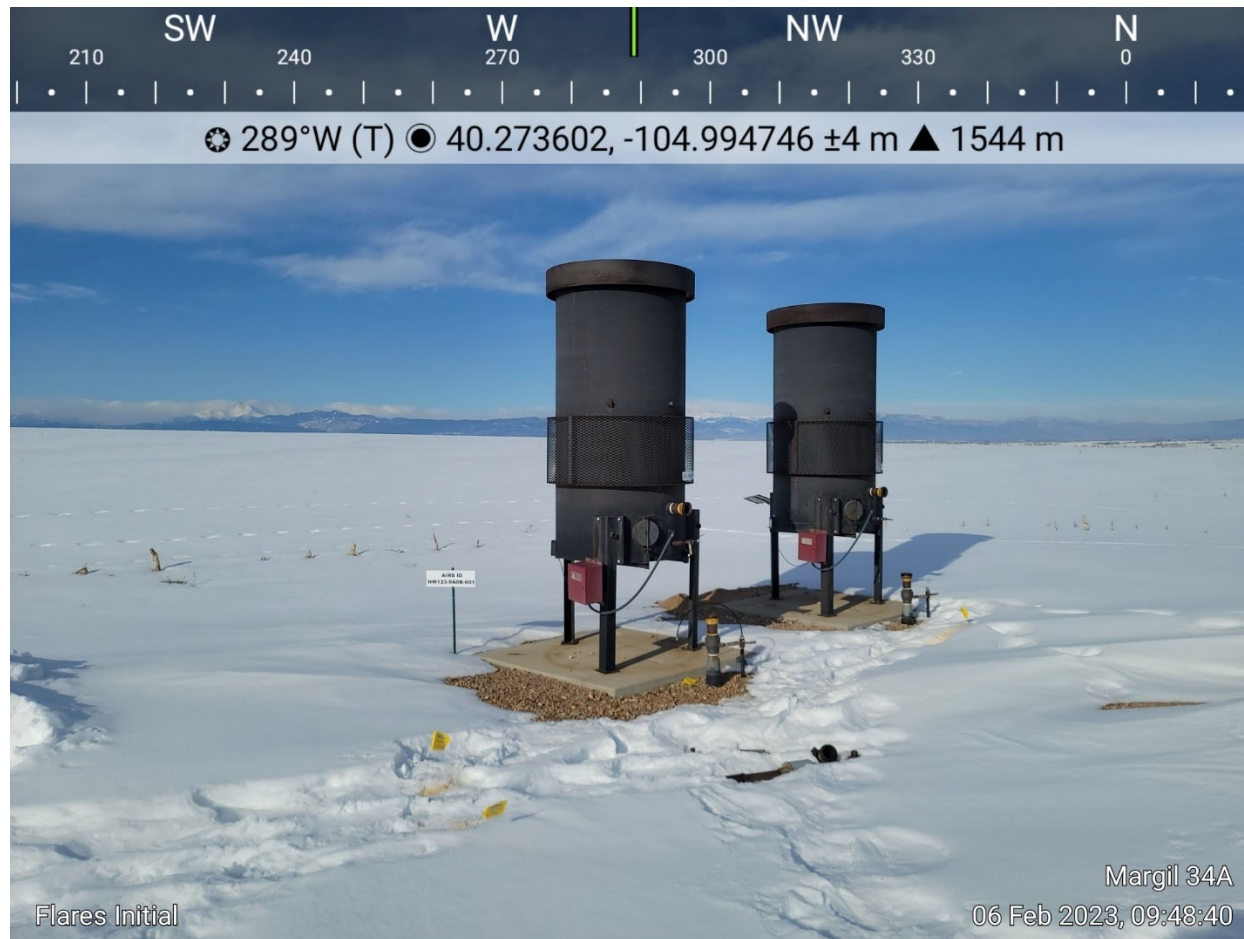
## Margil 34A Production Facility and Associated Wellheads Photographic Log



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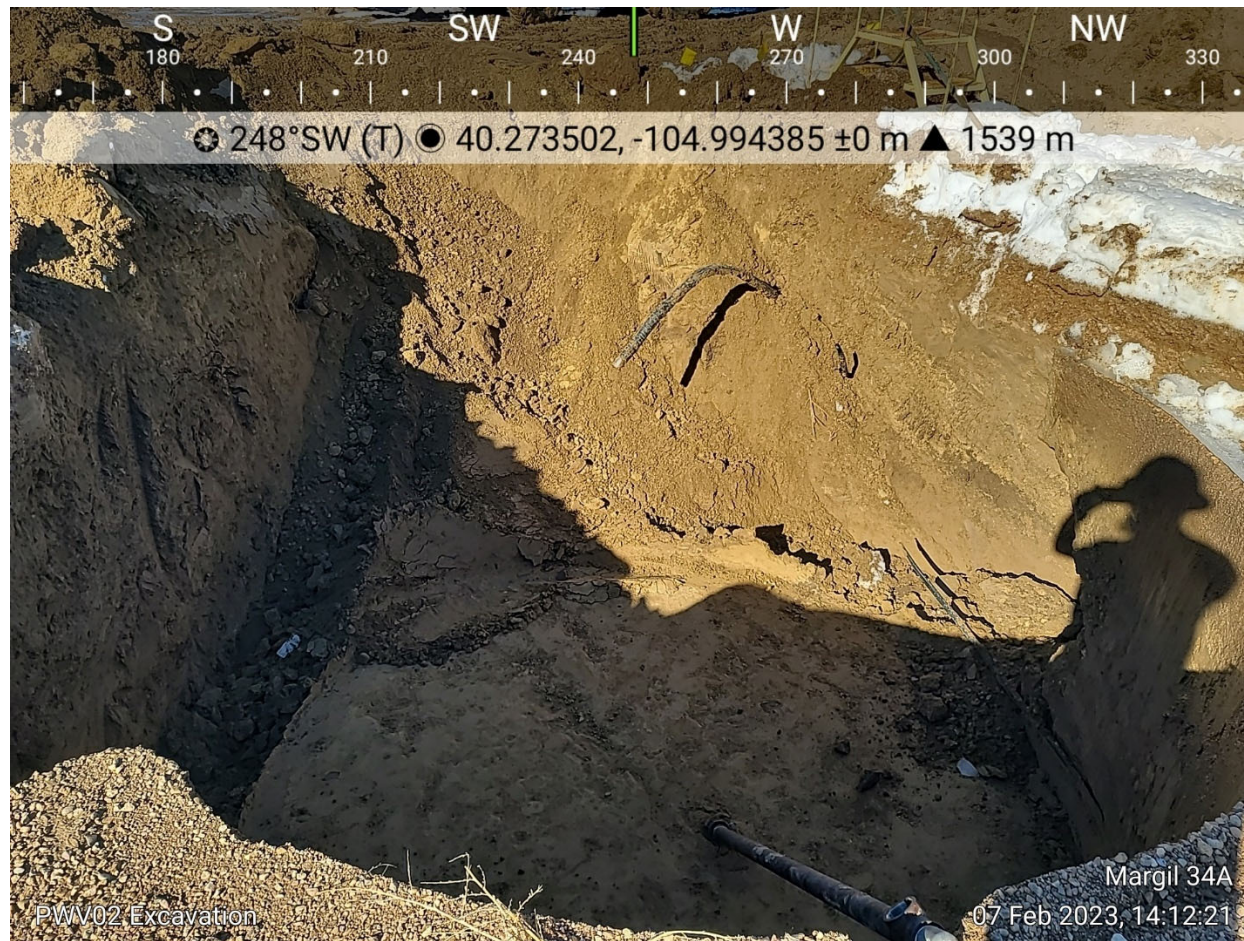
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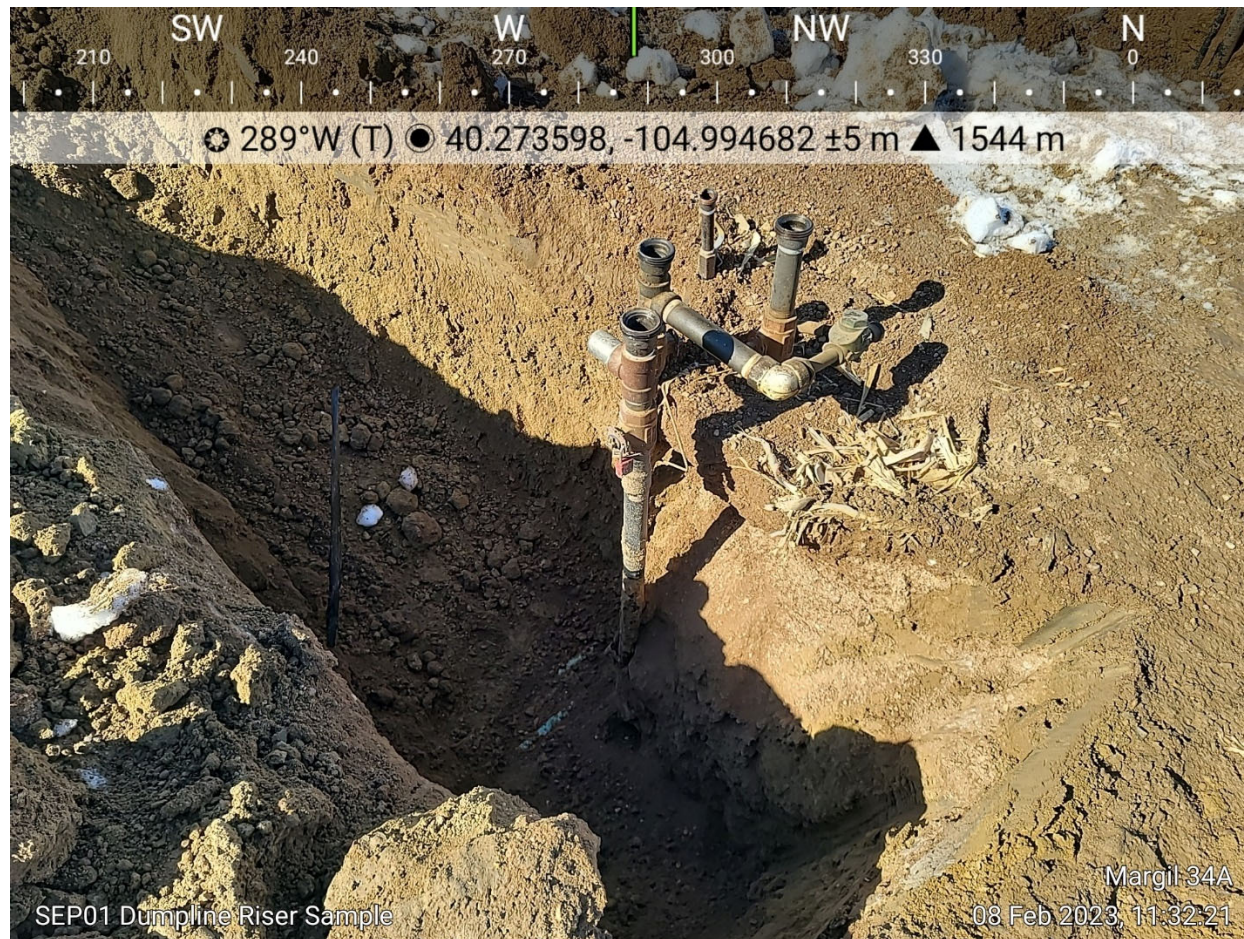
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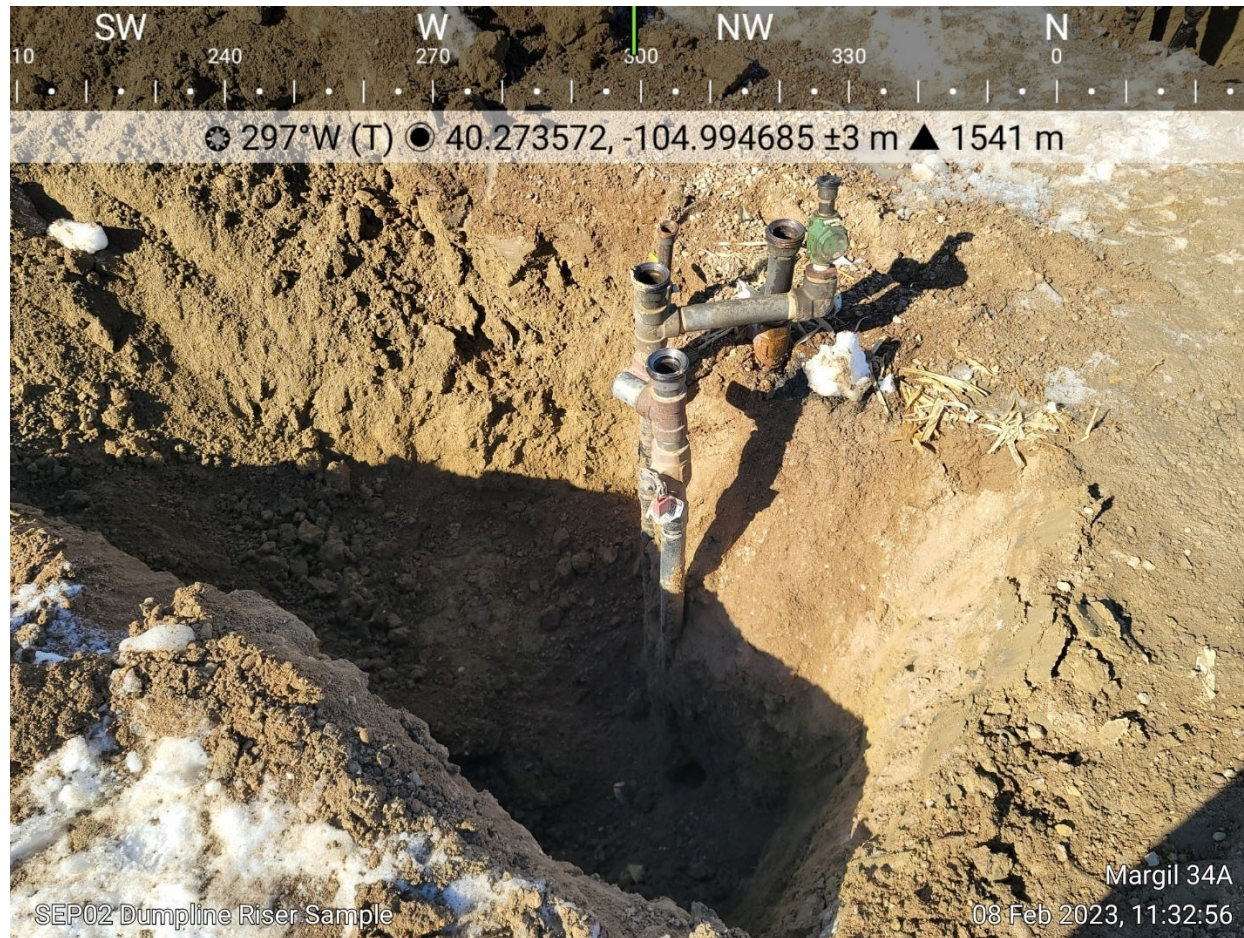
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## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



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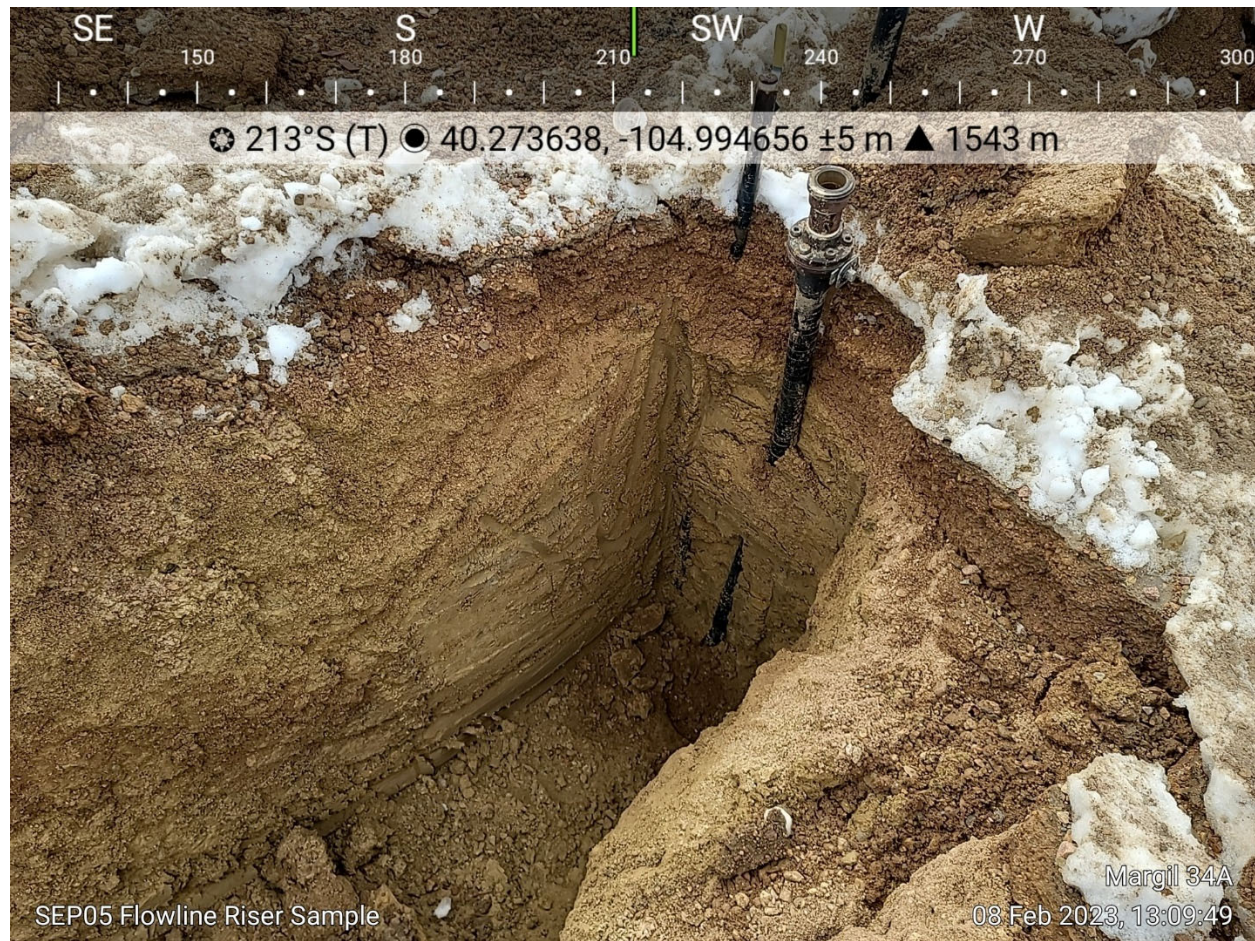
## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



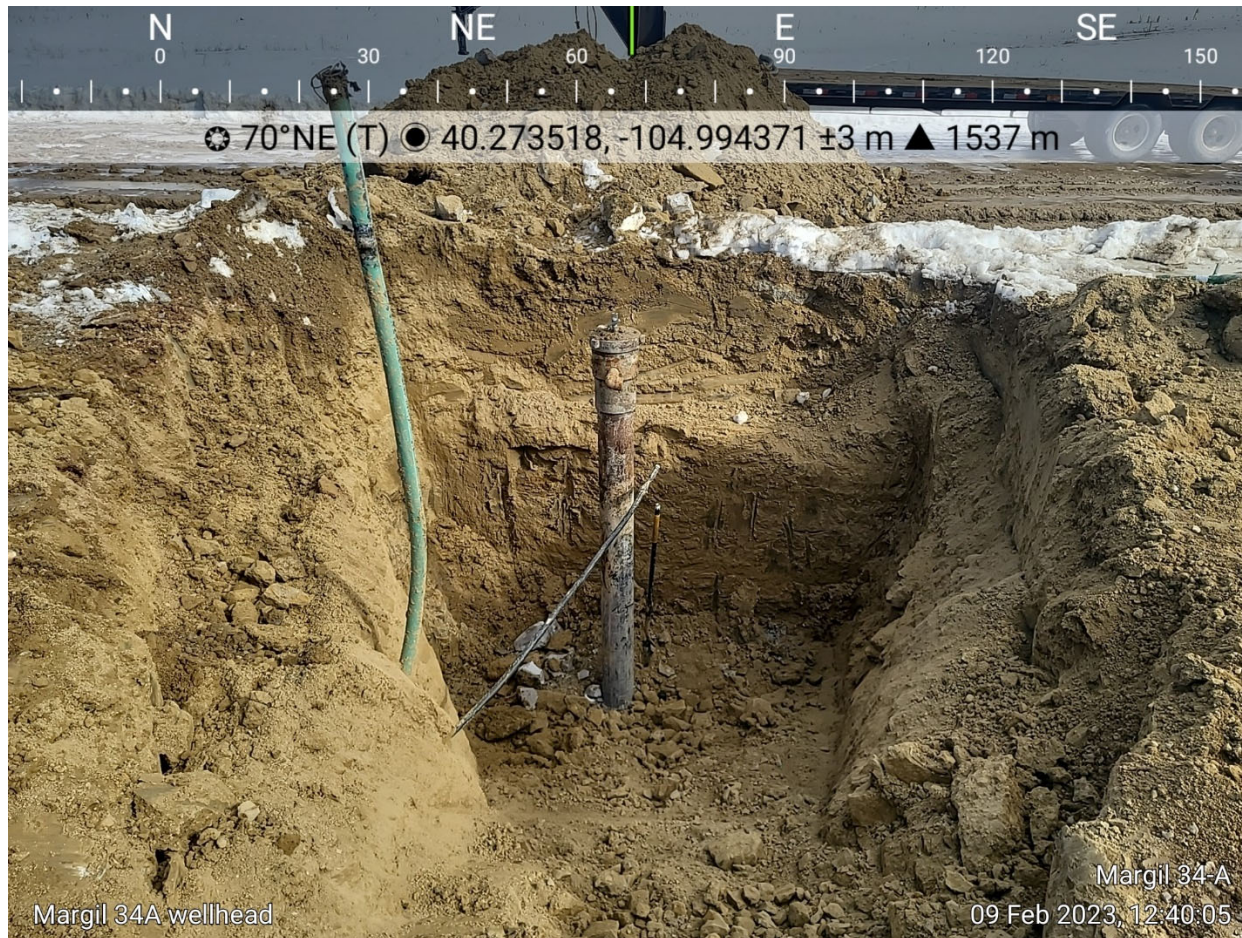
## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



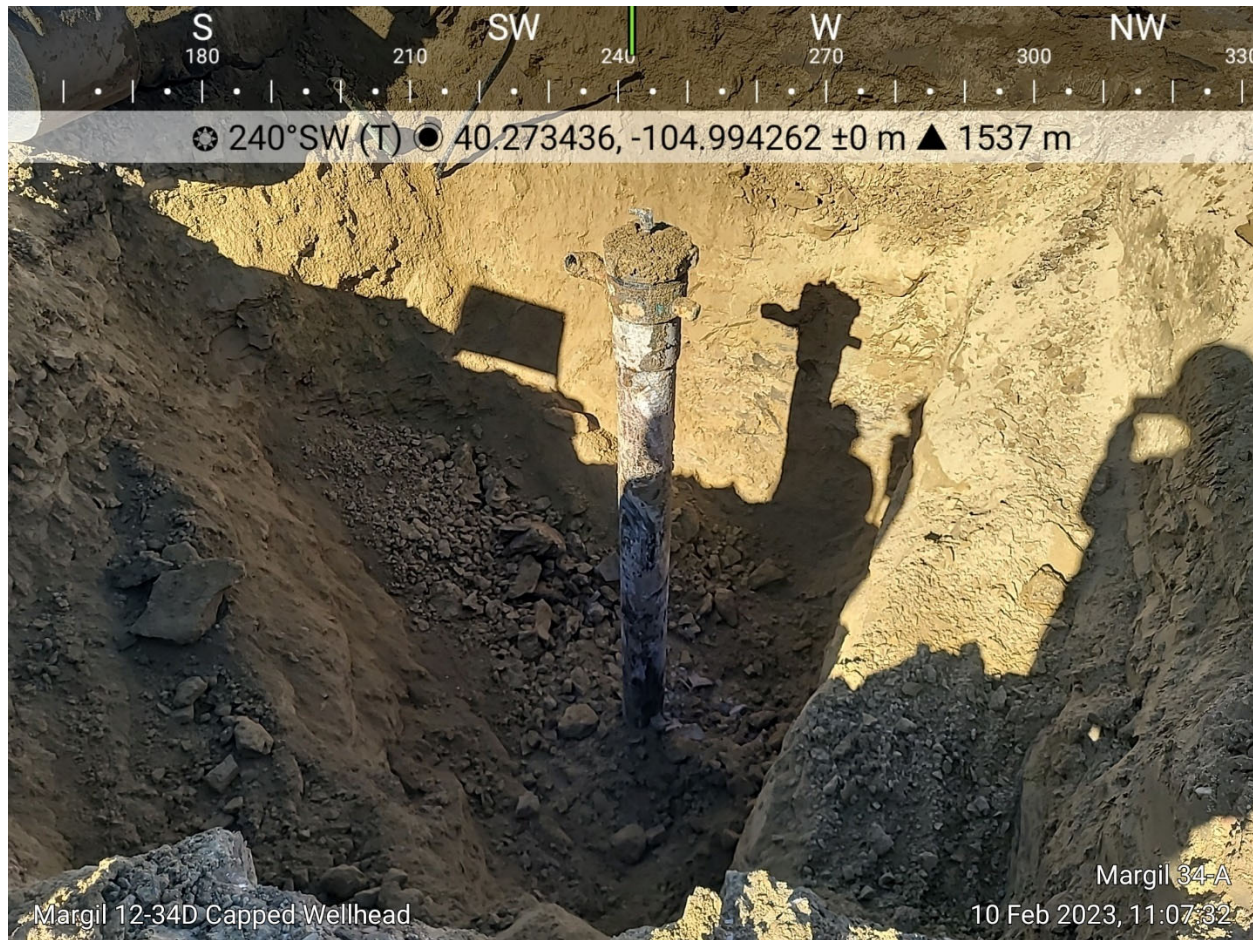
# Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



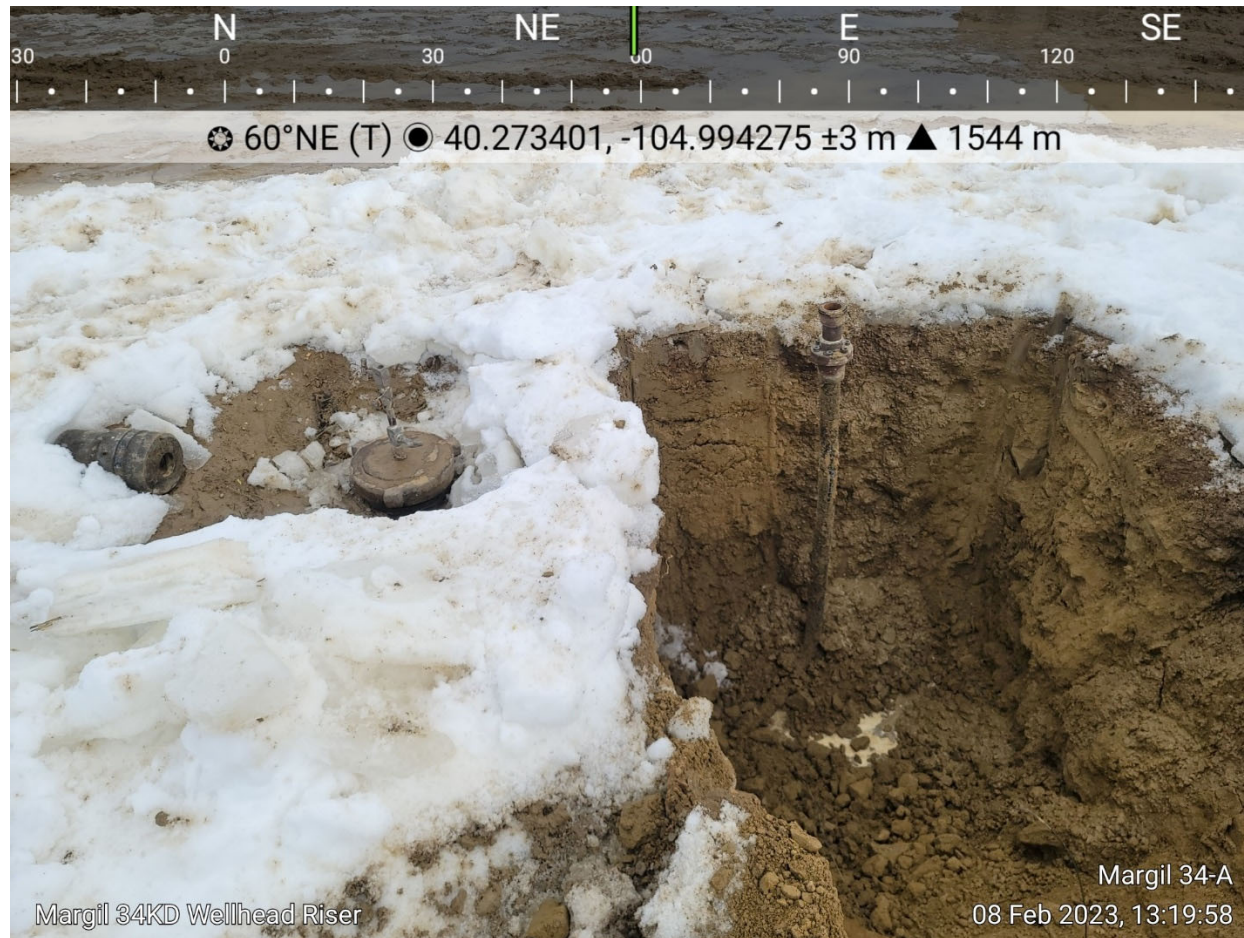
## Margil 34A Production Facility and Associated Wellheads Photographic Log



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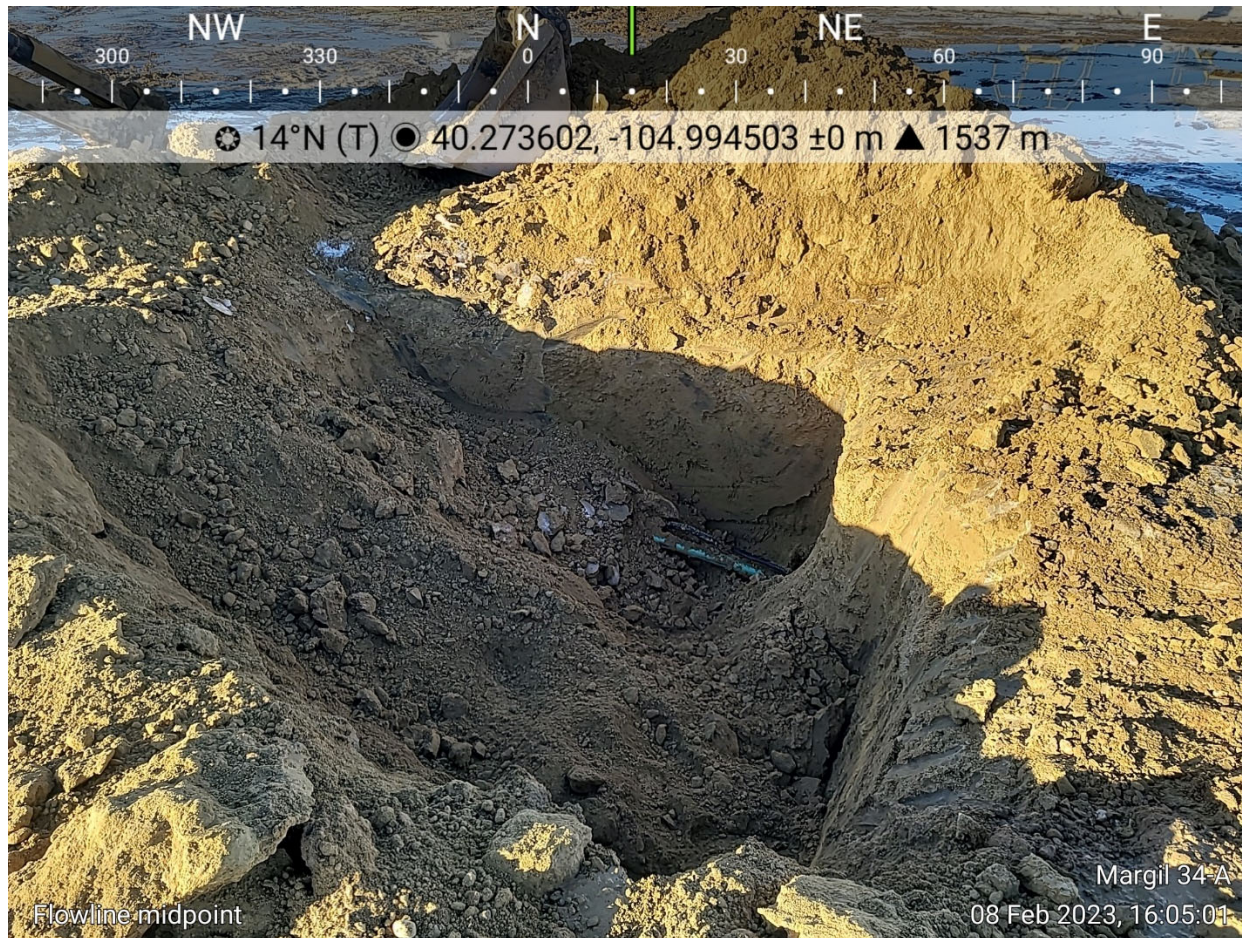
## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



FL01@4

## Margil 34A Production Facility and Associated Wellheads Photographic Log



# Margil 34A Production Facility and Associated Wellheads Photographic Log



# Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



## Margil 34A Production Facility and Associated Wellheads Photographic Log



**ATTACHMENT B**  
**FACILITY CLOSURE CHECKLISTS**

# Buried or Partially Buried Vessel Closure Checklist

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

Additional attachments (optional):		Pit Closure		Wellhead Closure		Flowline Closure		Tank Battery Closure
Site Name & COGCC Facility Number: Margil 34A, 424006		Date: 2/6/2023-2/10/2023, 2/13/2023						Remediation Project #: 25734
Associated Wells: Margil: 34A, 34 KD, 21-34D, 12-34D, 11-34D		Age of Site: 8/2/2011 - Spud						Number of Photos Attached: 54
Location: (GPS coordinates of vault or southeastern tank berm for multiple) 40.273226, -104.994433							Estimated Facility Size (acres): ~ 2	
General Condition of Site: (General observations regarding housekeeping, corrosion, waste management, etc.)								
Overall good.								
USCS Soil Type: SM, GM					Estimated Depth to Groundwater: Unknown			
Hydrocarbon Impacted Soils / Spills: (Note estimated size and if impact appears to be surficial or extends to an unknown depth)								
None observed.								
Salt Crusted Soils or Impacted Vegetation: (Note estimated size and if impact appears to be surficial or extends to an unknown depth)								
None observed.								
Buried or Partially Buried Vessels								
Tank Contents	Produced Water	Produced Water						
Size (barrels)	Unknown	Unknown						
Age	Unknown	Unknown						
Construction Material	Fiberglass	Fiberglass						
Visual Integrity of Tank	Good	Good						
Condition of tank	Good	Good						
PID Readings	0.3 ppm	0.5 ppm						
Condition of Flowline	Good	Good						
PID Readings	0.6 ppm	0.3 ppm						
Sample taken? Location/Sample ID#	PWV01@5, PWV01-2@5, WDL01@3	PWV02@5, WDL02@3						
Photo Number(s)	19-24, 55	25-29						
Other observations regarding partially buried vessels:								
None observed.								
Summary								
Was impacted soil identified?								
<input checked="" type="checkbox"/> No			Yes - less than 10 cubic yards			Yes - more than 10 cubic yards		
Total number of samples field screened: 10					Total number of samples collected: 4			
Highest PID Reading: 1.3 ppm					Total number of samples submitted to lab for analysis: 4			
If more than 10 cubic yards of impacted soil were observed: NA								
Vertical extent:					Estimated spill volume:			
Lateral extent:					Volume of soil removed:			
Is additional investigation required?								
Was groundwater encountered during the investigation?								
<input checked="" type="checkbox"/> No			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:								

# Tank Battery Closure Checklist

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

Additional attachments (optional):		Pit Closure		Wellhead Closure		Flowline Closure		Partially Buried Vault Closure
Site Name & COGCC Facility Number: Margil 34A, 424006		Date: 2/6/2023-2/10/2023, 2/13/2023						Remediation Project #: 25734
Associated Wells: Margil: 34A, 34 KD, 21-34D, 12-34D, 11-34D		Age of Site: 8/2/2011 - Spud						Number of Photos Attached: 54
Location: (GPS coordinates of southeaster berm) 40.273184,-104.994578							Estimated Facility Size (acres): ~2	
General Condition of Site: (General observations regarding housekeeping, corrosion, waste management, etc.)								
Overall good.								
USCS Soil Type: SW					Estimated Depth to Groundwater: Unknown			
Hydrocarbon Impacted Soils / Spills: (Note estimated size and if impact appears to be surficial or extends to an unknown depth)								
None observed.								
Salt Crusted Soils or Impacted Vegetation: (Note estimated size and if impact appears to be surficial or extends to an unknown depth)								
None observed.								
<b>Tanks</b>								
Tank Contents	Crude	Crude	Crude	Crude	Crude	Crude		
Size (barrels)	300	300	300	300	300	300		
Age	Unknown	Unknown	Unknown	Unknown	Unknown	Unknown		
Construction Material	Steel	Steel	Steel	Steel	Steel	Steel		
Tank type (AST/DRU, etc.)	AST	AST	AST	AST	AST	AST		
Visual Integrity of Tank	Good	Good	Good	Good	Good	Good		
Condition of tank footprint	Good	Good	Good	Good	Good	Good		
PID Readings	NA	NA	NA	NA	NA	NA		
Soil impacts present at valves or hatches?	None	None	None	None	None	None		
PID Readings	3.0 ppm	3.5 ppm	1.3 ppm	5.9 ppm	6.2 ppm	3.3 ppm		
Sample taken? Location/ Sample ID#	AST01@1	AST02@1	AST03@1	AST04@1.5	AST05@1	AST06@1.5		
Photo Number(s)	2, 3	4, 5	6, 7	8, 9	10, 11	12, 13		
Other observations regarding tanks:								
None observed.								
<b>Separators</b>								
Separator size	Unknown	Unknown	Unknown	Unknown	Unknown	Unknown		
Vertical or Horizontal	Horizontal	Horizontal	Horizontal	Horizontal	Horizontal	Horizontal		
Age	Unknown	Unknown	Unknown	Unknown	Unknown	Unknown		
Soil impacts observed? If yes	None	None	None	None	None	None		
PID Readings	1.8 ppm	1.5 ppm	8.3 ppm	0.4 ppm	8.3 ppm	1.4 ppm		
Sample taken? Location/ Sample ID#	SEP01-DL@5, SEP01-FL@5	SEP02-DL@4, SEP02-FL@5	SEP03-DL@4, SEP03-FL@5	SEP04-DL@8, SEP04-FL@5	SEP05-DL@4, SEP05-FL@5	SEP06-DL@4, SEP06-FL@5		
Photo Number(s)	31, 32	33, 34	35, 36	37, 38	39	40		
Other observations regarding separators								
None observed.								
<b>Third Party Equipment</b>								
Type	Meter House							
Age	Unknown							

Third Party Operator	Unknown																
Removal Date	Unknown																
Sample taken? Location/ Sample	MH01@0.5																
PID Readings	0.0 ppm																
Photo Number(s)	17, 18																
<b>Other Facility Equipment</b>																	
Equipment type	ECD	ECD															
Equipment Condition	Good	Good															
Age	Unknown	Unknown															
Soil impacts observed during	None	None															
PID Readings	0.0 ppm	0.0 ppm															
Sample taken? Location/ Sample	ECD01@0.5	ECD02@0.5															
Photo Number(s)	14, 15	14, 16															
Other observations regarding other facility or third party equipment:																	
None observed.																	
<b>Summary</b>																	
Was impacted soil identified?																	
<input checked="" type="checkbox"/> No		Yes - less than 10 cubic yards			Yes - more than 10 cubic yards												
Total number of samples field screened: 21					Total number of samples collected: 18												
Highest PID Reading: 8.3 ppm					Total number of samples submitted to lab for analysis: 18												
If more than 10 cubic yards of impacted soil were observed: NA																	
Vertical extent:					Estimated spill volume:												
Lateral extent:					Volume of soil removed:												
Is additional investigation required?																	
Was groundwater encountered during the investigation?																	
<input checked="" type="checkbox"/> No		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:																	

# Flowline Closure Checklist

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

Additional Attachments:		Tank Battery Closure		Wellhead Closure		Pit Closure		Partially Buried Vault Closure
Site Name & COGCC Facility Number: Margil 34A, 424006		Date: 2/6/2023-2/10/2023, 2/13/2023						Remediation Project #: 25734
Associated Wells: Margil: 34A, 34 KD, 21-34D, 12-34D,11-34D		Age of Site: 8/2/2011 - Spud						Number of Photos Attached: 54
Starting point: (GPS coordinates and descriptions) Wellhead Risers: 40.273590, -104.994372; 40.273537, -104.994341; 40.273492, -104.994309; 40.273443, -104.994280; 40.273343, -104.994218								
End point: (GPS coordinates and descriptions) Separator Risers: 40.273570, -104.994676; 40.273600, -104.994691; 40.273632, -104.994708; 40.273661, -104.994732; 40.273692, -104.994748								
USCS Soil Type: SC, SM					Estimated Depth to Groundwater: Unknown			
Hydrocarbon Impacted Soils / Spills: (Note estimated size and if impact appears to be surficial or extends to an unknown depth) None observed								
Salt Crusted Soils or Impacted Vegetation: (Note estimated size and if impact appears to be surficial or extends to an unknown depth) None observed								
Flowlines								
Flowline type	2"							
Depth	~4-5 ft-bgd							
Age	Unknown							
Length	~500 ft							
Construction Material	Steel							
Were flowlines pulled?	Yes							
Visual Integrity of lines	Good overall							
Visual impacts if trenched	None							
PID Readings if trenched	3.1 ppm							
Sample taken? Location/Sample ID#	FL01@4, FL02@4, FL03@4, FL04@5							
Photo Number(s)	51-54							
Other observations regarding on loction flowlines: None.								
Summary								
Was impacted soil identified? <input checked="" type="checkbox"/> No      Yes - less than 10 cubic yards      Yes - more than 10 cubic yards								
Total number of samples field screened: 4					Total number of samples collected: 0			
Highest PID Reading: 3.1 ppm					Total number of samples submitted to lab for analysis: 0			
If more than 10 cubic yards of impacted soil were observed: NA								
Vertical extent:					Estimated spill volume:			
Lateral extent:					Volume of soil removed:			
Is additional investigation required?								
Was groundwater encountered during the investigation? <input checked="" type="checkbox"/> No      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:								

Wellhead Closure Checklist						
COGCC Rule 911.a.(4) Environmental Site Closure Assessment Field Form						
Additional attachments (optional):		Pit Closure		Tank Battery Closure		Flowline Closure
Site Name & COGCC Facility Number: Margil 34A, 424006		Date: 2/6/2023-2/10/2023, 2/13/2023				Remediation Project #: 25734
Associated Wells: Margil: 34A, 34 KD, 21-34D, 12-34D, 11-34D		Age of Site: 8/2/2011 - Spud				Number of Photos Attached: 54
Location: (GPS coordinates of wellhead or southeastern most wellhead for multiple) 40.27335356, -104.9942238					Estimated Facility Size (acres): ~2	
General Condition of Site: (General observations regarding housekeeping, corrosion, waste management, etc.)						
Overall good.						
USCS Soil Type: SC, SM, GC, SP				Estimated Depth to Groundwater: Unknown		
Hydrocarbon Impacted Soils / Spills: (Note estimated size and if impact appears to be surficial or extends to an unknown depth)						
None observed.						
Salt Crusted Soils or Impacted Vegetation: (Note estimated size and if impact appears to be surficial or extends to an unknown depth)						
None observed.						
Wellhead(s)						
Well API	05-123-33838	05-123-33835	05-123-33831	05-123-33834	05-123-33841	
Age	8/31/2011 - Spud	8/5/2011 - Spud	8/20/2011 - Spud	8/2/2011 - Spud	8/14/2011 - Spud	
Condition of surface around wellhead	Good	Good	Good	Good	Good	
PID Readings	5.3 ppm	3.7 ppm	9.7 ppm	3.4 ppm	4.3 ppm	
Condition of subsurface (staining present)	Good	Good	Good	Good	Good	
PID Readings	0.3 ppm	0.0 ppm	0.3 ppm	2.3 ppm	1.1 ppm	
Sample taken? Location/Sample ID#	WH01-S@4, WH01@8	WH02-S@4, WH02@10	WH03-S@4, WH03@8	WH04-S@4, WH04@8	WH05-S@4, WH05@8	
Photo Number(s)	47, 48	43, 44	41, 42	49, 50	45, 46	
Other observations regarding wellheads:						
None observed.						
Summary						
Was impacted soil identified? <input checked="" type="checkbox"/> No Yes - less than 10 cubic yards Yes - more than 10 cubic yards						
Total number of samples field screened: 30				Total number of samples collected: 10		
Highest PID Reading: 9.7 ppm				Total number of samples submitted to lab for analysis: 10		
If more than 10 cubic yards of impacted soil were observed: NA						
Vertical extent:				Estimated spill volume:		
Lateral extent:				Volume of soil removed:		
Is additional investigation required?						
Was groundwater encountered during the investigation? <input checked="" type="checkbox"/> No 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:						

**ATTACHMENT C**  
**LABORATORY ANALYTICAL REPORTS**

# Summit Scientific

---

4653 Table Mountain Drive, Golden, Colorado 80403

303.277.9310

February 09, 2023

Ben Baugh  
Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction., CO 81501  
RE: PDC - Margil 34A  
Work Order #2302102

Enclosed are the results of analyses for samples received by Summit Scientific on 02/06/23 16:30. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in black ink, appearing to read "Scott Sheely".

Scott Sheely For Paul Shrewsbury  
President



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

#### ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
AST01@1	2302102-01	Soil	02/06/23 10:15	02/06/23 16:30
AST02@1	2302102-02	Soil	02/06/23 10:18	02/06/23 16:30
AST03@1	2302102-03	Soil	02/06/23 10:20	02/06/23 16:30
AST04@1.5	2302102-04	Soil	02/06/23 12:30	02/06/23 16:30
AST05@1	2302102-05	Soil	02/06/23 10:24	02/06/23 16:30
AST06@1.5	2302102-06	Soil	02/06/23 12:20	02/06/23 16:30

Summit Scientific

*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.*

# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 1 of 1
2302102	

Client: Entrada Consulting Group		Send Data To:		Send Invoice To:	
Address: 240 Mesa Avenue		Project Manager: Ben Baugh		Company: PDC	
City/State/Zip: Grand Junction, CO 81501		E-Mail: BBaugh@entradainc.com, rfinley@entradainc.com + PDC list		Project Name/Location:	
Phone: 804-513-0707		Project Name: Margil 34A		AFE#:	
Sampler Name: Ryan Finley		Project Number:		PO/Billing Codes:	
				Contact:	

					Preservative				Matrix				Analysis Requested						Special Instructions			
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other	Water	Soil	Air-Canister #	Other	BTEX + N	TPH (C6-C36)	1,2,4 + 1,3,5 TMB							
1	AST01@1	2/6/23	1015	2			X			X			X	X	X							
2	AST02@1	↓	1018	↓			↓			↓			↓	↓	↓							
3	AST03@1		1020																			
4	AST04@1.5		1230																			
5	AST05@1		1024				↓			↓			↓	↓	↓							
6	AST06@1.5	↓	1220	↓						↓			↓	↓	↓							
7																						
8																						
9																						
10																						
11																						
12																						
13																						
14																						
15																						

Relinquished by:	Date/Time: 2/6/23	Received by: SL	Date/Time: 2/6/23	TAT Business Days	Field DO	Notes:
				Same Day	Field EC	
Relinquished by: SL	Date/Time: 2/6/23 1630	Received by:	Date/Time: 2/6/23 1630	1 Day	Field ORP	
				2 Days	Field pH	
Relinquished by:	Date/Time:	Received by:	Date/Time:	3 Days	Field Temp.	
				Standard	X Field Turb.	
Temperature Upon Receipt: 8.3	Corrected Temperature: 0	IR gun #: 1	HNO3 lot #:			

S<sub>2</sub>

## Sample Receipt Checklist

S2 Work Order# 2302102Client: Entrada Client Project ID: Margil 34AShipped Via: H.D./P.U./FedEx/UPS/USPS/Other ☐ Airbill #: ☐

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------	--------------------------

Matrix (Check all that apply) Air ☐ Soil/Solid ☒ Water ☐ Other ☐Temp (°C) 8.3 Thermometer # 1

	Yes	No	N/A	Comments (if any)
If samples require cooling, is the temperature < 6°C? <sup>(1)</sup> <b>NOTE:</b> If samples are delivered the same day of sampling, this requirement is met if there is evidence that cooling has begun.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<u>on ICE</u>
If custody seals are present, are they intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are samples due within 48 hours present?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are water samples with short hold times present? Note the short hold analysis in the comments column - pH, Nitrate/Nitrite, Ferrous Iron (Fe <sup>2+</sup> ), Hexavalent Chromium (Cr <sup>6+</sup> , Cr VI), COD/BOD, Total Coliform, E. Coli, Total Residual Chlorine (TRC), Dissolved Oxygen	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Is a chain-of-custody (COC) form present and filled out Completely? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client w/ date and time recorded? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace present? <b>If yes, contact client and note in narrative.</b>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Are samples preserved that require preservation (excluding cooling)? <sup>(1)</sup> Note the type of preservative in the comments column – HCl, H <sub>2</sub> SO <sub>4</sub> , NaOH, HNO <sub>3</sub> , etc.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If samples are acid preserved for metals, is the pH ≤ 2? <sup>(1)</sup> Record the pH in Comments.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If dissolved metals are requested, were samples field filtered?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Additional Comments (if any):				
<sup>(1)</sup> If NO, then contact the client before proceeding with analysis and note in case narrative.				

AS  
Custodian Printed Name2/6/23  
Date/Time



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**AST01@1**  
**2302102-01 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/06/23 10:15**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Benzene	ND	0.0020	mg/kg	1	BGB0154	02/07/23	02/08/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:15**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Surrogate: 1,2-Dichloroethane-d4	0.0419	105 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0450	112 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0467	117 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/06/23 10:15**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0156	02/07/23	02/08/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:15**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Surrogate: o-Terphenyl	9.23	73.9 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**AST02@1**  
**2302102-02 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/06/23 10:18**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0154	02/07/23	02/08/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:18**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0319	79.8 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0341	85.3 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0397	99.3 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/06/23 10:18**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0156	02/07/23	02/08/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:18**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	8.81	70.5 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**AST03@1**  
**2302102-03 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/06/23 10:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0154	02/07/23	02/08/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0352	88.0 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0357	89.3 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0430	107 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/06/23 10:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0156	02/07/23	02/08/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	9.35	74.8 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**AST04@1.5**  
**2302102-04 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/06/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0154	02/07/23	02/08/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/06/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0352	87.9 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0366	91.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0412	103 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/06/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0156	02/07/23	02/08/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/06/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	9.34	74.7 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**AST05@1**  
**2302102-05 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/06/23 10:24**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0154	02/07/23	02/08/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:24**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0466	117 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0452	113 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0494	123 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/06/23 10:24**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0156	02/07/23	02/08/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/06/23 10:24**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	8.94	71.6 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**AST06@1.5**  
**2302102-06 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/06/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0154	02/07/23	02/08/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/06/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0321	80.3 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0356	89.0 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0392	97.9 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/06/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0156	02/07/23	02/08/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/06/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	9.20	73.6 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0154 - EPA 5030 Soil MS

##### Blank (BGB0154-BLK1)

Prepared & Analyzed: 02/07/23

Benzene	ND	0.0020	mg/kg							
Toluene	ND	0.0050	"							
Ethylbenzene	ND	0.0050	"							
Xylenes (total)	ND	0.010	"							
1,2,4-Trimethylbenzene	ND	0.0050	"							
1,3,5-Trimethylbenzene	ND	0.0050	"							
Naphthalene	ND	0.0038	"							
Gasoline Range Hydrocarbons	ND	0.50	"							
Surrogate: 1,2-Dichloroethane-d4	0.0404		"	0.0400		101	50-150			
Surrogate: Toluene-d8	0.0431		"	0.0400		108	50-150			
Surrogate: 4-Bromofluorobenzene	0.0465		"	0.0400		116	50-150			

##### LCS (BGB0154-BS1)

Prepared & Analyzed: 02/07/23

Benzene	0.0852	0.0020	mg/kg	0.100		85.2	70-130			
Toluene	0.0943	0.0050	"	0.100		94.3	70-130			
Ethylbenzene	0.100	0.0050	"	0.100		100	70-130			
m,p-Xylene	0.210	0.010	"	0.200		105	70-130			
o-Xylene	0.0989	0.0050	"	0.100		98.9	70-130			
1,2,4-Trimethylbenzene	0.0987	0.0050	"	0.100		98.7	70-130			
1,3,5-Trimethylbenzene	0.102	0.0050	"	0.100		102	70-130			
Naphthalene	0.0883	0.0038	"	0.100		88.3	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0297		"	0.0400		74.2	50-150			
Surrogate: Toluene-d8	0.0388		"	0.0400		97.0	50-150			
Surrogate: 4-Bromofluorobenzene	0.0393		"	0.0400		98.2	50-150			

##### Matrix Spike (BGB0154-MS1)

Source: 2302057-01

Prepared & Analyzed: 02/07/23

Benzene	0.0822	0.0020	mg/kg	0.100	ND	82.2	70-130			
Toluene	0.0745	0.0050	"	0.100	ND	74.5	70-130			
Ethylbenzene	0.0975	0.0050	"	0.100	ND	97.5	70-130			
m,p-Xylene	0.196	0.010	"	0.200	ND	97.8	70-130			
o-Xylene	0.0918	0.0050	"	0.100	ND	91.8	70-130			
1,2,4-Trimethylbenzene	0.0838	0.0050	"	0.100	ND	83.8	70-130			
1,3,5-Trimethylbenzene	0.0873	0.0050	"	0.100	ND	87.3	70-130			
Naphthalene	0.0928	0.0038	"	0.100	ND	92.8	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0252		"	0.0400		62.9	50-150			
Surrogate: Toluene-d8	0.0315		"	0.0400		78.7	50-150			
Surrogate: 4-Bromofluorobenzene	0.0362		"	0.0400		90.4	50-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**Volatile Organic Compounds by EPA Method 8260B - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0154 - EPA 5030 Soil MS**

Matrix Spike Dup (BGB0154-MSD1)	Source: 2302057-01			Prepared & Analyzed: 02/07/23						
Benzene	0.0824	0.0020	mg/kg	0.100	ND	82.4	70-130	0.219	30	
Toluene	0.0752	0.0050	"	0.100	ND	75.2	70-130	0.962	30	
Ethylbenzene	0.100	0.0050	"	0.100	ND	100	70-130	2.91	30	
m,p-Xylene	0.201	0.010	"	0.200	ND	100	70-130	2.68	30	
o-Xylene	0.0949	0.0050	"	0.100	ND	94.9	70-130	3.28	30	
1,2,4-Trimethylbenzene	0.0872	0.0050	"	0.100	ND	87.2	70-130	3.97	30	
1,3,5-Trimethylbenzene	0.0906	0.0050	"	0.100	ND	90.6	70-130	3.78	30	
Naphthalene	0.0935	0.0038	"	0.100	ND	93.5	70-130	0.773	30	
Surrogate: 1,2-Dichloroethane-d4	0.0243		"	0.0400		60.8	50-150			
Surrogate: Toluene-d8	0.0330		"	0.0400		82.4	50-150			
Surrogate: 4-Bromofluorobenzene	0.0373		"	0.0400		93.2	50-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

**Extractable Petroleum Hydrocarbons by 8015 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0156 - EPA 3550A**

**Blank (BGB0156-BLK1)**

Prepared & Analyzed: 02/07/23

C10-C28 (DRO)	ND	50	mg/kg							
C28-C36 (ORO)	ND	50	"							
Surrogate: o-Terphenyl	8.88		"	12.5		71.1	30-150			

**LCS (BGB0156-BS1)**

Prepared & Analyzed: 02/07/23

C10-C28 (DRO)	398	50	mg/kg	500		79.7	70-130			
Surrogate: o-Terphenyl	10.6		"	12.5		84.6	30-150			

**Matrix Spike (BGB0156-MS1)**

Source: 2302057-01

Prepared & Analyzed: 02/07/23

C10-C28 (DRO)	387	50	mg/kg	500	10.8	75.3	70-130			
Surrogate: o-Terphenyl	9.06		"	12.5		72.5	30-150			

**Matrix Spike Dup (BGB0156-MSD1)**

Source: 2302057-01

Prepared & Analyzed: 02/07/23

C10-C28 (DRO)	460	50	mg/kg	500	10.8	89.8	70-130	17.1	20	
Surrogate: o-Terphenyl	9.01		"	12.5		72.1	30-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/09/23 14:34

### Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

# Summit Scientific

---

4653 Table Mountain Drive, Golden, Colorado 80403

303.277.9310

February 14, 2023

Ben Baugh  
Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction., CO 81501  
RE: PDC - Margil 34A  
Work Order #2302129

Enclosed are the results of analyses for samples received by Summit Scientific on 02/07/23 16:30. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in black ink, appearing to read "Scott Sheely".

Scott Sheely For Paul Shrewsbury  
President



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

#### ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
PWV01@5	2302129-01	Soil	02/07/23 12:20	02/07/23 16:30
WDL01@3	2302129-02	Soil	02/07/23 12:25	02/07/23 16:30
PWV02@5	2302129-03	Soil	02/07/23 14:12	02/07/23 16:30
WDL02@3	2302129-04	Soil	02/07/23 14:15	02/07/23 16:30

Summit Scientific

*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.*

# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 1 of 1
2320129	

Client: Entrada Consulting Group		Send Data To:		Send Invoice To:	
Address: 240 Mesa Avenue		Project Manager: Ben Baugh		Company:	
City/State/Zip: Grand Junction, CO 81501		E-Mail: BBaugh@entradainc.com		Project Name/Location:	
Phone: 804-513-0707		rfinley@entradainc + PDC 1st		AFE#:	
Sampler Name: Ryan Finley		Project Name: Margil 34A		PO/Billing Codes:	
		Project Number:		Contact:	

					Preservative				Matrix				Analysis Requested								Special Instructions
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other _____	Water	Soil	Air-Canister #	Other _____	BTEX+N	TPH	1,2,4 + 1,3,5 TMB	PH	EC	SAR	Boron		
1	PWV0105	1220	2/7/23	2			X			X			X	X	X	X	X	X	X	X	
2	WDL0103	1225	2/7/23	1			—			—			—	—	—	—	—	—	—	—	
3	PWV0205	1412	↓	↓			—			↓			↓	↓	↓	↓	↓	↓	↓	↓	
4	WDL0203	1415	↓	↓			—			↓			↓	↓	↓	↓	↓	↓	↓	↓	
5																					
6																					
7																					
8																					
9																					
10																					
11																					
12																					
13																					
14																					
15																					

Relinquished by:	Date/Time: 2/7/23 1620	Received by: SZ	Date/Time: 2723 1620	TAT Business Days	Field DO	Notes:
Relinquished by: SZ	Date/Time: 2723 1630	Received by:	Date/Time: 2723 1630	Same Day	Field EC	
				1 Day	Field ORP	
				2 Days	Field pH	
				3 Days	Field Temp.	
Relinquished by:	Date/Time:	Received by:	Date/Time:	Standard	X Field Turb.	
Temperature Upon Receipt: 9.7	Corrected Temperature:	IR gun #: 1	HNO3 lot #:			

S<sub>2</sub>

## Sample Receipt Checklist

S2 Work Order# 2302/29Client: Entrada Client Project ID: Margil 34AShipped Via: H.D./P.U./FedEx/UPS/USPS/Other ☐ Airbill #: ☐

<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------	--------------------------	--------------------------	--------------------------

Matrix (Check all that apply) Air ☐ Soil/Solid ☒ Water ☐ Other ☐Temp (°C) 9.7 Thermometer # 1

	Yes	No	N/A	Comments (if any)
If samples require cooling, is the temperature < 6°C? <sup>(1)</sup> NOTE: If samples are delivered the same day of sampling, this requirement is met if there is evidence that cooling has begun.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	on ice
If custody seals are present, are they intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are samples due within 48 hours present?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are water samples with short hold times present? Note the short hold analysis in the comments column - pH, Nitrate/Nitrite, Ferrous Iron (Fe <sup>2+</sup> ), Hexavalent Chromium (Cr <sup>6+</sup> , Cr VI), COD/BOD, Total Coliform, E. Coli, Total Residual Chlorine (TRC), Dissolved Oxygen	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Is a chain-of-custody (COC) form present and filled out Completely? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client w/ date and time recorded? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace 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 (excluding cooling)? <sup>(1)</sup> Note the type of preservative in the comments column – HCl, H <sub>2</sub> SO <sub>4</sub> , NaOH, HNO <sub>3</sub> , etc.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If samples are acid preserved for metals, is the pH ≤ 2? <sup>(1)</sup> Record the pH in Comments.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If dissolved metals are requested, were samples field filtered?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	

Additional Comments (if any):

<sup>(1)</sup> If NO, then contact the client before proceeding with analysis and note in case narrative.AS  
Custodian Printed Name2/7/23  
Date/Time



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**PWV01@5**  
**2302129-01 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0195	02/08/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0321	80.2 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0441	110 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0514	129 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	66	50	mg/kg	1	BGB0197	02/08/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.3	115 %	30-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**PWV01@5**  
**2302129-01 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.127	0.0100	mg/L	1	BGB0262	02/09/23	02/11/23	EPA 6020B	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	62.6	0.0574	mg/L dry	1	BGB0225	02/08/23	02/10/23	EPA 6020B	
Magnesium	10.5	0.0574	"	"	"	"	"	"	
Sodium	3.99	0.0574	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	0.123	0.00100	units	1	BGB0377	02/13/23	02/13/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	87.1		%	1	BGB0366	02/13/23	02/13/23	Calculation	

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	0.342	0.0100	mmhos/cm	1	BGB0274	02/09/23	02/09/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**PWV01@5**  
**2302129-01 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **02/07/23 12:20**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>7.71</b>			pH Units	1	BGB0275	02/09/23	02/09/23	EPA 9045D	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**WDL01@3**  
**2302129-02 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/07/23 12:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0195	02/08/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/07/23 12:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0307	76.8 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0448	112 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0475	119 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/07/23 12:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0197	02/08/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/07/23 12:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.0	112 %	30-150		"	"	"	"	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**PWV02@5**  
**2302129-03 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0195	02/08/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0322	80.5 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0461	115 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0469	117 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0197	02/08/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	13.4	107 %	30-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**PWV02@5**  
**2302129-03 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.0866	0.0100	mg/L	1	BGB0262	02/09/23	02/11/23	EPA 6020B	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	37.6	0.0572	mg/L dry	1	BGB0225	02/08/23	02/10/23	EPA 6020B	
Magnesium	13.4	0.0572	"	"	"	"	"	"	
Sodium	8.05	0.0572	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	0.287	0.00100	units	1	BGB0377	02/13/23	02/13/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	87.4		%	1	BGB0366	02/13/23	02/13/23	Calculation	

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	0.299	0.0100	mmhos/cm	1	BGB0274	02/09/23	02/09/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**PWV02@5**  
**2302129-03 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **02/07/23 14:12**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>7.85</b>			pH Units	1	BGB0275	02/09/23	02/09/23	EPA 9045D	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**WDL02@3**  
**2302129-04 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/07/23 14:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0195	02/08/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/07/23 14:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0324	80.9 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0442	111 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0469	117 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/07/23 14:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0197	02/08/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/07/23 14:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	12.2	97.6 %	30-150		"	"	"	"	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0195 - EPA 5030 Soil MS

##### Blank (BGB0195-BLK1)

Prepared: 02/08/23 Analyzed: 02/09/23

Benzene	ND	0.0020	mg/kg							
Toluene	ND	0.0050	"							
Ethylbenzene	ND	0.0050	"							
Xylenes (total)	ND	0.010	"							
1,2,4-Trimethylbenzene	ND	0.0050	"							
1,3,5-Trimethylbenzene	ND	0.0050	"							
Naphthalene	ND	0.0038	"							
Gasoline Range Hydrocarbons	ND	0.50	"							
Surrogate: 1,2-Dichloroethane-d4	0.0330		"	0.0400		82.4	50-150			
Surrogate: Toluene-d8	0.0414		"	0.0400		103	50-150			
Surrogate: 4-Bromofluorobenzene	0.0463		"	0.0400		116	50-150			

##### LCS (BGB0195-BS1)

Prepared: 02/08/23 Analyzed: 02/09/23

Benzene	0.109	0.0020	mg/kg	0.125		87.1	70-130			
Toluene	0.136	0.0050	"	0.125		109	70-130			
Ethylbenzene	0.141	0.0050	"	0.125		113	70-130			
m,p-Xylene	0.278	0.010	"	0.250		111	70-130			
o-Xylene	0.134	0.0050	"	0.125		107	70-130			
1,2,4-Trimethylbenzene	0.148	0.0050	"	0.125		118	70-130			
1,3,5-Trimethylbenzene	0.151	0.0050	"	0.125		121	70-130			
Naphthalene	0.0919	0.0038	"	0.125		73.5	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0346		"	0.0400		86.6	50-150			
Surrogate: Toluene-d8	0.0426		"	0.0400		107	50-150			
Surrogate: 4-Bromofluorobenzene	0.0425		"	0.0400		106	50-150			

##### Matrix Spike (BGB0195-MS1)

Source: 2302120-21

Prepared: 02/08/23 Analyzed: 02/09/23

Benzene	0.109	0.0020	mg/kg	0.125	ND	86.9	70-130			
Toluene	0.139	0.0050	"	0.125	ND	111	70-130			
Ethylbenzene	0.141	0.0050	"	0.125	ND	113	70-130			
m,p-Xylene	0.281	0.010	"	0.250	ND	112	70-130			
o-Xylene	0.134	0.0050	"	0.125	ND	107	70-130			
1,2,4-Trimethylbenzene	0.150	0.0050	"	0.125	ND	120	70-130			
1,3,5-Trimethylbenzene	0.153	0.0050	"	0.125	ND	122	70-130			
Naphthalene	0.104	0.0038	"	0.125	ND	82.9	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0356		"	0.0400		89.1	50-150			
Surrogate: Toluene-d8	0.0424		"	0.0400		106	50-150			
Surrogate: 4-Bromofluorobenzene	0.0426		"	0.0400		106	50-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0195 - EPA 5030 Soil MS

Matrix Spike Dup (BGB0195-MSD1)	Source: 2302120-21			Prepared: 02/08/23 Analyzed: 02/09/23						
Benzene	0.110	0.0020	mg/kg	0.125	ND	87.9	70-130	1.13	30	
Toluene	0.142	0.0050	"	0.125	ND	113	70-130	2.14	30	
Ethylbenzene	0.142	0.0050	"	0.125	ND	113	70-130	0.786	30	
m,p-Xylene	0.284	0.010	"	0.250	ND	113	70-130	1.12	30	
o-Xylene	0.137	0.0050	"	0.125	ND	109	70-130	2.35	30	
1,2,4-Trimethylbenzene	0.153	0.0050	"	0.125	ND	122	70-130	2.03	30	
1,3,5-Trimethylbenzene	0.156	0.0050	"	0.125	ND	125	70-130	2.00	30	
Naphthalene	0.113	0.0038	"	0.125	ND	90.7	70-130	9.04	30	
Surrogate: 1,2-Dichloroethane-d4	0.0369		"	0.0400		92.3	50-150			
Surrogate: Toluene-d8	0.0419		"	0.0400		105	50-150			
Surrogate: 4-Bromofluorobenzene	0.0427		"	0.0400		107	50-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**Extractable Petroleum Hydrocarbons by 8015 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0197 - EPA 3550A**

**Blank (BGB0197-BLK1)**

Prepared & Analyzed: 02/08/23

C10-C28 (DRO)	ND	50	mg/kg							
C28-C36 (ORO)	ND	50	"							
Surrogate: o-Terphenyl	14.5		"	12.5		116	30-150			

**LCS (BGB0197-BS1)**

Prepared & Analyzed: 02/08/23

C10-C28 (DRO)	423	50	mg/kg	500		84.6	70-130			
Surrogate: o-Terphenyl	11.9		"	12.5		95.1	30-150			

**Matrix Spike (BGB0197-MS1)**

Source: 2302120-21

Prepared & Analyzed: 02/08/23

C10-C28 (DRO)	435	50	mg/kg	500	13.3	84.4	70-130			
Surrogate: o-Terphenyl	11.9		"	12.5		95.0	30-150			

**Matrix Spike Dup (BGB0197-MSD1)**

Source: 2302120-21

Prepared & Analyzed: 02/08/23

C10-C28 (DRO)	401	50	mg/kg	500	13.3	77.6	70-130	8.09	20	
Surrogate: o-Terphenyl	11.9		"	12.5		95.5	30-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**Total Metals by EPA 6020B Hot Water Soluble Extraction - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0262 - EPA 3050B**

**Blank (BGB0262-BLK1)**

Prepared: 02/09/23 Analyzed: 02/10/23

Boron ND 0.0100 mg/L

**LCS (BGB0262-BS1)**

Prepared: 02/09/23 Analyzed: 02/10/23

Boron 5.03 0.0100 mg/L 5.00 101 80-120

**Duplicate (BGB0262-DUP1)**

**Source: 2302057-01**

Prepared: 02/09/23 Analyzed: 02/10/23

Boron 0.421 0.0100 mg/L 0.407 3.50 20

**Matrix Spike (BGB0262-MS1)**

**Source: 2302057-01**

Prepared: 02/09/23 Analyzed: 02/10/23

Boron 5.14 0.0100 mg/L 5.00 0.407 94.7 75-125

**Matrix Spike Dup (BGB0262-MSD1)**

**Source: 2302057-01**

Prepared: 02/09/23 Analyzed: 02/10/23

Boron 5.14 0.0100 mg/L 5.00 0.407 94.7 75-125 0.0204 25

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction - Quality Control**

**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0225 - General Preparation**

**Blank (BGB0225-BLK1)**

Prepared: 02/08/23 Analyzed: 02/10/23

Calcium	ND	0.0500	mg/L wet
Magnesium	ND	0.0500	"
Sodium	ND	0.0500	"

**LCS (BGB0225-BS1)**

Prepared: 02/08/23 Analyzed: 02/10/23

Calcium	4.59	0.0500	mg/L wet	5.00	91.8	70-130
Magnesium	5.25	0.0500	"	5.00	105	70-130
Sodium	5.05	0.0500	"	5.00	101	70-130

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

### Physical Parameters by APHA/ASTM/EPA Methods - Quality Control

#### Summit Scientific

Analyte	Result	Reporting		Spike Level	Source		%REC		RPD	
		Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0366 - General Preparation

Duplicate (BGB0366-DUP1)		Source: 2302121-01			Prepared & Analyzed: 02/13/23					
% Solids	98.4		%		86.9		12.4		20	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction - Quality Control**  
**Summit Scientific**

Analyte	Result	Reporting		Spike Level	Source		%REC		RPD	
		Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0274 - General Preparation**

**Blank (BGB0274-BLK1)**

Prepared & Analyzed: 02/09/23

Specific Conductance (EC) ND 0.0100 mmhos/cm

**LCS (BGB0274-BS1)**

Prepared & Analyzed: 02/09/23

Specific Conductance (EC) 0.155 0.0100 mmhos/cm 0.150 103 95-105

**Duplicate (BGB0274-DUP1)**

**Source: 2302121-01**

Prepared & Analyzed: 02/09/23

Specific Conductance (EC) 0.366 0.0100 mmhos/cm 0.374 2.30 20

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction - Quality Control**

**Summit Scientific**

Analyte	Result	Reporting		Spike Level	Source		%REC		RPD	
		Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0275 - General Preparation**

**LCS (BGB0275-BS1)**

Prepared & Analyzed: 02/09/23

pH	9.13	pH Units	9.18	99.5	95-105
----	------	----------	------	------	--------

**Duplicate (BGB0275-DUP1)**

Source: 2302121-01

Prepared & Analyzed: 02/09/23

pH	6.71	pH Units	6.46	3.80	20
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Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 11:16

### Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

# Summit Scientific

---

4653 Table Mountain Drive, Golden, Colorado 80403

303.277.9310

February 20, 2023

Ben Baugh  
Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction., CO 81501  
RE: PDC - Margil 34A  
Work Order #2302146

Enclosed are the results of analyses for samples received by Summit Scientific on 02/08/23 16:48. If you have any questions concerning this report, please feel free to contact me.

Sincerely,



Mikayla Axtell For Paul Shrewsbury  
President



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

### ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
SEP01-DL@5	2302146-01	Soil	02/08/23 12:20	02/08/23 16:48
SEP02-DL@4	2302146-02	Soil	02/08/23 11:10	02/08/23 16:48
SEP03-DL@4	2302146-03	Soil	02/08/23 11:20	02/08/23 16:48
SEP04-DL@8	2302146-04	Soil	02/08/23 14:45	02/08/23 16:48
SEP05-DL@4	2302146-05	Soil	02/08/23 11:35	02/08/23 16:48
SEP06-DL@4	2302146-06	Soil	02/08/23 11:40	02/08/23 16:48
SEP01-FL@5	2302146-07	Soil	02/08/23 12:30	02/08/23 16:48
SEP02-FL@5	2302146-08	Soil	02/08/23 12:35	02/08/23 16:48
SEP03-FL@5	2302146-09	Soil	02/08/23 12:40	02/08/23 16:48
SEP04-FL@5	2302146-10	Soil	02/08/23 12:45	02/08/23 16:48
SEP05-FL@5	2302146-11	Soil	02/08/23 12:48	02/08/23 16:48
SEP06-FL@5	2302146-12	Soil	02/08/23 12:52	02/08/23 16:48
WH01-S@4	2302146-13	Soil	02/08/23 13:20	02/08/23 16:48
WH02-S@4	2302146-14	Soil	02/08/23 13:25	02/08/23 16:48
WH03-S@4	2302146-15	Soil	02/08/23 13:30	02/08/23 16:48
WH04-S@4	2302146-16	Soil	02/08/23 13:35	02/08/23 16:48
WH05-S@4	2302146-17	Soil	02/08/23 13:40	02/08/23 16:48

Summit Scientific

*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.*

# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 1 of 2
2302146.1	

Send Data To:		Send Invoice To:	
Client: Entrada Consulting Group		Company:	
Address: 240 Mesa Avenue		Project Name/Location:	
City/State/Zip: Grand Junction, CO 81501		AFE#:	
Phone: 804-513-0707		PO/Billing Codes:	
Sampler Name: Ryan Finley		Contact:	
Project Manager: Ben Baugh		Project Number:	
E-Mail: BBaugh@entradainc.com			
rfinley@entradainc.com + PDC list			
Project Name: Margil 34A			

					Preservative				Matrix				Analysis Requested							Special Instructions
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other	Water	Soil	Air-Canister #	Other	BTEX+N	TPH	1,2,4 + 1,3,5 TMBs	EC	SAR	pH	Boron	
1	SEP01-DL@ 5	2/8/23	1220	2			X			X			X	X	X					
2	SEP02-DL@ 4		1110				X													
3	SEP03-DL@ 4		1120																	
4	SEP04-DL@ 8		1445																	
5	SEP05-DL@ 4		1135																	
6	SEP06-DL@ 4		1140																	
7	SEP01-FL@ 5		1230																	
8	SEP02-FL@ 5		1235																	
9	SEP03-FL@ 5		1240																	
10	SEP04-FL@ 5		1245																	
11	SEP05-FL@ 5		1248																	
12	SEP06-FL@ 5		1252																	
13	WH01-S@ 4		1320													X	X	X	X	
14	WH02-S@ 4		1325																	
15	WH03-S@ 4		1330																	

Relinquished by:	Date/Time:	Received by:	Date/Time:	TAT Business Days	Field DO	Notes:
	2/8/23 1145		2/8/23 1648	Same Day	Field EC	
Relinquished by:	Date/Time:	Received by:	Date/Time:	1 Day	Field ORP	
				2 Days	Field pH	
Relinquished by:	Date/Time:	Received by:	Date/Time:	3 Days	Field Temp.	
				Standard	Field Turb.	
Temperature Upon Receipt: 99		Corrected Temperature: 0		IR gun #:	HNO3 lot #:	

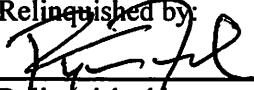
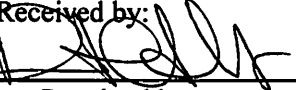

# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 2 of 2
2302146.2	

Client: Entrada Consulting Group		Send Data To:		Send Invoice To:	
Address: 240 Mesa Avenue		Project Manager: Ben Baugh		Company:	
City/State/Zip: Grand Junction, CO 81501		E-Mail: see p 1		Project Name/Location:	
Phone: 804-513-0707		Project Name: Margi 34A		AFE#:	
Sampler Name: Ryan Finley		Project Number:		PO/Billing Codes:	
				Contact:	

					Preservative				Matrix			Analysis Requested								Special Instructions	
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other	Water	Soil	Air-Canister #	Other	BTEX+N	TPH	TMBs	EC	SAR	pH	Boron		
1	WH04-S@4	2/8/23	1335	2			X			X			X	X	X	X	X	X	X		
2	WH05-S@4	↓	1340	2			X			X			X	X	X	X	X	X	X		
3																					
4																					
5																					
6																					
7																					
8																					
9																					
10																					
11																					
12																					
13																					
14																					
15																					

Relinquished by: 	Date/Time: 2/8/23 1648	Received by: 	Date/Time: 2/8/23 1648	TAT Business Days	Field DO	Notes:
Relinquished by:	Date/Time:	Received by:	Date/Time:	Same Day	Field EC	
				1 Day	Field ORP	
				2 Days	Field pH	
				3 Days	Field Temp.	
				Standard	X Field Turb.	
Temperature Upon Receipt: 99	Corrected Temperature: 	IR gun #: 1	HNO3 lot #:			

S<sub>2</sub>2/2  
Sample Receipt Checklist

S2 Work Order# 2302148

Client: Entrada Client Project ID: Margi 134AShipped Via: H.D./P.U./FedEx/UPS/USPS/Other ☐ Airbill #: ☐☐ ☐ ☐ ☐ ☐Matrix (Check all that apply) Air ☐ Soil/Solid ☐ Water ☐ Other ☐Temp (°C) Thermometer # 

	Yes	No	N/A	Comments (if any)
If samples require cooling, is the temperature < 6°C? <sup>(1)</sup> <b>NOTE:</b> If samples are delivered the same day of sampling, this requirement is met if there is evidence that cooling has begun.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	on ice
If custody seals are present, are they intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are samples due within 48 hours present?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are water samples with short hold times present? Note the short hold analysis in the comments column - pH, Nitrate/Nitrite, Ferrous Iron (Fe <sup>2+</sup> ), Hexavalent Chromium (Cr <sup>6+</sup> , Cr VI), COD/BOD, Total Coliform, E. Coli, Total Residual Chlorine (TRC), Dissolved Oxygen	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Is a chain-of-custody (COC) form present and filled out Completely? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client w/ date and time recorded? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace 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 (excluding cooling)? <sup>(1)</sup> Note the type of preservative in the comments column – HCl, H <sub>2</sub> SO <sub>4</sub> , NaOH, HNO <sub>3</sub> , etc.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If samples are acid preserved for metals, is the pH ≤ 2? <sup>(1)</sup> Record the pH in Comments.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If dissolved metals are requested, were samples field filtered?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Additional Comments (if any):				
<sup>(1)</sup> If NO, then contact the client before proceeding with analysis and note in case narrative.				

AS  
Custodian Printed Name2/8/23  
Date/Time



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP01-DL@5**  
**2302146-01 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0398	99.5 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0394	98.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0425	106 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	11.3	90.1 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP02-DL@4**  
**2302146-02 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 11:10**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:10**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0409	102 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0394	98.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0425	106 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 11:10**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:10**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	10.7	85.4 %	30-150		"	"	"	"	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP03-DL@4**  
**2302146-03 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 11:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0414	104 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0390	97.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0430	107 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 11:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	11.9	95.3 %	30-150		"	"	"	"	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP04-DL@8**  
**2302146-04 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 14:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 14:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0412	103 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0386	96.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0427	107 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 14:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 14:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	11.1	89.2 %	30-150		"	"	"	"	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP05-DL@4**  
**2302146-05 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 11:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0400	99.9 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0394	98.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0421	105 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 11:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/09/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	10.4	82.9 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP06-DL@4**  
**2302146-06 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 11:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0392	98.0 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0394	98.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0430	107 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 11:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 11:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.1	113 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP01-FL@5**  
**2302146-07 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0401	100 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0394	98.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0432	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.4	116 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP02-FL@5**  
**2302146-08 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 12:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0414	104 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0400	99.9 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0433	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 12:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.1	113 %	30-150		"	"	"	"	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP03-FL@5**  
**2302146-09 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 12:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0384	96.1 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0395	98.8 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0432	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 12:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.9	119 %	30-150		"	"	"	"	

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP04-FL@5**  
**2302146-10 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 12:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0380	95.0 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0398	99.5 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0434	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 12:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:45**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.6	117 %	30-150		"	"	"	"	

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP05-FL@5**  
**2302146-11 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 12:48**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/10/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:48**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0401	100 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0395	98.8 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0431	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 12:48**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:48**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.3	115 %	30-150		"	"	"	"	

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**SEP06-FL@5**  
**2302146-12 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 12:52**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:52**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0378	94.5 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0399	99.7 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0434	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 12:52**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 12:52**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.6	116 %	30-150		"	"	"	"	

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH01-S@4**  
**2302146-13 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0400	100 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0397	99.2 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0438	110 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.2	114 %	30-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH01-S@4**  
**2302146-13 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.157	0.0100	mg/L	1	BGB0346	02/13/23	02/14/23	EPA 6020B	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	17.2	0.0593	mg/L dry	1	BGB0374	02/13/23	02/15/23	EPA 6020B	
Magnesium	17.5	0.0593	"	"	"	"	"	"	
Sodium	12.2	0.0593	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	0.495	0.00100	units	1	BGB0455	02/15/23	02/15/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	84.3		%	1	BGB0367	02/13/23	02/14/23	Calculation	

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	0.298	0.0100	mmhos/cm	1	BGB0397	02/14/23	02/14/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH01-S@4**  
**2302146-13 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:20**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>8.19</b>			pH Units	1	BGB0396	02/14/23	02/14/23	EPA 9045D	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH02-S@4**  
**2302146-14 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0376	93.9 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0401	100 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0427	107 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	13.9	111 %	30-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH02-S@4**  
**2302146-14 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.145	0.0100	mg/L	1	BGB0346	02/13/23	02/14/23	EPA 6020B	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	24.0	0.0592	mg/L dry	1	BGB0374	02/13/23	02/15/23	EPA 6020B	
Magnesium	12.9	0.0592	"	"	"	"	"	"	
Sodium	17.5	0.0592	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	0.717	0.00100	units	1	BGB0455	02/15/23	02/15/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	84.5		%	1	BGB0367	02/13/23	02/14/23	Calculation	

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	0.285	0.0100	mmhos/cm	1	BGB0397	02/14/23	02/14/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH02-S@4**  
**2302146-14 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:25**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>8.18</b>			pH Units	1	BGB0396	02/14/23	02/14/23	EPA 9045D	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH03-S@4**  
**2302146-15 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0390	97.4 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0397	99.2 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0433	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	14.8	119 %	30-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

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240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH03-S@4**  
**2302146-15 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.325	0.0100	mg/L	1	BGB0346	02/13/23	02/14/23	EPA 6020B	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	19.0	0.0594	mg/L dry	1	BGB0374	02/13/23	02/15/23	EPA 6020B	
Magnesium	13.0	0.0594	"	"	"	"	"	"	
Sodium	22.1	0.0594	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	0.959	0.00100	units	1	BGB0455	02/15/23	02/15/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	84.2		%	1	BGB0367	02/13/23	02/14/23	Calculation	

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	0.330	0.0100	mmhos/cm	1	BGB0397	02/14/23	02/14/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH03-S@4**  
**2302146-15 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:30**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>8.18</b>			pH Units	1	BGB0396	02/14/23	02/14/23	EPA 9045D	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH04-S@4**  
**2302146-16 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0379	94.8 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0403	101 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0431	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	15.5	124 %	30-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH04-S@4**  
**2302146-16 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.118	0.0100	mg/L	1	BGB0346	02/13/23	02/14/23	EPA 6020B	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	58.7	0.0596	mg/L dry	1	BGB0374	02/13/23	02/15/23	EPA 6020B	
Magnesium	48.9	0.0596	"	"	"	"	"	"	
Sodium	80.3	0.0596	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	1.87	0.00100	units	1	BGB0455	02/15/23	02/15/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	83.8		%	1	BGB0367	02/13/23	02/14/23	Calculation	

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	1.47	0.0100	mmhos/cm	1	BGB0397	02/14/23	02/14/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH04-S@4**  
**2302146-16 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:35**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>7.83</b>			pH Units	1	BGB0396	02/14/23	02/14/23	EPA 9045D	

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH05-S@4**  
**2302146-17 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0244	02/09/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0394	98.5 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0397	99.2 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0433	108 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0247	02/09/23	02/10/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	15.8	127 %	30-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH05-S@4**  
**2302146-17 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.237	0.0100	mg/L	1	BGB0346	02/13/23	02/14/23	EPA 6020B	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	24.0	0.0627	mg/L dry	1	BGB0374	02/13/23	02/15/23	EPA 6020B	
Magnesium	12.3	0.0627	"	"	"	"	"	"	
Sodium	27.5	0.0627	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	1.14	0.00100	units	1	BGB0455	02/15/23	02/15/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	79.7		%	1	BGB0367	02/13/23	02/14/23	Calculation	

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	0.330	0.0100	mmhos/cm	1	BGB0397	02/14/23	02/14/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**WH05-S@4**  
**2302146-17 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **02/08/23 13:40**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>8.26</b>			pH Units	1	BGB0396	02/14/23	02/14/23	EPA 9045D	

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0244 - EPA 5030 Soil MS

##### Blank (BGB0244-BLK1)

Prepared: 02/09/23 Analyzed: 02/10/23

Benzene	ND	0.0020	mg/kg							
Toluene	ND	0.0050	"							
Ethylbenzene	ND	0.0050	"							
Xylenes (total)	ND	0.010	"							
1,2,4-Trimethylbenzene	ND	0.0050	"							
1,3,5-Trimethylbenzene	ND	0.0050	"							
Naphthalene	ND	0.0038	"							
Gasoline Range Hydrocarbons	ND	0.50	"							
Surrogate: 1,2-Dichloroethane-d4	0.0394		"	0.0400		98.4	50-150			
Surrogate: Toluene-d8	0.0388		"	0.0400		97.0	50-150			
Surrogate: 4-Bromofluorobenzene	0.0427		"	0.0400		107	50-150			

##### LCS (BGB0244-BS1)

Prepared: 02/09/23 Analyzed: 02/10/23

Benzene	0.0791	0.0020	mg/kg	0.100		79.1	70-130			
Toluene	0.0927	0.0050	"	0.100		92.7	70-130			
Ethylbenzene	0.126	0.0050	"	0.100		126	70-130			
m,p-Xylene	0.250	0.010	"	0.200		125	70-130			
o-Xylene	0.121	0.0050	"	0.100		121	70-130			
1,2,4-Trimethylbenzene	0.108	0.0050	"	0.100		108	70-130			
1,3,5-Trimethylbenzene	0.109	0.0050	"	0.100		109	70-130			
Naphthalene	0.111	0.0038	"	0.100		111	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0433		"	0.0400		108	50-150			
Surrogate: Toluene-d8	0.0391		"	0.0400		97.6	50-150			
Surrogate: 4-Bromofluorobenzene	0.0398		"	0.0400		99.4	50-150			

##### Matrix Spike (BGB0244-MS1)

Source: 2302146-01

Prepared: 02/09/23 Analyzed: 02/10/23

Benzene	0.0762	0.0020	mg/kg	0.100	ND	76.2	70-130			
Toluene	0.0893	0.0050	"	0.100	ND	89.3	70-130			
Ethylbenzene	0.119	0.0050	"	0.100	ND	119	70-130			
m,p-Xylene	0.238	0.010	"	0.200	ND	119	70-130			
o-Xylene	0.117	0.0050	"	0.100	ND	117	70-130			
1,2,4-Trimethylbenzene	0.104	0.0050	"	0.100	ND	104	70-130			
1,3,5-Trimethylbenzene	0.104	0.0050	"	0.100	ND	104	70-130			
Naphthalene	0.121	0.0038	"	0.100	ND	121	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0443		"	0.0400		111	50-150			
Surrogate: Toluene-d8	0.0386		"	0.0400		96.5	50-150			
Surrogate: 4-Bromofluorobenzene	0.0396		"	0.0400		99.1	50-150			

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0244 - EPA 5030 Soil MS

Matrix Spike Dup (BGB0244-MSD1)		Source: 2302146-01			Prepared: 02/09/23 Analyzed: 02/10/23					
Benzene	0.0753	0.0020	mg/kg	0.100	ND	75.3	70-130	1.11	30	
Toluene	0.0907	0.0050	"	0.100	ND	90.7	70-130	1.50	30	
Ethylbenzene	0.121	0.0050	"	0.100	ND	121	70-130	1.80	30	
m,p-Xylene	0.242	0.010	"	0.200	ND	121	70-130	1.71	30	
o-Xylene	0.120	0.0050	"	0.100	ND	120	70-130	2.51	30	
1,2,4-Trimethylbenzene	0.109	0.0050	"	0.100	ND	109	70-130	5.32	30	
1,3,5-Trimethylbenzene	0.108	0.0050	"	0.100	ND	108	70-130	4.22	30	
Naphthalene	0.131	0.0038	"	0.100	ND	131	70-130	7.64	30	
Surrogate: 1,2-Dichloroethane-d4		0.0429	"	0.0400		107	50-150			
Surrogate: Toluene-d8		0.0398	"	0.0400		99.4	50-150			
Surrogate: 4-Bromofluorobenzene		0.0404	"	0.0400		101	50-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**Extractable Petroleum Hydrocarbons by 8015 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0247 - EPA 3550A**

**Blank (BGB0247-BLK1)**

Prepared & Analyzed: 02/09/23

C10-C28 (DRO)	ND	50	mg/kg							
C28-C36 (ORO)	ND	50	"							
Surrogate: o-Terphenyl	14.0		"	12.5		112	30-150			

**LCS (BGB0247-BS1)**

Prepared & Analyzed: 02/09/23

C10-C28 (DRO)	496	50	mg/kg	500		99.3	70-130			
Surrogate: o-Terphenyl	14.9		"	12.5		119	30-150			

**Matrix Spike (BGB0247-MS1)**

Source: 2302146-01

Prepared & Analyzed: 02/09/23

C10-C28 (DRO)	426	50	mg/kg	500	10.7	83.0	70-130			
Surrogate: o-Terphenyl	12.0		"	12.5		96.0	30-150			

**Matrix Spike Dup (BGB0247-MSD1)**

Source: 2302146-01

Prepared & Analyzed: 02/09/23

C10-C28 (DRO)	445	50	mg/kg	500	10.7	86.8	70-130	4.40	20	
Surrogate: o-Terphenyl	13.0		"	12.5		104	30-150			

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**Total Metals by EPA 6020B Hot Water Soluble Extraction - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0346 - EPA 3050B**

**Blank (BGB0346-BLK1)**

Prepared: 02/13/23 Analyzed: 02/14/23

Boron ND 0.0100 mg/L

**LCS (BGB0346-BS1)**

Prepared: 02/13/23 Analyzed: 02/14/23

Boron 5.52 0.0100 mg/L 5.00 110 80-120

**Duplicate (BGB0346-DUP1)**

**Source: 2302141-01**

Prepared: 02/13/23 Analyzed: 02/14/23

Boron 0.0501 0.0100 mg/L 0.0555 10.2 20

**Matrix Spike (BGB0346-MS1)**

**Source: 2302141-01**

Prepared: 02/13/23 Analyzed: 02/14/23

Boron 5.68 0.0100 mg/L 5.00 0.0555 113 75-125

**Matrix Spike Dup (BGB0346-MSD1)**

**Source: 2302141-01**

Prepared: 02/13/23 Analyzed: 02/14/23

Boron 5.77 0.0100 mg/L 5.00 0.0555 114 75-125 1.42 25

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction - Quality Control**

**Summit Scientific**

Analyte	Reporting			Spike	Source	%REC		RPD		
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0374 - General Preparation**

**Blank (BGB0374-BLK1)**

Prepared: 02/13/23 Analyzed: 02/15/23

Calcium	ND	0.0500	mg/L wet
Magnesium	ND	0.0500	"
Sodium	ND	0.0500	"

**LCS (BGB0374-BS1)**

Prepared: 02/13/23 Analyzed: 02/15/23

Calcium	5.27	0.0500	mg/L wet	5.00	105	70-130
Magnesium	4.75	0.0500	"	5.00	94.9	70-130
Sodium	4.43	0.0500	"	5.00	88.5	70-130

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**Physical Parameters by APHA/ASTM/EPA Methods - Quality Control**

**Summit Scientific**

Analyte	Result	Reporting		Spike Level	Source		%REC		RPD	
		Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0367 - General Preparation**

Duplicate (BGB0367-DUP1)		Source: 2302141-01		Prepared: 02/13/23 Analyzed: 02/14/23	
% Solids	94.5		%	94.6	0.166 20

Summit Scientific

*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.*



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction - Quality Control**  
**Summit Scientific**

Analyte	Result	Reporting		Spike Level	Source		%REC		RPD	
		Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0397 - General Preparation**

**Blank (BGB0397-BLK1)**

Prepared & Analyzed: 02/14/23

Specific Conductance (EC) ND 0.0100 mmhos/cm

**LCS (BGB0397-BS1)**

Prepared & Analyzed: 02/14/23

Specific Conductance (EC) 0.151 0.0100 mmhos/cm 0.150 101 95-105

**Duplicate (BGB0397-DUP1)**

**Source: 2302138-01**

Prepared & Analyzed: 02/14/23

Specific Conductance (EC) 0.594 0.0100 mmhos/cm 0.601 1.20 20

Summit Scientific

*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.*



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction - Quality Control**

**Summit Scientific**

Analyte	Result	Reporting		Spike Level	Source Result	%REC		RPD		Notes
		Limit	Units			%REC	Limits	RPD	Limit	

**Batch BGB0396 - General Preparation**

**LCS (BGB0396-BS1)**

Prepared & Analyzed: 02/14/23

pH	9.12	pH Units	9.18	99.3	95-105
----	------	----------	------	------	--------

**Duplicate (BGB0396-DUP1)**

Source: 2302138-01

Prepared & Analyzed: 02/14/23

pH	7.72	pH Units	7.71	0.130	20
----	------	----------	------	-------	----

Summit Scientific

*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.*



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/20/23 16:30

### Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

# Summit Scientific

---

4653 Table Mountain Drive, Golden, Colorado 80403

303.277.9310

February 14, 2023

Ben Baugh  
Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction., CO 81501  
RE: PDC - Margil 34A  
Work Order #2302195

Enclosed are the results of analyses for samples received by Summit Scientific on 02/09/23 16:30. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in black ink, appearing to read "Scott Sheely".

Scott Sheely For Paul Shrewsbury  
President



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 13:37

### ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
WH01@8	2302195-01	Soil	02/09/23 10:35	02/09/23 16:30
WH03@8	2302195-02	Soil	02/09/23 13:00	02/09/23 16:30

Summit Scientific

*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.*

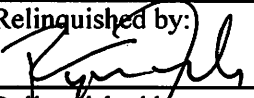
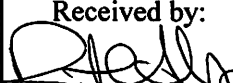
# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 1 of 1
2302195	

Client: Entrada Consulting Group		Send Data To:		Send Invoice To:	
Address: 240 Mesa Avenue		Project Manager: Ben Baugh		Company:	
City/State/Zip: Grand Junction, CO 81501		E-Mail: BBaugh@entradainc.com		Project Name/Location:	
Phone: 804-513-0707		rfinley@entradainc.com + PDC list		AFE#:	
Sampler Name: Ryan Finley		Project Name: Margil 34A		PO/Billing Codes:	
		Project Number:		Contact:	

					Preservative				Matrix			Analysis Requested					Special Instructions
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other	Water	Soil	Air-Canister #	Other	BTEX+N	TPH	1,2,4 + 1,3,5 TMB		
1	WH01@B	2/9/23	1035	2			X			X			X	X	X		
2	WH03@B	↓	1300	2			X			X			X	X	X		
3																	
4																	
5																	
6																	
7																	
8																	
9																	
10																	
11																	
12																	
13																	
14																	
15																	

Relinquished by: 	Date/Time: 2/9/23	Received by: SZ	Date/Time: 2/9/23	TAT Business Days	Field DO	Notes:
Relinquished by: SZ	Date/Time: 2/9/23 1630	Received by: 	Date/Time: 2/9/23 1630	Same Day	Field EC	
				1 Day	Field ORP	
				2 Days	Field pH	
				3 Days	Field Temp.	
				Standard	X Field Turb.	
Temperature Upon Receipt: 8.2	Corrected Temperature: 0	IR gun #: 1	HNO3 lot #:			

S<sub>2</sub>

## Sample Receipt Checklist

S2 Work Order# 2302195Client: Entrada Client Project ID: Margil 34AShipped Via: H.D./P.U./FedEx/UPS/USPS/Other ☐ Airbill #: ☐

<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	-------------------------------------	--------------------------	--------------------------	--------------------------

Matrix (Check all that apply) Air ☐ Soil/Solid ☐ Water ☐ Other ☐Temp (°C) 8.2 Thermometer # 1

	Yes	No	N/A	Comments (if any)
If samples require cooling, is the temperature < 6°C? <sup>(1)</sup> <b>NOTE:</b> If samples are delivered the same day of sampling, this requirement is met if there is evidence that cooling has begun.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	on ice
If custody seals are present, are they intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are samples due within 48 hours present?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are water samples with short hold times present? Note the short hold analysis in the comments column - pH, Nitrate/Nitrite, Ferrous Iron (Fe <sup>2+</sup> ), Hexavalent Chromium (Cr <sup>6+</sup> , Cr VI), COD/BOD, Total Coliform, E. Coli, Total Residual Chlorine (TRC), Dissolved Oxygen	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Is a chain-of-custody (COC) form present and filled out Completely? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client w/ date and time recorded? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace present? <b>If yes, contact client and note in narrative.</b>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Are samples preserved that require preservation (excluding cooling)? <sup>(1)</sup> Note the type of preservative in the comments column – HCl, H <sub>2</sub> SO <sub>4</sub> , NaOH, HNO <sub>3</sub> , etc.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If samples are acid preserved for metals, is the pH ≤ 2? <sup>(1)</sup> Record the pH in Comments.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If dissolved metals are requested, were samples field filtered?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Additional Comments (if any):				
<sup>(1)</sup> If NO, then contact the client before proceeding with analysis and note in case narrative.				

  
 Custodian Printed Name

2-9-23  
 Date/Time



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 13:37

**WH01@8**  
**2302195-01 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/09/23 10:35**

Analyte	Result	Reporting		Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit	Units						
Benzene	ND	0.0020	mg/kg	1	BGB0300	02/10/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/09/23 10:35**

Analyte	Result	Reporting		Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit	Units						
Surrogate: 1,2-Dichloroethane-d4	0.0341	85.2 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0417	104 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0447	112 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/09/23 10:35**

Analyte	Result	Reporting		Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit	Units						
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0298	02/10/23	02/11/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/09/23 10:35**

Analyte	Result	Reporting		Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit	Units						
Surrogate: o-Terphenyl	13.4	107 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 13:37

**WH03@8**  
**2302195-02 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/09/23 13:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0300	02/10/23	02/11/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/09/23 13:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0337	84.3 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0412	103 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0452	113 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/09/23 13:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0298	02/10/23	02/11/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/09/23 13:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	12.4	98.9 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 13:37

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0300 - EPA 5030 Soil MS

##### Blank (BGB0300-BLK1)

Prepared: 02/10/23 Analyzed: 02/11/23

Benzene	ND	0.0020	mg/kg							
Toluene	ND	0.0050	"							
Ethylbenzene	ND	0.0050	"							
Xylenes (total)	ND	0.010	"							
1,2,4-Trimethylbenzene	ND	0.0050	"							
1,3,5-Trimethylbenzene	ND	0.0050	"							
Naphthalene	ND	0.0038	"							
Gasoline Range Hydrocarbons	ND	0.50	"							
Surrogate: 1,2-Dichloroethane-d4	0.0397		"	0.0400		99.3	50-150			
Surrogate: Toluene-d8	0.0398		"	0.0400		99.4	50-150			
Surrogate: 4-Bromofluorobenzene	0.0429		"	0.0400		107	50-150			

##### LCS (BGB0300-BS1)

Prepared: 02/10/23 Analyzed: 02/11/23

Benzene	0.0775	0.0020	mg/kg	0.100		77.5	70-130			
Toluene	0.0984	0.0050	"	0.100		98.4	70-130			
Ethylbenzene	0.123	0.0050	"	0.100		123	70-130			
m,p-Xylene	0.246	0.010	"	0.200		123	70-130			
o-Xylene	0.119	0.0050	"	0.100		119	70-130			
1,2,4-Trimethylbenzene	0.107	0.0050	"	0.100		107	70-130			
1,3,5-Trimethylbenzene	0.108	0.0050	"	0.100		108	70-130			
Naphthalene	0.107	0.0038	"	0.100		107	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0375		"	0.0400		93.8	50-150			
Surrogate: Toluene-d8	0.0404		"	0.0400		101	50-150			
Surrogate: 4-Bromofluorobenzene	0.0405		"	0.0400		101	50-150			

##### Matrix Spike (BGB0300-MS1)

Source: 2302168-04

Prepared: 02/10/23 Analyzed: 02/11/23

Benzene	0.0752	0.0020	mg/kg	0.100	ND	75.2	70-130			
Toluene	0.0959	0.0050	"	0.100	ND	95.9	70-130			
Ethylbenzene	0.118	0.0050	"	0.100	ND	118	70-130			
m,p-Xylene	0.237	0.010	"	0.200	ND	119	70-130			
o-Xylene	0.118	0.0050	"	0.100	ND	118	70-130			
1,2,4-Trimethylbenzene	0.106	0.0050	"	0.100	ND	106	70-130			
1,3,5-Trimethylbenzene	0.105	0.0050	"	0.100	ND	105	70-130			
Naphthalene	0.122	0.0038	"	0.100	ND	122	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0390		"	0.0400		97.5	50-150			
Surrogate: Toluene-d8	0.0409		"	0.0400		102	50-150			
Surrogate: 4-Bromofluorobenzene	0.0408		"	0.0400		102	50-150			

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 13:37

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0300 - EPA 5030 Soil MS

Matrix Spike Dup (BGB0300-MSD1)	Source: 2302168-04			Prepared: 02/10/23 Analyzed: 02/11/23						
Benzene	0.0737	0.0020	mg/kg	0.100	ND	73.7	70-130	2.05	30	
Toluene	0.0973	0.0050	"	0.100	ND	97.3	70-130	1.43	30	
Ethylbenzene	0.121	0.0050	"	0.100	ND	121	70-130	2.63	30	
m,p-Xylene	0.241	0.010	"	0.200	ND	121	70-130	1.52	30	
o-Xylene	0.120	0.0050	"	0.100	ND	120	70-130	1.99	30	
1,2,4-Trimethylbenzene	0.110	0.0050	"	0.100	ND	110	70-130	4.00	30	
1,3,5-Trimethylbenzene	0.107	0.0050	"	0.100	ND	107	70-130	2.43	30	
Naphthalene	0.127	0.0038	"	0.100	ND	127	70-130	4.46	30	
Surrogate: 1,2-Dichloroethane-d4	0.0424		"	0.0400		106	50-150			
Surrogate: Toluene-d8	0.0400		"	0.0400		100	50-150			
Surrogate: 4-Bromofluorobenzene	0.0408		"	0.0400		102	50-150			

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 13:37

**Extractable Petroleum Hydrocarbons by 8015 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0298 - EPA 3550A**

**Blank (BGB0298-BLK1)**

Prepared: 02/10/23 Analyzed: 02/11/23

C10-C28 (DRO)	ND	50	mg/kg							
C28-C36 (ORO)	ND	50	"							
Surrogate: o-Terphenyl	12.7		"	12.5	102	30-150				

**LCS (BGB0298-BS1)**

Prepared: 02/10/23 Analyzed: 02/11/23

C10-C28 (DRO)	509	50	mg/kg	500	102	70-130				
Surrogate: o-Terphenyl	13.2		"	12.5	105	30-150				

**Matrix Spike (BGB0298-MS1)**

Source: 2302168-04

Prepared: 02/10/23 Analyzed: 02/11/23

C10-C28 (DRO)	479	50	mg/kg	500	31.2	89.6	70-130			
Surrogate: o-Terphenyl	12.5		"	12.5	100	30-150				

**Matrix Spike Dup (BGB0298-MSD1)**

Source: 2302168-04

Prepared: 02/10/23 Analyzed: 02/11/23

C10-C28 (DRO)	409	50	mg/kg	500	31.2	75.6	70-130	15.7	20	
Surrogate: o-Terphenyl	9.76		"	12.5	78.1	30-150				

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/14/23 13:37

### Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

# Summit Scientific

---

4653 Table Mountain Drive, Golden, Colorado 80403

303.277.9310

February 17, 2023

Ben Baugh  
Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction., CO 81501  
RE: PDC - Margil 34A  
Work Order #2302228

Enclosed are the results of analyses for samples received by Summit Scientific on 02/10/23 16:00. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in black ink, appearing to read "Scott Sheely".

Scott Sheely For Paul Shrewsbury  
President



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:36

#### ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
WH05@8	2302228-01	Soil	02/10/23 11:00	02/10/23 16:00
WH04@8	2302228-02	Soil	02/10/23 11:15	02/10/23 16:00

Summit Scientific

*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.*

# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 1 of 1
2302228	

Client: <u>Entrada Consulting</u>				Send Data To:				Send Invoice To:									
Address: <u>ON File</u>				Project Manager: <u>Ben Baugh</u>				Company:									
City/State/Zip:				E-Mail: <u>BBaugh@entradainc</u>				Project Name/Location:									
Phone: <u>804-513-0707</u>				<u>RFinley@entradainc + PDC list</u>				AFE#:									
Sampler Name: <u>Ryan Finley</u>				Project Name: <u>Margi 34A</u>				PO/Billing Codes:									
				Project Number:				Contact:									
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other	Water	Soil	Air-Canister #	Other	BTEX+N	TPH	TMBs	Analysis Requested	Special Instructions
1	WH05@B	2/10/23	1100	2			X			X			X	X	X		
2	WH04@B	↓	1115	2			X			X			X	X	X		
3																	
4																	
5																	
6																	
7																	
8																	
9																	
10																	
11																	
12																	
13																	
14																	
15																	
Relinquished by: <u>[Signature]</u>		Date/Time: <u>2/10/23 1100</u>		Received by: <u>[Signature]</u>		Date/Time: <u>2/10/23 1600</u>		TAT Business Days		Field DO		Notes:					
Relinquished by:		Date/Time:		Received by:		Date/Time:		Same Day		Field EC							
								1 Day		Field ORP							
								2 Days		Field pH							
								3 Days		Field Temp.							
Relinquished by:		Date/Time:		Received by:		Date/Time:		Standard		X Field Turb.							
Temperature Upon Receipt: <u>7.9</u>				Corrected Temperature: <u>8</u>				IR gun #: <u>1</u>				HNO3 lot #:					

S<sub>2</sub>

## Sample Receipt Checklist

S2 Work Order# 2302228Client: Entrada Client Project ID: Margill 34AShipped Via: H.D./P.U./FedEx/UPS/USPS/Other ☐ Airbill #: ☐☐ ☐ ☐ ☐ ☐Matrix (Check all that apply) Air ☐ Soil/Solid ☐ Water ☐ Other ☐Temp (°C) 7.9 Thermometer # 1

	Yes	No	N/A	Comments (if any)
If samples require cooling, is the temperature < 6°C? <sup>(1)</sup> <b>NOTE:</b> If samples are delivered the same day of sampling, this requirement is met if there is evidence that cooling has begun.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<u>on ice</u>
If custody seals are present, are they intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are samples due within 48 hours present?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are water samples with short hold times present? Note the short hold analysis in the comments column - pH, Nitrate/Nitrite, Ferrous Iron (Fe <sup>2+</sup> ), Hexavalent Chromium (Cr <sup>6+</sup> , Cr VI), COD/BOD, Total Coliform, E. Coli, Total Residual Chlorine (TRC), Dissolved Oxygen	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Is a chain-of-custody (COC) form present and filled out Completely? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client w/ date and time recorded? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace present? <b>If yes, contact client and note in narrative.</b>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Are samples preserved that require preservation (excluding cooling)? <sup>(1)</sup> Note the type of preservative in the comments column – HCl, H <sub>2</sub> SO <sub>4</sub> , NaOH, HNO <sub>3</sub> , etc.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If samples are acid preserved for metals, is the pH ≤ 2? <sup>(1)</sup> Record the pH in Comments.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If dissolved metals are requested, were samples field filtered?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Additional Comments (if any):				
<sup>(1)</sup> If NO, then contact the client before proceeding with analysis and note in case narrative.				

  
 Custodian Printed Name

2/10/23  
 Date/Time



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:36

**WH05@8**  
**2302228-01 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/10/23 11:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0355	02/13/23	02/14/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/10/23 11:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0314	78.4 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0332	83.1 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0381	95.2 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/10/23 11:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0356	02/13/23	02/14/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/10/23 11:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	9.13	73.1 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:36

**WH04@8**  
**2302228-02 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/10/23 11:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0355	02/13/23	02/14/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/10/23 11:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0324	81.0 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0362	90.6 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0398	99.5 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/10/23 11:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0356	02/13/23	02/14/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/10/23 11:15**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	7.37	59.0 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:36

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0355 - EPA 5030 Soil MS

##### Blank (BGB0355-BLK1)

Prepared & Analyzed: 02/13/23

Benzene	ND	0.0020	mg/kg							
Toluene	ND	0.0050	"							
Ethylbenzene	ND	0.0050	"							
Xylenes (total)	ND	0.010	"							
1,2,4-Trimethylbenzene	ND	0.0050	"							
1,3,5-Trimethylbenzene	ND	0.0050	"							
Naphthalene	ND	0.0038	"							
Gasoline Range Hydrocarbons	ND	0.50	"							
Surrogate: 1,2-Dichloroethane-d4	0.0340		"	0.0400		85.0	50-150			
Surrogate: Toluene-d8	0.0451		"	0.0400		113	50-150			
Surrogate: 4-Bromofluorobenzene	0.0499		"	0.0400		125	50-150			

##### LCS (BGB0355-BS1)

Prepared & Analyzed: 02/13/23

Benzene	0.0848	0.0020	mg/kg	0.100		84.8	70-130			
Toluene	0.112	0.0050	"	0.100		112	70-130			
Ethylbenzene	0.115	0.0050	"	0.100		115	70-130			
m,p-Xylene	0.233	0.010	"	0.200		117	70-130			
o-Xylene	0.123	0.0050	"	0.100		123	70-130			
1,2,4-Trimethylbenzene	0.110	0.0050	"	0.100		110	70-130			
1,3,5-Trimethylbenzene	0.118	0.0050	"	0.100		118	70-130			
Naphthalene	0.0885	0.0038	"	0.100		88.5	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0340		"	0.0400		85.1	50-150			
Surrogate: Toluene-d8	0.0541		"	0.0400		135	50-150			
Surrogate: 4-Bromofluorobenzene	0.0435		"	0.0400		109	50-150			

##### Matrix Spike (BGB0355-MS1)

Source: 2302224-01

Prepared & Analyzed: 02/13/23

Benzene	0.0808	0.0020	mg/kg	0.100	ND	80.8	70-130			
Toluene	0.0753	0.0050	"	0.100	ND	75.3	70-130			
Ethylbenzene	0.0977	0.0050	"	0.100	ND	97.7	70-130			
m,p-Xylene	0.195	0.010	"	0.200	ND	97.3	70-130			
o-Xylene	0.0913	0.0050	"	0.100	ND	91.3	70-130			
1,2,4-Trimethylbenzene	0.0867	0.0050	"	0.100	ND	86.7	70-130			
1,3,5-Trimethylbenzene	0.0904	0.0050	"	0.100	ND	90.4	70-130			
Naphthalene	0.0933	0.0038	"	0.100	ND	93.3	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0256		"	0.0400		64.1	50-150			
Surrogate: Toluene-d8	0.0320		"	0.0400		80.1	50-150			
Surrogate: 4-Bromofluorobenzene	0.0367		"	0.0400		91.6	50-150			

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:36

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0355 - EPA 5030 Soil MS

Matrix Spike Dup (BGB0355-MSD1)	Source: 2302224-01			Prepared & Analyzed: 02/13/23						
Benzene	0.0838	0.0020	mg/kg	0.100	ND	83.8	70-130	3.65	30	
Toluene	0.0891	0.0050	"	0.100	ND	89.1	70-130	16.7	30	
Ethylbenzene	0.106	0.0050	"	0.100	ND	106	70-130	7.79	30	
m,p-Xylene	0.215	0.010	"	0.200	ND	107	70-130	9.89	30	
o-Xylene	0.102	0.0050	"	0.100	ND	102	70-130	11.5	30	
1,2,4-Trimethylbenzene	0.100	0.0050	"	0.100	ND	100	70-130	14.5	30	
1,3,5-Trimethylbenzene	0.105	0.0050	"	0.100	ND	105	70-130	15.0	30	
Naphthalene	0.0953	0.0038	"	0.100	ND	95.3	70-130	2.20	30	
Surrogate: 1,2-Dichloroethane-d4	0.0266		"	0.0400		66.4	50-150			
Surrogate: Toluene-d8	0.0371		"	0.0400		92.8	50-150			
Surrogate: 4-Bromofluorobenzene	0.0371		"	0.0400		92.8	50-150			

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:36

**Extractable Petroleum Hydrocarbons by 8015 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0356 - EPA 3550A**

**Blank (BGB0356-BLK1)**

Prepared & Analyzed: 02/13/23

C10-C28 (DRO)	ND	50	mg/kg							
C28-C36 (ORO)	ND	50	"							
Surrogate: o-Terphenyl	14.7		"	12.5		117	30-150			

**LCS (BGB0356-BS1)**

Prepared & Analyzed: 02/13/23

C10-C28 (DRO)	416	50	mg/kg	500		83.2	70-130			
Surrogate: o-Terphenyl	15.7		"	12.5		126	30-150			

**Matrix Spike (BGB0356-MS1)**

Source: 2302224-01

Prepared & Analyzed: 02/13/23

C10-C28 (DRO)	433	50	mg/kg	500	12.5	84.2	70-130			
Surrogate: o-Terphenyl	10.6		"	12.5		85.0	30-150			

**Matrix Spike Dup (BGB0356-MSD1)**

Source: 2302224-01

Prepared & Analyzed: 02/13/23

C10-C28 (DRO)	400	50	mg/kg	500	12.5	77.4	70-130	8.08	20	
Surrogate: o-Terphenyl	10.3		"	12.5		82.1	30-150			

Summit Scientific

*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.*



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:36

### Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

# Summit Scientific

---

4653 Table Mountain Drive, Golden, Colorado 80403

303.277.9310

February 17, 2023

Ben Baugh  
Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction., CO 81501  
RE: PDC - Margil 34A  
Work Order #2302266

Enclosed are the results of analyses for samples received by Summit Scientific on 02/13/23 16:30. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

A handwritten signature in black ink, appearing to read "Scott Sheely".

Scott Sheely For Paul Shrewsbury  
President



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:52

### ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
WH02@10	2302266-01	Soil	02/13/23 09:00	02/13/23 16:30

Summit Scientific

*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.*

# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 1 of 1
2302266	

Client: <u>Entrada Consulting Group</u>		Send Data To:		Send Invoice To:	
Address:		Project Manager: <u>Ben Baugh</u>		Company: <u>PDC</u>	
City/State/Zip:		E-Mail: <u>bbbaugh@entradainc.com</u>		Project Name/Location:	
Phone: <u>506 945 6355</u>		<u>cveryser@entradainc.com</u> PDC		AFE#:	
Sampler Name: <u>Chelsea veryser</u>		Project Name: <u>margill 34A</u> EHS		PO/Billing Codes:	
		Project Number:		Contact:	

					Preservative			Matrix			Analysis Requested								Special Instructions
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other	Water	Soil	Air-Canister #	Other	BTXN	TMBs	TPH	PH, EC, SAR			
1	WH02@10	2/13/23	0900	2			X			X			X	X	X				
2	BK401@5	↓	1000	↓			↓			↓						X			ON HOLD
3																			
4																			
5																			
6																			
7																			
8																			
9																			
10																			
11																			
12																			
13																			
14																			
15																			

Relinquished by: <u>[Signature]</u>	Date/Time: <u>2/13/23 1100</u>	Received by: <u>SZ</u>	Date/Time: <u>2/13/23 1100</u>	TAT Business Days	Field DO	Notes:
Relinquished by: <u>SZ</u>	Date/Time: <u>2/13/23 1030</u>	Received by: <u>[Signature]</u>	Date/Time: <u>2/13/23 1030</u>	Same Day	Field EC	
				1 Day	Field ORP	
				2 Days	Field pH	
				3 Days	Field Temp.	
Relinquished by:	Date/Time:	Received by:	Date/Time:	Standard	X Field Turb.	
Temperature Upon Receipt: <u>8.0</u>	Corrected Temperature: <u>[Signature]</u>	IR gun #: <u>1</u>	HNO3 lot #:			

S<sub>2</sub>

## Sample Receipt Checklist

S2 Work Order# 2302266Client: Entrada Client Project ID: Margil 34AShipped Via: H.D./P.U./FedEx/UPS/USPS/Other ☐ Airbill #: ☐
☐ ☐ ☐ ☐ ☐
Matrix (Check all that apply) Air ☐ Soil/Solid ☐ Water ☐ Other ☐Temp (°C) 8.0Thermometer # 1

	Yes	No	N/A	Comments (if any)
If samples require cooling, is the temperature < 6°C? <sup>(1)</sup> <b>NOTE:</b> If samples are delivered the same day of sampling, this requirement is met if there is evidence that cooling has begun.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<u>on ice</u>
If custody seals are present, are they intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are samples due within 48 hours present?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are water samples with short hold times present? Note the short hold analysis in the comments column - pH, Nitrate/Nitrite, Ferrous Iron (Fe <sup>2+</sup> ), Hexavalent Chromium (Cr <sup>6+</sup> , Cr VI), COD/BOD, Total Coliform, E. Coli, Total Residual Chlorine (TRC), Dissolved Oxygen	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Is a chain-of-custody (COC) form present and filled out Completely? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client w/ date and time recorded? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace present? <b>If yes, contact client and note in narrative.</b>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Are samples preserved that require preservation (excluding cooling)? <sup>(1)</sup> Note the type of preservative in the comments column – HCl, H <sub>2</sub> SO <sub>4</sub> , NaOH, HNO <sub>3</sub> , etc.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If samples are acid preserved for metals, is the pH ≤ 2? <sup>(1)</sup> Record the pH in Comments.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If dissolved metals are requested, were samples field filtered?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	

Additional Comments (if any):

<sup>(1)</sup> If NO, then contact the client before proceeding with analysis and note in case narrative.
AS  
Custodian Printed Name

2/13/23  
Date/Time



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:52

**WH02@10**  
**2302266-01 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **02/13/23 09:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGB0395	02/14/23	02/16/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **02/13/23 09:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0276	68.9 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0325	81.3 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0343	85.8 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **02/13/23 09:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGB0392	02/14/23	02/15/23	EPA 8015M	
C28-C36 (ORO)	ND	50	"	"	"	"	"	"	

Date Sampled: **02/13/23 09:00**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	12.0	95.6 %	30-150		"	"	"	"	

Summit Scientific

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.



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:52

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0395 - EPA 5030 Soil MS

##### Blank (BGB0395-BLK1)

Prepared: 02/14/23 Analyzed: 02/15/23

Benzene	ND	0.0020	mg/kg							
Toluene	ND	0.0050	"							
Ethylbenzene	ND	0.0050	"							
Xylenes (total)	ND	0.010	"							
1,2,4-Trimethylbenzene	ND	0.0050	"							
1,3,5-Trimethylbenzene	ND	0.0050	"							
Naphthalene	ND	0.0038	"							
Gasoline Range Hydrocarbons	ND	0.50	"							
Surrogate: 1,2-Dichloroethane-d4	0.0462		"	0.0400		115	50-150			
Surrogate: Toluene-d8	0.0416		"	0.0400		104	50-150			
Surrogate: 4-Bromofluorobenzene	0.0393		"	0.0400		98.3	50-150			

##### LCS (BGB0395-BS1)

Prepared: 02/14/23 Analyzed: 02/15/23

Benzene	0.109	0.0020	mg/kg	0.100		109	70-130			
Toluene	0.108	0.0050	"	0.100		108	70-130			
Ethylbenzene	0.112	0.0050	"	0.100		112	70-130			
m,p-Xylene	0.223	0.010	"	0.200		112	70-130			
o-Xylene	0.106	0.0050	"	0.100		106	70-130			
1,2,4-Trimethylbenzene	0.106	0.0050	"	0.100		106	70-130			
1,3,5-Trimethylbenzene	0.109	0.0050	"	0.100		109	70-130			
Naphthalene	0.0894	0.0038	"	0.100		89.4	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0403		"	0.0400		101	50-150			
Surrogate: Toluene-d8	0.0398		"	0.0400		99.6	50-150			
Surrogate: 4-Bromofluorobenzene	0.0376		"	0.0400		94.1	50-150			

##### Matrix Spike (BGB0395-MS1)

Source: 2302198-01

Prepared: 02/14/23 Analyzed: 02/15/23

Benzene	0.104	0.0020	mg/kg	0.100	ND	104	70-130			
Toluene	0.105	0.0050	"	0.100	ND	105	70-130			
Ethylbenzene	0.109	0.0050	"	0.100	ND	109	70-130			
m,p-Xylene	0.214	0.010	"	0.200	ND	107	70-130			
o-Xylene	0.104	0.0050	"	0.100	ND	104	70-130			
1,2,4-Trimethylbenzene	0.105	0.0050	"	0.100	ND	105	70-130			
1,3,5-Trimethylbenzene	0.105	0.0050	"	0.100	ND	105	70-130			
Naphthalene	0.0848	0.0038	"	0.100	ND	84.8	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0419		"	0.0400		105	50-150			
Surrogate: Toluene-d8	0.0396		"	0.0400		98.9	50-150			
Surrogate: 4-Bromofluorobenzene	0.0382		"	0.0400		95.6	50-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:52

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGB0395 - EPA 5030 Soil MS

Matrix Spike Dup (BGB0395-MSD1)	Source: 2302198-01			Prepared: 02/14/23 Analyzed: 02/15/23						
Benzene	0.110	0.0020	mg/kg	0.100	ND	110	70-130	5.80	30	
Toluene	0.110	0.0050	"	0.100	ND	110	70-130	4.73	30	
Ethylbenzene	0.115	0.0050	"	0.100	ND	115	70-130	5.07	30	
m,p-Xylene	0.226	0.010	"	0.200	ND	113	70-130	5.41	30	
o-Xylene	0.108	0.0050	"	0.100	ND	108	70-130	4.14	30	
1,2,4-Trimethylbenzene	0.109	0.0050	"	0.100	ND	109	70-130	4.37	30	
1,3,5-Trimethylbenzene	0.111	0.0050	"	0.100	ND	111	70-130	5.13	30	
Naphthalene	0.0817	0.0038	"	0.100	ND	81.7	70-130	3.78	30	
Surrogate: 1,2-Dichloroethane-d4	0.0420		"	0.0400		105	50-150			
Surrogate: Toluene-d8	0.0410		"	0.0400		103	50-150			
Surrogate: 4-Bromofluorobenzene	0.0397		"	0.0400		99.3	50-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:52

**Extractable Petroleum Hydrocarbons by 8015 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGB0392 - EPA 3550A**

**Blank (BGB0392-BLK1)**

Prepared & Analyzed: 02/14/23

C10-C28 (DRO)	ND	50	mg/kg							
C28-C36 (ORO)	ND	50	"							
Surrogate: o-Terphenyl	12.5		"	12.5		100	30-150			

**LCS (BGB0392-BS1)**

Prepared & Analyzed: 02/14/23

C10-C28 (DRO)	456	50	mg/kg	500		91.2	70-130			
Surrogate: o-Terphenyl	12.5		"	12.5		99.6	30-150			

**Matrix Spike (BGB0392-MS1)**

Source: 2302193-03

Prepared: 02/14/23 Analyzed: 02/15/23

C10-C28 (DRO)	479	50	mg/kg	500	12.9	93.1	70-130			
Surrogate: o-Terphenyl	14.2		"	12.5		113	30-150			

**Matrix Spike Dup (BGB0392-MSD1)**

Source: 2302193-03

Prepared: 02/14/23 Analyzed: 02/15/23

C10-C28 (DRO)	529	50	mg/kg	500	12.9	103	70-130	9.98	20	
Surrogate: o-Terphenyl	15.8		"	12.5		127	30-150			

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
02/17/23 10:52

### Notes and Definitions

DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference

# Summit Scientific

---

4653 Table Mountain Drive, Golden, Colorado 80403

303.277.9310

April 12, 2023

Ben Baugh  
Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction., CO 81501  
RE: PDC - Margil 34A  
Work Order #2304030

Enclosed are the results of analyses for samples received by Summit Scientific on 04/03/23 16:45. If you have any questions concerning this report, please feel free to contact me.

Sincerely,



Mikayla Axtell For Paul Shrewsbury  
President



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

### ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
BKG02@5	2304030-01	Soil	04/03/23 14:10	04/03/23 16:45
BKG03@5	2304030-02	Soil	04/03/23 14:25	04/03/23 16:45
PWV01-2@5	2304030-03	Soil	04/03/23 14:40	04/03/23 16:45

Summit Scientific

*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.*

# SUMMIT SCIENTIFIC

4653 Table Mountain Drive  
Golden, CO 80403  
303-277-9310

Lab ID	Page 1 of 1
2304030	

Client: <u>Entrada Consulting Group</u>		Send Data To:		Send Invoice To:	
Address: <u>ON File</u>		Project Manager: <u>Ben Baugh</u>		Company:	
City/State/Zip:		E-Mail: <u>PDC + Entrada dist list</u>		Project Name/Location:	
Phone: <u>586-945-6355</u>		Project Name: <u>Margal 34A</u>		AFE#:	
Sampler Name: <u>Ryan Finley + Nick Yousa</u>		Project Number:		PO/Billing Codes:	
				Contact:	

					Preservative				Matrix				Analysis Requested					Special Instructions			
ID	Sample Description	Date Sampled	Time Sampled	# of containers	HCl	HNO3	None	Other _____	Water	Soil	Air-Canister #	Other _____	Full Table 915	PH, EC, SAR	Boron	Arsenic	Barium	Selenium			
1	BKG0205	4/3/23	1410	2			X			X				X	X	X	X	X			
2	BKG0305	↓	1425	↓			↓			↓				X	X	X	X	X			
3	PW01-205	↓	1440	↓			↓			↓			X								
4																					
5																					
6																					
7																					
8																					
9																					
10																					
11																					
12																					
13																					
14																					
15																					

Relinquished by: <u>[Signature]</u>	Date/Time: <u>4/3/23 1500</u>	Received by: <u>[Signature]</u>	Date/Time: <u>4/3/23 1605</u>	TAT Business Days	Field DO	Notes:
Relinquished by: <u>SZ</u>	Date/Time: <u>4/3/23 1605</u>	Received by: <u>[Signature]</u>	Date/Time: <u>4/3/23 1605</u>	Same Day	Field EC	
				1 Day	Field ORP	
				2 Days	Field pH	
				3 Days	Field Temp.	
Relinquished by: <u>??</u>	Date/Time:	Received by:	Date/Time:	Standard	X Field Turb.	
Temperature Upon Receipt: <u>9.3</u>	Corrected Temperature: <u>9</u>	IR gun #: <u>1</u>	HNO3 lot #: <u></u>			

S<sub>2</sub>

## Sample Receipt Checklist

S2 Work Order# 2304030Client: Entrada Client Project ID: Margil 34AShipped Via: H.D./P.U./FedEx/UPS/USPS/Other ☐ Airbill #: ☐
☐ ☒ ☐ ☐ ☐
Matrix (Check all that apply) Air ☐ Soil/Solid ☒ Water ☐ Other ☐Temp (°C) 9.3 Thermometer # 1

	Yes	No	N/A	Comments (if any)
If samples require cooling, is the temperature < 6°C? <sup>(1)</sup> <b>NOTE:</b> If samples are delivered the same day of sampling, this requirement is met if there is evidence that cooling has begun.	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	ON ICE
If custody seals are present, are they intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Are samples due within 48 hours present?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	
Are water samples with short hold times present? Note the short hold analysis in the comments column - pH, Nitrate/Nitrite, Ferrous Iron (Fe <sup>2+</sup> ), Hexavalent Chromium (Cr <sup>6+</sup> , Cr VI), COD/BOD, Total Coliform, E. Coli, Total Residual Chlorine (TRC), Dissolved Oxygen	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
Is a chain-of-custody (COC) form present and filled out Completely? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Is the COC properly relinquished by the client w/ date and time recorded? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Were all samples received intact? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Was adequate sample volume provided? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Does the COC agree with the number and type of sample bottles received? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
Do the sample IDs on the bottle labels match the COC? <sup>(1)</sup>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	
For volatiles in water – is there headspace 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 (excluding cooling)? <sup>(1)</sup> Note the type of preservative in the comments column – HCl, H <sub>2</sub> SO <sub>4</sub> , NaOH, HNO <sub>3</sub> , etc.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If samples are acid preserved for metals, is the pH ≤ 2? <sup>(1)</sup> Record the pH in Comments.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	
If dissolved metals are requested, were samples field filtered?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	

Additional Comments (if any):

<sup>(1)</sup> If NO, then contact the client before proceeding with analysis and note in case narrative.

Custodian Printed Name

Date/Time

4-23-23 12:45



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**BKG02@5**  
**2304030-01 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **04/03/23 14:10**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Boron	0.343	0.0100	mg/L	1	BGD0119	04/05/23	04/07/23	EPA 6020B	

**Total Metals by EPA 6020B**

Date Sampled: **04/03/23 14:10**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Arsenic	5.24	0.200	mg/kg dry	1	BGD0154	04/06/23	04/07/23	EPA 6020B	
Barium	130	0.400	"	"	"	"	"	"	
Selenium	ND	0.260	"	"	"	"	"	"	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **04/03/23 14:10**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	22.9	0.0570	mg/L dry	1	BGD0257	04/09/23	04/11/23	EPA 6020B	
Magnesium	20.6	0.0570	"	"	"	"	"	"	
Sodium	31.6	0.0570	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **04/03/23 14:10**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	1.15	0.00100	units	1	BGD0361	04/12/23	04/12/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **04/03/23 14:10**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
% Solids	87.7		%	1	BGD0185	04/06/23	04/07/23	Calculation	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**BKG02@5**  
**2304030-01 (Soil)**

**Summit Scientific**

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **04/03/23 14:10**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
Specific Conductance (EC)	<b>0.341</b>	0.0100		mmhos/cm	1	BGD0275	04/10/23	04/10/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **04/03/23 14:10**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>8.20</b>			pH Units	1	BGD0274	04/10/23	04/10/23	EPA 9045D	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**BKG03@5**  
**2304030-02 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **04/03/23 14:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
<b>Boron</b>	<b>0.0152</b>	0.0100	mg/L	1	BGD0119	04/05/23	04/07/23	EPA 6020B	

**Total Metals by EPA 6020B**

Date Sampled: **04/03/23 14:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
<b>Arsenic</b>	<b>5.71</b>	0.200	mg/kg dry	1	BGD0154	04/06/23	04/07/23	EPA 6020B	
<b>Barium</b>	<b>73.9</b>	0.400	"	"	"	"	"	"	
<b>Selenium</b>	<b>ND</b>	0.260	"	"	"	"	"	"	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **04/03/23 14:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
<b>Calcium</b>	<b>27.5</b>	0.0557	mg/L dry	1	BGD0257	04/09/23	04/11/23	EPA 6020B	
<b>Magnesium</b>	<b>19.1</b>	0.0557	"	"	"	"	"	"	
<b>Sodium</b>	<b>3.47</b>	0.0557	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **04/03/23 14:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
<b>Sodium Adsorption Ratio</b>	<b>0.124</b>	0.00100	units	1	BGD0361	04/12/23	04/12/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **04/03/23 14:25**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
<b>% Solids</b>	<b>89.8</b>		%	1	BGD0185	04/06/23	04/07/23	Calculation	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**BKG03@5**  
**2304030-02 (Soil)**

**Summit Scientific**

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **04/03/23 14:25**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
Specific Conductance (EC)	<b>0.268</b>	0.0100		mmhos/cm	1	BGD0275	04/10/23	04/10/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **04/03/23 14:25**

Analyte	Result	Reporting		Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit								
<b>pH</b>	<b>7.97</b>			pH Units	1	BGD0274	04/10/23	04/10/23	EPA 9045D	

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**PWV01-2@5**  
**2304030-03 (Soil)**

**Summit Scientific**

**Volatile Organic Compounds by EPA Method 8260B**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Benzene	ND	0.0020	mg/kg	1	BGD0102	04/04/23	04/06/23	EPA 8260B	
Toluene	ND	0.0050	"	"	"	"	"	"	
Ethylbenzene	ND	0.0050	"	"	"	"	"	"	
Xylenes (total)	ND	0.010	"	"	"	"	"	"	
1,2,4-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
1,3,5-Trimethylbenzene	ND	0.0050	"	"	"	"	"	"	
Naphthalene	ND	0.0038	"	"	"	"	"	"	
Gasoline Range Hydrocarbons	ND	0.50	"	"	"	"	"	"	

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: 1,2-Dichloroethane-d4	0.0322	80.4 %	50-150		"	"	"	"	
Surrogate: Toluene-d8	0.0344	86.0 %	50-150		"	"	"	"	
Surrogate: 4-Bromofluorobenzene	0.0369	92.2 %	50-150		"	"	"	"	

**Extractable Petroleum Hydrocarbons by 8015**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
C10-C28 (DRO)	ND	50	mg/kg	1	BGD0104	04/04/23	04/07/23	EPA 8015M	
<b>C28-C36 (ORO)</b>	<b>77</b>	50	"	"	"	"	"	"	

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
		Limit							
Surrogate: o-Terphenyl	12.2	97.4 %	30-150		"	"	"	"	

**PAH by EPA Method 8270D SIM**

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**PWV01-2@5**  
**2304030-03 (Soil)**

**Summit Scientific**

**PAH by EPA Method 8270D SIM**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Acenaphthene	ND	0.00500	mg/kg	1	BGD0195	04/07/23	04/08/23	EPA 8270D SIM	
Anthracene	ND	0.00500	"	"	"	"	"	"	
Benzo (a) anthracene	ND	0.00500	"	"	"	"	"	"	
Benzo (a) pyrene	ND	0.00500	"	"	"	"	"	"	
Benzo (b) fluoranthene	ND	0.00500	"	"	"	"	"	"	
Benzo (k) fluoranthene	ND	0.00500	"	"	"	"	"	"	
Chrysene	ND	0.00500	"	"	"	"	"	"	
Dibenz (a,h) anthracene	ND	0.00500	"	"	"	"	"	"	
Fluoranthene	ND	0.00500	"	"	"	"	"	"	
Fluorene	ND	0.00500	"	"	"	"	"	"	
Indeno (1,2,3-cd) pyrene	ND	0.00500	"	"	"	"	"	"	
Pyrene	ND	0.00500	"	"	"	"	"	"	
1-Methylnaphthalene	ND	0.00500	"	"	"	"	"	"	
2-Methylnaphthalene	ND	0.00500	"	"	"	"	"	"	

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Surrogate: 2-Methylnaphthalene-d10	0.0273	82.0 %	40-150		"	"	"	"	
Surrogate: Fluoranthene-d10	0.0271	81.2 %	40-150		"	"	"	"	

**Total Metals by EPA 6020B Hot Water Soluble Extraction**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
<b>Boron</b>	<b>0.129</b>	0.0100	mg/L	1	BGD0119	04/05/23	04/07/23	EPA 6020B	

**Total Metals by EPA 6020B**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**PWV01-2@5**  
**2304030-03 (Soil)**

**Summit Scientific**

**Total Metals by EPA 6020B**

Arsenic	6.03	0.231	mg/kg dry	1	BGD0154	04/06/23	04/07/23	EPA 6020B
Barium	87.4	0.462	"	"	"	"	"	"
Cadmium	0.163	0.231	"	"	"	"	"	"
Copper	5.22	0.462	"	"	"	"	"	"
Lead	9.51	0.231	"	"	"	"	"	"
Nickel	5.92	0.462	"	"	"	"	"	"
Selenium	ND	0.260	"	"	"	"	"	"
Silver	0.0476	0.0231	"	"	"	"	"	"
Zinc	26.6	0.462	"	"	"	"	"	"

**Hexavalent Chromium by EPA Method 7196**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Chromium, Hexavalent	ND	0.30	mg/kg dry	1	BGD0183	04/06/23	04/06/23	EPA 7196A	

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Calcium	33.7	0.0577	mg/L dry	1	BGD0257	04/09/23	04/11/23	EPA 6020B	
Magnesium	29.2	0.0577	"	"	"	"	"	"	
Sodium	26.3	0.0577	"	"	"	"	"	"	

**Calculated Analysis**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Sodium Adsorption Ratio	0.801	0.00100	units	1	BGD0361	04/12/23	04/12/23	Calculation	

**Physical Parameters by APHA/ASTM/EPA Methods**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
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240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**PWV01-2@5**  
**2304030-03 (Soil)**

**Summit Scientific**

**Physical Parameters by APHA/ASTM/EPA Methods**

% Solids	86.6	%	1	BGD0185	04/06/23	04/07/23	Calculation
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**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
Specific Conductance (EC)	<b>0.508</b>	0.0100	mmhos/cm	1	BGD0275	04/10/23	04/10/23	EPA 120.1	

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction**

Date Sampled: **04/03/23 14:40**

Analyte	Result	Reporting Limit	Units	Dilution	Batch	Prepared	Analyzed	Method	Notes
pH	<b>7.98</b>		pH Units	1	BGD0274	04/10/23	04/10/23	EPA 9045D	

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240 Mesa Avenue  
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Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

## Volatile Organic Compounds by EPA Method 8260B - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGD0102 - EPA 5030 Soil MS

##### Blank (BGD0102-BLK1)

Prepared: 04/04/23 Analyzed: 04/06/23

Benzene	ND	0.0020	mg/kg							
Toluene	ND	0.0050	"							
Ethylbenzene	ND	0.0050	"							
Xylenes (total)	ND	0.010	"							
1,2,4-Trimethylbenzene	ND	0.0050	"							
1,3,5-Trimethylbenzene	ND	0.0050	"							
Naphthalene	ND	0.0038	"							
Gasoline Range Hydrocarbons	ND	0.50	"							
Surrogate: 1,2-Dichloroethane-d4	0.0342		"	0.0400		85.6	50-150			
Surrogate: Toluene-d8	0.0349		"	0.0400		87.3	50-150			
Surrogate: 4-Bromofluorobenzene	0.0364		"	0.0400		91.0	50-150			

##### LCS (BGD0102-BS1)

Prepared: 04/04/23 Analyzed: 04/06/23

Benzene	0.115	0.0020	mg/kg	0.125		92.3	70-130			
Toluene	0.105	0.0050	"	0.125		84.3	70-130			
Ethylbenzene	0.152	0.0050	"	0.125		122	70-130			
m,p-Xylene	0.304	0.010	"	0.250		122	70-130			
o-Xylene	0.140	0.0050	"	0.125		112	70-130			
1,2,4-Trimethylbenzene	0.156	0.0050	"	0.125		125	70-130			
1,3,5-Trimethylbenzene	0.156	0.0050	"	0.125		125	70-130			
Naphthalene	0.161	0.0038	"	0.125		129	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0317		"	0.0400		79.4	50-150			
Surrogate: Toluene-d8	0.0346		"	0.0400		86.6	50-150			
Surrogate: 4-Bromofluorobenzene	0.0344		"	0.0400		86.0	50-150			

##### Matrix Spike (BGD0102-MS1)

Source: 2303760-01

Prepared: 04/04/23 Analyzed: 04/06/23

Benzene	0.115	0.0020	mg/kg	0.125	ND	92.4	70-130			
Toluene	0.105	0.0050	"	0.125	ND	84.3	70-130			
Ethylbenzene	0.154	0.0050	"	0.125	ND	123	70-130			
m,p-Xylene	0.304	0.010	"	0.250	ND	122	70-130			
o-Xylene	0.141	0.0050	"	0.125	ND	113	70-130			
1,2,4-Trimethylbenzene	0.156	0.0050	"	0.125	ND	125	70-130			
1,3,5-Trimethylbenzene	0.157	0.0050	"	0.125	ND	126	70-130			
Naphthalene	0.148	0.0038	"	0.125	ND	118	70-130			
Surrogate: 1,2-Dichloroethane-d4	0.0338		"	0.0400		84.5	50-150			
Surrogate: Toluene-d8	0.0346		"	0.0400		86.6	50-150			
Surrogate: 4-Bromofluorobenzene	0.0343		"	0.0400		85.7	50-150			

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Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Volatile Organic Compounds by EPA Method 8260B - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0102 - EPA 5030 Soil MS**

Matrix Spike Dup (BGD0102-MSD1)	Source: 2303760-01			Prepared: 04/04/23 Analyzed: 04/06/23						
Benzene	0.115	0.0020	mg/kg	0.125	ND	91.9	70-130	0.495	30	
Toluene	0.135	0.0050	"	0.125	ND	108	70-130	24.9	30	
Ethylbenzene	0.153	0.0050	"	0.125	ND	123	70-130	0.683	30	
m,p-Xylene	0.306	0.010	"	0.250	ND	122	70-130	0.502	30	
o-Xylene	0.142	0.0050	"	0.125	ND	114	70-130	1.21	30	
1,2,4-Trimethylbenzene	0.157	0.0050	"	0.125	ND	126	70-130	0.421	30	
1,3,5-Trimethylbenzene	0.157	0.0050	"	0.125	ND	126	70-130	0.0764	30	
Naphthalene	0.152	0.0038	"	0.125	ND	121	70-130	2.83	30	
Surrogate: 1,2-Dichloroethane-d4	0.0341		"	0.0400		85.3	50-150			
Surrogate: Toluene-d8	0.0353		"	0.0400		88.3	50-150			
Surrogate: 4-Bromofluorobenzene	0.0346		"	0.0400		86.6	50-150			

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Extractable Petroleum Hydrocarbons by 8015 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0104 - EPA 3550A**

**Blank (BGD0104-BLK1)**

Prepared: 04/04/23 Analyzed: 04/05/23

C10-C28 (DRO)	ND	50	mg/kg							
C28-C36 (ORO)	ND	50	"							
Surrogate: o-Terphenyl	13.1		"	12.5		105	30-150			

**LCS (BGD0104-BS1)**

Prepared: 04/04/23 Analyzed: 04/05/23

C10-C28 (DRO)	471	50	mg/kg	500		94.2	70-130			
Surrogate: o-Terphenyl	13.5		"	12.5		108	30-150			

**Matrix Spike (BGD0104-MS1)**

Source: 2303760-01

Prepared: 04/04/23 Analyzed: 04/05/23

C10-C28 (DRO)	467	50	mg/kg	500	15.2	90.3	70-130			
Surrogate: o-Terphenyl	14.2		"	12.5		113	30-150			

**Matrix Spike Dup (BGD0104-MSD1)**

Source: 2303760-01

Prepared: 04/04/23 Analyzed: 04/05/23

C10-C28 (DRO)	441	50	mg/kg	500	15.2	85.2	70-130	5.56	20	
Surrogate: o-Terphenyl	13.5		"	12.5		108	30-150			

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

## PAH by EPA Method 8270D SIM - Quality Control

### Summit Scientific

Analyte	Reporting			Spike	Source	%REC		RPD		Notes
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	

#### Batch BGD0195 - EPA 5030 Soil MS

##### Blank (BGD0195-BLK1)

Prepared: 04/07/23 Analyzed: 04/08/23

Acenaphthene	ND	0.00500	mg/kg							
Anthracene	ND	0.00500	"							
Benzo (a) anthracene	ND	0.00500	"							
Benzo (a) pyrene	ND	0.00500	"							
Benzo (b) fluoranthene	ND	0.00500	"							
Benzo (k) fluoranthene	ND	0.00500	"							
Chrysene	ND	0.00500	"							
Dibenz (a,h) anthracene	ND	0.00500	"							
Fluoranthene	ND	0.00500	"							
Fluorene	ND	0.00500	"							
Indeno (1,2,3-cd) pyrene	ND	0.00500	"							
Pyrene	ND	0.00500	"							
1-Methylnaphthalene	ND	0.00500	"							
2-Methylnaphthalene	ND	0.00500	"							
Surrogate: 2-Methylnaphthalene-d10	0.0371		"	0.0333		111	40-150			
Surrogate: Fluoranthene-d10	0.0354		"	0.0333		106	40-150			

##### LCS (BGD0195-BS1)

Prepared: 04/07/23 Analyzed: 04/08/23

Acenaphthene	0.0321	0.00500	mg/kg	0.0333	96.3	31-137
Anthracene	0.0309	0.00500	"	0.0333	92.8	30-120
Benzo (a) anthracene	0.0373	0.00500	"	0.0333	112	30-120
Benzo (a) pyrene	0.0315	0.00500	"	0.0333	94.4	30-120
Benzo (b) fluoranthene	0.0307	0.00500	"	0.0333	92.1	30-120
Benzo (k) fluoranthene	0.0271	0.00500	"	0.0333	81.3	30-120
Chrysene	0.0261	0.00500	"	0.0333	78.4	30-120
Dibenz (a,h) anthracene	0.0263	0.00500	"	0.0333	78.9	30-120
Fluoranthene	0.0306	0.00500	"	0.0333	91.9	30-120
Fluorene	0.0317	0.00500	"	0.0333	95.0	30-120
Indeno (1,2,3-cd) pyrene	0.0323	0.00500	"	0.0333	96.9	30-120
Pyrene	0.0330	0.00500	"	0.0333	99.0	35-142
1-Methylnaphthalene	0.0390	0.00500	"	0.0333	117	35-142
2-Methylnaphthalene	0.0380	0.00500	"	0.0333	114	35-142
Surrogate: 2-Methylnaphthalene-d10	0.0390		"	0.0333	117	40-150
Surrogate: Fluoranthene-d10	0.0343		"	0.0333	103	40-150

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240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

## PAH by EPA Method 8270D SIM - Quality Control

### Summit Scientific

Analyte	Reporting			Spike Level	Source		%REC		RPD	
	Result	Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGD0195 - EPA 5030 Soil MS

##### Matrix Spike (BGD0195-MS1)

Source: 2304020-01

Prepared: 04/07/23 Analyzed: 04/08/23

Acenaphthene	0.0227	0.00500	mg/kg	0.0333	ND	68.0	31-137		
Anthracene	0.0218	0.00500	"	0.0333	ND	65.5	30-120		
Benzo (a) anthracene	0.0287	0.00500	"	0.0333	ND	86.2	30-120		
Benzo (a) pyrene	0.0175	0.00500	"	0.0333	ND	52.4	30-120		
Benzo (b) fluoranthene	0.0145	0.00500	"	0.0333	ND	43.5	30-120		
Benzo (k) fluoranthene	0.0177	0.00500	"	0.0333	ND	53.1	30-120		
Chrysene	0.0182	0.00500	"	0.0333	ND	54.5	30-120		
Dibenz (a,h) anthracene	0.0159	0.00500	"	0.0333	ND	47.6	30-120		
Fluoranthene	0.0258	0.00500	"	0.0333	ND	77.4	30-120		
Fluorene	0.0225	0.00500	"	0.0333	ND	67.5	30-120		
Indeno (1,2,3-cd) pyrene	0.0141	0.00500	"	0.0333	ND	42.2	30-120		
Pyrene	0.0184	0.00500	"	0.0333	ND	55.2	35-142		
1-Methylnaphthalene	0.0298	0.00500	"	0.0333	ND	89.3	15-130		
2-Methylnaphthalene	0.0350	0.00500	"	0.0333	ND	105	15-130		
Surrogate: 2-Methylnaphthalene-d10	0.0300		"	0.0333		90.1	40-150		
Surrogate: Fluoranthene-d10	0.0316		"	0.0333		94.9	40-150		

##### Matrix Spike Dup (BGD0195-MSD1)

Source: 2304020-01

Prepared: 04/07/23 Analyzed: 04/08/23

Acenaphthene	0.0240	0.00500	mg/kg	0.0333	ND	71.9	31-137	5.57	30
Anthracene	0.0243	0.00500	"	0.0333	ND	72.9	30-120	10.8	30
Benzo (a) anthracene	0.0327	0.00500	"	0.0333	ND	98.1	30-120	13.0	30
Benzo (a) pyrene	0.0193	0.00500	"	0.0333	ND	57.9	30-120	9.89	30
Benzo (b) fluoranthene	0.0167	0.00500	"	0.0333	ND	50.1	30-120	14.2	30
Benzo (k) fluoranthene	0.0195	0.00500	"	0.0333	ND	58.4	30-120	9.51	30
Chrysene	0.0197	0.00500	"	0.0333	ND	59.0	30-120	8.03	30
Dibenz (a,h) anthracene	0.0154	0.00500	"	0.0333	ND	46.1	30-120	3.06	30
Fluoranthene	0.0281	0.00500	"	0.0333	ND	84.3	30-120	8.54	30
Fluorene	0.0239	0.00500	"	0.0333	ND	71.7	30-120	6.12	30
Indeno (1,2,3-cd) pyrene	0.0150	0.00500	"	0.0333	ND	45.1	30-120	6.72	30
Pyrene	0.0205	0.00500	"	0.0333	ND	61.5	35-142	10.8	30
1-Methylnaphthalene	0.0311	0.00500	"	0.0333	ND	93.2	15-130	4.26	50
2-Methylnaphthalene	0.0371	0.00500	"	0.0333	ND	111	15-130	5.63	50
Surrogate: 2-Methylnaphthalene-d10	0.0309		"	0.0333		92.8	40-150		
Surrogate: Fluoranthene-d10	0.0349		"	0.0333		105	40-150		

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Total Metals by EPA 6020B Hot Water Soluble Extraction - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0119 - EPA 3050B**

**Blank (BGD0119-BLK1)**

Prepared: 04/05/23 Analyzed: 04/07/23

Boron ND 0.0100 mg/L

**LCS (BGD0119-BS1)**

Prepared: 04/05/23 Analyzed: 04/07/23

Boron 4.84 0.0100 mg/L 5.00 96.7 80-120

**Duplicate (BGD0119-DUP1)**

Source: 2303778-01

Prepared: 04/05/23 Analyzed: 04/07/23

Boron 0.0298 0.0100 mg/L 0.0354 17.2 20

**Matrix Spike (BGD0119-MS1)**

Source: 2303778-01

Prepared: 04/05/23 Analyzed: 04/07/23

Boron 4.81 0.0100 mg/L 5.00 0.0354 95.5 75-125

**Matrix Spike Dup (BGD0119-MSD1)**

Source: 2303778-01

Prepared: 04/05/23 Analyzed: 04/07/23

Boron 4.64 0.0100 mg/L 5.00 0.0354 92.1 75-125 3.55 25

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Total Metals by EPA 6020B - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0154 - EPA 3050B**

**Blank (BGD0154-BLK1)**

Prepared: 04/06/23 Analyzed: 04/07/23

Arsenic	ND	0.200	mg/kg wet
Arsenic	ND	0.200	"
Barium	ND	0.400	"
Barium	ND	0.400	"
Cadmium	ND	0.200	"
Copper	ND	0.400	"
Lead	ND	0.200	"
Nickel	ND	0.400	"
Selenium	ND	0.260	"
Silver	ND	0.0200	"
Zinc	ND	0.400	"

**LCS (BGD0154-BS1)**

Prepared: 04/06/23 Analyzed: 04/07/23

Arsenic	41.6	0.200	mg/kg wet	40.0	104	80-120
Arsenic	41.6	0.200	"	40.0	104	80-120
Barium	42.6	0.400	"	40.0	107	80-120
Barium	42.6	0.400	"	40.0	107	80-120
Cadmium	2.15	0.200	"	2.00	107	80-120
Copper	45.3	0.400	"	40.0	113	80-120
Lead	21.1	0.200	"	20.0	106	80-120
Nickel	44.5	0.400	"	40.0	111	80-120
Selenium	4.69	0.260	"	4.00	117	80-120
Silver	2.12	0.0200	"	2.00	106	80-120
Zinc	43.9	0.400	"	40.0	110	80-120

**Duplicate (BGD0154-DUP1)**

Source: 2304030-01

Prepared: 04/06/23 Analyzed: 04/07/23

Arsenic	4.83	0.228	mg/kg dry	5.24	7.98	20
Arsenic	4.83	0.200	"	5.24	7.98	20
Barium	137	0.400	"	130	5.00	20
Barium	137	0.456	"	130	5.00	20
Cadmium	0.191	0.228	"	0.242	23.6	20
Copper	5.49	0.456	"	5.76	4.77	20
Lead	9.75	0.228	"	10.6	8.11	20
Nickel	6.49	0.456	"	7.24	11.0	20
Selenium	ND	0.260	"	ND		20
Silver	0.0415	0.0228	"	0.0474	13.3	20
Zinc	25.1	0.456	"	26.1	3.76	20

QR-01

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*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.*



Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Total Metals by EPA 6020B - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source	%REC		RPD		
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0154 - EPA 3050B**

Matrix Spike (BGD0154-MS1)		Source: 2304030-01			Prepared: 04/06/23		Analyzed: 04/07/23				
Arsenic	42.0	0.228	mg/kg dry	45.6	5.24	80.5	75-125				
Arsenic	42.0	0.200	"	45.6	5.24	80.5	75-125				
Barium	156	0.400	"	45.6	130	55.3	75-125				QM-05
Barium	156	0.456	"	45.6	130	55.3	75-125				QM-05
Cadmium	2.31	0.228	"	2.28	0.242	90.6	75-125				
Copper	31.4	0.456	"	45.6	5.76	56.2	75-125				QM-05
Lead	29.7	0.228	"	22.8	10.6	83.8	75-125				
Nickel	32.5	0.456	"	45.6	7.24	55.5	75-125				QM-05
Selenium	3.35	0.260	"	4.56	ND	73.4	75-125				QM-05
Silver	2.13	0.0228	"	2.28	0.0474	91.2	75-125				
Zinc	50.4	0.456	"	45.6	26.1	53.3	75-125				QM-05

Matrix Spike Dup (BGD0154-MSD1)		Source: 2304030-01			Prepared: 04/06/23		Analyzed: 04/07/23				
Arsenic	42.3	0.200	mg/kg dry	45.6	5.24	81.3	75-125	0.805	25		
Arsenic	42.3	0.228	"	45.6	5.24	81.3	75-125	0.805	25		
Barium	156	0.456	"	45.6	130	57.4	75-125	0.594	25		QM-05
Barium	156	0.400	"	45.6	130	57.4	75-125	0.594	25		QM-05
Cadmium	2.29	0.228	"	2.28	0.242	89.7	75-125	0.913	25		
Copper	31.2	0.456	"	45.6	5.76	55.7	75-125	0.786	25		QM-05
Lead	29.9	0.228	"	22.8	10.6	84.9	75-125	0.889	25		
Nickel	32.3	0.456	"	45.6	7.24	54.9	75-125	0.842	25		QM-05
Selenium	3.36	0.260	"	4.56	ND	73.7	75-125	0.449	25		QM-05
Silver	2.12	0.0228	"	2.28	0.0474	90.9	75-125	0.236	25		
Zinc	49.9	0.456	"	45.6	26.1	52.2	75-125	1.01	25		QM-05

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Hexavalent Chromium by EPA Method 7196 - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0183 - 3060A Mod**

**Blank (BGD0183-BLK1)**

Prepared & Analyzed: 04/06/23

Chromium, Hexavalent ND 0.30 mg/kg wet

**LCS (BGD0183-BS1)**

Prepared & Analyzed: 04/06/23

Chromium, Hexavalent 25.0 0.30 mg/kg wet 25.0 100 80-120

**Duplicate (BGD0183-DUP1)**

**Source: 2302502-01**

Prepared & Analyzed: 04/06/23

Chromium, Hexavalent ND 0.30 mg/kg dry ND 20

**Matrix Spike (BGD0183-MS1)**

**Source: 2302502-01**

Prepared & Analyzed: 04/06/23

Chromium, Hexavalent 27.0 0.30 mg/kg dry 28.1 ND 96.2 75-125

**Matrix Spike Dup (BGD0183-MSD1)**

**Source: 2302502-01**

Prepared & Analyzed: 04/06/23

Chromium, Hexavalent 27.3 0.30 mg/kg dry 28.1 ND 97.4 75-125 1.24 20

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Soluble Nutrients by EPA 6020/USDA60 6(2) - Saturated Paste Extraction - Quality Control**  
**Summit Scientific**

Analyte	Reporting			Spike	Source		%REC		RPD	
	Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0257 - General Preparation**

**Blank (BGD0257-BLK1)**

Prepared: 04/09/23 Analyzed: 04/11/23

Calcium	ND	0.0500	mg/L wet
Magnesium	ND	0.0500	"
Sodium	ND	0.0500	"

**LCS (BGD0257-BS1)**

Prepared: 04/09/23 Analyzed: 04/11/23

Calcium	4.53	0.0500	mg/L wet	5.00	90.6	70-130
Magnesium	4.95	0.0500	"	5.00	98.9	70-130
Sodium	4.90	0.0500	"	5.00	98.1	70-130

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

### Physical Parameters by APHA/ASTM/EPA Methods - Quality Control

#### Summit Scientific

Analyte	Result	Reporting		Spike Level	Source		%REC		RPD	
		Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

#### Batch BGD0185 - General Preparation

**Duplicate (BGD0185-DUP1)**

**Source: 2304025-21**

Prepared: 04/06/23 Analyzed: 04/07/23

% Solids	85.1	%	84.8	0.448	20
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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A  
Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Specific Conductance by EPA Method 120.1, Saturated Paste Extraction - Quality Control**  
**Summit Scientific**

Analyte	Result	Reporting		Spike Level	Source		%REC		RPD	
		Limit	Units		Result	%REC	Limits	RPD	Limit	Notes

**Batch BGD0275 - General Preparation**

**Blank (BGD0275-BLK1)**

Prepared & Analyzed: 04/10/23

Specific Conductance (EC) ND 0.0100 mmhos/cm

**LCS (BGD0275-BS1)**

Prepared & Analyzed: 04/10/23

Specific Conductance (EC) 0.150 0.0100 mmhos/cm 0.150 99.7 95-105

**Duplicate (BGD0275-DUP1)**

**Source: 2304026-01**

Prepared & Analyzed: 04/10/23

Specific Conductance (EC) 2.98 0.0100 mmhos/cm 2.92 2.07 20

Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction, CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

**Physical Parameters by APHA/ASTM/EPA Methods, Saturated Paste Extraction - Quality Control**

**Summit Scientific**

Analyte	Result	Reporting		Spike Level	Source Result	%REC		RPD		Notes
		Limit	Units			%REC	Limits	RPD	Limit	

**Batch BGD0274 - General Preparation**

**LCS (BGD0274-BS1)**

Prepared & Analyzed: 04/10/23

pH	9.12	pH Units	9.18	99.3	95-105
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**Duplicate (BGD0274-DUP1)**

Source: 2304025-21

Prepared & Analyzed: 04/10/23

pH	7.63	pH Units	7.56	0.922	20
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Summit Scientific

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Entrada Consulting Group  
240 Mesa Avenue  
Grand Junction. CO, 81501

Project: PDC - Margil 34A

Project Number: [none]  
Project Manager: Ben Baugh

**Reported:**  
04/12/23 13:24

### Notes and Definitions

QR-01	Analyses are not controlled on RPD values from sample concentrations less than 10 times the reporting limit. QC batch accepted based on LCS and/or LCSD QC results.
QM-05	The spike recovery was outside acceptance limits for the MS and/or MSD due to matrix interference. The associated LCS and/or LCSD were within acceptance limits, therefore the data are considered valid.
DET	Analyte DETECTED
ND	Analyte NOT DETECTED at or above the reporting limit
NR	Not Reported
dry	Sample results reported on a dry weight basis
RPD	Relative Percent Difference