

Third Quarter 2020 Groundwater Monitoring and Activities Summary Report

Burton Flats Booster Station
Eddy County, New Mexico
#2R799

Prepared for:



370 17th St., Suite 2500
Denver, CO 802

Prepared by:



6855 W. 119th Ave.
Broomfield, Colorado 80020

October 29, 2020

Table of Contents

1. Introduction	1
2. Site Location and Background.....	1
3. Groundwater Monitoring.....	1
3.1 Groundwater and LNAPL Elevation Monitoring	2
3.2 Groundwater Quality Monitoring	2
3.3 Data Quality Assurance / Quality Control.....	3
4. Remediation Activities	4
5. Conclusions	4
6. Recommendations	5

Tables

- | | |
|---|---|
| 1 | Third Quarter 2020 Summary of Groundwater Elevation Data |
| 2 | Third Quarter 2020 Summary of BTEX and Chloride Concentrations in Groundwater |

Figures

- | | |
|---|--|
| 1 | Site Location |
| 2 | Site Map with Monitoring Well Locations |
| 3 | Groundwater Elevation Map – September 15, 2020 |
| 4 | Analytical Results Map – September 15, 2020 |

Appendices

- | | |
|---|---|
| A | Historical Analytical Results – BTEX and Chloride Concentrations in Groundwater |
| B | Laboratory Analytical Reports |
| | - Pace Analytical Job #: L 1264952 |

1. Introduction

This report summarizes groundwater monitoring and remediation activities conducted during the third quarter 2020 at the Burton Flats Booster Station (Site) in Eddy County, New Mexico (Figure 1). Tasman Geosciences (Tasman) performed these activities on behalf of DCP Midstream, LP (DCP). Field activities were conducted with the purpose of monitoring groundwater flow and quality conditions and assessing the presence of light non-aqueous phase liquid (LNAPL) hydrocarbons in the Site subsurface. Current Site conditions were evaluated from field data and laboratory analytical results collected on September 15, 2020.

2. Site Location and Background

The Site is located in the Fourth and Fifth Lots of Section 1, Township 21 South, Range 27 East (approximate coordinates 32.5195 degrees north and 104.1507 degrees west). It is approximately 3.4 miles northwest of the intersection of US Highway 62 and County Road 243. The area is sparsely populated, and land use is primarily associated with livestock grazing and oil and gas production and gathering.

Based on information included in historical Site investigation reports, a release of approximately 10 barrels (bbl) of oil and produced water occurred on October 5, 2009, of which approximately 8 bbls were recovered from within the tank secondary containment area. The C-141 report was submitted on October 12, 2009, and Site investigation and soil sampling within the release area occurred during the third quarter of 2009 and early fourth quarter of 2010 (BH-1 through BH-5). Elevated levels of petroleum hydrocarbons within the soil were encountered at depths of 20-feet below ground surface (bgs). Groundwater was encountered between 16-feet and 20-feet bgs during Site characterization activities. Subsequent to soil investigation efforts, four groundwater monitoring wells were installed around and down-gradient from the release area during the fourth quarter of 2011 (MW-1 through MW-4). Elevated petroleum hydrocarbon concentrations in soil were observed during well installation. Consequently, two additional soil borings were completed to a depth of 20 feet bgs in the suspected source area (SB 11-1 and SB 11-2). Monitoring well locations are shown in Figure 2.

Boring logs for the Site monitoring wells indicate that the subsurface geology contains unconsolidated fine-grained sand, silt, and clay sediments. This general characteristic has been utilized in evaluating the historical and current LNAPL behavior. Ongoing monitoring and sampling of the four (4) Site monitoring wells listed above has been conducted on a quarterly basis following installation.

3. Groundwater Monitoring

This section describes the field and laboratory activities performed during the third quarter 2020 groundwater monitoring event. Quarterly monitoring activities were conducted on September 15, 2020, which included Site-wide groundwater gauging, LNAPL measurements, and groundwater sampling. Figure 2 illustrates the groundwater monitoring network (MW-1 through MW-4) utilized to perform these activities at the Site.

3.1 Groundwater and LNAPL Elevation Monitoring

Groundwater and LNAPL levels are measured in order to evaluate hydraulic characteristics and provide information regarding seasonal fluctuations of groundwater and LNAPL elevations at the Site. During the third quarter 2020, groundwater levels were measured at four (4) Site monitoring well locations (MW-1 through MW-4).

Groundwater levels were measured on the north side of the well casing to the nearest 0.01-foot using an oil-water interface probe (IP). Groundwater level data was subsequently converted to elevation (feet above mean sea level [AMSL]). Measured groundwater levels, LNAPL measurements, and calculated groundwater elevations are presented in Table 1.

A third quarter 2020 groundwater elevation contour map, included as Figure 3, indicates that the groundwater gradient at the Site trends to the West-northwest which is consistent with the previous three quarterly monitoring events, and with historical trends prior to second quarter 2016 at the Site. Although this is inconsistent with the trends between second quarter 2016 to first quarter 2019. It is our opinion that an unchecked QA/QC error was made during the data entry in the second quarter 2016 and was not fixed during subsequent reports, leading to an irregular hydraulic gradient direction at the Site. The corrected groundwater elevation ranges, average elevation change from the previous monitoring event, and the calculated hydraulic gradient at the Site are summarized in the table below.

Summary of Measured Hydraulic Parameters

	Third Quarter 2020 (9/15/2020)
Maximum Elevation (Well ID)	3,177.46 ft (MW-3)
Minimum Elevation (Well ID)	3,177.14 ft (MW-1)
Average Change from Previous Monitoring Event	-0.36 ft
Hydraulic Gradient / (Well IDs)	0.0022 ft/ft (MW-3 to MW-1)

LNAPL was observed at MW-4 during the third quarter 2020, however, based on the field data collected, LNAPL thickness could not be calculated. Historically, the presence of LNAPL at this location has fluctuated since 2015.

3.2 Groundwater Quality Monitoring

Subsequent to recording groundwater level measurements at each monitoring well, groundwater samples were collected from three (3) of the four (4) locations (MW-1 through MW-3). A minimum of three well casing volumes of groundwater were purged from each monitoring well prior to collection of groundwater samples. Due to the presence of LNAPL observed at MW-4, no groundwater sample was collected at this location.

Groundwater samples were collected using disposable polyethylene bailers, placed in clean laboratory supplied containers, packed in an ice-filled cooler and maintained at approximately four (4) degrees Celsius (°C) for transportation to the laboratory. Groundwater samples were then shipped under chain-of-custody procedures to Pace Analytical laboratory in Mount Juliet, Tennessee (Pace).

Water quality samples were submitted for analysis of benzene, toluene, ethylbenzene, and total xylenes (BTEX) by United States Environmental Protection Agency (USEPA) Method 8260B and chloride by USEPA Method 9056A.

Table 2 summarizes BTEX and chloride concentrations in groundwater samples collected during the reporting period. Historical laboratory analytical results up to and including the September 2020 event are provided in Appendix A and the laboratory analytical report for the third quarter 2020 event is included in Appendix B. The laboratory analytical results are also displayed on Figure 4.

Third quarter 2020 field observations and analytical results for samples collected from MW-1 through MW-3 indicate the following:

- Benzene was detected in exceedance of the updated NMWQCC groundwater standard of 0.005 mg/L (effective 7/1/2020) in MW-1 (0.03230/L, and 0.03370 mg/L [Duplicate]). Benzene was not detected above the NMWQCC groundwater standard or reported detection limit at MW-2 (<0.0010 mg/L) and MW-3 (0.000102 J mg/L).
- Toluene was not detected above the NMWQCC groundwater standard of 1.0 mg/L in any of the sampled Site monitoring wells.
- Ethylbenzene was not detected above the NMWQCC groundwater standard of 0.75 mg/L in any of the sampled Site monitoring wells.
- Total xylenes were not detected above the NMWQCC groundwater standard of 0.62 mg/L in any of the analyzed Site monitoring wells.
- Chloride was detected in exceedance of the NMWQCC secondary maximum contaminant level (SMCL) guideline of 250 mg/L at all sampled monitoring well locations with concentrations ranging from 403 mg/L at MW-3 to 2,650 mg/L at MW-2.

3.3 Data Quality Assurance / Quality Control

A trip blank and field duplicate sample (MW-1) was collected during the sampling event. The data were reviewed for compliance with the analytical method and the associated quality assurance/quality control (QA/QC) procedures. All samples were analyzed using the correct analytical methods and within the correct holding times. Chain of custody forms were in order and properly executed indicating that samples were received with no headspace. All data were reported using the correct method number and reporting units. QA/QC items of note for the second quarter 2020 include the following:

- The trip blank was fully in control, having no detection of target analytes.

- The parent sample collected from MW-1 and the associated duplicate sample exhibited Benzene concentrations of 0.03230 mg/L and 0.03370 mg/L, respectively, yielding a relative percent difference (RPD) of 2.8 which is within the target range of 20%.
- Subsequent to collection of the third quarter 2020 groundwater samples, the sample transport coolers were properly packaged with ice and shipped to Pace laboratory in Mount Juliet, Tennessee with priority overnight shipping. All coolers were received within laboratory temperature specifications as well as Chain of Custody (COC) forms properly executed.

Based on the data review, the QA/QC assessment indicates that overall data precision and accuracy are within acceptable limits.

4. Remediation Activities

Remediation activities conducted during the third quarter 2020 reporting period include vacuum enhanced fluid recovery (EFR) activities. EFR events were initiated in December 2014, started on a bi-monthly frequency at monitoring wells MW-1 and MW-4 during the fourth quarter 2019 and, are scheduled to continue, pending observation of the effectiveness of the effort in addressing persistent free phase and dissolved phase petroleum hydrocarbons on-Site.

One third quarter 2020 EFR event was conducted at the site on September 15, 2020, which included application of high vacuum (utilizing a vacuum truck) at MW-1 and MW-4 through flexible hosing inserted into each well. The stingers were placed slightly below the current groundwater level to facilitate removal of groundwater, LNAPL, and vapors from the subsurface. Approximately 15 bbls (630 gallons) of fluid was recovered during the third quarter 2020 EFR event.

A passive LNAPL skimmer was installed in MW-4 in an effort to collect and dispose of free-phase liquids in between groundwater sampling and EFR events. Between the second and third quarter 2020 sampling and EFR event, the skimmer collected approximately 0.20 gallons of product. The passive LNAPL skimmer was reinstalled after the September 15, 2020 EFR event.

5. Conclusions

Evaluation of the third quarter 2020 monitoring data and historical information provides the following general observations:

- Groundwater elevations at the Site indicated an overall decrease compared to the levels that were observed during the second quarter 2020.
- LNAPL was observed at monitoring well MW-4 during the third quarter 2020. The presence of LNAPL at this location has historically fluctuated since 2015.
- BTEX concentrations were detected in exceedance of NMWQCC maximum allowable concentration standards in MW-1 (0.03230 mg/L, and 0.03370 mg/L [Duplicate]).
- Chloride concentrations were above the NMWQCC SMCL guideline at all sampled Site monitoring wells.

6. Recommendations

Based on evaluation of third quarter 2020 and historical Site monitoring results, recommendations for future activities include:

- Continue quarterly groundwater monitoring and sampling at the monitoring locations illustrated on Figure 2.
- Continue bi-monthly EFR event(s) at monitoring wells MW-1 and MW-4 during the fourth quarter 2020.

Tables

TABLE 1
THIRD QUARTER 2020
SUMMARY OF GROUNDWATER ELEVATION DATA
BURTON FLATS BOOSTER STATION
EDDY COUNTY, NEW MEXICO

Location	Date	Depth to Groundwater (feet)	Depth to Product (feet)	Free Phase Hydrocarbon Thickness (LNAPL) (feet)	Total Depth (feet)	TOC Elevation (feet amsl) (2)	Groundwater Elevation (*) (feet amsl)	Change in Groundwater Elevation Since Previous Event ¹ (feet)
MW-1	3/21/2019	19.26			NM	3197.65	3178.39	0.15
MW-1	6/13/2019	19.42			NM	3197.65	3178.23	-0.16
MW-1	9/17/2019	19.96			NM	3197.65	3177.69	-0.54
MW-1	12/9/2019	19.73			NM	3197.65	3177.92	0.23
MW-1	6/19/2020	20.18			NM	3197.65	3177.47	-0.45
MW-1	9/15/2020	20.51			NM	3197.65	3177.14	-0.33
MW-2	3/21/2019	21.67			NM	3200.00	3178.33	0.13
MW-2	6/13/2019	21.82			NM	3200.00	3178.18	-0.15
MW-2	9/17/2019	22.32			NM	3200.00	3177.68	-0.50
MW-2	12/9/2019	22.09			NM	3200.00	3177.91	0.23
MW-2	6/19/2020	22.49			NM	3200.00	3177.51	-0.40
MW-2	9/15/2020	22.84			NM	3200.00	3177.16	-0.35
MW-3	3/21/2019	22.35			NM	3200.84	3178.49	0.11
MW-3	6/13/2019	22.42			NM	3200.84	3178.42	-0.07
MW-3	9/17/2019	22.79			NM	3200.84	3178.05	-0.37
MW-3	12/9/2019	22.70			NM	3200.84	3178.14	0.09
MW-3	6/19/2020	22.98			NM	3200.84	3177.86	-0.28
MW-3	9/15/2020	23.38			NM	3200.84	3177.46	-0.40
MW-4	3/21/2019	23.01	22.36	0.65	NM	3200.98	3178.46	0.16
MW-4	6/13/2019	23.09	22.54	0.55	NM	3200.98	3178.30	-0.16
MW-4	9/17/2019	23.39	23.16	0.23	NM	3200.98	3177.76	-0.54
MW-4	12/9/2019	23.14	22.75	0.39	NM	3200.98	3178.15	0.39
MW-4	6/19/2020	NM	23.20	NC	NM	3200.98	NC	NC
MW-4	9/15/2020	NM	24.65	NC	NM	3200.98	NC	NC
Average change in groundwater elevation (6/19/20 to 9/15/20)								-0.36

Notes:

1- Changes in groundwater elevation calculated by subtracting the measurement collected during the previous monitoring event from the measurement collected during the most recent monitoring event.

2- The TOC elevation for MW-1 through MW-4 have been calculated based on a relative elevation re-survey conducted on 8/7/2015

amsl = feet above mean sea level

TOC = top of casing

LNAPL - Light non-aqueous phase liquid

Groundwater elevation = (TOC Elevation - Measured Depth to Water)

*Groundwater elevation was corrected for product thickness using the following calculation, when applicable

Groundwater elevation = (TOC Elevation - Measured Depth to Water) + (LNAPL Thickness in Well * LNAPL Relative Density

LNAPL relative density was calculated to be approximately 0.792 grams per cubic centimeter (g/cm³)

NM = Not measured.

NC= Not calculated.

TABLE 2
THIRD QUARTER 2020
SUMMARY OF BTEX AND CHLORIDE CONCENTRATIONS IN GROUNDWATER
BURTON FLATS BOOSTER STATION
EDDY COUNTY, NEW MEXICO

Location Identification	Sample Date	Benzene (mg/l)	Toluene (mg/l)	Ethylbenzene (mg/l)	Total Xylenes (mg/l)	Chlorides (mg/l)	Comments
NMWQCC Groundwater Standards (mg/L)		0.005	1.00	0.70	0.62	250	
MW-1	9/15/2020	0.03230	<0.00100	0.01110	0.000948 J	771	Duplicate Sample Collected
MW-1 (Duplicate)	9/15/2020	0.03370	<0.00100	0.01260	0.00111 J	751	
MW-2	9/15/2020	<0.0010	<0.00100	<0.0010	<0.0030	2,650	
MW-3	9/15/2020	0.000102 J	<0.00100	<0.0010	<0.0030	403	
MW-4	9/15/2020	LNAPL					LNAPL
Trip Blank	9/15/2020	0.000104 J	<0.0010	<0.0010	0.000235 J	NA	

Notes:

Bold red values indicate an exceedance of the associated NMWQCC standard (Effective 7/1/2020) or, for chlorides, the secondary maximum contaminant level (SMCL) which has been established as a guideline in the National Secondary Drinking Water Regulations.

NMWQCC = New Mexico Water Quality Control Commission

LNAPL = Light Non-Aqueous Phase Liquid


NA = Not Analyzed

J = The identification of the analyte is acceptable, the reported value is an estimate.

mg/L = milligrams per liter

Figures



DATE: April 2015	 TASMAN GEOSCIENCES Tasman Geosciences, LLC 6899 Pecos Street - Unit C Denver, CO 80221	DCP Midstream Burton Flats Booster Station Lots 4 and 5, Section 1, Township 21 South, Range 27 East Eddy County, New Mexico	Site Location Map	Figure 1
DESIGNED BY: T. Johansen				
DRAWN BY: D. Arnold				



DATE:	December 2019
DESIGNED BY:	B. Humphrey
DRAWN BY:	L. Martin

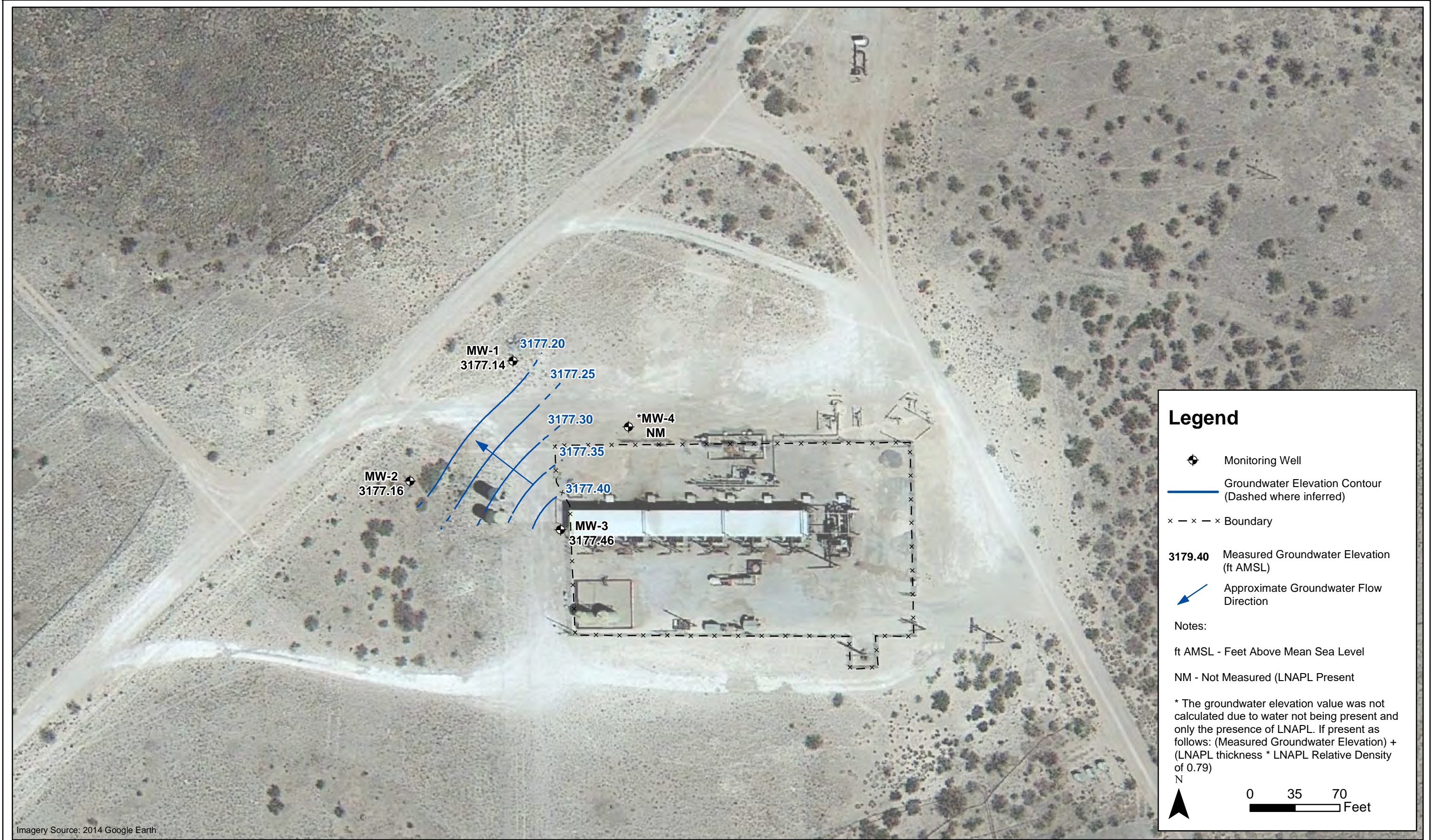


Tasman Geosciences, Inc.
6855 W. 119th Ave
Broomfield, CO 80020

DCP Midstream
Burton Flats Booster Station
Third Quarter 2020 Groundwater Monitoring
Summary Report

Site Map with Monitoring
Well Locations

Figure
2



Imagery Source: 2014 Google Earth

DATE:	October 2020
DESIGNED BY:	B. Humphrey
DRAWN BY:	J. Clonts

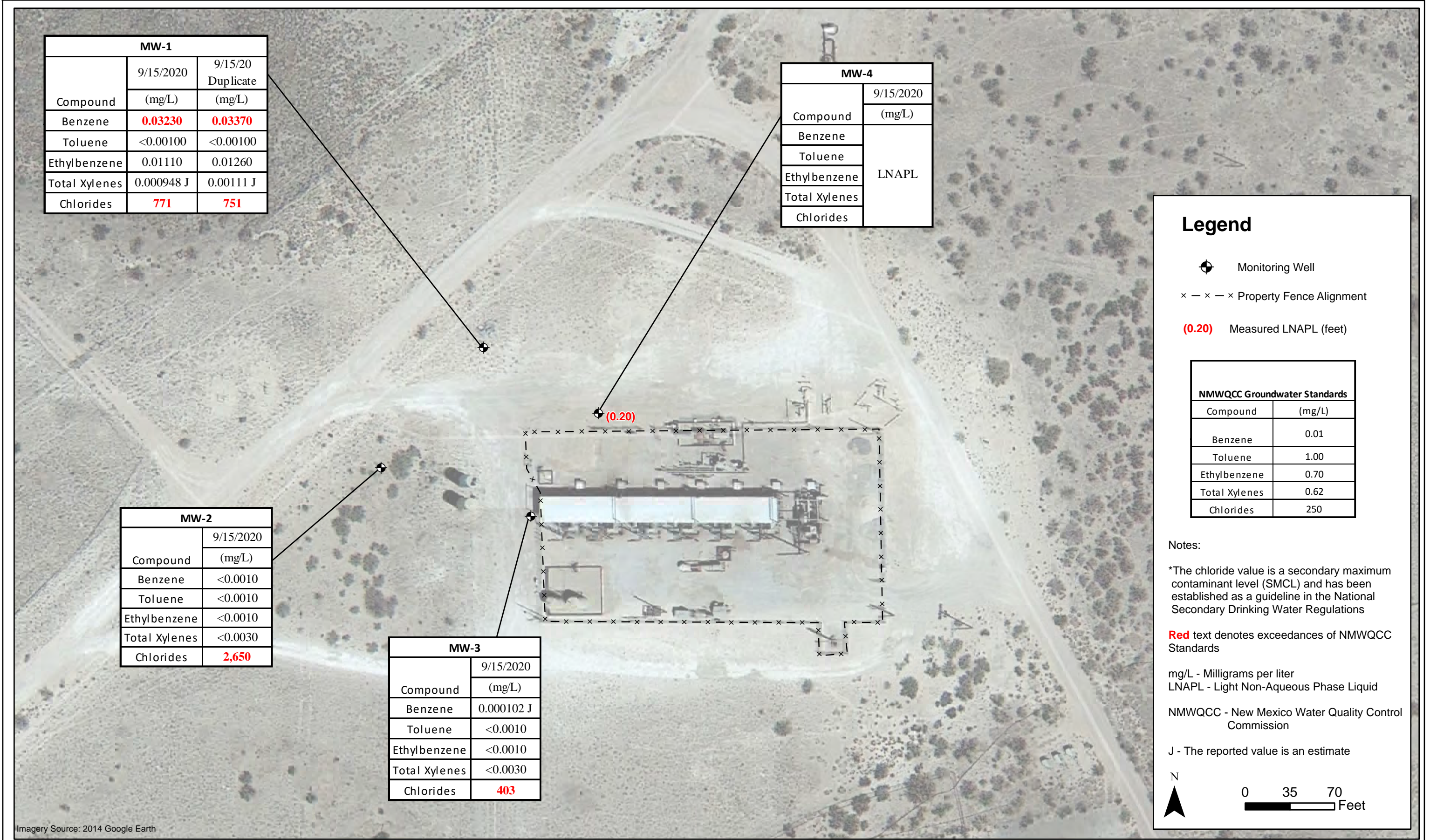


Tasman Geosciences, Inc.
6855 W. 119th Ave
Broomfield, CO 80020

DCP Midstream
Burton Flats Booster Station
Third Quarter 2020 Groundwater Monitoring
Summary Report

Groundwater Elevation
Contour Map
(September 15, 2020)

Figure
3



DATE:	October 2020
DESIGNED BY:	B. Humphrey
DRAWN BY:	J. Clonts



Tasman Geosciences, Inc.
6855 W. 119th Ave
Broomfield, CO 80020

DCP Midstream
Burton Flats Booster Station
Third Quarter 2020 Groundwater Monitoring
Summary Report

Analytical Results
Map
(September 15, 2020)

Figure
4

Appendix A

Historical Analytical Results

APPENDIX A
HISTORICAL ANALYTICAL RESULTS
BTEX AND CHLORIDE CONCENTRATIONS IN GROUNDWATER
BURTON FLATS BOOSTER STATION
EDDY COUNTY, NEW MEXICO

Location Identification	Sample Date	Benzene (mg/l)	Toluene (mg/l)	Ethylbenzene (mg/l)	Total Xylenes (mg/l)	Chlorides (mg/l)	Comments
NMWQCC Groundwater Standards (mg/L)		0.005	1.00	0.70	0.62	250	
MW-1	12/14/2011	0.140	0.0034	0.200	0.111	665	Duplicate sample collected
MW-1	4/26/2012	0.153	<0.001	0.229	0.0073	584	
MW-1	6/20/2012	0.0967	<0.001	0.284	0.0474	651	Duplicate sample collected
MW-1	9/26/2012	0.0615	<0.001	0.0803	0.0015	590	
MW-1	12/5/2012	0.020	<0.001	0.17	0.037	599	
MW-1	2/21/2013	0.0021	<0.001	0.0058	<0.003	668	Duplicate sample collected
MW-1	6/3/2013	0.0049	<0.001	0.0048	<0.001	703	Duplicate sample collected
MW-1	9/11/2013	LNAPL					
MW-1	12/3/2013	LNAPL					
MW-1	2/26/2014	LNAPL					
MW-1	6/2/2014	LNAPL					
MW-1	9/24/2014	Third Quarter 2014 Sampling Suspended - Regional Flooding					
MW-1	12/3/2014	LNAPL					
MW-1	2/27/2015	LNAPL					
MW-1	6/2/2015	LNAPL					
MW-1	8/31/2015	LNAPL					
MW-1	12/15/2015	LNAPL					
MW-1	3/21/2016	0.0450	<0.0010	0.080	0.010	685	
MW-1	6/20/2016	0.082	<0.0010	0.10	0.0072	700	
MW-1	9/26/2016	0.035	<0.0050	0.033	<0.015	705	
MW-1	12/19/2016	0.051	<0.0010	0.040	0.0035	769	
MW-1	3/6/2017	0.044	<0.0010	0.025	0.0012	733	Duplicate sample collected
MW-1 (Duplicate)	3/6/2017	0.054	<0.0010	0.035	0.0014	740	
MW-1	6/19/2017	0.043	<0.0010	0.020	<0.0010	671	
MW-1	9/27/2017	0.00867	<0.0010	0.00359	<0.0030	649	Duplicate Sample Collected
MW-1 (Duplicate)	9/27/2017	0.00958	<0.0010	0.00389	<0.0030	608	
MW-1	12/18/2017	0.0204	<0.0010	0.00522	<0.0030	679	Duplicate Sample Collected
MW-1 (Duplicate)	12/18/2017	0.0179	<0.0010	0.00502	<0.0030	778	
MW-1	3/12/2018	0.0299	<0.0010	0.0199	0.00114 J	764	Duplicate Sample Collected
MW-1 (Duplicate)	3/12/2018	0.0399	<0.0010	0.0230	<0.0030	770	
MW-1	6/25/2018	0.0255	<0.0010	0.0255	<0.0030	623	Duplicate Sample Collected
MW-1 (Duplicate)	6/25/2018	0.0281	<0.0010	0.0277	<0.0030	632	
MW-1	9/17/2018	0.0115	<0.0010	0.0063	<0.0030	668	Duplicate Sample Collected
MW-1 (Duplicate)	9/17/2018	0.0105	<0.0010	0.0060	<0.0030	641	
MW-1	12/10/2018	0.000641 J	<0.0010	0.00115	<0.0030	1,180	Duplicate Sample Collected
MW-1 (Duplicate)	12/10/2018	0.000712 J	<0.0010	0.00126	<0.0030	1,230	
MW-1	3/21/2019	0.0018	<0.0010	0.00159	<0.0030	667	Duplicate Sample Collected
MW-1 (Duplicate)	3/21/2019	0.0026	<0.0010	0.00144	<0.0030	680	
MW-1	6/13/2019	0.0316	<0.0010	0.0232	<0.0030	774	Duplicate Sample Collected
MW-1 (Duplicate)	6/13/2019	0.0294	<0.0010	0.0216	<0.0030	768	
MW-1	9/17/2019	0.00456	<0.0010	0.00219	<0.0030	654	Duplicate Sample Collected
MW-1 (Duplicate)	9/17/2019	0.0059	<0.0010	0.00272	<0.0030	768	
MW-1	12/9/2019	0.00713	<0.0010	0.00789	0.00161 J	681	Duplicate Sample Collected
MW-1 (Duplicate)	12/9/2019	0.00772	<0.0010	0.00827	0.00166 J	684	
MW-1	6/19/2020	0.02780	<0.0010	0.01900	0.00160 J	908	Duplicate Sample Collected
MW-1 (Duplicate)	6/19/2020	0.02770	<0.0010	0.01870	0.00139 J	927	
MW-1	9/15/2020	0.03230	<0.00100	0.01110	0.000948 J	771	Duplicate Sample Collected
MW-1 (Duplicate)	9/15/2020	0.03370	<0.00100	0.01260	0.00111 J	751	

APPENDIX A
HISTORICAL ANALYTICAL RESULTS
BTEX AND CHLORIDE CONCENTRATIONS IN GROUNDWATER
BURTON FLATS BOOSTER STATION
EDDY COUNTY, NEW MEXICO

Location Identification	Sample Date	Benzene (mg/l)	Toluene (mg/l)	Ethylbenzene (mg/l)	Total Xylenes (mg/l)	Chlorides (mg/l)	Comments
NMWQCC Groundwater Standards (mg/L)		0.005	1.00	0.70	0.62	250	
MW-2	12/14/2011	<0.001	<0.001	<0.001	<0.003	1,170	
MW-2	4/26/2012	<0.001	<0.001	<0.001	<0.003	1,040	
MW-2	6/20/2012	<0.001	<0.001	<0.001	<0.003	1,150	
MW-2	9/26/2012	<0.001	<0.001	<0.001	<0.003	1,130	
MW-2	12/5/2012	<0.001	<0.001	<0.001	<0.003	1,120	Duplicate sample collected
MW-2	2/21/2013	<0.001	<0.001	<0.001	<0.003	1,250	
MW-2	6/3/2013	<0.001	<0.001	<0.001	<0.001	1,150	
MW-2	9/11/2013	<0.001	<0.001	<0.001	<0.001	1,410	Duplicate sample collected
MW-2	12/3/2013	<0.001	<0.001	<0.001	<0.001	1,120	Duplicate sample collected
MW-2	2/26/2014	<0.001	<0.001	<0.001	<0.001	1,220	Duplicate sample collected
MW-2 (Duplicate)	2/26/2014	<0.001	<0.001	<0.001	<0.001	1,270	
MW-2	6/2/2014	<0.001	<0.001	<0.001	<0.001	1,270	Duplicate sample collected
MW-2 (Duplicate)	6/2/2014	<0.001	<0.001	<0.001	<0.001	1,290	
MW-2	9/24/2014	Third Quarter 2014 Sampling Suspended - Regional Flooding					
MW-2	12/3/2014	<0.001	<0.001	<0.001	<0.001	1,300	Duplicate sample collected
MW-2 (Duplicate)	12/3/2014	<0.001	<0.001	<0.001	<0.001	1,410	
MW-2	2/27/2015	<0.001	<0.001	<0.001	<0.003	1,440	Duplicate sample collected
MW-2 (Duplicate)	2/27/2015	<0.001	<0.001	<0.001	<0.003	1,440	
MW-2	6/2/2015	<0.001	<0.001	<0.001	<0.003	1,650	Duplicate sample collected
MW-2 (Duplicate)	6/2/2015	<0.001	<0.001	<0.001	<0.003	1,810	
MW-2	8/31/2015	<0.001	<0.001	<0.001	<0.003	1,420	Duplicate sample collected
MW-2 (Duplicate)	8/31/2015	<0.001	<0.001	<0.001	<0.003	1,440	
MW-2	12/15/2015	<0.001	<0.001	<0.001	<0.003	1,350	Duplicate sample collected
MW-2 (Duplicate)	12/15/2015	<0.001	<0.001	<0.001	<0.003	1,350	
MW-2	3/21/2016	<0.0010	<0.0010	<0.0010	<0.0030	1,300	
MW-2	6/20/2016	<0.0010	<0.0010	<0.0010	<0.0030	1,280	
MW-2	9/26/2016	<0.0010	<0.0010	<0.0010	<0.0030	1,310	
MW-2	12/19/2016	<0.0010	<0.0010	<0.0010	<0.0030	1,560	Duplicate sample collected
MW-2 (Duplicate)	12/19/2016	<0.0010	<0.0010	<0.0010	<0.0030	1,350	
MW-2	3/6/2017	<0.0010	<0.0010	<0.0010	<0.0010	1,210	
MW-2	6/19/2017	<0.0010	<0.0010	<0.0010	<0.0010	1,480	
MW-2	9/27/2017	<0.0010	<0.0010	<0.0010	<0.0030	1,530	
MW-2	12/18/2017	<0.0010	<0.0010	<0.0010	<0.0030	1,300	
MW-2	3/12/2018	<0.0010	<0.0010	<0.0010	<0.0030	1,290	
MW-2	6/25/2018	<0.0010	<0.0010	<0.0010	<0.0030	1,490	
MW-2	9/17/2018	<0.0010	<0.0010	<0.0010	<0.0030	2,130	
MW-2	12/10/2018	<0.0010	<0.0010	<0.0010	<0.0030	3,780	
MW-2	3/21/2019	<0.0010	<0.0010	<0.0010	<0.0030	1,380	
MW-2	6/13/2019	<0.0010	<0.0010	<0.0010	<0.0030	1,860	
MW-2	9/17/2019	<0.0010	<0.0010	<0.0010	<0.0030	2,380	
MW-2	12/9/2019	<0.0010	<0.0010	<0.0010	<0.0030	1,870	
MW-2	6/19/2020	<0.0010	<0.0010	<0.0010	<0.0030	2,220	
MW-2	9/15/2020	<0.0010	<0.0010	<0.0010	<0.0030	2,650	

APPENDIX A
HISTORICAL ANALYTICAL RESULTS
BTEX AND CHLORIDE CONCENTRATIONS IN GROUNDWATER
BURTON FLATS BOOSTER STATION
EDDY COUNTY, NEW MEXICO

Location Identification	Sample Date	Benzene (mg/l)	Toluene (mg/l)	Ethylbenzene (mg/l)	Total Xylenes (mg/l)	Chlorides (mg/l)	Comments
NMWQCC Groundwater Standards (mg/L)		0.005	1.00	0.70	0.62	250	
MW-3	12/14/2011	<0.001	<0.001	<0.001	<0.003	426	
MW-3	4/26/2012	<0.001	<0.001	<0.001	<0.003	406	Duplicate sample collected
MW-3	6/20/2012	<0.001	<0.001	<0.001	<0.003	435	
MW-3	9/26/2012	<0.001	<0.001	0.00057	<0.003	447	Duplicate sample collected
MW-3	12/5/2012	<0.001	<0.001	<0.001	<0.003	444	
MW-3	2/21/2013	<0.001	<0.001	<0.001	<0.003	503	
MW-3	6/12/2013	<0.001	<0.001	<0.001	<0.001	474	
MW-3	9/11/2013	<0.001	<0.001	<0.001	<0.001	589	
MW-3	12/3/2013	<0.001	<0.001	<0.001	<0.001	432	
MW-3	2/26/2014	<0.001	<0.001	<0.001	<0.001	484	
MW-3	6/2/2014	<0.001	<0.001	<0.001	<0.001	519	
MW-3	9/24/2014	Third Quarter 2014 Sampling Suspended - Regional Flooding					
MW-3	12/3/2014	<0.001	<0.001	<0.001	<0.001	294	
MW-3	2/27/2015	<0.001	<0.001	<0.001	<0.003	301	
MW-3	6/2/2015	<0.001	<0.001	<0.001	<0.003	384	
MW-3	8/31/2015	<0.001	<0.001	<0.001	<0.003	386	
MW-3	12/15/2015	<0.001	<0.001	<0.001	<0.003	568	
MW-3	3/21/2016	<0.0010	<0.0010	<0.0010	<0.0030	484	Duplicate sample collected
MW-3(Duplicate)	3/21/2016	<0.0010	<0.0010	<0.0010	<0.0030	526	
MW-3	6/20/2016	<0.0010	<0.0010	<0.0010	<0.0030	414	Duplicate sample collected
MW-3 (Duplicate)	6/20/2016	<0.0010	<0.0010	<0.0010	<0.0030	383	
MW-3	9/26/2016	<0.0010	<0.0010	<0.0010	<0.0030	320	Duplicate sample collected
MW-3 (Duplicate)	9/26/2016	<0.0010	<0.0010	<0.0010	<0.0030	324	
MW-3	12/19/2016	<0.0010	<0.0010	<0.0010	<0.0030	285	
MW-3	3/6/2017	<0.0010	<0.0010	<0.0010	<0.0010	466	
MW-3	6/19/2017	<0.0010	<0.0010	<0.0010	<0.0010	247	
MW-3 (Duplicate)	6/19/2017	<0.0010	<0.0010	<0.0010	<0.0010	251	
MW-3	9/27/2017	<0.0010	<0.0010	<0.0010	<0.0030	269	
MW-3	12/18/2017	<0.0010	<0.0010	<0.0010	<0.0030	310	
MW-3	3/12/2018	<0.0010	<0.0010	<0.0010	<0.0030	253	
MW-3	6/25/2018	<0.0010	<0.0010	<0.0010	<0.0030	258	
MW-3	9/17/2018	<0.0010	<0.0010	<0.0010	<0.0030	277	
MW-3	12/10/2018	<0.0010	<0.0010	<0.0010	<0.0030	429	
MW-3	3/21/2019	<0.0010	<0.0010	<0.0010	<0.0030	309	
MW-3	6/13/2019	<0.0010	<0.0010	<0.0010	<0.0030	369	
MW-3	9/17/2019	0.00426	<0.0010	<0.0010	<0.0030	333	
MW-3	12/9/2019	0.00216	<0.0010	<0.0010	<0.0030	339	
MW-3	6/19/2020	0.000240 J	<0.0010	<0.0010	<0.0030	372	
MW-3	9/15/2020	0.000102 J	<0.0010	<0.0010	<0.0030	403	

APPENDIX A
HISTORICAL ANALYTICAL RESULTS
BTEX AND CHLORIDE CONCENTRATIONS IN GROUNDWATER
BURTON FLATS BOOSTER STATION
EDDY COUNTY, NEW MEXICO

Location Identification	Sample Date	Benzene (mg/l)	Toluene (mg/l)	Ethylbenzene (mg/l)	Total Xylenes (mg/l)	Chlorides (mg/l)	Comments
NMWQCC Groundwater Standards (mg/L)		0.005	1.00	0.70	0.62	250	
MW-4	4/26/2012	LNAPL					
MW-4	6/20/2012	LNAPL					
MW-4	9/26/2012	LNAPL					
MW-4	12/5/2012	LNAPL					
MW-4	2/21/2013	LNAPL					
MW-4	6/3/2013	LNAPL					
MW-4	9/11/2013	LNAPL					
MW-4	12/3/2013	LNAPL					
MW-4	2/26/2014	LNAPL					
MW-4	6/2/2014	LNAPL					
MW-4	9/24/2014	Third Quarter 2014 Sampling Suspended - Regional Flooding					
MW-4	12/3/2014	LNAPL					
MW-4	2/27/2015	LNAPL					
MW-4	6/2/2015	LNAPL					
MW-4	8/31/2015	LNAPL					
MW-4	12/15/2015	LNAPL					
MW-4	3/21/2016	0.58	0.17	0.48	0.90	10,700	
MW-4	6/20/2016	0.46	0.16	0.64	1.2	9,700	
MW-4	9/26/2016	0.51	0.14	0.54	1.0	7,780	
MW-4	12/19/2016	0.37	0.12	0.56	0.99	7,530	
MW-4	3/6/2017	0.37	0.086	0.49	0.8	6,370	
MW-4	6/19/2017	0.14	0.035	0.46	0.50	6,420	LNAPL (0.30 feet)
MW-4	9/27/2017	0.104	0.0718	0.706	1.12	7,520	LNAPL (0.24 feet)
MW-4	12/18/2017	0.433	0.0979	0.570	1.12	6,450	LNAPL (0.10 feet)
MW-4	3/12/2018	0.293	0.0641	0.319	0.627	6,160	
MW-4	6/25/2018	LNAPL					LNAPL (0.18 feet)
MW-4	9/17/2018	LNAPL					LNAPL (0.5 feet)
MW-4	12/10/2018	LNAPL					LNAPL (0.59 feet)
MW-4	3/21/2019	LNAPL					LNAPL (0.65 feet)
MW-4	6/13/2019	LNAPL					LNAPL (0.55 feet)
MW-4	9/17/2019	LNAPL					LNAPL (0.23 feet)
MW-4	12/9/2019	LNAPL					LNAPL (0.39 feet)
MW-4	6/19/2020	LNAPL					LNAPL (0.45 feet)
MW-4	9/15/2020	LNAPL					LNAPL (0.20 feet)

APPENDIX A
HISTORICAL ANALYTICAL RESULTS
BTEX AND CHLORIDE CONCENTRATIONS IN GROUNDWATER
BURTON FLATS BOOSTER STATION
EDDY COUNTY, NEW MEXICO

Location Identification	Sample Date	Benzene (mg/l)	Toluene (mg/l)	Ethylbenzene (mg/l)	Total Xylenes (mg/l)	Chlorides (mg/l)	Comments
NMWQCC Groundwater Standards (mg/L)		0.005	1.00	0.70	0.62	250	
Trip Blank	6/2/2014	<0.001	<0.001	<0.001	<0.001	NA	
Trip Blank	12/3/2014	<0.001	<0.001	<0.001	<0.001	NA	
Trip Blank	2/27/2015	<0.001	<0.001	<0.001	<0.003	NA	
Trip Blank	6/2/2015	<0.001	<0.001	<0.001	<0.003	NA	
Trip Blank	8/31/2015	<0.001	<0.001	<0.001	<0.003	NA	
Trip Blank	12/15/2015	<0.001	<0.001	<0.001	<0.003	NA	
Trip Blank	3/21/2016	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	6/20/2016	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	9/26/2016	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	12/19/2016	<0.0010	<0.0010	<0.0010	<0.0010	NA	
Trip Blank	3/6/2017	<0.0010	<0.0010	<0.0010	<0.0010	NA	
Trip Blank	6/19/2017	<0.0010	<0.0010	<0.0010	<0.0010	NA	
Trip Blank	9/27/2017	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	12/18/2017	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	3/12/2018	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	3/12/2018	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	6/25/2018	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	9/17/2018	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	12/10/2018	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	3/21/2019	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	6/13/2019	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	9/17/2019	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	12/9/2019	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	6/19/2020	<0.0010	<0.0010	<0.0010	<0.0030	NA	
Trip Blank	9/15/2020	0.000104 J	<0.0010	<0.0010	0.000235 J	NA	

Notes:

Bold red values indicate an exceedance of the associated NMWQCC standard or, for chlorides, the secondary maximum contaminant level (SMCL) which has been established as a guideline in the National Secondary Drinking Water Regulations.

NMWQCC = New Mexico Water Quality Control Commission

LNAPL = Light Non-Aqueous Phase Liquid

NA = Not Analyzed

J = The identification of the analyte is acceptable, the reported value is an estimate.

mg/L = milligrams per liter

Appendix B

Laboratory Analytical Report

- Pace Analytical Report #: L1264952

October 01, 2020

¹Cp

²Tc

³Ss

⁴Cn

⁵Sr

⁶Qc

⁷Gl

⁸Al

⁹Sc

DCP Midstream - Tasman

Sample Delivery Group: L1264952
Samples Received: 09/17/2020
Project Number:
Description: Burton Flats Booster Station

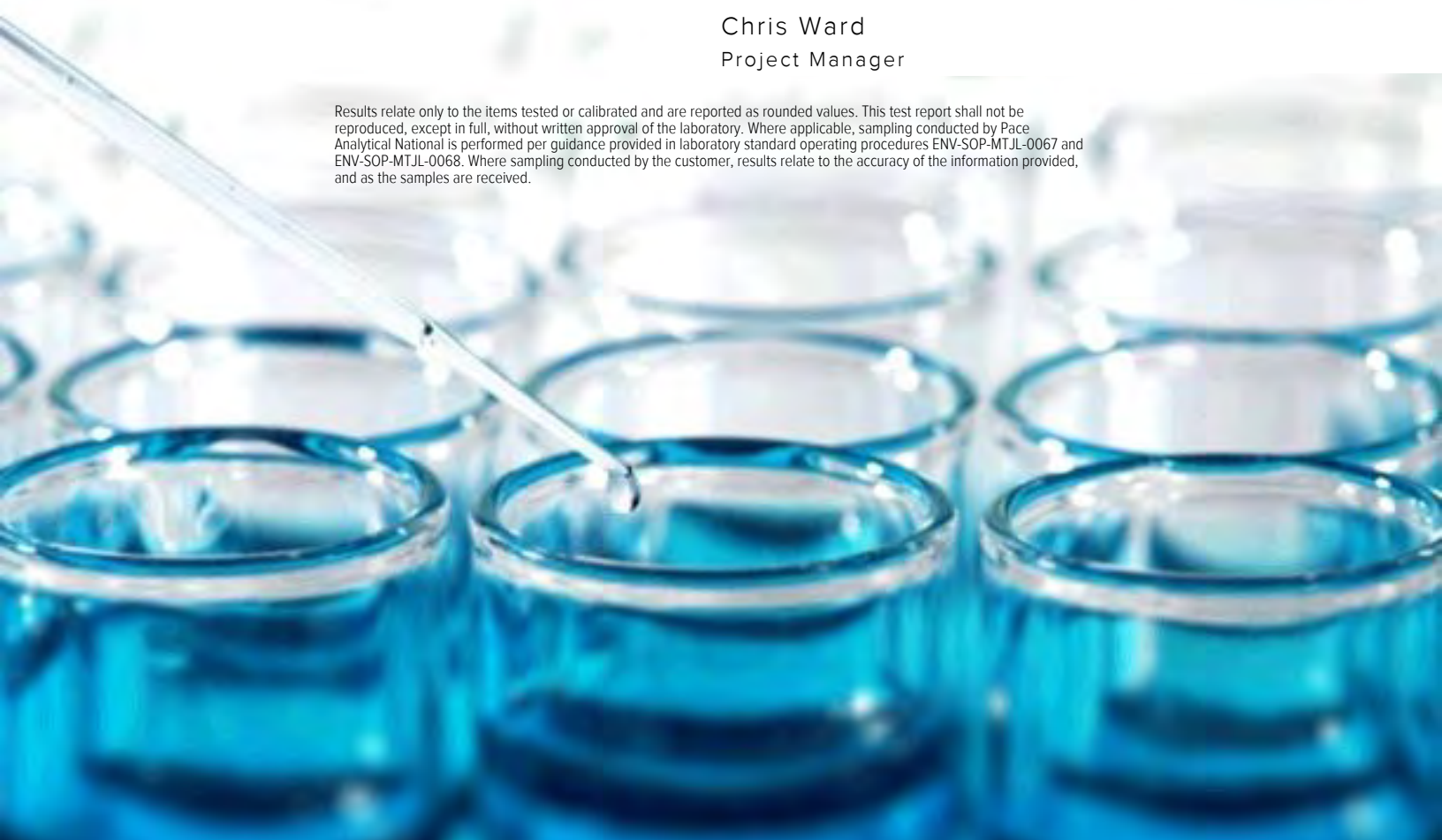
Report To: Nick Kopiasz
2620 W. Marland Blvd
Hobbs, NM 88240

Entire Report Reviewed By:



Chris Ward
Project Manager

Results relate only to the items tested or calibrated and are reported as rounded values. This test report shall not be reproduced, except in full, without written approval of the laboratory. Where applicable, sampling conducted by Pace Analytical National is performed per guidance provided in laboratory standard operating procedures ENV-SOP-MTJL-0067 and ENV-SOP-MTJL-0068. Where sampling conducted by the customer, results relate to the accuracy of the information provided, and as the samples are received.





Cp: Cover Page	1
Tc: Table of Contents	2
Ss: Sample Summary	3
Cn: Case Narrative	4
Sr: Sample Results	5
MW-1 L1264952-01	5
MW-2 L1264952-02	6
MW-3 L1264952-03	7
DUPLICATE L1264952-04	8
TRIP BLANK L1264952-05	9
Qc: Quality Control Summary	10
Wet Chemistry by Method 9056A	10
Volatile Organic Compounds (GC/MS) by Method 8260B	11
Gl: Glossary of Terms	12
Al: Accreditations & Locations	13
Sc: Sample Chain of Custody	14





MW-1 L1264952-01 GW

				Collected by	Collected date/time	Received date/time
					09/15/20 09:50	09/17/20 09:30
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1549114	20	09/29/20 01:53	09/29/20 01:53	ELN	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1550952	1	09/29/20 10:06	09/29/20 10:06	ACG	Mt. Juliet, TN

¹ Cp² Tc³ Ss

MW-2 L1264952-02 GW

				Collected by	Collected date/time	Received date/time
					09/15/20 10:30	09/17/20 09:30
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1549114	100	09/29/20 02:06	09/29/20 02:06	ELN	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1550952	1	09/29/20 10:25	09/29/20 10:25	ACG	Mt. Juliet, TN

⁴ Cn⁵ Sr⁶ Qc

MW-3 L1264952-03 GW

				Collected by	Collected date/time	Received date/time
					09/15/20 11:20	09/17/20 09:30
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1549114	10	09/29/20 02:45	09/29/20 02:45	ELN	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1550952	1	09/29/20 10:44	09/29/20 10:44	ACG	Mt. Juliet, TN

⁷ Gl⁸ Al⁹ Sc

DUPLICATE L1264952-04 GW

				Collected by	Collected date/time	Received date/time
					09/15/20 08:00	09/17/20 09:30
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1549114	20	09/29/20 02:58	09/29/20 02:58	ELN	Mt. Juliet, TN
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1550952	1	09/29/20 11:04	09/29/20 11:04	ACG	Mt. Juliet, TN

TRIP BLANK L1264952-05 GW

				Collected by	Collected date/time	Received date/time
					09/15/20 13:00	09/17/20 09:30
Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Volatile Organic Compounds (GC/MS) by Method 8260B	WG1550952	1	09/29/20 09:27	09/29/20 09:27	ACG	Mt. Juliet, TN



All sample aliquots were received at the correct temperature, in the proper containers, with the appropriate preservatives, and within method specified holding times, unless qualified or notated within the report. Where applicable, all MDL (LOD) and RDL (LOQ) values reported for environmental samples have been corrected for the dilution factor used in the analysis. All Method and Batch Quality Control are within established criteria except where addressed in this case narrative, a non-conformance form or properly qualified within the sample results. By my digital signature below, I affirm to the best of my knowledge, all problems/anomalies observed by the laboratory as having the potential to affect the quality of the data have been identified by the laboratory, and no information or data have been knowingly withheld that would affect the quality of the data.

Chris Ward
Project Manager

¹ Cp

² Tc

³ Ss

⁴ Cn

⁵ Sr

⁶ Qc

⁷ Gl

⁸ Al

⁹ Sc



Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Chloride	771		7.58	20.0	20	09/29/2020 01:53	WG1549114

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Benzene	0.0323		0.0000941	0.00100	1	09/29/2020 10:06	WG1550952
Toluene	U		0.000278	0.00100	1	09/29/2020 10:06	WG1550952
Ethylbenzene	0.0111		0.000137	0.00100	1	09/29/2020 10:06	WG1550952
Total Xylenes	0.000948	J	0.000174	0.00300	1	09/29/2020 10:06	WG1550952
(S) Toluene-d8	102			80.0-120		09/29/2020 10:06	WG1550952
(S) 4-Bromofluorobenzene	99.5			77.0-126		09/29/2020 10:06	WG1550952
(S) 1,2-Dichloroethane-d4	108			70.0-130		09/29/2020 10:06	WG1550952

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc



Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis date / time	Batch
Chloride	2650		37.9	100	100	09/29/2020 02:06	WG1549114

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis date / time	Batch
Benzene	U		0.0000941	0.00100	1	09/29/2020 10:25	WG1550952
Toluene	U		0.000278	0.00100	1	09/29/2020 10:25	WG1550952
Ethylbenzene	U		0.000137	0.00100	1	09/29/2020 10:25	WG1550952
Total Xylenes	U		0.000174	0.00300	1	09/29/2020 10:25	WG1550952
(S) Toluene-d8	106			80.0-120		09/29/2020 10:25	WG1550952
(S) 4-Bromofluorobenzene	100			77.0-126		09/29/2020 10:25	WG1550952
(S) 1,2-Dichloroethane-d4	112			70.0-130		09/29/2020 10:25	WG1550952

¹ Cp² Tc³ Ss⁴ Cn⁵ Sr⁶ Qc⁷ Gl⁸ Al⁹ Sc



Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Chloride	403		3.79	10.0	10	09/29/2020 02:45	WG1549114

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	mg/l		mg/l	mg/l		date / time	
Benzene	0.000102	J	0.0000941	0.00100	1	09/29/2020 10:44	WG1550952
Toluene	U		0.000278	0.00100	1	09/29/2020 10:44	WG1550952
Ethylbenzene	U		0.000137	0.00100	1	09/29/2020 10:44	WG1550952
Total Xylenes	U		0.000174	0.00300	1	09/29/2020 10:44	WG1550952
(S) Toluene-d8	109			80.0-120		09/29/2020 10:44	WG1550952
(S) 4-Bromofluorobenzene	101			77.0-126		09/29/2020 10:44	WG1550952
(S) 1,2-Dichloroethane-d4	107			70.0-130		09/29/2020 10:44	WG1550952

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc



Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis date / time	Batch
Chloride	751		7.58	20.0	20	09/29/2020 02:58	WG1549114

Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis date / time	Batch
Benzene	0.0337		0.0000941	0.00100	1	09/29/2020 11:04	WG1550952
Toluene	U		0.000278	0.00100	1	09/29/2020 11:04	WG1550952
Ethylbenzene	0.0126		0.000137	0.00100	1	09/29/2020 11:04	WG1550952
Total Xylenes	0.00111	J	0.000174	0.00300	1	09/29/2020 11:04	WG1550952
(S) Toluene-d8	110			80.0-120		09/29/2020 11:04	WG1550952
(S) 4-Bromofluorobenzene	94.8			77.0-126		09/29/2020 11:04	WG1550952
(S) 1,2-Dichloroethane-d4	113			70.0-130		09/29/2020 11:04	WG1550952

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc



Volatile Organic Compounds (GC/MS) by Method 8260B

Analyte	Result mg/l	Qualifier	MDL mg/l	RDL mg/l	Dilution	Analysis date / time	Batch
Benzene	0.000104	J	0.0000941	0.00100	1	09/29/2020 09:27	WG1550952
Toluene	U		0.000278	0.00100	1	09/29/2020 09:27	WG1550952
Ethylbenzene	U		0.000137	0.00100	1	09/29/2020 09:27	WG1550952
Total Xylenes	0.000235	J	0.000174	0.00300	1	09/29/2020 09:27	WG1550952
(S) Toluene-d8	104			80.0-120		09/29/2020 09:27	WG1550952
(S) 4-Bromofluorobenzene	101			77.0-126		09/29/2020 09:27	WG1550952
(S) 1,2-Dichloroethane-d4	113			70.0-130		09/29/2020 09:27	WG1550952

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc

Method Blank (MB)

(MB) R3575547-1 09/28/20 19:28

	MB Result	MB Qualifier	MB MDL	MB RDL
Analyte	mg/l		mg/l	mg/l
Chloride	U		0.379	1.00

¹ Cp

² Tc

³ Ss

⁴ Cn

⁵ Sr

⁶ Qc

⁷ Gl

⁸ Al

⁹ Sc

L1263111-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1263111-01 09/28/20 21:56 • (DUP) R3575547-3 09/28/20 22:09

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	16.0	15.8	1	1.29		15

L1263111-12 Original Sample (OS) • Duplicate (DUP)

(OS) L1263111-12 09/29/20 01:27 • (DUP) R3575547-7 09/29/20 01:40

	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
Analyte	mg/l	mg/l		%		%
Chloride	U	U	1	0.000		15

Laboratory Control Sample (LCS)

(LCS) R3575547-2 09/28/20 19:42

	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
Analyte	mg/l	mg/l	%	%	
Chloride	40.0	39.4	98.6	80.0-120	

L1263111-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1263111-03 09/28/20 22:22 • (MS) R3575547-4 09/28/20 22:36 • (MSD) R3575547-5 09/28/20 22:49

	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
Analyte	mg/l	mg/l	mg/l	mg/l	%	%		%			%	%
Chloride	50.0	1.35	52.4	53.4	102	104	1	80.0-120			1.99	15

L1263111-11 Original Sample (OS) • Matrix Spike (MS)

(OS) L1263111-11 09/29/20 01:00 • (MS) R3575547-6 09/29/20 01:14

	Spike Amount	Original Result	MS Result	MS Rec.	Dilution	Rec. Limits	MS Qualifier
Analyte	mg/l	mg/l	mg/l	%		%	
Chloride	50.0	2.46	54.5	104	1	80.0-120	



Method Blank (MB)

(MB) R3575703-4 09/29/20 06:27

Analyte	MB Result mg/l	MB Qualifier	MB MDL mg/l	MB RDL mg/l
Benzene	U		0.0000941	0.00100
Ethylbenzene	U		0.000137	0.00100
Toluene	U		0.000278	0.00100
Xylenes, Total	U		0.000174	0.00300
(S) Toluene-d8	111			80.0-120
(S) 4-Bromofluorobenzene	108			77.0-126
(S) 1,2-Dichloroethane-d4	113			70.0-130

¹ Cp

² Tc

³ Ss

⁴ Cn

⁵ Sr

⁶ Qc

⁷ Gl

⁸ Al

⁹ Sc

Laboratory Control Sample (LCS) • Laboratory Control Sample Duplicate (LCSD)

(LCS) R3575703-1 09/29/20 05:10 • (LCSD) R3575703-2 09/29/20 05:29

Analyte	Spike Amount mg/l	LCS Result mg/l	LCSD Result mg/l	LCS Rec. %	LCSD Rec. %	Rec. Limits %	LCS Qualifier	LCSD Qualifier	RPD %	RPD Limits %
Benzene	0.00500	0.00440	0.00436	88.0	87.2	70.0-123			0.913	20
Ethylbenzene	0.00500	0.00469	0.00457	93.8	91.4	79.0-123			2.59	20
Toluene	0.00500	0.00510	0.00434	102	86.8	79.0-120			16.1	20
Xylenes, Total	0.0150	0.0136	0.0132	90.7	88.0	79.0-123			2.99	20
(S) Toluene-d8				118	101	80.0-120				
(S) 4-Bromofluorobenzene				106	91.1	77.0-126				
(S) 1,2-Dichloroethane-d4				110	114	70.0-130				



Guide to Reading and Understanding Your Laboratory Report

The information below is designed to better explain the various terms used in your report of analytical results from the Laboratory. This is not intended as a comprehensive explanation, and if you have additional questions please contact your project representative.

Results Disclaimer - Information that may be provided by the customer, and contained within this report, include Permit Limits, Project Name, Sample ID, Sample Matrix, Sample Preservation, Field Blanks, Field Spikes, Field Duplicates, On-Site Data, Sampling Collection Dates/Times, and Sampling Location. Results relate to the accuracy of this information provided, and as the samples are received.

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
(S)	Surrogate (Surrogate Standard) - Analytes added to every blank, sample, Laboratory Control Sample/Duplicate and Matrix Spike/Duplicate; used to evaluate analytical efficiency by measuring recovery. Surrogates are not expected to be detected in all environmental media.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
Result	The actual analytical final result (corrected for any sample specific characteristics) reported for your sample. If there was no measurable result returned for a specific analyte, the result in this column may state "ND" (Not Detected) or "BDL" (Below Detectable Levels). The information in the results column should always be accompanied by either an MDL (Method Detection Limit) or RDL (Reporting Detection Limit) that defines the lowest value that the laboratory could detect or report for this analyte.
Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
Case Narrative (Cn)	A brief discussion about the included sample results, including a discussion of any non-conformances to protocol observed either at sample receipt by the laboratory from the field or during the analytical process. If present, there will be a section in the Case Narrative to discuss the meaning of any data qualifiers used in the report.
Quality Control Summary (Qc)	This section of the report includes the results of the laboratory quality control analyses required by procedure or analytical methods to assist in evaluating the validity of the results reported for your samples. These analyses are not being performed on your samples typically, but on laboratory generated material.
Sample Chain of Custody (Sc)	This is the document created in the field when your samples were initially collected. This is used to verify the time and date of collection, the person collecting the samples, and the analyses that the laboratory is requested to perform. This chain of custody also documents all persons (excluding commercial shippers) that have had control or possession of the samples from the time of collection until delivery to the laboratory for analysis.
Sample Results (Sr)	This section of your report will provide the results of all testing performed on your samples. These results are provided by sample ID and are separated by the analyses performed on each sample. The header line of each analysis section for each sample will provide the name and method number for the analysis reported.
Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier Description

J	The identification of the analyte is acceptable; the reported value is an estimate.
---	---

1 Cp

2 Tc

3 Ss

4 Cn

5 Sr

6 Qc

7 Gl

8 Al

9 Sc



Pace National is the only environmental laboratory accredited/certified to support your work nationwide from one location. One phone call, one point of contact, one laboratory. No other lab is as accessible or prepared to handle your needs throughout the country. Our capacity and capability from our single location laboratory is comparable to the collective totals of the network laboratories in our industry. The most significant benefit to our one location design is the design of our laboratory campus. The model is conducive to accelerated productivity, decreasing turn-around time, and preventing cross contamination, thus protecting sample integrity. Our focus on premium quality and prompt service allows us to be YOUR LAB OF CHOICE.

* Not all certifications held by the laboratory are applicable to the results reported in the attached report.

* Accreditation is only applicable to the test methods specified on each scope of accreditation held by Pace National.

State Accreditations

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN-03-2002-34
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico ¹	n/a
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina ¹	DW21704
Georgia	NELAP	North Carolina ³	41
Georgia ¹	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LA000356
Kentucky ^{1 6}	90010	South Carolina	84004
Kentucky ²	16	South Dakota	n/a
Louisiana	AI30792	Tennessee ^{1 4}	2006
Louisiana ¹	LA180010	Texas	T104704245-18-15
Maine	TN0002	Texas ⁵	LAB0152
Maryland	324	Utah	TN00003
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	460132
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	9980939910
Montana	CERT0086	Wyoming	A2LA

Third Party Federal Accreditations


A2LA – ISO 17025	1461.01	AIHA-LAP, LLC EMLAP	100789
A2LA – ISO 17025 ⁵	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

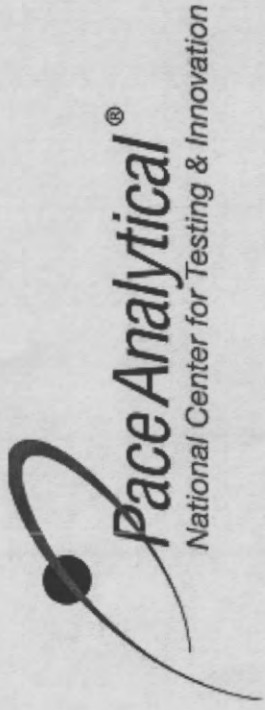
¹ Drinking Water ² Underground Storage Tanks ³ Aquatic Toxicity ⁴ Chemical/Microbiological ⁵ Mold ⁶ Wastewater n/a Accreditation not applicable

Our Locations

Pace National has sixty-four client support centers that provide sample pickup and/or the delivery of sampling supplies. If you would like assistance from one of our support offices, please contact our main office. Pace National performs all testing at our central laboratory.



DCP Midstream - Tasman 2620 W. Marland Blvd Hobbs, NM 88240		Billing Information: Steve Weathers 370 17th St, Ste 2500 Denver, CO 80202		Pres Chk		Analysis / Container / Preservative										Chain of Custody Page ____ of ____					
		Report to: Wick Kopias - BRYAN HUMPHREY Email To: K. JOSEMAN@TASMAN-GEO.COM B.HUMPHREY@TASMAN-GEO.COM		City/State Collected:		Please Circle: PT MT CT ET												 12065 Lebanon Rd Mount Juliet, TN 37122 Phone: 615-758-5858 Phone: 800-767-5859 Fax: 615-758-5859			
Project Description: Burton Flats Booster Station		Client Project #		Lab Project # DCPTASMAN-BURTONFLAT														SDG # 1264952 F173			
Phone: 303-487-1228		Site/Facility ID #		P.O. # 0000524217														Table #			
Collected by (print):		Collected by (signature):		Rush? (Lab MUST Be Notified) ___ Same Day ___ Five Day ___ Next Day ___ 5 Day (Rad Only) ___ Two Day ___ 10 Day (Rad Only) ___ Three Day		Date Results Needed												Acctnum: DCPTASMAN Template: T127771 Prelogin: P796049 PM: 824 - Chris Ward PB: DN 9/4			
Immediately Packed on Ice N ___ Y ___																		Shipped Via: FedEX Ground			
Sample ID		Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs											Remarks	Sample # (lab only)		
MW-1			GW		9-15-20	09:50	4	X	X												01
MW-2			GW		9-15-20	10:30	4	X	X												02
MW-3			GW		9-15-20	11:20	4	X	X												03
MW-4			GW																		
DUPLICATE			GW		9-15-20	58	4	X	X												04
			GW																		
			GW																		
TRIP BLANK			GW		9-15-20	1300	1														05



Login #: L1264952	Client: DCPTASMAN	Date: 9/17	Evaluated by: Olivia T
-------------------	-------------------	------------	------------------------

Non-Conformance (check applicable items)

Sample Integrity	Chain of Custody Clarification	If Broken Container:
Parameter(s) past holding time	Login Clarification Needed	Insufficient packing material around container
Temperature not in range	Chain of custody is incomplete	Insufficient packing material inside cooler
Improper container type	Please specify Metals requested.	Improper handling by carrier (FedEx / UPS / Courier)
pH not in range.	Please specify TCLP requested.	Sample was frozen
Insufficient sample volume.	Received additional samples not listed on coc.	Container lid not intact
Sample is biphasic.	Sample ids on containers do not match ids on coc	If no Chain of Custody:
Vials received with headspace.	Trip Blank not received.	Received by:
Broken container	Client did not "X" analysis.	Date/Time:
Broken container:	Chain of Custody is missing	Temp./Cont. Rec./pH:
Sufficient sample remains		Carrier:
		Tracking#

Login Comments: Received @ 15 degrees. All ice melted

Client informed by:	Call	x	Email	Voice Mail	Date: 9/17/20	Time: 1642
TSR Initials: CMW	Client Contact: Kyle Norman					

Login Instructions

Please proceed with analysis.