

**FOURTH QUARTER 2019
REMEDIAL ACTION PROGRESS
REPORT
FORMER ROUTE 119 AMOCO
FACILITY ID# 26-18711
1809 UNIVERSITY DRIVE
DUNBAR TOWNSHIP
FAYETTE COUNTY, PENNSYLVANIA**

FOR

**TIMOTHY AND MICHELE SHELL
202 CENTER WOOD CIRCLE
UNIONTOWN, PA 15401**

January 2020

Project Number: 13-17313-01

BY

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Figure 2: Site Plan

Figure 3: Groundwater Elevation Contour Map (Shallow Bedrock)

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Table 1: Groundwater Elevations

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1.0 INTRODUCTION

Converse Consultants (Converse) on behalf of Timothy and Michele Shell submits this Remedial Action Progress Report (RAPR) for the Former Route 119 Amoco facility located at 1809 University Drive (Route 119) in Dunbar Township, Fayette County, Pennsylvania (subject property) in accordance with 25 PA Code Chapter 245 (§245): Section 312(e). This RAPR documents the monitoring period from October 1, 2019 through December 31, 2019. A quarterly groundwater sample collection event was conducted on November 12, 2019.

Converse was retained by the Shells to complete site characterization work that was initiated by a previous consultant and complete remedial activities to demonstrate attainment of the selected standards for soil and groundwater in accordance with guidance received from PADEP and USTIF.

A petroleum release at the site was discovered in 1996 due to the presence of unusual levels of gasoline vapors and stained soil that was observed while excavating above the tanks to upgrade piping. The release was traced to loose swing joints and faulty coupler connections along the subsurface piping to the dispensers at the Facility. The UST system was removed as part of the cleanup in 2005. Impacted media removed at the time of closure for off-site disposal included 86 tons of impacted soil.

A Site Characterization Report (SCR) and Remedial Action Plan (RAP) were submitted to the Pennsylvania Department of Environmental Protection (the Department/PADEP) by the previous consultant on May 4, 1998. Additional information was supplied to the Department in September 2006, April 2011, and April 2012. The SCR was approved by the Department with modifications on February 23, 2007.

A Combined Supplemental SCR (SSCR) and RAP were submitted to PADEP by Converse in September 2017. The SSCR/RAP was approved by PADEP on October 31, 2017. **Appendix A: Figure 1** presents the location of the Property relative to area roads and features.

2.0 DOCUMENTATION AND ADMINISTRATIVE SUMMARY

2.1 PRIMARY CONTACTS

Responsible Party

Tim and Michele Shell
202 Center Wood Circle
Uniontown, Pennsylvania 15401
(724) 438-8472
Primary Contact: Ms. Michele Shell

USTIF/ICF Contact

ICF International
4000 Vine Street
Middletown, Pennsylvania 17057
(570) 732-3844
Primary Contact: Ms. Bethany Smith

Consultant

Converse Consultants
2738 West College Avenue
State College, Pennsylvania 16801
(814) 234-3223
Primary Contact: Mr. Orion B. Cook

PADEP Staff Contact

PADEP – Southwest Region
400 Waterfront Drive
Pittsburgh, Pennsylvania 15222
(412) 442-4000
Primary Contact: Mr. Ken Tua

2.2 SITE USE DESIGNATION

One (1) Site was identified during the Site Characterization. The Site extends beyond the boundary of the Property and includes soil and groundwater that are circumscribed by the monitoring wells at the Site.

Appendix A: Figure 2 presents cultural features that are located on and in the general area of the site. The Property has historically been utilized to service, store, and fuel vehicles. There are no longer any USTs located at the Property. The current use of the Property meets the definition of a Nonresidential Property as promulgated in *Act 2 of 1995: Pennsylvania Land Recycling and Environmental Remediation Standards Act* (Act 2), *Section 103*. The use of properties that are adjacent to the Site consists primarily of commercial, residential, and undeveloped land. The current use of surrounding properties meets the definition of nonresidential and residential property as promulgated in *Act 2, Section 103*. The probable future use of the Property and adjacent properties may be for either Residential or Nonresidential purposes.

2.3 SELECTED STANDARD

The Site-Specific Standard (SSS), as defined in Act 2: Section 303 and §250: Subchapter C, is the cleanup standard that is currently selected for soil and groundwater beneath the Site.

2.4 POINT OF COMPLIANCE WELLS

The point of compliance (POC) monitoring wells are identified as:

Shallow Bedrock: MW-3, MW-10S, MW-27S

Deep Bedrock: MW-4, MW-7, MW-8, MW-10, MW-11

Refer to **Appendix A: Figure 2** for the locations of the monitoring wells listed above.

2.5 OFF-FACILITY ACCESS AGREEMENTS

Delineation of the impacted soil and groundwater required the installation of multiple borings within the PENNDOT right-of-way and on a nearby residential properties owned by Scott and Cathy Malago, Fay-Penn Economic Development Council, Civic Development Company, and Dr. Fred Edge.

The Township of Dunbar provided access to the PENNDOT right-of-way, and the private property owners granted access to their properties for monitoring well installation and groundwater monitoring activities.

2.6 AQUIFER USE DETERMINATION

The aquifer beneath and in the area of the Facility is considered to be used, is currently planned for use (§250.403(b)), and to contain less than 2,500 milligrams per liter (mg/l) of dissolved solids.

2.7 FEDERAL, STATE, AND LOCAL PERMITS OR APPROVALS

Local and federal permits are not required for the work that is being conducted at the Site. To the best of our knowledge, PADEP approval of the ongoing measures is the only approval that is required.

2.8 SUBMITTED REPORTS AND PADEP RESPONSES

Submittals

- *Site Characterization Report, Route 119 Amoco, Facility ID #26-18711, State Route 119, Dunbar Township, Fayette Co. Dunbar, Pennsylvania, dated May 4, 1998, prepared by Chambers Environmental Group, Inc. of Pleasant Gap, Pennsylvania (1998 SCR/RAP).*
- *Comprehensive Environmental Site Characterization (SCR/RAP), Facility ID #26-18711, Former Route 119 Amoco, 1809 University Drive, Dunbar, Pennsylvania 15431, dated September 2006, prepared by Letterle & Associates, LLC of Allison Park, Pennsylvania (2006 SCR/RAP).*
- *Additional Site Characterization Report/Groundwater Monitoring Report (SCR), PADEP Facility ID # 26-18711, Former Route 119 Amoco, 1809 University Drive, Dunbar, Pennsylvania 15431, dated April 2011, prepared by Letterle & Associates, LLC of Allison Park, Pennsylvania (2011 SCR).*
- *Yearly Progress Report and Pilot Test (additional SCR), PADEP Facility ID #26-18711, Former Route 119 Amoco, 1809 University Drive, Dunbar, Pennsylvania 15431, dated April 2012, prepared by Letterle & Associates, LLC of Allison Park, Pennsylvania (2012 SCR).*
- *Supplemental Site Characterization and Remedial Action Plan (SSCR/RAP), prepared by Converse, submitted to PADEP September 18, 2017 (2017 SSCR/RAP).*

Responses

- *SCR Approval Letter, dated February 23, 2007, signed by Ms. Patricia Renwick from the PADEP Southwest Regional Office.*
- *SSCR/RAP Approval Letter, dated October 31, 2017, signed by Ms. Patricia Renwick from the PADEP Southwest Regional Office.*

3.0 PROPERTY DESCRIPTION

3.1 SITE LOCATION

The Property (Former Route 119 Amoco) is located at 1809 University Drive (SR 119), Dunbar Township, Fayette County, Pennsylvania (N39° 58' 04.21", W79° 38' 46.84" [NAD 83]). **Appendix A: Figure 1** presents the location of the Property relative to area roads and features.

3.2 PROPERTY SETTING

The Uniontown, Pennsylvania USGS 7.5-minute Quadrangle Map indicates that the elevation of the Property is approximately 1,250 feet above mean sea level. The former Route 119 Amoco Property is located within an area of dissected low plateau that is characterized by rolling hills. The topography of the property is gently sloping to the southeast, toward Route 119. The Property sits between the forks of a Y-intersection where Route 119 intersects Hi-Way Supply Road. The site extends to the west across Hi-Way Supply Road and into a field sloping gently to the west behind the adjacent residence, which sits at approximately the same elevation as the Property.

No surface water body is present within the boundaries of the Property. A small, unnamed pond lies approximately 900 feet west of the Property, with a small drainage stream flowing southward from it.

3.3 PROPERTY DESCRIPTION AND OPERATIONS

Appendix A: Figure 2 presents site features and the boundaries of the Property. The Property is currently owned by Mick McGuire. The Property is currently operated as a retail used automobile dealership and auto repair shop. All former USTs at the Property have been removed, however their historical locations at the Property are shown on **Figure 2 of Appendix A**.

The Property is gently sloping to the southeast and is covered with pavement (concrete or asphalt) and gravel. The area of the former release is covered by pavement. One slab on grade building is located at the Property and the Property and surrounding areas are served by public water and sewer.

4.0 GENERAL FACILITY GEOLOGY

The Pennsylvania Department of Environmental Resources, Bureau of Topographic and Geologic Survey, *Geologic Map of Pennsylvania, 1980* indicates that the bedrock that underlies the unconsolidated material at the Site is classified as the Pennsylvanian-aged Glenshaw Formation. The Glenshaw Formation is described as cyclic sequences of shale, sandstone, red beds, and thin limestones and coals. Shale bedrock was encountered during soil boring and monitoring well installation activities at depths of 5 to 10 feet below grade.

Soil borings and excavation activities that were completed at the Property indicate that unconsolidated material is present beneath the Site, and generally consists of gravel fill, silty clays and weathered shale.

5.0 GENERAL FACILITY HYDROGEOLOGY

Field and published data indicate that aquifers are present in the bedrock beneath the Property. The previously completed site characterization identified a leaky bedrock aquifer characterized by deeper water levels in monitoring wells that are screened at deeper depths. **Appendix A: Figure 2** presents the locations of the monitoring wells.

The former Route 119 Amoco Property is located within an area of dissected low plateau that is characterized by rolling hills. The depth to groundwater in monitoring wells that are completed within the upper unit (shallow bedrock aquifer) (MW-3, MW-10S, MW-12S, MW-13S, MW-14S, MW-15S, and MW-18S through MW-27S) ranges from approximately 1 foot to 28 feet below grade. The depth to groundwater in the monitoring wells that are completed in the lower unit (deep bedrock aquifer) (MW-4, MW-6, MW-7, MW-10, MW-12, MW-13, MW-16, and MW-17) range from approximately 28.5 feet to 45 feet below grade. Lower groundwater levels within the lower unit indicate the potential for downward migration of contaminants at the Site.

Groundwater elevation data indicate that groundwater flow beneath the Former Route 119 Amoco site is to the south and west in the shallow bedrock aquifer and to the south in the deep bedrock aquifer. Groundwater elevation contour maps prepared using data collected during the most recent groundwater sampling event are included as **Appendix A: Figures 3 and 4**. **Appendix B: Table 1** presents a tabulated summary of the relative elevation survey data, depth to water data, and calculated groundwater relative elevation data.

6.0 QUARTERLY SUMMARY

6.1 QUARTERLY GROUNDWATER SAMPLE COLLECTION

6.1.1 General

A quarterly groundwater sampling event was conducted on November 12, 2019 from the accessible monitoring wells. Samples were collected from monitoring wells MW-3, MW-10S, MW-12, MW-12S, MW-15S, MW-18S, MW-19S, MW-20S, MW-21S, MW-22S, MW-26S, MW-27S and the pond. **Appendix A: Figure 2** presents the locations of the monitoring wells.

It is noted that as suggested by PADEP in a phone call that occurred in August 2019 shallow bedrock monitoring wells MW-23S, MW-24S, and MW-25S and deep bedrock monitoring wells MW-4, MW-6, MW-7, MW-8, MW-10, MW-13, MW-16, and MW-17 were removed from the sampling regime.

6.1.2 Water Level Measurement

A Slope Indicator™ Water Level Indicator was used to measure the water levels in the monitoring wells prior to light non-aqueous phase liquid (LNAPL) monitoring, purge activities, and sample collection. Depth to groundwater during the fourth quarter 2019 groundwater sampling event ranged from 1.2 (MW-3S) to 28.95 (MW-27S) feet below top of casing in the shallow bedrock aquifer and 28.45 (MW-6) to 35.92 (MW-12) feet below top of casing in the deep bedrock aquifer.

6.1.3 Light Non-Aqueous Phase Liquid (LNAPL) Monitoring and Recovery

Interim remedial measures have been implemented to periodically remove LNAPL from monitoring wells where it is observed. Specifically, absorbent socks were placed in select monitoring wells and changed out bi-weekly between September 2017 and

July 2019 as a passive form of remediation. In addition, a high vacuum extraction event was conducted in August 2019 as described below.

During the second quarter 2019 groundwater sampling event (May 2019), the absorbent socks were removed from each well upon arrival at the site on the first day of the quarterly event. The wells were allowed to recover for approximately 30-hours before LNAPL was measured and a new sock was installed. After well recovery, approximately 4-inches of product was observed in RW-1. This was the most LNAPL observed at a single well since Converse's involvement with this project. To address the increased thickness of the LNAPL, August 6, 2019, Converse performed a high vacuum extraction event on monitoring well MW-27S and recovery wells RW-1 and RW-2. Approximately 80-gallons of water mixed with LNAPL were extracted from MW-27S, approximately 564-gallons were extracted from RW-1, and approximately 500-gallons were extracted from RW-2. The liquid was extracted and transported for proper disposal by Weavertown Environmental Group of Carnegie, PA.

In late-August 2019, after the high vacuum extraction event, Converse and PADEP had a conversation regarding the closure path for the Site. During that conversation it was decided that the high vacuum events should cease, and only LNAPL monitoring and manual LNAPL bailing should occur to address the LNAPL at the Site for the next several months. In addition, Converse agreed to assess what thickness of product would act as the threshold for removal of LNAPL to the extent most practical.

Since the high vacuum extraction event conducted in August 2019, nine (9) LNAPL monitoring events have occurred. During the past eight (8) monitoring events, only a sheen of LNAPL has been observed at the Site, except during the most recent event where monitoring well MW-12S and recovery well R-1 had measurable product (1/8 inch). Based on this information, the removal of LNAPL to the extent most practical is likely reflected by LNAPL levels less than 1/8 of an inch.

Refer to **Appendix B, Table 2** for a summary of water levels and LNAPL measurements recorded since January 2019.

6.1.4 Groundwater Sample Collection

Prior to sample collection, water level measurement described in the preceding section was conducted. The respective saturated casing volumes were calculated for the wells that were sampled. Each well was then purged of at least three (3) saturated casing volumes using a submersible pump and dedicated tubing or a polyethylene bailer. Purge water is field monitored for temperature, specific conductivity, and pH.

A disposable bailer was used to collect a groundwater sample from each of the sampled groundwater monitoring wells. The groundwater samples were collected directly into laboratory-supplied glassware.

6.1.5 GAC Effluent Sampling

The purge water from groundwater sample collection activities is treated with a portable GAC canister at the Site. One (1) GAC effluent sample is collected during each sampling event and submitted for laboratory analysis.

6.1.6 Project Quality Assurance/Quality Control Deliverables

Field and laboratory QA/QC protocol were consistent with PADEP protocol and with those that are published in the United States Environmental Protection Agency (USEPA) document titled *Solid Waste, Test Methods for Evaluating Solid Waste (EPA Manual SW-846)*. One (1) blind duplicate sample and one (1) trip blank were generally submitted with each sample set analyzed to provide quality assurance.

Nitrile disposable gloves were worn during sample collection activities and were changed prior to the collection of each sample. Each sample was given a unique identification number that was recorded on the field log, the Chain of Custody record, and the sample label.

All samples were placed in a cooler and chilled with ice for shipment to the analytical laboratory. All samples remained in the possession of Converse personnel until transferred to the analytical laboratory or to a courier for delivery to the analytical laboratory. Chain of Custody documentation was completed for and accompanied each sample set.

Single use bailers were used to collect the samples. Decontamination of these materials was, therefore, not necessary. Non-disposable sampling equipment was decontaminated prior to arrival at the site and between sample locations.

6.1.6.1 Laboratory Analysis

Groundwater samples from the Site were analyzed for benzene, toluene, ethylbenzene, xylenes, MTBE, cumene, and naphthalene. The samples were submitted to Fairway Laboratories of Altoona, Pennsylvania for analysis.

6.1.6.2 Laboratory Results

The following constituents were identified in groundwater above the respective PADEP RMSC during the November 2019 groundwater sampling event:

Monitoring Well MW-10S:	Benzene (33.8 µg/L)
Monitoring Well MW-12:	MTBE (50.3 µg/L)
Monitoring Well MW-12S:	Benzene (308 µg/L) and Naphthalene (136 µg/L)
Monitoring Well MW-15S:	Benzene (167 µg/L) and MTBE (106 µg/L)
Monitoring Well MW-18S:	Benzene (192 µg/L), MTBE (92.3 µg/L), and Naphthalene (152 µg/L)
Monitoring Well MW-19S:	MTBE (116 µg/L)
Monitoring Well MW-20S:	Benzene (29.8 µg/L) and MTBE (97.4 µg/L)
Monitoring Well MW-22S:	Benzene (210 µg/L), MTBE (56.6 µg/L), and Naphthalene (130 µg/L)

Appendix A: Figures 5 through 8 present the distribution of the aforementioned constituents for the November 2019 groundwater sampling event. **Appendix B: Table 3** presents a historical summary of the analytical data for all documented groundwater sampling events that have been conducted at the Site. Copies of the laboratory data and chains of custody are included as **Appendix C**. Analytical results from the GAC effluent sample indicated concentrations of all analyzed constituents are below their respective RMSC.

6.1.6.3 Practical Quantitation Limits (PQLs)

§250.4 stipulates limits that are related to practical quantitation limits (PQLs) for soil and groundwater. The *2002 LRP TGM*: Table IV-10 presents PQLs that are established for a number of constituents.

The PQLs that are listed in the *2002 LRP TGM* are either the estimated quantitation limits (EQLs) that are established in the most current version of the *USEPA RCRA Manual SW-846: Test Methods for Evaluating Solid Wastes, Physical/Chemical Methods* (EPA RCRA Manual SW-846) or the method detection limits (MDL) of the test methods that are cited in Table IV-10. The reported LQLs were less than the PQLs for the report period.

6.1.7 Constituent Concentration Trends

A linear trend evaluation has been conducted for each monitoring well that has exhibited constituent concentrations above their respective PADEP RMSC. Constituent concentrations are plotted against time with a linear trend line included to assess the trend. Groundwater analytical data presented in **Appendix B: Table 3** was used to prepare the trend charts. Trend charts are included in **Appendix D**. Decreasing trends are identified for all constituents in all evaluated wells except MTBE at MW-12S. Constituent trends will continue to be evaluated each quarter.

7.0 PLANNED ACTIVITIES

The following activities are scheduled during the next monitoring quarter:

1. First Quarter 2020 Groundwater Sampling Event (February 2019).
2. LNAPL Monitoring and Product Bailing (if necessary) every other week.

8.0 LIMITATIONS

Our services have been performed in accordance with applicable state and local ordinances, and generally accepted practices within our profession. No other warranty, either expressed or implied, is made.

Converse Consultants is not responsible or liable for any claims or damages associated with interpretation of available information provided by others. Site exploration identifies actual soil conditions only at those points where samples are taken, when they are taken. Data that are derived through sampling and analytical testing are extrapolated by Converse employees who then render an opinion about overall soil and/or groundwater conditions. Actual conditions in areas not sampled may

differ. In the event that changes to the property occur, or additional relevant information about the property is brought to our attention, the recommendations contained in this report may not be valid unless these changes and additional relevant information are reviewed, and the recommendations of this report are modified or verified in writing. Converse Consultants cannot be held liable for the accuracy of information provided by others. This report is based on our review of currently available information and has been prepared in accordance with generally accepted practices of environmental sciences, geology, and hydrogeology.

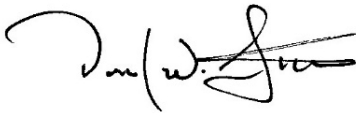
9.0 QUALIFICATIONS

Orion Cook is the primary Converse person responsible for the preparation of this Report. Mr. Cook has over 14 years of experience in the environmental consulting, hydrogeology, and geotechnical fields. Mr. Cook has been an Engineer with Converse Consultants since 2006.



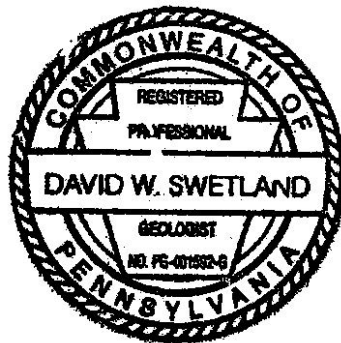
Orion B. Cook, P.E.
Senior Engineer

David Swetland is responsible for reviewing this report. Mr. Swetland has 29 years of experience conducting remedial investigations and providing environmental consulting services. Mr. Swetland has been a Geologist at Converse's State College, Pennsylvania office since 1991.



David Swetland, P.G.
Senior Geologist

AFFIX SEAL HERE



Appendix A

SOURCE: USGS Uniontown, PA
7.5' Topographic Quadrangle Map,
1963, Photorevised 1977



SCALE:
1 inch ≈ 2,000 feet

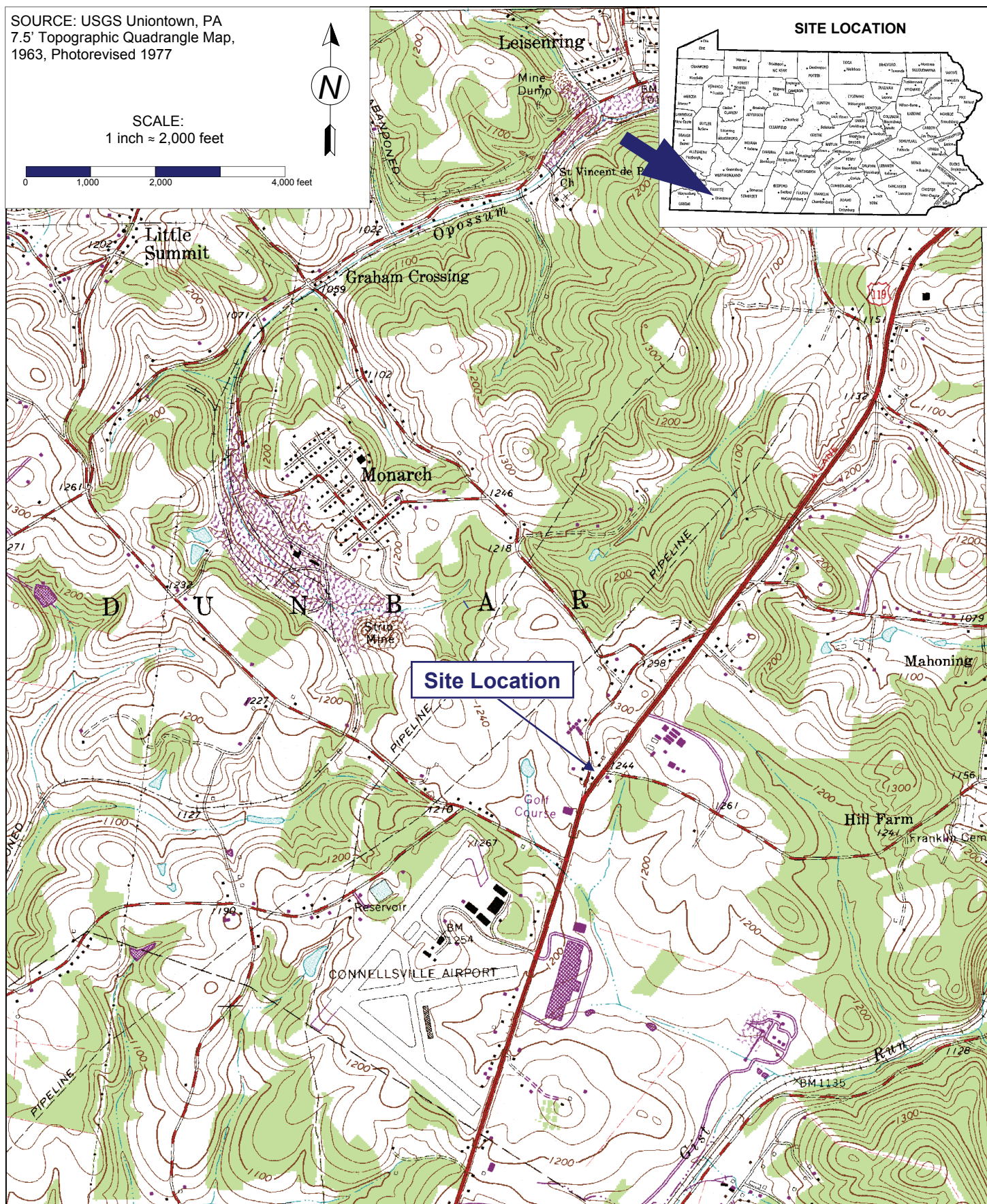
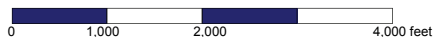


FIGURE 1: SITE LOCATION MAP

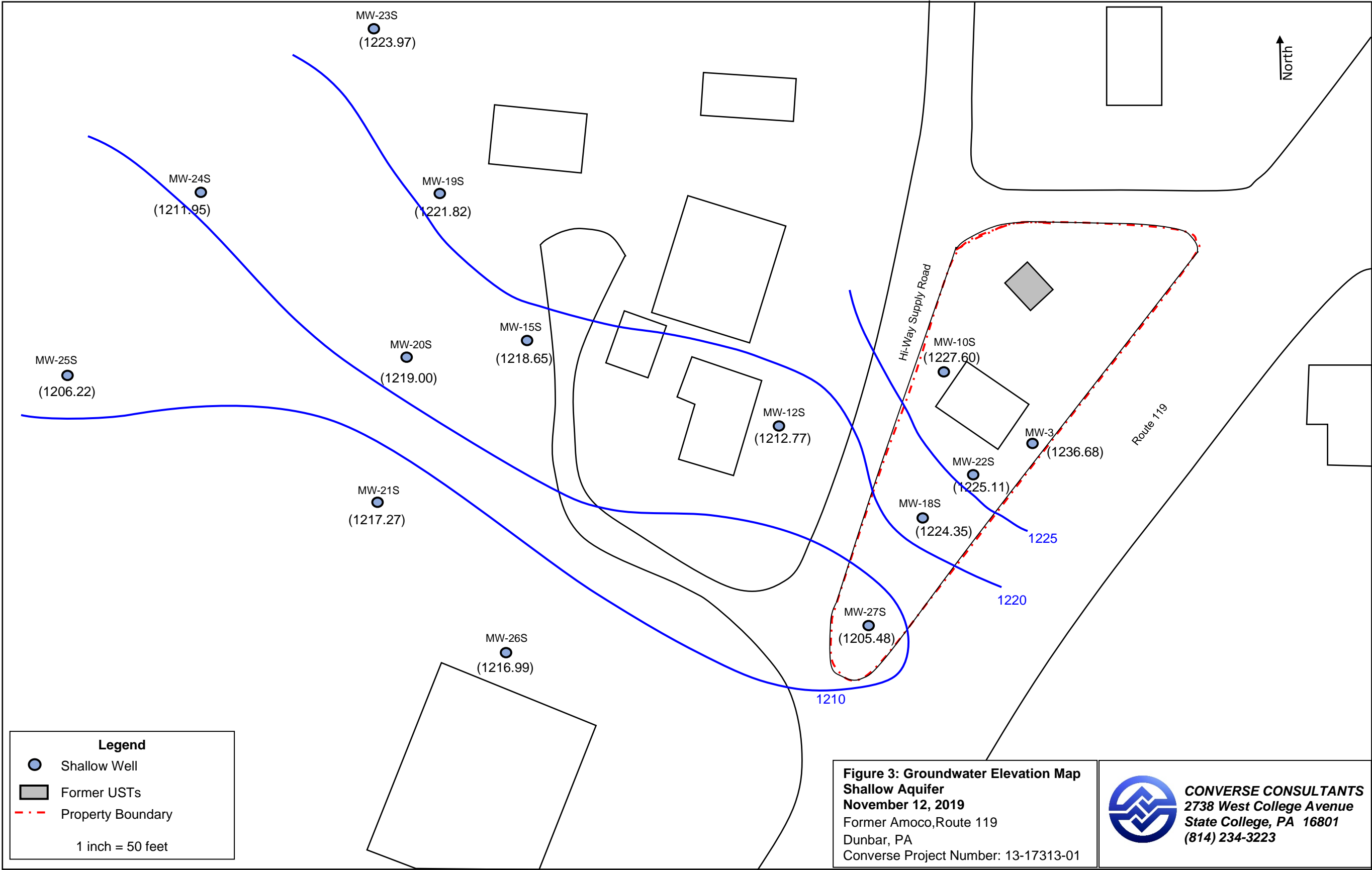
USTIF SITE
FORMER DUNBAR AMOCO, NOW McGUIRE'S GARAGE
108 HI WAY SUPPLY ROAD
DUNBAR, FAYETTE COUNTY, PENNSYLVANIA

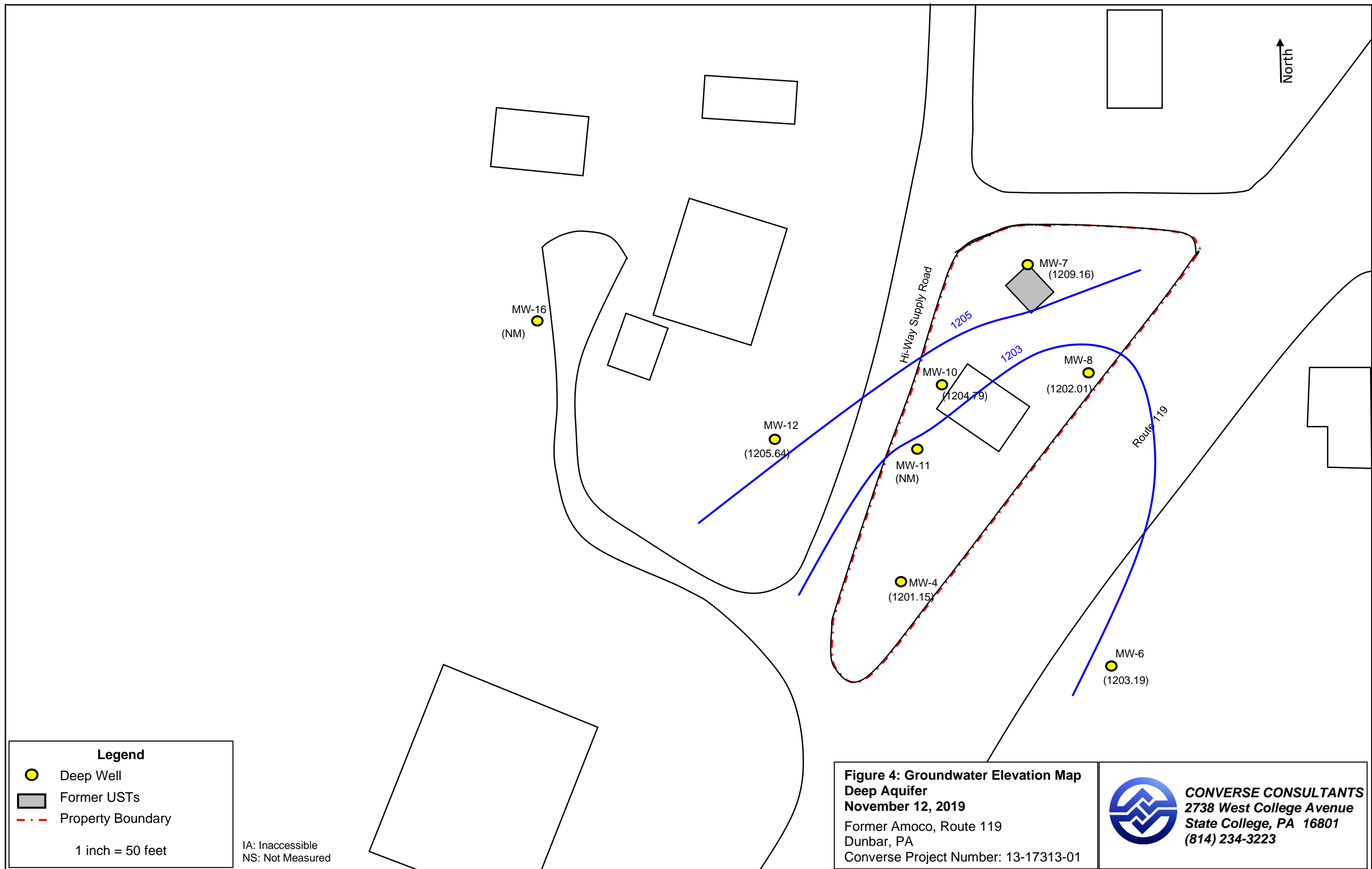
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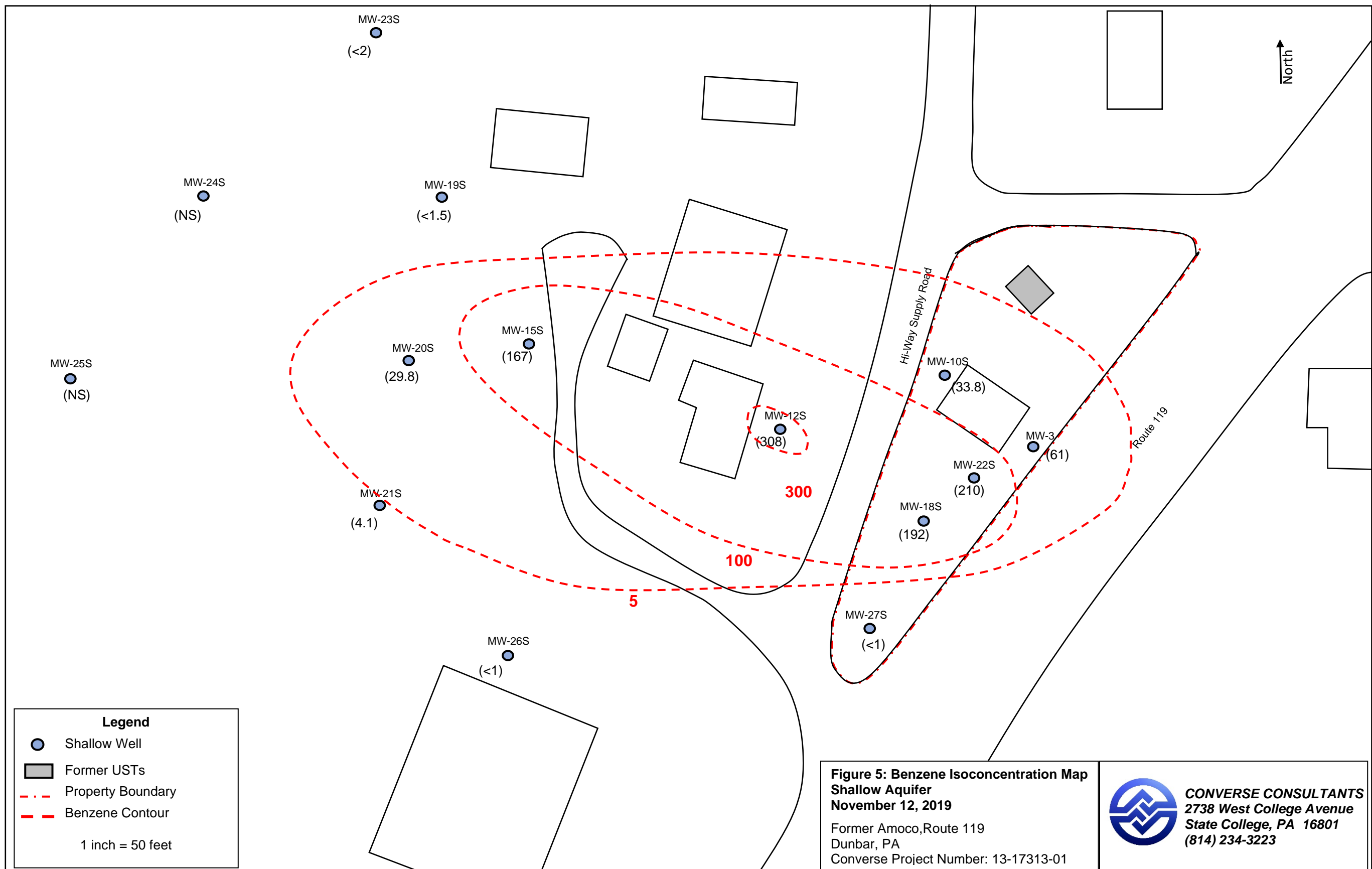


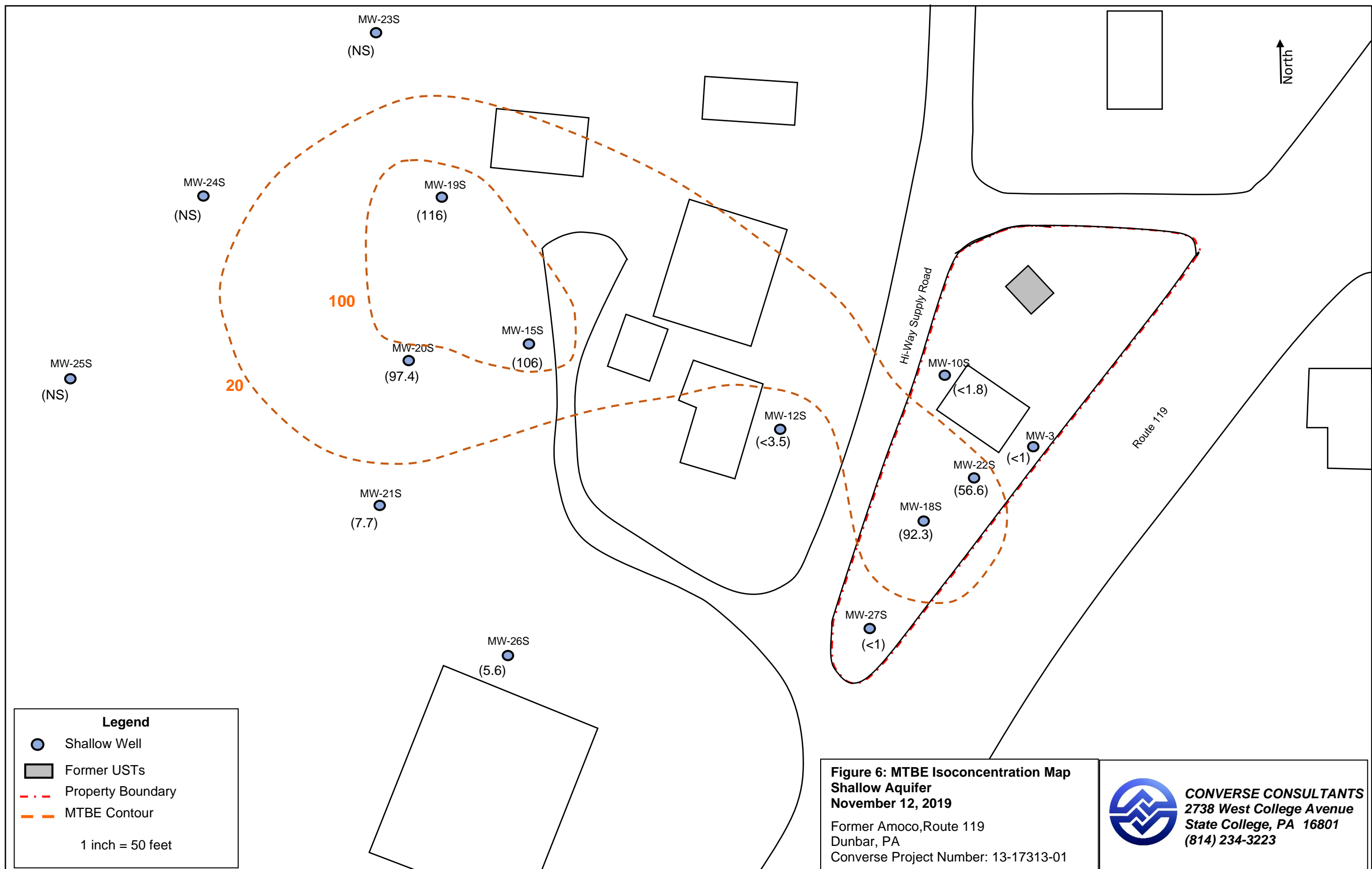
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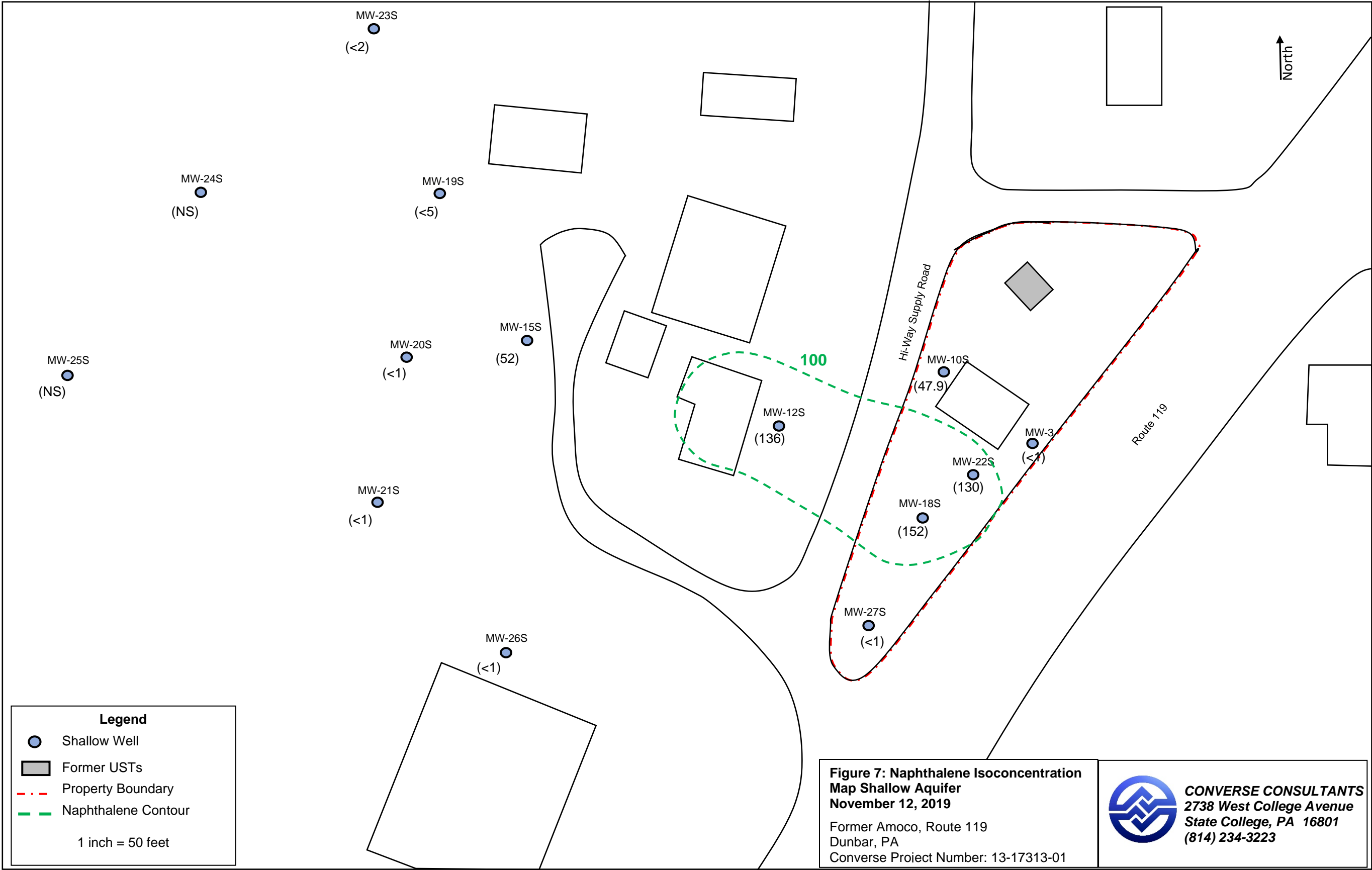


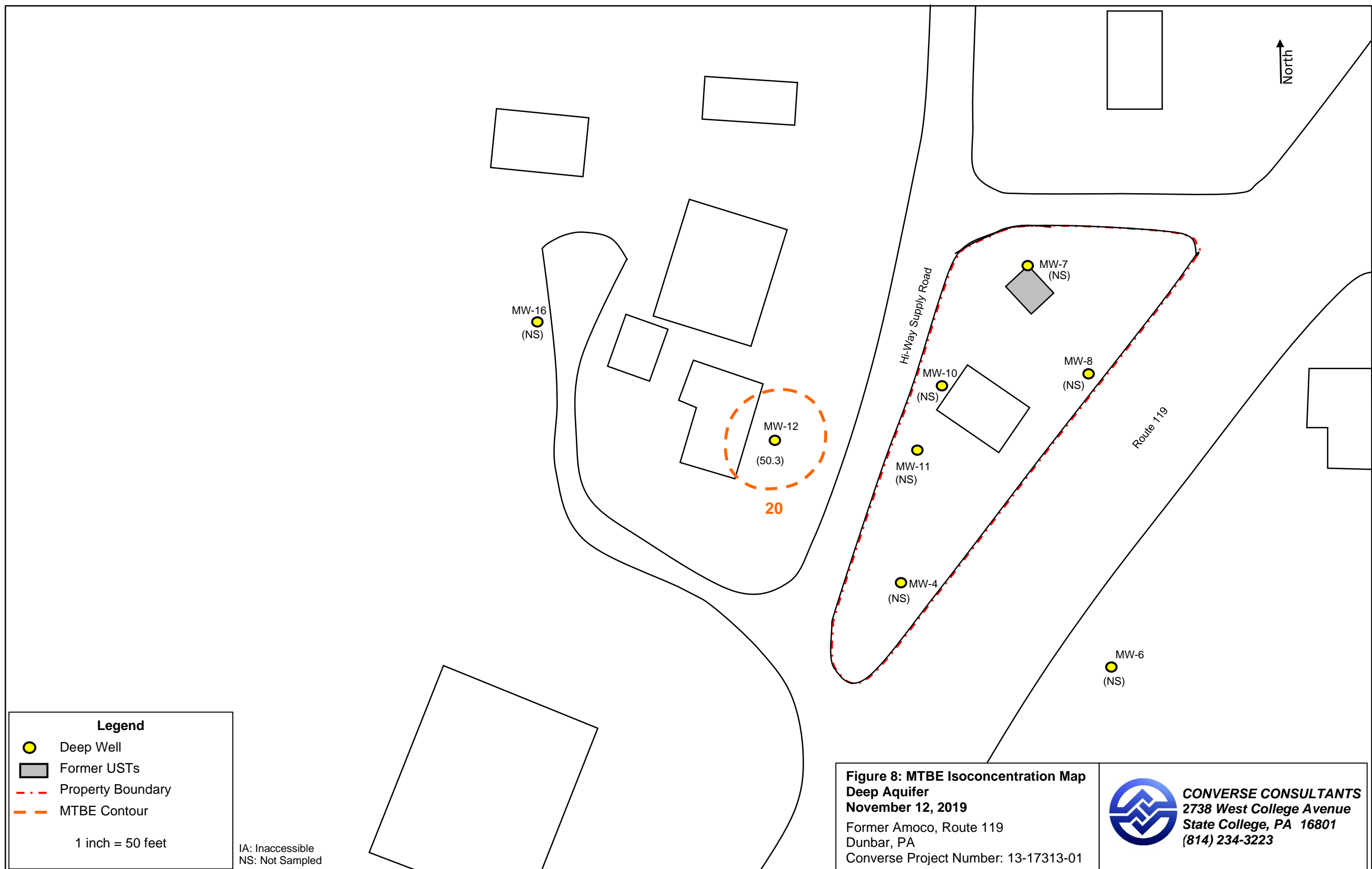












Appendix B

TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-3 Shallow	36.00	16 to 36	1,237.88	6/24/14	12.48	1225.40
				8/28/14	NS	NS
				6/30/16	14.74	1223.14
				9/20/16	13.65	1224.23
				6/29/17	14.7	1223.18
				9/28/17	15.7	1222.18
				11/9/17	1.07	1236.81
				12/13/17	NS	NS
				3/19/18	15.14	1222.74
				5/16/18	1.00	1236.88
				9/6/18	15.47	1222.41
				12/11/18	1.56	1236.32
				3/6/19	0.97	1236.91
				5/15/19	0.91	1236.97
				9/18/19	13.58	1224.30
				11/12/19	1.20	1236.68
MW-4 Deep	50.00	30 to 50	1,236.13	6/24/14	34.49	1201.64
				8/28/14	IA	IA
				6/30/16	IA	IA
				9/20/16	IA	IA
				6/29/17	IA	IA
				9/28/17	IA	IA
				11/9/17	35.22	1200.91
				12/13/17	NS	NS
				3/19/18	NS	NS
				5/17/18	NS	NS
				9/6/18	28.4	1207.73
				12/11/18	NS	NS
				3/6/19	34.83	1201.30
				5/15/19	NS	NS
				9/18/19	34.93	1201.20
				11/12/19	34.98	1201.15



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-6 Deep	46.00	26 to 46	1,231.64	6/24/14	27.56	1204.08
				8/28/14	NS	NS
				6/30/16	28.12	1203.52
				9/20/16	NS	NS
				6/29/17	27.55	1204.09
				9/28/17	28.62	1203.02
				11/9/17	28.6	1203.04
				12/13/17	NS	NS
				3/19/18	28.26	1203.38
				5/16/18	22.82	1208.82
				9/6/18	NS	NS
				12/11/18	28.10	1203.54
				3/6/19	28.32	1203.32
				5/15/19	27.52	1204.12
				9/18/19	29.50	1202.14
				11/12/19	28.45	1203.19
MW-7 Deep	50.00	35 to 50	1,244.14	6/24/14	44.35	1199.79
				8/28/14	NS	NS
				6/30/16	44.22	1199.92
				9/20/16	NS	NS
				6/29/17	IA	IA
				9/28/17	45.08	1199.06
				11/9/17	44.4	1199.74
				12/13/17	NS	NS
				3/19/18	44.18	1199.96
				5/17/18	NS	NS
				9/6/18	44.65	1199.49
				12/11/18	44.56	1199.58
				3/6/19	NS	NS
				5/15/19	NS	NS
				9/18/19	44.70	1199.44
				11/12/19	34.98	1209.16



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-8 Deep	51.00	36 to 51	1,239.09	6/24/14	36.91	1202.18
				8/28/14	NS	NS
				6/30/16	37.28	1201.81
				9/20/16	37.98	1201.11
				6/29/17	30.6	1208.49
				9/28/17	32.24	1206.85
				11/9/17	37.07	1202.02
				12/13/17	NS	NS
				3/19/18	37.03	1202.06
				5/16/18	36.78	1202.31
				9/6/18	37.23	1201.86
				12/11/18	36.70	1202.39
				3/6/19	36.72	1202.37
				5/15/19	36.25	1202.84
				9/18/19	32.27	1206.82
				11/12/19	37.08	1202.01
MW-10 Deep	50.00	35 to 50	1,239.23	6/24/14	34.45	1204.78
				8/28/14	NS	NS
				6/30/16	33.97	1205.26
				9/20/16	39.87	1199.36
				6/29/17	41.3	1197.93
				9/28/17	NS	NS
				11/9/17	IA	IA
				12/13/17	NS	NS
				3/19/18	33.48	1205.75
				5/16/18	33.73	1205.50
				9/6/18	34.50	1204.73
				12/11/18	31.90	1207.33
				3/6/19	34.83	1204.40
				5/15/19	33.87	1205.36
				9/18/19	34.44	1204.79
				11/12/19	34.44	1204.79



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-10S Shallow	30.15	15 to 30	1,243.27	6/24/14	13.79	1229.48
				8/28/14	14.45	1228.82
				6/30/16	15.46	1227.81
				9/20/16	17.56	1225.71
				6/29/17	13.79	1229.48
				9/28/17	NS	NS
				11/9/17	IA	IA
				12/13/17	NS	NS
				3/19/18	13.58	1229.69
				5/17/18	13.57	1229.70
				9/6/18	13.62	1229.65
				12/11/18	12.51	1230.76
				3/6/19	11.52	1231.75
				5/15/19	11.47	1231.80
				9/18/19	14.24	1229.03
				11/12/19	15.67	1227.60
MW-12 Deep	50.00	30 to 50	1,241.56	6/24/14	37.95	1203.61
				8/28/14	NS	NS
				6/30/16	36.65	1204.91
				9/20/16	37.28	1204.28
				6/29/17	30.41	1211.15
				9/28/17	37.55	1204.01
				11/9/17	36.54	1205.02
				12/13/17	36.98	1204.58
				3/19/18	37.13	1204.43
				5/17/18	36.43	1205.13
				9/6/18	36.93	1204.63
				12/11/18	36.03	1205.53
				3/6/19	34.32	1207.24
				5/15/19	34	1207.56
				9/18/19	36.18	1205.38
				11/12/19	35.92	1205.64



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-12S Shallow	26.55	15 to 27	1,237.47	6/24/14	15.51	1221.96
				8/28/14	17.65	1219.82
				6/30/16	24.55	1212.92
				9/20/16	25.7	1211.77
				6/29/17	21.74	1215.73
				9/28/17	25.03	1212.44
				11/9/17	18.92	1218.55
				12/13/17	19.29	1218.18
				3/19/18	22.88	1214.59
				5/17/18	24.76	1212.71
				9/6/18	18.23	1219.24
				12/11/18	22.3	1215.17
				3/6/19	21.53	1215.94
				5/15/19	19.68	1217.79
				9/18/19	24.15	1213.32
				11/12/19	24.7	1212.77
MW-13 Deep	50.00	30 to 50	1,234.87	6/24/14	32.27	1202.60
				8/28/14	NS	NS
				6/30/16	Well Destroyed	
MW-13S Shallow	26.70	15 to 27	1,230.77	6/24/14	13.90	1216.87
				8/28/14	22.34	1208.43
				6/30/16	Well Destroyed	
MW-14S Shallow	30.00	15 to 30	1,231.26	6/24/14	13.15	1218.11
				8/28/14	NS	NS
				6/30/16	Well Destroyed	
MW-15S Shallow	30.00	15 to 30	1,232.90	6/24/14	10.58	1222.32
				8/28/14	NS	NS
				6/30/16	13.55	1219.35
				9/20/16	14.62	1218.28
				6/29/17	13.43	1219.47
				9/28/17	14.55	1218.35
				11/9/17	11.68	1221.22
				12/13/17	13.67	1219.23
				3/19/18	12.61	1220.29
				5/17/18	12.22	1220.68
				9/6/18	13.00	1219.90
				12/11/18	11.52	1221.38
				3/6/19	11.40	1221.50
				5/15/19	11.34	1221.56
				9/18/19	13.58	1219.32
				11/12/19	14.25	1218.65



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-16 Deep	60.00	45 to 60	1,233.64	6/24/14	33.58	1200.06
				8/28/14	NS	NS
				6/30/16	44.63	1189.01
				9/20/16	NS	NS
				6/29/17	44.15	1189.49
				9/28/17	45.42	1188.22
				11/9/17	44.84	1188.80
				12/13/17	NS	NS
				3/19/18	37.32	1,196.32
				5/17/18	44.95	1,188.69
				9/6/18	45.00	1,188.64
				12/11/18	45.26	1,188.38
				3/6/19	44.98	1,188.66
				5/15/19	44.62	1,189.02
				9/18/19	45.50	1,188.14
				11/12/19	NS	NS
MW-17 Deep	55.00	40 to 55	1,231.48	6/24/14	38.95	1192.53
				8/28/14	NS	NS
				6/30/16	Well Destroyed	
MW-18S Shallow	29.80	15 to 30	1,238.82	6/24/14	11.95	1226.87
				8/28/14	13.69	1225.13
				6/30/16	17.60	1221.22
				9/20/16	IA	IA
				6/29/17	14.12	1,224.70
				9/28/17	14.25	1,224.57
				11/9/17	13.85	1,224.97
				12/13/17	13.91	1,224.91
				3/19/18	13.78	1,225.04
				5/17/18	13.5	1,225.32
				9/6/18	13.99	1,224.83
				12/11/18	13.86	1,224.96
				3/6/19	13.1	1,225.72
				5/15/19	12.55	1,226.27
				9/18/19	14.05	1,224.77
				11/12/19	14.47	1,224.35



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-19S Shallow	29.72	15 to 30	1,236.17	6/24/14	12.20	1223.97
				8/28/14	12.47	1223.70
				6/30/16	11.65	1224.52
				9/20/16	NS	NS
				6/29/17	12.69	1,223.48
				9/28/17	12.48	1,223.69
				11/9/17	13.38	1,222.79
				12/13/17	NS	NS
				3/19/18	12.87	1,223.30
				5/17/18	14.58	1,221.59
				9/6/18	14.22	1,221.95
				12/11/18	12.37	1,223.80
				3/6/19	12.13	1,224.04
				5/15/19	12.31	1,223.86
				9/18/19	14.80	1,221.37
				11/12/19	14.35	1,221.82
MW-20S Shallow	29.80	15 to 30	1,231.36	6/24/14	8.05	1223.31
				8/28/14	8.91	1218.63
				6/30/16	12.73	1218.63
				9/20/16	NS	NS
				6/29/17	12.1	1,219.26
				9/28/17	13.76	1,217.60
				11/9/17	11.48	1,219.88
				12/13/17	NS	NS
				3/19/18	12.88	1,218.48
				5/17/18	10.79	1,220.57
				9/6/18	14.46	1,216.90
				12/11/18	9.36	1,222.00
				3/6/19	10.53	1,220.83
				5/15/19	9.72	1,221.64
				9/18/19	12.73	1,218.63
				11/12/19	12.36	1,219.00



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-21S Shallow	30.00	15 to 30	1,226.37	6/24/14	4.65	1221.72
				8/28/14	4.83	1221.54
				6/30/16	NS	NS
				6/29/17	8.39	1217.98
				9/28/17	11.32	1215.05
				11/9/17	8.91	1217.46
				12/13/17	NS	NS
				3/19/18	8.05	1218.32
				5/17/18	7.74	1218.63
				9/6/18	8.30	1218.07
				12/11/18	7.24	1219.13
				3/6/19	6.80	1219.57
				5/15/19	6.42	1219.95
				9/18/19	8.92	1217.45
				11/12/19	9.10	1217.27
MW-22S Shallow	29.10	15 to 29	1,240.51	6/24/14	13.05	1227.46
				8/28/14	14.48	1224.91
				6/30/16	15.60	1224.91
				9/20/16	NS	NS
				6/29/17	14.82	1,225.69
				9/28/17	15.43	1,225.08
				11/9/17	14.73	1,225.78
				12/13/17	14.83	1,225.68
				3/19/18	14.53	1,225.98
				5/17/18	14.34	1,226.17
				9/6/18	14.73	1,225.78
				12/11/18	14.05	1,226.46
				3/6/19	14.00	1,226.51
				5/15/19	14.05	1,226.46
				9/18/19	13.37	1,227.14
				11/12/19	15.40	1,225.11



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-23S Shallow	30.00	13 to 30	1,236.51	6/30/16	18.95	1217.56
				9/20/16	20.13	1216.38
				6/29/17	16.41	1220.10
				9/28/17	NA	NA
				11/9/17	12.44	1224.07
				12/13/17	NS	NS
				3/19/18	13.38	1223.13
				5/17/18	11.10	1225.41
				9/6/18	11.87	1224.64
				12/11/18	12.00	1224.51
				3/6/19	10.37	1226.14
				5/15/19	8.40	1228.11
				9/18/19	14.05	1222.46
				11/12/19	12.54	1223.97
MW-24S Shallow	25.50	15 to 25.5	1,224.25	6/30/16	13.00	1211.25
				9/20/16	14.91	1209.34
				6/29/17	12.21	1212.04
				9/28/17	15.25	1209.00
				11/9/17	11.90	1212.35
				12/13/17	NS	NS
				3/19/18	11.62	1212.63
				5/17/18	10.91	1213.34
				9/6/18	12.33	1211.92
				12/11/18	11.25	1213.00
				3/6/19	10.53	1213.72
				5/15/19	9.85	1214.40
				9/18/19	12.48	1211.77
				11/12/19	12.30	1211.95



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-25S Shallow	25.00	10 to 25	1,216.55	6/30/16	10.94	1205.61
				9/20/16	13.05	1203.50
				6/29/17	11.80	1204.75
				9/28/17	13.82	1202.73
				11/9/17	9.90	1206.65
				12/13/17	NS	NS
				3/19/18	10.20	1206.35
				5/17/18	11.83	1204.72
				9/6/18	11.56	1204.99
				12/11/18	9.25	1207.30
				3/6/19	9.87	1206.68
				5/15/19	8.53	1208.02
				9/18/19	10.32	1206.23
				11/12/19	10.33	1206.22
MW-26S Shallow	32.00	17 to 32	1,230.69	6/30/16	12.18	1218.51
				9/20/16	15.64	1215.05
				6/29/17	12.89	1217.80
				9/28/17	13.54	1217.15
				11/9/17	13.25	1217.44
				12/13/17	13.30	1217.39
				3/19/18	11.25	1219.44
				5/16/18	11.25	1219.44
				9/6/18	13.58	1217.11
				12/11/18	12.17	1218.52
				3/6/19	11.20	1219.49
				5/15/19	11.32	1219.37
				9/18/19	14.05	1216.64
				11/12/19	13.70	1216.99



TABLE 1
GROUNDWATER ELEVATION DATA
FORMER DUNBAR AMOCO
13-17313-01

WELL	TWD	SI	TOC	DATE	DTW	GW ELEV
MW-27S Shallow	30.00	17 to 30	1,234.43	6/30/16	21.37	1213.06
				9/20/16	21.75	1212.68
				6/29/17	24.90	1209.53
				9/28/17	28.73	1205.70
				11/9/17	IA	IA
				3/19/18	IA	IA
				5/17/18	IA	IA
				9/6/18	IA	IA
				11/12/18	11.30	1223.13
				12/11/18	26.48	1207.95
				3/6/19	28.18	1206.25
				5/15/19	23.67	1210.76
				9/18/19	28.66	1205.77
				11/12/19	28.95	1205.48

(2) = Diameter of Well Casing in Inches.

TWD = Total Well Depth in feet below grade.

SI = Screened Interval in feet below grade. DTW = Measured Depth to Groundwater from TOC.

TOC = Top of Well Casing relative to Grade. GW ELEV = Calculated Groundwater Elevation.

+ = Approximate feet above grade. NM = Well not measured.

- = Approximate feet below grade. NA = Not Applicable.

TOC = Top of Well Casing.

IA = Inaccessible.

NS = Not Sampled.

6/29/17- Shallow Monitoring well water levels were recorded 7/7/17



Table 2
LNAPL Thickness
Former Dunbar Amoco
13-17313-01

	MW-10S			MW-12S			MW-12		MW-15S		MW-18S			MW-22S			MW-26S		MW-27S			RW-1			RW-2			
Date	Depth to Water	LNAPL Thickness	Sock Weight	Depth to Water	LNAPL Thickness	Sock Weight	Depth to Water	LNAPL Thickness	Depth to Water	LNAPL Thickness	Depth to Water	LNAPL Thickness	Sock Weight	Depth to Water	LNAPL Thickness	Sock Weight	Depth to Water	LNAPL Thickness	Sock Weight	Depth to Water	LNAPL Thickness	Sock Weight	Depth to Water	LNAPL Thickness	Sock Weight	Depth to Water	LNAPL Thickness	Sock Weight
1/11/2019	12.21	light sheen*	84	22.15	sheen*	110	36.01	0	11.76	0	13.71	light sheen*	90	13.96	light sheen*	80	11.56	0	NM	NM	NM	24.73	heavy sheen*^	123	15.37	light sheen*	85	
1/25/2019	12.68	sheen*	67	20.95	heavy sheen*	106	35.04	0	11.11	0	13.14	heavy sheen*	80	13.59	light sheen*	95	11.42	0	NM	NM	NM	24.8	heavy sheen*^	135	14.85	light sheen*	88	
2/7/2019	12.24	sheen*	96	17.44	sheen*	117	34.53	light sheet*	11.53	0	13.2	light sheen*	81	13.61	0	80	11.58	0	14.84	0	99	24.41	heavy sheen*^	355	14.42	0	98	
2/21/2019	11.23	sheen*	85	19.59	heavy sheen*	115	34.08	0	10.75	0	12.82	sheen*	84	13.29	0	89	10.95	0	25.93	0	99	24.48	heavy sheen*^	340	14.08	0	102	
3/6/2019	11.53	heavy sheen*	85	21.53	sheen*	115	34.42	0	11.40	0	13.1	heavy sheen*	87	14	sheen*	89	11.20	0	28.18	0	82	24.37	0.25"	380	14.1	0	80	
3/21/2019	12.25	sheen*	106	20	sheen*	112	34.33	0	14.54	0	13.76	heavy sheen*	130	14.73	sheen*	96	11.9	0	26.89	0	99	24.21	heavy sheen*^	291	15.09	light sheen*	106	
4/18/2019	14.11	heavy sheen*	100	21.97	light sheen*	123	35.64	0	14.68	0	14.6	heavy sheen*	111	15.15	light sheen*	114	13.07	0	27.44	0	98	24.43	heavy sheen*^	132	16.08	light sheen*	127	
4/19/2019	12.98	sheen*	116	20.5	sheen*	118	34.85	0	13.16	0	13.71	heavy sheen*	153	14.47	sheen*	115	12.14	0	27.7	0	105	24.51	sheen*	119	14.48	light sheen*	113	
5/15/2019	11.47	sheen*	229	19.68	sheen*	117	19.68	0	11.34	0	12.55	sheen*	116	14.05	sheen*	117	11.32	0	23.67	0	144	24.32	4"	388	13.43	light sheen*	148	
5/30/2019	11.19	0	93	18.81	sheen*	105	NM	NM	NM	NM	11.94	0	131	13.31	Light sheen*	109	NM	NM	23.43	0	113	24.5	.5"	394	13.34	0	117	
6/18/2019	10.76	0	95	19.5	sheen*	53	35.3	0	8.6	0	13.85	0	90	14.55	0	106	11.35	0	17.01	0	104	24.5	.25"	282	15.1	0	96	
7/3/2019	12.19	0	112	18.9	sheen*	121	34.55	0	11.89	0	13.01	0	110	14.01	0	127	11.94	0	26.15	0	NM	24.24	sheen	NM	13.83	light sheen*	110	
9/4/2019	13.1	0	NM	21.59	0	NM	35.47	0	11.88	0	IA	IA	IA	14.8	0	NM	11.9	0	26.54	0	NM	24.55	sheen	NM	14.76	0	NM	
9/18/2019	14.24	sheen	NM	24.15	0	NM	36.18	0	13.58	0	14.05	0	NM	15.37	0	NM	14.05	0	18.66	0	NM	24.64	0	NM	16.34	0	NM	
9/30/2019	15.55	sheen	NM	25.24	0	NM	36.24	0	15.08	0	14.61	0	NM	15.49	0	NM	14.95	0	29.27	0	NM	24.35	sheen	NM	16.8	0	NM	
10/15/2019	16.02	Heavy sheen	NM	25.42	0	NM	36.43	0	15.29	0	14.62	sheen	NM	15.49	0	NM	18.36	0	18.92	0	NM	25.66	0	NM	16.7	0	NM	
10/28/2019	16.16	sheen	NM	24.78	0	NM	36.35	0	14.75	0	14.57	heavy sheen	NM	15.47	0	NM	15.84	0	28.66	0	NM	24.75	0	NM	16.1	0	NM	
11/12/2019	15.67	0	NM	24.72	0	NM	35.92	0	14.55	0	14.47	heavy sheen	NM	15.4	0	NM	13.7	0	28.95	0	NM	24.7	0	NM	15.43	0	NM	
11/27/2019	15.2	sheen	NM	23.82	0	NM	36.07	0	14.62	0	14.02	sheen	NM	15.21	0	NM	13.36	0	29.08	0	NM	25.27	sheen	NM	16.15	0	NM	
12/10/2019	14.63	0	NM	22.64	sheen	NM	34.88	0	12.98	0	13.91	0	NM	15.1	light sheen	NM	12.64	0	28.45	0	NM	24.43	heavy sheen	NM	14.44	0	NM	

IA: inaccessible
NM: not measured
LNAPL measured in inches
OB: Obstruction in well.
NA: Not applicable
*: Sock in well.
Sock weight reported in grams
Dry sock weight: 81 grams prior to 4/4/2018, 60 grams after 4/4/2018.
^product mixed with water. Product was not measurable

TABLE 3
Groundwater Analytical Summary Table
Former Dunbar Amoco
13-17313-01

Monitoring Well ID								
	RMSC	5	1,000	700	10,000	1,100	20	100
	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Isopropylbenzene**	MTBE	Naphthalene
MW-3	6/24/2014	5.13	1.07	7.97	16.3	1.79	5.98	1.1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	<1	<1	<1	<2	<1	12.4	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	<1	<1	<1	<2	<1	<1	<1
	9/28/2017	<1	<1	<1	<2	<1	16	<1
	11/9/2017	<1	<1	<1	<2	<1	<1	<1
	3/19/2018	<1	<1	<1	<2	<1	4.97	<1
	5/16/2018	<1	<1	<1	<2	<1	<1	<1
	9/6/2018	1.19	1.07	<1	7.98	<1	10.1	<1
	12/11/2018	18	57	16	86	<2	<2	3.4
	3/6/2019	<2	<2	<2	<6	<2	<2	<2
	5/14/2019	<2	<2	<2	<6	<2	<2	<2
MW-4	9/24/2019	61	29	15	74	<2	10	<2
	11/13/2019	<1	<1	<1	<2	<1	<1	<1
	6/24/2014	<1	<1	<1	<2	<1	1.23	<1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	NS	NS	NS	NS	NS	NS	NS
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	NS	NS	NS	NS	NS	NS	NS
	9/28/2017	NS	NS	NS	NS	NS	NS	NS
	11/9/2017	<1	<1	<1	<2	<1	4.18	<1
	3/19/2018	NS	NS	NS	NS	NS	NS	NS
	5/16/2018	NS	NS	NS	NS	NS	NS	NS
	9/6/2018	<1	<1	<1	<2	<1	<1	<1
	12/11/2018*	<2	<2	<2	<6	<2	<2	<2
	3/6/2019	NS	NS	NS	NS	NS	NS	NS
MW-6	5/14/2019	NS	NS	NS	NS	NS	NS	NS
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS
	6/24/2014	<1	<1	<1	<2	<1	<1	<1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	<1	<1	<1	<2	<1	<1	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	<1	<1	<1	<2	<1	<1	<1
	9/28/2017	<1	<1	<1	<2	<1	<1	<1
	11/9/2017	<1	<1	<1	<2	<1	<1	<1
	3/19/2018	<1/<1	<1/<1	<1/<1	<2/<2	<1/<1	<1/<1	<1/<1
	5/16/2018	<1	<1	<1	<2	<1	<1	<1
	9/6/2018	NS	NS	NS	NS	NS	NS	NS
	12/11/2018	4.5	21	6.8	36	<2	<2	<2
	3/6/2019	<2	3.7	<2	8.5	<2	<2	<2
	5/14/2019	<2	<2	<2	<6	<2	<2	<2
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS



TABLE 3
Groundwater Analytical Summary Table
Former Dunbar Amoco
13-17313-01

Monitoring Well ID								
	RMSC	5	1,000	700	10,000	1,100	20	100
	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Isopropylbenzene**	MTBE	Naphthalene
MW-7	6/24/2014	<1	<1	<1	<2	<1	1.53	<1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	<1	<1	<1	<2	<1	8.96	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	NS	NS	NS	NS	NS	NS	NS
	9/28/2017	<1	<1	<1	<2	<1	5.26	<1
	11/9/2017	<1	<1	<1	<2	<1	6.11	<1
	3/19/2018	<1	<1	<1	<2	<1	6.59	<1
	5/16/2018	NS	NS	NS	NS	NS	NS	NS
	9/6/2018	<1	<1	<1	<2	<1	8.61	<1
	12/12/2018	<2	<2	<2	<2	<2	2.1	<2
	3/6/2019	<2	3.7	<2	8.5	<2	<2	<2
	5/14/2019	NS	NS	NS	NS	NS	NS	NS
MW-8	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS
	6/24/2014	<1	<1	<1	<2	<1	<1	<1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	<1	<1	<1	<2	<1	<1	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	<1	<1	<1	<2	<1	<1	<1
	9/28/2017	<1	<1	<1	<2	<1	<1	<1
	11/9/2017	<1	1.32	<1	<2	<1	<1	<1
	3/19/2018	<1	<1	<1	<2	<1	<1	<1
	5/16/2018	<1	<1	<1	<2	<1	<1	<1
	9/6/2018	<1	<1	<1	<2	<1	<1	<1
	12/11/2018	11	46	13	71	<2	<2	2.4
MW-10	3/6/2019	<2	<2	<2	<6	<2	<2	<2
	5/14/2019	<2	<2	<2	<6	<2	<2	<2
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS
	6/24/2014	<1/<1	<1/<1	<1/<1	<2/<2	<1/<1	8.96/13	<1/<1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	1.03	1.59	<1	<2	<1	9.42	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	<1	1.2	<1	<2	<1	6.6	<1
	9/28/2017	NS	NS	NS	NS	NS	NS	NS
	11/9/2017	NS	NS	NS	NS	NS	NS	NS
	3/19/2018	2.45	<1	2.09	4.63	1.01	3.96	2.55
	5/16/2018	<2	<1	<1	<2	<1	6.3	<1
	9/6/2018	<1	<1	<1	<2	<1	9.13	<1
MW-10	12/12/2018	13	46	15	73	<2	7.5	2.9
	3/6/2019	<2	<2	<2	<6	<2	7	<2
	5/14/2019	<2	<2	<2	<6	<2	5.8	<2
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS



TABLE 3
Groundwater Analytical Summary Table
Former Dunbar Amoco
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Monitoring Well ID								
	RMSC	5	1,000	700	10,000	1,100	20	100
	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Isopropylbenzene**	MTBE	Naphthalene
MW-10S	6/24/2014	164	88.1	476	1060	112	7	196
	8/28/2014	658	48.1	680	176	130	54.9	256
	6/30/2016	142	11.5	252	20.5	41.5	15.1	68
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	20	<5	36	<10	19	<5	9.9
	9/28/2017	NS	NS	NS	NS	NS	NS	NS
	11/9/2017	NS	NS	NS	NS	NS	NS	NS
	3/19/2018	49.9	<10	190	27.8	45.8	<10	53.3
	5/17/2018	27.6 / 35.3	<5 / 4.03	89 / 107	<10 / 9.37	31.9 / 37.3	<5 / 1.98	24.8 / 30.4
	9/6/2018	27.4	<5	77.2	<10	29.2	<5	23.8
	12/12/2018	16	15	31	30	17	<2	9.9
	3/6/2019	6	<2	37	<6	25	<2	18
	5/14/2019	7.7	<2	23	<6	18	<2	12
	9/18/2019	58	9.2	160	24	76	4.6	68
	11/12/2019	33.8	6.2	66.4	<10	36.4	<1.75	47.9
MW-12	6/24/2014	163	6.1	39.6	22.6	13.8	186	12.4
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	137/127	<25/<25	<25/<25	<50/<50	<25/<25	159/154	<25/<25
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	119 / 120	3.9 / 3.9	<1 / <1	4.6 / 4.5	12 / 11	114 / 114	7.6
	9/28/2017	161	<10	<10	<20	10.3	87.6	<10
	11/9/2017	78.8	<5	<5	<10	<5	68.1	<5
	3/19/2018	85.6	<10	<10	<20	<10	102	<10
	5/17/2018	14.5	<5	<5	<10	<5	99.8	<5
	9/6/2018	1.88	<1	<1	<2	<1	88.3	<1
	12/12/2018	<2	<2	<2	<6	<2	83	<2
	3/6/2019	<2	<2	<2	<6	<2	82	<2
	5/14/2019	<2	<2	<2	<6	<2	92	<2
	9/18/2019	<2/<2	<2/<2	<2/<2	<6/<6	<2/<2	74 / 80	<2/<2
	11/13/2019	<1.55	<5	<5	<10	<5	50.3	<5
MW-12S	6/24/2014	751	67	938	565	228	90.5	558
	8/28/2014	2,050/852	267/<100	787/801	888/440	132/154	123/102	381/411
	6/30/2016	972	48	346	79.8	69	121	<25
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	619	34.7	313	141	71.6	132	169
	9/28/2017	815	40.8	417	153	106	<10	241
	11/9/2017	619	46.2	444	158	62.2	<10	226
	3/19/2018	494	41.1	287	142	59.4	142	171
	5/17/2018	526	51.2	319	177	65.6	192	162
	9/6/2018	333	32.9	202	164	64.9	138	172
	12/12/2018	460	52	150	260	51	140	150
	3/6/2019	490	50	130	300	30	130	220
	5/14/2019	470	52	240	210	46	170	220
	9/18/2019	450	55	410	200	87	88	190
	11/13/2019	308	33.9	126	103	17.1	<3.5	136
MW-13	6/24/2014	38.8	4.16	34.8	26.5	4.84	34.6	4.06
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	Well Destroyed						
MW-13S	6/24/2014	188	47.2	564	237	69.5	40.7	172
	8/28/2014	599	68.6	740	418	111	74.1	206
	6/30/2016	Well Destroyed						
MW-14	6/24/2014	150	7.6	52.2	15.2	13	29.7	11.7
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	Well Destroyed						



TABLE 3
Groundwater Analytical Summary Table
Former Dunbar Amoco
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Monitoring Well ID								
	RMSC	5	1,000	700	10,000	1,100	20	100
	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Isopropylbenzene**	MTBE	Naphthalene
MW-15S	6/24/2014	26.9	1.85	4.15	5.52	<1	13.3	1.3
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	236	40	95.3	232	21.9	113	66.7
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	20	<1	<1	2.7	<1	6.5	1.2
	9/28/2017	302	35.7	136	194	26.6	303	87.4
	11/9/2017	49.4	<10	<10	<20	<10	<10	<10
	3/19/2018	13.9	<1	1.41	3.42	<1	3.68	2.15
	5/17/2018	20.9	1.47	<1	<2	<1	6.73	1.02
	9/6/2018	10.1	<1	<1	<2	<1	3.66	1.17
	12/11/2018	49	26	7.6	32	<2	17	3.6
	3/6/2019	10	<2	<2	<6	<2	6.7	<2
	5/14/2019	9.4	<2	<2	<6	<2	3.1	<2
	9/18/2019	160	11	<2	24	8.4	42	18
	11/13/2019	167	14.8	34	68.4	13.9	106	52
MW-16	6/24/2014	<1	<1	<1	<2	<1	<1	<1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	<1	<1	<1	<2	<1	<1	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	<1	<1	<1	<2	<1	<1	<1
	9/28/2017	<1	<1	<1	<2	<1	<1	<1
	11/9/2017	<1	<1	<1	<2	<1	<1	<1
	3/19/2018	1.78	<1	<1	<2	<1	<1	<1
	5/17/2018	<1	<1	<1	<2	<1	<1	<1
	9/6/2018	<1	<1	<1	<2	<1	<1	<1
	12/11/2018	12	47	13	68	<2	<2	3.2
	3/6/2019	2.1	8.1	2.4	8.7	13	<2	<2
	5/14/2019	<2	<2	<2	9.4	<2	<2	<2
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS
MW-17	6/24/2014	<1	<1	<1	<2	<1	<1	<1
	8/28/2014	NS	NS	NS	NS	NS	NS	NS
	6/30/2016	Well Destroyed						
MW-18S	6/24/2014	984	213	878	1120	182	310	365
	8/28/2014	554	149	884	2600	120	134	206
	6/30/2016	231	41.8	547	650	80.8	60.2	177
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	160	25.6	449	310	77.4	35.2	83.5
	9/28/2017	225 / 199	<50 / <25	588 / 523	280 / 246	100 / 90.8	<50 / 57.0	67 / 65.8
	11/9/2017	201	39.2	794	528	120	73	143
	3/19/2018	280	<50	462	699	79.5	67	108
	5/17/2018	204	<50	316	454	<50	58	65
	9/6/2018	157	30.8	500	349	80.5	53.2	90.9
	12/12/2018	190 / 190	48 / 44	570 / 530	400 / 350	100 / 94	56 / 56	120 / 110
	3/6/2019	260	94	630	760	94	63	140
	5/14/2019	120	35	480	570	62	46	82
	9/18/2019	200	43	150	380	150	72	82
	11/13/2019	192	43.5	664	653	84.3	92.3	152



TABLE 3
Groundwater Analytical Summary Table
Former Dunbar Amoco
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Monitoring Well ID								
	RMSC	5	1,000	700	10,000	1,100	20	100
	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Isopropylbenzene**	MTBE	Naphthalene
MW-19S	6/24/2014	23.5	<1	<1	<2	<1	167	<1
	8/28/2014	10.4	<2	<2	<4	<2	16.1	<2
	6/30/2016	39.4	<1	<1	<2	<1	64.3	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	2.9	<1	<1	<2	<1	146	<1
	9/28/2017	7.93	<1	<1	<2	<1	255	<1
	11/9/2017	13	<5	<5	<10	<5	224	<5
	3/19/2018	6.13	<1	<1	<2	<1	108	<1
	5/17/2018	9.44	<1	<1	<2	<1	127	<1
	9/6/2018	<1	<1	<1	<2	<1	72.2	<1
	12/12/2018	<2	<2	<2	<6	<2	110	<2
	3/6/2019	<2	<2	<2	<6	<2	130	<2
	5/14/2019	<2	<2	<2	<6	<2	32	<2
	9/18/2019	<2	<2	<2	<6	<2	170	<2
	11/13/2019	<1.55	<5	<5	<10	<5	116	<5
MW-20S	6/24/2014	29	<1	<1	<2	<1	114	<1
	8/28/2014	15.3	<2	<2	<4	<2	75.1	<2
	6/30/2016	65.4	<1	<1	<2	1.38	119	<1
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	49	<1	<1	2.4	<1	94.3	<1
	9/28/2017	42.5	<1	<1	<2	<1	109	<1
	11/9/2017	19.5	<1	<1	<2	<1	46.8	<1
	3/19/2018	21.6	<1	<1	<2	<1	60.4	1.14
	5/17/2018	49.1	<1	1	5.04	1.38	77.1	3.99
	9/6/2018	154	3.58	4.29	24.9	3.89	140	9.47
	12/12/2018	32	18	6.3	35	<2	61	4.8
	3/6/2019	33	<2	<2	<6	<2	85	3.8
	5/14/2019	57	<2	<2	8.6	2.4	85	8.1
	9/18/2019	39	<2	<2	<6	<2	130	<2
	11/13/2019	29.8	<1	<1	<2	<1	97.4	<1
MW-21S	6/24/2014	9.41	<1	<1	<2	<1	19.1	<1
	8/28/2014	<1	<1	<1	<2	<1	<1	<1
	6/30/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	4.7	<1	<1	<2	2.3	18.6	<1
	9/28/2017	8.14	<1	<1	<2	<1	11.2	<1
	11/9/2017	3.99/ 4.06	<1	<1	<2	<1	8.56 / 9.14	<1
	3/19/2018	5.15	<5	<5	<10	<5	14.7	<5
	5/17/2018	3.19	<1	<1	<2	<1	13.5	<1
	9/6/2018	3.32	<1	<1	<2	<1	10	<1
	12/11/2018	5.2	19	6.5	35	<2	6.3	<2
	3/6/2019	13	<2	<2	<6	<2	8.5	<2
	5/14/2019	12	<2	<2	<6	<2	12	<2
	9/18/2019	9.1	<2	<2	<6	<2	12	<2
	11/13/2019	4.08	<1	<1	<2	<1	7.65	<1



TABLE 3
Groundwater Analytical Summary Table
Former Dunbar Amoco
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Monitoring Well ID								
	RMSC	5	1,000	700	10,000	1,100	20	100
	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Isopropylbenzene**	MTBE	Naphthalene
MW-22S	6/24/2014	1280	63	234	373	71.1	154	163
	8/28/2014	585	48	332	420	61	163	147
	6/30/2016	110	14.5	118	117	37.9	30.5	47
	9/20/2016	NS	NS	NS	NS	NS	NS	NS
	6/29/2017*	95	13	150	70	44	24	30
	9/28/2017	129	<10	229	<20	61.3	<10	11.2
	11/9/2017	115	19.6	289	106	76.3	41.1	44
	3/19/2018	105	10.6	69.6	40.8	19.4	28.5	16.6
	5/17/2018	110	17.8	137	74.7	42.3	34.3	39.8
	9/6/2018	86.4	19.4	115	95.7	55.2	32.1	52.2
	12/12/2018	150	26	190	90	59	38	58
	3/6/2019	210	23	160	87	54	71	49
	5/14/2019	120 /100	22 /19	210 /180	94 /78	61 /50	30 /39	65 /58
	9/18/2019	240	48	640	450	130	57	140
	11/13/2019	210	37.6	446	273	79.4	56.6	130
MW-23S	6/30/2016	<1	<1	<1	<2	<1	<1	<1
	9/20/2016	<1/<1	<1/<1	<1/<1	<2/<2	<1/<1	2.0/1.9	<1/<1
	6/29/2017*	<1	<1	<1	<2	<1	<1	<1
	9/28/2017	<1	<1	<1	<2	<1	<1	<1
	11/9/2017	<1	<1	<1	<2	<1	<1	<1
	3/19/2018	<1	<1	<1	<2	<1	<1	<1
	5/17/2018	<1	<1	<1	<2	<1	<1	<1
	9/6/2018	<1	<1	<1	<2	<1	<1	<1
	12/12/2018	<2	<2	<2	<6	<2	<2	2.3
	3/6/2019	<2	<2	<2	<6	<2	<2	<2
	5/14/2019	<2	<2	<2	<6	<2	<2	<2
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS
MW-24S	6/30/2016	<1	<1	<1	<2	<1	25.9	<1
	9/20/2016	<1	<1	<1	<2	<1	20.2	<1
	6/29/2017*	<1	<1	<1	<2	<1	13	<1
	9/28/2017	<1	<1	<1	<2	<1	9.9	<1
	11/9/2017	<1	<1	<1	<2	<1	<1	<1
	3/19/2018	<1	<1	<1	<2	<1	5.69	<1
	5/17/2018	<1	<1	<1	<2	<1	2.13	<1
	9/6/2018	<1	<1	<1	<2	<1	2.74	<1
	12/12/2018	5	25	8	42	<2	5.5	<2
	3/6/2019	<2	<2	<2	<6	<2	<4	<2
	5/14/2019	<2	<2	<2	<6	<2	3.5	<2
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS
MW-25S	6/30/2016	<1	<1	<1	<2	<1	17.5	<1
	9/20/2016	<1	<1	<1	<2	<1	15.7	<1
	6/29/2017*	<1	<1	<1	<2	<1	16.6	<1
	9/28/2017	<1	<1	<1	<2	<1	15.9	<1
	11/9/2017	<1	<1	<1	<2	<1	13.2	<1
	3/19/2018	<1	<1	<1	<2	<1	15	<1
	5/17/2018	<1	<1	<1	<2	<1	15	<1
	9/6/2018	<1	<1	<1	<2	<1	14	<1
	12/11/2018	6.5	28	8.4	44	<2	14	<2
	3/6/2019	<2	<2	<2	<6	<2	14	<2
	5/14/2019	<2	<2	<2	<6	<2	16	<2
	9/18/2019	NS	NS	NS	NS	NS	NS	NS
	11/13/2019	NS	NS	NS	NS	NS	NS	NS



TABLE 3
Groundwater Analytical Summary Table
Former Dunbar Amoco
13-17313-01

Monitoring Well ID	RMSC	5	1,000	700	10,000	1,100	20	100
	Sample Date	Benzene	Toluene	Ethylbenzene	Total Xylenes	Isopropylbenzene**	MTBE	Naphthalene
MW-26S	6/30/2016	6	<5	<5	<10	<5	7.3	<5
	9/20/2016	2.61	<1	<1	<2	2.74	8.88	<1
	6/29/2017*	<1	<1	<1	<2	1.3	4.4	<1
	9/28/2017	1.11	1.97	<1	<2	<1	7.17	<1
	11/9/2017	2.1	<1	<1	<2	7.21	6.71	<1
	3/19/2018	1.41	<1	1.27	<2	3.4	6.16	1.1
	5/16/2018	<1	<1	<1	<2	<1	3.81	<1
	9/6/2018	<1	<1	<1	<2	<1	4.64	<1
	12/11/2018	2.5	13	5.1	27	<2	3.4	<2
	3/6/2019	5.3	4.2	9.1	8.9	5.2	5.4	<2
	5/14/2019	2.5	<2	<2	<6	<2	5.3	<2
	9/18/2019	<2	<2	<2	<6	<2	5.6	<2
	11/13/2019	<1	<1	<1	<2	<1	5.61	<1
MW-27S^	6/30/2016	<1	<1	<1	<2	<1	27.8	<1
	9/20/2016	<1	<1	<1	<2	<1	10.6	<1
	6/29/2017*	<1	<1	<1	<2	<1	26	<1
	9/28/2017	<1	<1	<1	<2	<1	29.5	<1
	11/9/2017	Under large gravel pile, could not access						
	3/19/2018	Under large gravel pile, could not access						
	5/17/2018	Under large gravel pile, could not access						
	11/12/2018	<2	<2	<2	<6	<2	35	<2
	12/12/2018	<2	<2	<2	<6	<2	19	<2
	3/6/2019	<2	<2	<2	<6	<2	<2	<2
	5/14/2019	<2	<2	<2	<6	<2	<2	<2
	9/18/2019	<2	<2	<2	<6	<2	<2	<2
	11/13/2019	<1	<1	<1	<2	<1	<1	<1
POND	6/30/2016	<1	<1	<1	<2	<1	<1	<1
	9/20/2016	<1	<1	<1	<2	<1	<1	<1
	9/28/2017	<1	<1	<1	<2	<1	<1	<1
	11/9/2017	<1	<1	<1	<2	<1	<1	<1
	3/19/2018	<1	<1	<1	<2	<1	<1	<1
	5/16/2018	<1	6.7	<1	<2	<1	<1	<1
	9/6/2018	<1	<1	<1	<2	<1	<1	<1
	12/12/2018	<2	<2	<2	<6	<2	<2	<2
	3/6/2019	NS	NS	NS	NS	NS	NS	NS
	5/14/2019	<2	<2	<2	<6	<2	<2	<2
	9/18/2019	<2	<2	<2	<6	<2	<2	<2
	11/13/2019	<1	<1	<1	<2	<1	<1	<1
Trip Blank	6/24/2014	<1	<1	<1	<2	<1	<1	<1
	8/28/2014	<1	<1	<1	<2	<1	<1	<1
	6/30/2016	<1	<1	<1	<2	<1	<1	<1
	9/20/2016	<1	<1	<1	<2	<1	<1	<1
	6/29/2017*	<1	<1	<1	<2	<1	<1	<1
	3/19/2018	<1	<1	<1	<2	<1	<1	<1

Notes: Concentrations measured in micrograms per liter (ug/L)
 NS - Not Sampled 12/11/19*- MW-4 Sampled on 1/11/19
 NA - Not Analyzed Monitoring wells MW-4, MW-6, MW-7, MW-8, MW-10, MW-13, MW-16, MW-17,
 WD - Well destroyed MW-23S, MW-24S, MW-25S were removed from the sample regime with PADEP
 MTBE - Methyl-Tert Butyl Ether approval on 8/30/2019
 1,3,5-TMB: 1,3,5-Trimethylbenzene
 1,2,4-TMB: 1,2,4-Trimethylbenzene
 ** Isopropylbenzene is also known as cumene
 1.3/1.7 represents a duplicate sample taken
 6/29/2017*- Samples MW-23S through MW-26S collected on 7/7/17
 MW-27S^ - This well was labeled as MW-4 for sampling date 6/29/2017 on the Fairway Laboratory Data Report
 RMSC: Residential Used Aquifer Medium Specific Concentration



Appendix C



2019 Ninth Avenue
PO Box 1925
Altoona, PA 16603
(814) 946-4306



NELAP: PA 07-062, VA 460212
State Certifications: MD 275, WV 364

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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Sample Type	Date Sampled	Date Received
MW-3	9K15085-01	Water	Grab	11/13/19 15:39	11/14/19 15:30
MW-12	9K15085-02	Water	Grab	11/12/19 15:54	11/14/19 15:30
MW-12S	9K15085-03	Water	Grab	11/12/19 16:14	11/14/19 15:30
MW-15S	9K15085-04	Water	Grab	11/13/19 09:03	11/14/19 15:30
MW-18S	9K15085-05	Water	Grab	11/12/19 16:35	11/14/19 15:30
MW-19S	9K15085-06	Water	Grab	11/13/19 10:37	11/14/19 15:30
MW-20S	9K15085-07	Water	Grab	11/13/19 11:38	11/14/19 15:30
MW-22S	9K15085-08	Water	Grab	11/12/19 13:07	11/14/19 15:30
MW-26S	9K15085-09	Water	Grab	11/12/19 17:22	11/14/19 15:30
MW-27S	9K15085-10	Water	Grab	11/12/19 11:25	11/14/19 15:30
MW-21S	9K15085-11	Water	Grab	11/13/19 12:41	11/14/19 15:30
MW-19S	9K15085-12	Water	Grab	11/12/19 14:15	11/14/19 15:30
POND	9K15085-13	Water	Grab	11/13/19 13:20	11/14/19 15:30
DUP	9K15085-14	Water	Grab	11/13/19 00:00	11/14/19 15:30
GAC	9K15085-15	Water	Grab	11/13/19 17:38	11/14/19 15:30

Fairway Laboratories, Inc.

Reviewed and Submitted by:

Michael P. Tyler
Laboratory Director

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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-3

Date/Time Sampled: 11/13/19 15:39

Laboratory Sample ID: 9K15085-01 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	<1.00	1.00	ug/l	11/18/19 19:48	EPA 8260B	JMG
Toluene	<1.00	1.00	ug/l	11/18/19 19:48	EPA 8260B	JMG
Ethylbenzene	<1.00	1.00	ug/l	11/18/19 19:48	EPA 8260B	JMG
Xylenes (total)	<2.00	2.00	ug/l	11/18/19 19:48	EPA 8260B	JMG
Isopropylbenzene	<1.00	1.00	ug/l	11/18/19 19:48	EPA 8260B	JMG
Methyl tert-butyl ether	<1.00	1.00	ug/l	11/18/19 19:48	EPA 8260B	JMG
Naphthalene	<1.00	1.00	ug/l	11/18/19 19:48	EPA 8260B	JMG
Surrogate: 4-Bromofluorobenzene	102 %	70-130		11/18/19 19:48	EPA 8260B	JMG
Surrogate: 1,2-Dichloroethane-d4	99.1 %	70-130		11/18/19 19:48	EPA 8260B	JMG
Surrogate: Fluorobenzene	101 %	70-130		11/18/19 19:48	EPA 8260B	JMG



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Converse
2738 West College Avenue
State College PA, 16801
Project Manager: Partick Cassidy

Project: DUNBAR AMOCO
Project Number: [none]
Collector: CLIENT
Number of Containers: 30

Reported:
11/21/19 15:13

Client Sample ID: MW-12

Date/Time Sampled: 11/12/19 15:54

Laboratory Sample ID: 9K15085-02 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Q

Benzene	<1.55	1.55	ug/l	11/19/19 12:55	EPA 8260B	JMG	S
Toluene	<5.00	5.00	ug/l	11/19/19 12:55	EPA 8260B	JMG	
Ethylbenzene	<5.00	5.00	ug/l	11/19/19 12:55	EPA 8260B	JMG	
Xylenes (total)	<10.0	10.0	ug/l	11/19/19 12:55	EPA 8260B	JMG	
Isopropylbenzene	<5.00	5.00	ug/l	11/19/19 12:55	EPA 8260B	JMG	
Methyl tert-butyl ether	50.3	5.00	ug/l	11/19/19 12:55	EPA 8260B	JMG	
Naphthalene	<5.00	5.00	ug/l	11/19/19 12:55	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene	106 %	70-130		11/19/19 12:55	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4	102 %	70-130		11/19/19 12:55	EPA 8260B	JMG	
Surrogate: Fluorobenzene	100 %	70-130		11/19/19 12:55	EPA 8260B	JMG	

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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-12S

Date/Time Sampled: 11/12/19 16:14

Laboratory Sample ID: 9K15085-03 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Q

Benzene	308		10.0	ug/l	11/19/19 14:49	EPA 8260B	JMG	
Toluene	33.9		10.0	ug/l	11/19/19 14:49	EPA 8260B	JMG	
Ethylbenzene	126		10.0	ug/l	11/19/19 14:49	EPA 8260B	JMG	
Xylenes (total)	103		20.0	ug/l	11/19/19 14:49	EPA 8260B	JMG	
Isopropylbenzene	17.1		10.0	ug/l	11/19/19 14:49	EPA 8260B	JMG	
Methyl tert-butyl ether	<3.50		3.50	ug/l	11/19/19 14:49	EPA 8260B	JMG	S
Naphthalene	136		10.0	ug/l	11/19/19 14:49	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		102 %	70-130		11/19/19 14:49	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		100 %	70-130		11/19/19 14:49	EPA 8260B	JMG	
Surrogate: Fluorobenzene		100 %	70-130		11/19/19 14:49	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-15S

Date/Time Sampled: 11/13/19 09:03

Laboratory Sample ID: 9K15085-04 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Q

Benzene	167		10.0	ug/l	11/19/19 15:18	EPA 8260B	JMG	
Toluene	14.8		10.0	ug/l	11/19/19 15:18	EPA 8260B	JMG	
Ethylbenzene	34.0		10.0	ug/l	11/19/19 15:18	EPA 8260B	JMG	
Xylenes (total)	68.4		20.0	ug/l	11/19/19 15:18	EPA 8260B	JMG	
Isopropylbenzene	13.9		10.0	ug/l	11/19/19 15:18	EPA 8260B	JMG	
Methyl tert-butyl ether	106		10.0	ug/l	11/19/19 15:18	EPA 8260B	JMG	
Naphthalene	52.0		10.0	ug/l	11/19/19 15:18	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene	103 %		70-130		11/19/19 15:18	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4	96.3 %		70-130		11/19/19 15:18	EPA 8260B	JMG	
Surrogate: Fluorobenzene	101 %		70-130		11/19/19 15:18	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-18S

Date/Time Sampled: 11/12/19 16:35

Laboratory Sample ID: 9K15085-05 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Q

Benzene	192		10.0	ug/l	11/19/19 15:46	EPA 8260B	JMG	
Toluene	43.5		10.0	ug/l	11/19/19 15:46	EPA 8260B	JMG	
Ethylbenzene	664		10.0	ug/l	11/19/19 15:46	EPA 8260B	JMG	
Xylenes (total)	653		20.0	ug/l	11/19/19 15:46	EPA 8260B	JMG	
Isopropylbenzene	84.3		10.0	ug/l	11/19/19 15:46	EPA 8260B	JMG	
Methyl tert-butyl ether	92.3		10.0	ug/l	11/19/19 15:46	EPA 8260B	JMG	
Naphthalene	152		10.0	ug/l	11/19/19 15:46	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		101 %	70-130		11/19/19 15:46	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		93.3 %	70-130		11/19/19 15:46	EPA 8260B	JMG	
Surrogate: Fluorobenzene		100 %	70-130		11/19/19 15:46	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-19S

Date/Time Sampled: 11/13/19 10:37

Laboratory Sample ID: 9K15085-06 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Q

Benzene	<1.55	1.55	ug/l	11/19/19 13:24	EPA 8260B	JMG	S
Toluene	<5.00	5.00	ug/l	11/19/19 13:24	EPA 8260B	JMG	
Ethylbenzene	<5.00	5.00	ug/l	11/19/19 13:24	EPA 8260B	JMG	
Xylenes (total)	<10.0	10.0	ug/l	11/19/19 13:24	EPA 8260B	JMG	
Isopropylbenzene	<5.00	5.00	ug/l	11/19/19 13:24	EPA 8260B	JMG	
Methyl tert-butyl ether	116	5.00	ug/l	11/19/19 13:24	EPA 8260B	JMG	
Naphthalene	<5.00	5.00	ug/l	11/19/19 13:24	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene	102 %	70-130		11/19/19 13:24	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4	101 %	70-130		11/19/19 13:24	EPA 8260B	JMG	
Surrogate: Fluorobenzene	101 %	70-130		11/19/19 13:24	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-20S

Date/Time Sampled: 11/13/19 11:38

Laboratory Sample ID: 9K15085-07 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	29.8		1.00	ug/l	11/18/19 20:16	EPA 8260B	JMG	
Toluene	<1.00		1.00	ug/l	11/18/19 20:16	EPA 8260B	JMG	
Ethylbenzene	<1.00		1.00	ug/l	11/18/19 20:16	EPA 8260B	JMG	
Xylenes (total)	<2.00		2.00	ug/l	11/18/19 20:16	EPA 8260B	JMG	
Isopropylbenzene	<1.00		1.00	ug/l	11/18/19 20:16	EPA 8260B	JMG	
Methyl tert-butyl ether	97.4		1.00	ug/l	11/18/19 20:16	EPA 8260B	JMG	
Naphthalene	<1.00		1.00	ug/l	11/18/19 20:16	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		104 %	70-130		11/18/19 20:16	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		103 %	70-130		11/18/19 20:16	EPA 8260B	JMG	
Surrogate: Fluorobenzene		100 %	70-130		11/18/19 20:16	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-22S

Date/Time Sampled: 11/12/19 13:07

Laboratory Sample ID: 9K15085-08 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Q

Benzene	210		5.00	ug/l	11/19/19 13:52	EPA 8260B	JMG	
Toluene	37.6		5.00	ug/l	11/19/19 13:52	EPA 8260B	JMG	
Ethylbenzene	446		5.00	ug/l	11/19/19 13:52	EPA 8260B	JMG	
Xylenes (total)	273		10.0	ug/l	11/19/19 13:52	EPA 8260B	JMG	
Isopropylbenzene	79.4		5.00	ug/l	11/19/19 13:52	EPA 8260B	JMG	
Methyl tert-butyl ether	56.6		5.00	ug/l	11/19/19 13:52	EPA 8260B	JMG	
Naphthalene	130		5.00	ug/l	11/19/19 13:52	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene	105 %		70-130		11/19/19 13:52	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4	100 %		70-130		11/19/19 13:52	EPA 8260B	JMG	
Surrogate: Fluorobenzene	100 %		70-130		11/19/19 13:52	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-26S

Date/Time Sampled: 11/12/19 17:22

Laboratory Sample ID: 9K15085-09 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	<1.00		1.00	ug/l	11/18/19 20:45	EPA 8260B	JMG	
Toluene	<1.00		1.00	ug/l	11/18/19 20:45	EPA 8260B	JMG	
Ethylbenzene	<1.00		1.00	ug/l	11/18/19 20:45	EPA 8260B	JMG	
Xylenes (total)	<2.00		2.00	ug/l	11/18/19 20:45	EPA 8260B	JMG	
Isopropylbenzene	<1.00		1.00	ug/l	11/18/19 20:45	EPA 8260B	JMG	
Methyl tert-butyl ether	5.61		1.00	ug/l	11/18/19 20:45	EPA 8260B	JMG	
Naphthalene	<1.00		1.00	ug/l	11/18/19 20:45	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		104 %	70-130		11/18/19 20:45	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		106 %	70-130		11/18/19 20:45	EPA 8260B	JMG	
Surrogate: Fluorobenzene		98.1 %	70-130		11/18/19 20:45	EPA 8260B	JMG	

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Converse
2738 West College Avenue
State College PA, 16801
Project Manager: Partick Cassidy

Project: DUNBAR AMOCO
Project Number: [none]
Collector: CLIENT
Number of Containers: 30

Reported:
11/21/19 15:13

Client Sample ID: MW-27S

Date/Time Sampled: 11/12/19 11:25

Laboratory Sample ID: 9K15085-10 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	<1.00		1.00	ug/l	11/18/19 21:13	EPA 8260B	JMG	
Toluene	<1.00		1.00	ug/l	11/18/19 21:13	EPA 8260B	JMG	
Ethylbenzene	<1.00		1.00	ug/l	11/18/19 21:13	EPA 8260B	JMG	
Xylenes (total)	<2.00		2.00	ug/l	11/18/19 21:13	EPA 8260B	JMG	
Isopropylbenzene	<1.00		1.00	ug/l	11/18/19 21:13	EPA 8260B	JMG	
Methyl tert-butyl ether	<1.00		1.00	ug/l	11/18/19 21:13	EPA 8260B	JMG	
Naphthalene	<1.00		1.00	ug/l	11/18/19 21:13	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		105 %	70-130		11/18/19 21:13	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		98.8 %	70-130		11/18/19 21:13	EPA 8260B	JMG	
Surrogate: Fluorobenzene		99.4 %	70-130		11/18/19 21:13	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-21S

Date/Time Sampled: 11/13/19 12:41

Laboratory Sample ID: 9K15085-11 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	4.08		1.00	ug/l	11/18/19 21:41	EPA 8260B	JMG	
Toluene	<1.00		1.00	ug/l	11/18/19 21:41	EPA 8260B	JMG	
Ethylbenzene	<1.00		1.00	ug/l	11/18/19 21:41	EPA 8260B	JMG	
Xylenes (total)	<2.00		2.00	ug/l	11/18/19 21:41	EPA 8260B	JMG	
Isopropylbenzene	<1.00		1.00	ug/l	11/18/19 21:41	EPA 8260B	JMG	
Methyl tert-butyl ether	7.65		1.00	ug/l	11/18/19 21:41	EPA 8260B	JMG	
Naphthalene	<1.00		1.00	ug/l	11/18/19 21:41	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		103 %	70-130		11/18/19 21:41	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		102 %	70-130		11/18/19 21:41	EPA 8260B	JMG	
Surrogate: Fluorobenzene		98.7 %	70-130		11/18/19 21:41	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: MW-19S

Date/Time Sampled: 11/12/19 14:15

Laboratory Sample ID: 9K15085-12 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

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Benzene	38.8		5.00	ug/l	11/19/19 14:21	EPA 8260B	JMG	
Toluene	6.20		5.00	ug/l	11/19/19 14:21	EPA 8260B	JMG	
Ethylbenzene	66.4		5.00	ug/l	11/19/19 14:21	EPA 8260B	JMG	
Xylenes (total)	<10.0		10.0	ug/l	11/19/19 14:21	EPA 8260B	JMG	
Isopropylbenzene	36.4		5.00	ug/l	11/19/19 14:21	EPA 8260B	JMG	
Methyl tert-butyl ether	<1.75		1.75	ug/l	11/19/19 14:21	EPA 8260B	JMG	S
Naphthalene	47.9		5.00	ug/l	11/19/19 14:21	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		105 %	70-130		11/19/19 14:21	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		106 %	70-130		11/19/19 14:21	EPA 8260B	JMG	
Surrogate: Fluorobenzene		104 %	70-130		11/19/19 14:21	EPA 8260B	JMG	

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Converse
2738 West College Avenue
State College PA, 16801
Project Manager: Partick Cassidy

Project: DUNBAR AMOCO
Project Number: [none]
Collector: CLIENT
Number of Containers: 30

Reported:
11/21/19 15:13

Client Sample ID: POND

Date/Time Sampled: 11/13/19 13:20

Laboratory Sample ID: 9K15085-13 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	<1.00		1.00	ug/l	11/18/19 22:10	EPA 8260B	JMG	
Toluene	<1.00		1.00	ug/l	11/18/19 22:10	EPA 8260B	JMG	
Ethylbenzene	<1.00		1.00	ug/l	11/18/19 22:10	EPA 8260B	JMG	
Xylenes (total)	<2.00		2.00	ug/l	11/18/19 22:10	EPA 8260B	JMG	
Isopropylbenzene	<1.00		1.00	ug/l	11/18/19 22:10	EPA 8260B	JMG	
Methyl tert-butyl ether	<1.00		1.00	ug/l	11/18/19 22:10	EPA 8260B	JMG	
Naphthalene	<1.00		1.00	ug/l	11/18/19 22:10	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		102 %	70-130		11/18/19 22:10	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		104 %	70-130		11/18/19 22:10	EPA 8260B	JMG	
Surrogate: Fluorobenzene		99.8 %	70-130		11/18/19 22:10	EPA 8260B	JMG	



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Converse
2738 West College Avenue
State College PA, 16801
Project Manager: Partick Cassidy

Project: DUNBAR AMOCO
Project Number: [none]
Collector: CLIENT
Number of Containers: 30

Reported:
11/21/19 15:13

Client Sample ID: DUP

Date/Time Sampled: 11/13/19 00:00

Laboratory Sample ID: 9K15085-14 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	<1.00		1.00	ug/l	11/18/19 22:38	EPA 8260B	JMG	
Toluene	<1.00		1.00	ug/l	11/18/19 22:38	EPA 8260B	JMG	
Ethylbenzene	<1.00		1.00	ug/l	11/18/19 22:38	EPA 8260B	JMG	
Xylenes (total)	<2.00		2.00	ug/l	11/18/19 22:38	EPA 8260B	JMG	
Isopropylbenzene	<1.00		1.00	ug/l	11/18/19 22:38	EPA 8260B	JMG	
Methyl tert-butyl ether	5.52		1.00	ug/l	11/18/19 22:38	EPA 8260B	JMG	
Naphthalene	<1.00		1.00	ug/l	11/18/19 22:38	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene		106 %	70-130		11/18/19 22:38	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4		99.1 %	70-130		11/18/19 22:38	EPA 8260B	JMG	
Surrogate: Fluorobenzene		99.8 %	70-130		11/18/19 22:38	EPA 8260B	JMG	



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Client Sample ID: GAC

Date/Time Sampled: 11/13/19 17:38

Laboratory Sample ID: 9K15085-15 (Water/Grab)

Analyte	Result	MDL	RL	Units	Date / Time Analyzed	Analytical Method	* Analyst	Note
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Volatile Organic Compounds by EPA Method 8260B/Prep Method 5030B

Benzene	<1.00		1.00	ug/l	11/18/19 23:06	EPA 8260B	JMG	
Toluene	<1.00		1.00	ug/l	11/18/19 23:06	EPA 8260B	JMG	
Ethylbenzene	<1.00		1.00	ug/l	11/18/19 23:06	EPA 8260B	JMG	
Xylenes (total)	<2.00		2.00	ug/l	11/18/19 23:06	EPA 8260B	JMG	
Isopropylbenzene	<1.00		1.00	ug/l	11/18/19 23:06	EPA 8260B	JMG	
Methyl tert-butyl ether	<1.00		1.00	ug/l	11/18/19 23:06	EPA 8260B	JMG	
Naphthalene	<1.00		1.00	ug/l	11/18/19 23:06	EPA 8260B	JMG	
Surrogate: 4-Bromofluorobenzene	103 %		70-130		11/18/19 23:06	EPA 8260B	JMG	
Surrogate: 1,2-Dichloroethane-d4	100 %		70-130		11/18/19 23:06	EPA 8260B	JMG	
Surrogate: Fluorobenzene	100 %		70-130		11/18/19 23:06	EPA 8260B	JMG	

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Converse	Project:	DUNBAR AMOCO	
2738 West College Avenue	Project Number:	[none]	Reported:
State College PA, 16801	Collector:	CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers:	30	

Notes

- Q Sample was analyzed at a dilution. Reporting limits were adjusted accordingly.
- S This analysis has been reported to the MDL; therefore it is an estimated value.



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Definitions:

If surrogate values are not within the indicated range, then the results are considered to be estimated.

Reporting limits are adjusted accordingly when samples are analyzed at a dilution due to the matrix.

MBAS, calculated as LAS, mol wt 348

If the solid sample weight for VOC analysis does not fall within the 3.5-6.5 gram range, the results are considered estimated values.

Unless otherwise noted, all results for solids are reported on a dry weight basis.

Samples collected by Fairway Laboratories' personnel are done so in accordance with Standard Operating Procedures established by Fairway Laboratories.

The following analyses are to be performed immediately upon sampling: pH, sulfite, chlorine residual, dissolved oxygen, filtration for ortho phosphorus, and ferrous iron. The date and time reported reflect the time the samples were analyzed at the laboratory; and should be considered as analyzed outside the EPA holding time.

^ The following analytes are to be filtered immediately upon sampling: Hexavalent Chromium. Filtration through a 0.45 micron filter within 15 minutes of sampling is required for compliance with the Clean Water Act (CWA) for reporting of hexavalent chromium to prevent interconversion of chromium species.

* **Analysis location indicator:**
D: Indicates analysis performed by Fairway Laboratories, Inc., 110 McCracken Run Rd., DuBois, PA 15801. PA DEP Chapter 252 certification: PA 33-00258.
G: Indicates analysis performed by Fairway Laboratories, Inc., 4727 Route 30 Ste 204, Greensburg, PA 15601. PA DEP Chapter 252 certification: PA 65-00392.
P: Indicates analysis performed by Fairway Laboratories, Inc., 89 Kristi Rd., Pennsdale, PA 17756. PA DEP Chapter 252 certification: PA 41-04684.
W: Indicates analysis performed by Fairway Laboratories, Inc., 1950 Golden Mile Rd., Wysox, PA 18854. NELAP certification: PA 08-05622.

< Represents "less than" - indicates that the result was less than the reporting limit.

MDL Method Detection Limit - is the lowest or minimum level that provides 99% confidence level that the analyte is detected. Any reported result values that are less than the RL are considered estimated values. If Radiological results are reported, the MDC - Minimum Detectable Concentration is shown in the MDL column.

RL Reporting Limit - is the lowest or minimum level at which the analyte can be quantified.

[CALC] Indicates a calculated result. Calculations use results from other analyses performed under accredited methods.



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Converse	Project: DUNBAR AMOCO	
2738 West College Avenue	Project Number: [none]	Reported:
State College PA, 16801	Collector: CLIENT	11/21/19 15:13
Project Manager: Partick Cassidy	Number of Containers: 30	

Terms & Conditions

Services provided by Fairway Laboratories Inc. are limited to the terms and conditions stated herein, unless otherwise agreed to in a formal contract.

CHAIN OF CUSTODY Fairway Laboratories Inc. ("Fairway," "us" or "we") will initiate a chain-of-custody/request for analysis upon sample receipt unless the client includes a completed form with the received sample(s). Upon request, Fairway will provide chain-of-custody forms for use.

CONFIDENTIALITY Fairway maintains confidentiality in all of our client interactions. The client's consent will be required before releasing information about the services provided.

CONTRACTS All contracts are subject to review and approval by Fairway's legal council. Each contract must be signed by a corporate officer.

PAYMENT/BILLING Unless otherwise set forth in a signed contract or purchase order, terms of payment are "NET 30 Days." The time allowed for payment shall begin based on the invoice date. A 1.5% per month service charge may be added to all unpaid balances beyond the initial 30 days. In its sole discretion, Fairway reserves the right to request payment before services and hold sample results for payment of due balances. We will not bill a third party without prior agreement among all parties acknowledging and accepting responsibility for payment.

SAMPLE COLLECTION AND SUBMISSION Clients not requesting collection services from Fairway are responsible for proper collection, preservation, packaging, and delivery of samples to the laboratory in accordance with current law and commercial practice. Fairway shall have no responsibility for sample integrity prior to the receipt of the sample(s) and/or for any inaccuracy in test or analyses results as a result of the failure of the client or any third party to maintain the integrity of samples prior to delivery to Fairway. All samples submitted must be accompanied by a completed chain of custody or similar document clearly noting the requested analyses, dates/time sampled, client contact information, and trail of custody. Samples received at the laboratory after business hours are verified on the next business day. Discrepancies are documented on the Receiving Document.

SUBCONTRACTING Some analyses may require subcontracting to another laboratory. Unless the client indicates otherwise, this decision will be made by Fairway. Subcontracted work will be identified on the final report in accordance with NELAC requirements.

RETURN OF RESULTS Fairway routinely provides faxed or verbal results within 10 working days of receipt of sample(s) and a hard copy of the data results is routinely received via US Postal Service within 15 working days. At the request of the client, Fairway may offer expedited return of sample results. Surcharges may apply to rush requests. All rush requests must be pre-approved by Fairway. We reserve the right to charge an archive retrieval fee for results older than one (1) year from the date of the request. All records will be maintained by Fairway for 5 years, after which, they will be destroyed.

SAMPLE DISPOSAL Fairway will maintain samples for four (4) weeks after the sample receipt date. Fairway will dispose of samples which are not and/or do not contain hazardous wastes (as such term is defined by applicable federal or state law), unless prior arrangements have been made for long-term storage. Fairway reserves the right to charge a disposal fee for the proper disposal of samples found or suspected to contain hazardous waste. A return shipping charge will be invoiced for samples returned to the client at their request.

HAZARD COMMUNICATION The client has the responsibility to inform the laboratory of any hazardous characteristics known or suspected about the sample, and to provide information on hazard prevention and personal protection as necessary or otherwise required by applicable law.

WARRANTY AND LIMITATION OF LIABILITY For services rendered, Fairway warrants that it will apply its best scientific knowledge and judgment and to employ its best level of effort consistent with professional standards within the environmental testing industry in performing the analytical services requested by its clients. We disclaim any other warranties, expressed or implied by law. Fairway does not accept any legal responsibility for the purposes for which client uses the test results.

LITIGATION All costs associated with compliance to any subpoena for documents, for testimony in a court of law, or for any other purpose relating to work performed by Fairway Laboratories, Inc. shall be invoiced by Fairway and paid by client. These costs shall include, but are not limited to, hourly charges for the persons involved, travel, mileage, and accommodations and for any and all other expenses associated with said litigation.

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Fax: (814) 946-8791

Client Page # 1 of 2

Client Name: <u>Converse Consultants</u> Address: <u>2738 W. Converse Ave.</u> <u>State College, PA 16801</u> Contact: _____ Phone #: <u>(814) 234-3223</u> Fax #: _____ Project Name: <u>Dunbar Amoco</u> Quote/PO #: _____		Received on ice? Y <input type="checkbox"/> N <input type="checkbox"/> Sample Temp: _____ Reportable to PADEP? Yes <input type="checkbox"/> PWSID # _____		Analyses Requested PADEP sheet 1st unleaded gasoline						LAB USE ONLY Work Order # <u>925085</u> Attach # <u>1</u> FLI Page # <u>1</u> of <u>3</u> Tracking # _____ Bottle Type/Comments _____				
TAT: Normal <input type="checkbox"/> Rush <input type="checkbox"/> Rush TAT subject to pre-approval and surcharge. Date Required: ____/____/____		GRAB Composite	Composite Start End	GRAB -or- Composite Start End	Matrix Solid Water Other	# of Containers 2								
Sample Description/Location		GRAB Composite	Start Date Time	Start Date Time	End Date Time	End Date Time	Solid Water Other	# of Containers	Bottle Type/Comments					
MW-3		<input checked="" type="checkbox"/>	11/13	2:29	11/13	5:39	<input checked="" type="checkbox"/>	2	40 ml HCL					
MW-12		<input type="checkbox"/>	11/12	3:08	11/12	3:54	<input type="checkbox"/>	1						
MW-12S		<input type="checkbox"/>	11/12	4:12	11/12	4:14	<input type="checkbox"/>	1						
MW-15S		<input type="checkbox"/>	11/13	8:37	11/13	9:03	<input type="checkbox"/>	1						
MW-18S		<input type="checkbox"/>	11/12	10:51	11/12	4:35	<input type="checkbox"/>	1						
MW-19S		<input type="checkbox"/>	11/13	10:11	11/13	10:57	<input type="checkbox"/>	1						
MW-20S		<input type="checkbox"/>	11/13	11:15	11/13	11:38	<input type="checkbox"/>	1						
MW-22S		<input type="checkbox"/>	11/12	12:50	11/12	1:07	<input type="checkbox"/>	1						
MW-26S		<input type="checkbox"/>	11/12	5:03	11/12	5:22	<input type="checkbox"/>	1						
MW-27S		<input type="checkbox"/>	11/12	11:20	11/12	11:25	<input type="checkbox"/>	1						
MW-21S		<input type="checkbox"/>	11/13	12:19	11/13	12:41	<input type="checkbox"/>	1						
Sampled by: <u>Bruce Berling</u> (Signature)			Received by: _____			Date 11/13/13	Time 9:23	Remarks						
Relinquished by: <u>Bruce Berling</u> (Signature)			Received by: <u>Chris</u> (Signature)			Date 11/14/13	Time 1435							
Relinquished by: <u>Chris</u> (Signature)			Received by: <u>hml</u> (Signature)			Date 11/14/13	Time 1530							
Relinquished by: _____			Received by: _____			Date _____	Time _____							

By relinquishing my sample to Fairway Laboratories, Inc., I hereby agree to the terms and conditions printed on the reverse.

White Original - FLI File Canary - FLI Copy Pink - Customer Receipt Copy

CHAIN OF CUSTODY/ REQUEST FOR ANALYSIS

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Client Page # 2 of 2

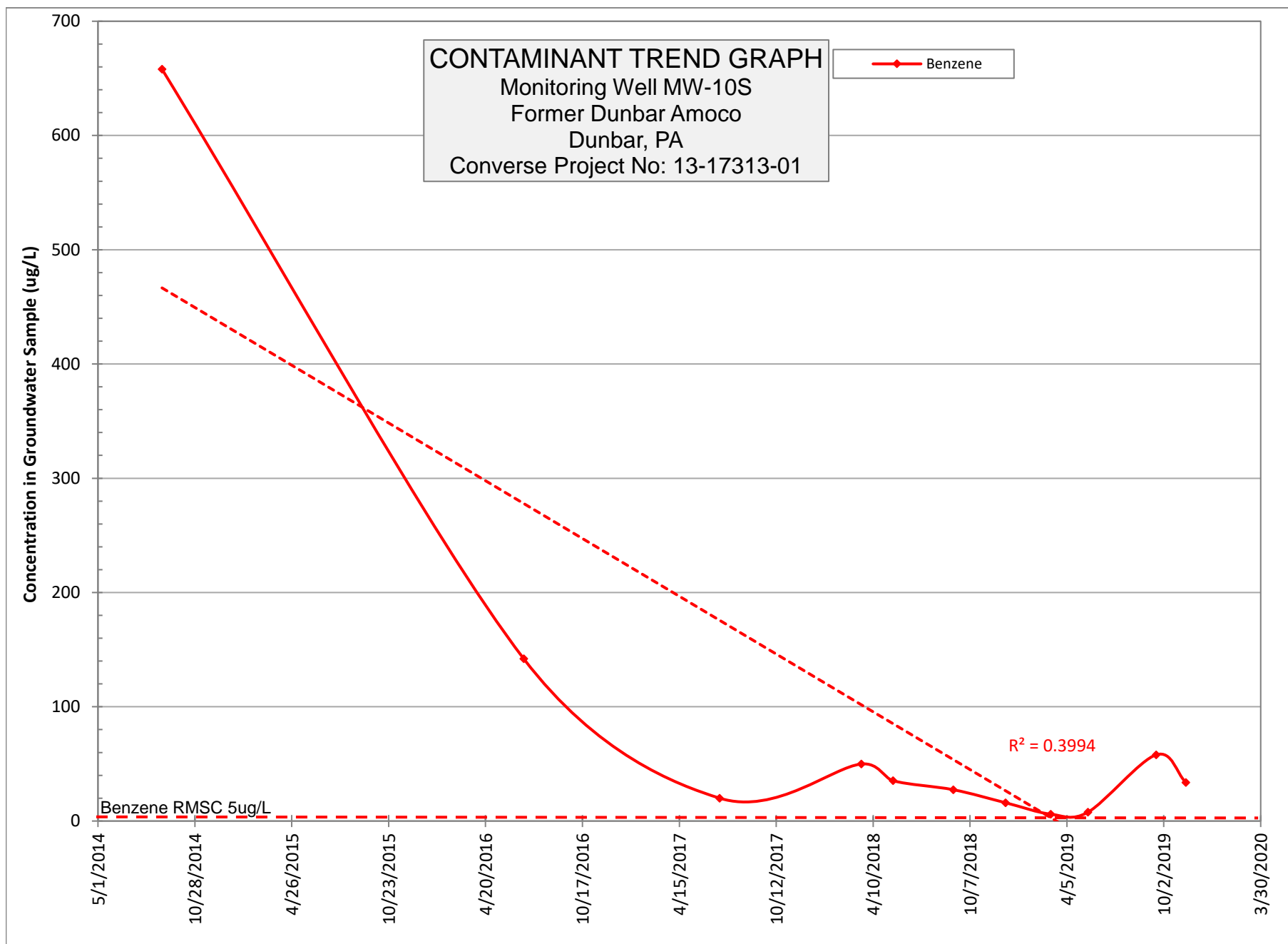
Client Name: <u>Canvase Consultants</u> Address: <u>2738 W. College Ave</u> <u>State College PA 16801</u> Contact: Phone #: <u>(814) 234-3223</u> Fax #: Project Name: <u>Dunkin' Amoco</u> Quote/PO #:			Received on ice? Y N Sample Temp:		Reportable to PADEP? Yes <input type="checkbox"/> PWSID #		Analyses Requested								LAB USE ONLY Work Order # <u>9K15085</u> Attach # <u>2</u> FLI Page # <u>2</u> of <u>3</u> Tracking #				
TAT: Normal <input type="checkbox"/> Rush <input type="checkbox"/> Rush TAT subject to pre-approval and surcharge. Date Required:			GRAB Composite	Composite Start GRAB -or- Composite End		Matrix Solid Water Other			# of Containers	PADEP State List Canvase Consultants								Bottle Type/Comments	
Sample Description/Location			GRAB Composite	Start Date Start Time End Date End Time		Solid Water Other			# of Containers	PADEP State List Canvase Consultants								Bottle Type/Comments	
<u>MLR-105</u>			✓	<u>11/12</u> <u>1:54</u> <u>11/12</u> <u>2:15</u>		✓			2	PADEP State List Canvase Consultants								<u>40 ml HCL</u>	
<u>Pond</u>				<u>11/13</u> <u>1:18</u> <u>11/13</u> <u>1:27</u>						PADEP State List Canvase Consultants								0.9	
<u>Dup</u>				<u>11/13</u> <u>5:35</u> <u>11/13</u> <u>5:35</u>						PADEP State List Canvase Consultants								0.9	
<u>Gac</u>										PADEP State List Canvase Consultants									
Sampled by: <u>Canvase</u> (Signature)			Received by:		Date Time		Remarks												
Relinquished by: <u>Canvase</u> (Signature)			Date Time <u>11/13/19</u> <u>9:33</u>		Received by: <u>Canvase</u> (Signature)		Date Time <u>11/14/19</u> <u>1435</u>												
Relinquished by: <u>Canvase</u> (Signature)			Date Time <u>11/14/19</u> <u>1530</u>		Received by: <u>Canvase</u> (Signature)		Date Time <u>11/14/19</u> <u>1530</u>												
Relinquished by:			Date Time		Received by:		Date Time												

By relinquishing my sample to Fairway Laboratories, Inc., I hereby agree to the terms and conditions printed on the reverse.

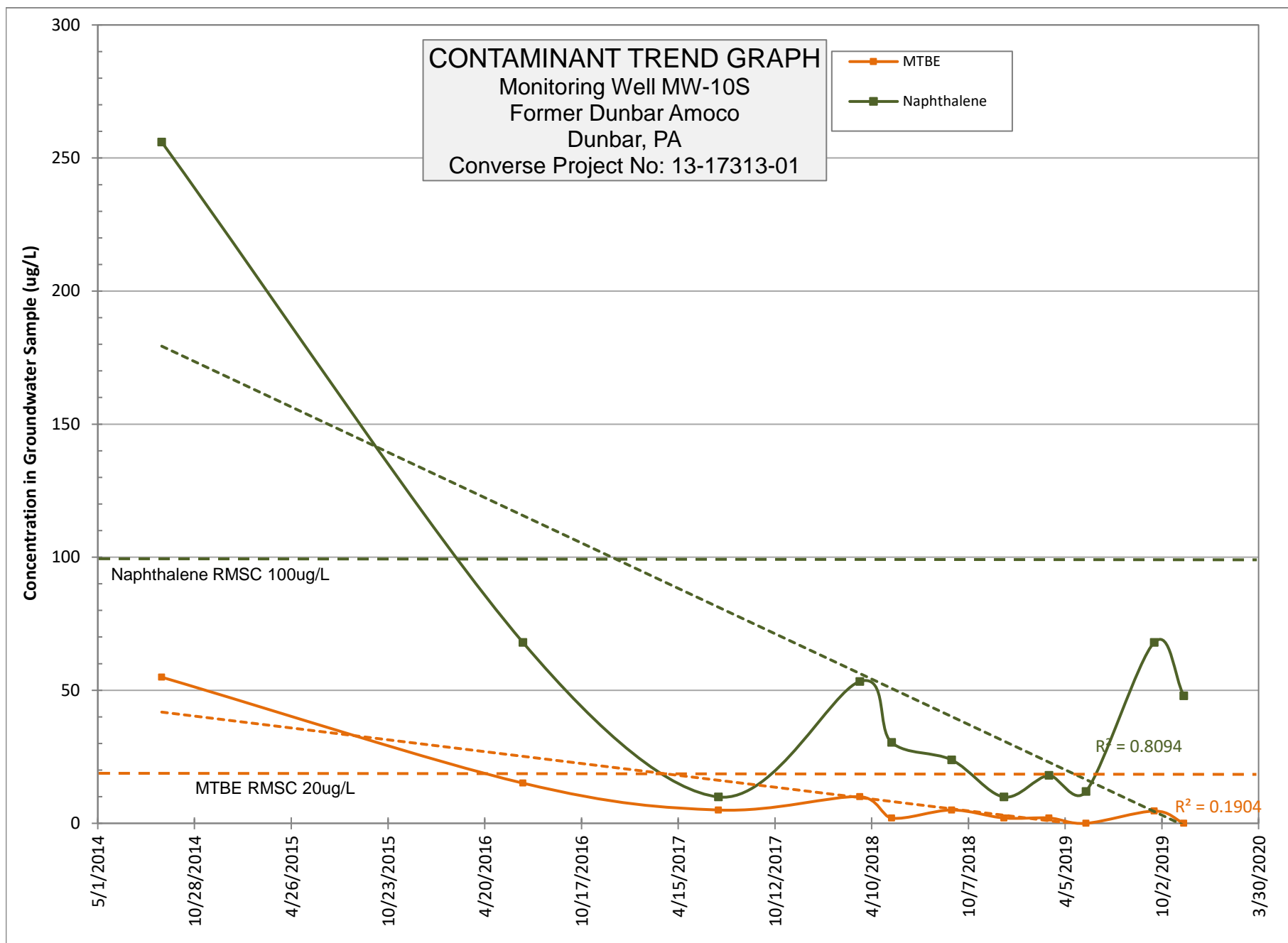
White Original - FLI File Canary - FLI Copy Pink - Customer Receipt Copy

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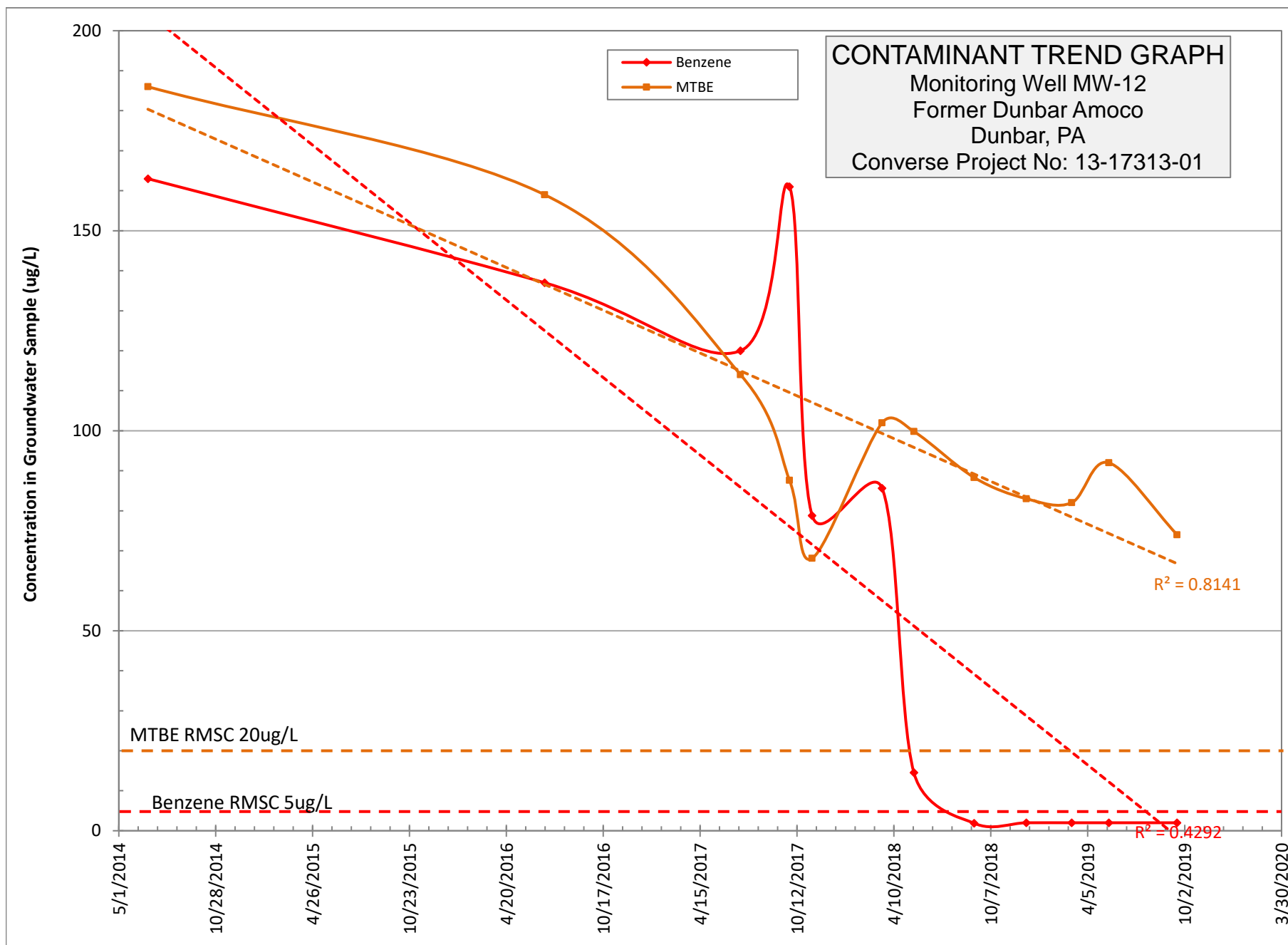
Appendix D



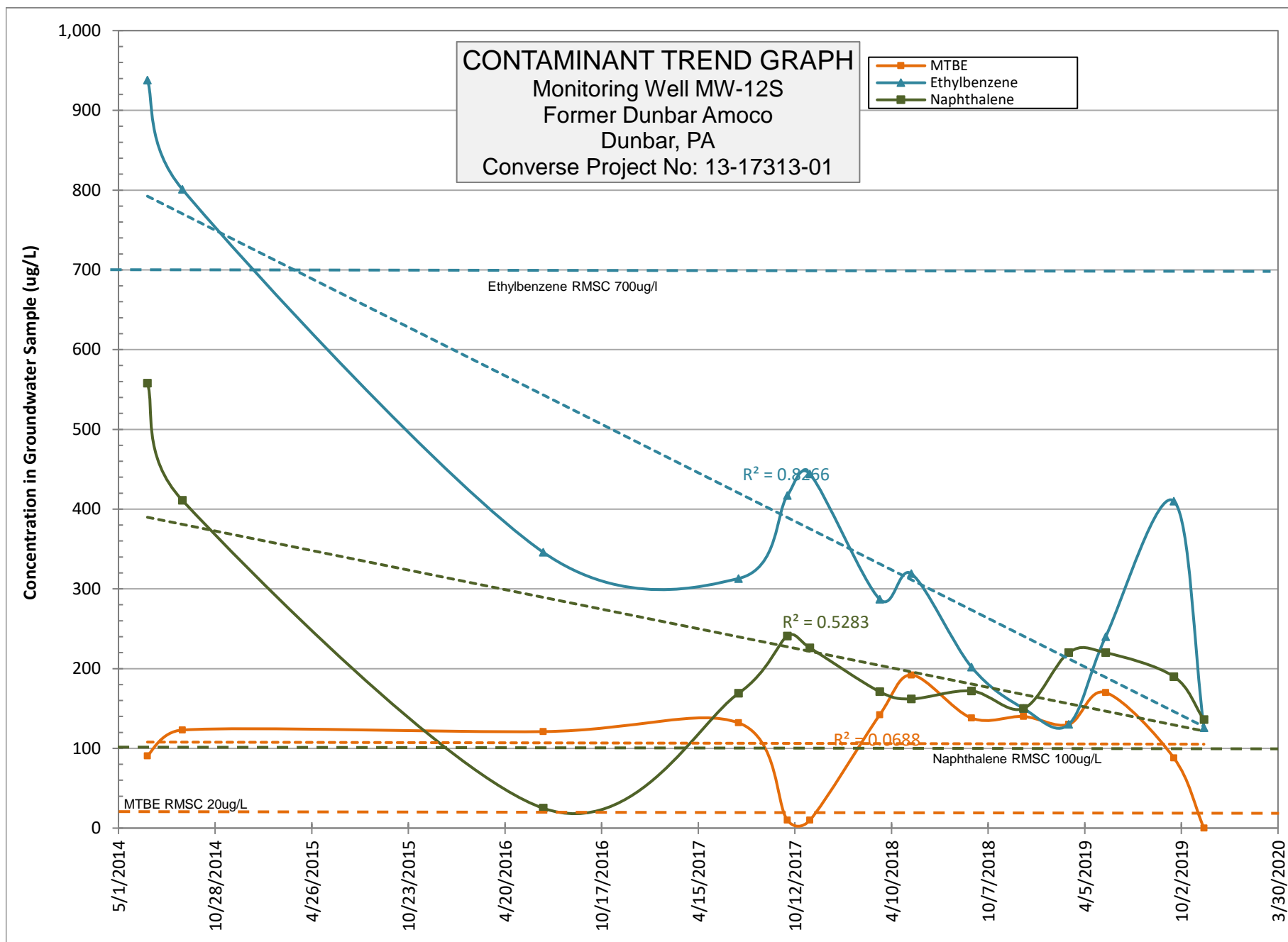
Concentrations that plot at zero correspond to analyte levels that were below the laboratory quantitation limit (LQL) of the analytical method.



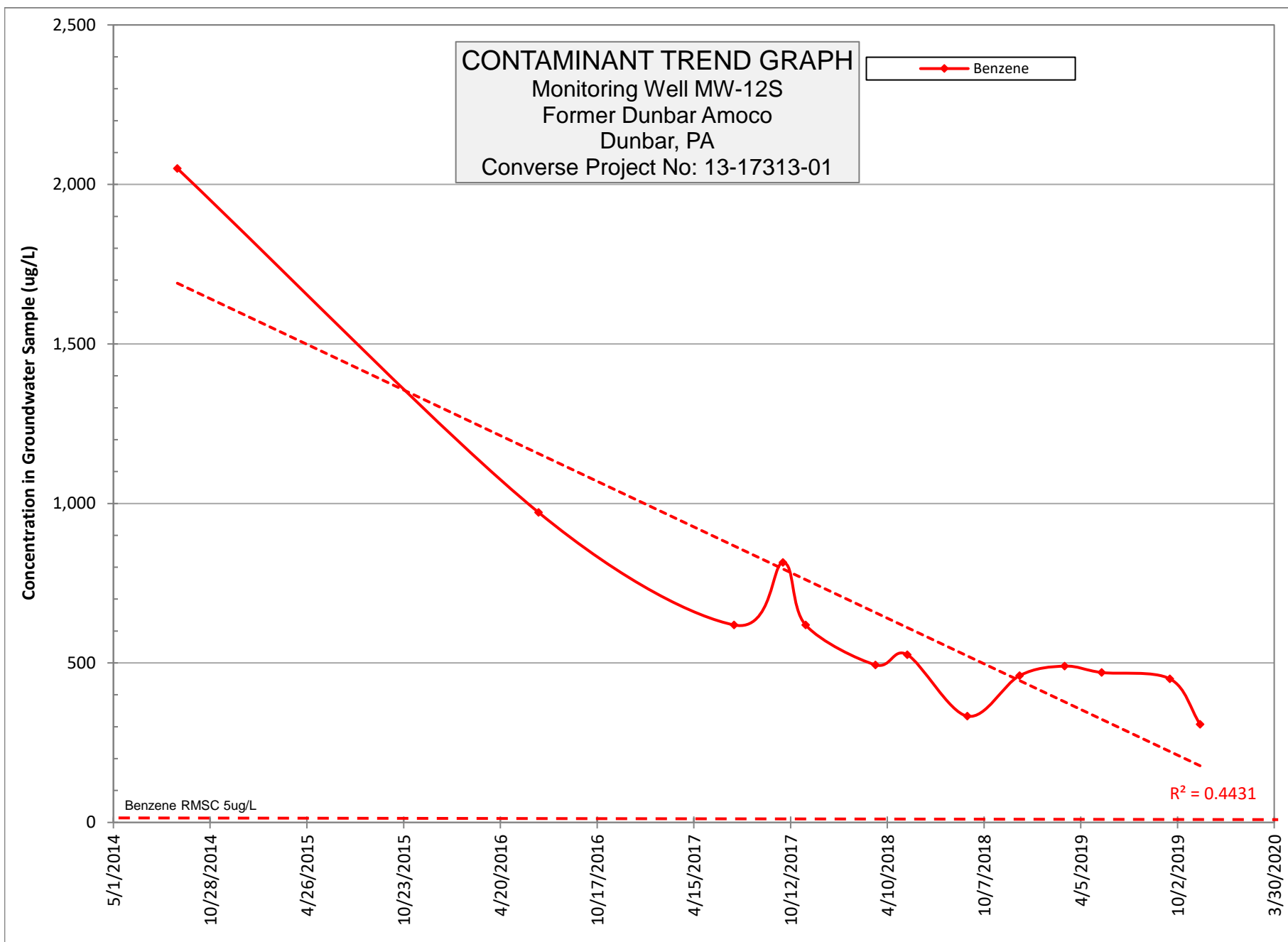
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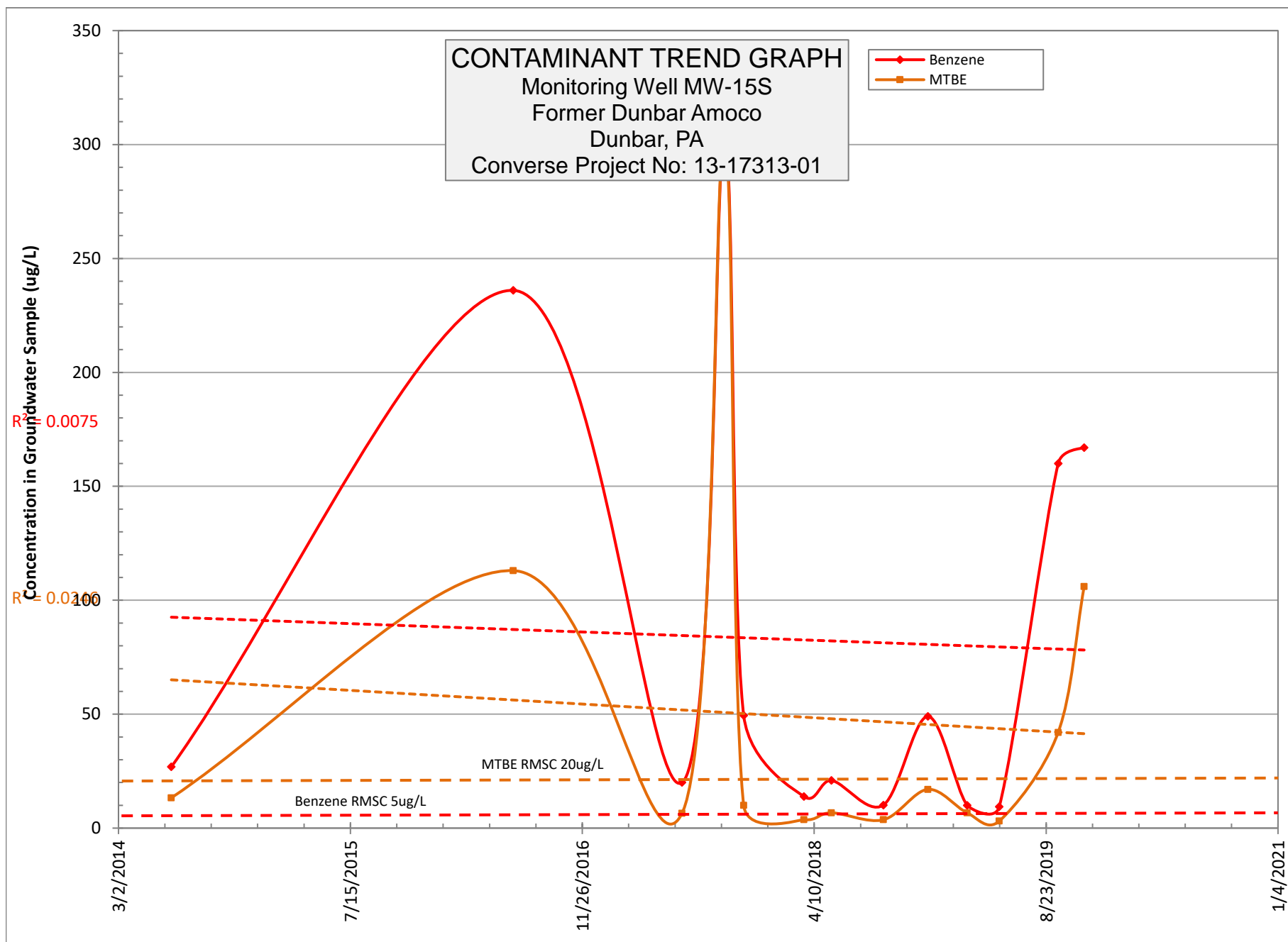
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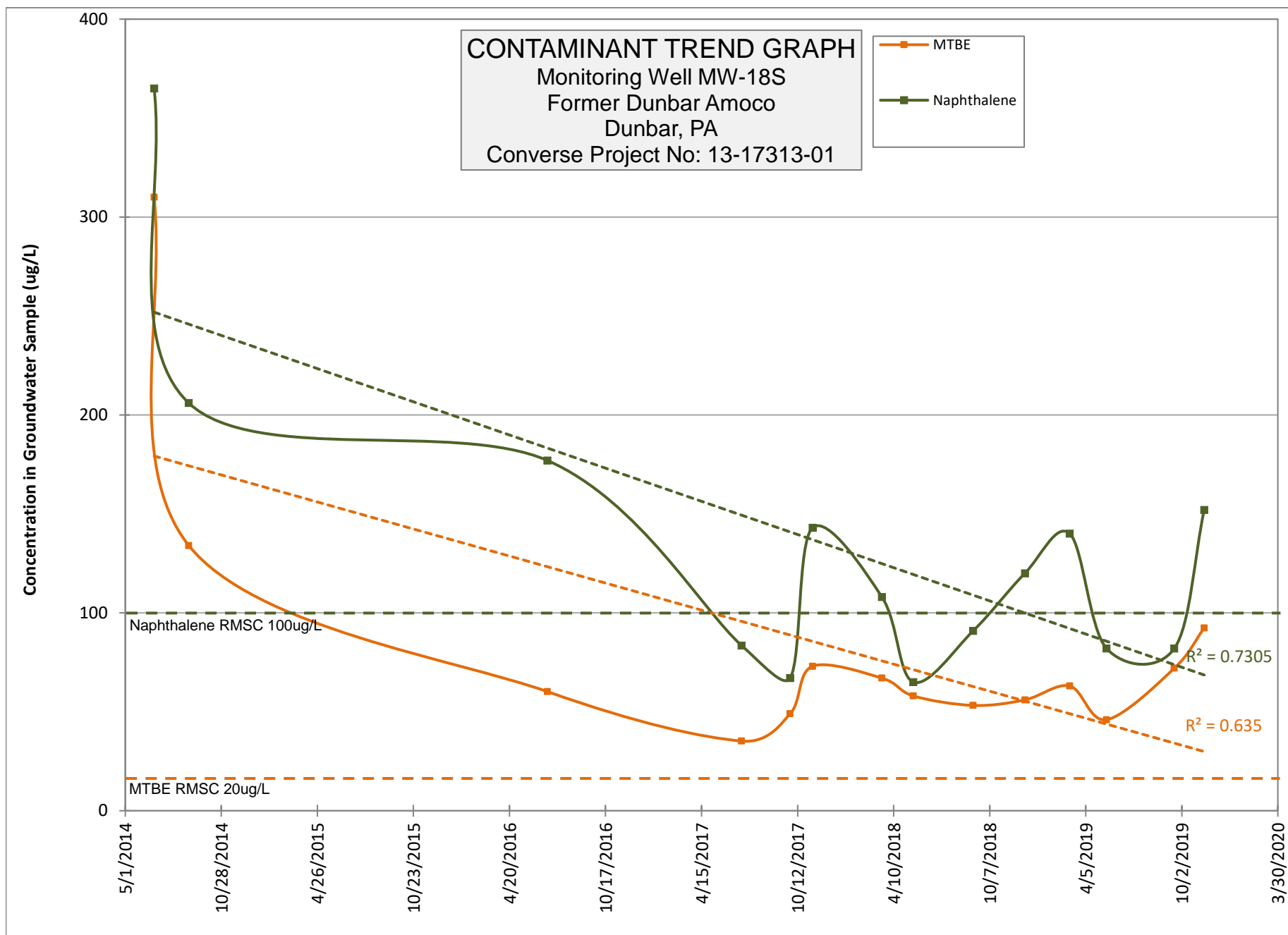
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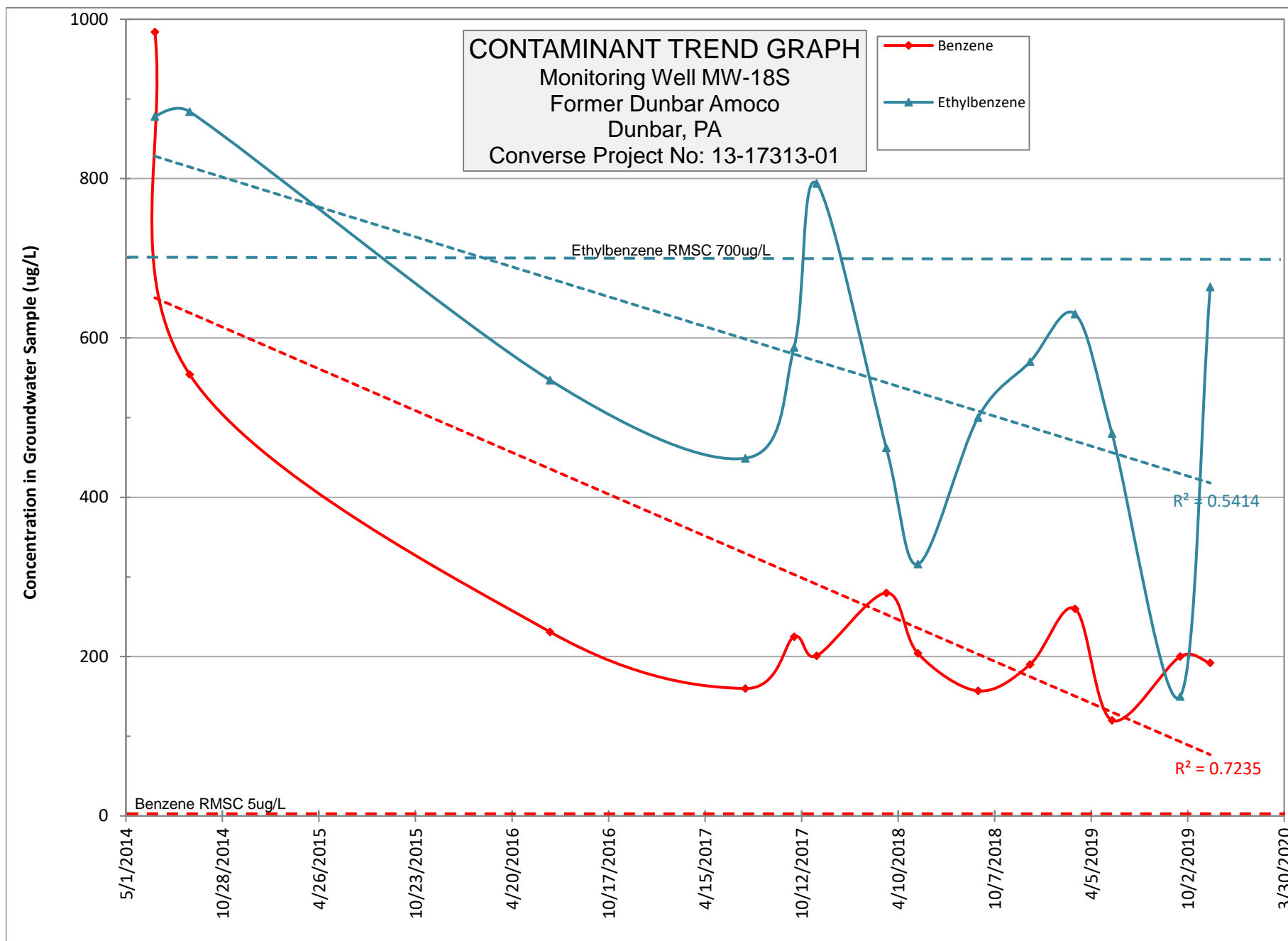
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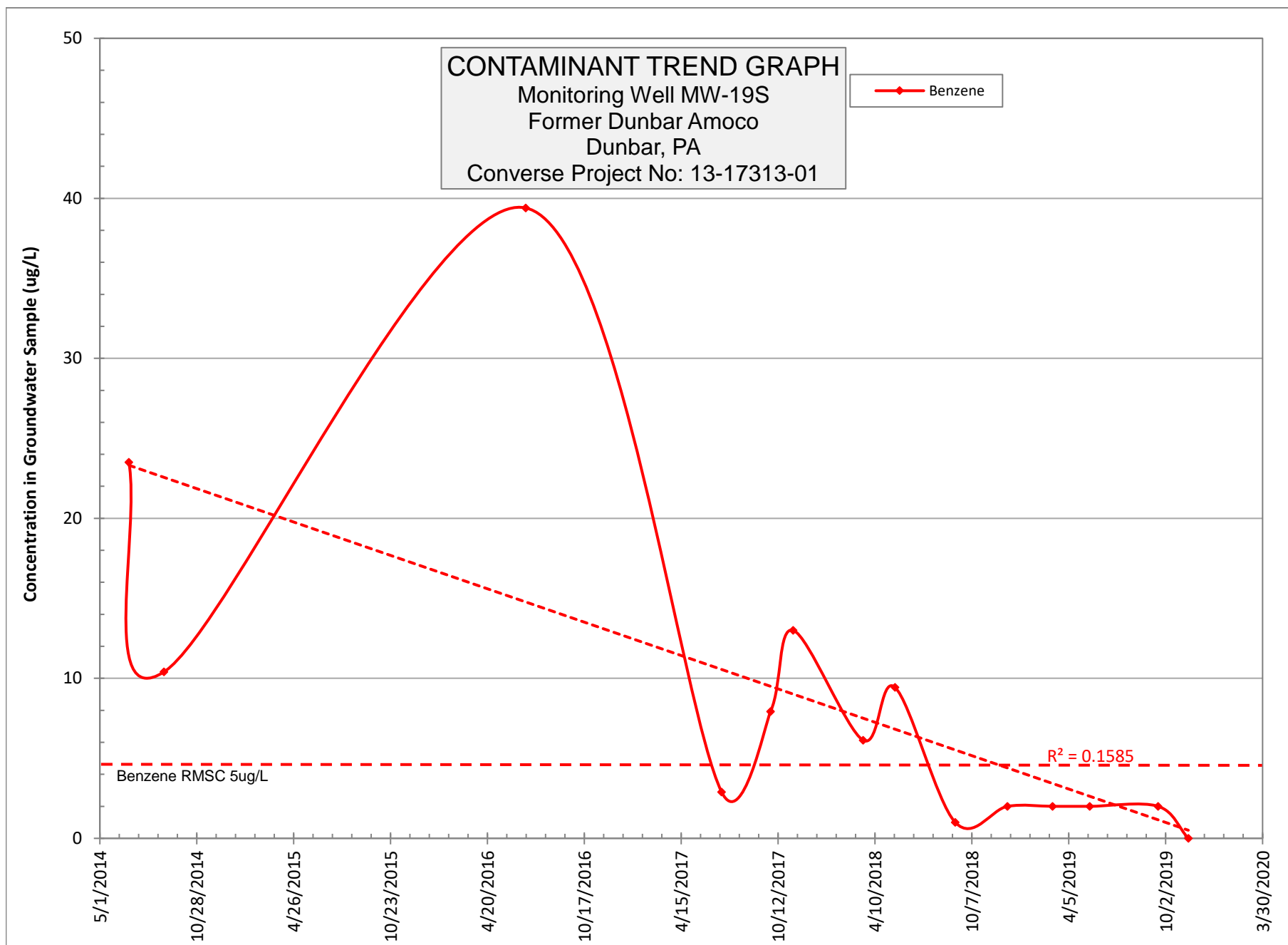
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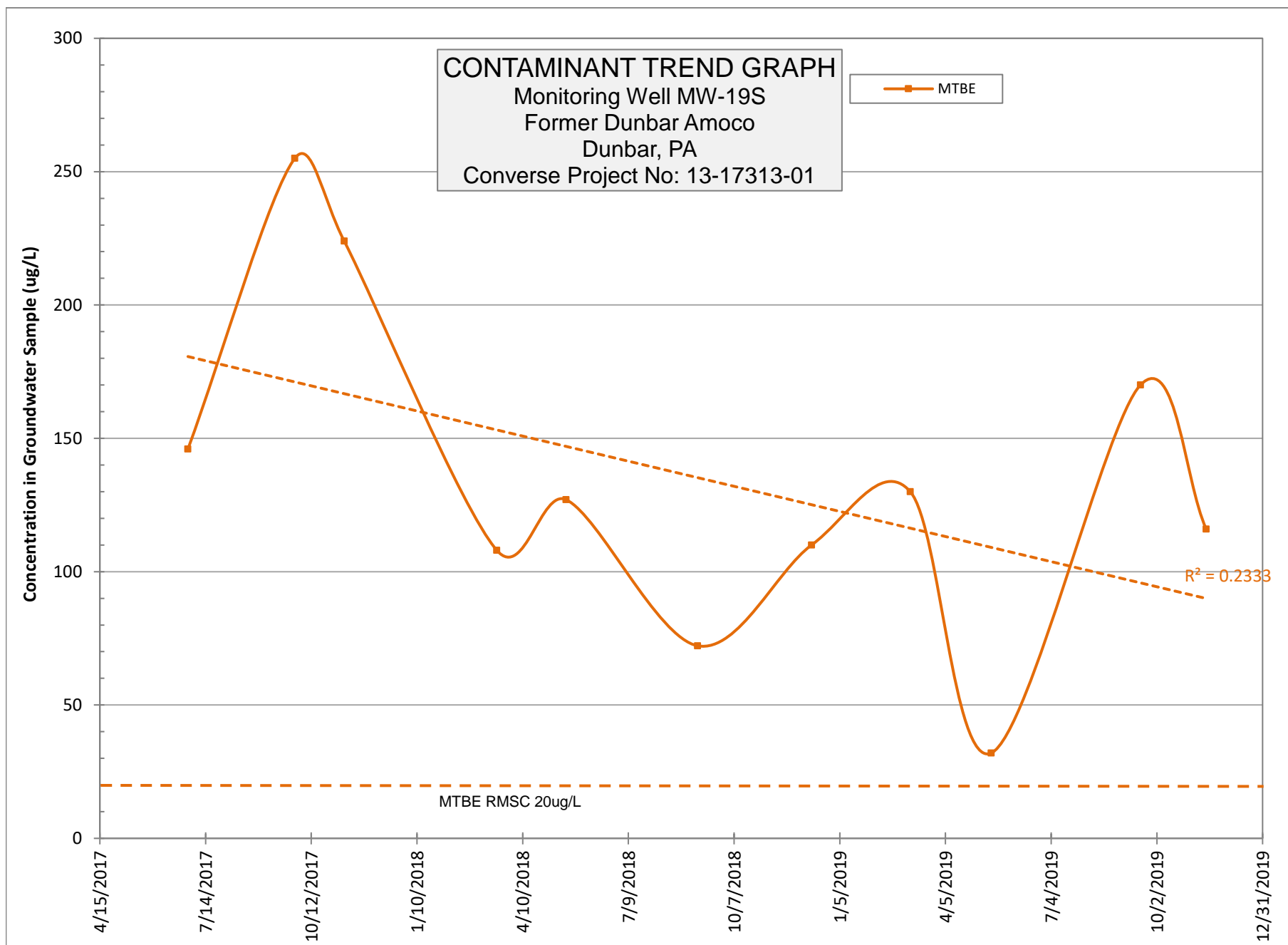
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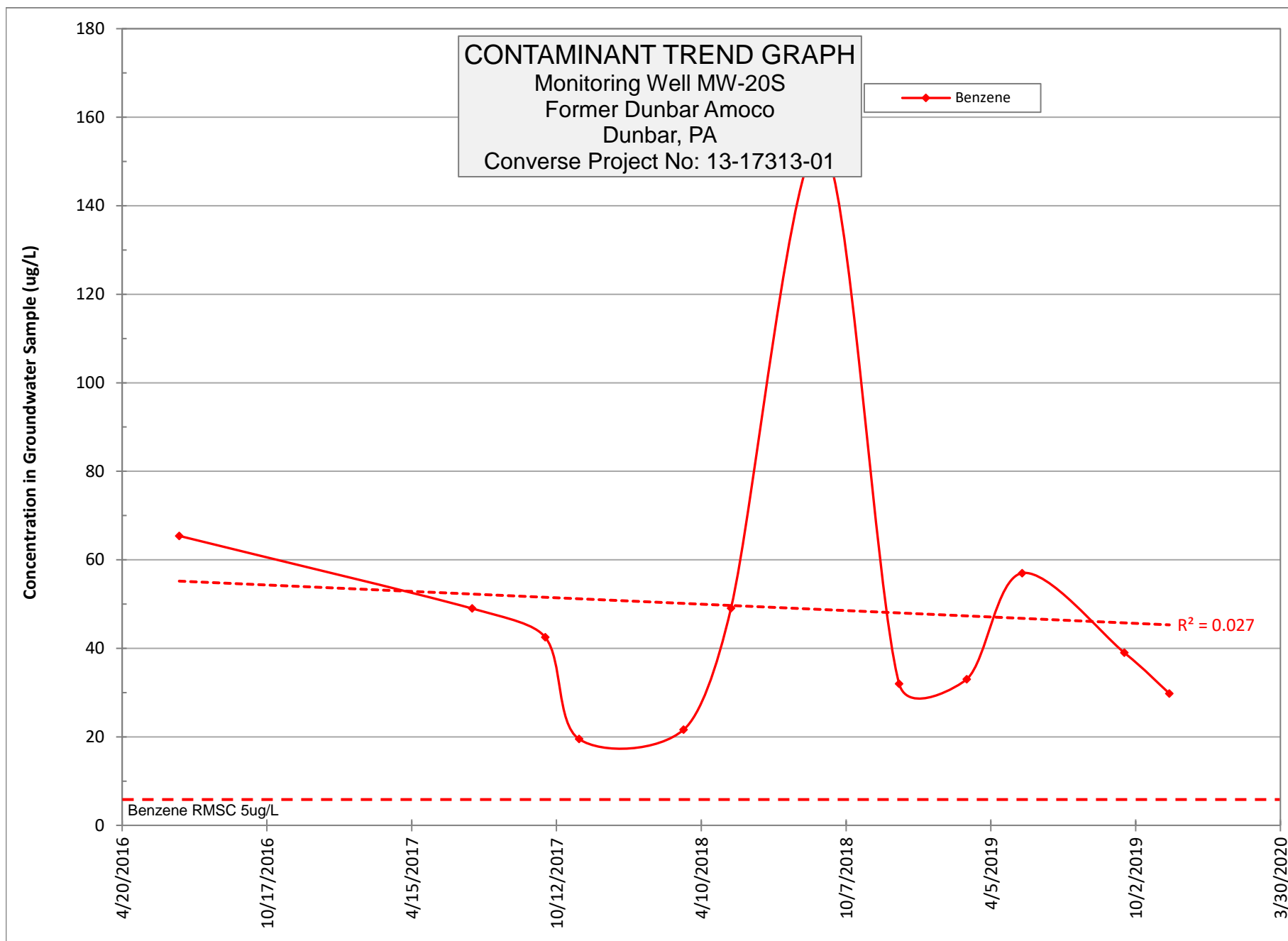
Concentrations that plot at zero correspond to analyte levels that were below the laboratory quantitation limit (LQL) of the analytical method.



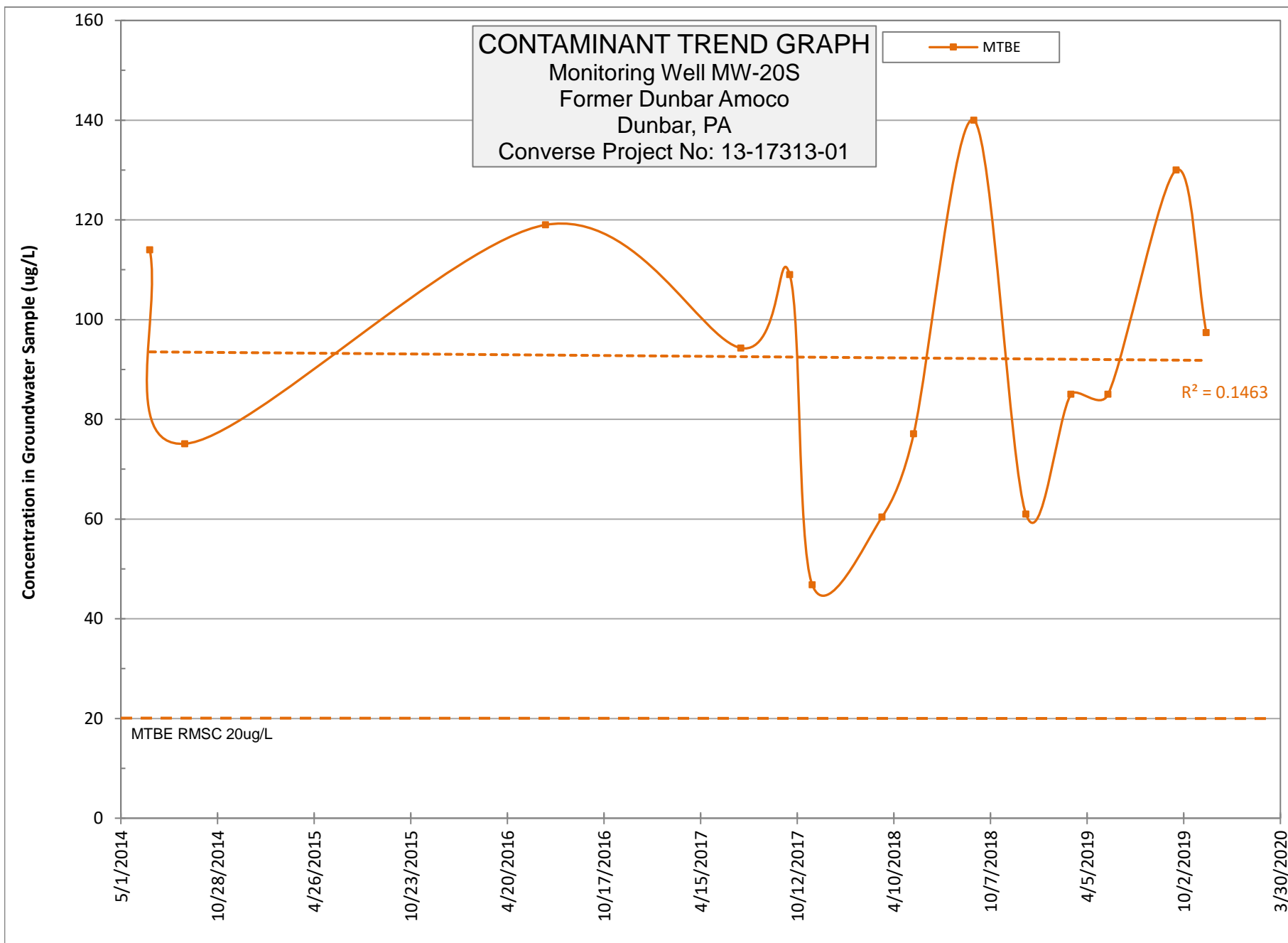
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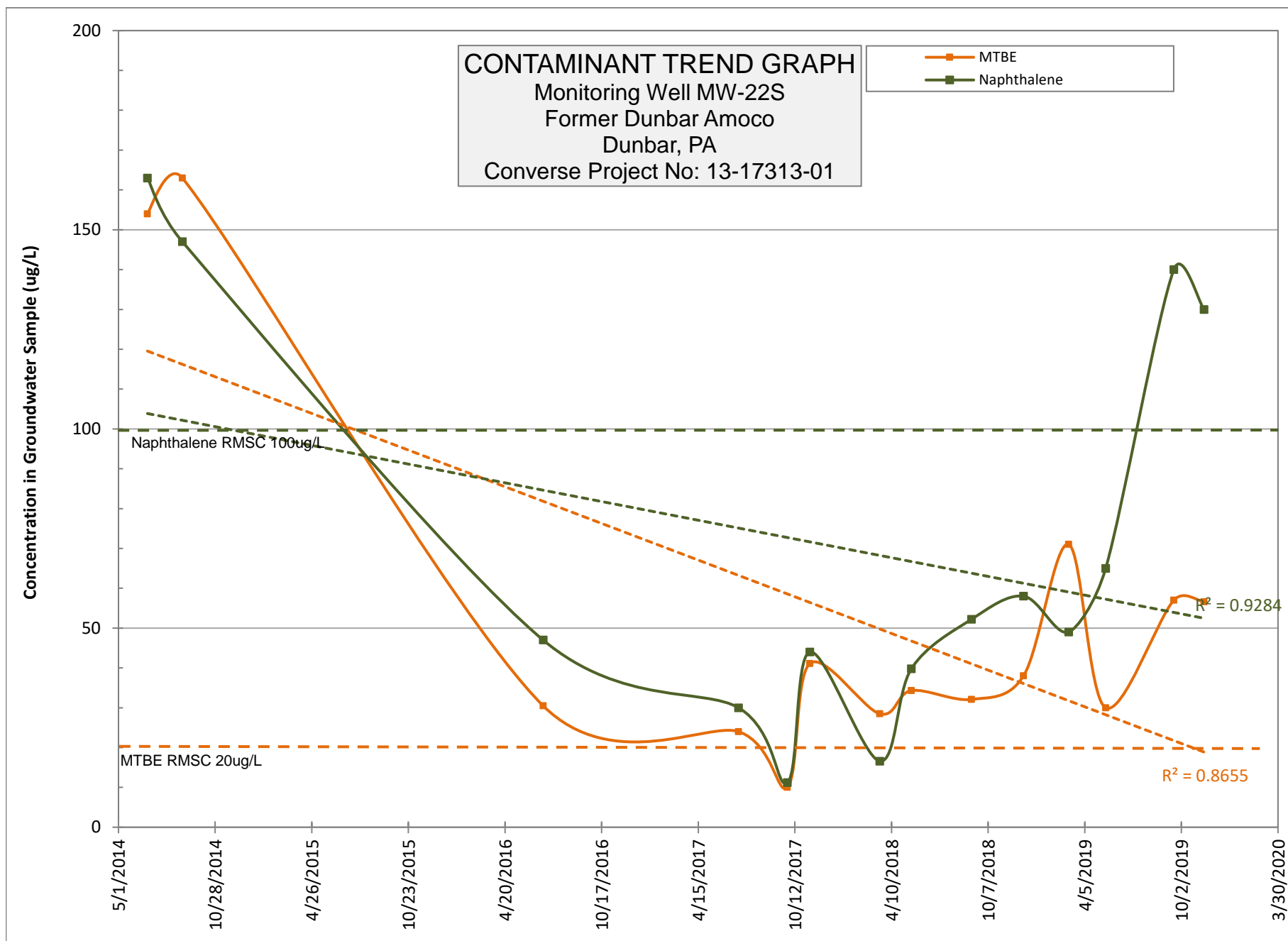
Concentrations that plot at zero correspond to analyte levels that were below the laboratory quantitation limit (LQL) of the analytical method.



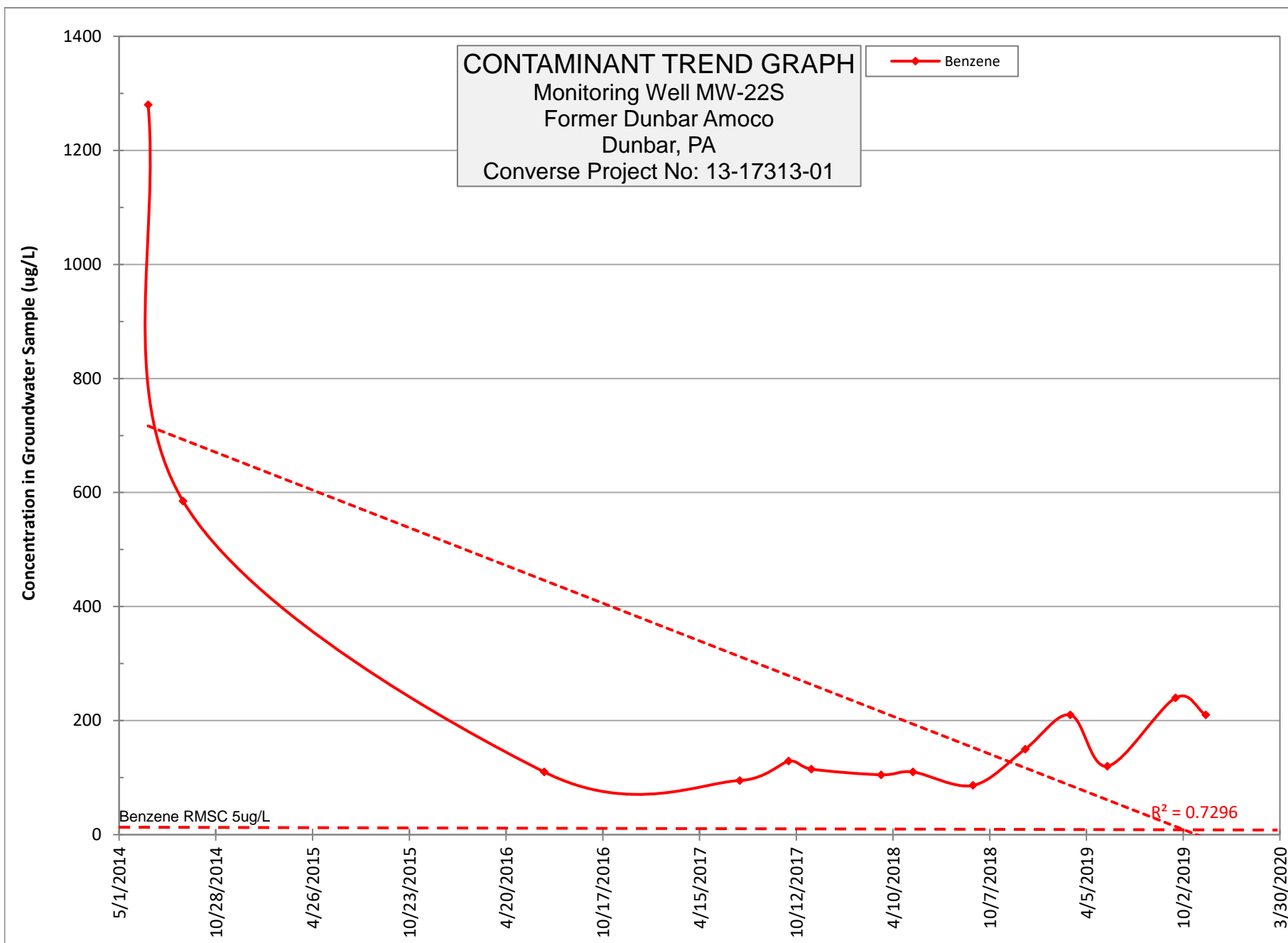
Concentrations that plot at zero correspond to analyte levels that were below the laboratory quantitation limit (LQL) of the analytical method.



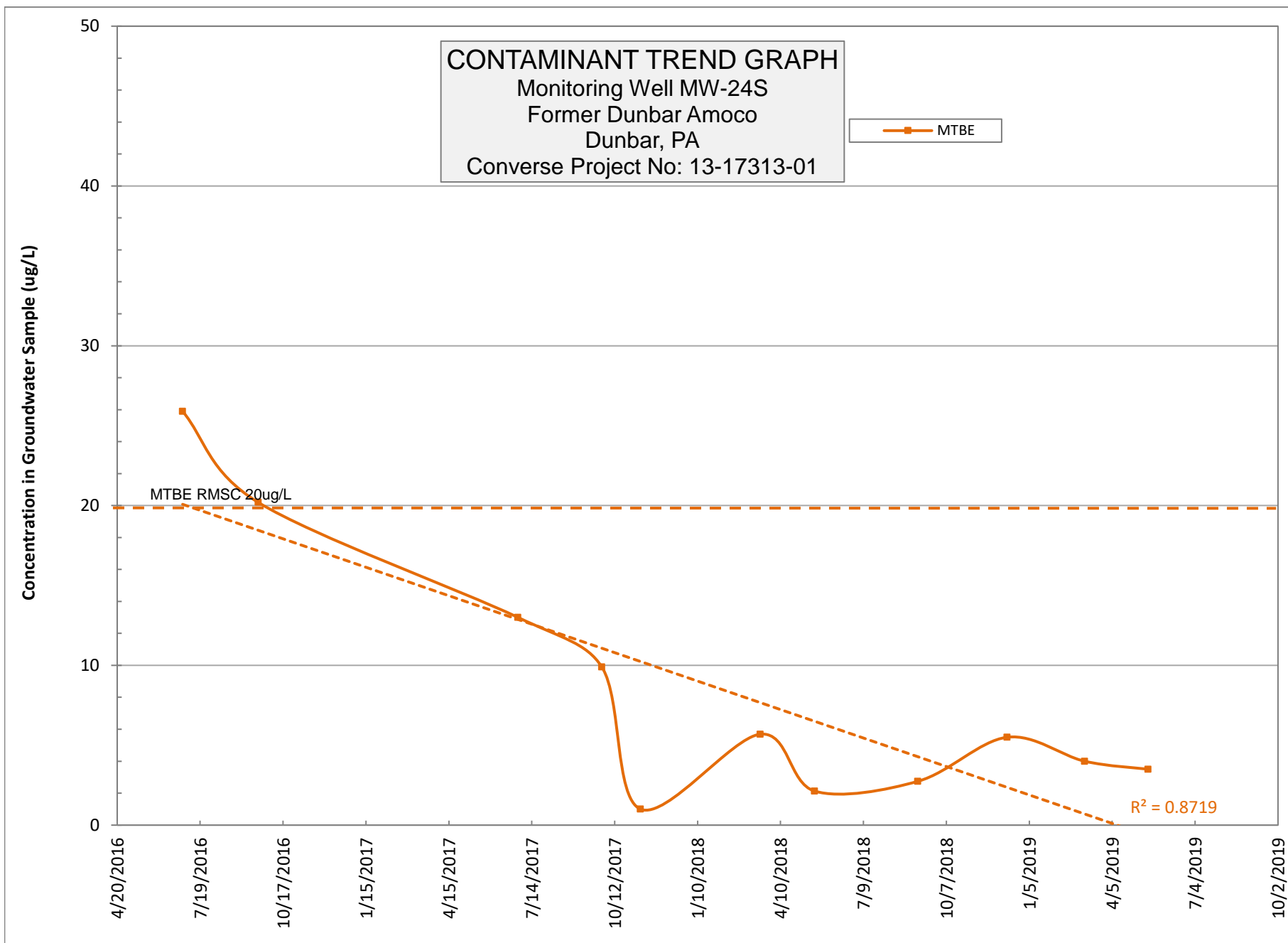
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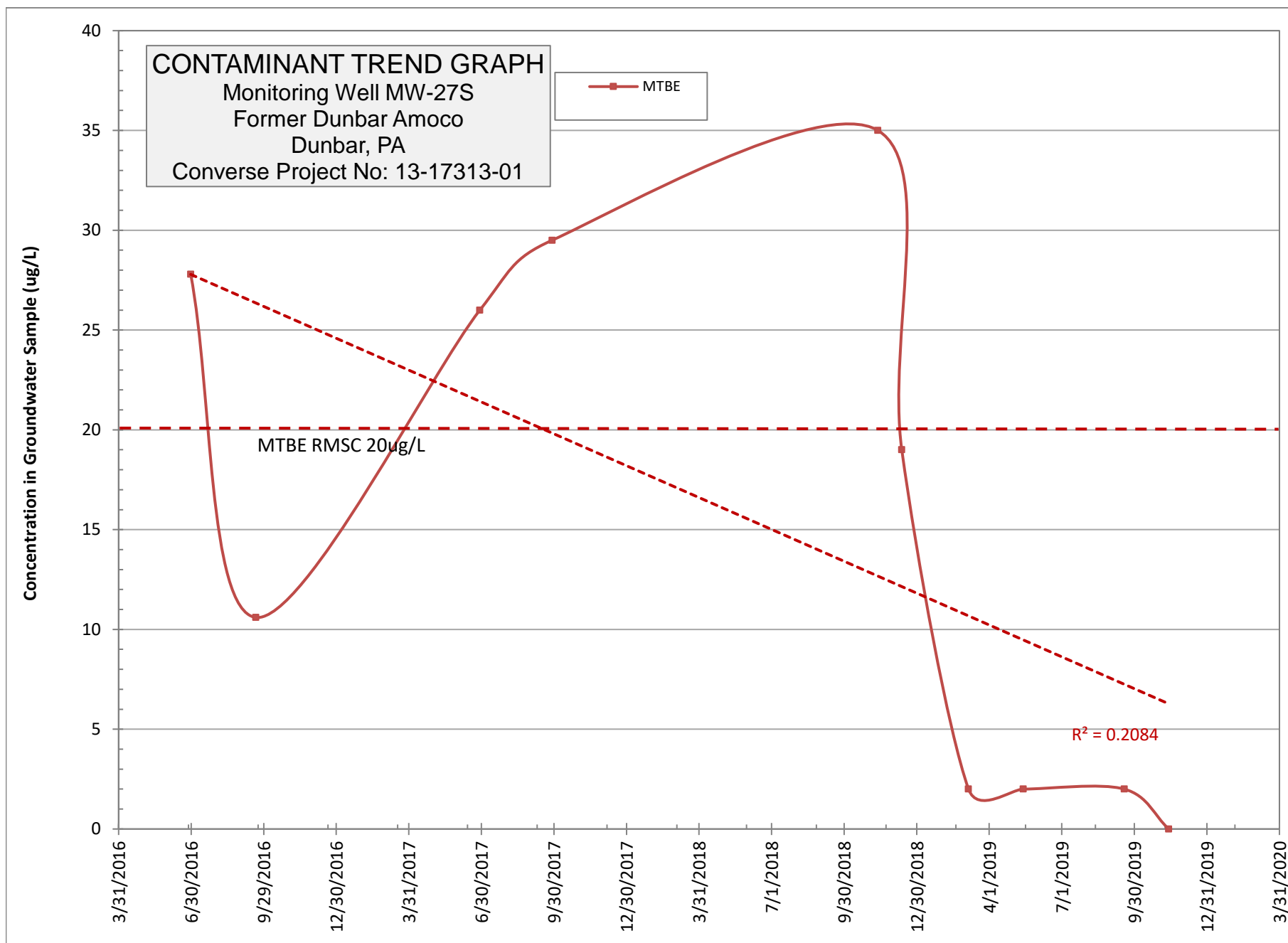
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