2024
ANNUAL GROUNDWATER QUALITY REPORT

OF

THE PLYMOUTH COUNTY SANITARY LANDFILL
75-SDP-01-74P
LE MARS, IOWA

by:
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November, 2024

HLW

HLW Engineering Group

Engineering *Management*

6052-23A.320

Figures

Tables

Appendices

Section 1.0 Background Information

1.1 Report Format

Table 1 through Table 13 are attached to this report and satisfy the January 16, 2020 IDNR requirement to provide the tables to meet the IDNR format requirements (Doc #96764).

1.2 Report Priority

No requests are made herein for priority review of this document.

1.3 Period of Report Coverage

Water quality data evaluation is based on a running compilation of data beginning in April, 11, 2018. Statistical evaluations herein are based on the most recent water quality data collected through October 29, 2024.

1.4 Current Site Maps

Figure 1 is attached illustrating the current site features, monitoring well locations, and subsurface gas probe locations.

Figure 2 represents the groundwater contour map.

1.5 Site Status and Applicable Rules

Site Location

The Plymouth County Sanitary Landfill is located in a portion of the NE¼ NE¼ of Section 34, T93N, R45W, Plymouth County, Iowa. The site has a physical address of 34898 150th Street, Le Mars, Iowa 51301. The facility operates under the Iowa Department of Natural Resources (IDNR) Permit Number 75-SDP-01-74P. The solid waste stream includes only construction and demolition waste.

Site Geology/Hydrogeology

The geology and hydrogeology are described in the 1991 Hydrogeologic Assessment Report (Doc #24610). Previous land use was undeveloped agricultural land.

The description of the site geology is:

"The landfill is situated in the loess hills region of western Iowa which is characterized by a mantle of wind derived silts and clays (loess) overlying glacial drift deposits. The landscape is well-drained. Accumulative thicknesses of loess and glacial drift are reported to be on the order of less than 50 to 150 feet. The uppermost bedrock unit at the site is shale of the Cretaceous-aged Graneros Formation or underlying Woodbury Member (primarily shale) of the Cretaceous-aged Dakota Formation. The Graneros Shale is of limited extent in Plymouth County. Shale of the underlying Woodbury Member becomes the uppermost bedrock unit where the Graneros is absent. Although the Woodbury Member reportedly contains occasional sand lenses within shale, IGS test borings revealed the Woodbury to consist of shale near the landfill site. Underlying the Woodbury Member Shale is the Nishnabotna Member of the Dakota Formation. The Nishnabotna

Member is a massive sand stone unit and a regional aquifer which supplies a substantial amount of water to the northwest Iowa region.

Loess was typically encountered as the uppermost lithologic unit. The exceptions to this observation were where fill material was overlying loess at some of the boring locations and where loess was not observed (MW-9 and PZ-9) which may be due to loess removal resulting from landfill operations. Loess was described in the field as brown lean clay, however the detection of a substantial amount of sand during grain size analysis in some loess samples may suggest that the loess has been reworked or redeposited.

Glacial drift was observed to underlie the loess deposits. Glacial till was generally described as brown to dark gray lean clay containing various amounts of sand and gravel.

Thin sand and gravel seams on the order of 1 to 5 centimeters thick were also observed within glacial till. Thicker sand units or lenses on the order of 1 to 14 feet thick were also observed within glacial till and are indicated on the boring logs and geologic profiles as individual lithologic units separate from glacial till."

Landfill Layout

The approved landfill is configured in a series of adjoining cells designated as Cell1-N though Cell 4-N, and Cell 1-S through Cell 11-S as illustrated on Figure 1.

Groundwater collection and diversion piping does not exist below the filled portions of this facility.

Applicable Rules
Iowa Administrative Code (IAC) 567-114 (2002) is applicable to the site.

MONITORING WELL MAINTENANCE PERFORMANCE REEVALUATION

Table 3 outlines the status of well performance and maintenance activities performed as required by IAC 567-114.21(2). Water elevation information is summarized in Table 4, Table 4A, and Table 4B.

High & Low Water Levels
Current year water elevation data is included on Table 4. Historic water elevation data (2017 to present) is included in Table 4A, while water elevation data prior to 2017 is included in Table 4B. The high and low water elevations in 2024 are summarized in Table 4, while the minimum and maximum elevations since 2017 are highlighted on Table 4A.

A Water Table Contour Map (Figure 2) dated October 29, 2024, is included with this report and illustrates the water surfaces and the effects of the topography.

Review of the 2024 water elevation data does not indicate any remarkable water elevation conditions.

Well Depth & Sedimentation
Well depth measurements were made October 29, 2024. Review of the well depth data included on Table 4 do not indicate that well sedimentation is occurring at any site monitoring wells.

Well Recharge Rates & Chemistry

The general in-situ permeability was defined in the 1998 revised Hydrologic Monitoring System Plan for the Plymouth County Landfill (Doc #8197):

"Results …….indicated an average measured horizontal conductivity of 4.4 x 10-4 centimeters per second (cm/s) for glacial drift and 6.2 x 10-6 cm/s for underlying shale and weathered shale collectively. The relatively higher conductivity for glacial drift is attributable to small sand seams and large sand lenses of glacio-fluvial origin within the glacial drift mass".

A variance to IAC 114.21 was issued by IDNR on March 10, 2021 (Doc # 99960) and authorizes performance of biennial well recharge rate evaluation in lieu of the in-situ permeability tests every five (5) years.

Table 4C is included summarizing the flow rates obtained August 2021 and those obtained in May 2023 and October 2023. Flow rates at each well do demonstrate a range which is attributed to the conditions in each well during the sample collection episode. Seasonal water level appears to play a part in the recorded flow rates, especially when certain wells are pumped dry during purging and/or sample collection activities.

The flow rate was sufficient in all cases to collect an appropriate sample in the spring of 2024. No-purge sample collection methods were employed in the fall of 2024.

Flow rate information indicates that recharge to the individual wells remains sufficient to promote collection of representative water quality samples and the wells were functioning as intended. Monitoring well flow rate reevaluation is due every other year based on the March 10, 2021 variance to 114.21(2)"d", and should be evaluated again in 2025.

Based on the apparent static conditions across the site, it appears that the semi-annual water elevation data is sufficient to adequately monitor the hydrologic condition of the site. Review of the water elevation data for 2024 does not indicate excessive variability compared to historic water elevation data. The wells are interpreted to be appropriately located to detect any impact, should it occur.

Section 2.0 Reporting Period Monitoring Activities

The Hydrologic Monitoring for the site is approved by Special Provision 4 of the Revised Permit dated October 17, 2024 (Doc# 111082). The current HMSP is summarized in the Table 1. The HMSP Implementation Schedule for 2025 is itemized in Table 2.

Background monitoring wells are restricted to a single well (MW-17). The background monitoring well is functioning as valid sampling point based on the hydrogeology and the water quality results,

however, additional existing site monitoring wells should likely be designated as background wells to incorporate the natural variability of water quality throughout the site. Consideration of supplemental background water quality from existing site monitoring wells will be discussed in the future under separate cover.

Downgradient monitoring points include MW-7, MW-8, MW-9, MW-10, MW-11, MW-12, MW-13, MW-14, and MW-16. Provision 4e of the Permit requires semi-annual sampling for indicator compounds (pursuant IAC 114.26(4)"e") to be performed at the designated monitoring wells at the site. The TOX and phenol testing requirements included in IAC 114.26(4)"f" are required annually.

Supplemental VOC testing is required at MW-7, MW-8, MW-10, MW-12, MW-14, and MW-16 pursuant to the Groundwater Assessment Plan Update dated June 27, 2019 (Doc #95503) and approved by Special Provision 4f of the Revised Permit. The supplemental VOC testing parameters include benzene, cis-1,2-dichloroethene, 1,2-dichloropropane, methyl chloride, PCE, TCE, and vinyl chloride.

A summary of the planned 2025 sample collection events at each well is included on Table 2.

Field sampling information for May 8, 2024 and October 29, 2024 is included on the field forms (IDNR Form 542-1322) in Appendix A.

A comprehensive summary of Analytical Data for the episodes between August 9, 1996 and October 29, 2024 is included on Table 9.

2.1 Current Detection Monitoring Activities

The background well is currently MW-17.

Downgradient monitoring points include MW-7, MW-8, MW-9, MW-10, MW-11, MW-12, MW-13, MW-14, and MW-16.

2.2 Current Assessment Monitoring Activities

There are no assessment monitoring activities at the site.

2.3 Current Corrective Action Activities

As illustrated in Figure 1, there are eleven (11) gas vents (GV-1 through GV-11) that were installed in September 2020 (Doc #98440). The vents are installed as a corrective action in order to reduce the potential water quality impacts by VOC at MW-7, MW-8, and MW-12. MW-7, MW-8, and MW-12 are evaluated to determine the success of the corrective action gas vents.

Section 3.0 Data Evaluation and Summary

Field Sampling Forms for the May 8, 2024, and October 29, 2024 sample collection episodes are included in Appendix A. Chemical analytical results for the May 8, 2024 and October 29, 2024 sample collection episodes are included in Appendix B. The cumulative chemical analytical data is also presented in summary form in Table 9.

Statistical Evaluations are prepared by Otter Creek Environmental Services for the Spring and Fall monitoring episodes. The Groundwater Statistics Report for the Plymouth County Sanitary Landfill, Semi-Annual Monitoring Events in 2024, dated November, 2024 is included in Appendix C.

SITE SPECIFIC GWPS

There are no Site-Specific GWPS established for this facility. Where GWPS exist, they are listed in the Statewide Standards published in Iowa Administrative Code (IAC) 567, Chapter 137. For many compounds tested, GWPS do not exist (Table 5). For compounds that do have GWPS, the published IAC 567, Chapter 137 GWPS are utilized.

STATISTICALLY SIGNIFICANT INCREASES (SSI)

Test results from background monitoring well MW-17 (Table 5) are utilized to establish background conditions of site groundwater.

The current HMSP has been in-place since April 11, 2018. All downgradient well data collected since April 11, 2018 is evaluated herein. In the downgradient wells, compounds that have exceeded a calculated control limit in 2024 are summarized in Table 6.

The water quality data at each downgradient well is also evaluated over time in Table 7 which summarizes compounds in downgradient wells that have exceeded a control limit since April 11, 2018.

Note that in wells where compounds have been detected that exceed a prediction limit in 2018 - 2024, supplemental sampling has not been implemented. The supplemental sampling approved in 2019 for VOC has been on-going to gauge water quality and water quality changes over time.

Table 7 summarizes compounds in downgradient wells that exceed a GWPS. It is noted that only VOC in MW-7, MW-8, MW-12, and MW-14 have been detected in concentrations that that exceed a GWPS. There are no other compounds recorded that exceed the GWPS.

No additional sampling is recommended at this time.

ASSESSMENT MONITORING SUMMARY

Not Applicable.

STATISTICALLY SIGNIFICANT LEVELS (SSL)

The detections that exceed site prediction limits (brown highlights on Table 7) are utilized to calculate the Confidence Interval (the 95% lower confidence limits (LCL) and the 95% upper control limits (UCL)) in accordance with the 2009 Unified Guidance for Statistical Analysis of Groundwater Monitoring Data at RCRA Facilities by US EPA. The 95% LCL values are

compared to applicable GWPS. Any 95% LCL value that exceeds an applicable GWPS is recorded as an SSL.

The Confidence Intervals (95% LCL and 95% UCL) are calculated during each statistical evaluation based on the most recent four (4) data points. Recorded SSL are highlighted in yellow in Table 7. Table 8 is included to illustrate the 95% UCL compared to the GWPS. A SSL is considered to persist until the 95% UCL value drops below the GWPS.

SSL are summarized as:

MW-7 – 1,2-dichloropropane, cis-1,2-dichloroethane, TCE, vinyl chloride
MW-8 - vinyl chloride (based on UCL evaluation (Table 8)).
MW-12 – vinyl chloride

A series of eleven (11) gas vents were installed as the corrective action at select locations. The vents are located between the waste mass and the impacted monitoring well. Based on completion of the remedy near each impacted well, MW-7, MW-8, and MW-12 are designated as the Corrective Action Monitoring Wells.

CORRECTIVE MEASURES MONITORING RESULTS

The evaluation of the Corrective Action Monitoring Wells MW-7, MW-8, and MW-12 is based on the Upper Confidence Limit (95% UCL), see Table 8. The 95% UCL values for the identified VOC currently remain above the GWPS (highlighted in green in Table 8) and MW-7, MW-8, and MW-12 should remain in Corrective Action Monitoring. It is noted that the reported 95% UCL for cis-1,2-dichloroethene at MW-8 dropped below the GWPS in October, 2023 and has remained below the GWPS for 18 months.

Additional Corrective Action Monitoring includes the on-going quarterly monitoring of Gas Vents GV1-GV-11 for the % Lower Explosive Limits (LEL).

Table 10 and Table 11 are included to summarize the on-going Corrective Action Monitoring Plan (CAMP) results at MW-7, MW-8, and MW-12.

Section 4.0 Leachate Collection System Performance Evaluation

General – The construction of the majority of this site predates the requirement to include leachate collection below the waste mass. The leachate control system (LCS) that does exist is installed under the adjoining boundary of Cell 10-S and Cell 11-S (Figure 3). The limited LCS consists of a gravity collection pipe that underlie the fills and two (2) leachate extraction pumps that operate during months when freezing does not occur. The collected leachate is conveyed to a leachate holding lagoon located near the southwest corner of the site. Leachate recirculation does not occur at the site.

Leachate Line Cleaning - The leachate lines were cleaned in May 2022. Line cleaning is tentatively scheduled again in 2025.

Leachate Head Measurements - Four (4) leachate piezometers exist at the site to monitor leachate head. One (1) leachate piezometer (LW-1) is located in the north (N) series Cells, while three (3) leachate piezometers (LW-2, LW-3, and LW-4) are located in the south (S) series Cells.

The leachate head monitoring is monthly in LW-1 through LW-4 and is summarized in Table 12. No remarkable changes are noted in leachate head over time. Filling and capping of the majority of the site (Cell 1-N through Cell 4-N, and Cell 1-S through Cell 8-S) is complete.

Extraction pumps are also located in leachate piezometer LW-3 and LW-4. The pumps are removed from the extraction wells during the cold weather months to avoid freezing issues with the pumping and conveyance equipment.

It is recognized that the average thickness of leachate on the unlined areas consistently exceeds 12 inches (typically 1-10 feet). It is also recognized that the landfill construction predominately predates the requirement for leachate collection or for the requirement of limited leachate head on the liner. Further all cells are closed except active cells Cell 10-S and Cell 11-S.

The recent Cells (Cell 10-S and Cell 11S) have been designed in accordance with requirements of IAC 567, Chapter 114.26(11)"a"(1) through (7). A leachate head monitoring point was proposed in the March 31, 2022 Letter (Doc 102694) when the lowest sections of Cell 10-S and Cell 11-S are constructed in the future.

Based on the highly static nature of monthly leachate levels in all wells (LW-1 through LW-4) over time (2013 to 2023), the IDNR approved that the frequency of leachate measurements be reduced to quarterly on December 27, 2023 (Doc #108520).

Leachate Transport to Treatment – In 2024 there was no leachate hauled from the Plymouth County Landfill. A Treatment Agreement is in place with the Le Mars WWTP. Additionally, 2,950 gallons of leachate was extracted from LW-3 and LW-4 in 2024 (conveyed to the leachate lagoon).

Leachate Analyses - Chemical analysis of the leachate was not performed in 2024 as it was not required by the Treatment Agreement with Le Mars (only required in years when leachate is hauled).

Section 5.0 Gas Monitoring

Explosive gas monitoring was performed quarterly through 2024, per IAC 567-114.26(15). Figure 4 illustrates the approved gas monitoring system points including the corrective action Gas Vents. The results are summarized in Table 13.

Review of Table 13 indicates that gas was undetected and reported as 0% LEL at all monitoring points during all four (4) monitoring events in 2024.

The results of gas monitoring (%LEL) in the eleven (11) corrective action gas vents is also

summarized in Table 13. Gas monitoring at the Gas Vents indicates the landfill gas is passively vented as intended. The venting of landfill gas is anticipated to improve water quality at MW-7, MW-8, and MW-12 over time and is anticipated to restrict subsurface migration from the site.

Section 6.0 Recommendations

a. Continue to perform sampling in accordance with Special Provision 4 of the Revised Permit. Supplemental analyses beyond the VOC analyses are not recommended.
b. Samples collected in the Spring of 2025 should include analyses for TOX and Phenol in accordance with IAC 114.26(4)"f".
c. Continue to evaluate water quality in the Annual Water Quality Report, due November 30 of each year.
d. Continue to perform semi-annual water level measurements in the Spring & Fall of each year and reevaluate the data in the Annual Water Quality Report due November 30 of each year.
e. The Flow Rate Evaluation should be performed again in 2025.
f. The leachate collection line should be cleaned on a 3-year frequency per rule (next cleaning event in 2025).
g. Continue to perform quarterly leachate level measurements and re-evaluate leachate levels in the Annual Groundwater Quality Report/Leachate Control System Performance Evaluation due November 30 of each year.
h. Continue to perform quarterly explosive gas monitoring and report the results in the Annual Groundwater Quality Report.

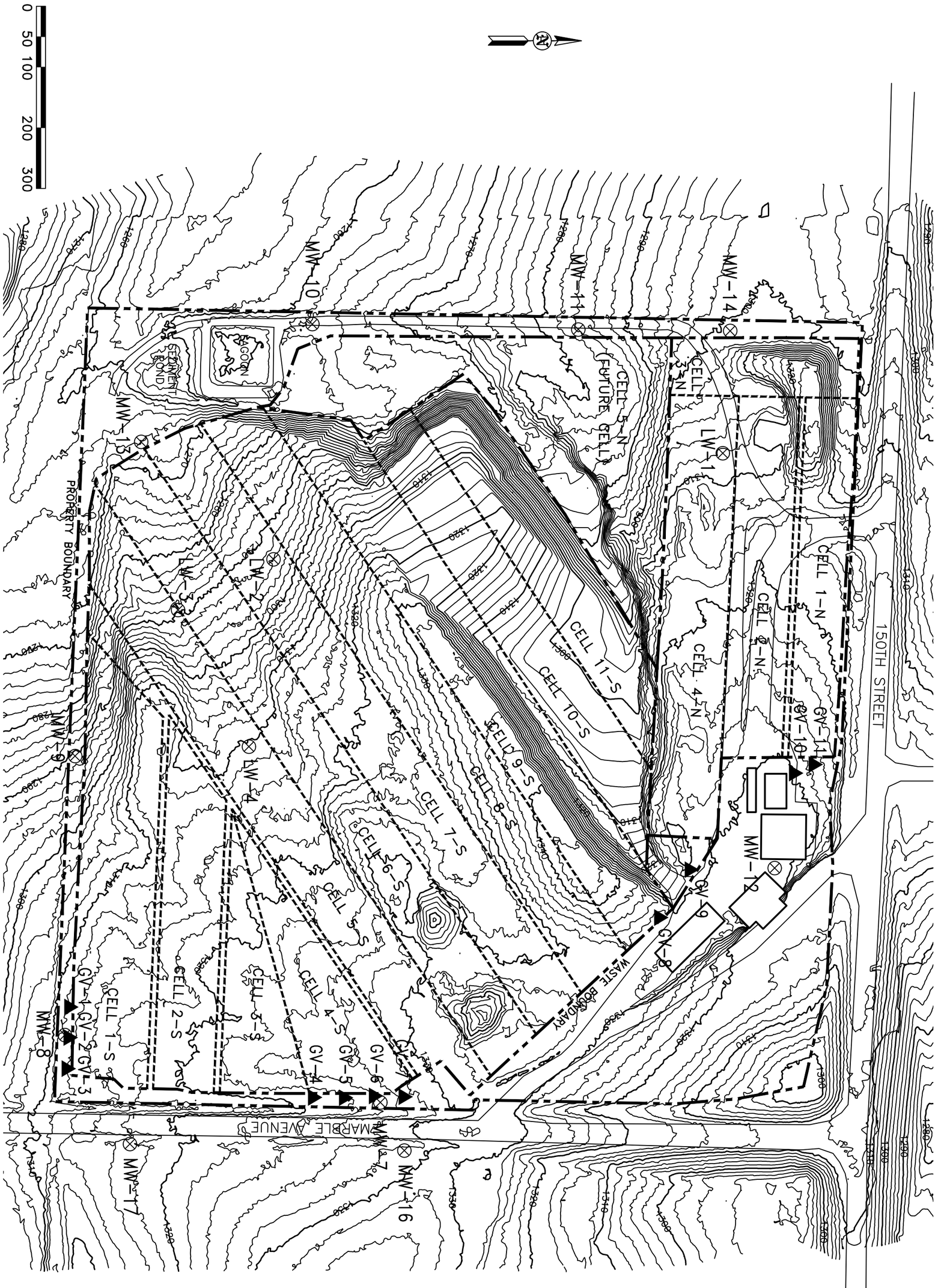
I hereby certify that this engineering document was prepared by me or under my direct personal supervision and that I am a duly licensed Professional Engineer under the laws of the State of Iowa.

12/2/24

DOUGLAS J. LUZBETAK, P.E. DATE
License number 12654

My license renewal date is December 31, 2024.

Pages or sheets covered by this seal:
All except Appendices.



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SITE PLAN

PLYMOUTH COUNTY SANITARY LANDFILL
LE MARS, IOWA

FIGURE: 1

REVISION	NO.	DATE
DRAWN DRA	PROJECT NO. 6052	DATE 10-31-24

WATER ELEVATION OCTOBER 29, 2024	
WELL	ELEV.
MW-7	1301.19
MW-8	1293.12
MW-9	1270.83
MW-10	1235.76
MW-11	1256.12
MW-12	1289.10
MW-13	1240.27
MW-14	1264.01
MW-16	1301.02
MW-17	1299.79

150TH STREET

CELL 1-N

CELL 2-N

CELL 3-N

CELL 4-N

CELL 5-N
(FUTURE CELL)

CELL 11-S

CELL 10-S

CELL 9-S

CELL 8-S

CELL 7-S

CELL 6-S

CELL 5-S

CELL 4-S

CELL 3-S

CELL 2-S

CELL 1-S

WASTE BOUNDARY

MARBLE AVENUE

MW-14

MW-12

MW-11

MW-10

MW-13

MW-9

MW-8

MW-7

MW-16

MW-17

LAGOON

SEDIMENT POND

PROPERTY BOUNDARY

1240

1250

1260

1270

1280

1290

1300

1310

0 50 100 200 300

FIGURE: 2

REVISION	NO.	DATE
DRAWN DRA	PROJECT NO. 6052	DATE 10-31-24

GROUNDWATER CONTOURS

PLYMOUTH COUNTY SANITARY LANDFILL
LE MARSA, IOWA

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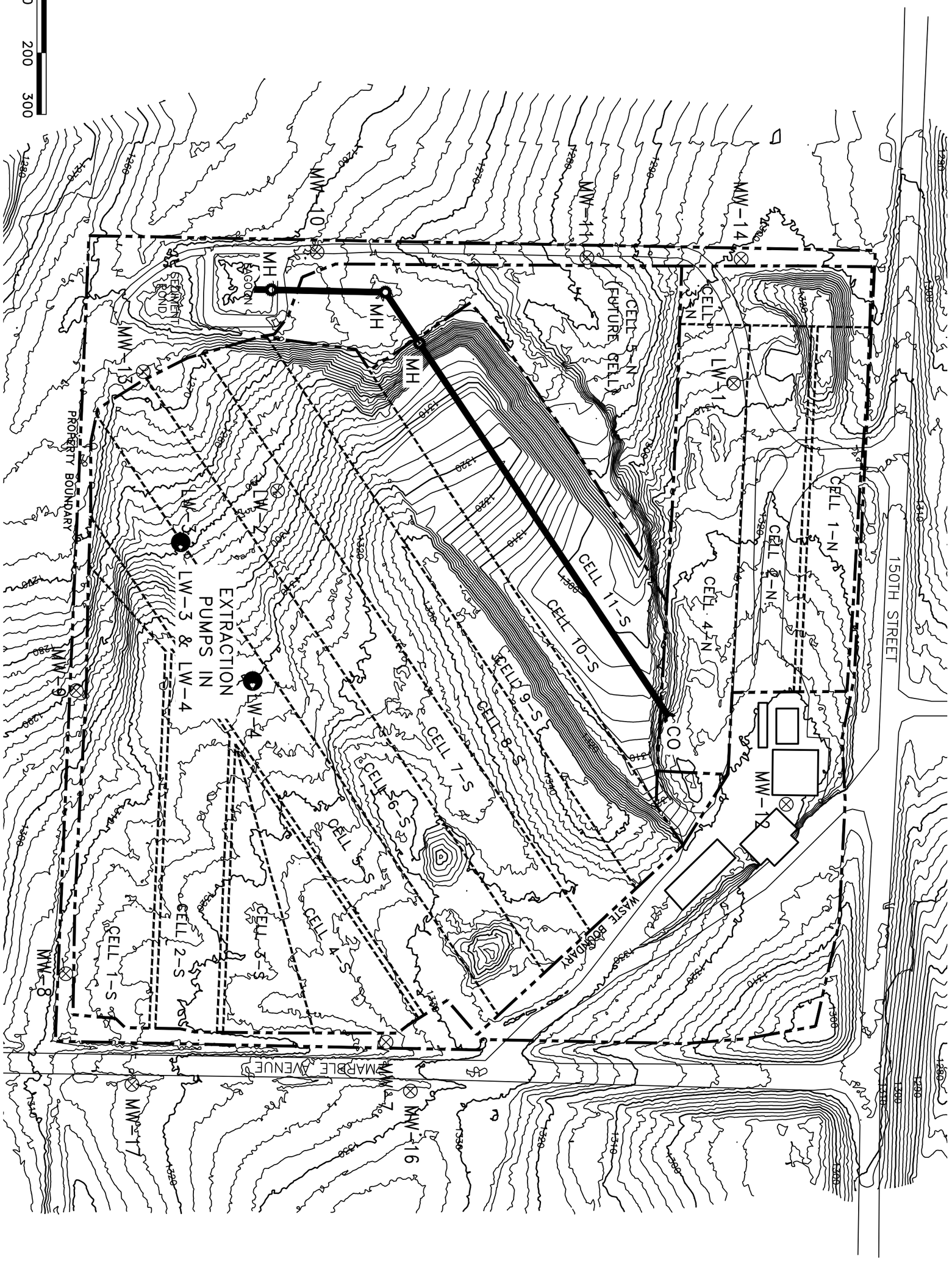

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LEACHATE COLLECTION SYSTEM PLAN

PLYMOUTH COUNTY SANITARY LANDFILL
LE MARS, IOWA

FIGURE: 3

REVISION	NO.	DATE
DRAWN DRA	PROJECT NO. 6052	DATE 10-31-24

LOCATION
1 EQUIPMENT BUILDING
2 TRANSFER STATION
3 STORAGE/RCC
4 OFFICE BUILDING
5 SCALE
MW-7
MW-8
MW-9
MW-10
MW-11
MW-12
MW-13
MW-14
MW-16
MW-17
GAS VENT GV-1
GAS VENT GV-2
GAS VENT GV-3
GAS VENT GV-4
GAS VENT GV-5
GAS VENT GV-6
GAS VENT GV-7
GAS VENT GV-8
GAS VENT GV-9
GAS VENT GV-10
GAS VENT GV-11

FIGURE: 4

REVISION	NO.	DATE
DRAWN DRA	PROJECT NO. 6052	DATE 10-31-24

GAS MONITORING SYSTEM PLAN

PLYMOUTH COUNTY SANITARY LANDFILL
LE MARS, IOWA

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Table 1 – Monitoring Program Summary

Table 1
Monitoring Program Summary
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

2024

Monitoring Well	Formation	Current Monitoring Program	Change for next sampling event	Historic - Constituents w/ SSI	Spring - Constituents w/ SSI	Fall - Constituents w/ SSI	Historic - Constituents w/ SSL	Spring - Constituents w/ SSL	Fall - Constituents w/ SSL	Total # of Samples in each monitoring program since January 1, 2018		
										Detection	Assessment	Corrective Action
MW-17	Glacial Till	Background	No Change	None	None	None	None	None	None	14	0	0
MW-8	Glacial Till	Corrective Action	No Change	1,2-dichloropropane, benzene, cis-1,2-dichloroethene,trichloroethene, vinyl chloride, chloride, specific conductance, TOX	cis-1,2-dichloroethene, vinyl chloride, chloride, specific conductance, TOX	cis-1,2-dichloroethene, chloride, specific conductance	**cis-1,2-dichloroethene, vinyl chloride**	**vinyl chloride**	**vinyl chloride**	0	0	14
MW-9	Glacial Till	Routine	No Change	COD, chloride,specific conductance, TOX	chloride,specific conductance, TOX	COD, chloride	None	None	None	10	0	0
MW-10	Weathered Shale	Routine	No Change	cis-1,2-dichloroethene, COD, chloride,specific conductance, TOX	chloride,specific conductance, TOX	COD, chloride,specific conductance	None	None	None	13	0	0
MW-11	Fine Sand/Glacial Till	Routine	No Change	chloride, specific conductance	chloride, specific conductance	chloride, specific conductance	None	None	None	11	0	0
MW-12	Medium Sand/Glacial Till	Corrective Action	No Change	benzene, cis-1,2-dichloroethene,trichloroethene, vinyl chloride, chloride, iron, specific conductance, TOX	benzene, cis-1,2-dichloroethene, vinyl chloride, chloride, iron, specific conductance, TOX	benzene, cis-1,2-dichloroethene, vinyl chloride, chloride, iron, specific conductance	**vinyl chloride**	**vinyl chloride**	**vinyl chloride**	0	0	14
MW-13	Glacial Till/Weathered Shale	Routine	No Change	COD, chloride, iron, specific conductance, TOX	COD, chloride, iron, specific conductance, TOX	COD, chloride, iron, specific conductance	None	None	None	14	0	0
MW-14	Glacial Till	Routine	No Change	1,2-dichloropropane, benzene, cis-1,2-dichloroethene, trichloroethene, COD, chloride, specific conductance, TOX	benzene, cis-1,2-dichloroethene, COD, chloride, specific conductance, TOX	benzene, cis-1,2-dichloroethene, COD, chloride, specific conductance	None	None	None	13	0	0
MW-16	Glacial Till	Routine	No Change	COD, chloride, specific conductance	specific conductance	COD, chloride, specific conductance	None	None	None	14	0	0
MW-7	Glacial Till	Corrective Action	No Change	1,2-dichloroethane, 1,2-dichloropropane, benzene, cis-1,2-dichloroethene, tetrachloroethene, trichloroethene, vinyl chloride	1,2-dichloroethane, 1,2-dichloropropane, benzene, cis-1,2-dichloroethene, tetrachloroethene, trichloroethene, vinyl chloride	1,2-dichloropropane, benzene, cis-1,2-dichloroethene, trichloroethene, vinyl chloride	**1,2-dichloropropane, cis-1,2-dichloroethene, TCE, vinyl chloride**	**1,2-dichloropropane, cis-1,2-dichloroethene, TCE, vinyl chloride**	**1,2-dichloropropane, cis-1,2-dichloroethene, TCE, vinyl chloride**	0	0	14

Table 2 – Monitoring Program Implementation Schedule

Table 2
Monitoring Program Implementation Schedule
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

2024

Monitoring Well	Recent Sampling Dates and Constituents	Upcoming Sampling Dates and Constituents	
		March, 2025	**September, 2025**
MW-17	See Table 9	IAC 567-114.26(4) "e" + **"f"** + VOC	IAC 567-114.26(4) "e" + VOC
MW-8	See Table 9	IAC 567-114.26(4) "e" + **"f"** + VOC	IAC 567-114.26(4) "e" + VOC
MW-9	See Table 9	IAC 567-114.26(4) "e" + **"f"**	IAC 567-114.26(4) "e"
MW-10	See Table 9	IAC 567-114.26(4) "e" + **"f"** + VOC	IAC 567-114.26(4) "e" + VOC
MW-11	See Table 9	IAC 567-114.26(4) "e" + **"f"**	IAC 567-114.26(4) "e"
MW-12	See Table 9	IAC 567-114.26(4) "e" + **"f"** + VOC	IAC 567-114.26(4) "e" + VOC
MW-13	See Table 9	IAC 567-114.26(4) "e" + **"f"**	IAC 567-114.26(4) "e"
MW-14	See Table 9	IAC 567-114.26(4) "e" + **"f"** + VOC	IAC 567-114.26(4) "e" + VOC
MW-16	See Table 9	IAC 567-114.26(4) "e" + **"f"** + VOC	IAC 567-114.26(4) "e" + VOC
MW-7	See Table 9	VOC	VOC

VOC = benzene, cis-1,2-dichloroethene, 1,2-dichloropropane, methyl chloride, PCE, TCE, vinyl chloride.

Table 3 – Monitoring Well Maintenance Performance Reevaluation Schedule

Table 3
Monitoring Well Maintenance and Performance Revaluation Schedule
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

Compliance with:	Monitoring Calendar Years									
	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029
567 IAC 114.21(2)"a" high and low water levels (biennial)	X		X		X		P		P	
567 IAC 114.21(2)"a" well location assessment and screen exposure (biennial)	X		X		X		P		P	
567 IAC 114.21(2)"b" changes in the hydrologic setting and flow paths (biennial)	X		X		X		P		P	
567 IAC 114.21(2)"c" well depths (annual)	X	X	X	X	X	P	P	P	P	P
567 IAC 114.21(2)"d" well permeability rates - variance for well recharge evaluations (biennial)		X		X		P		P		P

X = completed
P = Planned
N/A = Not Applicable

Table 4 – Monitoring Well Maintenance Performance Reevaluation Summary

Table 4
Monitoring Well Maintenance and Performance Summary
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

Well	Top of casing	Top of Screen	Total Depth		Date of Measurements		Maximum Depth Discrepancy (ft)
					5/8/2024	10/29/2024	
MW-17	1319.09	1301.07	33.02	Groundwater Level (ft)	13.5	19.3	1.12
				Groundwater Elevation (Ft MSL)	1305.59	1299.79	
				Measured Well Depth (ft)	31.9	31.9	
				Submerged (+) or Exposed screen (-)	4.52	-1.28	
MW-8	1314.12	1296.7	27.42	Groundwater Level (ft)	22.3	21	-0.38
				Groundwater Elevation (Ft MSL)	1291.82	1293.12	
				Measured Well Depth (ft)	27.8	27.8	
				Submerged (+) or Exposed screen (-)	-4.88	-3.58	
MW-9	1291.83	1277.01	24.73	Groundwater Level (ft)	18	21	-0.57
				Groundwater Elevation (Ft MSL)	1273.83	1270.83	
				Measured Well Depth (ft)	25.3	25.3	
				Submerged (+) or Exposed screen (-)	-3.18	-6.18	
MW-10	1264.66	1242	32.66	Groundwater Level (ft)	28.4	28.9	0.06
				Groundwater Elevation (Ft MSL)	1236.26	1235.76	
				Measured Well Depth (ft)	32.6	32.6	
				Submerged (+) or Exposed screen (-)	-5.74	-6.24	
MW-11	1285.62	1258	37.62	Groundwater Level (ft)	27	29.5	-1.48
				Groundwater Elevation (Ft MSL)	1258.62	1256.12	
				Measured Well Depth (ft)	39.1	39.1	
				Submerged (+) or Exposed screen (-)	0.62	-1.88	
MW-12	1333.2	1290.3	52.9	Groundwater Level (ft)	45	44.1	-0.7
				Groundwater Elevation (Ft MSL)	1288.2	1289.1	
				Measured Well Depth (ft)	53.6	53.6	
				Submerged (+) or Exposed screen (-)	-2.1	-1.2	
MW-13	1266.67	1248.8	36.87	Groundwater Level (ft)	18.3	26.4	0.37
				Groundwater Elevation (Ft MSL)	1248.37	1240.27	
				Measured Well Depth (ft)	36.5	36.5	
				Submerged (+) or Exposed screen (-)	-0.43	-8.53	
MW-14	1302.41	1267.4	50.01	Groundwater Level (ft)	40	38.4	-0.89
				Groundwater Elevation (Ft MSL)	1262.41	1264.01	
				Measured Well Depth (ft)	50.9	50.9	
				Submerged (+) or Exposed screen (-)	-4.99	-3.39	
MW-16	1330.02	1309	36.02	Groundwater Level (ft)	22.2	29	-1.38
				Groundwater Elevation (Ft MSL)	1307.82	1301.02	
				Measured Well Depth (ft)	37.4	37.4	
				Submerged (+) or Exposed screen (-)	-1.18	-7.98	
MW-7	1325.79	1303.4	32.4	Groundwater Level (ft)	25.3	24.6	-0.5
				Groundwater Elevation (Ft MSL)	1300.49	1301.19	
				Measured Well Depth (ft)	32.9	32.9	
				Submerged (+) or Exposed screen (-)	-2.91	-2.21	

Table 4A – Water Elevation Summary 2017 to Present

Table 4A
Water Elevation Data
Plymouth County Sanitary Landfill
75-SDP-1-74P

Well/TOC	MW-17	1319.09			MW-8	1314.12			MW-9	1291.83			MW-10	1264.66		
	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS
04/04/17	17.57	1301.52	1301.07	0.45	19.23	1294.89	1296.70	-1.81	23.57	1268.26	1277.01	-8.75	27.92	1236.74	1242.00	-5.26
10/10/17	19.30	1299.79	1301.07	-1.28	21.41	1292.71	1296.70	-3.99	21.65	1270.18	1277.01	-6.83	28.20	1236.46	1242.00	-5.54
04/11/18	18.69	1300.40	1301.07	-0.67	21.50	1292.62	1296.70	-4.08	23.00	1268.83	1277.01	-8.18	28.11	1236.55	1242.00	-5.45
10/30/18	14.40	1304.69	1301.07	3.62	16.39	1297.73	1296.70	1.03	16.62	1275.21	1277.01	-1.80	23.92	1240.74	1242.00	-1.26
04/01/19	17.24	1301.85	1301.07	0.78	18.29	1295.83	1296.70	-0.87	21.00	1270.83	1277.01	-6.18	26.35	1238.31	1242.00	-3.69
10/08/19	17.47	1301.62	1301.07	0.55	19.54	1294.58	1296.70	-2.12	20.12	1271.71	1277.01	-5.30	26.90	1237.76	1242.00	-4.24
04/20/20	15.40	1303.69	1301.07	2.62	18.50	1295.62	1296.70	-1.08	18.00	1273.83	1277.01	-3.18	27.20	1237.46	1242.00	-4.54
10/20/20	21.00	1298.09	1301.07	-2.98	18.40	1295.72	1296.70	-0.98	24.00	1267.83	1277.01	-9.18	30.00	1234.66	1242.00	-7.34
04/26/21	20.90	1298.19	1301.07	-2.88	22.50	1291.62	1296.70	-5.08	24.30	1267.53	1277.01	-9.48	30.10	1234.56	1242.00	-7.44
08/16/21	22.00	1297.09	1301.07	-3.98	22.90	1291.22	1296.70	-5.48	24.50	1267.33	1277.01	-9.68	30.60	1234.06	1242.00	-7.94
06/01/22	23.30	1295.79	1301.07	-5.28	24.00	1290.12	1296.70	-6.58	25.30	1266.53	1277.01	-10.48	31.30	1233.36	1242.00	-8.64
10/03/22	23.80	1295.29	1301.07	-5.78	24.60	1289.52	1296.70	-7.18	25.30	1266.53	1277.01	-10.48	32.60	1232.06	1242.00	-9.94
05/03/23	20.60	1298.49	1301.07	-2.58	23.70	1290.42	1296.70	-6.28	24.20	1267.63	1277.01	-9.38	29.70	1234.96	1242.00	-7.04
10/11/23	21.90	1297.19	1301.07	-3.88	24.10	1290.02	1296.70	-6.68	24.80	1267.03	1277.01	-9.98	31.20	1233.46	1242.00	-8.54
05/08/24	13.50	1305.59	1301.07	4.52	22.30	1291.82	1296.70	-4.88	18.00	1273.83	1277.01	-3.18	28.40	1236.26	1242.00	-5.74
August, 2024	21.20	1297.89	1301.07	-3.18	26.30	1287.82	1296.70	-8.88	25.30	1266.53	1277.01	-10.48	31.00	1233.66	1242.00	-8.34
10/29/24	19.30	1299.79	1301.07	-1.28	21.00	1293.12	1296.70	-3.58	21.00	1270.83	1277.01	-6.18	28.90	1235.76	1242.00	-6.24
minimum	13.50	1295.29		-5.78	16.39	1287.82		-8.88	16.62	1266.53		-10.48	23.92	1232.06		-9.94
maximum	23.80	1305.59		4.52	26.30	1297.73		1.03	25.30	1275.21		-1.80	32.60	1240.74		-1.26
average				-1.25				-4.03				-7.57				-6.30

Exposed Screens

Submerged Screens

Table 4A
Water Elevation Data
Plymouth County Sanitary Landfill
75-SDP-1-74P

Well/TOC	MW-11	1285.62			MW-12	1333.2			MW-13	1266.67			MW-14	1302.41		
	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS
04/04/17	26.12	1259.50	1258.00	1.50	44.28	1288.92	1290.30	-1.38	22.82	1243.85	1248.80	-4.95	36.27	1266.14	1267.40	-1.26
10/10/17	27.51	1258.11	1258.00	0.11	44.93	1288.27	1290.30	-2.03	25.65	1241.02	1248.80	-7.78	35.45	1266.96	1267.40	-0.44
04/11/18	28.16	1257.46	1258.00	-0.54	45.04	1288.16	1290.30	-2.14	24.34	1242.33	1248.80	-6.47	38.42	1263.99	1267.40	-3.41
10/30/18	21.73	1263.89	1258.00	5.89	44.00	1289.20	1290.30	-1.10	21.12	1245.55	1248.80	-3.25	29.63	1272.78	1267.40	5.38
04/01/19	24.59	1261.03	1258.00	3.03	44.54	1288.66	1290.30	-1.64	23.00	1243.67	1248.80	-5.13	33.71	1268.70	1267.40	1.30
10/08/19	24.00	1261.62	1258.00	3.62	44.22	1288.98	1290.30	-1.32	21.80	1244.87	1248.80	-3.93	33.70	1268.71	1267.40	1.31
04/20/20	24.80	1260.82	1258.00	2.82	45.10	1288.10	1290.30	-2.20	22.40	1244.27	1248.80	-4.53	35.00	1267.41	1267.40	0.01
10/20/20	28.60	1257.02	1258.00	-0.98	45.30	1287.90	1290.30	-2.40	26.50	1240.17	1248.80	-8.63	38.00	1264.41	1267.40	-2.99
04/26/21	30.20	1255.42	1258.00	-2.58	45.80	1287.40	1290.30	-2.90	26.20	1240.47	1248.80	-8.33	42.70	1259.71	1267.40	-7.69
08/16/21	31.30	1254.32	1258.00	-3.68	45.50	1287.70	1290.30	-2.60	28.90	1237.77	1248.80	-11.03	44.20	1258.21	1267.40	-9.19
06/01/22	32.90	1252.72	1258.00	-5.28	45.90	1287.30	1290.30	-3.00	27.50	1239.17	1248.80	-9.63	47.60	1254.81	1267.40	-12.59
10/03/22	33.10	1252.52	1258.00	-5.48	46.20	1287.00	1290.30	-3.30	27.60	1239.07	1248.80	-9.73	50.90	1251.51	1267.40	-15.89
05/03/23	32.20	1253.42	1258.00	-4.58	45.60	1287.60	1290.30	-2.70	25.90	1240.77	1248.80	-8.03	47.40	1255.01	1267.40	-12.39
10/11/23	31.60	1254.02	1258.00	-3.98	45.60	1287.60	1290.30	-2.70	27.50	1239.17	1248.80	-9.63	45.70	1256.71	1267.40	-10.69
05/08/24	27.00	1258.62	1258.00	0.62	45.00	1288.20	1290.30	-2.10	18.30	1248.37	1248.80	-0.43	40.00	1262.41	1267.40	-4.99
August, 2024	32.00	1253.62	1258.00	-4.38	45.60	1287.60	1290.30	-2.70	26.30	1240.37	1248.80	-8.43	47.50	1254.91	1267.40	-12.49
10/29/24	29.50	1256.12	1258.00	-1.88	44.10	1289.10	1290.30	-1.20	26.40	1240.27	1248.80	-8.53	38.40	1264.01	1267.40	-3.39
minimum	21.73	1252.52		-5.48	44.00	1287.00		-3.30	18.30	1237.77		-11.03	29.63	1251.51		-15.89
maximum	33.10	1263.89		5.89	46.20	1289.20		-1.10	28.90	1248.37		-0.43	50.90	1272.78		5.38
average				-0.93				-2.20				-6.97				-5.26

Table 4A
Water Elevation Data
Plymouth County Sanitary Landfill
75-SDP-1-74P

Well/TOC	MW-16	1330.02			MW-7	1325.79		
Date	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS	Water Depth	Water Elevation	Top of Screen (TOS) Elevation	above(+)/below(-) TOS
04/04/17	27.57	1302.45	1309.00	-6.55	23.67	1302.12	1303.40	-1.28
10/10/17	24.31	1305.71	1309.00	-3.29	21.40	1304.39	1303.40	0.99
04/11/18	28.13	1301.89	1309.00	-7.11	24.10	1301.69	1303.40	-1.71
10/30/18	20.54	1309.48	1309.00	0.48	17.91	1307.88	1303.40	4.48
04/01/19	26.53	1303.49	1309.00	-5.51	22.49	1303.30	1303.40	-0.10
10/08/19	25.12	1304.90	1309.00	-4.10	21.30	1304.49	1303.40	1.09
04/20/20	26.50	1303.52	1309.00	-5.48	22.30	1303.49	1303.40	0.09
10/20/20	30.80	1299.22	1309.00	-9.78	26.40	1299.39	1303.40	-4.01
04/26/21	29.20	1300.82	1309.00	-8.18	25.30	1300.49	1303.40	-2.91
08/16/21	31.00	1299.02	1309.00	-9.98	27.00	1298.79	1303.40	-4.61
06/01/22	33.20	1296.82	1309.00	-12.18	29.00	1296.79	1303.40	-6.61
10/03/22	33.50	1296.52	1309.00	-12.48	29.20	1296.59	1303.40	-6.81
05/03/23	29.00	1301.02	1309.00	-7.98	25.30	1300.49	1303.40	-2.91
10/11/23	31.70	1298.32	1309.00	-10.68	27.60	1298.19	1303.40	-5.21
05/08/24	22.20	1307.82	1309.00	-1.18	19.20	1306.59	1303.40	3.19
August, 2024	30.50	1299.52	1309.00	-9.48	30.50	1295.29	1303.40	-8.11
10/29/24	29.00	1301.02	1309.00	-7.98	24.60	1301.19	1303.40	-2.21
minimum	20.54	1296.52		-12.48	17.91	1295.29		-8.11
maximum	33.50	1309.48		0.48	30.50	1307.88		4.48
average				-7.14				-2.16

Table 4B – Water Elevation Summary Prior to 2017

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-7	1325.79	1303.4-1293.4	01/06/11	23.63	1302.16	Within Screen
			02/28/11	22.29	1303.50	Above Screen
			03/21/11	23.40	1302.39	Within Screen
			04/07/11	23.70	1302.09	Within Screen
			05/31/11	22.01	1303.78	Above Screen
			06/27/11	18.94	1306.85	Above Screen
			07/11	18.41	1307.38	Above Screen
			08/11	20.82	1304.97	Above Screen
			09/20/11	21.91	1303.88	Above Screen
			10/27/11	23.79	1302.00	Within Screen
			11/14/11	24.48	1301.31	Within Screen
			01/10/12	26.10	1299.69	Within Screen
			02/17/12	27.01	1298.78	Within Screen
			03/27/12	26.62	1299.17	Within Screen
			04/23/12	27.17	1298.62	Within Screen
			05/03/12	27.25	1298.54	Within Screen
			06/28/12	27.11	1298.68	Within Screen
			07/30/12	27.58	1298.21	Within Screen
			08/28/12	27.84	1297.95	Within Screen
			09/19/12	28.02	1297.77	Within Screen
			10/23/12	28.06	1297.73	Within Screen
			11/20/12	28.82	1296.97	Within Screen
			12/19/12	28.95	1296.84	Within Screen
			01/17/13	29.22	1296.57	Within Screen
			02/27/13	29.41	1296.38	Within Screen
			03/09/13	29.36	1296.43	Within Screen
			04/16/13	27.99	1297.80	Within Screen
			05/23/13	25.67	1300.12	Within Screen
			06/18/13	23.18	1302.61	Within Screen
			07/23/13	24.65	1301.14	Within Screen
			08/28/13	25.01	1300.78	Within Screen
			09/19/13	26.22	1299.57	Within Screen
			10/28/13	26.46	1299.33	Within Screen
			11/27/13	27.25	1298.54	Within Screen
			12/26/13	27.93	1297.86	Within Screen
			1/29/14	28.36	1297.43	Within Screen
			2/27/14	28.82	1296.97	Within Screen
			3/18/14	28.98	1296.81	Within Screen
			4/25/14	29.34	1296.45	Within Screen
			5/14/14	29.34	1296.45	Within Screen
			6/24/14	27.44	1298.35	Within Screen
			7/25/14	24.64	1301.15	Within Screen
			8/22/14	24.45	1301.34	Within Screen
			9/15/14	24.02	1301.77	Within Screen
			10/6/14	24.00	1301.79	Within Screen
			11/3/14	24.75	1301.04	Within Screen
			12/12/14	26.08	1299.71	Within Screen
			1/16/15	26.64	1299.15	Within Screen
			2/26/15	26.29	1299.50	Within Screen
			3/16/15	26.38	1299.41	Within Screen
			4/15/15	26.81	1298.98	Within Screen
			5/21/15	26.87	1298.92	Within Screen
			5/23/15	26.00	1299.79	Within Screen
			7/16/15	24.45	1301.34	Within Screen
			8/20/15	22.51	1303.28	Within Screen
			9/23/15	23.45	1302.34	Within Screen
			10/5/15	23.59	1302.20	Within Screen
			11/10/15	24.78	1301.01	Within Screen
			12/18/15	21.35	1304.44	Above Screen
			1/7/16	20.65	1305.14	Above Screen
			2/23/16	19.75	1306.04	Above Screen
			3/22/16	18.92	1306.87	Above Screen
			4/26/16	18.31	1307.48	Above Screen
			5/18/16	16.37	1309.42	Above Screen
			6/27/16	15.7	1310.09	Above Screen
			7/25/16	17.32	1308.47	Above Screen
			8/1/16	19.45	1306.34	Above Screen
			9/22/16	19.84	1305.95	Above Screen
			10/5/16	20.68	1305.11	Above Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-8	1314.12	1296.7-1286.7	01/06/11	18.56	1295.56	Within Screen
			02/28/11	17.11	1297.01	Above Screen
			03/21/11	17.24	1296.88	Above Screen
			04/07/11	17.69	1296.43	Within Screen
			05/31/11	16.51	1297.61	Above Screen
			06/27/11	14.15	1299.97	Above Screen
			07/11	15.34	1298.78	Above Screen
			08/11	18.00	1296.12	Within Screen
			09/20/11	18.82	1295.30	Within Screen
			10/27/11	19.62	1294.50	Within Screen
			11/14/11	20.00	1294.12	Within Screen
			01/10/12	21.13	1292.99	Within Screen
			02/17/12	21.59	1292.53	Within Screen
			03/27/12	21.68	1292.44	Within Screen
			04/23/12	21.87	1292.25	Within Screen
			05/03/12	21.90	1292.22	Within Screen
			06/28/12	22.13	1291.99	Within Screen
			07/30/12	22.51	1291.61	Within Screen
			08/28/12	22.93	1291.19	Within Screen
			09/19/12	23.24	1290.88	Within Screen
			10/23/12	23.60	1290.52	Within Screen
			11/20/12	23.81	1290.31	Within Screen
			12/19/12	23.96	1290.16	Within Screen
			01/17/13	24.16	1289.96	Within Screen
			02/27/13	24.31	1289.81	Within Screen
			03/09/13	24.36	1289.76	Within Screen
			04/16/13	24.15	1289.97	Within Screen
			05/23/13	22.87	1291.25	Within Screen
			06/18/13	20.86	1293.26	Within Screen
			07/23/13	19.54	1294.58	Within Screen
			08/28/13	19.91	1294.21	Within Screen
			09/19/13	20.35	1293.77	Within Screen
			10/28/13	20.81	1293.31	Within Screen
			11/27/13	21.23	1292.89	Within Screen
			12/26/13	21.57	1292.55	Within Screen
			1/29/14	21.9	1292.22	Within Screen
			2/27/14	22.27	1291.85	Within Screen
			3/18/14	22.71	1291.41	Within Screen
			4/25/14	22.81	1291.31	Within Screen
			5/14/14	22.56	1291.56	Within Screen
			6/24/14	22.38	1291.74	Within Screen
			7/25/14	20.81	1293.31	Within Screen
			8/22/14	20.64	1293.48	Within Screen
			9/15/14	20.87	1293.25	Within Screen
			10/6/14	20.82	1293.30	Within Screen
			11/3/14	20.82	1293.30	Within Screen
			12/12/14	20.97	1293.15	Within Screen
			1/16/15	21.17	1292.95	Within Screen
			2/26/15	21.11	1293.01	Within Screen
			3/16/15	20.97	1293.15	Within Screen
			4/15/15	21.16	1292.96	Within Screen
			5/21/15	21.14	1292.98	Within Screen
			5/23/15	21	1293.12	Within Screen
			7/16/15	21.32	1292.80	Within Screen
			8/20/15	21.67	1292.45	Within Screen
			9/23/15	20.85	1293.27	Within Screen
			10/5/15	20.65	1293.47	Within Screen
			11/10/15	20.44	1293.68	Within Screen
			12/18/15	19.75	1294.37	Within Screen
			1/7/16	18.82	1295.30	Within Screen
			2/23/16	17.89	1296.23	Within Screen
			3/22/16	15.63	1298.49	Above Screen
			4/26/16	14.83	1299.29	Above Screen
			5/18/16	13.53	1300.59	Above Screen
			6/27/16	14.37	1299.75	Above Screen
			7/25/16	16.04	1298.08	Above Screen
			8/1/16	17.22	1296.90	Above Screen
			9/22/16	17.54	1296.58	Within Screen
			10/5/16	17.64	1296.48	Within Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-9	1291.83	1277.1-1267.1	01/06/11	22.68	1269.15	Within Screen
			02/28/11	20.41	1271.42	Within Screen
			03/21/11	20.77	1271.06	Within Screen
			04/07/11	20.55	1271.28	Within Screen
			05/31/11	15.48	1276.35	Within Screen
			06/27/11	14.01	1277.82	Above Screen
			07/11	16.75	1275.08	Within Screen
			08/11	21.81	1270.02	Within Screen
			09/20/11	22.65	1269.18	Within Screen
			10/27/11	23.46	1268.37	Within Screen
			11/14/11	23.69	1268.14	Within Screen
			01/10/12	24.34	1267.49	Within Screen
			02/17/12	24.85	1266.98	Below Screen
			03/27/12	25.15	1266.68	Below Screen
			04/23/12	25.20	1266.63	Below Screen
			05/03/12	Dry	NC	Below Screen
			06/28/12	Dry	NC	Below Screen
			07/30/12	Dry	NC	Below Screen
			08/28/12	Dry	NC	Below Screen
			09/19/12	Dry	NC	Below Screen
			10/23/12	Dry	NC	Below Screen
			11/20/12	Dry	NC	Below Screen
			12/19/12	Dry	NC	Below Screen
			01/17/13	Dry	NC	Below Screen
			02/27/13	Dry	NC	Below Screen
			03/09/13	Dry	NC	Below Screen
			04/16/13	Dry	NC	Below Screen
			05/23/13	22.65	1269.18	Within Screen
			06/18/13	16.96	1274.87	Within Screen
			07/23/13	21.44	1270.39	Within Screen
			08/28/13	23.15	1268.68	Within Screen
			09/19/13	23.79	1268.04	Within Screen
			10/28/13	24.21	1267.62	Within Screen
			11/27/13	24.69	1267.14	Within Screen
			12/26/13	25.1	1266.73	Below Screen
			1/29/14	Dry	NC	Below Screen
			2/27/14	Dry	NC	Below Screen
			3/18/14	Dry	NC	Below Screen
			4/25/14	Dry	NC	Below Screen
			5/14/14	Dry	NC	Below Screen
			6/24/14	24.3	1267.53	Within Screen
			7/25/14	23.48	1268.35	Within Screen
			8/22/14	23.88	1267.95	Within Screen
			9/15/14	24.02	1267.81	Within Screen
			10/6/14	23.98	1267.85	Within Screen
			11/3/14	24.11	1267.72	Within Screen
			12/12/14	20.97	1270.86	Within Screen
			1/16/15	25.35	1266.48	Below Screen
			2/26/15	Dry	NC	Below Screen
			3/16/15	Dry	NC	Below Screen
			4/15/15	Dry	NC	Below Screen
			5/21/15	Dry	NC	Below Screen
			5/23/15	Dry	NC	Below Screen
			7/16/15	24.6	1267.23	Within Screen
			8/20/15	24.2	1267.63	Within Screen
			9/23/15	23.64	1268.19	Within Screen
			10/5/15	23.65	1268.18	Within Screen
			11/10/15	23.72	1268.11	Within Screen
			12/18/15	16.45	1275.38	Within Screen
			1/7/16	17.25	1274.58	Within Screen
			2/23/16	14.62	1277.21	Above Screen
			3/22/16	14.10	1277.73	Above Screen
			4/26/16	13.57	1278.26	Above Screen
			5/18/16	13.97	1277.86	Above Screen
			6/27/16	16.65	1275.18	Within Screen
			7/25/16	20.38	1271.45	Within Screen
			8/1/16	22.17	1269.66	Within Screen
			9/22/16	22.65	1269.18	Within Screen
			10/5/16	23.57	1268.26	Within Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-10	1264.66	1242.0-1232.0	01/06/11	27.36	1237.30	Within Screen
			02/28/11	26.70	1237.96	Within Screen
			03/21/11	27.19	1237.47	Within Screen
			04/07/11	27.58	1237.08	Within Screen
			05/31/11	25.60	1239.06	Within Screen
			06/27/11	22.92	1241.74	Within Screen
			07/11	23.52	1241.14	Within Screen
			08/11	26.23	1238.43	Within Screen
			09/20/11	27.12	1237.54	Within Screen
			10/27/11	27.94	1236.72	Within Screen
			11/14/11	28.17	1236.49	Within Screen
			01/10/12	28.89	1235.77	Within Screen
			02/17/12	29.25	1235.41	Within Screen
			03/27/12	29.09	1235.57	Within Screen
			04/23/12	29.38	1235.28	Within Screen
			05/03/12	29.41	1235.25	Within Screen
			06/28/12	29.14	1235.52	Within Screen
			07/30/12	29.64	1235.02	Within Screen
			08/28/12	30.15	1234.51	Within Screen
			09/19/12	30.45	1234.21	Within Screen
			10/23/12	30.67	1233.99	Within Screen
			11/20/12	30.83	1233.83	Within Screen
			12/19/12	30.99	1233.67	Within Screen
			01/17/13	31.12	1233.54	Within Screen
			02/27/13	31.33	1233.33	Within Screen
			03/09/13	31.33	1233.33	Within Screen
			04/16/13	30.76	1233.90	Within Screen
			05/23/13	30.34	1234.32	Within Screen
			06/18/13	28.38	1236.28	Within Screen
			07/23/13	28.88	1235.78	Within Screen
			08/28/13	29.53	1235.13	Within Screen
			09/19/13	29.67	1234.99	Within Screen
			10/28/13	30.58	1234.08	Within Screen
			11/27/13	30.82	1233.84	Within Screen
			12/26/13	31.05	1233.61	Within Screen
			1/29/14	31.20	1233.46	Within Screen
			2/27/14	31.36	1233.30	Within Screen
			3/18/14	31.33	1233.33	Within Screen
			4/25/14	31.41	1233.25	Within Screen
			5/14/14	31.48	1233.18	Within Screen
			6/24/14	29.41	1235.25	Within Screen
			7/25/14	28.64	1236.02	Within Screen
			8/22/14	28.82	1235.84	Within Screen
			9/15/14	28.91	1235.75	Within Screen
			10/6/14	28.87	1235.79	Within Screen
			11/3/14	29.08	1235.58	Within Screen
			12/12/14	29.30	1235.36	Within Screen
			1/16/15	29.48	1235.18	Within Screen
			2/26/15	29.31	1235.35	Within Screen
			3/16/15	29.42	1235.24	Within Screen
			4/15/15	29.55	1235.11	Within Screen
			5/21/15	29.62	1235.04	Within Screen
			5/23/15	29.20	1235.46	Within Screen
			7/16/15	28.85	1235.81	Within Screen
			8/20/15	28.21	1236.45	Within Screen
			9/23/15	28.64	1236.02	Within Screen
			10/5/15	28.58	1236.08	Within Screen
			11/10/15	28.79	1235.87	Within Screen
			12/18/15	26.47	1238.19	Within Screen
			1/7/16	26.11	1238.55	Within Screen
			2/23/16	25.00	1239.66	Within Screen
			3/22/16	24.34	1240.32	Within Screen
			4/26/16	23.24	1241.42	Within Screen
			5/18/16	22.32	1242.34	Above Screen
			6/27/16	22.80	1241.86	Within Screen
			7/25/16	24.45	1240.21	Within Screen
			8/1/16	26.35	1238.31	Within Screen
			9/22/16	26.91	1237.75	Within Screen
			10/5/16	27.17	1237.49	Within Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-11	1285.62	1258.0-1248.0	01/06/11	24.83	1260.79	Above Screen
			02/28/11	24.40	1261.22	Above Screen
			03/21/11	24.61	1261.01	Above Screen
			04/07/11	23.18	1262.44	Above Screen
			05/31/11	22.51	1263.11	Above Screen
			06/27/11	19.85	1265.77	Above Screen
			07/11	19.66	1265.96	Above Screen
			08/11	21.92	1263.70	Above Screen
			09/20/11	22.93	1262.69	Above Screen
			10/27/11	24.61	1261.01	Above Screen
			11/14/11	25.30	1260.32	Above Screen
			01/10/12	27.26	1258.36	Above Screen
			02/17/12	28.35	1257.27	Within Screen
			03/27/12	29.00	1256.62	Within Screen
			04/23/12	29.34	1256.28	Within Screen
			05/03/12	29.43	1256.19	Within Screen
			06/28/12	29.32	1256.30	Within Screen
			07/30/12	29.84	1255.78	Within Screen
			08/28/12	30.34	1255.28	Within Screen
			09/19/12	30.74	1254.88	Within Screen
			10/23/12	31.17	1254.45	Within Screen
			11/20/12	31.46	1254.16	Within Screen
			12/19/12	31.71	1253.91	Within Screen
			01/17/13	31.92	1253.70	Within Screen
			02/27/13	32.12	1253.50	Within Screen
			03/09/13	32.18	1253.44	Within Screen
			04/16/13	32.27	1253.35	Within Screen
			05/23/13	30.53	1255.09	Within Screen
			06/18/13	27.43	1258.19	Above Screen
			07/23/13	27.35	1258.27	Above Screen
			08/28/13	28.27	1257.35	Within Screen
			09/19/13	29.87	1255.75	Within Screen
			10/28/13	29.76	1255.86	Within Screen
			11/27/13	30.31	1255.31	Within Screen
			12/26/13	30.7	1254.92	Within Screen
			1/29/14	31.05	1254.57	Within Screen
			2/27/14	31.42	1254.20	Within Screen
			3/18/14	31.59	1254.03	Within Screen
			4/25/14	31.82	1253.80	Within Screen
			5/14/14	31.88	1253.74	Within Screen
			6/24/14	30.93	1254.69	Within Screen
			7/25/14	27.8	1257.82	Within Screen
			8/22/14	27.57	1258.05	Above Screen
			9/15/14	26.77	1258.85	Above Screen
			10/6/14	26.69	1258.93	Above Screen
			11/3/14	27.38	1258.24	Above Screen
			12/12/14	28.58	1257.04	Within Screen
			1/16/15	29.13	1256.49	Within Screen
			2/26/15	28.97	1256.65	Within Screen
			3/16/15	29.33	1256.29	Within Screen
			4/15/15	29.36	1256.26	Within Screen
			5/21/15	29.11	1256.51	Within Screen
			5/23/15	28.61	1257.01	Within Screen
			7/16/15	28.72	1256.90	Within Screen
			8/20/15	28.8	1256.82	Within Screen
			9/23/15	27.77	1257.85	Within Screen
			10/5/15	27.38	1258.24	Above Screen
			11/10/15	27.93	1257.69	Within Screen
			12/18/15	25.26	1260.36	Above Screen
			1/7/16	24.00	1261.62	Above Screen
			2/23/16	23.22	1262.40	Above Screen
			3/22/16	21.53	1264.09	Above Screen
			4/26/16	19.62	1266.00	Above Screen
			5/18/16	18.13	1267.49	Above Screen
			6/27/16	18.28	1267.34	Above Screen
			7/25/16	19.92	1265.70	Above Screen
			8/1/16	22.16	1263.46	Above Screen
			9/22/16	22.59	1263.03	Above Screen
			10/5/16	23.57	1262.05	Above Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-12	1333.20	1290.3-1280.3	01/06/11	44.04	1289.16	Within Screen
			02/28/11	44.27	1288.93	Within Screen
			03/21/11	44.22	1288.98	Within Screen
			04/07/11	44.37	1288.83	Within Screen
			05/31/11	44.29	1288.91	Within Screen
			06/27/11	44.32	1288.88	Within Screen
			07/11	44.31	1288.89	Within Screen
			08/11	43.33	1289.87	Within Screen
			09/20/11	43.51	1289.69	Within Screen
			10/27/11	43.91	1289.29	Within Screen
			11/14/11	44.06	1289.14	Within Screen
			01/10/12	44.49	1288.71	Within Screen
			02/17/12	44.72	1288.48	Within Screen
			03/27/12	44.90	1288.30	Within Screen
			04/23/12	45.05	1288.15	Within Screen
			05/03/12	45.05	1288.15	Within Screen
			06/28/12	45.22	1287.98	Within Screen
			07/30/12	45.23	1287.97	Within Screen
			08/28/12	45.33	1287.87	Within Screen
			09/19/12	45.38	1287.82	Within Screen
			10/23/12	45.46	1287.74	Within Screen
			11/20/12	45.52	1287.68	Within Screen
			12/19/12	45.61	1287.59	Within Screen
			01/17/13	45.60	1287.60	Within Screen
			02/27/13	45.79	1287.41	Within Screen
			03/09/13	45.65	1287.55	Within Screen
			04/16/13	45.73	1287.47	Within Screen
			05/23/13	45.51	1287.69	Within Screen
			06/18/13	45.18	1288.02	Within Screen
			07/23/13	44.98	1288.22	Within Screen
			08/28/13	44.93	1288.27	Within Screen
			09/19/13	44.98	1288.22	Within Screen
			10/28/13	45.05	1288.15	Within Screen
			11/27/13	45.17	1288.03	Within Screen
			12/26/13	45.21	1287.99	Within Screen
			1/29/14	45.31	1287.89	Within Screen
			2/27/14	45.45	1287.75	Within Screen
			3/18/14	45.52	1287.68	Within Screen
			4/25/14	45.05	1288.15	Within Screen
			5/14/14	45.58	1287.62	Within Screen
			6/24/14	45.55	1287.65	Within Screen
			7/25/14	45.22	1287.98	Within Screen
			8/22/14	45.18	1288.02	Within Screen
			9/15/14	45.00	1288.20	Within Screen
			10/6/14	45.01	1288.19	Within Screen
			11/3/15	44.97	1288.23	Within Screen
			12/12/14	45.06	1288.14	Within Screen
			1/16/15	45.19	1288.01	Within Screen
			2/26/15	45.23	1287.97	Within Screen
			3/16/15	45.20	1288.00	Within Screen
			4/15/15	45.22	1287.98	Within Screen
			5/21/15	45.22	1287.98	Within Screen
			5/23/15	45.20	1288.00	Within Screen
			7/16/15	45.20	1288.00	Within Screen
			8/20/15	45.25	1287.95	Within Screen
			9/23/15	45.00	1288.20	Within Screen
			10/5/15	45.00	1288.20	Within Screen
			11/10/15	45.00	1288.20	Within Screen
			12/18/15	44.81	1288.39	Within Screen
			1/7/16	44.69	1288.51	Within Screen
			2/23/16	44.31	1288.89	Within Screen
			3/22/16	43.85	1289.35	Within Screen
			4/26/16	43.61	1289.59	Within Screen
			5/18/16	43.13	1290.07	Within Screen
			6/27/16	42.24	1290.96	Above Screen
			7/25/16	43.10	1290.10	Within Screen
			8/1/16	42.82	1290.38	Above Screen
			9/22/16	43.07	1290.13	Within Screen
			10/5/16	43.12	1290.08	Within Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-13	1266.67	1244.8-1229.8	01/06/11	22.70	1243.97	Within Screen
			02/28/11	21.53	1245.14	Above Screen
			03/21/11	21.69	1244.98	Above Screen
			04/07/11	21.80	1244.87	Above Screen
			05/31/11	20.15	1246.52	Above Screen
			06/27/11	18.94	1247.73	Above Screen
			07/11	19.91	1246.76	Above Screen
			08/11	23.62	1243.05	Within Screen
			09/20/11	24.40	1242.27	Within Screen
			10/27/11	25.04	1241.63	Within Screen
			11/14/11	22.27	1244.40	Within Screen
			01/10/12	25.61	1241.06	Within Screen
			02/17/12	26.27	1240.40	Within Screen
			03/27/12	25.37	1241.30	Within Screen
			04/23/12	25.80	1240.87	Within Screen
			05/03/12	25.87	1240.80	Within Screen
			06/28/12	25.95	1240.72	Within Screen
			07/30/12	26.83	1239.84	Within Screen
			08/28/12	27.44	1239.23	Within Screen
			09/19/12	27.79	1238.88	Within Screen
			10/23/12	28.07	1238.60	Within Screen
			11/20/12	28.23	1238.44	Within Screen
			12/19/12	28.42	1238.25	Within Screen
			01/17/13	28.61	1238.06	Within Screen
			02/27/13	28.72	1237.95	Within Screen
			03/09/13	28.75	1237.92	Within Screen
			04/16/13	27.21	1239.46	Within Screen
			05/23/13	27.11	1239.56	Within Screen
			06/18/13	23.84	1242.83	Within Screen
			07/23/13	26.43	1240.24	Within Screen
			08/28/13	26.51	1240.16	Within Screen
			09/19/13	27.01	1239.66	Within Screen
			10/28/13	27.63	1239.04	Within Screen
			11/27/13	28.07	1238.60	Within Screen
			12/26/13	28.28	1238.39	Within Screen
			1/29/14	28.51	1238.16	Within Screen
			2/27/14	28.65	1238.02	Within Screen
			3/18/14	28.39	1238.28	Within Screen
			4/25/14	28.38	1238.29	Within Screen
			5/14/14	28.72	1237.95	Within Screen
			6/24/14	24.89	1241.78	Within Screen
			7/25/14	26.27	1240.40	Within Screen
			8/22/14	26.63	1240.04	Within Screen
			9/15/14	26.08	1240.59	Within Screen
			10/6/14	25.71	1240.96	Within Screen
			11/3/15	26.07	1240.60	Within Screen
			12/12/14	26.48	1240.19	Within Screen
			1/16/15	26.46	1240.21	Within Screen
			2/26/15	26.00	1240.67	Within Screen
			3/16/15	26.31	1240.36	Within Screen
			4/15/15	25.92	1240.75	Within Screen
			5/21/15	25.9	1240.77	Within Screen
			5/23/15	24.67	1242.00	Within Screen
			7/16/15	23.86	1242.81	Within Screen
			8/20/15	23.3	1243.37	Within Screen
			9/23/15	25.58	1241.09	Within Screen
			10/5/15	25.26	1241.41	Within Screen
			11/10/15	25	1241.67	Within Screen
			12/18/15	18.93	1247.74	Above Screen
			1/7/16	20.91	1245.76	Above Screen
			2/23/16	17.49	1249.18	Above Screen
			3/22/16	16.31	1250.36	Above Screen
			4/26/16	15.68	1250.99	Above Screen
			5/18/16	17.52	1249.15	Above Screen
			6/27/16	19.55	1247.12	Above Screen
			7/25/16	22.13	1244.54	Within Screen
			8/1/16	23.86	1242.81	Within Screen
			9/22/16	23.71	1242.96	Within Screen
			10/5/16	24.43	1242.24	Within Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-14	1302.41	1267.4-1252.4	01/06/11	35.22	1267.19	Within Screen
			02/28/11	35.59	1266.82	Within Screen
			03/21/11	35.42	1266.99	Within Screen
			04/07/11	35.70	1266.71	Within Screen
			05/31/11	34.38	1268.03	Above Screen
			06/27/11	30.11	1272.30	Above Screen
			07/11	28.22	1274.19	Above Screen
			08/11	30.85	1271.56	Above Screen
			09/20/11	31.91	1270.50	Above Screen
			10/27/11	33.93	1268.48	Above Screen
			11/14/11	34.72	1267.69	Above Screen
			01/10/12	36.85	1265.56	Within Screen
			02/17/12	38.14	1264.27	Within Screen
			03/27/12	38.77	1263.64	Within Screen
			04/23/12	40.06	1262.35	Within Screen
			05/03/12	40.74	1261.67	Within Screen
			06/28/12	42.00	1260.41	Within Screen
			07/30/12	42.48	1259.93	Within Screen
			08/28/12	43.00	1259.41	Within Screen
			09/19/12	43.55	1258.86	Within Screen
			10/23/12	44.45	1257.96	Within Screen
			11/20/12	45.21	1257.20	Within Screen
			12/19/12	45.63	1256.78	Within Screen
			01/17/13	46.14	1256.27	Within Screen
			02/27/13	46.46	1255.95	Within Screen
			03/09/13	46.63	1255.78	Within Screen
			04/16/13	46.98	1255.43	Within Screen
			05/23/13	46.68	1255.73	Within Screen
			06/18/13	43.66	1258.75	Within Screen
			07/23/13	41.23	1261.18	Within Screen
			08/28/13	41.49	1260.92	Within Screen
			09/19/13	41.79	1260.62	Within Screen
			10/28/13	42.90	1259.51	Within Screen
			11/27/13	43.82	1258.59	Within Screen
			12/26/13	44.34	1258.07	Within Screen
			1/29/14	44.74	1257.67	Within Screen
			2/27/14	45.40	1257.01	Within Screen
			3/18/14	45.62	1256.79	Within Screen
			4/25/14	46.34	1256.07	Within Screen
			5/14/14	46.7	1255.71	Within Screen
			6/24/14	46.78	1255.63	Within Screen
			7/25/14	43.35	1259.06	Within Screen
			8/22/14	42.02	1260.39	Within Screen
			9/15/14	41.11	1261.30	Within Screen
			10/6/14	40.55	1261.86	Within Screen
			11/3/14	40.67	1261.74	Within Screen
			12/12/14	41.43	1260.98	Within Screen
			1/16/15	41.76	1260.65	Within Screen
			2/26/15	41.87	1260.54	Within Screen
			3/16/15	42.32	1260.09	Within Screen
			4/15/15	42.70	1259.71	Within Screen
			5/21/15	42.75	1259.66	Within Screen
			5/23/15	42.36	1260.05	Within Screen
			7/16/15	42.10	1260.31	Within Screen
			8/20/15	41.50	1260.91	Within Screen
			9/23/15	39.94	1262.47	Within Screen
			10/5/15	39.39	1263.02	Within Screen
			11/10/15	39.58	1262.83	Within Screen
			12/18/15	37.60	1264.81	Within Screen
			1/7/16	34.51	1267.90	Above Screen
			2/23/16	33.07	1269.34	Above Screen
			3/22/16	30.12	1272.29	Above Screen
			4/26/16	28.93	1273.48	Above Screen
			5/18/16	26.73	1275.68	Above Screen
			6/27/16	26.22	1276.19	Above Screen
			7/25/16	27.56	1274.85	Above Screen
			8/1/16	30.00	1272.41	Above Screen
			9/22/16	31.16	1271.25	Above Screen
			10/5/16	31.80	1270.61	Above Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-15	1322.16	1294.4-1279.4	01/06/11	33.70	1288.46	Within Screen
			02/28/11	33.40	1288.76	Within Screen
			03/21/11	33.40	1288.76	Within Screen
			04/07/11	33.40	1288.76	Within Screen
			05/31/11	33.25	1288.91	Within Screen
			06/27/11	32.93	1289.23	Within Screen
			07/11	32.31	1289.85	Within Screen
			08/11	32.53	1289.63	Within Screen
			09/20/11	32.82	1289.34	Within Screen
			10/27/11	33.11	1289.05	Within Screen
			11/14/11	33.25	1288.91	Within Screen
			01/10/12	33.58	1288.58	Within Screen
			02/17/12	33.81	1288.35	Within Screen
			03/27/12	33.98	1288.18	Within Screen
			04/23/12	34.00	1288.16	Within Screen
			05/03/12	34.05	1288.11	Within Screen
			06/28/12	34.12	1288.04	Within Screen
			07/30/12	34.15	1288.01	Within Screen
			08/28/12	34.18	1287.98	Within Screen
			09/19/12	34.28	1287.88	Within Screen
			10/23/12	34.29	1287.87	Within Screen
			11/20/12	34.25	1287.91	Within Screen
			12/19/12	34.39	1287.77	Within Screen
			01/17/13	34.42	1287.74	Within Screen
			02/27/13	34.49	1287.67	Within Screen
			03/09/13	34.52	1287.64	Within Screen
			04/16/13	34.54	1287.62	Within Screen
			05/23/13	33.88	1288.28	Within Screen
			06/18/13	33.45	1288.71	Within Screen
			07/23/13	33.68	1288.48	Within Screen
			08/28/13	33.77	1288.39	Within Screen
			09/19/13	33.02	1289.14	Within Screen
			10/28/13	33.88	1288.28	Within Screen
			11/27/13	34.06	1288.10	Within Screen
			12/26/13	34.11	1288.05	Within Screen
			1/29/14	34.21	1287.95	Within Screen
			2/27/14	34.33	1287.83	Within Screen
			3/18/14	34.38	1287.78	Within Screen
			4/25/14	34.29	1287.87	Within Screen
			5/14/14	34.35	1287.81	Within Screen
			6/24/14	34.22	1287.94	Within Screen
			7/25/14	33.68	1288.48	Within Screen
			8/22/14	33.56	1288.60	Within Screen
			9/15/14	33.93	1288.23	Within Screen
			10/6/14	33.67	1288.49	Within Screen
			11/3/14	33.76	1288.40	Within Screen
			12/12/14	33.85	1288.31	Within Screen
			1/16/15	34.05	1288.11	Within Screen
			2/26/15	31.75	1290.41	Within Screen
			3/16/15	33.63	1288.53	Within Screen
			4/15/15	33.07	1289.09	Within Screen
			5/21/15	33.76	1288.40	Within Screen
			5/23/15	33.67	1288.49	Within Screen
			7/16/15	33.51	1288.65	Within Screen
			8/20/15	33.43	1288.73	Within Screen
			9/23/15	33.57	1288.59	Within Screen
			10/5/15	33.49	1288.67	Within Screen
			11/10/15	33.77	1288.39	Within Screen
			12/18/15	33.55	1288.61	Within Screen
			1/7/16	33.49	1288.67	Within Screen
			2/23/16	33.2	1288.96	Within Screen
			3/22/16	32.14	1290.02	Within Screen
			4/26/16	30.95	1291.21	Within Screen
			5/18/16	31.22	1290.94	Within Screen
			6/27/16	31.12	1291.04	Within Screen
			7/25/16	30.86	1291.30	Within Screen
			8/1/16	31.39	1290.77	Within Screen
			9/22/16	30.95	1291.21	Within Screen
			10/5/16	32.22	1289.94	Within Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-16	1330.02	1309.0-1294.0	01/06/11	27.89	1302.13	Within Screen
			02/28/11	25.57	1304.45	Within Screen
			03/21/11	27.23	1302.79	Within Screen
			04/07/11	28.25	1301.77	Within Screen
			05/31/11	24.70	1305.32	Within Screen
			06/27/11	20.84	1309.18	Above Screen
			07/11	20.54	1309.48	Above Screen
			08/11	24.91	1305.11	Within Screen
			09/20/11	25.93	1304.09	Within Screen
			10/27/11	28.09	1301.93	Within Screen
			11/14/11	28.77	1301.25	Within Screen
			01/10/12	30.40	1299.62	Within Screen
			02/17/12	31.31	1298.71	Within Screen
			03/27/12	30.77	1299.25	Within Screen
			04/23/12	31.45	1298.57	Within Screen
			05/03/12	31.43	1298.59	Within Screen
			06/28/12	31.15	1298.87	Within Screen
			07/30/12	31.74	1298.28	Within Screen
			08/28/12	32.06	1297.96	Within Screen
			09/19/12	32.30	1297.72	Within Screen
			10/23/12	32.64	1297.38	Within Screen
			11/20/12	32.95	1297.07	Within Screen
			12/19/12	33.12	1296.90	Within Screen
			01/17/13	33.34	1296.68	Within Screen
			02/27/13	33.52	1296.50	Within Screen
			03/09/13	33.50	1296.52	Within Screen
			04/16/13	32.12	1297.90	Within Screen
			05/23/13	29.83	1300.19	Within Screen
			06/18/13	26.85	1303.17	Within Screen
			07/23/13	28.75	1301.27	Within Screen
			08/28/13	29.15	1300.87	Within Screen
			09/19/13	29.73	1300.29	Within Screen
			10/28/13	30.47	1299.55	Within Screen
			11/27/13	31.53	1298.49	Within Screen
			12/26/13	32.17	1297.85	Within Screen
			1/29/14	32.65	1297.37	Within Screen
			2/27/14	33.1	1296.92	Within Screen
			3/18/14	33.22	1296.80	Within Screen
			4/25/14	33.41	1296.61	Within Screen
			5/14/14	33.57	1296.45	Within Screen
			6/24/14	30.82	1299.20	Within Screen
			7/25/14	28	1302.02	Within Screen
			8/22/14	28.33	1301.69	Within Screen
			9/15/14	27.97	1302.05	Within Screen
			10/6/14	28.05	1301.97	Within Screen
			11/3/14	28.93	1301.09	Within Screen
			12/12/14	30.22	1299.80	Within Screen
			1/16/15	30.67	1299.35	Within Screen
			2/26/15	30.15	1299.87	Within Screen
			3/16/15	30.22	1299.80	Within Screen
			4/15/15	30.63	1299.39	Within Screen
			5/21/15	30.83	1299.19	Within Screen
			5/23/15	29.7	1300.32	Within Screen
			7/16/15	27.95	1302.07	Within Screen
			8/20/15	26	1304.02	Within Screen
			9/23/15	27.43	1302.59	Within Screen
			10/5/2015	27.5	1302.52	Within Screen
			11/10/15	28.78	1301.24	Within Screen
			12/18/15	24.22	1305.80	Within Screen
			1/7/16	23.33	1306.69	Within Screen
			2/23/16	22.84	1307.18	Within Screen
			3/22/16	21.78	1308.24	Within Screen
			4/26/16	21	1309.02	Above Screen
			5/18/16	18	1312.02	Above Screen
			6/27/16	18.1	1311.92	Above Screen
			7/25/16	20.68	1309.34	Above Screen
			8/1/16	23.55	1306.47	Within Screen
			9/22/16	23.96	1306.06	Within Screen
			10/5/16	24.81	1305.21	Within Screen

TABLE 4B
Plymouth County Landfill
Terracon Project No. 08167143
Groundwater Elevation Measurements

Well ID	TOC Elevation	Screened Interval Elevation	Date	Depth to Water Measurement	Groundwater Elevation	Water Table Evaluation
MW-17	1319.12	1301.1-1286.1	01/06/11	17.79	1301.33	Above Screen
			02/28/11	15.88	1303.24	Above Screen
			03/21/11	16.14	1302.98	Above Screen
			04/07/11	17.23	1301.89	Above Screen
			05/31/11	14.13	1304.99	Above Screen
			06/27/11	11.87	1307.25	Above Screen
			07/11	14.21	1304.91	Above Screen
			08/11	16.93	1302.19	Above Screen
			09/20/11	17.81	1301.31	Above Screen
			10/27/11	18.86	1300.26	Within Screen
			11/14/11	19.23	1299.89	Within Screen
			01/10/12	20.25	1298.87	Within Screen
			02/17/12	20.79	1298.33	Within Screen
			03/27/12	20.46	1298.66	Within Screen
			04/23/12	20.08	1299.04	Within Screen
			05/03/12	20.87	1298.25	Within Screen
			06/28/12	20.57	1298.55	Within Screen
			07/30/12	20.97	1298.15	Within Screen
			08/28/12	21.40	1297.72	Within Screen
			09/19/12	21.77	1297.35	Within Screen
			10/23/12	22.19	1296.93	Within Screen
			11/20/12	22.56	1296.56	Within Screen
			12/19/12	22.92	1296.20	Within Screen
			01/17/13	23.25	1295.87	Within Screen
			02/27/13	23.62	1295.50	Within Screen
			03/09/13	23.69	1295.43	Within Screen
			04/16/13	23.48	1295.64	Within Screen
			05/23/13	20.17	1298.95	Within Screen
			06/18/13	15.48	1303.64	Above Screen
			07/23/13	17.71	1301.41	Above Screen
			08/28/13	18.88	1300.24	Within Screen
			09/19/13	19.42	1299.70	Within Screen
			10/28/13	20.11	1299.01	Within Screen
			11/27/13	20.86	1298.26	Within Screen
			12/26/13	21.4	1297.72	Within Screen
			1/29/14	21.85	1297.27	Within Screen
			2/27/14	22.35	1296.77	Within Screen
			3/18/14	22.75	1296.37	Within Screen
			4/25/14	23.05	1296.07	Within Screen
			5/14/14	23.23	1295.89	Within Screen
			6/24/14	20.73	1298.39	Within Screen
			7/25/14	17.34	1301.78	Above Screen
			8/22/14	18.3	1300.82	Within Screen
			9/15/14	18.2	1300.92	Within Screen
			10/6/14	18.15	1300.97	Within Screen
			11/3/14	18.42	1300.70	Within Screen
			12/12/14	19.3	1299.82	Within Screen
			1/16/15	19.77	1299.35	Within Screen
			2/26/15	19.05	1300.07	Within Screen
			3/16/15	18.59	1300.53	Within Screen
			4/15/15	19.01	1300.11	Within Screen
			5/21/15	19.42	1299.70	Within Screen
			5/23/15	19.36	1299.76	Within Screen
			7/16/15	19.2	1299.92	Within Screen
			8/20/15	19.12	1300.00	Within Screen
			9/23/15	17.27	1301.85	Above Screen
			10/5/15	17.61	1301.51	Above Screen
			11/10/15	18.30	1300.82	Within Screen
			12/18/15	15.1	1304.02	Above Screen
			1/7/16	15.6	1303.52	Above Screen
			2/23/16	14.2	1304.92	Above Screen
			3/22/16	13.95	1305.17	Above Screen
			4/26/16	13.34	1305.78	Above Screen
			5/18/16	12.24	1306.88	Above Screen
			6/27/16	12.95	1306.17	Above Screen
			7/25/16	15.05	1304.07	Above Screen
			8/1/16	16.56	1302.56	Above Screen
			9/22/16	16.24	1302.88	Above Screen
			10/5/16	16.62	1302.50	Above Screen

Notes

(1) Measurements are reported in feet.

(2) TOC = Top of Casing

(3) NC = Not Calculated

Table 4C – Flow Rate Evaluation

Table 4C
Flow Rate Assessment
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

Monitoring Well	Flow Rate August 2021 (L/min)	Flow Rate May 2023 (L/min)	Flow Rate October 2023 (L/min)
MW-17	7.50	5.68	7.57
MW-8	2.80	3.10	7.57
MW-9	NT	dry	dry
MW-10	3.10	1.72	1.89
MW-11	6.30	2.09	11.36
MW-12	0.40	3.03	6.06
MW-13	3.30	1.79	6.81
MW-14	1.80	0.95	3.79
MW-16	4.50	2.84	3.79
MW-7	4.30	6.31	7.57

NT = not tested

TABLE 2
Plymouth County Landfill
Terracon Project No. 05147045

Summary of Hydraulic Conductivities

DATE	MONITORING WELLS											
	MW-7	MW-8	MW-9	MW-10	MW-11	MW-12	MW-13	MW-14	MW-15	MW-16	MW-17	MW-18
March 1991	2.00E-04	9.70E-06	1.40E-04	8.90E-06	6.10E-04	5.30E-05						
May 1998	1.78E-04	3.33E-05	3.81E-05	4.50E-03	3.89E-04	3.30E-05	1.43E-04	1.31E-04	5.31E-05	9.23E-06	1.29E-05	
November 2003	1.34E-04	1.09E-05			3.31E-04	1.83E-04	2.96E-04	1.94E-04	5.26E-05	2.88E-05	9.63E-06	
October 2008	3.47E-04	1.78E-04		5.97E-02	5.44E-04	7.80E-04	2.65E-04	1.53E-04	1.64E-04	2.19E-04	2.71E-05	NT
October 2013	2.21E-04	2.13E-05			4.55E-04	5.59E-04	8.73E-04	7.09E-05	8.54E-05	1.04E-04	6.68E-06	NT

Notes

(1) Hydraulic conductivity values given in units of centimeters per second (cm/sec).

(2) Blank cells indicate no testing was performed.

(3) Wells MW-13, MW-14, MW-15, MW-16 and MW-17 did not exist at the time of hydraulic conductivity testing in 1991.

(4) Wells MW-9 and MW-10 had insufficient water for hydraulic conductivity testing in 2003 and 2013.

(5) Well MW-9 had insufficient water for hydraulic conductivity testing in 2008.

(6) Well MW-18 did not exist at the time of hydraulic conductivity testing in 1991, 1998, and 2003 and was not tested in 2008.

NT: Not Tested

Table 5 – Background and GWPS Summary

Table 5
Background and GWPS Summary
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

Interwell Background Wells (MW-17)

Inorganics - Appendix I										
Constituent	**Units**	**Model Type**	**Samples - N**	**Detections**	**Mean**	**SD**	**Prediction Limit**	**Confidence**	**GWPS**	**Source**
Ammonia as N	mg/L	nonparametric	57	0			0.2000	0.99	30	SS
COD	mg/L	nonparametric	57	13			21.2000	0.99	--	SS
Chloride	mg/L	nonparametric	57	4			7.3000	0.99	--	SS
Iron, dissolved	µg/l	nonparametric	57	0			100.0000	0.99	--	SS
pH	SU	nonparametric	55	55			5.10-7.89	0.99	5-9	SS
Phenols	mg/L	nonparametric	26	0			0.0200	0.98	--	SS
Specific Conductance	umhos/cm	normal	54	54	697.074	203.227	1189.0570	0.99	--	SS
TOX	µg/l	nonparametric	26	1			11.4000	0.98	--	SS
VOC - Appendix I										
Constituent	**Units**	**Model Type**	**Samples - N**	**Detections**	**Mean**	**SD**	**Prediction Limit**	**Confidence**	**GWPS**	**Source**
All	µg/l	DQR	57	0	<1	<1	<1	<1	various	SS

= Prediction limit exceeds the GWPS. A Site-Specific GWPS is warranted

Table 6 – Summary of Current Year Exceedances

Table 6
Summary of Well/Detected Constituent Pairs that Exceed the Background Standard
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

Well	System	Constituent	Date	Units	Result	Background Standard	GWPS
MW-7	Water Table	1,2-dichloroethane	5/8/2024	ug/L	1.85	1	**5**
MW-7	Water Table	1,2-dichloropropane	5/8/2024	ug/L	12.5	1.0	**5**
MW-7	Water Table	1,2-dichloropropane	10/29/2024	ug/L	5.7	1.0	**5**
MW-7	Water Table	benzene	5/8/2024	ug/L	0.879	0.5	**5**
MW-7	Water Table	benzene	10/29/2024	ug/L	0.759	0.5	**5**
MW-7	Water Table	cis-1,2-dichloroethene	5/8/2024	ug/L	216.0	1.0	**70**
MW-7	Water Table	cis-1,2-dichloroethene	10/29/2024	ug/L	131.0	1.0	**70**
MW-7	Water Table	PCE	5/8/2024	ug/L	1.61	1.0	**5**
MW-7	Water Table	TCE	5/8/2024	ug/L	15.0	1.0	**5**
MW-7	Water Table	TCE	10/29/2024	ug/L	7.81	1.0	**5**
MW-7	Water Table	vinyl chloride	5/8/2024	ug/L	5.77	1.0	**2**
MW-7	Water Table	vinyl chloride	10/29/2024	ug/L	9.39	1.0	**2**
MW-8	Water Table	cis-1,2-dichloroethene	5/8/2024	ug/L	57.1	1.0	**70**
MW-8	Water Table	cis-1,2-dichloroethene	10/29/2024	ug/L	14.8	1.0	**70**
MW-8	Water Table	vinyl chloride	5/8/2024	ug/L	1.51	1.0	**2**
MW-8	Water Table	chloride	5/8/2024	mg/L	12.3	7.3	--
MW-8	Water Table	chloride	10/29/2024	mg/L	16.5	7.3	--
MW-8	Water Table	Spec. Cond.	5/8/2024	umhos/cm	1290	1189.057	--
MW-8	Water Table	Spec. Cond.	10/29/2024	umhos/cm	1248	1189.057	--
MW-8	Water Table	TOX	5/8/2024	ug/L	157.0	11.4	--
MW-9	Water Table	COD	10/29/2024	ug/L	70.1	21.2	**70**
MW-9	Water Table	chloride	5/8/2024	ug/L	11.6	7.3	**2**
MW-9	Water Table	chloride	10/29/2024	mg/L	31.7	7.3	--
MW-9	Water Table	Spec. Cond.	5/8/2024	mg/L	1287.0	1189.057	--
MW-9	Water Table	TOX	5/8/2024	ug/L	75.6	11.4	--
MW-10	Water Table	COD	10/29/2024	mg/L	29.1	21.2	--
MW-10	Water Table	chloride	5/8/2024	mg/L	153	7.3	--
MW-10	Water Table	chloride	10/29/2024	mg/L	149	7.3	--
MW-10	Water Table	Spec. Cond.	5/8/2024	umhos/cm	1663	1189.057	--
MW-10	Water Table	Spec. Cond.	10/29/2024	umhos/cm	1602	1189.057	--
MW-10	Water Table	TOX	5/8/2024	ug/L	185	11.4	--
MW-11	Water Table	chloride	5/8/2024	mg/L	101	7.3	--
MW-11	Water Table	chloride	10/29/2024	mg/L	128	7.3	--
MW-11	Water Table	Spec. Cond.	5/8/2024	umhos/cm	1274	1189.057	--
MW-11	Water Table	Spec. Cond.	10/29/2024	umhos/cm	1345	1189.057	--
MW-12	Water Table	benzene	5/8/2024	ug/L	1.19	0.5	**5**
MW-12	Water Table	benzene	10/29/2024	ug/L	0.804	0.5	**5**
MW-12	Water Table	cis-1,2-dichloroethene	5/8/2024	ug/L	18.30	1.0	**70**
MW-12	Water Table	cis-1,2-dichloroethene	10/29/2024	ug/L	1.23	1.0	**70**
MW-12	Water Table	vinyl chloride	5/8/2024	ug/L	4.30	1.0	**2**
MW-12	Water Table	vinyl chloride	10/29/2024	ug/L	5.48	1.0	**2**
MW-12	Water Table	chloride	5/8/2024	mg/L	40.7	7.3	--
MW-12	Water Table	chloride	10/29/2024	mg/L	68.7	7.3	--
MW-12	Water Table	iron	5/8/2024	ug/L	6970	100.0	--
MW-12	Water Table	iron	10/29/2024	ug/L	13800	100.0	--
MW-12	Water Table	Spec. Cond.	5/8/2024	umhos/cm	1400	1189.057	--
MW-12	Water Table	Spec. Cond.	10/29/2024	umhos/cm	1348	1189.057	--
MW-12	Water Table	TOX	5/8/2024	ug/L	146	11.4	--
MW-13	Water Table	COD	5/8/2024	mg/L	23.7	21.2	--
MW-13	Water Table	COD	10/29/2024	mg/L	42.6	21.2	--
MW-13	Water Table	chloride	5/8/2024	mg/L	60.5	7.3	--
MW-13	Water Table	chloride	10/29/2024	mg/L	38.4	7.3	--
MW-13	Water Table	iron	5/8/2024	ug/L	6370.0	100.0	--
MW-13	Water Table	iron	10/29/2024	ug/L	<500	100.0	--
MW-13	Water Table	Spec. Cond.	5/8/2024	umhos/cm	1550.0	1189.057	--
MW-13	Water Table	Spec. Cond.	10/29/2024	umhos/cm	1604.0	1189.057	--
MW-13	Water Table	TOX	5/8/2024	ug/L	<40	11.4	--
MW-14	Water Table	benzene	5/8/2024	ug/L	0.678	0.5	**5**
MW-14	Water Table	benzene	10/29/2024	ug/L	0.531	0.5	**5**
MW-14	Water Table	cis-1,2-dichloroethene	5/8/2024	ug/L	49.3	1.0	**70**
MW-14	Water Table	cis-1,2-dichloroethene	10/29/2024	ug/L	39.0	1.0	**70**
MW-14	Water Table	COD	5/8/2024	mg/L	22.6	21.2	--
MW-14	Water Table	COD	10/29/2024	mg/L	28.4	21.2	--
MW-14	Water Table	chloride	5/8/2024	mg/L	129	7.3	--
MW-14	Water Table	chloride	10/29/2024	mg/L	130	7.3	--
MW-14	Water Table	Spec. Cond.	5/8/2024	umhos/cm	1662	1189.057	--
MW-14	Water Table	Spec. Cond.	10/29/2024	umhos/cm	1606	1189.057	--
MW-14	Water Table	TOX	5/8/2024	ug/L	299	11.4	--
MW-16	Water Table	COD	10/29/2024	mg/L	24.6	21.2	--
MW-16	Water Table	chloride	10/29/2024	mg/L	7.40	7.3	--
MW-16	Water Table	Spec. Cond.	5/8/2024	umhos/cm	1335	1189.057	--
MW-16	Water Table	Spec. Cond.	10/29/2024	umhos/cm	1302	1189.057	--

= exceeds background standard

= exceeds GWPS

Table 7 – Summary of Ongoing and Newly Identified SSI & SSL

Table 7
Summary of Ongoing & Newly Identified SSI
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-7	1,2-dichloroethane	4/11/2018	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	10/30/2018	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	4/1/2019	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	10/8/2019	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	4/20/2020	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	10/20/2020	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	4/26/2021	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	8/16/2021	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	6/1/2022	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	10/3/2022	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	5/3/2023	<1.0	1.0	0.500	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	10/11/2023	1.29	1.0	0.233	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	5/8/2024	1.85	1.0	0.260	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloroethane	10/29/2024	<1.0	1.0	0.260	5	10/11/2023	NA	4/20/2020
MW-7	1,2-dichloropropane	4/11/2018	**9.81**	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	10/30/2018	**8.62**	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	4/1/2019	**5.10**	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	10/8/2019	**7.25**	1.0	5.944	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	4/20/2020	**10.00**	1.0	5.933	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	10/20/2020	**9.41**	1.0	6.007	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	4/26/2021	**7.34**	1.0	7.277	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	8/16/2021	**13.50**	1.0	7.846	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	6/1/2022	**10.60**	1.0	7.985	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	10/3/2022	**11.80**	1.0	8.557	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	5/3/2023	**12.50**	1.0	10.666	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	10/11/2023	**12.90**	1.0	10.764	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	5/8/2024	**12.50**	1.0	11.887	5	4/11/2018	NA	4/20/2020
MW-7	1,2-dichloropropane	10/29/2024	**5.70**	1.0	6.816	5	4/11/2018	NA	4/20/2020

Table 7
Summary of Ongoing & Newly Identified SSI
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-7	benzene	4/11/2018	0.958	0.5	---	5	4/11/2018	NA	4/20/2020
MW-7	benzene	10/30/2018	0.896	0.5	---	5	4/11/2018	NA	4/20/2020
MW-7	benzene	4/1/2019	0.580	0.5	---	5	4/11/2018	NA	4/20/2020
MW-7	benzene	10/8/2019	0.655	0.5	0.614	5	4/11/2018	NA	4/20/2020
MW-7	benzene	4/20/2020	0.813	0.5	0.611	5	4/11/2018	NA	4/20/2020
MW-7	benzene	10/20/2020	0.949	0.5	0.607	5	4/11/2018	NA	4/20/2020
MW-7	benzene	4/26/2021	<0.500	0.5	0.405	5	4/11/2018	NA	4/20/2020
MW-7	benzene	8/16/2021	0.783	0.5	0.432	5	4/11/2018	NA	4/20/2020
MW-7	benzene	6/1/2022	<0.500	0.5	0.244	5	4/11/2018	NA	4/20/2020
MW-7	benzene	10/3/2022	<0.500	0.5	0.152	5	4/11/2018	NA	4/20/2020
MW-7	benzene	5/3/2023	0.716	0.5	0.159	5	4/11/2018	NA	4/20/2020
MW-7	benzene	10/11/2023	0.878	0.5	0.144	5	4/11/2018	NA	4/20/2020
MW-7	benzene	5/8/2024	0.879	0.5	0.331	5	4/11/2018	NA	4/20/2020
MW-7	benzene	10/29/2024	0.759	0.5	0.710	5	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	4/11/2018	**152.00**	1.0	---	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	10/30/2018	**113.00**	1.0	---	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	4/1/2019	66.30	1.0	---	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	10/8/2019	**117.00**	1.0	81.602	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	4/20/2020	**193.00**	1.0	76.913	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	10/20/2020	**198.00**	1.0	88.615	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	4/26/2021	**112.00**	1.0	114.423	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	8/16/2021	**240.00**	1.0	139.423	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	6/1/2022	**147.00**	1.0	125.504	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	10/3/2022	**168.00**	1.0	119.967	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	5/3/2023	**174.00**	1.0	134.960	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	10/11/2023	**203.00**	1.0	145.818	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	5/8/2024	**216.00**	1.0	163.215	70	4/11/2018	NA	4/20/2020
MW-7	cis-1,2-dichloroethylene	10/29/2024	**131.00**	1.0	136.684	70	4/11/2018	NA	4/20/2020

Table 7
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Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-7	PCE	4/11/2018	3.15	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	PCE	10/30/2018	2.12	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	PCE	4/1/2019	2.85	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	PCE	10/8/2019	1.23	1.0	1.596	5	4/11/2018	NA	4/20/2020
MW-7	PCE	4/20/2020	1.90	1.0	1.447	5	4/11/2018	NA	4/20/2020
MW-7	PCE	10/20/2020	<1.0	1.0	0.754	5	4/11/2018	NA	4/20/2020
MW-7	PCE	4/26/2021	1.66	1.0	0.790	5	4/11/2018	NA	4/20/2020
MW-7	PCE	8/16/2021	**5.30**	1.0	0.551	5	4/11/2018	NA	4/20/2020
MW-7	PCE	6/1/2022	2.89	1.0	0.808	5	4/11/2018	NA	4/20/2020
MW-7	PCE	10/3/2022	2.69	1.0	1.801	5	4/11/2018	NA	4/20/2020
MW-7	PCE	5/3/2023	2.67	1.0	1.883	5	4/11/2018	NA	4/20/2020
MW-7	PCE	10/11/2023	1.75	1.0	1.900	5	4/11/2018	NA	4/20/2020
MW-7	PCE	5/8/2024	1.61	1.0	1.497	5	4/11/2018	NA	4/20/2020
MW-7	PCE	10/29/2024	<1.0	1.0	0.586	5	4/11/2018	NA	4/20/2020
MW-7	TCE	4/11/2018	**11.10**	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	TCE	10/30/2018	**10.30**	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	TCE	4/1/2019	**5.36**	1.0	---	5	4/11/2018	NA	4/20/2020
MW-7	TCE	10/8/2019	**6.71**	1.0	5.970	5	4/11/2018	NA	4/20/2020
MW-7	TCE	4/20/2020	**20.40**	1.0	4.804	5	4/11/2018	NA	4/20/2020
MW-7	TCE	10/20/2020	**17.30**	1.0	5.924	5	4/11/2018	NA	4/20/2020
MW-7	TCE	4/26/2021	**10.00**	1.0	8.117	5	4/11/2018	NA	4/20/2020
MW-7	TCE	8/16/2021	**12.30**	1.0	10.915	5	4/11/2018	NA	4/20/2020
MW-7	TCE	6/1/2022	**7.03**	1.0	7.902	5	4/11/2018	NA	4/20/2020
MW-7	TCE	10/3/2022	**6.27**	1.0	6.493	5	4/11/2018	NA	4/20/2020
MW-7	TCE	5/3/2023	**7.50**	1.0	5.063	5	4/11/2018	NA	4/20/2020
MW-7	TCE	10/11/2023	**9.37**	1.0	5.990	5	4/11/2018	NA	4/20/2020
MW-7	TCE	5/8/2024	**15.00**	1.0	4.995	5	4/11/2018	NA	4/20/2020
MW-7	TCE	10/29/2024	**7.81**	1.0	5.822	5	4/11/2018	NA	4/20/2020

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KEY:	SSI	SSL LCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-7	Vinyl Chloride	4/11/2018	**1.87**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	10/30/2018	**1.98**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	4/1/2019	<1.0	1.0	---	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	10/8/2019	1.45	1.0	0.867	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	4/20/2020	**3.15**	1.0	0.813	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	10/20/2020	**3.48**	1.0	0.922	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	4/26/2021	1.02	1.0	1.217	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	8/16/2021	**2.84**	1.0	1.670	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	6/1/2022	1.47	1.0	1.206	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	10/3/2022	1.38	1.0	0.986	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	5/3/2023	**3.11**	1.0	1.139	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	10/11/2023	**4.28**	1.0	0.919	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	5/8/2024	**5.77**	1.0	1.452	2	4/11/2018	NA	4/20/2020
MW-7	Vinyl Chloride	10/29/2024	**9.39**	1.0	2.428	2	4/11/2018	NA	4/20/2020

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwater.*

Table 7
Summary of Ongoing & Newly Identified SSI
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Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-8	1,2-dichloropropane	4/11/2018	1.43	1.0	---	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	10/30/2018	1.27	1.0	---	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	4/1/2019	1.21	1.0	---	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	10/8/2019	1.57	1.0	1.229	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	5/28/2020	1.43	1.0	1.229	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	10/20/2020	1.29	1.0	1.238	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	4/26/2021	1.26	1.0	1.264	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	8/16/2021	1.52	1.0	1.270	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	6/1/2022	1.21	1.0	1.201	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	10/3/2022	1.01	1.0	1.068	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	5/3/2023	1.16	1.0	0.973	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	10/11/2023	<1.0	1.0	0.588	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	5/8/2024	<1.0	1.0	0.389	5	4/11/2018	NA	5/28/2020
MW-8	1,2-dichloropropane	10/29/2024	<1.0	1.0	0.277	5	4/11/2018	NA	5/28/2020
MW-8	benzene	4/11/2018	<0.5	0.5	---	5	4/1/2019	NA	4/20/2020
MW-8	benzene	10/30/2018	<0.5	0.5	---	5	4/1/2019	NA	4/20/2020
MW-8	benzene	4/1/2019	0.632	0.5	---	5	4/1/2019	NA	4/20/2020
MW-8	benzene	10/8/2019	0.858	0.5	0.237	5	4/1/2019	NA	4/20/2020
MW-8	benzene	4/20/2020	<0.5	0.5	0.237	5	4/1/2019	NA	4/20/2020
MW-8	benzene	10/20/2020	<0.5	0.5	0.237	5	4/1/2019	NA	4/20/2020
MW-8	benzene	4/26/2021	<0.5	0.5	0.139	5	4/1/2019	NA	4/20/2020
MW-8	benzene	8/16/2021	<0.5	0.5	0.250	5	4/1/2019	NA	4/20/2020
MW-8	benzene	6/1/2022	<0.5	0.5	0.250	5	4/1/2019	NA	4/20/2020
MW-8	benzene	10/3/2022	<0.5	0.5	0.250	5	4/1/2019	NA	4/20/2020
MW-8	benzene	5/3/2023	<0.5	0.5	0.250	5	4/1/2019	NA	4/20/2020
MW-8	benzene	10/11/2023	<0.5	0.5	0.250	5	4/1/2019	NA	4/20/2020
MW-8	benzene	5/8/2024	<0.5	0.5	0.250	5	4/1/2019	NA	4/20/2020
MW-8	benzene	10/29/2024	<0.5	0.5	0.250	5	4/1/2019	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	4/11/2018	**80.80**	1.0	---	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	10/30/2018	**82.60**	1.0	---	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	4/1/2019	**75.70**	1.0	---	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	10/8/2019	**85.80**	1.0	77.567	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	4/20/2020	1.21	1.0	26.427	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	5/28/2020	57.10	1.0	22.261	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	10/20/2020	**76.40**	1.0	22.324	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	4/26/2021	61.20	1.0	20.477	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	8/16/2021	**85.90**	1.0	58.558	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	6/1/2022	59.40	1.0	59.753	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	10/3/2022	50.20	1.0	50.956	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	5/3/2023	53.80	1.0	43.309	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	10/11/2023	45.70	1.0	45.462	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	5/8/2024	57.10	1.0	45.945	70	4/11/2018	NA	4/20/2020
MW-8	cis-1,2-dichloroethylene	10/29/2024	14.80	1.0	20.143	70	4/11/2018	NA	4/20/2020

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Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-8	TCE	4/11/2018	<1.0	1.0	---	5	5/3/2023	NA	4/20/2020
MW-8	TCE	10/30/2018	<1.0	1.0	---	5	5/3/2023	NA	4/20/2020
MW-8	TCE	4/1/2019	<1.0	1.0	---	5	5/3/2023	NA	4/20/2020
MW-8	TCE	10/8/2019	<1.0	1.0	0.500	5	5/3/2023	NA	4/20/2020
MW-8	TCE	4/20/2020	<1.0	1.0	0.500	5	5/3/2023	NA	4/20/2020
MW-8	TCE	10/20/2020	<1.0	1.0	0.500	5	5/3/2023	NA	4/20/2020
MW-8	TCE	4/26/2021	<1.0	1.0	0.500	5	5/3/2023	NA	4/20/2020
MW-8	TCE	8/16/2021	<1.0	1.0	0.500	5	5/3/2023	NA	4/20/2020
MW-8	TCE	6/1/2022	<1.0	1.0	0.500	5	5/3/2023	NA	4/20/2020
MW-8	TCE	10/3/2022	<1.0	1.0	0.500	5	5/3/2023	NA	4/20/2020
MW-8	TCE	5/3/2023	1.13	1.0	0.287	5	5/3/2023	NA	4/20/2020
MW-8	TCE	10/11/2023	<1.0	1.0	0.287	5	5/3/2023	NA	4/20/2020
MW-8	TCE	5/8/2024	<1.0	1.0	0.287	5	5/3/2023	NA	4/20/2020
MW-8	TCE	10/29/2024	<1.0	1.0	0.287	5	5/3/2023	NA	4/20/2020
MW-8	vinyl chloride	4/11/2018	**2.74**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	10/30/2018	**2.18**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	4/1/2019	**5.33**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	10/8/2019	**7.13**	1.0	2.346	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	4/20/2020	1.73	1.0	1.857	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	10/20/2020	**3.25**	1.0	2.313	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	4/26/2021	**2.16**	1.0	1.437	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	8/16/2021	**2.40**	1.0	1.831	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	6/1/2022	**2.72**	1.0	2.224	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	10/3/2022	1.62	1.0	1.823	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	5/3/2023	**2.16**	1.0	1.679	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	10/11/2023	1.03	1.0	1.030	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	5/8/2024	1.51	1.0	1.034	2	4/11/2018	NA	4/20/2020
MW-8	vinyl chloride	10/29/2024	<1.0	1.0	0.469	2	4/11/2018	NA	4/20/2020
MW-8	chloride	4/11/2018	16.40	7.3	---	---	4/11/2018	NA	4/20/2020
MW-8	chloride	10/30/2018	35.60	7.3	---	---	4/11/2018	NA	4/20/2020
MW-8	chloride	4/1/2019	30.30	7.3	---	---	4/11/2018	NA	4/20/2020
MW-8	chloride	10/8/2019	26.30	7.3	20.121	---	4/11/2018	NA	4/20/2020
MW-8	chloride	4/20/2020	21.70	7.3	23.358	---	4/11/2018	NA	4/20/2020
MW-8	chloride	10/20/2020	21.70	7.3	21.410	---	4/11/2018	NA	4/20/2020
MW-8	chloride	4/26/2021	16.30	7.3	17.959	---	4/11/2018	NA	4/20/2020
MW-8	chloride	8/16/2021	15.60	7.3	15.939	---	4/11/2018	NA	4/20/2020
MW-8	chloride	6/1/2022	13.10	7.3	13.539	---	4/11/2018	NA	4/20/2020
MW-8	chloride	10/3/2022	12.80	7.3	12.926	---	4/11/2018	NA	4/20/2020
MW-8	chloride	5/3/2023	12.90	7.3	12.440	---	4/11/2018	NA	4/20/2020
MW-8	chloride	10/11/2023	12.70	7.3	12.727	---	4/11/2018	NA	4/20/2020
MW-8	chloride	5/8/2024	12.30	7.3	12.447	---	4/11/2018	NA	4/20/2020
MW-8	chloride	10/29/2024	16.50	7.3	11.912	---	4/11/2018	NA	4/20/2020

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MW-8	Specific Conductance	4/11/2018	1232	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	10/30/2018	1473	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	4/1/2019	1507	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	10/8/2019	1564	1188.4824	1317.357	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	4/20/2020	1622	1188.4824	1484.779	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	10/20/2020	1557	1188.4824	1521.717	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	4/26/2021	1618	1188.4824	1560.364	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	8/16/2021	1834	1188.4824	1552.782	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	6/1/2022	1466	1188.4824	1483.215	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	10/3/2022	1456	1188.4824	1440.527	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	5/3/2023	1390	1188.4824	1362.274	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	10/11/2023	1393	1188.4824	1391.305	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	5/8/2024	1290	1188.4824	1322.826	---	4/11/2018	NA	4/20/2020
MW-8	Specific Conductance	10/29/2024	1248	1188.4824	1267.217	---	4/11/2018	NA	4/20/2020
MW-8	TOX	4/11/2018	82.00	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	10/30/2018	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	4/1/2019	76.50	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	10/8/2019	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	4/20/2020	<40	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	10/20/2020	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	4/26/2021	53.00	11.4	33.446	---	4/11/2018	NA	6/1/2022
MW-8	TOX	8/16/2021	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	6/1/2022	46.00	11.4	28.737	---	4/11/2018	NA	6/1/2022
MW-8	TOX	10/3/2022	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	5/3/2023	65.00	11.4	29.523	---	4/11/2018	NA	6/1/2022
MW-8	TOX	10/11/2023	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-8	TOX	5/8/2024	157.00	11.4	35.420	---	4/11/2018	NA	6/1/2022
MW-8	TOX	10/29/2024	NT	11.4	---	---	4/11/2018	NA	6/1/2022

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MW-9	COD	4/11/2018	19.10	21.2	---	---	10/30/2018	NA	4/20/2020
MW-9	COD	10/30/2018	22.40	21.2	---	---	10/30/2018	NA	4/20/2020
MW-9	COD	4/1/2019	55.10	21.2	---	---	10/30/2018	NA	4/20/2020
MW-9	COD	10/8/2019	22.30	21.2	15.015	---	10/30/2018	NA	4/20/2020
MW-9	COD	4/20/2020	19.60	21.2	15.229	---	10/30/2018	NA	4/20/2020
MW-9	COD	10/20/2020	15.40	21.2	12.319	---	10/30/2018	NA	4/20/2020
MW-9	COD	4/26/2021	19.40	21.2	16.713	---	10/30/2018	NA	4/20/2020
MW-9	COD	8/16/2021	171.00	21.2	0.000	---	10/30/2018	NA	4/20/2020
MW-9	COD	6/1/2022	Dry	21.2	0.000	---	10/30/2018	NA	4/20/2020
MW-9	COD	10/3/2022	Dry	21.2	0.000	---	10/30/2018	NA	4/20/2020
MW-9	COD	5/3/2023	Dry	21.2	0.000	---	10/30/2018	NA	4/20/2020
MW-9	COD	10/11/2023	Dry	21.2	0.000	---	10/30/2018	NA	4/20/2020
MW-9	COD	5/8/2024	17.50	21.2	0.000	---	10/30/2018	NA	4/20/2020
MW-9	COD	10/29/2024	70.10	21.2	7.217	---	10/30/2018	NA	4/20/2020
MW-9	chloride	4/11/2018	39.30	7.3	---	---	4/11/2018	NA	4/20/2020
MW-9	chloride	10/30/2018	31.10	7.3	---	---	4/11/2018	NA	4/20/2020
MW-9	chloride	4/1/2019	43.30	7.3	---	---	4/11/2018	NA	4/20/2020
MW-9	chloride	10/8/2019	55.90	7.3	33.451	---	4/11/2018	NA	4/20/2020
MW-9	chloride	4/20/2020	40.60	7.3	33.871	---	4/11/2018	NA	4/20/2020
MW-9	chloride	10/20/2020	50.10	7.3	41.505	---	4/11/2018	NA	4/20/2020
MW-9	chloride	4/26/2021	27.70	7.3	32.906	---	4/11/2018	NA	4/20/2020
MW-9	chloride	8/16/2021	34.00	7.3	29.805	---	4/11/2018	NA	4/20/2020
MW-9	chloride	6/1/2022	Dry	7.3	29.805	---	4/11/2018	NA	4/20/2020
MW-9	chloride	10/3/2022	Dry	7.3	29.805	---	4/11/2018	NA	4/20/2020
MW-9	chloride	5/3/2023	Dry	7.3	29.805	---	4/11/2018	NA	4/20/2020
MW-9	chloride	10/11/2023	Dry	7.3	29.805	---	4/11/2018	NA	4/20/2020
MW-9	chloride	5/8/2024	11.60	7.3	17.057	---	4/11/2018	NA	4/20/2020
MW-9	chloride	10/29/2024	31.70	7.3	17.497	---	4/11/2018	NA	4/20/2020

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MW-9	Specific Conductance	4/11/2018	1011	1189.0570	---	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	10/30/2018	1283	1189.0570	---	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	4/1/2019	1280	1189.0570	---	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	10/8/2019	1291	1189.0570	1097.681	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	4/20/2020	1457	1189.0570	1253.019	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	10/20/2020	1381	1189.0570	1280.190	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	4/26/2021	1635	1189.0570	1314.517	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	8/16/2021	1674	1189.0570	1415.189	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	6/1/2022	Dry	1189.0570	1415.189	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	10/3/2022	Dry	1189.0570	1415.189	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	5/3/2023	Dry	1189.0570	1415.189	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	10/11/2023	Dry	1189.0570	1415.189	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	5/8/2024	1287	1189.0570	1330.010	---	10/30/2018	NA	4/20/2020
MW-9	Specific Conductance	10/29/2024	1146	1189.0570	1210.475	---	10/30/2018	NA	4/20/2020
MW-9	TOX	4/11/2018	<30	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	10/30/2018	NT	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	4/1/2019	<30	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	10/8/2019	NT	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	4/20/2020	<40	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	10/20/2020	NT	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	4/26/2021	13.00	11.4	13.164	---	4/11/2018	NA	5/8/2024
MW-9	TOX	8/16/2021	NT	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	6/1/2022	Dry	11.4	13.164	---	4/11/2018	NA	5/8/2024
MW-9	TOX	10/3/2022	Dry	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	5/3/2023	Dry	11.4	13.164	---	4/11/2018	NA	5/8/2024
MW-9	TOX	10/11/2023	Dry	11.4	---	---	4/11/2018	NA	5/8/2024
MW-9	TOX	5/8/2024	75.60	11.4	4.967	---	4/11/2018	NA	5/8/2024
MW-9	TOX	10/29/2024	NT	11.4	---	---	4/11/2018	NA	5/8/2024

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MW-10	cis-1,2-dichloroethylene	4/11/2018	2.37	1.0	---	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	10/30/2018	<1.0	1.0	---	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	4/1/2019	<1.0	1.0	---	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	10/8/2019	<1.0	1.0	0.158	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	4/20/2020	5.16	1.0	0.000	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	10/20/2020	2.39	1.0	0.229	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	4/26/2021	1.17	1.0	0.523	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	8/16/2021	2.11	1.0	1.221	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	6/1/2022	2.16	1.0	1.491	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	10/3/2022	dry	1.0	1.491	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	5/3/2023	<1.0	1.0	0.793	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	10/11/2023	<1.0	1.0	0.500	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	5/8/2024	<1.0	1.0	0.196	70	4/11/2018	NA	4/20/2020
MW-10	cis-1,2-dichloroethylene	10/29/2024	<1.0	1.0	0.500	70	4/11/2018	NA	4/20/2020
MW-10	COD	4/11/2018	21.40	21.2	---	---	5/3/2023	NA	4/20/2020
MW-10	COD	10/30/2018	55.10	21.2	---	---	5/3/2023	NA	4/20/2020
MW-10	COD	4/1/2019	37.80	21.2	---	---	5/3/2023	NA	4/20/2020
MW-10	COD	10/8/2019	44.50	21.2	27.466	---	5/3/2023	NA	4/20/2020
MW-10	COD	4/20/2020	53.40	21.2	40.709	---	5/3/2023	NA	4/20/2020
MW-10	COD	10/20/2020	64.20	21.2	40.072	---	5/3/2023	NA	4/20/2020
MW-10	COD	4/26/2021	66.80	21.2	48.324	---	5/3/2023	NA	4/20/2020
MW-10	COD	8/16/2021	28.60	21.2	38.157	---	5/3/2023	NA	4/20/2020
MW-10	COD	6/1/2022	36.20	21.2	32.158	---	5/3/2023	NA	4/20/2020
MW-10	COD	10/3/2022	dry	21.2	32.158	---	5/3/2023	NA	4/20/2020
MW-10	COD	5/3/2023	26.60	21.2	23.415	---	5/3/2023	NA	4/20/2020
MW-10	COD	10/11/2023	40.90	21.2	27.310	---	5/3/2023	NA	4/20/2020
MW-10	COD	5/8/2024	14.60	21.2	19.510	---	5/3/2023	NA	4/20/2020
MW-10	COD	10/29/2024	29.10	21.2	18.459	---	5/3/2023	NA	4/20/2020
MW-10	chloride	4/11/2018	102.00	7.3	---	---	4/11/2018	NA	4/20/2020
MW-10	chloride	10/30/2018	140.00	7.3	---	---	4/11/2018	NA	4/20/2020
MW-10	chloride	4/1/2019	372.00	7.3	---	---	4/11/2018	NA	4/20/2020
MW-10	chloride	10/8/2019	196.00	7.3	99.085	---	4/11/2018	NA	4/20/2020
MW-10	chloride	4/20/2020	295.00	7.3	161.415	---	4/11/2018	NA	4/20/2020
MW-10	chloride	10/20/2020	269.00	7.3	220.091	---	4/11/2018	NA	4/20/2020
MW-10	chloride	4/26/2021	392.00	7.3	217.840	---	4/11/2018	NA	4/20/2020
MW-10	chloride	8/16/2021	115.00	7.3	168.358	---	4/11/2018	NA	4/20/2020
MW-10	chloride	6/1/2022	107.00	7.3	102.665	---	4/11/2018	NA	4/20/2020
MW-10	chloride	10/3/2022	dry	7.3	102.665	---	4/11/2018	NA	4/20/2020
MW-10	chloride	5/3/2023	166.00	7.3	79.032	---	4/11/2018	NA	4/20/2020
MW-10	chloride	10/11/2023	101.00	7.3	96.507	---	4/11/2018	NA	4/20/2020
MW-10	chloride	5/8/2024	153.00	7.3	68.898	---	4/11/2018	NA	4/20/2020
MW-10	chloride	10/29/2024	149.00	7.3	68.682	---	4/11/2018	NA	4/20/2020

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Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-10	Specific Conductance	4/11/2018	1200	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	10/30/2018	1776	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	4/1/2019	1890	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	10/8/2019	1855	1188.4824	1399.920	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	4/20/2020	1861	1188.4824	1803.248	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	10/20/2020	2520	1188.4824	1749.154	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	4/26/2021	1999	1188.4824	1786.289	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	8/16/2021	1673	1188.4824	1698.628	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	6/1/2022	1472	1188.4824	1519.802	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	10/3/2022	dry	1188.4824	1519.802	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	5/3/2023	1538	1188.4824	1467.475	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	10/11/2023	1394	1188.4824	1416.889	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	5/8/2024	1663	1188.4824	1418.121	---	4/11/2018	NA	4/20/2020
MW-10	Specific Conductance	10/29/2024	1602	1188.4824	1449.312	---	4/11/2018	NA	4/20/2020
MW-10	TOX	4/11/2018	50.00	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	10/30/2018	NT	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	4/1/2019	64.20	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	10/8/2019	NT	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	4/20/2020	<40	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	10/20/2020	NT	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	4/26/2021	76.00	11.4	31.624	---	4/11/2018	NA	4/26/2021
MW-10	TOX	8/16/2021	NT	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	6/1/2022	41.00	11.4	28.746	---	4/11/2018	NA	4/26/2021
MW-10	TOX	10/3/2022	NT	11.4	---	---	4/11/2018	NA	4/26/2021
MW-10	TOX	5/8/2024	185.00	11.4	28.430	---	4/11/2018	NA	4/26/2021
MW-10	TOX	10/29/2024	NT	11.4	---	---	4/11/2018	NA	4/26/2021

Bold Result *= A value that exceeds the GWPS.*
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MW-11	chloride	4/11/2018	89.30	7.3	---	---	4/11/2018	NA	4/20/2020
MW-11	chloride	10/30/2018	75.10	7.3	---	---	4/11/2018	NA	4/20/2020
MW-11	chloride	4/1/2019	81.10	7.3	---	---	4/11/2018	NA	4/20/2020
MW-11	chloride	10/8/2019	69.20	7.3	71.236	---	4/11/2018	NA	4/20/2020
MW-11	chloride	4/20/2020	72.00	7.3	69.929	---	4/11/2018	NA	4/20/2020
MW-11	chloride	10/20/2020	84.10	7.3	70.427	---	4/11/2018	NA	4/20/2020
MW-11	chloride	4/26/2021	100.00	7.3	69.176	---	4/11/2018	NA	4/20/2020
MW-11	chloride	8/16/2021	38.40	7.3	50.993	---	4/11/2018	NA	4/20/2020
MW-11	chloride	6/1/2022	26.90	7.3	31.850	---	4/11/2018	NA	4/20/2020
MW-11	chloride	10/3/2022	24.30	7.3	16.571	---	4/11/2018	NA	4/20/2020
MW-11	chloride	5/3/2023	25.10	7.3	22.982	---	4/11/2018	NA	4/20/2020
MW-11	chloride	10/11/2023	55.40	7.3	19.915	---	4/11/2018	NA	4/20/2020
MW-11	chloride	5/8/2024	101.00	7.3	20.216	---	4/11/2018	NA	4/20/2020
MW-11	chloride	10/29/2024	128.00	7.3	37.574	---	4/11/2018	NA	4/20/2020
MW-11	Specific Conductance	4/11/2018	1175	1188.4824	---	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	10/30/2018	1204	1188.4824	---	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	4/1/2019	1296	1188.4824	---	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	10/8/2019	1316	1188.4824	1188.183	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	4/20/2020	1416	1188.4824	1232.687	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	10/20/2020	1462	1188.4824	1303.676	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	4/26/2021	1553	1188.4824	1351.364	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	8/16/2021	1465	1188.4824	1424.427	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	6/1/2022	1245	1188.4824	1317.675	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	10/3/2022	1266	1188.4824	1251.526	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	5/3/2023	1259	1188.4824	1218.223	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	10/11/2023	1300	1188.4824	1247.270	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	5/8/2024	1274	1188.4824	1259.236	---	10/30/2018	NA	4/20/2020
MW-11	Specific Conductance	10/29/2024	1345	1188.4824	1261.862	---	10/30/2018	NA	4/20/2020

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MW-12	benzene	4/11/2018	1.610	0.5	---	5	4/1/2019	NA	4/20/2020
MW-12	benzene	10/30/2018	1.520	0.5	---	5	4/1/2019	NA	4/20/2020
MW-12	benzene	4/1/2019	1.450	0.5	---	5	4/1/2019	NA	4/20/2020
MW-12	benzene	10/8/2019	1.870	0.5	1.453	5	4/1/2019	NA	4/20/2020
MW-12	benzene	4/20/2020	1.860	0.5	1.483	5	4/1/2019	NA	4/20/2020
MW-12	benzene	10/20/2020	2.010	0.5	1.588	5	4/1/2019	NA	4/20/2020
MW-12	benzene	4/26/2021	1.840	0.5	1.828	5	4/1/2019	NA	4/20/2020
MW-12	benzene	8/16/2021	1.950	0.5	1.846	5	4/1/2019	NA	4/20/2020
MW-12	benzene	6/1/2022	0.784	0.5	1.145	5	4/1/2019	NA	4/20/2020
MW-12	benzene	10/3/2022	1.460	0.5	1.052	5	4/1/2019	NA	4/20/2020
MW-12	benzene	5/3/2023	1.270	0.5	0.799	5	4/1/2019	NA	4/20/2020
MW-12	benzene	10/11/2023	1.160	0.5	0.834	5	4/1/2019	NA	4/20/2020
MW-12	benzene	5/8/2024	1.190	0.5	1.111	5	4/1/2019	NA	4/20/2020
MW-12	benzene	10/29/2024	0.804	0.5	0.863	5	4/1/2019	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	4/11/2018	50.40	1.0	---	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	10/30/2018	29.60	1.0	---	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	4/1/2019	34.30	1.0	---	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	10/8/2019	47.30	1.0	31.719	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	4/20/2020	52.40	1.0	31.620	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	10/20/2020	55.10	1.0	39.277	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	4/26/2021	49.00	1.0	47.931	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	8/16/2021	64.70	1.0	49.458	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	6/1/2022	31.00	1.0	37.661	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	10/3/2022	35.20	1.0	31.783	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	5/3/2023	31.90	1.0	21.760	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	10/11/2023	31.30	1.0	30.072	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	5/8/2024	32.50	1.0	30.700	70	4/11/2018	NA	4/20/2020
MW-12	cis-1,2-dichloroethylene	10/29/2024	18.30	1.0	20.481	70	4/11/2018	NA	4/20/2020
MW-12	TCE	4/11/2018	1.23	1.0	---	5	4/11/2018	NA	4/20/2020
MW-12	TCE	10/30/2018	<1.0	1.0	---	5	4/11/2018	NA	4/20/2020
MW-12	TCE	4/1/2019	1.18	1.0	---	5	4/11/2018	NA	4/20/2020
MW-12	TCE	10/8/2019	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-12	TCE	4/20/2020	<1.0	1.0	0.376	5	4/11/2018	NA	4/20/2020
MW-12	TCE	10/20/2020	1.54	1.0	0.482	5	4/11/2018	NA	4/20/2020
MW-12	TCE	4/26/2021	<1.0	1.0	0.310	5	4/11/2018	NA	4/20/2020
MW-12	TCE	8/16/2021	<1.0	1.0	0.310	5	4/11/2018	NA	4/20/2020
MW-12	TCE	6/1/2022	<1.0	1.0	0.310	5	4/11/2018	NA	4/20/2020
MW-12	TCE	10/3/2022	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-12	TCE	5/3/2023	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-12	TCE	10/11/2023	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-12	TCE	5/8/2024	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-12	TCE	10/29/2024	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020

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MW-12	vinyl chloride	4/11/2018	**4.48**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	10/30/2018	**9.14**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	4/1/2019	**8.96**	1.0	---	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	10/8/2019	**6.50**	1.0	5.351	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	4/20/2020	**4.90**	1.0	5.606	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	10/20/2020	**5.41**	1.0	4.878	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	4/26/2021	**3.57**	1.0	4.042	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	8/16/2021	**4.08**	1.0	3.778	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	6/1/2022	1.56	1.0	2.271	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	10/3/2022	**7.15**	1.0	2.088	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	5/3/2023	**4.19**	1.0	1.556	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	10/11/2023	**3.56**	1.0	1.394	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	5/8/2024	**4.30**	1.0	2.918	2	4/11/2018	NA	4/20/2020
MW-12	vinyl chloride	10/29/2024	**5.48**	1.0	3.440	2	4/11/2018	NA	4/20/2020
MW-12	chloride	4/11/2018	15.20	7.3	---	---	4/11/2018	NA	4/20/2020
MW-12	chloride	10/30/2018	42.60	7.3	---	---	4/11/2018	NA	4/20/2020
MW-12	chloride	4/1/2019	31.50	7.3	---	---	4/11/2018	NA	4/20/2020
MW-12	chloride	10/8/2019	12.00	7.3	12.909	---	4/11/2018	NA	4/20/2020
MW-12	chloride	4/20/2020	11.20	7.3	11.006	---	4/11/2018	NA	4/20/2020
MW-12	chloride	10/20/2020	12.30	7.3	8.225	---	4/11/2018	NA	4/20/2020
MW-12	chloride	4/26/2021	9.32	7.3	10.045	---	4/11/2018	NA	4/20/2020
MW-12	chloride	8/16/2021	12.50	7.3	10.068	---	4/11/2018	NA	4/20/2020
MW-12	chloride	6/1/2022	32.00	7.3	7.510	---	4/11/2018	NA	4/20/2020
MW-12	chloride	10/3/2022	21.70	7.3	10.046	---	4/11/2018	NA	4/20/2020
MW-12	chloride	5/3/2023	29.10	7.3	16.285	---	4/11/2018	NA	4/20/2020
MW-12	chloride	10/11/2023	34.00	7.3	24.533	---	4/11/2018	NA	4/20/2020
MW-12	chloride	5/8/2024	40.70	7.3	24.435	---	4/11/2018	NA	4/20/2020
MW-12	chloride	10/29/2024	68.70	7.3	27.796	---	4/11/2018	NA	4/20/2020
MW-12	iron	4/11/2018	22900.00	100	---	---	4/11/2018	NA	4/20/2020
MW-12	iron	10/30/2018	27900.00	100	---	---	4/11/2018	NA	4/20/2020
MW-12	iron	4/1/2019	20200.00	100	---	---	4/11/2018	NA	4/20/2020
MW-12	iron	10/8/2019	27400.00	100	21399.220	---	4/11/2018	NA	4/20/2020
MW-12	iron	4/20/2020	24800.00	100	22024.280	---	4/11/2018	NA	4/20/2020
MW-12	iron	10/20/2020	19400.00	100	19656.450	---	4/11/2018	NA	4/20/2020
MW-12	iron	4/26/2021	27800.00	100	21499.250	---	4/11/2018	NA	4/20/2020
MW-12	iron	8/16/2021	29900.00	100	21526.980	---	4/11/2018	NA	4/20/2020
MW-12	iron	6/1/2022	25300.00	100	21667.440	---	4/11/2018	NA	4/20/2020
MW-12	iron	10/3/2022	9460.00	100	15064.860	---	4/11/2018	NA	4/20/2020
MW-12	iron	5/3/2023	10800.00	100	9967.266	---	4/11/2018	NA	4/20/2020
MW-12	iron	10/11/2023	7290.00	100	6122.277	---	4/11/2018	NA	4/20/2020
MW-12	iron	5/8/2024	6970.00	100	7052.898	---	4/11/2018	NA	4/20/2020
MW-12	iron	10/29/2024	13800.00	100	6918.569	---	4/11/2018	NA	4/20/2020

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MW-12	Specific Conductance	4/11/2018	1304	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	10/30/2018	1556	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	4/1/2019	1399	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	10/8/2019	1499	1188.4824	1343.176	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	4/20/2020	1386	1188.4824	1389.406	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	10/20/2020	1684	1188.4824	1372.838	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	4/26/2021	1637	1188.4824	1434.226	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	8/16/2021	1754	1188.4824	1476.500	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	6/1/2022	1371	1188.4824	1466.541	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	10/3/2022	1494	1188.4824	1419.451	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	5/3/2023	1481	1188.4824	1384.417	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	10/11/2023	1422	1188.4824	1392.842	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	5/8/2024	1440	1188.4824	1429.930	---	4/11/2018	NA	4/20/2020
MW-12	Specific Conductance	10/29/2024	1348	1188.4824	1374.587	---	4/11/2018	NA	4/20/2020
MW-12	TOX	4/11/2018	41.90	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	10/30/2018	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	4/1/2019	37.40	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	10/8/2019	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	4/20/2020	<40	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	10/20/2020	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	4/26/2021	42.00	11.4	26.284	---	4/11/2018	NA	6/1/2022
MW-12	TOX	8/16/2021	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	6/1/2022	48.00	11.4	26.421	---	4/11/2018	NA	6/1/2022
MW-12	TOX	10/3/2022	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-12	TOX	5/8/2024	146.00	11.4	27.245	---	4/11/2018	NA	6/1/2022
MW-12	TOX	10/29/2024	NT	11.4	---	---	4/11/2018	NA	6/1/2022

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwater.*

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Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS

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Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-13	COD	4/11/2018	17.20	21.2	---	---	4/1/2019	NA	4/20/2020
MW-13	COD	10/30/2018	18.60	21.2	---	---	4/1/2019	NA	4/20/2020
MW-13	COD	4/1/2019	32.50	21.2	---	---	4/1/2019	NA	4/20/2020
MW-13	COD	10/8/2019	60.20	21.2	14.848	---	4/1/2019	NA	4/20/2020
MW-13	COD	4/20/2020	26.70	21.2	18.862	---	4/1/2019	NA	4/20/2020
MW-13	COD	10/20/2020	8.56	21.2	13.463	---	4/1/2019	NA	4/20/2020
MW-13	COD	4/26/2021	22.50	21.2	10.531	---	4/1/2019	NA	4/20/2020
MW-13	COD	8/16/2021	12.50	21.2	10.241	---	4/1/2019	NA	4/20/2020
MW-13	COD	6/1/2022	20.90	21.2	10.331	---	4/1/2019	NA	4/20/2020
MW-13	COD	10/3/2022	13.50	21.2	12.949	---	4/1/2019	NA	4/20/2020
MW-13	COD	5/3/2023	23.50	21.2	12.896	---	4/1/2019	NA	4/20/2020
MW-13	COD	10/11/2023	20.30	21.2	15.856	---	4/1/2019	NA	4/20/2020
MW-13	COD	5/8/2024	23.70	21.2	16.126	---	4/1/2019	NA	4/20/2020
MW-13	COD	10/29/2024	42.60	21.2	18.718	---	4/1/2019	NA	4/20/2020
MW-13	chloride	4/11/2018	124.00	7.3	---	---	4/11/2018	NA	4/20/2020
MW-13	chloride	10/30/2018	132.00	7.3	---	---	4/11/2018	NA	4/20/2020
MW-13	chloride	4/1/2019	147.00	7.3	---	---	4/11/2018	NA	4/20/2020
MW-13	chloride	10/8/2019	179.00	7.3	124.470	---	4/11/2018	NA	4/20/2020
MW-13	chloride	4/20/2020	116.00	7.3	120.257	---	4/11/2018	NA	4/20/2020
MW-13	chloride	10/20/2020	32.50	7.3	64.139	---	4/11/2018	NA	4/20/2020
MW-13	chloride	4/26/2021	85.20	7.3	50.185	---	4/11/2018	NA	4/20/2020
MW-13	chloride	8/16/2021	33.10	7.3	31.093	---	4/11/2018	NA	4/20/2020
MW-13	chloride	6/1/2022	24.70	7.3	19.787	---	4/11/2018	NA	4/20/2020
MW-13	chloride	10/3/2022	21.70	7.3	15.416	---	4/11/2018	NA	4/20/2020
MW-13	chloride	5/3/2023	73.00	7.3	17.561	---	4/11/2018	NA	4/20/2020
MW-13	chloride	10/11/2023	33.10	7.3	17.561	---	4/11/2018	NA	4/20/2020
MW-13	chloride	5/8/2024	60.50	7.3	26.511	---	4/11/2018	NA	4/20/2020
MW-13	chloride	10/29/2024	38.40	7.3	35.024	---	4/11/2018	NA	4/20/2020
MW-13	iron	4/11/2018	<500	100	---	---	10/8/2019	NA	4/20/2020
MW-13	iron	10/30/2018	<500	100	---	---	10/8/2019	NA	4/20/2020
MW-13	iron	4/1/2019	<500	100	---	---	10/8/2019	NA	4/20/2020
MW-13	iron	10/8/2019	1780.00	100	0.000	---	10/8/2019	NA	4/20/2020
MW-13	iron	4/20/2020	1370.00	100	234.327	---	10/8/2019	NA	4/20/2020
MW-13	iron	10/20/2020	<500	100	234.327	---	10/8/2019	NA	4/20/2020
MW-13	iron	4/26/2021	<500	100	234.327	---	10/8/2019	NA	4/20/2020
MW-13	iron	8/16/2021	3430.00	100	26.510	---	10/8/2019	NA	4/20/2020
MW-13	iron	6/1/2022	1710.00	100	100.267	---	10/8/2019	NA	4/20/2020
MW-13	iron	10/3/2022	1740.00	100	656.681	---	10/8/2019	NA	4/20/2020
MW-13	iron	5/3/2023	1200.00	100	1178.127	---	10/8/2019	NA	4/20/2020
MW-13	iron	10/11/2023	747.00	100	940.653	---	10/8/2019	NA	4/20/2020
MW-13	iron	5/8/2024	6370.00	100	0.000	---	10/8/2019	NA	4/20/2020
MW-13	iron	10/29/2024	<500	100	0.000	---	10/8/2019	NA	4/20/2020

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Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-13	Specific Conductance	4/11/2018	1332	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	10/30/2018	1578	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	4/1/2019	1590	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	10/8/2019	1854	1188.4824	1403.842	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	4/20/2020	1680	1188.4824	1565.161	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	10/20/2020	990	1188.4824	1203.436	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	4/26/2021	1595	1188.4824	1204.442	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	8/16/2021	1209	1188.4824	1086.970	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	6/1/2022	938	1188.4824	924.304	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	10/3/2022	917	1188.4824	890.949	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	5/3/2023	1446	1188.4824	910.529	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	10/11/2023	990	1188.4824	855.622	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	5/8/2024	1550	1188.4824	949.819	---	4/11/2018	NA	4/20/2020
MW-13	Specific Conductance	10/29/2024	1604	1188.4824	1155.474	---	4/11/2018	NA	4/20/2020
MW-13	TOX	4/11/2018	69.20	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	10/30/2018	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	4/1/2019	72.70	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	10/8/2019	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	4/20/2020	54.10	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	10/20/2020	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	4/26/2021	31.00	11.4	26.284	---	4/11/2018	NA	6/1/2022
MW-13	TOX	8/16/2021	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	6/1/2022	11.00	11.4	26.421	---	4/11/2018	NA	6/1/2022
MW-13	TOX	10/3/2022	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	5/3/2023	77.00	11.4	27.906	---	4/11/2018	NA	6/1/2022
MW-13	TOX	10/11/2023	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-13	TOX	5/8/2024	<40	11.4	27.906	---	4/11/2018	NA	6/1/2022
MW-13	TOX	10/29/2024	NT	11.4	---	---	4/11/2018	NA	6/1/2022

Bold Result *= A value that exceeds the GWPS.*
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Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-14	1,2-dichloropropane	4/11/2018	1.13	1.0	---	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	10/30/2018	<1.0	1.0	---	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	4/1/2019	<1.0	1.0	---	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	10/8/2019	<1.0	1.0	0.385	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	5/28/2020	<1.0	1.0	0.500	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	10/20/2020	1.17	1.0	0.377	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	4/26/2021	1.03	1.0	0.496	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	8/16/2021	1.55	1.0	0.686	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	6/1/2022	<1.0	1.0	0.686	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	10/3/2022	Dry	1.0	0.686	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	5/3/2023	<1.0	1.0	0.303	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	10/11/2023	<1.0	1.0	0.145	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	5/8/2024	<1.0	1.0	0.500	5	4/11/2018	NA	5/28/2020
MW-14	1,2-dichloropropane	10/29/2024	<1.0	1.0	0.500	5	4/11/2018	NA	5/28/2020
MW-14	benzene	4/11/2018	0.592	0.5	---	5	4/11/2018	NA	4/20/2020
MW-14	benzene	10/30/2018	<0.5	0.5	---	5	4/11/2018	NA	4/20/2020
MW-14	benzene	4/1/2019	0.561	0.5	---	5	4/11/2018	NA	4/20/2020
MW-14	benzene	10/8/2019	0.627	0.5	0.357	5	4/11/2018	NA	4/20/2020
MW-14	benzene	4/20/2020	0.628	0.5	0.360	5	4/11/2018	NA	4/20/2020
MW-14	benzene	10/20/2020	0.713	0.5	0.578	5	4/11/2018	NA	4/20/2020
MW-14	benzene	4/26/2021	<0.5	0.5	0.375	5	4/11/2018	NA	4/20/2020
MW-14	benzene	8/16/2021	<0.5	0.5	0.248	5	4/11/2018	NA	4/20/2020
MW-14	benzene	6/1/2022	<0.5	0.5	0.165	5	4/11/2018	NA	4/20/2020
MW-14	benzene	10/3/2022	Dry	0.5	0.165	5	4/11/2018	NA	4/20/2020
MW-14	benzene	5/3/2023	<0.5	0.5	0.250	5	4/11/2018	NA	4/20/2020
MW-14	benzene	10/11/2023	<0.5	0.5	0.250	5	4/11/2018	NA	4/20/2020
MW-14	benzene	5/8/2024	0.678	0.5	0.105	5	4/11/2018	NA	4/20/2020
MW-14	benzene	10/29/2024	0.531	0.5	0.176	5	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	4/11/2018	59.80	1.0	---	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	10/30/2018	21.40	1.0	---	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	4/1/2019	45.30	1.0	---	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	10/8/2019	54.40	1.0	30.526	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	4/20/2020	63.60	1.0	30.476	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	10/20/2020	**73.20**	1.0	48.738	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	4/26/2021	56.10	1.0	54.401	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	8/16/2021	**74.30**	1.0	59.351	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	6/1/2022	33.30	1.0	42.609	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	10/3/2022	Dry	1.0	42.609	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	5/3/2023	36.60	1.0	27.693	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	10/11/2023	41.60	1.0	24.245	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	5/8/2024	49.30	1.0	32.013	70	4/11/2018	NA	4/20/2020
MW-14	cis-1,2-dichloroethylene	10/29/2024	39.00	1.0	35.145	70	4/11/2018	NA	4/20/2020

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Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-14	TCE	4/11/2018	1.13	1.0	---	5	4/11/2018	NA	4/20/2020
MW-14	TCE	10/30/2018	<1.0	1.0	---	5	4/11/2018	NA	4/20/2020
MW-14	TCE	4/1/2019	<1.0	1.0	---	5	4/11/2018	NA	4/20/2020
MW-14	TCE	10/8/2019	<1.0	1.0	0.385	5	4/11/2018	NA	4/20/2020
MW-14	TCE	4/20/2020	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	10/20/2020	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	4/26/2021	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	8/16/2021	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	6/1/2022	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	10/3/2022	Dry	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	5/3/2023	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	10/11/2023	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	5/8/2024	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	TCE	10/29/2024	<1.0	1.0	0.500	5	4/11/2018	NA	4/20/2020
MW-14	COD	4/11/2018	6.60	21.2	---	---	5/3/2023	NA	4/20/2020
MW-14	COD	10/30/2018	<5.0	21.2	---	---	5/3/2023	NA	4/20/2020
MW-14	COD	4/1/2019	12.8	21.2	---	---	5/3/2023	NA	4/20/2020
MW-14	COD	10/8/2019	<5.0	21.2	1.885	---	5/3/2023	NA	4/20/2020
MW-14	COD	4/20/2020	6.24	21.2	1.803	---	5/3/2023	NA	4/20/2020
MW-14	COD	10/20/2020	<5.0	21.2	1.803	---	5/3/2023	NA	4/20/2020
MW-14	COD	4/26/2021	15.50	21.2	1.372	---	5/3/2023	NA	4/20/2020
MW-14	COD	8/16/2021	12.50	21.2	4.080	---	5/3/2023	NA	4/20/2020
MW-14	COD	6/1/2022	13.90	21.2	6.023	---	5/3/2023	NA	4/20/2020
MW-14	COD	10/3/2022	Dry	21.2	6.023	---	5/3/2023	NA	4/20/2020
MW-14	COD	5/3/2023	29.60	21.2	11.023	---	5/3/2023	NA	4/20/2020
MW-14	COD	10/11/2023	42.60	21.2	12.302	---	5/3/2023	NA	4/20/2020
MW-14	COD	5/8/2024	22.60	21.2	16.675	---	5/3/2023	NA	4/20/2020
MW-14	COD	10/29/2024	28.40	21.2	23.491	---	5/3/2023	NA	4/20/2020
MW-14	chloride	4/11/2018	48.20	7.3	---	---	4/11/2018	NA	4/20/2020
MW-14	chloride	10/30/2018	20.50	7.3	---	---	4/11/2018	NA	4/20/2020
MW-14	chloride	4/1/2019	36.50	7.3	---	---	4/11/2018	NA	4/20/2020
MW-14	chloride	10/8/2019	30.50	7.3	23.895	---	4/11/2018	NA	4/20/2020
MW-14	chloride	4/20/2020	41.60	7.3	24.423	---	4/11/2018	NA	4/20/2020
MW-14	chloride	10/20/2020	50.20	7.3	32.476	---	4/11/2018	NA	4/20/2020
MW-14	chloride	4/26/2021	51.00	7.3	35.054	---	4/11/2018	NA	4/20/2020
MW-14	chloride	8/16/2021	50.30	7.3	44.409	---	4/11/2018	NA	4/20/2020
MW-14	chloride	6/1/2022	50.00	7.3	49.998	---	4/11/2018	NA	4/20/2020
MW-14	chloride	10/3/2022	Dry	7.3	49.998	---	4/11/2018	NA	4/20/2020
MW-14	chloride	5/3/2023	58.80	7.3	48.884	---	4/11/2018	NA	4/20/2020
MW-14	chloride	10/11/2023	109.00	7.3	42.535	---	4/11/2018	NA	4/20/2020
MW-14	chloride	5/8/2024	129.00	7.3	53.489	---	4/11/2018	NA	4/20/2020
MW-14	chloride	10/29/2024	130.00	7.3	77.804	---	4/11/2018	NA	4/20/2020

Table 7
Summary of Ongoing & Newly Identified SSI
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-14	Specific Conductance	4/11/2018	1227	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	10/30/2018	1317	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	4/1/2019	1328	1188.4824	---	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	10/8/2019	1338	1188.4824	1258.282	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	4/20/2020	1541	1188.4824	1288.326	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	10/20/2020	1542	1188.4824	1332.939	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	4/26/2021	1570	1188.4824	1404.787	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	8/16/2021	1608	1188.4824	1537.961	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	6/1/2022	1382	1188.4824	1439.403	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	10/3/2022	Dry	1188.4824	1439.403	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	5/3/2023	1501	1188.4824	1429.287	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	10/11/2023	1600	1188.4824	1431.209	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	5/8/2024	1662	1188.4824	1430.287	---	4/11/2018	NA	4/20/2020
MW-14	Specific Conductance	10/29/2024	1606	1188.4824	1534.283	---	4/11/2018	NA	4/20/2020
MW-14	TOX	4/11/2018	90.60	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	10/30/2018	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	4/1/2019	117.00	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	10/8/2019	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	4/20/2020	85.60	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	10/20/2020	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	4/26/2021	76.00	11.4	33.446	---	4/11/2018	NA	6/1/2022
MW-14	TOX	8/16/2021	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	6/1/2022	76.00	11.4	28.737	---	4/11/2018	NA	6/1/2022
MW-14	TOX	10/3/2022	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	5/3/2023	93.00	11.4	29.523	---	4/11/2018	NA	6/1/2022
MW-14	TOX	10/11/2023	NT	11.4	---	---	4/11/2018	NA	6/1/2022
MW-14	TOX	5/8/2024	299.00	11.4	9.733	---	4/11/2018	NA	6/1/2022
MW-14	TOX	10/29/2024	NT	11.4	---	---	4/11/2018	NA	6/1/2022

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwater.*

Table 7
Summary of Ongoing & Newly Identified SSI
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	Prediction Limit (ug/L)	95% LCL (ug/L)	GWPS Limit (ug/L)	SSI Initial Exceedance	Resamples Due	5th Background Sample
MW-16	COD	4/20/2020	<5.0	21.2	---	---	6/1/2022	NA	6/1/2022
MW-16	COD	10/20/2020	8.23	21.2	---	---	6/1/2022	NA	6/1/2022
MW-16	COD	4/26/2021	7.05	21.2	---	---	6/1/2022	NA	6/1/2022
MW-16	COD	8/16/2021	9.89	21.2	4.175	---	6/1/2022	NA	6/1/2022
MW-16	COD	6/1/2022	38.20	21.2	2.895	---	6/1/2022	NA	6/1/2022
MW-16	COD	10/3/2022	50.40	21.2	7.931	---	6/1/2022	NA	6/1/2022
MW-16	COD	5/3/2023	12.10	21.2	10.428	---	6/1/2022	NA	6/1/2022
MW-16	COD	10/11/2023	28.70	21.2	18.355	---	6/1/2022	NA	6/1/2022
MW-16	COD	5/8/2024	12.90	21.2	10.473	---	6/1/2022	NA	6/1/2022
MW-16	COD	10/29/2024	24.60	21.2	12.347	---	6/1/2022	NA	6/1/2022
MW-16	chloride	4/20/2020	12.00	7.3	---	---	4/20/2020	NA	6/1/2022
MW-16	chloride	10/20/2020	27.80	7.3	---	---	4/20/2020	NA	6/1/2022
MW-16	chloride	4/26/2021	5.50	7.3	---	---	4/20/2020	NA	6/1/2022
MW-16	chloride	8/16/2021	8.80	7.3	4.969	---	4/20/2020	NA	6/1/2022
MW-16	chloride	6/1/2022	9.73	7.3	4.245	---	4/20/2020	NA	6/1/2022
MW-16	chloride	10/3/2022	9.58	7.3	6.690	---	4/20/2020	NA	6/1/2022
MW-16	chloride	5/3/2023	6.95	7.3	7.660	---	4/20/2020	NA	6/1/2022
MW-16	chloride	10/11/2023	7.89	7.3	7.370	---	4/20/2020	NA	6/1/2022
MW-16	chloride	5/8/2024	6.27	7.3	6.430	---	4/20/2020	NA	6/1/2022
MW-16	chloride	10/29/2024	7.40	7.3	6.531	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	4/20/2020	1524	1188.4824	---	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	10/20/2020	1680	1188.4824	---	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	4/26/2021	1436	1188.4824	---	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	8/16/2021	1382	1188.4824	1392.723	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	6/1/2022	1103	1188.4824	1195.172	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	10/3/2022	1134	1188.4824	1116.841	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	5/3/2023	1319	1188.4824	1115.873	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	10/11/2023	1432	1188.4824	1111.987	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	5/8/2024	1335	1188.4824	1197.220	---	4/20/2020	NA	6/1/2022
MW-16	Specific Conductance	10/29/2024	1302	1188.4824	1296.557	---	4/20/2020	NA	6/1/2022

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwater.*

Table 8 - Summary of Ongoing of Identified SSL

Table 8
Summary of Ongoing & Newly Identified SSL
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY: SSI | SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)	SSL Initial Exceedance	Compliance Date 1st Occurrence	Compliance Date Most Recent	Compliance Date Duration (years)
MW-7	1,2-dichloroethane	4/11/2018	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	10/30/2018	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	4/1/2019	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	10/8/2019	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	4/20/2020	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	10/20/2020	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	4/26/2021	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	8/16/2021	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	6/1/2022	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	10/3/2022	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	5/3/2023	<1.0	0.500	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	10/11/2023	1.29	1.162	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	5/8/2024	1.85	1.810	5	NA	NA	NA	NA
MW-7	1,2-dichloroethane	10/29/2024	<1.0	1.810	5	NA	NA	NA	NA
MW-7	1,2-dichloropropane	4/11/2018	**9.81**	---	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	10/30/2018	**8.62**	---	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	4/1/2019	**5.10**	---	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	10/8/2019	**7.25**	9.446	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	4/20/2020	**10.00**	9.552	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	10/20/2020	**9.41**	9.873	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	4/26/2021	**7.34**	9.723	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	8/16/2021	**13.50**	12.279	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	6/1/2022	**10.60**	12.440	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	10/3/2022	**11.80**	13.063	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	5/3/2023	**12.50**	13.534	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	10/11/2023	**12.90**	13.136	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	5/8/2024	**12.50**	12.963	5	10/8/2019	NA	NA	NA
MW-7	1,2-dichloropropane	10/29/2024	**5.70**	14.984	5	10/8/2019	NA	NA	NA

Table 8
Summary of Ongoing & Newly Identified SSL
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY: | SSI | SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)	SSL Initial Exceedance	Compliance Date 1st Occurrence	Compliance Date Most Recent	Compliance Date Duration (years)
MW-7	benzene	4/11/2018	0.958	---	5	NA	NA	NA	NA
MW-7	benzene	10/30/2018	0.896	---	5	NA	NA	NA	NA
MW-7	benzene	4/1/2019	0.580	---	5	NA	NA	NA	NA
MW-7	benzene	10/8/2019	0.655	0.931	5	NA	NA	NA	NA
MW-7	benzene	4/20/2020	0.813	0.861	5	NA	NA	NA	NA
MW-7	benzene	10/20/2020	0.949	0.892	5	NA	NA	NA	NA
MW-7	benzene	4/26/2021	<0.500	0.929	5	NA	NA	NA	NA
MW-7	benzene	8/16/2021	0.783	0.965	5	NA	NA	NA	NA
MW-7	benzene	6/1/2022	<0.500	0.872	5	NA	NA	NA	NA
MW-7	benzene	10/3/2022	<0.500	0.614	5	NA	NA	NA	NA
MW-7	benzene	5/3/2023	0.716	0.840	5	NA	NA	NA	NA
MW-7	benzene	10/11/2023	0.878	0.903	5	NA	NA	NA	NA
MW-7	benzene	5/8/2024	0.879	1.030	5	NA	NA	NA	NA
MW-7	benzene	10/29/2024	0.759	0.906	5	NA	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	4/11/2018	**152.00**	---	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	10/30/2018	**113.00**	---	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	4/1/2019	66.30	---	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	10/8/2019	**117.00**	142.548	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	4/20/2020	**193.00**	167.737	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	10/20/2020	**198.00**	198.535	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	4/26/2021	**112.00**	195.577	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	8/16/2021	**240.00**	232.077	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	6/1/2022	**147.00**	222.996	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	10/3/2022	**168.00**	213.533	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	5/3/2023	**174.00**	229.540	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	10/11/2023	**203.00**	200.182	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	5/8/2024	**216.00**	217.285	70	10/8/2019	NA	NA	NA
MW-7	cis-1,2-dichloroethylene	10/29/2024	**131.00**	225.316	70	10/8/2019	NA	NA	NA

Table 8
Summary of Ongoing & Newly Identified SSL
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)	SSL Initial Exceedance	Compliance Date 1st Occurrence	Compliance Date Most Recent	Compliance Date Duration (years)
MW-7	PCE	4/11/2018	3.15	---	5	NA	NA	NA	NA
MW-7	PCE	10/30/2018	2.12	---	5	NA	NA	NA	NA
MW-7	PCE	4/1/2019	2.85	---	5	NA	NA	NA	NA
MW-7	PCE	10/8/2019	1.23	3.079	5	NA	NA	NA	NA
MW-7	PCE	4/20/2020	1.90	2.603	5	NA	NA	NA	NA
MW-7	PCE	10/20/2020	<1.0	2.486	5	NA	NA	NA	NA
MW-7	PCE	4/26/2021	1.66	1.855	5	NA	NA	NA	NA
MW-7	PCE	8/16/2021	**5.30**	4.129	5	NA	NA	NA	NA
MW-7	PCE	6/1/2022	2.89	4.367	5	NA	NA	NA	NA
MW-7	PCE	10/3/2022	2.69	4.469	5	NA	NA	NA	NA
MW-7	PCE	5/3/2023	2.67	4.892	5	NA	NA	NA	NA
MW-7	PCE	10/11/2023	1.75	3.100	5	NA	NA	NA	NA
MW-7	PCE	5/8/2024	1.61	2.863	5	NA	NA	NA	NA
MW-7	PCE	10/29/2024	<1.0	2.679	5	NA	NA	NA	NA
MW-7	TCE	4/11/2018	**11.10**	---	5	10/8/2019	NA	NA	NA
MW-7	TCE	10/30/2018	**10.30**	---	5	10/8/2019	NA	NA	NA
MW-7	TCE	4/1/2019	**5.36**	---	5	10/8/2019	NA	NA	NA
MW-7	TCE	10/8/2019	**6.71**	10.765	5	10/8/2019	NA	NA	NA
MW-7	TCE	4/20/2020	**20.40**	16.581	5	10/8/2019	NA	NA	NA
MW-7	TCE	10/20/2020	**17.30**	18.961	5	10/8/2019	NA	NA	NA
MW-7	TCE	4/26/2021	**10.00**	19.088	5	10/8/2019	NA	NA	NA
MW-7	TCE	8/16/2021	**12.30**	19.085	5	10/8/2019	NA	NA	NA
MW-7	TCE	6/1/2022	**7.03**	15.413	5	10/8/2019	NA	NA	NA
MW-7	TCE	10/3/2022	**6.27**	11.307	5	10/8/2019	NA	NA	NA
MW-7	TCE	5/3/2023	**7.50**	11.487	5	10/8/2019	NA	NA	NA
MW-7	TCE	10/11/2023	**9.37**	9.095	5	10/8/2019	NA	NA	NA
MW-7	TCE	5/8/2024	**15.00**	14.075	5	10/8/2019	NA	NA	NA
MW-7	TCE	10/29/2024	**7.81**	14.018	5	10/8/2019	NA	NA	NA

Table 8
Summary of Ongoing & Newly Identified SSL
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)	SSL Initial Exceedance	Compliance Date 1st Occurrence	Compliance Date Most Recent	Compliance Date Duration (years)
MW-7	Vinyl Chloride	4/11/2018	**1.87**	---	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	10/30/2018	**1.98**	---	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	4/1/2019	<1.0	---	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	10/8/2019	1.45	2.033	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	4/20/2020	**3.15**	2.727	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	10/20/2020	**3.48**	3.368	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	4/26/2021	1.02	3.333	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	8/16/2021	**2.84**	3.575	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	6/1/2022	1.47	3.199	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	10/3/2022	1.38	2.370	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	5/3/2023	**3.11**	3.261	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	10/11/2023	**4.28**	4.201	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	5/8/2024	**5.77**	5.818	2	NA	NA	NA	NA
MW-7	Vinyl Chloride	10/29/2024	**9.39**	8.847	2	NA	NA	NA	NA

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Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwater.*

Table 8
Summary of Ongoing & Newly Identified SSL
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)	SSL Initial Exceedance	Compliance Date 1st Occurrence	Compliance Date Most Recent	Compliance Date Duration (years)
MW-8	1,2-dichloropropane	4/11/2018	1.43	---	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	10/30/2018	1.27	---	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	4/1/2019	1.21	---	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	10/8/2019	1.57	1.511	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	5/28/2020	1.43	1.511	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	10/20/2020	1.29	1.512	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	4/26/2021	1.26	1.511	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	8/16/2021	1.52	1.480	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	6/1/2022	1.21	1.439	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	10/3/2022	1.01	1.432	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	5/3/2023	1.16	1.477	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	10/11/2023	<1.0	1.352	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	5/8/2024	<1.0	1.196	5	NA	NA	NA	NA
MW-8	1,2-dichloropropane	10/29/2024	<1.0	1.053	5	NA	NA	NA	NA
MW-8	benzene	4/11/2018	<0.5	---	5	NA	NA	NA	NA
MW-8	benzene	10/30/2018	<0.5	---	5	NA	NA	NA	NA
MW-8	benzene	4/1/2019	0.632	---	5	NA	NA	NA	NA
MW-8	benzene	10/8/2019	0.858	0.758	5	NA	NA	NA	NA
MW-8	benzene	4/20/2020	<0.5	0.758	5	NA	NA	NA	NA
MW-8	benzene	10/20/2020	<0.5	0.758	5	NA	NA	NA	NA
MW-8	benzene	4/26/2021	<0.5	0.665	5	NA	NA	NA	NA
MW-8	benzene	8/16/2021	<0.5	0.250	5	NA	NA	NA	NA
MW-8	benzene	6/1/2022	<0.5	0.250	5	NA	NA	NA	NA
MW-8	benzene	10/3/2022	<0.5	0.250	5	NA	NA	NA	NA
MW-8	benzene	5/3/2023	<0.5	0.250	5	NA	NA	NA	NA
MW-8	benzene	10/11/2023	<0.5	0.250	5	NA	NA	NA	NA
MW-8	benzene	5/8/2024	<0.5	0.250	5	NA	NA	NA	NA
MW-8	benzene	10/29/2024	<0.5	0.250	5	NA	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	4/11/2018	**80.80**	---	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	10/30/2018	**82.60**	---	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	4/1/2019	**75.70**	---	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	10/8/2019	**85.80**	84.883	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	4/20/2020	1.21	96.228	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	5/28/2020	57.10	87.644	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	10/20/2020	**76.40**	87.931	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	4/26/2021	61.20	77.478	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	8/16/2021	**85.90**	81.742	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	6/1/2022	59.40	81.696	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	10/3/2022	50.20	77.394	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	5/3/2023	53.80	81.341	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	10/11/2023	45.70	59.088	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	5/8/2024	57.10	57.455	70	10/8/2019	NA	NA	NA
MW-8	cis-1,2-dichloroethylene	10/29/2024	14.80	65.557	70	10/8/2019	NA	NA	NA

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Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)	SSL Initial Exceedance	Compliance Date 1st Occurrence	Compliance Date Most Recent	Compliance Date Duration (years)
MW-8	TCE	4/11/2018	<1.0	---	5	NA	NA	NA	NA
MW-8	TCE	10/30/2018	<1.0	---	5	NA	NA	NA	NA
MW-8	TCE	4/1/2019	<1.0	---	5	NA	NA	NA	NA
MW-8	TCE	10/8/2019	<1.0	0.500	5	NA	NA	NA	NA
MW-8	TCE	4/20/2020	<1.0	0.500	5	NA	NA	NA	NA
MW-8	TCE	10/20/2020	<1.0	0.500	5	NA	NA	NA	NA
MW-8	TCE	4/26/2021	<1.0	0.500	5	NA	NA	NA	NA
MW-8	TCE	8/16/2021	<1.0	0.500	5	NA	NA	NA	NA
MW-8	TCE	6/1/2022	<1.0	0.500	5	NA	NA	NA	NA
MW-8	TCE	10/3/2022	<1.0	0.500	5	NA	NA	NA	NA
MW-8	TCE	5/3/2023	1.13	1.028	5	NA	NA	NA	NA
MW-8	TCE	10/11/2023	<1.0	1.028	5	NA	NA	NA	NA
MW-8	TCE	5/8/2024	<1.0	1.028	5	NA	NA	NA	NA
MW-8	TCE	10/29/2024	<1.0	1.028	5	NA	NA	NA	NA
MW-8	vinyl chloride	4/11/2018	**2.74**	---	2	NA	NA	NA	NA
MW-8	vinyl chloride	10/30/2018	**2.18**	---	2	NA	NA	NA	NA
MW-8	vinyl chloride	4/1/2019	**5.33**	---	2	NA	NA	NA	NA
MW-8	vinyl chloride	10/8/2019	**7.13**	6.344	2	NA	NA	NA	NA
MW-8	vinyl chloride	4/20/2020	1.73	6.328	2	NA	NA	NA	NA
MW-8	vinyl chloride	10/20/2020	**3.25**	6.407	2	NA	NA	NA	NA
MW-8	vinyl chloride	4/26/2021	**2.16**	5.698	2	NA	NA	NA	NA
MW-8	vinyl chloride	8/16/2021	**2.40**	2.939	2	NA	NA	NA	NA
MW-8	vinyl chloride	6/1/2022	**2.72**	3.041	2	NA	NA	NA	NA
MW-8	vinyl chloride	10/3/2022	1.62	2.627	2	NA	NA	NA	NA
MW-8	vinyl chloride	5/3/2023	**2.16**	2.771	2	NA	NA	NA	NA
MW-8	vinyl chloride	10/11/2023	1.03	2.735	2	NA	NA	NA	NA
MW-8	vinyl chloride	5/8/2024	1.51	2.126	2	NA	NA	NA	NA
MW-8	vinyl chloride	10/29/2024	<1.0	2.131	2	NA	NA	NA	NA
MW-8	chloride	4/11/2018	16.40	---	---	NA	NA	NA	NA
MW-8	chloride	10/30/2018	35.60	---	---	NA	NA	NA	NA
MW-8	chloride	4/1/2019	30.30	---	---	NA	NA	NA	NA
MW-8	chloride	10/8/2019	26.30	34.179	---	NA	NA	NA	NA
MW-8	chloride	4/20/2020	21.70	33.592	---	NA	NA	NA	NA
MW-8	chloride	10/20/2020	21.70	28.590	---	NA	NA	NA	NA
MW-8	chloride	4/26/2021	16.30	25.041	---	NA	NA	NA	NA
MW-8	chloride	8/16/2021	15.60	21.711	---	NA	NA	NA	NA
MW-8	chloride	6/1/2022	13.10	19.811	---	NA	NA	NA	NA
MW-8	chloride	10/3/2022	12.80	15.974	---	NA	NA	NA	NA
MW-8	chloride	5/3/2023	12.90	14.760	---	NA	NA	NA	NA
MW-8	chloride	10/11/2023	12.70	13.023	---	NA	NA	NA	NA
MW-8	chloride	5/8/2024	12.30	12.903	---	NA	NA	NA	NA
MW-8	chloride	10/29/2024	16.50	15.288	---	NA	NA	NA	NA

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MW-8	Specific Conductance	4/11/2018	1232	---	---	NA	NA	NA	NA
MW-8	Specific Conductance	10/30/2018	1473	---	---	NA	NA	NA	NA
MW-8	Specific Conductance	4/1/2019	1507	---	---	NA	NA	NA	NA
MW-8	Specific Conductance	10/8/2019	1564	1570.643	---	NA	NA	NA	NA
MW-8	Specific Conductance	4/20/2020	1622	1598.221	---	NA	NA	NA	NA
MW-8	Specific Conductance	10/20/2020	1557	1603.283	---	NA	NA	NA	NA
MW-8	Specific Conductance	4/26/2021	1618	1620.136	---	NA	NA	NA	NA
MW-8	Specific Conductance	8/16/2021	1834	1762.718	---	NA	NA	NA	NA
MW-8	Specific Conductance	6/1/2022	1466	1754.285	---	NA	NA	NA	NA
MW-8	Specific Conductance	10/3/2022	1456	1746.473	---	NA	NA	NA	NA
MW-8	Specific Conductance	5/3/2023	1390	1710.726	---	NA	NA	NA	NA
MW-8	Specific Conductance	10/11/2023	1393	1461.196	---	NA	NA	NA	NA
MW-8	Specific Conductance	5/8/2024	1290	1441.674	---	NA	NA	NA	NA
MW-8	Specific Conductance	10/29/2024	1248	1393.283	---	NA	NA	NA	NA
MW-8	TOX	4/11/2018	82.00	---	---	NA	NA	NA	NA
MW-8	TOX	10/30/2018	NT	---	---	NA	NA	NA	NA
MW-8	TOX	4/1/2019	76.50	---	---	NA	NA	NA	NA
MW-8	TOX	10/8/2019	NT	---	---	NA	NA	NA	NA
MW-8	TOX	4/20/2020	<40	---	---	NA	NA	NA	NA
MW-8	TOX	10/20/2020	NT	---	---	NA	NA	NA	NA
MW-8	TOX	4/26/2021	53.00	82.304	---	NA	NA	NA	NA
MW-8	TOX	8/16/2021	NT	---	---	NA	NA	NA	NA
MW-8	TOX	6/1/2022	46.00	69.013	---	NA	NA	NA	NA
MW-8	TOX	10/3/2022	NT	---	---	NA	NA	NA	NA
MW-8	TOX	5/3/2023	65.00	62.477	---	NA	NA	NA	NA
MW-8	TOX	10/11/2023	NT	---	---	NA	NA	NA	NA
MW-8	TOX	5/8/2024	157.00	125.080	---	NA	NA	NA	NA
MW-8	TOX	10/29/2024	NT	---	---	NA	NA	NA	NA

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwater.*

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MW-12	benzene	4/11/2018	1.610	---	5	NA	NA	NA	NA
MW-12	benzene	10/30/2018	1.520	---	5	NA	NA	NA	NA
MW-12	benzene	4/1/2019	1.450	---	5	NA	NA	NA	NA
MW-12	benzene	10/8/2019	1.870	1.772	5	NA	NA	NA	NA
MW-12	benzene	4/20/2020	1.860	1.867	5	NA	NA	NA	NA
MW-12	benzene	10/20/2020	2.010	2.007	5	NA	NA	NA	NA
MW-12	benzene	4/26/2021	1.840	1.962	5	NA	NA	NA	NA
MW-12	benzene	8/16/2021	1.950	1.984	5	NA	NA	NA	NA
MW-12	benzene	6/1/2022	0.784	2.147	5	NA	NA	NA	NA
MW-12	benzene	10/3/2022	1.460	1.965	5	NA	NA	NA	NA
MW-12	benzene	5/3/2023	1.270	1.933	5	NA	NA	NA	NA
MW-12	benzene	10/11/2023	1.160	1.503	5	NA	NA	NA	NA
MW-12	benzene	5/8/2024	1.190	1.429	5	NA	NA	NA	NA
MW-12	benzene	10/29/2024	0.804	1.349	5	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	4/11/2018	50.40	---	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	10/30/2018	29.60	---	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	4/1/2019	34.30	---	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	10/8/2019	47.30	49.081	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	4/20/2020	52.40	50.180	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	10/20/2020	55.10	55.273	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	4/26/2021	49.00	53.969	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	8/16/2021	64.70	61.142	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	6/1/2022	31.00	62.239	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	10/3/2022	35.20	58.167	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	5/3/2023	31.90	59.640	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	10/11/2023	31.30	34.628	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	5/8/2024	32.50	34.750	70	NA	NA	NA	NA
MW-12	cis-1,2-dichloroethylene	10/29/2024	18.30	36.519	70	NA	NA	NA	NA
MW-12	TCE	4/11/2018	1.23	---	5	NA	NA	NA	NA
MW-12	TCE	10/30/2018	<1.0	---	5	NA	NA	NA	NA
MW-12	TCE	4/1/2019	1.18	---	5	NA	NA	NA	NA
MW-12	TCE	10/8/2019	<1.0	1.205	5	NA	NA	NA	NA
MW-12	TCE	4/20/2020	<1.0	0.964	5	NA	NA	NA	NA
MW-12	TCE	10/20/2020	1.54	1.378	5	NA	NA	NA	NA
MW-12	TCE	4/26/2021	<1.0	1.210	5	NA	NA	NA	NA
MW-12	TCE	8/16/2021	<1.0	1.210	5	NA	NA	NA	NA
MW-12	TCE	6/1/2022	<1.0	1.210	5	NA	NA	NA	NA
MW-12	TCE	10/3/2022	<1.0	0.500	5	NA	NA	NA	NA
MW-12	TCE	5/3/2023	<1.0	0.500	5	NA	NA	NA	NA
MW-12	TCE	10/11/2023	<1.0	0.500	5	NA	NA	NA	NA
MW-12	TCE	5/8/2024	<1.0	0.500	5	NA	NA	NA	NA
MW-12	TCE	10/29/2024	<1.0	0.500	5	NA	NA	NA	NA

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MW-12	vinyl chloride	4/11/2018	**4.48**	---	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	10/30/2018	**9.14**	---	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	4/1/2019	**8.96**	---	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	10/8/2019	**6.50**	9.189	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	4/20/2020	**4.90**	9.144	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	10/20/2020	**5.41**	8.007	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	4/26/2021	**3.57**	6.148	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	8/16/2021	**4.08**	5.202	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	6/1/2022	1.56	5.039	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	10/3/2022	**7.15**	6.092	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	5/3/2023	**4.19**	6.934	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	10/11/2023	**3.56**	6.836	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	5/8/2024	**4.30**	6.682	2	10/8/2019	NA	NA	NA
MW-12	vinyl chloride	10/29/2024	**5.48**	5.325	2	10/8/2019	NA	NA	NA
MW-12	chloride	4/11/2018	15.20	---	---	NA	NA	NA	NA
MW-12	chloride	10/30/2018	42.60	---	---	NA	NA	NA	NA
MW-12	chloride	4/1/2019	31.50	---	---	NA	NA	NA	NA
MW-12	chloride	10/8/2019	12.00	37.741	---	NA	NA	NA	NA
MW-12	chloride	4/20/2020	11.20	37.644	---	NA	NA	NA	NA
MW-12	chloride	10/20/2020	12.30	25.275	---	NA	NA	NA	NA
MW-12	chloride	4/26/2021	9.32	12.365	---	NA	NA	NA	NA
MW-12	chloride	8/16/2021	12.50	12.592	---	NA	NA	NA	NA
MW-12	chloride	6/1/2022	32.00	25.550	---	NA	NA	NA	NA
MW-12	chloride	10/3/2022	21.70	27.714	---	NA	NA	NA	NA
MW-12	chloride	5/3/2023	29.10	31.365	---	NA	NA	NA	NA
MW-12	chloride	10/11/2023	34.00	33.867	---	NA	NA	NA	NA
MW-12	chloride	5/8/2024	40.70	38.315	---	NA	NA	NA	NA
MW-12	chloride	10/29/2024	68.70	58.454	---	NA	NA	NA	NA
MW-12	iron	4/11/2018	22900.00	---	---	NA	NA	NA	NA
MW-12	iron	10/30/2018	27900.00	---	---	NA	NA	NA	NA
MW-12	iron	4/1/2019	20200.00	---	---	NA	NA	NA	NA
MW-12	iron	10/8/2019	27400.00	27800.780	---	NA	NA	NA	NA
MW-12	iron	4/20/2020	24800.00	28125.720	---	NA	NA	NA	NA
MW-12	iron	10/20/2020	19400.00	26243.550	---	NA	NA	NA	NA
MW-12	iron	4/26/2021	27800.00	28200.750	---	NA	NA	NA	NA
MW-12	iron	8/16/2021	29900.00	29423.020	---	NA	NA	NA	NA
MW-12	iron	6/1/2022	25300.00	29532.560	---	NA	NA	NA	NA
MW-12	iron	10/3/2022	9460.00	31165.140	---	NA	NA	NA	NA
MW-12	iron	5/3/2023	10800.00	27762.730	---	NA	NA	NA	NA
MW-12	iron	10/11/2023	7290.00	20302.723	---	NA	NA	NA	NA
MW-12	iron	5/8/2024	6970.00	10207.102	---	NA	NA	NA	NA
MW-12	iron	10/29/2024	13800.00	12511.431	---	NA	NA	NA	NA

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MW-12	Specific Conductance	4/11/2018	1304	---	---	NA	NA	NA	NA
MW-12	Specific Conductance	10/30/2018	1556	---	---	NA	NA	NA	NA
MW-12	Specific Conductance	4/1/2019	1399	---	---	NA	NA	NA	NA
MW-12	Specific Conductance	10/8/2019	1499	1535.824	---	NA	NA	NA	NA
MW-12	Specific Conductance	4/20/2020	1386	1530.594	---	NA	NA	NA	NA
MW-12	Specific Conductance	10/20/2020	1684	1611.162	---	NA	NA	NA	NA
MW-12	Specific Conductance	4/26/2021	1637	1668.774	---	NA	NA	NA	NA
MW-12	Specific Conductance	8/16/2021	1754	1754.000	---	NA	NA	NA	NA
MW-12	Specific Conductance	6/1/2022	1371	1756.459	---	NA	NA	NA	NA
MW-12	Specific Conductance	10/3/2022	1494	1708.549	---	NA	NA	NA	NA
MW-12	Specific Conductance	5/3/2023	1481	1665.583	---	NA	NA	NA	NA
MW-12	Specific Conductance	10/11/2023	1422	1491.158	---	NA	NA	NA	NA
MW-12	Specific Conductance	5/8/2024	1440	1488.570	---	NA	NA	NA	NA
MW-12	Specific Conductance	10/29/2024	1348	1470.913	---	NA	NA	NA	NA
MW-12	TOX	4/11/2018	41.90	---	---	NA	NA	NA	NA
MW-12	TOX	10/30/2018	NT	---	---	NA	NA	NA	NA
MW-12	TOX	4/1/2019	37.40	---	---	NA	NA	NA	NA
MW-12	TOX	10/8/2019	NT	---	---	NA	NA	NA	NA
MW-12	TOX	4/20/2020	<40	---	---	NA	NA	NA	NA
MW-12	TOX	10/20/2020	NT	---	---	NA	NA	NA	NA
MW-12	TOX	4/26/2021	42.00	44.366	---	NA	NA	NA	NA
MW-12	TOX	8/16/2021	NT	---	---	NA	NA	NA	NA
MW-12	TOX	6/1/2022	48.00	47.279	---	NA	NA	NA	NA
MW-12	TOX	10/3/2022	NT	---	---	NA	NA	NA	NA
MW-12	TOX	5/8/2024	146.00	114.255	---	NA	NA	NA	NA
MW-12	TOX	10/29/2024	NT	---	---	NA	NA	NA	NA

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwater.*

Table 9 – Analytical Data Summary

Table 1

Analytical Data Summary for MW-10

Constituents	Units	8/9/1996	10/10/1996	1/21/1997	4/17/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001
1,1,1-Trichloroethane	ug/L	<1	<1	<1	<1								
1,1-Dichloroethene	ug/L	<1	<1	<2	<2								
1,2-Dichloroethane	ug/L	<1.0	<.4	<.4	<.4							<.4	<.4
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	1.100	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	ug/L	<1.0	<1.0	<.5	<.5							<.5	<.5
Chemical Oxygen Demand	mg/L	140.0	<5.0	5.7	<5.0	<5.0	<5.0	<5.0	63.0	<5.0	<5.0	<5.0	<5.0
Chloride	mg/L	13.0	14.0	15.0	22.0	19.0	19.6	20.0	21.0	21.0	18.6	19.7	16.7
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	<100	<100	<100	150	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride	ug/L												
pH	S.U.	8.10	6.70	6.80	6.50	6.50	6.40	6.50	6.40	6.30	6.30	6.40	7.00
Phenols	mg/L					.0300		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	787	695	625	724	644	684	742	713	774	700	729	570
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					12.0		19.0		13.0		11.0	
Trichloroethene	ug/L	<1	<1	<2	<1							<1	<1
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 1

Analytical Data Summary for MW-10

Constituents	10/23/2001	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007
1,1,1-Trichloroethane													
1,1-Dichloroethene					<2								
1,2-Dichloroethane	<.4				<.4								
1,2-Dichloropropane													
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	<.5				<.5								
Chemical Oxygen Demand	<5.0	5.7	6.9	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0	11.3	12.1	8.0
Chloride	18.6	17.9	17.8	23.0	23.6	24.0	26.2	28.1	28.7	26.2	25.1	28.8	31.1
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride													
pH	6.90	6.50	7.10	7.00	7.30	6.60	7.00	6.80	6.70	6.90	7.00	7.00	7.50
Phenols	<.0200	.0100	<.0200	<.0200		<.0200		<.0200		<.0434		<.0200	
Specific Conductance	740	463	645	753	550	693	532	575	1051	879	972	943	1062
Tetrachloroethene													
Total Organic Halogens	<10.0	5.0	12.0	<10.0		<10.0		<10.0		<10.0		<10.0	
Trichloroethene	<1				<1								
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 1

Analytical Data Summary for MW-10

Constituents	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014
1,1,1-Trichloroethane								<1			<1	<1	<1
1,1-Dichloroethene													
1,2-Dichloroethane								<1.0			<1.0	<1.0	<1.0
1,2-Dichloropropane								<1			<1	<1	<1
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene								<.5			<.5	<.5	<.5
Chemical Oxygen Demand	<5.0	11.4	10.4	<5.0	9.6	21.8	9.1	26.7	<5.0	43.2	12.2	62.1	6.7
Chloride	33.9	35.4	37.4	39.6	50.8	52.4	51.8	65.7	56.1	46.7	47.0	58.5	55.4
Chlorodibromomethane								<5			<5	<5	<5
cis-1,2-Dichloroethene								3.59			4.18	3.16	2.79
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride								<5			<5	<5	<5
pH	6.90	6.70	6.90	7.00	6.80	6.80	6.60	6.80	6.70	6.80	6.90	6.90	6.90
Phenols	<.0200		<.0180		<.0180		<.0180		<.0200		<.0200		<.0200
Specific Conductance	1199	1069	982	973	1045	1100	1014	1141	1075	1258	1166	1297	1248
Tetrachloroethene								<1			<1	<1	<1
Total Organic Halogens	11.9		<10.0		16.1		28.0		20.3		<30.0		<30.0
Trichloroethene								<1			<1	<1	<1
Vinyl Chloride								<1			<1	<1	<1
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 1

Analytical Data Summary for MW-10

Constituents	10/6/2014	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020
1,1,1-Trichloroethane	<1	<1	<1	<1	<1	<1	<1	<1	<1				
1,1-Dichloroethene													
1,2-Dichloroethane	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0				
1,2-Dichloropropane	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	15.8	12.5	18.9	24.6	41.8	<5.0	12.1	21.4	55.1	37.8	44.5	53.4	64.2
Chloride	69.7	81.8	80.2	101.0	179.0	112.0	85.4	102.0	140.0	372.0	196.0	295.0	269.0
Chlorodibromomethane	<5	<5	<5	<5	<5	<5	<5	<5	<5				
cis-1,2-Dichloroethene	1.06	3.37	2.49	<1.00	1.01	1.86	3.00	2.37	<1.00	<1.00	<1.00	5.16	2.39
Iron, Dissolved	<100	<100	<100	<100	<100	<500	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.90	6.90	6.80	7.00	6.50	6.72	6.78	5.74	6.80	6.84	6.67	6.73	7.04
Phenols		<.0188		<.0188		<.0192		<.0180		<.0200		<.0200	
Specific Conductance	1394	1374	1394	1241	1785	1325	1146	1200	1776	1890	1855	1861	2520
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens		<30.0		<30.0		52.4		50.0		64.2		<40.0	
Trichloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 1

Analytical Data Summary for MW-10

Constituents	4/26/2021	8/16/2021	6/1/2022	5/3/2023	10/11/2023	5/2/2024	10/29/2024
1,1,1-Trichloroethane			<1		<1	<1	<1
1,1-Dichloroethene							
1,2-Dichloroethane			<1.0		<1.0	<1.0	<1.0
1,2-Dichloropropane	<1	<1	<1	<1	<1	<1	<1
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	.294
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	66.8	28.6	36.2	26.6	40.9	14.6	29.1
Chloride	392.0	115.0	107.0	166.0	101.0	153.0	149.0
Chlorodibromomethane			<5		<5	<5	<5
cis-1,2-Dichloroethene	1.17	2.11	2.16	<1.00	<1.00	<1.00	<1.00
Iron, Dissolved	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5
pH	7.09	6.90	7.39	6.91	7.30		6.74
Phenols	<.0188		<.0200	<.0200		<.0220	
Specific Conductance	1999	1673	1472	1538	1394		1602
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens	76.0		41.0	45.0		185.0	
Trichloroethene	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride	<1	<1	<1	<1	<1	<1	<1
Water Temperature				12.4	11.1		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 2

Analytical Data Summary for MW-11

Constituents	Units	7/12/1996	10/10/1996	1/21/1997	4/17/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001
1,1,1-Trichloroethane	ug/L	<1.0	1.1	<1.0	<1.0								
1,1-Dichloroethene	ug/L	<1	<1	<2	<2								
1,2-Dichloroethane	ug/L	<1.0	<.4	<.4	<.4							<.4	<.4
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	ug/L	<1.0	<1.0	<.5	<.5							<.5	<.5
Chemical Oxygen Demand	mg/L	5.70	5.20	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chloride	mg/L	19.0	19.0	22.0	20.0	28.0	20.2	32.0	37.0	33.0	6.4	5.5	12.9
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	3600	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride	ug/L												
pH	S.U.	6.60	6.80	6.80	6.60	6.80	6.70	6.70	6.50	6.50	7.10	6.90	7.10
Phenols	mg/L					<.0200		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	465	622	515	537	543	625	667	707	736	737	740	428
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					<10.0		15.0		11.0		<10.0	
Trichloroethene	ug/L	<1	<1	<1	<1							<1	<1
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 2

Analytical Data Summary for MW-11

Constituents	10/23/2001	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007
1,1,1-Trichloroethane													
1,1-Dichloroethene					<2								
1,2-Dichloroethane	<.4				<.4								
1,2-Dichloropropane													
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	.27	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	<.5				<.5								
Chemical Oxygen Demand	<5.00	5.40	23.00	7.80	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	10.60	13.70	8.30
Chloride	16.0	18.0	18.8	12.3	15.8	23.4	44.9	56.3	50.5	38.2	14.0	16.0	23.9
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	274	<100	<100	3090
Methylene Chloride													
pH	7.20	6.30	7.30	7.20	7.50	6.80	7.10	7.10	7.20	7.10	7.20	7.20	7.40
Phenols	<.0200	<.0200	<.0200	<.0200		<.0200		<.0200		<.0200		<.0200	
Specific Conductance	733	784	684	735	832	615	1266	658	989	882	975	979	1030
Tetrachloroethene													
Total Organic Halogens	<10.0	<10.0	<10.0	<10.0		<10.0		<10.0		<10.0		<10.0	
Trichloroethene	<1				<1								
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 2

Analytical Data Summary for MW-11

Constituents	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014
1,1,1-Trichloroethane								<1.0					
1,1-Dichloroethene													
1,2-Dichloroethane								<1.0					
1,2-Dichloropropane								<1					
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene								<.5					
Chemical Oxygen Demand	10.60	11.10	<5.00	<5.00	<5.00	18.70	5.40	26.00	<5.00	<5.00	<5.00	14.40	<5.00
Chloride	67.9	67.1	64.9	61.3	61.6	46.1	59.9	61.9	72.4	29.3	17.6	57.6	64.2
Chlorodibromomethane								<5					
cis-1,2-Dichloroethene								<1					
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	679	139	<100	<100	<100
Methylene Chloride								<5					
pH	6.90	6.90	6.80	7.00	6.90	6.90	6.80	7.00	6.90	7.00	7.20	6.70	7.10
Phenols	<.0200		<.0200		<.0180		<.0200		<.0200		<.0192		<.0210
Specific Conductance	1170	992	1034	1052	1121	1071	1039	1003	1060	1187	1121	1193	1178
Tetrachloroethene								<1					
Total Organic Halogens	11.1		15.6		18.9		25.0		29.6		<30.0		<30.0
Trichloroethene								<1					
Vinyl Chloride								<1					
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 2

Analytical Data Summary for MW-11

Constituents	10/6/2014	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020
1,1,1-Trichloroethane													
1,1-Dichloroethene													
1,2-Dichloroethane													
1,2-Dichloropropane													
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene													
Chemical Oxygen Demand	9.00	8.67	7.94	6.47	6.74	<5.00	<5.00	13.30	7.82	16.60	<5.00	7.25	9.21
Chloride	45.1	78.7	84.3	61.1	78.5	102.0	91.8	89.3	75.1	81.0	69.2	72.0	84.1
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<500	<500	<500	<500	<500	<500	<500	1710
Methylene Chloride													
pH	7.20	7.10	7.00	7.00	7.00	6.85	6.91	6.85	6.88	6.84	6.91	6.64	7.17
Phenols		<.0180		<.0188		<.0200		<.0184		<.0200		<.0220	
Specific Conductance	1082	1215	1221	1218	1299	1234	1196	1175	1204	1296	1316	1416	1462
Tetrachloroethene													
Total Organic Halogens		<30.0		<30.0		41.9		<30.0		<30.0		<40.0	
Trichloroethene													
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 2

Analytical Data Summary for MW-11

Constituents	4/26/2021	8/16/2021	6/1/2022	10/3/2022	5/3/2023	10/11/2023	5/2/2024	10/29/2024
1,1,1-Trichloroethane								
1,1-Dichloroethene								
1,2-Dichloroethane								
1,2-Dichloropropane								
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene								
Chemical Oxygen Demand	15.10	8.90	7.59	6.54	8.40	9.48	6.24	52.20
Chloride	100.0	38.4	26.9	24.3	25.1	55.4	101.0	128.0
Chlorodibromomethane								
cis-1,2-Dichloroethene								
Iron, Dissolved	<500	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride								
pH	6.90	7.86	7.26	7.63	6.75	7.01	7.33	7.03
Phenols	<.0188		<.0200		<.0200		<.0200	
Specific Conductance	1553	1465	1245	1266	1259	1300	1274	1345
Tetrachloroethene								
Total Organic Halogens	22.0		<10.0		<10.0		172.0	
Trichloroethene								
Vinyl Chloride								
Water Temperature					13.5	11.2		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 3

Analytical Data Summary for MW-12

Constituents	Units	10/10/1996	1/21/1997	4/17/1997	7/15/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001
1,1,1-Trichloroethane	ug/L	1.8	2.1	<1.0	1.9								
1,1-Dichloroethene	ug/L	<1	<2	<2	<2	<2	<2	<2		<2	<2		
1,2-Dichloroethane	ug/L	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	<.200	<.200	<.200	<.200	<.200	<.200	.210	<.200	<.200	<.200	<.200	<.200
Benzene	ug/L	<1.000	2.100	2.200	2.100	2.400	2.700	3.100	3.300	3.000	3.000	3.500	2.800
Chemical Oxygen Demand	mg/L	7.00	11.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chloride	mg/L	5.40	6.40	7.50	6.80	6.60	8.10	7.40	9.60	8.30	6.40	7.90	8.00
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride	ug/L												
pH	S.U.	6.40	6.20	6.20	6.10	5.00	6.00	6.00	6.00	5.80	5.70	5.80	6.70
Phenols	mg/L					<.0200		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	1026	922	1010	1017	906	1044	1046	1102	1171	1087	1129	1223
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					83.0		23.0		64.0		55.0	
Trichloroethene	ug/L	2.80	5.50	4.90	4.70	4.70	4.80	5.40	5.60	4.80	5.30	5.40	4.70
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 3

Analytical Data Summary for MW-12

Constituents	10/23/2001	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007
1,1,1-Trichloroethane						<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
1,1-Dichloroethene		<2	<2		<2	<2	<2	<2	<2	<2	<2	<2	<2
1,2-Dichloroethane	<.40	<.40	<.40		<.40	1.33	<.40	<.40	<.40	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane													
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	4.300	3.600	3.590		2.880	<.500	2.740	2.300	1.760	1.220	1.110	1.330	1.690
Chemical Oxygen Demand	<5.00	8.50	22.00	13.00	<5.00	8.20	<5.00	<5.00	<5.00	<5.00	14.10	12.00	8.30
Chloride	16.20	17.40	27.00	43.10	81.10	60.40	50.10	21.50	21.40	9.88	14.50	10.70	23.90
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	300	1500	2290	650	816	3090
Methylene Chloride													
pH	6.40	6.20	6.70	6.70	6.80	6.30	6.60	6.40	6.60	6.70	6.70	7.20	6.60
Phenols	<.0200	<.0200	<.0200	<.0200		<.0200		<.0200		<.0200		<.0200	
Specific Conductance	1165	1040	1051	1319	671	1106	496	182	1571	1374	1369	1270	1451
Tetrachloroethene													
Total Organic Halogens	58.0	59.0	44.0	57.0		54.0		38.0		41.4		33.8	
Trichloroethene	5.60	4.60	5.35		3.93	6.57	4.05	3.60	4.19	2.95	1.88	1.36	1.76
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 3

Analytical Data Summary for MW-12

Constituents	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014
1,1,1-Trichloroethane	<1.0	<1.0	<1.0	<1.0	<4.0	<2.0	<1.0	<1.0	<2.0	<1.0	<1.0	<1.0	<1.0
1,1-Dichloroethene	<2	<2	<2	<2	<2	<2	<2		<2	<2			
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane								<1			<1	<1	<1
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	1.240	1.200	1.410	1.390	1.390	1.240	1.300	.920	.940	.920	1.050	1.200	1.330
Chemical Oxygen Demand	9.20	9.40	6.10	9.80	<5.00	6.70	6.80	11.00	<5.00	<5.00	9.90	<5.00	<5.00
Chloride	13.20	19.80	9.30	9.80	11.00	25.90	16.00	14.20	12.30	9.37	9.32	35.80	23.80
Chlorodibromomethane								<5			<5	<5	<5
cis-1,2-Dichloroethene								33.0			58.3	51.7	57.3
Iron, Dissolved	465	1610	2400	7220	5400	6230	5660	5300	4510	7640	5970	8850	10100
Methylene Chloride								<5			<5	<5	<5
pH	6.30	6.50	6.80	6.80	6.50	6.70	6.50	6.70	6.60	6.40	6.50	6.70	6.50
Phenols	<.0200		<.0180		<.0180		<.0200		<.0376		<.0198		<.0200
Specific Conductance	1571	1377	1326	1371	1357	1399	1184	1205	1199	1518	1476	1523	1512
Tetrachloroethene								<1			<1	<1	<1
Total Organic Halogens	37.3		35.2		44.6		43.2		40.2		40.8		44.4
Trichloroethene	1.33	1.33	1.31	2.32	2.68	1.93	2.40	2.29	2.04	2.60	3.03	2.44	2.46
Vinyl Chloride								1.46			2.51	2.15	2.70
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 3

Analytical Data Summary for MW-12

Constituents	10/6/2014	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020
1,1,1-Trichloroethane	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0				
1,1-Dichloroethene													
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00				
1,2-Dichloropropane	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	1.070	1.320	1.620	1.490	1.350	1.340	1.650	1.610	1.520	1.450	1.870	1.860	2.010
Chemical Oxygen Demand	9.40	11.80	8.28	12.40	14.50	<5.00	<5.00	8.20	19.30	<5.00	7.63	<5.00	10.20
Chloride	37.90	63.70	61.40	130.00	106.00	42.90	19.20	15.20	42.60	31.50	12.00	11.20	12.30
Chlorodibromomethane	<5	<5	<5	<5	<5	<5	<5	<5	<5				
cis-1,2-Dichloroethene	38.7	40.6	55.9	42.8	35.7	37.4	48.9	50.4	29.6	34.3	47.3	52.4	55.1
Iron, Dissolved	13500	19800	21700	15600	19200	13100	17100	22900	27900	20200	27400	24800	19400
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.60	6.50	6.40	6.60	6.90	6.46	6.42	6.42	6.44	6.30	6.46	6.43	6.75
Phenols		<.0180		<.0204		<.0196		<.0180		<.0196		<.0200	
Specific Conductance	1547	1601	1637	1786	1706	1375	1287	1304	1556	1399	1499	1386	1684
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens		64.8		50.5		46.2		41.9		37.4		<40.0	
Trichloroethene	1.88	1.77	2.37	<1.00	1.36	1.41	1.50	1.23	<1.00	1.18	<1.00	<1.00	1.54
Vinyl Chloride	2.36	2.03	2.59	2.73	4.56	3.29	5.18	4.48	9.14	8.96	6.50	4.90	5.41
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 3

Analytical Data Summary for MW-12

Constituents	4/26/2021	8/16/2021	6/1/2022	10/3/2022	5/3/2023	10/11/2023	5/2/2024	10/29/2024
1,1,1-Trichloroethane			<1.0	<1.0		<1.0	<1.0	<1.0
1,1-Dichloroethene								
1,2-Dichloroethane			<1.00	<1.00		<1.00	<1.00	<1.00
1,2-Dichloropropane	<1	<1	<1	<1	<1	<1	<1	<1
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	.564
Benzene	1.840	1.950	.784	1.460	1.270	1.160	1.190	.804
Chemical Oxygen Demand	16.20	11.40	5.93	6.19	15.50	20.30	7.24	19.10
Chloride	9.32	12.50	32.00	21.70	29.10	34.00	40.70	68.70
Chlorodibromomethane			<5	<5		<5	<5	<5
cis-1,2-Dichloroethene	49.0	64.7	31.0	35.2	31.9	31.3	32.5	18.3
Iron, Dissolved	27800	29900	25300	9460	10800	7290	6970	13800
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.69	6.54	6.64	6.49	6.57	6.54	6.62	6.45
Phenols	<.0188		<.0200		<.0220		<.0200	
Specific Conductance	1637	1754	1371	1494	1481	1422	1440	1348
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens	42.0		48.0		47.0		146.0	
Trichloroethene	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Vinyl Chloride	3.57	4.08	1.56	7.15	4.19	3.56	4.30	5.48
Water Temperature					15.0	13.3		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 4

Analytical Data Summary for MW-13

Constituents	Units	7/12/1996	10/10/1996	1/21/1997	4/17/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001
1,1,1-Trichloroethane	ug/L	<1	<1	<1	<1								
1,1-Dichloroethene	ug/L	<1	<1	<2	<2								
1,2-Dichloroethane	ug/L	<1.0	<.4	<.4	<.4							<.4	<.4
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	.2	<.2	<.2
Benzene	ug/L	<1.0	<1.0	<.5	<.5							<.5	<.5
Chemical Oxygen Demand	mg/L	63.00	<5.00	7.50	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	22.00	<5.00	6.30
Chloride	mg/L	12.0	13.0	14.0	18.0	18.0	15.6	18.0	17.0	18.0	17.5	19.9	15.1
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	900	3400	3600	<100	490	200	50	50	720	1050	<100	160
Methylene Chloride	ug/L												
pH	S.U.	6.50	6.80	6.80	6.60	6.40	6.50	6.60	6.40	6.10	6.20	5.80	6.80
Phenols	mg/L					<.0200		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	390	475	479	645	548	584	525	605	558	517	536	648
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					<10.0		<10.0		138.0		<10.0	
Trichloroethene	ug/L	<1	<1	<1	<1							<1	<1
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 4

Analytical Data Summary for MW-13

Constituents	10/23/2001	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007
1,1,1-Trichloroethane													
1,1-Dichloroethene				<2	<2								
1,2-Dichloroethane	<.4			<.4	<.4								
1,2-Dichloropropane													
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene	<.5			<.5	<.5								
Chemical Oxygen Demand	<5.00	8.20	8.40	10.00	<5.00	12.00	<5.00	<5.00	<5.00	6.30	13.10	9.70	<5.00
Chloride	16.7	16.6	16.5	24.8	19.7	19.3	18.4	11.6	19.0	18.8	18.2	17.5	20.1
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	710	850	<100	880	<100	<100	150	340	560	934	178	177
Methylene Chloride													
pH	7.10	6.70	7.30	7.00	7.50	6.60	7.20	7.00	7.10	7.30	7.10	7.50	7.00
Phenols	<.0200	<.0200	<.0200	<.0200		<.0200		<.0200		<.0200		<.0200	
Specific Conductance	530	423	499	930	646	792	346	608	764	641	687	668	868
Tetrachloroethene													
Total Organic Halogens	<10.0	<10.0	<10.0	23.0		<10.0		13.0		<10.0		<10.0	
Trichloroethene	<1			<1	<1								
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 4

Analytical Data Summary for MW-13

Constituents	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014
1,1,1-Trichloroethane								<1					
1,1-Dichloroethene													
1,2-Dichloroethane								<1.0					
1,2-Dichloropropane								<1					
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene								<.5					
Chemical Oxygen Demand	<5.00	5.50	8.80	<5.00	9.60	17.90	12.10	14.30	<5.00	<5.00	<5.00	15.40	<5.00
Chloride	20.0	19.3	18.1	19.9	73.3	51.8	43.1	27.5	15.4	18.3	28.5	60.7	21.6
Chlorodibromomethane								<5					
cis-1,2-Dichloroethene								5.56					
Iron, Dissolved	<100	278	106	717	<100	1840	1660	211	121	241	<100	172	153
Methylene Chloride								<5					
pH	7.00	7.20	6.80	7.02	6.90	6.60	6.60	6.80	6.80	7.05	6.70	6.90	7.10
Phenols	<.0200		<.0180		<.0200		<.0200		<.0180		<.0196		<.0200
Specific Conductance	804	1057	747	759	1205	1329	1115	1018	1084	806	1336	1421	847
Tetrachloroethene								<1					
Total Organic Halogens	<10.0		5.0		17.1		19.5		16.0		<30.0		<30.0
Trichloroethene								<1					
Vinyl Chloride								<1					
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 4

Analytical Data Summary for MW-13

Constituents	10/6/2014	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020
1,1,1-Trichloroethane													
1,1-Dichloroethene													
1,2-Dichloroethane													
1,2-Dichloropropane													
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene													
Chemical Oxygen Demand	8.30	10.10	7.94	15.30	10.60	5.23	6.51	17.20	18.60	32.50	60.20	26.70	8.56
Chloride	77.7	143.0	75.7	93.2	73.8	130.0	62.8	124.0	132.0	147.0	179.0	116.0	32.5
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<500	663	<500	<500	<500	1780	1370	<500
Methylene Chloride													
pH	6.80	6.80	6.76	6.87	6.89	6.65	6.62	6.77	6.70	6.66	6.62	7.10	7.54
Phenols		<.0180		<.0188		<.0200		<.0184		<.0192		<.0200	
Specific Conductance	1590	1583	1204	1195	1159	1341	1193	1332	1578	1590	1854	1680	990
Tetrachloroethene													
Total Organic Halogens		48.2		<30.0		55.9		69.2		72.7		54.1	
Trichloroethene													
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 4

Analytical Data Summary for MW-13

Constituents	4/26/2021	8/16/2021	6/1/2022	10/3/2022	5/3/2023	10/11/2023	5/8/2024	10/29/2024
1,1,1-Trichloroethane								
1,1-Dichloroethene								
1,2-Dichloroethane								
1,2-Dichloropropane								
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene								
Chemical Oxygen Demand	22.50	12.50	20.90	13.50	23.50	20.30	23.70	42.60
Chloride	85.2	33.1	24.7	21.7	73.0	33.1	60.5	38.4
Chlorodibromomethane								
cis-1,2-Dichloroethene								
Iron, Dissolved	<500	3430	1710	1740	1200	747	6370	<500
Methylene Chloride								
pH	6.90	7.41	7.02	7.14	6.93	6.87	6.63	6.84
Phenols	<.0200		<.0200		<.0200		<.0208	
Specific Conductance	1595	1209	938	917	1446	990	1550	1604
Tetrachloroethene								
Total Organic Halogens	31.0		11.0		77.0		<40.0	
Trichloroethene								
Vinyl Chloride								
Water Temperature					12.1	10.8		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 5

Analytical Data Summary for MW-14

Constituents	Units	7/12/1996	10/10/1996	1/21/1997	4/17/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001
1,1,1-Trichloroethane	ug/L	<1.00	4.20	3.30	<1.00								
1,1-Dichloroethene	ug/L	<1	<1	<2	<2	<2	<2	<2		<2	<2		
1,2-Dichloroethane	ug/L	<1.00	<.40	<.40	<.40	.41	<.40	.54	1.10	<.40	<.40	<.40	.40
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	ug/L	<1.000	<1.000	<.500	<.500	<.500	<.500	<.500	<.500	<.500	<.500	<.500	<.500
Chemical Oxygen Demand	mg/L	24.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chloride	mg/L	12.0	14.0	13.0	17.0	15.0	18.5	19.0	20.0	18.0	17.7	17.0	16.8
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	140
Methylene Chloride	ug/L												
pH	S.U.	6.60	6.70	6.50	6.30	6.50	6.50	6.40	6.10	6.10	6.00	6.30	7.00
Phenols	mg/L					<.0200		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	528	690	582	698	682	764	831	913	900	914	808	941
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					28.0		<10.0		52.0		22.0	
Trichloroethene	ug/L	3.10	<1.00	1.20	1.50	1.30	1.10	1.60	2.10	1.40	1.70	<1.00	1.10
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 5

Analytical Data Summary for MW-14

Constituents	10/23/2001	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007
1,1,1-Trichloroethane						<1.00	1.79	1.42	1.29	<1.00	1.13	1.24	1.04
1,1-Dichloroethene		<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2
1,2-Dichloroethane	.50	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane													
Ammonia as N	<.20	<.20	<.20	<.20	<.20	.22	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	<.500	<.500	<.500	<.500	<.500	2.690	<.500	<.500	<.500	<.500	<.500	<.500	<.500
Chemical Oxygen Demand	<5.00	<5.00	15.00	7.70	10.00	<5.00	6.00	5.30	<5.00	<5.00	12.00	<5.00	5.80
Chloride	22.6	27.9	23.1	30.9	24.8	43.4	80.6	53.3	43.6	38.1	38.4	39.9	43.9
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride													
pH	6.80	6.50	7.00	7.00	7.20	7.00	6.90	6.80	6.90	6.80	6.90	6.90	6.80
Phenols	<.0200	<.0200	<.0200		<.0200	<.0200		<.0200		<.0200		<.0200	
Specific Conductance	889	742	757	930	1050	930	419	286	1237	1055	1145	1146	1211
Tetrachloroethene													
Total Organic Halogens	41.0	38.0	25.0		23.0	30.0		48.0		39.1		44.4	
Trichloroethene	1.10	1.10	<1.00	<1.00	<1.00	4.25	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 5

Analytical Data Summary for MW-14

Constituents	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014
1,1,1-Trichloroethane	<1.00	<1.00	<1.00	<1.00	<4.00	<1.00	<1.00	<1.00	<2.00	<1.00	<1.00	<1.00	<1.00
1,1-Dichloroethene	<2	<2	<2	<2	<2	<2	<2		<2	<2			
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane								<1.00			<1.00	<1.00	<1.00
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	<.500	<.500	<.500	<1.000	<.500	.530	.620	.560	.610	<.500	<.500	<.500	<.500
Chemical Oxygen Demand	<5.00	10.00	10.00	<5.00	<5.00	<5.00	10.50	13.30	<5.00	7.70	<5.00	22.80	5.10
Chloride	45.1	40.5	37.3	44.7	43.6	53.6	49.7	35.0	33.5	29.4	16.4	66.1	62.3
Chlorodibromomethane								<5			<5	<5	<5
cis-1,2-Dichloroethene								49.8			19.2	52.0	42.2
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	102
Methylene Chloride								7.72			<5.00	7.93	7.85
pH	6.90	6.70	6.50	6.80	6.60	6.60	6.60	6.70	6.60	6.70	7.00	6.80	6.90
Phenols	<.0200		<.0180		<.0200		<.0180		<.0200		<.0200		<.0196
Specific Conductance	1397	1254	1282	1266	1246	1279	1179	1158	1177	1383	1184	1487	1403
Tetrachloroethene								<1			<1	<1	<1
Total Organic Halogens	53.2		69.8		67.2		88.1		87.8		<30.0		83.1
Trichloroethene	<1.00	<1.00	<1.00	1.10	<1.00	1.09	1.43	1.40	3.52	2.10	<1.00	1.75	1.14
Vinyl Chloride								<1			<1	<1	<1
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 5

Analytical Data Summary for MW-14

Constituents	10/6/2014	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020
1,1,1-Trichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00				
1,1-Dichloroethene													
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00				
1,2-Dichloropropane	<1.00	<1.00	<1.00	<1.00	<1.00	1.08	1.42	1.13	<1.00	<1.00	<1.00	<1.00	1.17
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	<.500	<.500	<.500	<.500	<.500	.644	.781	.592	<.500	.561	.627	.628	.713
Chemical Oxygen Demand	7.70	<5.00	11.30	6.47	5.69	<5.00	<5.00	6.60	<5.00	12.80	<5.00	6.24	<5.00
Chloride	61.6	78.8	62.0	26.4	38.1	59.0	53.2	48.2	20.5	36.5	30.5	41.6	50.2
Chlorodibromomethane	<5	<5	<5	<5	<5	<5	<5	<5	<5				
cis-1,2-Dichloroethene	34.7	27.3	34.7	11.3	29.1	49.6	69.2	59.8	21.4	45.3	54.4	63.6	73.2
Iron, Dissolved	<100	<100	<100	<100	<100	<500	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	6.97	<5.00	7.07	<5.00	10.20	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
pH	6.70	11.40	6.70	6.80	6.78	6.60	6.53	6.58	6.70	6.62	6.89	6.49	7.11
Phenols		<.0180		<.0196		<.0200		.0278		<.0188		<.0196	
Specific Conductance	1443	1431	1423	1314	1377	1272	1238	1227	1317	1328	1338	1541	1542
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens		77.7		<30.0		84.1		90.6		117.0		85.6	
Trichloroethene	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	1.13	<1.00	<1.00	<1.00	<1.00	<1.00
Vinyl Chloride	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 5

Analytical Data Summary for MW-14

Constituents	4/26/2021	8/16/2021	6/1/2022	5/3/2023	10/11/2023	5/2/2024	10/29/2024
1,1,1-Trichloroethane			<1.00		<1.00	<1.00	<1.00
1,1-Dichloroethene							
1,2-Dichloroethane			<1.00		<1.00	<1.00	<1.00
1,2-Dichloropropane	1.03	1.55	<1.00	<1.00	<1.00	<1.00	<1.00
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	.26
Benzene	<.500	<.500	<.500	<.500	<.500	.678	.531
Chemical Oxygen Demand	15.50	12.50	13.90	29.60	42.60	22.60	28.40
Chloride	51.0	50.3	50.0	58.8	109.0	129.0	130.0
Chlorodibromomethane			<5		<5	<5	<5
cis-1,2-Dichloroethene	56.1	74.3	33.3	36.6	41.6	49.3	39.0
Iron, Dissolved	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
pH	6.82	6.69	6.90	6.64	6.62	6.62	6.50
Phenols	<.0184		<.0200	<.0200		<.0200	
Specific Conductance	1570	1608	1382	1501	1600	1662	1606
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens	76.0		76.0	93.0		299.0	
Trichloroethene	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Vinyl Chloride	<1	<1	<1	<1	<1	<1	<1
Water Temperature				14.5	12.9		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 6

Analytical Data Summary for MW-16

Constituents	Units	4/20/2020	10/20/2020	4/26/2021	8/16/2021	6/1/2022	10/3/2022	5/3/2023	10/11/2023	5/8/2024	10/29/2024
1,1,1-Trichloroethane	ug/L					<1	<1		<1	<1	<1
1,2-Dichloroethane	ug/L					<1	<1		<1	<1	<1
1,2-Dichloropropane	ug/L	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Ammonia as N	mg/L	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene	ug/L	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	mg/L	<5.00	8.23	7.05	9.89	38.20	50.40	12.10	28.70	12.90	24.60
Chloride	mg/L	12.00	27.80	5.50	8.80	9.73	9.58	6.95	7.89	6.27	7.40
Chlorodibromomethane	ug/L					<5	<5		<5	<5	<5
cis-1,2-Dichloroethene	ug/L	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	8.66	<1.00
Iron, Dissolved	ug/L	<500	<500	<500	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	ug/L	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5
pH	S.U.	7.35	6.62	6.97	6.77	7.08	6.84	7.06	6.99	7.14	6.67
Phenols	mg/L	<.0196		<.0192		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	1524	1680	1436	1382	1103	1134	1319	1432	1335	1302
Tetrachloroethene	ug/L	<1.00	<1.00	<1.00	1.00	<1.00	<1.00	<1.00	<1.00	1.55	<1.00
Total Organic Halogens	ug/L	<40		<10		<10		<10		<40	
Trichloroethene	ug/L	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride	ug/L	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Water Temperature	Degrees C							11.4	10.4		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 7

Analytical Data Summary for MW-17

Constituents	Units	10/4/1997	11/10/1997	1/8/1998	4/22/1998	7/1/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001	10/23/2001
1,1,1-Trichloroethane	ug/L		<1.00	<1.00									
1,1-Dichloroethene	ug/L	<2	<2	<2	<2	<2	<2		<2	<2			
1,2-Dichloroethane	ug/L	<.4	<.4	<.4	<.4	<.4	<.4	<.4	<.4	<.4	<.4	<.4	<.4
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L		<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene	ug/L	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	mg/L		<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chloride	mg/L		<5.00	<5.00	<5.00	7.30	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L		<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride	ug/L												
pH	S.U.				7.00	7.00	6.80	6.80	6.80	7.00	5.10	7.50	7.50
Phenols	mg/L						<.0200		<.0200		<.0200		<.0200
Specific Conductance	umhos/cm				408	450	444	449	449	465	440	511	473
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L						<10.0		<10.0		<10.0		<10.0
Trichloroethene	ug/L	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 7

Analytical Data Summary for MW-17

Constituents	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007	4/7/2008
1,1,1-Trichloroethane				<1.00	1.44	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,1-Dichloroethene	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2
1,2-Dichloroethane	<.4	<.4	<.4	<.4	<.4	<.4	<.4	<.4	<1.0	<1.0	<1.0	<1.0	<1.0
1,2-Dichloropropane													
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	<5.00	11.00	7.50	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	8.40	10.60	<5.00	<5.00
Chloride	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride													
pH	6.90	7.40	7.30	7.60	6.90	7.20	7.20	7.40	7.20	7.40	7.20	7.20	7.10
Phenols	<.0200	<.0200	<.0200		<.0200		<.0200				<.0200		
Specific Conductance	427	417	299	572	525	861	131	699	632	620	638	663	729
Tetrachloroethene													
Total Organic Halogens	<10.0	<10.0	<10.0		<10.0		<10.0				<10.0		
Trichloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 7

Analytical Data Summary for MW-17

Constituents	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014	10/6/2014
1,1,1-Trichloroethane	<1.00	<1.00	<1.00	<4.00	<1.00	<1.00	<1.00	<2.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,1-Dichloroethene	<2	<2	<2	<2	<2	<2		<2	<2				
1,2-Dichloroethane	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
1,2-Dichloropropane							<1			<1	<1	<1	<1
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	14.30	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chloride	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<2.00	<5.00	1.65	1.66
Chlorodibromomethane							<5			<5	<5	<5	<5
cis-1,2-Dichloroethene							<1			<1	<1	<1	<1
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride							<5			<5	<5	<5	<5
pH	7.30	6.90	7.20	7.30	7.10	7.20	7.10	7.10	7.10	7.30	7.40	7.23	7.28
Phenols		<.0180		<.0180		<.0180		<.0200		<.0196		<.0188	
Specific Conductance	646	613	625	649	636	591	611	599	774	725	745	780	769
Tetrachloroethene							<1			<1	<1	<1	<1
Total Organic Halogens		<10.0		<10.0		<10.0		11.4		<30.0		<30.0	
Trichloroethene	<1	<1	<1	<1	<1	<1	<1	<2	<1	<1	<1	<1	<1
Vinyl Chloride							<1			<1	<1	<1	<1
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 7

Analytical Data Summary for MW-17

Constituents	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020	4/26/2021
1,1,1-Trichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00					
1,1-Dichloroethene													
1,2-Dichloroethane	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0					
1,2-Dichloropropane	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	<5.00	<5.00	<5.00	<5.00	<5.00	<25.00	<5.00	<5.00	5.36	<5.00	<5.00	5.30	7.40
Chloride	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	6.47	<5.00	<5.00	<5.00	<5.00	<5.00
Chlorodibromomethane	<5	<5	<5	<5	<5	<5	<5	<5					
cis-1,2-Dichloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Iron, Dissolved	<100	<100	<100	<100	<500	<500	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.90	7.21	7.08	7.00	7.29	7.14	7.07	6.73	7.05	7.06	7.33	7.59	7.69
Phenols	<.0184		<.0212		<.0180		<.0192		<.0200		<.0200		<.0184
Specific Conductance	777	800	777	845	752	644	733	1115	806	856	908	860	1025
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens	<30.0		<30.0		<30.0		<30.0		<30.0		<40.0		<10.0
Trichloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 7

Analytical Data Summary for MW-17

Constituents	8/16/2021	6/1/2022	10/3/2022	5/3/2023	10/11/2023	5/8/2024	10/29/2024
1,1,1-Trichloroethane		<1.00	<1.00		<1.00	<1.00	<1.00
1,1-Dichloroethene							
1,2-Dichloroethane	<1.0	<1.0	<1.0		<1.0	<1.0	<1.0
1,2-Dichloropropane	<1	<1	<1	<1	<1	<1	<1
Ammonia as N	<.2	<.2	<.2	<.2	<.2	<.2	<.2
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	5.73	21.20	<5.00	10.80	7.45	<5.00	11.90
Chloride	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chlorodibromomethane		<5	<5		<5	<5	<5
cis-1,2-Dichloroethene	<1	<1	<1	<1	<1	<1	<1
Iron, Dissolved	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5
pH	7.39	7.05	7.51	6.47	7.45	7.89	7.14
Phenols		<.0200		<.0200		<.0200	
Specific Conductance	1058	1059	852	1326	827	864	824
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens		<10.0		<10.0		<40.0	
Trichloroethene	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride	<1	<1	<1	<1	<1	<1	<1
Water Temperature				11.7	10.3		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 8

Analytical Data Summary for MW-7

Constituents	Units	7/12/1996	10/10/1996	1/21/1997	4/17/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001
1,1,1-Trichloroethane	ug/L	<1	<1	<1	<1								
1,1-Dichloroethene	ug/L	<1	<1	<2	<2	<2	<2	<2		<2	<2		
1,2-Dichloroethane	ug/L	10.60	16.60	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	ug/L	<1.000	<1.000	<.500	<.500	.750	.740	.810	.800	<.500	.800	<.500	.600
Chemical Oxygen Demand	mg/L	42.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00
Chloride	mg/L	<5.00	<5.00	<5.00	<5.00	<5.00	6.90	6.60	6.70	5.90	6.40	5.50	5.90
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	<100	<100	<100	<100	120	<100	<100	<100	<100	130	<100	200
Methylene Chloride	ug/L												
pH	S.U.	6.10	6.50	6.50	6.00	6.20	6.10	6.20	6.10	5.90	5.60	6.00	6.70
Phenols	mg/L					<.0200		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	738	870	840	919	904	1001	1050	1094	1127	1041	1002	1147
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					95.0		51.0		104.0		67.0	
Trichloroethene	ug/L	4.70	5.10	6.60	12.20	9.80	10.90	8.20	12.50	8.20	8.40	6.40	8.40
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 8

Analytical Data Summary for MW-7

Constituents	10/23/2001	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007
1,1,1-Trichloroethane						<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2
1,2-Dichloroethane	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<.40	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane													
Ammonia as N	<.20	<.20	<.20	<.20	.23	.21	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	1.000	.500	<.500	<.500	.560	.600	.660	<.500	<.500	<.500	.540	.830	1.110
Chemical Oxygen Demand	<5.00	7.30	9.30	7.30	<5.00	8.90	<5.00	5.40	<5.00	5.50	11.70	12.20	7.40
Chloride	7.50	7.50	6.20	6.10	8.20	8.80	7.90	5.70	5.30	5.90	7.34	7.96	7.25
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride													
pH	6.70	6.30	6.50	6.70	7.10		6.50	6.40	6.70	6.70	6.90	6.80	6.60
Phenols	<.0200	<.0200	<.0200	<.0200		<.0200		<.0200		<.0200		<.0200	
Specific Conductance	1102	784	1232	1127	910		1495	1765	1443	1283	1414	1448	1548
Tetrachloroethene													
Total Organic Halogens	83.0	86.0	93.0	73.0		85.0		44.0		63.8		107.0	
Trichloroethene	10.70	12.00	13.40	10.40	10.70	11.00	7.40	3.60	2.94	5.97	7.26	11.00	13.40
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 8

Analytical Data Summary for MW-7

Constituents	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014
1,1,1-Trichloroethane	<1	<1	<1	<1	<4	<2	<1	<1	<2	<1	<1	<1	<1
1,1-Dichloroethene	<2	<2	<2	<2	<2	<2	<2		<2	<2			
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane								7.44			10.10	10.60	10.80
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20
Benzene	.724	1.010	.680	1.420	2.040	2.050	2.160	1.760	2.660	1.660	2.170	1.230	.549
Chemical Oxygen Demand	<5.00	<5.00	15.30	<5.00	<5.00	13.70	7.10	12.30	<5.00	8.00	8.50	<5.00	<5.00
Chloride	6.54	5.18	5.98	5.95	6.79	5.97	5.54	<5.00	<5.00	6.00	5.31	5.73	6.42
Chlorodibromomethane								<5			<5	<5	<5
cis-1,2-Dichloroethene								88.0			159.0	145.0	132.0
Iron, Dissolved	<100	<100	<100	190	<100	<100	145	175	229	348	<100	<100	441
Methylene Chloride								<5			<5	<5	<5
pH	6.80	6.60	7.10	6.70	6.70	6.60	6.60	6.60	6.70	6.70	6.60	6.70	6.80
Phenols	<.0200		<.0200		<.0200		<.0200		<.0200		<.0198		<.0188
Specific Conductance	1664	1430	1452	1384	1540	1418	1336	1300	1258	1623	1579	1553	1546
Tetrachloroethene								10.30			10.60	4.45	<1.00
Total Organic Halogens	87.1		111.0		180.0		162.0		<100.0		128.0		104.0
Trichloroethene	11.20	12.80	11.40	37.50	27.20	16.90	28.90	15.40	27.40	24.00	12.70	9.17	9.48
Vinyl Chloride								<1.00			<1.00	1.45	<1.00
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 8

Analytical Data Summary for MW-7

Constituents	10/6/2014	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020
1,1,1-Trichloroethane	<1	<1	<1	<1	<1	<1	<1	<1	<1				
1,1-Dichloroethene													
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00				
1,2-Dichloropropane	8.45	9.46	11.20	8.86	3.19	6.16	9.31	9.81	8.62	5.10	7.25	10.00	9.41
Ammonia as N	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20	<.20				
Benzene	.913	.694	.721	.674	<.500	.662	1.220	.958	.896	.580	.655	.813	.949
Chemical Oxygen Demand	<5.00	<5.00	5.29	7.58	<5.00	<5.00	<5.00	6.92	9.21				
Chloride	8.57	8.10	9.03	16.70	15.20	7.08	5.11	5.95	<5.00				
Chlorodibromomethane	<5	<5	<5	<5	<5	<5	<5	<5	<5				
cis-1,2-Dichloroethene	138.0	159.0	160.0	128.0	46.3	112.0	158.0	152.0	113.0	66.3	117.0	193.0	198.0
Iron, Dissolved	<100	102	<100	<100	<100	1250	<500	<500	<500				
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.60	6.70	6.60	6.60	6.80	6.52	6.56	6.20	6.45	6.74	6.56	6.76	6.92
Phenols		<.0188		<.0188		<.0184		<.0212					
Specific Conductance	1574	1531	1584	1482	1301	1306	1265	1290	1450	1394	1512	1752	1647
Tetrachloroethene	9.50	1.62	7.31	4.25	3.22	3.87	3.75	3.15	2.12	2.85	1.23	1.90	<1.00
Total Organic Halogens		151.0		122.0		108.0		139.0					
Trichloroethene	6.83	16.40	7.02	11.70	3.16	6.44	9.98	11.10	10.30	5.36	6.71	20.40	17.30
Vinyl Chloride	1.56	1.26	1.24	1.58	<1.00	1.15	1.81	1.87	1.98	<1.00	1.45	3.15	3.48
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 8

Analytical Data Summary for MW-7

Constituents	4/26/2021	8/16/2021	6/1/2022	10/3/2022	5/3/2023	10/11/2023	5/8/2024	10/29/2024
1,1,1-Trichloroethane			<1	<1		<1	<1	<1
1,1-Dichloroethene								
1,2-Dichloroethane			<1.00	<1.00		1.29	1.85	<1.00
1,2-Dichloropropane	7.34	13.50	10.60	11.80	12.50	12.90	12.50	5.70
Ammonia as N								
Benzene	<.500	.783	<.500	<.500	.716	.878	.879	.759
Chemical Oxygen Demand								
Chloride								
Chlorodibromomethane			<5	<5		<5	<5	<5
cis-1,2-Dichloroethene	112.0	240.0	147.0	168.0	174.0	203.0	216.0	131.0
Iron, Dissolved								
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.77	6.67	6.65	6.65	6.66	7.36	7.07	6.68
Phenols								
Specific Conductance	1657	1825	1626	1676	1713	1647	1686	1435
Tetrachloroethene	1.66	5.30	2.89	2.69	2.67	1.75	1.61	<1.00
Total Organic Halogens								
Trichloroethene	10.00	12.30	7.03	6.27	7.50	9.37	15.00	7.81
Vinyl Chloride	1.02	2.84	1.47	1.38	3.11	4.28	5.77	9.39
Water Temperature					12.9	12.0		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 9

Analytical Data Summary for MW-8

Constituents	Units	10/10/1996	1/21/1997	4/17/1997	7/15/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	4/12/2000	10/17/2000	4/25/2001
1,1,1-Trichloroethane	ug/L	<1	<1	<1	<1								
1,1-Dichloroethene	ug/L	14.2	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0		<2.0	<2.0		
1,2-Dichloroethane	ug/L	3.00	2.80	<.40	2.80	2.80	3.30	2.60	3.40	2.30	3.00	2.10	2.70
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	ug/L	2.800	2.200	<.500	1.200	1.530	1.100	1.300	1.300	1.000	.720	.950	<.500
Chemical Oxygen Demand	mg/L	<5.00	7.90	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	5.00	<5.00	<5.00
Chloride	mg/L	12.00	12.00	13.00	15.00	11.00	11.00	12.00	12.00	10.00	8.40	6.20	9.40
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	<100	130	<100	<100	180	<100	<100	<100	330	190	<100	<100
Methylene Chloride	ug/L												
pH	S.U.	6.60	6.40	6.20	6.30	6.20	6.30	6.20	6.10	5.90	5.80	6.20	6.80
Phenols	mg/L					.0220		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	923	823	896	929	888	945	1003	1050	1092	970	942	1034
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					114.0		56.0		112.0		103.0	
Trichloroethene	ug/L	21.40	20.80	18.60	17.10	15.60	16.40	16.10	14.10	11.80	9.80	9.80	7.80
Vinyl Chloride	ug/L												
Water Temperature	Degrees C												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 9

Analytical Data Summary for MW-8

Constituents	10/23/2001	4/28/2002	10/6/2002	4/3/2003	10/7/2003	4/30/2004	10/12/2004	4/26/2005	10/11/2005	4/26/2006	10/5/2006	4/23/2007	10/9/2007
1,1,1-Trichloroethane						<1	<1	<1	<1	<1	<1	<1	<1
1,1-Dichloroethene		<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0
1,2-Dichloroethane	2.30	1.90	1.61	<.40	1.55	1.39	1.21	1.30	1.97	1.93	1.83	1.67	1.86
1,2-Dichloropropane													
Ammonia as N	<.200	<.200	<.200	<.200	<.200	.210	<.200	<.200	<.200	<.200	<.200	.275	<.200
Benzene	<.500	<.500	<.500	.800	<.500	<.500	<.500	<.500	.550	1.080	.940	<.500	1.240
Chemical Oxygen Demand	<5.00	5.60	11.00	<5.00	8.20	<5.00	<5.00	6.60	5.20	<5.00	10.50	15.20	<5.00
Chloride	21.60	55.40	26.70	14.20	21.60	14.30	22.80	36.00	37.20	23.90	23.00	24.10	30.20
Chlorodibromomethane													
cis-1,2-Dichloroethene													
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride													
pH	6.80	6.50	7.00	6.80	7.10	6.50	6.80	6.70	6.80	6.70	6.90	6.60	6.90
Phenols	<.0200	<.0200	<.0200	<.0200		<.0200		<.0200		<.0200		<.0200	
Specific Conductance	538	984	895	1060	1115	832	563	90	1529	1337	1351	1258	1402
Tetrachloroethene													
Total Organic Halogens	75.0	77.0	72.0	74.0		26.0		71.0		97.3		83.8	
Trichloroethene	7.30	6.40	7.00	9.50	5.02	5.97	4.06	3.61	3.29	1.46	2.61	1.73	2.47
Vinyl Chloride													
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 9

Analytical Data Summary for MW-8

Constituents	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	4/23/2012	10/23/2012	4/16/2013	10/28/2013	4/24/2014
1,1,1-Trichloroethane	<1	<1	<1	<1	<4	<2	<1	<1	<2	<1	<1	<1	<1
1,1-Dichloroethene	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0	<2.0		<2.0	<2.0			
1,2-Dichloroethane	1.48	1.35	1.24	1.34	1.05	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane								1.46			1.62	1.44	1.35
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	1.610	1.460	.560	.860	<.500	<.500	1.090	1.040	.840	.710	<.500	<.500	<.500
Chemical Oxygen Demand	9.50	9.00	9.00	<5.00	6.50	6.70	9.50	19.50	<5.00	7.40	6.20	<5.00	<5.00
Chloride	34.00	32.50	23.30	20.50	14.50	16.90	19.60	16.00	13.50	12.30	11.90	9.86	12.50
Chlorodibromomethane								<5			<5	<5	<5
cis-1,2-Dichloroethene								104.00			85.70	53.80	69.30
Iron, Dissolved	<100	<100	<100	886	928	716	1480	1760	9770	1720	710	295	351
Methylene Chloride								<5			<5	<5	<5
pH	7.00	6.50	6.60	6.60	6.40	6.60	6.60	6.60	6.50	6.60	6.80	6.80	6.80
Phenols	<.0200		<.0180		<.0180		<.0200		<.0200		<.0196		<.0200
Specific Conductance	1574	1366	1331	1271	1312	1321	1215	1269	1223	1427	1419	1362	1345
Tetrachloroethene								<1			<1	<1	<1
Total Organic Halogens	90.1		91.4		85.3		109.0		71.5		67.6		53.9
Trichloroethene	1.91	2.13	1.91	2.16	1.08	1.12	1.17	1.07	<2.00	1.59	1.87	<1.00	<1.00
Vinyl Chloride								3.73			1.90	<1.00	<1.00
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 9

Analytical Data Summary for MW-8

Constituents	10/6/2014	4/21/2015	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	5/28/2020
1,1,1-Trichloroethane	<1	<1	<1	<1	<1	<1	<1	<1	<1				
1,1-Dichloroethene													
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00				
1,2-Dichloropropane	1.17	1.27	1.30	<1.00	<1.00	1.32	1.65	1.43	1.27	1.21	1.57	<1.00	1.43
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	
Benzene	<.500	<.500	<.500	<.500	.801	.794	.701	<.500	<.500	.632	.858	<.500	<.500
Chemical Oxygen Demand	<5.00	<5.00	<5.00	8.32	11.00	5.36	<5.00	7.24	10.30	<5.00	<5.00	5.24	
Chloride	11.50	13.90	10.50	18.70	35.80	29.60	20.80	16.40	35.60	30.30	26.30	21.70	
Chlorodibromomethane	<5	<5	<5	<5	<5	<5	<5	<5	<5				
cis-1,2-Dichloroethene	54.30	72.00	84.50	60.40	84.70	91.90	100.00	80.80	82.60	75.70	85.80	1.21	57.10
Iron, Dissolved	<100	265	144	415	1050	<500	<500	613	554	611	560	782	
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.60	6.70	6.70	6.70	6.60	6.55	6.58	6.51	6.63	6.54	6.55	6.84	
Phenols		<.0188		<.0196		<.0188		<.0188		<.0192		<.0200	
Specific Conductance	1339	1389	1380	1442	1585	1326	1245	1232	1473	1507	1564	1622	
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens		72.9		70.5		105.0		82.0		76.5		<40.0	
Trichloroethene	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
Vinyl Chloride	<1.00	<1.00	<1.00	1.06	2.86	3.73	3.83	2.74	2.18	5.33	7.13	<1.00	1.73
Water Temperature													

* - The displayed value is the arithmetic mean of multiple database matches.

Table 9

Analytical Data Summary for MW-8

Constituents	10/20/2020	4/26/2021	8/16/2021	6/1/2022	10/3/2022	5/3/2023	10/11/2023	5/8/2024	10/29/2024
1,1,1-Trichloroethane				<1	<1		<1	<1	<1
1,1-Dichloroethene									
1,2-Dichloroethane				<1.00	<1.00		<1.00	<1.00	<1.00
1,2-Dichloropropane	1.29	1.26	1.52	1.21	1.01	1.16	<1.00	<1.00	<1.00
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	<.500	<.500	<.500	<.500	<.500	<.500	<.500	<.500	<.500
Chemical Oxygen Demand	8.23	<5.00	<5.00	<5.00	5.49	16.50	14.20	<5.00	13.20
Chloride	21.70	16.30	15.60	13.10	12.80	12.90	12.70	12.30	16.50
Chlorodibromomethane				<5	<5		<5	<5	<5
cis-1,2-Dichloroethene	76.40	61.20	85.90	59.40	50.20	53.80	45.70	57.10	14.80
Iron, Dissolved	<500	531	<500	<500	<500	<500	<500	<500	<500
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5	<5	<5
pH	6.78	6.87	6.69	7.01	7.04	6.95	7.27	7.00	7.25
Phenols		<.0192		<.0200		<.0200		<.0200	
Specific Conductance	1557	1618	1834	1466	1456	1390	1393	1290	1248
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1
Total Organic Halogens		53.0		46.0		65.0		157.0	
Trichloroethene	<1.00	<1.00	<1.00	<1.00	<1.00	1.13	<1.00	<1.00	<1.00
Vinyl Chloride	3.25	2.16	2.40	2.72	1.62	2.16	1.03	1.51	<1.00
Water Temperature						12.8	11.8		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 10

Analytical Data Summary for MW-9

Constituents	Units	10/10/1996	1/21/1997	4/17/1997	7/15/1997	10/4/1997	4/22/1998	10/19/1998	4/30/1999	9/1/1999	10/12/2004	4/26/2005	10/11/2005
1,1,1-Trichloroethane	ug/L	<1	<1	<1	<1						<1	<1	<1
1,1-Dichloroethene	ug/L	<1	<2	<2	<2	<2	<2	<2		<2	<2	<2	<2
1,2-Dichloroethane	ug/L	.55	<.40	<.40	<.40	.54	<.40	.40	.47	<.40	<.40	<.40	<.40
1,2-Dichloropropane	ug/L												
Ammonia as N	mg/L	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	.310	<.200	<.200
Benzene	ug/L	<1.0	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	mg/L	<5.00	6.20	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	<5.00	6.20	<5.00
Chloride	mg/L	8.70	10.00	11.00	12.00	11.00	11.30	11.00	9.70	10.00	8.90	7.90	8.40
Chlorodibromomethane	ug/L												
cis-1,2-Dichloroethene	ug/L												
Iron, Dissolved	ug/L	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100
Methylene Chloride	ug/L												
pH	S.U.	6.50	6.50	6.00	6.30	6.30	6.30	6.30	6.10	6.10	6.90	6.50	7.00
Phenols	mg/L					.0210		<.0200		<.0200		<.0200	
Specific Conductance	umhos/cm	895	787	882	922	887	900	956	992	992	527	146	1128
Tetrachloroethene	ug/L												
Total Organic Halogens	ug/L					18.0		<10.0		27.0		<10.0	
Trichloroethene	ug/L	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride	ug/L												

* - The displayed value is the arithmetic mean of multiple database matches.

Table 10

Analytical Data Summary for MW-9

Constituents	4/26/2006	10/5/2006	4/23/2007	10/9/2007	4/7/2008	10/14/2008	4/7/2009	10/5/2009	4/1/2010	10/1/2010	4/7/2011	10/27/2011	10/28/2013	10/6/2014
1,1,1-Trichloroethane	<1	<1	<1	<1	<1	<1	<1	<1	<4	<2	<1	<1	<1	<1
1,1-Dichloroethene	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2	<2			
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00
1,2-Dichloropropane												<1	<1	<1
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5	<.5
Chemical Oxygen Demand	<5.00	7.70	9.90	<5.00	<5.00	8.20	<5.00	<5.00	<5.00	<5.00	<5.00	7.10	8.90	<5.00
Chloride	8.07	8.80	8.24	8.02	9.70	10.60	11.30	11.80	11.80	12.50	12.60	14.30	12.00	12.90
Chlorodibromomethane												<5	<5	<5
cis-1,2-Dichloroethene												2.70	<1.00	<1.00
Iron, Dissolved	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	<100	310	<100
Methylene Chloride												<5	<5	<5
pH	6.70	6.80	6.80	6.80	6.80	6.90	6.90	6.90	6.80	6.80	6.70	6.90	7.00	6.92
Phenols	<.0200		<.0200		<.0200		<.0200		<.0180		<.0180			
Specific Conductance	1054	1058	1069	1056	1259	1022	1037	992	1215	1066	914	928	1157	1153
Tetrachloroethene												<1	<1	<1
Total Organic Halogens	<20.0		12.0		14.5		10.6		14.2		16.9			
Trichloroethene	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1	<1
Vinyl Chloride												<1	<1	<1

* - The displayed value is the arithmetic mean of multiple database matches.

Table 10

Analytical Data Summary for MW-9

Constituents	10/5/2015	4/26/2016	10/5/2016	4/4/2017	10/10/2017	4/11/2018	10/30/2018	4/1/2019	10/8/2019	4/20/2020	10/20/2020	4/26/2021	8/16/2021
1,1,1-Trichloroethane	<1	<1	<1	<1	<1	<1	<1						
1,1-Dichloroethene													
1,2-Dichloroethane	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00	<1.00						
1,2-Dichloropropane	<1	<1	<1	<1	<1	<1	<1						
Ammonia as N	<.200	<.200	<.200	<.200	<.200	<.200	.201	<.200	<.200	<.200	<.200	<.200	<.200
Benzene	<.5	<.5	<.5	<.5	<.5	<.5	<.5						
Chemical Oxygen Demand	5.29	77.80	6.04	<5.00	17.70	19.10	22.40	55.10	22.30	19.60	15.40	19.40	171.00
Chloride	13.90	96.90	29.30	33.60	34.30	39.30	31.10	43.30	55.90	40.60	50.10	27.70	34.00
Chlorodibromomethane	<5	<5	<5	<5	<5	<5	<5						
cis-1,2-Dichloroethene	<1.00	1.69	<1.00	1.09	<1.00	<1.00	1.99						
Iron, Dissolved	<100	12400	409	<500	<500	<500	864	5630	<500	<500	737	<500	847
Methylene Chloride	<5	<5	<5	<5	<5	<5	<5						
pH	6.80	6.80	6.90	7.03	6.80	6.84	6.64	6.77	6.92	7.21	7.63	7.04	7.04
Phenols		<.0180		<.0192		<.0180		<.0200		<.0196		<.0188	
Specific Conductance	1198	1462	1206	1009	911	1011	1283	1280	1291	1457	1381	1635	1674
Tetrachloroethene	<1	<1	<1	<1	<1	<1	<1						
Total Organic Halogens		<30.0		<30.0		<30.0		<30.0		<40.0		13.0	
Trichloroethene	<1	<1	<1	<1	<1	<1	<1						
Vinyl Chloride	<1	<1	<1	<1	<1	<1	<1						

* - The displayed value is the arithmetic mean of multiple database matches.

Table 10

Analytical Data Summary for MW-9

Constituents	5/8/2024	10/29/2024
1,1,1-Trichloroethane		
1,1-Dichloroethene		
1,2-Dichloroethane		
1,2-Dichloropropane		
Ammonia as N	<.200	.437
Benzene		
Chemical Oxygen Demand	17.50	70.10
Chloride	11.60	31.70
Chlorodibromomethane		
cis-1,2-Dichloroethene		
Iron, Dissolved	<500	<500
Methylene Chloride		
pH	7.06	7.62
Phenols	<.0204	
Specific Conductance	1287	1146
Tetrachloroethene		
Total Organic Halogens	75.6	
Trichloroethene		
Vinyl Chloride		

* - The displayed value is the arithmetic mean of multiple database matches.

Table 10 – Historic SSI and SSL

Table 10
Historic SSI & SSL
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-7	1,2-dichloroethane	4/11/2018	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	10/30/2018	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	4/1/2019	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	10/8/2019	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	4/20/2020	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	10/20/2020	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	4/26/2021	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	8/16/2021	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	6/1/2022	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	10/3/2022	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	5/3/2023	<1.0	0.500	0.500	5
MW-7	1,2-dichloroethane	10/11/2023	1.29	0.233	1.162	5
MW-7	1,2-dichloroethane	5/8/2024	1.85	0.260	1.810	5
MW-7	1,2-dichloroethane	10/29/2024	<1.0	0.260	1.810	5
MW-7	1,2-dichloropropane	4/11/2018	**9.81**	---	---	5
MW-7	1,2-dichloropropane	10/30/2018	**8.62**	---	---	5
MW-7	1,2-dichloropropane	4/1/2019	**5.10**	---	---	5
MW-7	1,2-dichloropropane	10/8/2019	**7.25**	5.944	9.446	5
MW-7	1,2-dichloropropane	4/20/2020	**10.00**	5.933	9.552	5
MW-7	1,2-dichloropropane	10/20/2020	**9.41**	6.007	9.873	5
MW-7	1,2-dichloropropane	4/26/2021	**7.34**	7.277	9.723	5
MW-7	1,2-dichloropropane	8/16/2021	**13.50**	7.846	12.279	5
MW-7	1,2-dichloropropane	6/1/2022	**10.60**	7.985	12.440	5
MW-7	1,2-dichloropropane	10/3/2022	**11.80**	8.557	13.063	5
MW-7	1,2-dichloropropane	5/3/2023	**12.50**	10.666	13.534	5
MW-7	1,2-dichloropropane	10/11/2023	**12.90**	10.764	13.136	5
MW-7	1,2-dichloropropane	5/8/2024	**12.50**	11.887	12.963	5
MW-7	1,2-dichloropropane	10/29/2024	**5.70**	6.816	14.984	5

Table 10
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Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-7	benzene	4/11/2018	0.958	---	---	5
MW-7	benzene	10/30/2018	0.896	---	---	5
MW-7	benzene	4/1/2019	0.580	---	---	5
MW-7	benzene	10/8/2019	0.655	0.614	0.931	5
MW-7	benzene	4/20/2020	0.813	0.611	0.861	5
MW-7	benzene	10/20/2020	0.949	0.607	0.892	5
MW-7	benzene	4/26/2021	<0.500	0.405	0.929	5
MW-7	benzene	8/16/2021	0.783	0.432	0.965	5
MW-7	benzene	6/1/2022	<0.500	0.244	0.872	5
MW-7	benzene	10/3/2022	<0.500	0.152	0.614	5
MW-7	benzene	5/3/2023	0.716	0.159	0.840	5
MW-7	benzene	10/11/2023	0.878	0.144	0.903	5
MW-7	benzene	5/8/2024	0.879	0.331	1.030	5
MW-7	benzene	10/29/2024	0.759	0.710	0.906	5
MW-7	cis-1,2-dichloroethylene	4/11/2018	**152.00**	---	---	70
MW-7	cis-1,2-dichloroethylene	10/30/2018	**113.00**	---	---	70
MW-7	cis-1,2-dichloroethylene	4/1/2019	66.30	---	---	70
MW-7	cis-1,2-dichloroethylene	10/8/2019	**117.00**	81.602	142.548	70
MW-7	cis-1,2-dichloroethylene	4/20/2020	**193.00**	76.913	167.737	70
MW-7	cis-1,2-dichloroethylene	10/20/2020	**198.00**	88.615	198.535	70
MW-7	cis-1,2-dichloroethylene	4/26/2021	**112.00**	114.423	195.577	70
MW-7	cis-1,2-dichloroethylene	8/16/2021	**240.00**	139.423	232.077	70
MW-7	cis-1,2-dichloroethylene	6/1/2022	**147.00**	125.504	222.996	70
MW-7	cis-1,2-dichloroethylene	10/3/2022	**168.00**	119.967	213.533	70
MW-7	cis-1,2-dichloroethylene	5/3/2023	**174.00**	134.960	229.540	70
MW-7	cis-1,2-dichloroethylene	10/11/2023	**203.00**	145.818	200.182	70
MW-7	cis-1,2-dichloroethylene	5/8/2024	**216.00**	163.215	217.285	70
MW-7	cis-1,2-dichloroethylene	10/29/2024	**131.00**	136.684	225.316	70

Table 10
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Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-7	PCE	4/11/2018	3.15	---	---	5
MW-7	PCE	10/30/2018	2.12	---	---	5
MW-7	PCE	4/1/2019	2.85	---	---	5
MW-7	PCE	10/8/2019	1.23	1.596	3.079	5
MW-7	PCE	4/20/2020	1.90	1.447	2.603	5
MW-7	PCE	10/20/2020	<1.0	0.754	2.486	5
MW-7	PCE	4/26/2021	1.66	0.790	1.855	5
MW-7	PCE	8/16/2021	**5.30**	0.551	4.129	5
MW-7	PCE	6/1/2022	2.89	0.808	4.367	5
MW-7	PCE	10/3/2022	2.69	1.801	4.469	5
MW-7	PCE	5/3/2023	2.67	1.883	4.892	5
MW-7	PCE	10/11/2023	1.75	1.900	3.100	5
MW-7	PCE	5/8/2024	1.61	1.497	2.863	5
MW-7	PCE	10/29/2024	<1.0	0.586	2.679	5
MW-7	TCE	4/11/2018	**11.10**	---	---	5
MW-7	TCE	10/30/2018	**10.30**	---	---	5
MW-7	TCE	4/1/2019	**5.36**	---	---	5
MW-7	TCE	10/8/2019	**6.71**	5.970	10.765	5
MW-7	TCE	4/20/2020	**20.40**	4.804	16.581	5
MW-7	TCE	10/20/2020	**17.30**	5.924	18.961	5
MW-7	TCE	4/26/2021	**10.00**	8.117	19.088	5
MW-7	TCE	8/16/2021	**12.30**	10.915	19.085	5
MW-7	TCE	6/1/2022	**7.03**	7.902	15.413	5
MW-7	TCE	10/3/2022	**6.27**	6.493	11.307	5
MW-7	TCE	5/3/2023	**7.50**	5.063	11.487	5
MW-7	TCE	10/11/2023	**9.37**	5.990	9.095	5
MW-7	TCE	5/8/2024	**15.00**	4.995	14.075	5
MW-7	TCE	10/29/2024	**7.81**	5.822	14.018	5

Table 10
Historic SSI & SSL
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Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-7	Vinyl Chloride	4/11/2018	**1.87**	---	---	2
MW-7	Vinyl Chloride	10/30/2018	**1.98**	---	---	2
MW-7	Vinyl Chloride	4/1/2019	<1.0	---	---	2
MW-7	Vinyl Chloride	10/8/2019	1.45	0.867	2.033	2
MW-7	Vinyl Chloride	4/20/2020	**3.15**	0.813	2.727	2
MW-7	Vinyl Chloride	10/20/2020	**3.48**	0.922	3.368	2
MW-7	Vinyl Chloride	4/26/2021	1.02	1.217	3.333	2
MW-7	Vinyl Chloride	8/16/2021	**2.84**	1.670	3.575	2
MW-7	Vinyl Chloride	6/1/2022	1.47	1.206	3.199	2
MW-7	Vinyl Chloride	10/3/2022	1.38	0.986	2.370	2
MW-7	Vinyl Chloride	5/3/2023	**3.11**	1.139	3.261	2
MW-7	Vinyl Chloride	10/11/2023	**4.28**	0.919	4.201	2
MW-7	Vinyl Chloride	5/8/2024	**5.77**	1.452	5.818	2
MW-7	Vinyl Chloride	10/29/2024	**9.39**	2.428	8.847	2

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protectec*

Table 10
Historic SSI & SSL
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Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-8	1,2-dichloropropane	4/11/2018	1.43	---	---	5
MW-8	1,2-dichloropropane	10/30/2018	1.27	---	---	5
MW-8	1,2-dichloropropane	4/1/2019	1.21	---	---	5
MW-8	1,2-dichloropropane	10/8/2019	1.57	1.229	1.511	5
MW-8	1,2-dichloropropane	5/28/2020	1.43	1.229	1.511	5
MW-8	1,2-dichloropropane	10/20/2020	1.29	1.238	1.512	5
MW-8	1,2-dichloropropane	4/26/2021	1.26	1.264	1.511	5
MW-8	1,2-dichloropropane	8/16/2021	1.52	1.270	1.480	5
MW-8	1,2-dichloropropane	6/1/2022	1.21	1.201	1.439	5
MW-8	1,2-dichloropropane	10/3/2022	1.01	1.068	1.432	5
MW-8	1,2-dichloropropane	5/3/2023	1.16	0.973	1.477	5
MW-8	1,2-dichloropropane	10/11/2023	<1.0	0.588	1.352	5
MW-8	1,2-dichloropropane	5/8/2024	<1.0	0.389	1.196	5
MW-8	1,2-dichloropropane	10/29/2024	<1.0	0.277	1.053	5
MW-8	benzene	4/11/2018	<0.5	---	---	5
MW-8	benzene	10/30/2018	<0.5	---	---	5
MW-8	benzene	4/1/2019	0.632	---	---	5
MW-8	benzene	10/8/2019	0.858	0.237	0.758	5
MW-8	benzene	4/20/2020	<0.5	0.237	0.758	5
MW-8	benzene	10/20/2020	<0.5	0.237	0.758	5
MW-8	benzene	4/26/2021	<0.5	0.139	0.665	5
MW-8	benzene	8/16/2021	<0.5	0.250	0.250	5
MW-8	benzene	6/1/2022	<0.5	0.250	0.250	5
MW-8	benzene	10/3/2022	<0.5	0.250	0.250	5
MW-8	benzene	5/3/2023	<0.5	0.250	0.250	5
MW-8	benzene	10/11/2023	<0.5	0.250	0.250	5
MW-8	benzene	5/8/2024	<0.5	0.250	0.250	5
MW-8	benzene	10/29/2024	<0.5	0.250	0.250	5

Table 10
Historic SSI & SSL
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-8	cis-1,2-dichloroethylene	4/11/2018	**80.80**	---	---	70
MW-8	cis-1,2-dichloroethylene	10/30/2018	**82.60**	---	---	70
MW-8	cis-1,2-dichloroethylene	4/1/2019	**75.70**	---	---	70
MW-8	cis-1,2-dichloroethylene	10/8/2019	**85.80**	77.567	84.883	70
MW-8	cis-1,2-dichloroethylene	4/20/2020	1.21	26.427	96.228	70
MW-8	cis-1,2-dichloroethylene	5/28/2020	57.10	22.261	87.644	70
MW-8	cis-1,2-dichloroethylene	10/20/2020	**76.40**	22.324	87.931	70
MW-8	cis-1,2-dichloroethylene	4/26/2021	61.20	20.477	77.478	70
MW-8	cis-1,2-dichloroethylene	8/16/2021	**85.90**	58.558	81.742	70
MW-8	cis-1,2-dichloroethylene	6/1/2022	59.40	59.753	81.696	70
MW-8	cis-1,2-dichloroethylene	10/3/2022	50.20	50.956	77.394	70
MW-8	cis-1,2-dichloroethylene	5/3/2023	53.80	43.309	81.341	70
MW-8	cis-1,2-dichloroethylene	10/11/2023	45.70	45.462	59.088	70
MW-8	cis-1,2-dichloroethylene	5/8/2024	57.10	45.945	57.455	70
MW-8	cis-1,2-dichloroethylene	10/29/2024	14.80	20.143	65.557	70
MW-8	TCE	4/11/2018	<1.0	---	---	5
MW-8	TCE	10/30/2018	<1.0	---	---	5
MW-8	TCE	4/1/2019	<1.0	---	---	5
MW-8	TCE	10/8/2019	<1.0	0.500	0.500	5
MW-8	TCE	4/20/2020	<1.0	0.500	0.500	5
MW-8	TCE	10/20/2020	<1.0	0.500	0.500	5
MW-8	TCE	4/26/2021	<1.0	0.500	0.500	5
MW-8	TCE	8/16/2021	<1.0	0.500	0.500	5
MW-8	TCE	6/1/2022	<1.0	0.500	0.500	5
MW-8	TCE	10/3/2022	<1.0	0.500	0.500	5
MW-8	TCE	5/3/2023	1.13	0.287	1.028	5
MW-8	TCE	10/11/2023	<1.0	0.287	1.028	5
MW-8	TCE	5/8/2024	<1.0	0.287	1.028	5
MW-8	TCE	10/29/2024	<1.0	0.287	1.028	5

Table 10
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KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-8	vinyl chloride	4/11/2018	**2.74**	---	---	2
MW-8	vinyl chloride	10/30/2018	**2.18**	---	---	2
MW-8	vinyl chloride	4/1/2019	**5.33**	---	---	2
MW-8	vinyl chloride	10/8/2019	**7.13**	2.346	6.344	2
MW-8	vinyl chloride	4/20/2020	1.73	1.857	6.328	2
MW-8	vinyl chloride	10/20/2020	**3.25**	2.313	6.407	2
MW-8	vinyl chloride	4/26/2021	**2.16**	1.437	5.698	2
MW-8	vinyl chloride	8/16/2021	**2.40**	1.831	2.939	2
MW-8	vinyl chloride	6/1/2022	**2.72**	2.224	3.041	2
MW-8	vinyl chloride	10/3/2022	1.62	1.823	2.627	2
MW-8	vinyl chloride	5/3/2023	**2.16**	1.679	2.771	2
MW-8	vinyl chloride	10/11/2023	1.03	1.030	2.735	2
MW-8	vinyl chloride	5/8/2024	1.51	1.034	2.126	2
MW-8	vinyl chloride	10/29/2024	<1.0	0.469	2.131	2
MW-8	chloride	4/11/2018	16.40	---	---	---
MW-8	chloride	10/30/2018	35.60	---	---	---
MW-8	chloride	4/1/2019	30.30	---	---	---
MW-8	chloride	10/8/2019	26.30	20.121	34.179	---
MW-8	chloride	4/20/2020	21.70	23.358	33.592	---
MW-8	chloride	10/20/2020	21.70	21.410	28.590	---
MW-8	chloride	4/26/2021	16.30	17.959	25.041	---
MW-8	chloride	8/16/2021	15.60	15.939	21.711	---
MW-8	chloride	6/1/2022	13.10	13.539	19.811	---
MW-8	chloride	10/3/2022	12.80	12.926	15.974	---
MW-8	chloride	5/3/2023	12.90	12.440	14.760	---
MW-8	chloride	10/11/2023	12.70	12.727	13.023	---
MW-8	chloride	5/8/2024	12.30	12.447	12.903	---
MW-8	chloride	10/29/2024	16.50	11.912	15.288	---

Table 10
Historic SSI & SSL
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Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-8	Specific Conductance	4/11/2018	1232	---	---	---
MW-8	Specific Conductance	10/30/2018	1473	---	---	---
MW-8	Specific Conductance	4/1/2019	1507	---	---	---
MW-8	Specific Conductance	10/8/2019	1564	1317.357	1570.643	---
MW-8	Specific Conductance	4/20/2020	1622	1484.779	1598.221	---
MW-8	Specific Conductance	10/20/2020	1557	1521.717	1603.283	---
MW-8	Specific Conductance	4/26/2021	1618	1560.364	1620.136	---
MW-8	Specific Conductance	8/16/2021	1834	1552.782	1762.718	---
MW-8	Specific Conductance	6/1/2022	1466	1483.215	1754.285	---
MW-8	Specific Conductance	10/3/2022	1456	1440.527	1746.473	---
MW-8	Specific Conductance	5/3/2023	1390	1362.274	1710.726	---
MW-8	Specific Conductance	10/11/2023	1393	1391.305	1461.196	---
MW-8	Specific Conductance	5/8/2024	1290	1322.826	1441.674	---
MW-8	Specific Conductance	10/29/2024	1248	1267.217	1393.283	---
MW-8	TOX	4/11/2018	82.00	---	---	---
MW-8	TOX	10/30/2018	NT	---	---	---
MW-8	TOX	4/1/2019	76.50	---	---	---
MW-8	TOX	10/8/2019	NT	---	---	---
MW-8	TOX	4/20/2020	<40	---	---	---
MW-8	TOX	10/20/2020	NT	---	---	---
MW-8	TOX	4/26/2021	53.00	33.446	82.304	---
MW-8	TOX	8/16/2021	NT	---	---	---
MW-8	TOX	6/1/2022	46.00	28.737	69.013	---
MW-8	TOX	10/3/2022	NT	---	---	---
MW-8	TOX	5/3/2023	65.00	29.523	62.477	---
MW-8	TOX	10/11/2023	NT	---	---	---
MW-8	TOX	5/8/2024	157.00	35.420	125.080	---
MW-8	TOX	10/29/2024	NT	---	---	---

Table 10
Historic SSI & SSL
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KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-12	benzene	4/11/2018	1.610	---	---	5
MW-12	benzene	10/30/2018	1.520	---	---	5
MW-12	benzene	4/1/2019	1.450	---	---	5
MW-12	benzene	10/8/2019	1.870	1.453	1.772	5
MW-12	benzene	4/20/2020	1.860	1.483	1.867	5
MW-12	benzene	10/20/2020	2.010	1.588	2.007	5
MW-12	benzene	4/26/2021	1.840	1.828	1.962	5
MW-12	benzene	8/16/2021	1.950	1.846	1.984	5
MW-12	benzene	6/1/2022	0.784	1.145	2.147	5
MW-12	benzene	10/3/2022	1.460	1.052	1.965	5
MW-12	benzene	5/3/2023	1.270	0.799	1.933	5
MW-12	benzene	10/11/2023	1.160	0.834	1.503	5
MW-12	benzene	5/8/2024	1.190	1.111	1.429	5
MW-12	benzene	10/29/2024	0.804	0.863	1.349	5
MW-12	cis-1,2-dichloroethylene	4/11/2018	50.40	---	---	70
MW-12	cis-1,2-dichloroethylene	10/30/2018	29.60	---	---	70
MW-12	cis-1,2-dichloroethylene	4/1/2019	34.30	---	---	70
MW-12	cis-1,2-dichloroethylene	10/8/2019	47.30	31.719	49.081	70
MW-12	cis-1,2-dichloroethylene	4/20/2020	52.40	31.620	50.180	70
MW-12	cis-1,2-dichloroethylene	10/20/2020	55.10	39.277	55.273	70
MW-12	cis-1,2-dichloroethylene	4/26/2021	49.00	47.931	53.969	70
MW-12	cis-1,2-dichloroethylene	8/16/2021	64.70	49.458	61.142	70
MW-12	cis-1,2-dichloroethylene	6/1/2022	31.00	37.661	62.239	70
MW-12	cis-1,2-dichloroethylene	10/3/2022	35.20	31.783	58.167	70
MW-12	cis-1,2-dichloroethylene	5/3/2023	31.90	21.760	59.640	70
MW-12	cis-1,2-dichloroethylene	10/11/2023	31.30	30.072	34.628	70
MW-12	cis-1,2-dichloroethylene	5/8/2024	32.50	30.700	34.750	70
MW-12	cis-1,2-dichloroethylene	10/29/2024	18.30	20.481	36.519	70

Table 10
Historic SSI & SSL
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KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-12	TCE	4/11/2018	1.23	---	---	5
MW-12	TCE	10/30/2018	<1.0	---	---	5
MW-12	TCE	4/1/2019	1.18	---	---	5
MW-12	TCE	10/8/2019	<1.0	0.500	1.205	5
MW-12	TCE	4/20/2020	<1.0	0.376	0.964	5
MW-12	TCE	10/20/2020	1.54	0.482	1.378	5
MW-12	TCE	4/26/2021	<1.0	0.310	1.210	5
MW-12	TCE	8/16/2021	<1.0	0.310	1.210	5
MW-12	TCE	6/1/2022	<1.0	0.310	1.210	5
MW-12	TCE	10/3/2022	<1.0	0.500	0.500	5
MW-12	TCE	5/3/2023	<1.0	0.500	0.500	5
MW-12	TCE	10/11/2023	<1.0	0.500	0.500	5
MW-12	TCE	5/8/2024	<1.0	0.500	0.500	5
MW-12	TCE	10/29/2024	<1.0	0.500	0.500	5
MW-12	vinyl chloride	4/11/2018	**4.48**	---	---	2
MW-12	vinyl chloride	10/30/2018	**9.14**	---	---	2
MW-12	vinyl chloride	4/1/2019	**8.96**	---	---	2
MW-12	vinyl chloride	10/8/2019	**6.50**	5.351	9.189	2
MW-12	vinyl chloride	4/20/2020	**4.90**	5.606	9.144	2
MW-12	vinyl chloride	10/20/2020	**5.41**	4.878	8.007	2
MW-12	vinyl chloride	4/26/2021	**3.57**	4.042	6.148	2
MW-12	vinyl chloride	8/16/2021	**4.08**	3.778	5.202	2
MW-12	vinyl chloride	6/1/2022	1.56	2.271	5.039	2
MW-12	vinyl chloride	10/3/2022	**7.15**	2.088	6.092	2
MW-12	vinyl chloride	5/3/2023	**4.19**	1.556	6.934	2
MW-12	vinyl chloride	10/11/2023	**3.56**	1.394	6.836	2
MW-12	vinyl chloride	5/8/2024	**4.30**	2.918	6.682	2
MW-12	vinyl chloride	10/29/2024	**5.48**	3.440	5.325	2

Table 10
Historic SSI & SSL
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KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-12	chloride	4/11/2018	15.20	---	---	---
MW-12	chloride	10/30/2018	42.60	---	---	---
MW-12	chloride	4/1/2019	31.50	---	---	---
MW-12	chloride	10/8/2019	12.00	12.909	37.741	---
MW-12	chloride	4/20/2020	11.20	11.006	37.644	---
MW-12	chloride	10/20/2020	12.30	8.225	25.275	---
MW-12	chloride	4/26/2021	9.32	10.045	12.365	---
MW-12	chloride	8/16/2021	12.50	10.068	12.592	---
MW-12	chloride	6/1/2022	32.00	7.510	25.550	---
MW-12	chloride	10/3/2022	21.70	10.046	27.714	---
MW-12	chloride	5/3/2023	29.10	16.285	31.365	---
MW-12	chloride	10/11/2023	34.00	24.533	33.867	---
MW-12	chloride	5/8/2024	40.70	24.435	38.315	---
MW-12	chloride	10/29/2024	68.70	27.796	58.454	---
MW-12	iron	4/11/2018	22900.00	---	---	---
MW-12	iron	10/30/2018	27900.00	---	---	---
MW-12	iron	4/1/2019	20200.00	---	---	---
MW-12	iron	10/8/2019	27400.00	21399.220	27800.780	---
MW-12	iron	4/20/2020	24800.00	22024.280	28125.720	---
MW-12	iron	10/20/2020	19400.00	19656.450	26243.550	---
MW-12	iron	4/26/2021	27800.00	21499.250	28200.750	---
MW-12	iron	8/16/2021	29900.00	21526.980	29423.020	---
MW-12	iron	6/1/2022	25300.00	21667.440	29532.560	---
MW-12	iron	10/3/2022	9460.00	15064.860	31165.140	---
MW-12	iron	5/3/2023	10800.00	9967.266	27762.730	---
MW-12	iron	10/11/2023	7290.00	6122.277	20302.723	---
MW-12	iron	5/8/2024	6970.00	7052.898	10207.102	---
MW-12	iron	10/29/2024	13800.00	6918.569	12511.431	---

Table 10
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Annual Water Quality Report
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Permit No. 75-SDP-01-74P

KEY:	SSI	SSL LCL>GWPS	SSL UCL>GWPS

Note: The absence of shading indicates that the condition does not exist.

Monitoring Well	Compound	Sample Date	Each Result (ug/L)	95% LCL (ug/L)	95% UCL (ug/L)	GWPS Limit (ug/L)
MW-12	Specific Conductance	4/11/2018	1304	---	---	---
MW-12	Specific Conductance	10/30/2018	1556	---	---	---
MW-12	Specific Conductance	4/1/2019	1399	---	---	---
MW-12	Specific Conductance	10/8/2019	1499	1343.176	1535.824	---
MW-12	Specific Conductance	4/20/2020	1386	1389.406	1530.594	---
MW-12	Specific Conductance	10/20/2020	1684	1372.838	1611.162	---
MW-12	Specific Conductance	4/26/2021	1637	1434.226	1668.774	---
MW-12	Specific Conductance	8/16/2021	1754	1476.500	1754.000	---
MW-12	Specific Conductance	6/1/2022	1371	1466.541	1756.459	---
MW-12	Specific Conductance	10/3/2022	1494	1419.451	1708.549	---
MW-12	Specific Conductance	5/3/2023	1481	1384.417	1665.583	---
MW-12	Specific Conductance	10/11/2023	1422	1392.842	1491.158	---
MW-12	Specific Conductance	5/8/2024	1440	1429.930	1488.570	---
MW-12	Specific Conductance	10/29/2024	1348	1374.587	1470.913	---
MW-12	TOX	4/11/2018	41.90	---	---	---
MW-12	TOX	10/30/2018	NT	---	---	---
MW-12	TOX	4/1/2019	37.40	---	---	---
MW-12	TOX	10/8/2019	NT	---	---	---
MW-12	TOX	4/20/2020	<40	---	---	---
MW-12	TOX	10/20/2020	NT	---	---	---
MW-12	TOX	4/26/2021	42.00	26.284	44.366	---
MW-12	TOX	8/16/2021	NT	---	---	---
MW-12	TOX	6/1/2022	48.00	26.421	47.279	---
MW-12	TOX	10/3/2022	NT	---	---	---
MW-12	TOX	5/8/2024	146.00	27.245	114.255	---
MW-12	TOX	10/29/2024	NT	---	---	---

Bold Result *= A value that exceeds the GWPS.*

Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protectec*

Table 11 – Corrective Action Trend Analysis

Table 11
Corrective Action Trend Analysis
Annual Water Quality Report
Plymouth County Sanitary Landfill
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Monitoring Well	Compound	Sample Date	Current Condition	Trend	N	Projected Year to Completion (IAC 113.10(9)"e"
MW-7	1,2-dichloroethane	4/11/2018	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	10/30/2018	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	4/1/2019	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	10/8/2019	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	4/20/2020	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	10/20/2020	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	4/26/2021	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	8/16/2021	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	6/1/2022	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	10/3/2022	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	5/3/2023	No-SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	10/11/2023	SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	5/8/2024	SSI	N/A	N/A	N/A
MW-7	1,2-dichloroethane	10/29/2024	SSI	N/A	N/A	N/A
MW-7	1,2-dichloropropane	4/11/2018	SSI	N/A	1	2030
MW-7	1,2-dichloropropane	10/30/2018	SSI	N/A	2	2030
MW-7	1,2-dichloropropane	4/1/2019	SSI	N/A	3	2030
MW-7	1,2-dichloropropane	10/8/2019	**SSL**	increasing	4	2030
MW-7	1,2-dichloropropane	4/20/2020	**SSL**	increasing	5	2030
MW-7	1,2-dichloropropane	10/20/2020	**SSL**	increasing	6	2030
MW-7	1,2-dichloropropane	4/26/2021	**SSL**	increasing	7	2030
MW-7	1,2-dichloropropane	8/16/2021	**SSL**	increasing	8	2030
MW-7	1,2-dichloropropane	6/1/2022	**SSL**	increasing	9	2030
MW-7	1,2-dichloropropane	10/3/2022	**SSL**	increasing	10	2030
MW-7	1,2-dichloropropane	5/3/2023	**SSL**	increasing	11	2030
MW-7	1,2-dichloropropane	10/11/2023	**SSL**	increasing	12	2030
MW-7	1,2-dichloropropane	5/8/2024	**SSL**	increasing	13	2030
MW-7	1,2-dichloropropane	10/29/2024	**SSL**	increasing	14	2030

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MW-7	benzene	4/11/2018	SSI	N/A	N/A	N/A
MW-7	benzene	10/30/2018	SSI	N/A	N/A	N/A
MW-7	benzene	4/1/2019	SSI	N/A	N/A	N/A
MW-7	benzene	10/8/2019	SSI	N/A	N/A	N/A
MW-7	benzene	4/20/2020	SSI	N/A	N/A	N/A
MW-7	benzene	10/20/2020	SSI	N/A	N/A	N/A
MW-7	benzene	4/26/2021	No-SSI	N/A	N/A	N/A
MW-7	benzene	8/16/2021	SSI	N/A	N/A	N/A
MW-7	benzene	6/1/2022	No-SSI	N/A	N/A	N/A
MW-7	benzene	10/3/2022	No-SSI	N/A	N/A	N/A
MW-7	benzene	5/3/2023	SSI	N/A	N/A	N/A
MW-7	benzene	10/11/2023	SSI	N/A	N/A	N/A
MW-7	benzene	5/8/2024	SSI	N/A	N/A	N/A
MW-7	benzene	10/29/2024	SSI	N/A	N/A	N/A
MW-7	cis-1,2-dichloroethylene	4/11/2018	SSI	N/A	1	2030
MW-7	cis-1,2-dichloroethylene	10/30/2018	SSI	N/A	2	2030
MW-7	cis-1,2-dichloroethylene	4/1/2019	SSI	N/A	3	2030
MW-7	cis-1,2-dichloroethylene	10/8/2019	**SSL**	increasing	4	2030
MW-7	cis-1,2-dichloroethylene	4/20/2020	**SSL**	increasing	5	2030
MW-7	cis-1,2-dichloroethylene	10/20/2020	**SSL**	increasing	6	2030
MW-7	cis-1,2-dichloroethylene	4/26/2021	**SSL**	increasing	7	2030
MW-7	cis-1,2-dichloroethylene	8/16/2021	**SSL**	increasing	8	2030
MW-7	cis-1,2-dichloroethylene	6/1/2022	**SSL**	increasing	9	2030
MW-7	cis-1,2-dichloroethylene	10/3/2022	**SSL**	increasing	10	2030
MW-7	cis-1,2-dichloroethylene	5/3/2023	**SSL**	increasing	11	2030
MW-7	cis-1,2-dichloroethylene	10/11/2023	**SSL**	increasing	12	2030
MW-7	cis-1,2-dichloroethylene	5/8/2024	**SSL**	increasing	13	2030
MW-7	cis-1,2-dichloroethylene	10/29/2024	**SSL**	increasing	14	2030

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MW-7	PCE	4/11/2018	SSI	N/A	N/A	N/A
MW-7	PCE	10/30/2018	SSI	N/A	N/A	N/A
MW-7	PCE	4/1/2019	SSI	N/A	N/A	N/A
MW-7	PCE	10/8/2019	SSI	N/A	N/A	N/A
MW-7	PCE	4/20/2020	SSI	N/A	N/A	N/A
MW-7	PCE	10/20/2020	No-SSI	N/A	N/A	N/A
MW-7	PCE	4/26/2021	SSI	N/A	N/A	N/A
MW-7	PCE	8/16/2021	SSI	N/A	N/A	N/A
MW-7	PCE	6/1/2022	SSI	N/A	N/A	N/A
MW-7	PCE	10/3/2022	SSI	N/A	N/A	N/A
MW-7	PCE	5/3/2023	SSI	N/A	N/A	N/A
MW-7	PCE	10/11/2023	SSI	N/A	N/A	N/A
MW-7	PCE	5/8/2024	SSI	N/A	N/A	N/A
MW-7	PCE	10/29/2024	SSI	N/A	N/A	N/A
MW-7	TCE	4/11/2018	SSI	N/A	1	2030
MW-7	TCE	10/30/2018	SSI	N/A	2	2030
MW-7	TCE	4/1/2019	SSI	N/A	3	2030
MW-7	TCE	10/8/2019	**SSL**	increasing	4	2030
MW-7	TCE	4/20/2020	**SSL**	increasing	5	2030
MW-7	TCE	10/20/2020	**SSL**	increasing	6	2030
MW-7	TCE	4/26/2021	**SSL**	increasing	7	2030
MW-7	TCE	8/16/2021	**SSL**	increasing	8	2030
MW-7	TCE	6/1/2022	**SSL**	decreasing	9	2030
MW-7	TCE	10/3/2022	**SSL**	decreasing	10	2030
MW-7	TCE	5/3/2023	**SSL**	decreasing	11	2030
MW-7	TCE	10/11/2023	**SSL**	decreasing	12	2030
MW-7	TCE	5/8/2024	**SSL**	decreasing	13	2030
MW-7	TCE	10/29/2024	**SSL**	decreasing	14	2030

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MW-7	Vinyl Chloride	4/11/2018	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	10/30/2018	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	4/1/2019	No-SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	10/8/2019	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	4/20/2020	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	10/20/2020	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	4/26/2021	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	8/16/2021	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	6/1/2022	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	10/3/2022	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	5/3/2023	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	10/11/2023	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	5/8/2024	SSI	N/A	N/A	N/A
MW-7	Vinyl Chloride	10/29/2024	**SSL**	increasing	1	2030

Bold Result *= A value that exceeds the GWPS.*
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groun*

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MW-8	1,2-dichloropropane	4/11/2018	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	10/30/2018	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	4/1/2019	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	10/8/2019	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	5/28/2020	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	10/20/2020	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	4/26/2021	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	8/16/2021	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	6/1/2022	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	10/3/2022	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	5/3/2023	SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	10/11/2023	No-SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	5/8/2024	No-SSI	N/A	N/A	N/A
MW-8	1,2-dichloropropane	10/29/2024	No-SSI	N/A	N/A	N/A
MW-8	benzene	4/11/2018	No-SSI	N/A	N/A	N/A
MW-8	benzene	10/30/2018	No-SSI	N/A	N/A	N/A
MW-8	benzene	4/1/2019	SSI	N/A	N/A	N/A
MW-8	benzene	10/8/2019	SSI	N/A	N/A	N/A
MW-8	benzene	4/20/2020	No-SSI	N/A	N/A	N/A
MW-8	benzene	10/20/2020	No-SSI	N/A	N/A	N/A
MW-8	benzene	4/26/2021	No-SSI	N/A	N/A	N/A
MW-8	benzene	8/16/2021	No-SSI	N/A	N/A	N/A
MW-8	benzene	6/1/2022	No-SSI	N/A	N/A	N/A
MW-8	benzene	10/3/2022	No-SSI	N/A	N/A	N/A
MW-8	benzene	5/3/2023	No-SSI	N/A	N/A	N/A
MW-8	benzene	10/11/2023	No-SSI	N/A	N/A	N/A
MW-8	benzene	5/8/2024	No-SSI	N/A	N/A	N/A
MW-8	benzene	10/29/2024	No-SSI	N/A	N/A	N/A

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MW-8	cis-1,2-dichloroethylene	4/11/2018	SSI	N/A	1	2030
MW-8	cis-1,2-dichloroethylene	10/30/2018	SSI	N/A	2	2030
MW-8	cis-1,2-dichloroethylene	4/1/2019	SSI	N/A	3	2030
MW-8	cis-1,2-dichloroethylene	10/8/2019	**SSL**	static	4	2030
MW-8	cis-1,2-dichloroethylene	4/20/2020	**SSL**	static	5	2030
MW-8	cis-1,2-dichloroethylene	5/28/2020	**SSL**	static	5	2030
MW-8	cis-1,2-dichloroethylene	10/20/2020	**SSL**	static	6	2030
MW-8	cis-1,2-dichloroethylene	4/26/2021	**SSL**	static	7	2030
MW-8	cis-1,2-dichloroethylene	8/16/2021	**SSL**	static	8	2030
MW-8	cis-1,2-dichloroethylene	6/1/2022	**SSL**	static	9	2030
MW-8	cis-1,2-dichloroethylene	10/3/2022	**SSL**	static	10	2030
MW-8	cis-1,2-dichloroethylene	5/3/2023	**SSL**	decreasing	11	2030
MW-8	cis-1,2-dichloroethylene	10/11/2023	SSI	decreasing	12	2030
MW-8	cis-1,2-dichloroethylene	5/8/2024	SSI	decreasing	13	2030
MW-8	cis-1,2-dichloroethylene	10/29/2024	SSI	decreasing	14	2030
MW-8	TCE	4/11/2018	No-SSI	N/A	N/A	N/A
MW-8	TCE	10/30/2018	No-SSI	N/A	N/A	N/A
MW-8	TCE	4/1/2019	No-SSI	N/A	N/A	N/A
MW-8	TCE	10/8/2019	No-SSI	N/A	N/A	N/A
MW-8	TCE	4/20/2020	No-SSI	N/A	N/A	N/A
MW-8	TCE	10/20/2020	No-SSI	N/A	N/A	N/A
MW-8	TCE	4/26/2021	No-SSI	N/A	N/A	N/A
MW-8	TCE	8/16/2021	No-SSI	N/A	N/A	N/A
MW-8	TCE	6/1/2022	No-SSI	N/A	N/A	N/A
MW-8	TCE	10/3/2022	No-SSI	N/A	N/A	N/A
MW-8	TCE	5/3/2023	SSI	N/A	N/A	N/A
MW-8	TCE	10/11/2023	No-SSI	N/A	N/A	N/A
MW-8	TCE	5/8/2024	No-SSI	N/A	N/A	N/A
MW-8	TCE	10/29/2024	No-SSI	N/A	N/A	N/A

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MW-8	vinyl chloride	4/11/2018	SSI	N/A	1	2030
MW-8	vinyl chloride	10/30/2018	SSI	N/A	2	2030
MW-8	vinyl chloride	4/1/2019	SSI	N/A	3	2030
MW-8	vinyl chloride	10/8/2019	**SSL**	decreasing	4	2030
MW-8	vinyl chloride	4/20/2020	**SSL**	decreasing	5	2030
MW-8	vinyl chloride	10/20/2020	**SSL**	decreasing	6	2030
MW-8	vinyl chloride	4/26/2021	**SSL**	decreasing	7	2030
MW-8	vinyl chloride	8/16/2021	**SSL**	decreasing	8	2030
MW-8	vinyl chloride	6/1/2022	**SSL**	decreasing	9	2030
MW-8	vinyl chloride	10/3/2022	**SSL**	decreasing	10	2030
MW-8	vinyl chloride	5/3/2023	**SSL**	decreasing	11	2030
MW-8	vinyl chloride	10/11/2023	**SSL**	decreasing	12	2030
MW-8	vinyl chloride	5/8/2024	**SSL**	decreasing	13	2030
MW-8	vinyl chloride	10/29/2024	**SSL**	decreasing	14	2030
MW-8	chloride	4/11/2018	SSI	N/A	N/A	N/A
MW-8	chloride	10/30/2018	SSI	N/A	N/A	N/A
MW-8	chloride	4/1/2019	SSI	N/A	N/A	N/A
MW-8	chloride	10/8/2019	SSI	N/A	N/A	N/A
MW-8	chloride	4/20/2020	SSI	N/A	N/A	N/A
MW-8	chloride	10/20/2020	SSI	N/A	N/A	N/A
MW-8	chloride	4/26/2021	SSI	N/A	N/A	N/A
MW-8	chloride	8/16/2021	SSI	N/A	N/A	N/A
MW-8	chloride	6/1/2022	SSI	N/A	N/A	N/A
MW-8	chloride	10/3/2022	SSI	N/A	N/A	N/A
MW-8	chloride	5/3/2023	SSI	N/A	N/A	N/A
MW-8	chloride	10/11/2023	SSI	N/A	N/A	N/A
MW-8	chloride	5/8/2024	SSI	N/A	N/A	N/A
MW-8	chloride	10/29/2024	SSI	N/A	N/A	N/A

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MW-8	Specific Conductance	4/11/2018	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	10/30/2018	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	4/1/2019	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	10/8/2019	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	4/20/2020	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	10/20/2020	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	4/26/2021	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	8/16/2021	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	6/1/2022	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	10/3/2022	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	5/3/2023	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	10/11/2023	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	5/8/2024	SSI	N/A	N/A	N/A
MW-8	Specific Conductance	10/29/2024	SSI	N/A	N/A	N/A
MW-8	TOX	4/11/2018	SSI	N/A	N/A	N/A
MW-8	TOX	10/30/2018	---	N/A	N/A	N/A
MW-8	TOX	4/1/2019	SSI	N/A	N/A	N/A
MW-8	TOX	10/8/2019	---	N/A	N/A	N/A
MW-8	TOX	4/20/2020	SSI	N/A	N/A	N/A
MW-8	TOX	10/20/2020	---	N/A	N/A	N/A
MW-8	TOX	4/26/2021	SSI	N/A	N/A	N/A
MW-8	TOX	8/16/2021	---	N/A	N/A	N/A
MW-8	TOX	6/1/2022	SSI	N/A	N/A	N/A
MW-8	TOX	10/3/2022	---	N/A	N/A	N/A
MW-8	TOX	5/3/2023	SSI	N/A	N/A	N/A
MW-8	TOX	10/11/2023	---	N/A	N/A	N/A
MW-8	TOX	5/8/2024	SSI	N/A	N/A	N/A
MW-8	TOX	10/29/2024	---	N/A	N/A	N/A

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MW-12	benzene	4/11/2018	SSI	N/A	N/A	N/A
MW-12	benzene	10/30/2018	SSI	N/A	N/A	N/A
MW-12	benzene	4/1/2019	SSI	N/A	N/A	N/A
MW-12	benzene	10/8/2019	SSI	N/A	N/A	N/A
MW-12	benzene	4/20/2020	SSI	N/A	N/A	N/A
MW-12	benzene	10/20/2020	SSI	N/A	N/A	N/A
MW-12	benzene	4/26/2021	SSI	N/A	N/A	N/A
MW-12	benzene	8/16/2021	SSI	N/A	N/A	N/A
MW-12	benzene	6/1/2022	SSI	N/A	N/A	N/A
MW-12	benzene	10/3/2022	SSI	N/A	N/A	N/A
MW-12	benzene	5/3/2023	SSI	N/A	N/A	N/A
MW-12	benzene	10/11/2023	SSI	N/A	N/A	N/A
MW-12	benzene	5/8/2024	SSI	N/A	N/A	N/A
MW-12	benzene	10/29/2024	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	4/11/2018	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	10/30/2018	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	4/1/2019	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	10/8/2019	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	4/20/2020	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	10/20/2020	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	4/26/2021	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	8/16/2021	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	6/1/2022	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	10/3/2022	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	5/3/2023	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	10/11/2023	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	5/8/2024	SSI	N/A	N/A	N/A
MW-12	cis-1,2-dichloroethylene	10/29/2024	SSI	N/A	N/A	N/A

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MW-12	TCE	4/11/2018	SSI	N/A	N/A	N/A
MW-12	TCE	10/30/2018	No-SSI	N/A	N/A	N/A
MW-12	TCE	4/1/2019	SSI	N/A	N/A	N/A
MW-12	TCE	10/8/2019	No-SSI	N/A	N/A	N/A
MW-12	TCE	4/20/2020	No-SSI	N/A	N/A	N/A
MW-12	TCE	10/20/2020	SSI	N/A	N/A	N/A
MW-12	TCE	4/26/2021	No-SSI	N/A	N/A	N/A
MW-12	TCE	8/16/2021	No-SSI	N/A	N/A	N/A
MW-12	TCE	6/1/2022	No-SSI	N/A	N/A	N/A
MW-12	TCE	10/3/2022	No-SSI	N/A	N/A	N/A
MW-12	TCE	5/3/2023	No-SSI	N/A	N/A	N/A
MW-12	TCE	10/11/2023	No-SSI	N/A	N/A	N/A
MW-12	TCE	5/8/2024	No-SSI	N/A	N/A	N/A
MW-12	TCE	10/29/2024	No-SSI	N/A	N/A	N/A
MW-12	vinyl chloride	4/11/2018	SSI	N/A	1	2030
MW-12	vinyl chloride	10/30/2018	SSI	N/A	2	2030
MW-12	vinyl chloride	4/1/2019	SSI	N/A	3	2030
MW-12	vinyl chloride	10/8/2019	**SSL**	decreasing	4	2030
MW-12	vinyl chloride	4/20/2020	**SSL**	decreasing	5	2030
MW-12	vinyl chloride	10/20/2020	**SSL**	decreasing	6	2030
MW-12	vinyl chloride	4/26/2021	**SSL**	decreasing	7	2030
MW-12	vinyl chloride	8/16/2021	**SSL**	decreasing	8	2030
MW-12	vinyl chloride	6/1/2022	**SSL**	decreasing	9	2030
MW-12	vinyl chloride	10/3/2022	**SSL**	decreasing	10	2030
MW-12	vinyl chloride	5/3/2023	**SSL**	decreasing	11	2030
MW-12	vinyl chloride	10/11/2023	**SSL**	decreasing	12	2030
MW-12	vinyl chloride	5/8/2024	**SSL**	decreasing	13	2030
MW-12	vinyl chloride	10/29/2024	**SSL**	decreasing	14	2030

Table 11
Corrective Action Trend Analysis
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

Monitoring Well	Compound	Sample Date	Current Condition	Trend	N	Projected Year to Completion (IAC 113.10(9)"e"
MW-12	chloride	4/11/2018	SSI	N/A	N/A	N/A
MW-12	chloride	10/30/2018	SSI	N/A	N/A	N/A
MW-12	chloride	4/1/2019	SSI	N/A	N/A	N/A
MW-12	chloride	10/8/2019	SSI	N/A	N/A	N/A
MW-12	chloride	4/20/2020	SSI	N/A	N/A	N/A
MW-12	chloride	10/20/2020	SSI	N/A	N/A	N/A
MW-12	chloride	4/26/2021	SSI	N/A	N/A	N/A
MW-12	chloride	8/16/2021	SSI	N/A	N/A	N/A
MW-12	chloride	6/1/2022	SSI	N/A	N/A	N/A
MW-12	chloride	10/3/2022	SSI	N/A	N/A	N/A
MW-12	chloride	5/3/2023	SSI	N/A	N/A	N/A
MW-12	chloride	10/11/2023	SSI	N/A	N/A	N/A
MW-12	chloride	5/8/2024	SSI	N/A	N/A	N/A
MW-12	chloride	10/29/2024	SSI	N/A	N/A	N/A
MW-12	iron	4/11/2018	SSI	N/A	N/A	N/A
MW-12	iron	10/30/2018	SSI	N/A	N/A	N/A
MW-12	iron	4/1/2019	SSI	N/A	N/A	N/A
MW-12	iron	10/8/2019	SSI	N/A	N/A	N/A
MW-12	iron	4/20/2020	SSI	N/A	N/A	N/A
MW-12	iron	10/20/2020	SSI	N/A	N/A	N/A
MW-12	iron	4/26/2021	SSI	N/A	N/A	N/A
MW-12	iron	8/16/2021	SSI	N/A	N/A	N/A
MW-12	iron	6/1/2022	SSI	N/A	N/A	N/A
MW-12	iron	10/3/2022	SSI	N/A	N/A	N/A
MW-12	iron	5/3/2023	SSI	N/A	N/A	N/A
MW-12	iron	10/11/2023	SSI	N/A	N/A	N/A
MW-12	iron	5/8/2024	SSI	N/A	N/A	N/A
MW-12	iron	10/29/2024	SSI	N/A	N/A	N/A

Table 11
Corrective Action Trend Analysis
Annual Water Quality Report
Plymouth County Sanitary Landfill
Permit No. 75-SDP-01-74P

Monitoring Well	Compound	Sample Date	Current Condition	Trend	N	Projected Year to Completion (IAC 113.10(9)"e"
MW-12	Specific Conductance	4/11/2018	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	10/30/2018	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	4/1/2019	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	10/8/2019	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	4/20/2020	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	10/20/2020	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	4/26/2021	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	8/16/2021	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	6/1/2022	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	10/3/2022	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	5/3/2023	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	10/11/2023	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	5/8/2024	SSI	N/A	N/A	N/A
MW-12	Specific Conductance	10/29/2024	SSI	N/A	N/A	N/A
MW-12	TOX	4/11/2018	SSI	N/A	N/A	N/A
MW-12	TOX	10/30/2018	---	N/A	N/A	N/A
MW-12	TOX	4/1/2019	SSI	N/A	N/A	N/A
MW-12	TOX	10/8/2019	---	N/A	N/A	N/A
MW-12	TOX	4/20/2020	SSI	N/A	N/A	N/A
MW-12	TOX	10/20/2020	---	N/A	N/A	N/A
MW-12	TOX	4/26/2021	SSI	N/A	N/A	N/A
MW-12	TOX	8/16/2021	---	N/A	N/A	N/A
MW-12	TOX	6/1/2022	SSI	N/A	N/A	N/A
MW-12	TOX	10/3/2022	---	N/A	N/A	N/A
MW-12	TOX	5/8/2024	SSI	N/A	N/A	N/A
MW-12	TOX	10/29/2024	---	N/A	N/A	N/A

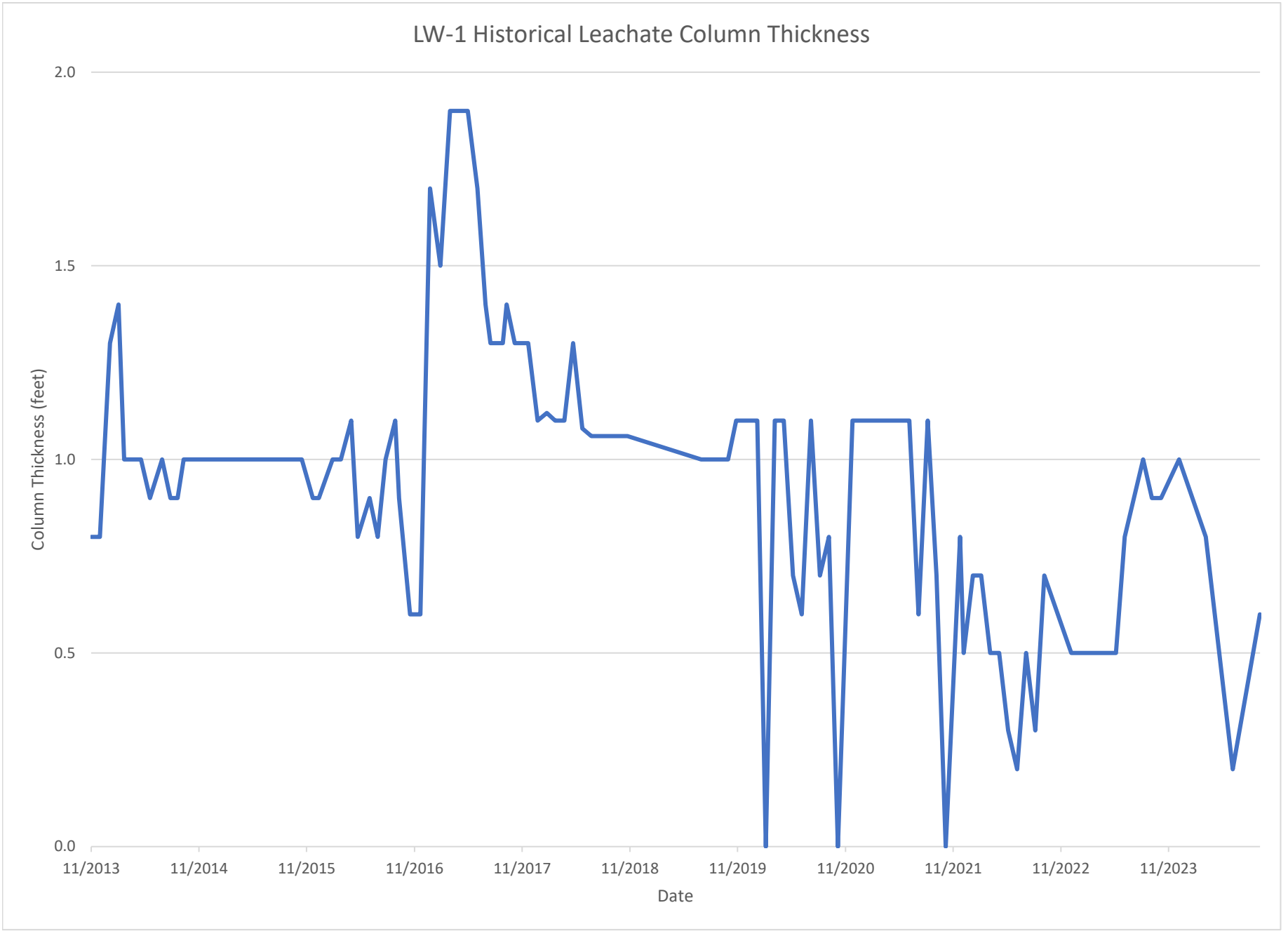
Bold Result *= A value that exceeds the GWPS.*

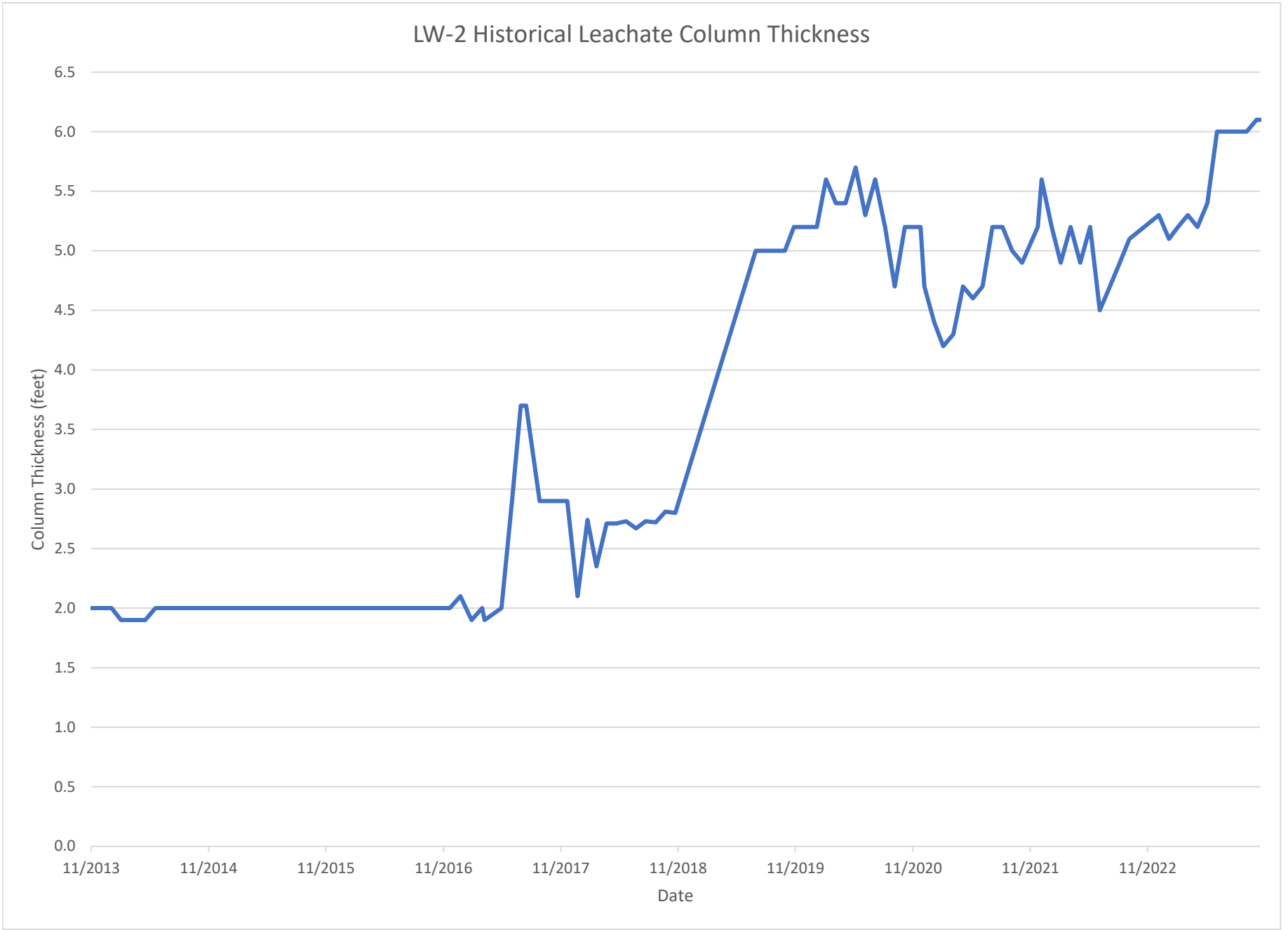
Bold GWPS *= A Site Specific GWPS that is equal to the Prediction Limit. All other GWPS are IAC 567-137 Statewaide Standards for Protected Groundwat*

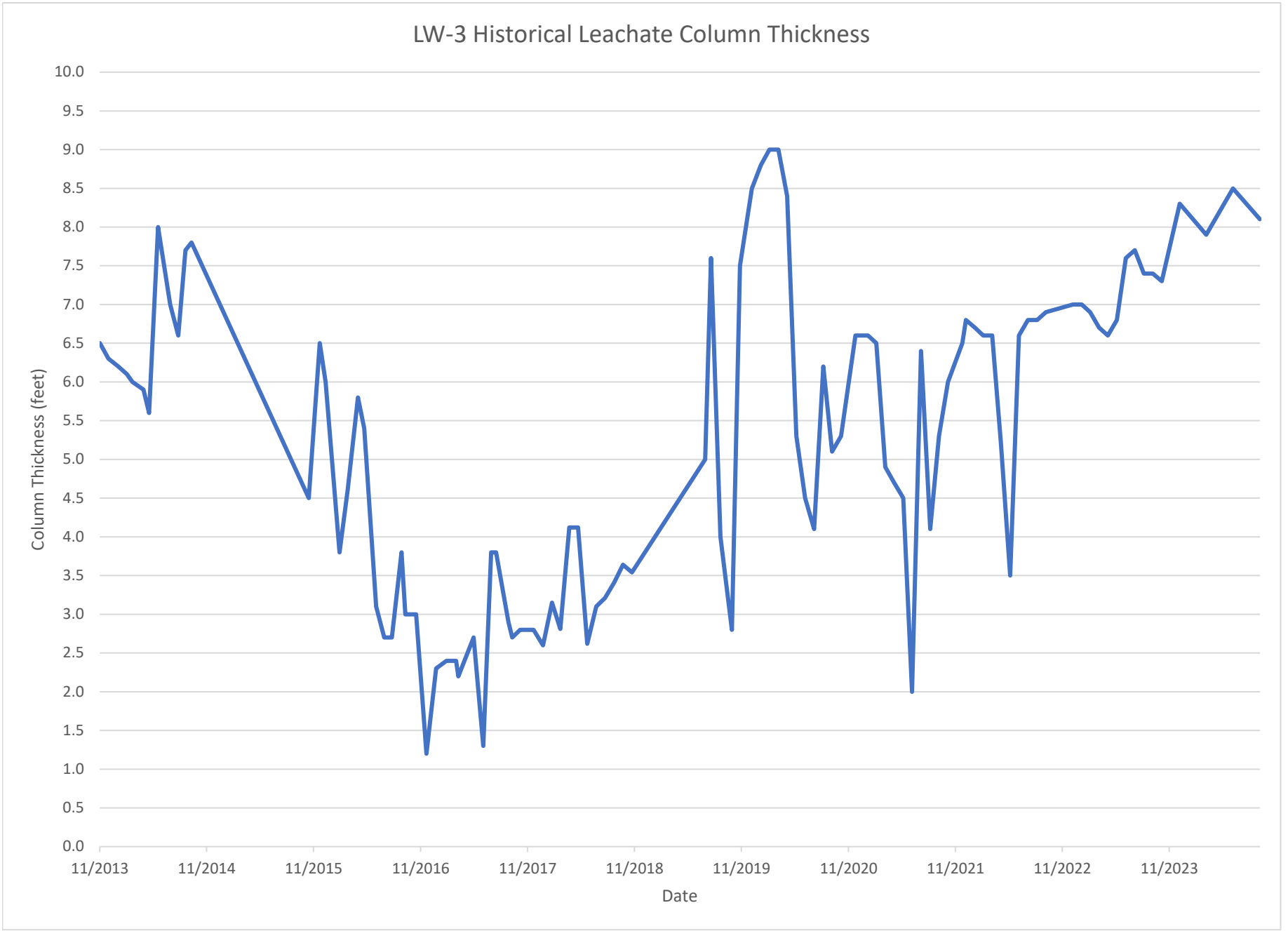
Table 12 – Leachate Levels

Table 12A
Leachate Elevation Data
Plymouth County Sanitary Landfill
75-SDP-1-74P

Well/TOC	LW-1	1310.51	Depth = 21.1		LW-2	1295.13	Depth = 25.2		LW-3	1290.87	Depth = 23.5		LW-4	1314.00	Depth = 31.1	
	Leachate Depth	Leachate Elevation	Bottom Well Elevation	Leachate Thickness (ft)	Leachate Depth	Leachate Elevation	Bottom Well Elevation	Leachate Thickness (ft)	Leachate Depth	Leachate Elevation	Bottom Well Elevation	Leachate Thickness (ft)	Leachate Depth	Leachate Elevation	Bottom Well Elevation	Leachate Thickness (ft)
11/01/19	20.00	1290.51	1289.41	1.10	20.00	1275.13	1269.93	5.20	16.00	1274.87	1267.37	7.50	24.00	1290.00	1282.90	7.10
12/01/19	20.00	1290.51	1289.41	1.10	20.00	1275.13	1269.93	5.20	15.30	1275.57	1267.37	8.20	24.00	1290.00	1282.90	7.10
01/01/20	20.00	1290.51	1289.41	1.10	20.00	1275.13	1269.93	5.20	15.00	1275.87	1267.37	8.50	24.00	1290.00	1282.90	7.10
02/01/20	20.00	1290.51	1289.41	1.10	20.00	1275.13	1269.93	5.20	14.70	1276.17	1267.37	8.80	23.40	1290.60	1282.90	7.70
03/01/20	21.00	1289.51	1289.41	0.10	19.60	1275.53	1269.93	5.60	14.50	1276.37	1267.37	9.00	24.00	1290.00	1282.90	7.10
04/01/20	20.00	1290.51	1289.41	1.10	19.80	1275.33	1269.93	5.40	14.50	1276.37	1267.37	9.00	25.00	1289.00	1282.90	6.10
05/01/20	20.00	1290.51	1289.41	1.10	19.80	1275.33	1269.93	5.40	15.10	1275.77	1267.37	8.40	24.50	1289.50	1282.90	6.60
06/01/20	20.40	1290.11	1289.41	0.70	19.50	1275.63	1269.93	5.70	18.20	1272.67	1267.37	5.30	23.00	1291.00	1282.90	8.10
07/01/20	20.50	1290.01	1289.41	0.60	19.90	1275.23	1269.93	5.30	19.00	1271.87	1267.37	4.50	29.00	1285.00	1282.90	2.10
08/01/20	20.00	1290.51	1289.41	1.10	19.60	1275.53	1269.93	5.60	19.40	1271.47	1267.37	4.10	29.00	1285.00	1282.90	2.10
09/01/20	20.40	1290.11	1289.41	0.70	20.00	1275.13	1269.93	5.20	17.30	1273.57	1267.37	6.20	29.30	1284.70	1282.90	1.80
10/01/20	20.30	1290.21	1289.41	0.80	20.50	1274.63	1269.93	4.70	18.40	1272.47	1267.37	5.10	29.00	1285.00	1282.90	2.10
11/01/20	21.30	1289.21	1289.41	-0.20	20.00	1275.13	1269.93	5.20	18.20	1272.67	1267.37	5.30	29.00	1285.00	1282.90	2.10
12/01/20	20.00	1290.51	1289.41	1.10	20.00	1275.13	1269.93	5.20	16.90	1273.97	1267.37	6.60	24.00	1290.00	1282.90	7.10
01/01/21	20.00	1290.51	1289.41	1.10	20.50	1274.63	1269.93	4.70	16.90	1273.97	1267.37	6.60	24.00	1290.00	1282.90	7.10
02/01/21	20.00	1290.51	1289.41	1.10	20.80	1274.33	1269.93	4.40	16.90	1273.97	1267.37	6.60	24.00	1290.00	1282.90	7.10
03/01/21	20.00	1290.51	1289.41	1.10	21.00	1274.13	1269.93	4.20	17.00	1273.87	1267.37	6.50	24.50	1289.50	1282.90	6.60
04/01/21	20.00	1290.51	1289.41	1.10	20.90	1274.23	1269.93	4.30	18.60	1272.27	1267.37	4.90	29.90	1284.10	1282.90	1.20
05/01/21	20.00	1290.51	1289.41	1.10	20.50	1274.63	1269.93	4.70	18.80	1272.07	1267.37	4.70	29.50	1284.50	1282.90	1.60
06/01/21	20.00	1290.51	1289.41	1.10	20.60	1274.53	1269.93	4.60	19.00	1271.87	1267.37	4.50	29.80	1284.20	1282.90	1.30
07/01/21	20.00	1290.51	1289.41	1.10	20.50	1274.63	1269.93	4.70	21.50	1269.37	1267.37	2.00	30.00	1284.00	1282.90	1.10
08/01/21	20.50	1290.01	1289.41	0.60	20.00	1275.13	1269.93	5.20	17.10	1273.77	1267.37	6.40	29.90	1284.10	1282.90	1.20
09/01/21	20.00	1290.51	1289.41	1.10	20.00	1275.13	1269.93	5.20	19.40	1271.47	1267.37	4.10	23.50	1290.50	1282.90	7.60
10/01/21	20.40	1290.11	1289.41	0.70	20.20	1274.93	1269.93	5.00	18.20	1272.67	1267.37	5.30	24.00	1290.00	1282.90	7.10
11/01/21	20.00	1290.51	1289.41	1.10	20.30	1274.83	1269.93	4.90	17.50	1273.37	1267.37	6.00	23.50	1290.50	1282.90	7.60
12/01/21	20.30	1290.21	1289.41	0.80	20.00	1275.13	1269.93	5.20	17.00	1273.87	1267.37	6.50	23.20	1290.80	1282.90	7.90
01/01/22	20.60	1289.91	1289.41	0.50	19.60	1275.53	1269.93	5.60	16.70	1274.17	1267.37	6.80	23.60	1290.40	1282.90	7.50
02/01/22	20.40	1290.11	1289.41	0.70	20.00	1275.13	1269.93	5.20	16.80	1274.07	1267.37	6.70	23.80	1290.20	1282.90	7.30
03/01/22	20.40	1290.11	1289.41	0.70	20.30	1274.83	1269.93	4.90	16.90	1273.97	1267.37	6.60	24.10	1289.90	1282.90	7.00
04/01/22	20.60	1289.91	1289.41	0.50	20.00	1275.13	1269.93	5.20	16.90	1273.97	1267.37	6.60	24.30	1289.70	1282.90	6.80
05/01/22	20.60	1289.91	1289.41	0.50	20.30	1274.83	1269.93	4.90	18.30	1272.57	1267.37	5.20	25.40	1288.60	1282.90	5.70
06/01/22	20.80	1289.71	1289.41	0.30	20.00	1275.13	1269.93	5.20	20.00	1270.87	1267.37	3.50	26.20	1287.80	1282.90	4.90
07/01/22	20.90	1289.61	1289.41	0.20	20.70	1274.43	1269.93	4.50	16.90	1273.97	1267.37	6.60	25.20	1288.80	1282.90	5.90
08/01/22	20.60	1289.91	1289.41	0.50	20.50	1274.63	1269.93	4.70	16.70	1274.17	1267.37	6.80	25.40	1288.60	1282.90	5.70
09/01/22	20.80	1289.71	1289.41	0.30	20.30	1274.83	1269.93	4.90	16.70	1274.17	1267.37	6.80	25.90	1288.10	1282.90	5.20
10/01/22	20.40	1290.11	1289.41	0.70	20.10	1275.03	1269.93	5.10	16.60	1274.27	1267.37	6.90	26.30	1287.70	1282.90	4.80
01/01/23	20.60	1289.91	1289.41	0.50	19.90	1275.23	1269.93	5.30	16.50	1274.37	1267.37	7.00	23.60	1290.40	1282.90	7.50
02/01/23	20.60	1289.91	1289.41	0.50	20.10	1275.03	1269.93	5.10	16.50	1274.37	1267.37	7.00	23.70	1290.30	1282.90	7.40
03/01/23	20.60	1289.91	1289.41	0.50	20.00	1275.13	1269.93	5.20	16.60	1274.27	1267.37	6.90	24.00	1290.00	1282.90	7.10
04/01/23	20.60	1289.91	1289.41	0.50	19.90	1275.23	1269.93	5.30	16.80	1274.07	1267.37	6.70	24.80	1289.20	1282.90	6.30
05/01/23	20.60	1289.91	1289.41	0.50	20.00	1275.13	1269.93	5.20	16.90	1273.97	1267.37	6.60	26.40	1287.60	1282.90	4.70
06/01/23	20.60	1289.91	1289.41	0.50	19.80	1275.33	1269.93	5.40	16.70	1274.17	1267.37	6.80	25.90	1288.10	1282.90	5.20
07/01/23	20.30	1290.21	1289.41	0.80	19.20	1275.93	1269.93	6.00	15.90	1274.97	1267.37	7.60	24.20	1289.80	1282.90	6.90
08/01/23	20.20	1290.31	1289.41	0.90	19.20	1275.93	1269.93	6.00	15.80	1275.07	1267.37	7.70	24.00	1290.00	1282.90	7.10
09/01/23	20.10	1290.41	1289.41	1.00	19.20	1275.93	1269.93	6.00	16.10	1274.77	1267.37	7.40	24.20	1289.80	1282.90	6.90
10/01/23	20.20	1290.31	1289.41	0.90	19.20	1275.93	1269.93	6.00	16.10	1274.77	1267.37	7.40	24.20	1289.80	1282.90	6.90
11/01/23	20.20	1290.31	1289.41	0.90	19.10	1276.03	1269.93	6.10	16.20	1274.67	1267.37	7.30	24.10	1289.90	1282.90	7.00
01/01/24	20.10	1290.41	1289.41	1.00	19.10	1276.03	1269.93	6.10	15.20	1275.67	1267.37	8.30	24.00	1290.00	1282.90	7.10
04/01/24	20.30	1290.21	1289.41	0.80	19.20	1275.93	1269.93	6.00	15.60	1275.27	1267.37	7.90	24.00	1290.00	1282.90	7.10
07/01/24	20.90	1289.61	1289.41	0.20	19.30	1275.83	1269.93	5.90	15.00	1275.87	1267.37	8.50	24.00	1290.00	1282.90	7.10
10/01/24	20.50	1290.01	1289.41	0.60	19.50	1275.63	1269.93	5.70	15.40	1275.47	1267.37	8.10	24.30	1289.70	1282.90	6.80
minimum	20.00	1289.21		-0.20	19.10	1274.13		4.20	14.50	1269.37		2.00	23.00	1284.00		1.10
maximum	21.30	1290.51		1.10	21.00	1276.03		6.10	21.50	1276.37		9.00	30.00	1291.00		8.10
average				0.75				5.23				6.55				5.75


LW-1 Historical Leachate Column Thickness
2.0
1.5
1.0
0.5
0.0
Column Thickness (feet)
11/2013
11/2014
11/2015
11/2016
11/2017
11/2018
11/2019
11/2020
11/2021
11/2022
11/2023
Date


LW-2 Historical Leachate Column Thickness
Column Thickness (feet)
6.5
6.0
5.5
5.0
4.5
4.0
3.5
3.0
2.5
2.0
1.5
1.0
0.5
0.0
11/2013
11/2014
11/2015
11/2016
11/2017
11/2018
11/2019
11/2020
11/2021
11/2022
Date


LW-3 Historical Leachate Column Thickness
Column Thickness (feet)
10.0
9.5
9.0
8.5
8.0
7.5
7.0
6.5
6.0
5.5
5.0
4.5
4.0
3.5
3.0
2.5
2.0
1.5
1.0
0.5
0.0
11/2013
11/2014
11/2015
11/2016
11/2017
11/2018
11/2019
11/2020
11/2021
11/2022
11/2023
Date

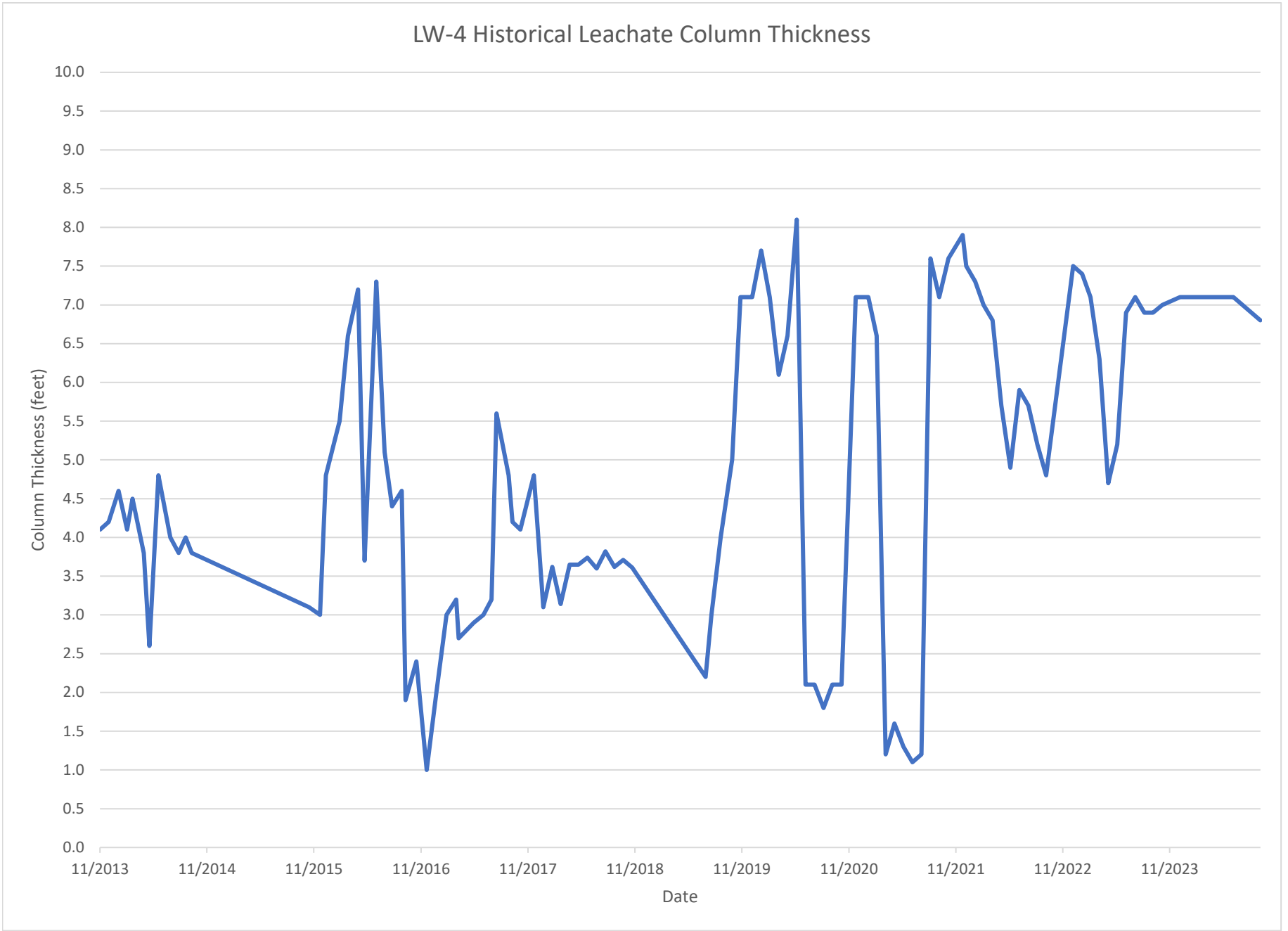

LW-4 Historical Leachate Column Thickness
Column Thickness (feet)
10.0
9.5
9.0
8.5
8.0
7.5
7.0
6.5
6.0
5.5
5.0
4.5
4.0
3.5
3.0
2.5
2.0
1.5
1.0
0.5
0.0
11/2013
11/2014
11/2015
11/2016
11/2017
11/2018
11/2019
11/2020
11/2021
11/2022
11/2023
Date

Table 13 – Gas Monitoring Summary

TABLE 13
Annual Methane Gas Evaluation Report
Plymouth County Sanitary Landfill
75-SDP-01-74P
2024

Location/Date	January-March		5/8/24		July-September		10/29/24	
	Screen	% LEL	Screen	% LEL	Screen	% LEL	Screen	% LEL
Equipment Building	N/A	0	N/A	0	N/A	0	N/A	0
Transfer Station	N/A	0	N/A	0	N/A	0	N/A	0
Storage/RCC	N/A	0	N/A	0	N/A	0	N/A	0
Office Building	N/A	0	N/A	0	N/A	0	N/A	0
Scale	N/A	0	N/A	0	N/A	0	N/A	0
MW-7	NM	0	S	0	E	0	E	0
MW-8	NM	0	E	0	E	0	E	0
MW-9	NM	0	E	0	E	0	E	0
MW-10	NM	0	E	0	E	0	E	0
MW-11	NM	0	S	0	E	0	E	0
MW-12	NM	0	E	0	E	0	E	0
MW-13	NM	0	E	0	E	0	E	0
MW-14	NM	0	E	0	E	0	E	0
MW-16	NM	0	E	0	E	0	E	0
MW-17	NM	0	S	0	E	0	E	0
Gas Vent GV-1	E	0	E	0	E	0	E	0
Gas Vent GV-2	E	0	E	0	E	0	E	0
Gas Vent GV-3	E	0	E	0	E	0	E	0
Gas Vent GV-4	E	**100**	E	**100**	E	**100**	E	0
Gas Vent GV-5	E	**100**	E	**100**	E	**100**	E	0
Gas Vent GV-6	E	**27**	E	0	E	**12**	E	**4**
Gas Vent GV-7	E	**100**	E	**66**	E	**100**	E	0
Gas Vent GV-8	E	**100**	E	**100**	E	**96**	E	0
Gas Vent GV-9	E	**100**	E	**100**	E	**100**	E	0
Gas Vent GV-10	E	0	E	0	E	**7**	E	0
Gas Vent GV-11	E	0	E	0	E	0	E	0

E= Exposed Screen
S= Submerged Screen
N/A = Not Applicable
NM = Not Measured

APPENDIX A

Field Sampling Forms

LANDFILL GROUNDWATER SAMPLING DATA SHEET

Project Information

Project Name	Plymouth County Sanitary Landfill
Project Location	LeMars, IA
Project Number	PCSWA.18001
SLF Permit No.	75-SDP-04-74P

Sampling Information

Date Sampled		5/2/2024
Sampling Crew		Kent Herbold
Equipment	Water Level	Geo Tech
	pH/Conductivit	Oakton
Equipment Calibration Date		5/2/2024
Equipment Calibration Time		5/2/2024

Weather Conditions

Recorded Depth	Well#	Date	Static Water Level	Measured Well Depth	Purge Time Start	Purge Time Finish	Bailing Equipment (see note)	Purge Volume Gal	Stabilized pH	Stabilized Conductivity	Stabilized Tempuratur e	Methane Gas	Capped Properly Y / N
32.7	MW-7			32.9									
27.6	MW-8			27.8									
25 5	MW-9			25 3									
32.8	MW-10			32.6									
39	MW-11	5/2/2024	27	39.1	10:12	10:15	P	4.84	7.33	1274	11.2	N	Y
53.6	MW-12	5/2/2024	45	53.6	9:28	9:31	P	3.44	6.62	1440	12.4	N	Y
36.56	MW-13	5/2/2024	28.4	36.5	10:32	10:35	P	3.24	7.49	1663	11.5	N	Y
50.16	MW-14	5/2/2024	40	50.9	9:50	9:58	P	4.36	6 62	1662	12.4	N	Y
43.2	MW-15			43.2									
37.3	MW-16			37.4									
32.6	MW-17			31 9									

Note: Low-Flow Pump (LF), Submersible (S), Peri Pump (P), Waterra (W), Dedicated Bailer (DB), Bailer (B)

LANDFILL GROUNDWATER SAMPLING DATA SHEET

Project Information

Project Name	Plymouth County Sanitary Landfill
Project Location	LeMars, IA
Project Number	PCSWA-18001
SLF Permit No.	75-SDP-04-74P

Sampling Information

Date Sampled	5-8 24
Sampling Crew	Kent Herbold
Equipment Water Level	Geo Tech
pH/Conductivity	OAKTON
Equipment Calibration Date	5-8 24
Equipment Calibration Time	5-8-24

Weather Conditions

Recorded Depth	Well#	Date	Static Water Level	Measured Well Depth	Purge Time Start	Purge Time Finish	Bailing Equipment (see note)	Purge Volume Gal	Stabilized pH	Stabilized Conductivity	Stabilized Tempuratur e	Methane Gas	Capped Properly Y / N
32.7	MW-7	5/8	19.2	32.9	8:58	9 04	P	5 4E	7.07	1686	13.3	N	Y
27 6	MW-8	5/8	22 3	27.8	9:40	9 42	P	2.32	7.00	1290	11.4	N	Y
25.5	MW-9	5/8	18	25.3	10 oc	10.04	P	292	7.06	1287	11.8	N	Y
32.8	MW-10			32.6									
39	MW-11			39.1									
53.6	MW-12			53.6									
36.56	MW-13	5/8	18.3	36.5	8 26	8 31	P	7.25	6.63	1550	10 6	N	Y
50.16	MW-14			50.9									
43.2	~~MW-15~~			43.2									
37.3	MW-16	5/8	22 2	37.4	10.50	10:38	P	6.08	7.14	1335	13 0		
32.6	MW-17	5/8	13.5	31.9	11 10	11 13	P	7.36	7.89	864	11.7	N	Y

Note: Low-Flow Pump (LF), Submersible (S), Peri Pump (P), Waterra (W), Dedicated Bailer (DB), Bailer (B)

mw-8 - Did pump dry purged 2.00 gallons
mw-16 - Did pump dry purged 5 oc gallons

LANDFILL GROUNDWATER SAMPLING DATA SHEET

Project Information

Project Name: Plymouth County Sanitary Landfill
Project Location: LeMars, IA
Project Number: PCSWA.18001
SLF Permit No.: 75-SDP-04-74P

Sampling Information

Date Sampled: 10/29/2024
Sampling Crew: Kent Herbold
Equipment: Water Level: geotech
pH/Conductivity: oakton
Equipment Calibration Date: 10/29/2024
Equipment Calibration Time: 8:00

Weather Conditions

Recorded Depth	Well#	Date	Static Water Level	Measured Well Depth	Time sampled	Bailing Equipment (see note)	Purge Volume Gal	Stabilized pH	Stabilized Conductivity	Stabilized Tempuratur e	Methane Gas	Capped Properly Y / N
32.7	MW-7	10/29/2024	24.6	32.9	8:31	B		6.68	1435	18.1	0	Y
27.6	MW-8	10/29/2024	21	27.8	8:46	B		7.25	1248	11.8	0	y
25.5	MW-9	10/29/2024	21	25.3	9:00	B		7.62	1146	17.1	0	y
32.8	MW-10	10/29/2024	28.9	32.6	9:14	B		6.74	1602	12.6	0	y
39	MW-11	10/29/2024	29.5	39.1	9:38	B		7.03	1345	12.8	0	y
53.6	MW-12	10/29/2024	44.1	53.6	9:51	B		6.45	1348	14.8	0	y
36.56	MW-13	10/29/2024	26.4	36.5	10:01	B		6.84	1604	12.5	0	y
50.16	MW-14	10/29/2024	38.4	50.9	10:16	B		6.5	1606	13.9	0	y
37.3	MW-16	10/29/2024	29	37.4	10:31	B		6.67	1302	12.2	0	y
32.6	MW-17	10/29/2024	19.3	31.9	10:45	B		7.14	824	11.4	0	y

Note: Low-Flow Pump (LF), Submersible (S), Peri Pump (P), Waterra (W), Dedicated Bailer (DB), Bailer (B)

APPENDIX B

Laboratory Analytical Data

eurofins | Environment Testing

ANALYTICAL REPORT

PREPARED FOR

Attn: Kent Herbold
Plymouth Co. Solid Waste
34898 150th Street
LeMars, Iowa 51031

Generated 5/22/2024 1:05:52 PM

JOB DESCRIPTION

Plymouth County Landfill

JOB NUMBER

310-280403-1

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls IA 50613

See page two for job notes and contact information.

myEOL

Job Notes

This report may not be reproduced except in full, and with written approval from the laboratory. The results relate only to the samples tested. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

The test results in this report relate only to the samples as received by the laboratory and will meet all requirements of the methodology, with any exceptions noted. This report shall not be reproduced except in full, without the express written approval of the laboratory. All questions should be directed to the Eurofins Environment Testing North Central, LLC Project Manager.

Authorization

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Authorized for release by
Emily Mathews, Project Management Assistant I
Emily.Mathews@et.eurofinsus.com
(319)277-2401

Table of Contents

Job Narrative
310-280403-1

Analytical test results meet all requirements of the associated regulatory program listed on the Accreditation/Certification Summary Page unless otherwise noted under the individual analysis. Data qualifiers are applied to indicate exceptions. Noncompliant quality control (QC) is further explained in narrative comments.

- Matrix QC may not be reported if insufficient sample or site-specific QC samples were not submitted. In these situations, to demonstrate precision and accuracy at a batch level, a LCS/LCSD may be performed, unless otherwise specified in the method.
- Surrogate and/or isotope dilution analyte recoveries (if applicable) which are outside of the QC window are confirmed unless attributed to a dilution or otherwise noted in the narrative.

Regulated compliance samples (e.g. SDWA, NPDES) must comply with the associated agency requirements/permits.

Receipt
The samples were received on 5/3/2024 9:25 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 9.4°C.

Receipt Exceptions
The following samples were received at the laboratory outside the required temperature criteria: MW-11 (310-280403-1), MW-12 (310-280403-2), MW-10 (310-280403-3) and MW-14 (310-280403-4). This does not meet regulatory requirements. The client was contacted regarding this issue, and the laboratory was instructed to proceed with analysis.

GC/MS VOA
No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

HPLC/IC
No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Metals
No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

General Chemistry
Method 9020B: Breakthrough exceeded 10% for the following sample:MW-14 (310-280403-4).

Method 9020B: Breakthrough exceeded 10% for the following samples:MW-11 (310-280403-1), MW-12 (310-280403-2) and MW-10 (310-280403-3).

Method 9020B: Breakthrough exceeded 10% for the following sample:MW-14 (310-280403-4).

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Sample Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
310-280403-1	MW-11	Water	05/02/24 10:12	05/03/24 09:25
310-280403-2	MW-12	Water	05/02/24 09:28	05/03/24 09:25
310-280403-3	MW-10	Water	05/02/24 10:32	05/03/24 09:25
310-280403-4	MW-14	Water	05/02/24 09:50	05/03/24 09:25

Detection Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Client Sample ID: MW-11 — Lab Sample ID: 310-280403-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	101		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	6.24		5.00		mg/L	1		5220D LL	Total/NA
Halogens, Total Organic	172		40.0		ug/L	1		9020B	Total/NA

Client Sample ID: MW-12 — Lab Sample ID: 310-280403-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	1.19		0.500		ug/L	1		8260D	Total/NA
cis-1,2-Dichloroethene	32.5	F1	1.00		ug/L	1		8260D	Total/NA
Vinyl chloride	4.30		1.00		ug/L	1		8260D	Total/NA
Chloride	40.7		5.00		mg/L	5		9056A	Total/NA
Iron	6.97		0.500		mg/L	1		6010D	Dissolved
Chemical Oxygen Demand	7.24		5.00		mg/L	1		5220D LL	Total/NA
Halogens, Total Organic	146		40.0		ug/L	1		9020B	Total/NA

Client Sample ID: MW-10 — Lab Sample ID: 310-280403-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	153		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	14.6		5.00		mg/L	1		5220D LL	Total/NA
Halogens, Total Organic	185		40.0		ug/L	1		9020B	Total/NA

Client Sample ID: MW-14 — Lab Sample ID: 310-280403-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	0.678		0.500		ug/L	1		8260D	Total/NA
cis-1,2-Dichloroethene	49.3		1.00		ug/L	1		8260D	Total/NA
Chloride	129		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	22.6		5.00		mg/L	1		5220D LL	Total/NA
Halogens, Total Organic	299		40.0		ug/L	1		9020B	Total/NA

This Detection Summary does not include radiochemical test results.

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Client Sample ID: MW-11
Date Collected: 05/02/24 10:12
Date Received: 05/03/24 09:25

Lab Sample ID: 310-280403-1
Matrix: Water

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**101**		5.00		mg/L			05/10/24 18:18	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/07/24 12:32	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/03/24 22:51	1
Chemical Oxygen Demand (SM 5220D LL)	**6.24**		5.00		mg/L			05/13/24 10:17	1
Halogens, Total Organic (SW846 9020B)	**172**		40.0		ug/L		05/20/24 08:19	05/20/24 17:05	1
Phenols, Total (SW846 9066)	<0.0200		0.0200		mg/L		05/06/24 09:15	05/06/24 17:07	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Client Sample ID: MW-12

Date Collected: 05/02/24 09:28
Date Received: 05/03/24 09:25

Lab Sample ID: 310-280403-2

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/09/24 23:53	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/09/24 23:53	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/09/24 23:53	1
Benzene	**1.19**		0.500		ug/L			05/09/24 23:53	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/09/24 23:53	1
cis-1,2-Dichloroethene	**32.5**	**F1**	1.00		ug/L			05/09/24 23:53	1
Methylene Chloride	<5.00		5.00		ug/L			05/09/24 23:53	1
Tetrachloroethene	<1.00		1.00		ug/L			05/09/24 23:53	1
Trichloroethene	<1.00		1.00		ug/L			05/09/24 23:53	1
Vinyl chloride	**4.30**		1.00		ug/L			05/09/24 23:53	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*119*		*73 - 130*		*05/09/24 23:53*	*1*
Toluene-d8 (Surr)	*94*		*80 - 120*		*05/09/24 23:53*	*1*
4-Bromofluorobenzene (Surr)	*100*		*80 - 120*		*05/09/24 23:53*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**40.7**		5.00		mg/L			05/10/24 18:31	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**6.97**		0.500		mg/L			05/07/24 12:36	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/03/24 22:55	1
Chemical Oxygen Demand (SM 5220D LL)	**7.24**		5.00		mg/L			05/13/24 10:17	1
Halogens, Total Organic (SW846 9020B)	**146**		40.0		ug/L		05/20/24 08:19	05/20/24 16:15	1
Phenols, Total (SW846 9066)	<0.0200		0.0200		mg/L		05/06/24 09:15	05/06/24 17:07	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Client Sample ID: MW-10

Date Collected: 05/02/24 10:32
Date Received: 05/03/24 09:25

Lab Sample ID: 310-280403-3

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 00:15	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 00:15	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 00:15	1
Benzene	<0.500		0.500		ug/L			05/10/24 00:15	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 00:15	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			05/10/24 00:15	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 00:15	1
Tetrachloroethene	<1.00		1.00		ug/L			05/10/24 00:15	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 00:15	1
Vinyl chloride	<1.00		1.00		ug/L			05/10/24 00:15	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*120*		*73 - 130*		*05/10/24 00:15*	*1*
Toluene-d8 (Surr)	*94*		*80 - 120*		*05/10/24 00:15*	*1*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*		*05/10/24 00:15*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**153**		5.00		mg/L			05/10/24 19:08	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/07/24 12:44	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/03/24 22:53	1
Chemical Oxygen Demand (SM 5220D LL)	**14.6**		5.00		mg/L			05/13/24 10:17	1
Halogens, Total Organic (SW846 9020B)	**185**		40.0		ug/L		05/20/24 08:19	05/20/24 17:56	1
Phenols, Total (SW846 9066)	<0.0220		0.0220		mg/L		05/06/24 09:15	05/06/24 17:07	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Client Sample ID: MW-14

Date Collected: 05/02/24 09:50
Date Received: 05/03/24 09:25

Lab Sample ID: 310-280403-4

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 00:38	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 00:38	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 00:38	1
Benzene	**0.678**		0.500		ug/L			05/10/24 00:38	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 00:38	1
cis-1,2-Dichloroethene	**49.3**		1.00		ug/L			05/10/24 00:38	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 00:38	1
Tetrachloroethene	<1.00		1.00		ug/L			05/10/24 00:38	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 00:38	1
Vinyl chloride	<1.00		1.00		ug/L			05/10/24 00:38	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*119*		*73 - 130*		*05/10/24 00:38*	*1*
Toluene-d8 (Surr)	*94*		*80 - 120*		*05/10/24 00:38*	*1*
4-Bromofluorobenzene (Surr)	*100*		*80 - 120*		*05/10/24 00:38*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**129**		5.00		mg/L			05/10/24 19:21	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/07/24 12:46	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/03/24 22:54	1
Chemical Oxygen Demand (SM 5220D LL)	**22.6**		5.00		mg/L			05/13/24 10:17	1
Halogens, Total Organic (SW846 9020B)	**299**		40.0		ug/L		05/21/24 09:03	05/21/24 13:28	1
Phenols, Total (SW846 9066)	<0.0200		0.0200		mg/L		05/06/24 09:15	05/06/24 17:08	1

Definitions/Glossary

Client: Plymouth Co. Solid Waste
Job ID: 310-280403-1
Project/Site: Plymouth County Landfill

Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control limits.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Surrogate Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Method: 8260D - Volatile Organic Compounds by GC/MS

Matrix: Water

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)		
		DBFM	TOL	BFB
Lab Sample ID	Client Sample ID	(73-130)	(80-120)	(80-120)
310-280403-2	MW-12	119	94	100
310-280403-2 MS	MW-12	107	95	100
310-280403-2 MSD	MW-12	104	95	100
310-280403-3	MW-10	120	94	101
310-280403-4	MW-14	119	94	100
LCS 310-421148/6	Lab Control Sample	105	96	99
LCS 310-421148/7	Lab Control Sample	122	95	101
MB 310-421148/5	Method Blank	118	95	100

Surrogate Legend

DBFM = Dibromofluoromethane (Surr)

TOL = Toluene-d8 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

Method: 8260D - Volatile Organic Compounds by GC/MS

Lab Sample ID: MB 310-421148/5
Matrix: Water
Analysis Batch: 421148

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/09/24 21:14	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/09/24 21:14	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/09/24 21:14	1
Benzene	<0.500		0.500		ug/L			05/09/24 21:14	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/09/24 21:14	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			05/09/24 21:14	1
Methylene Chloride	<5.00		5.00		ug/L			05/09/24 21:14	1
Tetrachloroethene	<1.00		1.00		ug/L			05/09/24 21:14	1
Trichloroethene	<1.00		1.00		ug/L			05/09/24 21:14	1
Vinyl chloride	<1.00		1.00		ug/L			05/09/24 21:14	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*118*		*73 - 130*		*05/09/24 21:14*	*1*
Toluene-d8 (Surr)	*95*		*80 - 120*		*05/09/24 21:14*	*1*
4-Bromofluorobenzene (Surr)	*100*		*80 - 120*		*05/09/24 21:14*	*1*

Lab Sample ID: LCS 310-421148/6
Matrix: Water
Analysis Batch: 421148

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
1,1,1-Trichloroethane			20.0	21.69		ug/L		108	73 - 129		
1,2-Dichloroethane			20.0	21.03		ug/L		105	71 - 125		
1,2-Dichloropropane			20.0	21.15		ug/L		106	73 - 124		
Benzene			20.0	20.60		ug/L		103	72 - 124		
Chlorodibromomethane			20.0	18.74		ug/L		94	71 - 121		
cis-1,2-Dichloroethene			20.0	20.11		ug/L		101	74 - 123		
Methylene Chloride			20.0	20.18		ug/L		101	50 - 150		
Tetrachloroethene			20.0	19.64		ug/L		98	71 - 130		
Trichloroethene			20.0	21.02		ug/L		105	72 - 126		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*105*		*73 - 130*
Toluene-d8 (Surr)	*96*		*80 - 120*
4-Bromofluorobenzene (Surr)	*99*		*80 - 120*

Lab Sample ID: LCS 310-421148/7
Matrix: Water
Analysis Batch: 421148

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Vinyl chloride			20.0	23.23		ug/L		116	56 - 140		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*122*		*73 - 130*
Toluene-d8 (Surr)	*95*		*80 - 120*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*

Method: 8260D - Volatile Organic Compounds by GC/MS (Continued)

Lab Sample ID: 310-280403-2 MS
Matrix: Water
Analysis Batch: 421148

Client Sample ID: MW-12
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
1,1,1-Trichloroethane	<1.00		20.0	16.47		ug/L		82	52 - 130
1,2-Dichloroethane	<1.00		20.0	17.66		ug/L		88	51 - 130
1,2-Dichloropropane	<1.00		20.0	17.71		ug/L		89	57 - 130
Benzene	1.19		20.0	17.78		ug/L		83	46 - 130
Chlorodibromomethane	<5.00		20.0	15.57		ug/L		78	54 - 130
cis-1,2-Dichloroethene	32.5	F1	20.0	43.59		ug/L		56	45 - 130
Methylene Chloride	<5.00		20.0	17.17		ug/L		86	37 - 150
Tetrachloroethene	<1.00		20.0	14.01		ug/L		70	47 - 130
Trichloroethene	<1.00		20.0	16.57		ug/L		80	51 - 130

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*107*		*73 - 130*
Toluene-d8 (Surr)	*95*		*80 - 120*
4-Bromofluorobenzene (Surr)	*100*		*80 - 120*

Lab Sample ID: 310-280403-2 MSD
Matrix: Water
Analysis Batch: 421148

Client Sample ID: MW-12
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
1,1,1-Trichloroethane	<1.00		20.0	15.36		ug/L		77	52 - 130	7	20
1,2-Dichloroethane	<1.00		20.0	16.69		ug/L		83	51 - 130	6	20
1,2-Dichloropropane	<1.00		20.0	16.63		ug/L		83	57 - 130	6	20
Benzene	1.19		20.0	16.70		ug/L		78	46 - 130	6	20
Chlorodibromomethane	<5.00		20.0	15.28		ug/L		76	54 - 130	2	20
cis-1,2-Dichloroethene	32.5	F1	20.0	39.95	F1	ug/L		37	45 - 130	9	20
Methylene Chloride	<5.00		20.0	15.91		ug/L		80	37 - 150	8	24
Tetrachloroethene	<1.00		20.0	13.61		ug/L		68	47 - 130	3	20
Trichloroethene	<1.00		20.0	15.81		ug/L		77	51 - 130	5	20

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*104*		*73 - 130*
Toluene-d8 (Surr)	*95*		*80 - 120*
4-Bromofluorobenzene (Surr)	*100*		*80 - 120*

Method: 9056A - Anions, Ion Chromatography

Lab Sample ID: MB 310-421482/3
Matrix: Water
Analysis Batch: 421482

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<1.00		1.00		mg/L			05/10/24 16:50	1

Method: 9056A - Anions, Ion Chromatography (Continued)

Lab Sample ID: LCS 310-421482/4
Matrix: Water
Analysis Batch: 421482

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chloride	10.0	9.953		mg/L		100	90 - 110

Method: 6010D - Metals (ICP)

Lab Sample ID: MB 310-420902/90
Matrix: Water
Analysis Batch: 420902

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/07/24 12:28	1

Lab Sample ID: LCS 310-420902/91
Matrix: Water
Analysis Batch: 420902

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Iron	20.0	19.89		mg/L		99	80 - 120

Lab Sample ID: 310-280403-1 DU
Matrix: Water
Analysis Batch: 420902

Client Sample ID: MW-11
Prep Type: Dissolved

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Iron	<0.500		<0.500		mg/L		NC	20

Method: 350.1 - Nitrogen, Ammonia

Lab Sample ID: MB 310-420681/79
Matrix: Water
Analysis Batch: 420681

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	<0.200		0.200		mg/L			05/03/24 22:34	1

Lab Sample ID: LCS 310-420681/80
Matrix: Water
Analysis Batch: 420681

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Ammonia	8.55	9.007		mg/L		105	90 - 110

Method: 5220D LL - COD

Lab Sample ID: MB 310-421462/32
Matrix: Water
Analysis Batch: 421462

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	<5.00		5.00		mg/L			05/13/24 10:17	1

Method: 5220D LL - COD (Continued)

Lab Sample ID: MB 310-421462/60
Matrix: Water
Analysis Batch: 421462

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	<5.00		5.00		mg/L			05/13/24 10:17	1

Lab Sample ID: LCS 310-421462/33
Matrix: Water
Analysis Batch: 421462

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chemical Oxygen Demand	125	122.0		mg/L		97	85 - 115

Method: 9020B - Organic Halides, Total (TOX)

Lab Sample ID: MB 680-839020/1-A
Matrix: Water
Analysis Batch: 839027

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 839020

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Halogens, Total Organic	<40.0		40.0		ug/L		05/20/24 06:14	05/20/24 09:08	1

Lab Sample ID: LCS 680-839020/2-A
Matrix: Water
Analysis Batch: 839027

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 839020

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Halogens, Total Organic	400	415.2		ug/L		104	60 - 140

Lab Sample ID: MB 680-839040/1-A
Matrix: Water
Analysis Batch: 839047

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 839040

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Halogens, Total Organic	<40.0		40.0		ug/L		05/20/24 08:19	05/20/24 09:55	1

Lab Sample ID: LCS 680-839040/2-A
Matrix: Water
Analysis Batch: 839047

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 839040

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Halogens, Total Organic	400	390.0		ug/L		98	60 - 140

Lab Sample ID: MB 680-839272/1-A
Matrix: Water
Analysis Batch: 839297

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 839272

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Halogens, Total Organic	<40.0		40.0		ug/L		05/21/24 09:03	05/21/24 13:28	1

Method: 9020B - Organic Halides, Total (TOX) (Continued)

Lab Sample ID: LCS 680-839272/2-A
Matrix: Water
Analysis Batch: 839297

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 839272

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Halogens, Total Organic	400	390.0		ug/L		98	60 - 140

Method: 9066 - Phenolics, Total Recoverable

Lab Sample ID: MB 310-420733/1-A
Matrix: Water
Analysis Batch: 420802

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 420733

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Phenols, Total	<0.0200		0.0200		mg/L		05/06/24 09:15	05/06/24 16:58	1

Lab Sample ID: LCS 310-420733/2-A
Matrix: Water
Analysis Batch: 420802

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 420733

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Phenols, Total	0.100	0.09289		mg/L		93	90 - 110

QC Association Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

GC/MS VOA

Analysis Batch: 421148

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-2	MW-12	Total/NA	Water	8260D	
310-280403-3	MW-10	Total/NA	Water	8260D	
310-280403-4	MW-14	Total/NA	Water	8260D	
MB 310-421148/5	Method Blank	Total/NA	Water	8260D	
LCS 310-421148/6	Lab Control Sample	Total/NA	Water	8260D	
LCS 310-421148/7	Lab Control Sample	Total/NA	Water	8260D	
310-280403-2 MS	MW-12	Total/NA	Water	8260D	
310-280403-2 MSD	MW-12	Total/NA	Water	8260D	

HPLC/IC

Analysis Batch: 421482

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Total/NA	Water	9056A	
310-280403-2	MW-12	Total/NA	Water	9056A	
310-280403-3	MW-10	Total/NA	Water	9056A	
310-280403-4	MW-14	Total/NA	Water	9056A	
MB 310-421482/3	Method Blank	Total/NA	Water	9056A	
LCS 310-421482/4	Lab Control Sample	Total/NA	Water	9056A	

Metals

Analysis Batch: 420902

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Dissolved	Water	6010D	
310-280403-2	MW-12	Dissolved	Water	6010D	
310-280403-3	MW-10	Dissolved	Water	6010D	
310-280403-4	MW-14	Dissolved	Water	6010D	
MB 310-420902/90	Method Blank	Total/NA	Water	6010D	
LCS 310-420902/91	Lab Control Sample	Total/NA	Water	6010D	
310-280403-1 DU	MW-11	Dissolved	Water	6010D	

General Chemistry

Analysis Batch: 420681

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Total/NA	Water	350.1	
310-280403-2	MW-12	Total/NA	Water	350.1	
310-280403-3	MW-10	Total/NA	Water	350.1	
310-280403-4	MW-14	Total/NA	Water	350.1	
MB 310-420681/79	Method Blank	Total/NA	Water	350.1	
LCS 310-420681/80	Lab Control Sample	Total/NA	Water	350.1	

Prep Batch: 420733

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Total/NA	Water	Distill/Phenol	
310-280403-2	MW-12	Total/NA	Water	Distill/Phenol	
310-280403-3	MW-10	Total/NA	Water	Distill/Phenol	
310-280403-4	MW-14	Total/NA	Water	Distill/Phenol	
MB 310-420733/1-A	Method Blank	Total/NA	Water	Distill/Phenol	
LCS 310-420733/2-A	Lab Control Sample	Total/NA	Water	Distill/Phenol	

General Chemistry

Analysis Batch: 420802

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Total/NA	Water	9066	420733
310-280403-2	MW-12	Total/NA	Water	9066	420733
310-280403-3	MW-10	Total/NA	Water	9066	420733
310-280403-4	MW-14	Total/NA	Water	9066	420733
MB 310-420733/1-A	Method Blank	Total/NA	Water	9066	420733
LCS 310-420733/2-A	Lab Control Sample	Total/NA	Water	9066	420733

Analysis Batch: 421462

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Total/NA	Water	5220D LL	
310-280403-2	MW-12	Total/NA	Water	5220D LL	
310-280403-3	MW-10	Total/NA	Water	5220D LL	
310-280403-4	MW-14	Total/NA	Water	5220D LL	
MB 310-421462/32	Method Blank	Total/NA	Water	5220D LL	
MB 310-421462/60	Method Blank	Total/NA	Water	5220D LL	
LCS 310-421462/33	Lab Control Sample	Total/NA	Water	5220D LL	

Prep Batch: 839020

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 680-839020/1-A	Method Blank	Total/NA	Water	Carbon Trap	
LCS 680-839020/2-A	Lab Control Sample	Total/NA	Water	Carbon Trap	

Analysis Batch: 839027

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 680-839020/1-A	Method Blank	Total/NA	Water	9020B	839020
LCS 680-839020/2-A	Lab Control Sample	Total/NA	Water	9020B	839020

Prep Batch: 839040

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Total/NA	Water	Carbon Trap	
310-280403-2	MW-12	Total/NA	Water	Carbon Trap	
310-280403-3	MW-10	Total/NA	Water	Carbon Trap	
MB 680-839040/1-A	Method Blank	Total/NA	Water	Carbon Trap	
LCS 680-839040/2-A	Lab Control Sample	Total/NA	Water	Carbon Trap	

Analysis Batch: 839047

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-1	MW-11	Total/NA	Water	9020B	839040
310-280403-2	MW-12	Total/NA	Water	9020B	839040
310-280403-3	MW-10	Total/NA	Water	9020B	839040
MB 680-839040/1-A	Method Blank	Total/NA	Water	9020B	839040
LCS 680-839040/2-A	Lab Control Sample	Total/NA	Water	9020B	839040

Prep Batch: 839272

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-4	MW-14	Total/NA	Water	Carbon Trap	
MB 680-839272/1-A	Method Blank	Total/NA	Water	Carbon Trap	
LCS 680-839272/2-A	Lab Control Sample	Total/NA	Water	Carbon Trap	

QC Association Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

General Chemistry

Analysis Batch: 839297

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280403-4	MW-14	Total/NA	Water	9020B	839272
MB 680-839272/1-A	Method Blank	Total/NA	Water	9020B	839272
LCS 680-839272/2-A	Lab Control Sample	Total/NA	Water	9020B	839272

Lab Chronicle

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Client Sample ID: MW-11

Lab Sample ID: 310-280403-1

Date Collected: 05/02/24 10:12

Matrix: Water

Date Received: 05/03/24 09:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		5	421482	QTZ5	EET CF	05/10/24 18:18
Dissolved	Analysis	6010D		1	420902	ZRI4	EET CF	05/07/24 12:32
Total/NA	Analysis	350.1		1	420681	ZJX4	EET CF	05/03/24 22:51
Total/NA	Analysis	5220D LL		1	421462	HE7K	EET CF	05/13/24 10:17
Total/NA	Prep	Carbon Trap			839040	CLJ	EET SAV	05/20/24 08:19
Total/NA	Analysis	9020B		1	839047	CLJ	EET SAV	05/20/24 17:05
Total/NA	Prep	Distill/Phenol			420733	ENB7	EET CF	05/06/24 09:15
Total/NA	Analysis	9066		1	420802	ZJX4	EET CF	05/06/24 17:07

Client Sample ID: MW-12

Lab Sample ID: 310-280403-2

Date Collected: 05/02/24 09:28

Matrix: Water

Date Received: 05/03/24 09:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421148	FE5V	EET CF	05/09/24 23:53
Total/NA	Analysis	9056A		5	421482	QTZ5	EET CF	05/10/24 18:31
Dissolved	Analysis	6010D		1	420902	ZRI4	EET CF	05/07/24 12:36
Total/NA	Analysis	350.1		1	420681	ZJX4	EET CF	05/03/24 22:55
Total/NA	Analysis	5220D LL		1	421462	HE7K	EET CF	05/13/24 10:17
Total/NA	Prep	Carbon Trap			839040	CLJ	EET SAV	05/20/24 08:19
Total/NA	Analysis	9020B		1	839047	CLJ	EET SAV	05/20/24 16:15
Total/NA	Prep	Distill/Phenol			420733	ENB7	EET CF	05/06/24 09:15
Total/NA	Analysis	9066		1	420802	ZJX4	EET CF	05/06/24 17:07

Client Sample ID: MW-10

Lab Sample ID: 310-280403-3

Date Collected: 05/02/24 10:32

Matrix: Water

Date Received: 05/03/24 09:25

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421148	FE5V	EET CF	05/10/24 00:15
Total/NA	Analysis	9056A		5	421482	QTZ5	EET CF	05/10/24 19:08
Dissolved	Analysis	6010D		1	420902	ZRI4	EET CF	05/07/24 12:44
Total/NA	Analysis	350.1		1	420681	ZJX4	EET CF	05/03/24 22:53
Total/NA	Analysis	5220D LL		1	421462	HE7K	EET CF	05/13/24 10:17
Total/NA	Prep	Carbon Trap			839040	CLJ	EET SAV	05/20/24 08:19
Total/NA	Analysis	9020B		1	839047	CLJ	EET SAV	05/20/24 17:56
Total/NA	Prep	Distill/Phenol			420733	ENB7	EET CF	05/06/24 09:15
Total/NA	Analysis	9066		1	420802	ZJX4	EET CF	05/06/24 17:07

Lab Chronicle

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Client Sample ID: MW-14

Date Collected: 05/02/24 09:50
Date Received: 05/03/24 09:25

Lab Sample ID: 310-280403-4

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421148	FE5V	EET CF	05/10/24 00:38
Total/NA	Analysis	9056A		5	421482	QTZ5	EET CF	05/10/24 19:21
Dissolved	Analysis	6010D		1	420902	ZRI4	EET CF	05/07/24 12:46
Total/NA	Analysis	350.1		1	420681	ZJX4	EET CF	05/03/24 22:54
Total/NA	Analysis	5220D LL		1	421462	HE7K	EET CF	05/13/24 10:17
Total/NA	Prep	Carbon Trap			839272	CLJ	EET SAV	05/21/24 09:03
Total/NA	Analysis	9020B		1	839297	CLJ	EET SAV	05/21/24 13:28
Total/NA	Prep	Distill/Phenol			420733	ENB7	EET CF	05/06/24 09:15
Total/NA	Analysis	9066		1	420802	ZJX4	EET CF	05/06/24 17:08

Laboratory References:

EET CF = Eurofins Cedar Falls, 3019 Venture Way, Cedar Falls, IA 50613, TEL (319)277-2401

EET SAV = Eurofins Savannah, 5102 LaRoche Avenue, Savannah, GA 31404, TEL (912)354-7858

Accreditation/Certification Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Laboratory: Eurofins Cedar Falls

The accreditations/certifications listed below are applicable to this report.

Authority	Program	Identification Number	Expiration Date
Iowa	State	007	12-01-25

Laboratory: Eurofins Savannah

All accreditations/certifications held by this laboratory are listed. Not all accreditations/certifications are applicable to this report.

Authority	Program	Identification Number	Expiration Date
	AFCEE	SAVLAB	
Alabama	State	41450	06-30-24
ANAB	Dept. of Defense ELAP	L2463	09-22-24
Arkansas (DW)	State	GA00006	06-30-24
California	State	2939	06-30-24
Florida	NELAP	E87052	06-30-24
Georgia	State	E87052	06-30-24
Georgia (DW)	State	803	06-30-24
Hawaii	State	<cert No.>	06-30-24
Illinois	NELAP	200022	11-30-24
Indiana	State	C-GA-02	06-30-24
Iowa	State	353	07-01-25
Kentucky (UST)	State	NA	06-30-24
Louisiana	NELAP	30690	06-30-24
Louisiana (All)	NELAP	30690	06-30-24
Louisiana (DW)	State	LA009	12-31-24
Maine	State	GA00006	09-25-24
Maryland	State	250	12-31-24
Massachusetts	State	M-GA006	06-30-24
Michigan	State	9925	06-30-24
Mississippi	State	<cert No.>	06-30-24
Nebraska	State	NE-OS-7-04	06-30-24
New Jersey	NELAP	GA769	06-30-24
New Mexico	State	GA00006	06-30-24
North Carolina (DW)	State	13701	07-31-24
North Carolina (WW/SW)	State	269	12-31-24
Pennsylvania	NELAP	68-00474	06-30-24
Puerto Rico	State	GA00006	01-01-25
South Carolina	State	98001	06-30-24
Tennessee	State	TN02961	06-30-24
Texas	NELAP	T1047004185	11-30-24
Texas	TCEQ Water Supply	T104704185	06-30-24
USDA	US Federal Programs	P330-18-00313	04-04-27
Virginia	NELAP	460161	06-14-24
Wyoming	State	8TMS-L	06-30-24

Method Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280403-1

Method	Method Description	Protocol	Laboratory
8260D	Volatile Organic Compounds by GC/MS	SW846	EET CF
9056A	Anions, Ion Chromatography	SW846	EET CF
6010D	Metals (ICP)	SW846	EET CF
350.1	Nitrogen, Ammonia	EPA	EET CF
5220D LL	COD	SM	EET CF
9020B	Organic Halides, Total (TOX)	SW846	EET SAV
9066	Phenolics, Total Recoverable	SW846	EET CF
5030B	Purge and Trap	SW846	EET CF
Carbon Trap	Carbon Trap Preparation	EPA-17	EET SAV
Distill/Phenol	Distillation, Phenolics	None	EET CF

Protocol References:

EPA = US Environmental Protection Agency

EPA-17 = "Method 1650, Revision A, Adsorbable Organic Halides By Adsorption And Colormetric Titration," EPA, February 1992

None = None

SM = "Standard Methods For The Examination Of Water And Wastewater"

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

EET CF = Eurofins Cedar Falls, 3019 Venture Way, Cedar Falls, IA 50613, TEL (319)277-2401

EET SAV = Eurofins Savannah, 5102 LaRoche Avenue, Savannah, GA 31404, TEL (912)354-7858

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310-280403 Chain of Custody

Cooler/Sample Receipt and Temperature Log Form

Client Information

Client: Plymouth Co Solid Waste

City/State: CITY | STATE | Project:

Receipt Information

Date/Time Received: DATE 5/3/24 TIME 0925 | Received By. EM

Delivery Type: ☐ UPS ☒ FedEx ☐ FedEx Ground ☐ US Mail ☐ Spee-Dee ☐ Lab Courier ☐ Lab Field Services ☐ Client Drop-off ☐ Other:_____

Condition of Cooler/Containers

Sample(s) received in Cooler?	☒ Yes	☐ No	*If yes:* Cooler ID:
Multiple Coolers?	☐ Yes	☒ No	*If yes:* Cooler # _____ of _____
Cooler Custody Seals Present? No	☒ Yes	☐ No	*If yes:* Cooler custody seals intact? ☒ Yes ☐
Sample Custody Seals Present? No	☐ Yes	☒ No	*If yes:* Sample custody seals intact? ☐ Yes ☐
Trip Blank Present?	☐ Yes	☒ No	*If yes:* Which VOA samples are in cooler? ↓

Temperature Record

Coolant: ☒ Wet ice ☐ Blue ice ☐ Dry ice ☐ Other:_____ ☐ NONE

Thermometer ID: Y | Correction Factor (°C): 0

• **Temp Blank Temperature** – If no temp blank, or temp blank temperature above criteria, proceed to Sample Container Temperature

Uncorrected Temp (°C): 9.4 | Corrected Temp (°C): 9.4

• **Sample Container Temperature**

	CONTAINER 1	CONTAINER 2
Container(s) used:	250ml Plastic	
Uncorrected Temp (°C):	9.8	
Corrected Temp (°C):	9.8	

Exceptions Noted

1) If temperature exceeds criteria, was sample(s) received same day of sampling? ☐ Yes ☐ No
   a) *If yes:* Is there evidence that the chilling process began? ☐ Yes ☐ No

2) If temperature is <0°C, are there obvious signs that the integrity of sample containers is compromised? (e.g., bulging septa, broken/cracked bottles, frozen solid?) ☐ Yes ☐ No

NOTE: If yes, contact PM before proceeding. If no, proceed with login

Additional Comments

Sample MW-13 sent w/ MW-10 label stickers, no VOA vials, TB on Chain not in cooler

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls, IA 50613
Phone (319) 277-2401 Phone (319) 277-2425

Chain of Custody Record

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Client Information	Sampler: Kent Herbold	Lab PM: Bindert, Zach T	Carrier Tracking No(s):	COC No: 310-90365-24965.2
Client Contact: Kent Herbold	Phone: 712-260-2395	E-Mail: Zach.Bindert@et.eurofinsus.com	State of Origin: Iowa	Page: Page 2 of 2
Company: Plymouth Co. Solid Waste	PWSID:	Analysis Requested		Job #:
Address: 34898 150th Street	Due Date Requested:			Preservation Codes: A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Y - Trizma, Z - other (specify)
City: LeMars	TAT Requested (days):			
State, Zip: IA, 51031	Compliance Project: Δ Yes Δ No			
Phone: 712-260-2395	PO #: Purchase Order not required			
Email: kherbold@plymouthcountyiowa.gov kherbold@co.plymouth.ia.us	WO #:			
Project Name: Plymouth County Landfill - March 2024	Project #: 31002859			
Site: Plymouth County Landfill	SSOW#:			Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	9056A_ORGFM_28D - Chloride	Ammonia - 350.1, COD - 5220D_LL	9066 - Total Recoverable Phenolics	8260D - (MOD) Volatile Custom Sublist	9020B - TOX	6010D - Dissolved Iron							Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	S	S	A	S	D								
Trip Blank				Water																
MW-11	5-2-24	10:12	G	water	X															
MW-12	5-2-24	9:28	G	water	X															
MW-13	5-2-24	10:32	G	water	X															
MW-14	5-2-24	9:50	G	water	X															

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☒ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
			MW	5-3-24 925	
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.	Cooler Temperature(s) °C and Other Remarks:

Ver 01/16/2019

LANDFILL GROUNDWATER SAMPLING DATA SHEET

Project Information

Project Name: Plymouth County Sanitary Landfill
Project Location: LeMars, IA
Project Number: PCSWA.18001
SLF Permit No.: 75-SDP-04-74P

Sampling Information

Date Sampled: 5/2/2024
Sampling Crew: Kent Herbold
Equipment Water Level: Geo Tech
pH/Conductivi: Oakton
Equipment Calibration Date: 5/2/2024
Equipment Calibration Time: 5/2/2024

Weather Conditions

Recorded Depth	Well#	Date	Static Water Level	Measured Well Depth	Purge Time Start	Purge Time Finish	Bailing Equipment (see note)	Purge Volume Gal	Stabilized pH	Stabilized Conductivity	Stabilized Tempuratur e	Methane Gas	Capped Properly Y / N
32.7	MW-7			32.9									
27.6	MW-8			27.8									
25 5	MW-9			25 3									
32.8	MW-10			32.6									
39	MW-11	5/2/2024	27	39.1	10:12	10:15	P	4.84	7.33	1274	11.2	N	Y
53.6	MW-12	5/2/2024	45	53.6	9:28	9:31	P	3.44	6.62	1440	12.4	N	Y
36.56	MW-13	5/2/2024	28.4	36.5	10:32	10:35	P	3.24	7.49	1663	11.5	N	Y
50.16	MW-14	5/2/2024	40	50.9	9.50	9:58	P	4.36	6 62	1662	12.4	N	Y
43.2	MW-15			43.2									
37.3	MW-16			37.4									
32.6	MW-17			31 9									

Note: Low-Flow Pump (LF), Submersible (S), Peri Pump (P), Waterra (W), Dedicated Bailer (DB), Bailer (B)

Login Sample Receipt Checklist

Client: Plymouth Co. Solid Waste

Job Number: 310-280403-1

Login Number: 280403

List Source: Eurofins Cedar Falls

List Number: 1

Creator: Costello, Mackenzie K

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	N/A	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	False	Cooler temperature outside required temperature criteria.
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	False	No vials received for MW-11.
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

Login Sample Receipt Checklist

Client: Plymouth Co. Solid Waste

Job Number: 310-280403-1

Login Number: 280403
List Number: 2
Creator: Watters, David

List Source: Eurofins Savannah
List Creation: 05/04/24 12:19 PM

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

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ANALYTICAL REPORT

PREPARED FOR

Attn: Kent Herbold
Plymouth Co. Solid Waste
34898 150th Street
LeMars, Iowa 51031

Generated 5/29/2024 2:16:17 PM

JOB DESCRIPTION

Plymouth County Landfill

JOB NUMBER

310-280877-1

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls IA 50613

See page two for job notes and contact information.

Job Notes

This report may not be reproduced except in full, and with written approval from the laboratory. The results relate only to the samples tested. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

The test results in this report relate only to the samples as received by the laboratory and will meet all requirements of the methodology, with any exceptions noted. This report shall not be reproduced except in full, without the express written approval of the laboratory. All questions should be directed to the Eurofins Environment Testing North Central, LLC Project Manager.

Authorization

Generated
5/29/2024 2:16:17 PM

Authorized for release by
Emily Mathews, Project Management Assistant I
Emily.Mathews@et.eurofinsus.com
(319)277-2401

Table of Contents

Job Narrative
310-280877-1

Analytical test results meet all requirements of the associated regulatory program listed on the Accreditation/Certification Summary Page unless otherwise noted under the individual analysis. Data qualifiers are applied to indicate exceptions. Noncompliant quality control (QC) is further explained in narrative comments.

- Matrix QC may not be reported if insufficient sample or site-specific QC samples were not submitted. In these situations, to demonstrate precision and accuracy at a batch level, a LCS/LCSD may be performed, unless otherwise specified in the method.
- Surrogate and/or isotope dilution analyte recoveries (if applicable) which are outside of the QC window are confirmed unless attributed to a dilution or otherwise noted in the narrative.

Regulated compliance samples (e.g. SDWA, NPDES) must comply with the associated agency requirements/permits.

Receipt
The samples were received on 5/9/2024 11:50 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperatures of the 2 coolers at receipt time were 2.5°C and 11.4°C.

Receipt Exceptions
The following samples were received at the laboratory outside the required temperature criteria: Trip Blank (310-280877-1), MW-7 (310-280877-2), MW-8 (310-280877-3), MW-9 (310-280877-4), MW-13 (310-280877-5), MW-16 (310-280877-6), MW-17 (310-280877-7) and Duplicate (310-280877-8). This does not meet regulatory requirements. The client was contacted regarding this issue, and the laboratory was instructed to <CHOOSE_ONE> proceed with/cancel analysis.

GC/MS VOA
Method 8260D: The method requirement for no headspace was not met. The following volatile samples were analyzed with headspace in the sample container: MW-16 (310-280877-6) and Duplicate (310-280877-8).

Method 8260D: Surrogate recovery for the following sample was outside the upper control limit: MW-17 (310-280877-7). This sample did not contain any target analytes; therefore, re-analysis was not performed.

Method 8260D: The continuing calibration verification (CCV) associated with batch 310-421300 recovered outside of the control limits for cis-1,2-Dichloroethene (-22.3%D) and Tetrachloroethene (-21.4%D). The LCS associated with this CCV passed CCV criteria for the affected analytes; therefore, the data have been reported. The associated sample is impacted: (CCV 310-421300/4).

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

HPLC/IC
Method 9056A_ORGFM_28D: The following samples were diluted due to the nature of the sample matrix: MW-17 (310-280877-7) and Duplicate (310-280877-8). Elevated reporting limits (RLs) are provided.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Metals
No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

General Chemistry
Method 9020B: Breakthrough exceeded 10% for the following samples:MW-8 (310-280877-3) and MW-9 (310-280877-4).

Method 9020B: Breakthrough exceeded 10% for the following samples:MW-13 (310-280877-5), MW-16 (310-280877-6), MW-17 (310-280877-7) and Duplicate (310-280877-8).

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Sample Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
310-280877-1	Trip Blank	Water	05/08/24 00:00	05/09/24 11:50
310-280877-2	MW-7	Water	05/08/24 08:58	05/09/24 11:50
310-280877-3	MW-8	Water	05/08/24 09:40	05/09/24 11:50
310-280877-4	MW-9	Water	05/08/24 10:00	05/09/24 11:50
310-280877-5	MW-13	Water	05/08/24 08:26	05/09/24 11:50
310-280877-6	MW-16	Water	05/08/24 10:50	05/09/24 11:50
310-280877-7	MW-17	Water	05/08/24 11:10	05/09/24 11:50
310-280877-8	Duplicate	Water	05/08/24 11:15	05/09/24 11:50

Detection Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: Trip Blank — Lab Sample ID: 310-280877-1

No Detections.

Client Sample ID: MW-7 — Lab Sample ID: 310-280877-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,2-Dichloroethane	1.85		1.00		ug/L	1		8260D	Total/NA
1,2-Dichloropropane	12.5		1.00		ug/L	1		8260D	Total/NA
Benzene	0.879		0.500		ug/L	1		8260D	Total/NA
cis-1,2-Dichloroethene	216		1.00		ug/L	1		8260D	Total/NA
Tetrachloroethene	1.61		1.00		ug/L	1		8260D	Total/NA
Trichloroethene	15.0		1.00		ug/L	1		8260D	Total/NA
Vinyl chloride	5.77		1.00		ug/L	1		8260D	Total/NA

Client Sample ID: MW-8 — Lab Sample ID: 310-280877-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	57.1		1.00		ug/L	1		8260D	Total/NA
Vinyl chloride	1.51		1.00		ug/L	1		8260D	Total/NA
Chloride	12.3		5.00		mg/L	5		9056A	Total/NA
Halogens, Total Organic	157		50.0		ug/L	1		9020B	Total/NA

Client Sample ID: MW-9 — Lab Sample ID: 310-280877-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	11.6		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	17.5		5.00		mg/L	1		5220D LL	Total/NA
Halogens, Total Organic	75.6		40.0		ug/L	1		9020B	Total/NA

Client Sample ID: MW-13 — Lab Sample ID: 310-280877-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	60.5		5.00		mg/L	5		9056A	Total/NA
Iron	6.37		0.500		mg/L	1		6010D	Dissolved
Chemical Oxygen Demand	23.7		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-16 — Lab Sample ID: 310-280877-6

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	8.66		1.00		ug/L	1		8260D	Total/NA
Tetrachloroethene	1.55		1.00		ug/L	1		8260D	Total/NA
Chloride	6.27		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	12.9		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-17 — Lab Sample ID: 310-280877-7

No Detections.

Client Sample ID: Duplicate — Lab Sample ID: 310-280877-8

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chemical Oxygen Demand	72.8		25.0		mg/L	5		5220D LL	Total/NA

This Detection Summary does not include radiochemical test results.

Client Sample Results

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: Trip Blank

Date Collected: 05/08/24 00:00
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-1

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 14:41	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 14:41	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 14:41	1
Benzene	<0.500		0.500		ug/L			05/10/24 14:41	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 14:41	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			05/10/24 14:41	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 14:41	1
Tetrachloroethene	<1.00		1.00		ug/L			05/10/24 14:41	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 14:41	1
Vinyl chloride	<1.00		1.00		ug/L			05/10/24 14:41	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*122*		*73 - 130*		*05/10/24 14:41*	*1*
Toluene-d8 (Surr)	*95*		*80 - 120*		*05/10/24 14:41*	*1*
4-Bromofluorobenzene (Surr)	*105*		*80 - 120*		*05/10/24 14:41*	*1*

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: MW-7

Date Collected: 05/08/24 08:58
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-2

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 18:04	1
1,2-Dichloroethane	**1.85**		1.00		ug/L			05/10/24 18:04	1
1,2-Dichloropropane	**12.5**		1.00		ug/L			05/10/24 18:04	1
Benzene	**0.879**		0.500		ug/L			05/10/24 18:04	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 18:04	1
cis-1,2-Dichloroethene	**216**		1.00		ug/L			05/10/24 18:04	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 18:04	1
Tetrachloroethene	**1.61**		1.00		ug/L			05/10/24 18:04	1
Trichloroethene	**15.0**		1.00		ug/L			05/10/24 18:04	1
Vinyl chloride	**5.77**		1.00		ug/L			05/10/24 18:04	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*126*		*73 - 130*		*05/10/24 18:04*	*1*
Toluene-d8 (Surr)	*94*		*80 - 120*		*05/10/24 18:04*	*1*
4-Bromofluorobenzene (Surr)	*98*		*80 - 120*		*05/10/24 18:04*	*1*

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: MW-8

Date Collected: 05/08/24 09:40
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-3

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 18:26	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 18:26	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 18:26	1
Benzene	<0.500		0.500		ug/L			05/10/24 18:26	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 18:26	1
cis-1,2-Dichloroethene	**57.1**		1.00		ug/L			05/10/24 18:26	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 18:26	1
Tetrachloroethene	<1.00		1.00		ug/L			05/10/24 18:26	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 18:26	1
Vinyl chloride	**1.51**		1.00		ug/L			05/10/24 18:26	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*130*		*73 - 130*		*05/10/24 18:26*	*1*
Toluene-d8 (Surr)	*92*		*80 - 120*		*05/10/24 18:26*	*1*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*		*05/10/24 18:26*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**12.3**		5.00		mg/L			05/14/24 09:58	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/13/24 14:15	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200	F1	0.200		mg/L			05/10/24 21:15	1
Chemical Oxygen Demand (SM 5220D LL)	<5.00		5.00		mg/L			05/15/24 10:47	1
Halogens, Total Organic (SW846 9020B)	**157**		50.0		ug/L		05/28/24 06:26	05/28/24 13:53	1
Phenols, Total (SW846 9066)	<0.0200		0.0200		mg/L		05/13/24 08:25	05/13/24 19:26	1

Client Sample Results

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: MW-9

Date Collected: 05/08/24 10:00
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-4

Matrix: Water

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**11.6**		5.00		mg/L			05/14/24 10:34	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/13/24 14:23	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/10/24 21:18	1
Chemical Oxygen Demand (SM 5220D LL)	**17.5**		5.00		mg/L			05/15/24 10:47	1
Halogens, Total Organic (SW846 9020B)	**75.6**		40.0		ug/L		05/28/24 06:26	05/29/24 06:11	1
Phenols, Total (SW846 9066)	<0.0204		0.0204		mg/L		05/13/24 08:25	05/13/24 19:26	1

Client Sample Results

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: MW-13

Date Collected: 05/08/24 08:26
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-5

Matrix: Water

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**60.5**		5.00		mg/L			05/14/24 10:46	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**6.37**		0.500		mg/L			05/13/24 14:27	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/10/24 21:18	1
Chemical Oxygen Demand (SM 5220D LL)	**23.7**		5.00		mg/L			05/15/24 10:47	1
Halogens, Total Organic (SW846 9020B)	<40.0		40.0		ug/L		05/28/24 10:15	05/29/24 07:50	1
Phenols, Total (SW846 9066)	<0.0208		0.0208		mg/L		05/13/24 08:25	05/13/24 19:27	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: MW-16

Date Collected: 05/08/24 10:50
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-6

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 18:49	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 18:49	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 18:49	1
Benzene	<0.500		0.500		ug/L			05/10/24 18:49	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 18:49	1
cis-1,2-Dichloroethene	**8.66**		1.00		ug/L			05/10/24 18:49	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 18:49	1
Tetrachloroethene	**1.55**		1.00		ug/L			05/10/24 18:49	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 18:49	1
Vinyl chloride	<1.00		1.00		ug/L			05/10/24 18:49	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*129*		*73 - 130*		*05/10/24 18:49*	*1*
Toluene-d8 (Surr)	*94*		*80 - 120*		*05/10/24 18:49*	*1*
4-Bromofluorobenzene (Surr)	*103*		*80 - 120*		*05/10/24 18:49*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**6.27**		5.00		mg/L			05/14/24 10:58	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/13/24 14:29	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/10/24 21:19	1
Chemical Oxygen Demand (SM 5220D LL)	**12.9**		5.00		mg/L			05/15/24 10:47	1
Halogens, Total Organic (SW846 9020B)	<40.0		40.0		ug/L		05/28/24 10:15	05/29/24 09:21	1
Phenols, Total (SW846 9066)	<0.0200		0.0200		mg/L		05/13/24 08:25	05/13/24 19:27	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: MW-17

Date Collected: 05/08/24 11:10
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-7

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 19:11	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 19:11	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 19:11	1
Benzene	<0.500		0.500		ug/L			05/10/24 19:11	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 19:11	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			05/10/24 19:11	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 19:11	1
Tetrachloroethene	<1.00		1.00		ug/L			05/10/24 19:11	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 19:11	1
Vinyl chloride	<1.00		1.00		ug/L			05/10/24 19:11	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*133*	*S1+*	*73 - 130*		*05/10/24 19:11*	*1*
Toluene-d8 (Surr)	*92*		*80 - 120*		*05/10/24 19:11*	*1*
4-Bromofluorobenzene (Surr)	*104*		*80 - 120*		*05/10/24 19:11*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00		5.00		mg/L			05/14/24 11:10	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/13/24 14:31	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/10/24 21:20	1
Chemical Oxygen Demand (SM 5220D LL)	<5.00		5.00		mg/L			05/15/24 10:47	1
Halogens, Total Organic (SW846 9020B)	<40.0		40.0		ug/L		05/28/24 10:15	05/29/24 09:57	1
Phenols, Total (SW846 9066)	<0.0200		0.0200		mg/L		05/13/24 08:25	05/13/24 19:28	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: Duplicate

Date Collected: 05/08/24 11:15
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-8

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 19:33	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 19:33	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 19:33	1
Benzene	<0.500		0.500		ug/L			05/10/24 19:33	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 19:33	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			05/10/24 19:33	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 19:33	1
Tetrachloroethene	<1.00		1.00		ug/L			05/10/24 19:33	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 19:33	1
Vinyl chloride	<1.00		1.00		ug/L			05/10/24 19:33	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*122*		*73 - 130*		*05/10/24 19:33*	*1*
Toluene-d8 (Surr)	*92*		*80 - 120*		*05/10/24 19:33*	*1*
4-Bromofluorobenzene (Surr)	*104*		*80 - 120*		*05/10/24 19:33*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00		5.00		mg/L			05/14/24 11:22	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/13/24 14:33	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			05/10/24 21:21	1
Chemical Oxygen Demand (SM 5220D LL)	72.8		25.0		mg/L			05/15/24 10:47	5
Halogens, Total Organic (SW846 9020B)	<40.0		40.0		ug/L		05/28/24 10:15	05/29/24 10:33	1
Phenols, Total (SW846 9066)	<0.0200		0.0200		mg/L		05/13/24 08:25	05/13/24 19:28	1

Definitions/Glossary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Qualifiers

GC/MS VOA

Qualifier	Qualifier Description
S1+	Surrogate recovery exceeds control limits, high biased.

General Chemistry

Qualifier	Qualifier Description
F1	MS and/or MSD recovery exceeds control limits.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
¤	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Surrogate Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Method: 8260D - Volatile Organic Compounds by GC/MS

Matrix: Water

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)		
		DBFM	TOL	BFB
Lab Sample ID	Client Sample ID	(73-130)	(80-120)	(80-120)
310-280877-1	Trip Blank	122	95	105
310-280877-2	MW-7	126	94	98
310-280877-3	MW-8	130	92	101
310-280877-6	MW-16	129	94	103
310-280877-7	MW-17	133 S1+	92	104
310-280877-8	Duplicate	122	92	104
LCS 310-421300/7	Lab Control Sample	101	103	96
LCS 310-421300/8	Lab Control Sample	128	94	101
MB 310-421300/6	Method Blank	128	94	101

Surrogate Legend

DBFM = Dibromofluoromethane (Surr)
TOL = Toluene-d8 (Surr)
BFB = 4-Bromofluorobenzene (Surr)

Method: 8260D - Volatile Organic Compounds by GC/MS

Lab Sample ID: MB 310-421300/6
Matrix: Water
Analysis Batch: 421300

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			05/10/24 12:25	1
1,2-Dichloroethane	<1.00		1.00		ug/L			05/10/24 12:25	1
1,2-Dichloropropane	<1.00		1.00		ug/L			05/10/24 12:25	1
Benzene	<0.500		0.500		ug/L			05/10/24 12:25	1
Chlorodibromomethane	<5.00		5.00		ug/L			05/10/24 12:25	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			05/10/24 12:25	1
Methylene Chloride	<5.00		5.00		ug/L			05/10/24 12:25	1
Tetrachloroethene	<1.00		1.00		ug/L			05/10/24 12:25	1
Trichloroethene	<1.00		1.00		ug/L			05/10/24 12:25	1
Vinyl chloride	<1.00		1.00		ug/L			05/10/24 12:25	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*128*		*73 - 130*		*05/10/24 12:25*	*1*
Toluene-d8 (Surr)	*94*		*80 - 120*		*05/10/24 12:25*	*1*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*		*05/10/24 12:25*	*1*

Lab Sample ID: LCS 310-421300/7
Matrix: Water
Analysis Batch: 421300

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
1,1,1-Trichloroethane	20.0	18.34		ug/L		92	73 - 129
1,2-Dichloroethane	20.0	17.98		ug/L		90	71 - 125
1,2-Dichloropropane	20.0	18.56		ug/L		93	73 - 124
Benzene	20.0	18.26		ug/L		91	72 - 124
Chlorodibromomethane	20.0	16.92		ug/L		85	71 - 121
cis-1,2-Dichloroethene	20.0	17.69		ug/L		88	74 - 123
Methylene Chloride	20.0	19.73		ug/L		99	50 - 150
Tetrachloroethene	20.0	16.66		ug/L		83	71 - 130
Trichloroethene	20.0	18.75		ug/L		94	72 - 126

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*101*		*73 - 130*
Toluene-d8 (Surr)	*103*		*80 - 120*
4-Bromofluorobenzene (Surr)	*96*		*80 - 120*

Lab Sample ID: LCS 310-421300/8
Matrix: Water
Analysis Batch: 421300

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Vinyl chloride	20.0	21.36		ug/L		107	56 - 140

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*128*		*73 - 130*
Toluene-d8 (Surr)	*94*		*80 - 120*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*

Method: 9056A - Anions, Ion Chromatography

Lab Sample ID: MB 310-421701/3
Matrix: Water
Analysis Batch: 421701

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<1.00		1.00		mg/L			05/14/24 09:34	1

Lab Sample ID: LCS 310-421701/4
Matrix: Water
Analysis Batch: 421701

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride			10.0	9.621		mg/L		96	90 - 110		

Lab Sample ID: 310-280877-3 MS
Matrix: Water
Analysis Batch: 421701

Client Sample ID: MW-8
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride	12.3		25.0	33.84		mg/L		86	80 - 120		

Lab Sample ID: 310-280877-3 MSD
Matrix: Water
Analysis Batch: 421701

Client Sample ID: MW-8
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Chloride	12.3		25.0	33.92		mg/L		86	80 - 120	0	15

Method: 6010D - Metals (ICP)

Lab Sample ID: MB 310-421588/14
Matrix: Water
Analysis Batch: 421588

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			05/13/24 14:11	1

Lab Sample ID: LCS 310-421588/15
Matrix: Water
Analysis Batch: 421588

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Iron			20.0	19.53		mg/L		98	80 - 120		

Lab Sample ID: 310-280877-3 DU
Matrix: Water
Analysis Batch: 421588

Client Sample ID: MW-8
Prep Type: Dissolved

Analyte	Sample Result	Sample Qualifier		DU Result	DU Qualifier	Unit	D			RPD	RPD Limit
Iron	<0.500			<0.500		mg/L				NC	20

Method: 350.1 - Nitrogen, Ammonia

Lab Sample ID: MB 310-421369/126
Matrix: Water
Analysis Batch: 421369

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	<0.200		0.200		mg/L			05/10/24 21:13	1

Lab Sample ID: LCS 310-421369/127
Matrix: Water
Analysis Batch: 421369

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Ammonia			8.55	9.318		mg/L		109	90 - 110		

Lab Sample ID: 310-280877-3 MS
Matrix: Water
Analysis Batch: 421369

Client Sample ID: MW-8
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits		
Ammonia	<0.200	F1	1.00	0.8323	F1	mg/L		83	90 - 110		

Lab Sample ID: 310-280877-3 MSD
Matrix: Water
Analysis Batch: 421369

Client Sample ID: MW-8
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Ammonia	<0.200	F1	1.00	0.8337	F1	mg/L		83	90 - 110	0	13

Method: 5220D LL - COD

Lab Sample ID: MB 310-421735/5
Matrix: Water
Analysis Batch: 421735

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	<5.00		5.00		mg/L			05/15/24 10:47	1

Lab Sample ID: LCS 310-421735/3
Matrix: Water
Analysis Batch: 421735

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Chemical Oxygen Demand			125	122.8		mg/L		98	85 - 110		

Method: 9020B - Organic Halides, Total (TOX)

Lab Sample ID: MB 680-840142/1-A
Matrix: Water
Analysis Batch: 840148

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 840142

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Halogens, Total Organic	<40.0		40.0		ug/L		05/28/24 06:26	05/28/24 09:55	1

Method: 9020B - Organic Halides, Total (TOX) (Continued)

Lab Sample ID: LCS 680-840142/2-A
Matrix: Water
Analysis Batch: 840148

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 840142

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Halogens, Total Organic	400	432.8		ug/L		108	60 - 140

Lab Sample ID: 310-280877-3 MS
Matrix: Water
Analysis Batch: 840148

Client Sample ID: MW-8
Prep Type: Total/NA
Prep Batch: 840142

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Halogens, Total Organic	157		400	460.4		ug/L		76	60 - 140

Lab Sample ID: 310-280877-3 MSD
Matrix: Water
Analysis Batch: 840148

Client Sample ID: MW-8
Prep Type: Total/NA
Prep Batch: 840142

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Halogens, Total Organic	157		400	524.6		ug/L		92	60 - 140	13	40

Lab Sample ID: MB 680-840238/1-A
Matrix: Water
Analysis Batch: 840240

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 840238

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Halogens, Total Organic	<40.0		40.0		ug/L		05/28/24 10:15	05/28/24 15:10	1

Lab Sample ID: LCS 680-840238/2-A
Matrix: Water
Analysis Batch: 840240

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 840238

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Halogens, Total Organic	400	382.4		ug/L		96	60 - 140

Lab Sample ID: LCSD 680-840238/18-A
Matrix: Water
Analysis Batch: 840240

Client Sample ID: Lab Control Sample Dup
Prep Type: Total/NA
Prep Batch: 840238

Analyte	Spike Added	LCSD Result	LCSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Halogens, Total Organic	400	345.4		ug/L		86	60 - 140	10	40

Lab Sample ID: 310-280877-5 MS
Matrix: Water
Analysis Batch: 840240

Client Sample ID: MW-13
Prep Type: Total/NA
Prep Batch: 840238

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Halogens, Total Organic	<40.0		400	351.4		ug/L		83	60 - 140

Lab Sample ID: 310-280877-5 MSD
Matrix: Water
Analysis Batch: 840240

Client Sample ID: MW-13
Prep Type: Total/NA
Prep Batch: 840238

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Halogens, Total Organic	<40.0		400	332.5		ug/L		79	60 - 140	6	40

Method: 9066 - Phenolics, Total Recoverable

Lab Sample ID: MB 310-421409/1-A
Matrix: Water
Analysis Batch: 421521

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 421409

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Phenols, Total	<0.0196		0.0196		mg/L		05/13/24 08:25	05/13/24 19:20	1

Lab Sample ID: LCS 310-421409/2-A
Matrix: Water
Analysis Batch: 421521

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 421409

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Phenols, Total			0.100	0.1005		mg/L		101	90 - 110		

QC Association Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

GC/MS VOA

Analysis Batch: 421300

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-1	Trip Blank	Total/NA	Water	8260D	
310-280877-2	MW-7	Total/NA	Water	8260D	
310-280877-3	MW-8	Total/NA	Water	8260D	
310-280877-6	MW-16	Total/NA	Water	8260D	
310-280877-7	MW-17	Total/NA	Water	8260D	
310-280877-8	Duplicate	Total/NA	Water	8260D	
MB 310-421300/6	Method Blank	Total/NA	Water	8260D	
LCS 310-421300/7	Lab Control Sample	Total/NA	Water	8260D	
LCS 310-421300/8	Lab Control Sample	Total/NA	Water	8260D	

HPLC/IC

Analysis Batch: 421701

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Total/NA	Water	9056A	
310-280877-4	MW-9	Total/NA	Water	9056A	
310-280877-5	MW-13	Total/NA	Water	9056A	
310-280877-6	MW-16	Total/NA	Water	9056A	
310-280877-7	MW-17	Total/NA	Water	9056A	
310-280877-8	Duplicate	Total/NA	Water	9056A	
MB 310-421701/3	Method Blank	Total/NA	Water	9056A	
LCS 310-421701/4	Lab Control Sample	Total/NA	Water	9056A	
310-280877-3 MS	MW-8	Total/NA	Water	9056A	
310-280877-3 MSD	MW-8	Total/NA	Water	9056A	

Metals

Analysis Batch: 421588

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Dissolved	Water	6010D	
310-280877-4	MW-9	Dissolved	Water	6010D	
310-280877-5	MW-13	Dissolved	Water	6010D	
310-280877-6	MW-16	Dissolved	Water	6010D	
310-280877-7	MW-17	Dissolved	Water	6010D	
310-280877-8	Duplicate	Dissolved	Water	6010D	
MB 310-421588/14	Method Blank	Total/NA	Water	6010D	
LCS 310-421588/15	Lab Control Sample	Total/NA	Water	6010D	
310-280877-3 DU	MW-8	Dissolved	Water	6010D	

General Chemistry

Analysis Batch: 421369

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Total/NA	Water	350.1	
310-280877-4	MW-9	Total/NA	Water	350.1	
310-280877-5	MW-13	Total/NA	Water	350.1	
310-280877-6	MW-16	Total/NA	Water	350.1	
310-280877-7	MW-17	Total/NA	Water	350.1	
310-280877-8	Duplicate	Total/NA	Water	350.1	
MB 310-421369/126	Method Blank	Total/NA	Water	350.1	
LCS 310-421369/127	Lab Control Sample	Total/NA	Water	350.1	
310-280877-3 MS	MW-8	Total/NA	Water	350.1	

General Chemistry (Continued)

Analysis Batch: 421369 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3 MSD	MW-8	Total/NA	Water	350.1	

Prep Batch: 421409

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Total/NA	Water	Distill/Phenol	
310-280877-4	MW-9	Total/NA	Water	Distill/Phenol	
310-280877-5	MW-13	Total/NA	Water	Distill/Phenol	
310-280877-6	MW-16	Total/NA	Water	Distill/Phenol	
310-280877-7	MW-17	Total/NA	Water	Distill/Phenol	
310-280877-8	Duplicate	Total/NA	Water	Distill/Phenol	
MB 310-421409/1-A	Method Blank	Total/NA	Water	Distill/Phenol	
LCS 310-421409/2-A	Lab Control Sample	Total/NA	Water	Distill/Phenol	

Analysis Batch: 421521

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Total/NA	Water	9066	421409
310-280877-4	MW-9	Total/NA	Water	9066	421409
310-280877-5	MW-13	Total/NA	Water	9066	421409
310-280877-6	MW-16	Total/NA	Water	9066	421409
310-280877-7	MW-17	Total/NA	Water	9066	421409
310-280877-8	Duplicate	Total/NA	Water	9066	421409
MB 310-421409/1-A	Method Blank	Total/NA	Water	9066	421409
LCS 310-421409/2-A	Lab Control Sample	Total/NA	Water	9066	421409

Analysis Batch: 421735

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Total/NA	Water	5220D LL	
310-280877-4	MW-9	Total/NA	Water	5220D LL	
310-280877-5	MW-13	Total/NA	Water	5220D LL	
310-280877-6	MW-16	Total/NA	Water	5220D LL	
310-280877-7	MW-17	Total/NA	Water	5220D LL	
310-280877-8	Duplicate	Total/NA	Water	5220D LL	
MB 310-421735/5	Method Blank	Total/NA	Water	5220D LL	
LCS 310-421735/3	Lab Control Sample	Total/NA	Water	5220D LL	

Prep Batch: 840142

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Total/NA	Water	Carbon Trap	
310-280877-4	MW-9	Total/NA	Water	Carbon Trap	
MB 680-840142/1-A	Method Blank	Total/NA	Water	Carbon Trap	
LCS 680-840142/2-A	Lab Control Sample	Total/NA	Water	Carbon Trap	
310-280877-3 MS	MW-8	Total/NA	Water	Carbon Trap	
310-280877-3 MSD	MW-8	Total/NA	Water	Carbon Trap	

Analysis Batch: 840148

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3	MW-8	Total/NA	Water	9020B	840142
310-280877-4	MW-9	Total/NA	Water	9020B	840142
MB 680-840142/1-A	Method Blank	Total/NA	Water	9020B	840142
LCS 680-840142/2-A	Lab Control Sample	Total/NA	Water	9020B	840142
310-280877-3 MS	MW-8	Total/NA	Water	9020B	840142

General Chemistry (Continued)

Analysis Batch: 840148 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-3 MSD	MW-8	Total/NA	Water	9020B	840142

Prep Batch: 840238

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-5	MW-13	Total/NA	Water	Carbon Trap	
310-280877-6	MW-16	Total/NA	Water	Carbon Trap	
310-280877-7	MW-17	Total/NA	Water	Carbon Trap	
310-280877-8	Duplicate	Total/NA	Water	Carbon Trap	
MB 680-840238/1-A	Method Blank	Total/NA	Water	Carbon Trap	
LCS 680-840238/2-A	Lab Control Sample	Total/NA	Water	Carbon Trap	
LCSD 680-840238/18-A	Lab Control Sample Dup	Total/NA	Water	Carbon Trap	
310-280877-5 MS	MW-13	Total/NA	Water	Carbon Trap	
310-280877-5 MSD	MW-13	Total/NA	Water	Carbon Trap	

Analysis Batch: 840240

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-280877-5	MW-13	Total/NA	Water	9020B	840238
310-280877-6	MW-16	Total/NA	Water	9020B	840238
310-280877-7	MW-17	Total/NA	Water	9020B	840238
310-280877-8	Duplicate	Total/NA	Water	9020B	840238
MB 680-840238/1-A	Method Blank	Total/NA	Water	9020B	840238
LCS 680-840238/2-A	Lab Control Sample	Total/NA	Water	9020B	840238
LCSD 680-840238/18-A	Lab Control Sample Dup	Total/NA	Water	9020B	840238
310-280877-5 MS	MW-13	Total/NA	Water	9020B	840238
310-280877-5 MSD	MW-13	Total/NA	Water	9020B	840238

Lab Chronicle

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: Trip Blank
Lab Sample ID: 310-280877-1
Date Collected: 05/08/24 00:00
Matrix: Water
Date Received: 05/09/24 11:50

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421300	WSE8	EET CF	05/10/24 14:41

Client Sample ID: MW-7
Lab Sample ID: 310-280877-2
Date Collected: 05/08/24 08:58
Matrix: Water
Date Received: 05/09/24 11:50

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421300	WSE8	EET CF	05/10/24 18:04

Client Sample ID: MW-8
Lab Sample ID: 310-280877-3
Date Collected: 05/08/24 09:40
Matrix: Water
Date Received: 05/09/24 11:50

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421300	WSE8	EET CF	05/10/24 18:26
Total/NA	Analysis	9056A		5	421701	QTZ5	EET CF	05/14/24 09:58
Dissolved	Analysis	6010D		1	421588	ZRI4	EET CF	05/13/24 14:15
Total/NA	Analysis	350.1		1	421369	ZJX4	EET CF	05/10/24 21:15
Total/NA	Analysis	5220D LL		1	421735	ENB7	EET CF	05/15/24 10:47
Total/NA	Prep	Carbon Trap			840142	CLJ	EET SAV	05/28/24 06:26
Total/NA	Analysis	9020B		1	840148	CLJ	EET SAV	05/28/24 13:53
Total/NA	Prep	Distill/Phenol			421409	ENB7	EET CF	05/13/24 08:25
Total/NA	Analysis	9066		1	421521	ZJX4	EET CF	05/13/24 19:26

Client Sample ID: MW-9
Lab Sample ID: 310-280877-4
Date Collected: 05/08/24 10:00
Matrix: Water
Date Received: 05/09/24 11:50

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		5	421701	QTZ5	EET CF	05/14/24 10:34
Dissolved	Analysis	6010D		1	421588	ZRI4	EET CF	05/13/24 14:23
Total/NA	Analysis	350.1		1	421369	ZJX4	EET CF	05/10/24 21:18
Total/NA	Analysis	5220D LL		1	421735	ENB7	EET CF	05/15/24 10:47
Total/NA	Prep	Carbon Trap			840142	CLJ	EET SAV	05/28/24 06:26
Total/NA	Analysis	9020B		1	840148	CLJ	EET SAV	05/29/24 06:11
Total/NA	Prep	Distill/Phenol			421409	ENB7	EET CF	05/13/24 08:25
Total/NA	Analysis	9066		1	421521	ZJX4	EET CF	05/13/24 19:26

Client Sample ID: MW-13
Lab Sample ID: 310-280877-5
Date Collected: 05/08/24 08:26
Matrix: Water
Date Received: 05/09/24 11:50

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		5	421701	QTZ5	EET CF	05/14/24 10:46

Lab Chronicle

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: MW-13

Date Collected: 05/08/24 08:26
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-5

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Dissolved	Analysis	6010D		1	421588	ZRI4	EET CF	05/13/24 14:27
Total/NA	Analysis	350.1		1	421369	ZJX4	EET CF	05/10/24 21:18
Total/NA	Analysis	5220D LL		1	421735	ENB7	EET CF	05/15/24 10:47
Total/NA	Prep	Carbon Trap			840238	CLJ	EET SAV	05/28/24 10:15
Total/NA	Analysis	9020B		1	840240	CLJ	EET SAV	05/29/24 07:50
Total/NA	Prep	Distill/Phenol			421409	ENB7	EET CF	05/13/24 08:25
Total/NA	Analysis	9066		1	421521	ZJX4	EET CF	05/13/24 19:27

Client Sample ID: MW-16

Date Collected: 05/08/24 10:50
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-6

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421300	WSE8	EET CF	05/10/24 18:49
Total/NA	Analysis	9056A		5	421701	QTZ5	EET CF	05/14/24 10:58
Dissolved	Analysis	6010D		1	421588	ZRI4	EET CF	05/13/24 14:29
Total/NA	Analysis	350.1		1	421369	ZJX4	EET CF	05/10/24 21:19
Total/NA	Analysis	5220D LL		1	421735	ENB7	EET CF	05/15/24 10:47
Total/NA	Prep	Carbon Trap			840238	CLJ	EET SAV	05/28/24 10:15
Total/NA	Analysis	9020B		1	840240	CLJ	EET SAV	05/29/24 09:21
Total/NA	Prep	Distill/Phenol			421409	ENB7	EET CF	05/13/24 08:25
Total/NA	Analysis	9066		1	421521	ZJX4	EET CF	05/13/24 19:27

Client Sample ID: MW-17

Date Collected: 05/08/24 11:10
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-7

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421300	WSE8	EET CF	05/10/24 19:11
Total/NA	Analysis	9056A		5	421701	QTZ5	EET CF	05/14/24 11:10
Dissolved	Analysis	6010D		1	421588	ZRI4	EET CF	05/13/24 14:31
Total/NA	Analysis	350.1		1	421369	ZJX4	EET CF	05/10/24 21:20
Total/NA	Analysis	5220D LL		1	421735	ENB7	EET CF	05/15/24 10:47
Total/NA	Prep	Carbon Trap			840238	CLJ	EET SAV	05/28/24 10:15
Total/NA	Analysis	9020B		1	840240	CLJ	EET SAV	05/29/24 09:57
Total/NA	Prep	Distill/Phenol			421409	ENB7	EET CF	05/13/24 08:25
Total/NA	Analysis	9066		1	421521	ZJX4	EET CF	05/13/24 19:28

Client Sample ID: Duplicate

Date Collected: 05/08/24 11:15
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-8

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	421300	WSE8	EET CF	05/10/24 19:33

Lab Chronicle

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Client Sample ID: Duplicate

Date Collected: 05/08/24 11:15
Date Received: 05/09/24 11:50

Lab Sample ID: 310-280877-8

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		5	421701	QTZ5	EET CF	05/14/24 11:22
Dissolved	Analysis	6010D		1	421588	ZRI4	EET CF	05/13/24 14:33
Total/NA	Analysis	350.1		1	421369	ZJX4	EET CF	05/10/24 21:21
Total/NA	Analysis	5220D LL		5	421735	ENB7	EET CF	05/15/24 10:47
Total/NA	Prep	Carbon Trap			840238	CLJ	EET SAV	05/28/24 10:15
Total/NA	Analysis	9020B		1	840240	CLJ	EET SAV	05/29/24 10:33
Total/NA	Prep	Distill/Phenol			421409	ENB7	EET CF	05/13/24 08:25
Total/NA	Analysis	9066		1	421521	ZJX4	EET CF	05/13/24 19:28

Laboratory References:

EET CF = Eurofins Cedar Falls, 3019 Venture Way, Cedar Falls, IA 50613, TEL (319)277-2401

EET SAV = Eurofins Savannah, 5102 LaRoche Avenue, Savannah, GA 31404, TEL (912)354-7858

Accreditation/Certification Summary

Client: Plymouth Co. Solid Waste
Job ID: 310-280877-1
Project/Site: Plymouth County Landfill

Laboratory: Eurofins Cedar Falls

The accreditations/certifications listed below are applicable to this report.

Authority	Program	Identification Number	Expiration Date
Iowa	State	007	12-01-25

Laboratory: Eurofins Savannah

All accreditations/certifications held by this laboratory are listed. Not all accreditations/certifications are applicable to this report.

Authority	Program	Identification Number	Expiration Date
	AFCEE	SAVLAB	
Alabama	State	41450	06-30-24
ANAB	Dept. of Defense ELAP	L2463	09-22-24
Arkansas (DW)	State	GA00006	06-30-24
California	State	2939	06-30-24
Florida	NELAP	E87052	06-30-24
Georgia	State	E87052	06-30-24
Georgia (DW)	State	803	06-30-24
Hawaii	State	<cert No.>	06-30-24
Illinois	NELAP	200022	11-30-24
Indiana	State	C-GA-02	06-30-24
Iowa	State	353	07-01-25
Kentucky (UST)	State	NA	06-30-24
Louisiana	NELAP	30690	06-30-24
Louisiana (All)	NELAP	30690	06-30-24
Louisiana (DW)	State	LA009	12-31-24
Maine	State	GA00006	09-25-24
Maryland	State	250	12-31-24
Massachusetts	State	M-GA006	06-30-24
Michigan	State	9925	06-30-24
Mississippi	State	<cert No.>	06-30-24
Nebraska	State	NE-OS-7-04	06-30-24
New Jersey	NELAP	GA769	06-30-24
New Mexico	State	GA00006	06-30-24
North Carolina (DW)	State	13701	07-31-24
North Carolina (WW/SW)	State	269	12-31-24
Pennsylvania	NELAP	68-00474	06-30-24
Puerto Rico	State	GA00006	01-01-25
South Carolina	State	98001	06-30-24
Tennessee	State	TN02961	06-30-24
Texas	NELAP	T1047004185	11-30-24
Texas	TCEQ Water Supply	T104704185	06-30-24
USDA	US Federal Programs	P330-18-00313	04-04-27
Virginia	NELAP	460161	06-14-24
Wyoming	State	8TMS-L	06-30-24

Method Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill

Job ID: 310-280877-1

Method	Method Description	Protocol	Laboratory
8260D	Volatile Organic Compounds by GC/MS	SW846	EET CF
9056A	Anions, Ion Chromatography	SW846	EET CF
6010D	Metals (ICP)	SW846	EET CF
350.1	Nitrogen, Ammonia	EPA	EET CF
5220D LL	COD	SM	EET CF
9020B	Organic Halides, Total (TOX)	SW846	EET SAV
9066	Phenolics, Total Recoverable	SW846	EET CF
5030B	Purge and Trap	SW846	EET CF
Carbon Trap	Carbon Trap Preparation	EPA-17	EET SAV
Distill/Phenol	Distillation, Phenolics	None	EET CF

Protocol References:

EPA = US Environmental Protection Agency
EPA-17 = "Method 1650, Revision A, Adsorbable Organic Halides By Adsorption And Colormetric Titration," EPA, February 1992
None = None
SM = "Standard Methods For The Examination Of Water And Wastewater"
SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

EET CF = Eurofins Cedar Falls, 3019 Venture Way, Cedar Falls, IA 50613, TEL (319)277-2401
EET SAV = Eurofins Savannah, 5102 LaRoche Avenue, Savannah, GA 31404, TEL (912)354-7858

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310-280877 Chain of Custody

Cooler/Sample Receipt and Temperature Log Form

Client Information

Client: Plymouth Co.

City/State: CITY | STATE | Project:

Receipt Information

Date/Time Received: DATE 5/9/24 | TIME 1150 | Received By: FM

Delivery Type: ☐ UPS ☒ FedEx ☐ FedEx Ground ☐ US Mail ☐ Spee-Dee
☐ Lab Courier ☐ Lab Field Services ☐ Client Drop-off ☐ Other:_____

Condition of Cooler/Containers

Sample(s) received in Cooler? ☒ Yes ☐ No *If yes:* Cooler ID:

Multiple Coolers? ☒ Yes ☐ No *If yes:* Cooler # 1 of 2

Cooler Custody Seals Present? ☒ Yes ☐ No *If yes:* Cooler custody seals intact? ☒ Yes ☐ No

Sample Custody Seals Present? ☐ Yes ☒ No *If yes:* Sample custody seals intact? ☐ Yes ☐ No

Trip Blank Present? ☒ Yes ☐ No *If yes:* Which VOA samples are in cooler? ↓

MW-17, -7, Duplicate

Temperature Record

Coolant: ☒ Wet ice ☐ Blue ice ☐ Dry ice ☐ Other:_____ ☐ NONE

Thermometer ID: R | Correction Factor (°C): 0

• Temp Blank Temperature – If no temp blank, or temp blank temperature above criteria, proceed to Sample Container Temperature

Uncorrected Temp (°C): 2.5 | Corrected Temp (°C): 2.5

• Sample Container Temperature

	CONTAINER 1	CONTAINER 2
Container(s) used:		
Uncorrected Temp (°C):		
Corrected Temp (°C):		

Exceptions Noted

1) If temperature exceeds criteria, was sample(s) received same day of sampling? ☐ Yes ☐ No
   a) *If yes:* Is there evidence that the chilling process began? ☐ Yes ☐ No

2) If temperature is <0°C, are there obvious signs that the integrity of sample containers is compromised? (e.g., bulging septa, broken/cracked bottles, frozen solid?) ☐ Yes ☐ No

NOTE: If yes, contact PM before proceeding. If no, proceed with login

Additional Comments

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Place COC scanning label here

Cooler/Sample Receipt and Temperature Log Form

Client Information

Client: Plymouth Co. Solid Waste

City/State: CITY Lemars | STATE IA | Project: 90365

Receipt Information

Date/Time Received: DATE 5/24 | TIME 1150 | Received By: [illegible]

Delivery Type: ☐ UPS ☑ FedEx ☐ FedEx Ground ☐ US Mail ☐ Spee-Dee ☐ Lab Courier ☐ Lab Field Services ☐ Client Drop-off ☐ Other:_____

Condition of Cooler/Containers

Sample(s) received in Cooler?	☑ Yes	☐ No	*If yes:* Cooler ID.
Multiple Coolers?	☑ Yes	☑ No	*If yes:* Cooler # 2 of 2
Cooler Custody Seals Present? No	☑ Yes	☐ No	*If yes:* Cooler custody seals intact? ☑ Yes ☐
Sample Custody Seals Present? No	☐ Yes	☑ No	*If yes:* Sample custody seals intact? ☐ Yes ☐
Trip Blank Present?	☐ Yes	☑ No	*If yes:* Which VOA samples are in cooler? ↓

Temperature Record

Coolant: ☑ Wet ice ☐ Blue ice ☐ Dry ice ☐ Other:_____ ☐ NONE

Thermometer ID: 4 | Correction Factor (°C): 0.0

• **Temp Blank Temperature** – If no temp blank, or temp blank temperature above criteria, proceed to Sample Container Temperature

Uncorrected Temp (°C): 11.4 | Corrected Temp (°C): 11.4

• **Sample Container Temperature**

	CONTAINER 1	CONTAINER 2
Container(s) used:	250 HNO3	250 HNO3
Uncorrected Temp (°C):	9.6	8.8
Corrected Temp (°C):	9.6	8.8

Exceptions Noted

1) If temperature exceeds criteria, was sample(s) received same day of sampling? ☐ Yes ☑ No
   a) *If yes:* Is there evidence that the chilling process began? ☐ Yes ☐ No

2) If temperature is <0°C, are there obvious signs that the integrity of sample containers is compromised? (*e.g.*, bulging septa, broken/cracked bottles, frozen solid?) ☐ Yes ☐ No

NOTE: If yes, contact PM before proceeding. If no, proceed with login

Additional Comments

MW 6, MW 8, MW-9

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls, IA 50613
Phone (319) 277-2401 Phone (319) 277-2425

Chain of Custody Record

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Client Information	Sampler: Kent Herbold	Lab PM: Bindert, Zach T	Carrier Tracking No(s):	COC No: 310-90365-24965.2
Client Contact: Kent Herbold	Phone: 712-260-2395	E-Mail: Zach.Bindert@et.eurofinsus.com	State of Origin:	Page: Page 2 of 2
Company: Plymouth Co. Solid Waste	PWSID:			Job #:
Address: 34898 150th Street	Due Date Requested:			
City: LeMars	TAT Requested (days):			
State, Zip: IA, 51031	Compliance Project: Δ Yes Δ No			
Phone: 712-269-2395	PO #: Purchase Order not required			
Email: kherbold@co.plymouth.ia.us	WO #:			
Project Name: Plymouth County Landfill - March 2024	Project #: 31002859			
Site:	SSOW#:			

Analysis Requested

Preservation Codes:
A - HCL, B - NaOH, C - Zn Acetate, D - Nitric Acid, E - NaHSO4, F - MeOH, G - Amchlor, H - Ascorbic Acid, I - Ice, J - DI Water, K - EDTA, L - EDA, M - Hexane, N - None, O - AsNaO2, P - Na2O4S, Q - Na2SO3, R - Na2S2O3, S - H2SO4, T - TSP Dodecahydrate, U - Acetone, V - MCAA, W - pH 4-5, Y - Trizma, Z - other (specify)
Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	9056A_ORGFM_28D - Chloride	Ammonia - 350.1, COD - 5220D_LL	9066 - Total Recoverable Phenolics	8260D - (MOD) Volatile Custom Sublist	9020B - TOX	6010D - Dissolved Iron	Total Number of containers	Special Instructions/Note:
			Preservation Code:				N	S	S	A	S	D		
Trip Blank	5/8			Water										
MW-7	5/8	8:58	G	Water										
MW-8	5/8	9:40	G	Water	Y									
MW-9	5/8	10:00	G	Water	Y									
MW-13	5/8	8:26	G	Water	Y									
MW-16	5/8	10:50	G	Water	Y									
MW-17	5/8	11:10	G	Water	Y									
Duplicate	5/8	11:15	G	Water	Y									

Possible Hazard Identification
☑ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☑ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested: I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
			MK	5-9-24 1450	
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company

Custody Seals Intact: Δ Yes Δ No | Custody Seal No | Cooler Temperature(s) °C and Other Remarks:

Ver: 01/16/2019

LANDFILL GROUNDWATER SAMPLING DATA SHEET

Project Information

Project Name	Plymouth County Sanitary Landfill
Project Location	LeMars, IA
Project Number	PCSWA.18001
SLF Permit No.	75-SDP-04-74P

Sampling Information

Date Sampled	5-8 24
Sampling Crew	Kent Herbold
Equipment Water Level	Geo Tech
pH/Conductivity	OAKTON
Equipment Calibration Date	5-8 24
Equipment Calibration Time	5-8-24

Weather Conditions

Recorded Depth	Well#	Date	Static Water Level	Measured Well Depth	Purge Time Start	Purge Time Finish	Bailing Equipment (see note)	Purge Volume Gal	Stabilized pH	Stabilized Conductivity	Stabilized Tempuratur e	Methane Gas	Capped Properly Y / N
32.7	MW-7	5/8	19.2	32.9	8:58	9 04	P	5 48	7.07	1686	13.3	N	Y
27 6	MW-8	5/8	22 3	27.8	9:40	9 42	P	2.32	7.00	1290	11.4	N	Y
25.5	MW-9	5/8	18	25.3	10 00	10.04	P	2 92	7.06	1287	11.8	N	Y
32.8	MW-10			32.6									
39	MW-11			39.1									
53.6	MW-12			53.6									
36.56	MW-13	5/8	18.3	36.5	8 26	8 31	P	7.25	6.63	1550	10 6	N	Y
50.16	MW-14			50.9									
43.2	~~MW-15~~			43.2									
37.3	MW-16	5/8	22 2	37.4	10.50	10:38	P	6.08	7.14	1335	13 0		
32.6	MW-17	5/8	13.5	31.9	11 10	11 13	P	7.36	7.89	864	11.7	N	Y

Note: Low-Flow Pump (LF), Submersible (S), Peri Pump (P), Waterra (W), Dedicated Bailer (DB), Bailer (B)

mw-8 - Did pump dry purged 2.00 gallons
mw-16 - Did pump dry purged 5 00 gallons

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls, IA 50613
Phone: 319-277-2401 Fax: 319-277-2425

Chain of Custody Record

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Client Information (Sub Contract Lab)	Sampler:	Lab PM: Mathews, Emily A	Carrier Tracking No(s):	COC No: 310-72235.1
Client Contact: Shipping/Receiving	Phone:	E-Mail: Emily.Mathews@et.eurofinsus.com	State of Origin: Iowa	Page: Page 1 of 1
Company: Eurofins Environment Testing Southeast L		Accreditations Required (See note): State Program - Iowa		Job #: 310-280877-1
Address: 5102 LaRoche Avenue, ,	Due Date Requested: 5/29/2024			Preservation Codes: -
City: Savannah	TAT Requested (days):			
State, Zip: GA, 31404				
Phone: 912-354-7858(Tel) 912-352-0165(Fax)	PO #:			
Email:	WO #:			
Project Name: Plymouth County Landfill	Project #: 31002859			
Site:	SSOW#:			Other:

Sample Identification - Client ID (Lab ID)	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	9020B/Carbon_Trap	Total Number of containers	Special Instructions/Note:
			Preservation Code:						
MW-8 (310-280877-3)	5/8/24	09:40 Central		Water			X	1	
MW-9 (310-280877-4)	5/8/24	10:00 Central		Water			X	1	
MW-13 (310-280877-5)	5/8/24	08:26 Central		Water			X	1	
MW-16 (310-280877-6)	5/8/24	10:50 Central		Water			X	1	
MW-17 (310-280877-7)	5/8/24	11:10 Central		Water			X	1	
Duplicate (310-280877-8)	5/8/24	11:15 Central		Water			X	1	

Note: Since laboratory accreditations are subject to change, Eurofins Environment Testing North Central, LLC places the ownership of method, analyte & accreditation compliance upon our subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins Environment Testing North Central, LLC laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Environment Testing North Central, LLC attention immediately. If all requested accreditations are current to date, return the signed Chain of Custody attesting to said compliance to Eurofins Environment Testing North Central, LLC.

Possible Hazard Identification	*Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)*
Unconfirmed	☐ *Return To Client* ☐ *Disposal By Lab* ☐ *Archive For* _____ *Months*
Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 2	Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
	5/8/24 1130				
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time: 5/11/24 0928	Company

Custody Seals Intact: ∆ Yes ∆ No	Custody Seal No.:	Cooler Temperature(s) °C and Other Remarks: 2.6/2.7

Login Sample Receipt Checklist

Client: Plymouth Co. Solid Waste

Job Number: 310-280877-1

Login Number: 280877
List Number: 1
Creator: Costello, Mackenzie K

List Source: Eurofins Cedar Falls

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	N/A	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	False	Cooler temperature outside required temperature criteria.
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

Login Sample Receipt Checklist

Client: Plymouth Co. Solid Waste

Job Number: 310-280877-1

Login Number: 280877
List Number: 2
Creator: Munro, Caroline

List Source: Eurofins Savannah
List Creation: 05/11/24 01:27 PM

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

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ANALYTICAL REPORT

PREPARED FOR

Attn: Kent Herbold
Plymouth Co. Solid Waste
34898 150th Street
LeMars, Iowa 51031

Generated 11/14/2024 2:40:20 PM

JOB DESCRIPTION

Plymouth County Landfill-Sept

JOB NUMBER

310-293989-1

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls IA 50613

See page two for job notes and contact information.

Job Notes

This report may not be reproduced except in full, and with written approval from the laboratory. The results relate only to the samples tested. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

The test results in this report relate only to the samples as received by the laboratory and will meet all requirements of the methodology, with any exceptions noted. This report shall not be reproduced except in full, without the express written approval of the laboratory. All questions should be directed to the Eurofins Environment Testing North Central, LLC Project Manager.

Authorization

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11/14/2024 2:40:20 PM

Authorized for release by
Samuel Miller, Project Management Assistant I
Samuel.Miller@et.eurofinsus.com
(319)277-2401

Table of Contents

Job ID: 310-293989-1 — Eurofins Cedar Falls

Job Narrative
310-293989-1

Analytical test results meet all requirements of the associated regulatory program listed on the Accreditation/Certification Summary Page unless otherwise noted under the individual analysis. Data qualifiers and/or narrative comments are included to explain any exceptions, if applicable.

- Matrix QC may not be reported if insufficient sample is provided or site-specific QC samples were not submitted. In these situations, to demonstrate precision and accuracy at a batch level, a LCS/LCSD may be performed, unless otherwise specified in the method.
- Surrogate and/or isotope dilution analyte recoveries (if applicable) which are outside of the QC window are confirmed unless attributed to a dilution or otherwise noted in the narrative.

Regulated compliance samples (e.g. SDWA, NPDES) must comply with the associated agency requirements/permits.

Receipt
The samples were received on 10/30/2024 9:00 AM. Unless otherwise noted below, the samples arrived in good condition, and, where required, properly preserved and on ice. The temperature of the cooler at receipt time was 3.8°C.

GC/MS VOA
Method 8260D: The following sample was collected in a properly preserved vial; however, the pH was outside the required criteria when verified by the laboratory. The sample was analyzed within the 7-day holding time specified for unpreserved samples: MW-10 (310-293989-5).

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

HPLC/IC
Method 9056A_ORGFM_28D: The following sample was diluted due to the nature of the sample matrix: MW-17 (310-293989-1). Elevated reporting limits (RLs) are provided.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Metals
No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

General Chemistry
No additional analytical or quality issues were noted, other than those described above or in the Definitions/ Glossary page.

Sample Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
310-293989-1	MW-17	Water	10/29/24 08:31	10/30/24 09:00
310-293989-2	MW-8	Water	10/29/24 08:46	10/30/24 09:00
310-293989-3	MW-12	Water	10/29/24 09:01	10/30/24 09:00
310-293989-4	MW-16	Water	10/29/24 09:16	10/30/24 09:00
310-293989-5	MW-10	Water	10/29/24 09:39	10/30/24 09:00
310-293989-6	MW-14	Water	10/29/24 10:02	10/30/24 09:00
310-293989-7	Duplicate	Water	10/29/24 09:39	10/30/24 09:00
310-293989-8	MW-7	Water	10/29/24 10:01	10/30/24 09:00
310-293989-9	TripBlank	Water	10/29/24 00:00	10/30/24 09:00
310-293989-10	MW-9	Water	10/29/24 10:45	10/30/24 09:00
310-293989-11	MW-11	Water	10/29/24 10:51	10/30/24 09:00
310-293989-12	MW-13	Water	10/29/24 09:30	10/30/24 09:00

Detection Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: MW-17 — Lab Sample ID: 310-293989-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chemical Oxygen Demand	11.9		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-8 — Lab Sample ID: 310-293989-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
cis-1,2-Dichloroethene	14.8		1.00		ug/L	1		8260D	Total/NA
Chloride	16.5		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	13.2		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-12 — Lab Sample ID: 310-293989-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	0.804		0.500		ug/L	1		8260D	Total/NA
cis-1,2-Dichloroethene	18.3		1.00		ug/L	1		8260D	Total/NA
Vinyl chloride	5.48		1.00		ug/L	1		8260D	Total/NA
Chloride	68.7		5.00		mg/L	5		9056A	Total/NA
Iron	13.8		0.500		mg/L	1		6010D	Dissolved
Ammonia	0.564		0.200		mg/L	1		350.1	Total/NA
Chemical Oxygen Demand	19.1		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-16 — Lab Sample ID: 310-293989-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	7.40		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	24.6		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-10 — Lab Sample ID: 310-293989-5

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	149		5.00		mg/L	5		9056A	Total/NA
Ammonia	0.294		0.200		mg/L	1		350.1	Total/NA
Chemical Oxygen Demand	29.1		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-14 — Lab Sample ID: 310-293989-6

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Benzene	0.531		0.500		ug/L	1		8260D	Total/NA
cis-1,2-Dichloroethene	39.0		1.00		ug/L	1		8260D	Total/NA
Chloride	130		5.00		mg/L	5		9056A	Total/NA
Ammonia	0.260		0.200		mg/L	1		350.1	Total/NA
Chemical Oxygen Demand	28.4		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: Duplicate — Lab Sample ID: 310-293989-7

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	149		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	75.3		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-7 — Lab Sample ID: 310-293989-8

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
1,2-Dichloropropane	5.70		1.00		ug/L	1		8260D	Total/NA
Benzene	0.759		0.500		ug/L	1		8260D	Total/NA
cis-1,2-Dichloroethene	131		1.00		ug/L	1		8260D	Total/NA

This Detection Summary does not include radiochemical test results.

Detection Summary

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-7 (Continued) — Lab Sample ID: 310-293989-8

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Trichloroethene	7.81		1.00		ug/L	1		8260D	Total/NA
Vinyl chloride	9.39		1.00		ug/L	1		8260D	Total/NA

Client Sample ID: TripBlank — Lab Sample ID: 310-293989-9

No Detections.

Client Sample ID: MW-9 — Lab Sample ID: 310-293989-10

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	31.7		5.00		mg/L	5		9056A	Total/NA
Ammonia	0.437		0.200		mg/L	1		350.1	Total/NA
Chemical Oxygen Demand	70.1		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-11 — Lab Sample ID: 310-293989-11

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	128		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	52.2		5.00		mg/L	1		5220D LL	Total/NA

Client Sample ID: MW-13 — Lab Sample ID: 310-293989-12

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Chloride	38.4		5.00		mg/L	5		9056A	Total/NA
Chemical Oxygen Demand	42.6		5.00		mg/L	1		5220D LL	Total/NA

This Detection Summary does not include radiochemical test results.

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: MW-17

Date Collected: 10/29/24 08:31
Date Received: 10/30/24 09:00

Lab Sample ID: 310-293989-1

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 13:20	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 13:20	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 13:20	1
Benzene	<0.500		0.500		ug/L			10/31/24 13:20	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 13:20	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			10/31/24 13:20	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 13:20	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 13:20	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 13:20	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 13:20	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*99*		*73 - 130*		*10/31/24 13:20*	*1*
Toluene-d8 (Surr)	*105*		*80 - 120*		*10/31/24 13:20*	*1*
4-Bromofluorobenzene (Surr)	*100*		*80 - 120*		*10/31/24 13:20*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<5.00		5.00		mg/L			11/13/24 17:19	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 14:44	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			10/31/24 00:55	1
Chemical Oxygen Demand (SM 5220D LL)	**11.9**		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: MW-8

Date Collected: 10/29/24 08:46
Date Received: 10/30/24 09:00

Lab Sample ID: 310-293989-2

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 13:43	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 13:43	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 13:43	1
Benzene	<0.500		0.500		ug/L			10/31/24 13:43	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 13:43	1
cis-1,2-Dichloroethene	**14.8**		1.00		ug/L			10/31/24 13:43	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 13:43	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 13:43	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 13:43	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 13:43	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*99*		*73 - 130*		*10/31/24 13:43*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/31/24 13:43*	*1*
4-Bromofluorobenzene (Surr)	*102*		*80 - 120*		*10/31/24 13:43*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**16.5**		5.00		mg/L			11/13/24 17:53	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 14:46	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			10/31/24 00:55	1
Chemical Oxygen Demand (SM 5220D LL)	**13.2**		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: MW-12

Date Collected: 10/29/24 09:01
Date Received: 10/30/24 09:00

Lab Sample ID: 310-293989-3

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 14:06	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 14:06	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 14:06	1
Benzene	**0.804**		0.500		ug/L			10/31/24 14:06	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 14:06	1
cis-1,2-Dichloroethene	**18.3**		1.00		ug/L			10/31/24 14:06	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 14:06	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 14:06	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 14:06	1
Vinyl chloride	**5.48**		1.00		ug/L			10/31/24 14:06	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*103*		*73 - 130*		*10/31/24 14:06*	*1*
Toluene-d8 (Surr)	*105*		*80 - 120*		*10/31/24 14:06*	*1*
4-Bromofluorobenzene (Surr)	*102*		*80 - 120*		*10/31/24 14:06*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**68.7**		5.00		mg/L			11/13/24 18:26	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	**13.8**		0.500		mg/L			11/11/24 14:48	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	**0.564**		0.200		mg/L			10/31/24 00:57	1
Chemical Oxygen Demand (SM 5220D LL)	**19.1**		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: MW-16

Date Collected: 10/29/24 09:16
Date Received: 10/30/24 09:00

Lab Sample ID: 310-293989-4

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 14:28	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 14:28	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 14:28	1
Benzene	<0.500		0.500		ug/L			10/31/24 14:28	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 14:28	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			10/31/24 14:28	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 14:28	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 14:28	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 14:28	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 14:28	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*101*		*73 - 130*		*10/31/24 14:28*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/31/24 14:28*	*1*
4-Bromofluorobenzene (Surr)	*102*		*80 - 120*		*10/31/24 14:28*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**7.40**		5.00		mg/L			11/13/24 18:37	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 14:50	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			10/31/24 00:57	1
Chemical Oxygen Demand (SM 5220D LL)	**24.6**		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: MW-10

Date Collected: 10/29/24 09:39
Date Received: 10/30/24 09:00

Lab Sample ID: 310-293989-5

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 14:51	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 14:51	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 14:51	1
Benzene	<0.500		0.500		ug/L			10/31/24 14:51	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 14:51	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			10/31/24 14:51	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 14:51	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 14:51	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 14:51	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 14:51	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*98*		*73 - 130*		*10/31/24 14:51*	*1*
Toluene-d8 (Surr)	*103*		*80 - 120*		*10/31/24 14:51*	*1*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*		*10/31/24 14:51*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**149**		5.00		mg/L			11/13/24 18:48	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 14:53	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	**0.294**		0.200		mg/L			10/31/24 00:57	1
Chemical Oxygen Demand (SM 5220D LL)	**29.1**		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: MW-14

Date Collected: 10/29/24 10:02
Date Received: 10/30/24 09:00

Lab Sample ID: 310-293989-6

Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 15:14	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 15:14	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 15:14	1
Benzene	**0.531**		0.500		ug/L			10/31/24 15:14	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 15:14	1
cis-1,2-Dichloroethene	**39.0**		1.00		ug/L			10/31/24 15:14	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 15:14	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 15:14	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 15:14	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 15:14	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*100*		*73 - 130*		*10/31/24 15:14*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/31/24 15:14*	*1*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*		*10/31/24 15:14*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**130**		5.00		mg/L			11/13/24 18:59	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 14:55	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	**0.260**		0.200		mg/L			10/31/24 00:59	1
Chemical Oxygen Demand (SM 5220D LL)	**28.4**		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Client Sample ID: Duplicate

Date Collected: 10/29/24 09:39
Date Received: 10/30/24 09:00

Lab Sample ID: 310-293989-7
Matrix: Water

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 15:36	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 15:36	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 15:36	1
Benzene	<0.500		0.500		ug/L			10/31/24 15:36	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 15:36	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			10/31/24 15:36	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 15:36	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 15:36	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 15:36	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 15:36	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*100*		*73 - 130*		*10/31/24 15:36*	*1*
Toluene-d8 (Surr)	*102*		*80 - 120*		*10/31/24 15:36*	*1*
4-Bromofluorobenzene (Surr)	*102*		*80 - 120*		*10/31/24 15:36*	*1*

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**149**		5.00		mg/L			11/13/24 19:10	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 14:57	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			10/31/24 00:59	1
Chemical Oxygen Demand (SM 5220D LL)	**75.3**		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-7
Lab Sample ID: 310-293989-8
Date Collected: 10/29/24 10:01
Matrix: Water
Date Received: 10/30/24 09:00

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 15:59	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 15:59	1
1,2-Dichloropropane	**5.70**		1.00		ug/L			10/31/24 15:59	1
Benzene	**0.759**		0.500		ug/L			10/31/24 15:59	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 15:59	1
cis-1,2-Dichloroethene	**131**		1.00		ug/L			10/31/24 15:59	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 15:59	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 15:59	1
Trichloroethene	**7.81**		1.00		ug/L			10/31/24 15:59	1
Vinyl chloride	**9.39**		1.00		ug/L			10/31/24 15:59	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*103*		*73 - 130*		*10/31/24 15:59*	*1*
Toluene-d8 (Surr)	*105*		*80 - 120*		*10/31/24 15:59*	*1*
4-Bromofluorobenzene (Surr)	*102*		*80 - 120*		*10/31/24 15:59*	*1*

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: TripBlank
Lab Sample ID: 310-293989-9
Date Collected: 10/29/24 00:00
Matrix: Water
Date Received: 10/30/24 09:00

Method: SW846 8260D - Volatile Organic Compounds by GC/MS

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 11:51	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 11:51	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 11:51	1
Benzene	<0.500		0.500		ug/L			10/31/24 11:51	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 11:51	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			10/31/24 11:51	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 11:51	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 11:51	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 11:51	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 11:51	1

Surrogate	*%Recovery*	*Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*101*		*73 - 130*		*10/31/24 11:51*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/31/24 11:51*	*1*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*		*10/31/24 11:51*	*1*

Client Sample Results

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-9
Lab Sample ID: 310-293989-10

Date Collected: 10/29/24 10:45
Matrix: Water
Date Received: 10/30/24 09:00

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	31.7		5.00		mg/L			11/13/24 19:21	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 15:03	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	0.437		0.200		mg/L			10/31/24 01:02	1
Chemical Oxygen Demand (SM 5220D LL)	70.1		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-11
Lab Sample ID: 310-293989-11
Date Collected: 10/29/24 10:51
Matrix: Water
Date Received: 10/30/24 09:00

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	128		5.00		mg/L			11/13/24 19:32	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 15:05	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			10/31/24 01:02	1
Chemical Oxygen Demand (SM 5220D LL)	52.2		5.00		mg/L			11/12/24 09:38	1

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-13
Lab Sample ID: 310-293989-12
Date Collected: 10/29/24 09:30
Matrix: Water
Date Received: 10/30/24 09:00

Method: SW846 9056A - Anions, Ion Chromatography

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	**38.4**		5.00		mg/L			11/13/24 19:43	5

Method: SW846 6010D - Metals (ICP) - Dissolved

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 15:09	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia (EPA 350.1)	<0.200		0.200		mg/L			10/31/24 01:04	1
Chemical Oxygen Demand (SM 5220D LL)	**42.6**		5.00		mg/L			11/12/24 09:38	1

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
☼	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

Surrogate Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

Method: 8260D - Volatile Organic Compounds by GC/MS

Matrix: Water

Prep Type: Total/NA

		Percent Surrogate Recovery (Acceptance Limits)								
		DBFM	TOL	BFB						
Lab Sample ID	Client Sample ID	(73-130)	(80-120)	(80-120)						
310-293989-1	MW-17	99	105	100						
310-293989-1 MS	MW-17	95	105	101						
310-293989-1 MSD	MW-17	97	107	102						
310-293989-2	MW-8	99	104	102						
310-293989-3	MW-12	103	105	102						
310-293989-4	MW-16	101	104	102						
310-293989-5	MW-10	98	103	101						
310-293989-6	MW-14	100	104	101						
310-293989-7	Duplicate	100	102	102						
310-293989-8	MW-7	103	105	102						
310-293989-9	TripBlank	101	104	101						
LCS 310-438190/6	Lab Control Sample	95	108	99						
LCS 310-438190/7	Lab Control Sample	100	106	101						
MB 310-438190/5	Method Blank	98	104	103						

Surrogate Legend

DBFM = Dibromofluoromethane (Surr)

TOL = Toluene-d8 (Surr)

BFB = 4-Bromofluorobenzene (Surr)

Method: 8260D - Volatile Organic Compounds by GC/MS

Lab Sample ID: MB 310-438190/5
Matrix: Water
Analysis Batch: 438190

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
1,1,1-Trichloroethane	<1.00		1.00		ug/L			10/31/24 09:57	1
1,2-Dichloroethane	<1.00		1.00		ug/L			10/31/24 09:57	1
1,2-Dichloropropane	<1.00		1.00		ug/L			10/31/24 09:57	1
Benzene	<0.500		0.500		ug/L			10/31/24 09:57	1
Chlorodibromomethane	<5.00		5.00		ug/L			10/31/24 09:57	1
cis-1,2-Dichloroethene	<1.00		1.00		ug/L			10/31/24 09:57	1
Methylene Chloride	<5.00		5.00		ug/L			10/31/24 09:57	1
Tetrachloroethene	<1.00		1.00		ug/L			10/31/24 09:57	1
Trichloroethene	<1.00		1.00		ug/L			10/31/24 09:57	1
Vinyl chloride	<1.00		1.00		ug/L			10/31/24 09:57	1

Surrogate	*MB %Recovery*	*MB Qualifier*	*Limits*	*Prepared*	*Analyzed*	*Dil Fac*
Dibromofluoromethane (Surr)	*98*		*73 - 130*		*10/31/24 09:57*	*1*
Toluene-d8 (Surr)	*104*		*80 - 120*		*10/31/24 09:57*	*1*
4-Bromofluorobenzene (Surr)	*103*		*80 - 120*		*10/31/24 09:57*	*1*

Lab Sample ID: LCS 310-438190/6
Matrix: Water
Analysis Batch: 438190

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
1,1,1-Trichloroethane			20.0	17.47		ug/L		87	73 - 129		
1,2-Dichloroethane			20.0	17.43		ug/L		87	71 - 125		
1,2-Dichloropropane			20.0	18.95		ug/L		95	73 - 124		
Benzene			20.0	17.78		ug/L		89	72 - 124		
Chlorodibromomethane			20.0	16.20		ug/L		81	71 - 121		
cis-1,2-Dichloroethene			20.0	18.08		ug/L		90	74 - 123		
Methylene Chloride			20.0	17.93		ug/L		90	50 - 150		
Tetrachloroethene			20.0	16.63		ug/L		83	71 - 130		
Trichloroethene			20.0	17.03		ug/L		85	72 - 126		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*95*		*73 - 130*
Toluene-d8 (Surr)	*108*		*80 - 120*
4-Bromofluorobenzene (Surr)	*99*		*80 - 120*

Lab Sample ID: LCS 310-438190/7
Matrix: Water
Analysis Batch: 438190

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Vinyl chloride			20.0	19.75		ug/L		99	56 - 140		

Surrogate	*LCS %Recovery*	*LCS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*100*		*73 - 130*
Toluene-d8 (Surr)	*106*		*80 - 120*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*

Method: 8260D - Volatile Organic Compounds by GC/MS (Continued)

Lab Sample ID: 310-293989-1 MS
Matrix: Water
Analysis Batch: 438190

Client Sample ID: MW-17
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
1,1,1-Trichloroethane	<1.00		25.0	19.71		ug/L		79	52 - 130
1,2-Dichloroethane	<1.00		25.0	18.73		ug/L		75	51 - 130
1,2-Dichloropropane	<1.00		25.0	20.13		ug/L		81	57 - 130
Benzene	<0.500		25.0	19.51		ug/L		78	46 - 130
Chlorodibromomethane	<5.00		25.0	17.69		ug/L		71	54 - 130
cis-1,2-Dichloroethene	<1.00		25.0	19.55		ug/L		78	45 - 130
Methylene Chloride	<5.00		25.0	19.62		ug/L		78	37 - 150
Tetrachloroethene	<1.00		25.0	20.04		ug/L		80	47 - 130
Trichloroethene	<1.00		25.0	19.18		ug/L		77	51 - 130

Surrogate	*MS %Recovery*	*MS Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*95*		*73 - 130*
Toluene-d8 (Surr)	*105*		*80 - 120*
4-Bromofluorobenzene (Surr)	*101*		*80 - 120*

Lab Sample ID: 310-293989-1 MSD
Matrix: Water
Analysis Batch: 438190

Client Sample ID: MW-17
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
1,1,1-Trichloroethane	<1.00		25.0	19.61		ug/L		78	52 - 130	1	20
1,2-Dichloroethane	<1.00		25.0	18.19		ug/L		73	51 - 130	3	20
1,2-Dichloropropane	<1.00		25.0	19.92		ug/L		80	57 - 130	1	20
Benzene	<0.500		25.0	19.23		ug/L		77	46 - 130	1	20
Chlorodibromomethane	<5.00		25.0	18.18		ug/L		73	54 - 130	3	20
cis-1,2-Dichloroethene	<1.00		25.0	19.24		ug/L		77	45 - 130	2	20
Methylene Chloride	<5.00		25.0	19.48		ug/L		78	37 - 150	1	24
Tetrachloroethene	<1.00		25.0	20.28		ug/L		81	47 - 130	1	20
Trichloroethene	<1.00		25.0	18.79		ug/L		75	51 - 130	2	20

Surrogate	*MSD %Recovery*	*MSD Qualifier*	*Limits*
Dibromofluoromethane (Surr)	*97*		*73 - 130*
Toluene-d8 (Surr)	*107*		*80 - 120*
4-Bromofluorobenzene (Surr)	*102*		*80 - 120*

Method: 9056A - Anions, Ion Chromatography

Lab Sample ID: MB 310-439727/3
Matrix: Water
Analysis Batch: 439727

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<1.00		1.00		mg/L			11/13/24 16:51	1

Method: 9056A - Anions, Ion Chromatography (Continued)

Lab Sample ID: LCS 310-439727/4
Matrix: Water
Analysis Batch: 439727

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride			10.0	9.388		mg/L		94	90 - 110		

Lab Sample ID: 310-293989-1 MS
Matrix: Water
Analysis Batch: 439727

Client Sample ID: MW-17
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits		
Chloride	<5.00		50.0	48.19		mg/L		90	80 - 120		

Lab Sample ID: 310-293989-1 MSD
Matrix: Water
Analysis Batch: 439727

Client Sample ID: MW-17
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Chloride	<5.00		50.0	47.85		mg/L		89	80 - 120	1	15

Method: 6010D - Metals (ICP)

Lab Sample ID: MB 310-439342/16
Matrix: Water
Analysis Batch: 439342

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Iron	<0.500		0.500		mg/L			11/11/24 14:40	1

Lab Sample ID: LCS 310-439342/17
Matrix: Water
Analysis Batch: 439342

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte			Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits		
Iron			20.0	21.84		mg/L		109	80 - 120		

Lab Sample ID: 310-293989-12 DU
Matrix: Water
Analysis Batch: 439342

Client Sample ID: MW-13
Prep Type: Dissolved

Analyte	Sample Result	Sample Qualifier		DU Result	DU Qualifier	Unit	D			RPD	RPD Limit
Iron	<0.500			<0.500		mg/L				NC	20

Method: 350.1 - Nitrogen, Ammonia

Lab Sample ID: MB 310-438137/219
Matrix: Water
Analysis Batch: 438137

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia	<0.200		0.200		mg/L			10/31/24 00:47	1

Method: 350.1 - Nitrogen, Ammonia (Continued)

Lab Sample ID: LCS 310-438137/220
Matrix: Water
Analysis Batch: 438137

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Ammonia	8.55	8.639		mg/L		101	90 - 110

Method: 5220D LL - COD

Lab Sample ID: MB 310-439399/32
Matrix: Water
Analysis Batch: 439399

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chemical Oxygen Demand	<5.00		5.00		mg/L			11/12/24 09:38	1

Lab Sample ID: LCS 310-439399/3
Matrix: Water
Analysis Batch: 439399

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chemical Oxygen Demand	125	129.8		mg/L		104	85 - 110

Lab Sample ID: LCS 310-439399/33
Matrix: Water
Analysis Batch: 439399

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chemical Oxygen Demand	125	129.8		mg/L		104	85 - 110

GC/MS VOA

Analysis Batch: 438190

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-293989-1	MW-17	Total/NA	Water	8260D	
310-293989-2	MW-8	Total/NA	Water	8260D	
310-293989-3	MW-12	Total/NA	Water	8260D	
310-293989-4	MW-16	Total/NA	Water	8260D	
310-293989-5	MW-10	Total/NA	Water	8260D	
310-293989-6	MW-14	Total/NA	Water	8260D	
310-293989-7	Duplicate	Total/NA	Water	8260D	
310-293989-8	MW-7	Total/NA	Water	8260D	
310-293989-9	TripBlank	Total/NA	Water	8260D	
MB 310-438190/5	Method Blank	Total/NA	Water	8260D	
LCS 310-438190/6	Lab Control Sample	Total/NA	Water	8260D	
LCS 310-438190/7	Lab Control Sample	Total/NA	Water	8260D	
310-293989-1 MS	MW-17	Total/NA	Water	8260D	
310-293989-1 MSD	MW-17	Total/NA	Water	8260D	

HPLC/IC

Analysis Batch: 439727

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-293989-1	MW-17	Total/NA	Water	9056A	
310-293989-2	MW-8	Total/NA	Water	9056A	
310-293989-3	MW-12	Total/NA	Water	9056A	
310-293989-4	MW-16	Total/NA	Water	9056A	
310-293989-5	MW-10	Total/NA	Water	9056A	
310-293989-6	MW-14	Total/NA	Water	9056A	
310-293989-7	Duplicate	Total/NA	Water	9056A	
310-293989-10	MW-9	Total/NA	Water	9056A	
310-293989-11	MW-11	Total/NA	Water	9056A	
310-293989-12	MW-13	Total/NA	Water	9056A	
MB 310-439727/3	Method Blank	Total/NA	Water	9056A	
LCS 310-439727/4	Lab Control Sample	Total/NA	Water	9056A	
310-293989-1 MS	MW-17	Total/NA	Water	9056A	
310-293989-1 MSD	MW-17	Total/NA	Water	9056A	

Metals

Analysis Batch: 439342

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-293989-1	MW-17	Dissolved	Water	6010D	
310-293989-2	MW-8	Dissolved	Water	6010D	
310-293989-3	MW-12	Dissolved	Water	6010D	
310-293989-4	MW-16	Dissolved	Water	6010D	
310-293989-5	MW-10	Dissolved	Water	6010D	
310-293989-6	MW-14	Dissolved	Water	6010D	
310-293989-7	Duplicate	Dissolved	Water	6010D	
310-293989-10	MW-9	Dissolved	Water	6010D	
310-293989-11	MW-11	Dissolved	Water	6010D	
310-293989-12	MW-13	Dissolved	Water	6010D	
MB 310-439342/16	Method Blank	Total/NA	Water	6010D	
LCS 310-439342/17	Lab Control Sample	Total/NA	Water	6010D	
310-293989-12 DU	MW-13	Dissolved	Water	6010D	

QC Association Summary

Client: Plymouth Co. Solid Waste
Project/Site: Plymouth County Landfill-Sept

Job ID: 310-293989-1

General Chemistry

Analysis Batch: 438137

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-293989-1	MW-17	Total/NA	Water	350.1	
310-293989-2	MW-8	Total/NA	Water	350.1	
310-293989-3	MW-12	Total/NA	Water	350.1	
310-293989-4	MW-16	Total/NA	Water	350.1	
310-293989-5	MW-10	Total/NA	Water	350.1	
310-293989-6	MW-14	Total/NA	Water	350.1	
310-293989-7	Duplicate	Total/NA	Water	350.1	
310-293989-10	MW-9	Total/NA	Water	350.1	
310-293989-11	MW-11	Total/NA	Water	350.1	
310-293989-12	MW-13	Total/NA	Water	350.1	
MB 310-438137/219	Method Blank	Total/NA	Water	350.1	
LCS 310-438137/220	Lab Control Sample	Total/NA	Water	350.1	

Analysis Batch: 439399

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
310-293989-1	MW-17	Total/NA	Water	5220D LL	
310-293989-2	MW-8	Total/NA	Water	5220D LL	
310-293989-3	MW-12	Total/NA	Water	5220D LL	
310-293989-4	MW-16	Total/NA	Water	5220D LL	
310-293989-5	MW-10	Total/NA	Water	5220D LL	
310-293989-6	MW-14	Total/NA	Water	5220D LL	
310-293989-7	Duplicate	Total/NA	Water	5220D LL	
310-293989-10	MW-9	Total/NA	Water	5220D LL	
310-293989-11	MW-11	Total/NA	Water	5220D LL	
310-293989-12	MW-13	Total/NA	Water	5220D LL	
MB 310-439399/32	Method Blank	Total/NA	Water	5220D LL	
LCS 310-439399/3	Lab Control Sample	Total/NA	Water	5220D LL	
LCS 310-439399/33	Lab Control Sample	Total/NA	Water	5220D LL	

Lab Chronicle

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-17
Lab Sample ID: 310-293989-1
Date Collected: 10/29/24 08:31
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 13:20
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 17:19
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 14:44
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 00:55
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: MW-8
Lab Sample ID: 310-293989-2
Date Collected: 10/29/24 08:46
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 13:43
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 17:53
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 14:46
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 00:55
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: MW-12
Lab Sample ID: 310-293989-3
Date Collected: 10/29/24 09:01
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 14:06
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 18:26
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 14:48
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 00:57
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: MW-16
Lab Sample ID: 310-293989-4
Date Collected: 10/29/24 09:16
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 14:28
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 18:37
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 14:50
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 00:57
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Lab Chronicle

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-10
Lab Sample ID: 310-293989-5
Date Collected: 10/29/24 09:39
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 14:51
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 18:48
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 14:53
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 00:57
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: MW-14
Lab Sample ID: 310-293989-6
Date Collected: 10/29/24 10:02
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 15:14
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 18:59
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 14:55
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 00:59
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: Duplicate
Lab Sample ID: 310-293989-7
Date Collected: 10/29/24 09:39
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 15:36
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 19:10
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 14:57
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 00:59
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: MW-7
Lab Sample ID: 310-293989-8
Date Collected: 10/29/24 10:01
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 15:59

Client Sample ID: TripBlank
Lab Sample ID: 310-293989-9
Date Collected: 10/29/24 00:00
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	8260D		1	438190	WSE8	EET CF	10/31/24 11:51

Lab Chronicle

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Client Sample ID: MW-9
Lab Sample ID: 310-293989-10

Date Collected: 10/29/24 10:45
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 19:21
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 15:03
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 01:02
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: MW-11
Lab Sample ID: 310-293989-11

Date Collected: 10/29/24 10:51
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 19:32
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 15:05
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 01:02
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Client Sample ID: MW-13
Lab Sample ID: 310-293989-12

Date Collected: 10/29/24 09:30
Matrix: Water
Date Received: 10/30/24 09:00

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		5	439727	WZC8	EET CF	11/13/24 19:43
Dissolved	Analysis	6010D		1	439342	ZRI4	EET CF	11/11/24 15:09
Total/NA	Analysis	350.1		1	438137	ZJX4	EET CF	10/31/24 01:04
Total/NA	Analysis	5220D LL		1	439399	HE7K	EET CF	11/12/24 09:38

Laboratory References:

EET CF = Eurofins Cedar Falls, 3019 Venture Way, Cedar Falls, IA 50613, TEL (319)277-2401

Accreditation/Certification Summary

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Laboratory: Eurofins Cedar Falls

The accreditations/certifications listed below are applicable to this report.

Authority	Program	Identification Number	Expiration Date
Iowa	State	007	12-01-25

Method Summary

Client: Plymouth Co. Solid Waste
Job ID: 310-293989-1
Project/Site: Plymouth County Landfill-Sept

Method	Method Description	Protocol	Laboratory
8260D	Volatile Organic Compounds by GC/MS	SW846	EET CF
9056A	Anions, Ion Chromatography	SW846	EET CF
6010D	Metals (ICP)	SW846	EET CF
350.1	Nitrogen, Ammonia	EPA	EET CF
5220D LL	COD	SM	EET CF
5030B	Purge and Trap	SW846	EET CF

Protocol References:

EPA = US Environmental Protection Agency

SM = "Standard Methods For The Examination Of Water And Wastewater"

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

EET CF = Eurofins Cedar Falls, 3019 Venture Way, Cedar Falls, IA 50613, TEL (319)277-2401

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310-293989 Chain of Custody

Cooler/Sample Receipt and Temperature Log Form

Client Information			
Client: Plymouth CO			
City/State: CITY		STATE	Project:
Receipt Information			
Date/Time Received:	DATE 10/30/24	TIME 900	Received By: XB

Delivery Type: ☐ UPS ☒ FedEx ☐ FedEx Ground ☐ US Mail ☐ Spee-Dee ☐ Lab Courier ☐ Lab Field Services ☐ Client Drop-off ☐ Other:_____

Condition of Cooler/Containers

Sample(s) received in Cooler?	☒ Yes ☐ No	*If yes:* Cooler ID:
Multiple Coolers?	☐ Yes ☒ No	*If yes:* Cooler # _____ of _____
Cooler Custody Seals Present? No	☐ Yes ☒ No	*If yes:* Cooler custody seals intact? ☐ Yes ☐
Sample Custody Seals Present? No	☐ Yes ☒ No	*If yes:* Sample custody seals intact? ☐ Yes ☐
Trip Blank Present?	☒ Yes ☐ No	*If yes:* Which VOA samples are in cooler? ↓

all

Temperature Record

Coolant: ☒ Wet ice ☐ Blue ice ☐ Dry ice ☐ Other:_____ ☐ NONE

Thermometer ID: 2	Correction Factor (°C): 0

• **Temp Blank Temperature** – If no temp blank, or temp blank temperature above criteria, proceed to Sample Container Temperature

Uncorrected Temp (°C): 3.8	Corrected Temp (°C): 3.8

• **Sample Container Temperature**

	CONTAINER 1	CONTAINER 2
Container(s) used:		
Uncorrected Temp (°C):		
Corrected Temp (°C):		

Exceptions Noted

1) If temperature exceeds criteria, was sample(s) received same day of sampling? ☐ Yes ☐ No
   a) *If yes:* Is there evidence that the chilling process began? ☐ Yes ☐ No

2) If temperature is <0°C, are there obvious signs that the integrity of sample containers is compromised? (e.g., bulging septa, broken/cracked bottles, frozen solid?) ☐ Yes ☐ No

NOTE: If yes, contact PM before proceeding. If no, proceed with login

Additional Comments

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls, IA 50613
Phone. 319-277-2401 Fax: 319-277-2425

Chain of Custody Record

TestAmerica Des Moines SC
214

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Client Information	Sampler: Kent Herbold	Lab PM: Mathews, Emily A	Carrier Tracking No(s):	COC No: 310-95676-23524.1
Client Contact: Kent Herbold	Phone: 712-260-2395	E-Mail: Emily Mathews@et.eurofinsus.com	State of Origin: Iowa	Page: Page 1 of 2
Company: Plymouth Co. Solid Waste	PWSID:			Job #:
Address: 34898 150th Street	Due Date Requested:			
City: LeMars	TAT Requested (days):			
State, Zip: IA, 51031	Compliance Project: Δ Yes Δ No			
Phone: 712-260-2395	PO #: Purchase Order not required			
Email: kherbold@co.plymouth.ia.us	WO #:			
Project Name: Plymouth County Landfill-Sept	Project #: 31002859			
Site: LANDFILL	SSOW#:			

Analysis Requested

Preservation Codes:
A - HCL
D - HNO3
N - None
S - H2SO4
Other:

Sample Identification	Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	8260D - (MOD) Volatile Custom Sublist	6010D - Dissolved Iron	9056A_ORGFM_28D - Chloride	350.1, 5220D_LL	Total Number of containers	Special Instructions/Note:
			Preservation Code:				A	D	N	S		
MW-17	10-29-24	8:31	G	Water	Y							
MW-8	10-29-24	8:46	G	Water	Y							
MW-12	10-29-24	9:01	G	Water	Y							
MW-16	10-29-24	9:16	G	Water	Y							
MW-10	10-29-24	9:39	G	Water	Y							
MW-14	10-29-24	10:02	G	Water	Y							
DUPLICATE	10-29-24	9:39	G	Water	Y							
MW-7	10-29-24	10:01	G	Water	N							
TRIPBLANK	10-29-24	—		Water	N							
MW-9	10-29-24	10:45	G	Water	Y							
MW-11	10-29-24	10:57	G	Water	Y							

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☒ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested. I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time: 10/30/24 0900	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.	Cooler Temperature(s) °C and Other Remarks:

Ver: 06/06/2024

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11/14/2024

Eurofins Cedar Falls
3019 Venture Way
Cedar Falls, IA 50613
Phone. 319-277-2401 Fax: 319-277-2425

Chain of Custody Record

TestAmerica Des Moines SC
214

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Client Information	Sampler	Lab PM: Mathews, Emily A	Carrier Tracking No(s):	COC No: 310-95676-23524.2
Client Contact: Kent Herbold	Phone:	E-Mail: Emily.Mathews@et.eurofinsus.com	State of Origin:	Page: Page 2 of 2
Company: Plymouth Co. Solid Waste	PWSID:	Analysis Requested		Job #:
Address: 34898 150th Street	Due Date Requested:			Preservation Codes: A - HCL; D - HNO3; N - None; S - H2SO4
City: LeMars	TAT Requested (days):			
State, Zip: IA, 51031	Compliance Project: Δ Yes Δ No			
Phone:	PO #: Purchase Order not required			Other:
Email: kherbold@co.plymouth.ia.us	WO #:			
Project Name: Plymouth County Landfill-Sept	Project #: 31002859			
Site:	SSOW#:			

Sample Identification	Sample Date	Sample Time	Sample Type (C=Comp, G=grab)	Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)	Field Filtered Sample (Yes or No)	Perform MS/MSD (Yes or No)	8260D - (MOD) Volatile Custom Sublist	6010D - Dissolved Iron	9056A_ORGFM_28D - Chloride	350.1, 6220D_LL	Total Number of containers	Special Instructions/Note:
			Preservation Code:				A	D	N	S		
MW-13	10/29/24	9:50	G	Water							3	

Possible Hazard Identification
☐ Non-Hazard ☐ Flammable ☐ Skin Irritant ☐ Poison B ☐ Unknown ☐ Radiological

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
☐ Return To Client ☐ Disposal By Lab ☐ Archive For _____ Months

Deliverable Requested I, II, III, IV, Other (specify)

Special Instructions/QC Requirements:

Empty Kit Relinquished by:	Date:	Time:	Method of Shipment:

Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time:	Company
Relinquished by:	Date/Time:	Company	Received by:	Date/Time: 10/30/24 0900	Company

Custody Seals Intact: Δ Yes Δ No	Custody Seal No.	Cooler Temperature(s) °C and Other Remarks:

Ver: 05/06/2024

LANDFILL GROUNDWATER SAMPLING DATA SHEET

Project Information

Project Name: Plymouth County Sanitary Landfill
Project Location: LeMars, IA
Project Number: PCSWA.18001
SLF Permit No.: 75-SDP-04-74P

Sampling Information

Date Sampled: 10/29/2024
Sampling Crew: Kent Herbold
Equipment — Water Level: geotech
pH/Conductivity: oakton
Equipment Calibration Date: 10/29/2024
Equipment Calibration Time: 8:00

Weather Conditions

Recorded Depth	Well#	Date	Static Water Level	Measured Well Depth	Time sampled	Bailing Equipment (see note)	Purge Volume Gal	Stabilized pH	Stabilized Conductivity	Stabilized Tempuratur e	Methane Gas	Capped Properly Y / N
32.7	MW-7		24.6	32.9	8:31	B		6.68	1435	18.1	0	Y
27.6	MW-8		21	27.8	8:46	B		7.25	1248	11.8	0	y
25.5	MW-9		21	25.3	9:00	B		7.62	1146	17.1	0	y
32.8	MW-10		28.9	32.6	9:14	B		6.74	1602	12.6	0	y
39	MW-11		29.5	39.1	9:38	B		7.03	1345	12.8	0	y
53.6	MW-12		44.1	53.6	9:51	B		6.45	1348	14.8	0	y
36.56	MW-13		26.4	36.5	10:01	B		6.84	1604	12.5	0	y
50.16	MW-14		38.4	50.9	10:16	B		6.5	1606	13.9	0	y
37.3	MW-16		29	37.4	10:31	B		6.67	1302	12.2	0	y
32.6	MW-17		19.3	31.9	10:45	B		7.14	824	11.4	0	y

Note: Low-Flow Pump (LF), Submersible (S), Peri Pump (P), Waterra (W), Dedicated Bailer (DB), Bailer (B)

Login Sample Receipt Checklist

Client: Plymouth Co. Solid Waste

Job Number: 310-293989-1
SDG Number:

Login Number: 293989
List Number: 1
Creator: Homolar, Dana J

List Source: Eurofins Cedar Falls

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	N/A	
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

APPENDIX C

Statistical Report

Results of the Ground Water Statistics

for Plymouth County Sanitary Landfill

Semi-Annual Monitoring Events in 2024

Prepared for:
Plymouth County Solid Waste Agency
LeMars, IA

Prepared by:
Jeffrey A. Holmgren
Otter Creek Environmental Services, L.L.C.
40W565 Foxwick Court
Elgin, IL 60124
(847) 464-1355

November 2024

INTRODUCTION

This report contains the results of the statistical analyses used to evaluate the ground water data obtained during the semi-annual monitoring events in 2024 at the Plymouth County Sanitary Landfill. The ground water at the Plymouth County Sanitary Landfill is monitored by a network of wells including MW-10, MW-11, MW-12, MW-13, MW-14, MW-16, MW-17, MW-7, MW-8, and MW-9. Monitoring wells MW-10, MW-11, MW-12, MW-13, MW-14, MW-16, MW-17, MW-7, MW-8, and MW-9 were sampled during May 2-8, 2024 and October 29, 2024 and analyzed for the parameters required by permit. The statistical plan is designed to detect a release from the facility at the earliest indication so that it is protective of human health and the environment. The interwell methodology is described and then applied to the Plymouth County Sanitary Landfill data. The statistical plan conforms with IAC 567, Chapter 113.10, USEPA Guidance document ("*Statistical Analysis of Ground-Water Monitoring Data at RCRA Facilities, Unified Guidance"*, March 2009), and the American Society for Testing and Materials (ASTM) standard D6312-98, *Developing Appropriate Statistical Approaches for Ground-Water Detection Monitoring Programs*.

Ground Water Monitoring Program

Each of the groundwater monitoring wells is to be sampled semi-annually and analyzed for select VOCs, iron, ammonia, COD, chloride, pH, and specific conductivity. TOX and phenols are monitored for annually. The ground water data obtained during the semi-annual monitoring events in 2024 are summarized in Attachment A.

STATISTICAL METHODOLOGIES FOR DETECTION MONITORING

IAC 567, Chapter 113.10(4) provides several options for statistically evaluating the ground water data. The preferred methods for comparing ground water data are using either prediction limits or using control charts. The site prediction limit method was applied to the Plymouth County Sanitary Landfill data using the DUMPStat® statistical program. DUMPStat® is a program for the statistical analysis of groundwater monitoring data using methods described in "Statistical Methods for Groundwater Monitoring" by Dr. Robert D. Gibbons. The DUMPStat program is completely consistent with all USEPA regulations and guidance and the ASTM D6312-98 guidance.

Interwell Statistics: Upgradient versus Downgradient Comparisons

Interwell statistics are appropriate when the upgradient and downgradient wells monitor the same ground water formation and there is similar variability in the upgradient and downgradient zones. Site prediction limits are determined by pooling the historical ground water data from hydraulically upgradient wells. This statistical method compares the current downgradient determinations to site prediction limits and checks for exceedances. The type of prediction limit utilized (e.g., parametric or nonparametric) is based on the detection frequency and the data distribution of each parameter in the background data. The distribution of the background data is tested for normality using the Shapiro-Wilk test (Gibbons, 1994 and USEPA 1992). If the constituent is normally distributed, a normal prediction limit is used. If normality is rejected by the Shapiro-Wilk test, the background data is transformed by taking the natural logarithm. The Shapiro-Wilk test is then reapplied on the transformed data. If it is not rejected, lognormal prediction limits are used. If after transforming the data, normality is still rejected, nonparametric prediction limits are used for that analyte. The nonparametric prediction limit is the largest determination in the background measurements. For constituents where the background detection frequency is greater than 0% but less than 50%, nonparametric prediction limits will be used. If the detection frequency is 0% after thirteen samples have

been collected, the practical quantitation limit (PQL) becomes the nonparametric prediction limit.

Results of the Interwell Statistics: First Semi-Annual Monitoring event in 2024

The background data used in this statistical analysis includes the ground water data collected from ground water well MW-17 during the period from 1997 through May 2024. A summary of the background data from monitoring well MW-17 is listed in Attachment B, Table 1 "Upgradient Data". This statistical method compares the current downgradient determinations to site prediction limits and checks for exceedances.

Table 2 "Most Current Downgradient Monitoring Data", summarizes the May 2024 data from wells MW-10, MW-11, MW-12, MW-13, MW-14, MW-16, MW-8, and MW-9, compared to the site prediction limits. Prediction limit exceedances are flagged with asterisks. For the May 2024 data, the site prediction limit exceedances detected are summarized in the table below.

Prediction Limit Exceedances during the First Semi-Annual Monitoring Event in 2024

Well	Parameter	Result	Prediction Limit	Prediction Limit Type	Verified/ Awaiting verification
MW-10	COD, mg/L	153	21.2000	Nonparametric	Verified
	TOX, µg/L	185	11.4000	Nonparametric	Verified
MW-11	Chloride, mg/L	101	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1274	1189.8845	Normal	Verified
	TOX, µg/L	172	11.4000	Nonparametric	Awaiting verification
MW-12	Chloride, mg/L	40.7	7.3000	Nonparametric	Verified
	Iron, µg/L	6970	100.0000	Nonparametric	Verified
	Spec cond, µmhos/cm	1440	1189.8845	Normal	Verified
	TOX, µg/L	146	11.4000	Nonparametric	Verified
MW-13	COD, mg/L	23.7	21.2000	Nonparametric	Awaiting verification
	Chloride, mg/L	60.5	7.3000	Nonparametric	Verified
	Iron, µg/L	6370	100.0000	Nonparametric	Verified
	Spec cond, µmhos/cm	1550	1189.8845	Normal	Awaiting verification
MW-14	COD, mg/L	22.6	21.2000	Nonparametric	Verified
	Chloride, mg/L	129	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1662	1189.8845	Normal	Verified
	TOX, µg/L	299	11.4000	Nonparametric	Verified
MW-16	Spec cond, µmhos/cm	1335	1189.8845	Normal	Verified
MW-8	Chloride, mg/L	12.3	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1290	1189.8845	Normal	Verified
	TOX, µg/L	157	11.4000	Nonparametric	Verified
MW-9	Chloride, mg/L	11.6	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1287	1189.8845	Normal	Verified
	TOX, µg/L	75.6	11.4000	Nonparametric	Verified

The detection frequencies of the parameters in the up and down gradient monitoring wells are summarized in Table 3. Specific conductance and pH were detected at a frequency greater than or equal to 50% in the upgradient well so these parameters were tested for normality. The remainder of the parameters are rarely detected (less than 50%) in the upgradient well so nonparametric prediction limits were be used in those cases. Table 4 summarizes the results of the Shapiro-Wilk test. Table 5 is a summary of the statistics and prediction limits determined. Table 8 is a historical summary of the data at those wells that have indicated an exceedance. Time series graphs of each of the parameters at each well with the corresponding prediction limits are attached.

A statistical power curve indicates the expected false assessments for the site as a whole. The false positive rate for interwell analyses is the percentage of failures when the upgradient versus downgradient true mean difference equals zero. False negative rate indicates the chance of missing contamination at a single well for a single constituent. The statistical power is a function of the number of wells included, the number of constituents compared, the detection frequencies, and the data distributions involved. For interwell analysis, the site-wide false positive rate is 2% and the test becomes sensitive to 3 standard deviation unit increases over background.

Volatile Organic Compounds

Volatile Organic Compounds (VOCs) are generally man-made compounds not present in ambient ground water. If VOCs are detected above their statistical limit (i.e., the laboratory PQL or reporting limit), a verification resample will be conducted at the next scheduled sampling event. A statistical exceedance will be indicated if the VOC detection is confirmed by the subsequent monitoring. The VOCs detected in the ground water during the first semi-annual monitoring event in 2024 are summarized in the table below.

VOCs detected during the First Semi-Annual Monitoring Event in 2024

Well	VOC Detected	Result, µg/L	Reporting Limit, µg/L	Verified/ Awaiting Verification	Ground Water Standard
MW-12	Benzene	1.19	0.5	Verified	5[a]
	cis-1,2-Dichloroethene	32.5	1	Verified	70[a]
	Vinyl chloride	4.3	1	Verified	2[a]
MW-14	Benzene	0.678	0.5	Verified	5[a]
	cis-1,2-Dichloroethene	49.3	1	Verified	70[a]
MW-16	*cis*-1,2-Dichloroethene	8.66	1	Awaiting verification	70[a]
	Tetrachloroethene	1.55	1	Awaiting verification	5[a]

a - USEPA MCL, b – Iowa Statewide Standard

VOCs detected during the First Semi-Annual Monitoring Event in 2024 (cont.)

Well	VOC Detected	Result, µg/L	Reporting Limit, µg/L	Verified/ Awaiting Verification	Ground Water Standard
MW-7	1,2-Dichloroethane	1.85	1	Verified	5[a]
	1,2-Dichloropropane	12.5	1	Verified	5[a]
	Benzene	0.879	0.5	Verified	5[a]
	cis-1,2-Dichloroethene	216	1	Verified	70[a]
	Tetrachloroethene	1.61	1	Verified	5[a]
	Trichloroethene	15.0	1	Verified	5[a]
	Vinyl chloride	5.77	1	Verified	2[a]
MW-8	*cis*-1,2-Dichloroethene	57.1	1	Verified	70[a]
	Vinyl chloride	1..51	1	Verified	2[a]

a - USEPA MCL, b – Iowa Statewide Standard

Historical VOC detections are summarized in Attachment C. The VOC detections were evaluated against the ground water protection standards (GWPS) using confidence limits (Attachment D). The analysis was conducted to evaluate whether verified concentrations are significantly above the water quality standard. The 95% lower confidence limit (LCL) for the mean of the historical data was used to evaluate whether the regulated unit is in compliance with the ground-water protection standards under 40 CFR 264 (e.g. whether the verified constituent is detected at a significant level above the GWPS). An exceedance is verified if the LCL is above the Regulatory GWPS.

The 95% LCL for vinyl chloride at MW-12 (2.918 µg/L) exceeds the USEPA MCL of 2 µg/L.
The 95% LCL for 1,2-dichloropropane at MW-7 (11.887 µg/L) exceeds the USEPA MCL of 5 µg/L.
The 95% LCL for *cis*-1,2-dichloroethene at MW-7 (163.215 µg/L) exceeds the USEPA MCL of 70 µg/L.
The remainder of the calculated LCLs do not exceed GWPS.

Results of the Interwell Statistics: Second Semi-Annual Monitoring event in 2024

The background data used in this statistical analysis includes the ground water data collected from ground water well MW-17 during the period from 1997 through October 2024. A summary of the background data from monitoring well MW-17 is listed in Attachment E, Table 1 "Upgradient Data". This statistical method compares the current downgradient determinations to site prediction limits and checks for exceedances.

Table 2 "Most Current Downgradient Monitoring Data", summarizes the October 2024 data from wells MW-10, MW-11, MW-12, MW-13, MW-14, MW-16, MW-8, and MW-9, compared to the site prediction limits. Prediction limit exceedances are flagged with asterisks. For the October 2024 data, the site prediction limit exceedances detected are summarized in the table below.

Prediction Limit Exceedances during the Second Semi-Annual Monitoring Event in 2024

Well	Parameter	Result	Prediction Limit	Prediction Limit Type	Verified/ Awaiting verification
MW-10	Ammonia, mg/L	0.294	0.2000	Nonparametric	Awaiting verification
	COD, mg/L	29.1	21.2000	Nonparametric	Awaiting verification
	Chloride, mg/L	149	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1602	1189.0566	Normal	Verified
MW-11	COD, mg/L	52.2	21.2000	Nonparametric	Awaiting verification
	Chloride, mg/L	128	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1345	1189.0566	Normal	Verified
MW-12	Ammonia, mg/L	0.564	0.2000	Nonparametric	Awaiting verification
	Chloride, mg/L	68.7	7.3000	Nonparametric	Verified
	Iron, µg/L	13800	100.0000	Nonparametric	Verified
	Spec cond, µmhos/cm	1348	1189.0566	Normal	Verified
MW-13	COD, mg/L	42.6	21.2000	Nonparametric	Verified
	Chloride, mg/L	38.4	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1604	1189.0566	Normal	Verified
MW-14	Ammonia, mg/L	0.260	0.2000	Nonparametric	Awaiting verification
	COD, mg/L	28.4	21.2000	Nonparametric	Verified
	Chloride, mg/L	130	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1606	1189.0566	Normal	Verified
MW-16	COD, mg/L	24.6	21.2000	Nonparametric	Awaiting verification
	Chloride, mg/L	7.4	7.3000	Nonparametric	Awaiting verification
	Spec cond, µmhos/cm	1302	1189.0566	Normal	Verified
MW-8	Chloride, mg/L	16.5	7.3000	Nonparametric	Verified
	Spec cond, µmhos/cm	1248	1189.0566	Normal	Verified
MW-9	Ammonia, mg/L	0.437	0.2000	Nonparametric	Awaiting verification
	COD, mg/L	70.1	21.2000	Nonparametric	Awaiting verification
	Chloride, mg/L	31.7	7.3000	Nonparametric	Verified

The detection frequencies of the parameters in the up and down gradient monitoring wells are summarized in Table 3. Specific conductance and pH were detected at a frequency greater than or equal to 50% in the upgradient well so these parameters were tested for normality. The remainder of the parameters are rarely detected (less than 50%) in the upgradient well so nonparametric prediction limits were be used in those cases. Table 4 summarizes the results of the Shapiro-Wilk test. Table 5 is a summary of the statistics and prediction limits determined. Table 8 is a historical summary of the data at those wells that have indicated an exceedance. Time series graphs of each of the parameters at each well with the corresponding prediction limits are attached.

A statistical power curve indicates the expected false assessments for the site as a whole. The false positive rate for interwell analyses is the percentage of failures when the upgradient versus downgradient true mean difference equals zero. False negative rate indicates the chance of missing contamination at a single well for a single constituent. The statistical power is a function of the number of wells included, the number of constituents compared, the detection frequencies, and the data distributions involved. For interwell analysis, the site-wide false positive rate is 1% and the test becomes sensitive to 3 standard deviation unit increases over background.

Volatile Organic Compounds

The VOCs detected in the ground water during the second semi-annual monitoring event in 2024 are summarized in the table below.

VOCs detected during the Second Semi-Annual Monitoring Event in 2024

Well	VOC Detected	Result, µg/L	Reporting Limit, µg/L	Verified/ Awaiting Verification	Ground Water Standard
MW-12	Benzene	0.804	0.5	Verified	5[a]
	cis-1,2-Dichloroethene	18.3	1	Verified	70[a]
	Vinyl chloride	5.48	1	Verified	2[a]
MW-14	Benzene	0.531	0.5	Verified	5[a]
	cis-1,2-Dichloroethene	39.0	1	Verified	70[a]
MW-7	1,2-Dichloropropane	5.7	1	Verified	5[a]
	Benzene	0.759	0.5	Verified	5[a]
	cis-1,2-Dichloroethene	131	1	Verified	70[a]
	Trichloroethene	7.81	1	Verified	5[a]
	Vinyl chloride	9.39	1	Verified	2[a]
MW-8	*cis*-1,2-Dichloroethene	14.8	1	Verified	70[a]

a - USEPA MCL, b – Iowa Statewide Standard

The VOC detections were evaluated against the ground water protection standards (GWPS) using confidence limits (Attachment F).

The 95% LCL for vinyl chloride at MW-12 (3.440 µg/L) exceeds the USEPA MCL of 2 µg/L.
The 95% LCL for 1,2-dichloropropane at MW-7 (6.816 µg/L) exceeds the USEPA MCL of 5 µg/L.
The 95% LCL for *cis*-1,2-dichloroethene at MW-7 (136.684 µg/L) exceeds the USEPA MCL of 70 µg/L.

The 95% LCL for trichloroethene at MW-7 (5.822 µg/L) exceeds the USEPA MCL of 5 µg/L.
The 95% LCL for vinyl chloride at MW-7 (2.428 µg/L) exceeds the USEPA MCL of 2 µg/L.
The remainder of the calculated LCLs do not exceed GWPS.

Attachment A

Ground Water Data obtained during the First and Second Semi-Annual Monitoring Events in 2024

Table 1

Analytical Data Summary for 5/2/2024

Constituents	Units	MW-10	MW-11	MW-12	MW-14
1,1,1-Trichloroethane	ug/L	<1		<1	<1
1,2-Dichloroethane	ug/L	<1		<1	<1
1,2-Dichloropropane	ug/L	<1		<1	<1
Ammonia as N	mg/L	<.2	<.2	<.2	<.2
Benzene	ug/L	<.500		1.190	.678
Chemical Oxygen Demand	mg/L	14.60	6.24	7.24	22.60
Chloride	mg/L	153.0	101.0	40.7	129.0
Chlorodibromomethane	ug/L	<5		<5	<5
cis-1,2-Dichloroethene	ug/L	<1.0		32.5	49.3
Iron, Dissolved	ug/L	<500	<500	6970	<500
Methylene Chloride	ug/L	<5		<5	<5
pH	S.U.		7.33	6.62	6.62
Phenols	mg/L	<.022	<.020	<.020	<.020
Specific Conductance	umhos/cm		1274	1440	1662
Tetrachloroethene	ug/L	<1		<1	<1
Total Organic Halogens	ug/L	185	172	146	299
Trichloroethene	ug/L	<1		<1	<1
Vinyl Chloride	ug/L	<1.0		4.3	<1.0

* - The displayed value is the arithmetic mean of multiple database matches.

Table 2

Analytical Data Summary for 5/8/2024

Constituents	Units	MW-13	MW-16	MW-17	MW-7	MW-8	MW-9
1,1,1-Trichloroethane	ug/L		<1	<1	<1	<1	
1,2-Dichloroethane	ug/L		<1.00	<1.00	1.85	<1.00	
1,2-Dichloropropane	ug/L		<1.0	<1.0	12.5	<1.0	
Ammonia as N	mg/L	<.2	<.2	<.2		<.2	<.2
Benzene	ug/L		<.500	<.500	.879	<.500	
Chemical Oxygen Demand	mg/L	23.7	12.9	<5.0		<5.0	17.5
Chloride	mg/L	60.50	6.27	<5.00		12.30	11.60
Chlorodibromomethane	ug/L		<5	<5	<5	<5	
cis-1,2-Dichloroethene	ug/L		8.66	<1.00	216.00	57.10	
Iron, Dissolved	ug/L	6370	<500	<500		<500	<500
Methylene Chloride	ug/L		<5	<5	<5	<5	
pH	S.U.	6.63	7.14	7.89	7.07	7.00	7.06
Phenols	mg/L	<.0208	<.0200	<.0200		<.0200	<.0204
Specific Conductance	umhos/cm	1550	1335	864	1686	1290	1287
Tetrachloroethene	ug/L		1.55	<1.00	1.61	<1.00	
Total Organic Halogens	ug/L	<40.0	<40.0	<40.0		157.0	75.6
Trichloroethene	ug/L		<1	<1	15	<1	
Vinyl Chloride	ug/L		<1.00	<1.00	5.77	1.51	

* - The displayed value is the arithmetic mean of multiple database matches.

Table 3

Analytical Data Summary for 10/29/2024

Constituents	Units	MW-10	MW-11	MW-12	MW-13	MW-14	MW-16	MW-17	MW-7	MW-8	MW-9
1,1,1-Trichloroethane	ug/L	<1		<1		<1	<1	<1	<1	<1	
1,2-Dichloroethane	ug/L	<1		<1		<1	<1	<1	<1	<1	
1,2-Dichloropropane	ug/L	<1.0		<1.0		<1.0	<1.0	<1.0	5.7	<1.0	
Ammonia as N	mg/L	.294	<.200	.564	<.200	.260	<.200	<.200		<.200	.437
Benzene	ug/L	<.500		.804		.531	<.500	<.500	.759	<.500	
Chemical Oxygen Demand	mg/L	29.1	52.2	19.1	42.6	28.4	24.6	11.9		13.2	70.1
Chloride	mg/L	149.0	128.0	68.7	38.4	130.0	7.4	<5.0		16.5	31.7
Chlorodibromomethane	ug/L	<5		<5		<5	<5	<5	<5	<5	
cis-1,2-Dichloroethene	ug/L	<1.0		18.3		39.0	<1.0	<1.0	131.0	14.8	
Iron, Dissolved	ug/L	<500	<500	13800	<500	<500	<500	<500		<500	<500
Methylene Chloride	ug/L	<5		<5		<5	<5	<5	<5	<5	
pH	S.U.	6.74	7.03	6.45	6.84	6.50	6.67	7.14	6.68	7.25	7.62
Specific Conductance	umhos/cm	1602	1345	1348	1604	1606	1302	824	1435	1248	1146
Tetrachloroethene	ug/L	<1		<1		<1	<1	<1	<1	<1	
Trichloroethene	ug/L	<1.00		<1.00		<1.00	<1.00	<1.00	7.81	<1.00	
Vinyl Chloride	ug/L	<1.00		5.48		<1.00	<1.00	<1.00	9.39	<1.00	

* - The displayed value is the arithmetic mean of multiple database matches.

Attachment B

Summary Tables and Graphs for the Interwell Comparisons
First Semi-Annual Monitoring Event in 2024

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Ammonia as N	mg/L	MW-17	11/10/1997	ND	0.2000		
Ammonia as N	mg/L	MW-17	01/08/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/22/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	07/01/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/19/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/30/1999	ND	0.2000		
Ammonia as N	mg/L	MW-17	09/01/1999	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/12/2000	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/17/2000	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/25/2001	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/23/2001	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/28/2002	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/06/2002	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/03/2003	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/07/2003	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/30/2004	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/12/2004	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2005	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/11/2005	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2006	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2006	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/23/2007	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/09/2007	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/07/2008	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/14/2008	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/07/2009	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2009	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/01/2010	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/01/2010	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/07/2011	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/27/2011	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/23/2012	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/23/2012	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/16/2013	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/28/2013	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/24/2014	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/06/2014	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/21/2015	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2015	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2016	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2016	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/04/2017	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/10/2017	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/11/2018	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/30/2018	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/01/2019	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/08/2019	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/20/2020	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/20/2020	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2021	ND	0.2000		
Ammonia as N	mg/L	MW-17	08/16/2021	ND	0.2000		
Ammonia as N	mg/L	MW-17	06/01/2022	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/03/2022	ND	0.2000		
Ammonia as N	mg/L	MW-17	05/03/2023	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/11/2023	ND	0.2000		
Ammonia as N	mg/L	MW-17	05/08/2024	ND	0.2000		
Chemical Oxygen Demand	mg/L	MW-17	11/10/1997	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	01/08/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/22/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	07/01/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/19/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/30/1999	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	09/01/1999	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/12/2000	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/17/2000	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/25/2001	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/23/2001	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/28/2002	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/06/2002		11.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/03/2003		7.5000		
Chemical Oxygen Demand	mg/L	MW-17	10/07/2003	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/30/2004	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/12/2004	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/26/2005	ND	5.0000		

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Chemical Oxygen Demand	mg/L	MW-17	10/11/2005	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/26/2006	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2006		8.4000		
Chemical Oxygen Demand	mg/L	MW-17	04/23/2007		10.6000		
Chemical Oxygen Demand	mg/L	MW-17	10/09/2007	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/07/2008	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/14/2008	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/07/2009	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2009	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/01/2010	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/01/2010	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/07/2011	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/27/2011		14.3000		
Chemical Oxygen Demand	mg/L	MW-17	04/23/2012	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/23/2012	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/16/2013	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/28/2013	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/24/2014	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/06/2014	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/21/2015	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2015	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/26/2016	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2016	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/04/2017	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/10/2017	ND	25.0000	5.0000	**
Chemical Oxygen Demand	mg/L	MW-17	04/11/2018	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/30/2018	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/01/2019		5.3600		
Chemical Oxygen Demand	mg/L	MW-17	10/08/2019	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/20/2020	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/20/2020		5.3000		
Chemical Oxygen Demand	mg/L	MW-17	04/26/2021		7.4000		
Chemical Oxygen Demand	mg/L	MW-17	08/16/2021		5.7300		
Chemical Oxygen Demand	mg/L	MW-17	06/01/2022		21.2000		
Chemical Oxygen Demand	mg/L	MW-17	10/03/2022	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	05/03/2023		10.8000		
Chemical Oxygen Demand	mg/L	MW-17	10/11/2023		7.4500		
Chemical Oxygen Demand	mg/L	MW-17	05/08/2024	ND	5.0000		
Chloride	mg/L	MW-17	11/10/1997	ND	5.0000		
Chloride	mg/L	MW-17	01/08/1998	ND	5.0000		
Chloride	mg/L	MW-17	04/22/1998	ND	5.0000		
Chloride	mg/L	MW-17	07/01/1998		7.3000		
Chloride	mg/L	MW-17	10/19/1998	ND	5.0000		
Chloride	mg/L	MW-17	04/30/1999	ND	5.0000		
Chloride	mg/L	MW-17	09/01/1999	ND	5.0000		
Chloride	mg/L	MW-17	04/12/2000	ND	5.0000		
Chloride	mg/L	MW-17	10/17/2000	ND	5.0000		
Chloride	mg/L	MW-17	04/25/2001	ND	5.0000		
Chloride	mg/L	MW-17	10/23/2001	ND	5.0000		
Chloride	mg/L	MW-17	04/28/2002	ND	5.0000		
Chloride	mg/L	MW-17	10/06/2002	ND	5.0000		
Chloride	mg/L	MW-17	04/03/2003	ND	5.0000		
Chloride	mg/L	MW-17	10/07/2003	ND	5.0000		
Chloride	mg/L	MW-17	04/30/2004	ND	5.0000		
Chloride	mg/L	MW-17	10/12/2004	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2005	ND	5.0000		
Chloride	mg/L	MW-17	10/11/2005	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2006	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2006	ND	5.0000		
Chloride	mg/L	MW-17	04/23/2007	ND	5.0000		
Chloride	mg/L	MW-17	10/09/2007	ND	5.0000		
Chloride	mg/L	MW-17	04/07/2008	ND	5.0000		
Chloride	mg/L	MW-17	10/14/2008	ND	5.0000		
Chloride	mg/L	MW-17	04/07/2009	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2009	ND	5.0000		
Chloride	mg/L	MW-17	04/01/2010	ND	5.0000		
Chloride	mg/L	MW-17	10/01/2010	ND	5.0000		
Chloride	mg/L	MW-17	04/07/2011	ND	5.0000		
Chloride	mg/L	MW-17	10/27/2011	ND	5.0000		
Chloride	mg/L	MW-17	04/23/2012	ND	5.0000		
Chloride	mg/L	MW-17	10/23/2012	ND	5.0000		
Chloride	mg/L	MW-17	04/16/2013	ND	2.0000	5.0000	**
Chloride	mg/L	MW-17	10/28/2013	ND	5.0000		
Chloride	mg/L	MW-17	04/24/2014		1.6500		

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Chloride	mg/L	MW-17	10/06/2014		1.6600		
Chloride	mg/L	MW-17	04/21/2015	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2015	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2016	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2016	ND	5.0000		
Chloride	mg/L	MW-17	04/04/2017	ND	5.0000		
Chloride	mg/L	MW-17	10/10/2017	ND	5.0000		
Chloride	mg/L	MW-17	04/11/2018	ND	5.0000		
Chloride	mg/L	MW-17	10/30/2018		6.4700		
Chloride	mg/L	MW-17	04/01/2019	ND	5.0000		
Chloride	mg/L	MW-17	10/08/2019	ND	5.0000		
Chloride	mg/L	MW-17	04/20/2020	ND	5.0000		
Chloride	mg/L	MW-17	10/20/2020	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2021	ND	5.0000		
Chloride	mg/L	MW-17	08/16/2021	ND	5.0000		
Chloride	mg/L	MW-17	06/01/2022	ND	5.0000		
Chloride	mg/L	MW-17	10/03/2022	ND	5.0000		
Chloride	mg/L	MW-17	05/03/2023	ND	5.0000		
Chloride	mg/L	MW-17	10/11/2023	ND	5.0000		
Chloride	mg/L	MW-17	05/08/2024	ND	5.0000		
Iron, Dissolved	ug/L	MW-17	11/10/1997	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	01/08/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/22/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	07/01/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/19/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/30/1999	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	09/01/1999	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/12/2000	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/17/2000	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/25/2001	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/23/2001	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/28/2002	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/06/2002	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/03/2003	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/07/2003	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/30/2004	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/12/2004	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/26/2005	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/11/2005	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/26/2006	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2006	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/23/2007	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/09/2007	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/07/2008	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/14/2008	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/07/2009	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2009	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/01/2010	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/01/2010	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/07/2011	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/27/2011	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/23/2012	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/23/2012	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/16/2013	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/28/2013	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/24/2014	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/06/2014	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/21/2015	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2015	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/26/2016	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2016	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/04/2017	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/10/2017	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/11/2018	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/30/2018	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/01/2019	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/08/2019	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/20/2020	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/20/2020	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/26/2021	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	08/16/2021	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	06/01/2022	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/03/2022	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	05/03/2023	ND	500.0000	100.0000	**

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Iron, Dissolved	ug/L	MW-17	10/11/2023	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	05/08/2024	ND	500.0000	100.0000	**
pH	S.U.	MW-17	04/22/1998		7.0000		
pH	S.U.	MW-17	07/01/1998		7.0000		
pH	S.U.	MW-17	10/19/1998		6.8000		
pH	S.U.	MW-17	04/30/1999		6.8000		
pH	S.U.	MW-17	09/01/1999		6.8000		
pH	S.U.	MW-17	04/12/2000		7.0000		
pH	S.U.	MW-17	10/17/2000		5.1000		
pH	S.U.	MW-17	04/25/2001		7.5000		
pH	S.U.	MW-17	10/23/2001		7.5000		
pH	S.U.	MW-17	04/28/2002		6.9000		
pH	S.U.	MW-17	10/06/2002		7.4000		
pH	S.U.	MW-17	04/03/2003		7.3000		
pH	S.U.	MW-17	10/07/2003		7.6000		
pH	S.U.	MW-17	04/30/2004		6.9000		
pH	S.U.	MW-17	10/12/2004		7.2000		
pH	S.U.	MW-17	04/26/2005		7.2000		
pH	S.U.	MW-17	10/11/2005		7.4000		
pH	S.U.	MW-17	04/26/2006		7.2000		
pH	S.U.	MW-17	10/05/2006		7.4000		
pH	S.U.	MW-17	04/23/2007		7.2000		
pH	S.U.	MW-17	10/09/2007		7.2000		
pH	S.U.	MW-17	04/07/2008		7.1000		
pH	S.U.	MW-17	10/14/2008		7.3000		
pH	S.U.	MW-17	04/07/2009		6.9000		
pH	S.U.	MW-17	10/05/2009		7.2000		
pH	S.U.	MW-17	04/01/2010		7.3000		
pH	S.U.	MW-17	10/01/2010		7.1000		
pH	S.U.	MW-17	04/07/2011		7.2000		
pH	S.U.	MW-17	10/27/2011		7.1000		
pH	S.U.	MW-17	04/23/2012		7.1000		
pH	S.U.	MW-17	10/23/2012		7.1000		
pH	S.U.	MW-17	04/16/2013		7.3000		
pH	S.U.	MW-17	10/28/2013		7.4000		
pH	S.U.	MW-17	04/24/2014		7.2300		
pH	S.U.	MW-17	10/06/2014		7.2800		
pH	S.U.	MW-17	04/21/2015		6.9000		
pH	S.U.	MW-17	10/05/2015		7.2100		
pH	S.U.	MW-17	04/26/2016		7.0800		
pH	S.U.	MW-17	10/05/2016		7.0000		
pH	S.U.	MW-17	04/04/2017		7.2900		
pH	S.U.	MW-17	10/10/2017		7.1400		
pH	S.U.	MW-17	04/11/2018		7.0700		
pH	S.U.	MW-17	10/30/2018		6.7300		
pH	S.U.	MW-17	04/01/2019		7.0500		
pH	S.U.	MW-17	10/08/2019		7.0600		
pH	S.U.	MW-17	04/20/2020		7.3300		
pH	S.U.	MW-17	10/20/2020		7.5900		
pH	S.U.	MW-17	04/26/2021		7.6900		
pH	S.U.	MW-17	08/16/2021		7.3900		
pH	S.U.	MW-17	06/01/2022		7.0500		
pH	S.U.	MW-17	10/03/2022		7.5100		
pH	S.U.	MW-17	05/03/2023		6.4700		
pH	S.U.	MW-17	10/11/2023		7.4500		
pH	S.U.	MW-17	05/08/2024		7.8900		
Phenols	mg/L	MW-17	10/19/1998	ND	0.0200		
Phenols	mg/L	MW-17	09/01/1999	ND	0.0200		
Phenols	mg/L	MW-17	10/17/2000	ND	0.0200		
Phenols	mg/L	MW-17	10/23/2001	ND	0.0200		
Phenols	mg/L	MW-17	04/28/2002	ND	0.0200		
Phenols	mg/L	MW-17	10/06/2002	ND	0.0200		
Phenols	mg/L	MW-17	04/03/2003	ND	0.0200		
Phenols	mg/L	MW-17	04/30/2004	ND	0.0200		
Phenols	mg/L	MW-17	04/26/2005	ND	0.0200		
Phenols	mg/L	MW-17	04/23/2007	ND	0.0200		
Phenols	mg/L	MW-17	04/07/2009	ND	0.0180	0.0200	**
Phenols	mg/L	MW-17	04/01/2010	ND	0.0180	0.0200	**
Phenols	mg/L	MW-17	04/07/2011	ND	0.0180	0.0200	**
Phenols	mg/L	MW-17	04/23/2012	ND	0.0200		
Phenols	mg/L	MW-17	04/16/2013	ND	0.0196	0.0200	**
Phenols	mg/L	MW-17	04/24/2014	ND	0.0188	0.0200	**
Phenols	mg/L	MW-17	04/21/2015	ND	0.0184	0.0200	**
Phenols	mg/L	MW-17	04/26/2016	ND	0.0212	0.0200	**

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Phenols	mg/L	MW-17	04/04/2017	ND	0.0180	0.0200	**
Phenols	mg/L	MW-17	04/11/2018	ND	0.0192	0.0200	**
Phenols	mg/L	MW-17	04/01/2019	ND	0.0200		
Phenols	mg/L	MW-17	04/20/2020	ND	0.0200		
Phenols	mg/L	MW-17	04/26/2021	ND	0.0184	0.0200	**
Phenols	mg/L	MW-17	06/01/2022	ND	0.0200		
Phenols	mg/L	MW-17	05/03/2023	ND	0.0200		
Phenols	mg/L	MW-17	05/08/2024	ND	0.0200		
Specific Conductance	umhos/cm	MW-17	04/22/1998		408.0000		
Specific Conductance	umhos/cm	MW-17	07/01/1998		450.0000		
Specific Conductance	umhos/cm	MW-17	10/19/1998		444.0000		
Specific Conductance	umhos/cm	MW-17	04/30/1999		449.0000		
Specific Conductance	umhos/cm	MW-17	09/01/1999		449.0000		
Specific Conductance	umhos/cm	MW-17	04/12/2000		465.0000		
Specific Conductance	umhos/cm	MW-17	10/17/2000		440.0000		
Specific Conductance	umhos/cm	MW-17	04/25/2001		511.0000		
Specific Conductance	umhos/cm	MW-17	10/23/2001		473.0000		
Specific Conductance	umhos/cm	MW-17	04/28/2002		427.0000		
Specific Conductance	umhos/cm	MW-17	10/06/2002		417.0000		
Specific Conductance	umhos/cm	MW-17	04/03/2003		299.0000		
Specific Conductance	umhos/cm	MW-17	10/07/2003		572.0000		
Specific Conductance	umhos/cm	MW-17	04/30/2004		525.0000		
Specific Conductance	umhos/cm	MW-17	10/12/2004		861.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2005		131.0000		*
Specific Conductance	umhos/cm	MW-17	10/11/2005		699.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2006		632.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2006		620.0000		
Specific Conductance	umhos/cm	MW-17	04/23/2007		638.0000		
Specific Conductance	umhos/cm	MW-17	10/09/2007		663.0000		
Specific Conductance	umhos/cm	MW-17	04/07/2008		729.0000		
Specific Conductance	umhos/cm	MW-17	10/14/2008		646.0000		
Specific Conductance	umhos/cm	MW-17	04/07/2009		613.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2009		625.0000		
Specific Conductance	umhos/cm	MW-17	04/01/2010		649.0000		
Specific Conductance	umhos/cm	MW-17	10/01/2010		636.0000		
Specific Conductance	umhos/cm	MW-17	04/07/2011		591.0000		
Specific Conductance	umhos/cm	MW-17	10/27/2011		611.0000		
Specific Conductance	umhos/cm	MW-17	04/23/2012		599.0000		
Specific Conductance	umhos/cm	MW-17	10/23/2012		774.0000		
Specific Conductance	umhos/cm	MW-17	04/16/2013		725.0000		
Specific Conductance	umhos/cm	MW-17	10/28/2013		745.0000		
Specific Conductance	umhos/cm	MW-17	04/24/2014		780.0000		
Specific Conductance	umhos/cm	MW-17	10/06/2014		769.0000		
Specific Conductance	umhos/cm	MW-17	04/21/2015		777.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2015		800.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2016		777.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2016		845.0000		
Specific Conductance	umhos/cm	MW-17	04/04/2017		752.0000		
Specific Conductance	umhos/cm	MW-17	10/10/2017		644.0000		
Specific Conductance	umhos/cm	MW-17	04/11/2018		733.0000		
Specific Conductance	umhos/cm	MW-17	10/30/2018		1115.0000		
Specific Conductance	umhos/cm	MW-17	04/01/2019		806.0000		
Specific Conductance	umhos/cm	MW-17	10/08/2019		856.0000		
Specific Conductance	umhos/cm	MW-17	04/20/2020		908.0000		
Specific Conductance	umhos/cm	MW-17	10/20/2020		860.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2021		1025.0000		
Specific Conductance	umhos/cm	MW-17	08/16/2021		1058.0000		
Specific Conductance	umhos/cm	MW-17	06/01/2022		1059.0000		
Specific Conductance	umhos/cm	MW-17	10/03/2022		852.0000		
Specific Conductance	umhos/cm	MW-17	05/03/2023		1326.0000		
Specific Conductance	umhos/cm	MW-17	10/11/2023		827.0000		
Specific Conductance	umhos/cm	MW-17	05/08/2024		864.0000		
Total Organic Halogens	ug/L	MW-17	10/19/1998	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	09/01/1999	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	10/17/2000	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	10/23/2001	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/28/2002	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	10/06/2002	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/03/2003	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/30/2004	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/26/2005	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/23/2007	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/07/2009	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/01/2010	ND	10.0000		

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Total Organic Halogens	ug/L	MW-17	04/07/2011	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	04/23/2012		11.4000		
Total Organic Halogens	ug/L	MW-17	04/16/2013	ND	30.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/24/2014	ND	30.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/21/2015	ND	30.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/26/2016	ND	30.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/04/2017	ND	30.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/11/2018	ND	30.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/01/2019	ND	30.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/20/2020	ND	40.0000	10.0000	**
Total Organic Halogens	ug/L	MW-17	04/26/2021	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	06/01/2022	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	05/03/2023	ND	10.0000		
Total Organic Halogens	ug/L	MW-17	05/08/2024	ND	40.0000	10.0000	**

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 2

Most Current Downgradient Monitoring Data

Constituent	Units	Well	Date		Result		Pred. Limit
Ammonia as N	mg/L	MW-10	05/02/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-10	05/02/2024		14.6000	**	21.2000
Chloride	mg/L	MW-10	05/02/2024		153.0000	***	7.3000
Iron, Dissolved	ug/L	MW-10	05/02/2024	ND	500.0000		100.0000
pH	S.U.	MW-10	10/11/2023		7.3000		5.10 - 7.89
Phenols	mg/L	MW-10	05/02/2024	ND	0.0220		0.0200
Specific Conductance	umhos/cm	MW-10	10/11/2023		1394.0000	***	1189.8845
Total Organic Halogens	ug/L	MW-10	05/02/2024		185.0000	***	11.4000
Ammonia as N	mg/L	MW-11	05/02/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-11	05/02/2024		6.2400		21.2000
Chloride	mg/L	MW-11	05/02/2024		101.0000	***	7.3000
Iron, Dissolved	ug/L	MW-11	05/02/2024	ND	500.0000		100.0000
pH	S.U.	MW-11	05/02/2024		7.3300		5.10 - 7.89
Phenols	mg/L	MW-11	05/02/2024	ND	0.0200		0.0200
Specific Conductance	umhos/cm	MW-11	05/02/2024		1274.0000	***	1189.8845
Total Organic Halogens	ug/L	MW-11	05/02/2024		172.0000	*	11.4000
Ammonia as N	mg/L	MW-12	05/02/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-12	05/02/2024		7.2400		21.2000
Chloride	mg/L	MW-12	05/02/2024		40.7000	***	7.3000
Iron, Dissolved	ug/L	MW-12	05/02/2024		6970.0000	***	100.0000
pH	S.U.	MW-12	05/02/2024		6.6200		5.10 - 7.89
Phenols	mg/L	MW-12	05/02/2024	ND	0.0200		0.0200
Specific Conductance	umhos/cm	MW-12	05/02/2024		1440.0000	***	1189.8845
Total Organic Halogens	ug/L	MW-12	05/02/2024		146.0000	***	11.4000
Ammonia as N	mg/L	MW-13	05/08/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-13	05/08/2024		23.7000	*	21.2000
Chloride	mg/L	MW-13	05/08/2024		60.5000	***	7.3000
Iron, Dissolved	ug/L	MW-13	05/08/2024		6370.0000	***	100.0000
pH	S.U.	MW-13	05/08/2024		6.6300		5.10 - 7.89
Phenols	mg/L	MW-13	05/08/2024	ND	0.0208		0.0200
Specific Conductance	umhos/cm	MW-13	05/08/2024		1550.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-13	05/08/2024	ND	40.0000	**	11.4000
Ammonia as N	mg/L	MW-14	05/02/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-14	05/02/2024		22.6000	***	21.2000
Chloride	mg/L	MW-14	05/02/2024		129.0000	***	7.3000
Iron, Dissolved	ug/L	MW-14	05/02/2024	ND	500.0000		100.0000
pH	S.U.	MW-14	05/02/2024		6.6200		5.10 - 7.89
Phenols	mg/L	MW-14	05/02/2024	ND	0.0200		0.0200
Specific Conductance	umhos/cm	MW-14	05/02/2024		1662.0000	***	1189.8845
Total Organic Halogens	ug/L	MW-14	05/02/2024		299.0000	***	11.4000
Ammonia as N	mg/L	MW-16	05/08/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-16	05/08/2024		12.9000	**	21.2000
Chloride	mg/L	MW-16	05/08/2024		6.2700	**	7.3000
Iron, Dissolved	ug/L	MW-16	05/08/2024	ND	500.0000		100.0000
pH	S.U.	MW-16	05/08/2024		7.1400		5.10 - 7.89
Phenols	mg/L	MW-16	05/08/2024	ND	0.0200		0.0200
Specific Conductance	umhos/cm	MW-16	05/08/2024		1335.0000	***	1189.8845
Total Organic Halogens	ug/L	MW-16	05/08/2024	ND	40.0000		11.4000
Ammonia as N	mg/L	MW-8	05/08/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-8	05/08/2024	ND	5.0000		21.2000
Chloride	mg/L	MW-8	05/08/2024		12.3000	***	7.3000
Iron, Dissolved	ug/L	MW-8	05/08/2024	ND	500.0000		100.0000
pH	S.U.	MW-8	05/08/2024		7.0000		5.10 - 7.89
Phenols	mg/L	MW-8	05/08/2024	ND	0.0200		0.0200
Specific Conductance	umhos/cm	MW-8	05/08/2024		1290.0000	***	1189.8845
Total Organic Halogens	ug/L	MW-8	05/08/2024		157.0000	***	11.4000
Ammonia as N	mg/L	MW-9	05/08/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-9	05/08/2024		17.5000	**	21.2000
Chloride	mg/L	MW-9	05/08/2024		11.6000	***	7.3000
Iron, Dissolved	ug/L	MW-9	05/08/2024	ND	500.0000	**	100.0000
pH	S.U.	MW-9	05/08/2024		7.0600		5.10 - 7.89
Phenols	mg/L	MW-9	05/08/2024	ND	0.0204		0.0200
Specific Conductance	umhos/cm	MW-9	05/08/2024		1287.0000	***	1189.8845
Total Organic Halogens	ug/L	MW-9	05/08/2024		75.6000	***	11.4000

* - Current value failed - awaiting verification.
** - Current value passed - previous exceedance not verified.
*** - Current value failed - exceedance verified.
**** - Current value passed - awaiting one more verification.
***** - Insufficient background data to compute prediction limit.
ND = Not Detected, Result = detection limit.

Table 3

Detection Frequencies in Upgradient and Downgradient Wells

Constituent	Detect	Upgradient N	Proportion	Detect	Downgradient N	Proportion
Ammonia as N	0	56	0.000	9	395	0.023
Chemical Oxygen Demand	12	56	0.214	222	395	0.562
Chloride	4	56	0.071	395	395	1.000
Iron, Dissolved	0	56	0.000	117	395	0.296
pH	54	54	1.000	394	394	1.000
Phenols	0	26	0.000	5	196	0.026
Specific Conductance	53	53	1.000	394	394	1.000
Total Organic Halogens	1	26	0.038	133	196	0.679

N = Total number of measurements in all wells.
Detect = Total number of detections in all wells.
Proportion = Detect/N.

Table 4

Shapiro-Wilk Multiple Group Test of Normality

Constituent	Detect	N	Detect Freq	G raw	G log	G cbrt	G sqrt	G sqr	G cub	Crit Value	Dist Form	Model Type
Ammonia as N	0	56	0.000									nonpar
Chemical Oxygen Demand	12	56	0.214	1.995	0.266					2.326	normal	nonpar
Chloride	4	56	0.071	1.334	1.586					2.326	normal	nonpar
Iron, Dissolved	0	56	0.000									nonpar
pH	54	54	1.000	5.439	6.280					2.326	non-norm	nonpar
Phenols	0	26	0.000									nonpar
Specific Conductance	53	53	1.000	0.331	0.482					2.326	normal	normal
Total Organic Halogens	1	26	0.038									nonpar

* - Distribution override for that constituent.
Fit to distribution is confirmed if G <= critical value.
Model type may not match distributional form when detection frequency < 50%.

Table 5

Summary Statistics and Prediction Limits

Constituent	Units	Detect	N	Mean	SD	alpha	Factor	Pred Limit	Type		Conf
Ammonia as N	mg/L	0	56					0.2000	nonpar	***	0.99
Chemical Oxygen Demand	mg/L	12	56					21.2000	nonpar		0.99
Chloride	mg/L	4	56					7.3000	nonpar		0.99
Iron, Dissolved	ug/L	0	56					100.0000	nonpar	***	0.99
pH	S.U.	54	54					5.10- 7.89	nonpar		0.99
Phenols	mg/L	0	26					0.0200	nonpar	***	0.98
Specific Conductance	umhos/cm	53	53	694.6792	204.4011	0.0100	2.4227	1189.8845	normal		
Total Organic Halogens	ug/L	1	26					11.4000	nonpar		0.98

Conf = confidence level for passing initial test or one verification resample at all downgradient wells for a single constituent (nonparametric test only).
* - Insufficient Data.
** - Calculated limit raised to Manual Reporting Limit.
*** - Nonparametric limit based on ND value.
For transformed data, mean and SD in transformed units and prediction limit in original units.
All sample sizes and statistics are based on outlier free data.
For nonparametric limits, median reporting limits are substituted for extreme reporting limit values.

Table 6

Dixon's Test Outliers
1% Significance Level

Constituent	Units	Well	Date	Result	ND Qualifier	Date Range	N	Critical Value
Specific Conductance	umhos/cm	MW-17	04/26/2005	131.0000		04/22/1998-05/08/2024	54	0.3752

N = Total number of independent measurements in background at each well.
Date Range = Dates of the first and last measurements included in background at each well.
Critical Value depends on the significance level and on N-1 when the two most extreme values are tested or N for the most extreme value.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chemical Oxygen Demand	mg/L	MW-10	08/09/1996		140.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	01/21/1997		5.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/30/1999		63.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/12/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/17/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/25/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/23/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/28/2002		5.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/06/2002		6.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/03/2003	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/07/2003	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/30/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/12/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2006	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2006		11.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/23/2007		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/09/2007		8.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/14/2008		11.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/07/2009		10.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/01/2010		9.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/01/2010		21.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/07/2011		9.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/27/2011		26.7000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/23/2012		43.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/16/2013		12.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/28/2013		62.1000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/24/2014		6.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/06/2014		15.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/21/2015		12.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2015		18.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2016		24.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2016		41.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/04/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/10/2017		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/11/2018		21.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/30/2018		55.1000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/01/2019		37.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/08/2019		44.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/20/2020		53.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/20/2020		64.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2021		66.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	08/16/2021		28.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	06/01/2022		36.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	05/03/2023		26.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/11/2023		40.9000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	05/02/2024		14.6000		21.2000
Chloride	mg/L	MW-10	08/09/1996		13.0000	*	7.3000
Chloride	mg/L	MW-10	10/10/1996		14.0000	*	7.3000
Chloride	mg/L	MW-10	01/21/1997		15.0000	*	7.3000
Chloride	mg/L	MW-10	04/17/1997		22.0000	*	7.3000
Chloride	mg/L	MW-10	10/04/1997		19.0000	*	7.3000
Chloride	mg/L	MW-10	04/22/1998		19.6000	*	7.3000
Chloride	mg/L	MW-10	10/19/1998		20.0000	*	7.3000
Chloride	mg/L	MW-10	04/30/1999		21.0000	*	7.3000
Chloride	mg/L	MW-10	09/01/1999		21.0000	*	7.3000
Chloride	mg/L	MW-10	04/12/2000		18.6000	*	7.3000
Chloride	mg/L	MW-10	10/17/2000		19.7000	*	7.3000
Chloride	mg/L	MW-10	04/25/2001		16.7000	*	7.3000
Chloride	mg/L	MW-10	10/23/2001		18.6000	*	7.3000
Chloride	mg/L	MW-10	04/28/2002		17.9000	*	7.3000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-10	10/06/2002		17.8000	*	7.3000
Chloride	mg/L	MW-10	04/03/2003		23.0000	*	7.3000
Chloride	mg/L	MW-10	10/07/2003		23.6000	*	7.3000
Chloride	mg/L	MW-10	04/30/2004		24.0000	*	7.3000
Chloride	mg/L	MW-10	10/12/2004		26.2000	*	7.3000
Chloride	mg/L	MW-10	04/26/2005		28.1000	*	7.3000
Chloride	mg/L	MW-10	10/11/2005		28.7000	*	7.3000
Chloride	mg/L	MW-10	04/26/2006		26.2000	*	7.3000
Chloride	mg/L	MW-10	10/05/2006		25.1000	*	7.3000
Chloride	mg/L	MW-10	04/23/2007		28.8000	*	7.3000
Chloride	mg/L	MW-10	10/09/2007		31.1000	*	7.3000
Chloride	mg/L	MW-10	04/07/2008		33.9000	*	7.3000
Chloride	mg/L	MW-10	10/14/2008		35.4000	*	7.3000
Chloride	mg/L	MW-10	04/07/2009		37.4000	*	7.3000
Chloride	mg/L	MW-10	10/05/2009		39.6000	*	7.3000
Chloride	mg/L	MW-10	04/01/2010		50.8000	*	7.3000
Chloride	mg/L	MW-10	10/01/2010		52.4000	*	7.3000
Chloride	mg/L	MW-10	04/07/2011		51.8000	*	7.3000
Chloride	mg/L	MW-10	10/27/2011		65.7000	*	7.3000
Chloride	mg/L	MW-10	04/23/2012		56.1000	*	7.3000
Chloride	mg/L	MW-10	10/23/2012		46.7000	*	7.3000
Chloride	mg/L	MW-10	04/16/2013		47.0000	*	7.3000
Chloride	mg/L	MW-10	10/28/2013		58.5000	*	7.3000
Chloride	mg/L	MW-10	04/24/2014		55.4000	*	7.3000
Chloride	mg/L	MW-10	10/06/2014		69.7000	*	7.3000
Chloride	mg/L	MW-10	04/21/2015		81.8000	*	7.3000
Chloride	mg/L	MW-10	10/05/2015		80.2000	*	7.3000
Chloride	mg/L	MW-10	04/26/2016		101.0000	*	7.3000
Chloride	mg/L	MW-10	10/05/2016		179.0000	*	7.3000
Chloride	mg/L	MW-10	04/04/2017		112.0000	*	7.3000
Chloride	mg/L	MW-10	10/10/2017		85.4000	*	7.3000
Chloride	mg/L	MW-10	04/11/2018		102.0000	*	7.3000
Chloride	mg/L	MW-10	10/30/2018		140.0000	*	7.3000
Chloride	mg/L	MW-10	04/01/2019		372.0000	*	7.3000
Chloride	mg/L	MW-10	10/08/2019		196.0000	*	7.3000
Chloride	mg/L	MW-10	04/20/2020		295.0000	*	7.3000
Chloride	mg/L	MW-10	10/20/2020		269.0000	*	7.3000
Chloride	mg/L	MW-10	04/26/2021		392.0000	*	7.3000
Chloride	mg/L	MW-10	08/16/2021		115.0000	*	7.3000
Chloride	mg/L	MW-10	06/01/2022		107.0000	*	7.3000
Chloride	mg/L	MW-10	05/03/2023		166.0000	*	7.3000
Chloride	mg/L	MW-10	10/11/2023		101.0000	*	7.3000
Chloride	mg/L	MW-10	05/02/2024		153.0000	*	7.3000
Specific Conductance	umhos/cm	MW-10	08/09/1996		787.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/10/1996		695.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	01/21/1997		625.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/17/1997		724.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/04/1997		644.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/22/1998		684.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/19/1998		742.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/30/1999		713.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	09/01/1999		774.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/12/2000		700.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/17/2000		729.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/25/2001		570.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/23/2001		740.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/28/2002		463.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/06/2002		645.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/03/2003		753.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/07/2003		550.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/30/2004		693.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/12/2004		532.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/26/2005		575.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/11/2005		1051.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/26/2006		879.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/05/2006		972.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/23/2007		943.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/09/2007		1062.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/07/2008		1199.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/14/2008		1069.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/07/2009		982.0000		1189.8845

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-10	10/05/2009		973.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/01/2010		1045.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/01/2010		1100.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/07/2011		1014.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/27/2011		1141.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/23/2012		1075.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/23/2012		1258.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/16/2013		1166.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	10/28/2013		1297.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/24/2014		1248.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/06/2014		1394.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/21/2015		1374.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/05/2015		1394.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/26/2016		1241.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/05/2016		1785.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/04/2017		1325.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/10/2017		1146.0000		1189.8845
Specific Conductance	umhos/cm	MW-10	04/11/2018		1200.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/30/2018		1776.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/01/2019		1890.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/08/2019		1855.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/20/2020		1861.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/20/2020		2520.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	04/26/2021		1999.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	08/16/2021		1673.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	06/01/2022		1472.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	05/03/2023		1538.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-10	10/11/2023		1394.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-10	10/04/1997		12.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	10/19/1998		19.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	09/01/1999		13.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	10/17/2000		11.0000		11.4000
Total Organic Halogens	ug/L	MW-10	10/23/2001	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/28/2002		5.0000		11.4000
Total Organic Halogens	ug/L	MW-10	10/06/2002		12.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/03/2003	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/30/2004	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/26/2005	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/26/2006	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/23/2007	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/07/2008		11.9000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/07/2009	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/01/2010		16.1000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/07/2011		28.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/23/2012		20.3000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/16/2013	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/24/2014	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/21/2015	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/26/2016	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/04/2017		52.4000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/11/2018		50.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/01/2019		64.2000	*	11.4000
Total Organic Halogens	ug/L	MW-10	04/20/2020	ND	40.0000		11.4000
Total Organic Halogens	ug/L	MW-10	04/26/2021		76.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	06/01/2022		41.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	05/03/2023		45.0000	*	11.4000
Total Organic Halogens	ug/L	MW-10	05/02/2024		185.0000	*	11.4000
Chloride	mg/L	MW-11	07/12/1996		19.0000	*	7.3000
Chloride	mg/L	MW-11	10/10/1996		19.0000	*	7.3000
Chloride	mg/L	MW-11	01/21/1997		22.0000	*	7.3000
Chloride	mg/L	MW-11	04/17/1997		20.0000	*	7.3000
Chloride	mg/L	MW-11	10/04/1997		28.0000	*	7.3000
Chloride	mg/L	MW-11	04/22/1998		20.2000	*	7.3000
Chloride	mg/L	MW-11	10/19/1998		32.0000	*	7.3000
Chloride	mg/L	MW-11	04/30/1999		37.0000	*	7.3000
Chloride	mg/L	MW-11	09/01/1999		33.0000	*	7.3000
Chloride	mg/L	MW-11	04/12/2000		6.4000		7.3000
Chloride	mg/L	MW-11	10/17/2000		5.5000		7.3000
Chloride	mg/L	MW-11	04/25/2001		12.9000	*	7.3000
Chloride	mg/L	MW-11	10/23/2001		16.0000	*	7.3000
Chloride	mg/L	MW-11	04/28/2002		18.0000	*	7.3000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-11	10/06/2002		18.8000	*	7.3000
Chloride	mg/L	MW-11	04/03/2003		12.3000	*	7.3000
Chloride	mg/L	MW-11	10/07/2003		15.8000	*	7.3000
Chloride	mg/L	MW-11	04/30/2004		23.4000	*	7.3000
Chloride	mg/L	MW-11	10/12/2004		44.9000	*	7.3000
Chloride	mg/L	MW-11	04/26/2005		56.3000	*	7.3000
Chloride	mg/L	MW-11	10/11/2005		50.5000	*	7.3000
Chloride	mg/L	MW-11	04/26/2006		38.2000	*	7.3000
Chloride	mg/L	MW-11	10/05/2006		14.0000	*	7.3000
Chloride	mg/L	MW-11	04/23/2007		16.0000	*	7.3000
Chloride	mg/L	MW-11	10/09/2007		23.9000	*	7.3000
Chloride	mg/L	MW-11	04/07/2008		67.9000	*	7.3000
Chloride	mg/L	MW-11	10/14/2008		67.1000	*	7.3000
Chloride	mg/L	MW-11	04/07/2009		64.9000	*	7.3000
Chloride	mg/L	MW-11	10/05/2009		61.3000	*	7.3000
Chloride	mg/L	MW-11	04/01/2010		61.6000	*	7.3000
Chloride	mg/L	MW-11	10/01/2010		46.1000	*	7.3000
Chloride	mg/L	MW-11	04/07/2011		59.9000	*	7.3000
Chloride	mg/L	MW-11	10/27/2011		61.9000	*	7.3000
Chloride	mg/L	MW-11	04/23/2012		72.4000	*	7.3000
Chloride	mg/L	MW-11	10/23/2012		29.3000	*	7.3000
Chloride	mg/L	MW-11	04/16/2013		17.6000	*	7.3000
Chloride	mg/L	MW-11	10/28/2013		57.6000	*	7.3000
Chloride	mg/L	MW-11	04/24/2014		64.2000	*	7.3000
Chloride	mg/L	MW-11	10/06/2014		45.1000	*	7.3000
Chloride	mg/L	MW-11	04/21/2015		78.7000	*	7.3000
Chloride	mg/L	MW-11	10/05/2015		84.3000	*	7.3000
Chloride	mg/L	MW-11	04/26/2016		61.1000	*	7.3000
Chloride	mg/L	MW-11	10/05/2016		78.5000	*	7.3000
Chloride	mg/L	MW-11	04/04/2017		102.0000	*	7.3000
Chloride	mg/L	MW-11	10/10/2017		91.8000	*	7.3000
Chloride	mg/L	MW-11	04/11/2018		89.3000	*	7.3000
Chloride	mg/L	MW-11	10/30/2018		75.1000	*	7.3000
Chloride	mg/L	MW-11	04/01/2019		81.0000	*	7.3000
Chloride	mg/L	MW-11	10/08/2019		69.2000	*	7.3000
Chloride	mg/L	MW-11	04/20/2020		72.0000	*	7.3000
Chloride	mg/L	MW-11	10/20/2020		84.1000	*	7.3000
Chloride	mg/L	MW-11	04/26/2021		100.0000	*	7.3000
Chloride	mg/L	MW-11	08/16/2021		38.4000	*	7.3000
Chloride	mg/L	MW-11	06/01/2022		26.9000	*	7.3000
Chloride	mg/L	MW-11	10/03/2022		24.3000	*	7.3000
Chloride	mg/L	MW-11	05/03/2023		25.1000	*	7.3000
Chloride	mg/L	MW-11	10/11/2023		55.4000	*	7.3000
Chloride	mg/L	MW-11	05/02/2024		101.0000	*	7.3000
Specific Conductance	umhos/cm	MW-11	07/12/1996		465.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/10/1996		622.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	01/21/1997		515.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/17/1997		537.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/04/1997		543.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/22/1998		625.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/19/1998		667.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/30/1999		707.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	09/01/1999		736.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/12/2000		737.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/17/2000		740.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/25/2001		428.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/23/2001		733.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/28/2002		784.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/06/2002		684.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/03/2003		735.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/07/2003		832.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/30/2004		615.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/12/2004		1266.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/26/2005		658.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/11/2005		989.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/26/2006		882.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/05/2006		975.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/23/2007		979.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/09/2007		1030.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/07/2008		1170.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/14/2008		992.0000		1189.8845

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Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-11	04/07/2009		1034.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/05/2009		1052.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/01/2010		1121.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/01/2010		1071.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/07/2011		1039.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/27/2011		1003.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/23/2012		1060.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/23/2012		1187.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/16/2013		1121.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/28/2013		1193.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/24/2014		1178.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/06/2014		1082.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	04/21/2015		1215.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	10/05/2015		1221.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/26/2016		1218.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	10/05/2016		1299.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/04/2017		1234.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	10/10/2017		1196.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/11/2018		1175.0000		1189.8845
Specific Conductance	umhos/cm	MW-11	10/30/2018		1204.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/01/2019		1296.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	10/08/2019		1316.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/20/2020		1416.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	10/20/2020		1462.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	04/26/2021		1553.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	08/16/2021		1465.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	06/01/2022		1245.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	10/03/2022		1266.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	05/03/2023		1259.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	10/11/2023		1300.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-11	05/02/2024		1274.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-11	10/04/1997	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	10/19/1998		15.0000	*	11.4000
Total Organic Halogens	ug/L	MW-11	09/01/1999		11.0000		11.4000
Total Organic Halogens	ug/L	MW-11	10/17/2000	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	10/23/2001	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/28/2002	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	10/06/2002	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/03/2003	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/30/2004	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/26/2005	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/26/2006	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/23/2007	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/07/2008		11.1000		11.4000
Total Organic Halogens	ug/L	MW-11	04/07/2009		15.6000	*	11.4000
Total Organic Halogens	ug/L	MW-11	04/01/2010		18.9000	*	11.4000
Total Organic Halogens	ug/L	MW-11	04/07/2011		25.0000	*	11.4000
Total Organic Halogens	ug/L	MW-11	04/23/2012		29.6000	*	11.4000
Total Organic Halogens	ug/L	MW-11	04/16/2013	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/24/2014	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/21/2015	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/26/2016	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/04/2017		41.9000	*	11.4000
Total Organic Halogens	ug/L	MW-11	04/11/2018	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/01/2019	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/20/2020	ND	40.0000		11.4000
Total Organic Halogens	ug/L	MW-11	04/26/2021		22.0000	*	11.4000
Total Organic Halogens	ug/L	MW-11	06/01/2022	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	05/03/2023	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-11	05/02/2024		172.0000	*	11.4000
Chloride	mg/L	MW-12	10/10/1996		5.4000		7.3000
Chloride	mg/L	MW-12	01/21/1997		6.4000		7.3000
Chloride	mg/L	MW-12	04/17/1997		7.5000	*	7.3000
Chloride	mg/L	MW-12	07/15/1997		6.8000		7.3000
Chloride	mg/L	MW-12	10/04/1997		6.6000		7.3000
Chloride	mg/L	MW-12	04/22/1998		8.1000	*	7.3000
Chloride	mg/L	MW-12	10/19/1998		7.4000	*	7.3000
Chloride	mg/L	MW-12	04/30/1999		9.6000	*	7.3000
Chloride	mg/L	MW-12	09/01/1999		8.3000	*	7.3000
Chloride	mg/L	MW-12	04/12/2000		6.4000		7.3000
Chloride	mg/L	MW-12	10/17/2000		7.9000	*	7.3000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-12	04/25/2001		8.0000	*	7.3000
Chloride	mg/L	MW-12	10/23/2001		16.2000	*	7.3000
Chloride	mg/L	MW-12	04/28/2002		17.4000	*	7.3000
Chloride	mg/L	MW-12	10/06/2002		27.0000	*	7.3000
Chloride	mg/L	MW-12	04/03/2003		43.1000	*	7.3000
Chloride	mg/L	MW-12	10/07/2003		81.1000	*	7.3000
Chloride	mg/L	MW-12	04/30/2004		60.4000	*	7.3000
Chloride	mg/L	MW-12	10/12/2004		50.1000	*	7.3000
Chloride	mg/L	MW-12	04/26/2005		21.5000	*	7.3000
Chloride	mg/L	MW-12	10/11/2005		21.4000	*	7.3000
Chloride	mg/L	MW-12	04/26/2006		9.8800	*	7.3000
Chloride	mg/L	MW-12	10/05/2006		14.5000	*	7.3000
Chloride	mg/L	MW-12	04/23/2007		10.7000	*	7.3000
Chloride	mg/L	MW-12	10/09/2007		23.9000	*	7.3000
Chloride	mg/L	MW-12	04/07/2008		13.2000	*	7.3000
Chloride	mg/L	MW-12	10/14/2008		19.8000	*	7.3000
Chloride	mg/L	MW-12	04/07/2009		9.3000	*	7.3000
Chloride	mg/L	MW-12	10/05/2009		9.8000	*	7.3000
Chloride	mg/L	MW-12	04/01/2010		11.0000	*	7.3000
Chloride	mg/L	MW-12	10/01/2010		25.9000	*	7.3000
Chloride	mg/L	MW-12	04/07/2011		16.0000	*	7.3000
Chloride	mg/L	MW-12	10/27/2011		14.2000	*	7.3000
Chloride	mg/L	MW-12	04/23/2012		12.3000	*	7.3000
Chloride	mg/L	MW-12	10/23/2012		9.3700	*	7.3000
Chloride	mg/L	MW-12	04/16/2013		9.3200	*	7.3000
Chloride	mg/L	MW-12	10/28/2013		35.8000	*	7.3000
Chloride	mg/L	MW-12	04/24/2014		23.8000	*	7.3000
Chloride	mg/L	MW-12	10/06/2014		37.9000	*	7.3000
Chloride	mg/L	MW-12	04/21/2015		63.7000	*	7.3000
Chloride	mg/L	MW-12	10/05/2015		61.4000	*	7.3000
Chloride	mg/L	MW-12	04/26/2016		130.0000	*	7.3000
Chloride	mg/L	MW-12	10/05/2016		106.0000	*	7.3000
Chloride	mg/L	MW-12	04/04/2017		42.9000	*	7.3000
Chloride	mg/L	MW-12	10/10/2017		19.2000	*	7.3000
Chloride	mg/L	MW-12	04/11/2018		15.2000	*	7.3000
Chloride	mg/L	MW-12	10/30/2018		42.6000	*	7.3000
Chloride	mg/L	MW-12	04/01/2019		31.5000	*	7.3000
Chloride	mg/L	MW-12	10/08/2019		12.0000	*	7.3000
Chloride	mg/L	MW-12	04/20/2020		11.2000	*	7.3000
Chloride	mg/L	MW-12	10/20/2020		12.3000	*	7.3000
Chloride	mg/L	MW-12	04/26/2021		9.3200	*	7.3000
Chloride	mg/L	MW-12	08/16/2021		12.5000	*	7.3000
Chloride	mg/L	MW-12	06/01/2022		32.0000	*	7.3000
Chloride	mg/L	MW-12	10/03/2022		21.7000	*	7.3000
Chloride	mg/L	MW-12	05/03/2023		29.1000	*	7.3000
Chloride	mg/L	MW-12	10/11/2023		34.0000	*	7.3000
Chloride	mg/L	MW-12	05/02/2024		40.7000	*	7.3000
Iron, Dissolved	ug/L	MW-12	10/10/1996	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	01/21/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/17/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	07/15/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/04/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/22/1998	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/19/1998	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/30/1999	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	09/01/1999	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/12/2000	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/17/2000	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/25/2001	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/23/2001	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/28/2002	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/06/2002	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/03/2003	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/07/2003	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/30/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/12/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2005		300.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/11/2005		1500.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2006		2290.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/05/2006		650.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/23/2007		816.0000	*	100.0000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Iron, Dissolved	ug/L	MW-12	10/09/2007		3090.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/07/2008		465.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/14/2008		1610.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/07/2009		2400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/05/2009		7220.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/01/2010		5400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/01/2010		6230.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/07/2011		5660.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/27/2011		5300.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/23/2012		4510.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/23/2012		7640.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/16/2013		5970.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/28/2013		8850.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/24/2014		10100.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/06/2014		13500.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/21/2015		19800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/05/2015		21700.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2016		15600.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/05/2016		19200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/04/2017		13100.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/10/2017		17100.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/11/2018		22900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/30/2018		27900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/01/2019		20200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/08/2019		27400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/20/2020		24800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/20/2020		19400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2021		27800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	08/16/2021		29900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	06/01/2022		25300.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/03/2022		9460.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	05/03/2023		10800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/11/2023		7290.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	05/02/2024		6970.0000	*	100.0000
Specific Conductance	umhos/cm	MW-12	10/10/1996		1026.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	01/21/1997		922.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/17/1997		1010.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	07/15/1997		1017.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	10/04/1997		906.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/22/1998		1044.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	10/19/1998		1046.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/30/1999		1102.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	09/01/1999		1171.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/12/2000		1087.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	10/17/2000		1129.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/25/2001		1223.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/23/2001		1165.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/28/2002		1040.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	10/06/2002		1051.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/03/2003		1319.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/07/2003		671.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/30/2004		1106.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	10/12/2004		496.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	04/26/2005		182.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	10/11/2005		1571.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/26/2006		1374.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/05/2006		1369.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/23/2007		1270.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/09/2007		1451.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/07/2008		1571.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/14/2008		1377.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/07/2009		1326.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/05/2009		1371.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/01/2010		1357.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/01/2010		1399.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/07/2011		1184.0000		1189.8845
Specific Conductance	umhos/cm	MW-12	10/27/2011		1205.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/23/2012		1199.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/23/2012		1518.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/16/2013		1476.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/28/2013		1523.0000	*	1189.8845

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-12	04/24/2014		1512.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/06/2014		1547.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/21/2015		1601.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/05/2015		1637.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/26/2016		1786.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/05/2016		1706.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/04/2017		1375.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/10/2017		1287.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/11/2018		1304.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/30/2018		1556.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/01/2019		1399.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/08/2019		1499.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/20/2020		1386.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/20/2020		1684.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	04/26/2021		1637.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	08/16/2021		1754.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	06/01/2022		1371.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/03/2022		1494.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	05/03/2023		1481.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	10/11/2023		1422.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-12	05/02/2024		1440.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-12	10/04/1997		83.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	10/19/1998		23.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	09/01/1999		64.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	10/17/2000		55.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	10/23/2001		58.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/28/2002		59.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	10/06/2002		44.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/03/2003		57.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/30/2004		54.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/26/2005		38.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/26/2006		41.4000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/23/2007		33.8000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/07/2008		37.3000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/07/2009		35.2000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/01/2010		44.6000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/07/2011		43.2000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/23/2012		40.2000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/16/2013		40.8000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/24/2014		44.4000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/21/2015		64.8000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/26/2016		50.5000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/04/2017		46.2000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/11/2018		41.9000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/01/2019		37.4000	*	11.4000
Total Organic Halogens	ug/L	MW-12	04/20/2020	ND	40.0000		11.4000
Total Organic Halogens	ug/L	MW-12	04/26/2021		42.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	06/01/2022		48.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	05/03/2023		47.0000	*	11.4000
Total Organic Halogens	ug/L	MW-12	05/02/2024		146.0000	*	11.4000
Chemical Oxygen Demand	mg/L	MW-13	07/12/1996		63.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	01/21/1997		7.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/30/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/12/2000		22.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/17/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/25/2001		6.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/23/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/28/2002		8.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/06/2002		8.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/03/2003		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/07/2003	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/30/2004		12.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/12/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/26/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/11/2005	ND	5.0000		21.2000

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ND = Not Detected, Result = detection limit.

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Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chemical Oxygen Demand	mg/L	MW-13	04/26/2006		6.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2006		13.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/23/2007		9.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/09/2007	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/14/2008		5.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/07/2009		8.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/01/2010		9.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/01/2010		17.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/07/2011		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/27/2011		14.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/16/2013	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/28/2013		15.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/24/2014	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/06/2014		8.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/21/2015		10.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2015		7.9400		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/26/2016		15.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2016		10.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/04/2017		5.2300		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/10/2017		6.5100		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/11/2018		17.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/30/2018		18.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/01/2019		32.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/08/2019		60.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/20/2020		26.7000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/20/2020		8.5600		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/26/2021		22.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	08/16/2021		12.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	06/01/2022		20.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/03/2022		13.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	05/03/2023		23.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/11/2023		20.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	05/08/2024		23.7000	*	21.2000
Chloride	mg/L	MW-13	07/12/1996		12.0000	*	7.3000
Chloride	mg/L	MW-13	10/10/1996		13.0000	*	7.3000
Chloride	mg/L	MW-13	01/21/1997		14.0000	*	7.3000
Chloride	mg/L	MW-13	04/17/1997		18.0000	*	7.3000
Chloride	mg/L	MW-13	10/04/1997		18.0000	*	7.3000
Chloride	mg/L	MW-13	04/22/1998		15.6000	*	7.3000
Chloride	mg/L	MW-13	10/19/1998		18.0000	*	7.3000
Chloride	mg/L	MW-13	04/30/1999		17.0000	*	7.3000
Chloride	mg/L	MW-13	09/01/1999		18.0000	*	7.3000
Chloride	mg/L	MW-13	04/12/2000		17.5000	*	7.3000
Chloride	mg/L	MW-13	10/17/2000		19.9000	*	7.3000
Chloride	mg/L	MW-13	04/25/2001		15.1000	*	7.3000
Chloride	mg/L	MW-13	10/23/2001		16.7000	*	7.3000
Chloride	mg/L	MW-13	04/28/2002		16.6000	*	7.3000
Chloride	mg/L	MW-13	10/06/2002		16.5000	*	7.3000
Chloride	mg/L	MW-13	04/03/2003		24.8000	*	7.3000
Chloride	mg/L	MW-13	10/07/2003		19.7000	*	7.3000
Chloride	mg/L	MW-13	04/30/2004		19.3000	*	7.3000
Chloride	mg/L	MW-13	10/12/2004		18.4000	*	7.3000
Chloride	mg/L	MW-13	04/26/2005		11.6000	*	7.3000
Chloride	mg/L	MW-13	10/11/2005		19.0000	*	7.3000
Chloride	mg/L	MW-13	04/26/2006		18.8000	*	7.3000
Chloride	mg/L	MW-13	10/05/2006		18.2000	*	7.3000
Chloride	mg/L	MW-13	04/23/2007		17.5000	*	7.3000
Chloride	mg/L	MW-13	10/09/2007		20.1000	*	7.3000
Chloride	mg/L	MW-13	04/07/2008		20.0000	*	7.3000
Chloride	mg/L	MW-13	10/14/2008		19.3000	*	7.3000
Chloride	mg/L	MW-13	04/07/2009		18.1000	*	7.3000
Chloride	mg/L	MW-13	10/05/2009		19.9000	*	7.3000
Chloride	mg/L	MW-13	04/01/2010		73.3000	*	7.3000
Chloride	mg/L	MW-13	10/01/2010		51.8000	*	7.3000
Chloride	mg/L	MW-13	04/07/2011		43.1000	*	7.3000
Chloride	mg/L	MW-13	10/27/2011		27.5000	*	7.3000
Chloride	mg/L	MW-13	04/23/2012		15.4000	*	7.3000

* - Significantly increased over background.
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*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-13	10/23/2012		18.3000	*	7.3000
Chloride	mg/L	MW-13	04/16/2013		28.5000	*	7.3000
Chloride	mg/L	MW-13	10/28/2013		60.7000	*	7.3000
Chloride	mg/L	MW-13	04/24/2014		21.6000	*	7.3000
Chloride	mg/L	MW-13	10/06/2014		77.7000	*	7.3000
Chloride	mg/L	MW-13	04/21/2015		143.0000	*	7.3000
Chloride	mg/L	MW-13	10/05/2015		75.7000	*	7.3000
Chloride	mg/L	MW-13	04/26/2016		93.2000	*	7.3000
Chloride	mg/L	MW-13	10/05/2016		73.8000	*	7.3000
Chloride	mg/L	MW-13	04/04/2017		130.0000	*	7.3000
Chloride	mg/L	MW-13	10/10/2017		62.8000	*	7.3000
Chloride	mg/L	MW-13	04/11/2018		124.0000	*	7.3000
Chloride	mg/L	MW-13	10/30/2018		132.0000	*	7.3000
Chloride	mg/L	MW-13	04/01/2019		147.0000	*	7.3000
Chloride	mg/L	MW-13	10/08/2019		179.0000	*	7.3000
Chloride	mg/L	MW-13	04/20/2020		116.0000	*	7.3000
Chloride	mg/L	MW-13	10/20/2020		32.5000	*	7.3000
Chloride	mg/L	MW-13	04/26/2021		85.2000	*	7.3000
Chloride	mg/L	MW-13	08/16/2021		33.1000	*	7.3000
Chloride	mg/L	MW-13	06/01/2022		24.7000	*	7.3000
Chloride	mg/L	MW-13	10/03/2022		21.7000	*	7.3000
Chloride	mg/L	MW-13	05/03/2023		73.0000	*	7.3000
Chloride	mg/L	MW-13	10/11/2023		33.1000	*	7.3000
Chloride	mg/L	MW-13	05/08/2024		60.5000	*	7.3000
Iron, Dissolved	ug/L	MW-13	07/12/1996		900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/10/1996		3400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	01/21/1997		3600.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/17/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/04/1997		490.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/22/1998		200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/19/1998		50.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/30/1999		50.0000		100.0000
Iron, Dissolved	ug/L	MW-13	09/01/1999		720.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/12/2000		1050.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/17/2000	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/25/2001		160.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/23/2001	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/28/2002		710.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/06/2002		850.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/03/2003	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/07/2003		880.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/30/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/12/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/26/2005		150.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/11/2005		340.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/26/2006		560.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2006		934.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/23/2007		178.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/09/2007		177.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/07/2008	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/14/2008		278.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/07/2009		106.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2009		717.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/01/2010	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/01/2010		1840.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/07/2011		1660.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/27/2011		211.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/23/2012		121.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/23/2012		241.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/16/2013	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/28/2013		172.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/24/2014		153.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/06/2014	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/21/2015	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2015	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/26/2016	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2016	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/04/2017	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/10/2017		663.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/11/2018	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/30/2018	ND	500.0000		100.0000

* - Significantly increased over background.
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ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Iron, Dissolved	ug/L	MW-13	04/01/2019	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/08/2019		1780.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/20/2020		1370.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/20/2020	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/26/2021	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	08/16/2021		3430.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	06/01/2022		1710.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/03/2022		1740.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	05/03/2023		1200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/11/2023		747.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	05/08/2024		6370.0000	*	100.0000
Specific Conductance	umhos/cm	MW-13	07/12/1996		390.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/10/1996		475.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	01/21/1997		479.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/17/1997		645.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/04/1997		548.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/22/1998		584.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/19/1998		525.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/30/1999		605.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	09/01/1999		558.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/12/2000		517.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/17/2000		536.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/25/2001		648.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/23/2001		530.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/28/2002		423.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/06/2002		499.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/03/2003		930.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/07/2003		646.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/30/2004		792.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/12/2004		346.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/26/2005		608.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/11/2005		764.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/26/2006		641.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/05/2006		687.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/23/2007		668.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/09/2007		868.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/07/2008		804.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/14/2008		1057.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/07/2009		747.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/05/2009		759.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/01/2010		1205.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/01/2010		1329.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	04/07/2011		1115.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/27/2011		1018.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/23/2012		1084.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/23/2012		806.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/16/2013		1336.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/28/2013		1421.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	04/24/2014		847.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/06/2014		1590.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	04/21/2015		1583.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/05/2015		1204.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	04/26/2016		1195.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/05/2016		1159.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/04/2017		1341.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/10/2017		1193.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	04/11/2018		1332.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/30/2018		1578.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	04/01/2019		1590.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/08/2019		1854.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	04/20/2020		1680.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/20/2020		990.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	04/26/2021		1595.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	08/16/2021		1209.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	06/01/2022		938.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	10/03/2022		917.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	05/03/2023		1446.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-13	10/11/2023		990.0000		1189.8845
Specific Conductance	umhos/cm	MW-13	05/08/2024		1550.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-13	10/04/1997	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	10/19/1998	ND	10.0000		11.4000

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Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Total Organic Halogens	ug/L	MW-13	09/01/1999		138.0000	*	11.4000
Total Organic Halogens	ug/L	MW-13	10/17/2000	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	10/23/2001	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/28/2002	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	10/06/2002	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/03/2003		23.0000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/30/2004	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/26/2005		13.0000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/26/2006	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/23/2007	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/07/2008	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/07/2009		5.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/01/2010		17.1000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/07/2011		19.5000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/23/2012		16.0000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/16/2013	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/24/2014	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/21/2015		48.2000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/26/2016	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-13	04/04/2017		55.9000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/11/2018		69.2000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/01/2019		72.7000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/20/2020		54.1000	*	11.4000
Total Organic Halogens	ug/L	MW-13	04/26/2021		31.0000	*	11.4000
Total Organic Halogens	ug/L	MW-13	06/01/2022		11.0000		11.4000
Total Organic Halogens	ug/L	MW-13	05/03/2023		77.0000	*	11.4000
Total Organic Halogens	ug/L	MW-13	05/08/2024	ND	40.0000		11.4000
Chemical Oxygen Demand	mg/L	MW-14	07/12/1996		24.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	01/21/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/30/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/12/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/17/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/25/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/23/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/28/2002	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/06/2002		15.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/03/2003		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/07/2003		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/30/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/12/2004		6.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2005		5.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2006	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2006		12.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/23/2007	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/09/2007		5.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/14/2008		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/07/2009		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/07/2011		10.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/27/2011		13.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/23/2012		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/16/2013	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/28/2013		22.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/24/2014		5.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/06/2014		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/21/2015	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2015		11.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2016		6.4700		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2016		5.6900		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/04/2017	ND	5.0000		21.2000

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Constituent	Units	Well	Date		Result		Pred. Limit
Chemical Oxygen Demand	mg/L	MW-14	10/10/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/11/2018		6.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/30/2018	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/01/2019		12.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/08/2019	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/20/2020		6.2400		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/20/2020	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2021		15.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	08/16/2021		12.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	06/01/2022		13.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	05/03/2023		29.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/11/2023		42.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	05/02/2024		22.6000	*	21.2000
Chloride	mg/L	MW-14	07/12/1996		12.0000	*	7.3000
Chloride	mg/L	MW-14	10/10/1996		14.0000	*	7.3000
Chloride	mg/L	MW-14	01/21/1997		13.0000	*	7.3000
Chloride	mg/L	MW-14	04/17/1997		17.0000	*	7.3000
Chloride	mg/L	MW-14	10/04/1997		15.0000	*	7.3000
Chloride	mg/L	MW-14	04/22/1998		18.5000	*	7.3000
Chloride	mg/L	MW-14	10/19/1998		19.0000	*	7.3000
Chloride	mg/L	MW-14	04/30/1999		20.0000	*	7.3000
Chloride	mg/L	MW-14	09/01/1999		18.0000	*	7.3000
Chloride	mg/L	MW-14	04/12/2000		17.7000	*	7.3000
Chloride	mg/L	MW-14	10/17/2000		17.0000	*	7.3000
Chloride	mg/L	MW-14	04/25/2001		16.8000	*	7.3000
Chloride	mg/L	MW-14	10/23/2001		22.6000	*	7.3000
Chloride	mg/L	MW-14	04/28/2002		27.9000	*	7.3000
Chloride	mg/L	MW-14	10/06/2002		23.1000	*	7.3000
Chloride	mg/L	MW-14	04/03/2003		30.9000	*	7.3000
Chloride	mg/L	MW-14	10/07/2003		24.8000	*	7.3000
Chloride	mg/L	MW-14	04/30/2004		43.4000	*	7.3000
Chloride	mg/L	MW-14	10/12/2004		80.6000	*	7.3000
Chloride	mg/L	MW-14	04/26/2005		53.3000	*	7.3000
Chloride	mg/L	MW-14	10/11/2005		43.6000	*	7.3000
Chloride	mg/L	MW-14	04/26/2006		38.1000	*	7.3000
Chloride	mg/L	MW-14	10/05/2006		38.4000	*	7.3000
Chloride	mg/L	MW-14	04/23/2007		39.9000	*	7.3000
Chloride	mg/L	MW-14	10/09/2007		43.9000	*	7.3000
Chloride	mg/L	MW-14	04/07/2008		45.1000	*	7.3000
Chloride	mg/L	MW-14	10/14/2008		40.5000	*	7.3000
Chloride	mg/L	MW-14	04/07/2009		37.3000	*	7.3000
Chloride	mg/L	MW-14	10/05/2009		44.7000	*	7.3000
Chloride	mg/L	MW-14	04/01/2010		43.6000	*	7.3000
Chloride	mg/L	MW-14	10/01/2010		53.6000	*	7.3000
Chloride	mg/L	MW-14	04/07/2011		49.7000	*	7.3000
Chloride	mg/L	MW-14	10/27/2011		35.0000	*	7.3000
Chloride	mg/L	MW-14	04/23/2012		33.5000	*	7.3000
Chloride	mg/L	MW-14	10/23/2012		29.4000	*	7.3000
Chloride	mg/L	MW-14	04/16/2013		16.4000	*	7.3000
Chloride	mg/L	MW-14	10/28/2013		66.1000	*	7.3000
Chloride	mg/L	MW-14	04/24/2014		62.3000	*	7.3000
Chloride	mg/L	MW-14	10/06/2014		61.6000	*	7.3000
Chloride	mg/L	MW-14	04/21/2015		78.8000	*	7.3000
Chloride	mg/L	MW-14	10/05/2015		62.0000	*	7.3000
Chloride	mg/L	MW-14	04/26/2016		26.4000	*	7.3000
Chloride	mg/L	MW-14	10/05/2016		38.1000	*	7.3000
Chloride	mg/L	MW-14	04/04/2017		59.0000	*	7.3000
Chloride	mg/L	MW-14	10/10/2017		53.2000	*	7.3000
Chloride	mg/L	MW-14	04/11/2018		48.2000	*	7.3000
Chloride	mg/L	MW-14	10/30/2018		20.5000	*	7.3000
Chloride	mg/L	MW-14	04/01/2019		36.5000	*	7.3000
Chloride	mg/L	MW-14	10/08/2019		30.5000	*	7.3000
Chloride	mg/L	MW-14	04/20/2020		41.6000	*	7.3000
Chloride	mg/L	MW-14	10/20/2020		50.2000	*	7.3000
Chloride	mg/L	MW-14	04/26/2021		51.0000	*	7.3000
Chloride	mg/L	MW-14	08/16/2021		50.3000	*	7.3000
Chloride	mg/L	MW-14	06/01/2022		50.0000	*	7.3000
Chloride	mg/L	MW-14	05/03/2023		58.8000	*	7.3000
Chloride	mg/L	MW-14	10/11/2023		109.0000	*	7.3000
Chloride	mg/L	MW-14	05/02/2024		129.0000	*	7.3000
Specific Conductance	umhos/cm	MW-14	07/12/1996		528.0000		1189.8845

* - Significantly increased over background.
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ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-14	10/10/1996		690.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	01/21/1997		582.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/17/1997		698.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/04/1997		682.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/22/1998		764.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/19/1998		831.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/30/1999		913.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	09/01/1999		900.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/12/2000		914.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/17/2000		808.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/25/2001		941.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/23/2001		889.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/28/2002		742.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/06/2002		757.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/03/2003		930.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/07/2003		1050.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/30/2004		930.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/12/2004		419.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/26/2005		286.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/11/2005		1237.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/26/2006		1055.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/05/2006		1145.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/23/2007		1146.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/09/2007		1211.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/07/2008		1397.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/14/2008		1254.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/07/2009		1282.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/05/2009		1266.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/01/2010		1246.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/01/2010		1279.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/07/2011		1179.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/27/2011		1158.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	04/23/2012		1177.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/23/2012		1383.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/16/2013		1184.0000		1189.8845
Specific Conductance	umhos/cm	MW-14	10/28/2013		1487.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/24/2014		1403.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/06/2014		1443.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/21/2015		1431.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/05/2015		1423.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/26/2016		1314.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/05/2016		1377.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/04/2017		1272.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/10/2017		1238.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/11/2018		1227.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/30/2018		1317.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/01/2019		1328.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/08/2019		1338.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/20/2020		1541.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/20/2020		1542.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	04/26/2021		1570.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	08/16/2021		1608.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	06/01/2022		1382.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	05/03/2023		1501.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	10/11/2023		1600.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-14	05/02/2024		1662.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-14	10/04/1997		28.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	10/19/1998	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-14	09/01/1999		52.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	10/17/2000		22.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	10/23/2001		41.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/28/2002		38.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	10/06/2002		25.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	10/07/2003		23.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/30/2004		30.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/26/2005		48.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/26/2006		39.1000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/23/2007		44.4000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/07/2008		53.2000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/07/2009		69.8000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/01/2010		67.2000	*	11.4000

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Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Total Organic Halogens	ug/L	MW-14	04/07/2011		88.1000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/23/2012		87.8000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/16/2013	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-14	04/24/2014		83.1000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/21/2015		77.7000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/26/2016	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-14	04/04/2017		84.1000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/11/2018		90.6000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/01/2019		117.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/20/2020		85.6000	*	11.4000
Total Organic Halogens	ug/L	MW-14	04/26/2021		76.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	06/01/2022		76.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	05/03/2023		93.0000	*	11.4000
Total Organic Halogens	ug/L	MW-14	05/02/2024		299.0000	*	11.4000
Chemical Oxygen Demand	mg/L	MW-16	04/20/2020	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-16	10/20/2020		8.2300		21.2000
Chemical Oxygen Demand	mg/L	MW-16	04/26/2021		7.0500		21.2000
Chemical Oxygen Demand	mg/L	MW-16	08/16/2021		9.8900		21.2000
Chemical Oxygen Demand	mg/L	MW-16	06/01/2022		38.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-16	10/03/2022		50.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-16	05/03/2023		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-16	10/11/2023		28.7000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-16	05/08/2024		12.9000		21.2000
Chloride	mg/L	MW-16	04/20/2020		12.0000	*	7.3000
Chloride	mg/L	MW-16	10/20/2020		27.8000	*	7.3000
Chloride	mg/L	MW-16	04/26/2021		5.5000		7.3000
Chloride	mg/L	MW-16	08/16/2021		8.8000	*	7.3000
Chloride	mg/L	MW-16	06/01/2022		9.7300	*	7.3000
Chloride	mg/L	MW-16	10/03/2022		9.5800	*	7.3000
Chloride	mg/L	MW-16	05/03/2023		6.9500		7.3000
Chloride	mg/L	MW-16	10/11/2023		7.8900	*	7.3000
Chloride	mg/L	MW-16	05/08/2024		6.2700		7.3000
Specific Conductance	umhos/cm	MW-16	04/20/2020		1524.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-16	10/20/2020		1680.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-16	04/26/2021		1436.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-16	08/16/2021		1382.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-16	06/01/2022		1103.0000		1189.8845
Specific Conductance	umhos/cm	MW-16	10/03/2022		1134.0000		1189.8845
Specific Conductance	umhos/cm	MW-16	05/03/2023		1319.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-16	10/11/2023		1432.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-16	05/08/2024		1335.0000	*	1189.8845
Chloride	mg/L	MW-8	10/10/1996		12.0000	*	7.3000
Chloride	mg/L	MW-8	01/21/1997		12.0000	*	7.3000
Chloride	mg/L	MW-8	04/17/1997		13.0000	*	7.3000
Chloride	mg/L	MW-8	07/15/1997		15.0000	*	7.3000
Chloride	mg/L	MW-8	10/04/1997		11.0000	*	7.3000
Chloride	mg/L	MW-8	04/22/1998		11.0000	*	7.3000
Chloride	mg/L	MW-8	10/19/1998		12.0000	*	7.3000
Chloride	mg/L	MW-8	04/30/1999		12.0000	*	7.3000
Chloride	mg/L	MW-8	09/01/1999		10.0000	*	7.3000
Chloride	mg/L	MW-8	04/12/2000		8.4000	*	7.3000
Chloride	mg/L	MW-8	10/17/2000		6.2000		7.3000
Chloride	mg/L	MW-8	04/25/2001		9.4000	*	7.3000
Chloride	mg/L	MW-8	10/23/2001		21.6000	*	7.3000
Chloride	mg/L	MW-8	04/28/2002		55.4000	*	7.3000
Chloride	mg/L	MW-8	10/06/2002		26.7000	*	7.3000
Chloride	mg/L	MW-8	04/03/2003		14.2000	*	7.3000
Chloride	mg/L	MW-8	10/07/2003		21.6000	*	7.3000
Chloride	mg/L	MW-8	04/30/2004		14.3000	*	7.3000
Chloride	mg/L	MW-8	10/12/2004		22.8000	*	7.3000
Chloride	mg/L	MW-8	04/26/2005		36.0000	*	7.3000
Chloride	mg/L	MW-8	10/11/2005		37.2000	*	7.3000
Chloride	mg/L	MW-8	04/26/2006		23.9000	*	7.3000
Chloride	mg/L	MW-8	10/05/2006		23.0000	*	7.3000
Chloride	mg/L	MW-8	04/23/2007		24.1000	*	7.3000
Chloride	mg/L	MW-8	10/09/2007		30.2000	*	7.3000
Chloride	mg/L	MW-8	04/07/2008		34.0000	*	7.3000
Chloride	mg/L	MW-8	10/14/2008		32.5000	*	7.3000
Chloride	mg/L	MW-8	04/07/2009		23.3000	*	7.3000
Chloride	mg/L	MW-8	10/05/2009		20.5000	*	7.3000
Chloride	mg/L	MW-8	04/01/2010		14.5000	*	7.3000

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Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-8	10/01/2010		16.9000	*	7.3000
Chloride	mg/L	MW-8	04/07/2011		19.6000	*	7.3000
Chloride	mg/L	MW-8	10/27/2011		16.0000	*	7.3000
Chloride	mg/L	MW-8	04/23/2012		13.5000	*	7.3000
Chloride	mg/L	MW-8	10/23/2012		12.3000	*	7.3000
Chloride	mg/L	MW-8	04/16/2013		11.9000	*	7.3000
Chloride	mg/L	MW-8	10/28/2013		9.8600	*	7.3000
Chloride	mg/L	MW-8	04/24/2014		12.5000	*	7.3000
Chloride	mg/L	MW-8	10/06/2014		11.5000	*	7.3000
Chloride	mg/L	MW-8	04/21/2015		13.9000	*	7.3000
Chloride	mg/L	MW-8	10/05/2015		10.5000	*	7.3000
Chloride	mg/L	MW-8	04/26/2016		18.7000	*	7.3000
Chloride	mg/L	MW-8	10/05/2016		35.8000	*	7.3000
Chloride	mg/L	MW-8	04/04/2017		29.6000	*	7.3000
Chloride	mg/L	MW-8	10/10/2017		20.8000	*	7.3000
Chloride	mg/L	MW-8	04/11/2018		16.4000	*	7.3000
Chloride	mg/L	MW-8	10/30/2018		35.6000	*	7.3000
Chloride	mg/L	MW-8	04/01/2019		30.3000	*	7.3000
Chloride	mg/L	MW-8	10/08/2019		26.3000	*	7.3000
Chloride	mg/L	MW-8	04/20/2020		21.7000	*	7.3000
Chloride	mg/L	MW-8	10/20/2020		21.7000	*	7.3000
Chloride	mg/L	MW-8	04/26/2021		16.3000	*	7.3000
Chloride	mg/L	MW-8	08/16/2021		15.6000	*	7.3000
Chloride	mg/L	MW-8	06/01/2022		13.1000	*	7.3000
Chloride	mg/L	MW-8	10/03/2022		12.8000	*	7.3000
Chloride	mg/L	MW-8	05/03/2023		12.9000	*	7.3000
Chloride	mg/L	MW-8	10/11/2023		12.7000	*	7.3000
Chloride	mg/L	MW-8	05/08/2024		12.3000	*	7.3000
Specific Conductance	umhos/cm	MW-8	10/10/1996		923.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	01/21/1997		823.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/17/1997		896.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	07/15/1997		929.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/04/1997		888.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/22/1998		945.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/19/1998		1003.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/30/1999		1050.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	09/01/1999		1092.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/12/2000		970.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/17/2000		942.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/25/2001		1034.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/23/2001		538.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/28/2002		984.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/06/2002		895.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/03/2003		1060.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/07/2003		1115.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/30/2004		832.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/12/2004		563.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	04/26/2005		90.0000		1189.8845
Specific Conductance	umhos/cm	MW-8	10/11/2005		1529.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/26/2006		1337.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/05/2006		1351.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/23/2007		1258.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/09/2007		1402.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/07/2008		1574.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/14/2008		1366.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/07/2009		1331.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/05/2009		1271.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/01/2010		1312.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/01/2010		1321.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/07/2011		1215.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/27/2011		1269.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/23/2012		1223.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/23/2012		1427.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/16/2013		1419.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/28/2013		1362.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/24/2014		1345.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/06/2014		1339.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/21/2015		1389.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/05/2015		1380.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/26/2016		1442.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/05/2016		1585.0000	*	1189.8845

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-8	04/04/2017		1326.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/10/2017		1245.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/11/2018		1232.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/30/2018		1473.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/01/2019		1507.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/08/2019		1564.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/20/2020		1622.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/20/2020		1557.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	04/26/2021		1618.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	08/16/2021		1834.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	06/01/2022		1466.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/03/2022		1456.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	05/03/2023		1390.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	10/11/2023		1393.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-8	05/08/2024		1290.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-8	10/04/1997		114.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	10/19/1998		56.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	09/01/1999		112.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	10/17/2000		103.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	10/23/2001		75.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/28/2002		77.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	10/06/2002		72.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/03/2003		74.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/30/2004		26.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/26/2005		71.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/26/2006		97.3000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/23/2007		83.8000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/07/2008		90.1000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/07/2009		91.4000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/01/2010		85.3000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/07/2011		109.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/23/2012		71.5000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/16/2013		67.6000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/24/2014		53.9000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/21/2015		72.9000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/26/2016		70.5000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/04/2017		105.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/11/2018		82.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/01/2019		76.5000	*	11.4000
Total Organic Halogens	ug/L	MW-8	04/20/2020	ND	40.0000		11.4000
Total Organic Halogens	ug/L	MW-8	04/26/2021		53.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	06/01/2022		46.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	05/03/2023		65.0000	*	11.4000
Total Organic Halogens	ug/L	MW-8	05/08/2024		157.0000	*	11.4000
Chemical Oxygen Demand	mg/L	MW-9	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	01/21/1997		6.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	07/15/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/30/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/12/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/26/2005		6.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/26/2006	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2006		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/23/2007		9.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/09/2007	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/14/2008		8.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/07/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/07/2011	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/27/2011		7.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/28/2013		8.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/06/2014	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2015		5.2900		21.2000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chemical Oxygen Demand	mg/L	MW-9	04/26/2016		77.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2016		6.0400		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/04/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/10/2017		17.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/11/2018		19.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/30/2018		22.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/01/2019		55.1000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/08/2019		22.3000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/20/2020		19.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/20/2020		15.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/26/2021		19.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	08/16/2021		171.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	05/08/2024		17.5000		21.2000
Chloride	mg/L	MW-9	10/10/1996		8.7000	*	7.3000
Chloride	mg/L	MW-9	01/21/1997		10.0000	*	7.3000
Chloride	mg/L	MW-9	04/17/1997		11.0000	*	7.3000
Chloride	mg/L	MW-9	07/15/1997		12.0000	*	7.3000
Chloride	mg/L	MW-9	10/04/1997		11.0000	*	7.3000
Chloride	mg/L	MW-9	04/22/1998		11.3000	*	7.3000
Chloride	mg/L	MW-9	10/19/1998		11.0000	*	7.3000
Chloride	mg/L	MW-9	04/30/1999		9.7000	*	7.3000
Chloride	mg/L	MW-9	09/01/1999		10.0000	*	7.3000
Chloride	mg/L	MW-9	10/12/2004		8.9000	*	7.3000
Chloride	mg/L	MW-9	04/26/2005		7.9000	*	7.3000
Chloride	mg/L	MW-9	10/11/2005		8.4000	*	7.3000
Chloride	mg/L	MW-9	04/26/2006		8.0700	*	7.3000
Chloride	mg/L	MW-9	10/05/2006		8.8000	*	7.3000
Chloride	mg/L	MW-9	04/23/2007		8.2400	*	7.3000
Chloride	mg/L	MW-9	10/09/2007		8.0200	*	7.3000
Chloride	mg/L	MW-9	04/07/2008		9.7000	*	7.3000
Chloride	mg/L	MW-9	10/14/2008		10.6000	*	7.3000
Chloride	mg/L	MW-9	04/07/2009		11.3000	*	7.3000
Chloride	mg/L	MW-9	10/05/2009		11.8000	*	7.3000
Chloride	mg/L	MW-9	04/01/2010		11.8000	*	7.3000
Chloride	mg/L	MW-9	10/01/2010		12.5000	*	7.3000
Chloride	mg/L	MW-9	04/07/2011		12.6000	*	7.3000
Chloride	mg/L	MW-9	10/27/2011		14.3000	*	7.3000
Chloride	mg/L	MW-9	10/28/2013		12.0000	*	7.3000
Chloride	mg/L	MW-9	10/06/2014		12.9000	*	7.3000
Chloride	mg/L	MW-9	10/05/2015		13.9000	*	7.3000
Chloride	mg/L	MW-9	04/26/2016		96.9000	*	7.3000
Chloride	mg/L	MW-9	10/05/2016		29.3000	*	7.3000
Chloride	mg/L	MW-9	04/04/2017		33.6000	*	7.3000
Chloride	mg/L	MW-9	10/10/2017		34.3000	*	7.3000
Chloride	mg/L	MW-9	04/11/2018		39.3000	*	7.3000
Chloride	mg/L	MW-9	10/30/2018		31.1000	*	7.3000
Chloride	mg/L	MW-9	04/01/2019		43.3000	*	7.3000
Chloride	mg/L	MW-9	10/08/2019		55.9000	*	7.3000
Chloride	mg/L	MW-9	04/20/2020		40.6000	*	7.3000
Chloride	mg/L	MW-9	10/20/2020		50.1000	*	7.3000
Chloride	mg/L	MW-9	04/26/2021		27.7000	*	7.3000
Chloride	mg/L	MW-9	08/16/2021		34.0000	*	7.3000
Chloride	mg/L	MW-9	05/08/2024		11.6000	*	7.3000
Iron, Dissolved	ug/L	MW-9	10/10/1996	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	01/21/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/17/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	07/15/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/04/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/22/1998	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/19/1998	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/30/1999	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	09/01/1999	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/12/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/26/2005	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/11/2005	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/26/2006	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/05/2006	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/23/2007	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/09/2007	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/07/2008	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/14/2008	ND	100.0000		100.0000

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ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Iron, Dissolved	ug/L	MW-9	04/07/2009	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/05/2009	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/01/2010	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/01/2010	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/07/2011	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/27/2011	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/28/2013		310.0000	*	100.0000
Iron, Dissolved	ug/L	MW-9	10/06/2014	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/05/2015	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/26/2016		12400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-9	10/05/2016		409.0000	*	100.0000
Iron, Dissolved	ug/L	MW-9	04/04/2017	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/10/2017	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/11/2018	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/30/2018		864.0000	*	100.0000
Iron, Dissolved	ug/L	MW-9	04/01/2019		5630.0000	*	100.0000
Iron, Dissolved	ug/L	MW-9	10/08/2019	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-9	04/20/2020	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-9	10/20/2020		737.0000	*	100.0000
Iron, Dissolved	ug/L	MW-9	04/26/2021	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-9	08/16/2021		847.0000	*	100.0000
Iron, Dissolved	ug/L	MW-9	05/08/2024	ND	500.0000		100.0000
Specific Conductance	umhos/cm	MW-9	10/10/1996		895.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	01/21/1997		787.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/17/1997		882.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	07/15/1997		922.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/04/1997		887.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/22/1998		900.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/19/1998		956.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/30/1999		992.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	09/01/1999		992.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/12/2004		527.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/26/2005		146.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/11/2005		1128.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/26/2006		1054.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/05/2006		1058.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/23/2007		1069.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/09/2007		1056.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/07/2008		1259.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	10/14/2008		1022.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/07/2009		1037.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/05/2009		992.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/01/2010		1215.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	10/01/2010		1066.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/07/2011		914.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/27/2011		928.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/28/2013		1157.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/06/2014		1153.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/05/2015		1198.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	04/26/2016		1462.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	10/05/2016		1206.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	04/04/2017		1009.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/10/2017		911.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	04/11/2018		1011.0000		1189.8845
Specific Conductance	umhos/cm	MW-9	10/30/2018		1283.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	04/01/2019		1280.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	10/08/2019		1291.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	04/20/2020		1457.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	10/20/2020		1381.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	04/26/2021		1635.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	08/16/2021		1674.0000	*	1189.8845
Specific Conductance	umhos/cm	MW-9	05/08/2024		1287.0000	*	1189.8845
Total Organic Halogens	ug/L	MW-9	10/04/1997		18.0000	*	11.4000
Total Organic Halogens	ug/L	MW-9	10/19/1998	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-9	09/01/1999		27.0000	*	11.4000
Total Organic Halogens	ug/L	MW-9	04/26/2005	ND	10.0000		11.4000
Total Organic Halogens	ug/L	MW-9	04/26/2006	ND	20.0000		11.4000
Total Organic Halogens	ug/L	MW-9	04/23/2007		12.0000	*	11.4000
Total Organic Halogens	ug/L	MW-9	04/07/2008		14.5000	*	11.4000
Total Organic Halogens	ug/L	MW-9	04/07/2009		10.6000		11.4000
Total Organic Halogens	ug/L	MW-9	04/01/2010		14.2000	*	11.4000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

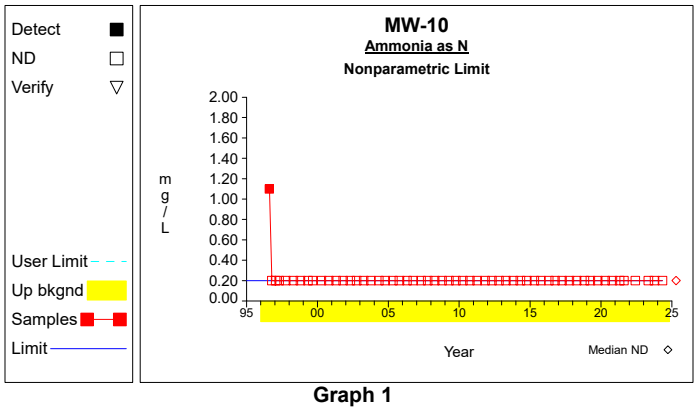
Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

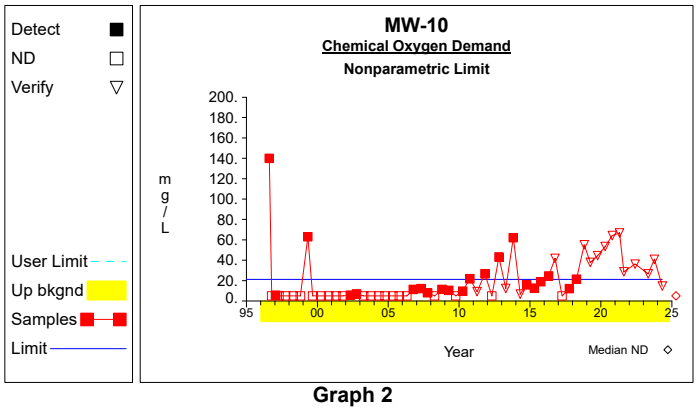
Constituent	Units	Well	Date		Result		Pred. Limit
Total Organic Halogens	ug/L	MW-9	04/07/2011		16.9000	*	11.4000
Total Organic Halogens	ug/L	MW-9	04/26/2016	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-9	04/04/2017	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-9	04/11/2018	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-9	04/01/2019	ND	30.0000		11.4000
Total Organic Halogens	ug/L	MW-9	04/20/2020	ND	40.0000		11.4000
Total Organic Halogens	ug/L	MW-9	04/26/2021		13.0000	*	11.4000
Total Organic Halogens	ug/L	MW-9	05/08/2024		75.6000	*	11.4000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

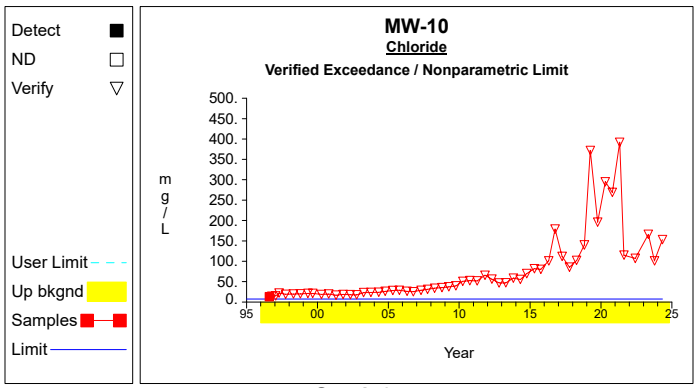
Up vs. Down Prediction Limits



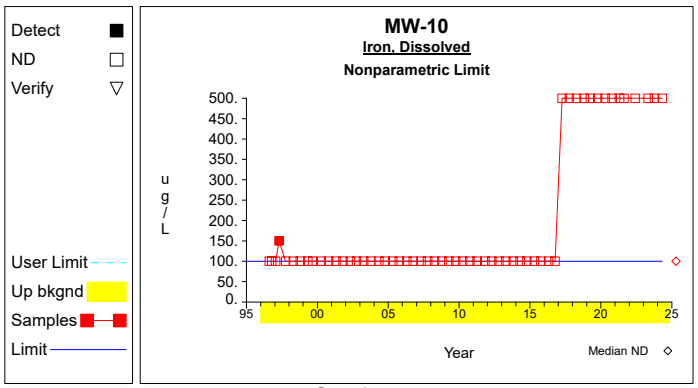
Graph 1



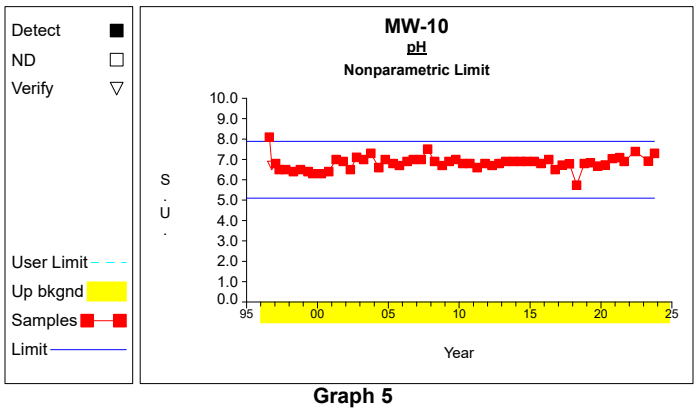
Graph 2



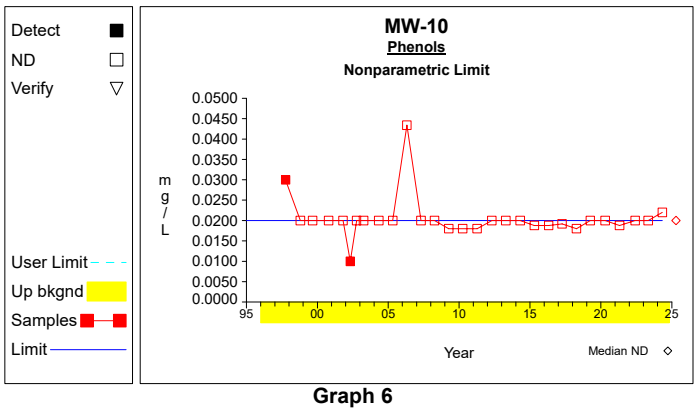
Graph 3



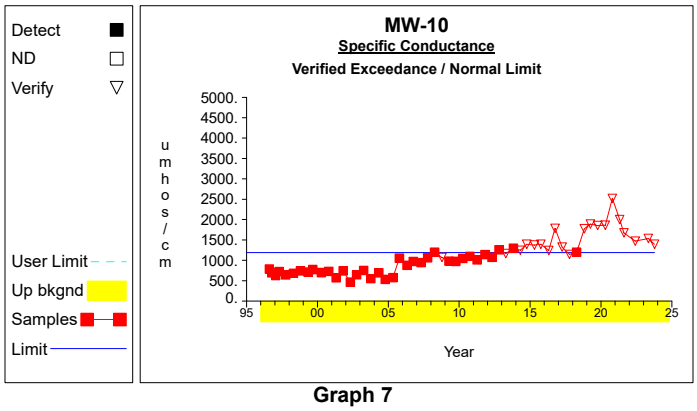
Graph 4



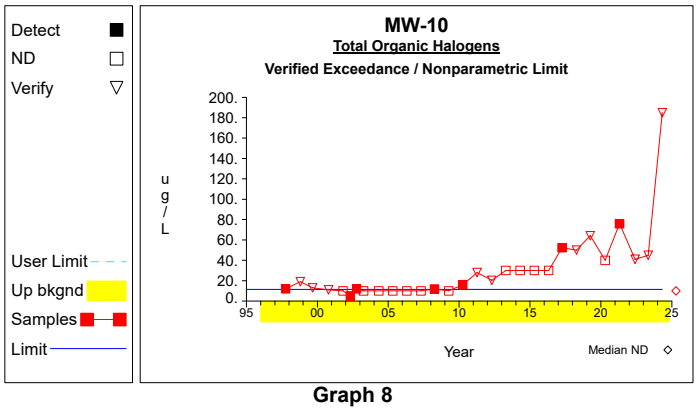
Graph 5



Graph 6



Graph 7



Graph 8

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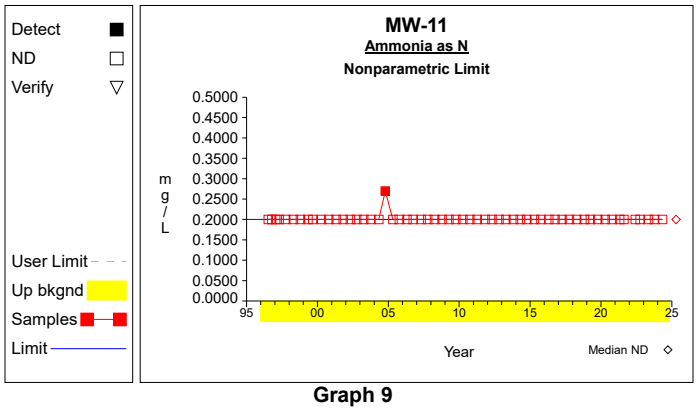
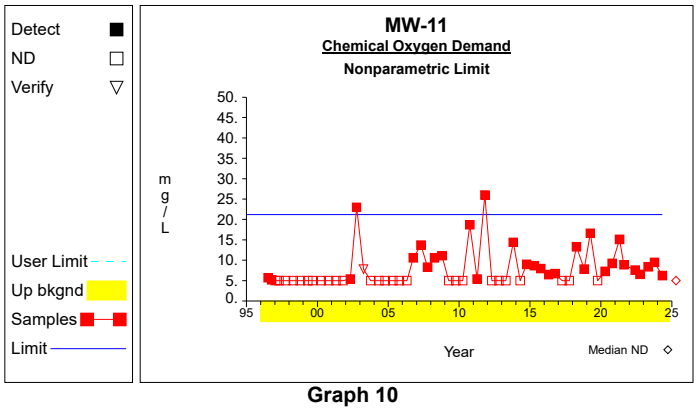
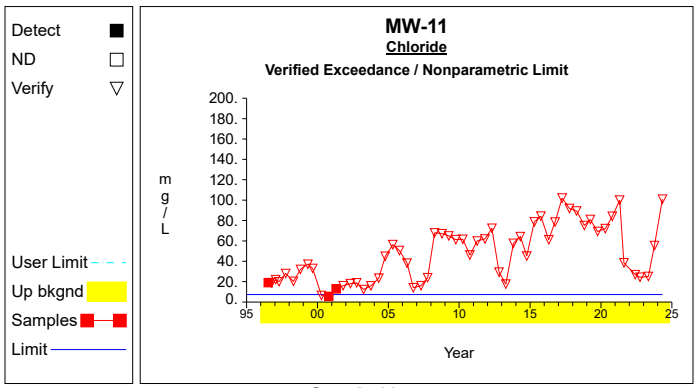
Up vs. Down Prediction Limits



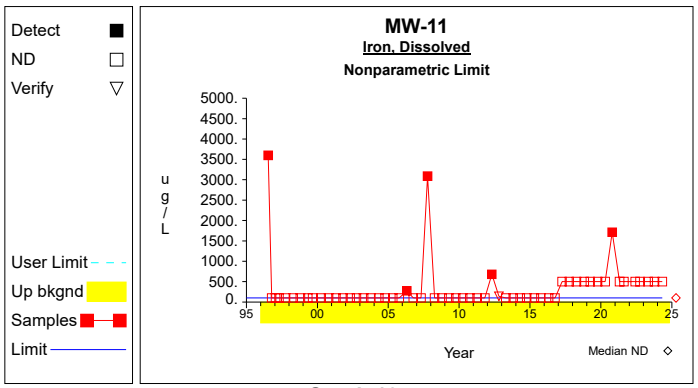
Graph 9



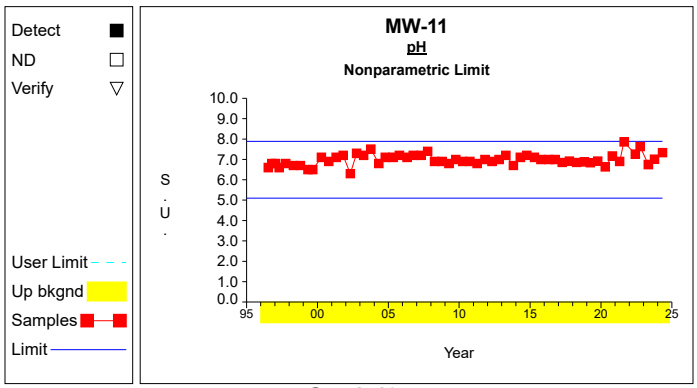
Graph 10



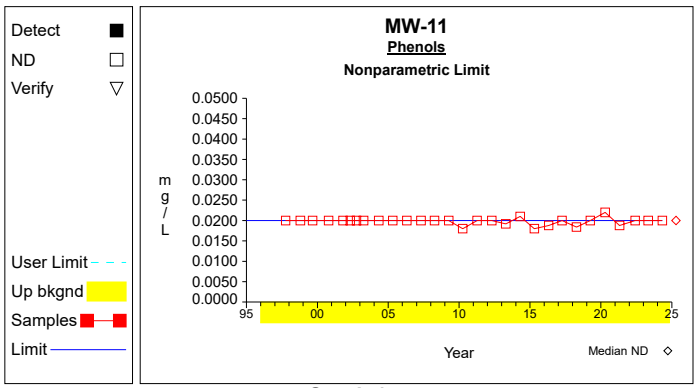
Graph 11



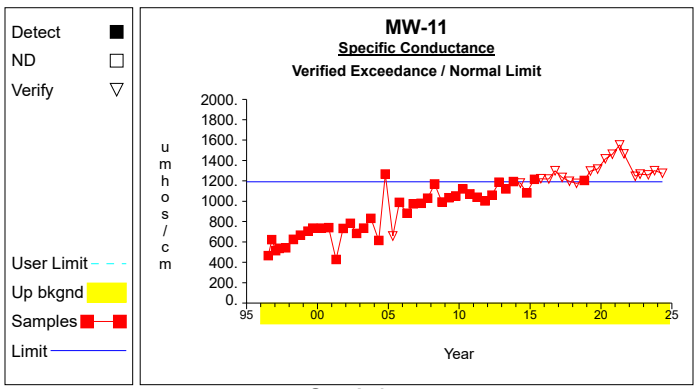
Graph 12



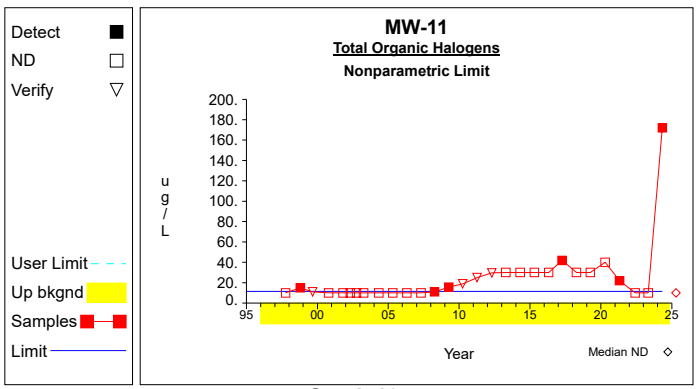
Graph 13



Graph 14



Graph 15



Graph 16

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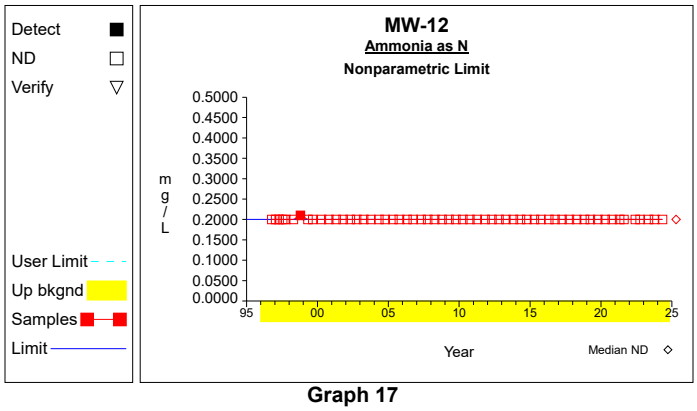
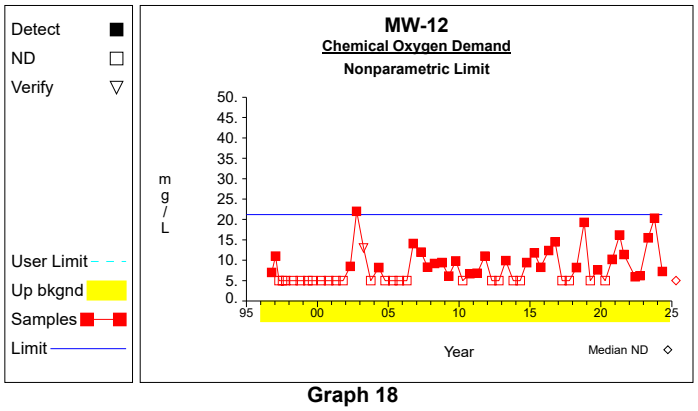
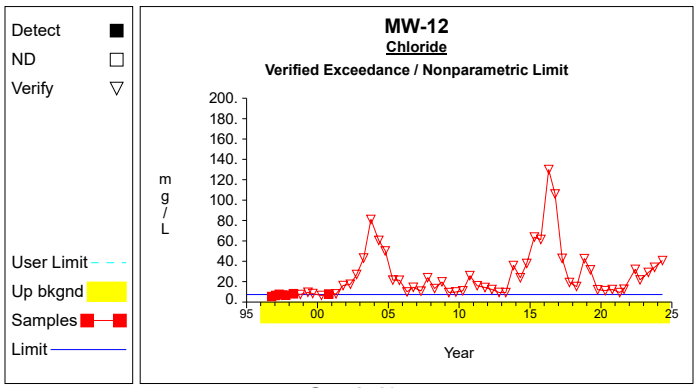
Up vs. Down Prediction Limits



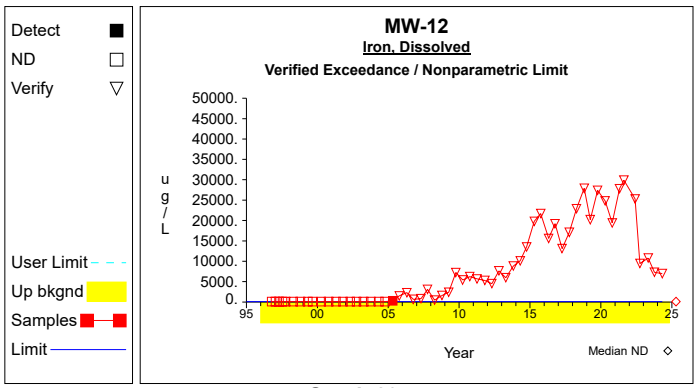
Graph 17



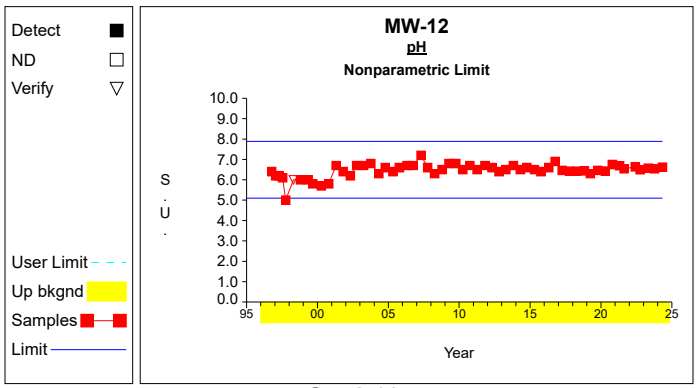
Graph 18



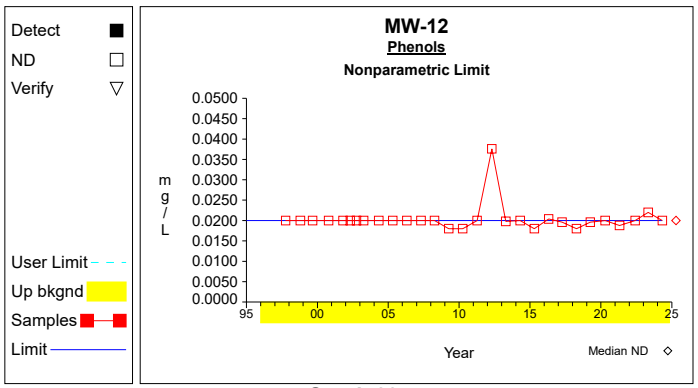
Graph 19



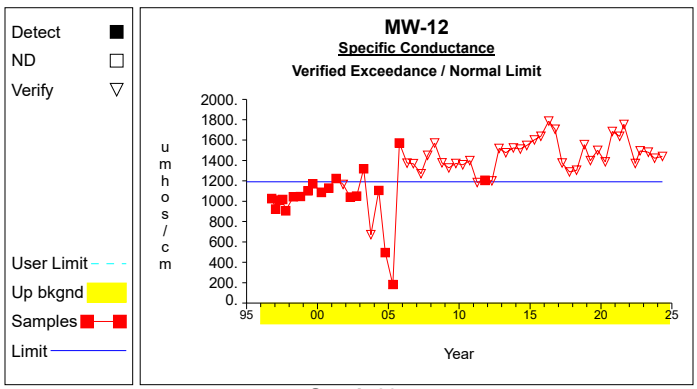
Graph 20



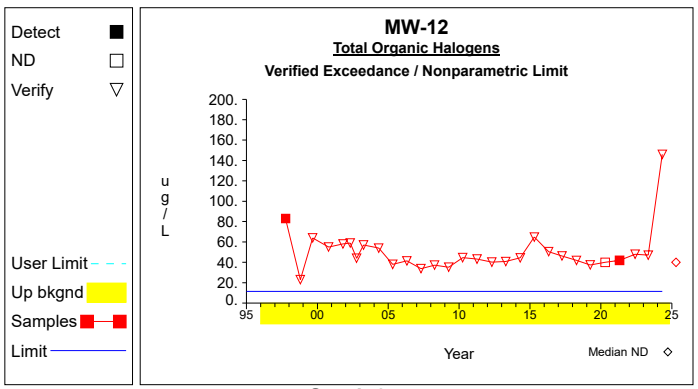
Graph 21



Graph 22



Graph 23



Graph 24

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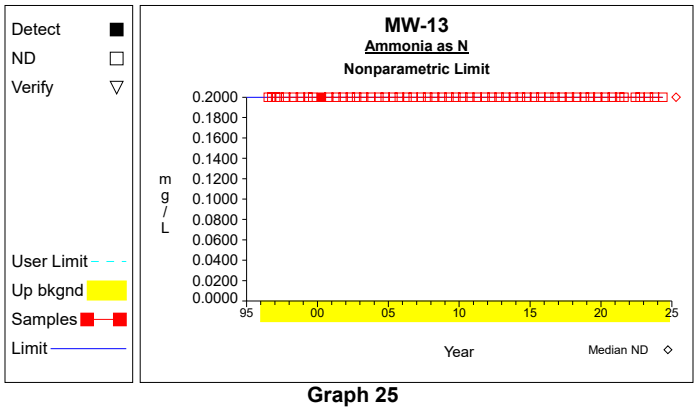
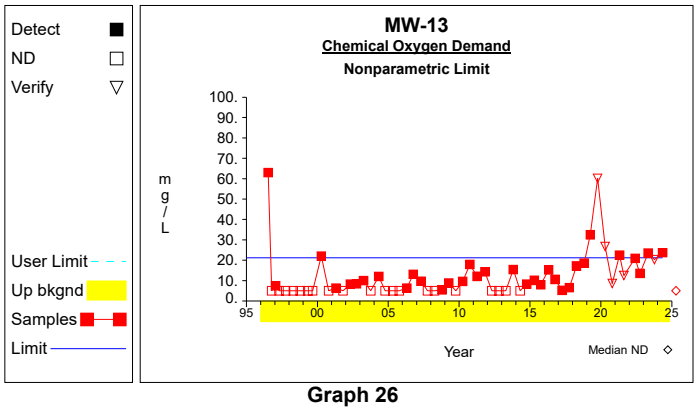
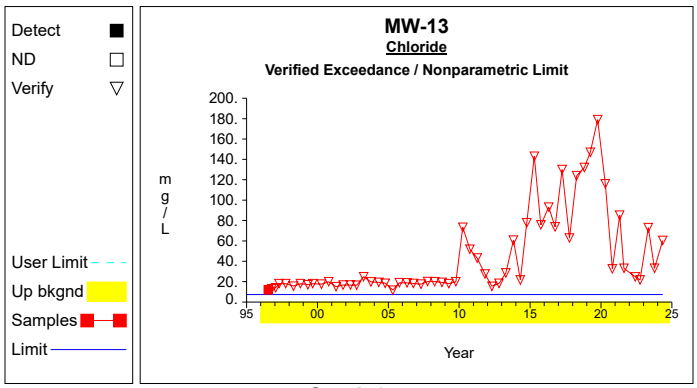
Up vs. Down Prediction Limits



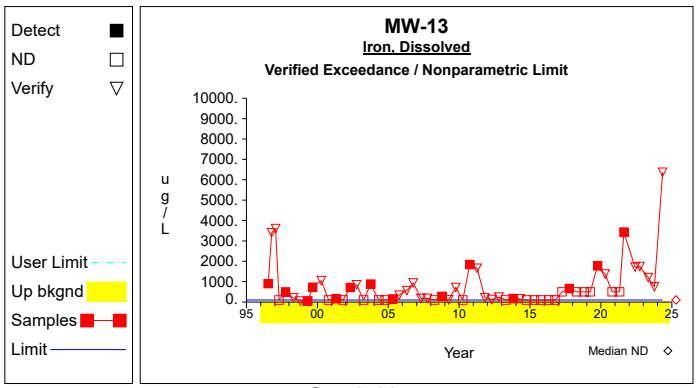
Graph 25



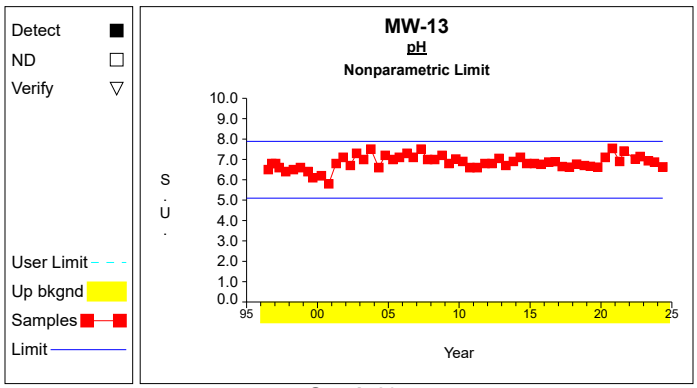
Graph 26



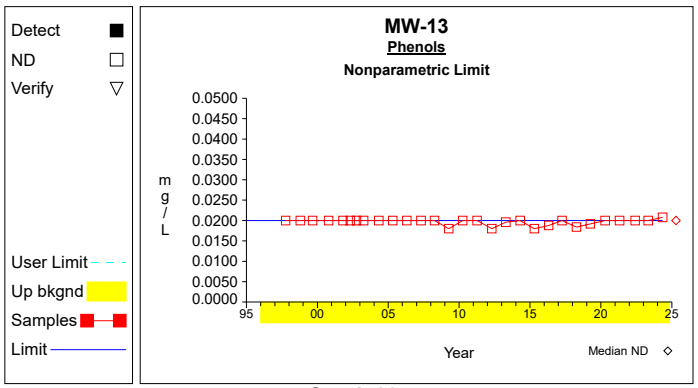
Graph 27



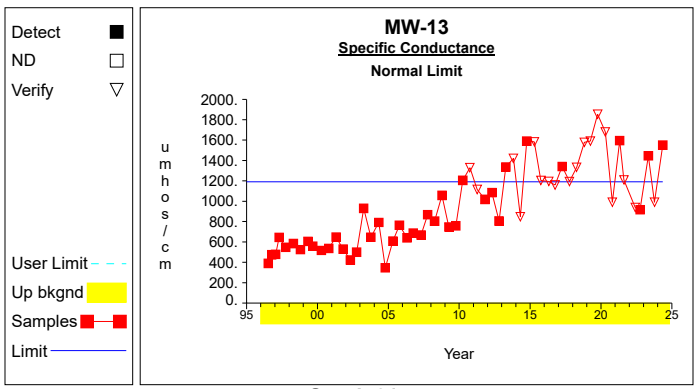
Graph 28



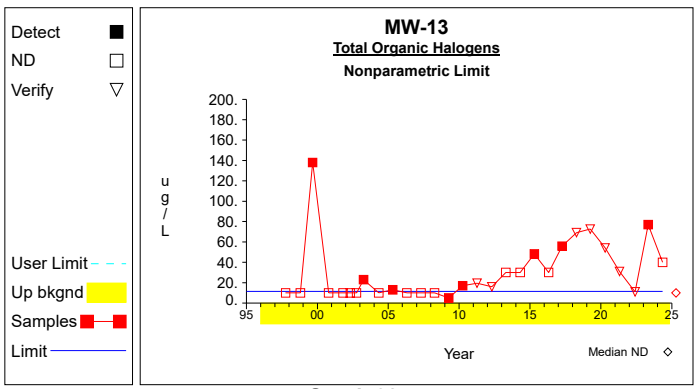
Graph 29



Graph 30



Graph 31



Graph 32

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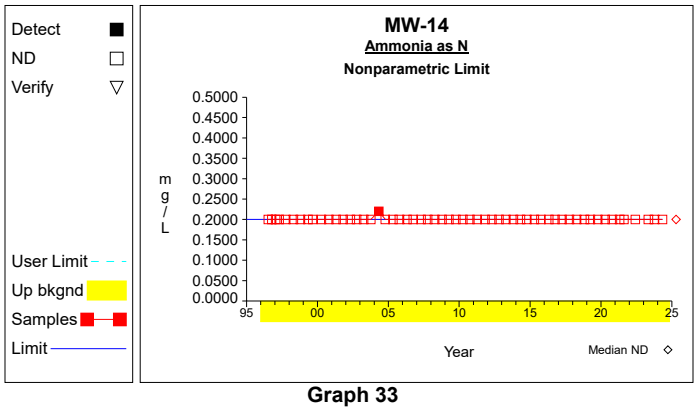
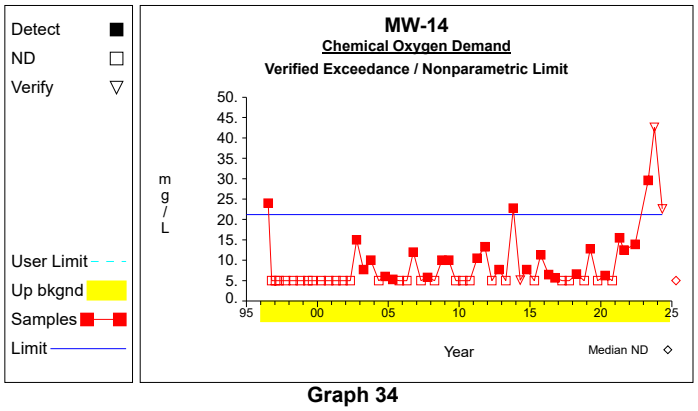
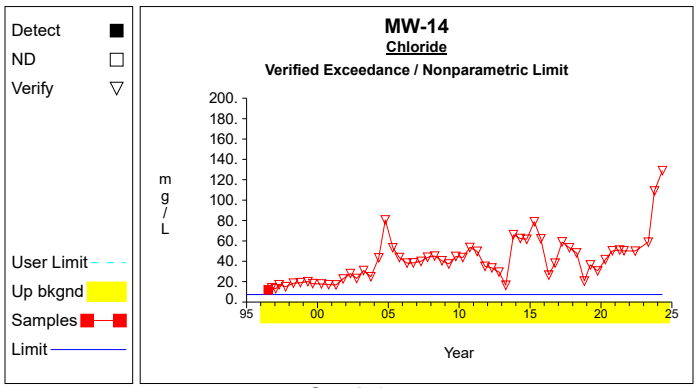
Up vs. Down Prediction Limits



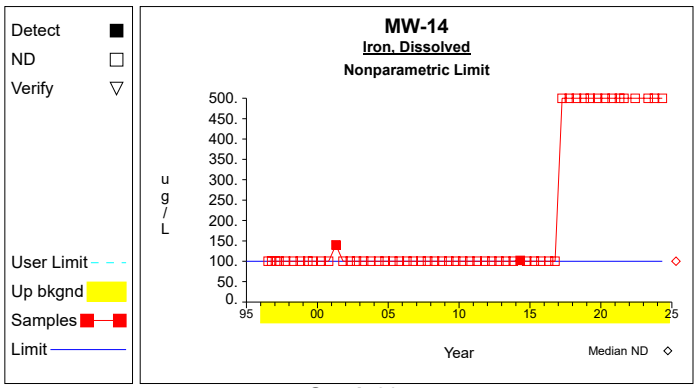
Graph 33



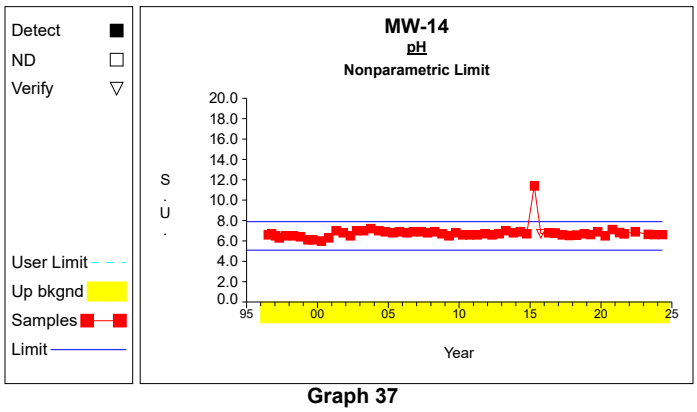
Graph 34



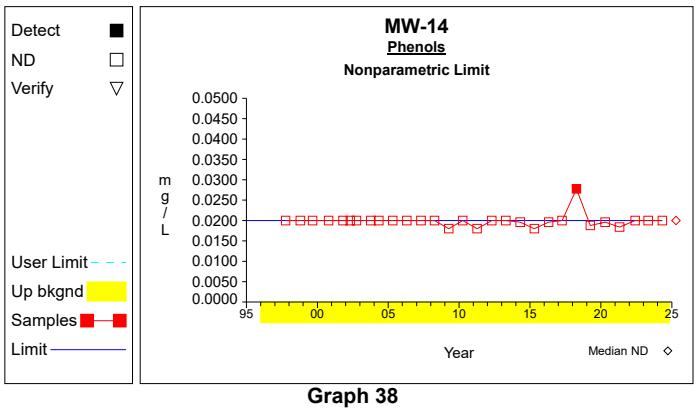
Graph 35



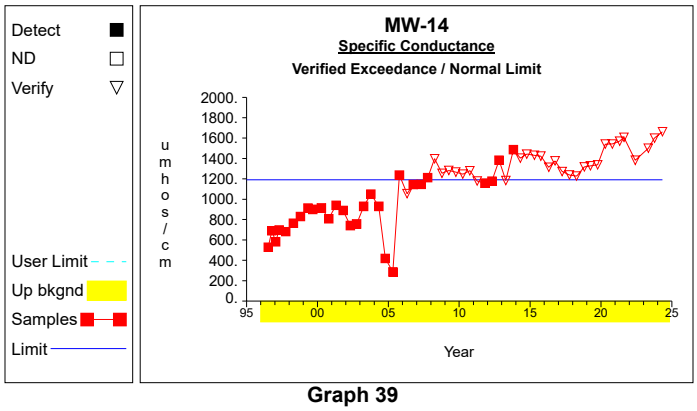
Graph 36



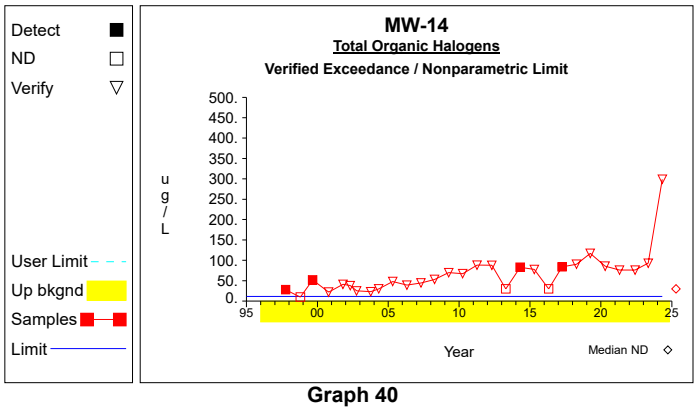
Graph 37



Graph 38



Graph 39



Graph 40

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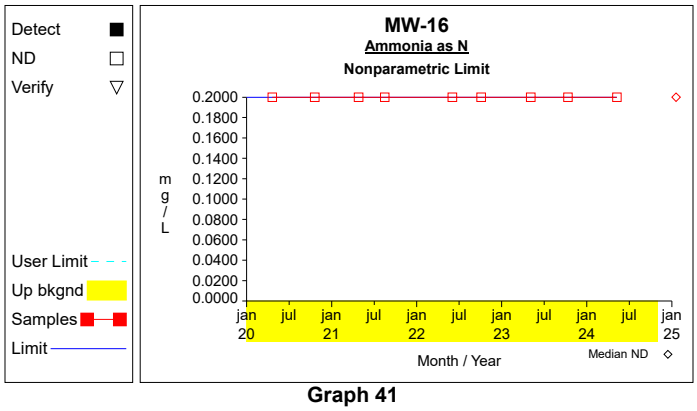
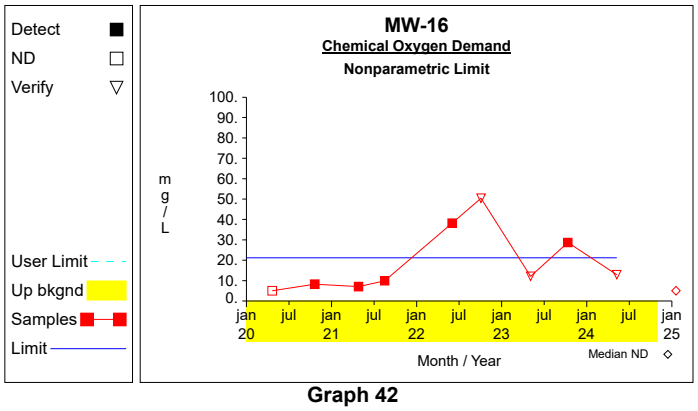
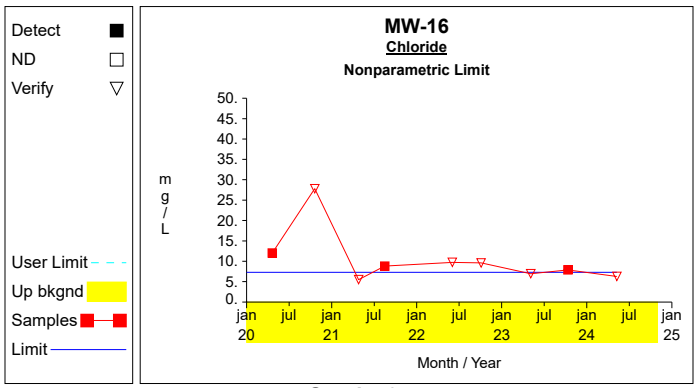
Up vs. Down Prediction Limits



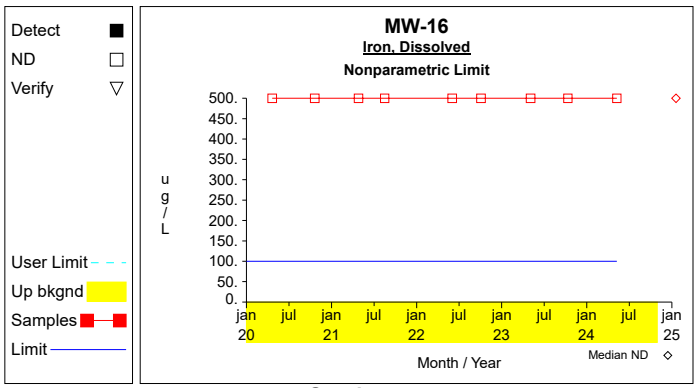
Graph 41



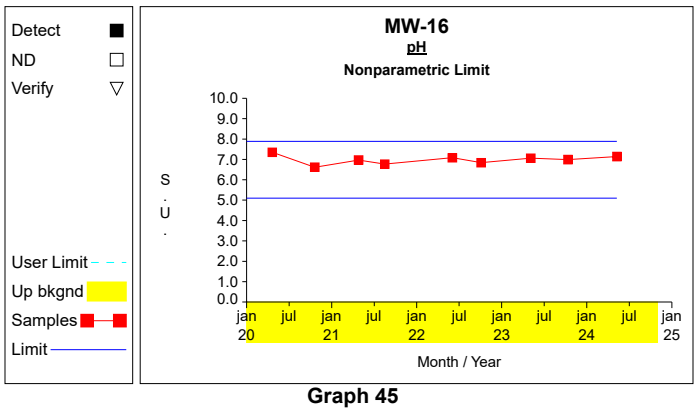
Graph 42



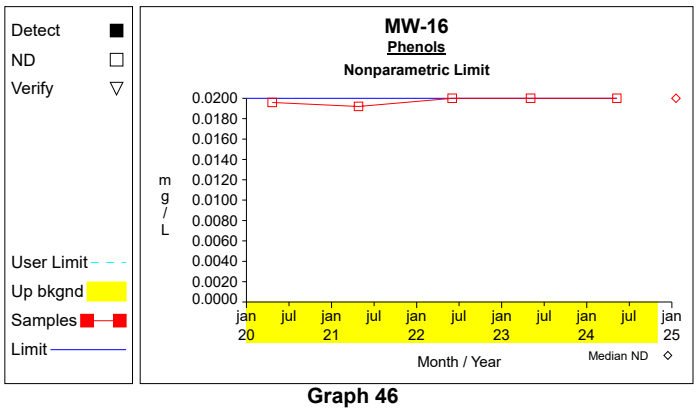
Graph 43



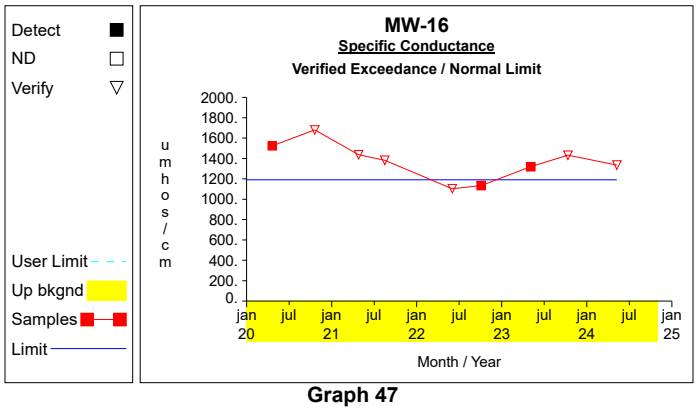
Graph 44



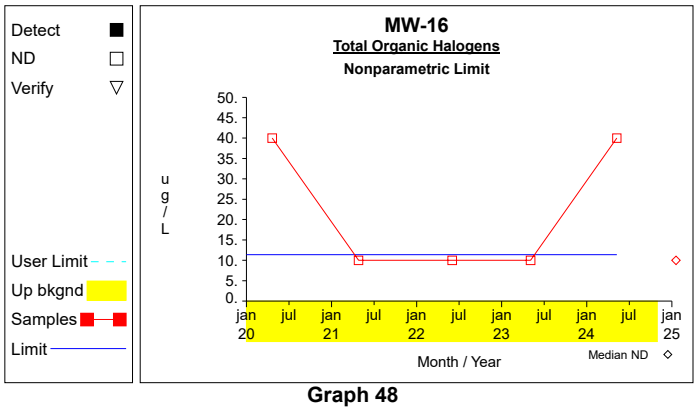
Graph 45



Graph 46



Graph 47



Graph 48

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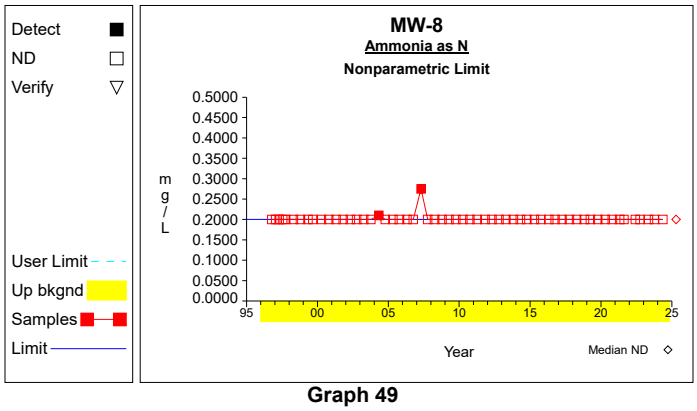
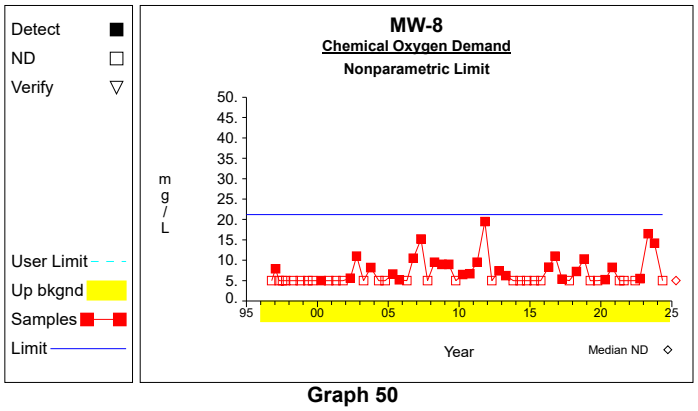
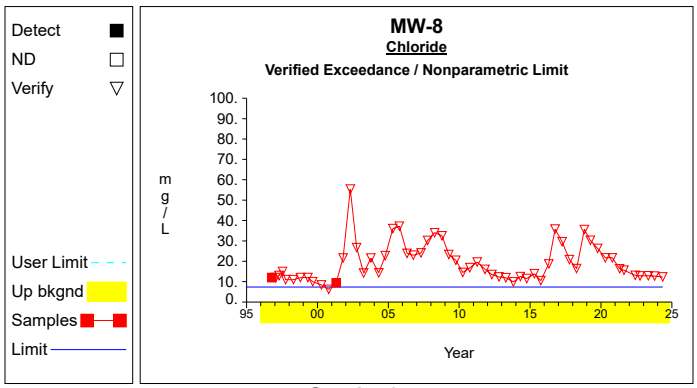
Up vs. Down Prediction Limits



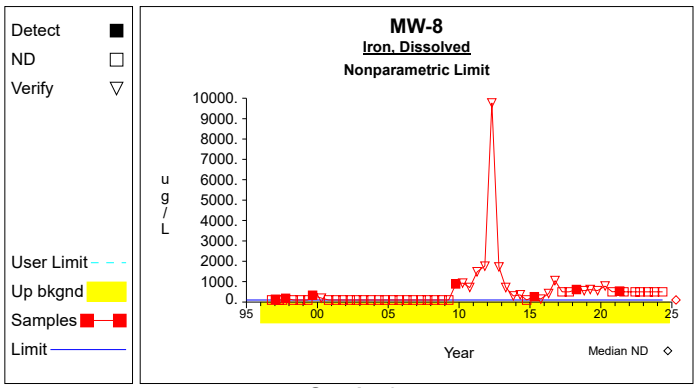
Graph 49



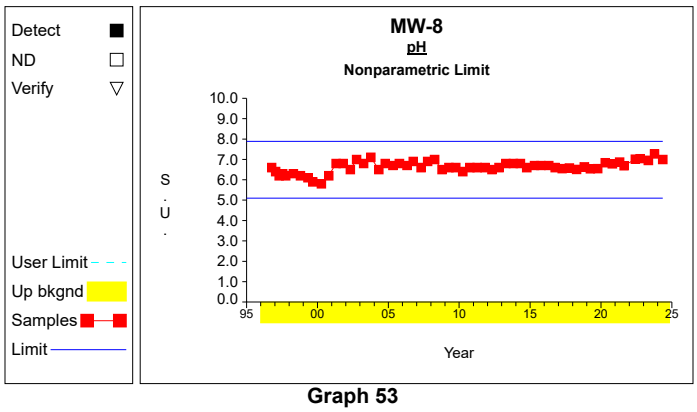
Graph 50



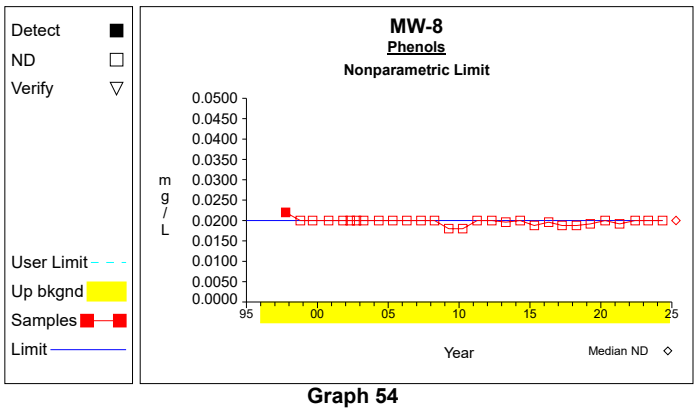
Graph 51



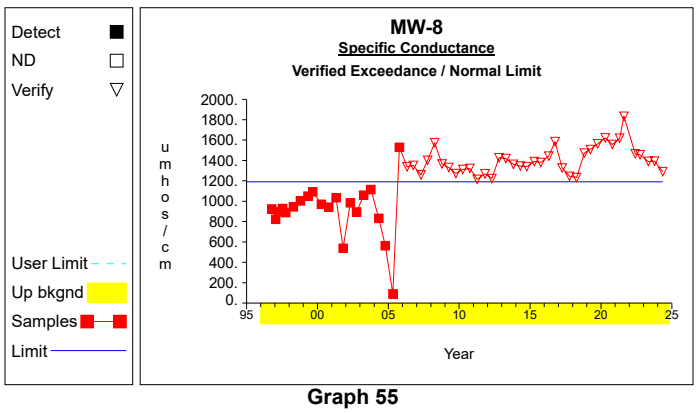
Graph 52



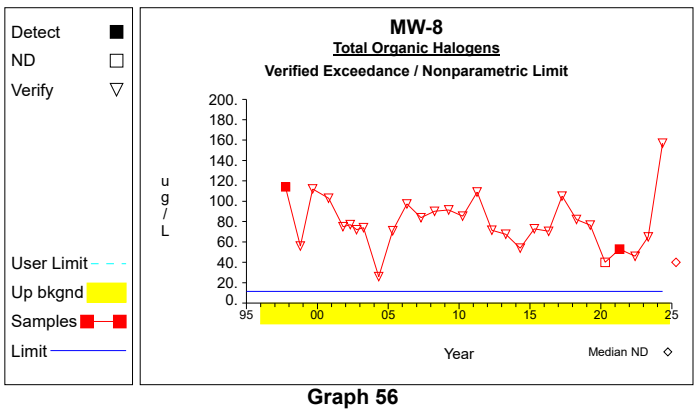
Graph 53



Graph 54



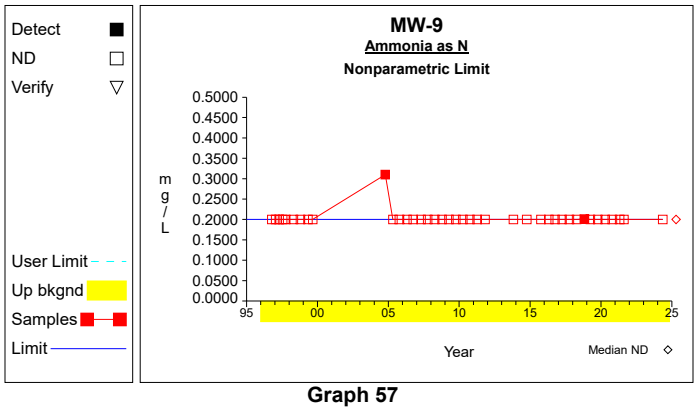
Graph 55



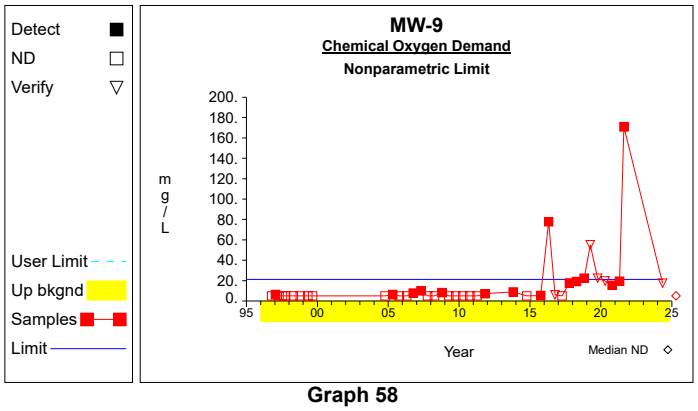
Graph 56

Prepared by: Otter Creek Environmental

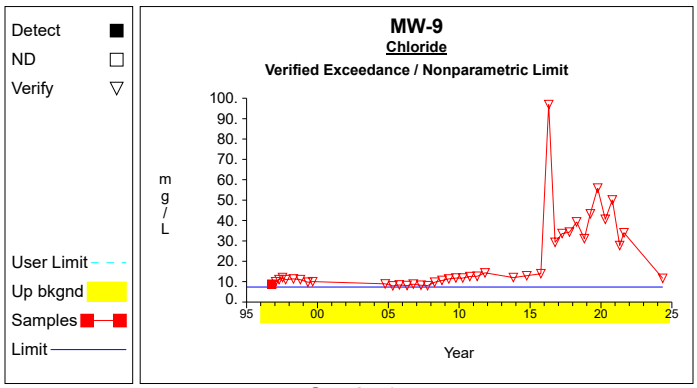
Up vs. Down Prediction Limits



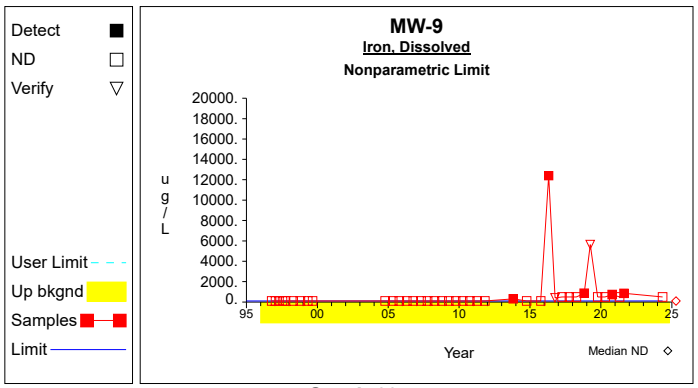
Graph 57



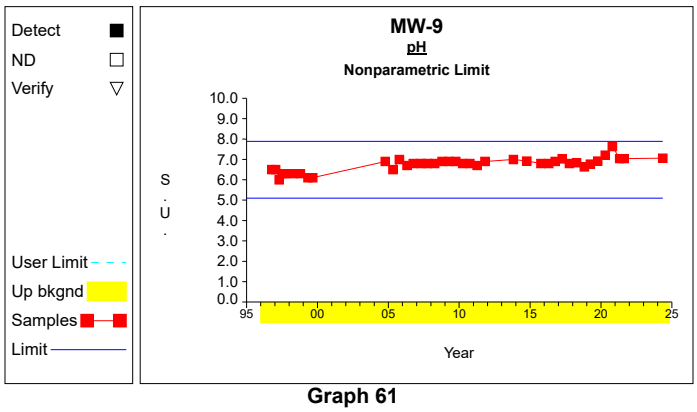
Graph 58



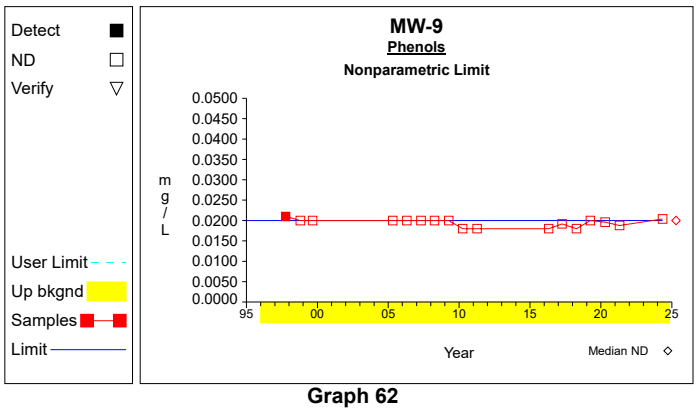
Graph 59



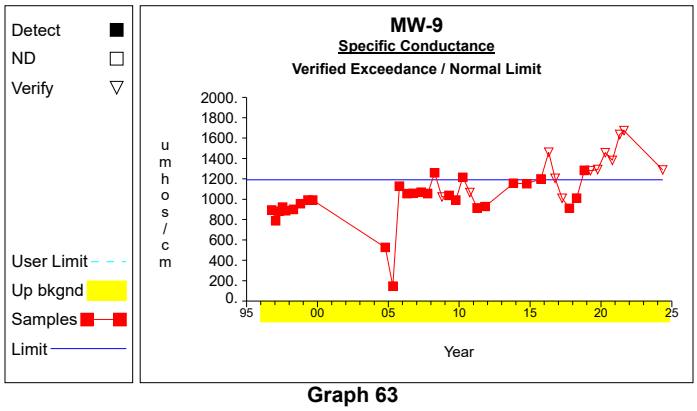
Graph 60



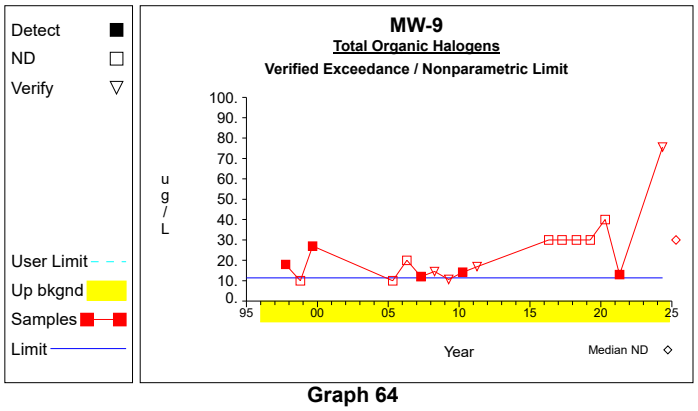
Graph 61



Graph 62



Graph 63

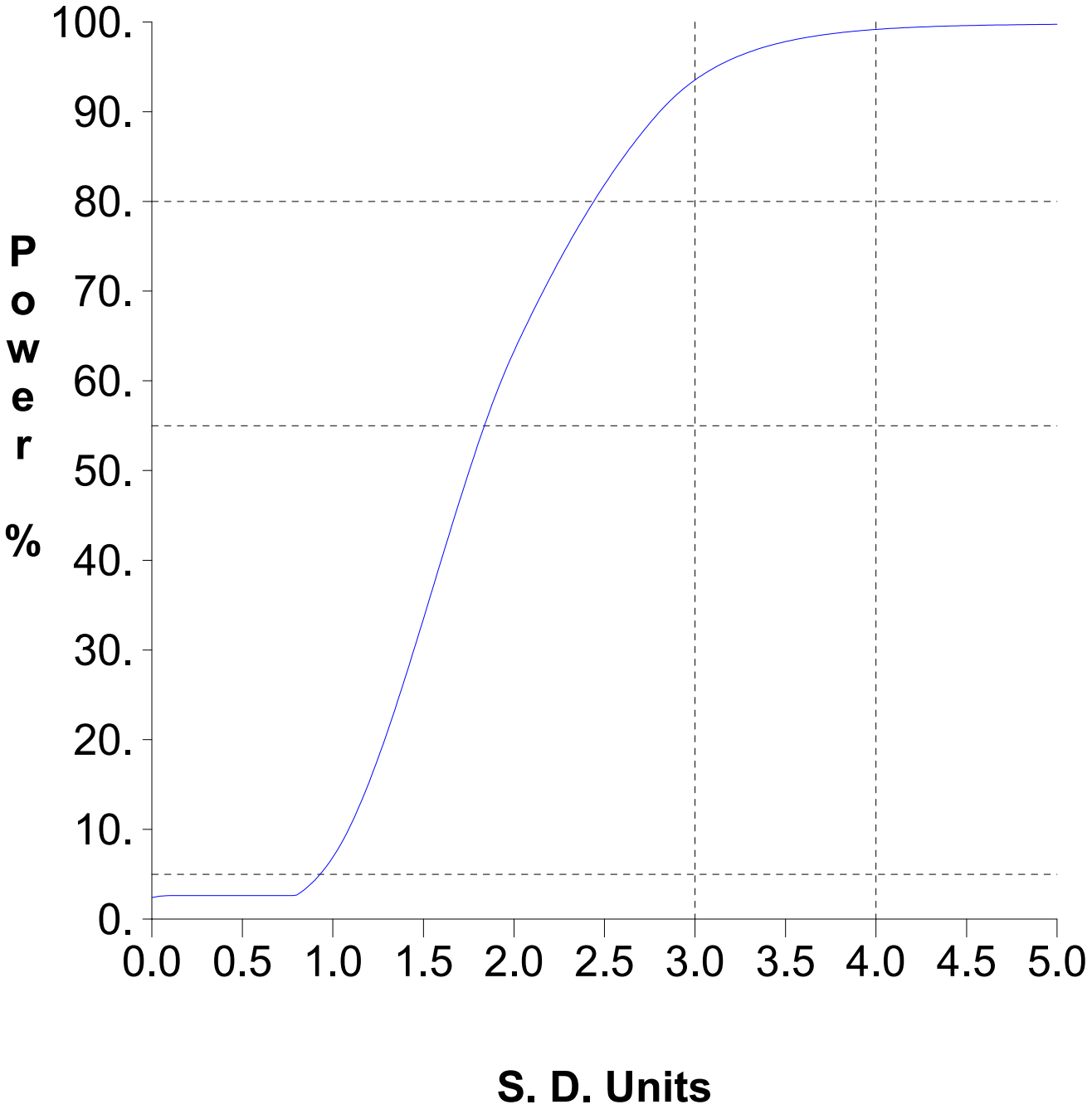


Graph 64

Prepared by: Otter Creek Environmental

False Positive and False Negative Rates for Current

Upgradient vs. Downgradient Monitoring Program



Worksheet 1 - Upgradient vs. Downgradient Comparisons
Ammonia as N (mg/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = median(X) = **0.2**	Compute nonparametric prediction limit as median reporting limit in background.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Chemical Oxygen Demand (mg/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = max(X) = **21.2**	Compute nonparametric prediction limit as largest background measurement.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Chloride (mg/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = max(X) = **7.3**	Compute nonparametric prediction limit as largest background measurement.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Iron, Dissolved (ug/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = median(X) = **100.0**	Compute nonparametric prediction limit as median reporting limit in background.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
pH (S.U.)
Nonparametric Prediction Limit

Step	Equation	Description
1	$PL_{(low)}$ = min(X) = **5.1** $PL_{(high)}$ = max(X) = **7.89**	Compute nonparametric prediction interval as minimum and maximum measurements.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Phenols (mg/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = median(X) = **0.02**	Compute nonparametric prediction limit as median reporting limit in background.
2	Conf = **0.98**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Specific Conductance (umhos/cm)
Normal Prediction Limit

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **36818.0** / **53** = **694.679**	Compute upgradient mean.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.77**x**10^7** - **1.36**x**10^9**/**53**) / (**53**-1))^{½} = **204.401**	Compute upgradient sd.
3	alpha = min[(1-.95$^{1/\mathbf{K}}$)^{½}, .01] = min[(1-.95$^{1/\mathbf{64}}$)^{½}, .01] = **0.01**	Adjusted per comparison false positive rate. Pass initial or 1 resample.
4	PL = $\overline{\mathbf{X}}$ + **tS**(1+1/**N**)^{½} = **694.679** + (**2.4*****204.401**)(1+1/**53**)^{½} = **1189.884**	One-sided normal prediction limit (t is Student's t on N-1 degrees of freedom and 1-alpha confidence level).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Total Organic Halogens (ug/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = max(X) = **11.4**	Compute nonparametric prediction limit as largest background measurement.
2	Conf = **0.98**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Attachment C

Historical VOC Detections in the Ground Water

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
cis-1,2-Dichloroethene	MW-10	10/27/2011		3.59	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	4/16/2013		4.18	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	10/28/2013		3.16	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	4/24/2014		2.79	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	10/06/2014		1.06	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	4/21/2015		3.37	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	10/05/2015		2.49	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	10/05/2016		1.01	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	4/04/2017		1.86	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	10/10/2017		3.00	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	4/11/2018		2.37	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	4/20/2020		5.16	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	10/20/2020		2.39	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	4/26/2021		1.17	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	8/16/2021		2.11	1.00	ug/L
cis-1,2-Dichloroethene	MW-10	6/01/2022		2.16	1.00	ug/L
1,1,1-Trichloroethane	MW-11	10/10/1996		1.1	1.0	ug/L
1,1,1-Trichloroethane	MW-12	10/10/1996		1.8	1.0	ug/L
1,1,1-Trichloroethane	MW-12	1/21/1997		2.1	1.0	ug/L
1,1,1-Trichloroethane	MW-12	7/15/1997		1.9	1.0	ug/L
1,2-Dichloroethane	MW-12	4/30/2004		1.33	1.00	ug/L
Benzene	MW-12	1/21/1997		2.100	1.000	ug/L
Benzene	MW-12	4/17/1997		2.200	1.000	ug/L
Benzene	MW-12	7/15/1997		2.100	1.000	ug/L
Benzene	MW-12	10/04/1997		2.400	1.000	ug/L
Benzene	MW-12	4/22/1998		2.700	1.000	ug/L
Benzene	MW-12	10/19/1998		3.100	1.000	ug/L
Benzene	MW-12	4/30/1999		3.300	1.000	ug/L
Benzene	MW-12	9/01/1999		3.000	1.000	ug/L
Benzene	MW-12	4/12/2000		3.000	1.000	ug/L
Benzene	MW-12	10/17/2000		3.500	1.000	ug/L
Benzene	MW-12	4/25/2001		2.800	1.000	ug/L
Benzene	MW-12	10/23/2001		4.300	1.000	ug/L
Benzene	MW-12	4/28/2002		3.600	1.000	ug/L
Benzene	MW-12	10/06/2002		3.590	1.000	ug/L
Benzene	MW-12	10/07/2003		2.880	1.000	ug/L
Benzene	MW-12	10/12/2004		2.740	1.000	ug/L
Benzene	MW-12	4/26/2005		2.300	1.000	ug/L
Benzene	MW-12	10/11/2005		1.760	1.000	ug/L
Benzene	MW-12	4/26/2006		1.220	1.000	ug/L
Benzene	MW-12	10/05/2006		1.110	1.000	ug/L
Benzene	MW-12	4/23/2007		1.330	1.000	ug/L
Benzene	MW-12	10/09/2007		1.690	1.000	ug/L
Benzene	MW-12	4/07/2008		1.240	1.000	ug/L
Benzene	MW-12	10/14/2008		1.200	1.000	ug/L
Benzene	MW-12	4/07/2009		1.410	1.000	ug/L
Benzene	MW-12	10/05/2009		1.390	1.000	ug/L
Benzene	MW-12	4/01/2010		1.390	1.000	ug/L
Benzene	MW-12	10/01/2010		1.240	1.000	ug/L
Benzene	MW-12	4/07/2011		1.300	1.000	ug/L
Benzene	MW-12	10/27/2011		.920	.500	ug/L
Benzene	MW-12	4/23/2012		.940	.500	ug/L
Benzene	MW-12	10/23/2012		.920	.500	ug/L
Benzene	MW-12	4/16/2013		1.050	1.000	ug/L
Benzene	MW-12	10/28/2013		1.200	1.000	ug/L
Benzene	MW-12	4/24/2014		1.330	1.000	ug/L
Benzene	MW-12	10/06/2014		1.070	1.000	ug/L
Benzene	MW-12	4/21/2015		1.320	1.000	ug/L
Benzene	MW-12	10/05/2015		1.620	1.000	ug/L
Benzene	MW-12	4/26/2016		1.490	1.000	ug/L
Benzene	MW-12	10/05/2016		1.350	1.000	ug/L
Benzene	MW-12	4/04/2017		1.340	1.000	ug/L
Benzene	MW-12	10/10/2017		1.650	1.000	ug/L
Benzene	MW-12	4/11/2018		1.610	1.000	ug/L
Benzene	MW-12	10/30/2018		1.520	1.000	ug/L
Benzene	MW-12	4/01/2019		1.450	1.000	ug/L
Benzene	MW-12	10/08/2019		1.870	1.000	ug/L
Benzene	MW-12	4/20/2020		1.860	1.000	ug/L
Benzene	MW-12	10/20/2020		2.010	1.000	ug/L
Benzene	MW-12	4/26/2021		1.840	1.000	ug/L
Benzene	MW-12	8/16/2021		1.950	1.000	ug/L
Benzene	MW-12	6/01/2022		.784	.500	ug/L
Benzene	MW-12	10/03/2022		1.460	1.000	ug/L
Benzene	MW-12	5/03/2023		1.270	.500	ug/L
Benzene	MW-12	10/11/2023		1.160	.500	ug/L
Benzene	MW-12	5/02/2024		1.190	.500	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
Benzene	MW-12	10/29/2024		.804	.500	ug/L
cis-1,2-Dichloroethene	MW-12	10/27/2011		33.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/16/2013		58.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/28/2013		51.7	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/24/2014		57.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/06/2014		38.7	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/21/2015		40.6	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/05/2015		55.9	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/26/2016		42.8	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/05/2016		35.7	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/04/2017		37.4	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/10/2017		48.9	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/11/2018		50.4	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/30/2018		29.6	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/01/2019		34.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/08/2019		47.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/20/2020		52.4	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/20/2020		55.1	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	4/26/2021		49.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	8/16/2021		64.7	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	6/01/2022		31.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/03/2022		35.2	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	5/03/2023		31.9	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/11/2023		31.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	5/02/2024		32.5	1.0	ug/L
cis-1,2-Dichloroethene	MW-12	10/29/2024		18.3	1.0	ug/L
Trichloroethene	MW-12	10/10/1996		2.80	1.00	ug/L
Trichloroethene	MW-12	1/21/1997		5.50	1.00	ug/L
Trichloroethene	MW-12	4/17/1997		4.90	1.00	ug/L
Trichloroethene	MW-12	7/15/1997		4.70	1.00	ug/L
Trichloroethene	MW-12	10/04/1997		4.70	1.00	ug/L
Trichloroethene	MW-12	4/22/1998		4.80	1.00	ug/L
Trichloroethene	MW-12	10/19/1998		5.40	1.00	ug/L
Trichloroethene	MW-12	4/30/1999		5.60	1.00	ug/L
Trichloroethene	MW-12	9/01/1999		4.80	1.00	ug/L
Trichloroethene	MW-12	4/12/2000		5.30	1.00	ug/L
Trichloroethene	MW-12	10/17/2000		5.40	1.00	ug/L
Trichloroethene	MW-12	4/25/2001		4.70	1.00	ug/L
Trichloroethene	MW-12	10/23/2001		5.60	1.00	ug/L
Trichloroethene	MW-12	4/28/2002		4.60	1.00	ug/L
Trichloroethene	MW-12	10/06/2002		5.35	1.00	ug/L
Trichloroethene	MW-12	10/07/2003		3.93	1.00	ug/L
Trichloroethene	MW-12	4/30/2004		6.57	1.00	ug/L
Trichloroethene	MW-12	10/12/2004		4.05	1.00	ug/L
Trichloroethene	MW-12	4/26/2005		3.60	1.00	ug/L
Trichloroethene	MW-12	10/11/2005		4.19	1.00	ug/L
Trichloroethene	MW-12	4/26/2006		2.95	1.00	ug/L
Trichloroethene	MW-12	10/05/2006		1.88	1.00	ug/L
Trichloroethene	MW-12	4/23/2007		1.36	1.00	ug/L
Trichloroethene	MW-12	10/09/2007		1.76	1.00	ug/L
Trichloroethene	MW-12	4/07/2008		1.33	1.00	ug/L
Trichloroethene	MW-12	10/14/2008		1.33	1.00	ug/L
Trichloroethene	MW-12	4/07/2009		1.31	1.00	ug/L
Trichloroethene	MW-12	10/05/2009		2.32	1.00	ug/L
Trichloroethene	MW-12	4/01/2010		2.68	1.00	ug/L
Trichloroethene	MW-12	10/01/2010		1.93	1.00	ug/L
Trichloroethene	MW-12	4/07/2011		2.40	1.00	ug/L
Trichloroethene	MW-12	10/27/2011		2.29	1.00	ug/L
Trichloroethene	MW-12	4/23/2012		2.04	1.00	ug/L
Trichloroethene	MW-12	10/23/2012		2.60	1.00	ug/L
Trichloroethene	MW-12	4/16/2013		3.03	1.00	ug/L
Trichloroethene	MW-12	10/28/2013		2.44	1.00	ug/L
Trichloroethene	MW-12	4/24/2014		2.46	1.00	ug/L
Trichloroethene	MW-12	10/06/2014		1.88	1.00	ug/L
Trichloroethene	MW-12	4/21/2015		1.77	1.00	ug/L
Trichloroethene	MW-12	10/05/2015		2.37	1.00	ug/L
Trichloroethene	MW-12	10/05/2016		1.36	1.00	ug/L
Trichloroethene	MW-12	4/04/2017		1.41	1.00	ug/L
Trichloroethene	MW-12	10/10/2017		1.50	1.00	ug/L
Trichloroethene	MW-12	4/11/2018		1.23	1.00	ug/L
Trichloroethene	MW-12	4/01/2019		1.18	1.00	ug/L
Trichloroethene	MW-12	10/20/2020		1.54	1.00	ug/L
Vinyl Chloride	MW-12	10/27/2011		1.46	1.00	ug/L
Vinyl Chloride	MW-12	4/16/2013		2.51	1.00	ug/L
Vinyl Chloride	MW-12	10/28/2013		2.15	1.00	ug/L
Vinyl Chloride	MW-12	4/24/2014		2.70	1.00	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
Vinyl Chloride	MW-12	10/06/2014		2.36	1.00	ug/L
Vinyl Chloride	MW-12	4/21/2015		2.03	1.00	ug/L
Vinyl Chloride	MW-12	10/05/2015		2.59	1.00	ug/L
Vinyl Chloride	MW-12	4/26/2016		2.73	1.00	ug/L
Vinyl Chloride	MW-12	10/05/2016		4.56	1.00	ug/L
Vinyl Chloride	MW-12	4/04/2017		3.29	1.00	ug/L
Vinyl Chloride	MW-12	10/10/2017		5.18	1.00	ug/L
Vinyl Chloride	MW-12	4/11/2018		4.48	1.00	ug/L
Vinyl Chloride	MW-12	10/30/2018		9.14	1.00	ug/L
Vinyl Chloride	MW-12	4/01/2019		8.96	1.00	ug/L
Vinyl Chloride	MW-12	10/08/2019		6.50	1.00	ug/L
Vinyl Chloride	MW-12	4/20/2020		4.90	1.00	ug/L
Vinyl Chloride	MW-12	10/20/2020		5.41	1.00	ug/L
Vinyl Chloride	MW-12	4/26/2021		3.57	1.00	ug/L
Vinyl Chloride	MW-12	8/16/2021		4.08	1.00	ug/L
Vinyl Chloride	MW-12	6/01/2022		1.56	1.00	ug/L
Vinyl Chloride	MW-12	10/03/2022		7.15	1.00	ug/L
Vinyl Chloride	MW-12	5/03/2023		4.19	1.00	ug/L
Vinyl Chloride	MW-12	10/11/2023		3.56	1.00	ug/L
Vinyl Chloride	MW-12	5/02/2024		4.30	1.00	ug/L
Vinyl Chloride	MW-12	10/29/2024		5.48	1.00	ug/L
cis-1,2-Dichloroethene	MW-13	10/27/2011		5.56	1.00	ug/L
1,1,1-Trichloroethane	MW-14	10/10/1996		4.20	1.00	ug/L
1,1,1-Trichloroethane	MW-14	1/21/1997		3.30	1.00	ug/L
1,1,1-Trichloroethane	MW-14	10/12/2004		1.79	1.00	ug/L
1,1,1-Trichloroethane	MW-14	4/26/2005		1.42	1.00	ug/L
1,1,1-Trichloroethane	MW-14	10/11/2005		1.29	1.00	ug/L
1,1,1-Trichloroethane	MW-14	10/05/2006		1.13	1.00	ug/L
1,1,1-Trichloroethane	MW-14	4/23/2007		1.24	1.00	ug/L
1,1,1-Trichloroethane	MW-14	10/09/2007		1.04	1.00	ug/L
1,2-Dichloroethane	MW-14	10/04/1997		.41	.40	ug/L
1,2-Dichloroethane	MW-14	10/19/1998		.54	.40	ug/L
1,2-Dichloroethane	MW-14	4/30/1999		1.10	1.00	ug/L
1,2-Dichloroethane	MW-14	4/25/2001		.40	.40	ug/L
1,2-Dichloroethane	MW-14	10/23/2001		.50	.40	ug/L
1,2-Dichloropropane	MW-14	4/04/2017		1.08	1.00	ug/L
1,2-Dichloropropane	MW-14	10/10/2017		1.42	1.00	ug/L
1,2-Dichloropropane	MW-14	4/11/2018		1.13	1.00	ug/L
1,2-Dichloropropane	MW-14	10/20/2020		1.17	1.00	ug/L
1,2-Dichloropropane	MW-14	4/26/2021		1.03	1.00	ug/L
1,2-Dichloropropane	MW-14	8/16/2021		1.55	1.00	ug/L
Benzene	MW-14	4/30/2004		2.690	.500	ug/L
Benzene	MW-14	10/01/2010		.530	.500	ug/L
Benzene	MW-14	4/07/2011		.620	.500	ug/L
Benzene	MW-14	10/27/2011		.560	.500	ug/L
Benzene	MW-14	4/23/2012		.610	.500	ug/L
Benzene	MW-14	4/04/2017		.644	.500	ug/L
Benzene	MW-14	10/10/2017		.781	.500	ug/L
Benzene	MW-14	4/11/2018		.592	.500	ug/L
Benzene	MW-14	4/01/2019		.561	.500	ug/L
Benzene	MW-14	10/08/2019		.627	.500	ug/L
Benzene	MW-14	4/20/2020		.628	.500	ug/L
Benzene	MW-14	10/20/2020		.713	.500	ug/L
Benzene	MW-14	5/02/2024		.678	.500	ug/L
Benzene	MW-14	10/29/2024		.531	.500	ug/L
cis-1,2-Dichloroethene	MW-14	10/27/2011		49.8	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/16/2013		19.2	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/28/2013		52.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/24/2014		42.2	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/06/2014		34.7	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/21/2015		27.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/05/2015		34.7	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/26/2016		11.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/05/2016		29.1	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/04/2017		49.6	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/10/2017		69.2	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/11/2018		59.8	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/30/2018		21.4	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/01/2019		45.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/08/2019		54.4	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/20/2020		63.6	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/20/2020		73.2	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	4/26/2021		56.1	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	8/16/2021		74.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	6/01/2022		33.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	5/03/2023		36.6	1.0	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
cis-1,2-Dichloroethene	MW-14	10/11/2023		41.6	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	5/02/2024		49.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-14	10/29/2024		39.0	1.0	ug/L
Methylene Chloride	MW-14	10/27/2011		7.72	1.00	ug/L
Methylene Chloride	MW-14	10/28/2013		7.93	1.00	ug/L
Methylene Chloride	MW-14	4/24/2014		7.85	1.00	ug/L
Methylene Chloride	MW-14	10/06/2014		6.97	1.00	ug/L
Methylene Chloride	MW-14	10/05/2015		7.07	1.00	ug/L
Methylene Chloride	MW-14	10/05/2016		10.20	1.00	ug/L
Trichloroethene	MW-14	7/12/1996		3.10	1.00	ug/L
Trichloroethene	MW-14	1/21/1997		1.20	1.00	ug/L
Trichloroethene	MW-14	4/17/1997		1.50	1.00	ug/L
Trichloroethene	MW-14	10/04/1997		1.30	1.00	ug/L
Trichloroethene	MW-14	4/22/1998		1.10	1.00	ug/L
Trichloroethene	MW-14	10/19/1998		1.60	1.00	ug/L
Trichloroethene	MW-14	4/30/1999		2.10	1.00	ug/L
Trichloroethene	MW-14	9/01/1999		1.40	1.00	ug/L
Trichloroethene	MW-14	4/12/2000		1.70	1.00	ug/L
Trichloroethene	MW-14	4/25/2001		1.10	1.00	ug/L
Trichloroethene	MW-14	10/23/2001		1.10	1.00	ug/L
Trichloroethene	MW-14	4/28/2002		1.10	1.00	ug/L
Trichloroethene	MW-14	4/30/2004		4.25	1.00	ug/L
Trichloroethene	MW-14	10/05/2009		1.10	1.00	ug/L
Trichloroethene	MW-14	10/01/2010		1.09	1.00	ug/L
Trichloroethene	MW-14	4/07/2011		1.43	1.00	ug/L
Trichloroethene	MW-14	10/27/2011		1.40	1.00	ug/L
Trichloroethene	MW-14	4/23/2012		3.52	1.00	ug/L
Trichloroethene	MW-14	10/23/2012		2.10	1.00	ug/L
Trichloroethene	MW-14	10/28/2013		1.75	1.00	ug/L
Trichloroethene	MW-14	4/24/2014		1.14	1.00	ug/L
Trichloroethene	MW-14	4/11/2018		1.13	1.00	ug/L
cis-1,2-Dichloroethene	MW-16	5/08/2024		8.66	1.00	ug/L
Tetrachloroethene	MW-16	8/16/2021		1.00	1.00	ug/L
Tetrachloroethene	MW-16	5/08/2024		1.55	1.00	ug/L
1,1,1-Trichloroethane	MW-17	4/30/2004		1.44	1.00	ug/L
1,2-Dichloroethane	MW-7	7/12/1996		10.60	1.00	ug/L
1,2-Dichloroethane	MW-7	10/10/1996		16.60	1.00	ug/L
1,2-Dichloroethane	MW-7	10/11/2023		1.29	1.00	ug/L
1,2-Dichloroethane	MW-7	5/08/2024		1.85	1.00	ug/L
1,2-Dichloropropane	MW-7	10/27/2011		7.44	1.00	ug/L
1,2-Dichloropropane	MW-7	4/16/2013		10.10	1.00	ug/L
1,2-Dichloropropane	MW-7	10/28/2013		10.60	1.00	ug/L
1,2-Dichloropropane	MW-7	4/24/2014		10.80	1.00	ug/L
1,2-Dichloropropane	MW-7	10/06/2014		8.45	1.00	ug/L
1,2-Dichloropropane	MW-7	4/21/2015		9.46	1.00	ug/L
1,2-Dichloropropane	MW-7	10/05/2015		11.20	1.00	ug/L
1,2-Dichloropropane	MW-7	4/26/2016		8.86	1.00	ug/L
1,2-Dichloropropane	MW-7	10/05/2016		3.19	1.00	ug/L
1,2-Dichloropropane	MW-7	4/04/2017		6.16	1.00	ug/L
1,2-Dichloropropane	MW-7	10/10/2017		9.31	1.00	ug/L
1,2-Dichloropropane	MW-7	4/11/2018		9.81	1.00	ug/L
1,2-Dichloropropane	MW-7	10/30/2018		8.62	1.00	ug/L
1,2-Dichloropropane	MW-7	4/01/2019		5.10	1.00	ug/L
1,2-Dichloropropane	MW-7	10/08/2019		7.25	1.00	ug/L
1,2-Dichloropropane	MW-7	4/20/2020		10.00	1.00	ug/L
1,2-Dichloropropane	MW-7	10/20/2020		9.41	1.00	ug/L
1,2-Dichloropropane	MW-7	4/26/2021		7.34	1.00	ug/L
1,2-Dichloropropane	MW-7	8/16/2021		13.50	1.00	ug/L
1,2-Dichloropropane	MW-7	6/01/2022		10.60	1.00	ug/L
1,2-Dichloropropane	MW-7	10/03/2022		11.80	1.00	ug/L
1,2-Dichloropropane	MW-7	5/03/2023		12.50	1.00	ug/L
1,2-Dichloropropane	MW-7	10/11/2023		12.90	1.00	ug/L
1,2-Dichloropropane	MW-7	5/08/2024		12.50	1.00	ug/L
1,2-Dichloropropane	MW-7	10/29/2024		5.70	1.00	ug/L
Benzene	MW-7	10/04/1997		.750	.500	ug/L
Benzene	MW-7	4/22/1998		.740	.500	ug/L
Benzene	MW-7	10/19/1998		.810	.500	ug/L
Benzene	MW-7	4/30/1999		.800	.500	ug/L
Benzene	MW-7	4/12/2000		.800	.500	ug/L
Benzene	MW-7	4/25/2001		.600	.500	ug/L
Benzene	MW-7	10/23/2001		1.000	1.000	ug/L
Benzene	MW-7	4/28/2002		.500	.500	ug/L
Benzene	MW-7	10/07/2003		.560	.500	ug/L
Benzene	MW-7	4/30/2004		.600	.500	ug/L
Benzene	MW-7	10/12/2004		.660	.500	ug/L
Benzene	MW-7	10/05/2006		.540	.500	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
Benzene	MW-7	4/23/2007		.830	.500	ug/L
Benzene	MW-7	10/09/2007		1.110	1.000	ug/L
Benzene	MW-7	4/07/2008		.724	.500	ug/L
Benzene	MW-7	10/14/2008		1.010	1.000	ug/L
Benzene	MW-7	4/07/2009		.680	.500	ug/L
Benzene	MW-7	10/05/2009		1.420	1.000	ug/L
Benzene	MW-7	4/01/2010		2.040	.500	ug/L
Benzene	MW-7	10/01/2010		2.050	.500	ug/L
Benzene	MW-7	4/07/2011		2.160	.500	ug/L
Benzene	MW-7	10/27/2011		1.760	1.000	ug/L
Benzene	MW-7	4/23/2012		2.660	.500	ug/L
Benzene	MW-7	10/23/2012		1.660	1.000	ug/L
Benzene	MW-7	4/16/2013		2.170	.500	ug/L
Benzene	MW-7	10/28/2013		1.230	1.000	ug/L
Benzene	MW-7	4/24/2014		.549	.500	ug/L
Benzene	MW-7	10/06/2014		.913	.500	ug/L
Benzene	MW-7	4/21/2015		.694	.500	ug/L
Benzene	MW-7	10/05/2015		.721	.500	ug/L
Benzene	MW-7	4/26/2016		.674	.500	ug/L
Benzene	MW-7	4/04/2017		.662	.500	ug/L
Benzene	MW-7	10/10/2017		1.220	1.000	ug/L
Benzene	MW-7	4/11/2018		.958	.500	ug/L
Benzene	MW-7	10/30/2018		.896	.500	ug/L
Benzene	MW-7	4/01/2019		.580	.500	ug/L
Benzene	MW-7	10/08/2019		.655	.500	ug/L
Benzene	MW-7	4/20/2020		.813	.500	ug/L
Benzene	MW-7	10/20/2020		.949	.500	ug/L
Benzene	MW-7	8/16/2021		.783	.500	ug/L
Benzene	MW-7	5/03/2023		.716	.500	ug/L
Benzene	MW-7	10/11/2023		.878	.500	ug/L
Benzene	MW-7	5/08/2024		.879	.500	ug/L
Benzene	MW-7	10/29/2024		.759	.500	ug/L
cis-1,2-Dichloroethene	MW-7	10/27/2011		88.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/16/2013		159.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/28/2013		145.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/24/2014		132.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/06/2014		138.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/21/2015		159.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/05/2015		160.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/26/2016		128.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/05/2016		46.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/04/2017		112.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/10/2017		158.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/11/2018		152.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/30/2018		113.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/01/2019		66.3	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/08/2019		117.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/20/2020		193.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/20/2020		198.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	4/26/2021		112.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	8/16/2021		240.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	6/01/2022		147.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/03/2022		168.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	5/03/2023		174.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/11/2023		203.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	5/08/2024		216.0	1.0	ug/L
cis-1,2-Dichloroethene	MW-7	10/29/2024		131.0	1.0	ug/L
Tetrachloroethene	MW-7	10/27/2011		10.30	1.00	ug/L
Tetrachloroethene	MW-7	4/16/2013		10.60	1.00	ug/L
Tetrachloroethene	MW-7	10/28/2013		4.45	1.00	ug/L
Tetrachloroethene	MW-7	10/06/2014		9.50	1.00	ug/L
Tetrachloroethene	MW-7	4/21/2015		1.62	1.00	ug/L
Tetrachloroethene	MW-7	10/05/2015		7.31	1.00	ug/L
Tetrachloroethene	MW-7	4/26/2016		4.25	1.00	ug/L
Tetrachloroethene	MW-7	10/05/2016		3.22	1.00	ug/L
Tetrachloroethene	MW-7	4/04/2017		3.87	1.00	ug/L
Tetrachloroethene	MW-7	10/10/2017		3.75	1.00	ug/L
Tetrachloroethene	MW-7	4/11/2018		3.15	1.00	ug/L
Tetrachloroethene	MW-7	10/30/2018		2.12	1.00	ug/L
Tetrachloroethene	MW-7	4/01/2019		2.85	1.00	ug/L
Tetrachloroethene	MW-7	10/08/2019		1.23	1.00	ug/L
Tetrachloroethene	MW-7	4/20/2020		1.90	1.00	ug/L
Tetrachloroethene	MW-7	4/26/2021		1.66	1.00	ug/L
Tetrachloroethene	MW-7	8/16/2021		5.30	1.00	ug/L
Tetrachloroethene	MW-7	6/01/2022		2.89	1.00	ug/L
Tetrachloroethene	MW-7	10/03/2022		2.69	1.00	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
Tetrachloroethene	MW-7	5/03/2023		2.67	1.00	ug/L
Tetrachloroethene	MW-7	10/11/2023		1.75	1.00	ug/L
Tetrachloroethene	MW-7	5/08/2024		1.61	1.00	ug/L
Trichloroethene	MW-7	7/12/1996		4.70	1.00	ug/L
Trichloroethene	MW-7	10/10/1996		5.10	1.00	ug/L
Trichloroethene	MW-7	1/21/1997		6.60	1.00	ug/L
Trichloroethene	MW-7	4/17/1997		12.20	1.00	ug/L
Trichloroethene	MW-7	10/04/1997		9.80	1.00	ug/L
Trichloroethene	MW-7	4/22/1998		10.90	1.00	ug/L
Trichloroethene	MW-7	10/19/1998		8.20	1.00	ug/L
Trichloroethene	MW-7	4/30/1999		12.50	1.00	ug/L
Trichloroethene	MW-7	9/01/1999		8.20	1.00	ug/L
Trichloroethene	MW-7	4/12/2000		8.40	1.00	ug/L
Trichloroethene	MW-7	10/17/2000		6.40	1.00	ug/L
Trichloroethene	MW-7	4/25/2001		8.40	1.00	ug/L
Trichloroethene	MW-7	10/23/2001		10.70	1.00	ug/L
Trichloroethene	MW-7	4/28/2002		12.00	1.00	ug/L
Trichloroethene	MW-7	10/06/2002		13.40	1.00	ug/L
Trichloroethene	MW-7	4/03/2003		10.40	1.00	ug/L
Trichloroethene	MW-7	10/07/2003		10.70	1.00	ug/L
Trichloroethene	MW-7	4/30/2004		11.00	1.00	ug/L
Trichloroethene	MW-7	10/12/2004		7.40	1.00	ug/L
Trichloroethene	MW-7	4/26/2005		3.60	1.00	ug/L
Trichloroethene	MW-7	10/11/2005		2.94	1.00	ug/L
Trichloroethene	MW-7	4/26/2006		5.97	1.00	ug/L
Trichloroethene	MW-7	10/05/2006		7.26	1.00	ug/L
Trichloroethene	MW-7	4/23/2007		11.00	1.00	ug/L
Trichloroethene	MW-7	10/09/2007		13.40	1.00	ug/L
Trichloroethene	MW-7	4/07/2008		11.20	1.00	ug/L
Trichloroethene	MW-7	10/14/2008		12.80	1.00	ug/L
Trichloroethene	MW-7	4/07/2009		11.40	1.00	ug/L
Trichloroethene	MW-7	10/05/2009		37.50	1.00	ug/L
Trichloroethene	MW-7	4/01/2010		27.20	1.00	ug/L
Trichloroethene	MW-7	10/01/2010		16.90	1.00	ug/L
Trichloroethene	MW-7	4/07/2011		28.90	1.00	ug/L
Trichloroethene	MW-7	10/27/2011		15.40	1.00	ug/L
Trichloroethene	MW-7	4/23/2012		27.40	1.00	ug/L
Trichloroethene	MW-7	10/23/2012		24.00	1.00	ug/L
Trichloroethene	MW-7	4/16/2013		12.70	1.00	ug/L
Trichloroethene	MW-7	10/28/2013		9.17	1.00	ug/L
Trichloroethene	MW-7	4/24/2014		9.48	1.00	ug/L
Trichloroethene	MW-7	10/06/2014		6.83	1.00	ug/L
Trichloroethene	MW-7	4/21/2015		16.40	1.00	ug/L
Trichloroethene	MW-7	10/05/2015		7.02	1.00	ug/L
Trichloroethene	MW-7	4/26/2016		11.70	1.00	ug/L
Trichloroethene	MW-7	10/05/2016		3.16	1.00	ug/L
Trichloroethene	MW-7	4/04/2017		6.44	1.00	ug/L
Trichloroethene	MW-7	10/10/2017		9.98	1.00	ug/L
Trichloroethene	MW-7	4/11/2018		11.10	1.00	ug/L
Trichloroethene	MW-7	10/30/2018		10.30	1.00	ug/L
Trichloroethene	MW-7	4/01/2019		5.36	1.00	ug/L
Trichloroethene	MW-7	10/08/2019		6.71	1.00	ug/L
Trichloroethene	MW-7	4/20/2020		20.40	1.00	ug/L
Trichloroethene	MW-7	10/20/2020		17.30	1.00	ug/L
Trichloroethene	MW-7	4/26/2021		10.00	1.00	ug/L
Trichloroethene	MW-7	8/16/2021		12.30	1.00	ug/L
Trichloroethene	MW-7	6/01/2022		7.03	1.00	ug/L
Trichloroethene	MW-7	10/03/2022		6.27	1.00	ug/L
Trichloroethene	MW-7	5/03/2023		7.50	1.00	ug/L
Trichloroethene	MW-7	10/11/2023		9.37	1.00	ug/L
Trichloroethene	MW-7	5/08/2024		15.00	1.00	ug/L
Trichloroethene	MW-7	10/29/2024		7.81	1.00	ug/L
Vinyl Chloride	MW-7	10/28/2013		1.45	1.00	ug/L
Vinyl Chloride	MW-7	10/06/2014		1.56	1.00	ug/L
Vinyl Chloride	MW-7	4/21/2015		1.26	1.00	ug/L
Vinyl Chloride	MW-7	10/05/2015		1.24	1.00	ug/L
Vinyl Chloride	MW-7	4/26/2016		1.58	1.00	ug/L
Vinyl Chloride	MW-7	4/04/2017		1.15	1.00	ug/L
Vinyl Chloride	MW-7	10/10/2017		1.81	1.00	ug/L
Vinyl Chloride	MW-7	4/11/2018		1.87	1.00	ug/L
Vinyl Chloride	MW-7	10/30/2018		1.98	1.00	ug/L
Vinyl Chloride	MW-7	10/08/2019		1.45	1.00	ug/L
Vinyl Chloride	MW-7	4/20/2020		3.15	1.00	ug/L
Vinyl Chloride	MW-7	10/20/2020		3.48	1.00	ug/L
Vinyl Chloride	MW-7	4/26/2021		1.02	1.00	ug/L
Vinyl Chloride	MW-7	8/16/2021		2.84	1.00	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
Vinyl Chloride	MW-7	6/01/2022		1.47	1.00	ug/L
Vinyl Chloride	MW-7	10/03/2022		1.38	1.00	ug/L
Vinyl Chloride	MW-7	5/03/2023		3.11	1.00	ug/L
Vinyl Chloride	MW-7	10/11/2023		4.28	1.00	ug/L
Vinyl Chloride	MW-7	5/08/2024		5.77	1.00	ug/L
Vinyl Chloride	MW-7	10/29/2024		9.39	1.00	ug/L
1,1-Dichloroethene	MW-8	10/10/1996		14.2	1.0	ug/L
1,2-Dichloroethane	MW-8	10/10/1996		3.00	1.00	ug/L
1,2-Dichloroethane	MW-8	1/21/1997		2.80	1.00	ug/L
1,2-Dichloroethane	MW-8	7/15/1997		2.80	1.00	ug/L
1,2-Dichloroethane	MW-8	10/04/1997		2.80	1.00	ug/L
1,2-Dichloroethane	MW-8	4/22/1998		3.30	1.00	ug/L
1,2-Dichloroethane	MW-8	10/19/1998		2.60	1.00	ug/L
1,2-Dichloroethane	MW-8	4/30/1999		3.40	1.00	ug/L
1,2-Dichloroethane	MW-8	9/01/1999		2.30	1.00	ug/L
1,2-Dichloroethane	MW-8	4/12/2000		3.00	1.00	ug/L
1,2-Dichloroethane	MW-8	10/17/2000		2.10	1.00	ug/L
1,2-Dichloroethane	MW-8	4/25/2001		2.70	1.00	ug/L
1,2-Dichloroethane	MW-8	10/23/2001		2.30	1.00	ug/L
1,2-Dichloroethane	MW-8	4/28/2002		1.90	1.00	ug/L
1,2-Dichloroethane	MW-8	10/06/2002		1.61	1.00	ug/L
1,2-Dichloroethane	MW-8	10/07/2003		1.55	1.00	ug/L
1,2-Dichloroethane	MW-8	4/30/2004		1.39	1.00	ug/L
1,2-Dichloroethane	MW-8	10/12/2004		1.21	1.00	ug/L
1,2-Dichloroethane	MW-8	4/26/2005		1.30	1.00	ug/L
1,2-Dichloroethane	MW-8	10/11/2005		1.97	1.00	ug/L
1,2-Dichloroethane	MW-8	4/26/2006		1.93	1.00	ug/L
1,2-Dichloroethane	MW-8	10/05/2006		1.83	1.00	ug/L
1,2-Dichloroethane	MW-8	4/23/2007		1.67	1.00	ug/L
1,2-Dichloroethane	MW-8	10/09/2007		1.86	1.00	ug/L
1,2-Dichloroethane	MW-8	4/07/2008		1.48	1.00	ug/L
1,2-Dichloroethane	MW-8	10/14/2008		1.35	1.00	ug/L
1,2-Dichloroethane	MW-8	4/07/2009		1.24	1.00	ug/L
1,2-Dichloroethane	MW-8	10/05/2009		1.34	1.00	ug/L
1,2-Dichloroethane	MW-8	4/01/2010		1.05	1.00	ug/L
1,2-Dichloropropane	MW-8	10/27/2011		1.46	1.00	ug/L
1,2-Dichloropropane	MW-8	4/16/2013		1.62	1.00	ug/L
1,2-Dichloropropane	MW-8	10/28/2013		1.44	1.00	ug/L
1,2-Dichloropropane	MW-8	4/24/2014		1.35	1.00	ug/L
1,2-Dichloropropane	MW-8	10/06/2014		1.17	1.00	ug/L
1,2-Dichloropropane	MW-8	4/21/2015		1.27	1.00	ug/L
1,2-Dichloropropane	MW-8	10/05/2015		1.30	1.00	ug/L
1,2-Dichloropropane	MW-8	4/04/2017		1.32	1.00	ug/L
1,2-Dichloropropane	MW-8	10/10/2017		1.65	1.00	ug/L
1,2-Dichloropropane	MW-8	4/11/2018		1.43	1.00	ug/L
1,2-Dichloropropane	MW-8	10/30/2018		1.27	1.00	ug/L
1,2-Dichloropropane	MW-8	4/01/2019		1.21	1.00	ug/L
1,2-Dichloropropane	MW-8	10/08/2019		1.57	1.00	ug/L
1,2-Dichloropropane	MW-8	5/28/2020		1.43	1.00	ug/L
1,2-Dichloropropane	MW-8	10/20/2020		1.29	1.00	ug/L
1,2-Dichloropropane	MW-8	4/26/2021		1.26	1.00	ug/L
1,2-Dichloropropane	MW-8	8/16/2021		1.52	1.00	ug/L
1,2-Dichloropropane	MW-8	6/01/2022		1.21	1.00	ug/L
1,2-Dichloropropane	MW-8	10/03/2022		1.01	1.00	ug/L
1,2-Dichloropropane	MW-8	5/03/2023		1.16	1.00	ug/L
Benzene	MW-8	10/10/1996		2.800	.500	ug/L
Benzene	MW-8	1/21/1997		2.200	.500	ug/L
Benzene	MW-8	7/15/1997		1.200	1.000	ug/L
Benzene	MW-8	10/04/1997		1.530	1.000	ug/L
Benzene	MW-8	4/22/1998		1.100	1.000	ug/L
Benzene	MW-8	10/19/1998		1.300	1.000	ug/L
Benzene	MW-8	4/30/1999		1.300	1.000	ug/L
Benzene	MW-8	9/01/1999		1.000	1.000	ug/L
Benzene	MW-8	4/12/2000		.720	.500	ug/L
Benzene	MW-8	10/17/2000		.950	.500	ug/L
Benzene	MW-8	4/03/2003		.800	.500	ug/L
Benzene	MW-8	10/11/2005		.550	.500	ug/L
Benzene	MW-8	4/26/2006		1.080	1.000	ug/L
Benzene	MW-8	10/05/2006		.940	.500	ug/L
Benzene	MW-8	10/09/2007		1.240	1.000	ug/L
Benzene	MW-8	4/07/2008		1.610	1.000	ug/L
Benzene	MW-8	10/14/2008		1.460	1.000	ug/L
Benzene	MW-8	4/07/2009		.560	.500	ug/L
Benzene	MW-8	10/05/2009		.860	.500	ug/L
Benzene	MW-8	4/07/2011		1.090	1.000	ug/L
Benzene	MW-8	10/27/2011		1.040	1.000	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
Benzene	MW-8	4/23/2012		.840	.500	ug/L
Benzene	MW-8	10/23/2012		.710	.500	ug/L
Benzene	MW-8	10/05/2016		.801	.500	ug/L
Benzene	MW-8	4/04/2017		.794	.500	ug/L
Benzene	MW-8	10/10/2017		.701	.500	ug/L
Benzene	MW-8	4/01/2019		.632	.500	ug/L
Benzene	MW-8	10/08/2019		.858	.500	ug/L
cis-1,2-Dichloroethene	MW-8	10/27/2011		104.00	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/16/2013		85.70	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/28/2013		53.80	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/24/2014		69.30	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/06/2014		54.30	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/21/2015		72.00	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/05/2015		84.50	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/26/2016		60.40	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/05/2016		84.70	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/04/2017		91.90	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/10/2017		100.00	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/11/2018		80.80	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/30/2018		82.60	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/01/2019		75.70	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/08/2019		85.80	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/20/2020		1.21	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	5/28/2020		57.10	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/20/2020		76.40	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	4/26/2021		61.20	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	8/16/2021		85.90	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	6/01/2022		59.40	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/03/2022		50.20	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	5/03/2023		53.80	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/11/2023		45.70	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	5/08/2024		57.10	1.00	ug/L
cis-1,2-Dichloroethene	MW-8	10/29/2024		14.80	1.00	ug/L
Trichloroethene	MW-8	10/10/1996		21.40	1.00	ug/L
Trichloroethene	MW-8	1/21/1997		20.80	1.00	ug/L
Trichloroethene	MW-8	4/17/1997		18.60	1.00	ug/L
Trichloroethene	MW-8	7/15/1997		17.10	1.00	ug/L
Trichloroethene	MW-8	10/04/1997		15.60	1.00	ug/L
Trichloroethene	MW-8	4/22/1998		16.40	1.00	ug/L
Trichloroethene	MW-8	10/19/1998		16.10	1.00	ug/L
Trichloroethene	MW-8	4/30/1999		14.10	1.00	ug/L
Trichloroethene	MW-8	9/01/1999		11.80	1.00	ug/L
Trichloroethene	MW-8	4/12/2000		9.80	1.00	ug/L
Trichloroethene	MW-8	10/17/2000		9.80	1.00	ug/L
Trichloroethene	MW-8	4/25/2001		7.80	1.00	ug/L
Trichloroethene	MW-8	10/23/2001		7.30	1.00	ug/L
Trichloroethene	MW-8	4/28/2002		6.40	1.00	ug/L
Trichloroethene	MW-8	10/06/2002		7.00	1.00	ug/L
Trichloroethene	MW-8	4/03/2003		9.50	1.00	ug/L
Trichloroethene	MW-8	10/07/2003		5.02	1.00	ug/L
Trichloroethene	MW-8	4/30/2004		5.97	1.00	ug/L
Trichloroethene	MW-8	10/12/2004		4.06	1.00	ug/L
Trichloroethene	MW-8	4/26/2005		3.61	1.00	ug/L
Trichloroethene	MW-8	10/11/2005		3.29	1.00	ug/L
Trichloroethene	MW-8	4/26/2006		1.46	1.00	ug/L
Trichloroethene	MW-8	10/05/2006		2.61	1.00	ug/L
Trichloroethene	MW-8	4/23/2007		1.73	1.00	ug/L
Trichloroethene	MW-8	10/09/2007		2.47	1.00	ug/L
Trichloroethene	MW-8	4/07/2008		1.91	1.00	ug/L
Trichloroethene	MW-8	10/14/2008		2.13	1.00	ug/L
Trichloroethene	MW-8	4/07/2009		1.91	1.00	ug/L
Trichloroethene	MW-8	10/05/2009		2.16	1.00	ug/L
Trichloroethene	MW-8	4/01/2010		1.08	1.00	ug/L
Trichloroethene	MW-8	10/01/2010		1.12	1.00	ug/L
Trichloroethene	MW-8	4/07/2011		1.17	1.00	ug/L
Trichloroethene	MW-8	10/27/2011		1.07	1.00	ug/L
Trichloroethene	MW-8	10/23/2012		1.59	1.00	ug/L
Trichloroethene	MW-8	4/16/2013		1.87	1.00	ug/L
Trichloroethene	MW-8	5/03/2023		1.13	1.00	ug/L
Vinyl Chloride	MW-8	10/27/2011		3.73	1.00	ug/L
Vinyl Chloride	MW-8	4/16/2013		1.90	1.00	ug/L
Vinyl Chloride	MW-8	4/26/2016		1.06	1.00	ug/L
Vinyl Chloride	MW-8	10/05/2016		2.86	1.00	ug/L
Vinyl Chloride	MW-8	4/04/2017		3.73	1.00	ug/L
Vinyl Chloride	MW-8	10/10/2017		3.83	1.00	ug/L
Vinyl Chloride	MW-8	4/11/2018		2.74	1.00	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Table 1

Historical Volatile Organic Compound Detections

Constituent	Well	Date	Identifier	Result	Limit	Units
Vinyl Chloride	MW-8	10/30/2018		2.18	1.00	ug/L
Vinyl Chloride	MW-8	4/01/2019		5.33	1.00	ug/L
Vinyl Chloride	MW-8	10/08/2019		7.13	1.00	ug/L
Vinyl Chloride	MW-8	5/28/2020		1.73	1.00	ug/L
Vinyl Chloride	MW-8	10/20/2020		3.25	1.00	ug/L
Vinyl Chloride	MW-8	4/26/2021		2.16	1.00	ug/L
Vinyl Chloride	MW-8	8/16/2021		2.40	1.00	ug/L
Vinyl Chloride	MW-8	6/01/2022		2.72	1.00	ug/L
Vinyl Chloride	MW-8	10/03/2022		1.62	1.00	ug/L
Vinyl Chloride	MW-8	5/03/2023		2.16	1.00	ug/L
Vinyl Chloride	MW-8	10/11/2023		1.03	1.00	ug/L
Vinyl Chloride	MW-8	5/08/2024		1.51	1.00	ug/L
1,2-Dichloroethane	MW-9	10/10/1996		.55	.40	ug/L
1,2-Dichloroethane	MW-9	10/04/1997		.54	.40	ug/L
1,2-Dichloroethane	MW-9	10/19/1998		.40	.40	ug/L
1,2-Dichloroethane	MW-9	4/30/1999		.47	.40	ug/L
cis-1,2-Dichloroethene	MW-9	10/27/2011		2.70	1.00	ug/L
cis-1,2-Dichloroethene	MW-9	4/26/2016		1.69	1.00	ug/L
cis-1,2-Dichloroethene	MW-9	4/04/2017		1.09	1.00	ug/L
cis-1,2-Dichloroethene	MW-9	10/30/2018		1.99	1.00	ug/L

Detections are shown for the constituents and sample points selected for the analysis
The Limit column refers to the laboratory reporting limit

Attachment D

Assessment Statistics on Verified VOCs
First Semi-Annual Monitoring Event in 2024

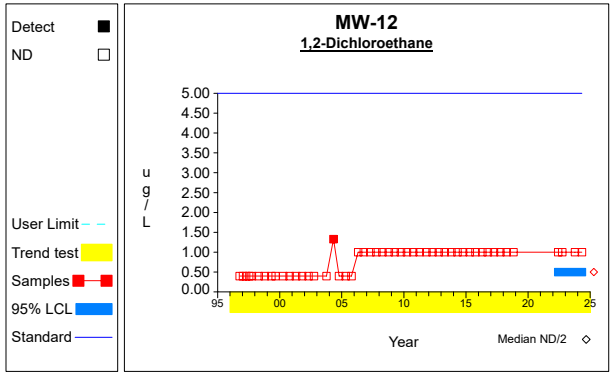
Table 1

Confidence Intervals for Comparing the Mean of the Last 4 Measurements to an Assessment Monitoring Standard

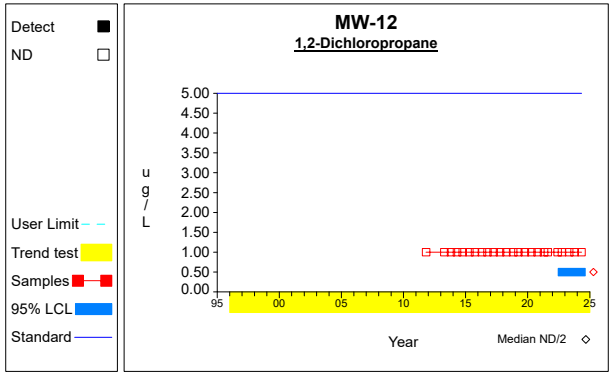
Constituent	Units	Well	N	Mean	SD	Factor	95% LCL	95% UCL	Standard	Trend	
1,2-Dichloroethane	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000		
1,2-Dichloropropane	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000		
Benzene	ug/L	MW-12	4	1.270	0.135	1.176	1.111	1.429	5.000	dec	
cis-1,2-Dichloroethene	ug/L	MW-12	4	32.725	1.721	1.176	30.700	34.750	70.000		
Tetrachloroethene	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000		
Trichloroethene	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000	dec	
Vinyl Chloride	ug/L	MW-12	4	4.800	1.600	1.176	2.918	6.682	2.000		**
1,2-Dichloroethane	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
1,2-Dichloropropane	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
Benzene	ug/L	MW-14	4	0.357	0.214	1.176	0.105	0.609	5.000		
cis-1,2-Dichloroethene	ug/L	MW-14	4	40.200	6.960	1.176	32.013	48.387	70.000		
Tetrachloroethene	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
Trichloroethene	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
Vinyl Chloride	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	2.000		
1,2-Dichloroethane	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	5.000		
1,2-Dichloropropane	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	5.000		
Benzene	ug/L	MW-16	4	0.250	0.000	1.176	0.250	0.250	5.000		
cis-1,2-Dichloroethene	ug/L	MW-16	4	2.540	4.080	1.176	0.000	7.339	70.000		
Tetrachloroethene	ug/L	MW-16	4	0.763	0.525	1.176	0.145	1.380	5.000		
Trichloroethene	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	5.000		
Vinyl Chloride	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	2.000		
1,2-Dichloroethane	ug/L	MW-7	4	1.035	0.659	1.176	0.260	1.810	5.000		
1,2-Dichloropropane	ug/L	MW-7	4	12.425	0.457	1.176	11.887	12.963	5.000		**
Benzene	ug/L	MW-7	4	0.681	0.297	1.176	0.331	1.030	5.000		
cis-1,2-Dichloroethene	ug/L	MW-7	4	190.250	22.984	1.176	163.215	217.285	70.000		**
Tetrachloroethene	ug/L	MW-7	4	2.180	0.580	1.176	1.497	2.863	5.000	dec	
Trichloroethene	ug/L	MW-7	4	9.535	3.860	1.176	4.995	14.075	5.000		
Vinyl Chloride	ug/L	MW-7	4	3.635	1.856	1.176	1.452	5.818	2.000	inc	
1,2-Dichloroethane	ug/L	MW-8	4	0.500	0.000	1.176	0.500	0.500	5.000	dec	
1,2-Dichloropropane	ug/L	MW-8	4	0.793	0.343	1.176	0.389	1.196	5.000		
Benzene	ug/L	MW-8	4	0.250	0.000	1.176	0.250	0.250	5.000		
cis-1,2-Dichloroethene	ug/L	MW-8	4	51.700	4.893	1.176	45.945	57.455	70.000		
Tetrachloroethene	ug/L	MW-8	4	0.500	0.000	1.176	0.500	0.500	5.000		
Trichloroethene	ug/L	MW-8	4	0.658	0.315	1.176	0.287	1.028	5.000	dec	
Vinyl Chloride	ug/L	MW-8	4	1.580	0.464	1.176	1.034	2.126	2.000		

* - Insufficient Data
** - Significant Exceedance
LCL = Lower Confidence Limit
UCL = Upper Confidence Limit

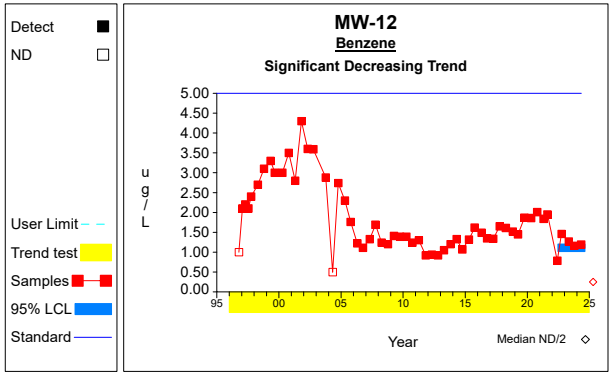
Confidence Limits (Assessment)



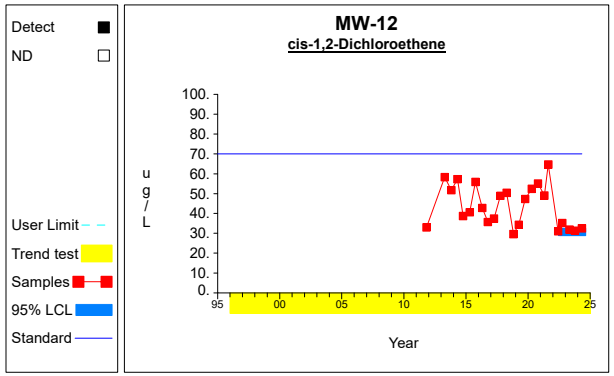
Graph 1



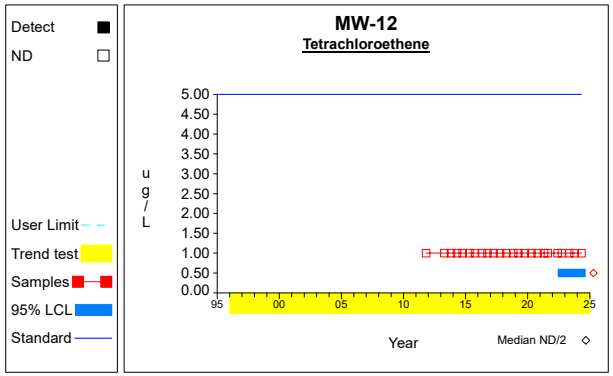
Graph 2



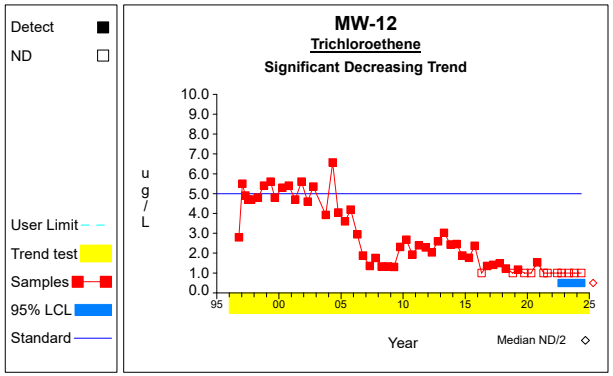
Graph 3



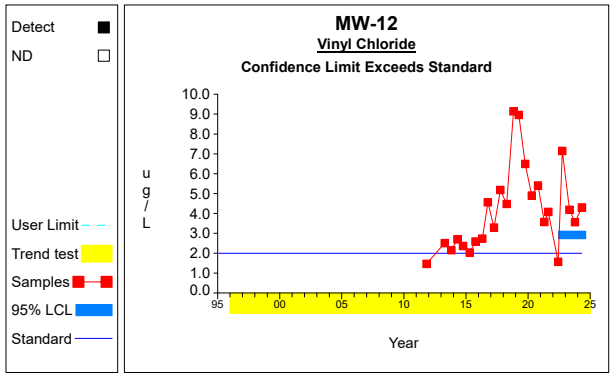
Graph 4



Graph 5

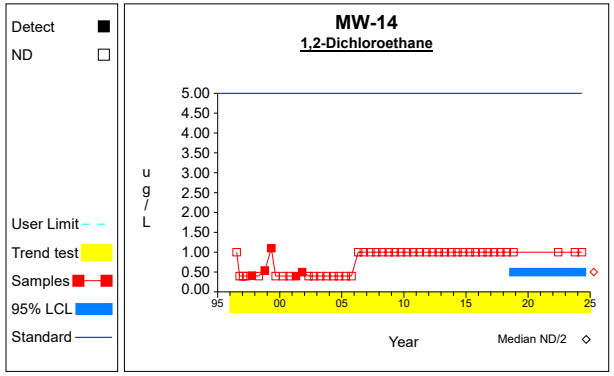


Graph 6

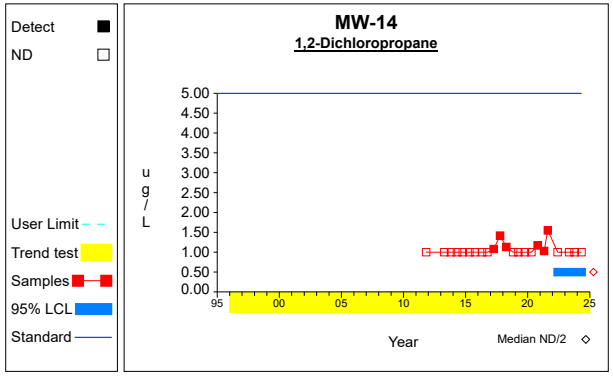


Graph 7

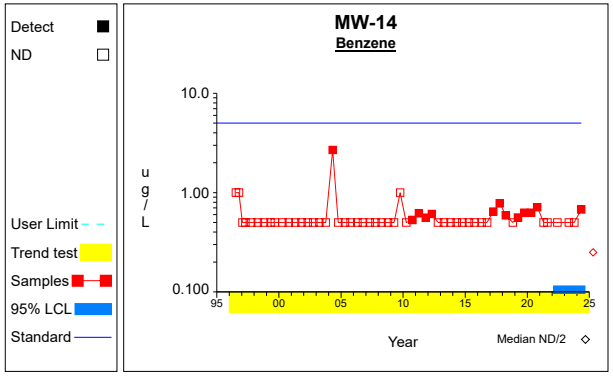
Confidence Limits (Assessment)



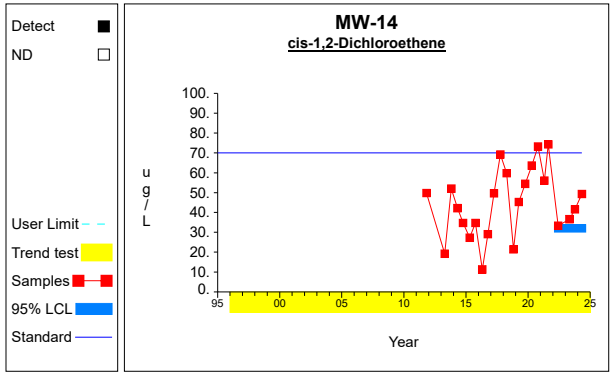
Graph 8



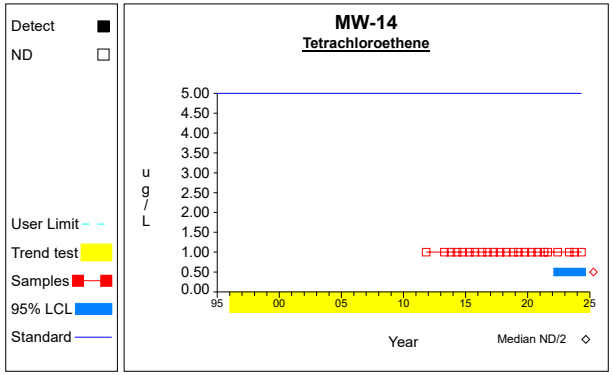
Graph 9



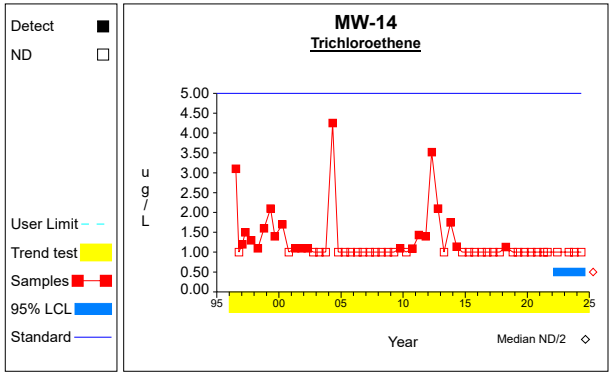
Graph 10



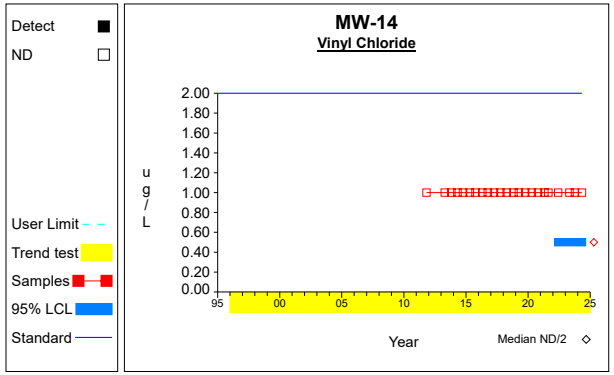
Graph 11



Graph 12

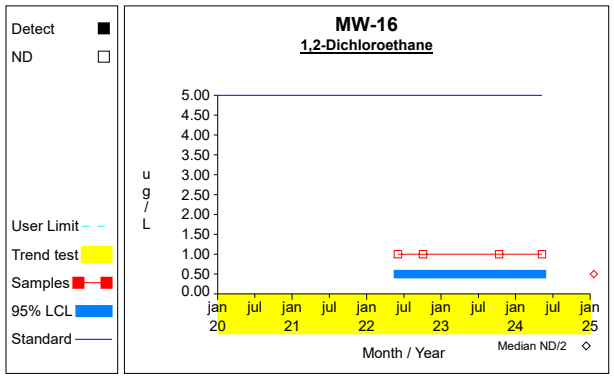


Graph 13

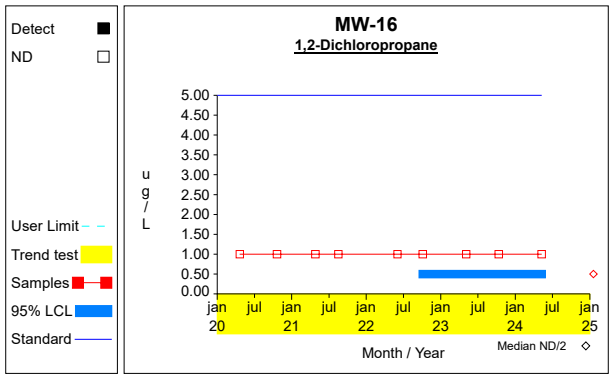


Graph 14

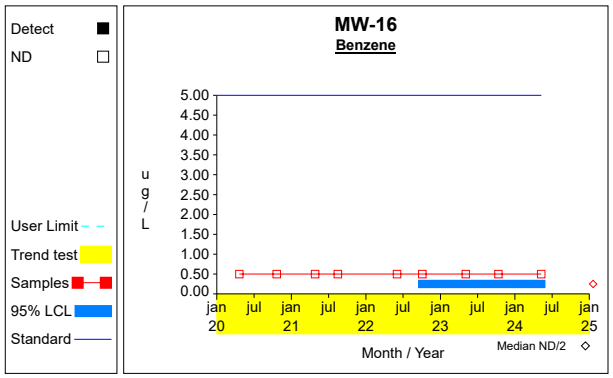
Confidence Limits (Assessment)



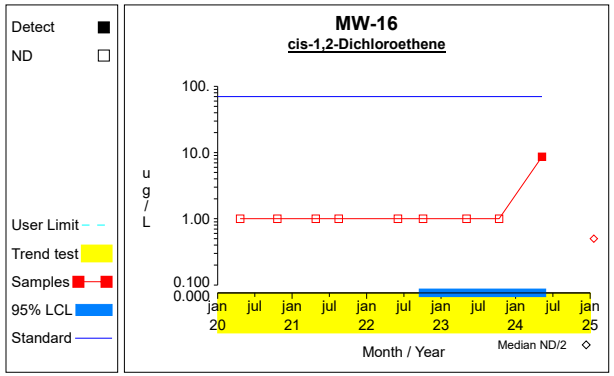
Graph 15



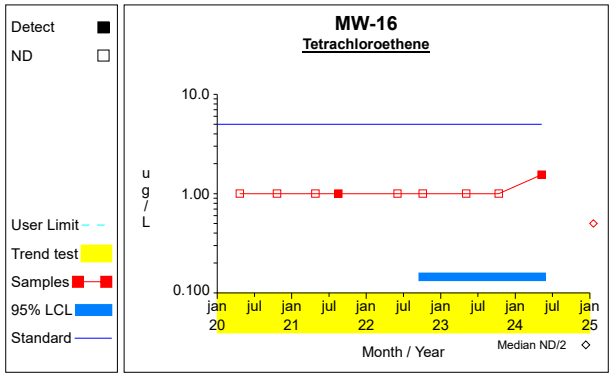
Graph 16



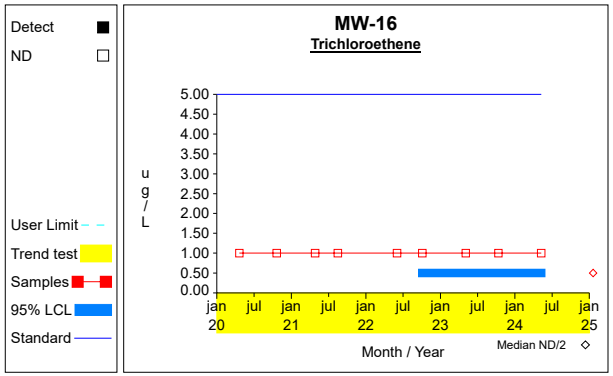
Graph 17



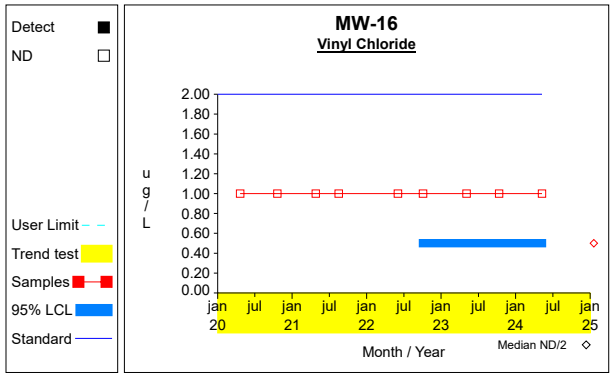
Graph 18



Graph 19

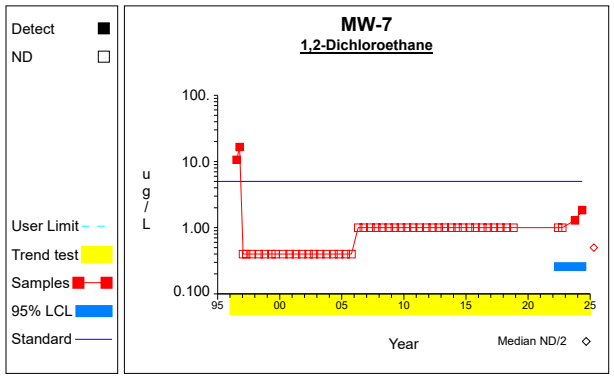


Graph 20

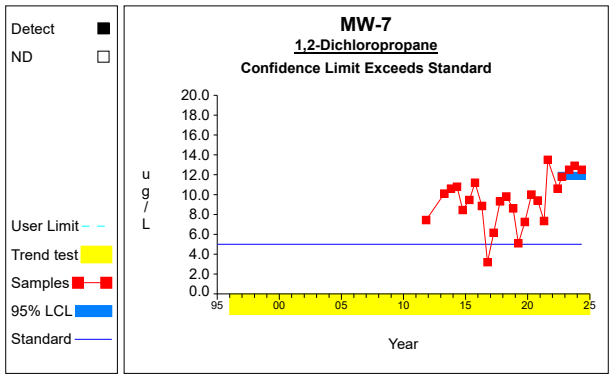


Graph 21

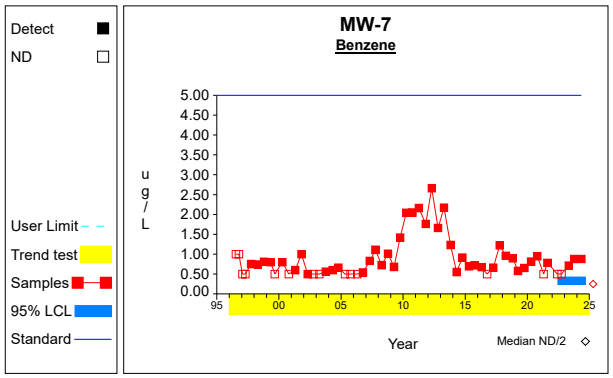
Confidence Limits (Assessment)



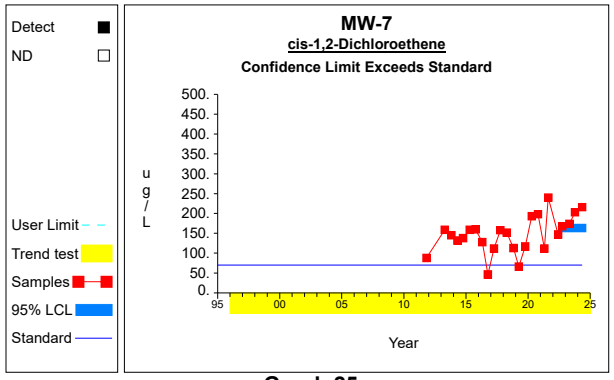
Graph 22



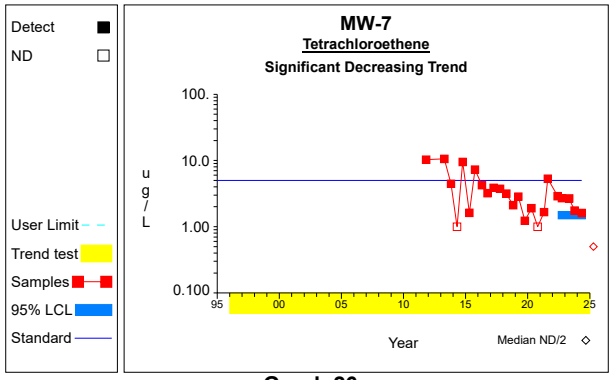
Graph 23



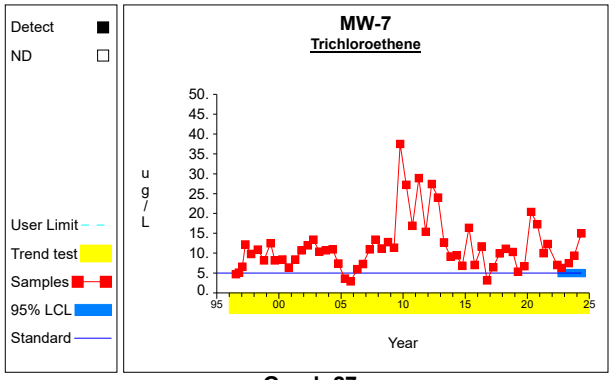
Graph 24



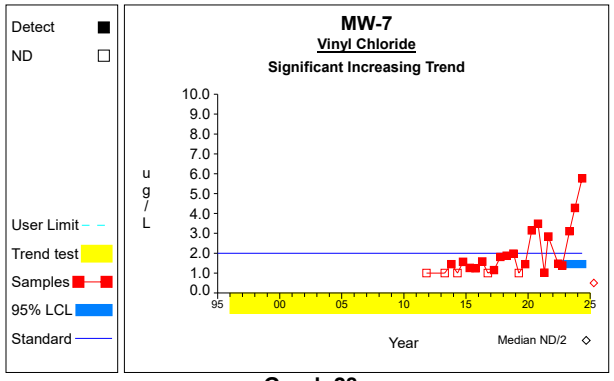
Graph 25



Graph 26

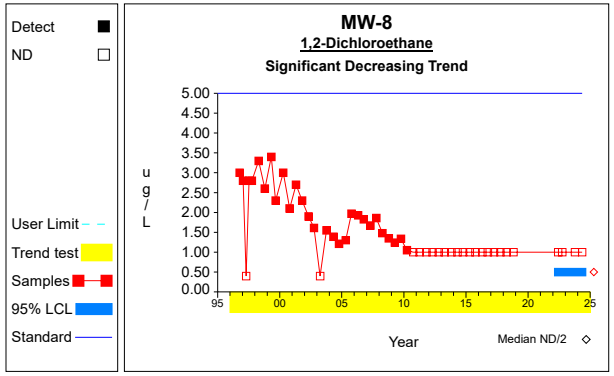


Graph 27

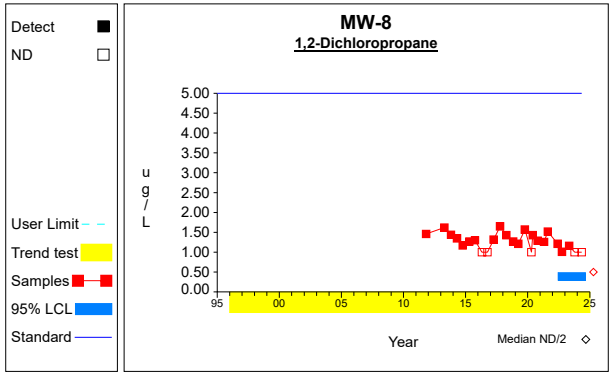


Graph 28

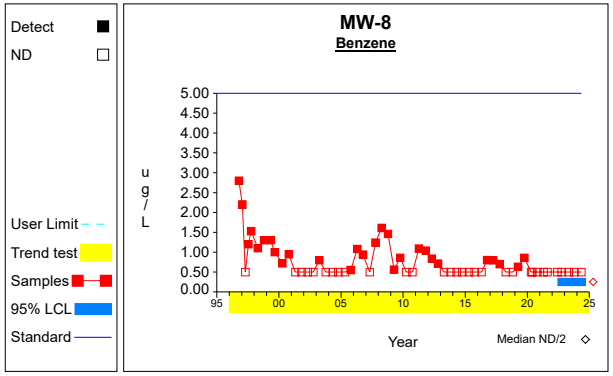
Confidence Limits (Assessment)



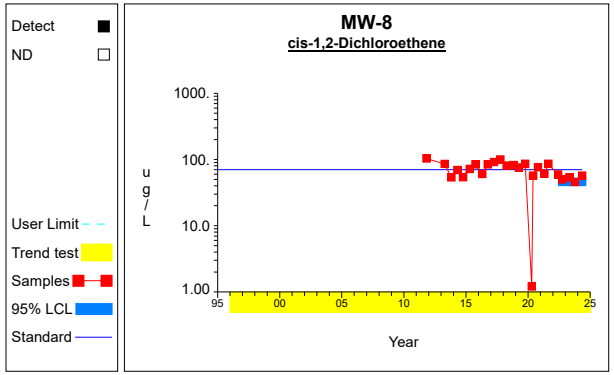
Graph 29



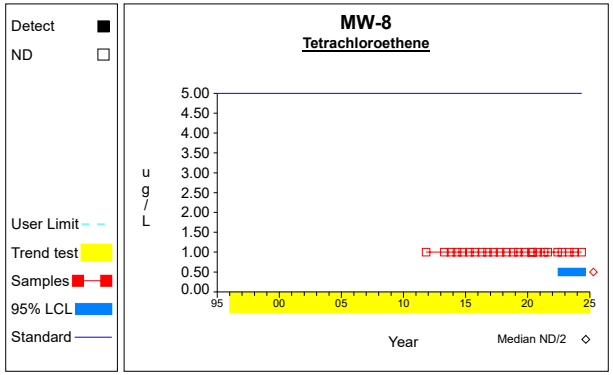
Graph 30



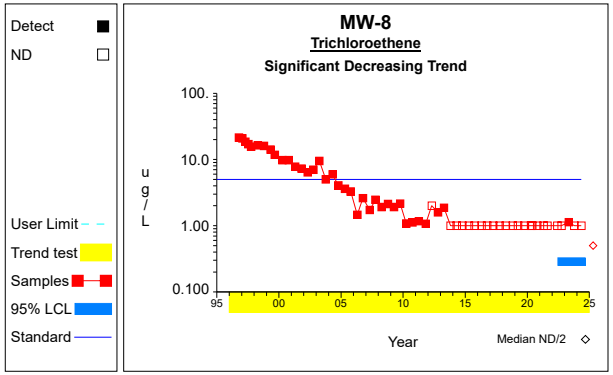
Graph 31



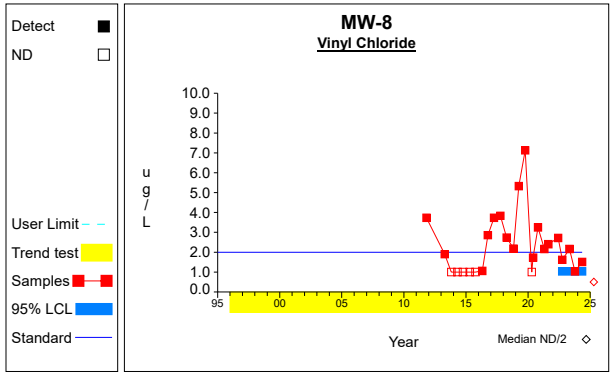
Graph 32



Graph 33



Graph 34



Graph 35

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **50** * (**50**-1) / 2 = **1225**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **833.0**	Variance estimate for slope.
8	M(S) = (**N**' ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1225** ± **2.576** * **833.0**^{½}) / 2 = [**575.326**, **649.674**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **0.0**^{½}) / 2 = [**138.0**, **138.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **5.08** / **4** = **1.27**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**6.506** - **25.806**/**4**) / (**4**-1))^{½} = **0.135**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **1.27** - **2.353** * **0.135**/**4**^{½} = **1.111**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **1.27** + **2.353** * **0.135**/**4**^{½} = **1.429**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **57** * (**57**-1) / 2 = **1596**	Number of sample pairs during trend detection period.
6	S = **-0.039**	Sen's estimator of trend.
7	var(S) = **21094.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1596** ± **2.576** * **21094.667**^{½}) / 2 = [**610.931**, **985.069**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.075**, **-0.003**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **130.9** / **4** = **32.725**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**4292.59** - **17134.81**/**4**) / (**4**-1))^{½} = **1.721**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **32.725** - **2.353** * **1.721**/**4**^{½} = **30.7**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **32.725** + **2.353** * **1.721**/**4**^{½} = **34.75**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **-0.826**	Sen's estimator of trend.
7	var(S) = **1625.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **1625.333**^{½}) / 2 = [**86.074**, **189.926**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-2.745**, **1.092**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **0.0**^{½}) / 2 = [**138.0**, **138.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **57** * (**57**-1) / 2 = **1596**	Number of sample pairs during trend detection period.
6	S = **-0.184**	Sen's estimator of trend.
7	var(S) = **20928.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1596** ± **2.576** * **20928.0**^{½}) / 2 = [**611.671**, **984.329**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.214**, **-0.152**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **19.2** / **4** = **4.8**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**99.842** - **368.64**/**4**) / (**4**-1))^{½} = **1.6**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **4.8** - **2.353** * **1.6**/**4**^{½} = **2.918**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **4.8** + **2.353** * **1.6**/**4**^{½} = **6.682**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.225**	Sen's estimator of trend.
7	var(S) = **1625.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **1625.333**^{½}) / 2 = [**86.074**, **189.926**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.028**, **0.56**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **50** * (**50**-1) / 2 = **1225**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **3136.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1225** ± **2.576** * **3136.667**^{½}) / 2 = [**540.364**, **684.636**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **23** * (**23**-1) / 2 = **253**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **844.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**253** ± **2.576** * **844.333**^{½}) / 2 = [**89.074**, **163.926**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **1.428** / **4** = **0.357**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**0.647** - **2.039**/**4**) / (**4**-1))^{½} = **0.214**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.357** - **2.353** * **0.214**/**4**^{½} = **0.105**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.357** + **2.353** * **0.214**/**4**^{½} = **0.609**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **57** * (**57**-1) / 2 = **1596**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **11327.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1596** ± **2.576** * **11327.333**^{½}) / 2 = [**660.918**, **935.082**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **160.8** / **4** = **40.2**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**6609.5** - **25856.64**/**4**) / (**4**-1))^{½} = **6.96**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **40.2** - **2.353** * **6.96**/**4**^{½} = **32.013**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **40.2** + **2.353** * **6.96**/**4**^{½} = **48.387**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **23** * (**23**-1) / 2 = **253**	Number of sample pairs during trend detection period.
6	S = **1.688**	Sen's estimator of trend.
7	var(S) = **1432.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**253** ± **2.576** * **1432.667**^{½}) / 2 = [**77.748**, **175.252**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-1.633**, **5.105**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **23** * (**23**-1) / 2 = **253**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**253** ± **2.576** * **0.0**^{½}) / 2 = [**126.5**, **126.5**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **57** * (**57**-1) / 2 = **1596**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **16125.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1596** ± **2.576** * **16125.667**^{½}) / 2 = [**634.441**, **961.559**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.032**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **23** * (**23**-1) / 2 = **253**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**253** ± **2.576** * **0.0**^{½}) / 2 = [**126.5**, **126.5**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **4** * (**4**-1) / 2 = **6**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**6** ± **2.576** * **0.0**^{½}) / 2 = [**3.0**, **3.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **9** * (**9**-1) / 2 = **36**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**36** ± **2.576** * **0.0**^{½}) / 2 = [**18.0**, **18.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **1.0** / **4** = **0.25**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**0.25** - **1.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.25** - **2.353** * **0.0**/**4**^{½} = **0.25**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.25** + **2.353** * **0.0**/**4**^{½} = **0.25**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **9** * (**9**-1) / 2 = **36**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**36** ± **2.576** * **0.0**^{½}) / 2 = [**18.0**, **18.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **10.16** / **4** = **2.54**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**75.746** - **103.226**/**4**) / (**4**-1))^{½} = **4.08**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **2.54** - **2.353** * **4.08**/**4**^{½} = **0.0**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **2.54** + **2.353** * **4.08**/**4**^{½} = **7.339**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **9** * (**9**-1) / 2 = **36**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **26.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**36** ± **2.576** * **26.667**^{½}) / 2 = [**11.349**, **24.651**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **3.05** / **4** = **0.763**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**3.153** - **9.303**/**4**) / (**4**-1))^{½} = **0.525**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.763** - **2.353** * **0.525**/**4**^{½} = **0.145**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.763** + **2.353** * **0.525**/**4**^{½} = **1.38**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **9** * (**9**-1) / 2 = **36**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **47.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**36** ± **2.576** * **47.667**^{½}) / 2 = [**9.108**, **26.892**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.253**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **9** * (**9**-1) / 2 = **36**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**36** ± **2.576** * **0.0**^{½}) / 2 = [**18.0**, **18.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **9** * (**9**-1) / 2 = **36**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**36** ± **2.576** * **0.0**^{½}) / 2 = [**18.0**, **18.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **4.14** / **4** = **1.035**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**5.587** - **17.14**/**4**) / (**4**-1))^{½} = **0.659**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **1.035** - **2.353** * **0.659**/**4**^{½} = **0.26**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **1.035** + **2.353** * **0.659**/**4**^{½} = **1.81**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **51** * (**51**-1) / 2 = **1275**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **3267.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1275** ± **2.576** * **3267.333**^{½}) / 2 = [**563.877**, **711.123**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **49.7** / **4** = **12.425**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**618.15** - **2470.09**/**4**) / (**4**-1))^{½} = **0.457**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **12.425** - **2.353** * **0.457**/**4**^{½} = **11.887**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **12.425** + **2.353** * **0.457**/**4**^{½} = **12.963**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.286**	Sen's estimator of trend.
7	var(S) = **1623.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **1623.333**^{½}) / 2 = [**86.106**, **189.894**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.168**, **0.68**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.723** / **4** = **0.681**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.119** - **7.415**/**4**) / (**4**-1))^{½} = **0.297**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.681** - **2.353** * **0.297**/**4**^{½} = **0.331**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.681** + **2.353** * **0.297**/**4**^{½} = **1.03**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **58** * (**58**-1) / 2 = **1653**	Number of sample pairs during trend detection period.
6	S = **0.011**	Sen's estimator of trend.
7	var(S) = **21813.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1653** ± **2.576** * **21813.333**^{½}) / 2 = [**636.271**, **1016.729**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.029**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **761.0** / **4** = **190.25**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**146365.0** - **579121.0**/**4**) / (**4**-1))^{½} = **22.984**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **190.25** - **2.353** * **22.984**/**4**^{½} = **163.215**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **190.25** + **2.353** * **22.984**/**4**^{½} = **217.285**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **5.754**	Sen's estimator of trend.
7	var(S) = **1623.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **1623.333**^{½}) / 2 = [**86.106**, **189.894**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-1.394**, **13.169**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **8.72** / **4** = **2.18**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**20.02** - **76.038**/**4**) / (**4**-1))^{½} = **0.58**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **2.18** - **2.353** * **0.58**/**4**^{½} = **1.497**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **2.18** + **2.353** * **0.58**/**4**^{½} = **2.863**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **-0.358**	Sen's estimator of trend.
7	var(S) = **1624.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **1624.333**^{½}) / 2 = [**86.09**, **189.91**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.843**, **-0.072**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **38.14** / **4** = **9.535**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**408.36** - **1454.66**/**4**) / (**4**-1))^{½} = **3.86**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **9.535** - **2.353** * **3.86**/**4**^{½} = **4.995**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **9.535** + **2.353** * **3.86**/**4**^{½} = **14.075**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **58** * (**58**-1) / 2 = **1653**	Number of sample pairs during trend detection period.
6	S = **0.077**	Sen's estimator of trend.
7	var(S) = **22218.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1653** ± **2.576** * **22218.667**^{½}) / 2 = [**634.512**, **1018.488**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.101**, **0.275**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **14.54** / **4** = **3.635**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**63.188** - **211.412**/**4**) / (**4**-1))^{½} = **1.856**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **3.635** - **2.353** * **1.856**/**4**^{½} = **1.452**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **3.635** + **2.353** * **1.856**/**4**^{½} = **5.818**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.238**	Sen's estimator of trend.
7	var(S) = **1607.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **1607.667**^{½}) / 2 = [**86.357**, **189.643**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.052**, **0.384**]	Two-sided confidence interval for slope.
10	LCL(S) > 0	**Significant increasing trend.**

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **51** * (**51**-1) / 2 = **1275**	Number of sample pairs during trend detection period.
6	S = **-0.106**	Sen's estimator of trend.
7	var(S) = **13719.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1275** ± **2.576** * **13719.0**^{½}) / 2 = [**486.639**, **788.361**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.13**, **-0.078**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **3.17** / **4** = **0.793**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.866** - **10.049**/**4**) / (**4**-1))^{½} = **0.343**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.793** - **2.353** * **0.343**/**4**^{½} = **0.389**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.793** + **2.353** * **0.343**/**4**^{½} = **1.196**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **-0.028**	Sen's estimator of trend.
7	var(S) = **1813.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1813.667**^{½}) / 2 = [**95.148**, **204.852**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.093**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **1.0** / **4** = **0.25**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**0.25** - **1.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.25** - **2.353** * **0.0**/**4**^{½} = **0.25**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.25** + **2.353** * **0.0**/**4**^{½} = **0.25**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **59** * (**59**-1) / 2 = **1711**	Number of sample pairs during trend detection period.
6	S = **-0.017**	Sen's estimator of trend.
7	var(S) = **19921.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1711** ± **2.576** * **19921.0**^{½}) / 2 = [**673.709**, **1037.291**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.043**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **206.8** / **4** = **51.7**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**10763.38** - **42766.24**/**4**) / (**4**-1))^{½} = **4.893**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **51.7** - **2.353** * **4.893**/**4**^{½} = **45.945**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **51.7** + **2.353** * **4.893**/**4**^{½} = **57.455**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **-2.278**	Sen's estimator of trend.
7	var(S) = **1831.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1831.333**^{½}) / 2 = [**94.881**, **205.119**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-5.441**, **0.456**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **0.0**^{½}) / 2 = [**150.0**, **150.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.63** / **4** = **0.658**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.027** - **6.917**/**4**) / (**4**-1))^{½} = **0.315**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.658** - **2.353** * **0.315**/**4**^{½} = **0.287**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.658** + **2.353** * **0.315**/**4**^{½} = **1.028**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **59** * (**59**-1) / 2 = **1711**	Number of sample pairs during trend detection period.
6	S = **-0.397**	Sen's estimator of trend.
7	var(S) = **21948.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1711** ± **2.576** * **21948.0**^{½}) / 2 = [**664.685**, **1046.315**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.61**, **-0.233**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **6.32** / **4** = **1.58**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**10.631** - **39.942**/**4**) / (**4**-1))^{½} = **0.464**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **1.58** - **2.353** * **0.464**/**4**^{½} = **1.034**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **1.58** + **2.353** * **0.464**/**4**^{½} = **2.126**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **0.041**	Sen's estimator of trend.
7	var(S) = **1803.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1803.0**^{½}) / 2 = [**95.309**, **204.691**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.195**, **0.275**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Attachment E

Summary Tables and Graphs for the Interwell Comparisons
Second Semi-Annual Monitoring Event in 2024

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Ammonia as N	mg/L	MW-17	11/10/1997	ND	0.2000		
Ammonia as N	mg/L	MW-17	01/08/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/22/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	07/01/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/19/1998	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/30/1999	ND	0.2000		
Ammonia as N	mg/L	MW-17	09/01/1999	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/12/2000	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/17/2000	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/25/2001	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/23/2001	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/28/2002	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/06/2002	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/03/2003	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/07/2003	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/30/2004	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/12/2004	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2005	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/11/2005	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2006	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2006	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/23/2007	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/09/2007	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/07/2008	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/14/2008	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/07/2009	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2009	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/01/2010	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/01/2010	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/07/2011	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/27/2011	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/23/2012	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/23/2012	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/16/2013	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/28/2013	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/24/2014	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/06/2014	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/21/2015	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2015	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2016	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/05/2016	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/04/2017	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/10/2017	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/11/2018	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/30/2018	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/01/2019	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/08/2019	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/20/2020	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/20/2020	ND	0.2000		
Ammonia as N	mg/L	MW-17	04/26/2021	ND	0.2000		
Ammonia as N	mg/L	MW-17	08/16/2021	ND	0.2000		
Ammonia as N	mg/L	MW-17	06/01/2022	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/03/2022	ND	0.2000		
Ammonia as N	mg/L	MW-17	05/03/2023	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/11/2023	ND	0.2000		
Ammonia as N	mg/L	MW-17	05/08/2024	ND	0.2000		
Ammonia as N	mg/L	MW-17	10/29/2024	ND	0.2000		
Chemical Oxygen Demand	mg/L	MW-17	11/10/1997	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	01/08/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/22/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	07/01/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/19/1998	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/30/1999	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	09/01/1999	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/12/2000	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/17/2000	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/25/2001	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/23/2001	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/28/2002	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/06/2002		11.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/03/2003		7.5000		
Chemical Oxygen Demand	mg/L	MW-17	10/07/2003	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/30/2004	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/12/2004	ND	5.0000		

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Chemical Oxygen Demand	mg/L	MW-17	04/26/2005	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/11/2005	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/26/2006	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2006		8.4000		
Chemical Oxygen Demand	mg/L	MW-17	04/23/2007		10.6000		
Chemical Oxygen Demand	mg/L	MW-17	10/09/2007	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/07/2008	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/14/2008	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/07/2009	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2009	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/01/2010	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/01/2010	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/07/2011	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/27/2011		14.3000		
Chemical Oxygen Demand	mg/L	MW-17	04/23/2012	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/23/2012	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/16/2013	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/28/2013	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/24/2014	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/06/2014	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/21/2015	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2015	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/26/2016	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/05/2016	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/04/2017	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/10/2017	ND	25.0000	5.0000	**
Chemical Oxygen Demand	mg/L	MW-17	04/11/2018	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/30/2018	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/01/2019		5.3600		
Chemical Oxygen Demand	mg/L	MW-17	10/08/2019	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	04/20/2020	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/20/2020		5.3000		
Chemical Oxygen Demand	mg/L	MW-17	04/26/2021		7.4000		
Chemical Oxygen Demand	mg/L	MW-17	08/16/2021		5.7300		
Chemical Oxygen Demand	mg/L	MW-17	06/01/2022		21.2000		
Chemical Oxygen Demand	mg/L	MW-17	10/03/2022	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	05/03/2023		10.8000		
Chemical Oxygen Demand	mg/L	MW-17	10/11/2023		7.4500		
Chemical Oxygen Demand	mg/L	MW-17	05/08/2024	ND	5.0000		
Chemical Oxygen Demand	mg/L	MW-17	10/29/2024		11.9000		
Chloride	mg/L	MW-17	11/10/1997	ND	5.0000		
Chloride	mg/L	MW-17	01/08/1998	ND	5.0000		
Chloride	mg/L	MW-17	04/22/1998	ND	5.0000		
Chloride	mg/L	MW-17	07/01/1998		7.3000		
Chloride	mg/L	MW-17	10/19/1998	ND	5.0000		
Chloride	mg/L	MW-17	04/30/1999	ND	5.0000		
Chloride	mg/L	MW-17	09/01/1999	ND	5.0000		
Chloride	mg/L	MW-17	04/12/2000	ND	5.0000		
Chloride	mg/L	MW-17	10/17/2000	ND	5.0000		
Chloride	mg/L	MW-17	04/25/2001	ND	5.0000		
Chloride	mg/L	MW-17	10/23/2001	ND	5.0000		
Chloride	mg/L	MW-17	04/28/2002	ND	5.0000		
Chloride	mg/L	MW-17	10/06/2002	ND	5.0000		
Chloride	mg/L	MW-17	04/03/2003	ND	5.0000		
Chloride	mg/L	MW-17	10/07/2003	ND	5.0000		
Chloride	mg/L	MW-17	04/30/2004	ND	5.0000		
Chloride	mg/L	MW-17	10/12/2004	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2005	ND	5.0000		
Chloride	mg/L	MW-17	10/11/2005	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2006	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2006	ND	5.0000		
Chloride	mg/L	MW-17	04/23/2007	ND	5.0000		
Chloride	mg/L	MW-17	10/09/2007	ND	5.0000		
Chloride	mg/L	MW-17	04/07/2008	ND	5.0000		
Chloride	mg/L	MW-17	10/14/2008	ND	5.0000		
Chloride	mg/L	MW-17	04/07/2009	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2009	ND	5.0000		
Chloride	mg/L	MW-17	04/01/2010	ND	5.0000		
Chloride	mg/L	MW-17	10/01/2010	ND	5.0000		
Chloride	mg/L	MW-17	04/07/2011	ND	5.0000		
Chloride	mg/L	MW-17	10/27/2011	ND	5.0000		
Chloride	mg/L	MW-17	04/23/2012	ND	5.0000		
Chloride	mg/L	MW-17	10/23/2012	ND	5.0000		
Chloride	mg/L	MW-17	04/16/2013	ND	2.0000	5.0000	**

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Chloride	mg/L	MW-17	10/28/2013	ND	5.0000		
Chloride	mg/L	MW-17	04/24/2014		1.6500		
Chloride	mg/L	MW-17	10/06/2014		1.6600		
Chloride	mg/L	MW-17	04/21/2015	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2015	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2016	ND	5.0000		
Chloride	mg/L	MW-17	10/05/2016	ND	5.0000		
Chloride	mg/L	MW-17	04/04/2017	ND	5.0000		
Chloride	mg/L	MW-17	10/10/2017	ND	5.0000		
Chloride	mg/L	MW-17	04/11/2018	ND	5.0000		
Chloride	mg/L	MW-17	10/30/2018		6.4700		
Chloride	mg/L	MW-17	04/01/2019	ND	5.0000		
Chloride	mg/L	MW-17	10/08/2019	ND	5.0000		
Chloride	mg/L	MW-17	04/20/2020	ND	5.0000		
Chloride	mg/L	MW-17	10/20/2020	ND	5.0000		
Chloride	mg/L	MW-17	04/26/2021	ND	5.0000		
Chloride	mg/L	MW-17	08/16/2021	ND	5.0000		
Chloride	mg/L	MW-17	06/01/2022	ND	5.0000		
Chloride	mg/L	MW-17	10/03/2022	ND	5.0000		
Chloride	mg/L	MW-17	05/03/2023	ND	5.0000		
Chloride	mg/L	MW-17	10/11/2023	ND	5.0000		
Chloride	mg/L	MW-17	05/08/2024	ND	5.0000		
Chloride	mg/L	MW-17	10/29/2024	ND	5.0000		
Iron, Dissolved	ug/L	MW-17	11/10/1997	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	01/08/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/22/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	07/01/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/19/1998	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/30/1999	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	09/01/1999	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/12/2000	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/17/2000	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/25/2001	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/23/2001	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/28/2002	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/06/2002	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/03/2003	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/07/2003	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/30/2004	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/12/2004	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/26/2005	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/11/2005	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/26/2006	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2006	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/23/2007	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/09/2007	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/07/2008	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/14/2008	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/07/2009	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2009	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/01/2010	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/01/2010	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/07/2011	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/27/2011	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/23/2012	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/23/2012	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/16/2013	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/28/2013	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/24/2014	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/06/2014	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/21/2015	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2015	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/26/2016	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	10/05/2016	ND	100.0000		
Iron, Dissolved	ug/L	MW-17	04/04/2017	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/10/2017	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/11/2018	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/30/2018	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/01/2019	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/08/2019	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/20/2020	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/20/2020	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	04/26/2021	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	08/16/2021	ND	500.0000	100.0000	**

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Iron, Dissolved	ug/L	MW-17	06/01/2022	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/03/2022	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	05/03/2023	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/11/2023	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	05/08/2024	ND	500.0000	100.0000	**
Iron, Dissolved	ug/L	MW-17	10/29/2024	ND	500.0000	100.0000	**
pH	S.U.	MW-17	04/22/1998		7.0000		
pH	S.U.	MW-17	07/01/1998		7.0000		
pH	S.U.	MW-17	10/19/1998		6.8000		
pH	S.U.	MW-17	04/30/1999		6.8000		
pH	S.U.	MW-17	09/01/1999		6.8000		
pH	S.U.	MW-17	04/12/2000		7.0000		
pH	S.U.	MW-17	10/17/2000		5.1000		
pH	S.U.	MW-17	04/25/2001		7.5000		
pH	S.U.	MW-17	10/23/2001		7.5000		
pH	S.U.	MW-17	04/28/2002		6.9000		
pH	S.U.	MW-17	10/06/2002		7.4000		
pH	S.U.	MW-17	04/03/2003		7.3000		
pH	S.U.	MW-17	10/07/2003		7.6000		
pH	S.U.	MW-17	04/30/2004		6.9000		
pH	S.U.	MW-17	10/12/2004		7.2000		
pH	S.U.	MW-17	04/26/2005		7.2000		
pH	S.U.	MW-17	10/11/2005		7.4000		
pH	S.U.	MW-17	04/26/2006		7.2000		
pH	S.U.	MW-17	10/05/2006		7.4000		
pH	S.U.	MW-17	04/23/2007		7.2000		
pH	S.U.	MW-17	10/09/2007		7.2000		
pH	S.U.	MW-17	04/07/2008		7.1000		
pH	S.U.	MW-17	10/14/2008		7.3000		
pH	S.U.	MW-17	04/07/2009		6.9000		
pH	S.U.	MW-17	10/05/2009		7.2000		
pH	S.U.	MW-17	04/01/2010		7.3000		
pH	S.U.	MW-17	10/01/2010		7.1000		
pH	S.U.	MW-17	04/07/2011		7.2000		
pH	S.U.	MW-17	10/27/2011		7.1000		
pH	S.U.	MW-17	04/23/2012		7.1000		
pH	S.U.	MW-17	10/23/2012		7.1000		
pH	S.U.	MW-17	04/16/2013		7.3000		
pH	S.U.	MW-17	10/28/2013		7.4000		
pH	S.U.	MW-17	04/24/2014		7.2300		
pH	S.U.	MW-17	10/06/2014		7.2800		
pH	S.U.	MW-17	04/21/2015		6.9000		
pH	S.U.	MW-17	10/05/2015		7.2100		
pH	S.U.	MW-17	04/26/2016		7.0800		
pH	S.U.	MW-17	10/05/2016		7.0000		
pH	S.U.	MW-17	04/04/2017		7.2900		
pH	S.U.	MW-17	10/10/2017		7.1400		
pH	S.U.	MW-17	04/11/2018		7.0700		
pH	S.U.	MW-17	10/30/2018		6.7300		
pH	S.U.	MW-17	04/01/2019		7.0500		
pH	S.U.	MW-17	10/08/2019		7.0600		
pH	S.U.	MW-17	04/20/2020		7.3300		
pH	S.U.	MW-17	10/20/2020		7.5900		
pH	S.U.	MW-17	04/26/2021		7.6900		
pH	S.U.	MW-17	08/16/2021		7.3900		
pH	S.U.	MW-17	06/01/2022		7.0500		
pH	S.U.	MW-17	10/03/2022		7.5100		
pH	S.U.	MW-17	05/03/2023		6.4700		
pH	S.U.	MW-17	10/11/2023		7.4500		
pH	S.U.	MW-17	05/08/2024		7.8900		
pH	S.U.	MW-17	10/29/2024		7.1400		
Specific Conductance	umhos/cm	MW-17	04/22/1998		408.0000		
Specific Conductance	umhos/cm	MW-17	07/01/1998		450.0000		
Specific Conductance	umhos/cm	MW-17	10/19/1998		444.0000		
Specific Conductance	umhos/cm	MW-17	04/30/1999		449.0000		
Specific Conductance	umhos/cm	MW-17	09/01/1999		449.0000		
Specific Conductance	umhos/cm	MW-17	04/12/2000		465.0000		
Specific Conductance	umhos/cm	MW-17	10/17/2000		440.0000		
Specific Conductance	umhos/cm	MW-17	04/25/2001		511.0000		
Specific Conductance	umhos/cm	MW-17	10/23/2001		473.0000		
Specific Conductance	umhos/cm	MW-17	04/28/2002		427.0000		
Specific Conductance	umhos/cm	MW-17	10/06/2002		417.0000		
Specific Conductance	umhos/cm	MW-17	04/03/2003		299.0000		
Specific Conductance	umhos/cm	MW-17	10/07/2003		572.0000		

* - Outlier for that well and constituent.
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Table 1

Upgradient Data

Constituent	Units	Well	Date		Result	Adjusted	
Specific Conductance	umhos/cm	MW-17	04/30/2004		525.0000		
Specific Conductance	umhos/cm	MW-17	10/12/2004		861.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2005		131.0000		*
Specific Conductance	umhos/cm	MW-17	10/11/2005		699.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2006		632.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2006		620.0000		
Specific Conductance	umhos/cm	MW-17	04/23/2007		638.0000		
Specific Conductance	umhos/cm	MW-17	10/09/2007		663.0000		
Specific Conductance	umhos/cm	MW-17	04/07/2008		729.0000		
Specific Conductance	umhos/cm	MW-17	10/14/2008		646.0000		
Specific Conductance	umhos/cm	MW-17	04/07/2009		613.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2009		625.0000		
Specific Conductance	umhos/cm	MW-17	04/01/2010		649.0000		
Specific Conductance	umhos/cm	MW-17	10/01/2010		636.0000		
Specific Conductance	umhos/cm	MW-17	04/07/2011		591.0000		
Specific Conductance	umhos/cm	MW-17	10/27/2011		611.0000		
Specific Conductance	umhos/cm	MW-17	04/23/2012		599.0000		
Specific Conductance	umhos/cm	MW-17	10/23/2012		774.0000		
Specific Conductance	umhos/cm	MW-17	04/16/2013		725.0000		
Specific Conductance	umhos/cm	MW-17	10/28/2013		745.0000		
Specific Conductance	umhos/cm	MW-17	04/24/2014		780.0000		
Specific Conductance	umhos/cm	MW-17	10/06/2014		769.0000		
Specific Conductance	umhos/cm	MW-17	04/21/2015		777.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2015		800.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2016		777.0000		
Specific Conductance	umhos/cm	MW-17	10/05/2016		845.0000		
Specific Conductance	umhos/cm	MW-17	04/04/2017		752.0000		
Specific Conductance	umhos/cm	MW-17	10/10/2017		644.0000		
Specific Conductance	umhos/cm	MW-17	04/11/2018		733.0000		
Specific Conductance	umhos/cm	MW-17	10/30/2018		1115.0000		
Specific Conductance	umhos/cm	MW-17	04/01/2019		806.0000		
Specific Conductance	umhos/cm	MW-17	10/08/2019		856.0000		
Specific Conductance	umhos/cm	MW-17	04/20/2020		908.0000		
Specific Conductance	umhos/cm	MW-17	10/20/2020		860.0000		
Specific Conductance	umhos/cm	MW-17	04/26/2021		1025.0000		
Specific Conductance	umhos/cm	MW-17	08/16/2021		1058.0000		
Specific Conductance	umhos/cm	MW-17	06/01/2022		1059.0000		
Specific Conductance	umhos/cm	MW-17	10/03/2022		852.0000		
Specific Conductance	umhos/cm	MW-17	05/03/2023		1326.0000		
Specific Conductance	umhos/cm	MW-17	10/11/2023		827.0000		
Specific Conductance	umhos/cm	MW-17	05/08/2024		864.0000		
Specific Conductance	umhos/cm	MW-17	10/29/2024		824.0000		

* - Outlier for that well and constituent.
** - ND value replaced with median RL.
*** - ND value replaced with manual RL.
ND = Not detected, Result = detection limit.

Table 2

Most Current Downgradient Monitoring Data

Constituent	Units	Well	Date		Result		Pred. Limit
Ammonia as N	mg/L	MW-10	10/29/2024		0.2940	*	0.2000
Chemical Oxygen Demand	mg/L	MW-10	10/29/2024		29.1000	*	21.2000
Chloride	mg/L	MW-10	10/29/2024		149.0000	***	7.3000
Iron, Dissolved	ug/L	MW-10	10/29/2024	ND	500.0000		100.0000
pH	S.U.	MW-10	10/29/2024		6.7400		5.10 - 7.89
Specific Conductance	umhos/cm	MW-10	10/29/2024		1602.0000	***	1189.0566
Ammonia as N	mg/L	MW-11	10/29/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-11	10/29/2024		52.2000	*	21.2000
Chloride	mg/L	MW-11	10/29/2024		128.0000	***	7.3000
Iron, Dissolved	ug/L	MW-11	10/29/2024	ND	500.0000		100.0000
pH	S.U.	MW-11	10/29/2024		7.0300		5.10 - 7.89
Specific Conductance	umhos/cm	MW-11	10/29/2024		1345.0000	***	1189.0566
Ammonia as N	mg/L	MW-12	10/29/2024		0.5640	*	0.2000
Chemical Oxygen Demand	mg/L	MW-12	10/29/2024		19.1000		21.2000
Chloride	mg/L	MW-12	10/29/2024		68.7000	***	7.3000
Iron, Dissolved	ug/L	MW-12	10/29/2024		13800.0000	***	100.0000
pH	S.U.	MW-12	10/29/2024		6.4500		5.10 - 7.89
Specific Conductance	umhos/cm	MW-12	10/29/2024		1348.0000	***	1189.0566
Ammonia as N	mg/L	MW-13	10/29/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-13	10/29/2024		42.6000	***	21.2000
Chloride	mg/L	MW-13	10/29/2024		38.4000	***	7.3000
Iron, Dissolved	ug/L	MW-13	10/29/2024	ND	500.0000	**	100.0000
pH	S.U.	MW-13	10/29/2024		6.8400		5.10 - 7.89
Specific Conductance	umhos/cm	MW-13	10/29/2024		1604.0000	***	1189.0566
Ammonia as N	mg/L	MW-14	10/29/2024		0.2600	*	0.2000
Chemical Oxygen Demand	mg/L	MW-14	10/29/2024		28.4000	***	21.2000
Chloride	mg/L	MW-14	10/29/2024		130.0000	***	7.3000
Iron, Dissolved	ug/L	MW-14	10/29/2024	ND	500.0000		100.0000
pH	S.U.	MW-14	10/29/2024		6.5000		5.10 - 7.89
Specific Conductance	umhos/cm	MW-14	10/29/2024		1606.0000	***	1189.0566
Ammonia as N	mg/L	MW-16	10/29/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-16	10/29/2024		24.6000	*	21.2000
Chloride	mg/L	MW-16	10/29/2024		7.4000	*	7.3000
Iron, Dissolved	ug/L	MW-16	10/29/2024	ND	500.0000		100.0000
pH	S.U.	MW-16	10/29/2024		6.6700		5.10 - 7.89
Specific Conductance	umhos/cm	MW-16	10/29/2024		1302.0000	***	1189.0566
Ammonia as N	mg/L	MW-8	10/29/2024	ND	0.2000		0.2000
Chemical Oxygen Demand	mg/L	MW-8	10/29/2024		13.2000		21.2000
Chloride	mg/L	MW-8	10/29/2024		16.5000	***	7.3000
Iron, Dissolved	ug/L	MW-8	10/29/2024	ND	500.0000		100.0000
pH	S.U.	MW-8	10/29/2024		7.2500		5.10 - 7.89
Specific Conductance	umhos/cm	MW-8	10/29/2024		1248.0000	***	1189.0566
Ammonia as N	mg/L	MW-9	10/29/2024		0.4370	*	0.2000
Chemical Oxygen Demand	mg/L	MW-9	10/29/2024		70.1000	*	21.2000
Chloride	mg/L	MW-9	10/29/2024		31.7000	***	7.3000
Iron, Dissolved	ug/L	MW-9	10/29/2024	ND	500.0000		100.0000
pH	S.U.	MW-9	10/29/2024		7.6200		5.10 - 7.89
Specific Conductance	umhos/cm	MW-9	10/29/2024		1146.0000	**	1189.0566

* - Current value failed - awaiting verification.
** - Current value passed - previous exceedance not verified.
*** - Current value failed - exceedance verified.
**** - Current value passed - awaiting one more verification.
***** - Insufficient background data to compute prediction limit.
ND = Not Detected, Result = detection limit.

Table 3

Detection Frequencies in Upgradient and Downgradient Wells

Constituent	Detect	Upgradient N	Proportion	Detect	Downgradient N	Proportion
Ammonia as N	0	57	0.000	13	403	0.032
Chemical Oxygen Demand	13	57	0.228	230	403	0.571
Chloride	4	57	0.070	403	403	1.000
Iron, Dissolved	0	57	0.000	118	403	0.293
pH	55	55	1.000	402	402	1.000
Specific Conductance	54	54	1.000	402	402	1.000

N = Total number of measurements in all wells.
Detect = Total number of detections in all wells.
Proportion = Detect/N.

Table 4

Shapiro-Wilk Multiple Group Test of Normality

Constituent	Detect	N	Detect Freq	G raw	G log	G cbrt	G sqrt	G sqr	G cub	Crit Value	Dist Form	Model Type
Ammonia as N	0	57	0.000									nonpar
Chemical Oxygen Demand	13	57	0.228	1.761	0.038					2.326	normal	nonpar
Chloride	4	57	0.070	1.334	1.586					2.326	normal	nonpar
Iron, Dissolved	0	57	0.000									nonpar
pH	55	55	1.000	5.645	6.463					2.326	non-norm	nonpar
Specific Conductance	54	54	1.000	0.142	0.249					2.326	normal	normal

* - Distribution override for that constituent.
Fit to distribution is confirmed if G <= critical value.
Model type may not match distributional form when detection frequency < 50%.

Table 5

Summary Statistics and Prediction Limits

Constituent	Units	Detect	N	Mean	SD	alpha	Factor	Pred Limit	Type		Conf
Ammonia as N	mg/L	0	57					0.2000	nonpar	***	0.99
Chemical Oxygen Demand	mg/L	13	57					21.2000	nonpar		0.99
Chloride	mg/L	4	57					7.3000	nonpar		0.99
Iron, Dissolved	ug/L	0	57					100.0000	nonpar	***	0.99
pH	S.U.	55	55					5.10- 7.89	nonpar		0.99
Specific Conductance	umhos/cm	54	54	697.0741	203.2270	0.0100	2.4209	1189.0566	normal		

Conf = confidence level for passing initial test or one verification resample at all downgradient wells for a single constituent (nonparametric test only).
* - Insufficient Data.
** - Calculated limit raised to Manual Reporting Limit.
*** - Nonparametric limit based on ND value.
For transformed data, mean and SD in transformed units and prediction limit in original units.
All sample sizes and statistics are based on outlier free data.
For nonparametric limits, median reporting limits are substituted for extreme reporting limit values.

Table 6

Dixon's Test Outliers
1% Significance Level

Constituent	Units	Well	Date	Result	ND Qualifier	Date Range	N	Critical Value
Specific Conductance	umhos/cm	MW-17	04/26/2005	131.0000		04/22/1998-10/29/2024	55	0.3726

N = Total number of independent measurements in background at each well.
Date Range = Dates of the first and last measurements included in background at each well.
Critical Value depends on the significance level and on N-1 when the two most extreme values are tested or N for the most extreme value.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Ammonia as N	mg/L	MW-10	08/09/1996		1.1000	*	0.2000
Ammonia as N	mg/L	MW-10	10/10/1996	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	01/21/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/17/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/04/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/22/1998	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/19/1998	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/30/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	09/01/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/12/2000	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/17/2000	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/25/2001	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/23/2001	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/28/2002	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/06/2002	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/03/2003	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/07/2003	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/30/2004	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/12/2004	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/26/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/11/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/26/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/05/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/23/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/09/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/07/2008	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/14/2008	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/07/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/05/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/07/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/27/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/23/2012	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/23/2012	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/16/2013	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/28/2013	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/24/2014	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/06/2014	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/21/2015	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/05/2015	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/26/2016	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/05/2016	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/04/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/10/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/11/2018	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/30/2018	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/01/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/08/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	04/26/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	08/16/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	06/01/2022	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	05/03/2023	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/11/2023	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	05/02/2024	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-10	10/29/2024		0.2940	*	0.2000
Chemical Oxygen Demand	mg/L	MW-10	08/09/1996		140.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	01/21/1997		5.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/30/1999		63.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/12/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/17/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/25/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/23/2001	ND	5.0000		21.2000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chemical Oxygen Demand	mg/L	MW-10	04/28/2002		5.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/06/2002		6.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/03/2003	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/07/2003	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/30/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/12/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2006	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2006		11.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/23/2007		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/09/2007		8.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/14/2008		11.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/07/2009		10.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/01/2010		9.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/01/2010		21.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/07/2011		9.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/27/2011		26.7000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/23/2012		43.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/16/2013		12.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/28/2013		62.1000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/24/2014		6.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/06/2014		15.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/21/2015		12.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2015		18.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2016		24.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/05/2016		41.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/04/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/10/2017		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/11/2018		21.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/30/2018		55.1000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/01/2019		37.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/08/2019		44.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/20/2020		53.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/20/2020		64.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	04/26/2021		66.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	08/16/2021		28.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	06/01/2022		36.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	05/03/2023		26.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/11/2023		40.9000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-10	05/02/2024		14.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-10	10/29/2024		29.1000	*	21.2000
Chloride	mg/L	MW-10	08/09/1996		13.0000	*	7.3000
Chloride	mg/L	MW-10	10/10/1996		14.0000	*	7.3000
Chloride	mg/L	MW-10	01/21/1997		15.0000	*	7.3000
Chloride	mg/L	MW-10	04/17/1997		22.0000	*	7.3000
Chloride	mg/L	MW-10	10/04/1997		19.0000	*	7.3000
Chloride	mg/L	MW-10	04/22/1998		19.6000	*	7.3000
Chloride	mg/L	MW-10	10/19/1998		20.0000	*	7.3000
Chloride	mg/L	MW-10	04/30/1999		21.0000	*	7.3000
Chloride	mg/L	MW-10	09/01/1999		21.0000	*	7.3000
Chloride	mg/L	MW-10	04/12/2000		18.6000	*	7.3000
Chloride	mg/L	MW-10	10/17/2000		19.7000	*	7.3000
Chloride	mg/L	MW-10	04/25/2001		16.7000	*	7.3000
Chloride	mg/L	MW-10	10/23/2001		18.6000	*	7.3000
Chloride	mg/L	MW-10	04/28/2002		17.9000	*	7.3000
Chloride	mg/L	MW-10	10/06/2002		17.8000	*	7.3000
Chloride	mg/L	MW-10	04/03/2003		23.0000	*	7.3000
Chloride	mg/L	MW-10	10/07/2003		23.6000	*	7.3000
Chloride	mg/L	MW-10	04/30/2004		24.0000	*	7.3000
Chloride	mg/L	MW-10	10/12/2004		26.2000	*	7.3000
Chloride	mg/L	MW-10	04/26/2005		28.1000	*	7.3000
Chloride	mg/L	MW-10	10/11/2005		28.7000	*	7.3000
Chloride	mg/L	MW-10	04/26/2006		26.2000	*	7.3000
Chloride	mg/L	MW-10	10/05/2006		25.1000	*	7.3000
Chloride	mg/L	MW-10	04/23/2007		28.8000	*	7.3000
Chloride	mg/L	MW-10	10/09/2007		31.1000	*	7.3000
Chloride	mg/L	MW-10	04/07/2008		33.9000	*	7.3000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-10	10/14/2008		35.4000	*	7.3000
Chloride	mg/L	MW-10	04/07/2009		37.4000	*	7.3000
Chloride	mg/L	MW-10	10/05/2009		39.6000	*	7.3000
Chloride	mg/L	MW-10	04/01/2010		50.8000	*	7.3000
Chloride	mg/L	MW-10	10/01/2010		52.4000	*	7.3000
Chloride	mg/L	MW-10	04/07/2011		51.8000	*	7.3000
Chloride	mg/L	MW-10	10/27/2011		65.7000	*	7.3000
Chloride	mg/L	MW-10	04/23/2012		56.1000	*	7.3000
Chloride	mg/L	MW-10	10/23/2012		46.7000	*	7.3000
Chloride	mg/L	MW-10	04/16/2013		47.0000	*	7.3000
Chloride	mg/L	MW-10	10/28/2013		58.5000	*	7.3000
Chloride	mg/L	MW-10	04/24/2014		55.4000	*	7.3000
Chloride	mg/L	MW-10	10/06/2014		69.7000	*	7.3000
Chloride	mg/L	MW-10	04/21/2015		81.8000	*	7.3000
Chloride	mg/L	MW-10	10/05/2015		80.2000	*	7.3000
Chloride	mg/L	MW-10	04/26/2016		101.0000	*	7.3000
Chloride	mg/L	MW-10	10/05/2016		179.0000	*	7.3000
Chloride	mg/L	MW-10	04/04/2017		112.0000	*	7.3000
Chloride	mg/L	MW-10	10/10/2017		85.4000	*	7.3000
Chloride	mg/L	MW-10	04/11/2018		102.0000	*	7.3000
Chloride	mg/L	MW-10	10/30/2018		140.0000	*	7.3000
Chloride	mg/L	MW-10	04/01/2019		372.0000	*	7.3000
Chloride	mg/L	MW-10	10/08/2019		196.0000	*	7.3000
Chloride	mg/L	MW-10	04/20/2020		295.0000	*	7.3000
Chloride	mg/L	MW-10	10/20/2020		269.0000	*	7.3000
Chloride	mg/L	MW-10	04/26/2021		392.0000	*	7.3000
Chloride	mg/L	MW-10	08/16/2021		115.0000	*	7.3000
Chloride	mg/L	MW-10	06/01/2022		107.0000	*	7.3000
Chloride	mg/L	MW-10	05/03/2023		166.0000	*	7.3000
Chloride	mg/L	MW-10	10/11/2023		101.0000	*	7.3000
Chloride	mg/L	MW-10	05/02/2024		153.0000	*	7.3000
Chloride	mg/L	MW-10	10/29/2024		149.0000	*	7.3000
Specific Conductance	umhos/cm	MW-10	08/09/1996		787.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/10/1996		695.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	01/21/1997		625.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/17/1997		724.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/04/1997		644.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/22/1998		684.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/19/1998		742.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/30/1999		713.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	09/01/1999		774.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/12/2000		700.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/17/2000		729.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/25/2001		570.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/23/2001		740.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/28/2002		463.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/06/2002		645.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/03/2003		753.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/07/2003		550.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/30/2004		693.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/12/2004		532.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/26/2005		575.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/11/2005		1051.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/26/2006		879.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/05/2006		972.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/23/2007		943.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/09/2007		1062.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/07/2008		1199.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/14/2008		1069.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/07/2009		982.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/05/2009		973.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/01/2010		1045.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/01/2010		1100.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/07/2011		1014.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/27/2011		1141.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/23/2012		1075.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/23/2012		1258.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	04/16/2013		1166.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	10/28/2013		1297.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	04/24/2014		1248.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/06/2014		1394.0000	*	1189.0566

* - Significantly increased over background.
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*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-10	04/21/2015		1374.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/05/2015		1394.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	04/26/2016		1241.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/05/2016		1785.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	04/04/2017		1325.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/10/2017		1146.0000		1189.0566
Specific Conductance	umhos/cm	MW-10	04/11/2018		1200.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/30/2018		1776.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	04/01/2019		1890.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/08/2019		1855.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	04/20/2020		1861.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/20/2020		2520.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	04/26/2021		1999.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	08/16/2021		1673.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	06/01/2022		1472.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	05/03/2023		1538.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/11/2023		1394.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-10	10/29/2024		1602.0000	*	1189.0566
Chemical Oxygen Demand	mg/L	MW-11	07/12/1996		5.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/10/1996		5.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	01/21/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/30/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/12/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/17/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/25/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/23/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/28/2002		5.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/06/2002		23.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/03/2003		7.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/07/2003	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/30/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/12/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/26/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/26/2006	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/05/2006		10.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/23/2007		13.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/09/2007		8.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/07/2008		10.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/14/2008		11.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/07/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/01/2010		18.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/07/2011		5.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/27/2011		26.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/16/2013	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/28/2013		14.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/24/2014	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/06/2014		9.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/21/2015		8.6700		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/05/2015		7.9400		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/26/2016		6.4700		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/05/2016		6.7400		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/04/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/10/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/11/2018		13.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/30/2018		7.8200		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/01/2019		16.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/08/2019	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/20/2020		7.2500		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/20/2020		9.2100		21.2000
Chemical Oxygen Demand	mg/L	MW-11	04/26/2021		15.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	08/16/2021		8.9000		21.2000

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Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chemical Oxygen Demand	mg/L	MW-11	06/01/2022		7.5900		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/03/2022		6.5400		21.2000
Chemical Oxygen Demand	mg/L	MW-11	05/03/2023		8.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/11/2023		9.4800		21.2000
Chemical Oxygen Demand	mg/L	MW-11	05/02/2024		6.2400		21.2000
Chemical Oxygen Demand	mg/L	MW-11	10/29/2024		52.2000	*	21.2000
Chloride	mg/L	MW-11	07/12/1996		19.0000	*	7.3000
Chloride	mg/L	MW-11	10/10/1996		19.0000	*	7.3000
Chloride	mg/L	MW-11	01/21/1997		22.0000	*	7.3000
Chloride	mg/L	MW-11	04/17/1997		20.0000	*	7.3000
Chloride	mg/L	MW-11	10/04/1997		28.0000	*	7.3000
Chloride	mg/L	MW-11	04/22/1998		20.2000	*	7.3000
Chloride	mg/L	MW-11	10/19/1998		32.0000	*	7.3000
Chloride	mg/L	MW-11	04/30/1999		37.0000	*	7.3000
Chloride	mg/L	MW-11	09/01/1999		33.0000	*	7.3000
Chloride	mg/L	MW-11	04/12/2000		6.4000		7.3000
Chloride	mg/L	MW-11	10/17/2000		5.5000		7.3000
Chloride	mg/L	MW-11	04/25/2001		12.9000	*	7.3000
Chloride	mg/L	MW-11	10/23/2001		16.0000	*	7.3000
Chloride	mg/L	MW-11	04/28/2002		18.0000	*	7.3000
Chloride	mg/L	MW-11	10/06/2002		18.8000	*	7.3000
Chloride	mg/L	MW-11	04/03/2003		12.3000	*	7.3000
Chloride	mg/L	MW-11	10/07/2003		15.8000	*	7.3000
Chloride	mg/L	MW-11	04/30/2004		23.4000	*	7.3000
Chloride	mg/L	MW-11	10/12/2004		44.9000	*	7.3000
Chloride	mg/L	MW-11	04/26/2005		56.3000	*	7.3000
Chloride	mg/L	MW-11	10/11/2005		50.5000	*	7.3000
Chloride	mg/L	MW-11	04/26/2006		38.2000	*	7.3000
Chloride	mg/L	MW-11	10/05/2006		14.0000	*	7.3000
Chloride	mg/L	MW-11	04/23/2007		16.0000	*	7.3000
Chloride	mg/L	MW-11	10/09/2007		23.9000	*	7.3000
Chloride	mg/L	MW-11	04/07/2008		67.9000	*	7.3000
Chloride	mg/L	MW-11	10/14/2008		67.1000	*	7.3000
Chloride	mg/L	MW-11	04/07/2009		64.9000	*	7.3000
Chloride	mg/L	MW-11	10/05/2009		61.3000	*	7.3000
Chloride	mg/L	MW-11	04/01/2010		61.6000	*	7.3000
Chloride	mg/L	MW-11	10/01/2010		46.1000	*	7.3000
Chloride	mg/L	MW-11	04/07/2011		59.9000	*	7.3000
Chloride	mg/L	MW-11	10/27/2011		61.9000	*	7.3000
Chloride	mg/L	MW-11	04/23/2012		72.4000	*	7.3000
Chloride	mg/L	MW-11	10/23/2012		29.3000	*	7.3000
Chloride	mg/L	MW-11	04/16/2013		17.6000	*	7.3000
Chloride	mg/L	MW-11	10/28/2013		57.6000	*	7.3000
Chloride	mg/L	MW-11	04/24/2014		64.2000	*	7.3000
Chloride	mg/L	MW-11	10/06/2014		45.1000	*	7.3000
Chloride	mg/L	MW-11	04/21/2015		78.7000	*	7.3000
Chloride	mg/L	MW-11	10/05/2015		84.3000	*	7.3000
Chloride	mg/L	MW-11	04/26/2016		61.1000	*	7.3000
Chloride	mg/L	MW-11	10/05/2016		78.5000	*	7.3000
Chloride	mg/L	MW-11	04/04/2017		102.0000	*	7.3000
Chloride	mg/L	MW-11	10/10/2017		91.8000	*	7.3000
Chloride	mg/L	MW-11	04/11/2018		89.3000	*	7.3000
Chloride	mg/L	MW-11	10/30/2018		75.1000	*	7.3000
Chloride	mg/L	MW-11	04/01/2019		81.0000	*	7.3000
Chloride	mg/L	MW-11	10/08/2019		69.2000	*	7.3000
Chloride	mg/L	MW-11	04/20/2020		72.0000	*	7.3000
Chloride	mg/L	MW-11	10/20/2020		84.1000	*	7.3000
Chloride	mg/L	MW-11	04/26/2021		100.0000	*	7.3000
Chloride	mg/L	MW-11	08/16/2021		38.4000	*	7.3000
Chloride	mg/L	MW-11	06/01/2022		26.9000	*	7.3000
Chloride	mg/L	MW-11	10/03/2022		24.3000	*	7.3000
Chloride	mg/L	MW-11	05/03/2023		25.1000	*	7.3000
Chloride	mg/L	MW-11	10/11/2023		55.4000	*	7.3000
Chloride	mg/L	MW-11	05/02/2024		101.0000	*	7.3000
Chloride	mg/L	MW-11	10/29/2024		128.0000	*	7.3000
Specific Conductance	umhos/cm	MW-11	07/12/1996		465.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/10/1996		622.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	01/21/1997		515.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/17/1997		537.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/04/1997		543.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/22/1998		625.0000		1189.0566

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Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-11	10/19/1998		667.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/30/1999		707.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	09/01/1999		736.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/12/2000		737.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/17/2000		740.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/25/2001		428.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/23/2001		733.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/28/2002		784.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/06/2002		684.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/03/2003		735.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/07/2003		832.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/30/2004		615.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/12/2004		1266.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/26/2005		658.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/11/2005		989.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/26/2006		882.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/05/2006		975.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/23/2007		979.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/09/2007		1030.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/07/2008		1170.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/14/2008		992.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/07/2009		1034.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/05/2009		1052.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/01/2010		1121.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/01/2010		1071.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/07/2011		1039.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/27/2011		1003.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/23/2012		1060.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/23/2012		1187.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/16/2013		1121.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/28/2013		1193.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/24/2014		1178.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/06/2014		1082.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	04/21/2015		1215.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/05/2015		1221.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/26/2016		1218.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/05/2016		1299.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/04/2017		1234.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/10/2017		1196.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/11/2018		1175.0000		1189.0566
Specific Conductance	umhos/cm	MW-11	10/30/2018		1204.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/01/2019		1296.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/08/2019		1316.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/20/2020		1416.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/20/2020		1462.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	04/26/2021		1553.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	08/16/2021		1465.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	06/01/2022		1245.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/03/2022		1266.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	05/03/2023		1259.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/11/2023		1300.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	05/02/2024		1274.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-11	10/29/2024		1345.0000	*	1189.0566
Ammonia as N	mg/L	MW-12	10/10/1996	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	01/21/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/17/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	07/15/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/04/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/22/1998	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/19/1998		0.2100	*	0.2000
Ammonia as N	mg/L	MW-12	04/30/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	09/01/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/12/2000	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/17/2000	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/25/2001	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/23/2001	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/28/2002	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/06/2002	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/03/2003	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/07/2003	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/30/2004	ND	0.2000		0.2000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Ammonia as N	mg/L	MW-12	10/12/2004	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/26/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/11/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/26/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/05/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/23/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/09/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/07/2008	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/14/2008	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/07/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/05/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/07/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/27/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/23/2012	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/23/2012	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/16/2013	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/28/2013	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/24/2014	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/06/2014	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/21/2015	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/05/2015	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/26/2016	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/05/2016	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/04/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/10/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/11/2018	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/30/2018	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/01/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/08/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	04/26/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	08/16/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	06/01/2022	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/03/2022	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	05/03/2023	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/11/2023	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	05/02/2024	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-12	10/29/2024		0.5640	*	0.2000
Chloride	mg/L	MW-12	10/10/1996		5.4000		7.3000
Chloride	mg/L	MW-12	01/21/1997		6.4000		7.3000
Chloride	mg/L	MW-12	04/17/1997		7.5000	*	7.3000
Chloride	mg/L	MW-12	07/15/1997		6.8000		7.3000
Chloride	mg/L	MW-12	10/04/1997		6.6000		7.3000
Chloride	mg/L	MW-12	04/22/1998		8.1000	*	7.3000
Chloride	mg/L	MW-12	10/19/1998		7.4000	*	7.3000
Chloride	mg/L	MW-12	04/30/1999		9.6000	*	7.3000
Chloride	mg/L	MW-12	09/01/1999		8.3000	*	7.3000
Chloride	mg/L	MW-12	04/12/2000		6.4000		7.3000
Chloride	mg/L	MW-12	10/17/2000		7.9000	*	7.3000
Chloride	mg/L	MW-12	04/25/2001		8.0000	*	7.3000
Chloride	mg/L	MW-12	10/23/2001		16.2000	*	7.3000
Chloride	mg/L	MW-12	04/28/2002		17.4000	*	7.3000
Chloride	mg/L	MW-12	10/06/2002		27.0000	*	7.3000
Chloride	mg/L	MW-12	04/03/2003		43.1000	*	7.3000
Chloride	mg/L	MW-12	10/07/2003		81.1000	*	7.3000
Chloride	mg/L	MW-12	04/30/2004		60.4000	*	7.3000
Chloride	mg/L	MW-12	10/12/2004		50.1000	*	7.3000
Chloride	mg/L	MW-12	04/26/2005		21.5000	*	7.3000
Chloride	mg/L	MW-12	10/11/2005		21.4000	*	7.3000
Chloride	mg/L	MW-12	04/26/2006		9.8800	*	7.3000
Chloride	mg/L	MW-12	10/05/2006		14.5000	*	7.3000
Chloride	mg/L	MW-12	04/23/2007		10.7000	*	7.3000
Chloride	mg/L	MW-12	10/09/2007		23.9000	*	7.3000
Chloride	mg/L	MW-12	04/07/2008		13.2000	*	7.3000
Chloride	mg/L	MW-12	10/14/2008		19.8000	*	7.3000
Chloride	mg/L	MW-12	04/07/2009		9.3000	*	7.3000
Chloride	mg/L	MW-12	10/05/2009		9.8000	*	7.3000
Chloride	mg/L	MW-12	04/01/2010		11.0000	*	7.3000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-12	10/01/2010		25.9000	*	7.3000
Chloride	mg/L	MW-12	04/07/2011		16.0000	*	7.3000
Chloride	mg/L	MW-12	10/27/2011		14.2000	*	7.3000
Chloride	mg/L	MW-12	04/23/2012		12.3000	*	7.3000
Chloride	mg/L	MW-12	10/23/2012		9.3700	*	7.3000
Chloride	mg/L	MW-12	04/16/2013		9.3200	*	7.3000
Chloride	mg/L	MW-12	10/28/2013		35.8000	*	7.3000
Chloride	mg/L	MW-12	04/24/2014		23.8000	*	7.3000
Chloride	mg/L	MW-12	10/06/2014		37.9000	*	7.3000
Chloride	mg/L	MW-12	04/21/2015		63.7000	*	7.3000
Chloride	mg/L	MW-12	10/05/2015		61.4000	*	7.3000
Chloride	mg/L	MW-12	04/26/2016		130.0000	*	7.3000
Chloride	mg/L	MW-12	10/05/2016		106.0000	*	7.3000
Chloride	mg/L	MW-12	04/04/2017		42.9000	*	7.3000
Chloride	mg/L	MW-12	10/10/2017		19.2000	*	7.3000
Chloride	mg/L	MW-12	04/11/2018		15.2000	*	7.3000
Chloride	mg/L	MW-12	10/30/2018		42.6000	*	7.3000
Chloride	mg/L	MW-12	04/01/2019		31.5000	*	7.3000
Chloride	mg/L	MW-12	10/08/2019		12.0000	*	7.3000
Chloride	mg/L	MW-12	04/20/2020		11.2000	*	7.3000
Chloride	mg/L	MW-12	10/20/2020		12.3000	*	7.3000
Chloride	mg/L	MW-12	04/26/2021		9.3200	*	7.3000
Chloride	mg/L	MW-12	08/16/2021		12.5000	*	7.3000
Chloride	mg/L	MW-12	06/01/2022		32.0000	*	7.3000
Chloride	mg/L	MW-12	10/03/2022		21.7000	*	7.3000
Chloride	mg/L	MW-12	05/03/2023		29.1000	*	7.3000
Chloride	mg/L	MW-12	10/11/2023		34.0000	*	7.3000
Chloride	mg/L	MW-12	05/02/2024		40.7000	*	7.3000
Chloride	mg/L	MW-12	10/29/2024		68.7000	*	7.3000
Iron, Dissolved	ug/L	MW-12	10/10/1996	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	01/21/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/17/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	07/15/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/04/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/22/1998	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/19/1998	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/30/1999	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	09/01/1999	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/12/2000	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/17/2000	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/25/2001	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/23/2001	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/28/2002	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/06/2002	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/03/2003	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/07/2003	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/30/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	10/12/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2005		300.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/11/2005		1500.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2006		2290.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/05/2006		650.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/23/2007		816.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/09/2007		3090.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/07/2008		465.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/14/2008		1610.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/07/2009		2400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/05/2009		7220.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/01/2010		5400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/01/2010		6230.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/07/2011		5660.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/27/2011		5300.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/23/2012		4510.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/23/2012		7640.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/16/2013		5970.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/28/2013		8850.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/24/2014		10100.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/06/2014		13500.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/21/2015		19800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/05/2015		21700.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2016		15600.0000	*	100.0000

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Table 8

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Constituent	Units	Well	Date		Result		Pred. Limit
Iron, Dissolved	ug/L	MW-12	10/05/2016		19200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/04/2017		13100.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/10/2017		17100.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/11/2018		22900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/30/2018		27900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/01/2019		20200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/08/2019		27400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/20/2020		24800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/20/2020		19400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	04/26/2021		27800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	08/16/2021		29900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	06/01/2022		25300.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/03/2022		9460.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	05/03/2023		10800.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/11/2023		7290.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	05/02/2024		6970.0000	*	100.0000
Iron, Dissolved	ug/L	MW-12	10/29/2024		13800.0000	*	100.0000
Specific Conductance	umhos/cm	MW-12	10/10/1996		1026.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	01/21/1997		922.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/17/1997		1010.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	07/15/1997		1017.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	10/04/1997		906.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/22/1998		1044.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	10/19/1998		1046.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/30/1999		1102.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	09/01/1999		1171.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/12/2000		1087.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	10/17/2000		1129.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/25/2001		1223.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/23/2001		1165.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/28/2002		1040.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	10/06/2002		1051.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/03/2003		1319.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/07/2003		671.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/30/2004		1106.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	10/12/2004		496.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	04/26/2005		182.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	10/11/2005		1571.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/26/2006		1374.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/05/2006		1369.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/23/2007		1270.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/09/2007		1451.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/07/2008		1571.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/14/2008		1377.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/07/2009		1326.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/05/2009		1371.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/01/2010		1357.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/01/2010		1399.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/07/2011		1184.0000		1189.0566
Specific Conductance	umhos/cm	MW-12	10/27/2011		1205.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/23/2012		1199.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/23/2012		1518.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/16/2013		1476.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/28/2013		1523.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/24/2014		1512.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/06/2014		1547.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/21/2015		1601.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/05/2015		1637.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/26/2016		1786.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/05/2016		1706.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/04/2017		1375.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/10/2017		1287.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/11/2018		1304.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/30/2018		1556.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/01/2019		1399.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/08/2019		1499.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/20/2020		1386.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/20/2020		1684.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	04/26/2021		1637.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	08/16/2021		1754.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	06/01/2022		1371.0000	*	1189.0566

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-12	10/03/2022		1494.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	05/03/2023		1481.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/11/2023		1422.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	05/02/2024		1440.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-12	10/29/2024		1348.0000	*	1189.0566
Chemical Oxygen Demand	mg/L	MW-13	07/12/1996		63.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	01/21/1997		7.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/30/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/12/2000		22.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/17/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/25/2001		6.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/23/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/28/2002		8.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/06/2002		8.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/03/2003		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/07/2003	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/30/2004		12.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/12/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/26/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/26/2006		6.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2006		13.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/23/2007		9.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/09/2007	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/14/2008		5.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/07/2009		8.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/01/2010		9.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/01/2010		17.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/07/2011		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/27/2011		14.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/16/2013	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/28/2013		15.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/24/2014	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/06/2014		8.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/21/2015		10.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2015		7.9400		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/26/2016		15.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/05/2016		10.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/04/2017		5.2300		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/10/2017		6.5100		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/11/2018		17.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/30/2018		18.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/01/2019		32.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/08/2019		60.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/20/2020		26.7000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/20/2020		8.5600		21.2000
Chemical Oxygen Demand	mg/L	MW-13	04/26/2021		22.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	08/16/2021		12.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	06/01/2022		20.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/03/2022		13.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	05/03/2023		23.5000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/11/2023		20.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-13	05/08/2024		23.7000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-13	10/29/2024		42.6000	*	21.2000
Chloride	mg/L	MW-13	07/12/1996		12.0000	*	7.3000
Chloride	mg/L	MW-13	10/10/1996		13.0000	*	7.3000
Chloride	mg/L	MW-13	01/21/1997		14.0000	*	7.3000
Chloride	mg/L	MW-13	04/17/1997		18.0000	*	7.3000
Chloride	mg/L	MW-13	10/04/1997		18.0000	*	7.3000
Chloride	mg/L	MW-13	04/22/1998		15.6000	*	7.3000
Chloride	mg/L	MW-13	10/19/1998		18.0000	*	7.3000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-13	04/30/1999		17.0000	*	7.3000
Chloride	mg/L	MW-13	09/01/1999		18.0000	*	7.3000
Chloride	mg/L	MW-13	04/12/2000		17.5000	*	7.3000
Chloride	mg/L	MW-13	10/17/2000		19.9000	*	7.3000
Chloride	mg/L	MW-13	04/25/2001		15.1000	*	7.3000
Chloride	mg/L	MW-13	10/23/2001		16.7000	*	7.3000
Chloride	mg/L	MW-13	04/28/2002		16.6000	*	7.3000
Chloride	mg/L	MW-13	10/06/2002		16.5000	*	7.3000
Chloride	mg/L	MW-13	04/03/2003		24.8000	*	7.3000
Chloride	mg/L	MW-13	10/07/2003		19.7000	*	7.3000
Chloride	mg/L	MW-13	04/30/2004		19.3000	*	7.3000
Chloride	mg/L	MW-13	10/12/2004		18.4000	*	7.3000
Chloride	mg/L	MW-13	04/26/2005		11.6000	*	7.3000
Chloride	mg/L	MW-13	10/11/2005		19.0000	*	7.3000
Chloride	mg/L	MW-13	04/26/2006		18.8000	*	7.3000
Chloride	mg/L	MW-13	10/05/2006		18.2000	*	7.3000
Chloride	mg/L	MW-13	04/23/2007		17.5000	*	7.3000
Chloride	mg/L	MW-13	10/09/2007		20.1000	*	7.3000
Chloride	mg/L	MW-13	04/07/2008		20.0000	*	7.3000
Chloride	mg/L	MW-13	10/14/2008		19.3000	*	7.3000
Chloride	mg/L	MW-13	04/07/2009		18.1000	*	7.3000
Chloride	mg/L	MW-13	10/05/2009		19.9000	*	7.3000
Chloride	mg/L	MW-13	04/01/2010		73.3000	*	7.3000
Chloride	mg/L	MW-13	10/01/2010		51.8000	*	7.3000
Chloride	mg/L	MW-13	04/07/2011		43.1000	*	7.3000
Chloride	mg/L	MW-13	10/27/2011		27.5000	*	7.3000
Chloride	mg/L	MW-13	04/23/2012		15.4000	*	7.3000
Chloride	mg/L	MW-13	10/23/2012		18.3000	*	7.3000
Chloride	mg/L	MW-13	04/16/2013		28.5000	*	7.3000
Chloride	mg/L	MW-13	10/28/2013		60.7000	*	7.3000
Chloride	mg/L	MW-13	04/24/2014		21.6000	*	7.3000
Chloride	mg/L	MW-13	10/06/2014		77.7000	*	7.3000
Chloride	mg/L	MW-13	04/21/2015		143.0000	*	7.3000
Chloride	mg/L	MW-13	10/05/2015		75.7000	*	7.3000
Chloride	mg/L	MW-13	04/26/2016		93.2000	*	7.3000
Chloride	mg/L	MW-13	10/05/2016		73.8000	*	7.3000
Chloride	mg/L	MW-13	04/04/2017		130.0000	*	7.3000
Chloride	mg/L	MW-13	10/10/2017		62.8000	*	7.3000
Chloride	mg/L	MW-13	04/11/2018		124.0000	*	7.3000
Chloride	mg/L	MW-13	10/30/2018		132.0000	*	7.3000
Chloride	mg/L	MW-13	04/01/2019		147.0000	*	7.3000
Chloride	mg/L	MW-13	10/08/2019		179.0000	*	7.3000
Chloride	mg/L	MW-13	04/20/2020		116.0000	*	7.3000
Chloride	mg/L	MW-13	10/20/2020		32.5000	*	7.3000
Chloride	mg/L	MW-13	04/26/2021		85.2000	*	7.3000
Chloride	mg/L	MW-13	08/16/2021		33.1000	*	7.3000
Chloride	mg/L	MW-13	06/01/2022		24.7000	*	7.3000
Chloride	mg/L	MW-13	10/03/2022		21.7000	*	7.3000
Chloride	mg/L	MW-13	05/03/2023		73.0000	*	7.3000
Chloride	mg/L	MW-13	10/11/2023		33.1000	*	7.3000
Chloride	mg/L	MW-13	05/08/2024		60.5000	*	7.3000
Chloride	mg/L	MW-13	10/29/2024		38.4000	*	7.3000
Iron, Dissolved	ug/L	MW-13	07/12/1996		900.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/10/1996		3400.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	01/21/1997		3600.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/17/1997	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/04/1997		490.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/22/1998		200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/19/1998		50.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/30/1999		50.0000		100.0000
Iron, Dissolved	ug/L	MW-13	09/01/1999		720.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/12/2000		1050.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/17/2000	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/25/2001		160.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/23/2001	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/28/2002		710.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/06/2002		850.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/03/2003	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/07/2003		880.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/30/2004	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/12/2004	ND	100.0000		100.0000

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Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Iron, Dissolved	ug/L	MW-13	04/26/2005		150.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/11/2005		340.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/26/2006		560.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2006		934.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/23/2007		178.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/09/2007		177.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/07/2008	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/14/2008		278.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/07/2009		106.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2009		717.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/01/2010	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/01/2010		1840.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/07/2011		1660.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/27/2011		211.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/23/2012		121.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/23/2012		241.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/16/2013	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/28/2013		172.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/24/2014		153.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/06/2014	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/21/2015	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2015	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/26/2016	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/05/2016	ND	100.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/04/2017	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/10/2017		663.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/11/2018	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/30/2018	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/01/2019	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	10/08/2019		1780.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	04/20/2020		1370.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/20/2020	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	04/26/2021	ND	500.0000		100.0000
Iron, Dissolved	ug/L	MW-13	08/16/2021		3430.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	06/01/2022		1710.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/03/2022		1740.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	05/03/2023		1200.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/11/2023		747.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	05/08/2024		6370.0000	*	100.0000
Iron, Dissolved	ug/L	MW-13	10/29/2024	ND	500.0000		100.0000
Specific Conductance	umhos/cm	MW-13	07/12/1996		390.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/10/1996		475.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	01/21/1997		479.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/17/1997		645.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/04/1997		548.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/22/1998		584.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/19/1998		525.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/30/1999		605.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	09/01/1999		558.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/12/2000		517.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/17/2000		536.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/25/2001		648.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/23/2001		530.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/28/2002		423.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/06/2002		499.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/03/2003		930.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/07/2003		646.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/30/2004		792.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/12/2004		346.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/26/2005		608.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/11/2005		764.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/26/2006		641.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/05/2006		687.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/23/2007		668.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/09/2007		868.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/07/2008		804.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/14/2008		1057.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/07/2009		747.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/05/2009		759.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/01/2010		1205.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/01/2010		1329.0000	*	1189.0566

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ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-13	04/07/2011		1115.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/27/2011		1018.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/23/2012		1084.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/23/2012		806.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/16/2013		1336.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/28/2013		1421.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	04/24/2014		847.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/06/2014		1590.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	04/21/2015		1583.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/05/2015		1204.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	04/26/2016		1195.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/05/2016		1159.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/04/2017		1341.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/10/2017		1193.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	04/11/2018		1332.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/30/2018		1578.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	04/01/2019		1590.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/08/2019		1854.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	04/20/2020		1680.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/20/2020		990.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	04/26/2021		1595.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	08/16/2021		1209.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	06/01/2022		938.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	10/03/2022		917.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	05/03/2023		1446.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/11/2023		990.0000		1189.0566
Specific Conductance	umhos/cm	MW-13	05/08/2024		1550.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-13	10/29/2024		1604.0000	*	1189.0566
Ammonia as N	mg/L	MW-14	07/12/1996	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/10/1996	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	01/21/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/17/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/04/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/22/1998	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/19/1998	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/30/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	09/01/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/12/2000	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/17/2000	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/25/2001	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/23/2001	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/28/2002	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/06/2002	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/03/2003	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/07/2003	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/30/2004		0.2200	*	0.2000
Ammonia as N	mg/L	MW-14	10/12/2004	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/26/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/11/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/26/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/05/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/23/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/09/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/07/2008	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/14/2008	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/07/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/05/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/07/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/27/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/23/2012	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/23/2012	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/16/2013	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/28/2013	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/24/2014	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/06/2014	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/21/2015	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/05/2015	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/26/2016	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/05/2016	ND	0.2000		0.2000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Ammonia as N	mg/L	MW-14	04/04/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/10/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/11/2018	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/30/2018	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/01/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/08/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	04/26/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	08/16/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	06/01/2022	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	05/03/2023	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/11/2023	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	05/02/2024	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-14	10/29/2024		0.2600	*	0.2000
Chemical Oxygen Demand	mg/L	MW-14	07/12/1996		24.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	01/21/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/30/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/12/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/17/2000	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/25/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/23/2001	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/28/2002	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/06/2002		15.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/03/2003		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/07/2003		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/30/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/12/2004		6.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2005		5.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2006	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2006		12.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/23/2007	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/09/2007		5.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/14/2008		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/07/2009		10.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/07/2011		10.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/27/2011		13.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/23/2012	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/23/2012		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/16/2013	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/28/2013		22.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/24/2014		5.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/06/2014		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/21/2015	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2015		11.3000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2016		6.4700		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/05/2016		5.6900		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/04/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/10/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/11/2018		6.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/30/2018	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/01/2019		12.8000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/08/2019	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/20/2020		6.2400		21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/20/2020	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	04/26/2021		15.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	08/16/2021		12.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	06/01/2022		13.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-14	05/03/2023		29.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/11/2023		42.6000	*	21.2000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chemical Oxygen Demand	mg/L	MW-14	05/02/2024		22.6000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-14	10/29/2024		28.4000	*	21.2000
Chloride	mg/L	MW-14	07/12/1996		12.0000	*	7.3000
Chloride	mg/L	MW-14	10/10/1996		14.0000	*	7.3000
Chloride	mg/L	MW-14	01/21/1997		13.0000	*	7.3000
Chloride	mg/L	MW-14	04/17/1997		17.0000	*	7.3000
Chloride	mg/L	MW-14	10/04/1997		15.0000	*	7.3000
Chloride	mg/L	MW-14	04/22/1998		18.5000	*	7.3000
Chloride	mg/L	MW-14	10/19/1998		19.0000	*	7.3000
Chloride	mg/L	MW-14	04/30/1999		20.0000	*	7.3000
Chloride	mg/L	MW-14	09/01/1999		18.0000	*	7.3000
Chloride	mg/L	MW-14	04/12/2000		17.7000	*	7.3000
Chloride	mg/L	MW-14	10/17/2000		17.0000	*	7.3000
Chloride	mg/L	MW-14	04/25/2001		16.8000	*	7.3000
Chloride	mg/L	MW-14	10/23/2001		22.6000	*	7.3000
Chloride	mg/L	MW-14	04/28/2002		27.9000	*	7.3000
Chloride	mg/L	MW-14	10/06/2002		23.1000	*	7.3000
Chloride	mg/L	MW-14	04/03/2003		30.9000	*	7.3000
Chloride	mg/L	MW-14	10/07/2003		24.8000	*	7.3000
Chloride	mg/L	MW-14	04/30/2004		43.4000	*	7.3000
Chloride	mg/L	MW-14	10/12/2004		80.6000	*	7.3000
Chloride	mg/L	MW-14	04/26/2005		53.3000	*	7.3000
Chloride	mg/L	MW-14	10/11/2005		43.6000	*	7.3000
Chloride	mg/L	MW-14	04/26/2006		38.1000	*	7.3000
Chloride	mg/L	MW-14	10/05/2006		38.4000	*	7.3000
Chloride	mg/L	MW-14	04/23/2007		39.9000	*	7.3000
Chloride	mg/L	MW-14	10/09/2007		43.9000	*	7.3000
Chloride	mg/L	MW-14	04/07/2008		45.1000	*	7.3000
Chloride	mg/L	MW-14	10/14/2008		40.5000	*	7.3000
Chloride	mg/L	MW-14	04/07/2009		37.3000	*	7.3000
Chloride	mg/L	MW-14	10/05/2009		44.7000	*	7.3000
Chloride	mg/L	MW-14	04/01/2010		43.6000	*	7.3000
Chloride	mg/L	MW-14	10/01/2010		53.6000	*	7.3000
Chloride	mg/L	MW-14	04/07/2011		49.7000	*	7.3000
Chloride	mg/L	MW-14	10/27/2011		35.0000	*	7.3000
Chloride	mg/L	MW-14	04/23/2012		33.5000	*	7.3000
Chloride	mg/L	MW-14	10/23/2012		29.4000	*	7.3000
Chloride	mg/L	MW-14	04/16/2013		16.4000	*	7.3000
Chloride	mg/L	MW-14	10/28/2013		66.1000	*	7.3000
Chloride	mg/L	MW-14	04/24/2014		62.3000	*	7.3000
Chloride	mg/L	MW-14	10/06/2014		61.6000	*	7.3000
Chloride	mg/L	MW-14	04/21/2015		78.8000	*	7.3000
Chloride	mg/L	MW-14	10/05/2015		62.0000	*	7.3000
Chloride	mg/L	MW-14	04/26/2016		26.4000	*	7.3000
Chloride	mg/L	MW-14	10/05/2016		38.1000	*	7.3000
Chloride	mg/L	MW-14	04/04/2017		59.0000	*	7.3000
Chloride	mg/L	MW-14	10/10/2017		53.2000	*	7.3000
Chloride	mg/L	MW-14	04/11/2018		48.2000	*	7.3000
Chloride	mg/L	MW-14	10/30/2018		20.5000	*	7.3000
Chloride	mg/L	MW-14	04/01/2019		36.5000	*	7.3000
Chloride	mg/L	MW-14	10/08/2019		30.5000	*	7.3000
Chloride	mg/L	MW-14	04/20/2020		41.6000	*	7.3000
Chloride	mg/L	MW-14	10/20/2020		50.2000	*	7.3000
Chloride	mg/L	MW-14	04/26/2021		51.0000	*	7.3000
Chloride	mg/L	MW-14	08/16/2021		50.3000	*	7.3000
Chloride	mg/L	MW-14	06/01/2022		50.0000	*	7.3000
Chloride	mg/L	MW-14	05/03/2023		58.8000	*	7.3000
Chloride	mg/L	MW-14	10/11/2023		109.0000	*	7.3000
Chloride	mg/L	MW-14	05/02/2024		129.0000	*	7.3000
Chloride	mg/L	MW-14	10/29/2024		130.0000	*	7.3000
Specific Conductance	umhos/cm	MW-14	07/12/1996		528.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/10/1996		690.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	01/21/1997		582.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/17/1997		698.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/04/1997		682.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/22/1998		764.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/19/1998		831.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/30/1999		913.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	09/01/1999		900.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/12/2000		914.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/17/2000		808.0000		1189.0566

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ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-14	04/25/2001		941.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/23/2001		889.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/28/2002		742.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/06/2002		757.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/03/2003		930.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/07/2003		1050.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/30/2004		930.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/12/2004		419.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/26/2005		286.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/11/2005		1237.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/26/2006		1055.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/05/2006		1145.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/23/2007		1146.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/09/2007		1211.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/07/2008		1397.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/14/2008		1254.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/07/2009		1282.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/05/2009		1266.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/01/2010		1246.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/01/2010		1279.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/07/2011		1179.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/27/2011		1158.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	04/23/2012		1177.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/23/2012		1383.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/16/2013		1184.0000		1189.0566
Specific Conductance	umhos/cm	MW-14	10/28/2013		1487.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/24/2014		1403.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/06/2014		1443.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/21/2015		1431.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/05/2015		1423.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/26/2016		1314.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/05/2016		1377.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/04/2017		1272.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/10/2017		1238.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/11/2018		1227.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/30/2018		1317.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/01/2019		1328.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/08/2019		1338.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/20/2020		1541.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/20/2020		1542.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	04/26/2021		1570.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	08/16/2021		1608.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	06/01/2022		1382.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	05/03/2023		1501.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/11/2023		1600.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	05/02/2024		1662.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-14	10/29/2024		1606.0000	*	1189.0566
Chemical Oxygen Demand	mg/L	MW-16	04/20/2020	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-16	10/20/2020		8.2300		21.2000
Chemical Oxygen Demand	mg/L	MW-16	04/26/2021		7.0500		21.2000
Chemical Oxygen Demand	mg/L	MW-16	08/16/2021		9.8900		21.2000
Chemical Oxygen Demand	mg/L	MW-16	06/01/2022		38.2000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-16	10/03/2022		50.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-16	05/03/2023		12.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-16	10/11/2023		28.7000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-16	05/08/2024		12.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-16	10/29/2024		24.6000	*	21.2000
Chloride	mg/L	MW-16	04/20/2020		12.0000	*	7.3000
Chloride	mg/L	MW-16	10/20/2020		27.8000	*	7.3000
Chloride	mg/L	MW-16	04/26/2021		5.5000		7.3000
Chloride	mg/L	MW-16	08/16/2021		8.8000	*	7.3000
Chloride	mg/L	MW-16	06/01/2022		9.7300	*	7.3000
Chloride	mg/L	MW-16	10/03/2022		9.5800	*	7.3000
Chloride	mg/L	MW-16	05/03/2023		6.9500		7.3000
Chloride	mg/L	MW-16	10/11/2023		7.8900	*	7.3000
Chloride	mg/L	MW-16	05/08/2024		6.2700		7.3000
Chloride	mg/L	MW-16	10/29/2024		7.4000	*	7.3000
Specific Conductance	umhos/cm	MW-16	04/20/2020		1524.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-16	10/20/2020		1680.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-16	04/26/2021		1436.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-16	08/16/2021		1382.0000	*	1189.0566

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-16	06/01/2022		1103.0000		1189.0566
Specific Conductance	umhos/cm	MW-16	10/03/2022		1134.0000		1189.0566
Specific Conductance	umhos/cm	MW-16	05/03/2023		1319.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-16	10/11/2023		1432.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-16	05/08/2024		1335.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-16	10/29/2024		1302.0000	*	1189.0566
Chloride	mg/L	MW-8	10/10/1996		12.0000	*	7.3000
Chloride	mg/L	MW-8	01/21/1997		12.0000	*	7.3000
Chloride	mg/L	MW-8	04/17/1997		13.0000	*	7.3000
Chloride	mg/L	MW-8	07/15/1997		15.0000	*	7.3000
Chloride	mg/L	MW-8	10/04/1997		11.0000	*	7.3000
Chloride	mg/L	MW-8	04/22/1998		11.0000	*	7.3000
Chloride	mg/L	MW-8	10/19/1998		12.0000	*	7.3000
Chloride	mg/L	MW-8	04/30/1999		12.0000	*	7.3000
Chloride	mg/L	MW-8	09/01/1999		10.0000	*	7.3000
Chloride	mg/L	MW-8	04/12/2000		8.4000	*	7.3000
Chloride	mg/L	MW-8	10/17/2000		6.2000		7.3000
Chloride	mg/L	MW-8	04/25/2001		9.4000	*	7.3000
Chloride	mg/L	MW-8	10/23/2001		21.6000	*	7.3000
Chloride	mg/L	MW-8	04/28/2002		55.4000	*	7.3000
Chloride	mg/L	MW-8	10/06/2002		26.7000	*	7.3000
Chloride	mg/L	MW-8	04/03/2003		14.2000	*	7.3000
Chloride	mg/L	MW-8	10/07/2003		21.6000	*	7.3000
Chloride	mg/L	MW-8	04/30/2004		14.3000	*	7.3000
Chloride	mg/L	MW-8	10/12/2004		22.8000	*	7.3000
Chloride	mg/L	MW-8	04/26/2005		36.0000	*	7.3000
Chloride	mg/L	MW-8	10/11/2005		37.2000	*	7.3000
Chloride	mg/L	MW-8	04/26/2006		23.9000	*	7.3000
Chloride	mg/L	MW-8	10/05/2006		23.0000	*	7.3000
Chloride	mg/L	MW-8	04/23/2007		24.1000	*	7.3000
Chloride	mg/L	MW-8	10/09/2007		30.2000	*	7.3000
Chloride	mg/L	MW-8	04/07/2008		34.0000	*	7.3000
Chloride	mg/L	MW-8	10/14/2008		32.5000	*	7.3000
Chloride	mg/L	MW-8	04/07/2009		23.3000	*	7.3000
Chloride	mg/L	MW-8	10/05/2009		20.5000	*	7.3000
Chloride	mg/L	MW-8	04/01/2010		14.5000	*	7.3000
Chloride	mg/L	MW-8	10/01/2010		16.9000	*	7.3000
Chloride	mg/L	MW-8	04/07/2011		19.6000	*	7.3000
Chloride	mg/L	MW-8	10/27/2011		16.0000	*	7.3000
Chloride	mg/L	MW-8	04/23/2012		13.5000	*	7.3000
Chloride	mg/L	MW-8	10/23/2012		12.3000	*	7.3000
Chloride	mg/L	MW-8	04/16/2013		11.9000	*	7.3000
Chloride	mg/L	MW-8	10/28/2013		9.8600	*	7.3000
Chloride	mg/L	MW-8	04/24/2014		12.5000	*	7.3000
Chloride	mg/L	MW-8	10/06/2014		11.5000	*	7.3000
Chloride	mg/L	MW-8	04/21/2015		13.9000	*	7.3000
Chloride	mg/L	MW-8	10/05/2015		10.5000	*	7.3000
Chloride	mg/L	MW-8	04/26/2016		18.7000	*	7.3000
Chloride	mg/L	MW-8	10/05/2016		35.8000	*	7.3000
Chloride	mg/L	MW-8	04/04/2017		29.6000	*	7.3000
Chloride	mg/L	MW-8	10/10/2017		20.8000	*	7.3000
Chloride	mg/L	MW-8	04/11/2018		16.4000	*	7.3000
Chloride	mg/L	MW-8	10/30/2018		35.6000	*	7.3000
Chloride	mg/L	MW-8	04/01/2019		30.3000	*	7.3000
Chloride	mg/L	MW-8	10/08/2019		26.3000	*	7.3000
Chloride	mg/L	MW-8	04/20/2020		21.7000	*	7.3000
Chloride	mg/L	MW-8	10/20/2020		21.7000	*	7.3000
Chloride	mg/L	MW-8	04/26/2021		16.3000	*	7.3000
Chloride	mg/L	MW-8	08/16/2021		15.6000	*	7.3000
Chloride	mg/L	MW-8	06/01/2022		13.1000	*	7.3000
Chloride	mg/L	MW-8	10/03/2022		12.8000	*	7.3000
Chloride	mg/L	MW-8	05/03/2023		12.9000	*	7.3000
Chloride	mg/L	MW-8	10/11/2023		12.7000	*	7.3000
Chloride	mg/L	MW-8	05/08/2024		12.3000	*	7.3000
Chloride	mg/L	MW-8	10/29/2024		16.5000	*	7.3000
Specific Conductance	umhos/cm	MW-8	10/10/1996		923.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	01/21/1997		823.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/17/1997		896.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	07/15/1997		929.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	10/04/1997		888.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/22/1998		945.0000		1189.0566

* - Significantly increased over background.
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Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-8	10/19/1998		1003.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/30/1999		1050.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	09/01/1999		1092.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/12/2000		970.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	10/17/2000		942.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/25/2001		1034.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	10/23/2001		538.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/28/2002		984.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	10/06/2002		895.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/03/2003		1060.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	10/07/2003		1115.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/30/2004		832.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	10/12/2004		563.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	04/26/2005		90.0000		1189.0566
Specific Conductance	umhos/cm	MW-8	10/11/2005		1529.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/26/2006		1337.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/05/2006		1351.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/23/2007		1258.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/09/2007		1402.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/07/2008		1574.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/14/2008		1366.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/07/2009		1331.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/05/2009		1271.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/01/2010		1312.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/01/2010		1321.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/07/2011		1215.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/27/2011		1269.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/23/2012		1223.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/23/2012		1427.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/16/2013		1419.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/28/2013		1362.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/24/2014		1345.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/06/2014		1339.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/21/2015		1389.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/05/2015		1380.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/26/2016		1442.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/05/2016		1585.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/04/2017		1326.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/10/2017		1245.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/11/2018		1232.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/30/2018		1473.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/01/2019		1507.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/08/2019		1564.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/20/2020		1622.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/20/2020		1557.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	04/26/2021		1618.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	08/16/2021		1834.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	06/01/2022		1466.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/03/2022		1456.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	05/03/2023		1390.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/11/2023		1393.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	05/08/2024		1290.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-8	10/29/2024		1248.0000	*	1189.0566
Ammonia as N	mg/L	MW-9	10/10/1996	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	01/21/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/17/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	07/15/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/04/1997	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/22/1998	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/19/1998	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/30/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	09/01/1999	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/12/2004		0.3100	*	0.2000
Ammonia as N	mg/L	MW-9	04/26/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/11/2005	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/26/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/05/2006	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/23/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/09/2007	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/07/2008	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/14/2008	ND	0.2000		0.2000

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Constituent	Units	Well	Date		Result		Pred. Limit
Ammonia as N	mg/L	MW-9	04/07/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/05/2009	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/01/2010	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/07/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/27/2011	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/28/2013	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/06/2014	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/05/2015	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/26/2016	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/05/2016	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/04/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/10/2017	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/11/2018	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/30/2018		0.2010	*	0.2000
Ammonia as N	mg/L	MW-9	04/01/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/08/2019	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/20/2020	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	04/26/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	08/16/2021	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	05/08/2024	ND	0.2000		0.2000
Ammonia as N	mg/L	MW-9	10/29/2024		0.4370	*	0.2000
Chemical Oxygen Demand	mg/L	MW-9	10/10/1996	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	01/21/1997		6.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/17/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	07/15/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/04/1997	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/22/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/19/1998	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/30/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	09/01/1999	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/12/2004	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/26/2005		6.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/11/2005	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/26/2006	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2006		7.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/23/2007		9.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/09/2007	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/07/2008	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/14/2008		8.2000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/07/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2009	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/01/2010	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/07/2011	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/27/2011		7.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/28/2013		8.9000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/06/2014	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2015		5.2900		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/26/2016		77.8000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/05/2016		6.0400		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/04/2017	ND	5.0000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/10/2017		17.7000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/11/2018		19.1000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/30/2018		22.4000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/01/2019		55.1000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/08/2019		22.3000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/20/2020		19.6000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/20/2020		15.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	04/26/2021		19.4000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	08/16/2021		171.0000	*	21.2000
Chemical Oxygen Demand	mg/L	MW-9	05/08/2024		17.5000		21.2000
Chemical Oxygen Demand	mg/L	MW-9	10/29/2024		70.1000	*	21.2000
Chloride	mg/L	MW-9	10/10/1996		8.7000	*	7.3000
Chloride	mg/L	MW-9	01/21/1997		10.0000	*	7.3000
Chloride	mg/L	MW-9	04/17/1997		11.0000	*	7.3000
Chloride	mg/L	MW-9	07/15/1997		12.0000	*	7.3000
Chloride	mg/L	MW-9	10/04/1997		11.0000	*	7.3000
Chloride	mg/L	MW-9	04/22/1998		11.3000	*	7.3000
Chloride	mg/L	MW-9	10/19/1998		11.0000	*	7.3000

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

Constituent	Units	Well	Date		Result		Pred. Limit
Chloride	mg/L	MW-9	04/30/1999		9.7000	*	7.3000
Chloride	mg/L	MW-9	09/01/1999		10.0000	*	7.3000
Chloride	mg/L	MW-9	10/12/2004		8.9000	*	7.3000
Chloride	mg/L	MW-9	04/26/2005		7.9000	*	7.3000
Chloride	mg/L	MW-9	10/11/2005		8.4000	*	7.3000
Chloride	mg/L	MW-9	04/26/2006		8.0700	*	7.3000
Chloride	mg/L	MW-9	10/05/2006		8.8000	*	7.3000
Chloride	mg/L	MW-9	04/23/2007		8.2400	*	7.3000
Chloride	mg/L	MW-9	10/09/2007		8.0200	*	7.3000
Chloride	mg/L	MW-9	04/07/2008		9.7000	*	7.3000
Chloride	mg/L	MW-9	10/14/2008		10.6000	*	7.3000
Chloride	mg/L	MW-9	04/07/2009		11.3000	*	7.3000
Chloride	mg/L	MW-9	10/05/2009		11.8000	*	7.3000
Chloride	mg/L	MW-9	04/01/2010		11.8000	*	7.3000
Chloride	mg/L	MW-9	10/01/2010		12.5000	*	7.3000
Chloride	mg/L	MW-9	04/07/2011		12.6000	*	7.3000
Chloride	mg/L	MW-9	10/27/2011		14.3000	*	7.3000
Chloride	mg/L	MW-9	10/28/2013		12.0000	*	7.3000
Chloride	mg/L	MW-9	10/06/2014		12.9000	*	7.3000
Chloride	mg/L	MW-9	10/05/2015		13.9000	*	7.3000
Chloride	mg/L	MW-9	04/26/2016		96.9000	*	7.3000
Chloride	mg/L	MW-9	10/05/2016		29.3000	*	7.3000
Chloride	mg/L	MW-9	04/04/2017		33.6000	*	7.3000
Chloride	mg/L	MW-9	10/10/2017		34.3000	*	7.3000
Chloride	mg/L	MW-9	04/11/2018		39.3000	*	7.3000
Chloride	mg/L	MW-9	10/30/2018		31.1000	*	7.3000
Chloride	mg/L	MW-9	04/01/2019		43.3000	*	7.3000
Chloride	mg/L	MW-9	10/08/2019		55.9000	*	7.3000
Chloride	mg/L	MW-9	04/20/2020		40.6000	*	7.3000
Chloride	mg/L	MW-9	10/20/2020		50.1000	*	7.3000
Chloride	mg/L	MW-9	04/26/2021		27.7000	*	7.3000
Chloride	mg/L	MW-9	08/16/2021		34.0000	*	7.3000
Chloride	mg/L	MW-9	05/08/2024		11.6000	*	7.3000
Chloride	mg/L	MW-9	10/29/2024		31.7000	*	7.3000
Specific Conductance	umhos/cm	MW-9	10/10/1996		895.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	01/21/1997		787.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/17/1997		882.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	07/15/1997		922.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/04/1997		887.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/22/1998		900.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/19/1998		956.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/30/1999		992.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	09/01/1999		992.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/12/2004		527.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/26/2005		146.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/11/2005		1128.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/26/2006		1054.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/05/2006		1058.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/23/2007		1069.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/09/2007		1056.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/07/2008		1259.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	10/14/2008		1022.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/07/2009		1037.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/05/2009		992.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/01/2010		1215.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	10/01/2010		1066.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/07/2011		914.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/27/2011		928.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/28/2013		1157.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/06/2014		1153.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/05/2015		1198.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	04/26/2016		1462.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	10/05/2016		1206.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	04/04/2017		1009.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/10/2017		911.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	04/11/2018		1011.0000		1189.0566
Specific Conductance	umhos/cm	MW-9	10/30/2018		1283.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	04/01/2019		1280.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	10/08/2019		1291.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	04/20/2020		1457.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	10/20/2020		1381.0000	*	1189.0566

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

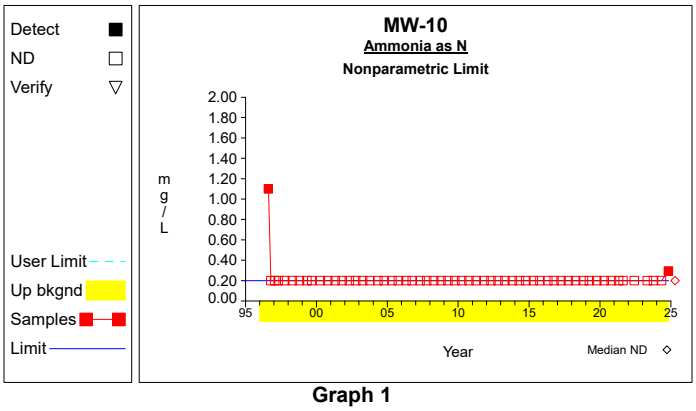
Table 8

Historical Downgradient Data for Constituent-Well Combinations that Failed the Current Statistical Evaluation or are in Verification Resampling Mode

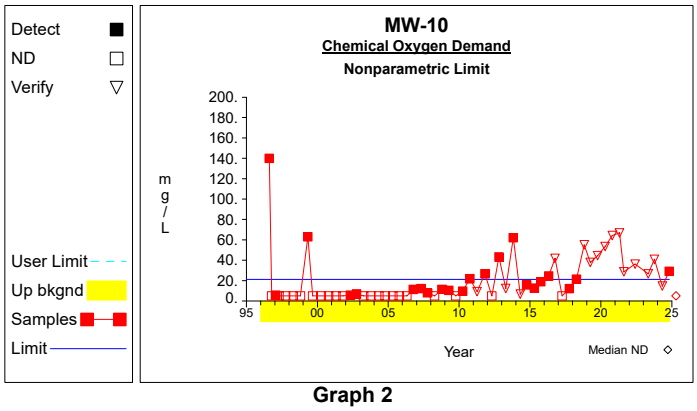
Constituent	Units	Well	Date		Result		Pred. Limit
Specific Conductance	umhos/cm	MW-9	04/26/2021		1635.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	08/16/2021		1674.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	05/08/2024		1287.0000	*	1189.0566
Specific Conductance	umhos/cm	MW-9	10/29/2024		1146.0000		1189.0566

* - Significantly increased over background.
** - Detect at limit for 100% NDs in background (NPPL only).
*** - Manual exclusion.
ND = Not Detected, Result = detection limit.

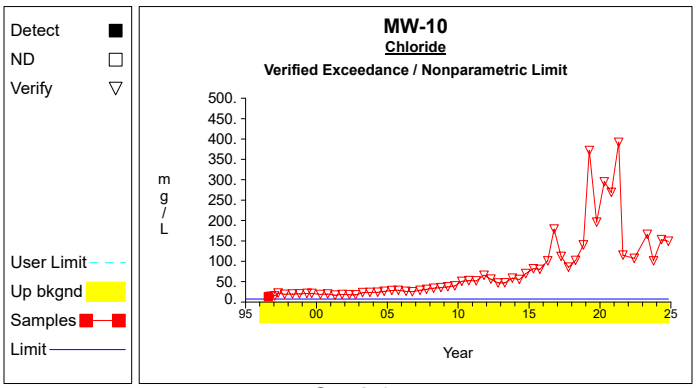
Up vs. Down Prediction Limits



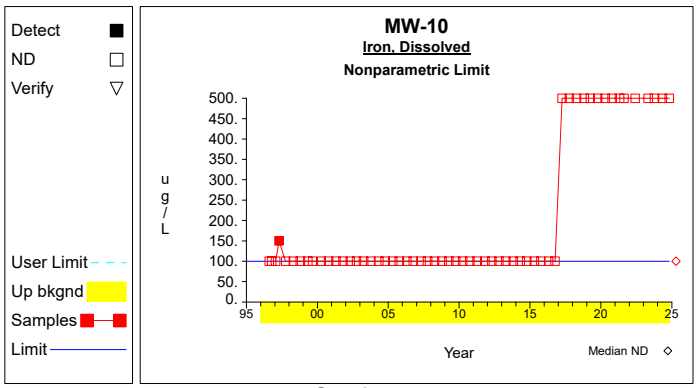
Graph 1



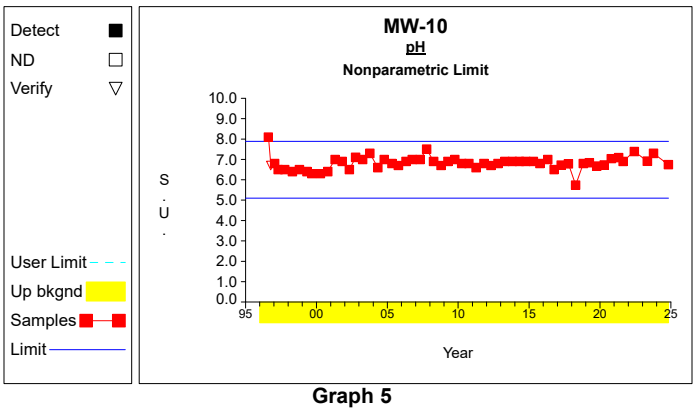
Graph 2



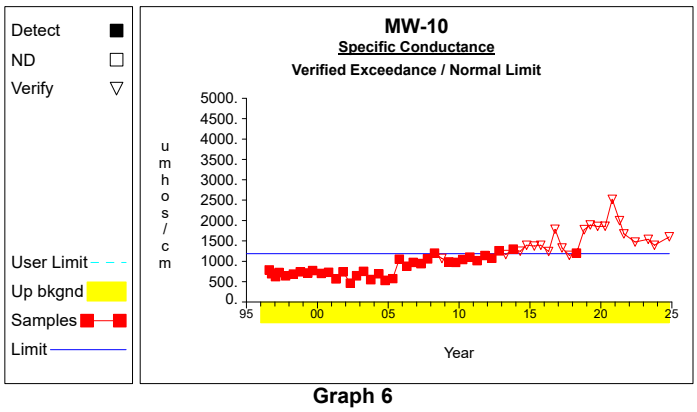
Graph 3



Graph 4

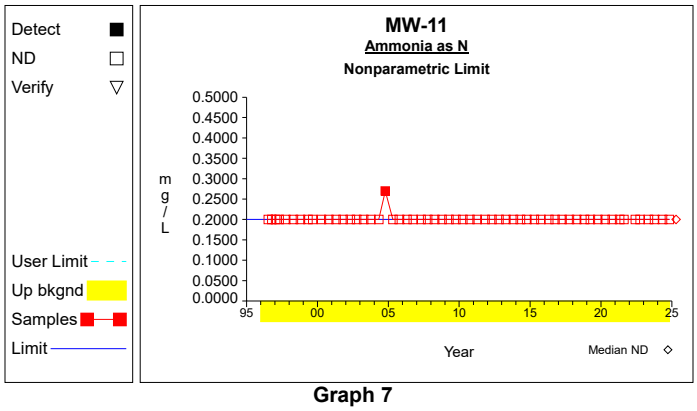


Graph 5

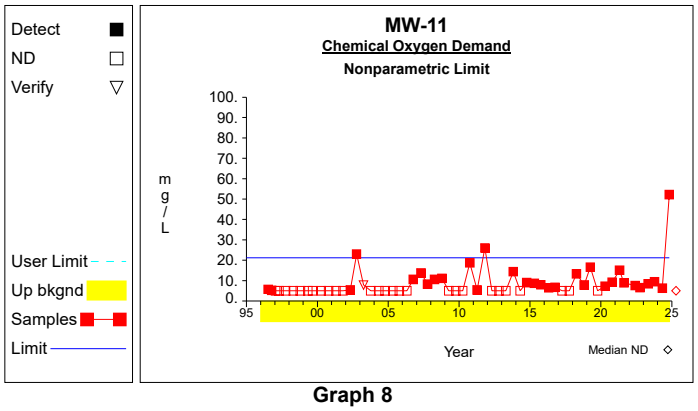


Graph 6

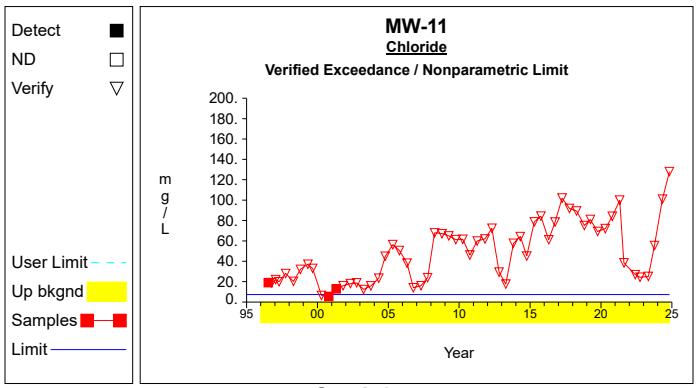
Up vs. Down Prediction Limits



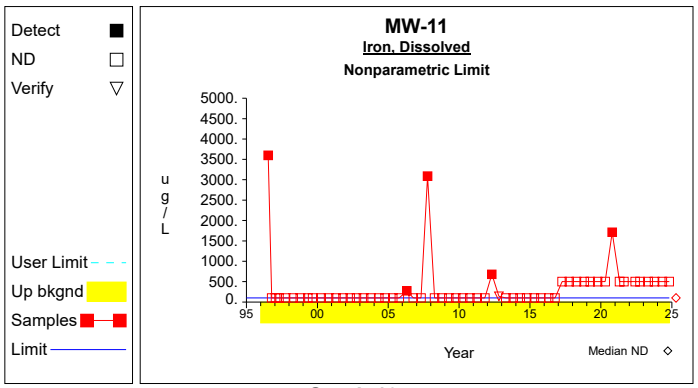
Graph 7



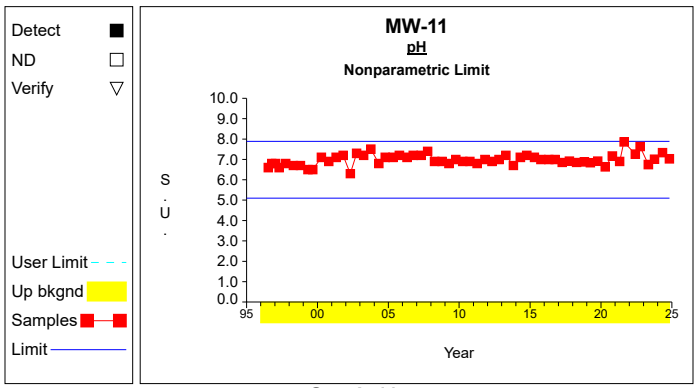
Graph 8



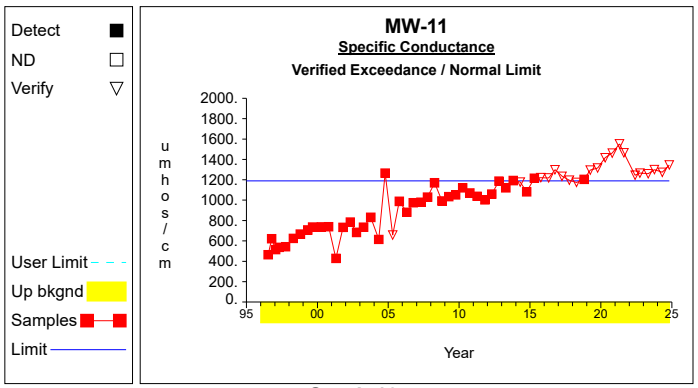
Graph 9



Graph 10

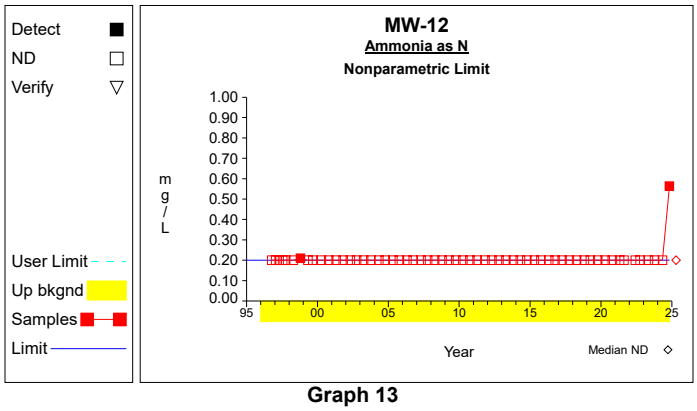


Graph 11

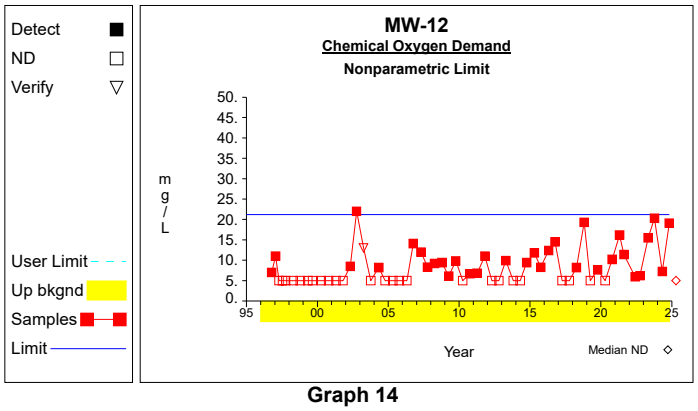


Graph 12

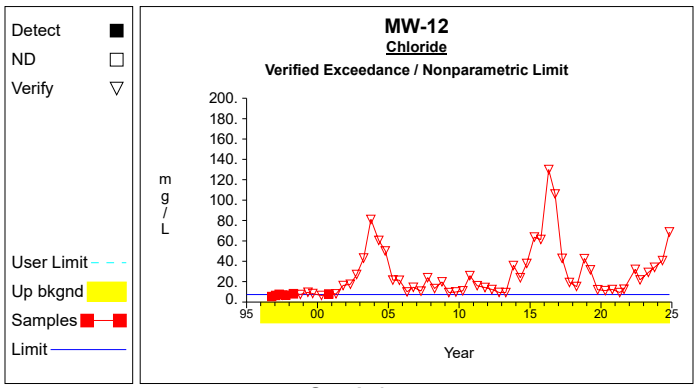
Up vs. Down Prediction Limits



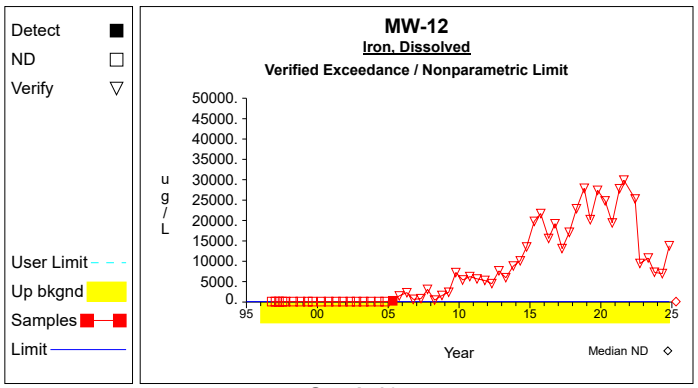
Graph 13



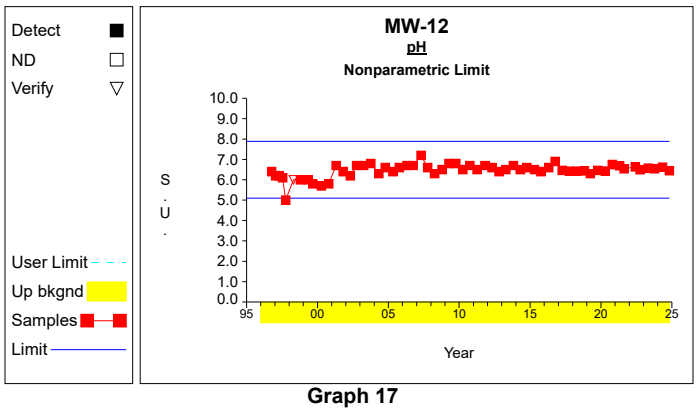
Graph 14



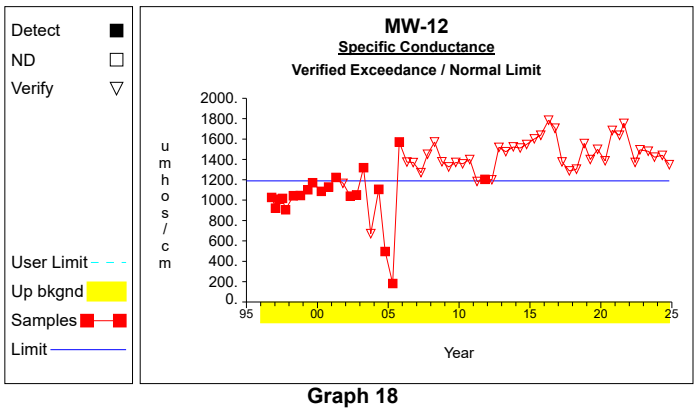
Graph 15



Graph 16

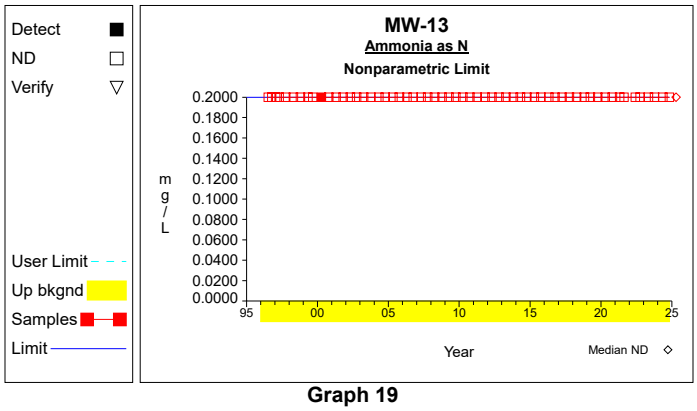


Graph 17

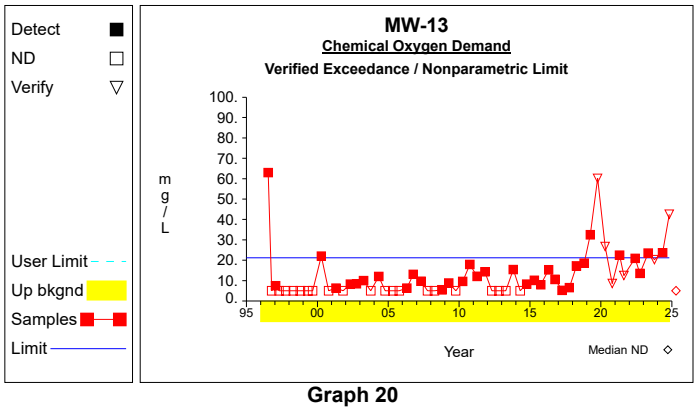


Graph 18

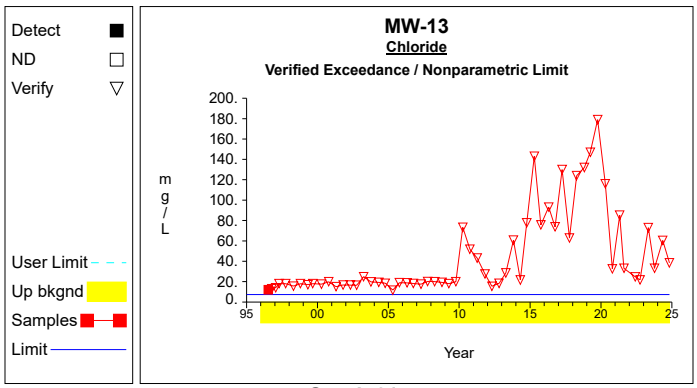
Up vs. Down Prediction Limits



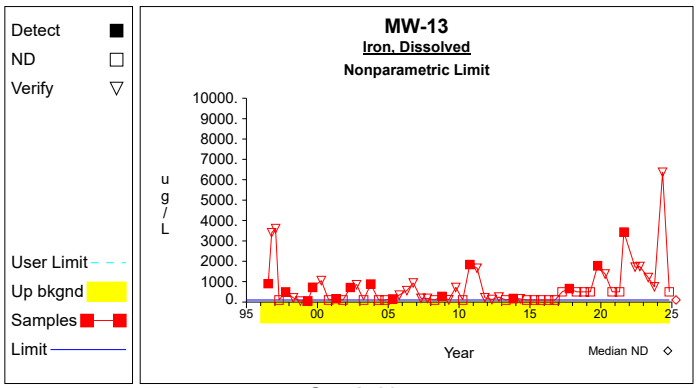
Graph 19



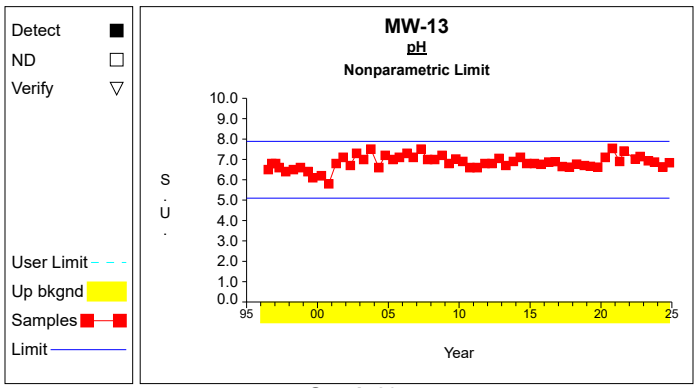
Graph 20



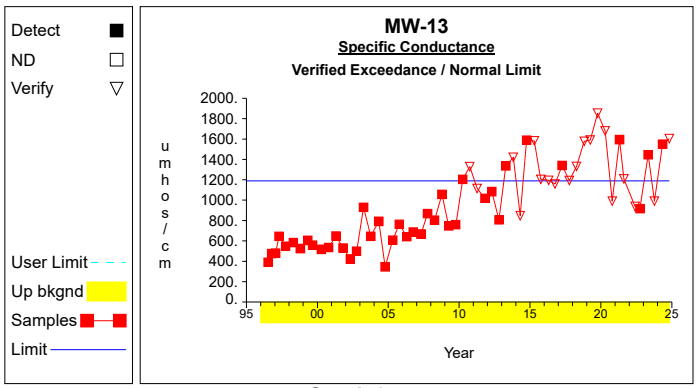
Graph 21



Graph 22

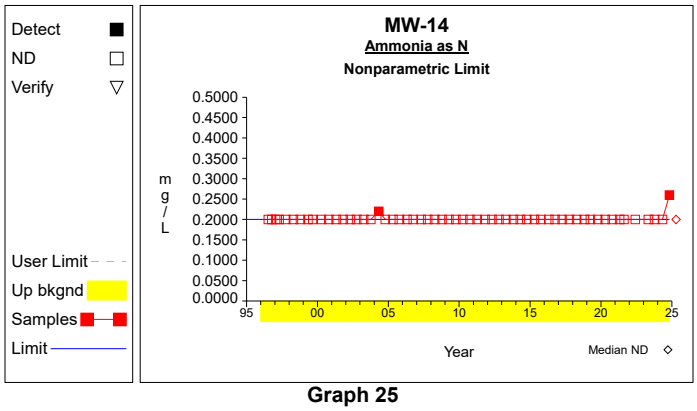


Graph 23

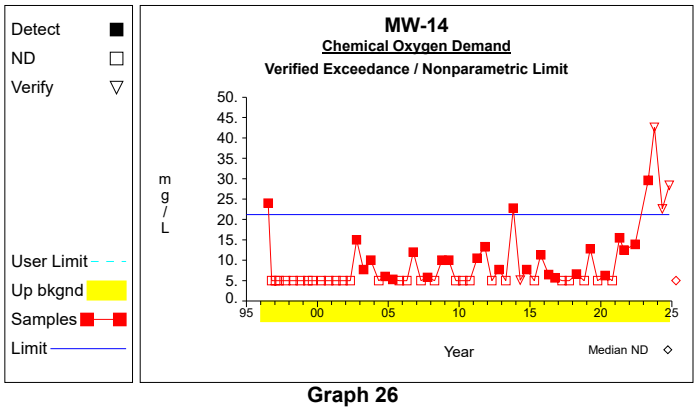


Graph 24

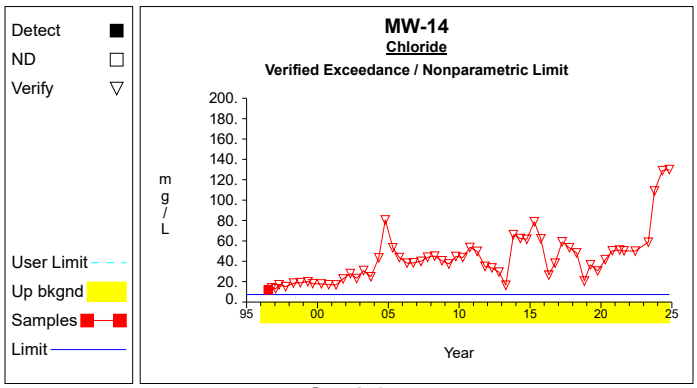
Up vs. Down Prediction Limits



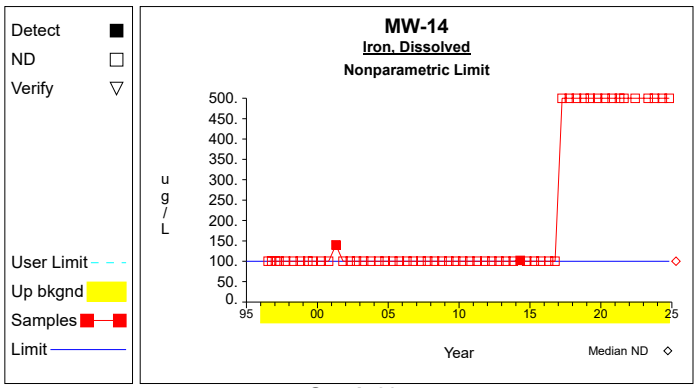
Graph 25



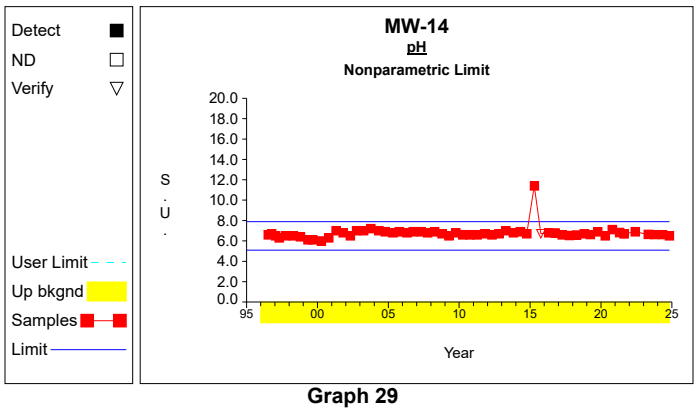
Graph 26



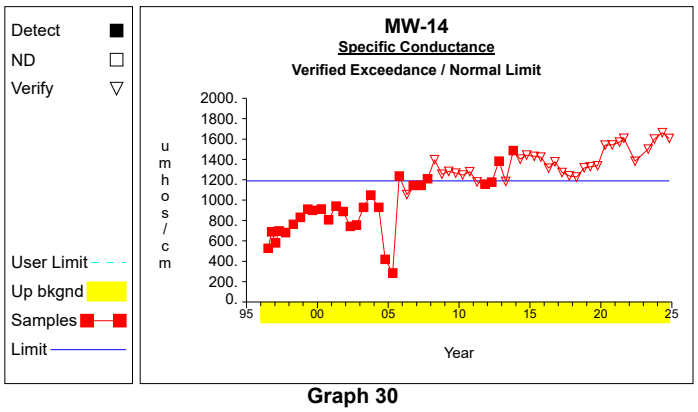
Graph 27



Graph 28

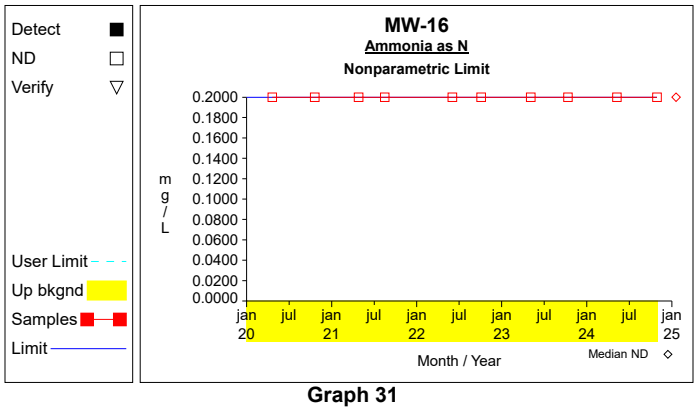


Graph 29

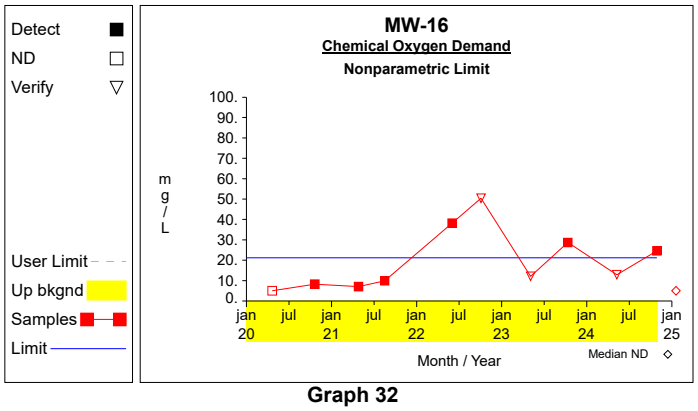


Graph 30

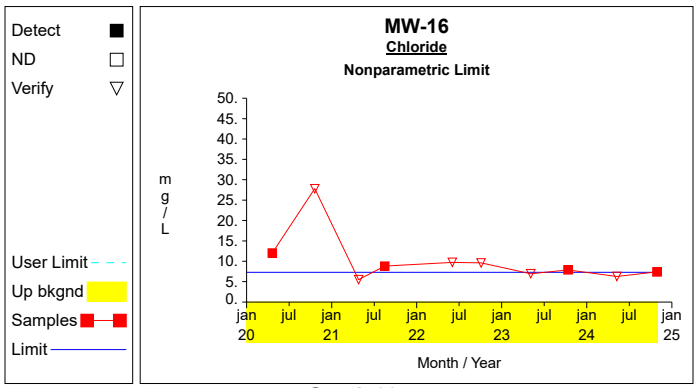
Up vs. Down Prediction Limits



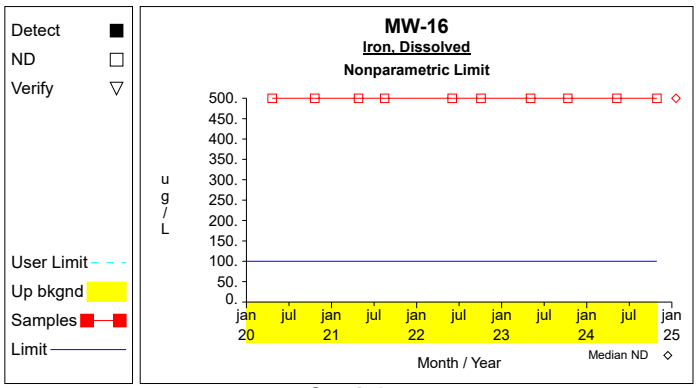
Graph 31



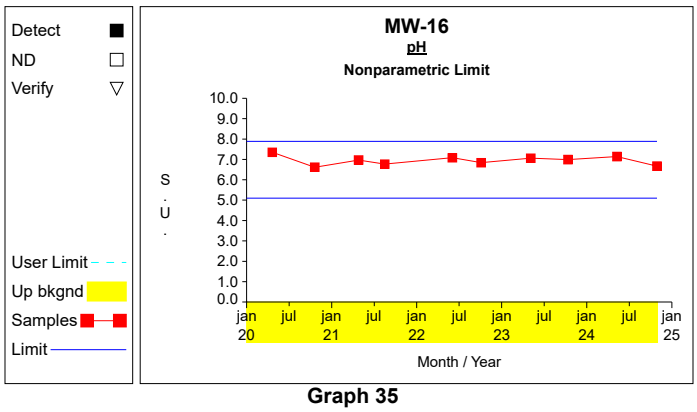
Graph 32



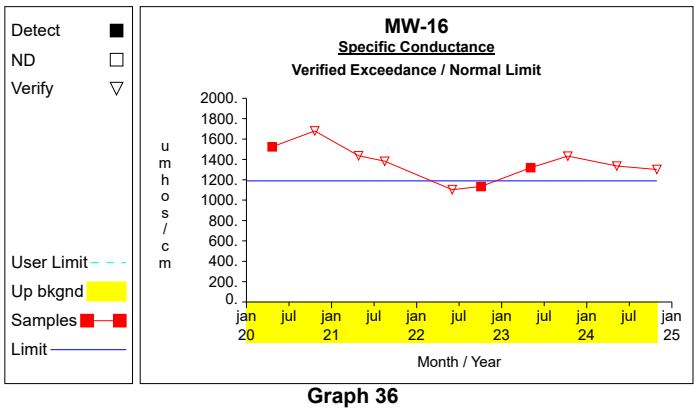
Graph 33



Graph 34

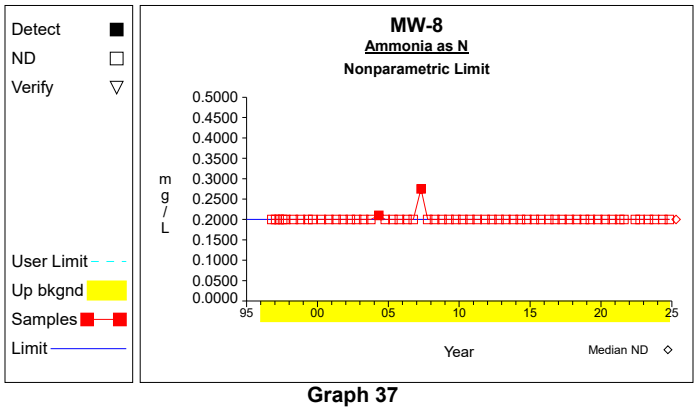


Graph 35

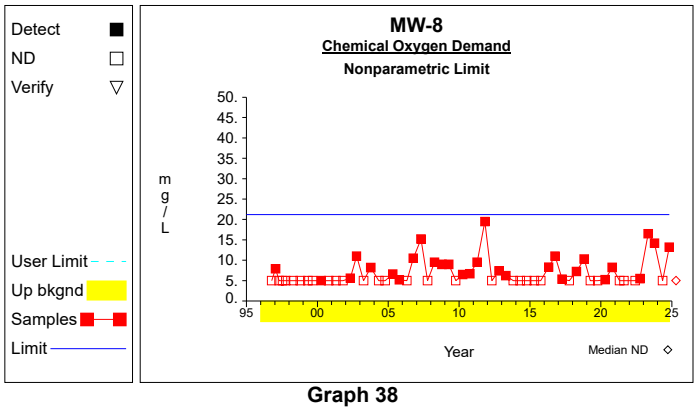


Graph 36

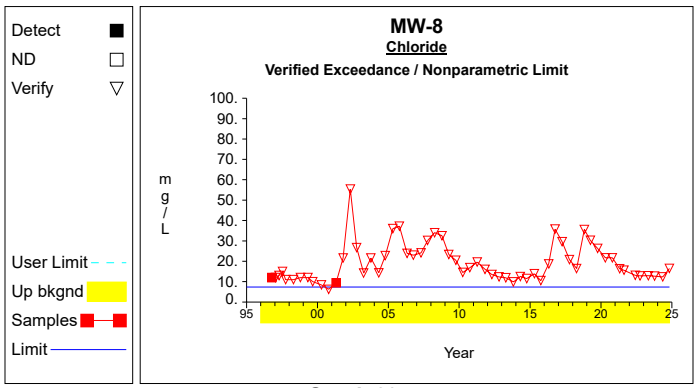
Up vs. Down Prediction Limits



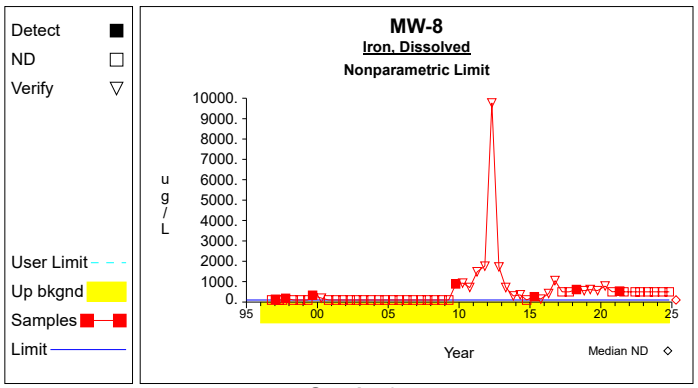
Graph 37



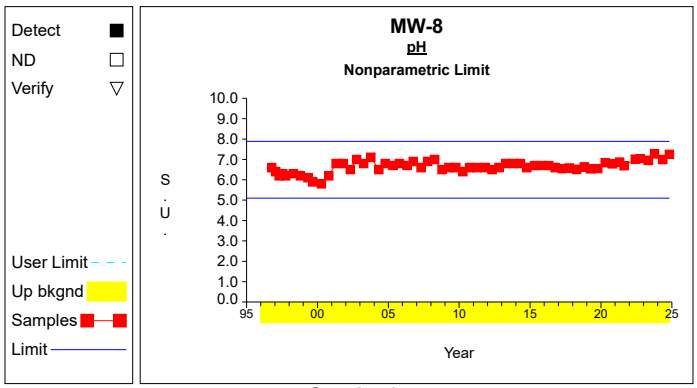
Graph 38



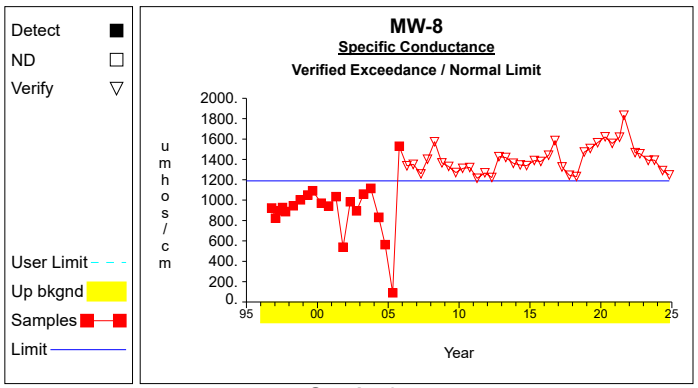
Graph 39



Graph 40

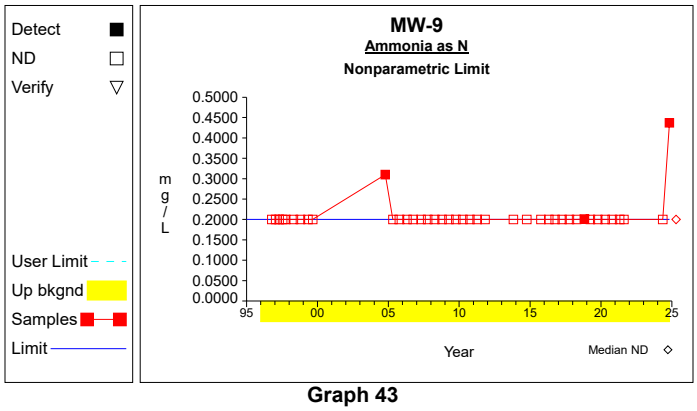


Graph 41

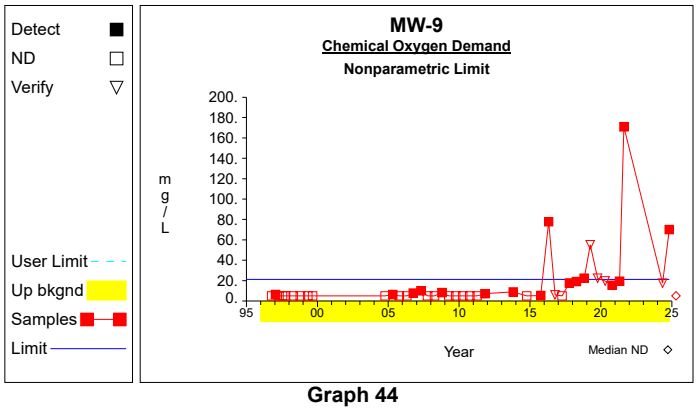


Graph 42

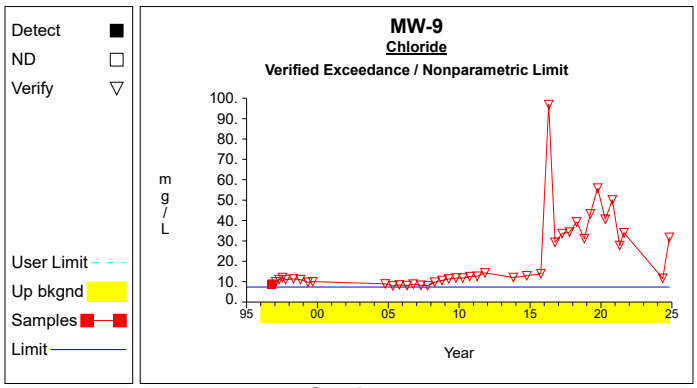
Up vs. Down Prediction Limits



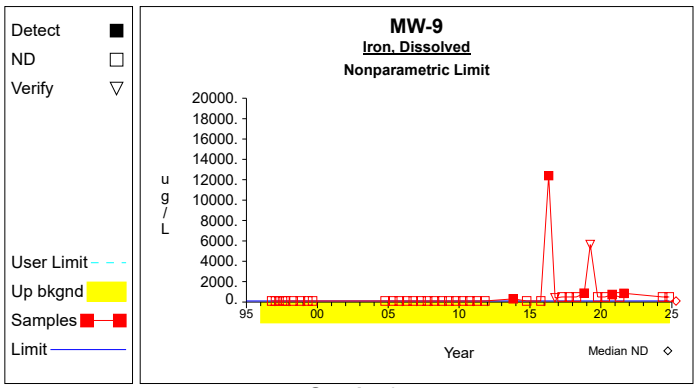
Graph 43



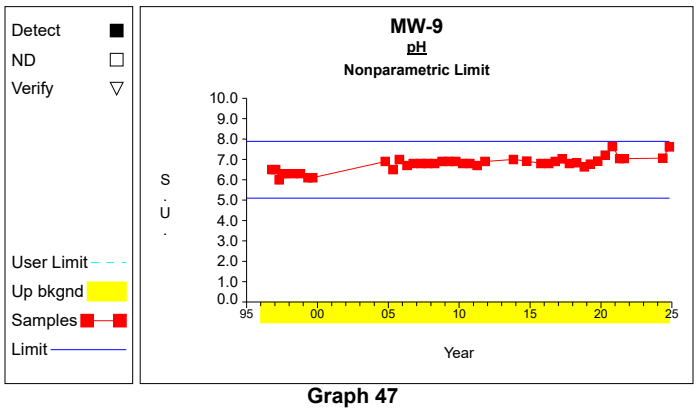
Graph 44



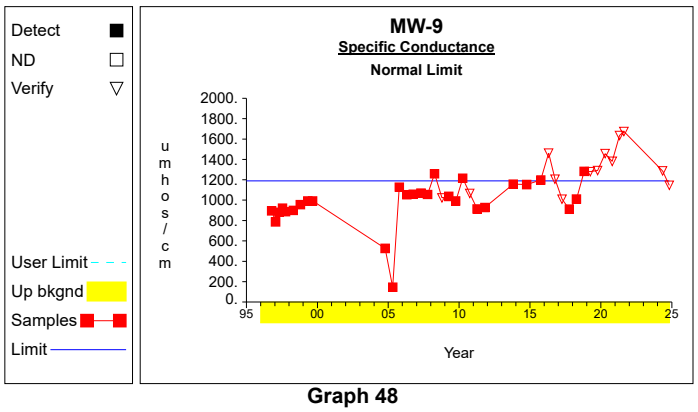
Graph 45



Graph 46



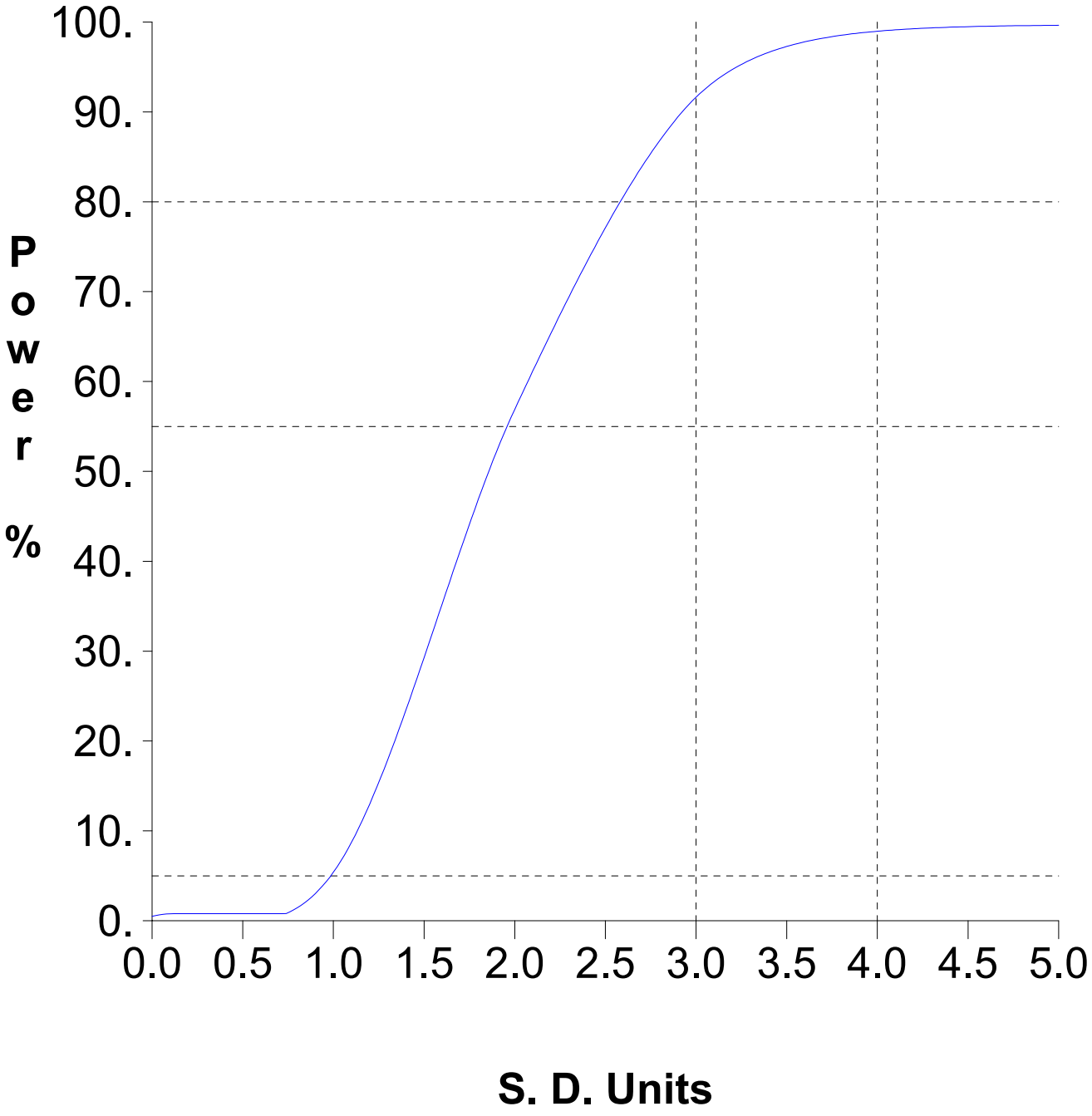
Graph 47



Graph 48

False Positive and False Negative Rates for Current

Upgradient vs. Downgradient Monitoring Program



Worksheet 1 - Upgradient vs. Downgradient Comparisons
Ammonia as N (mg/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = median(X) = **0.2**	Compute nonparametric prediction limit as median reporting limit in background.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Chemical Oxygen Demand (mg/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = max(X) = **21.2**	Compute nonparametric prediction limit as largest background measurement.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Chloride (mg/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = max(X) = **7.3**	Compute nonparametric prediction limit as largest background measurement.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Iron, Dissolved (ug/L)
Nonparametric Prediction Limit

Step	Equation	Description
1	PL = median(X) = **100.0**	Compute nonparametric prediction limit as median reporting limit in background.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
pH (S.U.)
Nonparametric Prediction Limit

Step	Equation	Description
1	$PL_{(low)}$ = min(X) = **5.1** $PL_{(high)}$ = max(X) = **7.89**	Compute nonparametric prediction interval as minimum and maximum measurements.
2	Conf = **0.99**	Confidence level is based on N, K and resampling strategy (see Gibbons 1994).

Worksheet 1 - Upgradient vs. Downgradient Comparisons
Specific Conductance (umhos/cm)
Normal Prediction Limit

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **37642.0** / **54** = **697.074**	Compute upgradient mean.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.84**x**10^7** - **1.42**x**10^9**/**54**) / (**54**-1))^{½} = **203.227**	Compute upgradient sd.
3	alpha = min[(1-.95$^{1/\mathbf{K}}$)^{½}, .01] = min[(1-.95$^{1/\mathbf{48}}$)^{½}, .01] = **0.01**	Adjusted per comparison false positive rate. Pass initial or 1 resample.
4	PL = $\overline{\mathbf{X}}$ + **tS**(1+1/**N**)^{½} = **697.074** + (**2.399*****203.227**)(1+1/**54**)^{½} = **1189.057**	One-sided normal prediction limit (t is Student's t on N-1 degrees of freedom and 1-alpha confidence level).

Attachment F

Assessment Statistics on Verified VOCs
Second Semi-Annual Monitoring Event in 2024

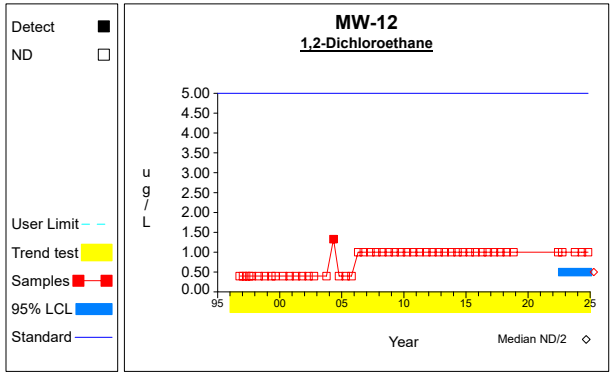
Table 1

Confidence Intervals for Comparing the Mean of the Last 4 Measurements to an Assessment Monitoring Standard

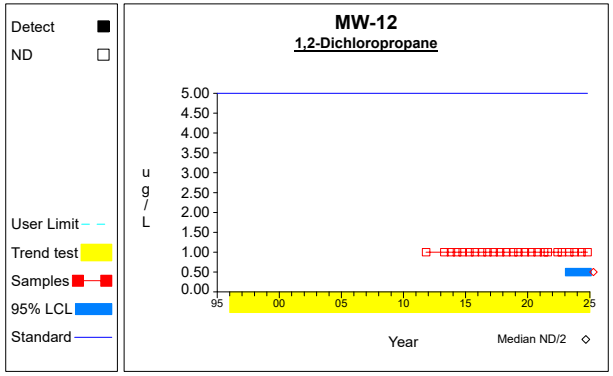
Constituent	Units	Well	N	Mean	SD	Factor	95% LCL	95% UCL	Standard	Trend	
1,2-Dichloroethane	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000		
1,2-Dichloropropane	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000		
Benzene	ug/L	MW-12	4	1.106	0.207	1.176	0.863	1.349	5.000	dec	
cis-1,2-Dichloroethene	ug/L	MW-12	4	28.500	6.818	1.176	20.481	36.519	70.000		
Tetrachloroethene	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000		
Trichloroethene	ug/L	MW-12	4	0.500	0.000	1.176	0.500	0.500	5.000	dec	
Vinyl Chloride	ug/L	MW-12	4	4.383	0.801	1.176	3.440	5.325	2.000	inc	**
1,2-Dichloroethane	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
1,2-Dichloropropane	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
Benzene	ug/L	MW-14	4	0.427	0.213	1.176	0.176	0.678	5.000		
cis-1,2-Dichloroethene	ug/L	MW-14	4	41.625	5.509	1.176	35.145	48.105	70.000		
Tetrachloroethene	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
Trichloroethene	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	5.000		
Vinyl Chloride	ug/L	MW-14	4	0.500	0.000	1.176	0.500	0.500	2.000		
1,2-Dichloroethane	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	5.000		
1,2-Dichloropropane	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	5.000		
Benzene	ug/L	MW-16	4	0.250	0.000	1.176	0.250	0.250	5.000		
cis-1,2-Dichloroethene	ug/L	MW-16	4	2.540	4.080	1.176	0.000	7.339	70.000		
Tetrachloroethene	ug/L	MW-16	4	0.763	0.525	1.176	0.145	1.380	5.000		
Trichloroethene	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	5.000		
Vinyl Chloride	ug/L	MW-16	4	0.500	0.000	1.176	0.500	0.500	2.000		
1,2-Dichloroethane	ug/L	MW-7	4	1.035	0.659	1.176	0.260	1.810	5.000		
1,2-Dichloropropane	ug/L	MW-7	4	10.900	3.472	1.176	6.816	14.984	5.000		**
Benzene	ug/L	MW-7	4	0.808	0.083	1.176	0.710	0.906	5.000		
cis-1,2-Dichloroethene	ug/L	MW-7	4	181.000	37.674	1.176	136.684	225.316	70.000		**
Tetrachloroethene	ug/L	MW-7	4	1.633	0.889	1.176	0.586	2.679	5.000	dec	
Trichloroethene	ug/L	MW-7	4	9.920	3.484	1.176	5.822	14.018	5.000		**
Vinyl Chloride	ug/L	MW-7	4	5.638	2.728	1.176	2.428	8.847	2.000	inc	**
1,2-Dichloroethane	ug/L	MW-8	4	0.500	0.000	1.176	0.500	0.500	5.000	dec	
1,2-Dichloropropane	ug/L	MW-8	4	0.665	0.330	1.176	0.277	1.053	5.000		
Benzene	ug/L	MW-8	4	0.250	0.000	1.176	0.250	0.250	5.000		
cis-1,2-Dichloroethene	ug/L	MW-8	4	42.850	19.304	1.176	20.143	65.557	70.000		
Tetrachloroethene	ug/L	MW-8	4	0.500	0.000	1.176	0.500	0.500	5.000		
Trichloroethene	ug/L	MW-8	4	0.658	0.315	1.176	0.287	1.028	5.000	dec	
Vinyl Chloride	ug/L	MW-8	4	1.300	0.706	1.176	0.469	2.131	2.000		

* - Insufficient Data
** - Significant Exceedance
LCL = Lower Confidence Limit
UCL = Upper Confidence Limit

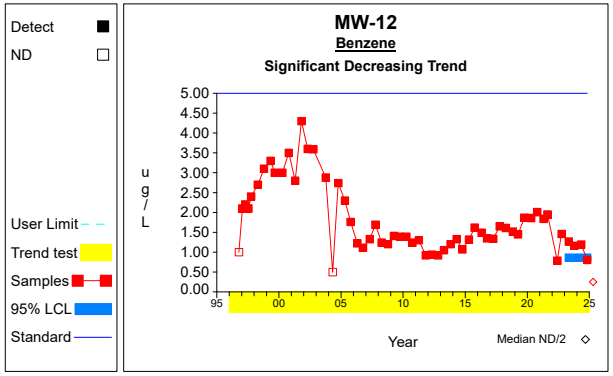
Confidence Limits (Assessment)



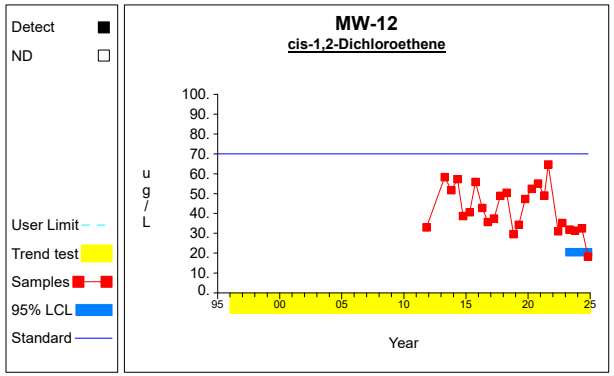
Graph 1



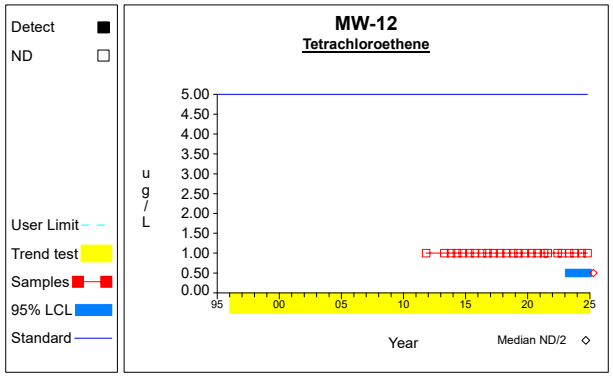
Graph 2



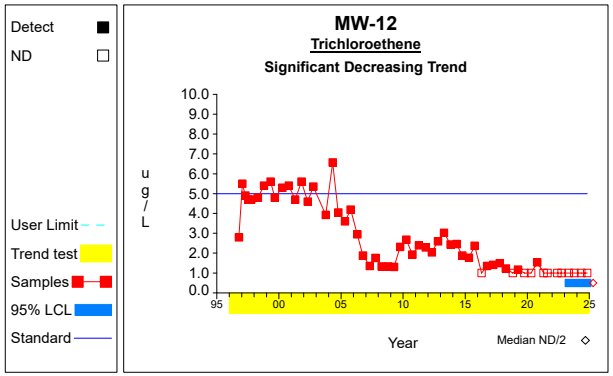
Graph 3



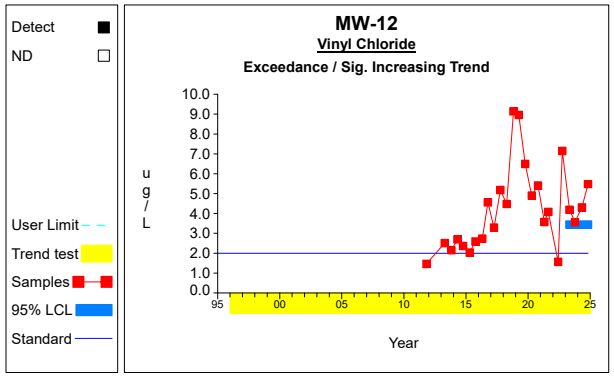
Graph 4



Graph 5

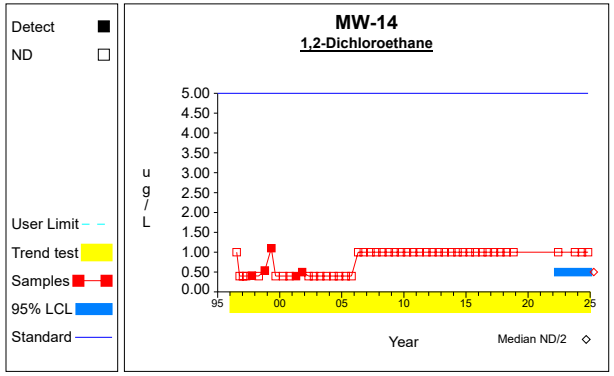


Graph 6

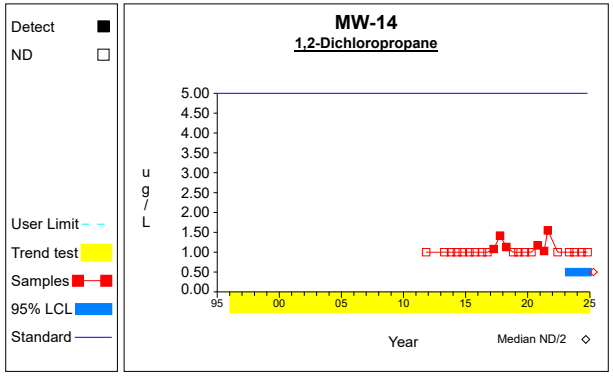


Graph 7

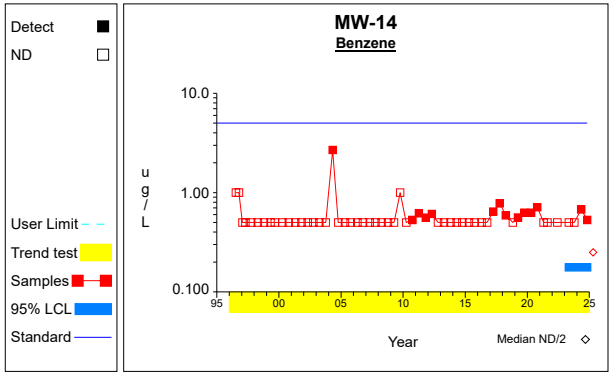
Confidence Limits (Assessment)



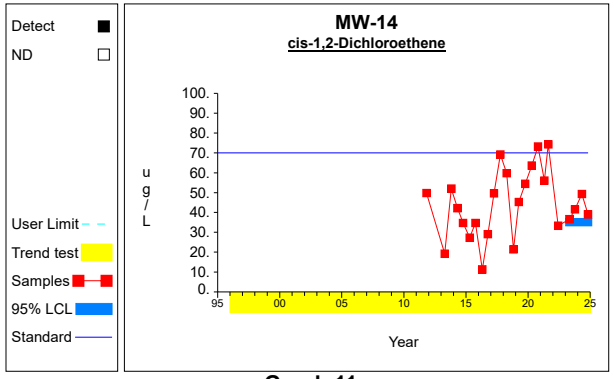
Graph 8



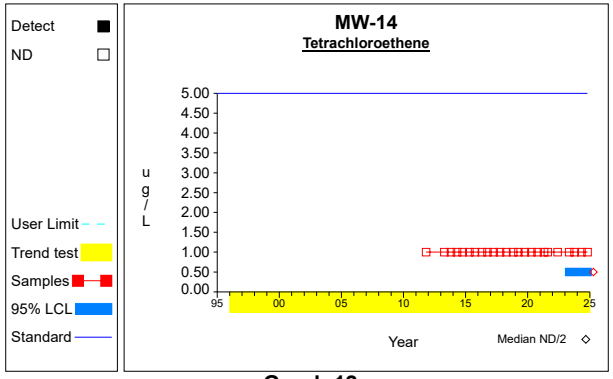
Graph 9



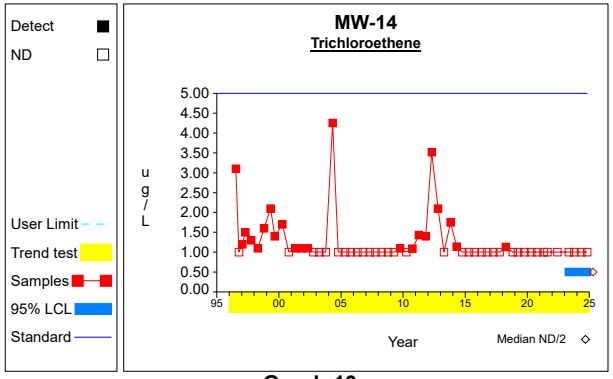
Graph 10



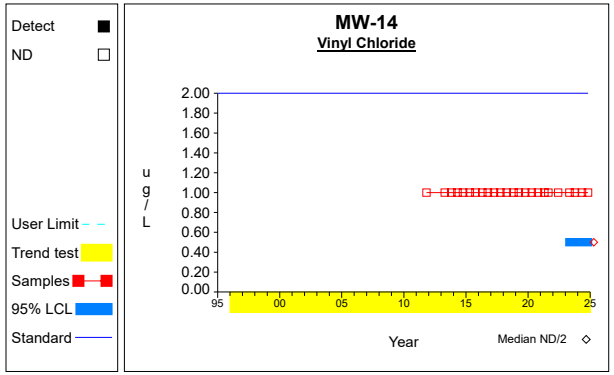
Graph 11



Graph 12

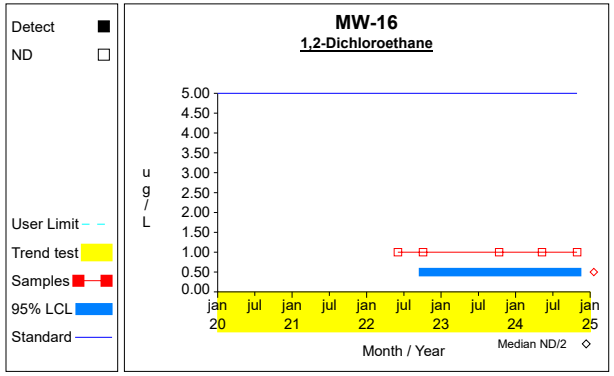


Graph 13

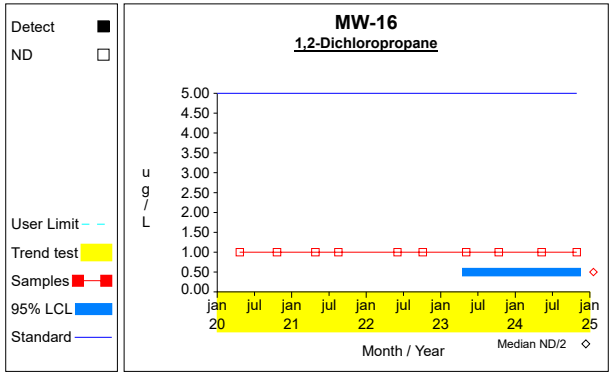


Graph 14

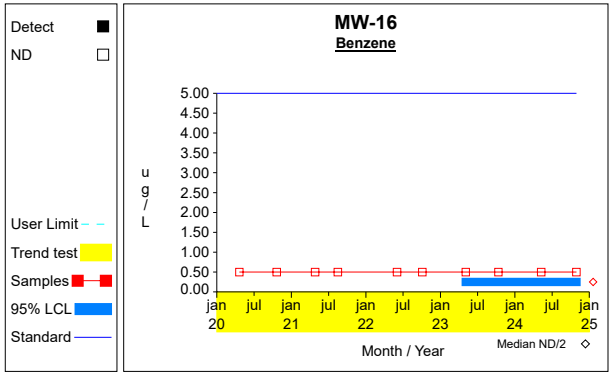
Confidence Limits (Assessment)



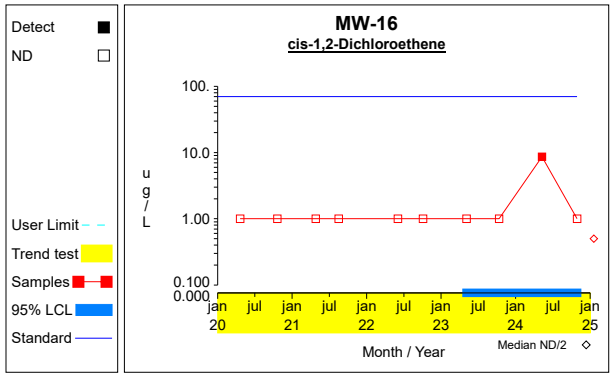
Graph 15



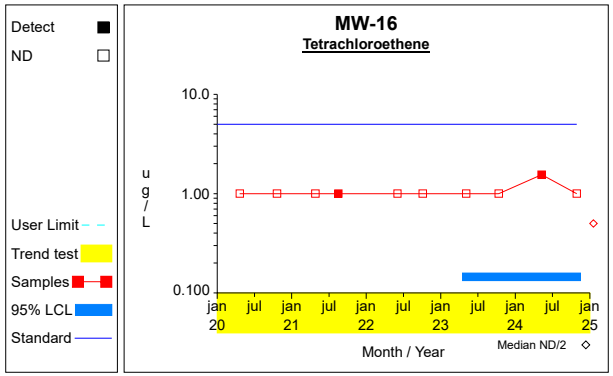
Graph 16



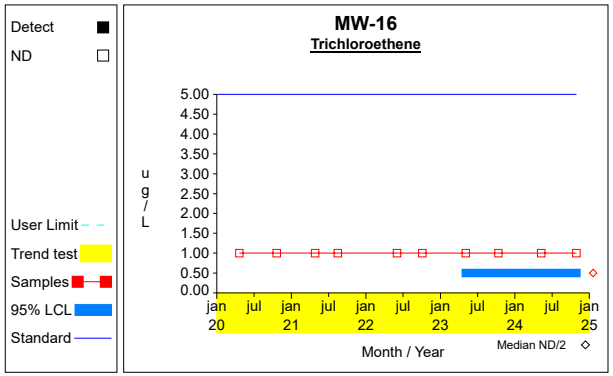
Graph 17



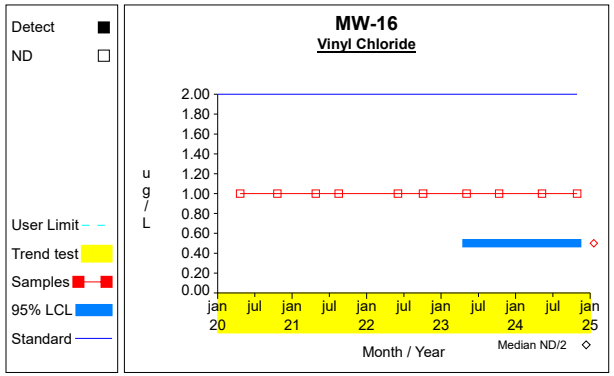
Graph 18



Graph 19

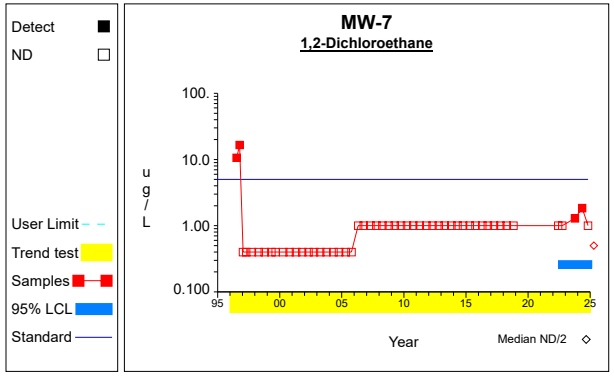


Graph 20

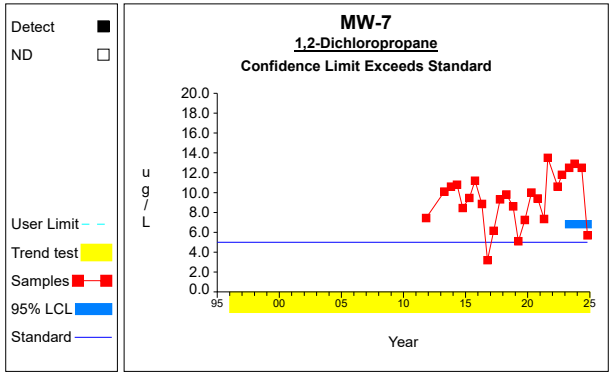


Graph 21

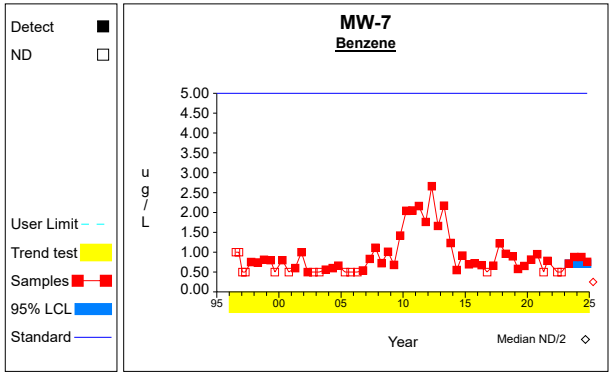
Confidence Limits (Assessment)



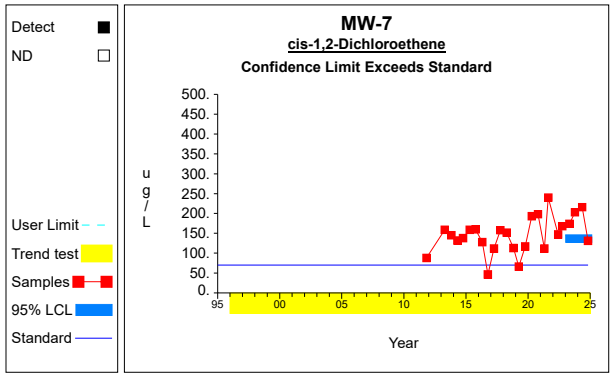
Graph 22



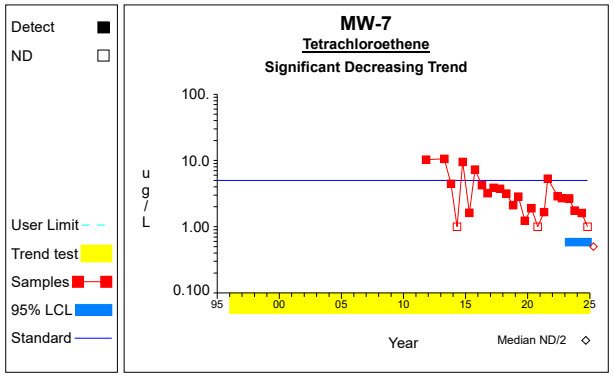
Graph 23



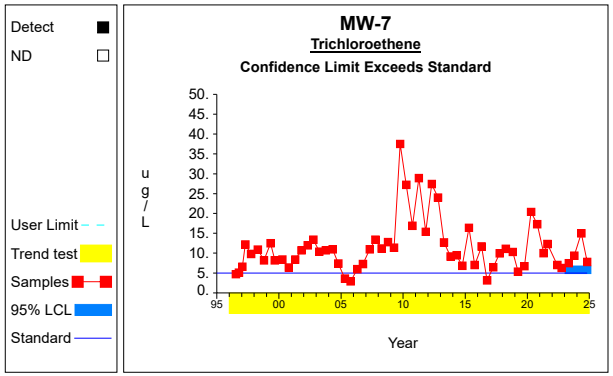
Graph 24



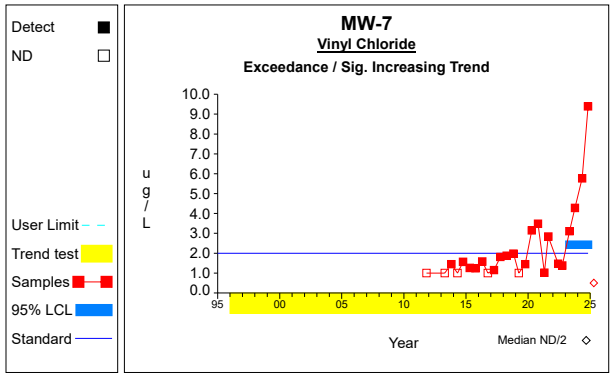
Graph 25



Graph 26

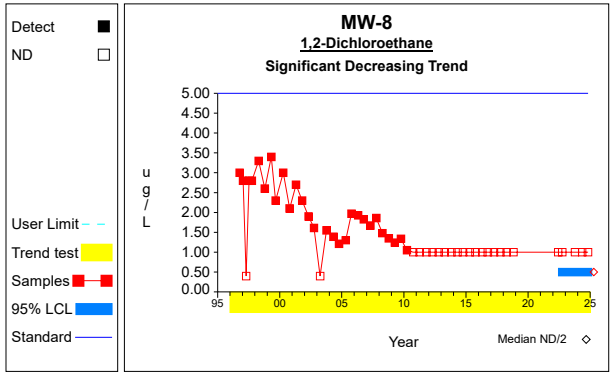


Graph 27

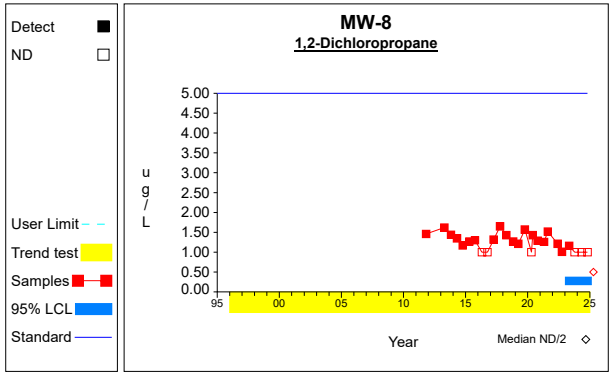


Graph 28

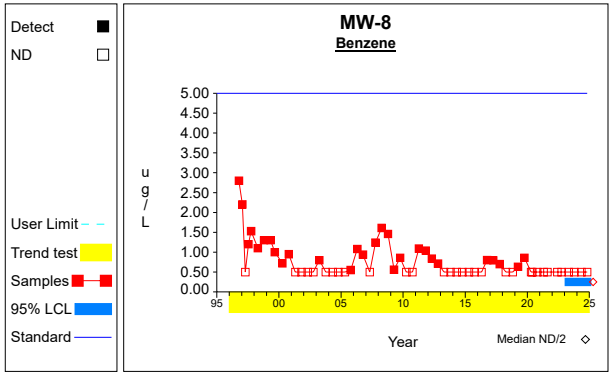
Confidence Limits (Assessment)



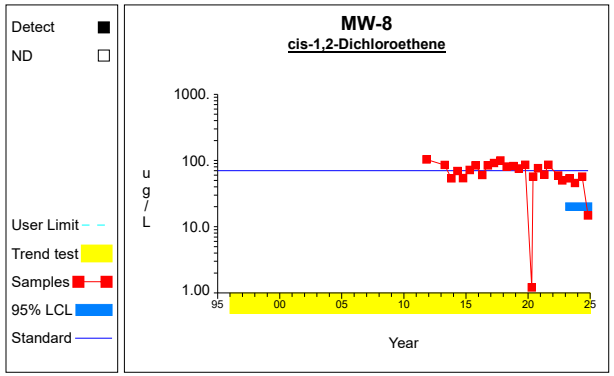
Graph 29



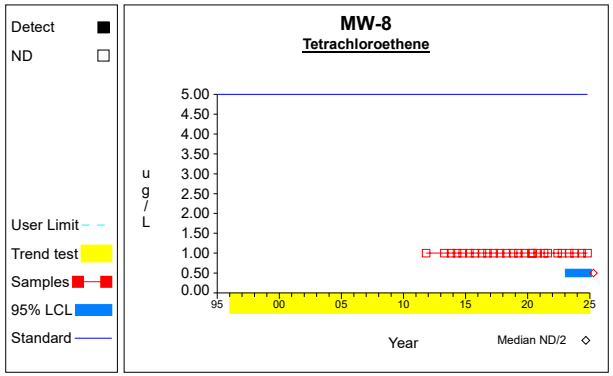
Graph 30



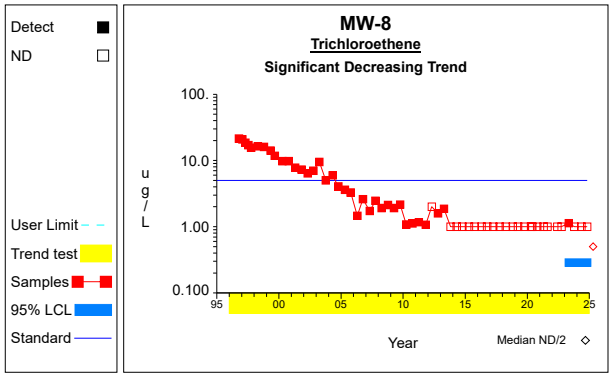
Graph 31



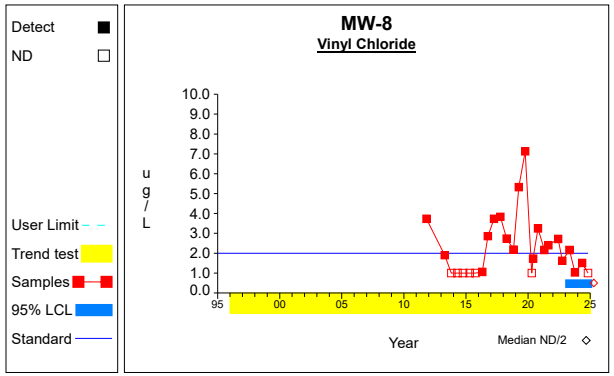
Graph 32



Graph 33



Graph 34



Graph 35

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **51** * (**51**-1) / 2 = **1275**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **866.667**	Variance estimate for slope.
8	M(S) = (**N**' ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1275** ± **2.576** * **866.667**^{½}) / 2 = [**599.582**, **675.418**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **0.0**^{½}) / 2 = [**150.0**, **150.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **4.424** / **4** = **1.106**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**5.021** - **19.572**/**4**) / (**4**-1))^{½} = **0.207**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **1.106** - **2.353** * **0.207**/**4**^{½} = **0.863**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **1.106** + **2.353** * **0.207**/**4**^{½} = **1.349**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **58** * (**58**-1) / 2 = **1653**	Number of sample pairs during trend detection period.
6	S = **-0.042**	Sen's estimator of trend.
7	var(S) = **22215.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1653** ± **2.576** * **22215.667**^{½}) / 2 = [**634.525**, **1018.475**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.075**, **-0.007**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **114.0** / **4** = **28.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**3388.44** - **12996.0**/**4**) / (**4**-1))^{½} = **6.818**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **28.5** - **2.353** * **6.818**/**4**^{½} = **20.481**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **28.5** + **2.353** * **6.818**/**4**^{½} = **36.519**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **-1.09**	Sen's estimator of trend.
7	var(S) = **1833.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1833.333**^{½}) / 2 = [**94.851**, **205.149**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-2.964**, **0.53**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **0.0**^{½}) / 2 = [**150.0**, **150.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **58** * (**58**-1) / 2 = **1653**	Number of sample pairs during trend detection period.
6	S = **-0.182**	Sen's estimator of trend.
7	var(S) = **22001.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1653** ± **2.576** * **22001.333**^{½}) / 2 = [**635.453**, **1017.547**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.211**, **-0.151**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-12

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **17.53** / **4** = **4.383**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**78.75** - **307.301**/**4**) / (**4**-1))^{½} = **0.801**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **4.383** - **2.353** * **0.801**/**4**^{½} = **3.44**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **4.383** + **2.353** * **0.801**/**4**^{½} = **5.325**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **0.232**	Sen's estimator of trend.
7	var(S) = **1833.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1833.333**^{½}) / 2 = [**94.851**, **205.149**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.03**, **0.527**]	Two-sided confidence interval for slope.
10	LCL(S) > 0	**Significant increasing trend.**

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **51** * (**51**-1) / 2 = **1275**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **3267.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1275** ± **2.576** * **3267.333**^{½}) / 2 = [**563.877**, **711.123**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **928.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **928.333**^{½}) / 2 = [**98.756**, **177.244**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **1.709** / **4** = **0.427**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**0.867** - **2.921**/**4**) / (**4**-1))^{½} = **0.213**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.427** - **2.353** * **0.213**/**4**^{½} = **0.176**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.427** + **2.353** * **0.213**/**4**^{½} = **0.678**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **58** * (**58**-1) / 2 = **1653**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **12448.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1653** ± **2.576** * **12448.333**^{½}) / 2 = [**682.795**, **970.205**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **166.5** / **4** = **41.625**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**7021.61** - **27722.25**/**4**) / (**4**-1))^{½} = **5.509**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **41.625** - **2.353** * **5.509**/**4**^{½} = **35.145**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **41.625** + **2.353** * **5.509**/**4**^{½} = **48.105**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **1.332**	Sen's estimator of trend.
7	var(S) = **1624.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **1624.333**^{½}) / 2 = [**86.09**, **189.91**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-1.668**, **4.435**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **0.0**^{½}) / 2 = [**138.0**, **138.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))$^{1/2}$ = ((**1.0** - **4.0**/**4**) / (**4**-1))$^{1/2}$ = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**$^{1/2}$ = **0.5** - **2.353** * **0.0**/**4**$^{1/2}$ = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**$^{1/2}$ = **0.5** + **2.353** * **0.0**/**4**$^{1/2}$ = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **58** * (**58**-1) / 2 = **1653**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **16815.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**$^{1/2}$) / 2 = (**1653** ± **2.576** * **16815.0**$^{1/2}$) / 2 = [**659.482**, **993.518**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.031**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-14

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **24** * (**24**-1) / 2 = **276**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**276** ± **2.576** * **0.0**^{½}) / 2 = [**138.0**, **138.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **5** * (**5**-1) / 2 = **10**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**10** ± **2.576** * **0.0**^{½}) / 2 = [**5.0**, **5.0**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **10** * (**10**-1) / 2 = **45**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**45** ± **2.576** * **0.0**^{½}) / 2 = [**22.5**, **22.5**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **1.0** / **4** = **0.25**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**0.25** - **1.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.25** - **2.353** * **0.0**/**4**^{½} = **0.25**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.25** + **2.353** * **0.0**/**4**^{½} = **0.25**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **10** * (**10**-1) / 2 = **45**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**45** ± **2.576** * **0.0**^{½}) / 2 = [**22.5**, **22.5**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **10.16** / **4** = **2.54**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**75.746** - **103.226**/**4**) / (**4**-1))^{½} = **4.08**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **2.54** - **2.353** * **4.08**/**4**^{½} = **0.0**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **2.54** + **2.353** * **4.08**/**4**^{½} = **7.339**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **10** * (**10**-1) / 2 = **45**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **33.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**45** ± **2.576** * **33.0**^{½}) / 2 = [**15.101**, **29.899**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **3.05** / **4** = **0.763**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**3.153** - **9.303**/**4**) / (**4**-1))^{½} = **0.525**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.763** - **2.353** * **0.525**/**4**^{½} = **0.145**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.763** + **2.353** * **0.525**/**4**^{½} = **1.38**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **10** * (**10**-1) / 2 = **45**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **59.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**45** ± **2.576** * **59.667**^{½}) / 2 = [**12.551**, **32.449**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **10** * (**10**-1) / 2 = **45**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**45** ± **2.576** * **0.0**^{½}) / 2 = [**22.5**, **22.5**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-16

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **10** * (**10**-1) / 2 = **45**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**45** ± **2.576** * **0.0**^{½}) / 2 = [**22.5**, **22.5**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **4.14** / **4** = **1.035**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**5.587** - **17.14**/**4**) / (**4**-1))^{½} = **0.659**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **1.035** - **2.353** * **0.659**/**4**^{½} = **0.26**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **1.035** + **2.353** * **0.659**/**4**^{½} = **1.81**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **52** * (**52**-1) / 2 = **1326**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **3400.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1326** ± **2.576** * **3400.667**^{½}) / 2 = [**587.89**, **738.11**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **43.6** / **4** = **10.9**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**511.4** - **1900.96**/**4**) / (**4**-1))^{½} = **3.472**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **10.9** - **2.353** * **3.472**/**4**^{½} = **6.816**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **10.9** + **2.353** * **3.472**/**4**^{½} = **14.984**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **0.226**	Sen's estimator of trend.
7	var(S) = **1831.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1831.333**^{½}) / 2 = [**94.881**, **205.119**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.274**, **0.543**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **3.232** / **4** = **0.808**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.632** - **10.446**/**4**) / (**4**-1))^{½} = **0.083**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.808** - **2.353** * **0.083**/**4**^{½} = **0.71**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.808** + **2.353** * **0.083**/**4**^{½} = **0.906**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **59** * (**59**-1) / 2 = **1711**	Number of sample pairs during trend detection period.
6	S = **0.01**	Sen's estimator of trend.
7	var(S) = **22973.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1711** ± **2.576** * **22973.333**^{½}) / 2 = [**660.278**, **1050.722**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.027**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **724.0** / **4** = **181.0**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**135302.0** - **524176.0**/**4**) / (**4**-1))^{½} = **37.674**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **181.0** - **2.353** * **37.674**/**4**^{½} = **136.684**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **181.0** + **2.353** * **37.674**/**4**^{½} = **225.316**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **4.751**	Sen's estimator of trend.
7	var(S) = **1831.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1831.333**^{½}) / 2 = [**94.881**, **205.119**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-2.357**, **11.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **6.53** / **4** = **1.633**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**13.034** - **42.641**/**4**) / (**4**-1))^{½} = **0.889**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **1.633** - **2.353** * **0.889**/**4**^{½} = **0.586**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **1.633** + **2.353** * **0.889**/**4**^{½} = **2.679**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **-0.399**	Sen's estimator of trend.
7	var(S) = **1829.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1829.667**^{½}) / 2 = [**94.906**, **205.094**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.838**, **-0.095**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **39.68** / **4** = **9.92**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**430.043** - **1574.502**/**4**) / (**4**-1))^{½} = **3.484**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **9.92** - **2.353** * **3.484**/**4**^{½} = **5.822**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **9.92** + **2.353** * **3.484**/**4**^{½} = **14.018**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **59** * (**59**-1) / 2 = **1711**	Number of sample pairs during trend detection period.
6	S = **0.063**	Sen's estimator of trend.
7	var(S) = **23378.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1711** ± **2.576** * **23378.667**^{½}) / 2 = [**658.564**, **1052.436**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.113**, **0.251**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-7

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **22.55** / **4** = **5.638**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**149.456** - **508.503**/**4**) / (**4**-1))^{½} = **2.728**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **5.638** - **2.353** * **2.728**/**4**^{½} = **2.428**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **5.638** + **2.353** * **2.728**/**4**^{½} = **8.847**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **25** * (**25**-1) / 2 = **300**	Number of sample pairs during trend detection period.
6	S = **0.261**	Sen's estimator of trend.
7	var(S) = **1815.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**300** ± **2.576** * **1815.667**^{½}) / 2 = [**95.117**, **204.883**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.091**, **0.444**]	Two-sided confidence interval for slope.
10	LCL(S) > 0	**Significant increasing trend.**

Worksheet 6 - Assessment Monitoring
1,2-Dichloroethane (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **52** * (**52**-1) / 2 = **1326**	Number of sample pairs during trend detection period.
6	S = **-0.101**	Sen's estimator of trend.
7	var(S) = **14428.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1326** ± **2.576** * **14428.333**^{½}) / 2 = [**508.288**, **817.712**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.126**, **-0.074**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
1,2-Dichloropropane (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.66** / **4** = **0.665**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.096** - **7.076**/**4**) / (**4**-1))^{½} = **0.33**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.665** - **2.353** * **0.33**/**4**^{½} = **0.277**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.665** + **2.353** * **0.33**/**4**^{½} = **1.053**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **26** * (**26**-1) / 2 = **325**	Number of sample pairs during trend detection period.
6	S = **-0.035**	Sen's estimator of trend.
7	var(S) = **2027.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**325** ± **2.576** * **2027.0**^{½}) / 2 = [**104.511**, **220.489**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.098**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Benzene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **1.0** / **4** = **0.25**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**0.25** - **1.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.25** - **2.353** * **0.0**/**4**^{½} = **0.25**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.25** + **2.353** * **0.0**/**4**^{½} = **0.25**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **60** * (**60**-1) / 2 = **1770**	Number of sample pairs during trend detection period.
6	S = **-0.017**	Sen's estimator of trend.
7	var(S) = **20779.667**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1770** ± **2.576** * **20779.667**^{½}) / 2 = [**699.333**, **1070.667**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.042**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
cis-1,2-Dichloroethene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **171.4** / **4** = **42.85**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**8462.38** - **29377.96**/**4**) / (**4**-1))^{½} = **19.304**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **42.85** - **2.353** * **19.304**/**4**^{½} = **20.143**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **42.85** + **2.353** * **19.304**/**4**^{½} = **65.557**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **26** * (**26**-1) / 2 = **325**	Number of sample pairs during trend detection period.
6	S = **-3.054**	Sen's estimator of trend.
7	var(S) = **2056.333**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**325** ± **2.576** * **2056.333**^{½}) / 2 = [**104.093**, **220.907**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-6.297**, **0.15**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Tetrachloroethene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.0** / **4** = **0.5**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**1.0** - **4.0**/**4**) / (**4**-1))^{½} = **0.0**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.5** - **2.353** * **0.0**/**4**^{½} = **0.5**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.5** + **2.353** * **0.0**/**4**^{½} = **0.5**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **26** * (**26**-1) / 2 = **325**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **0.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**325** ± **2.576** * **0.0**^{½}) / 2 = [**162.5**, **162.5**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**0.0**, **0.0**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.

Worksheet 6 - Assessment Monitoring
Trichloroethene (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **2.63** / **4** = **0.658**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**2.027** - **6.917**/**4**) / (**4**-1))^{½} = **0.315**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **0.658** - **2.353** * **0.315**/**4**^{½} = **0.287**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **0.658** + **2.353** * **0.315**/**4**^{½} = **1.028**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **60** * (**60**-1) / 2 = **1770**	Number of sample pairs during trend detection period.
6	S = **-0.385**	Sen's estimator of trend.
7	var(S) = **22956.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**1770** ± **2.576** * **22956.0**^{½}) / 2 = [**689.852**, **1080.148**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.583**, **-0.22**]	Two-sided confidence interval for slope.
10	UCL(S) < 0	**Significant decreasing trend.**

Worksheet 6 - Assessment Monitoring
Vinyl Chloride (ug/L) at MW-8

Step	Equation	Description
1	$\overline{X}$ = **sum[X]** / **N** = **5.2** / **4** = **1.3**	Compute the mean of the last 4 measurements.
2	S = ((**sum[X^2]** - **sum[X]**^{2}/**N**) / (**N**-1))^{½} = ((**8.257** - **27.04**/**4**) / (**4**-1))^{½} = **0.706**	Compute sd of the last 4 measurements.
3	LCL = $\overline{\mathbf{X}}$ - **tS**/**N**^{½} = **1.3** - **2.353** * **0.706**/**4**^{½} = **0.469**	Compute lower confidence limit for the mean of the last 4 measurements.
4	UCL = $\overline{\mathbf{X}}$ + **tS**/**N**^{½} = **1.3** + **2.353** * **0.706**/**4**^{½} = **2.131**	Compute upper confidence limit for the mean of the last 4 measurements.
5	N' = **N** * (**N**-1) / 2 = **26** * (**26**-1) / 2 = **325**	Number of sample pairs during trend detection period.
6	S = **0.0**	Sen's estimator of trend.
7	var(S) = **2012.0**	Variance estimate for slope.
8	M(S) = (**N'** ± **Z**$_{.995}$ * **var(S)**^{½}) / 2 = (**325** ± **2.576** * **2012.0**^{½}) / 2 = [**104.726**, **220.274**]	Ordinal positions for two-sided lower confidence limits for slope. The LCL and UCL are the Mth largest slope estimates for the values shown. When the values are not integers, interpolation is used.
9	CL(S) = [**-0.228**, **0.242**]	Two-sided confidence interval for slope.
10	the interval includes 0	There is no significant trend.