2023 ANNUAL GROUNDWATER MONITORING AND CORRECTIVE ACTION REPORT

UPPER AQC IMPOUNDMENT
LA CYGNE GENERATING STATION
LA CYGNE, KANSAS

Presented To:
Evergy Metro, Inc.

SCS ENGINEERS

27217233.23 | January 2024

8575 W 110th Street, Suite 100
Overland Park, Kansas 66210
913-681-0030

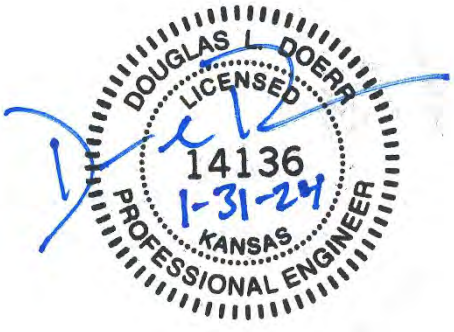
CERTIFICATIONS

I, John R. Rockhold, being a qualified groundwater scientist and Professional Geologist in the State of Kansas, do hereby certify that the 2023 Annual Groundwater Monitoring and Corrective Action Report for the Upper AQC Impoundment at the La Cygne Generating Station was prepared by me or under my direct supervision and fulfills the requirements of 40 CFR 257.90(e).

John R. Rockhold, P.G.

SCS Engineers

I, Douglas L. Doerr, being a qualified licensed Professional Engineer in the State of Kansas, do hereby certify that the 2023 Annual Groundwater Monitoring and Corrective Action Report for the Upper AQC Impoundment at the La Cygne Generating Station was prepared by me or under my direct supervision and fulfills the requirements of 40 CFR 257.90(e).



Douglas L. Doerr, P.E.

SCS Engineers

Revision Number	Revision Date	Revision Sections	Summary of Revisions
0	January 31, 2024	NA	Original

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Section **Page**

Appendices

1 INTRODUCTION

This 2023 Annual Groundwater Monitoring and Corrective Action Report was prepared to support compliance with the groundwater monitoring requirements of the "Coal Combustion Residuals (CCR) Final Rule" (Rule) published by the United States Environmental Protection Agency (USEPA) in the *Hazardous and Solid Waste Management System; Disposal of Coal Combustion Residuals from Electric Utilities; Final Rule*, dated April 17, 2015 (USEPA, 2015), and subsequent revisions. Specifically, this report was prepared for Evergy Metro, Inc. (Evergy) to fulfill the requirements of 40 CFR 257.90 (e). The applicable sections of the Rule are provided below in *italics*, followed by applicable information relative to the 2023 Annual Groundwater Monitoring and Corrective Action Report for the Upper AQC Impoundment at the La Cygne Generating Station.

1.1 § 257.90(e)(6) SUMMARY

A section at the beginning of the annual report that provides an overview of the current status of groundwater monitoring and corrective action programs for the CCR unit. At a minimum, the summary must specify all of the following:

1.1.1 § 257.90(e)(6)(i) Initial Monitoring Program

At the start of the current annual reporting period, whether the CCR unit was operating under the detection monitoring program in § 257.94 or the assessment monitoring program in § 257.95;

At the start of the current annual reporting period, (January 1, 2023), the CCR Impoundment was operating under a detection monitoring program in compliance with § 257.94.

1.1.2 § 257.90(e)(6)(ii) Final Monitoring Program

At the end of the current annual reporting period, whether the CCR unit was operating under the detection monitoring program in § 257.94 or the assessment monitoring program in § 257.95;

At the end of the current annual reporting period, (December 31, 2023), the CCR Impoundment was operating under a detection monitoring program in compliance with § 257.94.

1.1.3 § 257.90(e)(6)(iii) Statistically Significant Increases

If it was determined that there was a statistically significant increase over background for one or more constituents listed in Appendix III to this part pursuant to § 257.94(e):

(A) Identify those constituents listed in Appendix III to this part and the names of the monitoring wells associated with such an increase; and

Monitoring Event	Monitoring Well	Constituent	ASD
Fall 2022	MW-707B	Fluoride	Successful

(B) Provide the date when the assessment monitoring program was initiated for the CCR unit.

Not applicable because an assessment monitoring program was not initiated.

1.1.4 § 257.90(e)(6)(iv) Statistically Significant Levels

If it was determined that there was a statistically significant level above the groundwater protection standard for one or more constituents listed in Appendix IV to this part pursuant to § 257.95(g) include all of the following:

(A) Identify those constituents listed in Appendix IV to this part and the names of the monitoring wells associated with such an increase;

Not applicable because there was no assessment monitoring conducted.

(B) Provide the date when the assessment of corrective measures was initiated for the CCR unit;

Not applicable because there was no assessment of corrective measures initiated for the CCR Unit.

(C) Provide the date when the public meeting was held for the assessment of corrective measures for the CCR unit*; and*

Not applicable because there was no assessment of corrective measures initiated for the CCR Unit.

(D) Provide the date when the assessment of corrective measures was completed for the CCR unit.

Not applicable because there was no assessment of corrective measures initiated for the CCR Unit.

1.1.5 § 257.90(e)(6)(v) Selection of Remedy

Whether a remedy was selected pursuant to § 257.97 during the current annual reporting period, and if so, the date of remedy selection; and

Not applicable because corrective measures are not required.

1.1.6 § 257.90(e)(6)(vi) Remedial Activities

Whether remedial activities were initiated or are ongoing pursuant to § 257.98 during the current annual reporting period.

Not applicable because corrective measures are not required.

2 § 257.90(E) ANNUAL REPORT REQUIREMENTS

Annual groundwater monitoring and corrective action report. *For existing CCR landfills and existing CCR surface impoundments, no later than January 31, 2018, and annually thereafter, the owner or operator must prepare an annual groundwater monitoring and corrective action report. For new CCR landfills, new CCR surface impoundments, and all lateral expansions of CCR units, the owner or operator must prepare the initial annual groundwater monitoring and corrective action report no later than January 31 of the year following the calendar year a groundwater monitoring system has been established for such CCR unit as required by this subpart, and annually thereafter. For the preceding calendar year, the annual report must document the status of the groundwater monitoring and corrective action program for the CCR unit, summarize key actions completed, describe any problems encountered, discuss actions to resolve the problems, and project key activities for the upcoming year. For purposes of this section, the owner or operator has prepared the annual report when the report is placed in the facility's operating record as required by § 257.105(h)(1). At a minimum, the annual groundwater monitoring and corrective action report must contain the following information, to the extent available:*

2.1 § 257.90(E)(1) SITE MAP

A map, aerial image, or diagram showing the CCR unit and all background (or upgradient) and downgradient monitoring wells, to include the well identification numbers, that are part of the groundwater monitoring program for the CCR unit;

A site map with an aerial image showing the Upper AQC Impoundment and all background (or upgradient) and downgradient monitoring wells with identification numbers for the Upper AQC Impoundment groundwater monitoring program is provided as **Figure 1** in **Appendix A**.

2.2 § 257.90(E)(2) MONITORING SYSTEM CHANGES

Identification of any monitoring wells that were installed or decommissioned during the preceding year, along with a narrative description of why those actions were taken;

No new monitoring wells were installed, and no wells were decommissioned as part of the CCR groundwater monitoring program for the Upper AQC Impoundment in 2023.

2.3 § 257.90(E)(3) SUMMARY OF SAMPLING EVENTS

In addition to all the monitoring data obtained under §§ 257.90 through 257.98, a summary including the number of groundwater samples that were collected for analysis for each background and downgradient well, the dates the samples were collected, and whether the sample was required by the detection monitoring or assessment monitoring programs;

Only detection monitoring was required to be conducted during the reporting period (2023). Samples collected in 2023 were collected and analyzed for Appendix III detection monitoring constituents. Results of the sampling events are provided in **Appendix B**, **Table 1** (Appendix III Detection Monitoring Results), and **Table 2** (Detection Monitoring Field Measurements). These tables include Fall 2022 semiannual detection monitoring event verification sample data collected and analyzed in 2023; Spring 2023 semiannual detection monitoring data and verification sample data; and the initial Fall 2023 semiannual detection monitoring data. The dates of sample collection and the monitoring program requiring the sample are also provided in these tables.

2.4 § 257.90(E)(4) MONITORING TRANSITION NARRATIVE

A narrative discussion of any transition between monitoring programs (e.g., the date and circumstances for transitioning from detection monitoring to assessment monitoring in addition to identifying the constituent(s) detected at a statistically significant increase over background levels); and

There was no transition between monitoring programs in 2023. Only detection monitoring was conducted in 2023.

2.5 § 257.90(e)(5) OTHER REQUIREMENTS

Other information required to be included in the annual report as specified in §§ 257.90 through 257.98.

A summary of potentially required information and the corresponding section of the Rule is provided in the following sections. In addition, the information, if applicable, is provided.

2.5.1 § 257.90(e) Program Status

Status of Groundwater Monitoring and Corrective Action Program.

The groundwater monitoring and corrective action program is in detection monitoring.

Summary of Key Actions Completed.

a. completion of the Fall 2022 verification sampling and analyses per the certified statistical method,

b. completion of the statistical evaluation of the Fall 2022 semiannual detection monitoring sampling and analysis event per the certified statistical method,

c. completion of the 2022 Annual Groundwater Monitoring and Corrective Action Report,

d. completion of a successful alternative source demonstration for the Fall 2022 semiannual detection monitoring sampling and analysis event,

e. completion of the Spring 2023 semiannual detection monitoring sampling and analysis event with subsequent verification sampling per the certified statistical method,

f. completion of the statistical evaluation of the Spring 2023 semiannual detection monitoring sampling and analysis event per the certified statistical method,

g. initiation of the Fall 2023 semiannual detection monitoring sampling and analysis event.

h. an updated Sampling and Analysis Plan (SAP), Groundwater Monitoring System Certification, and Statistical Method Certification were finalized and added to the operating record on December 4, 2023. These documents were prepared to transition from intrawell statistical methods to interwell statistical methods and to transition from a single-unit monitoring system (Upper AQC Impoundment) to a three-unit multi-unit monitoring system (CCR Landfill, Lower AQC Impoundment, and Upper AQC Impoundment). These changes will be reflected in the 2024 Annual GWMCA Report.

Description of Any Problems Encountered.

No noteworthy problems were encountered.

Discussion of Actions to Resolve the Problems.

Not applicable because no noteworthy problems were encountered.

Projection of Key Activities for the Upcoming Year (2024).

Completion of data analysis and the statistical evaluation of Fall 2023 detection monitoring sampling and analysis event, and, if required, alternative source demonstration(s). The Fall 2023 statistical evaluation will be completed as a combined three-unit multi-unit monitoring system utilizing interwell statistical procedures. An updated Sampling and Analysis Plan (SAP), Groundwater Monitoring System Certification, and Statistical Method Certification in support of this transition was finalized and added to the operating record on December 4, 2023. Future sampling events will be completed utilizing this combined multi-unit monitoring system and interwell statistical methods. Semiannual Spring and Fall 2024 groundwater sampling and analysis. Completion of the statistical evaluation of the Spring 2024 detection monitoring sampling and analysis event, and, if required, alternative source demonstration(s).

2.5.2 § 257.94(d)(3) Demonstration for Alternative Detection Monitoring Frequency

The owner or operator must obtain a certification from a qualified professional engineer or approval from the Participating State Director or approval from EPA where EPA is the permitting authority stating that the demonstration for an alternative groundwater sampling and analysis frequency meets the requirements of this section. The owner or operator must include the demonstration providing the basis for the alternative monitoring frequency and the certification by a qualified professional engineer or the approval from the Participating State Director or approval from EPA where EPA is the permitting authority in the annual groundwater monitoring and corrective action report required by § 257.90(e).

Not applicable because no alternative monitoring frequency for detection monitoring and certification was pursued.

2.5.3 § 257.94(e)(2) Detection Monitoring Alternate Source Demonstration

Demonstration that a source other than the CCR unit caused the statistically significant increase (SSI) over background levels for a constituent or that the SSI resulted from error in sampling, analysis, statistical evaluation, or natural variation in groundwater quality. In addition, certification of the demonstration is to be included in the annual report.

The following demonstration reports are included as **Appendix C**:

C1 CCR Groundwater Monitoring Alternative Source Demonstration Report
November 2022 Groundwater Monitoring Event, Upper AQC Impoundment, La Cygne Generating Station (June 2023)

2.5.4 § 257.95(c)(3) Demonstration for Alternative Assessment Monitoring Frequency

The owner or operator must obtain a certification from a qualified professional engineer or approval from the Participating State Director or approval from EPA where EPA is the permitting authority stating that the demonstration for an alternative groundwater sampling and analysis frequency meets the requirements of this section. The owner or operator must include the demonstration providing the basis for the alternative monitoring frequency and the certification by a qualified professional engineer or the approval from the Participating State Director or the approval from EPA where EPA is the permitting authority in the annual groundwater monitoring and corrective action report required by § 257.90(e).

Not applicable because there was no assessment monitoring conducted.

2.5.5 § 257.95(d)(3) Assessment Monitoring Concentrations and Groundwater Protection Standards

Include the concentrations of Appendix III and detected Appendix IV constituents from the assessment monitoring, the established background concentrations, and the established groundwater protection standards.

Not applicable because there was no assessment monitoring conducted.

2.5.6 § 257.95(g)(3)(ii) Assessment Monitoring Alternate Source Demonstration

Demonstrate that a source other than the CCR unit caused the contamination, or that the statistically significant increase resulted from error in sampling, analysis, statistical evaluation, or natural variation in groundwater quality. Any such demonstration must be supported by a report that includes the factual or evidentiary basis for any conclusions and must be certified to be accurate by a qualified professional engineer. If a successful demonstration is made, the owner or operator must continue monitoring in accordance with the assessment monitoring program pursuant to this section, and may return to detection monitoring if the constituents in appendices III and IV to this part are at or below background as specified in paragraph (e) of this section. The owner or operator must also include the demonstration in the annual groundwater monitoring and corrective action report required by § 257.90(e), in addition to the certification by a qualified professional engineer or the approval from the Participating State Director or approval from EPA where EPA is the permitting authority.

Not applicable because there was no assessment monitoring conducted.

2.5.7 § 257.96(a) Demonstration for Additional Time for Assessment of Corrective Measures

Within 90 days of finding that any constituent listed in appendix IV to this part has been detected at a statistically significant level exceeding the groundwater protection standard defined under § 257.95(h), or immediately upon detection of a release from a CCR unit, the owner or operator must initiate an assessment of corrective measures to prevent further releases, to remediate any releases and to restore affected area to original conditions. The assessment of corrective measures must be completed within 90 days, unless the owner or operator demonstrates the need for additional time to complete the assessment of corrective measures due to site-specific conditions or circumstances. The owner or operator must obtain a certification from a qualified professional engineer attesting that

the demonstration is accurate. The 90-day deadline to complete the assessment of corrective measures may be extended for no longer than 60 days. The owner or operator must also include the demonstration in the annual groundwater monitoring and corrective action report required by § 257.90(e), in addition to the certification by a qualified professional engineer or the approval from the Participating State Director or approval from EPA where EPA is the permitting authority.

Not applicable because there was no assessment monitoring conducted.

2.6 § 257.90(e)(6) OVERVIEW SUMMARY

A section at the beginning of the annual report that provides an overview of the current status of groundwater monitoring and corrective action programs for the CCR unit.

§ 257.90(e)(6) is addressed in Section 1.1 of this report.

3 SUPPLEMENTAL INFORMATION AND DATA

In addition to the requirements listed in 40 CFR 257.90(e), supplemental information has been included in this section in recognition of comments received by Evergy from the USEPA on January 11, 2022. The USEPA indicated in their comments that the GWMCA Report contain the following:

- Results of laboratory analysis of groundwater or other environmental media samples for 40 CFR 257 Appendix III and Appendix IV constituents or other constituents, such as those supporting characterization of site conditions that may ultimately affect a remedy.
- Required statistical analysis performed on laboratory analysis results; and
- Calculated groundwater flow rate and direction.

This information is not specifically referred to in 40 CFR 257.90(e) for inclusion in the GWMCA Reports; however, it is routinely collected, determined, and maintained in Evergy's files and is being provided with in this GWMCA report. This supplemental information and data are provided as specified below:

- Laboratory Analytical Reports (**Appendix D**):

  Includes laboratory data packages with supporting information such as case narrative, sample and method summary, analytical results, quality control, and chain-of-custody documentation. The laboratory data packages for the following sampling events are provided:

  - January 2023 – First verification sampling for the Fall 2022 detection monitoring event.
  - February 2023 – Second verification sampling for the Fall 2022 detection monitoring event.
  - May 2023 – Spring 2023 semiannual detection monitoring sampling event.
  - July 2023 – First verification sampling for the Spring 2023 detection monitoring sampling event.
  - November 2023 - Fall 2023 semiannual detection monitoring sampling event.

- Statistical Analyses **(Appendix E)**:

  Includes summary of statistical results, prediction limit plots, prediction limit background data, detection sample results, first and second verification re-sample results (when applicable), extra sample results for pH (collected as part of the approved sampling procedures), input

parameters, and a Prediction Limit summary table. Statistical analyses completed in 2023 included the following:

- Fall 2022 semiannual detection monitoring statistical analyses.
- Spring 2023 semiannual detection monitoring statistical analyses.

- Groundwater Potentiometric Surface Maps (**Appendix A**):

  Includes revised groundwater potentiometric surface maps with the measured groundwater elevations at each well and the generalized groundwater flow direction and the calculated groundwater flow rate. Maps for the following sampling events are provided:

  - **Figure 2** - Spring 2023 semiannual detection monitoring sampling event.
  - **Figure 3** - Fall 2023 semiannual detection monitoring sampling event.

4 GENERAL COMMENTS

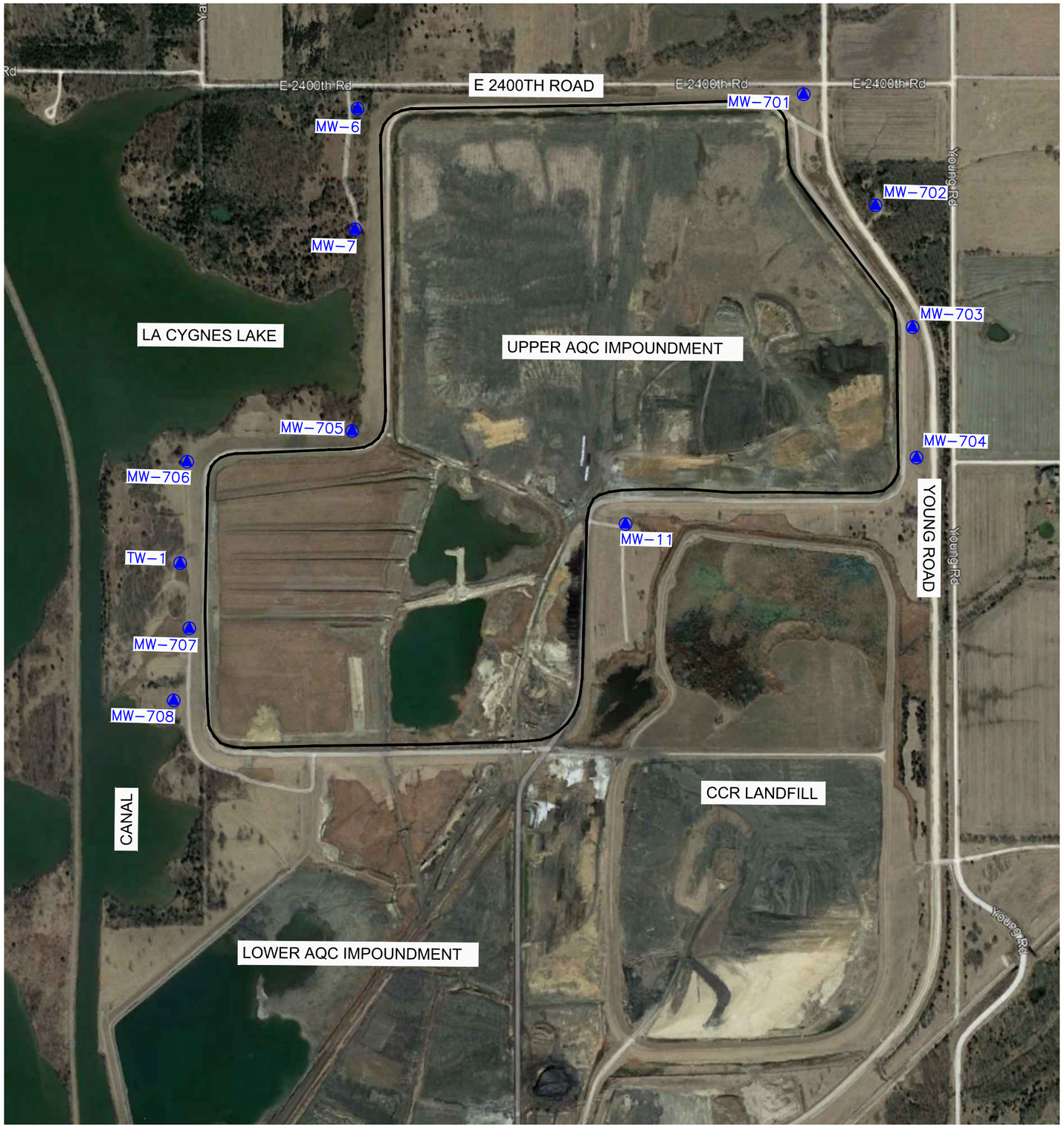
This report has been prepared and reviewed under the direction of a qualified groundwater scientist and qualified professional engineer. The information contained in this report is a reflection of the conditions encountered at the La Cygne Generating Station at the time of fieldwork. This report includes a review and compilation of the required information and does not reflect any variations of the subsurface, which may occur between sampling locations. Actual subsurface conditions may vary and the extent of such variations may not become evident without further investigation.

Conclusions drawn by others from the result of this work should recognize the limitation of the methods used. Please note that SCS Engineers does not warrant the work of regulatory agencies or other third parties supplying information used in the assimilation of this report. This report is prepared in accordance with generally accepted environmental engineering and geological practices, within the constraints of the client's directives. It is intended for the exclusive use of Evergy Metro, Inc. for specific application to the La Cygne Generating Station Upper AQC Impoundment. No warranties, express or implied, are intended or made.

APPENDIX A

FIGURES

Figure 1: Site Map
Figure 2: Potentiometric Surface Map (May 2023)
Figure 3: Potentiometric Surface Map (November 2023)



LEGEND

CCR UNIT BOUNDARY
(APPROXIMATE LIMITS OF UPPER AQC IMPOUNDMENT)

MW–703 CCR GROUNDWATER MONITORING SYSTEM WELLS

NOTES:

1. KDHE FACILITY PERMIT AND LANDFILL PERMIT BOUNDARIES VARY FROM THAT SHOWN.
2. GOOGLE EARTH IMAGE DATED MARCH 2020. BOUNDARY AND MONITOR WELL LOCATIONS ARE APPROXIMATE.
3. BOUNDARY AND MONITOR WELL LOCATIONS ARE PROVIDED BY AECOM.

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SHEET TITLE
SITE MAP
UPPER AQC IMPOUNDMENT
CCR GROUNDWATER MONITORING SYSTEM

PROJECT TITLE
2023 CCR GROUNDWATER MONITORING AND CORRECTIVE ACTION REPORT

CLIENT
EVERGY METRO, INC
LA CYGNE GENERATING STATION
LA CYGNE, KANSAS

SCS ENGINEERS
8575 W. 110th St. Ste. 100
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PROJ. NO. 27217233.20
DSN. BY: ALR
CHK. BY: JF
QA/A RVW BY: JRR
PROJ. MGR JRR
DSR. BY: ALR

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DATE:
1/23/2023

FIGURE NO.
1

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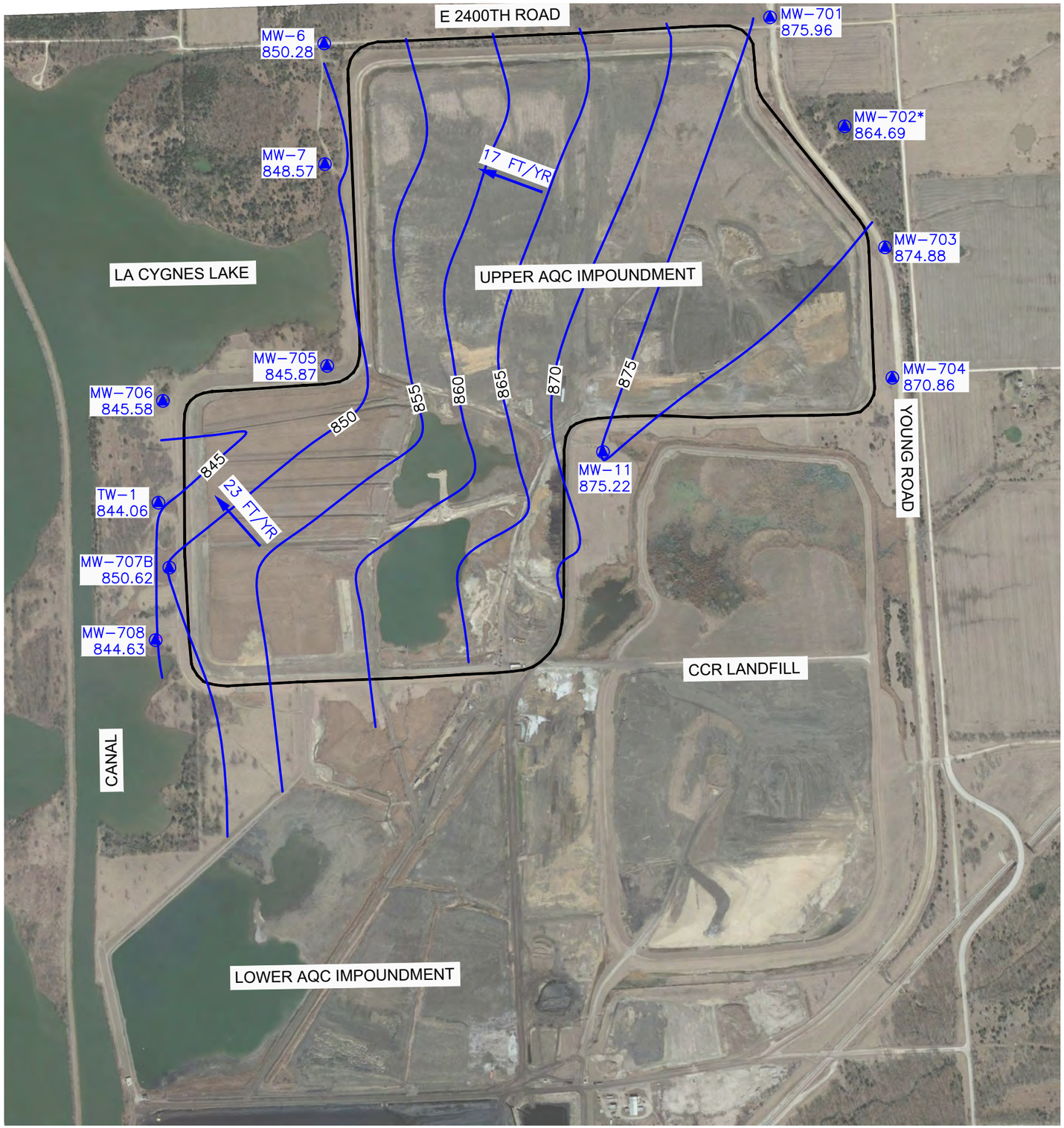

LEGEND

- CCR UNIT BOUNDARY (APPROXIMATE LIMITS)
- MW-704 (869.52) — CCR GROUNDWATER MONITORING SYSTEM WELLS (GROUNDWATER ELEVATION)
- 875 — GROUNDWATER POTENTIOMETRIC SURFACE ELEVATIONS
- 17 FT/YR — DIRECTION OF GROUNDWATER FLOW AND GROUNDWATER FLOW RATE (FEET/YEAR)
- MW-702* (864.69) — INDICATES WELL NOT USED TO DEVELOP POTENTIOMETRIC SURFACE MAP

NOTES:

1. KDHE FACILITY PERMIT AND LANDFILL PERMIT BOUNDARIES VARY FROM THAT SHOWN.
2. GOOGLE EARTH IMAGE DATED MARCH 2020. BOUNDARY AND MONITOR WELL LOCATIONS ARE APPROXIMATE.
3. BOUNDARY AND MONITOR WELL LOCATIONS ARE PROVIDED BY AECOM.
4. WATER LEVEL MEASUREMENTS COLLECTED ON MAY 17, 2023.

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SHEET TITLE
POTENTIOMETRIC SURFACE MAP
MAY 2023
UPPER AQC IMPOUNDMENT

PROJECT TITLE
2023 GROUNDWATER MONITORING AND CORRECTIVE ACTION REPORT

CLIENT
EVERGY METRO, INC.
LA CYGNE GENERATING STATION
LA CYGNE, KANSAS

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PROJ. NO. 27217233.22
DSN. BY: DAW
DWN. BY: SJW
CHK. BY: JF
QA/A RVW BY: JRR
PROJ. MGR JRR

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LA CYGNE LF__ MAY 2023 EXCLUDING MW-702 & MW-803.DWG
DATE: 9/26/23
FIGURE NO. 2

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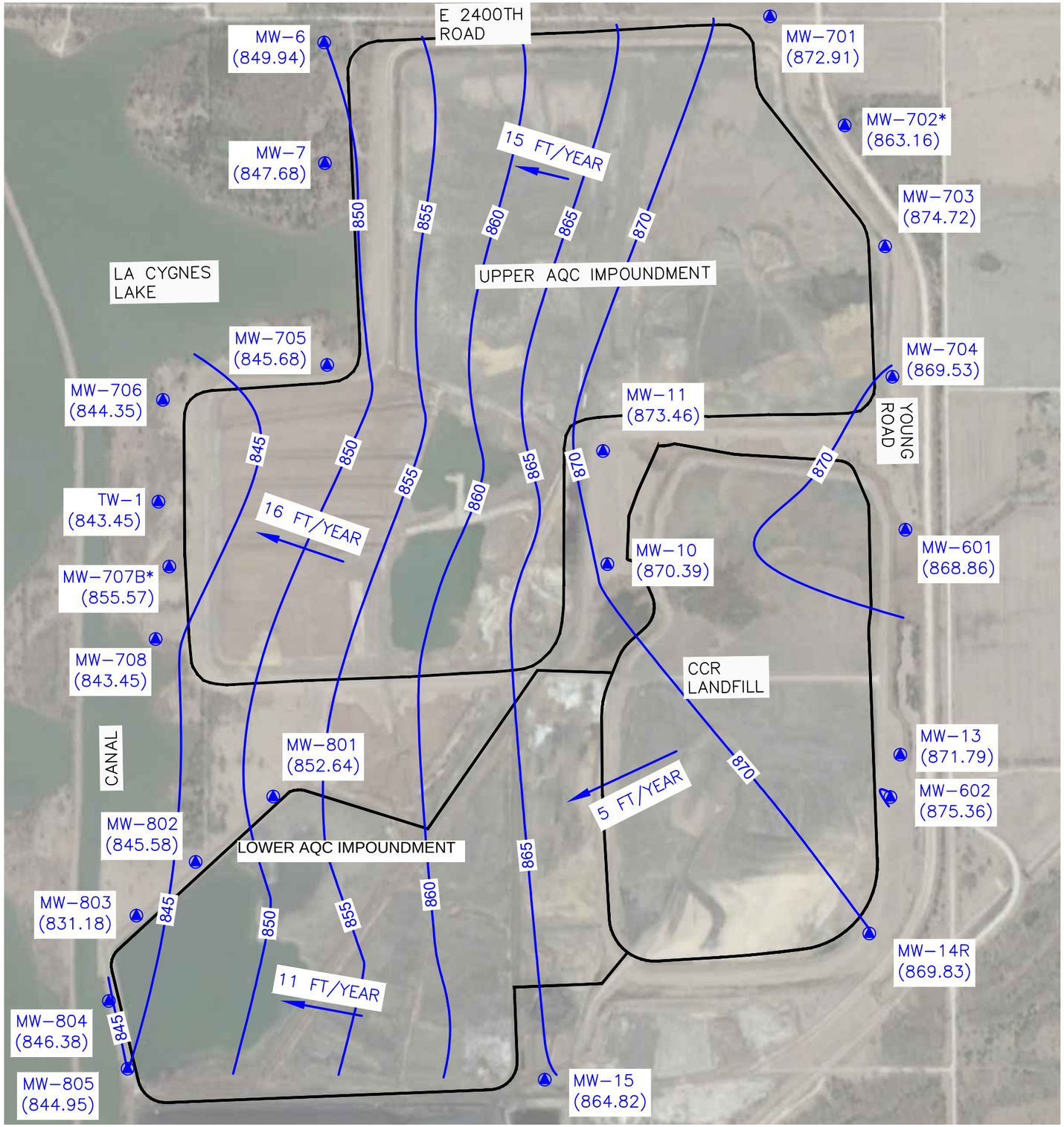

LEGEND

- CCR UNIT BOUNDARY (APPROXIMATE LIMITS)
- MW-704 (869.52) — CCR GROUNDWATER MONITORING SYSTEM WELLS (GROUNDWATER ELEVATION)
- 875 — GROUNDWATER POTENTIOMETRIC SURFACE ELEVATIONS
- 18 FT/YR — DIRECTION OF GROUNDWATER FLOW AND GROUNDWATER FLOW RATE (FEET/YEAR)
- MW-702* (864.69) — * INDICATES WELL NOT USED TO DEVELOP POTENTIOMETRIC SURFACE MAP

NOTES:

1. KDHE FACILITY PERMIT AND LANDFILL PERMIT BOUNDARIES VARY FROM THAT SHOWN.
2. GOOGLE EARTH IMAGE DATED MARCH 2020. BOUNDARY AND MONITOR WELL LOCATIONS ARE APPROXIMATE.
3. BOUNDARY AND MONITOR WELL LOCATIONS ARE PROVIDED BY AECOM.
4. WATER LEVEL MEASUREMENTS COLLECTED ON NOVEMBER 17, 2023.

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SHEET TITLE
POTENTIOMETRIC SURFACE MAP (NOVEMBER 2023)

PROJECT TITLE
COMBINED UAQC/LANDFILL - LAQC IMPOUNDMENT 2023 GROUNDWATER

CLIENT
EVERGY METRO, INC
LA CYGNE GENERATING STATION
LA CYGNE, KANSAS

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PROJ. NO.	DWN. BY:	CHK. BY:	QA/QC BY:	PROJ. MGR
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DSN. BY: ALR

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DATE: 1/05/24

FIGURE NO. 3

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APPENDIX B

TABLES

Table 1
Upper AQC Impoundment
Appendix III Detection Monitoring Results
Evergy LaCygne Generating Station

Well Number	Sample Date	Appendix III Constituents						
		Boron (mg/L)	Calcium (mg/L)	Chloride (mg/L)	Fluoride (mg/L)	pH (S.U.)	Sulfate (mg/L)	Total Dissolved Solids (mg/L)
MW-6	1/12/2023	---	---	---	---	*6.96	---	---
MW-6	2/8/2023	---	---	---	---	*7.45	---	---
MW-6	5/17/2023	1.13	69.2	189	0.606	7.17	114	1030
MW-6	11/17/2023	1.11	76.7	188	0.508	7.29	86.7	1040
MW-7	1/12/2023	---	---	---	---	*7.55	---	---
MW-7	2/8/2023	---	---	---	---	*7.89	---	---
MW-7	5/17/2023	1.55	22.0	96.3	1.28	7.68	1.86 (J)	878
MW-7	11/17/2023	1.53	19.9	93.1 (J-)	1.26	7.98	3.13 (J/J-)	854
MW-11	5/17/2023	1.13	55.9	64.4	0.457	7.22	226	942
MW-11	11/17/2023	1.11	59.3	63.4 (J-)	0.532	7.56	229 (J-)	986
MW-701	1/12/2023	---	---	---	---	**7.21	*88.2	---
MW-701	2/8/2023	---	---	---	**0.79 (E)	**7.81	*83.9	---
MW-701	5/17/2023	0.883	43.5	45.5	0.528	7.75	92.2	559
MW-701	7/12/2023	---	---	---	---	**7.61	*78.4	---
MW-701	11/17/2023	0.927	45.3	48.7 (J-)	0.640	7.69	83.0 (J-)	576
MW-702	5/17/2023	1.82	18.3	45.7	1.16	8.11	<5.00	643
MW-702	11/17/2023	1.80	16.6	47.7 (J-)	1.48	8.07	2.34 (J/J-)	652
MW-703	5/17/2023	1.81	17.9	109	1.20	7.84	<5.00	876
MW-703	11/17/2023	1.74	18.0	90.6 (J-)	1.41	7.86	25.0 (J-)	856
MW-704	5/17/2023	1.97	21.5	90.3	0.723	7.76	167	1240
MW-704	11/17/2023	1.95	21.8	88.3 (J-)	0.905	7.68	159 (J-)	1150
MW-705	5/17/2023	2.14	27.7	133	0.799	7.35	40.7	1010
MW-705	11/17/2023	2.12	29.9	132 (J-)	1.01	7.47	40.6 (J-)	958
MW-706	5/17/2023	1.98	23.6	218	0.858	7.21	20.7	1100
MW-706	11/17/2023	2.00	25.4	214 (J-)	1.09	7.74	20.0 (J-)	1120
MW-707B	1/12/2023	---	---	---	*<0.640 (M)	**6.74	---	---
MW-707B	2/8/2023	---	---	---	*1.0 (E)	**7.06	**4900 (E)	---
MW-707B	5/17/2023	1.87	391	172	0.372	6.78	4840	9880
MW-707B	7/12/2023	---	---	---	---	**6.90	---	*7920
MW-707B	11/17/2023	1.87	403	167 (J-)	0.388	6.88	5010 (J-)	6930
MW-708	1/12/2023	---	---	---	---	**7.12	---	*597
MW-708	5/17/2023	1.36	29.1	46.5	0.631	7.21	9.31	652
MW-708	11/17/2023	1.43	30.4	47.8 (J-)	0.654	7.61	11.2 (J-)	615
TW-1	5/17/2023	1.41	23.9	39.0	0.389	7.36	66.5	974
TW-1	11/17/2023	1.40	25.8	39.5 (J-)	0.400	7.77	73.0 (J-)	960

* Verification Sample obtained per certified statistical method and Statistical Analysis of Groundwater Monitoring Data at RCRA Facilities, Unified Guidance, March 2009.

**Extra Sample for Quality Control Validation or per Standard Sampling Procedure

mg/L - miligrams per liter

pCi/L - picocuries per liter

S.U. - Standard Units

--- Not Sampled

(B) - Based on the Stage II data quality review the sample result is potentially biased high due to analyte detection in the ass

(M) - Method Detection Limit (MDL)

(J) - Reported concentration is below the laboratory reported detection limit (RDL), however is above the MDL and is estimat

(E) - Eurofins Laboratories data

(J-) – Based on the Stage II data quality review the sample result is potentially biased low.

Table 2
Upper AQC Impoundment
Detection Monitoring Field Measurements
Evergy LaCygne Generating Station

Well Number	Sample Date	pH (S.U.)	Specific Conductivity (µS)	Temperature (°C)	Turbidity (NTU)	ORP (mV)	DO (mg/L)	***Water Level (ft btoc)	Groundwater Elevation (ft NGVD)
MW-6	1/12/2023	*6.96	1950	11.93	1.5	-155	0.00	10.66	850.02
MW-6	2/8/2023	*7.45	1950	11.63	1.1	-147	0.00	10.73	849.95
MW-6	5/17/2023	7.17	1830	16.58	38.7	90	0.38	10.40	850.28
MW-6	11/17/2023	7.29	1940	14.98	23.4	-203	0.00	10.74	849.94
MW-7	1/12/2023	*7.55	1500	11.10	7.4	73	0.00	7.14	848.52
MW-7	2/8/2023	*7.89	1460	11.48	8.0	65	0.00	7.34	848.32
MW-7	5/17/2023	7.68	1530	16.80	15.4	130	0.02	7.09	848.57
MW-7	11/17/2023	7.98	1580	14.44	22.3	-207	0.00	7.98	847.68
MW-11	5/17/2023	7.22	1370	16.49	0.0	-10	0.04	1.76	875.22
MW-11	11/17/2023	7.56	1530	15.40	0.2	-12	0.00	3.52	873.46
MW-701	1/12/2023	**7.21	993	11.35	10.0	25	0.00	8.42	876.81
MW-701	2/8/2023	**7.81	1600	12.59	14.3	151	0.00	12.09	873.14
MW-701	5/17/2023	7.75	933	15.04	36.1	20	2.95	9.27	875.96
MW-701	7/12/2023	**7.61	919	19.12	6.5	-50	0.00	11.51	873.72
MW-701	11/17/2023	7.69	1020	13.22	3.0	136	0.00	12.92	872.31
MW-702	5/17/2023	8.11	1070	16.06	28.4	9	8.35	18.48	864.69
MW-702	11/17/2023	8.07	1150	14.30	3.5	34	0.49	20.01	863.16
MW-703	5/17/2023	7.84	1540	14.79	17.6	-81	0.00	8.96	874.88
MW-703	11/17/2023	7.86	1500	15.70	4.2	-94	0.49	9.71	874.13
MW-704	5/17/2023	7.76	1910	16.49	43.1	46	1.33	12.31	870.86
MW-704	11/17/2023	7.68	1970	15.86	0.0	-16	5.00	13.64	869.53
MW-705	5/17/2023	7.35	1620	16.90	73.6	81	0.11	10.08	845.87
MW-705	11/17/2023	7.47	1760	15.92	28.2	-92	0.00	10.27	845.68
MW-706	5/17/2023	7.21	1710	19.30	72.7	129	0.92	8.70	845.58
MW-706	11/17/2023	7.74	2120	15.86	44.7	-92	10.71	9.93	844.35
MW-707B	1/12/2023	**6.74	8330	11.68	24.6	-13	0.00	9.16	849.64
MW-707B	2/8/2023	**7.06	1290	11.69	10.6	147	0.00	10.73	848.07
MW-707B	5/17/2023	6.78	7450	19.78	59.1	125	0.09	8.18	850.62
MW-707B	7/12/2023	**6.90	7390	20.69	20.7	14	0.00	9.46	849.34
MW-707B	11/17/2023	6.88	8230	16.92	34.4	-16	0.00	3.23	855.57
MW-708	1/12/2023	**7.12	1180	12.92	9.1	88	0.91	8.31	844.72
MW-708	5/17/2023	7.21	1130	18.15	45.5	209	0.64	8.40	844.63
MW-708	11/17/2023	7.61	1170	17.11	21.7	-3	0.00	9.58	843.45
TW-1	5/17/2023	7.36	1370	19.48	37.7	253	3.49	18.04	844.06
TW-1	11/17/2023	7.77	1740	16.53	22.1	10	1.05	18.65	843.45

* Verification Sample obtained per certified statistical method and Statistical Analysis of Groundwater Monitoring Data at RCRA Facilities, Unified Guidance, March 2009.

**Extra Sample for Quality Control Validation or per Standard Sampling Procedure

***Depth to water measured in all monitoring wells within 24 hour period prior to the sampling event

S.U. - Standard Units

µS - microsiemens

°C - Degrees Celsius

ft btoc - Feet Below Top of Casing

ft NGVD - National Geodetic Vertical Datum (NAVD 88)

NTU - Nephelometric Turbidity Unit

APPENDIX C

ALTERNATIVE SOURCE DEMONSTRATIONS

C1 CCR Groundwater Monitoring Alternative Source Demonstration Report November 2022 Groundwater Monitoring Event, Upper AQC Impoundment, La Cygne Generating Station (June 2023)

APPENDIX C. 1

CCR Groundwater Monitoring Alternative Source Demonstration Report November 2022 Groundwater Monitoring Event, Upper AQC Impoundment, La Cygne Generating Station (June 2023)

CCR GROUNDWATER MONITORING ALTERNATIVE SOURCE DEMONSTRATION REPORT NOVEMBER 2022 GROUNDWATER MONITORING EVENT

UPPER AQC IMPOUNDMENT

La Cygne Generating Station
Evergy Metro, Inc.
La Cygne, Kansas

SCS ENGINEERS

June 16, 2023
File No. 27217233.23

8575 W. 110th Suite 100
Overland Park, KS 66210
913-749-0700

CERTIFICATIONS

I, John R. Rockhold, being a qualified groundwater scientist and licensed Professional Geologist in the State of Kansas, do hereby certify the accuracy of the information in the CCR Groundwater Monitoring Alternative Source Demonstration Report for the Upper AQC Impoundment at the La Cygne Generating Station. The Alternative Source Demonstration was prepared by me or under my direct supervision in accordance with generally accepted hydrogeological practices and the local standard of care.

John R. Rockhold, P.G.
SCS Engineers

I, Douglas L. Doerr, being a qualified licensed Professional Engineer in the State of Kansas, do hereby certify the accuracy of the information in the CCR Groundwater Monitoring Alternative Source Demonstration Report for the Upper AQC Impoundment at the La Cygne Generating Station. The Alternative Source Demonstration was prepared by me or under my direct supervision in accordance with generally accepted engineering practices and the local standard of care.

Douglas L. Doerr, P.E.
SCS Engineers

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Appendices

1 REGULATORY FRAMEWORK

Certain owners or operators of Coal Combustion Residuals (CCR) units are required to complete groundwater monitoring activities to evaluate whether a release from the unit has occurred. Included in the activities is the completion of a statistical analysis of the groundwater quality data as prescribed in § 257.93(h) of the CCR Final Rule. If the initial analysis indicates a statistically significant increase (SSI) over background levels, the owner or operator may perform an alternative source demonstration (ASD). In accordance with § 257.94(e)(2), the owner or operator of the CCR unit may demonstrate that a source other than the CCR unit caused the SSI over background levels for a constituent, or that the SSI resulted from error in sampling, analysis, statistical evaluation, or natural variation in groundwater quality. The owner or operator must complete the written demonstration within 90 days of detecting an SSI over background levels to include obtaining a certification from a qualified professional engineer verifying the accuracy of the information in the report. If a successful demonstration is completed within the 90-day period, the owner or operator of the CCR unit may continue with a detection monitoring program under § 257.94. If a successful demonstration is not completed within the 90-day period, the owner or operator of the CCR unit must initiate an assessment monitoring program as required under § 257.95. The owner or operator must also include the demonstration in the annual groundwater monitoring and corrective action report required by § 257.90(e), in addition to the certification by a qualified professional engineer.

2 STATISTICAL RESULTS

Statistical analysis of monitoring data from the groundwater monitoring system for the Upper AQC Impoundment at the La Cygne Generating Station has been completed in substantial compliance with the "Statistical Method Certification by A Qualified Professional Engineer" dated October 12, 2017. Detection monitoring groundwater samples were collected on November 9, 2022. Review and validation of the results from the November 2022 Detection Monitoring Event was completed on December 20, 2022, which constitutes completion and finalization of detection monitoring laboratory analyses. A statistical analysis was then conducted to determine whether there was a statistically significant increase (SSI) over background values for each constituent listed in Appendix III to Part 257-Constituents for Detection Monitoring. Two rounds of verification sampling were conducted for certain constituents on January 12, 2023, and February 8, 2023.

The second verification sample for certain analytes was split between three laboratories, Pace National, Pace Laboratories (Lenexa), and Eurofins, in an effort to provide undiluted analytical data to meet previous laboratory reporting limits and for the reporting limit to be below the prediction limits. Pace National and Eurofins completed anions analyses by EPA Method 9056A, and Pace Laboratories completed anions analyses by EPA Method 300.1. None of the laboratories were able to meet the previous reporting limit of 0.1 mg/L for fluoride. Because Eurofins used the same analytical method as has historically been used, the Eurofins fluoride data was utilized for the SSI determination.

Monitoring Well Constituent	*UPL	Observation November 9, 2022	1st Verification January 12, 2023	2nd Verification February 8, 2023
MW-707B				
Fluoride	0.5018	1.31(J)	<0.640(M)/<0.640(M)**	1.0(E)/0.9(JE)

*UPL – Upper Prediction Limit
** - Duplicate Sample
(J) – Estimated Value
(E) – Eurofins Split Laboratory Sample, Lower Reporting Limit than Primary Laboratory Pace National
(M) – Method Detection Limit

Determination: A statistical evaluation was completed for all Appendix III detection monitoring constituents in accordance with the certified statistical method. The statistical evaluation identified an SSI above the background prediction limit for fluoride at MW-707B.

3 ALTERNATIVE SOURCE DEMONSTRATION

An Alternative Source Demonstration is a means to provide supporting lines of evidence that something other than a release from a regulated CCR unit caused an SSI. For the above identified SSI for the Upper AQC Impoundment at the La Cygne Generating Station, there are multiple lines of supporting evidence to indicate they are not caused by a release from the Upper AQC Impoundment. Select multiple lines of supporting evidence are described as follows.

3.1 LABORATORY DILUTION INTERFERENCE

Data validation was performed on data from the November 2022 Detection Monitoring Event and subsequently the first and second verification sampling events. Although the data validation process did not identify specific issues with the reported data (the laboratory data was validated as acceptable as reported), there were several on-going issues with the fluoride data for MW-707B reported by the primary laboratory (Pace National).

The May 2022 RL for fluoride was 0.15 mg/L without sample dilution. However, the MW-707B sample was diluted by the laboratory which brought the RL up to 1.5 mg/L (10x dilution) and the method detection limit (MDL) up to 0.64 mg/L. Because the RL and MDL were above the upper prediction limit (UPL) for fluoride for MW-707B (0.5018 mg/L), it was treated as an SSI and the first verification sampling event was performed in July 2022. For this event, the sample was not diluted and the laboratory reported an estimated value of 0.328 mg/L, which is below the UPL.

The November 2023 RL for fluoride was 0.15 mg/L without sample dilution. However, the MW-707B sample was diluted by the laboratory which brought the RL up to 1.5 mg/L (10x dilution) and the MDL up to 0.64 mg/L. The laboratory reported an estimated concentration between the RL and MDL of 1.31 mg/L. The first verification sample collected in January 2023 was again diluted (10x) by the laboratory; however, fluoride was not detected above the MDL of 0.64 mg/L. Because the MDL was above the UPL for fluoride for MW-707B, a second verification sample was collected in February 2023.

As noted above, the second verification sampling event (February 2023) split the fluoride sample between three laboratories: Pace National (historically the primary laboratory), Pace Laboratories (Lenexa), and Eurofins. This split sampling was completed in an effort to provide undiluted analytical data to meet previous laboratory RLs and for the RL to be below the prediction limits. Pace National and Eurofins completed analyses by EPA Method 9056A, and Pace Lenexa completed analyses by EPA

Method 300.1. None of the laboratories met the RLs of 0.1 or 0.15 mg/L for fluoride. Pace Lenexa used a different analytical method than the historical analyses and reported anomalously high concentrations of 6.9 and 6.1 mg/L for the sample and its duplicate, respectively. Pace National diluted the samples by 10x and did not detect fluoride above the RL (1.5 mg/L) or the MDL (0.64 mg/L). The Eurofins analysis exceeded the holding time but was still analyzed. Eurofins analyzed the samples with an RL of 1.0 mg/L and MDL of 0.19 mg/L. The reported concentrations were 1.0 mg/L for the sample and an estimated concentration of 0.90 mg/L for its duplicate. However, as noted above, this RL exceeded the prediction limit.

The results summary from the split sampling effort is provided below:

Split Sample Results for Fluoride			
Well ID	**Pace National** RL (1.5) / MDL (0.64)	**Pace Lenexa** RL (0.20) / MDL (0.12)	**Eurofins** RL (1.0) / MDL (0.19)
MW-707B	<1.5 / <0.64 | <1.5* / <0.64*	6.9 | 6.1*	1.0 | 0.90 (J)*

All Units in mg/L
* Duplicate Sample

Based on the inconsistency and significant variation in the reported results, it is our opinion that the SSIs over background levels for fluoride likely resulted from errors or issues associated with the laboratory analysis and were not caused by the CCR landfill.

3.2 BOX AND WHISKERS PLOTS

A commonly accepted method to demonstrate and visualize the distribution of data in a given data set is to construct box and whiskers plots. The basic box plotted graphically locates the median, 25th and 75th percentiles of the data set; the "whiskers" extend to the minimum and maximum values of the data set. The range between the ends of a box plot represents the Interquartile Range, which can be used as an estimate of spread or variability. The mean is denoted by a "+".

When comparing multiple wells or well groups, box plots for each well can be lined up on the same axis to roughly compare the variability in each well. This may be used as an exploratory screening for the test of homogeneity of variance across multiple wells.

Box and whiskers plots were prepared for fluoride for CCR monitoring network well MW-707B, upgradient wells MW-701 and MW-703, and non-network upgradient wells MW-13 and MW-602. The box and whiskers plots show that the fluoride concentration in MW-707B is below the typical fluoride concentrations in upgradient well MW-703 and non-network upgradient well MW-602. In addition, there is significant variability of the fluoride concentrations between upgradient wells (e.g., MW-13 and MW-703). This demonstrates that a source other than the Upper AQC Impoundment likely caused the SSI above the background level for fluoride in MW-707B, or that the SSI resulted from error in sampling, analysis, statistical evaluation, or that the SSI resulted from natural variation in groundwater quality. Box and whiskers plots are provided in **Appendix A**.

3.3 TIME SERIES PLOTS

Time series plots provide a graphical method to view changes in data at a particular well (monitoring point) or wells over time. Time series plots display the variability in concentration levels over time and can be used to indicate possible outliers or data errors. More than one well can be compared on the

same plot to look for differences between wells. Non-detect data is plotted as censored data at one-half of the laboratory reporting limit. Time series plots can also be used to examine the data for trends.

Time series plots for chloride were prepared for CCR monitoring network well MW-707B, upgradient wells MW-701 and MW-703, and non-network upgradient wells MW-13 and MW-602. The time series plots show that the concentration in MW-707B is below the historical fluoride concentrations for upgradient well MW-703 and non-network upgradient well MW-602. In addition, there is significant variability of the fluoride concentrations between upgradient wells (i.e., MW-13 and MW-703). This demonstrates that a source other than the Upper AQC Impoundment likely caused the SSI above the background level for fluoride in MW-707B, or that the SSI resulted from error in sampling, analysis, statistical evaluation, or that the SSI resulted from natural variation in groundwater quality. Time series plots are provided in **Appendix B**.

3.4 PIPER DIAGRAM PLOTS

Piper diagrams are a form of tri-linear diagram, and a widely accepted method to provide a visual representation of the ion concentration of groundwater. Piper diagrams portray water compositions and facilitate the interpretation and presentation of chemical analyses. They may be used to visually compare the chemical composition of water quality across wells, and aid in determining whether the waters are similar or dis-similar, and can over time indicate whether the waters are mixing.

A piper diagram has two triangular plots on the right and left side of a 4-sided center field. The three major cations are plotted in the left triangle and anions in the right. Each of the three cation/anion variables, in milliequivalents, is divided by the sum of the three values, to produce a percent of total cation/anions. These percentages determine the location of the associated symbol. The data points in the center field are located by extending the points in the lower triangles to the point of intersection. In order for a piper diagram to be produced, the selected data file must contain the following constituents: Sodium (Na), Potassium (K), Calcium (Ca), Magnesium (Mg), Chloride (Cl), Sulfate (SO4), Carbonate (CO3), and Bicarbonate (HCO3).

A piper diagram was generated for samples from network well MW-707B, upgradient wells MW-701 and MW-703, and non-network upgradient wells MW-13 and MW-602. The samples from MW-707B plot near samples from non-network upgradient well MW-13 indicating similar geochemical characteristics to an upgradient well. Additionally, the piper diagram plots indicate natural variability occurs between upgradient wells and is likely to occur across the site. This demonstrates that a source other than the Upper AQC Impoundment likely caused the SSI for MW-707B, or that the SSI resulted from error in sampling, analysis, statistical evaluation, or that the SSI resulted from natural variation in groundwater quality. The piper diagram plots and analytical results are provided in **Appendix C**.

4 CONCLUSIONS

Our opinion is that a sufficient body of evidence is available and presented above to demonstrate that a source other than the Upper AQC Impoundment likely caused the SSI above the background level for fluoride in MW-707B, or that the SSI resulted from error in sampling, analysis, statistical evaluation, or that the SSI resulted from natural variation in groundwater quality. Based on the successful ASD, the owner or operator of the Upper AQC Impoundment may continue with the detection monitoring program under § 257.94.

5 GENERAL COMMENTS

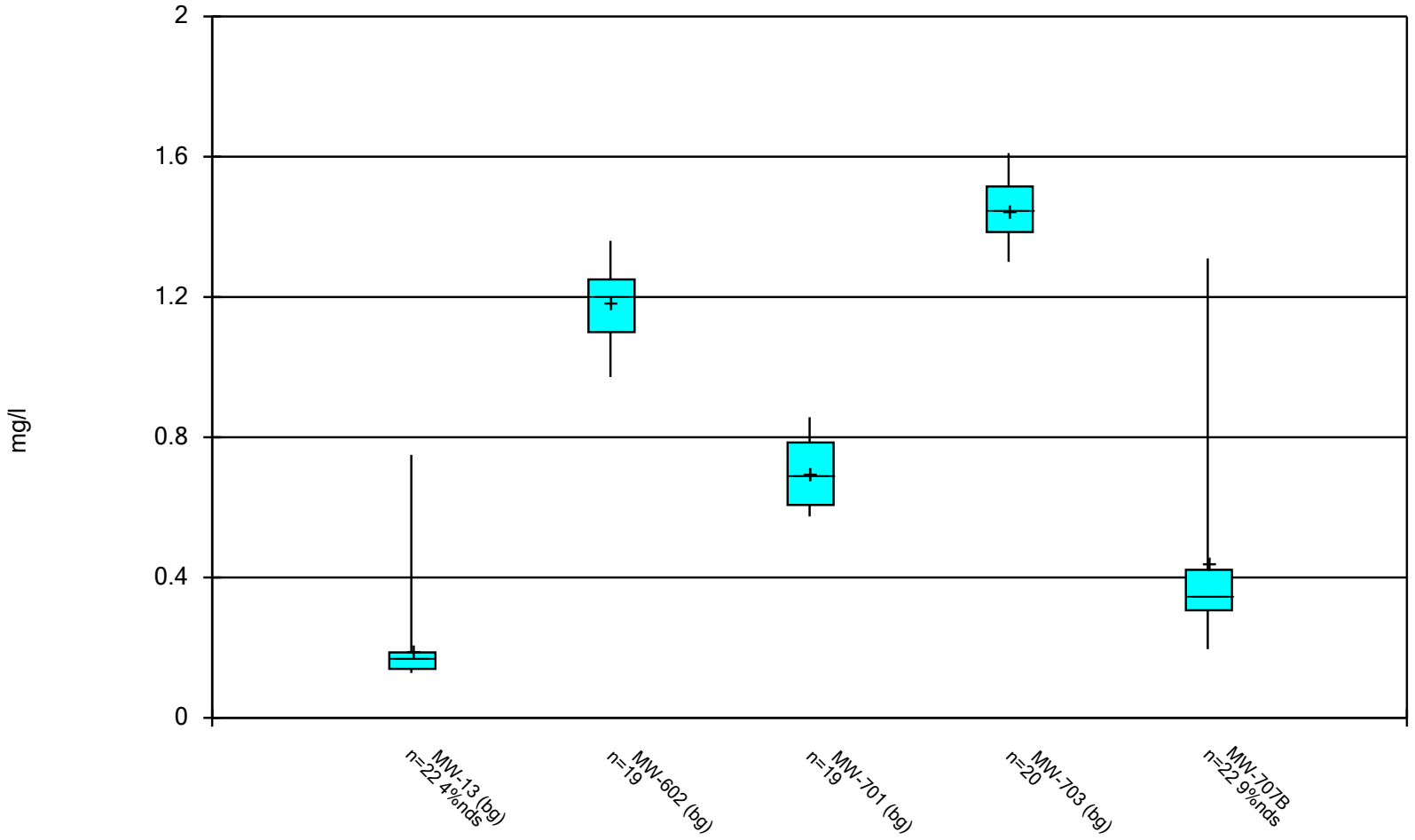
This report has been prepared and reviewed under the direction of a qualified groundwater scientist and qualified professional engineer. Please note that SCS Engineers does not warrant the work of regulatory agencies or other third parties supplying information used in the assimilation of this report. This report is prepared in accordance with generally accepted environmental engineering and geological practices, within the constraints of the client's directives. It is intended for the exclusive use of Evergy Metro, Inc. for specific application to the La Cygne Generating Station. No warranties, express or implied, are intended or made.

The signatures of the certifying registered geologist and professional engineer on this document represents that to the best of their knowledge, information, and belief in the exercise of their professional judgement in accordance with the standard of practice, it is their professional opinions that the aforementioned information is accurate as of the date of such signatures. Any opinion or decisions by them are made on the basis of their experience, qualifications, and professional judgement and are not to be construed as warranties or guaranties. In addition, opinions relating to regulatory, environmental, geologic, geochemical and geotechnical conditions interpretations or other estimates are based on available data, and actual conditions may vary from those encountered at the times and locations where data are obtained, despite the use of due care.

Appendix A

Box and Whiskers Plots

Box & Whiskers Plot



Constituent: FLUORIDE Analysis Run 4/24/2023 3:58 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Box & Whiskers Plot

Constituent: FLUORIDE (mg/l) Analysis Run 4/24/2023 3:59 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-13 (bg)	MW-602 (bg)	MW-701 (bg)	MW-703 (bg)	MW-707B
6/7/2016			0.717	1.37	
6/9/2016	0.17				
6/10/2016		1.21			
6/23/2016					0.386
8/9/2016		1.27	0.719	1.44	0.347
8/11/2016	0.128				
10/11/2016			0.751	1.45	0.382
10/13/2016	0.171	1.3			
12/6/2016			0.816	1.55	0.353
12/9/2016		1.16			
12/13/2016	0.142				
2/7/2017			0.679	1.44	0.293
2/8/2017		1.24			
2/10/2017	0.167				
4/4/2017			0.79	1.4	0.323
4/6/2017	0.171				
4/7/2017		1.18			
6/13/2017			0.692		0.613
6/14/2017				1.45	
6/15/2017	0.137	1.2			
8/8/2017	0.139		0.857		0.402
8/10/2017		1.36		1.58	
10/3/2017			0.798		0.391
10/5/2017	0.138	0.972		1.37	
5/23/2018	0.227	1.27			
5/24/2018			0.785	1.49	0.392
7/11/2018	0.181				
11/30/2018	0.191	1.09			
12/3/2018			0.642	1.52	
12/4/2018					0.328
1/14/2019	0.208				
3/11/2019	0.194				
5/23/2019	0.176	1.06	0.603	1.34	0.276
11/7/2019	0.182	1.07	0.703	1.56	0.442
5/19/2020	0.169	1.24	0.63	1.41	0.325
11/12/2020	0.165	1.25	0.607	1.61	0.196
2/4/2021				1.51	
5/18/2021	<1.5	1.23			
5/19/2021			0.641	1.3	0.281
11/18/2021	0.132	1.14	0.589	1.46	0.25
5/9/2022	0.16	1.14	0.574	1.42	<1.5
7/15/2022					0.328
11/9/2022	0.14	1.1	0.594	1.31	1.31 (j)
1/12/2023					<0.64 (M)
2/8/2023					1 (E)
Median	0.1695	1.2	0.692	1.445	0.35
LowerQ.	0.1395	1.1	0.607	1.385	0.3065
UpperQ.	0.1865	1.25	0.785	1.515	0.422
Min	0.128	0.972	0.574	1.3	0.196
Max	0.75	1.36	0.857	1.61	1.31
Mean	0.1926	1.183	0.6941	1.449	0.4404

ND substitution: RL/2.

Box & Whiskers Plot

LaCygne Client: SCS Engineers Data: LaC GW Data Printed 4/24/2023, 3:59 PM

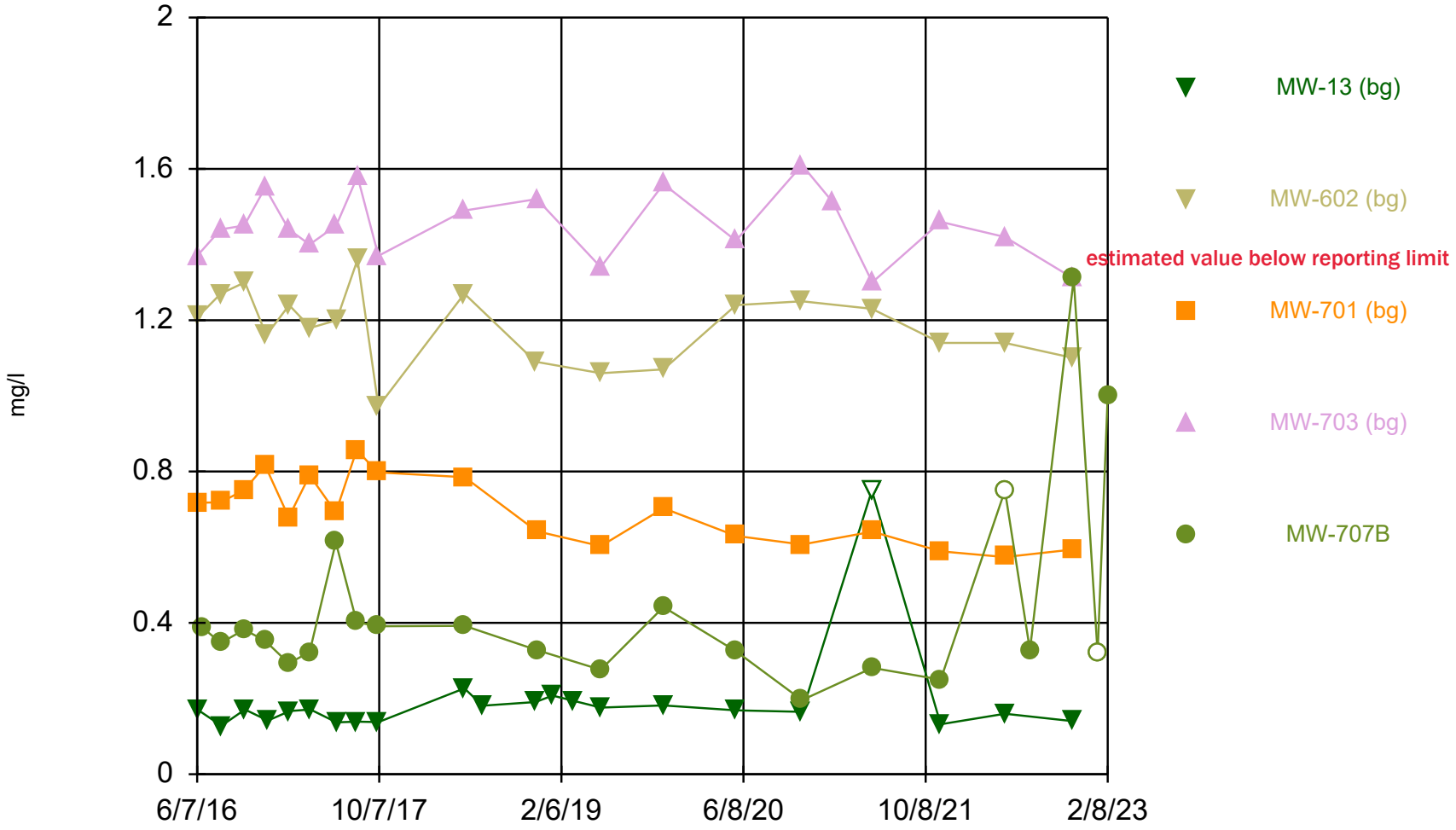
Constituent	Well	N	Mean	Std. Dev.	Std. Err.	Median	Min.	Max.	%NDs
FLUORIDE (mg/l)	MW-13 (bg)	22	0.1926	0.1271	0.0271	0.1695	0.128	0.75	4.545
FLUORIDE (mg/l)	MW-602 (bg)	19	1.183	0.09619	0.02207	1.2	0.972	1.36	0
FLUORIDE (mg/l)	MW-701 (bg)	19	0.6941	0.08672	0.01989	0.692	0.574	0.857	0
FLUORIDE (mg/l)	MW-703 (bg)	20	1.449	0.08795	0.01967	1.445	1.3	1.61	0
FLUORIDE (mg/l)	MW-707B	22	0.4404	0.2638	0.05623	0.35	0.196	1.31	9.091

Appendix B

Time Series Plots

Hollow symbols indicate censored values.

Time Series



Constituent: FLUORIDE Analysis Run 4/24/2023 4:00 PM View: Upper AQC III

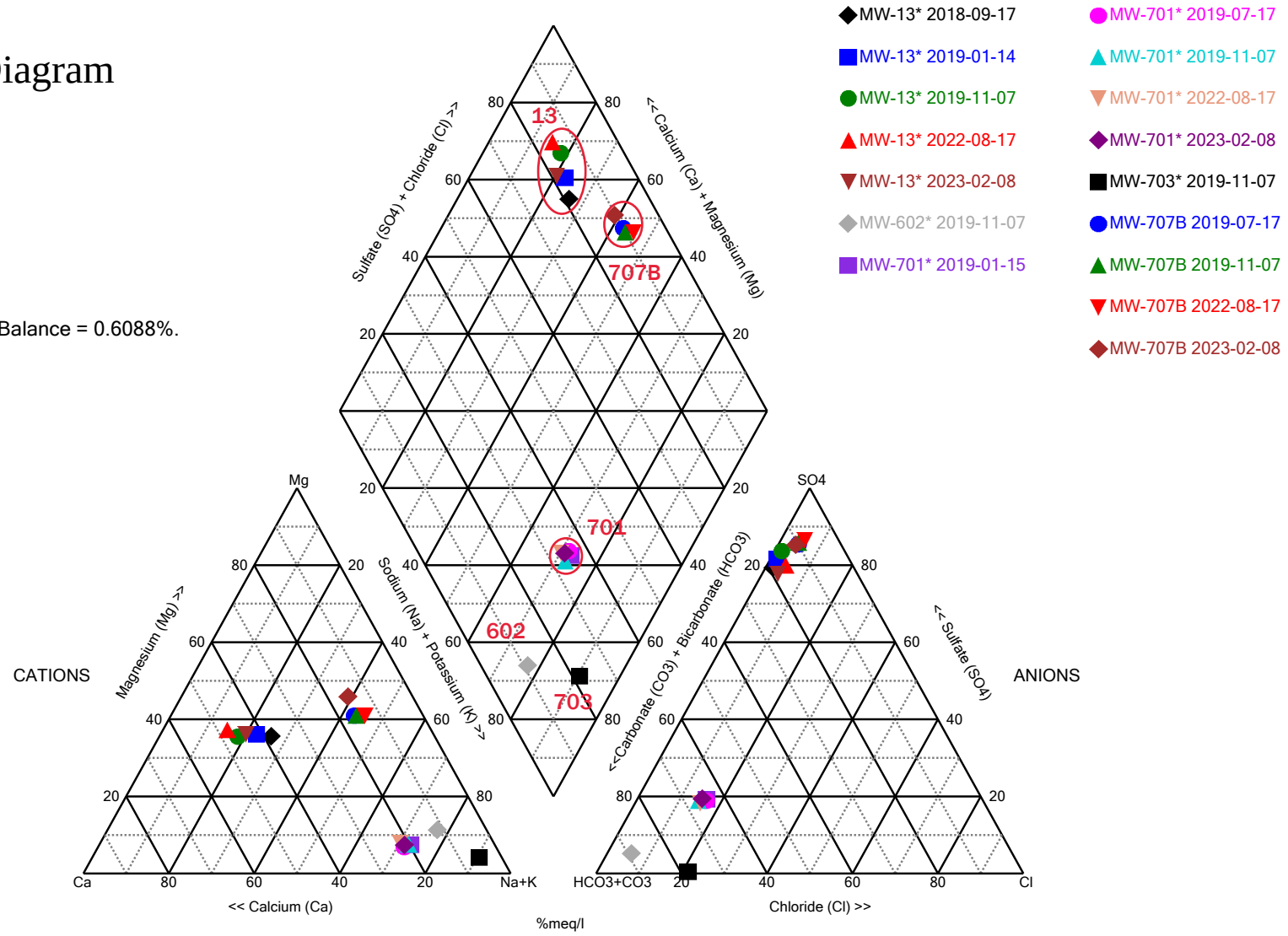
LaCygne Client: SCS Engineers Data: LaC GW Data

Appendix C

Piper Diagram Plots and Analytical Results

Piper Diagram

Cation-Anion Balance = 0.6088%.



Analysis Run 4/24/2023 4:10 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Piper Diagram

Analysis Run 4/24/2023 4:11 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Totals (ppm)	Na	K	Ca	Mg	Cl	SO4	HCO3	CO3
MW-13* 2018-09-17	165	3.55	214	120	13.1	1010	295	10
MW-13* 2019-01-14	151	3.3	247	128	12.5	1120	289	10
MW-13* 2019-11-07	154	3.37	340	159	15.7	1450	321	10
MW-13* 2022-08-17	118	2.93	339	159	53.8	1440	346	10
MW-13* 2023-02-08	164	4.95	319	157	35.1	1210	366	10
MW-602* 2019-11-07	192	3.59	24.9	15	16.6	24.5	523	10
MW-701* 2019-01-15	169	3.11	40.2	8.79	47.9	83.3	336	10
MW-701* 2019-07-17	172	2.91	45	8.71	50.7	83.4	349	10
MW-701* 2019-11-07	163	2.85	40.4	8.6	46.2	83.7	369	10
MW-701* 2022-08-17	153	3.23	42	8.91	48.6	84.5	375	10
MW-701* 2023-02-08	172	3.74	45.4	9.2	45.7	83.9	349	10
MW-703* 2019-11-07	339	3.53	17.6	8.07	111	2.5	725	10
MW-707B 2019-07-17	1200	19.2	406	615	183	4920	746	10
MW-707B 2019-11-07	1220	18.8	386	613	169	5330	813	10
MW-707B 2022-08-17	1070	19.2	285	510	194	4440	548	10
MW-707B 2023-02-08	1120	22.5	398	709	172	4980	795	10

APPENDIX D

LABORATORY ANALYTICAL REPORTS

- January 2023 – First verification sampling for the Fall 2022 detection monitoring event.
- February 2023 – Second verification sampling for the Fall 2022 detection monitoring event.
- May 2023 – Spring 2023 semiannual detection monitoring sampling event.
- July 2023 – First verification sampling for the Spring 2023 detection monitoring sampling event.
- November 2023 - Fall 2023 semiannual detection monitoring sampling event.

ANALYTICAL REPORT

January 19, 2023

SCS Engineers - KS

Sample Delivery Group:	L1576034
Samples Received:	01/13/2023
Project Number:	27217233.21 - I
Description:	Evergy La Cygne Gen Station GW 2022-23

Report To:

Jason Franks
8575 West 110th Street
Suite 100
Overland Park, KS 66210

Entire Report Reviewed By:

Jeff Carr
Project Manager

TABLE OF CONTENTS

MW-701 L1576034-01 GW

Collected by: Matt Vander Putten | Collected date/time: 01/12/23 12:25 | Received date/time: 01/13/23 09:15

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1988769	1	01/14/23 13:41	01/14/23 13:41	GEB	Mt. Juliet, TN

DUPLICATE U1 L1576034-02 GW

Collected by: Matt Vander Putten | Collected date/time: 01/12/23 12:25 | Received date/time: 01/13/23 09:15

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1988769	1	01/14/23 14:45	01/14/23 14:45	GEB	Mt. Juliet, TN

MW-707B L1576034-03 GW

Collected by: Matt Vander Putten | Collected date/time: 01/12/23 11:05 | Received date/time: 01/13/23 09:15

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1988769	10	01/14/23 19:16	01/14/23 19:16	GEB	Mt. Juliet, TN

DUPLICATE U2 L1576034-04 GW

Collected by: Matt Vander Putten | Collected date/time: 01/12/23 11:05 | Received date/time: 01/13/23 09:15

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG1988769	10	01/14/23 15:01	01/14/23 15:01	GEB	Mt. Juliet, TN

MW-708 L1576034-05 GW

Collected by: Matt Vander Putten | Collected date/time: 01/12/23 11:50 | Received date/time: 01/13/23 09:15

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG1989696	1	01/17/23 09:56	01/17/23 13:51	TDW	Mt. Juliet, TN

DUPLICATE U3 L1576034-06 GW

Collected by: Matt Vander Putten | Collected date/time: 01/12/23 11:50 | Received date/time: 01/13/23 09:15

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG1989696	1	01/17/23 09:56	01/17/23 13:51	TDW	Mt. Juliet, TN

CASE NARRATIVE

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

Jeff Carr
Project Manager

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Sulfate	88200		594	5000	1	01/14/2023 13:41	WG1988769

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Sulfate	87900		594	5000	1	01/14/2023 14:45	WG1988769

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Fluoride	U		640	1500	10	01/14/2023 19:16	WG1988769

Sample Narrative:

L1576034-03 WG1988769: Dilution due to matrix.

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Fluoride	U		640	1500	10	01/14/2023 15:01	WG1988769

Sample Narrative:

L1576034-04 WG1988769: Dilution due to matrix.

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	597000	J3	13300	1	01/17/2023 13:51	WG1989696

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	633000		13300	1	01/17/2023 13:51	WG1989696

Method Blank (MB)

(MB) R3882612-1 01/17/23 13:51

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Dissolved Solids	U		10000	10000

L1576034-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1576034-05 01/17/23 13:51 • (DUP) R3882612-3 01/17/23 13:51

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	597000	635000	1	6.06	J3	5

L1576034-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1576034-06 01/17/23 13:51 • (DUP) R3882612-4 01/17/23 13:51

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	633000	625000	1	1.27		5

Laboratory Control Sample (LCS)

(LCS) R3882612-2 01/17/23 13:51

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Dissolved Solids	8800000	8110000	92.2	77.3-123	

Method Blank (MB)

(MB) R3881130-1 01/14/23 10:17

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1576034-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1576034-01 01/14/23 13:41 • (DUP) R3881130-3 01/14/23 13:57

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	625	624	1	0.0961		15
Sulfate	88200	88300	1	0.162		15

L1576034-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1576034-03 01/14/23 19:16 • (DUP) R3881130-6 01/14/23 19:32

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	U	U	10	0.000		15

Sample Narrative:

OS: Dilution due to matrix.

Laboratory Control Sample (LCS)

(LCS) R3881130-2 01/14/23 10:33

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Fluoride	8000	8500	106	80.0-120	
Sulfate	40000	40900	102	80.0-120	

L1576034-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1576034-01 01/14/23 13:41 • (MS) R3881130-4 01/14/23 14:13 • (MSD) R3881130-5 01/14/23 14:29

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	5000	625	6050	5990	109	107	1	80.0-120			1.12	15
Sulfate	50000	88200	133000	133000	90.4	89.4	1	80.0-120			0.356	15

L1576034-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1576034-03 01/14/23 19:16 • (MS) R3881130-7 01/14/23 19:48 • (MSD) R3881130-8 01/14/23 20:04

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	5000	U	5340	5610	107	112	10	80.0-120			4.95	15

Sample Narrative:

OS: Dilution due to matrix.

GLOSSARY OF TERMS

Guide to Reading and Understanding Your Laboratory Report

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

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

Abbreviations and Definitions

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

Qualifier	Description
J3	The associated batch QC was outside the established quality control range for precision.

ACCREDITATIONS & LOCATIONS

Pace Analytical National 12065 Lebanon Rd Mount Juliet, TN 37122

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN000032021-1
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	TN00003
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO000356
Kentucky [1 6]	KY90010	South Carolina	84004002
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana	LA018	Texas	T104704245-20-18
Maine	TN00003	Texas [5]	LAB0152
Maryland	324	Utah	TN000032021-11
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	110033
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	998093910
Montana	CERT0086	Wyoming	A2LA
A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

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

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

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

Company Name/Address:
SCS Engineers - KS
8575 West 110th Street
Suite 100
Overland Park. KS 66210

Billing Information:
Accounts Payable
8575 W. 110th Street
Suite 100
Overland Park, KS 66210

Pres Chk

Report to: **Jason Franks**

Email To: **jfranks@scsengineers.com;jay.martin@evergy.c**

Project Description: **Evergy La Cygne Gen Station GW 2022-23**

City/State Collected: La Cygne KS

Please Circle: PT MT CT ET

Phone: **913-681-0030**

Client Project # **27217233.21 - I**

Lab Project # **AQUAOPKS-LACYGNE**

Collected by (print): Matt VanderPutten

Site/Facility ID #

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed: Std

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Fluoride 125mlHDPE-NoPres	Sulfate 125mlHDPE-NoPres	TDS 1L-HDPE NoPres	Remarks	Sample # (lab only)
MW-701	Grab	GW	NA	1/12/23	1225	1		X			-01
MW-701 MS/MSD		GW			1225	1		X			
DUPLICATE U1		GW			1225	1		X			-02
MW-707B		GW			1105	1	X				-03
MW-707B MS/MSD		GW			1105	1	X				
DUPLICATE U2		GW			1105	1	X				-04
MW-708		GW			1150	1			X		-05
DUPLICATE U3		GW			1150	1			X		-06

Analysis / Container / Preservative

Chain of Custody Page ___ of ___

Pace
PEOPLE ADVANCING SCIENCE

MT JULIET, TN
12065 Lebanon Rd Mount Juliet, TN 37122
Submitting a sample via this chain of custody constitutes acknowledgment and acceptance of the Pace Terms and Conditions found at: https://info.pacelabs.com/hubfs/pas-standard-terms.pdf

SDG # L1576034
E190

Acctnum: **AQUAOPKS**
Template: **T136276**
Prelogin: **P973649**
PM: **206 - Jeff Carr**
PB:
Shipped Via:

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via: __ UPS __ FedEx __ Courier _____

Tracking # 5671 5374 5645

Sample Receipt Checklist

COC Seal Present/Intact:	NP	Y N
COC Signed/Accurate:		Y N
Bottles arrive intact:		Y N
Correct bottles used:		Y N
Sufficient volume sent:		Y N
If Applicable		
VOA Zero Headspace:		Y N
Preservation Correct/Checked:		Y N
RAD Screen <0.5 mR/hr:		Y N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
	1/12/23	1700	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)

Trip Blank Received: Yes / No
HCL / MeoH
TBR

Temp: 6.3A °C Bottles Received: 8

Date: 1-13 Time: 0915

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

February 20, 2023

Jason Franks
SCS Engineers
8575 West 110th St
Suite 100
Overland Park, KS 66210

RE: Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Dear Jason Franks:

Enclosed are the analytical results for sample(s) received by the laboratory on February 09, 2023. The results relate only to the samples included in this report. Results reported herein conform to the applicable TNI/NELAC Standards and the laboratory's Quality Manual, where applicable, unless otherwise noted in the body of the report.

The test results provided in this final report were generated by each of the following laboratories within the Pace Network:

- Pace Analytical Services - Kansas City

If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Heather Wilson
heather.wilson@pacelabs.com
1(913)563-1407
Project Manager

Enclosures

cc: Andrea Bausch, SCS Engineers

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

CERTIFICATIONS

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Pace Analytical Services Kansas

9608 Loiret Boulevard, Lenexa, KS 66219
Missouri Inorganic Drinking Water Certification #: 10090
Arkansas Drinking Water
Arkansas Certification #: 22-031-0
Illinois Certification #: 2000302021-3
Iowa Certification #: 118
Kansas/NELAP Certification #: E-10116
Louisiana Certification #: 03055
Nevada Certification #: KS000212023-1
Oklahoma Certification #: 2022-057
Florida: Cert E871149 SEKS WET
Texas Certification #: T104704407-21-15
Utah Certification #: KS000212022-12
Illinois Certification #: 004592
Kansas Field Laboratory Accreditation: # E-92587
Missouri SEKS Micro Certification: 10070

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

SAMPLE SUMMARY

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Lab ID	Sample ID	Matrix	Date Collected	Date Received
60421765001	**MW-701**	Water	02/08/23 10:50	02/09/23 15:42
60421765002	**MW-707B**	Water	02/08/23 12:10	02/09/23 15:42
60421765003	**DUPLICATE U2**	Water	02/08/23 12:20	02/09/23 15:42

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

SAMPLE ANALYTE COUNT

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Lab ID	Sample ID	Method	Analysts	Analytes Reported	Laboratory
60421765001	**MW-701**	EPA 300.0	CRN2	1	PASI-K
60421765002	**MW-707B**	EPA 300.0	CRN2	1	PASI-K
60421765003	**DUPLICATE U2**	EPA 300.0	CRN2	1	PASI-K

PASI-K = Pace Analytical Services - Kansas City

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

ANALYTICAL RESULTS

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Sample: MW-701 **Lab ID: 60421765001** Collected: 02/08/23 10:50 Received: 02/09/23 15:42 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
300.0 IC Anions 28 Days	Analytical Method: EPA 300.0 Pace Analytical Services - Kansas City								
Sulfate	**78.0**	mg/L	20.0	11.0	20		02/15/23 18:16	14808-79-8	

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

ANALYTICAL RESULTS

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Sample: MW-707B **Lab ID: 60421765002** Collected: 02/08/23 12:10 Received: 02/09/23 15:42 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
300.0 IC Anions 28 Days	Analytical Method: EPA 300.0 Pace Analytical Services - Kansas City								
Fluoride	**6.9**	mg/L	0.20	0.12	1		02/15/23 18:30	16984-48-8	M1,R1

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

ANALYTICAL RESULTS

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Sample: DUPLICATE U2 **Lab ID: 60421765003** Collected: 02/08/23 12:20 Received: 02/09/23 15:42 Matrix: Water

Parameters	Results	Units	Report Limit	MDL	DF	Prepared	Analyzed	CAS No.	Qual
300.0 IC Anions 28 Days	Analytical Method: EPA 300.0 Pace Analytical Services - Kansas City								
Fluoride	**6.1**	mg/L	0.20	0.12	1		02/15/23 19:23	16984-48-8	

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

QUALITY CONTROL DATA

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

QC Batch: 831953 | Analysis Method: EPA 300.0
QC Batch Method: EPA 300.0 | Analysis Description: 300.0 IC Anions
Laboratory: Pace Analytical Services - Kansas City
Associated Lab Samples: 60421765001, 60421765002, 60421765003

METHOD BLANK: 3301805 Matrix: Water
Associated Lab Samples: 60421765001, 60421765002, 60421765003

Parameter	Units	Blank Result	Reporting Limit	MDL	Analyzed	Qualifiers
Fluoride	mg/L	ND	0.20	0.12	02/15/23 09:40	
Sulfate	mg/L	ND	1.0	0.55	02/15/23 09:40	

METHOD BLANK: 3303831 Matrix: Water
Associated Lab Samples: 60421765001, 60421765002, 60421765003

Parameter	Units	Blank Result	Reporting Limit	MDL	Analyzed	Qualifiers
Fluoride	mg/L	ND	0.20	0.12	02/17/23 09:18	
Sulfate	mg/L	ND	1.0	0.55	02/17/23 09:18	

LABORATORY CONTROL SAMPLE: 3301806

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Fluoride	mg/L	2.5	2.3	93	90-110	
Sulfate	mg/L	5	4.8	95	90-110	

LABORATORY CONTROL SAMPLE: 3303832

Parameter	Units	Spike Conc.	LCS Result	LCS % Rec	% Rec Limits	Qualifiers
Fluoride	mg/L	2.5	2.4	97	90-110	
Sulfate	mg/L	5	4.9	98	90-110	

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 3301807 3301808

Parameter	Units	60421882005 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Fluoride	mg/L	ND	50	50	56.6	57.0	113	114	80-120	1	15	
Sulfate	mg/L	56.9	100	100	210	211	153	154	80-120	0	15	M1

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

QUALITY CONTROL DATA

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 3301810 3301811

Parameter	Units	60421763003 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Fluoride	mg/L	ND	50	50	51.9	43.1	104	86	80-120	19	15	R1
Sulfate	mg/L	50.6	100	100	173	147	123	96	80-120	16	15	M1,R1

MATRIX SPIKE & MATRIX SPIKE DUPLICATE: 3304791 3304792

Parameter	Units	60421765002 Result	MS Spike Conc.	MSD Spike Conc.	MS Result	MSD Result	MS % Rec	MSD % Rec	% Rec Limits	RPD	Max RPD	Qual
Fluoride	mg/L	6.9	2.5	2.5	7.8	7.5	36	24	80-120	4	15	M1,R1
Sulfate	mg/L	4700	5	5	4700	4720	110	339	80-120	0	15	

SAMPLE DUPLICATE: 3301809

Parameter	Units	60421882005 Result	Dup Result	RPD	Max RPD	Qualifiers
Fluoride	mg/L	ND	ND		15	
Sulfate	mg/L	56.9	57.1	0	15	

SAMPLE DUPLICATE: 3301812

Parameter	Units	60421763003 Result	Dup Result	RPD	Max RPD	Qualifiers
Fluoride	mg/L	ND	ND		15	
Sulfate	mg/L	50.6	66.9	28	15	D6

SAMPLE DUPLICATE: 3304793

Parameter	Units	60421765002 Result	Dup Result	RPD	Max RPD	Qualifiers
Fluoride	mg/L	6.9	7.3	5	15	
Sulfate	mg/L	4700	4660	1	15	

Results presented on this page are in the units indicated by the "Units" column except where an alternate unit is presented to the right of the result.

REPORT OF LABORATORY ANALYSIS

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

QUALIFIERS

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

DEFINITIONS

DF - Dilution Factor, if reported, represents the factor applied to the reported data due to dilution of the sample aliquot.

ND - Not Detected at or above adjusted reporting limit.

TNTC - Too Numerous To Count

J - Estimated concentration above the adjusted method detection limit and below the adjusted reporting limit.

MDL - Adjusted Method Detection Limit.

PQL - Practical Quantitation Limit.

RL - Reporting Limit - The lowest concentration value that meets project requirements for quantitative data with known precision and bias for a specific analyte in a specific matrix.

S - Surrogate

1,2-Diphenylhydrazine decomposes to and cannot be separated from Azobenzene using Method 8270. The result for each analyte is a combined concentration.

Consistent with EPA guidelines, unrounded data are displayed and have been used to calculate % recovery and RPD values.

LCS(D) - Laboratory Control Sample (Duplicate)

MS(D) - Matrix Spike (Duplicate)

DUP - Sample Duplicate

RPD - Relative Percent Difference

NC - Not Calculable.

SG - Silica Gel - Clean-Up

U - Indicates the compound was analyzed for, but not detected.

N-Nitrosodiphenylamine decomposes and cannot be separated from Diphenylamine using Method 8270. The result reported for each analyte is a combined concentration.

Reported results are not rounded until the final step prior to reporting. Therefore, calculated parameters that are typically reported as "Total" may vary slightly from the sum of the reported component parameters.

Pace Analytical is TNI accredited. Contact your Pace PM for the current list of accredited analytes.

TNI - The NELAC Institute.

ANALYTE QUALIFIERS

D6	The precision between the sample and sample duplicate exceeded laboratory control limits.
M1	Matrix spike recovery exceeded QC limits. Batch accepted based on laboratory control sample (LCS) recovery.
R1	RPD value was outside control limits.

Pace Analytical Services, LLC
9608 Loiret Blvd.
Lenexa, KS 66219
(913)599-5665

QUALITY CONTROL DATA CROSS REFERENCE TABLE

Project: EVERGY LA CYGNE GEN STATION GW
Pace Project No.: 60421765

Lab ID	Sample ID	QC Batch Method	QC Batch	Analytical Method	Analytical Batch
60421765001	**MW-701**	EPA 300.0	831953		
60421765002	**MW-707B**	EPA 300.0	831953		
60421765003	**DUPLICATE U2**	EPA 300.0	831953		

Pace ANALYTICAL SERVICES	DC#_Title: ENV-FRM-LENE-0009_Samp	WO# : 60421765
	Revision: 2	Effective Date: 01/12/202

Client Name: SCS ENGINEERS

Courier: FedEx ☐ UPS ☐ VIA ☐ Clay ☐ PEX ☐ ECI ☐ Pace ☐ Xroads ☐ Client ☑ Other ☐

Tracking #: _____ Pace Shipping Label Used? Yes ☑ No ☐

Custody Seal on Cooler/Box Present: Yes ☑ No ☐ Seals intact: Yes ☐ No ☑

Packing Material: Bubble Wrap ☑ Bubble Bags ☐ Foam ☐ None ☐ Other ☐

Thermometer Used: T-2116 **Type of Ice:** Wet Blue None

Cooler Temperature (°C): **As-read** 0.2 **Corr. Factor** -0.1 **Corrected** 0.1

Date and initials of person examining contents: VT 3/10

Temperature should be above freezing to 6°C

Chain of Custody present:	☑Yes ☐No ☐N/A	
Chain of Custody relinquished:	☑Yes ☐No ☐N/A	
Samples arrived within holding time:	☑Yes ☐No ☐N/A	
Short Hold Time analyses (<72hr):	☐Yes ☑No ☐N/A	
Rush Turn Around Time requested:	☐Yes ☑No ☐N/A	
Sufficient volume:	☑Yes ☐No ☐N/A	
Correct containers used:	☑Yes ☐No ☐N/A	
Pace containers used:	☑Yes ☐No ☐N/A	
Containers intact:	☑Yes ☐No ☐N/A	
Unpreserved 5035A / TX1005/1006 soils frozen in 48hrs?	☐Yes ☐No ☑N/A	
Filtered volume received for dissolved tests?	☐Yes ☐No ☑N/A	
Sample labels match COC: Date / time / ID / analyses	☑Yes ☐No ☐N/A	
Samples contain multiple phases? Matrix: WT	☐Yes ☑No ☐N/A	
Containers requiring pH preservation in compliance? (HNO_3, H_2SO_4, HCl<2; NaOH>9 Sulfide, NaOH>10 Cyanide) (Exceptions: VOA, Micro, O&G, KS TPH, OK-DRO) **LOT#:**	☐Yes ☐No ☑N/A	List sample IDs, volumes, lot #'s of preservative and the date/time added.
Cyanide water sample checks: Lead acetate strip turns dark? (Record only)	☐Yes ☐No	
Potassium iodide test strip turns blue/purple? (Preserve)	☐Yes ☐No	
Trip Blank present:	☐Yes ☐No ☑N/A	
Headspace in VOA vials (>6mm):	☐Yes ☐No ☑N/A	
Samples from USDA Regulated Area: State:	☐Yes ☐No ☑N/A	
Additional labels attached to 5035A / TX1005 vials in the field?	☐Yes ☐No ☑N/A	

Client Notification/ Resolution: Copy COC to Client? Y / N Field Data Required? Y / N

Person Contacted: _____ Date/Time: _____

Comments/ Resolution: _____

Project Manager Review: _____ Date: _____

Qualtrax Document ID: 30468

Pace Analytical
www.pacelabs.com

CHAIN-OF-CUSTODY / Analytical Request Document

The Chain-of-Custody is a LEGAL DOCUMENT. All relevant fields must be completed accurately.

Section A Required Client Information:		Section B Required Project Information:		Section C Invoice Information:	
Company:	SCS Engineers	Report To:	Jason R. Franks	Attention:	
Address:	8575 W 110th Street, Suite 100	Copy To:		Company Name:	
	Overland Park, Kansas 66210			Address:	
Email To:	jfranks@scsengineers.com	Purchase Order No.:		Pace Quote Reference:	
Phone:	913-302-3238 Fax:	Project Name:	Evergy La Cygne Gen Station GW 2022-23	Pace Project Manager:	
Requested Due Date/TAT:	STD	Project Number:	27217233.22 - F	Pace Profile #:	

REGULATORY AGENCY

☐ NPDES ☑ GROUND WATER ☐ DRINKING WATER
☐ UST ☐ RCRA ☐ OTHER _____

Site Location STATE: KS

Section D Required Client Information

SAMPLE ID
(A-Z, 0-9 / ,-)
Sample IDs MUST BE UNIQUE

Valid Matrix Codes

MATRIX	CODE
DRINKING WATER	DW
WATER	WT
WASTE WATER	WW
PRODUCT	P
SOIL/SOLID	SL
OIL	OL
WIPE	WP
AIR	AR
OTHER	OT
TISSUE	TS

ITEM #	SAMPLE ID	MATRIX CODE (see valid codes to left)	SAMPLE TYPE (G=GRAB C=COMP)	COLLECTED: COMPOSITE START DATE	COLLECTED: COMPOSITE START TIME	COLLECTED: COMPOSITE END/GRAB DATE	COLLECTED: COMPOSITE END/GRAB TIME	SAMPLE TEMP AT COLLECTION	# OF CONTAINERS	Preservatives: Unpreserved	H_2SO_4	HNO_3	HCl	NaOH	$Na_2S_2O_3$	Methanol	Other	Analysis Test Y/N	300.0 Fluoride	300.0 Sulfate	Residual Chlorine (Y/N)	Pace Project No./ Lab I.D.
1	MW-701	WT	G	-	-	02/08/23	10:50	-	1	1										X		60421765
2	MW-707B	WT	G	-	-	02/08/23	12:10	-	1	1									X			
3	Duplicate U2	WT	G	-	-	02/08/23	12:20	-	1	1									X			
4	MW-707 MS/MSD	WT	G	-	-	02/08/23	12:15	-	1	1									X			
5																						
6																						
7																						
8																						
9																						
10																						
11																						
12																						

ADDITIONAL COMMENTS	RELINQUISHED BY / AFFILIATION	DATE	TIME	ACCEPTED BY / AFFILIATION	DATE	TIME	SAMPLE CONDITIONS: Temp in °C	Received on Ice (Y/N)	Custody Sealed Cooler (Y/N)	Samples Intact (Y/N)
	Jason R. Franks / SCS	2/9/23	16:00		2/9/23	1542	0-2	Y	Y	Y

SAMPLER NAME AND SIGNATURE

PRINT Name of SAMPLER: Jason R. Franks

SIGNATURE of SAMPLER:

DATE Signed (MM/DD/YY): 2/9/23

*Important Note: By signing this form you are accepting Pace's NET 30 day payment terms and agreeing to late charges of 1.5% per month for any invoices not paid within 30 days.

Client: SCS ENGINEERS Profile # 15762-2

Site: EVERGY LA CYGNE GEN STATION GW 2022-23 Notes MS/MSD

COC Line Item	Matrix	VG9H	DG9H	DG9Q	VG9U	DG9U	DG9M	DG9B	BG1U	AG1H	AG1U	AG2U	AG3S	AG4U	AG5U	JGFU	WGKU	WGDU	BP1U	BP2U	BP3U	BP1N	BP3N	BP3F	BP3S	BP3C	BP3Z	WPDU	ZPLC	Other		
1																					1											
2																					2											
3																					1											
4																																
5																																
6																																
7																																
8																																
9																																
10																																
11																																
12																																

Container Codes

Glass			
DG9B	40mL bisulfate clear vial	WGKU	8oz clear soil jar
DG9H	40mL HCl amber voa vial	WGFU	4oz clear soil jar
DG9M	40mL MeOH clear vial	WG2U	2oz clear soil jar
DG9Q	40mL TSP amber vial	JGFU	4oz unpreserved amber wide
DG9S	40mL H2SO4 amber vial	AG0U	100mL unores amber glass
DG9T	40mL Na Thio amber vial	AG1H	1L HCl amber glass
DG9U	40mL amber unpreserved	AG1S	1L H2SO4 amber glass
VG9H	40mL HCl clear vial	AG1T	1L Na Thiosulfate clear/amber glass
VG9T	40mL Na Thio. clear vial	AG1U	1liter unpres amber glass
VG9U	40mL unpreserved clear vial	AG2N	500mL HNO3 amber glass
BG1S	1liter H2SO4 clear glass	AG2S	500mL H2SO4 amber glass
BG1U	1liter unpres glass	AG3S	250mL H2SO4 amber glass
BG3H	250mL HCL Clear glass	AG2U	500mL unpres amber glass
BG3U	250mL Unpres Clear glass	AG3U	250mL unpres amber glass
WGDU	16oz clear soil jar	AG4U	125mL unpres amber glass
		AG5U	100mL unpres amber glass

Plastic	
BP1C	1L NAOH plastic
BP1N	1L HNO3 plastic
BP1S	1L H2SO4 plastic
BP1U	1L unpreserved plastic
BP1Z	1L NaOH, Zn Acetate
BP2C	500mL NAOH plastic
BP2N	500mL HNO3 plastic
BP2S	500mL H2SO4 plastic
BP2U	500mL unpreserved plastic
BP2Z	500mL NaOH, Zn Acetate
BP3C	250mL NaOH plastic
BP3F	250mL HNO3 plastic - field filtered
BP3N	250mL HNO3 plastic
BP3U	250mL unpreserved plastic
BP3S	250mL H2SO4 plastic
BP3Z	250mL NaOH, Zn Acetate
BP4U	125mL unpreserved plastic
BP4N	125mL HNO3 plastic
BP4S	125mL H2SO4 plastic
WPDU	16oz unpresserved plstic

Misc.	
I	Wipe/Swab
SP5T	120mL Coliform Na Thiosulfate
ZPLC	Ziploc Bag
AF	Air Filter
C	Air Cassettes
R	Terracore Kit
U	Summa Can

Matrix	
WT	Water
SL	Solid
NAL	Non-aqueous Liquid
OL	OIL
WP	Wipe
DW	Drinking Water

Work Order Number: 60421765

eurofins | Environment Testing

ANALYTICAL REPORT

PREPARED FOR

Attn: Jason R Franks
SCS Engineers
8575 W 110th St
Suite 100
Overland Park, Kansas 66210

Generated 3/16/2023 6:23:39 PM Revision 2

JOB DESCRIPTION

Evergy La Cygne Gen Station 27217233.22

JOB NUMBER

500-229308-1

Eurofins Chicago
2417 Bond Street
University Park IL 60484

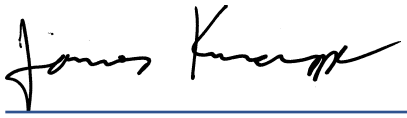
See page two for job notes and contact information.

Job Notes

The test results in this report meet all NELAP requirements for parameters for which accreditation is required or available. Any exceptions to the NELAP requirements are noted in this report. Pursuant to NELAP, this report may not be reproduced, except in full, without the written approval of the laboratory. This report is confidential and is intended for the sole use of Eurofins Environment Testing North Central, LLC and its client. All questions regarding this report should be directed to the Eurofins Environment Testing North Central, LLC Project Manager who has signed this report.

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 Chicago Project Manager.

Authorization



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Revision 2

Authorized for release by
Jim Knapp, Project Manager II
Jim.Knapp@et.eurofinsus.com
Designee for
Sandie Fredrick, Project Manager II
Sandra.Fredrick@et.eurofinsus.com
(920)261-1660

Table of Contents

Case Narrative

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Job ID: 500-229308-1

Laboratory: Eurofins Chicago

Narrative

Job Narrative
500-229308-1

Comments
No additional comments.

Revision
The report being provided is a revision of the original report sent on 2/28/2023. The report (revision 1) is being revised due to: The report has been revised to include fluoride result for sample 707B per client request..

Receipt
The samples were received on 2/10/2023 9:40 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 was 1.4° C.

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

Detection Summary

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Client Sample ID: MW-701 — Lab Sample ID: 500-229308-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Fluoride	0.79		0.20	0.067	mg/L	1		9056A	Total/NA

Client Sample ID: Duplicate U1 — Lab Sample ID: 500-229308-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Fluoride	0.82		0.20	0.067	mg/L	1		9056A	Total/NA

Client Sample ID: MW-707B — Lab Sample ID: 500-229308-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Sulfate	4900		250	52	mg/L	250		9056A	Total/NA
Fluoride	1.0	H	1.0	0.19	mg/L	1		9056A	Total/NA

Client Sample ID: Duplicate U2 — Lab Sample ID: 500-229308-4

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Sulfate	5100		250	52	mg/L	250		9056A	Total/NA
Fluoride	0.90	J H	1.0	0.19	mg/L	1		9056A	Total/NA

This Detection Summary does not include radiochemical test results.

Method Summary

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Method	Method Description	Protocol	Laboratory
9056A	Anions, Ion Chromatography	SW846	EET CHI

Protocol References:

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

Laboratory References:

EET CHI = Eurofins Chicago, 2417 Bond Street, University Park, IL 60484, TEL (708)534-5200

Sample Summary

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
500-229308-1	MW-701	Water	02/08/23 10:50	02/10/23 09:40
500-229308-2	Duplicate U1	Water	02/08/23 11:00	02/10/23 09:40
500-229308-3	MW-707B	Water	02/08/23 12:10	02/10/23 09:40
500-229308-4	Duplicate U2	Water	02/08/23 12:20	02/10/23 09:40

Client Sample Results

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Client Sample ID: MW-701
Lab Sample ID: 500-229308-1
Date Collected: 02/08/23 10:50
Matrix: Water
Date Received: 02/10/23 09:40

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Fluoride (SW846 9056A)	0.79		0.20	0.067	mg/L			02/22/23 21:49	1

Client Sample Results

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Client Sample ID: Duplicate U1
Lab Sample ID: 500-229308-2
Date Collected: 02/08/23 11:00
Matrix: Water
Date Received: 02/10/23 09:40

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Fluoride (SW846 9056A)	0.82		0.20	0.067	mg/L			02/22/23 22:27	1

Client Sample Results

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Client Sample ID: MW-707B
Lab Sample ID: 500-229308-3
Date Collected: 02/08/23 12:10
Matrix: Water
Date Received: 02/10/23 09:40

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate (SW846 9056A)	**4900**		250	52	mg/L			02/24/23 02:39	250
Fluoride (SW846 9056A)	<48		250	48	mg/L			02/23/23 00:21	250
Fluoride (SW846 9056A)	**1.0**	**H**	1.0	0.19	mg/L			03/14/23 17:29	1

Client Sample Results

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Client Sample ID: Duplicate U2
Lab Sample ID: 500-229308-4
Date Collected: 02/08/23 12:20
Matrix: Water
Date Received: 02/10/23 09:40

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate (SW846 9056A)	**5100**		250	52	mg/L			02/24/23 03:55	250
Fluoride (SW846 9056A)	<48		250	48	mg/L			02/23/23 00:59	250
Fluoride (SW846 9056A)	**0.90**	**J H**	1.0	0.19	mg/L			03/14/23 18:15	1

Definitions/Glossary

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Qualifiers

General Chemistry

Qualifier	Qualifier Description
E	Result exceeded calibration range.
H	Sample was prepped or analyzed beyond the specified holding time
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

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

QC Association Summary

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

General Chemistry

Analysis Batch: 699877

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-229308-1	MW-701	Total/NA	Water	9056A	
500-229308-2	Duplicate U1	Total/NA	Water	9056A	
500-229308-3	MW-707B	Total/NA	Water	9056A	
500-229308-4	Duplicate U2	Total/NA	Water	9056A	
MB 500-699877/41	Method Blank	Total/NA	Water	9056A	
LCS 500-699877/42	Lab Control Sample	Total/NA	Water	9056A	
500-229308-1 MS	MW-701	Total/NA	Water	9056A	
500-229308-1 MSD	MW-701	Total/NA	Water	9056A	
500-229308-3 MS	MW-707B	Total/NA	Water	9056A	
500-229308-3 MSD	MW-707B	Total/NA	Water	9056A	

Analysis Batch: 700075

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-229308-3	MW-707B	Total/NA	Water	9056A	
500-229308-4	Duplicate U2	Total/NA	Water	9056A	
MB 500-700075/45	Method Blank	Total/NA	Water	9056A	
LCS 500-700075/46	Lab Control Sample	Total/NA	Water	9056A	
500-229308-3 MS	MW-707B	Total/NA	Water	9056A	
500-229308-3 MSD	MW-707B	Total/NA	Water	9056A	

Analysis Batch: 702569

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-229308-3	MW-707B	Total/NA	Water	9056A	
500-229308-4	Duplicate U2	Total/NA	Water	9056A	
MB 500-702569/3	Method Blank	Total/NA	Water	9056A	
LCS 500-702569/4	Lab Control Sample	Total/NA	Water	9056A	
500-229308-3 MS	MW-707B	Total/NA	Water	9056A	
500-229308-3 MSD	MW-707B	Total/NA	Water	9056A	

Method: 9056A - Anions, Ion Chromatography

Lab Sample ID: MB 500-699877/41
Matrix: Water
Analysis Batch: 699877
Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Fluoride	<0.19		1.0	0.19	mg/L			02/22/23 17:36	1

Lab Sample ID: LCS 500-699877/42
Matrix: Water
Analysis Batch: 699877
Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Fluoride	1.00	1.05		mg/L		105	80 - 120

Lab Sample ID: 500-229308-1 MS
Matrix: Water
Analysis Batch: 699877
Client Sample ID: MW-701
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Fluoride	0.79		0.600	1.34		mg/L		92	80 - 120

Lab Sample ID: 500-229308-1 MSD
Matrix: Water
Analysis Batch: 699877
Client Sample ID: MW-701
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Fluoride	0.79		0.600	1.34		mg/L		91	80 - 120	0	15

Lab Sample ID: MB 500-700075/45
Matrix: Water
Analysis Batch: 700075
Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	<0.21		1.0	0.21	mg/L			02/24/23 02:09	1
Fluoride	<0.19		1.0	0.19	mg/L			02/24/23 02:09	1

Lab Sample ID: LCS 500-700075/46
Matrix: Water
Analysis Batch: 700075
Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Sulfate	20.0	18.8		mg/L		94	80 - 120
Fluoride	20.0	19.8		mg/L		99	80 - 120

Lab Sample ID: 500-229308-3 MS
Matrix: Water
Analysis Batch: 700075
Client Sample ID: MW-707B
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Sulfate	4900		2500	7810		mg/L		116	80 - 120

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

Lab Sample ID: 500-229308-3 MSD
Matrix: Water
Analysis Batch: 700075

Client Sample ID: MW-707B
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Sulfate	4900		2500	7780		mg/L		115	80 - 120	0	15

Lab Sample ID: MB 500-702569/3
Matrix: Water
Analysis Batch: 702569

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

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	<0.21		1.0	0.21	mg/L			03/14/23 13:02	1
Fluoride	<0.19		1.0	0.19	mg/L			03/14/23 13:02	1

Lab Sample ID: LCS 500-702569/4
Matrix: Water
Analysis Batch: 702569

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

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Sulfate	20.0	19.4	E	mg/L		97	80 - 120
Fluoride	20.0	20.2	E	mg/L		101	80 - 120

Lab Sample ID: 500-229308-3 MS
Matrix: Water
Analysis Batch: 702569

Client Sample ID: MW-707B
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Fluoride	1.0	H	10.0	10.5	H E	mg/L		95	80 - 120

Lab Sample ID: 500-229308-3 MSD
Matrix: Water
Analysis Batch: 702569

Client Sample ID: MW-707B
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Fluoride	1.0	H	10.0	10.6	H E	mg/L		96	80 - 120	1	15

Lab Chronicle

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Client Sample ID: MW-701
Lab Sample ID: 500-229308-1
Date Collected: 02/08/23 10:50
Matrix: Water
Date Received: 02/10/23 09:40

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		1	699877	MM	EET CHI	02/22/23 21:49

Client Sample ID: Duplicate U1
Lab Sample ID: 500-229308-2
Date Collected: 02/08/23 11:00
Matrix: Water
Date Received: 02/10/23 09:40

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		1	699877	MM	EET CHI	02/22/23 22:27

Client Sample ID: MW-707B
Lab Sample ID: 500-229308-3
Date Collected: 02/08/23 12:10
Matrix: Water
Date Received: 02/10/23 09:40

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		250	700075	MM	EET CHI	02/24/23 02:39
Total/NA	Analysis	9056A		250	699877	MM	EET CHI	02/23/23 00:21
Total/NA	Analysis	9056A		1	702569	MM	EET CHI	03/14/23 17:29

Client Sample ID: Duplicate U2
Lab Sample ID: 500-229308-4
Date Collected: 02/08/23 12:20
Matrix: Water
Date Received: 02/10/23 09:40

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Analysis	9056A		250	700075	MM	EET CHI	02/24/23 03:55
Total/NA	Analysis	9056A		250	699877	MM	EET CHI	02/23/23 00:59
Total/NA	Analysis	9056A		1	702569	MM	EET CHI	03/14/23 18:15

Laboratory References:

EET CHI = Eurofins Chicago, 2417 Bond Street, University Park, IL 60484, TEL (708)534-5200

Accreditation/Certification Summary

Client: SCS Engineers
Job ID: 500-229308-1
Project/Site: Evergy La Cygne Gen Station 27217233.22

Laboratory: Eurofins Chicago

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

Authority	Program	Identification Number	Expiration Date
Kansas	NELAP	E-10161	10-31-23

Eurofins Chicago
2417 Bond Street
University Park IL 60484
Phone (708) 534-5200 Phone (708) 534-5211

Chain of Custody Record

eurofins

Client Information	Sampler: Jason R Franks	Lab PM: Fredrick Sandie	Carrier Tracking No(s): FedEx 628393156570	COC No: 500-110269-45955 1
Client Contact: Jason Franks	Phone: 913-302-3238	E-Mail: Sandra Fredrick@et eurofinsus.com	State of Origin: Kansas	Page: Page 1 of 1
Company: SCS Engineers	PWSID:			Job #: 500-229308
Address: 8575 W 110th St Suite 100	Due Date Requested:			
City: Overland Park	TAT Requested (days): STD			
State, Zip: KS, 66210	Compliance Project: Δ Yes Δ No			
Phone: 913-302-3238	PO #: 27217233 22 - I			
Email: jfranks@scsengineers.com	WO #:			
Project Name: Evergy La Cygne Gen Station GW	Project #: 50021131			
Site: Evergy La Cygne Gen Station	SSOW#:			

500-229308 COC

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_28D - Fluoride	9056A_28D - Sulfate	Total Number of containers	Special Instructions/Note:
				Preservation Code:				N	N		
1	MW-701	2/8/23	10 50	G	Water	N	N	X			
2	Duplicate U1	2/8/23	11 00	G	Water	N	N	X			
1	MW-701 MS/MSD	2/8/23	10 55	G	Water	N	Y	X			
3	MW-707B	2/8/23	12 10	G	Water	N	N		X		
4	Duplicate U2	2/8/23	12 20	G	Water	N	N		X		
3	MW-707B MS/MSD	2/8/23	12 15	G	Water	N	Y		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
Jason R Franks	02/09/23 / 16.00	SCS	[signature]	2/10/23 0940	[illegible]
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 Pace	Cooler Temperature(s) °C and Other Remarks. 2.4 → 1.4

Eurofins Chicago
2417 Bond Street
University Park IL 60484
Phone (708) 534-5200 Phone (708) 534-5211

Chain of Custody Record

eurofins

Client Information	Sampler: Jason R Franks	Lab PM: Fredrick Sandie	Carrier Tracking No(s): FedEx 628393156570	COC No: 500-110269-45955 1
Client Contact: Jason Franks	Phone: 913-302-3238	E-Mail: Sandra Fredrick@et eurofinsus.com	State of Origin: Kansas	Page: Page 1 of 1
Company: SCS Engineers	PWSID:			Job #: 500-229308
Address: 8575 W 110th St Suite 100	Due Date Requested:			
City: Overland Park	TAT Requested (days): STD			
State, Zip: KS, 66210	Compliance Project: Δ Yes Δ No			
Phone: 913-302-3238	PO #: 27217233 22 - I			
Email: jfranks@scsengineers.com	WO #:			
Project Name: Evergy La Cygne Gen Station GW	Project #: 50021131			
Site: Evergy La Cygne Gen Station	SSOW#:			

500-229308 COC

Analysis Requested

Preservation Codes

A	HCL	M	Hexane
B	NaOH	N	None
C	Zn Acetate	O	AsNaO2
D	Nitric Acid	P	Na2O4S
E	NaHSO4	Q	Na2SO3
F	MeOH	R	Na2S2O3
G	Amchlor	S	H2SO4
H	Ascorbic Acid	T	TSP Dodecahydrate
I	Ice	U	Acetone
J	DI Water	V	MCAA
K	EDTA	W	pH 4-5
L	EDA	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_28D - Fluoride	9056A_28D - Sulfate	Total Number of containers	Special Instructions/Note:
				Preservation Code:				N	N		
1	MW-701	2/8/23	10 50	G	Water	N	N	X			
2	Duplicate U1	2/8/23	11 00	G	Water	N	N	X			
1	MW-701 MS/MSD	2/8/23	10 55	G	Water	N	Y	X			
3	MW-707B	2/8/23	12 10	G	Water	N	N		X		
4	Duplicate U2	2/8/23	12 20	G	Water	N	N		X		
3	MW-707B MS/MSD	2/8/23	12 15	G	Water	N	Y		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
Jason R Franks	02/09/23 / 16.00	SCS	Phi Scott	2/10/23 0940	EET
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 Pace	Cooler Temperature(s) °C and Other Remarks. 2.4→1.4


500-229308 Waybi
FedEx
TRK# 0221 6283 9315 6570
FRI – 10 FEB 10:30A
PRIORITY OVERNIGHT
NX JOTA
60484
IL-US ORD
#151740 02/09 5B1J1/BB02/FE2D


500-229308 Waybi
FedEx
TRK# 0221 6283 9315 6570
FRI – 10 FEB 10:30A
PRIORITY OVERNIGHT
NX JOTA
60484
IL-US ORD
#151740 02/09 5B1J1/BB02/FE2D

Login Sample Receipt Checklist

Client: SCS Engineers

Job Number: 500-229308-1

Login Number: 229308
List Number: 1
Creator: Scott, Sherri L

List Source: Eurofins Chicago

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	True	
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	1.4
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").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	

ANALYTICAL REPORT

February 13, 2023

SCS Engineers - KS

Sample Delivery Group:	L1584383
Samples Received:	02/10/2023
Project Number:	27217233.22 - I
Description:	Evergy La Cygne Gen Station GW 2022-23

Report To:

Jason Franks
8575 West 110th Street
Suite 100
Overland Park, KS 66210

Entire Report Reviewed By:

Jeff Carr
Project Manager

TABLE OF CONTENTS

MW-701 L1584383-01 GW

Collected by: Jason R. Franks | Collected date/time: 02/08/23 10:50 | Received date/time: 02/10/23 08:50

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG2004252	1	02/11/23 20:02	02/11/23 20:02	GEB	Mt. Juliet, TN

DUPLICATE U1 L1584383-02 GW

Collected by: Jason R. Franks | Collected date/time: 02/08/23 11:00 | Received date/time: 02/10/23 08:50

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG2004119	1	02/10/23 23:33	02/10/23 23:33	GEB	Mt. Juliet, TN

MW-707B L1584383-03 GW

Collected by: Jason R. Franks | Collected date/time: 02/08/23 12:10 | Received date/time: 02/10/23 08:50

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG2004252	10	02/11/23 20:53	02/11/23 20:53	GEB	Mt. Juliet, TN

DUPLICATE U2 L1584383-04 GW

Collected by: Jason R. Franks | Collected date/time: 02/08/23 12:20 | Received date/time: 02/10/23 08:50

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG2004119	10	02/10/23 23:45	02/10/23 23:45	GEB	Mt. Juliet, TN

CASE NARRATIVE

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

Jeff Carr
Project Manager

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Sulfate	83900		594	5000	1	02/11/2023 20:02	WG2004252

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Sulfate	85100		594	5000	1	02/10/2023 23:33	WG2004119

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Fluoride	U		640	1500	10	02/11/2023 20:53	WG2004252

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Fluoride	U		640	1500	10	02/10/2023 23:45	WG2004119

Method Blank (MB)

(MB) R3889917-1 02/10/23 19:49

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1584382-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1584382-03 02/10/23 20:13 • (DUP) R3889917-3 02/10/23 20:26

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	643	645	1	0.295		15
Sulfate	34400	34400	1	0.0686		15

L1584395-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1584395-03 02/11/23 11:33 • (DUP) R3889917-6 02/11/23 12:11

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	73.1	78.0	1	6.49	J	15
Sulfate	8650	8660	1	0.162		15

Laboratory Control Sample (LCS)

(LCS) R3889917-2 02/10/23 20:01

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Fluoride	8000	8170	102	80.0-120	
Sulfate	40000	40200	100	80.0-120	

L1584382-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1584382-03 02/10/23 20:13 • (MS) R3889917-4 02/10/23 20:38 • (MSD) R3889917-5 02/10/23 20:51

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	5000	643	5690	5680	101	101	1	80.0-120			0.188	15
Sulfate	50000	34400	82700	82600	96.7	96.5	1	80.0-120			0.0928	15

L1584395-03 Original Sample (OS) • Matrix Spike (MS)

(OS) L1584395-03 02/11/23 11:33 • (MS) R3889917-7 02/11/23 12:23

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Fluoride	5000	73.1	5140	101	1	80.0-120	
Sulfate	50000	8650	58600	100	1	80.0-120	

Method Blank (MB)

(MB) R3889844-1 02/11/23 18:55

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1584383-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1584383-01 02/11/23 20:02 • (DUP) R3889844-3 02/11/23 20:14

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	667	674	1	1.07		15
Sulfate	83900	83700	1	0.320		15

L1584396-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1584396-01 02/11/23 23:01 • (DUP) R3889844-8 02/11/23 23:14

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	199	225	1	12.2		15
Sulfate	14300	14600	1	2.33		15

Laboratory Control Sample (LCS)

(LCS) R3889844-2 02/11/23 19:08

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Fluoride	8000	8130	102	80.0-120	
Sulfate	40000	39800	99.6	80.0-120	

L1584383-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1584383-01 02/11/23 20:02 • (MS) R3889844-4 02/11/23 20:27 • (MSD) R3889844-5 02/11/23 20:40

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	5000	667	5870	5910	104	105	1	80.0-120			0.813	15
Sulfate	50000	83900	127000	129000	86.9	89.7	1	80.0-120			1.07	15

L1584383-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1584383-03 02/11/23 20:53 • (MS) R3889844-6 02/11/23 21:06 • (MSD) R3889844-7 02/11/23 21:18

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	5000	U	5160	4990	103	99.9	10	80.0-120			3.20	15
Sulfate	50000	5070000	4870000	4870000	0.000	0.000	10	80.0-120	E V	E V	0.161	15

GLOSSARY OF TERMS

Guide to Reading and Understanding Your Laboratory Report

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

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

Abbreviations and Definitions

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

Qualifier	Description
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace Analytical National 12065 Lebanon Rd Mount Juliet, TN 37122

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN000032021-1
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	TN00003
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO000356
Kentucky [1 6]	KY90010	South Carolina	84004002
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana	LA018	Texas	T104704245-20-18
Maine	TN00003	Texas [5]	LAB0152
Maryland	324	Utah	TN000032021-11
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	110033
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	998093910
Montana	CERT0086	Wyoming	A2LA
A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

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

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

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

Company Name/Address:
SCS Engineers - KS
8575 West 110th Street
Suite 100
Overland Park. KS 66210

Billing Information:
Accounts Payable
8575 W. 110th Street
Suite 100
Overland Park, KS 66210

Pres Chk

Report to:
Jason Franks

Email To:
jfranks@scsengineers.com;jay.martin@evergy.c

Project Description:
Evergy La Cygne Gen Station GW 2022-23

City/State Collected: **LaCygne, KS**

Please Circle: PT MT CT ET

Phone: **913-681-0030**

Client Project #
27217233.22 - I

Lab Project #
AQUAOPKS-LACYGNE

Collected by (print):
JASON R FRANKS

Site/Facility ID #

P.O. #

Collected by (signature):
Immediately
Packed on Ice N ___ Y ✓

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day
Date Results Needed

Quote #

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Fluoride 125mlHDPE-NoPres	Sulfate 125mlHDPE-NoPres	Remarks	Sample # (lab only)
MW-701	GRAB	GW	–	2/8/23	1050	1		X		-01
MW-701 MS/MSD		GW	–		1055	1		X		-01
DUPLICATE U1		GW	–		1100	1		X		-02
MW-707B		GW	–		1210	1	X			-03
MW-707B MS/MSD		GW	–		1215	1	X			-03
DUPLICATE U2		GW	–		1210	1	X			-04

Analysis / Container / Preservative

Chain of Custody Page 1 of 1

Pace
PEOPLE ADVANCING SCIENCE

MT JULIET, TN
12065 Lebanon Rd Mount Juliet, TN 37122
Submitting a sample via this chain of custody constitutes acknowledgment and acceptance of the Pace Terms and Conditions found at: https://info.pacelabs.com/hubfs/pas-standard-terms.pdf

SDG # L1584383

F060

Acctnum: **AQUAOPKS**
Template: **T136276**
Prelogin: **P978651**
PM: **206 - Jeff Carr**
PB:
Shipped Via:

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other ___

Remarks:

pH ___ Temp ___
Flow ___ Other ___

Samples returned via:
__ UPS __ FedEx ✓ Courier ___

Tracking # 609454558221

Sample Receipt Checklist
COC Seal Present/Intact: NP Y N
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: Y N
Preservation Correct/Checked: Y N
RAD Screen <0.5 mR/hr: Y N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR
Jason R Franks	2/9/23	1600		
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: NSAG °C Bottles Received: 1.1 +0 = 1.1 6
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 2-10-23 Time: 0850

If preservation required by Login: Date/Time

Hold: Condition: NCF / OK

ANALYTICAL REPORT

June 09, 2023

SCS Engineers - KS

Sample Delivery Group:	L1618334
Samples Received:	05/19/2023
Project Number:	27217233.23-A
Description:	Evergy La Cygne Gen Station GW 2023-24

Report To:

Jason Franks
8575 West 110th Street
Suite 100
Overland Park, KS 66210

Entire Report Reviewed By:

Jeff Carr
Project Manager

TABLE OF CONTENTS

MW-6 L1618334-01 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 10:30 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065125	1	05/23/23 23:12	05/24/23 00:52	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067116	1	05/27/23 00:39	05/27/23 00:39	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 11:48	CCE	Mt. Juliet, TN

MW-7 L1618334-02 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 11:03 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065125	1	05/23/23 23:12	05/24/23 00:52	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067116	1	05/27/23 01:32	05/27/23 01:32	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 11:51	CCE	Mt. Juliet, TN

MW-11 L1618334-03 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 13:35 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065125	1	05/23/23 23:12	05/24/23 00:52	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/26/23 23:10	05/26/23 23:10	LBR	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	5	05/26/23 23:22	05/26/23 23:22	LBR	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 11:54	CCE	Mt. Juliet, TN

MW-701 L1618334-04 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 10:05 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065125	1	05/23/23 23:12	05/24/23 00:52	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/27/23 00:01	05/27/23 00:01	LBR	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 11:56	CCE	Mt. Juliet, TN

MW-702 L1618334-05 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 10:35 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065125	1	05/23/23 23:12	05/24/23 00:52	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/26/23 19:19	05/26/23 19:19	LBR	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 11:15	CCE	Mt. Juliet, TN

MW-703 L1618334-06 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 11:15 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065125	1	05/23/23 23:12	05/24/23 00:52	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/27/23 00:27	05/27/23 00:27	LBR	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 11:59	CCE	Mt. Juliet, TN

MW-704 L1618334-07 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 11:45 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065126	1	05/23/23 23:45	05/24/23 01:39	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/27/23 00:39	05/27/23 00:39	LBR	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 12:02	CCE	Mt. Juliet, TN

MW-705 L1618334-08 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 11:43 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065126	1	05/23/23 23:45	05/24/23 01:39	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/27/23 01:05	05/27/23 01:05	LBR	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 12:05	CCE	Mt. Juliet, TN

MW-706 L1618334-09 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 12:40 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065126	1	05/23/23 23:45	05/24/23 01:39	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/27/23 01:44	05/27/23 01:44	LBR	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	5	05/27/23 01:56	05/27/23 01:56	LBR	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 12:08	CCE	Mt. Juliet, TN

MW-707B L1618334-10 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 14:25 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065126	1	05/23/23 23:45	05/24/23 01:39	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067121	1	05/27/23 02:35	05/27/23 02:35	LBR	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2073212	100	06/07/23 17:35	06/07/23 17:35	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 12:17	CCE	Mt. Juliet, TN

MW-708 L1618334-11 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 15:08 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065126	1	05/23/23 23:45	05/24/23 01:39	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067116	1	05/27/23 02:13	05/27/23 02:13	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 12:19	CCE	Mt. Juliet, TN

TW-1 L1618334-12 GW

Collected by: B. Coleman | Collected date/time: 05/17/23 13:45 | Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065126	1	05/23/23 23:45	05/24/23 01:39	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067370	1	06/08/23 04:46	06/08/23 04:46	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 12:22	CCE	Mt. Juliet, TN

DUPLICATE L1618334-13 GW

Collected by: B. Coleman
Collected date/time: 05/17/23 00:00
Received date/time: 05/19/23 09:05

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2065126	1	05/23/23 23:45	05/24/23 01:39	AS	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2067370	1	06/08/23 04:59	06/08/23 04:59	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2064213	1	05/25/23 12:24	05/26/23 12:25	CCE	Mt. Juliet, TN

CASE NARRATIVE

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

Jeff Carr
Project Manager

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	1030000		20000	1	05/24/2023 00:52	WG2065125

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	189000		379	1000	1	05/27/2023 00:39	WG2067116
Fluoride	606		64.0	150	1	05/27/2023 00:39	WG2067116
Sulfate	114000		594	5000	1	05/27/2023 00:39	WG2067116

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1130		20.0	200	1	05/26/2023 11:48	WG2064213
Calcium	69200		79.3	1000	1	05/26/2023 11:48	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	878000		20000	1	05/24/2023 00:52	WG2065125

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	96300		379	1000	1	05/27/2023 01:32	WG2067116
Fluoride	1280		64.0	150	1	05/27/2023 01:32	WG2067116
Sulfate	1860	J	594	5000	1	05/27/2023 01:32	WG2067116

Metals (ICP) by Method 6010D

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Boron	1550		20.0	200	1	05/26/2023 11:51	WG2064213
Calcium	22000		79.3	1000	1	05/26/2023 11:51	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	942000		20000	1	05/24/2023 00:52	WG2065125

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	64400		379	1000	1	05/26/2023 23:10	WG2067121
Fluoride	457		64.0	150	1	05/26/2023 23:10	WG2067121
Sulfate	226000		2970	25000	5	05/26/2023 23:22	WG2067121

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1130		20.0	200	1	05/26/2023 11:54	WG2064213
Calcium	55900		79.3	1000	1	05/26/2023 11:54	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	559000		10000	1	05/24/2023 00:52	WG2065125

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	45500		379	1000	1	05/27/2023 00:01	WG2067121
Fluoride	528		64.0	150	1	05/27/2023 00:01	WG2067121
Sulfate	92200		594	5000	1	05/27/2023 00:01	WG2067121

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	883		20.0	200	1	05/26/2023 11:56	WG2064213
Calcium	43500		79.3	1000	1	05/26/2023 11:56	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	643000		13300	1	05/24/2023 00:52	WG2065125

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	45700		379	1000	1	05/26/2023 19:19	WG2067121
Fluoride	1160		64.0	150	1	05/26/2023 19:19	WG2067121
Sulfate	U		594	5000	1	05/26/2023 19:19	WG2067121

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1820		20.0	200	1	05/26/2023 11:15	WG2064213
Calcium	18300	J6	79.3	1000	1	05/26/2023 11:15	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	876000		20000	1	05/24/2023 00:52	WG2065125

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	109000		379	1000	1	05/27/2023 00:27	WG2067121
Fluoride	1200		64.0	150	1	05/27/2023 00:27	WG2067121
Sulfate	U		594	5000	1	05/27/2023 00:27	WG2067121

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1810		20.0	200	1	05/26/2023 11:59	WG2064213
Calcium	17900		79.3	1000	1	05/26/2023 11:59	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	1240000		20000	1	05/24/2023 01:39	WG2065126

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	90300		379	1000	1	05/27/2023 00:39	WG2067121
Fluoride	723		64.0	150	1	05/27/2023 00:39	WG2067121
Sulfate	167000		594	5000	1	05/27/2023 00:39	WG2067121

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1970		20.0	200	1	05/26/2023 12:02	WG2064213
Calcium	21500		79.3	1000	1	05/26/2023 12:02	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	1010000		20000	1	05/24/2023 01:39	WG2065126

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	133000		379	1000	1	05/27/2023 01:05	WG2067121
Fluoride	799		64.0	150	1	05/27/2023 01:05	WG2067121
Sulfate	40700		594	5000	1	05/27/2023 01:05	WG2067121

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	2140		20.0	200	1	05/26/2023 12:05	WG2064213
Calcium	27700		79.3	1000	1	05/26/2023 12:05	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	1100000		25000	1	05/24/2023 01:39	WG2065126

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	218000		1900	5000	5	05/27/2023 01:56	WG2067121
Fluoride	858		64.0	150	1	05/27/2023 01:44	WG2067121
Sulfate	20700		594	5000	1	05/27/2023 01:44	WG2067121

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1980		20.0	200	1	05/26/2023 12:08	WG2064213
Calcium	23600		79.3	1000	1	05/26/2023 12:08	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	9880000		100000	1	05/24/2023 01:39	WG2065126

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	172000		379	1000	1	05/27/2023 02:35	WG2067121
Fluoride	372		64.0	150	1	05/27/2023 02:35	WG2067121
Sulfate	4840000		59400	500000	100	06/07/2023 17:35	WG2073212

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1870		20.0	200	1	05/26/2023 12:17	WG2064213
Calcium	391000		79.3	1000	1	05/26/2023 12:17	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	652000		13300	1	05/24/2023 01:39	WG2065126

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	46500		379	1000	1	05/27/2023 02:13	WG2067116
Fluoride	631		64.0	150	1	05/27/2023 02:13	WG2067116
Sulfate	9310		594	5000	1	05/27/2023 02:13	WG2067116

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1360		20.0	200	1	05/26/2023 12:19	WG2064213
Calcium	29100		79.3	1000	1	05/26/2023 12:19	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	974000		20000	1	05/24/2023 01:39	WG2065126

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	39000		379	1000	1	06/08/2023 04:46	WG2067370
Fluoride	389		64.0	150	1	06/08/2023 04:46	WG2067370
Sulfate	66500		594	5000	1	06/08/2023 04:46	WG2067370

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1410		20.0	200	1	05/26/2023 12:22	WG2064213
Calcium	23900		79.3	1000	1	05/26/2023 12:22	WG2064213

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	648000		13300	1	05/24/2023 01:39	WG2065126

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	45200		379	1000	1	06/08/2023 04:59	WG2067370
Fluoride	1290		64.0	150	1	06/08/2023 04:59	WG2067370
Sulfate	1050	J	594	5000	1	06/08/2023 04:59	WG2067370

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1800		20.0	200	1	05/26/2023 12:25	WG2064213
Calcium	16400		79.3	1000	1	05/26/2023 12:25	WG2064213

Method Blank (MB)

(MB) R3929555-1 05/24/23 00:52

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Dissolved Solids	U	J	10000	10000

L1618334-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1618334-05 05/24/23 00:52 • (DUP) R3929555-3 05/24/23 00:52

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	643000	656000	1	2.05		5

L1618334-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1618334-06 05/24/23 00:52 • (DUP) R3929555-4 05/24/23 00:52

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	876000	840000	1	4.20		5

Laboratory Control Sample (LCS)

(LCS) R3929555-2 05/24/23 00:52

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Dissolved Solids	8800000	8410000	95.6	77.3-123	

Method Blank (MB)

(MB) R3929591-1 05/24/23 01:39

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Dissolved Solids	U		10000	10000

L1618334-12 Original Sample (OS) • Duplicate (DUP)

(OS) L1618334-12 05/24/23 01:39 • (DUP) R3929591-3 05/24/23 01:39

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Dissolved Solids	974000	1000000	1	3.03		5

L1618334-13 Original Sample (OS) • Duplicate (DUP)

(OS) L1618334-13 05/24/23 01:39 • (DUP) R3929591-4 05/24/23 01:39

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Dissolved Solids	648000	652000	1	0.615		5

Laboratory Control Sample (LCS)

(LCS) R3929591-2 05/24/23 01:39

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	ug/l	ug/l	%	%	
Dissolved Solids	8800000	8500000	96.6	77.3-123	

Method Blank (MB)

(MB) R3929819-1 05/26/23 10:03

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Chloride	U		379	1000
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1618138-09 Original Sample (OS) • Duplicate (DUP)

(OS) L1618138-09 05/26/23 17:43 • (DUP) R3929819-8 05/26/23 17:57

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	1210	1230	1	1.49		15
Fluoride	220	212	1	3.80		15
Sulfate	36300	36400	1	0.356		15

L1618334-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1618334-02 05/27/23 01:32 • (DUP) R3929819-11 05/27/23 01:46

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	96300	94300	1	2.08		15
Fluoride	1280	1260	1	1.16		15
Sulfate	1860	1820	1	2.03	J	15

Laboratory Control Sample (LCS)

(LCS) R3929819-2 05/26/23 10:17

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	ug/l	ug/l	%	%	
Chloride	40000	39500	98.8	80.0-120	
Fluoride	8000	8200	102	80.0-120	
Sulfate	40000	40700	102	80.0-120	

L1618138-09 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1618138-09 05/26/23 17:43 • (MS) R3929819-9 05/26/23 18:10 • (MSD) R3929819-10 05/26/23 18:23

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	1210	51300	51300	100	100	1	80.0-120			0.0263	15
Fluoride	5000	220	5250	5240	101	100	1	80.0-120			0.175	15
Sulfate	50000	36300	87100	86800	102	101	1	80.0-120			0.266	15

L1618334-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1618334-02 05/27/23 01:32 • (MS) R3929819-12 05/27/23 01:59

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	96300	142000	92.3	1	80.0-120	
Fluoride	5000	1280	6470	104	1	80.0-120	
Sulfate	50000	1860	53000	102	1	80.0-120	

Method Blank (MB)

(MB) R3933340-1 05/26/23 18:54

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	485	J	379	1000
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1618334-05 Original Sample (OS) • Duplicate (DUP)

(OS) L1618334-05 05/26/23 19:19 • (DUP) R3933340-3 05/26/23 19:32

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	45700	45800	1	0.130		15
Fluoride	1160	1310	1	12.3		15
Sulfate	U	U	1	0.000		15

L1618334-08 Original Sample (OS) • Duplicate (DUP)

(OS) L1618334-08 05/27/23 01:05 • (DUP) R3933340-6 05/27/23 01:18

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	133000	134000	1	0.600		15
Fluoride	799	808	1	1.06		15
Sulfate	40700	40800	1	0.405		15

Laboratory Control Sample (LCS)

(LCS) R3933340-2 05/26/23 19:06

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	37700	94.3	80.0-120	
Fluoride	8000	7320	91.5	80.0-120	
Sulfate	40000	39800	99.5	80.0-120	

L1618334-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1618334-05 05/26/23 19:19 • (MS) R3933340-4 05/26/23 19:45 • (MSD) R3933340-5 05/26/23 19:57

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	50000	45700	93100	92800	94.7	94.2	1	80.0-120			0.257	15
Fluoride	5000	1160	6170	5800	100	92.9	1	80.0-120			6.07	15
Sulfate	50000	U	50200	50100	100	100	1	80.0-120			0.183	15

L1618334-08 Original Sample (OS) • Matrix Spike (MS)

(OS) L1618334-08 05/27/23 01:05 • (MS) R3933340-7 05/27/23 01:31

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	133000	176000	86.5	1	80.0-120	
Fluoride	5000	799	5390	91.8	1	80.0-120	
Sulfate	50000	40700	90800	100	1	80.0-120	

Method Blank (MB)

(MB) R3933842-1 05/27/23 11:50

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Chloride	U		379	1000
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1616015-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1616015-01 05/27/23 12:17 • (DUP) R3933842-3 05/27/23 12:30

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	21100	20600	1	2.43		15
Fluoride	454	398	1	13.1		15
Sulfate	29300	28300	1	3.38		15

L1618341-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1618341-02 06/08/23 06:06 • (DUP) R3934566-1 06/08/23 06:20

Analyte	Original Result	DUP Result	Dilution	DUP RPD	DUP Qualifier	DUP RPD Limits
	ug/l	ug/l		%		%
Chloride	3330	3290	1	1.32		15

Laboratory Control Sample (LCS)

(LCS) R3933842-2 05/27/23 12:03

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	ug/l	ug/l	%	%	
Chloride	40000	40000	100	80.0-120	
Fluoride	8000	8370	105	80.0-120	
Sulfate	40000	41000	103	80.0-120	

L1616015-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1616015-01 05/27/23 12:17 • (MS) R3933842-4 05/27/23 12:44 • (MSD) R3933842-5 05/27/23 12:57

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Chloride	50000	21100	68500	67700	94.9	93.1	1	80.0-120			1.30	15
Fluoride	5000	454	5390	5330	98.7	97.4	1	80.0-120			1.18	15
Sulfate	50000	29300	78300	77200	98.0	95.7	1	80.0-120			1.48	15

L1618341-02 Original Sample (OS) • Matrix Spike (MS)

(OS) L1618341-02 06/08/23 06:06 • (MS) R3934566-2 06/08/23 07:00

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	50000	3330	52700	98.8	1	80.0-120	

Method Blank (MB)

(MB) R3934559-1 06/07/23 11:17

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Sulfate	U		594	5000

L1618676-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1618676-06 06/07/23 16:27 • (DUP) R3934559-4 06/07/23 16:54

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Sulfate	291000	287000	5	1.11		15

L1618658-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1618658-06 06/08/23 03:12 • (DUP) R3934559-7 06/08/23 03:25

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Sulfate	19400	19600	1	1.16		15

Laboratory Control Sample (LCS)

(LCS) R3934559-2 06/07/23 11:30

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Sulfate	40000	37700	94.3	80.0-120	

L1618676-06 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1618676-06 06/07/23 16:14 • (MS) R3934559-5 06/07/23 17:08 • (MSD) R3934559-6 06/07/23 17:21

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Sulfate	50000	287000	317000	319000	61.2	65.2	1	80.0-120	E V	E V	0.618	15

L1618658-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L1618658-06 06/08/23 03:12 • (MS) R3934559-8 06/08/23 03:39

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Sulfate	50000	19400	65400	92.1	1	80.0-120	

Method Blank (MB)

(MB) R3929840-1 05/26/23 11:09

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Boron	U		20.0	200
Calcium	139	J	79.3	1000

Laboratory Control Sample (LCS)

(LCS) R3929840-2 05/26/23 11:12

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Boron	1000	998	99.8	80.0-120	
Calcium	10000	10300	103	80.0-120	

L1618334-05 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1618334-05 05/26/23 11:15 • (MS) R3929840-4 05/26/23 11:20 • (MSD) R3929840-5 05/26/23 11:23

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Boron	1000	1820	2760	2770	94.2	95.2	1	75.0-125			0.381	20
Calcium	10000	18300	24700	24800	63.9	65.0	1	75.0-125	J6	J6	0.470	20

GLOSSARY OF TERMS

Guide to Reading and Understanding Your Laboratory Report

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

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

Abbreviations and Definitions

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

Qualifier	Description
E	The analyte concentration exceeds the upper limit of the calibration range of the instrument established by the initial calibration (ICAL).
J	The identification of the analyte is acceptable; the reported value is an estimate.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace Analytical National 12065 Lebanon Rd Mount Juliet, TN 37122

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN000032021-1
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	TN00003
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO000356
Kentucky [1 6]	KY90010	South Carolina	84004002
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana	LA018	Texas	T104704245-20-18
Maine	TN00003	Texas [5]	LAB0152
Maryland	324	Utah	TN000032021-11
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	110033
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	998093910
Montana	CERT0086	Wyoming	A2LA
A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

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

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

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

Company Name/Address:
SCS Engineers - KS
8575 West 110th Street
Suite 100
Overland Park. KS 66210

Billing Information:
Accounts Payable
8575 W. 110th Street
Suite 100
Overland Park, KS 66210

Pres Chk

Report to: **Jason Franks**

Email To: **jfranks@scsengineers.com;jrockhold@scsengine**

Project Description: **Evergy La Cygne Gen Station GW 2023-24**

City/State Collected: La Cygne, KS

Please Circle: PT MT CT ET

Phone: **913-681-0030**

Client Project # **27217233.23-A**

Lab Project # **AQUAOPKS-LACYGNE**

Collected by (print): D. Colwell

Site/Facility ID #

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed: STD

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Anions (Cld, F, SO4) 125mlHDPE-NoPres	B, Ca - 6010 250mlHDPE-HNO3	TDS 250mlHDPE-NoPres							Remarks	Sample # (lab only)
MW-6	G	GW	-	5/17/23	1030	3	X	X	X								- 01
MW-7		GW			1103	3	X	X	X								- 02
MW-11		GW			1335	3	X	X	X								- 03
MW-701		GW			1005	3	X	X	X								- 04
MW-702		GW			1035	3	X	X	X								- 05
MW-703		GW			1115	3	X	X	X								- 06
MW-704		GW			1145	3	X	X	X								- 07
MW-705		GW			1143	3	X	X	X								- 08
MW-706		GW			1240	3	X	X	X								- 09
MW-707B		GW			1425	3	X	X	X								- 10

Analysis / Container / Preservative

Chain of Custody Page 1 of 2

Pace
PEOPLE ADVANCING SCIENCE

MT JULIET, TN
12065 Lebanon Rd Mount Juliet, TN 37122
Submitting a sample via this chain of custody constitutes acknowledgment and acceptance of the Pace Terms and Conditions found at: https://info.pacelabs.com/hubfs/pas-standard-terms.pdf

L161834

D194

Acctnum: **AQUAOPKS**
Template: **T150678**
Prelogin: **P999276**
PM: **206 - Jeff Carr**
PB:

Shipped Via: **FedEX Ground**

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier _____

Tracking # 5163 7715 1727

Sample Receipt Checklist
COC Seal Present/Intact: NP Y N
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: Y N
Preservation Correct/Checked: Y N
RAD Screen <0.5 mR/hr: Y N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	If preservation required by Login: Date/Time
	5/17/23	1800			
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: NS #7 °C 1.9+0=1.9 Bottles Received: 39	
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 5-14-23 Time: 905	Hold: Condition: NCF / OK

Page 1 of 2

Company Name/Address:
SCS Engineers - KS
8575 West 110th Street
Suite 100
Overland Park. KS 66210

Billing Information:
Accounts Payable
8575 W. 110th Street
Suite 100
Overland Park, KS 66210

Pres Chk

Report to: **Jason Franks**

Email To: **jfranks@scsengineers.com;jrockhold@scsengine**

Project Description: **Evergy La Cygne Gen Station GW 2023-24**

City/State Collected: La Cygne, KS

Please Circle: PT MT CT ET

Phone: **913-681-0030**

Client Project # **27217233.23-A**

Lab Project # **AQUAOPKS-LACYGNE**

Collected by (print): B. Coleman

Site/Facility ID #

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed: SSD

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Anions (Cld, F, SO4) 125mlHDPE-NoPres	B, Ca - 6010 250mlHDPE-HNO3	TDS 250mlHDPE-NoPres							Remarks	Sample # (lab only)
MW-708	G	GW	-	5/17/23	1508	3	X	X	X								-11
TW-1	↓	GW	↓	↓	1345	3	X	X	X								-12
DUPLICATE		GW			-	3	X	X	X								-13
702 MS/MSD	↓	GW	↓	↓	-	2	X	X									-05

Analysis / Container / Preservative — 22

Chain of Custody Page 1 of 2

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MT JULIET, TN

12065 Lebanon Rd Mount Juliet, TN 37122
Submitting a sample via this chain of custody constitutes acknowledgment and acceptance of the Pace Terms and Conditions found at: https://info.pacelabs.com/hubfs/pas-standard-terms.pdf

SDG # L1618334

Table #

Acctnum: **AQUAOPKS**
Template: **T150678**
Prelogin: **P999276**
PM: **206 - Jeff Carr**
PB:

Shipped Via: **FedEX Ground**

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via: __ UPS __ FedEx __ Courier _____

Tracking # 5163 7715 1727

Sample Receipt Checklist

COC Seal Present/Intact:	NP	Y N
COC Signed/Accurate:		Y N
Bottles arrive intact:		Y N
Correct bottles used:		Y N
Sufficient volume sent:		Y N
If Applicable		
VOA Zero Headspace:		Y N
Preservation Correct/Checked:		Y N
RAD Screen <0.5 mR/hr:		Y N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	
	5/17/23	1800			
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: NSAT °C 1.9+0=1.9	Bottles Received: 39
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) Eli 17	Date: 5-19-23	Time: 905

If preservation required by Login: Date/Time

Hold:

Condition: NCF / OK

ANALYTICAL REPORT

July 21, 2023

SCS Engineers - KS

Sample Delivery Group:	L1635072
Samples Received:	07/13/2023
Project Number:	27217233.22 - I
Description:	Evergy La Cygne Gen Station GW 2022-23

Report To:

Jason Franks
8575 West 110th Street
Suite 100
Overland Park, KS 66210

Entire Report Reviewed By:

Jeff Carr
Project Manager

TABLE OF CONTENTS

MW-701 L1635072-01 GW

Collected by: Whit Martin | Collected date/time: 07/12/23 12:30 | Received date/time: 07/13/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG2098385	1	07/20/23 14:06	07/20/23 14:06	GEB	Mt. Juliet, TN

DUPLICATE U1 L1635072-02 GW

Collected by: Whit Martin | Collected date/time: 07/12/23 12:30 | Received date/time: 07/13/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Wet Chemistry by Method 9056A	WG2098385	1	07/20/23 15:07	07/20/23 15:07	GEB	Mt. Juliet, TN

MW-707B L1635072-03 GW

Collected by: Whit Martin | Collected date/time: 07/12/23 13:40 | Received date/time: 07/13/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2096735	1	07/19/23 10:06	07/19/23 11:15	ARD	Mt. Juliet, TN

DUPLICATE U2 L1635072-04 GW

Collected by: Whit Martin | Collected date/time: 07/12/23 13:40 | Received date/time: 07/13/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2096735	1	07/19/23 10:06	07/19/23 11:15	ARD	Mt. Juliet, TN

CASE NARRATIVE

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

Jeff Carr
Project Manager

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Sulfate	78400		594	5000	1	07/20/2023 14:06	WG2098385

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Sulfate	78000		594	5000	1	07/20/2023 15:07	WG2098385

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	7920000		100000	1	07/19/2023 11:15	WG2096735

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	8270000		100000	1	07/19/2023 11:15	WG2096735

Method Blank (MB)

(MB) R3951229-1 07/19/23 11:15

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Dissolved Solids	U	J	10000	10000

L1634908-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1634908-01 07/19/23 11:15 • (DUP) R3951229-3 07/19/23 11:15

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	103000	111000	1	7.48	J3	5

L1634925-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1634925-01 07/19/23 11:15 • (DUP) R3951229-4 07/19/23 11:15

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	401000	432000	1	7.44	J3	5

Laboratory Control Sample (LCS)

(LCS) R3951229-2 07/19/23 11:15

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Dissolved Solids	8800000	8690000	98.8	77.3-123	

Method Blank (MB)

(MB) R3951053-1 07/20/23 09:34

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Sulfate	U		594	5000

L1634964-21 Original Sample (OS) • Duplicate (DUP)

(OS) L1634964-21 07/20/23 11:55 • (DUP) R3951053-5 07/20/23 12:25

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Sulfate	10500	10600	1	1.17		15

L1635072-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1635072-01 07/20/23 14:06 • (DUP) R3951053-8 07/20/23 14:57

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Sulfate	78400	77700	1	0.833		15

Laboratory Control Sample (LCS)

(LCS) R3951053-2 07/20/23 09:44

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Sulfate	40000	40500	101	80.0-120	

L1634964-21 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1634964-21 07/20/23 11:55 • (MS) R3951053-3 07/20/23 12:05 • (MSD) R3951053-4 07/20/23 12:15

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Sulfate	50000	10500	60100	60500	99.3	99.9	1	80.0-120			0.541	15

L1635072-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1635072-01 07/20/23 14:06 • (MS) R3951053-6 07/20/23 14:16 • (MSD) R3951053-7 07/20/23 14:26

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Sulfate	50000	78400	124000	124000	91.5	91.4	1	80.0-120			0.0653	15

GLOSSARY OF TERMS

Guide to Reading and Understanding Your Laboratory Report

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

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

Abbreviations and Definitions

MDL	Method Detection Limit.
RDL	Reported Detection Limit.
Rec.	Recovery.
RPD	Relative Percent Difference.
SDG	Sample Delivery Group.
U	Not detected at the Reporting Limit (or MDL where applicable).
Analyte	The name of the particular compound or analysis performed. Some Analyses and Methods will have multiple analytes reported.
Dilution	If the sample matrix contains an interfering material, the sample preparation volume or weight values differ from the standard, or if concentrations of analytes in the sample are higher than the highest limit of concentration that the laboratory can accurately report, the sample may be diluted for analysis. If a value different than 1 is used in this field, the result reported has already been corrected for this factor.
Limits	These are the target % recovery ranges or % difference value that the laboratory has historically determined as normal for the method and analyte being reported. Successful QC Sample analysis will target all analytes recovered or duplicated within these ranges.
Original Sample	The non-spiked sample in the prep batch used to determine the Relative Percent Difference (RPD) from a quality control sample. The Original Sample may not be included within the reported SDG.
Qualifier	This column provides a letter and/or number designation that corresponds to additional information concerning the result reported. If a Qualifier is present, a definition per Qualifier is provided within the Glossary and Definitions page and potentially a discussion of possible implications of the Qualifier in the Case Narrative if applicable.
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Uncertainty (Radiochemistry)	Confidence level of 2 sigma.
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Sample Summary (Ss)	This section of the Analytical Report defines the specific analyses performed for each sample ID, including the dates and times of preparation and/or analysis.

Qualifier	Description
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.

ACCREDITATIONS & LOCATIONS

Pace Analytical National 12065 Lebanon Rd Mount Juliet, TN 37122

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN000032021-1
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	TN00003
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO000356
Kentucky [1 6]	KY90010	South Carolina	84004002
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana	LA018	Texas	T104704245-20-18
Maine	TN00003	Texas [5]	LAB0152
Maryland	324	Utah	TN000032021-11
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	110033
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	998093910
Montana	CERT0086	Wyoming	A2LA
A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

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Overland Park, KS 66210

Billing Information:
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Pres Chk

Analysis / Container / Preservative

Chain of Custody Page 1 of 1

Pace PEOPLE ADVANCING SCIENCE

MT JULIET, TN

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SDG # 1635072
E104

Report to: Jason Franks

Email To: jfranks@scsengineers.com;jrockhold@scsengine

Project Description: Evergy La Cygne Gen Station GW 2022-23

City/State Collected: La Cygne, KS

Please Circle: PT MT (CT) ET

Phone: 913-681-0030

Client Project # 27217233.22 - I

Lab Project # AQUAOPKS-LACYGNE

Collected by (print): Whit Martin

Site/Facility ID #

P.O. #

Collected by (signature): [signature]

Immediately Packed on Ice N ___ Y X

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed: Std

Acctnum: AQUAOPKS
Template: T136276
Prelogin: P1010512
PM: 206 - Jeff Carr
PB:
Shipped Via:

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Sulfate 125mlHDPE-NoPres	TDS 1L-HDPE NoPres	Remarks	Sample # (lab only)
MW-701	Grab	GW		7/12/23	1230	1	X			J01
MW-701 MS/MSD	Grab	GW		7/12/23	1230	1	X			
DUPLICATE U1	Grab	GW		7/12/23	1230	1	X			-02
MW-707B	Grab	GW		7/12/23	1340	1		X		-03
DUPLICATE U2	Grab	GW		7/12/23	1340	1		X		-04

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_________

Remarks:

pH ______ Temp ______
Flow ______ Other ______

Samples returned via: __ UPS __ FedEx __ Courier ________

Tracking # 6481 5470 3620

Sample Receipt Checklist
COC Seal Present/Intact: __NP (Y) __N
COC Signed/Accurate: Y __N
Bottles arrive intact: Y __N
Correct bottles used: Y __N
Sufficient volume sent: Y __N
If Applicable
VOA Zero Headspace: __Y __N
Preservation Correct/Checked: __Y __N
RAD Screen <0.5 mR/hr: (Y) __N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)		
[signature]	7/12/23	1730		Trip Blank Received: Yes / (No) HCL / MeoH TBR	
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: GBAG 4.7+0=4.7 °C Bottles Received:	If preservation required by Login: Date/Time
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature) [signature]	Date: 7/13/23 Time: 9:00	Hold: Condition: NCF / (OK)

ANALYTICAL REPORT

December 11, 2023

SCS Engineers - KS

Sample Delivery Group:	L1679687
Samples Received:	11/18/2023
Project Number:	27217233.23-A
Description:	Evergy La Cygne Gen Station GW 2023-24

Report To:

Jason Franks
8575 West 110th Street
Suite 100
Overland Park, KS 66210

Entire Report Reviewed By:

Jeff Carr
Project Manager

TABLE OF CONTENTS

MW-6 L1679687-01 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 10:10 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177011	1	11/24/23 14:05	11/24/23 17:33	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178466	1	11/29/23 23:28	11/29/23 23:28	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:33	JTM	Mt. Juliet, TN

MW-7 L1679687-02 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 10:40 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177017	1	11/24/23 18:03	11/24/23 20:02	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 09:41	11/29/23 09:41	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:36	JTM	Mt. Juliet, TN

MW-11 L1679687-03 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 14:10 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177017	1	11/24/23 18:03	11/24/23 20:02	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 10:13	11/29/23 10:13	GEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	5	11/29/23 11:00	11/29/23 11:00	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:38	JTM	Mt. Juliet, TN

MW-701 L1679687-04 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 09:35 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177017	1	11/24/23 18:03	11/24/23 20:02	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 11:16	11/29/23 11:16	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:22	JTM	Mt. Juliet, TN

MW-702 L1679687-05 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 10:05 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177017	1	11/24/23 18:03	11/24/23 20:02	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 12:04	11/29/23 12:04	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:41	JTM	Mt. Juliet, TN

MW-703 L1679687-06 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 10:35 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177017	1	11/24/23 18:03	11/24/23 20:02	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 12:20	11/29/23 12:20	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:49	JTM	Mt. Juliet, TN

MW-704 L1679687-07 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 11:05 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177011	1	11/24/23 14:05	11/24/23 17:33	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 12:36	11/29/23 12:36	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:52	JTM	Mt. Juliet, TN

MW-705 L1679687-08 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 11:20 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177011	1	11/24/23 14:05	11/24/23 17:33	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 12:52	11/29/23 12:52	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:55	JTM	Mt. Juliet, TN

MW-706 L1679687-09 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 12:05 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177011	1	11/24/23 14:05	11/24/23 17:33	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 13:08	11/29/23 13:08	GEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	5	11/29/23 13:24	11/29/23 13:24	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 09:57	JTM	Mt. Juliet, TN

MW-707B L1679687-10 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 13:25 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177011	1	11/24/23 14:05	11/24/23 17:33	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	10	11/29/23 14:11	11/29/23 14:11	GEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	100	11/29/23 14:27	11/29/23 14:27	GEB	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2185395	1	12/08/23 18:46	12/08/23 18:46	MDM	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 10:00	JTM	Mt. Juliet, TN

MW-708 L1679687-11 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 14:05 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177011	1	11/24/23 14:05	11/24/23 17:33	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 14:43	11/29/23 14:43	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 10:03	JTM	Mt. Juliet, TN

TW-1 L1679687-12 GW

Collected by: B. Coleman | Collected date/time: 11/17/23 12:45 | Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177011	1	11/24/23 14:05	11/24/23 17:33	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 14:59	11/29/23 14:59	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 10:06	JTM	Mt. Juliet, TN

DUPLICATE L1679687-13 GW

Collected by: B. Coleman
Collected date/time: 11/17/23 00:00
Received date/time: 11/18/23 09:00

Method	Batch	Dilution	Preparation date/time	Analysis date/time	Analyst	Location
Gravimetric Analysis by Method 2540 C-2011	WG2177017	1	11/24/23 18:03	11/24/23 20:02	MMF	Mt. Juliet, TN
Wet Chemistry by Method 9056A	WG2178835	1	11/29/23 15:15	11/29/23 15:15	GEB	Mt. Juliet, TN
Metals (ICP) by Method 6010D	WG2174867	1	11/29/23 12:48	11/30/23 10:08	JTM	Mt. Juliet, TN

CASE NARRATIVE

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

Jeff Carr
Project Manager

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	1040000	J3	20000	1	11/24/2023 17:33	WG2177011

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	188000		379	1000	1	11/29/2023 23:28	WG2178466
Fluoride	508		64.0	150	1	11/29/2023 23:28	WG2178466
Sulfate	86700		594	5000	1	11/29/2023 23:28	WG2178466

Metals (ICP) by Method 6010D

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Boron	1110		20.0	200	1	11/30/2023 09:33	WG2174867
Calcium	76700		79.3	1000	1	11/30/2023 09:33	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	854000		20000	1	11/24/2023 20:02	WG2177017

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	93100		379	1000	1	11/29/2023 09:41	WG2178835
Fluoride	1260		64.0	150	1	11/29/2023 09:41	WG2178835
Sulfate	3130	J	594	5000	1	11/29/2023 09:41	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Boron	1530		20.0	200	1	11/30/2023 09:36	WG2174867
Calcium	19900		79.3	1000	1	11/30/2023 09:36	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	986000		20000	1	11/24/2023 20:02	WG2177017

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	63400		379	1000	1	11/29/2023 10:13	WG2178835
Fluoride	532		64.0	150	1	11/29/2023 10:13	WG2178835
Sulfate	229000		2970	25000	5	11/29/2023 11:00	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1110		20.0	200	1	11/30/2023 09:38	WG2174867
Calcium	59300		79.3	1000	1	11/30/2023 09:38	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	576000		10000	1	11/24/2023 20:02	WG2177017

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	48700	J6	379	1000	1	11/29/2023 11:16	WG2178835
Fluoride	640		64.0	150	1	11/29/2023 11:16	WG2178835
Sulfate	83000	J6	594	5000	1	11/29/2023 11:16	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	927		20.0	200	1	11/30/2023 09:22	WG2174867
Calcium	45300		79.3	1000	1	11/30/2023 09:22	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	652000		13300	1	11/24/2023 20:02	WG2177017

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	47700		379	1000	1	11/29/2023 12:04	WG2178835
Fluoride	1480		64.0	150	1	11/29/2023 12:04	WG2178835
Sulfate	2340	J	594	5000	1	11/29/2023 12:04	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Boron	1800		20.0	200	1	11/30/2023 09:41	WG2174867
Calcium	16600		79.3	1000	1	11/30/2023 09:41	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	856000		20000	1	11/24/2023 20:02	WG2177017

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	90600		379	1000	1	11/29/2023 12:20	WG2178835
Fluoride	1410		64.0	150	1	11/29/2023 12:20	WG2178835
Sulfate	25000		594	5000	1	11/29/2023 12:20	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Boron	1740		20.0	200	1	11/30/2023 09:49	WG2174867
Calcium	18000		79.3	1000	1	11/30/2023 09:49	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	1150000		25000	1	11/24/2023 17:33	WG2177011

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	88300		379	1000	1	11/29/2023 12:36	WG2178835
Fluoride	905		64.0	150	1	11/29/2023 12:36	WG2178835
Sulfate	159000		594	5000	1	11/29/2023 12:36	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1950		20.0	200	1	11/30/2023 09:52	WG2174867
Calcium	21800		79.3	1000	1	11/30/2023 09:52	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	958000		20000	1	11/24/2023 17:33	WG2177011

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	132000		379	1000	1	11/29/2023 12:52	WG2178835
Fluoride	1010		64.0	150	1	11/29/2023 12:52	WG2178835
Sulfate	40600		594	5000	1	11/29/2023 12:52	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	2120		20.0	200	1	11/30/2023 09:55	WG2174867
Calcium	29900		79.3	1000	1	11/30/2023 09:55	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	1120000		25000	1	11/24/2023 17:33	WG2177011

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	214000		1900	5000	5	11/29/2023 13:24	WG2178835
Fluoride	1090		64.0	150	1	11/29/2023 13:08	WG2178835
Sulfate	20000		594	5000	1	11/29/2023 13:08	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	2000		20.0	200	1	11/30/2023 09:57	WG2174867
Calcium	25400		79.3	1000	1	11/30/2023 09:57	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	6930000		100000	1	11/24/2023 17:33	WG2177011

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	167000		3790	10000	10	11/29/2023 14:11	WG2178835
Fluoride	388		64.0	150	1	12/08/2023 18:46	WG2185395
Sulfate	5010000		59400	500000	100	11/29/2023 14:27	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	1870		20.0	200	1	11/30/2023 10:00	WG2174867
Calcium	403000		79.3	1000	1	11/30/2023 10:00	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	615000		13300	1	11/24/2023 17:33	WG2177011

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	47800		379	1000	1	11/29/2023 14:43	WG2178835
Fluoride	654		64.0	150	1	11/29/2023 14:43	WG2178835
Sulfate	11200		594	5000	1	11/29/2023 14:43	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Boron	1430		20.0	200	1	11/30/2023 10:03	WG2174867
Calcium	30400		79.3	1000	1	11/30/2023 10:03	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result ug/l	Qualifier	RDL ug/l	Dilution	Analysis date / time	Batch
Dissolved Solids	960000		20000	1	11/24/2023 17:33	WG2177011

Wet Chemistry by Method 9056A

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Chloride	39500		379	1000	1	11/29/2023 14:59	WG2178835
Fluoride	400		64.0	150	1	11/29/2023 14:59	WG2178835
Sulfate	73000		594	5000	1	11/29/2023 14:59	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result ug/l	Qualifier	MDL ug/l	RDL ug/l	Dilution	Analysis date / time	Batch
Boron	1400		20.0	200	1	11/30/2023 10:06	WG2174867
Calcium	25800		79.3	1000	1	11/30/2023 10:06	WG2174867

Gravimetric Analysis by Method 2540 C-2011

Analyte	Result	Qualifier	RDL	Dilution	Analysis	Batch
	ug/l		ug/l		date / time	
Dissolved Solids	570000		10000	1	11/24/2023 20:02	WG2177017

Wet Chemistry by Method 9056A

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Chloride	48800		379	1000	1	11/29/2023 15:15	WG2178835
Fluoride	646		64.0	150	1	11/29/2023 15:15	WG2178835
Sulfate	83100		594	5000	1	11/29/2023 15:15	WG2178835

Metals (ICP) by Method 6010D

Analyte	Result	Qualifier	MDL	RDL	Dilution	Analysis	Batch
	ug/l		ug/l	ug/l		date / time	
Boron	934		20.0	200	1	11/30/2023 10:08	WG2174867
Calcium	45700		79.3	1000	1	11/30/2023 10:08	WG2174867

Method Blank (MB)

(MB) R4005328-1 11/24/23 17:33

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Dissolved Solids	U		10000	10000

L1679687-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1679687-01 11/24/23 17:33 • (DUP) R4005328-3 11/24/23 17:33

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	1040000	1110000	1	6.72	J3	5

L1679687-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1679687-07 11/24/23 17:33 • (DUP) R4005328-4 11/24/23 17:33

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	1150000	1200000	1	4.47		5

Laboratory Control Sample (LCS)

(LCS) R4005328-2 11/24/23 17:33

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Dissolved Solids	8800000	8710000	99.0	85.0-115	

Method Blank (MB)

(MB) R4005296-1 11/24/23 20:02

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Dissolved Solids	U		10000	10000

L1679627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1679627-01 11/24/23 20:02 • (DUP) R4005296-3 11/24/23 20:02

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	176000	182000	1	3.35		5

L1679627-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1679627-02 11/24/23 20:02 • (DUP) R4005296-4 11/24/23 20:02

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Dissolved Solids	178000	189000	1	5.99	J3	5

Laboratory Control Sample (LCS)

(LCS) R4005296-2 11/24/23 20:02

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Dissolved Solids	8800000	8870000	101	85.0-115	

Method Blank (MB)

(MB) R4006354-1 11/29/23 19:06

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	U		379	1000
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1679627-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1679627-01 11/29/23 20:42 • (DUP) R4006354-3 11/29/23 20:55

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	2050	2040	1	0.714		15
Fluoride	151	152	1	0.660		15
Sulfate	11800	11900	1	0.694		15

L1679906-06 Original Sample (OS) • Duplicate (DUP)

(OS) L1679906-06 11/30/23 02:13 • (DUP) R4006354-6 11/30/23 02:26

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	507	496	1	2.07	J	15
Fluoride	U	U	1	0.000		15
Sulfate	U	U	1	0.000		15

Laboratory Control Sample (LCS)

(LCS) R4006354-2 11/29/23 19:19

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	39500	98.8	80.0-120	
Fluoride	8000	7990	99.9	80.0-120	
Sulfate	40000	38600	96.4	80.0-120	

L1679627-01 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1679627-01 11/29/23 20:42 • (MS) R4006354-4 11/29/23 21:08 • (MSD) R4006354-5 11/29/23 21:20

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	40000	2050	42000	42100	100	100	1	80.0-120			0.212	15
Fluoride	8000	151	8480	8490	104	104	1	80.0-120			0.121	15
Sulfate	40000	11800	49800	49600	94.9	94.4	1	80.0-120			0.409	15

L1679906-06 Original Sample (OS) • Matrix Spike (MS)

(OS) L1679906-06 11/30/23 02:13 • (MS) R4006354-7 11/30/23 02:39

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Chloride	40000	507	39700	97.9	1	80.0-120	
Fluoride	8000	U	8270	103	1	80.0-120	
Sulfate	40000	U	38900	97.3	1	80.0-120	

Method Blank (MB)

(MB) R4006442-1 11/29/23 04:55

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Chloride	U		379	1000
Fluoride	U		64.0	150
Sulfate	U		594	5000

L1679687-02 Original Sample (OS) • Duplicate (DUP)

(OS) L1679687-02 11/29/23 09:41 • (DUP) R4006442-5 11/29/23 09:57

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	93100	94000	1	0.944		15
Fluoride	1260	1260	1	0.0159		15
Sulfate	3130	3110	1	0.564	J	15

L1679691-01 Original Sample (OS) • Duplicate (DUP)

(OS) L1679691-01 11/29/23 15:37 • (DUP) R4006442-8 11/29/23 15:53

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Chloride	45700	45600	1	0.158		15
Fluoride	389	387	1	0.361		15
Sulfate	15700	15700	1	0.155		15

Laboratory Control Sample (LCS)

(LCS) R4006442-2 11/29/23 05:10

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Chloride	40000	39900	99.7	80.0-120	
Fluoride	8000	8330	104	80.0-120	
Sulfate	40000	41100	103	80.0-120	

L1681696-02 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1681696-02 11/29/23 05:58 • (MS) R4006442-3 11/29/23 06:14 • (MSD) R4006442-4 11/29/23 06:30

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	40000	1110000	867000	864000	0.000	0.000	10	80.0-120	V	V	0.299	15
Fluoride	8000	U	8360	8310	105	104	10	80.0-120			0.579	15
Sulfate	40000	2570000	1960000	1950000	0.000	0.000	10	80.0-120	V	V	0.302	15

Sample Narrative:

OS: Dilution due to matrix.

L1679687-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1679687-04 11/29/23 11:16 • (MS) R4006442-6 11/29/23 11:32 • (MSD) R4006442-7 11/29/23 11:48

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Chloride	40000	48700	79500	79100	76.9	76.1	1	80.0-120	J6	J6	0.394	15
Fluoride	8000	640	8920	8880	104	103	1	80.0-120			0.494	15
Sulfate	40000	83000	107000	107000	60.7	60.3	1	80.0-120	J6	J6	0.168	15

Method Blank (MB)

(MB) R4010115-1 12/08/23 09:07

Analyte	MB Result ug/l	MB Qualifier	MB MDL ug/l	MB RDL ug/l
Fluoride	U		64.0	150

L1684034-07 Original Sample (OS) • Duplicate (DUP)

(OS) L1684034-07 12/08/23 14:25 • (DUP) R4010115-6 12/08/23 15:13

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	U	U	1	0.000		15

L1682898-03 Original Sample (OS) • Duplicate (DUP)

(OS) L1682898-03 12/08/23 09:55 • (DUP) R4010115-3 12/08/23 10:11

Analyte	Original Result ug/l	DUP Result ug/l	Dilution	DUP RPD %	DUP Qualifier	DUP RPD Limits %
Fluoride	457	445	5	2.62	J	15

Laboratory Control Sample (LCS)

(LCS) R4010115-2 12/08/23 09:23

Analyte	Spike Amount ug/l	LCS Result ug/l	LCS Rec. %	Rec. Limits %	LCS Qualifier
Fluoride	8000	8040	100	80.0-120	

L1684034-07 Original Sample (OS) • Matrix Spike (MS)

(OS) L1684034-07 12/08/23 14:25 • (MS) R4010115-7 12/08/23 15:29

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MS Rec. %	Dilution	Rec. Limits %	MS Qualifier
Fluoride	8000	U	8090	101	1	80.0-120	

L1682898-03 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1682898-03 12/08/23 09:55 • (MS) R4010115-4 12/08/23 10:27 • (MSD) R4010115-5 12/08/23 10:42

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	8000	457	8510	8530	101	101	5	80.0-120			0.244	15

L1678508-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1678508-04 12/08/23 17:26 • (MS) R4010115-10 12/08/23 17:42 • (MSD) R4010115-11 12/08/23 17:58

Analyte	Spike Amount ug/l	Original Result ug/l	MS Result ug/l	MSD Result ug/l	MS Rec. %	MSD Rec. %	Dilution	Rec. Limits %	MS Qualifier	MSD Qualifier	RPD %	RPD Limits %
Fluoride	8000	439	7780	7610	91.7	89.7	1	80.0-120			2.12	15

Method Blank (MB)

(MB) R4006575-1 11/30/23 09:17

Analyte	MB Result	MB Qualifier	MB MDL	MB RDL
	ug/l		ug/l	ug/l
Boron	U		20.0	200
Calcium	U		79.3	1000

Laboratory Control Sample (LCS)

(LCS) R4006575-2 11/30/23 09:20

Analyte	Spike Amount	LCS Result	LCS Rec.	Rec. Limits	LCS Qualifier
	ug/l	ug/l	%	%	
Boron	1000	964	96.4	80.0-120	
Calcium	10000	9780	97.8	80.0-120	

L1679687-04 Original Sample (OS) • Matrix Spike (MS) • Matrix Spike Duplicate (MSD)

(OS) L1679687-04 11/30/23 09:22 • (MS) R4006575-4 11/30/23 09:28 • (MSD) R4006575-5 11/30/23 09:30

Analyte	Spike Amount	Original Result	MS Result	MSD Result	MS Rec.	MSD Rec.	Dilution	Rec. Limits	MS Qualifier	MSD Qualifier	RPD	RPD Limits
	ug/l	ug/l	ug/l	ug/l	%	%		%			%	%
Boron	1000	927	1840	1860	90.9	93.3	1	75.0-125			1.30	20
Calcium	10000	45300	54700	54700	94.0	94.6	1	75.0-125			0.109	20

GLOSSARY OF TERMS

Guide to Reading and Understanding Your Laboratory Report

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

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

Abbreviations and Definitions

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

Qualifier	Description
J	The identification of the analyte is acceptable; the reported value is an estimate.
J3	The associated batch QC was outside the established quality control range for precision.
J6	The sample matrix interfered with the ability to make any accurate determination; spike value is low.
V	The sample concentration is too high to evaluate accurate spike recoveries.

ACCREDITATIONS & LOCATIONS

Pace Analytical National 12065 Lebanon Rd Mount Juliet, TN 37122

Alabama	40660	Nebraska	NE-OS-15-05
Alaska	17-026	Nevada	TN000032021-1
Arizona	AZ0612	New Hampshire	2975
Arkansas	88-0469	New Jersey–NELAP	TN002
California	2932	New Mexico [1]	TN00003
Colorado	TN00003	New York	11742
Connecticut	PH-0197	North Carolina	Env375
Florida	E87487	North Carolina [1]	DW21704
Georgia	NELAP	North Carolina [3]	41
Georgia [1]	923	North Dakota	R-140
Idaho	TN00003	Ohio–VAP	CL0069
Illinois	200008	Oklahoma	9915
Indiana	C-TN-01	Oregon	TN200002
Iowa	364	Pennsylvania	68-02979
Kansas	E-10277	Rhode Island	LAO000356
Kentucky [1 6]	KY90010	South Carolina	84004002
Kentucky [2]	16	South Dakota	n/a
Louisiana	AI30792	Tennessee [1 4]	2006
Louisiana	LA018	Texas	T104704245-20-18
Maine	TN00003	Texas [5]	LAB0152
Maryland	324	Utah	TN000032021-11
Massachusetts	M-TN003	Vermont	VT2006
Michigan	9958	Virginia	110033
Minnesota	047-999-395	Washington	C847
Mississippi	TN00003	West Virginia	233
Missouri	340	Wisconsin	998093910
Montana	CERT0086	Wyoming	A2LA
A2LA – ISO 17025	1461.01	AIHA-LAP,LLC EMLAP	100789
A2LA – ISO 17025 [5]	1461.02	DOD	1461.01
Canada	1461.01	USDA	P330-15-00234
EPA–Crypto	TN00003		

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

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

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

Company Name/Address:
SCS Engineers - KS

8575 West 110th Street
Suite 100
Overland Park. KS 66210

Billing Information:
Accounts Payable
8575 W. 110th Street
Suite 100
Overland Park, KS 66210

Pres Chk

Report to:
Jason Franks

Email To:
jfranks@scsengineers.com;jrockhold@scsengine

Project Description:
Evergy La Cygne Gen Station GW 2023-24

City/State Collected: **La Cygne, KS**

Please Circle: PT MT (CT) ET

Phone: **913-681-0030**

Client Project #
27217233.23-A

Lab Project #
AQUAOPKS-LACYGNE

Collected by (print):
B. Coleman

Site/Facility ID #

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed
STD

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Anions (Cld, F, SO4) 125mlHDPE-NoPres	B, Ca - 6010 250mlHDPE-HNO3	TDS 250mlHDPE-NoPres	Remarks	Sample # (lab only)
MW-6	G	GW		11-17-23	1010	3	X	X	X		-01
MW-7		GW			1040	3	X	X	X		-02
MW-11		GW			1410	3	X	X	X		-03
MW-701		GW			935	3	X	X	X		-04
MW-702		GW			1005	3	X	X	X		-05
MW-703		GW			1035	3	X	X	X		-06
MW-704		GW			1105	3	X	X	X		-07
MW-705		GW			1120	3	X	X	X		-08
MW-706		GW			1205	3	X	X	X		-09
MW-707B		GW			1325	3	X	X	X		-10

* Matrix:
SS - Soil AIR - Air F - Filter
GW - Groundwater B - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____

Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier _____

Tracking #

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR
	11-17-23	1530		
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received: 38
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 11-18-23 Time: 9:00

If preservation required by Login: Date/Time

PH-10BDH4321 TRC-235236
CR6-20221V

Hold:

Condition: NCF / OK

Sample Receipt Checklist
COC Seal Present/Intact: __NP (Y) N
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: __Y __N
Preservation Correct/Checked: Y N
RAD Screen <0.5 mR/hr: (Y) __N

Chain of Custody Page 1 of 2

Pace
PEOPLE ADVANCING SCIENCE

MT JULIET, TN
12065 Lebanon Rd Mount Juliet, TN 37122
Submitting a sample via this chain of custody constitutes acknowledgment and acceptance of the Pace Terms and Conditions found at: https://info.pacelabs.com/hubfs/pas-standard-terms.pdf

SDG # L1479687
B125

Table

Acctnum: **AQUAOPKS**
Template: **T150678**
Prelogin: **P1033072**
PM: **206 - Jeff Carr**
PB:

Shipped Via: **FedEX Ground**

Company Name/Address:
SCS Engineers - KS

8575 West 110th Street
Suite 100
Overland Park. KS 66210

Billing Information:
Accounts Payable
8575 W. 110th Street
Suite 100
Overland Park, KS 66210

Pres Chk

Report to:
Jason Franks

Email To:
jfranks@scsengineers.com;jrockhold@scsengine

Project Description:
Evergy La Cygne Gen Station GW 2023-24

City/State Collected: La Cygne, KS

Please Circle: PT MT CT ET

Phone: **913-681-0030**

Client Project #
27217233.23-A

Lab Project #
AQUAOPKS-LACYGNE

Collected by (print): B. Holman

Site/Facility ID #

P.O. #

Collected by (signature):

Immediately Packed on Ice N ___ Y ___

Rush? (Lab MUST Be Notified)
___ Same Day ___ Five Day
___ Next Day ___ 5 Day (Rad Only)
___ Two Day ___ 10 Day (Rad Only)
___ Three Day

Quote #

Date Results Needed: STD

Sample ID	Comp/Grab	Matrix *	Depth	Date	Time	No. of Cntrs	Anions (Cld, F, SO4) 125mlHDPE-NoPres	B, Ca - 6010 250mlHDPE-HNO3	TDS 250mlHDPE-NoPres							Remarks	Sample # (lab only)
MW-708	G	GW		11-17-23	1405	3	X	X	X								-11
TW-1		GW			1245	3	X	X	X								-12
DUPLICATE		GW			-	3	X	X	X								-13
701 MS/MSD		GW			-	2	X	X									-04

Analysis / Container / Preservative

Chain of Custody Page 2 of 2

Pace
PEOPLE ADVANCING SCIENCE

MT JULIET, TN
12065 Lebanon Rd Mount Juliet, TN 37122
Submitting a sample via this chain of custody constitutes acknowledgment and acceptance of the Pace Terms and Conditions found at: https://info.pacelabs.com/hubfs/pas-standard-terms.pdf

SDG # L1679687

Table #

Acctnum: **AQUAOPKS**
Template: **T150678**
Prelogin: **P1033072**
PM: **206 - Jeff Carr**
PB:

Shipped Via: **FedEX Ground**

* Matrix:
SS - Soil **AIR** - Air **F** - Filter
GW - Groundwater **B** - Bioassay
WW - WasteWater
DW - Drinking Water
OT - Other_____

Remarks:

pH _____ Temp _____
Flow _____ Other _____

Samples returned via:
__ UPS __ FedEx __ Courier _____

Tracking #

Sample Receipt Checklist
COC Seal Present/Intact: __NP Y N
COC Signed/Accurate: Y N
Bottles arrive intact: Y N
Correct bottles used: Y N
Sufficient volume sent: Y N
If Applicable
VOA Zero Headspace: Y N
Preservation Correct/Checked: Y N
RAD Screen <0.5 mR/hr: Y N

Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Trip Blank Received: Yes / No HCL / MeoH TBR	If preservation required by Login: Date/Time
	11-17-23	1530			
Relinquished by : (Signature)	Date:	Time:	Received by: (Signature)	Temp: °C Bottles Received:	
Relinquished by : (Signature)	Date:	Time:	Received for lab by: (Signature)	Date: 11.18.23 Time: 900	Hold: Condition: NCF / OK

L1679687

Tracking Numbers	Tempature
6481 5470 4425.	CCA8 1.3to=1.3
6481 5470 4811.	CCA8 2.3to=2.3
6481 5470 4877.	CCA8 0.1to=0.1
6481 5470 4822.	CCA8 3.6to=3.6
6481 5470 5005.	CCA8 1.3to=1.3
7074 8788 2858.	CCA8 3.0to=3.0
6481 5470 4800.	CCA8 2.2to=2.2
7014 5686 3190.	CCA8 0.1to=0.1
6481 5470 4991.	CCA8 1.1to=1.1
6481 5470 4899.	CCA8 1.3to=1.3
6481 5470 4855.	CCA8 1.5to=1.5
6481 5470 3675.	CCA8 4.1to=4.1
6481 5470 4858.	CCA8 3.6to=3.6

APPENDIX E

STATISTICAL ANALYSES

E.1 Fall 2022 Semiannual Detection Monitoring Statistical Analyses

E.2 Spring 2023 Semiannual Detection Monitoring Statistical Analyses

APPENDIX E.1

Fall 2022 Semiannual Detection Monitoring Statistical Analyses

SCS ENGINEERS

Environmental Consulting & Contracting

MEMORANDUM

March 20, 2023

To: La Cygne Generating Station
25166 East 2200 Road
La Cygne, Kansas 66040
Evergy Metro, Inc.

From: SCS Engineers
John Rockhold, P.G.
Douglas Doerr, P.E.

RE: Determination of Statistically Significant Increases –
Upper AQC Impoundment
Fall 2022 Semiannual Detection Monitoring 40 CFR 257.94

Statistical analysis of monitoring data from the groundwater monitoring system for the Upper AQC Impoundment at the La Cygne Generating Station has been completed in substantial compliance with the "Statistical Method Certification by A Qualified Professional Engineer" dated October 12, 2017. Detection monitoring groundwater samples were collected on November 9, 2022. Review and validation of the results from the November 2022 Detection Monitoring Event was completed on December 20, 2022, which constitutes completion and finalization of detection monitoring laboratory analyses. A statistical analysis was then conducted to determine whether there was a statistically significant increase (SSI) over background values for each constituent listed in Appendix III to Part 257-Constituents for Detection Monitoring. Two rounds of verification sampling were conducted for certain constituents on January 12, 2023, and February 8, 2023.

The second verification sample for certain analytes was split between three laboratories, Pace National, Pace Laboratories (Lenexa), and Eurofins, in an effort to provide useful or undiluted analytical data to meet previous laboratory reporting limits and for the reporting limit to be below the prediction limits. Pace National and Eurofins completed anions analyses by EPA Method 9056A, and Pace Laboratories completed anions analyses by EPA Method 300.1. None of the laboratories were able to meet the previous reporting limit of 0.1 mg/L for fluoride. However, Eurofins came the closest and reported a detection above the reporting limit. Therefore, the Eurofins fluoride data was utilized for the SSI determination.

The completed statistical evaluation identified one Appendix III constituent above its prediction limit established for monitoring well MW-707B.

Monitoring Well Constituent	*UPL	Observation November 9, 2022	1st Verification January 12, 2023	2nd Verification February 8, 2023
MW-707B				
Fluoride	0.5018	<1.31(J)	<0.640(M)/<0.640(M)**	1.0(E)/0.9(JE)

*UPL – Upper Prediction Limit
** - Duplicate Sample
(J) – Estimated Value
(E) – Eurofins Split Laboratory Sample, Lower Reporting Limit than Primary Laboratory Pace National
(M) – Method Detection Limit

Determination: A statistical evaluation was completed for all Appendix III detection monitoring constituents in accordance with the certified statistical method. The statistical evaluation identified an SSI above the background prediction limit for fluoride at MW-707B.

Attached to this memorandum are the following backup information:

Attachment 1: Sanitas™ Output:

Statistical evaluation output from Sanitas™ for the prediction limit analysis. This includes prediction limit plots, prediction limit background data, detection sample results, 1st verification re-sample results (when applicable), 2nd verification re-sample results (when applicable), extra sample results for pH because pH is collected as part of the sampling procedure, and a Prediction Limit summary table. Output documentation includes the analytical data used for the statistical analyses.

Attachment 2: Sanitas™ Configuration Settings:

Screen shots of the applicable Sanitas™ configuration settings for the statistical prediction limit analysis. This includes data configuration, output configuration, prediction limit configuration and other tests configuration.

Revision Number	Revision Date	Attachment Revised	Summary of Revisions

La Cygne Generating Station
Determination of Statistically Significant Increases
Upper AQC Impoundment
March 20, 2023

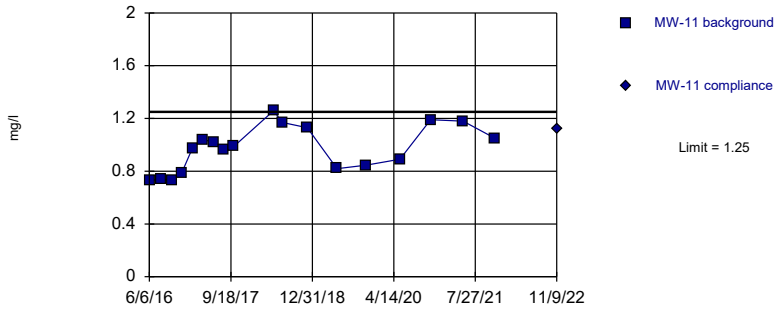
ATTACHMENT 1

Sanitas™ Output

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.9726, Std. Dev.=0.1721, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9419, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

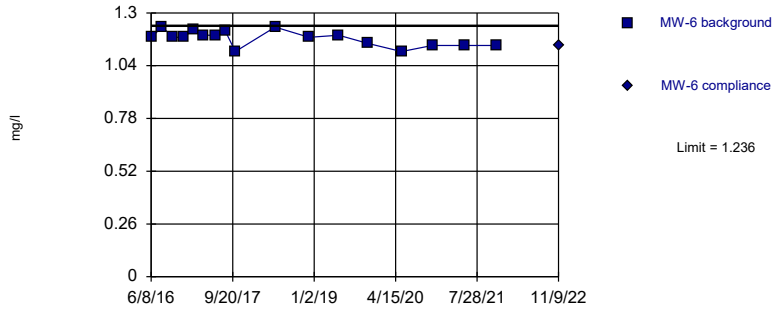
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.175, Std. Dev.=0.03777, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9328, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

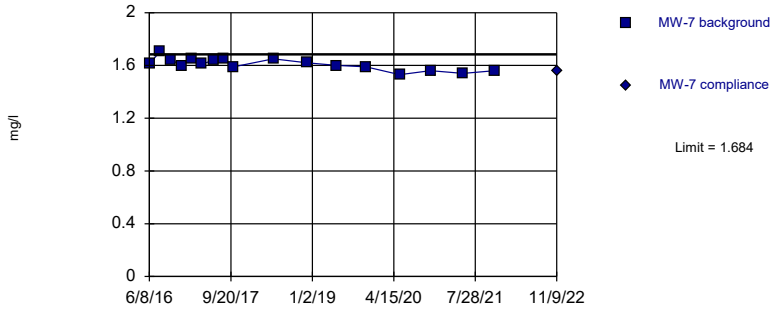
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.609, Std. Dev.=0.04608, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9659, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

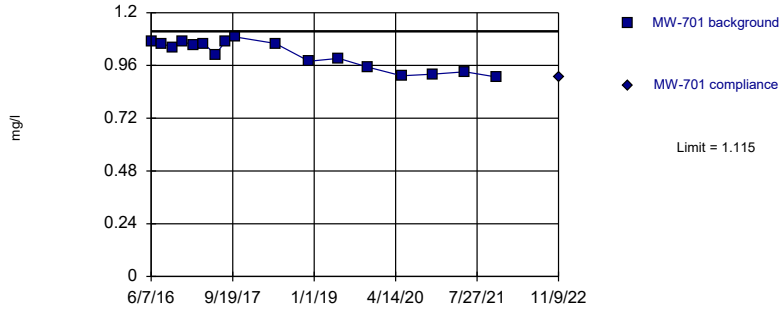
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.01, Std. Dev.=0.06433, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8689, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11
6/6/2016	0.729	
8/11/2016	0.739	
10/12/2016	0.73	
12/9/2016	0.786	
2/9/2017	0.974	
4/6/2017	1.04	
6/15/2017	1.02	
8/10/2017	0.965	
10/5/2017	0.988	
5/23/2018	1.26	
7/11/2018	1.17	
12/3/2018	1.13	
5/23/2019	0.819	
11/7/2019	0.846	
5/19/2020	0.891	
11/12/2020	1.19	
5/19/2021	1.18	
11/18/2021	1.05	
11/9/2022		1.12

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-6	MW-6
6/8/2016	1.18	
8/10/2016	1.23	
10/13/2016	1.18	
12/12/2016	1.18	
2/9/2017	1.22	
4/5/2017	1.19	
6/15/2017	1.19	
8/9/2017	1.21	
10/5/2017	1.11	
5/23/2018	1.23	
12/4/2018	1.18	
5/23/2019	1.19	
11/7/2019	1.15	
5/19/2020	1.11	
11/12/2020	1.14	
5/19/2021	1.14	
11/18/2021	1.14	
11/9/2022		1.14

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-7	MW-7
6/8/2016	1.61	
8/10/2016	1.71	
10/13/2016	1.64	
12/12/2016	1.6	
2/8/2017	1.65	
4/5/2017	1.61	
6/15/2017	1.64	
8/9/2017	1.65	
10/5/2017	1.59	
5/23/2018	1.65	
12/4/2018	1.62	
5/23/2019	1.6	
11/7/2019	1.59	
5/19/2020	1.53	
11/12/2020	1.56	
5/19/2021	1.54	
11/18/2021	1.56	
11/9/2022		1.56

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

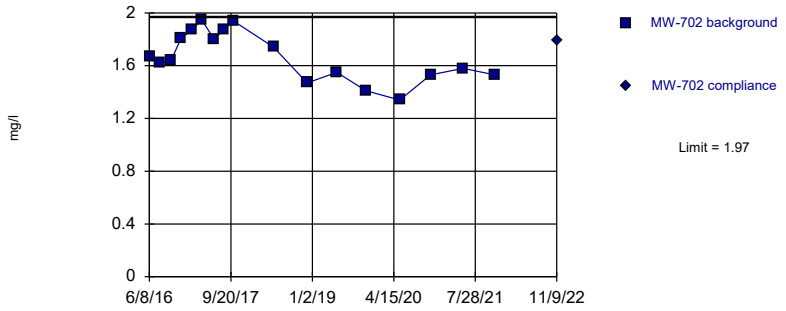
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-701	MW-701
6/7/2016	1.07	
8/9/2016	1.06	
10/11/2016	1.04	
12/6/2016	1.07	
2/7/2017	1.05	
4/4/2017	1.06	
6/13/2017	1.01	
8/8/2017	1.07	
10/3/2017	1.09	
5/24/2018	1.06	
12/3/2018	0.979	
5/23/2019	0.992	
11/7/2019	0.952	
5/19/2020	0.913	
11/12/2020	0.92	
5/19/2021	0.931	
11/18/2021	0.907	
11/9/2022		0.905

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.666, Std. Dev.=0.1861, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9606, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

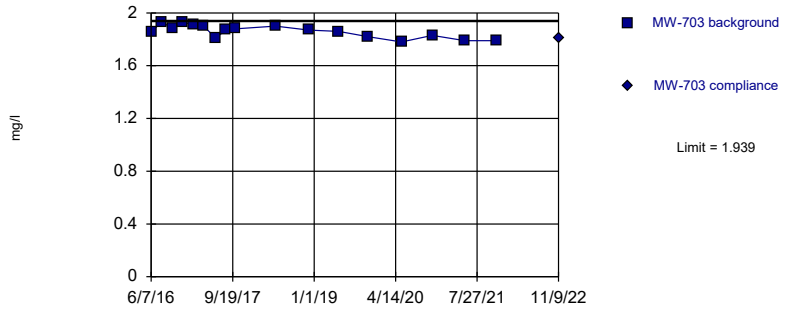
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.859, Std. Dev.=0.04854, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9402, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

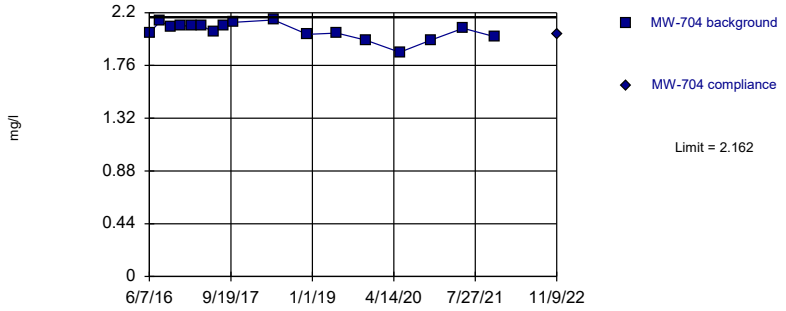
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=2.049, Std. Dev.=0.06918, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9212, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

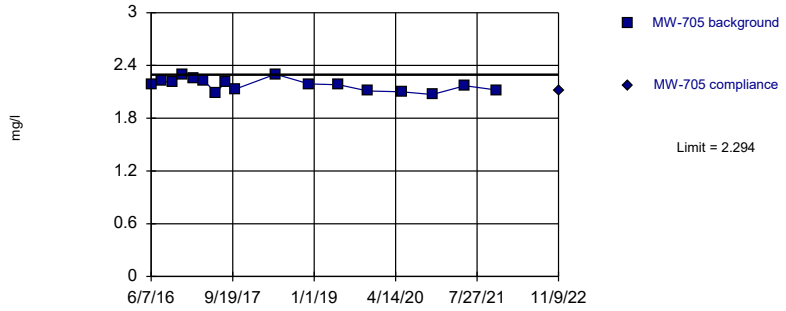
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=2.181, Std. Dev.=0.06959, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.957, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702
6/8/2016	1.67	
8/9/2016	1.62	
10/11/2016	1.64	
12/8/2016	1.81	
2/8/2017	1.87	
4/5/2017	1.95	
6/15/2017	1.8	
8/9/2017	1.87	
10/3/2017	1.94	
5/24/2018	1.74	
12/3/2018	1.47	
5/23/2019	1.55	
11/7/2019	1.41	
5/19/2020	1.34	
11/12/2020	1.53	
5/19/2021	1.58	
11/18/2021	1.53	
11/9/2022		1.79

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-703	MW-703
6/7/2016	1.86	
8/9/2016	1.93	
10/11/2016	1.88	
12/6/2016	1.93	
2/7/2017	1.91	
4/4/2017	1.9	
6/14/2017	1.81	
8/10/2017	1.87	
10/5/2017	1.88	
5/24/2018	1.9	
12/3/2018	1.87	
5/23/2019	1.86	
11/7/2019	1.82	
5/19/2020	1.78	
11/12/2020	1.83	
5/19/2021	1.79	
11/18/2021	1.79	
11/9/2022		1.81

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-704	MW-704
6/7/2016	2.03	
8/9/2016	2.13	
10/11/2016	2.08	
12/6/2016	2.09	
2/7/2017	2.09	
4/4/2017	2.09	
6/13/2017	2.04	
8/8/2017	2.09	
10/3/2017	2.12	
5/24/2018	2.14	
12/3/2018	2.02	
5/23/2019	2.03	
11/7/2019	1.97	
5/19/2020	1.87	
11/12/2020	1.97	
5/19/2021	2.07	
11/18/2021	2	
11/9/2022		2.02

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

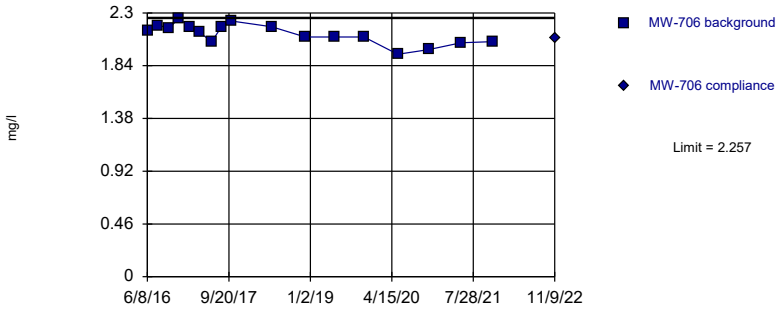
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-705	MW-705
6/7/2016	2.19	
8/9/2016	2.22	
10/11/2016	2.21	
12/7/2016	2.3	
2/9/2017	2.25	
4/6/2017	2.23	
6/13/2017	2.09	
8/9/2017	2.21	
10/3/2017	2.13	
5/24/2018	2.3	
12/4/2018	2.19	
5/23/2019	2.18	
11/7/2019	2.11	
5/19/2020	2.1	
11/12/2020	2.07	
5/19/2021	2.17	
11/18/2021	2.12	
11/9/2022		2.11

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=2.116, Std. Dev.=0.08602, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9602, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

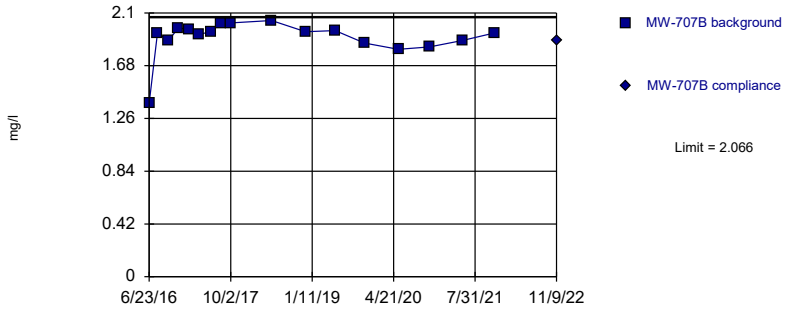
Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary (based on x^5 transformation): Mean=26.11, Std. Dev.=7.072, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8672, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

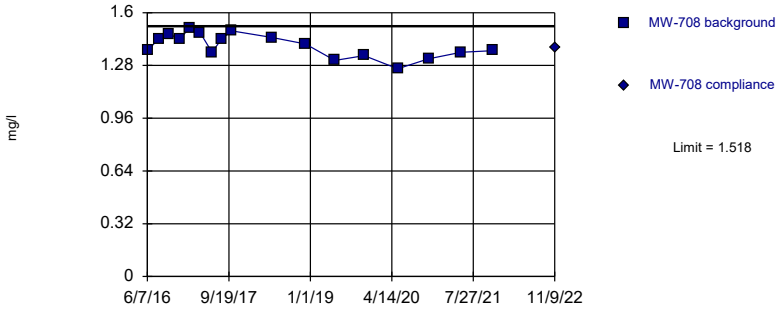
Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.401, Std. Dev.=0.0714, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9595, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

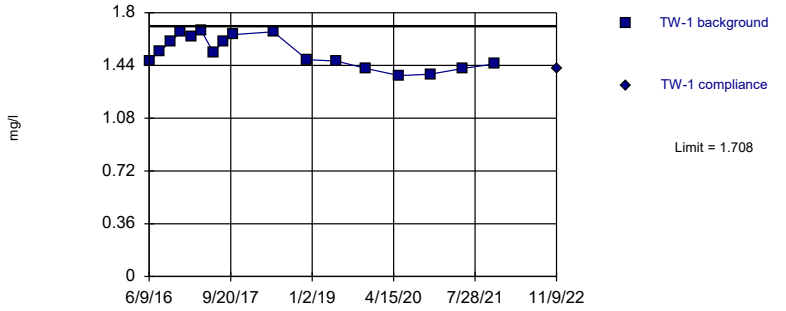
Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.532, Std. Dev.=0.1079, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9153, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706
6/8/2016	2.14	
8/9/2016	2.19	
10/11/2016	2.17	
12/6/2016	2.25	
2/7/2017	2.18	
4/4/2017	2.13	
6/13/2017	2.05	
8/9/2017	2.18	
10/4/2017	2.23	
5/24/2018	2.18	
12/4/2018	2.09	
5/23/2019	2.09	
11/7/2019	2.09	
5/19/2020	1.94	
11/12/2020	1.98	
5/19/2021	2.04	
11/18/2021	2.05	
11/9/2022		2.08

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-707B	MW-707B
6/23/2016	1.38	
8/9/2016	1.94	
10/11/2016	1.88	
12/6/2016	1.98	
2/7/2017	1.97	
4/4/2017	1.93	
6/13/2017	1.95	
8/8/2017	2.02	
10/3/2017	2.02	
5/24/2018	2.04	
12/4/2018	1.95	
5/23/2019	1.96	
11/7/2019	1.86	
5/19/2020	1.81	
11/12/2020	1.83	
5/19/2021	1.88	
11/18/2021	1.94	
11/9/2022		1.88

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-708	MW-708
6/7/2016	1.37	
8/10/2016	1.44	
10/12/2016	1.47	
12/9/2016	1.44	
2/9/2017	1.51	
4/6/2017	1.48	
6/14/2017	1.36	
8/8/2017	1.44	
10/4/2017	1.49	
5/23/2018	1.45	
12/4/2018	1.41	
5/23/2019	1.31	
11/7/2019	1.34	
5/19/2020	1.26	
11/12/2020	1.32	
5/19/2021	1.36	
11/18/2021	1.37	
11/9/2022		1.39

Prediction Limit

Constituent: BORON (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

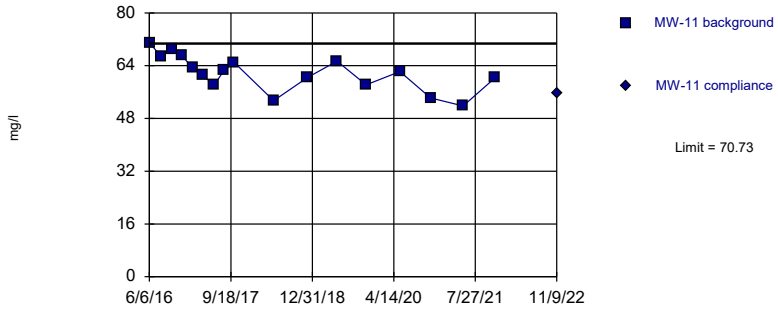
LaCygne Client: SCS Engineers Data: LaC GW Data

	TW-1	TW-1
6/9/2016	1.47	
8/9/2016	1.54	
10/11/2016	1.6	
12/6/2016	1.67	
2/7/2017	1.64	
4/4/2017	1.68	
6/13/2017	1.53	
8/8/2017	1.6	
10/3/2017	1.65	
5/24/2018	1.67	
12/4/2018	1.48	
5/23/2019	1.47	
11/7/2019	1.42	
5/19/2020	1.37	
11/12/2020	1.38	
5/19/2021	1.42	
11/18/2021	1.45	
11/9/2022		1.42

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=61.79, Std. Dev.=5.475, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9742, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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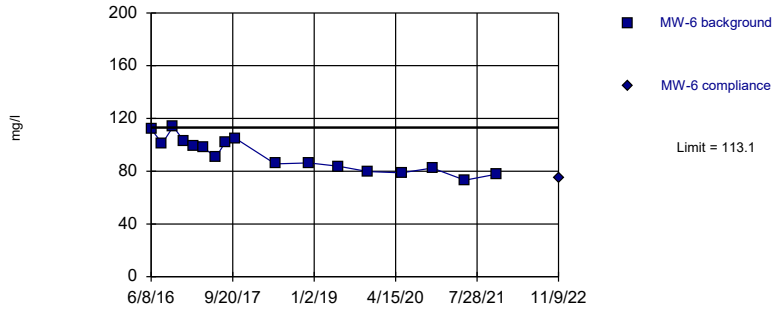
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=92.45, Std. Dev.=12.62, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9427, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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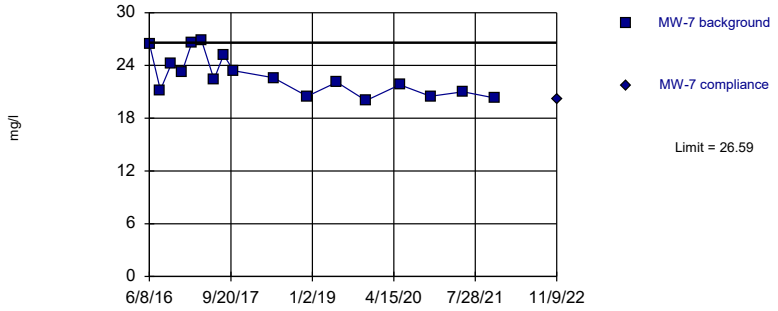
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=22.84, Std. Dev.=2.298, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.906, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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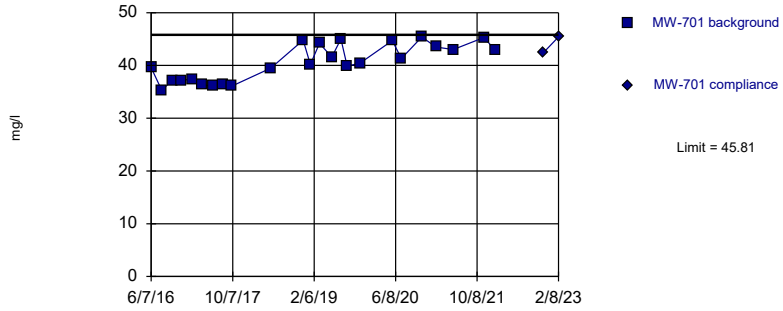
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=40.55, Std. Dev.=3.455, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9111, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11
6/6/2016	71	
8/11/2016	66.9	
10/12/2016	69.2	
12/9/2016	67.1	
2/9/2017	63.4	
4/6/2017	61.1	
6/15/2017	58.2	
8/10/2017	62.6	
10/5/2017	65.1	
5/23/2018	53.4	
12/3/2018	60.4	
5/23/2019	65.4	
11/7/2019	58.2	
5/19/2020	62.2	
11/12/2020	54.2	
5/19/2021	51.8	
11/18/2021	60.3	
11/9/2022		55.5

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-6	MW-6
6/8/2016	112	
8/10/2016	101	
10/13/2016	114	
12/12/2016	103	
2/9/2017	98.8	
4/5/2017	97.9	
6/15/2017	90.5	
8/9/2017	102	
10/5/2017	105	
5/23/2018	85.6	
12/4/2018	86.3	
5/23/2019	83.7	
11/7/2019	79.7	
5/19/2020	78.8	
11/12/2020	82.4	
5/19/2021	73.2	
11/18/2021	77.8	
11/9/2022		75.3

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-7	MW-7
6/8/2016	26.5	
8/10/2016	21.2	
10/13/2016	24.2	
12/12/2016	23.2	
2/8/2017	26.6	
4/5/2017	26.8	
6/15/2017	22.4	
8/9/2017	25.2	
10/5/2017	23.4	
5/23/2018	22.6	
12/4/2018	20.5	
5/23/2019	22.1	
11/7/2019	20	
5/19/2020	21.8	
11/12/2020	20.5	
5/19/2021	21	
11/18/2021	20.3	
11/9/2022		20.2

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

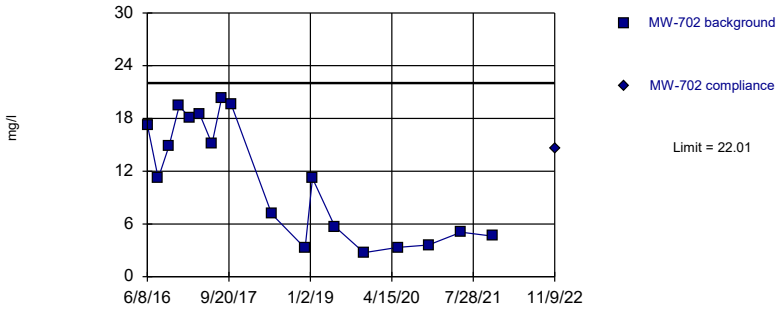
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-701	MW-701	
6/7/2016	39.6		
8/9/2016	35.3		
10/11/2016	37.2		
12/6/2016	37.2		
2/7/2017	37.4		
4/4/2017	36.3		
6/13/2017	36.1		
8/8/2017	36.3		
10/3/2017	36.1		
5/24/2018	39.5		
12/3/2018	44.8		
1/15/2019	40.2		
3/11/2019	44.2		
5/23/2019	41.6		
7/17/2019	45		
8/23/2019	39.9		
11/7/2019	40.4		
5/19/2020	44.7		
7/13/2020	41.3		
11/12/2020	45.4		
2/4/2021	43.5		
5/19/2021	43		
11/18/2021	45.3		
1/27/2022	42.9		
11/9/2022		42.4	
2/8/2023		45.4	extra sample

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=11.17, Std. Dev.=6.731, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8647, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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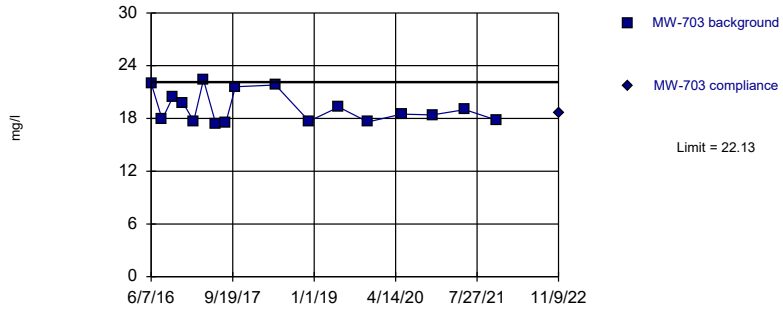
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=19.23, Std. Dev.=1.779, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8523, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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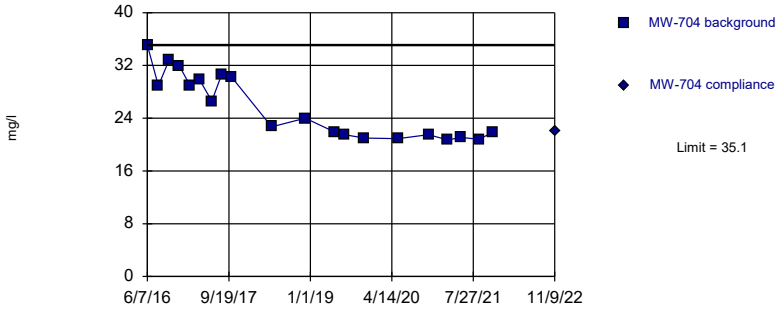
Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 20 background values. Well-constituent pair annual alpha = 0.001125. Individual comparison alpha = 0.0005627 (1 of 3).

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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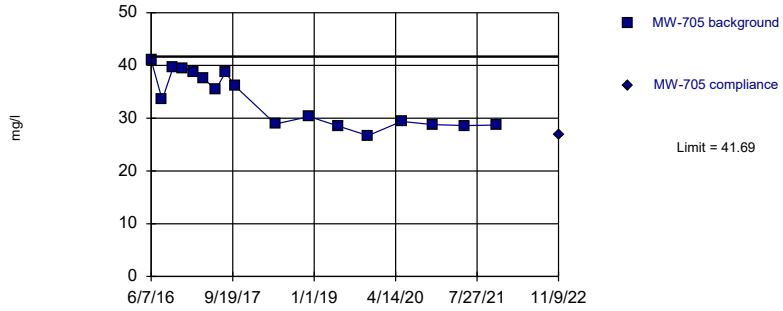
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=33.53, Std. Dev.=4.997, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8701, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702
6/8/2016	17.3	
8/9/2016	11.2	
10/11/2016	14.9	
12/8/2016	19.4	
2/8/2017	18.1	
4/5/2017	18.5	
6/15/2017	15.1	
8/9/2017	20.3	
10/3/2017	19.6	
5/24/2018	7.13	
12/3/2018	3.24	
1/14/2019	11.2	
5/23/2019	5.7	
11/7/2019	2.73	
5/19/2020	3.33	
11/12/2020	3.6	
5/19/2021	5.07	
11/18/2021	4.61	
11/9/2022		14.6

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-703	MW-703
6/7/2016	22	
8/9/2016	17.9	
10/11/2016	20.5	
12/6/2016	19.8	
2/7/2017	17.7	
4/4/2017	22.4	
6/14/2017	17.4	
8/10/2017	17.5	
10/5/2017	21.6	
5/24/2018	21.8	
12/3/2018	17.7	
5/23/2019	19.3	
11/7/2019	17.6	
5/19/2020	18.5	
11/12/2020	18.4	
5/19/2021	19	
11/18/2021	17.8	
11/9/2022		18.6

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-704	MW-704
6/7/2016	35.1	
8/9/2016	28.9	
10/11/2016	32.9	
12/6/2016	32	
2/7/2017	29	
4/4/2017	29.8	
6/13/2017	26.6	
8/8/2017	30.6	
10/3/2017	30.3	
5/24/2018	22.7	
12/3/2018	24	
5/23/2019	21.9	
7/17/2019	21.5	
11/7/2019	21	
5/19/2020	20.9	
8/27/2020	21.8 (i)	
11/12/2020	21.5	
3/3/2021	20.7	
5/19/2021	21.1	
8/30/2021	20.8	
11/18/2021	21.9	
11/9/2022		22

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

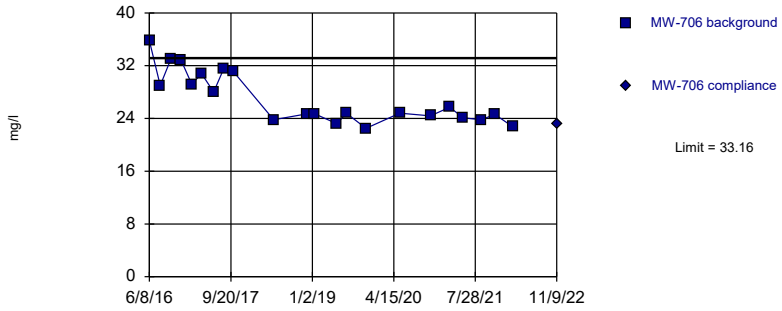
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-705	MW-705
6/7/2016	41	
8/9/2016	33.5	
10/11/2016	39.6	
12/7/2016	39.5	
2/9/2017	38.8	
4/6/2017	37.5	
6/13/2017	35.4	
8/9/2017	38.7	
10/3/2017	36.1	
5/24/2018	28.9	
12/4/2018	30.3	
5/23/2019	28.5	
11/7/2019	26.7	
5/19/2020	29.4	
11/12/2020	28.8	
5/19/2021	28.6	
11/18/2021	28.7	
11/9/2022		26.9

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=27.05, Std. Dev.=3.948, n=22. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8784, critical = 0.878. Kappa = 1.547 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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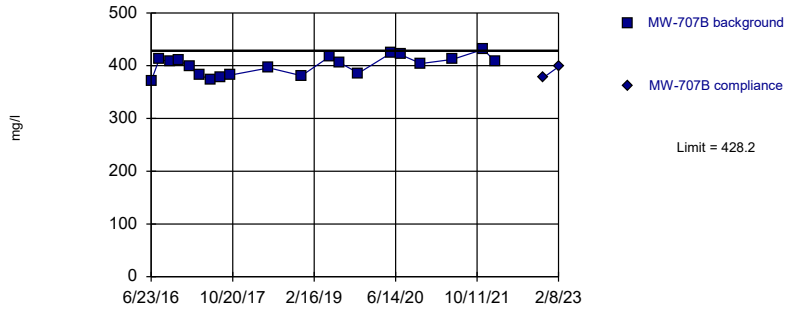
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=400.1, Std. Dev.=17.91, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9475, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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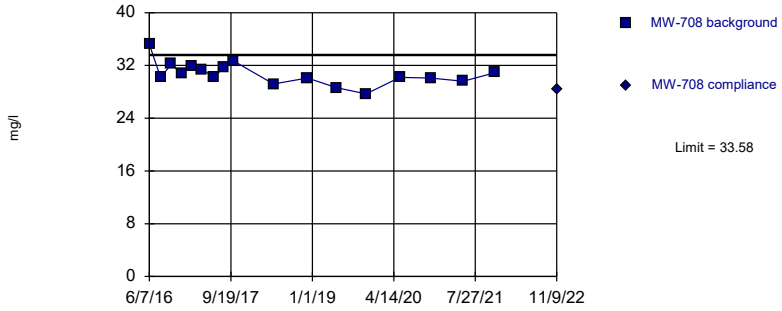
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=30.75, Std. Dev.=1.732, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9526, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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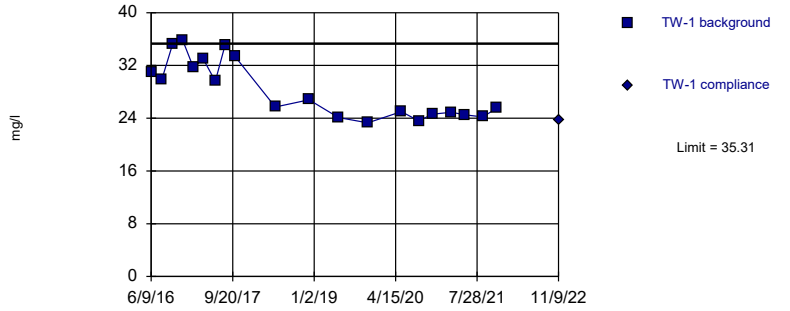
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=28.36, Std. Dev.=4.431, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.868, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706
6/8/2016	35.8	
8/9/2016	29	
10/11/2016	33.1	
12/6/2016	32.9	
2/7/2017	29.2	
4/4/2017	30.8	
6/13/2017	28	
8/9/2017	31.5	
10/4/2017	31.1	
5/24/2018	23.8	
12/4/2018	24.7	
1/15/2019	24.7	
5/23/2019	23.2	
7/17/2019	24.8	
11/7/2019	22.5	
1/14/2020	24.4 (i)	
5/19/2020	24.8	
8/27/2020	23 (i)	
11/12/2020	24.4	
3/3/2021	25.7	
5/19/2021	24.1	
8/30/2021	23.8	
11/18/2021	24.6	
3/3/2022	22.7	
11/9/2022		23.2

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-707B	MW-707B	
6/23/2016	371		
8/9/2016	412		
10/11/2016	408		
12/6/2016	410		
2/7/2017	398		
4/4/2017	382		
6/13/2017	374		
8/8/2017	378		
10/3/2017	382		
5/24/2018	396		
12/4/2018	381		
5/23/2019	418		
7/17/2019	406		
11/7/2019	386		
5/19/2020	424		
7/13/2020	421		
11/12/2020	404		
5/19/2021	412		
11/18/2021	431		
1/27/2022	408		
11/9/2022		377	
2/8/2023		398	extra sample

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-708	MW-708
6/7/2016	35.2	
8/10/2016	30.2	
10/12/2016	32.2	
12/9/2016	30.7	
2/9/2017	32	
4/6/2017	31.4	
6/14/2017	30.2	
8/8/2017	31.7	
10/4/2017	32.7	
5/23/2018	29.2	
12/4/2018	30.1	
5/23/2019	28.6	
11/7/2019	27.7	
1/14/2020	29.5 (i)	
5/19/2020	30.2	
11/12/2020	30.1	
5/19/2021	29.6	
11/18/2021	30.9	
11/9/2022		28.3

Prediction Limit

Constituent: CALCIUM (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

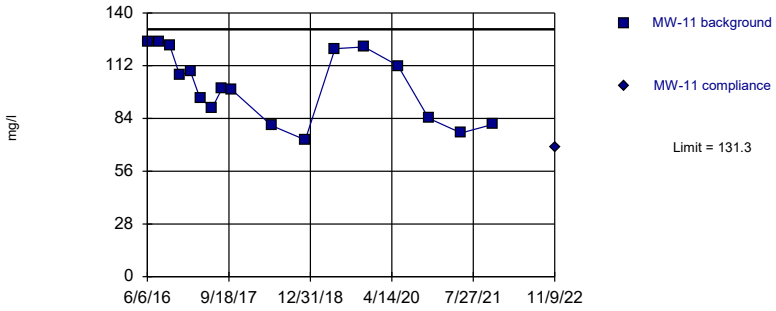
LaCygne Client: SCS Engineers Data: LaC GW Data

	TW-1	TW-1
6/9/2016	31	
8/9/2016	29.9	
10/11/2016	35.3	
12/6/2016	35.9	
2/7/2017	31.7	
4/4/2017	33	
6/13/2017	29.6	
8/8/2017	35.1	
10/3/2017	33.4	
5/24/2018	25.7	
12/4/2018	26.8	
5/23/2019	24.1	
11/7/2019	23.3	
5/19/2020	25	
8/27/2020	23.6	
11/12/2020	24.6	
3/3/2021	24.9	
5/19/2021	24.5	
8/30/2021	24.2	
11/18/2021	25.5	
11/9/2022		23.8

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=101.3, Std. Dev.=18.39, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9172, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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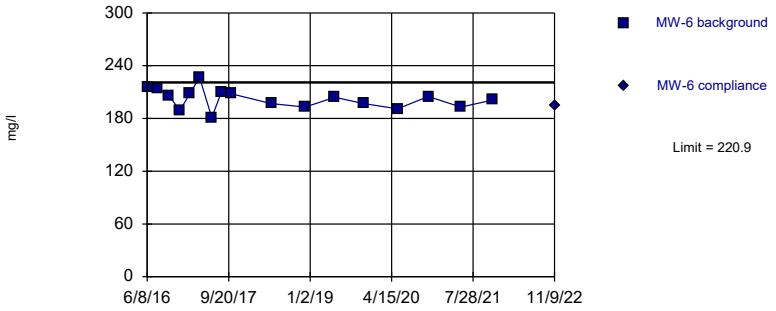
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=202.4, Std. Dev.=11.38, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9867, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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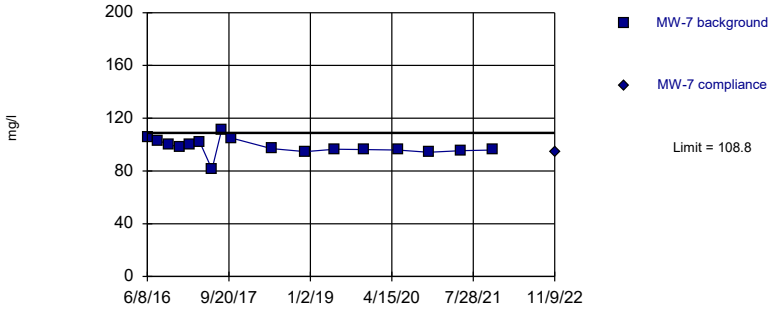
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=98.34, Std. Dev.=6.419, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9125, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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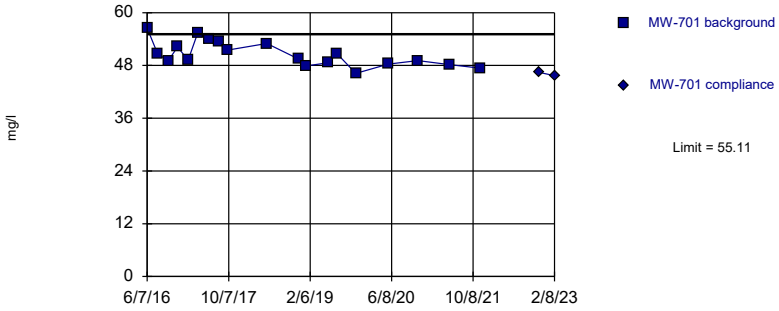
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=50.57, Std. Dev.=2.853, n=19. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9467, critical = 0.863. Kappa = 1.591 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:31 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11
6/6/2016	125	
8/11/2016	125	
10/12/2016	123	
12/9/2016	107	
2/9/2017	109	
4/6/2017	94.5	
6/15/2017	89.7	
8/10/2017	100	
10/5/2017	99.2	
5/23/2018	80.2	
12/3/2018	72.6	
5/23/2019	121	
11/7/2019	122	
5/19/2020	112	
11/12/2020	84.1	
5/19/2021	76.3	
11/18/2021	80.9	
11/9/2022		68.5

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-6	MW-6
6/8/2016	216	
8/10/2016	214	
10/13/2016	206	
12/12/2016	189	
2/9/2017	208	
4/5/2017	227	
6/15/2017	181	
8/9/2017	210	
10/5/2017	208	
5/23/2018	197	
12/4/2018	193	
5/23/2019	204	
11/7/2019	197	
5/19/2020	191	
11/12/2020	205	
5/19/2021	193	
11/18/2021	201	
11/9/2022		195

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-7	MW-7
6/8/2016	106	
8/10/2016	103	
10/13/2016	99.9	
12/12/2016	98	
2/8/2017	100	
4/5/2017	102	
6/15/2017	81.2	
8/9/2017	111	
10/5/2017	105	
5/23/2018	96.9	
12/4/2018	94.6	
5/23/2019	96.5	
11/7/2019	96.2	
5/19/2020	95.9	
11/12/2020	94.2	
5/19/2021	95.4	
11/18/2021	95.9	
11/9/2022		94.7

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

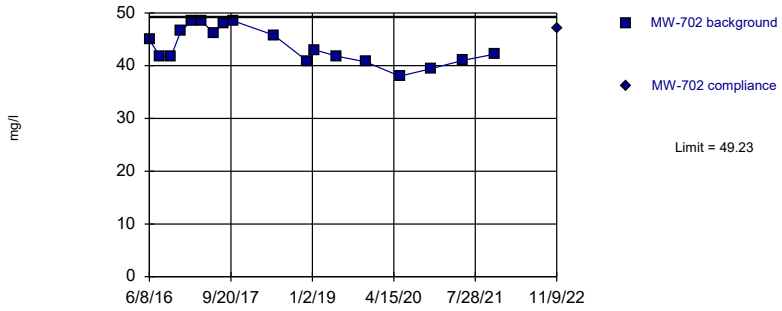
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-701	MW-701	
6/7/2016	56.5		
8/9/2016	50.6		
10/11/2016	49.1		
12/6/2016	52.2		
2/7/2017	49.2		
4/4/2017	55.3		
6/13/2017	54.1		
8/8/2017	53.5		
10/3/2017	51.5		
5/24/2018	53		
12/3/2018	49.4		
1/15/2019	47.9		
5/23/2019	48.6		
7/17/2019	50.7		
11/7/2019	46.2		
5/19/2020	48.3		
11/12/2020	49.1		
5/19/2021	48.2		
11/18/2021	47.4		
11/9/2022		46.4	
2/8/2023		45.7	extra sample

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=43.75, Std. Dev.=3.402, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9167, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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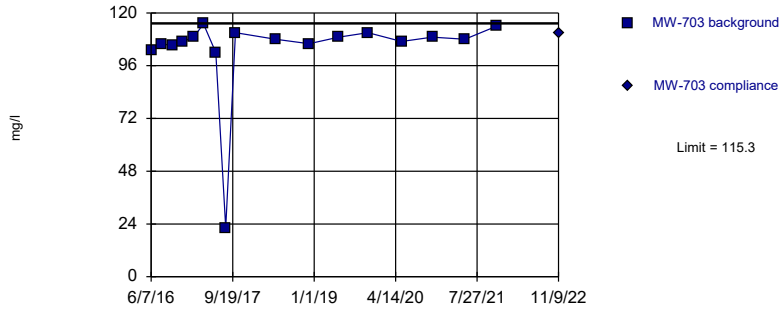
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary (based on x^6 transformation): Mean=1.5e12, Std. Dev.=5.0e11, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.857, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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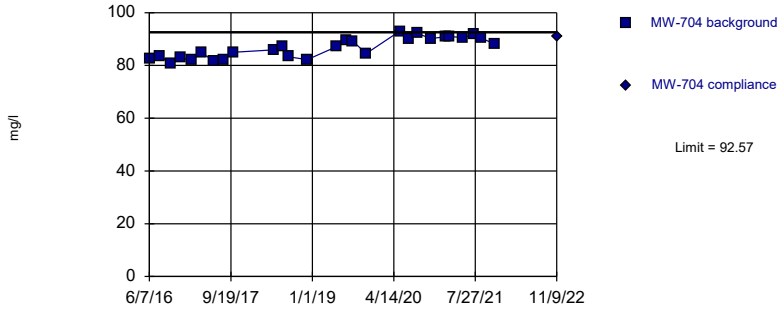
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=86.76, Std. Dev.=3.878, n=27. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9132, critical = 0.894. Kappa = 1.498 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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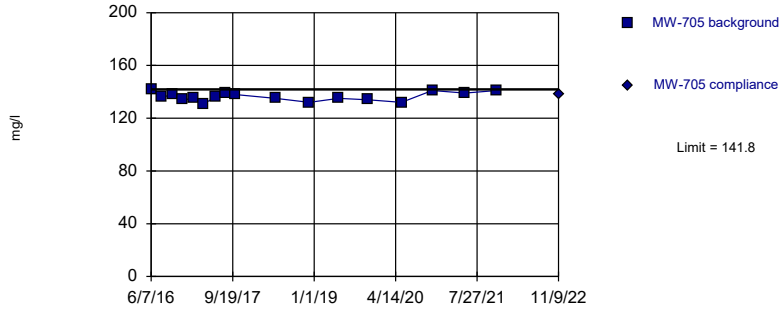
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=136.4, Std. Dev.=3.334, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9557, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702
6/8/2016	44.9	
8/9/2016	41.7	
10/11/2016	41.8	
12/8/2016	46.7	
2/8/2017	48.4	
4/5/2017	48.4	
6/15/2017	46.2	
8/9/2017	48.1	
10/3/2017	48.5	
5/24/2018	45.8	
12/3/2018	40.9	
1/14/2019	43	
5/23/2019	41.8	
11/7/2019	40.7	
5/19/2020	38	
11/12/2020	39.4	
5/19/2021	41	
11/18/2021	42.2	
11/9/2022		47.2

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-703	MW-703
6/7/2016	103	
8/9/2016	106	
10/11/2016	105	
12/6/2016	107	
2/7/2017	109	
4/4/2017	115	
6/14/2017	102	
8/10/2017	22.3	
10/5/2017	111	
5/24/2018	108	
12/3/2018	106	
5/23/2019	109	
11/7/2019	111	
5/19/2020	107	
11/12/2020	109	
5/19/2021	108	
11/18/2021	114	
11/9/2022		111

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-704	MW-704
6/7/2016	82.5	
8/9/2016	83.4	
10/11/2016	80.8	
12/6/2016	82.9	
2/7/2017	82	
4/4/2017	84.7	
6/13/2017	81.8	
8/8/2017	82.1	
10/3/2017	85	
5/24/2018	85.9	
7/11/2018	87.1	
8/16/2018	83.3	
12/3/2018	82.2	
5/23/2019	87.2	
7/17/2019	89.7	
8/23/2019	89.2	
11/7/2019	84.5	
5/19/2020	93	
7/13/2020	90.1	
8/27/2020	92.2	
11/12/2020	90.2	
2/4/2021	90.8	
3/3/2021	91	
5/19/2021	90.5	
7/21/2021	91.9	
8/30/2021	90.4	
11/18/2021	88.1	
11/9/2022		91.1

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

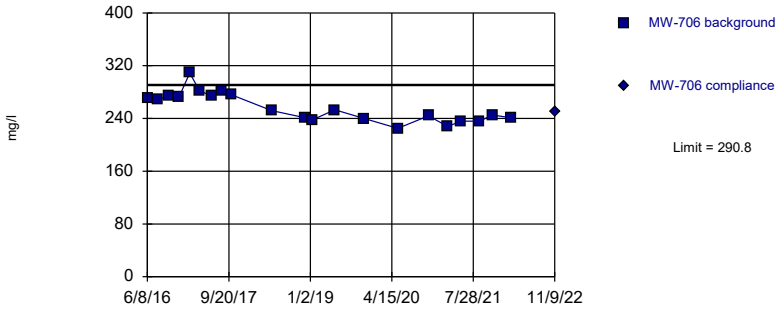
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-705	MW-705
6/7/2016	142	
8/9/2016	136	
10/11/2016	138	
12/7/2016	134	
2/9/2017	135	
4/6/2017	131	
6/13/2017	136	
8/9/2017	139	
10/3/2017	138	
5/24/2018	135	
12/4/2018	132	
5/23/2019	135	
11/7/2019	134	
5/19/2020	132	
11/12/2020	141	
5/19/2021	139	
11/18/2021	141	
11/9/2022		138

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=256.5, Std. Dev.=22.01, n=21. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9274, critical = 0.873. Kappa = 1.558 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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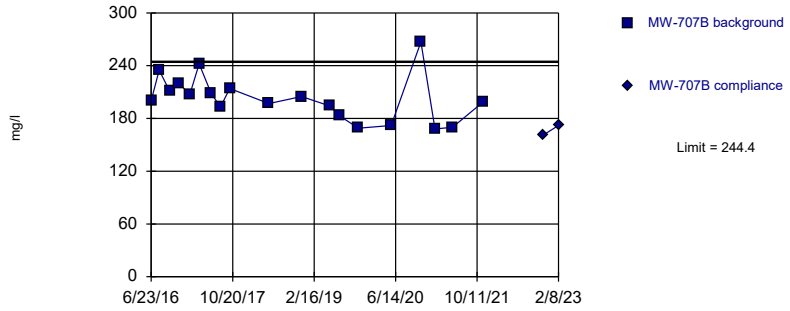
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=202.9, Std. Dev.=26.08, n=19. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9401, critical = 0.863. Kappa = 1.591 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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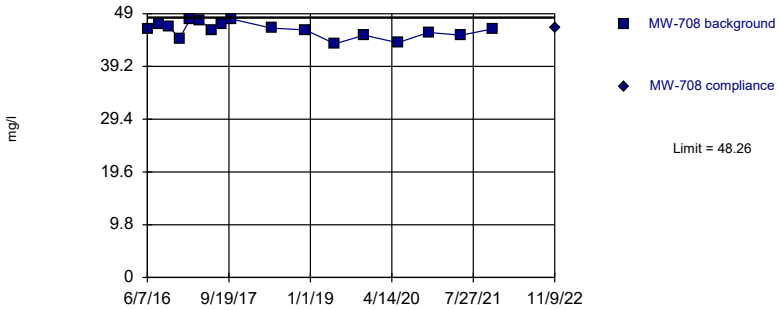
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=45.99, Std. Dev.=1.389, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9543, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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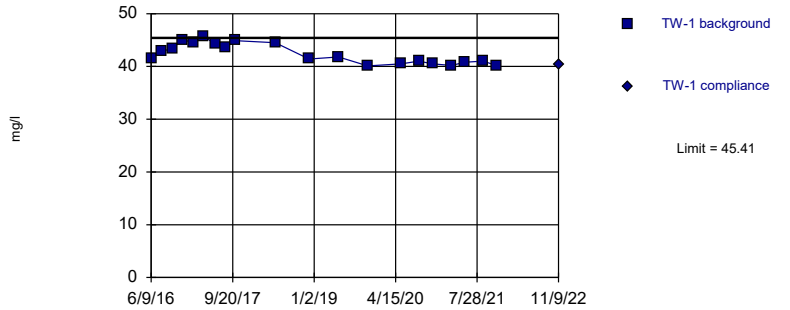
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=42.39, Std. Dev.=1.922, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8888, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706
6/8/2016	270	
8/9/2016	269	
10/11/2016	274	
12/6/2016	272	
2/7/2017	309	
4/4/2017	282	
6/13/2017	274	
8/9/2017	282	
10/4/2017	276	
5/24/2018	252	
12/4/2018	241	
1/15/2019	238	
5/23/2019	253	
11/7/2019	240	
1/14/2020	247 (i)	
5/19/2020	225	
8/27/2020	238 (i)	
11/12/2020	244	
3/3/2021	228	
5/19/2021	236	
8/30/2021	236	
11/18/2021	245	
3/3/2022	241	
11/9/2022		250

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-707B	MW-707B	
6/23/2016	200		
8/9/2016	235		
10/11/2016	211		
12/6/2016	220		
2/7/2017	207		
4/4/2017	242		
6/13/2017	209		
8/8/2017	193		
10/3/2017	214		
5/24/2018	197		
12/4/2018	205		
5/23/2019	194		
7/17/2019	183		
11/7/2019	169		
5/19/2020	172		
11/12/2020	267		
2/4/2021	168		
5/19/2021	170		
11/18/2021	199		
11/9/2022		161	
2/8/2023		172	extra sample

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-708	MW-708
6/7/2016	46.2	
8/10/2016	47	
10/12/2016	46.5	
12/9/2016	44.4	
2/9/2017	48	
4/6/2017	47.7	
6/14/2017	46	
8/8/2017	47.1	
10/4/2017	48	
5/23/2018	46.3	
12/4/2018	46	
5/23/2019	43.4	
11/7/2019	45	
1/14/2020	46 (i)	
5/19/2020	43.6	
11/12/2020	45.5	
5/19/2021	45	
11/18/2021	46.2	
11/9/2022		46.4

Prediction Limit

Constituent: CHLORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

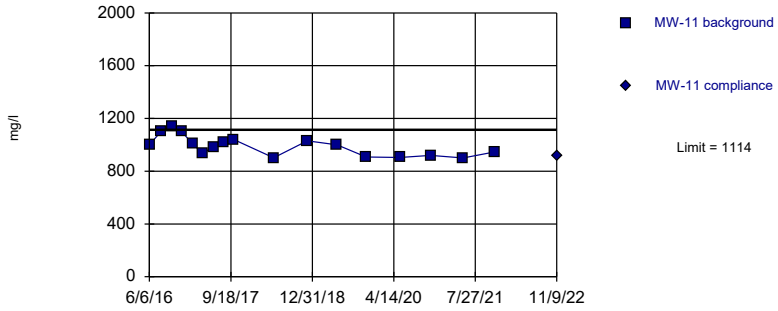
LaCygne Client: SCS Engineers Data: LaC GW Data

	TW-1	TW-1
6/9/2016	41.5	
8/9/2016	42.9	
10/11/2016	43.4	
12/6/2016	45.1	
2/7/2017	44.5	
4/4/2017	45.7	
6/13/2017	44.3	
8/8/2017	43.5	
10/3/2017	44.9	
5/24/2018	44.5	
12/4/2018	41.4	
5/23/2019	41.8	
11/7/2019	40.1	
5/19/2020	40.5	
8/27/2020	41	
11/12/2020	40.5	
3/3/2021	40.2	
5/19/2021	40.8	
8/30/2021	41	
11/18/2021	40.2	
11/9/2022		40.3

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=990.7, Std. Dev.=75.76, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.923, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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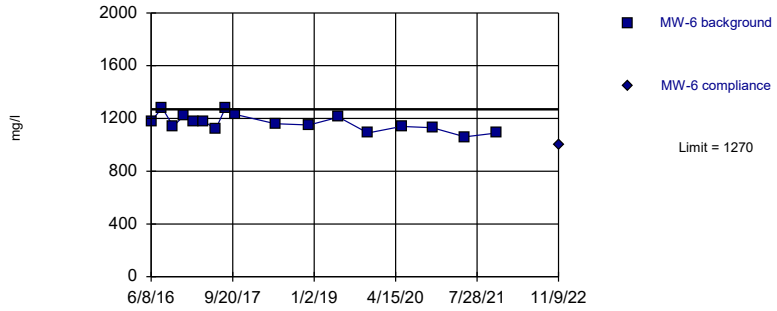
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1167, Std. Dev.=62.93, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9671, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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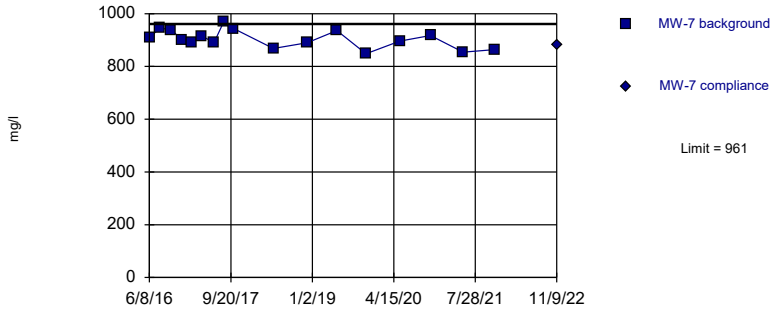
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=904.5, Std. Dev.=34.62, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9698, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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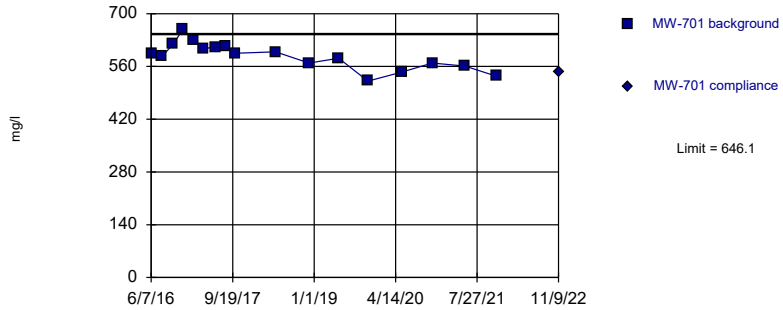
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=588.1, Std. Dev.=35.56, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9858, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11
6/6/2016	1000	
8/11/2016	1100	
10/12/2016	1140	
12/9/2016	1100	
2/9/2017	1010	
4/6/2017	938	
6/15/2017	984	
8/10/2017	1020	
10/5/2017	1040	
5/23/2018	902	
12/3/2018	1030	
5/23/2019	1000	
11/7/2019	908	
5/19/2020	904	
11/12/2020	920	
5/19/2021	900	
11/18/2021	946	
11/9/2022		918

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-6	MW-6
6/8/2016	1180	
8/10/2016	1280	
10/13/2016	1140	
12/12/2016	1220	
2/9/2017	1180	
4/5/2017	1180	
6/15/2017	1120	
8/9/2017	1280	
10/5/2017	1230	
5/23/2018	1160	
12/4/2018	1150	
5/23/2019	1210	
11/7/2019	1090	
5/19/2020	1140	
11/12/2020	1130	
5/19/2021	1060	
11/18/2021	1090	
11/9/2022		1000

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-7	MW-7
6/8/2016	910	
8/10/2016	946	
10/13/2016	938	
12/12/2016	902	
2/8/2017	890	
4/5/2017	916	
6/15/2017	890	
8/9/2017	968	
10/5/2017	944	
5/23/2018	868	
12/4/2018	890	
5/23/2019	936	
11/7/2019	848	
5/19/2020	896	
11/12/2020	917	
5/19/2021	854	
11/18/2021	864	
11/9/2022		882

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

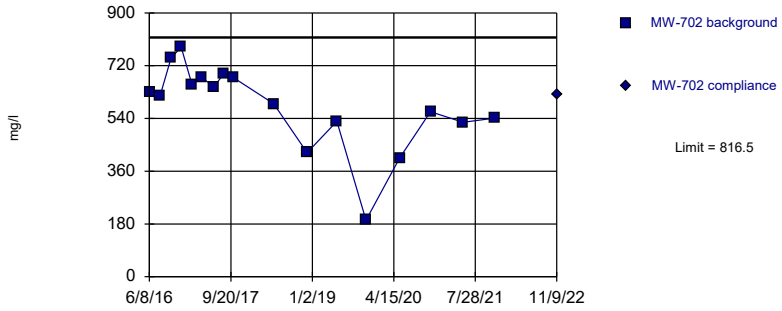
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-701	MW-701
6/7/2016	595	
8/9/2016	587	
10/11/2016	619	
12/6/2016	658	
2/7/2017	631	
4/4/2017	607	
6/13/2017	612	
8/8/2017	613	
10/3/2017	595	
5/24/2018	599	
12/3/2018	569	
5/23/2019	582	
11/7/2019	521	
5/19/2020	545	
11/12/2020	569	
5/19/2021	561	
11/18/2021	534	
11/9/2022		545

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=582.8, Std. Dev.=143.2, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9117, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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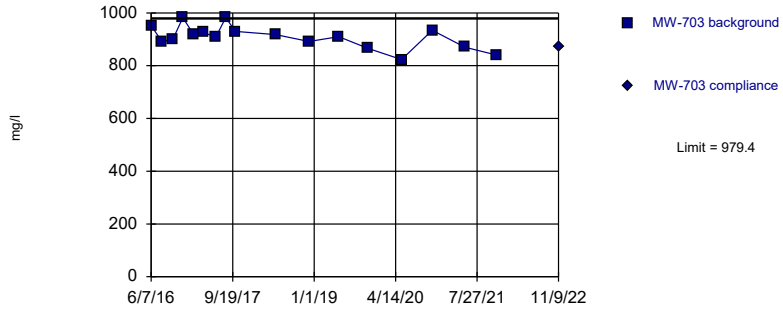
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=908.4, Std. Dev.=43.48, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9715, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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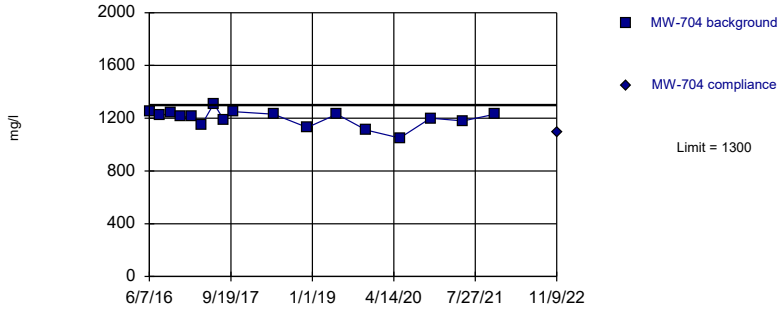
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1199, Std. Dev.=61.49, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.936, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

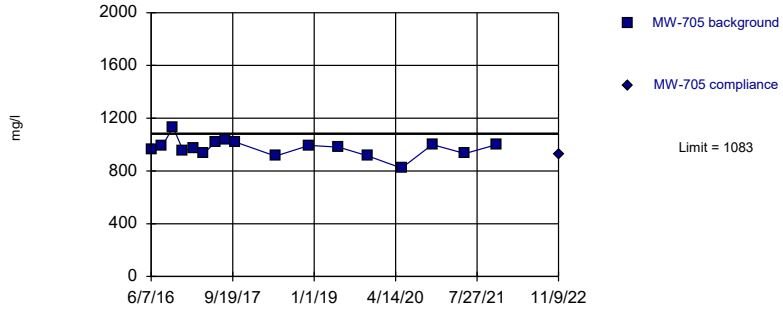
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=974.9, Std. Dev.=65.95, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9542, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702
6/8/2016	629	
8/9/2016	619	
10/11/2016	747	
12/8/2016	783	
2/8/2017	657	
4/5/2017	680	
6/15/2017	648	
8/9/2017	692	
10/3/2017	680	
5/24/2018	590	
12/3/2018	423	
5/23/2019	530	
11/7/2019	193	
5/19/2020	406	
11/12/2020	563	
5/19/2021	527	
11/18/2021	541	
11/9/2022		620

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-703	MW-703
6/7/2016	952	
8/9/2016	890	
10/11/2016	902	
12/6/2016	982	
2/7/2017	918	
4/4/2017	926	
6/14/2017	908	
8/10/2017	982	
10/5/2017	930	
5/24/2018	918	
12/3/2018	892	
5/23/2019	910	
11/7/2019	866	
5/19/2020	823	
11/12/2020	934	
5/19/2021	870	
11/18/2021	840	
11/9/2022		870

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-704	MW-704
6/7/2016	1250	
8/9/2016	1220	
10/11/2016	1240	
12/6/2016	1210	
2/7/2017	1210	
4/4/2017	1150	
6/13/2017	1310	
8/8/2017	1190	
10/3/2017	1250	
5/24/2018	1230	
12/3/2018	1130	
5/23/2019	1230	
11/7/2019	1110	
5/19/2020	1050	
11/12/2020	1200	
5/19/2021	1180	
11/18/2021	1230	
11/9/2022		1090

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

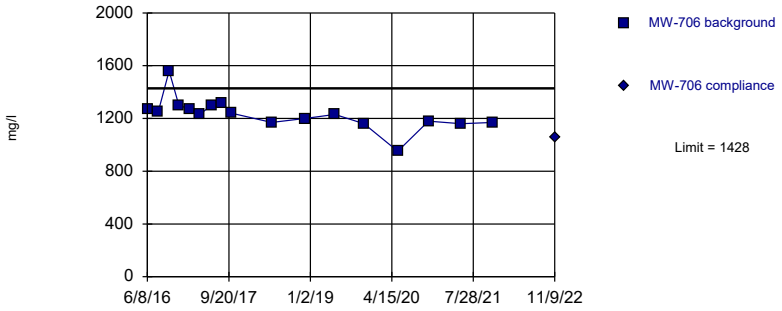
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-705	MW-705
6/7/2016	960	
8/9/2016	992	
10/11/2016	1130	
12/7/2016	958	
2/9/2017	968	
4/6/2017	932	
6/13/2017	1020	
8/9/2017	1040	
10/3/2017	1020	
5/24/2018	912	
12/4/2018	994	
5/23/2019	980	
11/7/2019	914	
5/19/2020	822	
11/12/2020	1000	
5/19/2021	932	
11/18/2021	1000	
11/9/2022		930

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1233, Std. Dev.=119.4, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8686, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

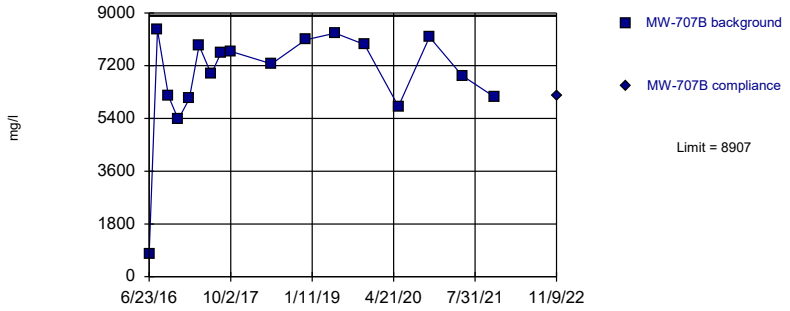
Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary (based on square transformation): Mean=4.9e7, Std. Dev.=1.8e7, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9023, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

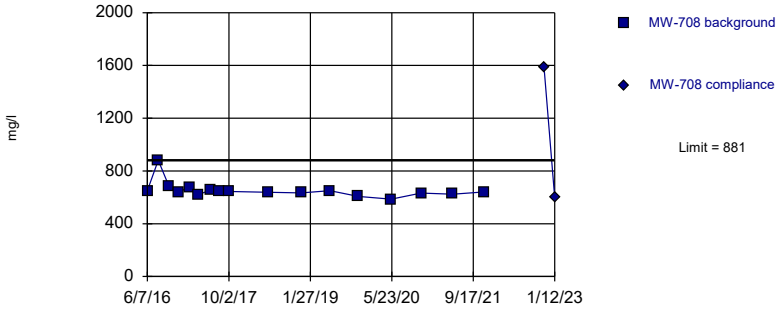
Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 17 background values. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

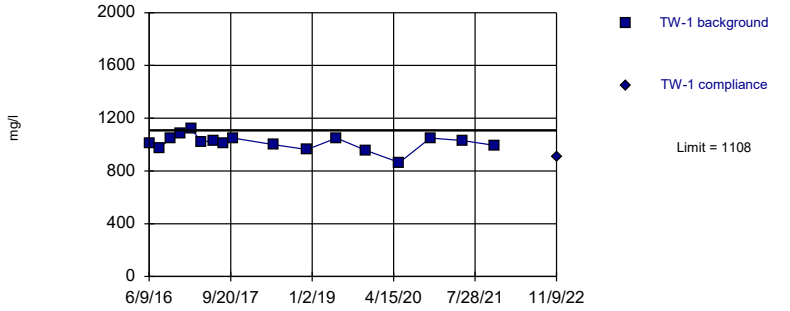
Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1015, Std. Dev.=56.98, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9408, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706
6/8/2016	1270	
8/9/2016	1250	
10/11/2016	1560	
12/6/2016	1300	
2/7/2017	1270	
4/4/2017	1230	
6/13/2017	1300	
8/9/2017	1320	
10/4/2017	1240	
5/24/2018	1170	
12/4/2018	1200	
5/23/2019	1230	
11/7/2019	1160	
5/19/2020	952	
11/12/2020	1180	
5/19/2021	1160	
11/18/2021	1170	
11/9/2022		1060

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-707B	MW-707B
6/23/2016	770	
8/9/2016	8420	
10/11/2016	6160	
12/6/2016	5370	
2/7/2017	6070	
4/4/2017	7890	
6/13/2017	6910	
8/8/2017	7640	
10/3/2017	7690	
5/24/2018	7260	
12/4/2018	8080	
5/23/2019	8310	
11/7/2019	7920	
5/19/2020	5810	
11/12/2020	8180	
5/19/2021	6860	
11/18/2021	6140	
11/9/2022		6160

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-708	MW-708	
6/7/2016	651		
8/10/2016	881		
10/12/2016	684		
12/9/2016	639		
2/9/2017	679		
4/6/2017	623		
6/14/2017	653		
8/8/2017	649		
10/4/2017	645		
5/23/2018	639		
12/4/2018	633		
5/23/2019	651		
11/7/2019	607		
5/19/2020	586		
11/12/2020	632		
5/19/2021	624		
11/18/2021	641		
11/9/2022		1590	
1/12/2023		597	1st verification

Prediction Limit

Constituent: DISSOLVED SOLIDS (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

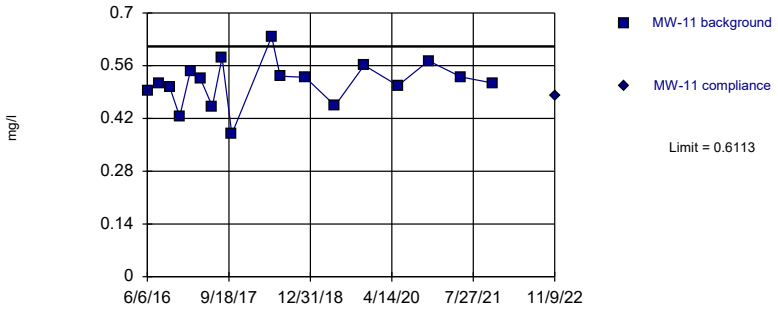
LaCygne Client: SCS Engineers Data: LaC GW Data

	TW-1	TW-1
6/9/2016	1010	
8/9/2016	976	
10/11/2016	1050	
12/6/2016	1080	
2/7/2017	1120	
4/4/2017	1020	
6/13/2017	1030	
8/8/2017	1010	
10/3/2017	1050	
5/24/2018	1000	
12/4/2018	962	
5/23/2019	1050	
11/7/2019	956	
5/19/2020	864	
11/12/2020	1050	
5/19/2021	1030	
11/18/2021	994	
11/9/2022		908

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.5143, Std. Dev.=0.06021, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9697, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

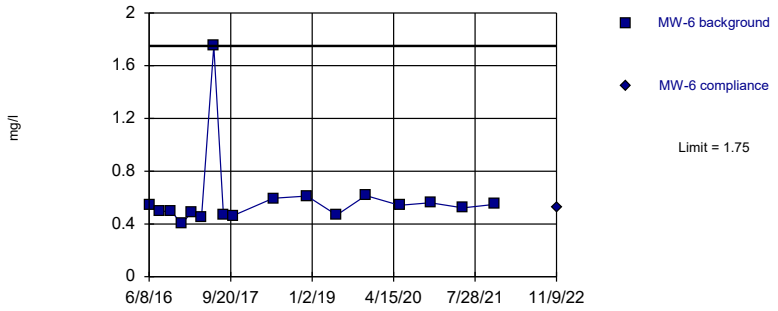
Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 17 background values. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

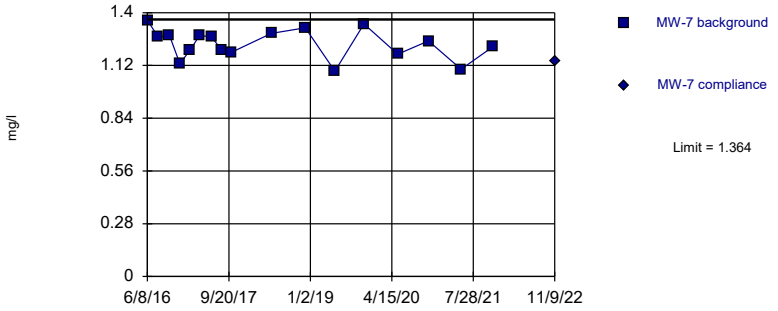
Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.234, Std. Dev.=0.07968, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9599, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

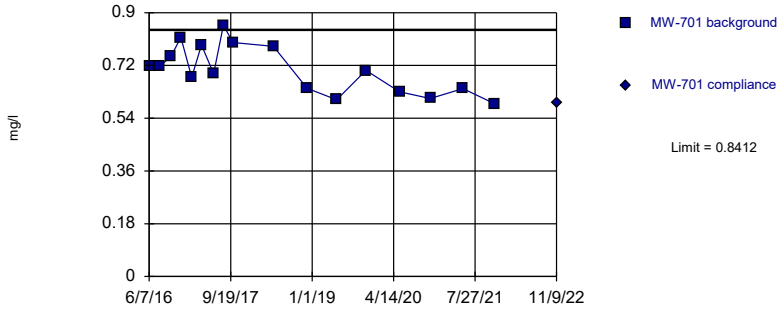
Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.707, Std. Dev.=0.08219, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9534, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11
6/6/2016	0.493	
8/11/2016	0.512	
10/12/2016	0.504	
12/9/2016	0.425	
2/9/2017	0.546	
4/6/2017	0.527	
6/15/2017	0.452	
8/10/2017	0.582	
10/5/2017	0.379	
5/23/2018	0.637	
7/11/2018	0.532	
12/3/2018	0.529	
5/23/2019	0.454	
11/7/2019	0.561	
5/19/2020	0.507	
11/12/2020	0.573	
5/19/2021	0.53	
11/18/2021	0.514	
11/9/2022		0.479

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-6	MW-6
6/8/2016	0.545	
8/10/2016	0.495	
10/13/2016	0.497	
12/12/2016	0.401	
2/9/2017	0.492	
4/5/2017	0.447	
6/15/2017	1.75	
8/9/2017	0.473	
10/5/2017	0.464	
5/23/2018	0.595	
12/4/2018	0.612	
5/23/2019	0.467	
11/7/2019	0.615	
5/19/2020	0.541	
11/12/2020	0.561	
5/19/2021	0.522	
11/18/2021	0.549	
11/9/2022		0.525

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-7	MW-7
6/8/2016	1.36	
8/10/2016	1.27	
10/13/2016	1.28	
12/12/2016	1.13	
2/8/2017	1.2	
4/5/2017	1.28	
6/15/2017	1.27	
8/9/2017	1.2	
10/5/2017	1.19	
5/23/2018	1.29	
12/4/2018	1.32	
5/23/2019	1.09	
11/7/2019	1.34	
5/19/2020	1.18	
11/12/2020	1.25	
5/19/2021	1.1	
11/18/2021	1.22	
11/9/2022		1.14

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

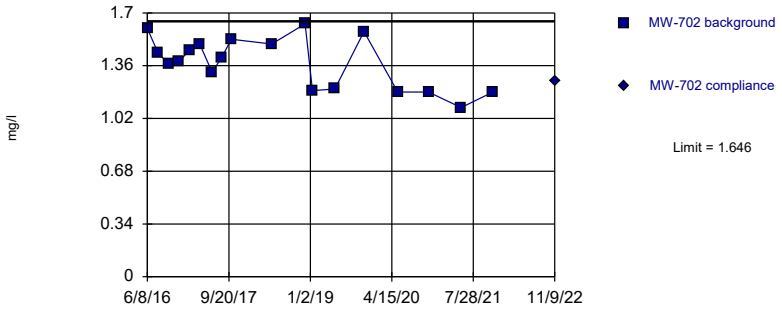
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-701	MW-701
6/7/2016	0.717	
8/9/2016	0.719	
10/11/2016	0.751	
12/6/2016	0.816	
2/7/2017	0.679	
4/4/2017	0.79	
6/13/2017	0.692	
8/8/2017	0.857	
10/3/2017	0.798	
5/24/2018	0.785	
12/3/2018	0.642	
5/23/2019	0.603	
11/7/2019	0.703	
5/19/2020	0.63	
11/12/2020	0.607	
5/19/2021	0.641	
11/18/2021	0.589	
11/9/2022		0.594

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.378, Std. Dev.=0.1664, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9358, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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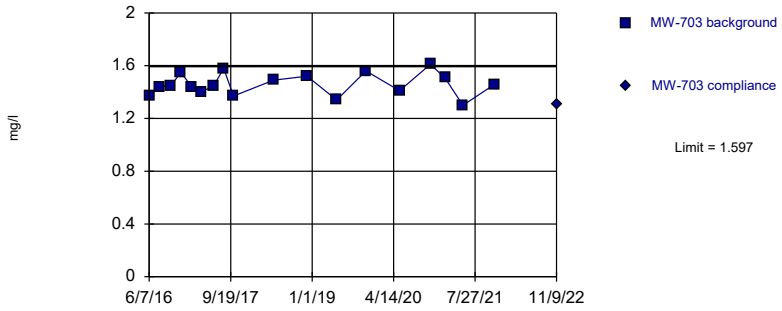
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.458, Std. Dev.=0.08583, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9821, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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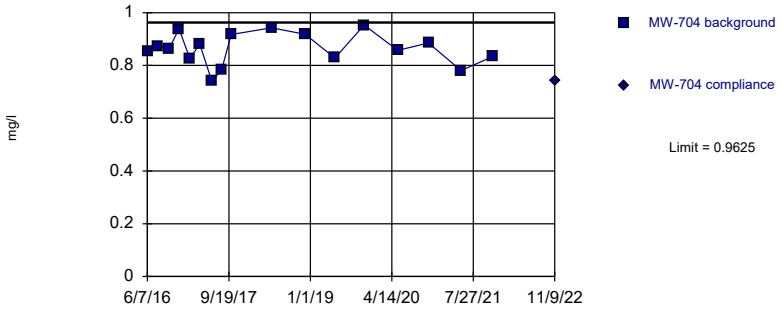
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.8633, Std. Dev.=0.06078, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9661, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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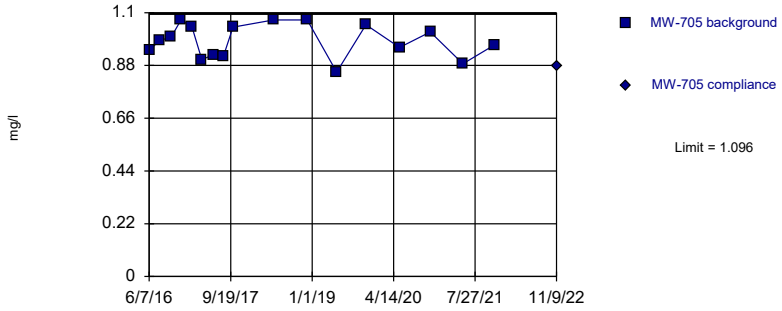
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.9821, Std. Dev.=0.06972, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9382, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702
6/8/2016	1.6	
8/9/2016	1.44	
10/11/2016	1.37	
12/8/2016	1.39	
2/8/2017	1.46	
4/5/2017	1.5	
6/15/2017	1.32	
8/9/2017	1.41	
10/3/2017	1.53	
5/24/2018	1.5	
12/3/2018	1.63	
1/14/2019	1.2	
5/23/2019	1.21	
11/7/2019	1.58	
5/19/2020	1.19	
11/12/2020	1.19	
5/19/2021	1.09	
11/18/2021	1.19	
11/9/2022		1.26

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-703	MW-703
6/7/2016	1.37	
8/9/2016	1.44	
10/11/2016	1.45	
12/6/2016	1.55	
2/7/2017	1.44	
4/4/2017	1.4	
6/14/2017	1.45	
8/10/2017	1.58	
10/5/2017	1.37	
5/24/2018	1.49	
12/3/2018	1.52	
5/23/2019	1.34	
11/7/2019	1.56	
5/19/2020	1.41	
11/12/2020	1.61	
2/4/2021	1.51	
5/19/2021	1.3	
11/18/2021	1.46	
11/9/2022		1.31

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-704	MW-704
6/7/2016	0.852	
8/9/2016	0.874	
10/11/2016	0.865	
12/6/2016	0.939	
2/7/2017	0.825	
4/4/2017	0.882	
6/13/2017	0.74	
8/8/2017	0.783	
10/3/2017	0.917	
5/24/2018	0.943	
12/3/2018	0.918	
5/23/2019	0.828	
11/7/2019	0.953	
5/19/2020	0.857	
11/12/2020	0.885	
5/19/2021	0.781	
11/18/2021	0.834	
11/9/2022		0.742

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

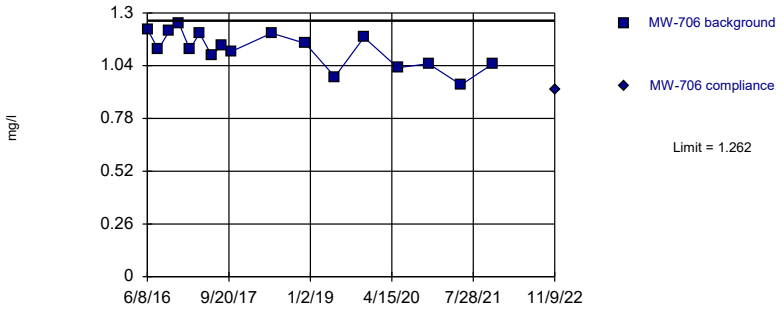
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-705	MW-705
6/7/2016	0.944	
8/9/2016	0.985	
10/11/2016	0.998	
12/7/2016	1.07	
2/9/2017	1.04	
4/6/2017	0.905	
6/13/2017	0.924	
8/9/2017	0.92	
10/3/2017	1.04	
5/24/2018	1.07	
12/4/2018	1.07	
5/23/2019	0.852	
11/7/2019	1.05	
5/19/2020	0.955	
11/12/2020	1.02	
5/19/2021	0.887	
11/18/2021	0.966	
11/9/2022		0.878

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.121, Std. Dev.=0.08664, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9623, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

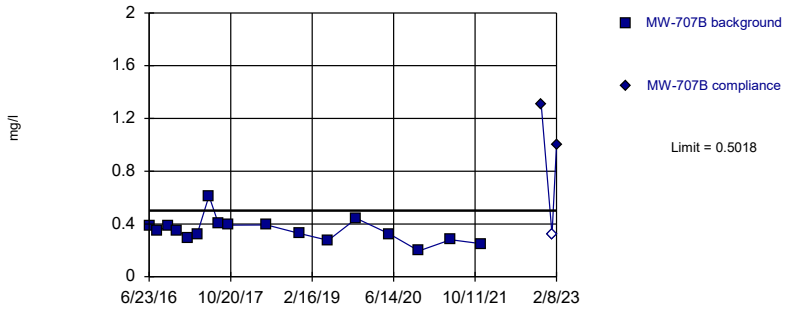
LaCygne Client: SCS Engineers Data: LaC GW Data

Hollow symbols indicate censored values.

Exceeds Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.3518, Std. Dev.=0.09189, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.912, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

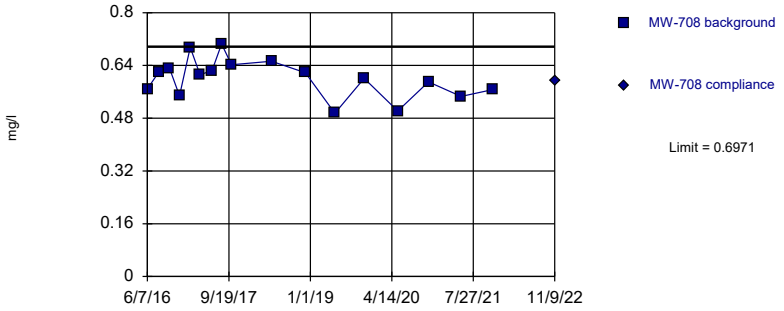
Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.6011, Std. Dev.=0.05886, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9716, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

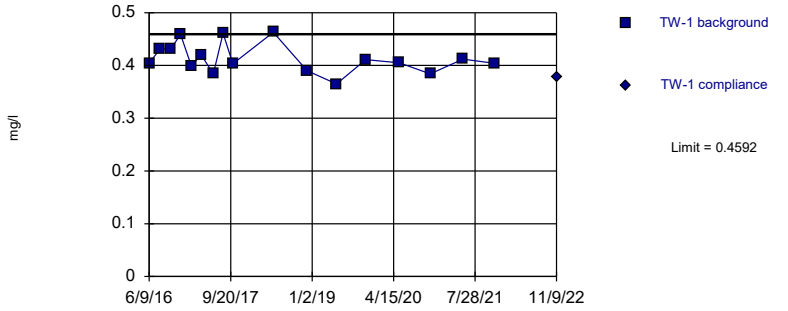
Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.4133, Std. Dev.=0.02813, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9332, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706
6/8/2016	1.22	
8/9/2016	1.12	
10/11/2016	1.21	
12/6/2016	1.25	
2/7/2017	1.12	
4/4/2017	1.2	
6/13/2017	1.09	
8/9/2017	1.14	
10/4/2017	1.11	
5/24/2018	1.2	
12/4/2018	1.15	
5/23/2019	0.985	
11/7/2019	1.18	
5/19/2020	1.03	
11/12/2020	1.05	
5/19/2021	0.946	
11/18/2021	1.05	
11/9/2022		0.923

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-707B	MW-707B	
6/23/2016	0.386		
8/9/2016	0.347		
10/11/2016	0.382		
12/6/2016	0.353		
2/7/2017	0.293		
4/4/2017	0.323		
6/13/2017	0.613		
8/8/2017	0.402		
10/3/2017	0.391		
5/24/2018	0.392		
12/4/2018	0.328		
5/23/2019	0.276		
11/7/2019	0.442		
5/19/2020	0.325		
11/12/2020	0.196		
5/19/2021	0.281		
11/18/2021	0.25		
11/9/2022		1.31 (j)	estimated value
1/12/2023		<0.64 (M)	1st verification (MDL)
2/8/2023		1 (E)	2nd verification Eurofins

ND substitution: RL/2.

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-708	MW-708
6/7/2016	0.569	
8/10/2016	0.619	
10/12/2016	0.632	
12/9/2016	0.548	
2/9/2017	0.695	
4/6/2017	0.612	
6/14/2017	0.624	
8/8/2017	0.705	
10/4/2017	0.642	
5/23/2018	0.653	
12/4/2018	0.618	
5/23/2019	0.495	
11/7/2019	0.601	
5/19/2020	0.502	
11/12/2020	0.59	
5/19/2021	0.546	
11/18/2021	0.567	
11/9/2022		0.595

Prediction Limit

Constituent: FLUORIDE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

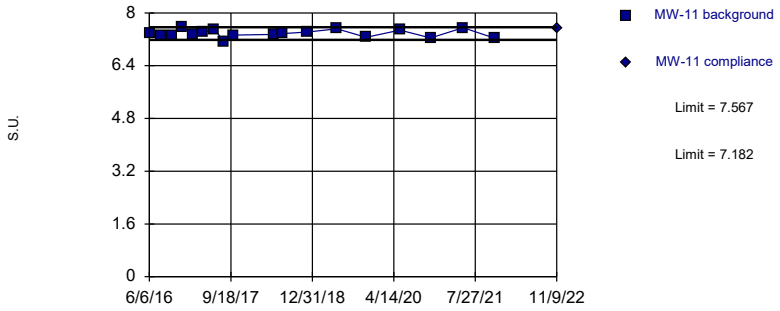
LaCygne Client: SCS Engineers Data: LaC GW Data

	TW-1	TW-1
6/9/2016	0.404	
8/9/2016	0.431	
10/11/2016	0.431	
12/6/2016	0.459	
2/7/2017	0.399	
4/4/2017	0.42	
6/13/2017	0.384	
8/8/2017	0.461	
10/3/2017	0.403	
5/24/2018	0.463	
12/4/2018	0.39	
5/23/2019	0.365	
11/7/2019	0.411	
5/19/2020	0.405	
11/12/2020	0.384	
5/19/2021	0.412	
11/18/2021	0.404	
11/9/2022		0.377

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.374, Std. Dev.=0.1193, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9783, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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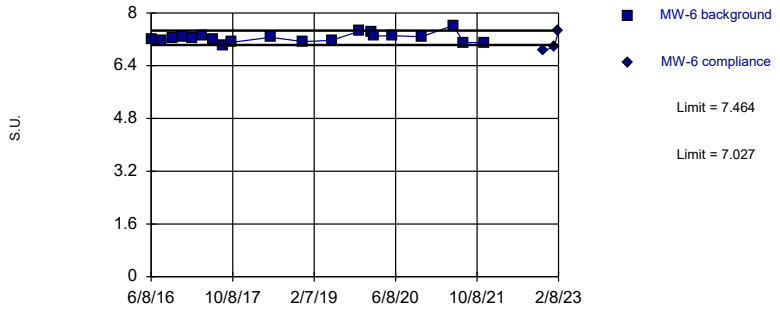
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.246, Std. Dev.=0.1392, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9364, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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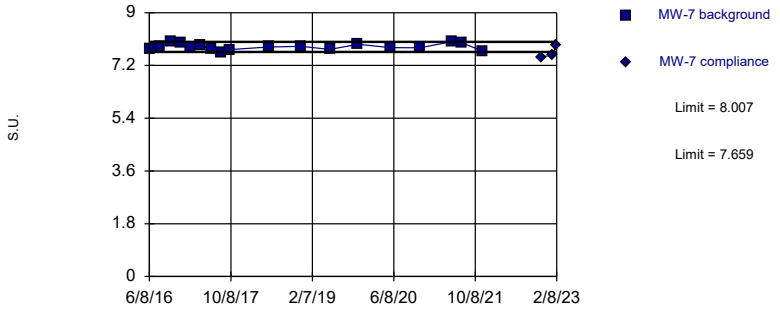
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.833, Std. Dev.=0.108, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9664, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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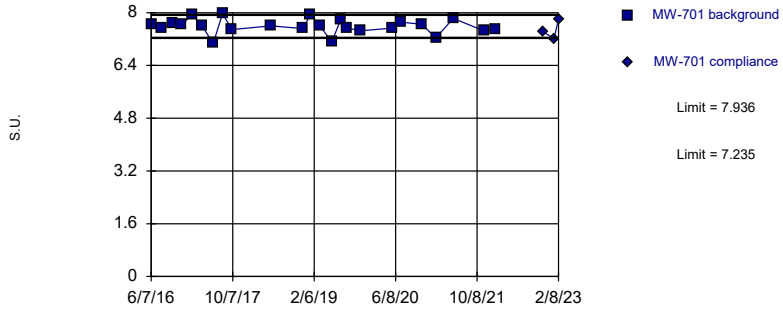
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.586, Std. Dev.=0.23, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.939, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11
6/6/2016	7.37	
8/11/2016	7.3	
10/12/2016	7.33	
12/9/2016	7.58	
2/9/2017	7.36	
4/6/2017	7.41	
6/15/2017	7.5	
8/10/2017	7.14	
10/5/2017	7.33	
5/23/2018	7.35	
7/11/2018	7.37	
12/3/2018	7.42	
5/23/2019	7.52	
11/7/2019	7.26	
5/19/2020	7.48	
11/12/2020	7.24	
5/19/2021	7.55	
11/18/2021	7.23	
11/9/2022		7.52

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-6	MW-6	
6/8/2016	7.19		
8/10/2016	7.18		
10/13/2016	7.24		
12/12/2016	7.27		
2/9/2017	7.25		
4/5/2017	7.3		
6/15/2017	7.2		
8/9/2017	7.02		
10/5/2017	7.11		
5/23/2018	7.26		
12/4/2018	7.13		
5/23/2019	7.17		
11/7/2019	7.45		
1/14/2020	7.43		
2/3/2020	7.3		
5/19/2020	7.31		
11/12/2020	7.28		
5/19/2021	7.62		
7/21/2021	7.1		
11/18/2021	7.1		
11/9/2022		6.86	
1/12/2023		6.96	1st verification
2/8/2023		7.45	2nd verification

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-7	MW-7	
6/8/2016	7.77		
8/10/2016	7.83		
10/13/2016	8		
12/12/2016	7.96		
2/8/2017	7.79		
4/5/2017	7.89		
6/15/2017	7.75		
8/9/2017	7.62		
10/5/2017	7.74		
5/23/2018	7.83		
12/4/2018	7.85		
5/23/2019	7.75		
11/7/2019	7.92		
5/19/2020	7.81		
11/12/2020	7.8		
5/19/2021	8.01		
7/21/2021	7.97		
11/18/2021	7.7		
11/9/2022		7.49	
1/12/2023		7.55	1st verification
2/8/2023		7.89	2nd verification

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

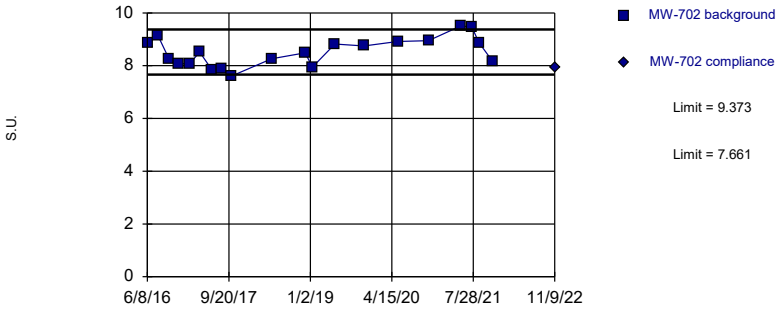
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-701	MW-701	
6/7/2016	7.63		
8/9/2016	7.54		
10/11/2016	7.67		
12/6/2016	7.63		
2/7/2017	7.94		
4/4/2017	7.62		
6/13/2017	7.07		
8/8/2017	7.97		
10/3/2017	7.49		
5/24/2018	7.6		
12/3/2018	7.52		
1/15/2019	7.95		
3/11/2019	7.61		
5/23/2019	7.12		
7/17/2019	7.8		
8/23/2019	7.54		
11/7/2019	7.45		
5/19/2020	7.53		
7/13/2020	7.71		
11/12/2020	7.65		
2/4/2021	7.23		
5/19/2021	7.83		
11/18/2021	7.45		
1/27/2022	7.51		
11/9/2022		7.42	
1/12/2023		7.21	extra sample
2/8/2023		7.81	extra sample

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=8.517, Std. Dev.=0.5454, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9614, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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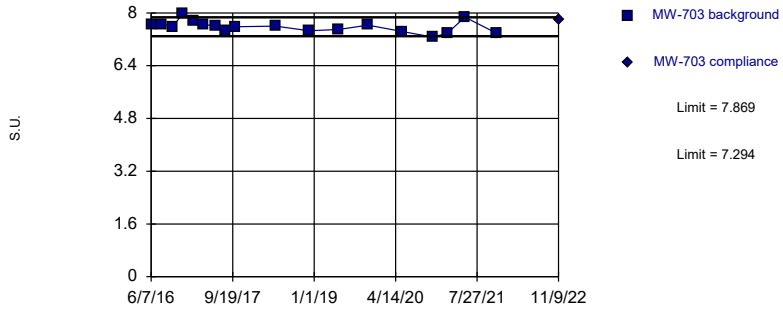
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.581, Std. Dev.=0.1784, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.957, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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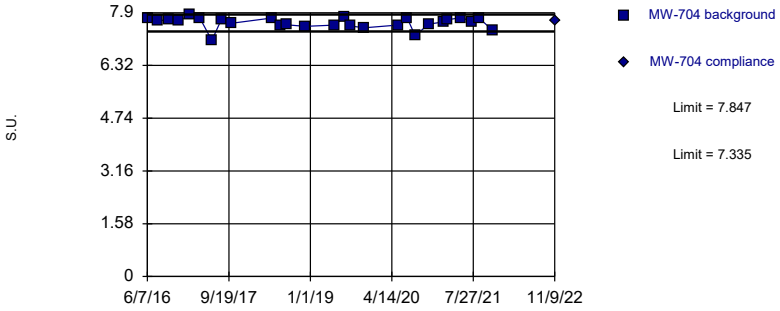
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary (based on cube transformation): Mean=438.9, Std. Dev.=29.53, n=27. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8988, critical = 0.894. Kappa = 1.498 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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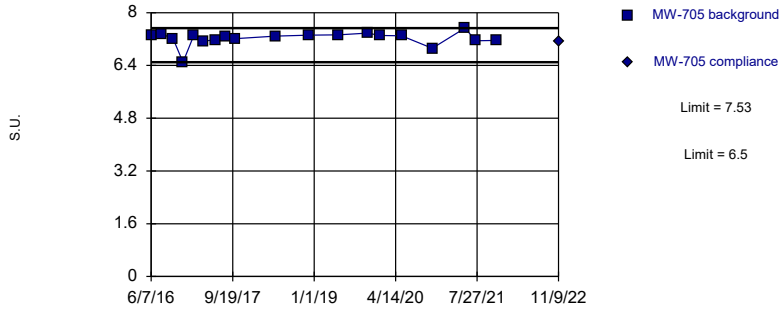
Within Limits

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limits are highest and lowest of 19 background values. Well-constituent pair annual alpha = 0.002713. Individual comparison alpha = 0.001357 (1 of 3).

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702
6/8/2016	8.86	
8/9/2016	9.12	
10/11/2016	8.25	
12/8/2016	8.07	
2/8/2017	8.09	
4/5/2017	8.52	
6/15/2017	7.84	
8/9/2017	7.87	
10/3/2017	7.6	
5/24/2018	8.26	
12/3/2018	8.49	
1/14/2019	7.95	
5/23/2019	8.82	
11/7/2019	8.75	
5/19/2020	8.92	
11/12/2020	8.95	
5/19/2021	9.51	
7/21/2021	9.45	
8/30/2021	8.87	
11/18/2021	8.15	
11/9/2022		7.95

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-703	MW-703
6/7/2016	7.63	
8/9/2016	7.65	
10/11/2016	7.59	
12/7/2016	8	
2/7/2017	7.76	
4/4/2017	7.64	
6/14/2017	7.62	
8/10/2017	7.47	
10/5/2017	7.58	
5/24/2018	7.6	
12/3/2018	7.46	
5/23/2019	7.5	
11/7/2019	7.63	
5/19/2020	7.44	
11/12/2020	7.27	
2/4/2021	7.37	
5/19/2021	7.87	
11/18/2021	7.38	
11/9/2022		7.8

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-704	MW-704
6/7/2016	7.74	
8/9/2016	7.65	
10/11/2016	7.71	
12/6/2016	7.66	
2/7/2017	7.83	
4/4/2017	7.75	
6/13/2017	7.07	
8/8/2017	7.71	
10/3/2017	7.58	
5/24/2018	7.74	
7/11/2018	7.53	
8/16/2018	7.54	
12/3/2018	7.49	
5/23/2019	7.53	
7/17/2019	7.78	
8/23/2019	7.5	
11/7/2019	7.45	
5/19/2020	7.53	
7/13/2020	7.73	
8/27/2020	7.21	
11/12/2020	7.56	
2/4/2021	7.62	
3/3/2021	7.69	
5/19/2021	7.75	
7/21/2021	7.64	
8/30/2021	7.74	
11/18/2021	7.36	
11/9/2022		7.66

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

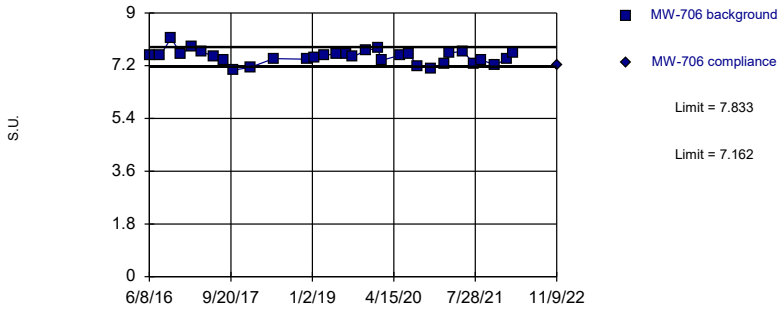
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-705	MW-705
6/7/2016	7.3	
8/9/2016	7.35	
10/11/2016	7.21	
12/7/2016	6.5	
2/9/2017	7.33	
4/6/2017	7.14	
6/13/2017	7.18	
8/9/2017	7.29	
10/3/2017	7.21	
5/24/2018	7.29	
12/4/2018	7.32	
5/23/2019	7.33	
11/7/2019	7.38	
1/14/2020	7.31	
5/19/2020	7.3	
11/12/2020	6.92	
5/19/2021	7.53	
7/21/2021	7.15	
11/18/2021	7.16	
11/9/2022		7.11

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.498, Std. Dev.=0.2292, n=32. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9724, critical = 0.904. Kappa = 1.465 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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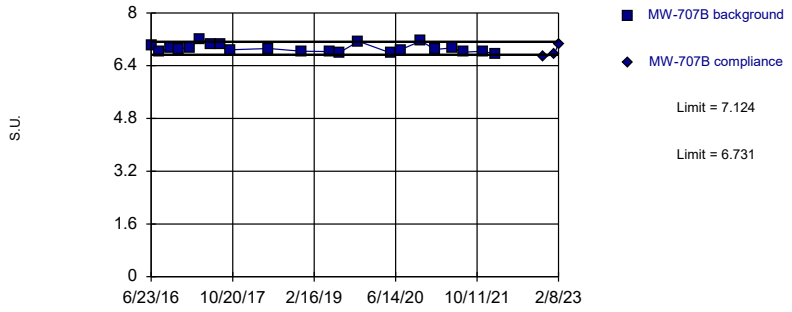
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=6.928, Std. Dev.=0.127, n=22. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9299, critical = 0.878. Kappa = 1.547 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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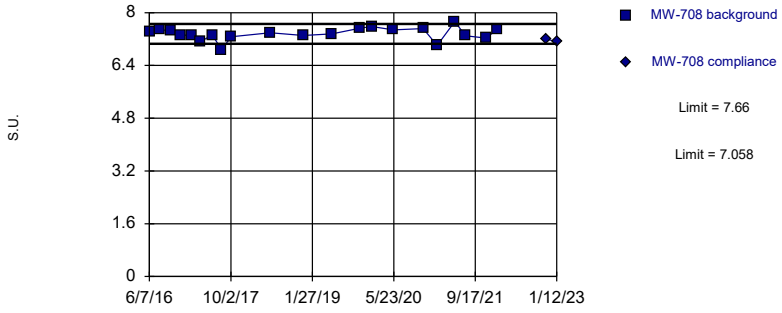
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.359, Std. Dev.=0.1933, n=21. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9535, critical = 0.873. Kappa = 1.558 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

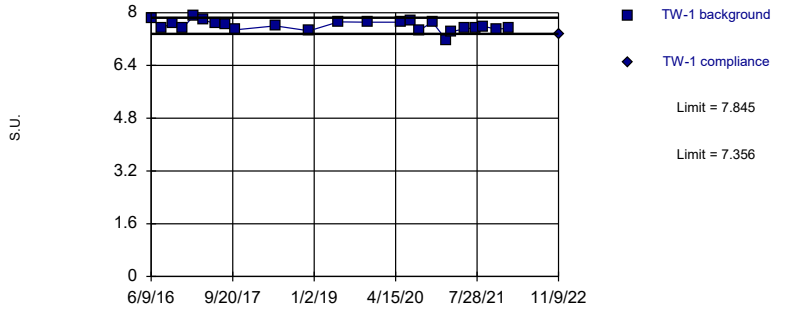
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.601, Std. Dev.=0.1605, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9541, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706
6/8/2016	7.54	
8/9/2016	7.55	
10/11/2016	8.14	
12/6/2016	7.6	
2/7/2017	7.84	
4/4/2017	7.67	
6/13/2017	7.53	
8/9/2017	7.37	
10/4/2017	7.05	
1/9/2018	7.14	
5/24/2018	7.44	
12/4/2018	7.42	
1/15/2019	7.49	
3/11/2019	7.55	
5/23/2019	7.61	
7/17/2019	7.58	
8/23/2019	7.5	
11/7/2019	7.72	
1/14/2020	7.79	
2/3/2020	7.38	
5/19/2020	7.55	
7/13/2020	7.6	
8/27/2020	7.2	
11/12/2020	7.11	
2/4/2021	7.25	
3/3/2021	7.64	
5/19/2021	7.69	
7/21/2021	7.27	
8/30/2021	7.4	
11/18/2021	7.23	
1/27/2022	7.43	
3/3/2022	7.64	
11/9/2022		7.24

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-707B	MW-707B	
6/23/2016	7.03		
8/9/2016	6.81		
10/11/2016	6.95		
12/6/2016	6.92		
2/7/2017	6.95		
4/4/2017	7.2		
6/13/2017	7.06		
8/8/2017	7.04		
10/3/2017	6.88		
5/24/2018	6.92		
12/4/2018	6.84		
5/23/2019	6.83		
7/17/2019	6.8		
11/7/2019	7.14		
5/19/2020	6.78		
7/13/2020	6.88		
11/12/2020	7.15		
2/4/2021	6.89		
5/19/2021	6.94		
7/21/2021	6.81		
11/18/2021	6.84		
1/27/2022	6.75		
11/9/2022		6.67	
1/12/2023		6.74	1st verification
2/8/2023		7.06	2nd verification

Prediction Limit

Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-708	MW-708	
6/7/2016	7.43		
8/10/2016	7.48		
10/12/2016	7.46		
12/9/2016	7.32		
2/9/2017	7.32		
4/6/2017	7.12		
6/14/2017	7.33		
8/8/2017	6.88		
10/4/2017	7.27		
5/23/2018	7.39		
12/4/2018	7.31		
5/23/2019	7.36		
11/7/2019	7.53		
1/14/2020	7.58		
5/19/2020	7.48		
11/12/2020	7.52		
2/4/2021	7.01		
5/19/2021	7.73		
7/21/2021	7.3		
11/18/2021	7.23		
1/27/2022	7.49		
11/9/2022		7.2	
1/12/2023		7.12	extra sample

Prediction Limit

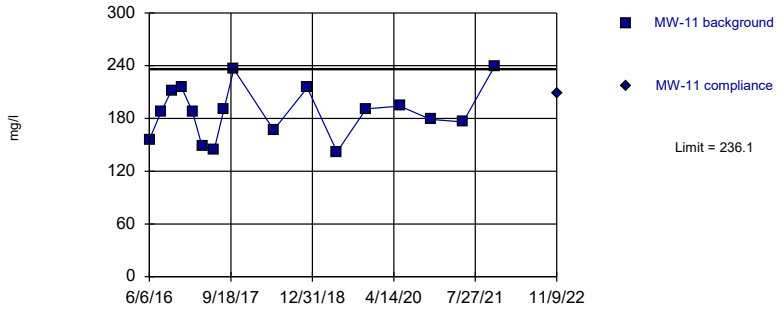
Constituent: pH (S.U.) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

	TW-1	TW-1
6/9/2016	7.83	
8/9/2016	7.54	
10/11/2016	7.69	
12/6/2016	7.53	
2/7/2017	7.89	
4/4/2017	7.78	
6/13/2017	7.67	
8/8/2017	7.65	
10/3/2017	7.48	
5/24/2018	7.6	
12/4/2018	7.45	
5/23/2019	7.72	
11/7/2019	7.71	
5/19/2020	7.71	
7/13/2020	7.76	
8/27/2020	7.45	
11/12/2020	7.72	
2/4/2021	7.15	
3/3/2021	7.42	
5/19/2021	7.52	
7/21/2021	7.53	
8/30/2021	7.59	
11/18/2021	7.5	
1/27/2022	7.53	
11/9/2022		7.36

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=187.2, Std. Dev.=29.94, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.956, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

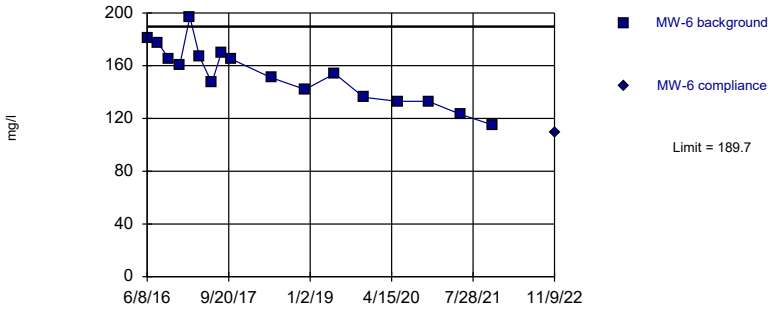
Constituent: SULFATE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=153.9, Std. Dev.=21.94, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9865, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

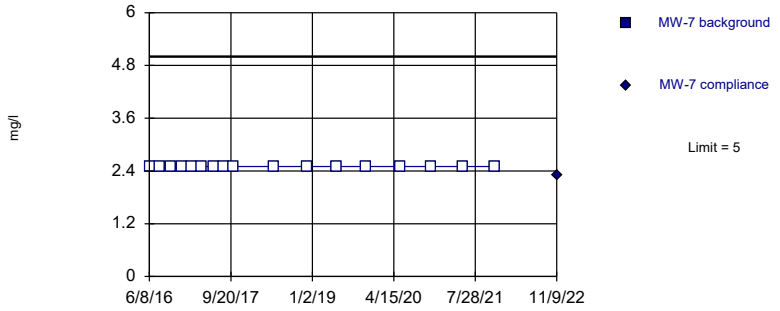
LaCygne Client: SCS Engineers Data: LaC GW Data

Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because censored data exceeded 50%. All background values (n = 17) were censored; limit is most recent reporting limit. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

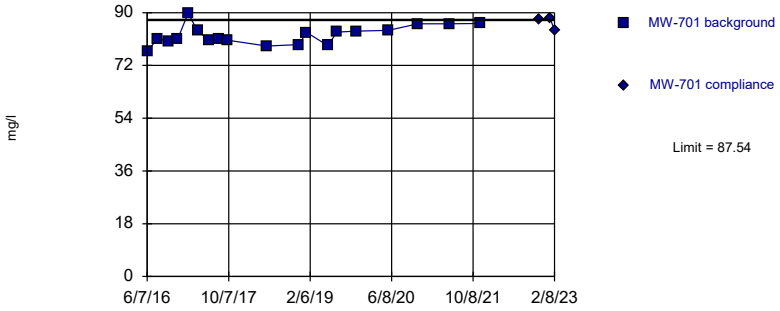
Constituent: SULFATE Analysis Run 3/16/2023 11:32 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=82.34, Std. Dev.=3.272, n=19. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9573, critical = 0.863. Kappa = 1.591 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11
6/6/2016	156	
8/11/2016	187	
10/12/2016	212	
12/9/2016	215	
2/9/2017	188	
4/6/2017	148	
6/15/2017	145	
8/10/2017	191	
10/5/2017	236	
5/23/2018	167	
12/3/2018	215	
5/23/2019	142	
11/7/2019	191	
5/19/2020	194	
11/12/2020	179	
5/19/2021	176	
11/18/2021	240	
11/9/2022		208

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-6	MW-6
6/8/2016	181	
8/10/2016	177	
10/13/2016	165	
12/12/2016	160	
2/9/2017	197	
4/5/2017	167	
6/15/2017	147	
8/9/2017	170	
10/5/2017	165	
5/23/2018	151	
12/4/2018	142	
5/23/2019	154	
11/7/2019	136	
5/19/2020	133	
11/12/2020	133	
5/19/2021	123	
11/18/2021	115	
11/9/2022		109

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-7	MW-7
6/8/2016	<5	
8/10/2016	<5	
10/13/2016	<5	
12/12/2016	<5	
2/8/2017	<5	
4/5/2017	<5	
6/15/2017	<5	
8/9/2017	<5	
10/5/2017	<5	
5/23/2018	<5	
12/4/2018	<5	
5/23/2019	<5	
11/7/2019	<5	
5/19/2020	<5	
11/12/2020	<5	
5/19/2021	<5	
11/18/2021	<5	
11/9/2022		2.29

ND substitution: RL/2.

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-701	MW-701	
6/7/2016	76.9		
8/9/2016	81.1		
10/11/2016	80.3		
12/6/2016	80.9		
2/7/2017	89.8		
4/4/2017	83.8		
6/13/2017	80.6		
8/8/2017	80.8		
10/3/2017	80.6		
5/24/2018	78.6		
12/3/2018	79.1		
1/15/2019	83.3		
5/23/2019	78.8		
7/17/2019	83.4		
11/7/2019	83.7		
5/19/2020	84		
11/12/2020	86.2		
5/19/2021	86.2		
11/18/2021	86.3		
11/9/2022		87.8	
1/12/2023		88.2	1st verification
2/8/2023		83.9	2nd verification

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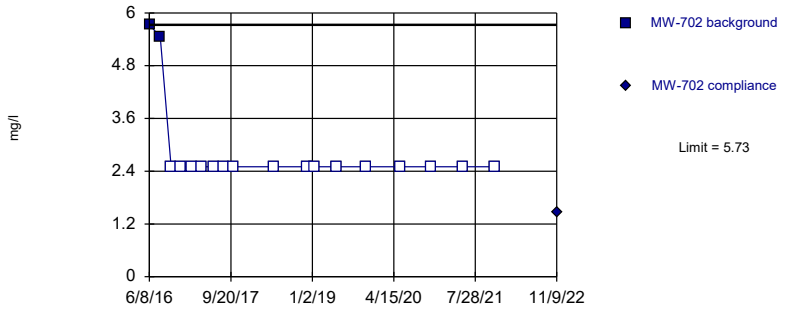
Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because censored data exceeded 50%. Limit is highest of 18 background values. 88.89% NDs. Well-constituent pair annual alpha = 0.001588. Individual comparison alpha = 0.0007943 (1 of 3).

Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

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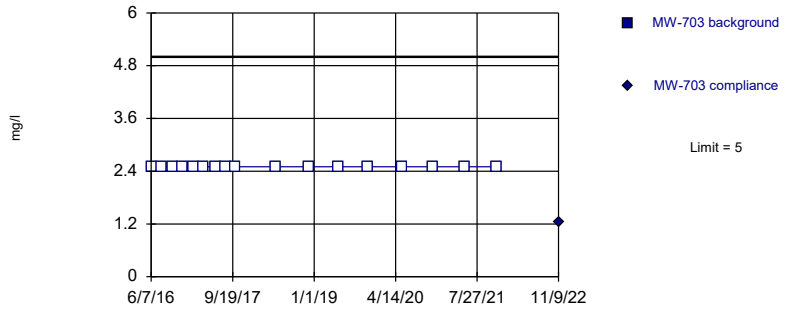
Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because censored data exceeded 50%. All background values (n = 17) were censored; limit is most recent reporting limit. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

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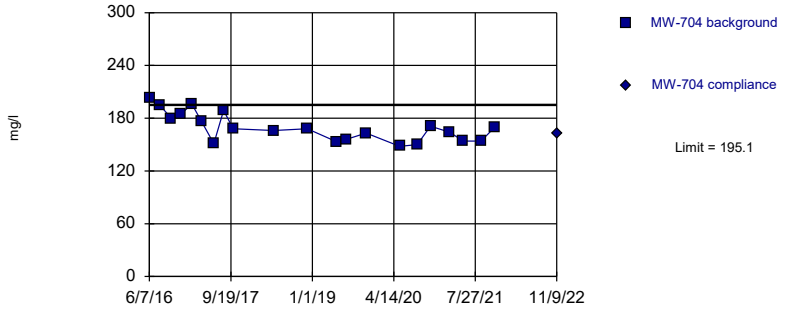
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=169.5, Std. Dev.=16.45, n=21. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.935, critical = 0.873. Kappa = 1.558 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

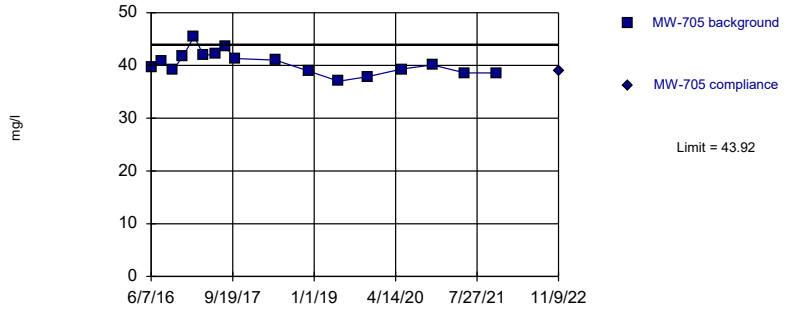
Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.9.6.36 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=40.41, Std. Dev.=2.15, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9648, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702
6/8/2016	5.73	
8/9/2016	5.46	
10/11/2016	<5	
12/8/2016	<5	
2/8/2017	<5	
4/5/2017	<5	
6/15/2017	<5	
8/9/2017	<5	
10/3/2017	<5	
5/24/2018	<5	
12/3/2018	<5	
1/14/2019	<5	
5/23/2019	<5	
11/7/2019	<5	
5/19/2020	<5	
11/12/2020	<5	
5/19/2021	<5	
11/18/2021	<5	
11/9/2022		1.47

ND substitution: RL/2.

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-703	MW-703
6/7/2016	<5	
8/9/2016	<5	
10/11/2016	<5	
12/6/2016	<5	
2/7/2017	<5	
4/4/2017	<5	
6/14/2017	<5	
8/10/2017	<5	
10/5/2017	<5	
5/24/2018	<5	
12/3/2018	<5	
5/23/2019	<5	
11/7/2019	<5	
5/19/2020	<5	
11/12/2020	<5	
5/19/2021	<5	
11/18/2021	<5	
11/9/2022		1.24

ND substitution: RL/2.

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-704	MW-704
6/7/2016	203	
8/9/2016	194	
10/11/2016	180	
12/6/2016	185	
2/7/2017	196	
4/4/2017	176	
6/13/2017	151	
8/8/2017	189	
10/3/2017	168	
5/24/2018	166	
12/3/2018	168	
5/23/2019	153	
7/17/2019	156	
11/7/2019	163	
5/19/2020	148	
8/27/2020	150	
11/12/2020	171	
3/3/2021	164	
5/19/2021	154	
8/30/2021	154	
11/18/2021	170	
11/9/2022		163

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

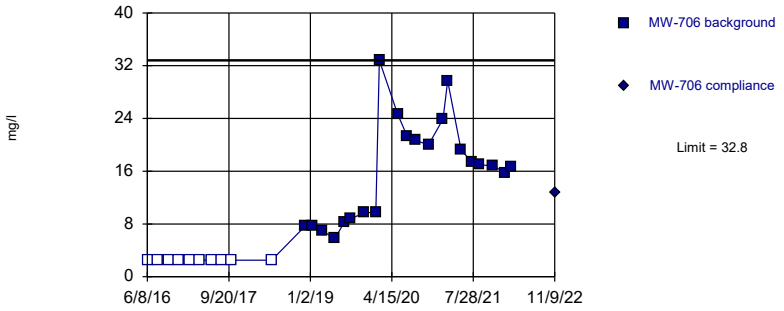
	MW-705	MW-705
6/7/2016	39.6	
8/9/2016	40.7	
10/11/2016	39.2	
12/7/2016	41.7	
2/9/2017	45.5	
4/6/2017	41.9	
6/13/2017	42.2	
8/9/2017	43.5	
10/3/2017	41.3	
5/24/2018	41	
12/4/2018	38.9	
5/23/2019	37	
11/7/2019	37.9	
5/19/2020	39.3	
11/12/2020	40.1	
5/19/2021	38.6	
11/18/2021	38.6	
11/9/2022		39

Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 31 background values. 32.26% NDs. Well-constituent pair annual alpha = 0.0003403. Individual comparison alpha = 0.0001701 (1 of 3).

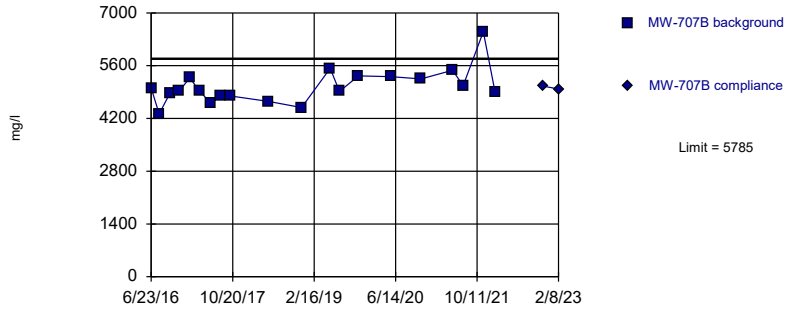
Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=5047, Std. Dev.=470.5, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8964, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

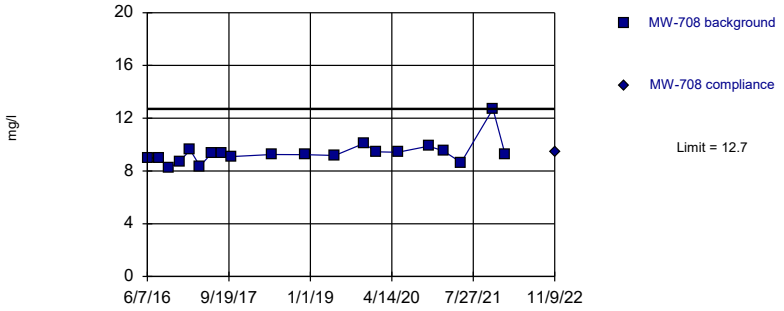
Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 20 background values. Well-constituent pair annual alpha = 0.001125. Individual comparison alpha = 0.0005627 (1 of 3).

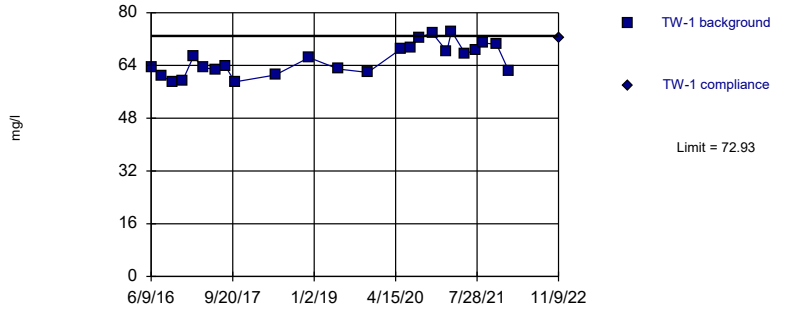
Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=65.73, Std. Dev.=4.73, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9484, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 3/16/2023 11:33 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706
6/8/2016	<5	
8/9/2016	<5	
10/11/2016	<5	
12/6/2016	<5	
2/7/2017	<5	
4/4/2017	<5	
6/13/2017	<5	
8/9/2017	<5	
10/4/2017	<5	
5/24/2018	<5	
12/4/2018	7.69	
1/15/2019	7.73	
3/11/2019	6.96	
5/23/2019	5.78	
7/17/2019	8.27	
8/23/2019	8.79	
11/7/2019	9.68	
1/14/2020	9.78	
2/3/2020	32.8	
5/19/2020	24.6	
7/13/2020	21.3	
8/27/2020	20.7	
11/12/2020	20	
2/4/2021	23.9	
3/3/2021	29.7	
5/19/2021	19.2	
7/21/2021	17.4	
8/30/2021	17	
11/18/2021	16.8	
1/27/2022	15.8	
3/3/2022	16.7	
11/9/2022		12.7

ND substitution: RL/2.

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-707B	MW-707B	
6/23/2016	5010		
8/9/2016	4320		
10/11/2016	4860		
12/6/2016	4920		
2/7/2017	5280		
4/4/2017	4940		
6/13/2017	4600		
8/8/2017	4790		
10/3/2017	4800		
5/24/2018	4650		
12/4/2018	4490		
5/23/2019	5530		
7/17/2019	4920		
11/7/2019	5330		
5/19/2020	5310		
11/12/2020	5250		
5/19/2021	5480		
7/21/2021	5070		
11/18/2021	6500		
1/27/2022	4890		
11/9/2022		5060	
2/8/2023		4980	extra sample

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-708	MW-708
6/7/2016	8.99	
8/10/2016	8.98	
10/12/2016	8.24	
12/9/2016	8.72	
2/9/2017	9.59	
4/6/2017	8.36	
6/14/2017	9.38	
8/8/2017	9.36	
10/4/2017	9.09	
5/23/2018	9.25	
12/4/2018	9.24	
5/23/2019	9.18	
11/7/2019	10.1	
1/14/2020	9.45	
5/19/2020	9.42	
11/12/2020	9.88	
2/4/2021	9.54	
5/19/2021	8.64	
11/18/2021	12.7	
1/27/2022	9.26	
11/9/2022		9.47

Prediction Limit

Constituent: SULFATE (mg/l) Analysis Run 3/16/2023 11:35 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	TW-1	TW-1
6/9/2016	63.4	
8/9/2016	60.9	
10/11/2016	58.8	
12/6/2016	59.3	
2/7/2017	66.7	
4/4/2017	63.4	
6/13/2017	62.7	
8/8/2017	63.9	
10/3/2017	59	
5/24/2018	61.1	
12/4/2018	66.4	
5/23/2019	62.9	
11/7/2019	61.9	
5/19/2020	69.1	
7/13/2020	69.4	
8/27/2020	72.4	
11/12/2020	73.8	
2/4/2021	68.3	
3/3/2021	74.4	
5/19/2021	67.7	
7/21/2021	68.5	
8/30/2021	70.8	
11/18/2021	70.4	
1/27/2022	62.2	
11/9/2022		72.2

Prediction Limit

LaCygne Client: SCS Engineers Data: LaC GW Data Printed 3/16/2023, 11:35 PM

Constituent	Well	Upper Lim.	Lower Lim.	Date	Observ.	Sig.	Bg N	%NDs	Transform	Alpha	Method
BORON (mg/l)	MW-11	1.25	n/a	11/9/2022	1.12	No	18	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-6	1.236	n/a	11/9/2022	1.14	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-7	1.684	n/a	11/9/2022	1.56	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-701	1.115	n/a	11/9/2022	0.905	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-702	1.97	n/a	11/9/2022	1.79	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-703	1.939	n/a	11/9/2022	1.81	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-704	2.162	n/a	11/9/2022	2.02	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-705	2.294	n/a	11/9/2022	2.11	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-706	2.257	n/a	11/9/2022	2.08	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-707B	2.066	n/a	11/9/2022	1.88	No	17	0	x^5	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-708	1.518	n/a	11/9/2022	1.39	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	TW-1	1.708	n/a	11/9/2022	1.42	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-11	70.73	n/a	11/9/2022	55.5	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-6	113.1	n/a	11/9/2022	75.3	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-7	26.59	n/a	11/9/2022	20.2	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-701	45.81	n/a	2/8/2023	45.4	No	24	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-702	22.01	n/a	11/9/2022	14.6	No	18	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-703	22.13	n/a	11/9/2022	18.6	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-704	35.1	n/a	11/9/2022	22	No	20	0	n/a	0.000...	NP Intra (normality) ...
CALCIUM (mg/l)	MW-705	41.69	n/a	11/9/2022	26.9	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-706	33.16	n/a	11/9/2022	23.2	No	22	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-707B	428.2	n/a	2/8/2023	398	No	20	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-708	33.58	n/a	11/9/2022	28.3	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	TW-1	35.31	n/a	11/9/2022	23.8	No	20	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-11	131.3	n/a	11/9/2022	68.5	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-6	220.9	n/a	11/9/2022	195	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-7	108.8	n/a	11/9/2022	94.7	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-701	55.11	n/a	2/8/2023	45.7	No	19	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-702	49.23	n/a	11/9/2022	47.2	No	18	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-703	115.3	n/a	11/9/2022	111	No	17	0	x^6	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-704	92.57	n/a	11/9/2022	91.1	No	27	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-705	141.8	n/a	11/9/2022	138	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-706	290.8	n/a	11/9/2022	250	No	21	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-707B	244.4	n/a	2/8/2023	172	No	19	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-708	48.26	n/a	11/9/2022	46.4	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	TW-1	45.41	n/a	11/9/2022	40.3	No	20	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-11	1114	n/a	11/9/2022	918	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-6	1270	n/a	11/9/2022	1000	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-7	961	n/a	11/9/2022	882	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-701	646.1	n/a	11/9/2022	545	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-702	816.5	n/a	11/9/2022	620	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-703	979.4	n/a	11/9/2022	870	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-704	1300	n/a	11/9/2022	1090	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-705	1083	n/a	11/9/2022	930	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-706	1428	n/a	11/9/2022	1060	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-707B	8907	n/a	11/9/2022	6160	No	17	0	x^2	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-708	881	n/a	1/12/2023	597	No	17	0	n/a	0.000...	NP Intra (normality) ...
DISSOLVED SOLIDS (mg/l)	TW-1	1108	n/a	11/9/2022	908	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-11	0.6113	n/a	11/9/2022	0.479	No	18	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-6	1.75	n/a	11/9/2022	0.525	No	17	0	n/a	0.000...	NP Intra (normality) ...

Prediction Limit

LaCygne Client: SCS Engineers Data: LaC GW Data Printed 3/16/2023, 11:35 PM

Constituent	Well	Upper Lim.	Lower Lim.	Date	Observ.	Sig.	Bg N	%NDs	Transform	Alpha	Method
FLUORIDE (mg/l)	MW-7	1.364	n/a	11/9/2022	1.14	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-701	0.8412	n/a	11/9/2022	0.594	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-702	1.646	n/a	11/9/2022	1.26	No	18	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-703	1.597	n/a	11/9/2022	1.31	No	18	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-704	0.9625	n/a	11/9/2022	0.742	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-705	1.096	n/a	11/9/2022	0.878	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-706	1.262	n/a	11/9/2022	0.923	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	**MW-707B**	**0.5018**	**n/a**	**2/8/2023**	**1**	**Yes**	**17**	**0**	**No**	**0.000...**	**Param Intra 1 of 3**
FLUORIDE (mg/l)	MW-708	0.6971	n/a	11/9/2022	0.595	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	TW-1	0.4592	n/a	11/9/2022	0.377	No	17	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-11	7.567	7.182	11/9/2022	7.52	No	18	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-6	7.464	7.027	2/8/2023	7.45	No	20	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-7	8.007	7.659	2/8/2023	7.89	No	18	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-701	7.936	7.235	2/8/2023	7.81	No	24	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-702	9.373	7.661	11/9/2022	7.95	No	20	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-703	7.869	7.294	11/9/2022	7.8	No	18	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-704	7.847	7.335	11/9/2022	7.66	No	27	0	x^3	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-705	7.53	6.5	11/9/2022	7.11	No	19	0	n/a	0.001357	NP Intra (normality) ...
pH (S.U.)	MW-706	7.833	7.162	11/9/2022	7.24	No	32	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-707B	7.124	6.731	2/8/2023	7.06	No	22	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-708	7.66	7.058	1/12/2023	7.12	No	21	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	TW-1	7.845	7.356	11/9/2022	7.36	No	24	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-11	236.1	n/a	11/9/2022	208	No	17	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-6	189.7	n/a	11/9/2022	109	No	17	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-7	5	n/a	11/9/2022	2.29	No	17	100	n/a	0.000...	NP Intra (NDs) 1 of 3
SULFATE (mg/l)	MW-701	87.54	n/a	2/8/2023	83.9	No	19	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-702	5.73	n/a	11/9/2022	1.47	No	18	88.89	n/a	0.000...	NP Intra (NDs) 1 of 3
SULFATE (mg/l)	MW-703	5	n/a	11/9/2022	1.24	No	17	100	n/a	0.000...	NP Intra (NDs) 1 of 3
SULFATE (mg/l)	MW-704	195.1	n/a	11/9/2022	163	No	21	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-705	43.92	n/a	11/9/2022	39	No	17	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-706	32.8	n/a	11/9/2022	12.7	No	31	32.26	n/a	0.000...	NP Intra (normality) ...
SULFATE (mg/l)	MW-707B	5785	n/a	2/8/2023	4980	No	20	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-708	12.7	n/a	11/9/2022	9.47	No	20	0	n/a	0.000...	NP Intra (normality) ...
SULFATE (mg/l)	TW-1	72.93	n/a	11/9/2022	72.2	No	24	0	No	0.000...	Param Intra 1 of 3

ATTACHMENT 2

Sanitas™ Configuration Settings

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

Exclude data flags: i

Data Reading Options

- (•) Individual Observations
- ( ) Mean of Each: ( ) Month
- ( ) Median of Each: ( ) Season

Non-Detect / Trace Handling...

Setup Seasons...

[ ] Automatically Process Resamples...

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

- [ ] Black and White Output
- [x] Four Plots Per Page
  - [x] Always Combine Data Pages...
  - [x] Include Tick Marks on Data Page
- [ ] Use Constituent Name for Graph Title
- [ ] Draw Border Around Text Reports and Data Pages
- [x] Enlarge/Reduce Fonts (Graphs): 100%
- [x] Enlarge/Reduce Fonts (Data/Text Reports): 100%
- [x] Wide Margins (on reports without explicit setting)
- [ ] Use CAS# (Not Const. Name)
- [ ] Truncate File Names to 20 Characters
- [ ] Include Limit Lines when found in Database...
- [x] Show Deselected Data on Time Series Lighter
- [ ] Show Deselected Data on all Data Pages Lighter

Setup Symbols and Colors...

- [x] Prompt to Overwrite/Append Summary Tables
- [ ] Round Limits to 2 Sig. Digits (when not set in data file)
- [ ] User-Set Scale
- [x] Indicate Background Data
- [ ] Show Exact Dates
- [ ] Thick Plot Lines

Zoom Factor: 200%

Output Decimal Precision

- ( ) Less Precision
- (•) Normal Precision
- ( ) More Precision

- [x] Store Print Jobs in Multiple Constituent Mode

Store All Print Jobs...

Printer: Adobe PDF

Printers...

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

☐ Use Modified Alpha...

☑ Test Residuals For Normality (Parametric test only) using Shapiro-Wilk/Francia at Alpha = 0.01

☐ Continue Parametric if Unable to Normalize

Transformation (Parametric test only)

- ◉ Use Ladder of Powers
- ○ Natural Log or No Transformation
- ○ Never Transform
- ○ Use Specific Transformation:

☐ Use Best W Statistic

☐ Plot Transformed Values

Use Non-Parametric Test (Sen's Slope/Mann-Kendall) when Non-Detects Percent > 75

☐ Include 95. % Confidence Interval around Trend Line

☑ Only when Trend is Significant

☑ Include Details of Interaction with Limit Lines (if applicable, in Multiple Constituent mode)

☐ Automatically Remove Outliers (Parametric test only)

☐ Limit data to most recent values (dropping any earlier observations)

Note: there is no "Always Use Non-Parametric" checkbox on this tab because, for consistency with prior versions, Sen's Slope / Mann-Kendall (the non-parametric alternative) is available as a report in its own right, under Analysis->Intrawell->Trend.

Data | Output | Trend Test | Control Cht | **Prediction Lim** | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

☑ Test for Normality using Shapiro-Wilk/Francia at Alpha = 0.01

☑ Use Non-Parametric Test when Non-Detects Percent > 50

Use Aitchison's Adjustment when Non-Detects Percent > 15

☐ Optional Further Refinement: Use _____ when NDs % > 50

☐ Use Poisson Prediction Limit when Non-Detects Percent > 0

Transformation

- (●) Use Ladder of Powers
- ( ) Natural Log or No Transformation
- ( ) Never Transform
- ( ) Use Specific Transformation: Natural Log

☐ Use Best W Statistic

☐ Plot Transformed Values

Deseasonalize (Intra- and InterWell)

- ( ) If Seasonality Is Detected
- ( ) If Seasonality Is Detected Or Insufficient to Test
- ( ) Always (When Sufficient Data)
- (●) Never

☐ Always Use Non-Parametric

Facility α

Statistical Evaluations per Year: 2

Constituents Analyzed: 7

Downgradient (Compliance) Wells: 9

Sampling Plan

Comparing Individual Observations

( ) 1 of 1 ( ) 1 of 2 (●) 1 of 3 ( ) 1 of 4

( ) 2 of 4 ("Modified California")

IntraWell Other

☐ Stop if Background Trend Detected at Alpha = 0.05

☑ Plot Background Data

Override Standard Deviation: _____

Override DF: _____ Override Kappa: _____

☐ Automatically Remove Background Outliers

☐ 2-Tailed Test Mode...

☐ Show Deselected Data Lighter

Non-Parametric Limit = Highest Background Value

Non-Parametric Limit when 100% Non-Detects:

- ( ) Highest/Second Highest Background Value
- (●) Most Recent PQL if available, or MDL
- ( ) Most Recent Background Value (subst. method)

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

Rank Von Neumann, Wilcoxon Rank Sum / Mann-Whitney

- [ ] Use Modified Alpha...
- [ ] 2-Tailed Test Mode...
- [ ] Combine Background Wells on Mann-Whitney...

Outlier Tests

- ( ) EPA 1989 Outlier Screening (fixed alpha of 0.05)
- (•) Dixon's at α= 0.05 or if n > 22 Rosner's at α= 0.01 [x] Use EPA Screening to establish Suspected Outliers
- ( ) Tukey's Outlier Screening, with IQR Multiplier = 3.0 [ ] Use Ladder of Powers to achieve Best W Stat
- [x] Test For Normality using Shapiro-Wilk/Francia at Alpha = 0.1
  - (•) Stop if Non-Normal
  - ( ) Continue with Parametric Test if Non-Normal
  - ( ) Tukey's if Non-Normal, with IQR Multiplier = 3.0 [x] Use Ladder of Powers to achieve Best W Stat
- [x] No Outlier If Less Than 3.0 Times Median
- [ ] Apply Rules found in Ohio Guidance Document 0715
- [ ] Combine Background Wells on the Outlier Report...

Piper, Stiff Diagram

- [ ] Combine Wells
- [ ] Combine Dates
- (•) Use Default Constituent Names
- ( ) Use Constituent Definition File Edit
- [x] Label Constituents
- [x] Label Axes
- [x] Note Cation-Anion Balance (Piper only)

APPENDIX E.2

Spring 2023 Semiannual Detection Monitoring Statistical Analyses

SCS ENGINEERS

Environmental Consulting & Contracting

MEMORANDUM

September 28, 2023

To: La Cygne Generating Station
25166 East 2200 Road
La Cygne, Kansas 66040
Evergy Metro, Inc.

From: SCS Engineers
John Rockhold, P.G.
Douglas Doerr, P.E.

RE: Determination of Statistically Significant Increases –
Upper AQC Impoundment
Spring 2023 Semiannual Detection Monitoring 40 CFR 257.94

Statistical analysis of monitoring data from the groundwater monitoring system for the Upper AQC Impoundment at the La Cygne Generating Station has been completed in substantial compliance with the "Statistical Method Certification by A Qualified Professional Engineer" dated October 12, 2017. Detection monitoring groundwater samples were collected on May 17, 2023. Review and validation of the results from the May 2023 Detection Monitoring Event was completed on June 30, 2023, which constitutes completion and finalization of detection monitoring laboratory analyses. A statistical analysis was then conducted to determine whether there was a statistically significant increase (SSI) over background values for each constituent listed in Appendix III to Part 257-Constituents for Detection Monitoring. One round of verification sampling was conducted for certain constituents on July 12, 2023.

Determination: A statistical evaluation was completed for all Appendix III detection monitoring constituents in accordance with the certified statistical method. The statistical evaluation did not identify any SSIs above background.

Attached to this memorandum are the following backup information:

Attachment 1: Sanitas™ Output:

Statistical evaluation output from Sanitas™ for the prediction limit analysis. This includes prediction limit plots, prediction limit background data, detection sample results, 1st verification re-sample results (when applicable), 2nd verification re-sample results (when applicable), extra sample results for pH because pH is collected as part of the sampling procedure, and a Prediction Limit summary table. Output documentation includes the analytical data used for the statistical analyses.

Attachment 2: Sanitas™ Configuration Settings:

Screen shots of the applicable Sanitas™ configuration settings for the statistical prediction limit analysis. This includes data configuration, output configuration, prediction limit configuration and other tests configuration.

Revision Number	Revision Date	Attachment Revised	Summary of Revisions

La Cygne Generating Station
Determination of Statistically Significant Increases
Upper AQC Impoundment
September 28, 2023

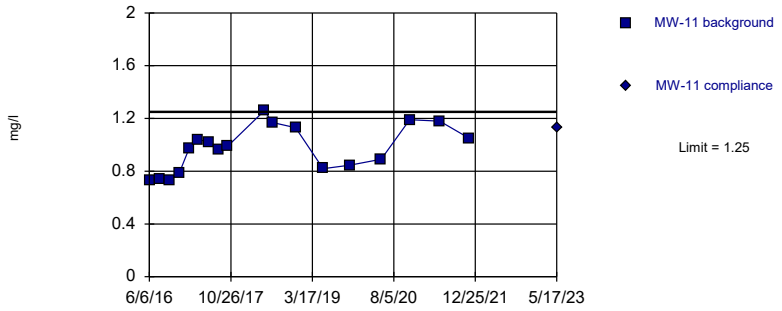
ATTACHMENT 1

Sanitas™ Output

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.9726, Std. Dev.=0.1721, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9419, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

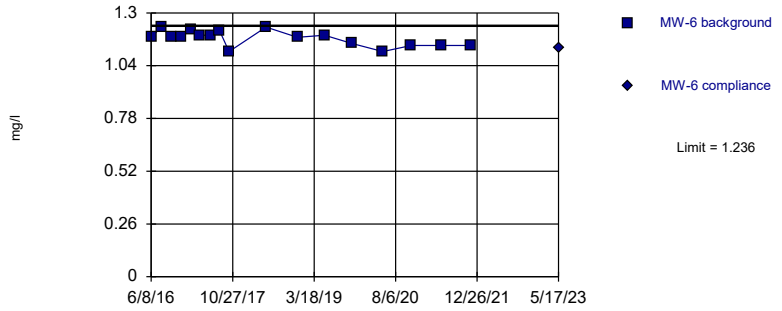
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.175, Std. Dev.=0.03777, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9328, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

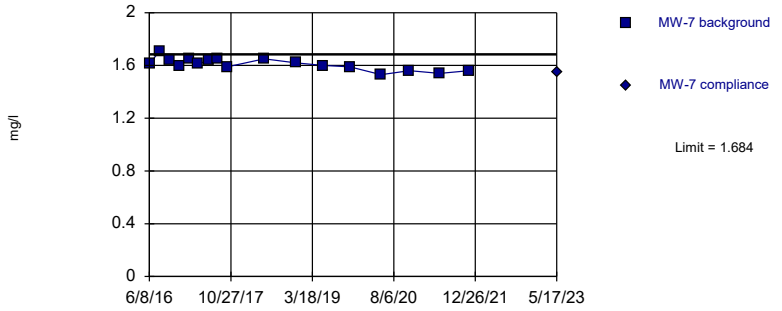
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.609, Std. Dev.=0.04608, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9659, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

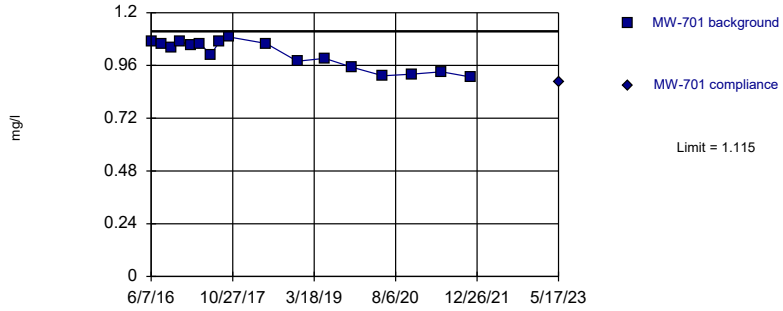
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.01, Std. Dev.=0.06433, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8689, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: BORON Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

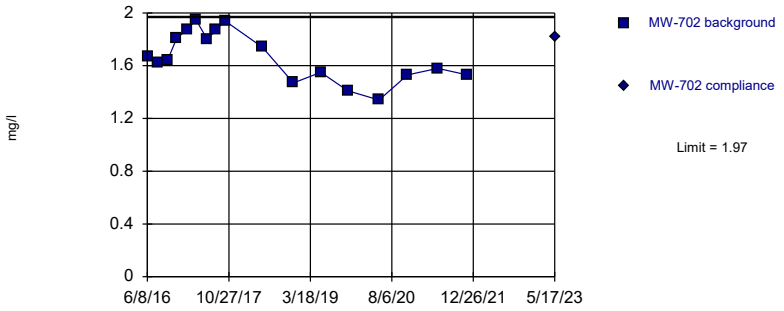
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11	MW-6	MW-6	MW-7	MW-7	MW-701	MW-701
6/6/2016	0.729							
6/7/2016							1.07	
6/8/2016			1.18		1.61			
8/9/2016							1.06	
8/10/2016			1.23		1.71			
8/11/2016	0.739							
10/11/2016							1.04	
10/12/2016	0.73							
10/13/2016			1.18		1.64			
12/6/2016							1.07	
12/9/2016	0.786							
12/12/2016			1.18		1.6			
2/7/2017							1.05	
2/8/2017					1.65			
2/9/2017	0.974		1.22					
4/4/2017							1.06	
4/5/2017			1.19		1.61			
4/6/2017	1.04							
6/13/2017							1.01	
6/15/2017	1.02		1.19		1.64			
8/8/2017							1.07	
8/9/2017			1.21		1.65			
8/10/2017	0.965							
10/3/2017							1.09	
10/5/2017	0.988		1.11		1.59			
5/23/2018	1.26		1.23		1.65			
5/24/2018							1.06	
7/11/2018	1.17							
12/3/2018	1.13						0.979	
12/4/2018			1.18		1.62			
5/23/2019	0.819		1.19		1.6		0.992	
11/7/2019	0.846		1.15		1.59		0.952	
5/19/2020	0.891		1.11		1.53		0.913	
11/12/2020	1.19		1.14		1.56		0.92	
5/19/2021	1.18		1.14		1.54		0.931	
11/18/2021	1.05		1.14		1.56		0.907	
5/17/2023		1.13		1.13		1.55		0.883

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.666, Std. Dev.=0.1861, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9606, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

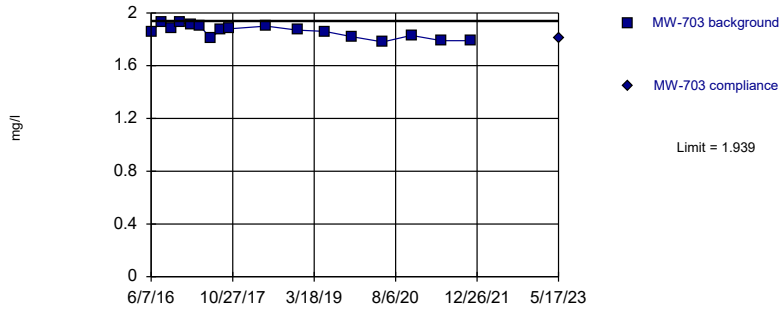
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.859, Std. Dev.=0.04854, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9402, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

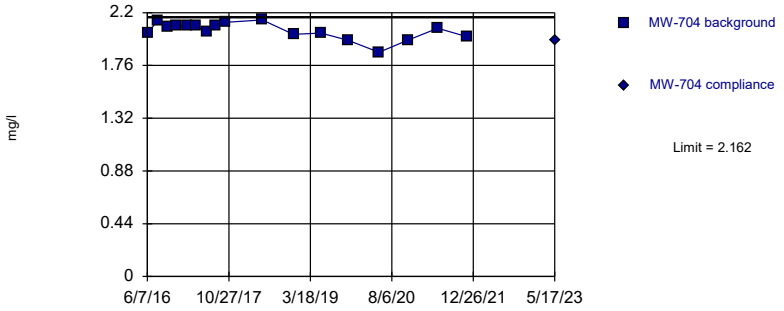
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=2.049, Std. Dev.=0.06918, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9212, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

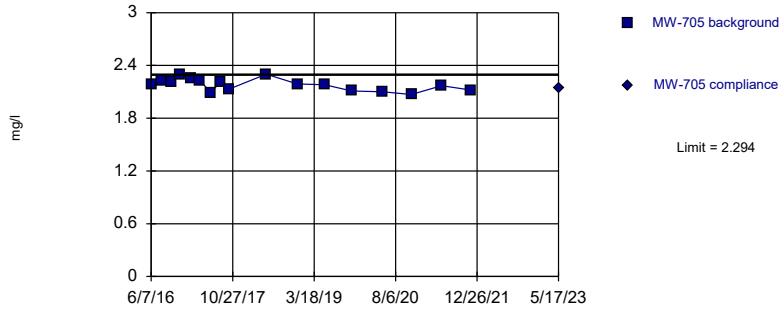
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=2.181, Std. Dev.=0.06959, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.957, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: BORON Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

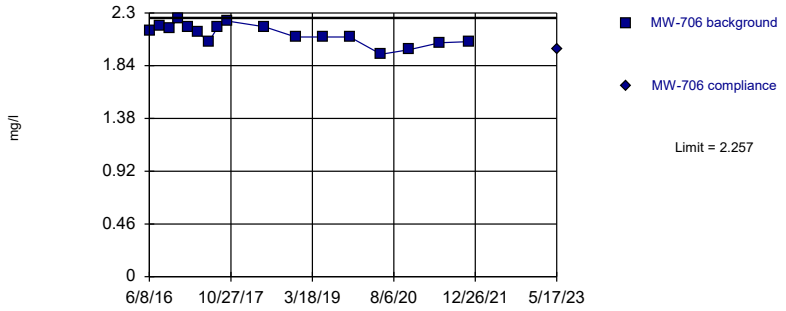
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702	MW-703	MW-703	MW-704	MW-704	MW-705	MW-705
6/7/2016			1.86		2.03		2.19	
6/8/2016	1.67							
8/9/2016	1.62		1.93		2.13		2.22	
10/11/2016	1.64		1.88		2.08		2.21	
12/6/2016			1.93		2.09			
12/7/2016							2.3	
12/8/2016	1.81							
2/7/2017			1.91		2.09			
2/8/2017	1.87							
2/9/2017							2.25	
4/4/2017			1.9		2.09			
4/5/2017	1.95							
4/6/2017							2.23	
6/13/2017					2.04		2.09	
6/14/2017			1.81					
6/15/2017	1.8							
8/8/2017					2.09			
8/9/2017	1.87						2.21	
8/10/2017			1.87					
10/3/2017	1.94				2.12		2.13	
10/5/2017			1.88					
5/24/2018	1.74		1.9		2.14		2.3	
12/3/2018	1.47		1.87		2.02			
12/4/2018							2.19	
5/23/2019	1.55		1.86		2.03		2.18	
11/7/2019	1.41		1.82		1.97		2.11	
5/19/2020	1.34		1.78		1.87		2.1	
11/12/2020	1.53		1.83		1.97		2.07	
5/19/2021	1.58		1.79		2.07		2.17	
11/18/2021	1.53		1.79		2		2.12	
5/17/2023		1.82		1.81		1.97		2.14

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=2.116, Std. Dev.=0.08602, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9602, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

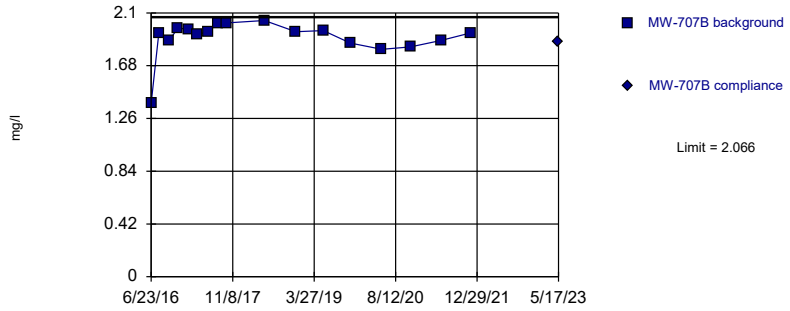
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary (based on x^5 transformation): Mean=26.11, Std. Dev.=7.072, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8672, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

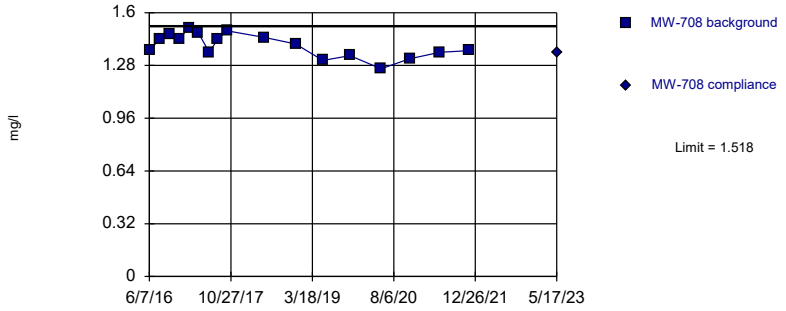
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.401, Std. Dev.=0.0714, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9595, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

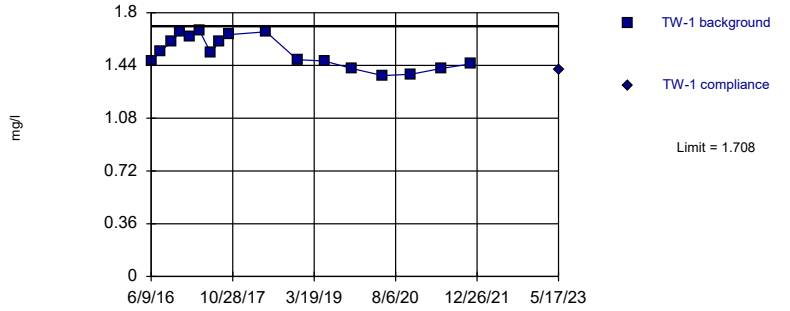
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.532, Std. Dev.=0.1079, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9153, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: BORON Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: BORON Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

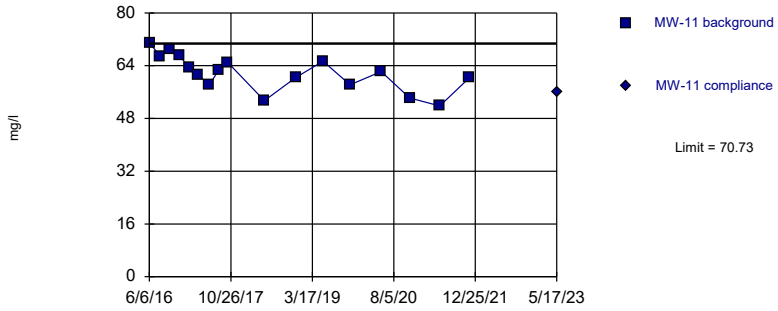
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706	MW-707B	MW-707B	MW-708	MW-708	TW-1	TW-1
6/7/2016					1.37			
6/8/2016	2.14							
6/9/2016							1.47	
6/23/2016			1.38					
8/9/2016	2.19		1.94				1.54	
8/10/2016					1.44			
10/11/2016	2.17		1.88				1.6	
10/12/2016					1.47			
12/6/2016	2.25		1.98				1.67	
12/9/2016					1.44			
2/7/2017	2.18		1.97				1.64	
2/9/2017					1.51			
4/4/2017	2.13		1.93				1.68	
4/6/2017					1.48			
6/13/2017	2.05		1.95				1.53	
6/14/2017					1.36			
8/8/2017			2.02		1.44		1.6	
8/9/2017	2.18							
10/3/2017			2.02				1.65	
10/4/2017	2.23				1.49			
5/23/2018					1.45			
5/24/2018	2.18		2.04				1.67	
12/4/2018	2.09		1.95		1.41		1.48	
5/23/2019	2.09		1.96		1.31		1.47	
11/7/2019	2.09		1.86		1.34		1.42	
5/19/2020	1.94		1.81		1.26		1.37	
11/12/2020	1.98		1.83		1.32		1.38	
5/19/2021	2.04		1.88		1.36		1.42	
11/18/2021	2.05		1.94		1.37		1.45	
5/17/2023		1.98		1.87		1.36		1.41

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=61.79, Std. Dev.=5.475, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9742, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

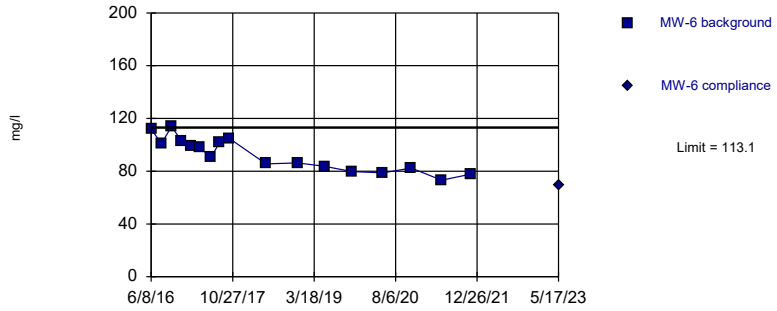
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=92.45, Std. Dev.=12.62, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9427, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

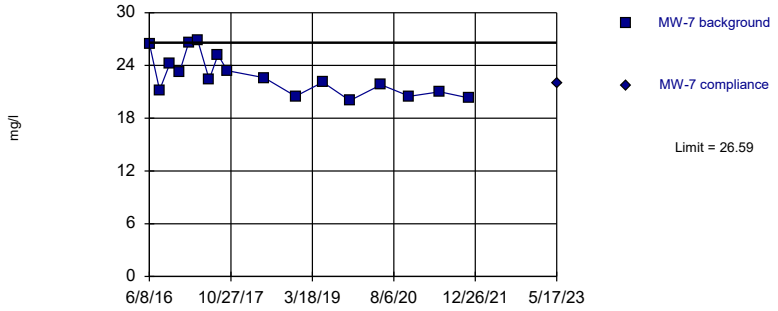
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=22.84, Std. Dev.=2.298, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.906, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

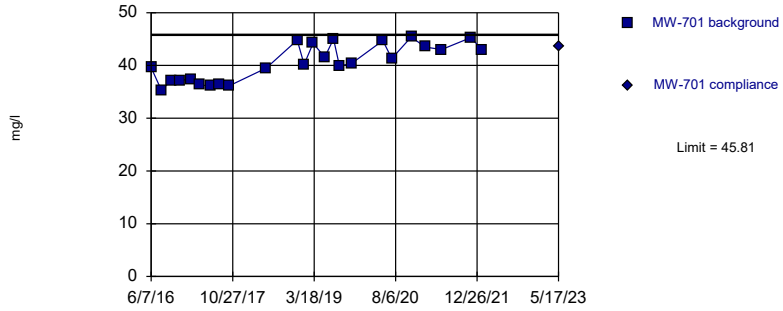
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=40.55, Std. Dev.=3.455, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9111, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CALCIUM Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

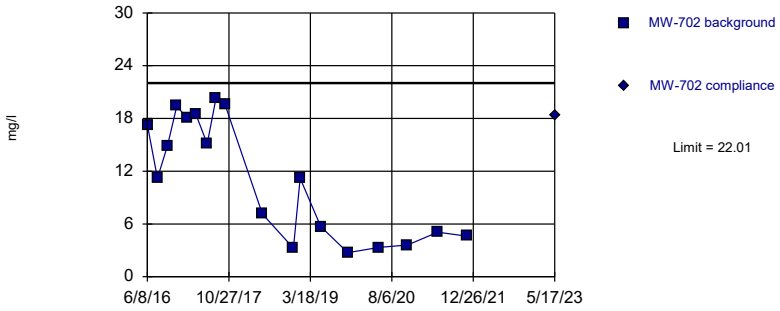
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11	MW-6	MW-6	MW-7	MW-7	MW-701	MW-701
6/6/2016	71							
6/7/2016							39.6	
6/8/2016			112		26.5			
8/9/2016							35.3	
8/10/2016			101		21.2			
8/11/2016	66.9							
10/11/2016							37.2	
10/12/2016	69.2							
10/13/2016			114		24.2			
12/6/2016							37.2	
12/9/2016	67.1							
12/12/2016			103		23.2			
2/7/2017							37.4	
2/8/2017					26.6			
2/9/2017	63.4		98.8					
4/4/2017							36.3	
4/5/2017			97.9		26.8			
4/6/2017	61.1							
6/13/2017							36.1	
6/15/2017	58.2		90.5		22.4			
8/8/2017							36.3	
8/9/2017			102		25.2			
8/10/2017	62.6							
10/3/2017							36.1	
10/5/2017	65.1		105		23.4			
5/23/2018	53.4		85.6		22.6			
5/24/2018							39.5	
12/3/2018	60.4						44.8	
12/4/2018			86.3		20.5			
1/15/2019							40.2	
3/11/2019							44.2	
5/23/2019	65.4		83.7		22.1		41.6	
7/17/2019							45	
8/23/2019							39.9	
11/7/2019	58.2		79.7		20		40.4	
5/19/2020	62.2		78.8		21.8		44.7	
7/13/2020							41.3	
11/12/2020	54.2		82.4		20.5		45.4	
2/4/2021							43.5	
5/19/2021	51.8		73.2		21		43	
11/18/2021	60.3		77.8		20.3		45.3	
1/27/2022							42.9	
5/17/2023		55.9		69.2		22		43.5

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=11.17, Std. Dev.=6.731, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8647, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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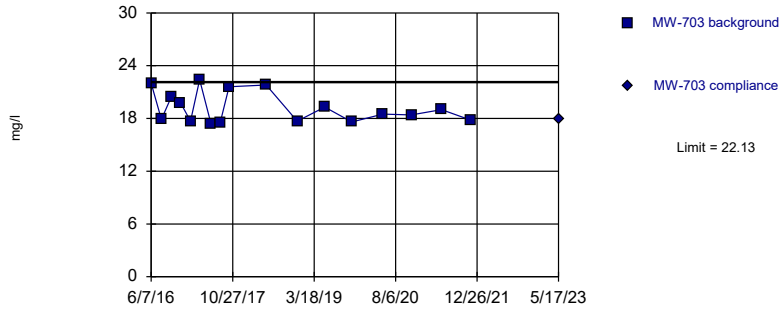
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=19.23, Std. Dev.=1.779, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8523, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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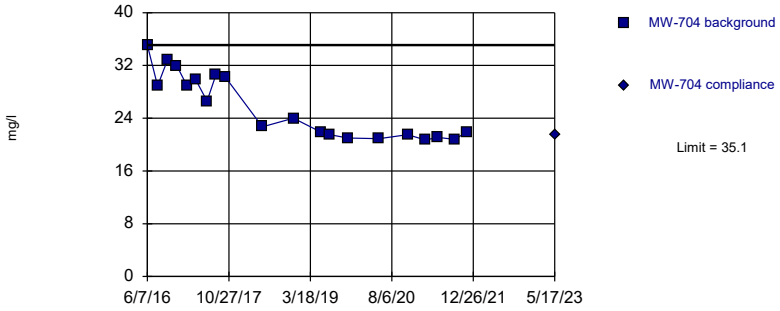
Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 20 background values. Well-constituent pair annual alpha = 0.001125. Individual comparison alpha = 0.0005627 (1 of 3).

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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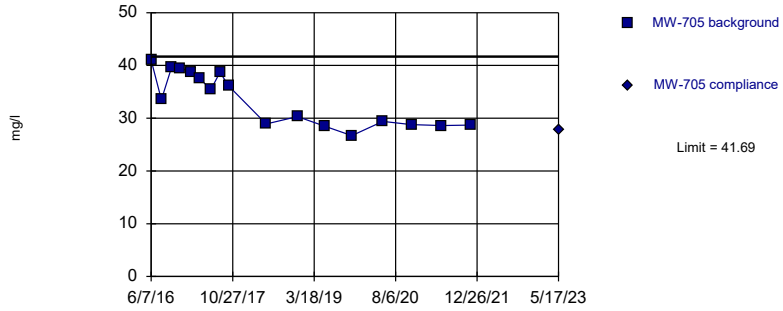
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=33.53, Std. Dev.=4.997, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8701, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CALCIUM Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

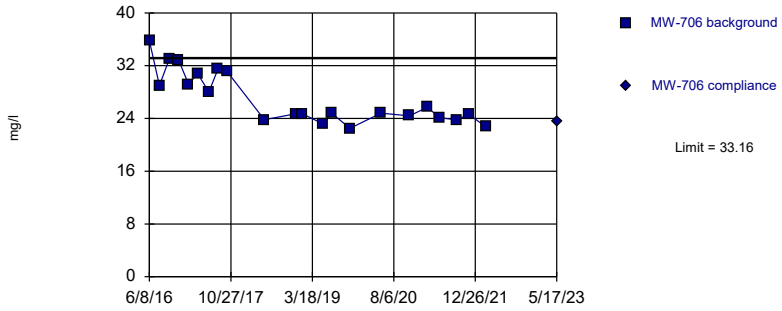
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702	MW-703	MW-703	MW-704	MW-704	MW-705	MW-705
6/7/2016			22		35.1		41	
6/8/2016	17.3							
8/9/2016	11.2		17.9		28.9		33.5	
10/11/2016	14.9		20.5		32.9		39.6	
12/6/2016			19.8		32			
12/7/2016							39.5	
12/8/2016	19.4							
2/7/2017			17.7		29			
2/8/2017	18.1							
2/9/2017							38.8	
4/4/2017			22.4		29.8			
4/5/2017	18.5							
4/6/2017							37.5	
6/13/2017					26.6		35.4	
6/14/2017			17.4					
6/15/2017	15.1							
8/8/2017					30.6			
8/9/2017	20.3						38.7	
8/10/2017			17.5					
10/3/2017	19.6				30.3		36.1	
10/5/2017			21.6					
5/24/2018	7.13		21.8		22.7		28.9	
12/3/2018	3.24		17.7		24			
12/4/2018							30.3	
1/14/2019	11.2							
5/23/2019	5.7		19.3		21.9		28.5	
7/17/2019					21.5			
11/7/2019	2.73		17.6		21		26.7	
5/19/2020	3.33		18.5		20.9		29.4	
11/12/2020	3.6		18.4		21.5		28.8	
3/3/2021					20.7			
5/19/2021	5.07		19		21.1		28.6	
8/30/2021					20.8			
11/18/2021	4.61		17.8		21.9		28.7	
5/17/2023		18.3		17.9		21.5		27.7

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=27.05, Std. Dev.=3.948, n=22. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8784, critical = 0.878. Kappa = 1.547 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:56 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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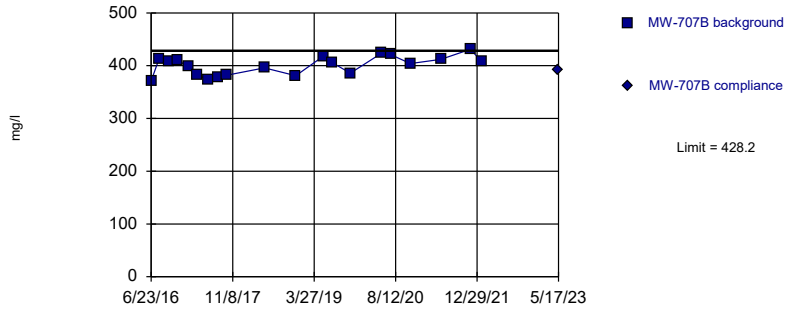
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=400.1, Std. Dev.=17.91, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9475, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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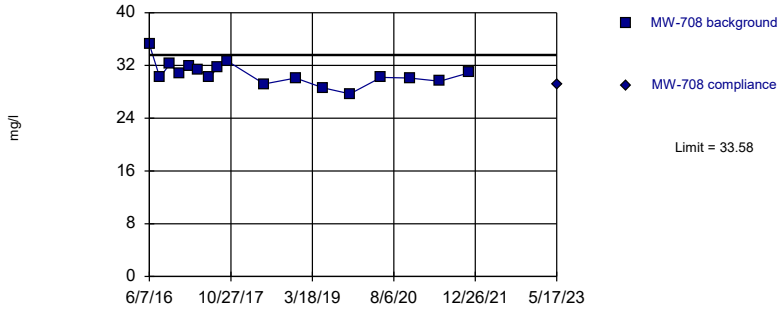
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=30.75, Std. Dev.=1.732, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9526, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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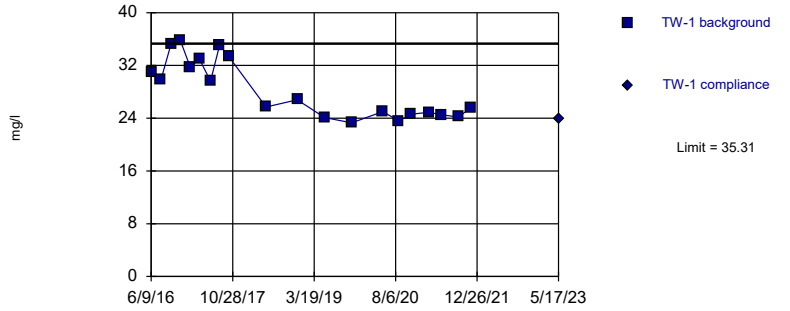
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=28.36, Std. Dev.=4.431, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.868, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CALCIUM Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CALCIUM Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

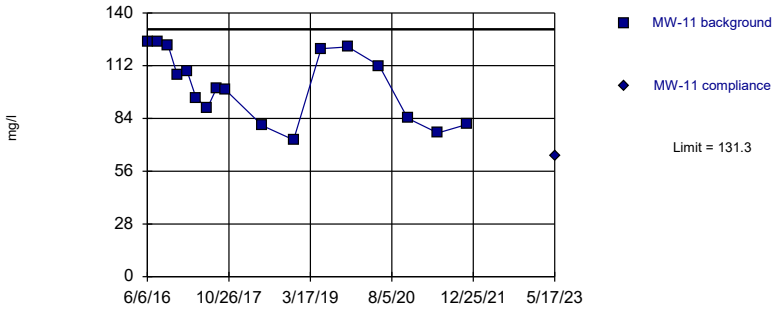
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706	MW-707B	MW-707B	MW-708	MW-708	TW-1	TW-1
6/7/2016					35.2			
6/8/2016	35.8							
6/9/2016							31	
6/23/2016			371					
8/9/2016	29		412				29.9	
8/10/2016					30.2			
10/11/2016	33.1		408				35.3	
10/12/2016					32.2			
12/6/2016	32.9		410				35.9	
12/9/2016					30.7			
2/7/2017	29.2		398				31.7	
2/9/2017					32			
4/4/2017	30.8		382				33	
4/6/2017					31.4			
6/13/2017	28		374				29.6	
6/14/2017					30.2			
8/8/2017			378		31.7		35.1	
8/9/2017	31.5							
10/3/2017			382				33.4	
10/4/2017	31.1				32.7			
5/23/2018					29.2			
5/24/2018	23.8		396				25.7	
12/4/2018	24.7		381		30.1		26.8	
1/15/2019	24.7							
5/23/2019	23.2		418		28.6		24.1	
7/17/2019	24.8		406					
11/7/2019	22.5		386		27.7		23.3	
5/19/2020	24.8		424		30.2		25	
7/13/2020			421					
8/27/2020							23.6	
11/12/2020	24.4		404		30.1		24.6	
3/3/2021	25.7						24.9	
5/19/2021	24.1		412		29.6		24.5	
8/30/2021	23.8						24.2	
11/18/2021	24.6		431		30.9		25.5	
1/27/2022			408					
3/3/2022	22.7							
5/17/2023		23.6		391		29.1		23.9

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=101.3, Std. Dev.=18.39, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9172, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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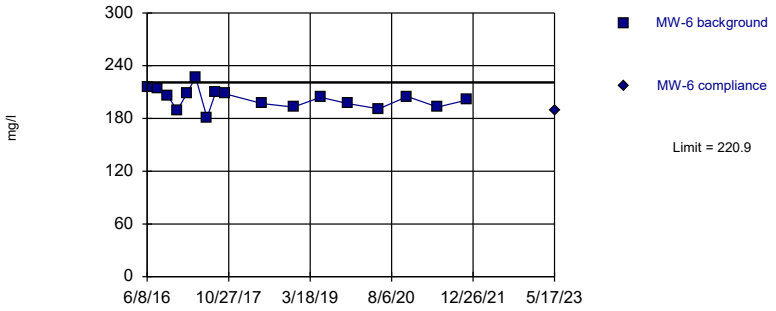
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=202.4, Std. Dev.=11.38, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9867, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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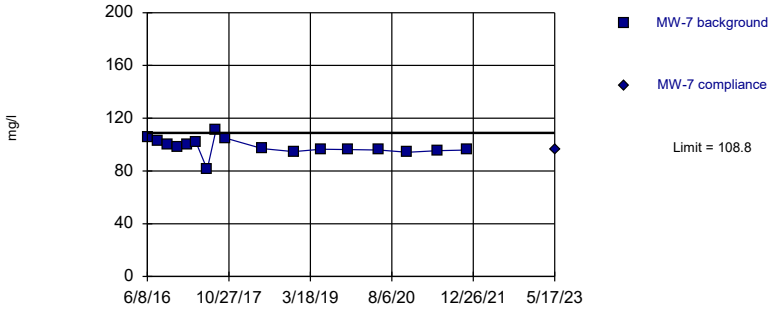
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=98.34, Std. Dev.=6.419, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9125, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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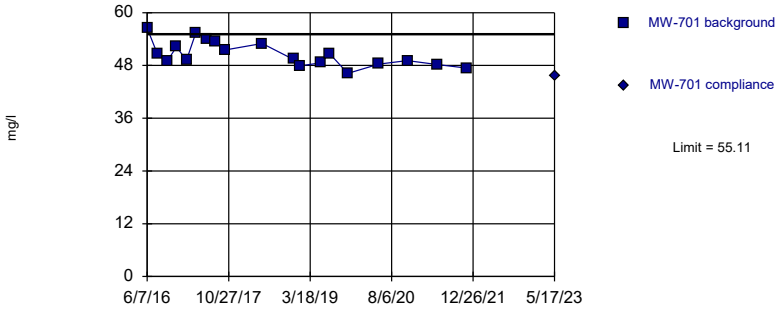
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=50.57, Std. Dev.=2.853, n=19. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9467, critical = 0.863. Kappa = 1.591 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CHLORIDE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

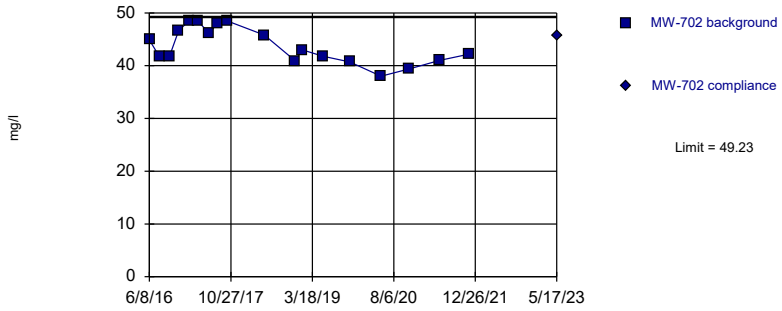
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11	MW-6	MW-6	MW-7	MW-7	MW-701	MW-701
6/6/2016	125							
6/7/2016							56.5	
6/8/2016			216		106			
8/9/2016							50.6	
8/10/2016			214		103			
8/11/2016	125							
10/11/2016							49.1	
10/12/2016	123							
10/13/2016			206		99.9			
12/6/2016							52.2	
12/9/2016	107							
12/12/2016			189		98			
2/7/2017							49.2	
2/8/2017					100			
2/9/2017	109		208					
4/4/2017							55.3	
4/5/2017			227		102			
4/6/2017	94.5							
6/13/2017							54.1	
6/15/2017	89.7		181		81.2			
8/8/2017							53.5	
8/9/2017			210		111			
8/10/2017	100							
10/3/2017							51.5	
10/5/2017	99.2		208		105			
5/23/2018	80.2		197		96.9			
5/24/2018							53	
12/3/2018	72.6						49.4	
12/4/2018			193		94.6			
1/15/2019							47.9	
5/23/2019	121		204		96.5		48.6	
7/17/2019							50.7	
11/7/2019	122		197		96.2		46.2	
5/19/2020	112		191		95.9		48.3	
11/12/2020	84.1		205		94.2		49.1	
5/19/2021	76.3		193		95.4		48.2	
11/18/2021	80.9		201		95.9		47.4	
5/17/2023		64.4		189		96.3		45.5

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=43.75, Std. Dev.=3.402, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9167, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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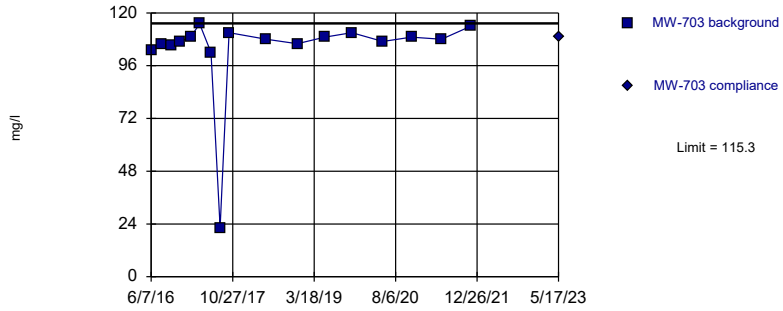
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary (based on x^6 transformation): Mean=1.5e12, Std. Dev.=5.0e11, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.857, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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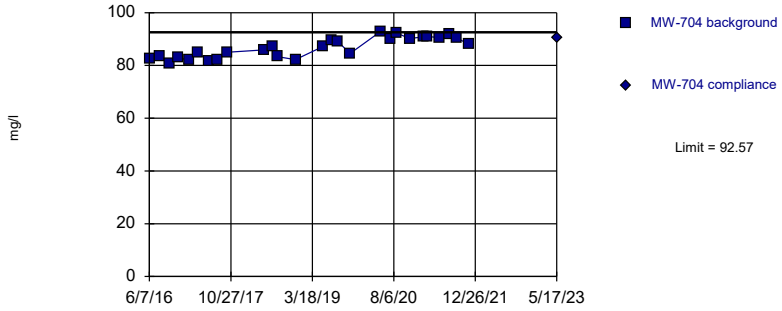
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=86.76, Std. Dev.=3.878, n=27. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9132, critical = 0.894. Kappa = 1.498 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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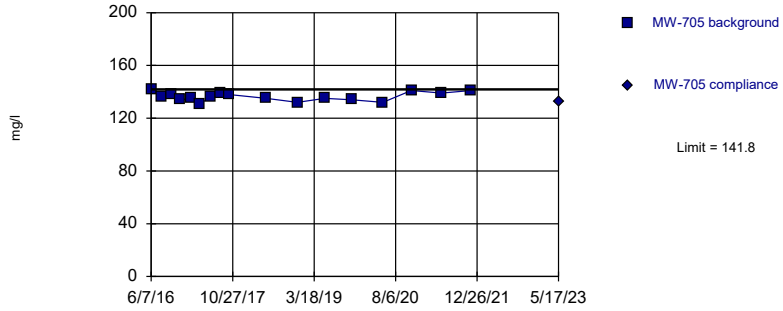
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=136.4, Std. Dev.=3.334, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9557, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CHLORIDE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

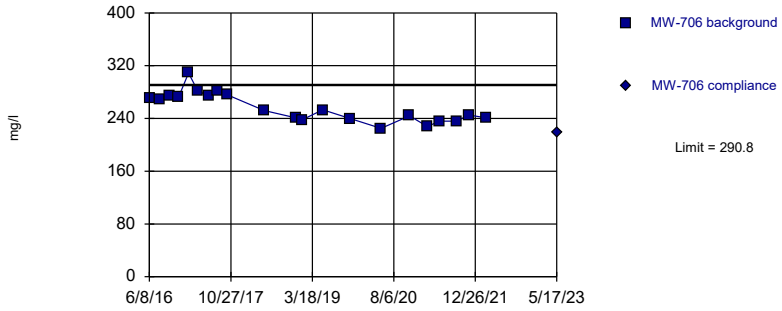
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702	MW-703	MW-703	MW-704	MW-704	MW-705	MW-705
6/7/2016			103		82.5		142	
6/8/2016	44.9							
8/9/2016	41.7		106		83.4		136	
10/11/2016	41.8		105		80.8		138	
12/6/2016			107		82.9			
12/7/2016							134	
12/8/2016	46.7							
2/7/2017			109		82			
2/8/2017	48.4							
2/9/2017							135	
4/4/2017			115		84.7			
4/5/2017	48.4							
4/6/2017							131	
6/13/2017					81.8		136	
6/14/2017			102					
6/15/2017	46.2							
8/8/2017					82.1			
8/9/2017	48.1						139	
8/10/2017			22.3					
10/3/2017	48.5				85		138	
10/5/2017			111					
5/24/2018	45.8		108		85.9		135	
7/11/2018					87.1			
8/16/2018					83.3			
12/3/2018	40.9		106		82.2			
12/4/2018							132	
1/14/2019	43							
5/23/2019	41.8		109		87.2		135	
7/17/2019					89.7			
8/23/2019					89.2			
11/7/2019	40.7		111		84.5		134	
5/19/2020	38		107		93		132	
7/13/2020					90.1			
8/27/2020					92.2			
11/12/2020	39.4		109		90.2		141	
2/4/2021					90.8			
3/3/2021					91			
5/19/2021	41		108		90.5		139	
7/21/2021					91.9			
8/30/2021					90.4			
11/18/2021	42.2		114		88.1		141	
5/17/2023		45.7		109		90.3		133

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=256.5, Std. Dev.=22.01, n=21. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9274, critical = 0.873. Kappa = 1.558 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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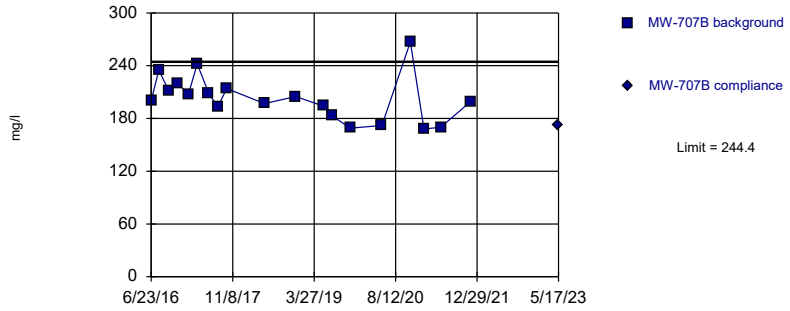
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=202.9, Std. Dev.=26.08, n=19. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9401, critical = 0.863. Kappa = 1.591 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

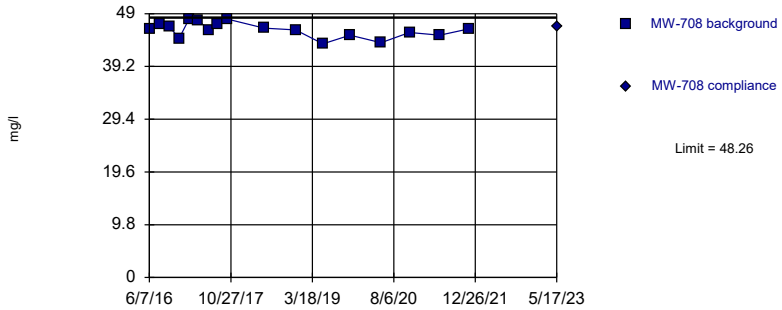
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=45.99, Std. Dev.=1.389, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9543, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

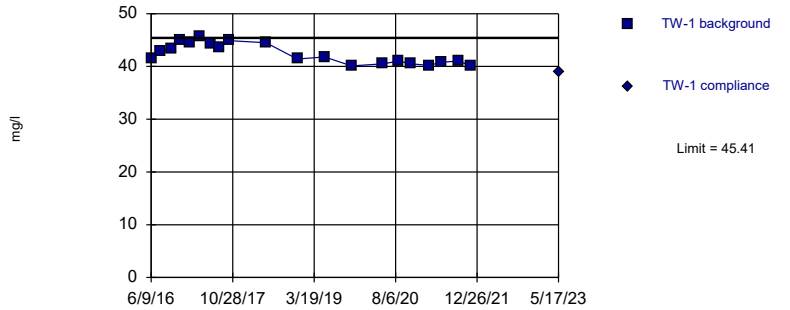
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=42.39, Std. Dev.=1.922, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8888, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: CHLORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: CHLORIDE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

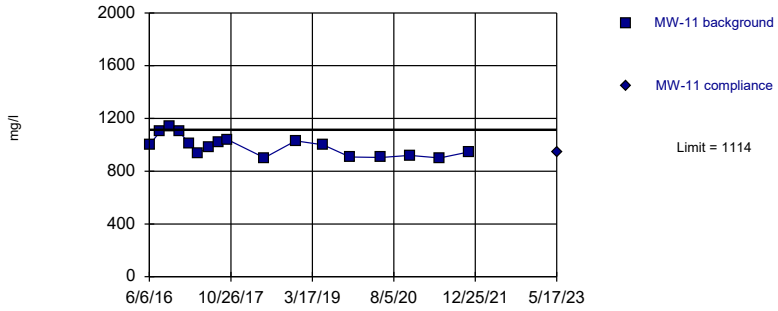
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706	MW-707B	MW-707B	MW-708	MW-708	TW-1	TW-1
6/7/2016					46.2			
6/8/2016	270							
6/9/2016							41.5	
6/23/2016			200					
8/9/2016	269		235				42.9	
8/10/2016					47			
10/11/2016	274		211				43.4	
10/12/2016					46.5			
12/6/2016	272		220				45.1	
12/9/2016					44.4			
2/7/2017	309		207				44.5	
2/9/2017					48			
4/4/2017	282		242				45.7	
4/6/2017					47.7			
6/13/2017	274		209				44.3	
6/14/2017					46			
8/8/2017			193		47.1		43.5	
8/9/2017	282							
10/3/2017			214				44.9	
10/4/2017	276				48			
5/23/2018					46.3			
5/24/2018	252		197				44.5	
12/4/2018	241		205		46		41.4	
1/15/2019	238							
5/23/2019	253		194		43.4		41.8	
7/17/2019			183					
11/7/2019	240		169		45		40.1	
5/19/2020	225		172		43.6		40.5	
8/27/2020							41	
11/12/2020	244		267		45.5		40.5	
2/4/2021			168					
3/3/2021	228						40.2	
5/19/2021	236		170		45		40.8	
8/30/2021	236						41	
11/18/2021	245		199		46.2		40.2	
3/3/2022	241							
5/17/2023		218		172		46.5		39

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=990.7, Std. Dev.=75.76, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.923, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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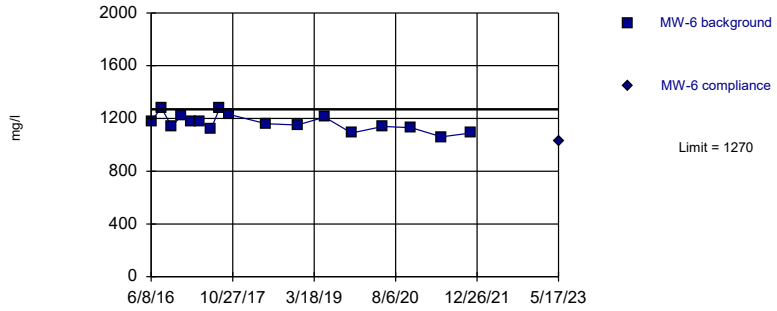
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1167, Std. Dev.=62.93, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9671, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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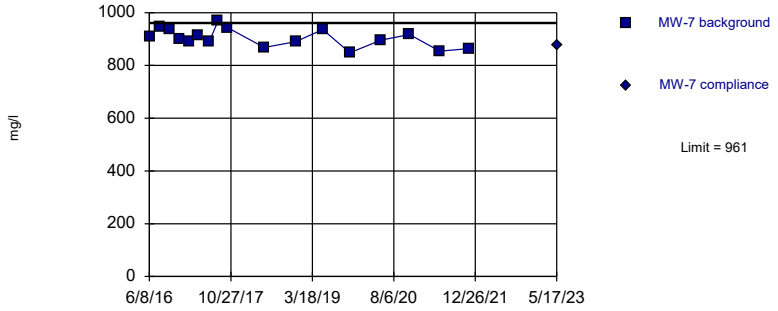
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=904.5, Std. Dev.=34.62, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9698, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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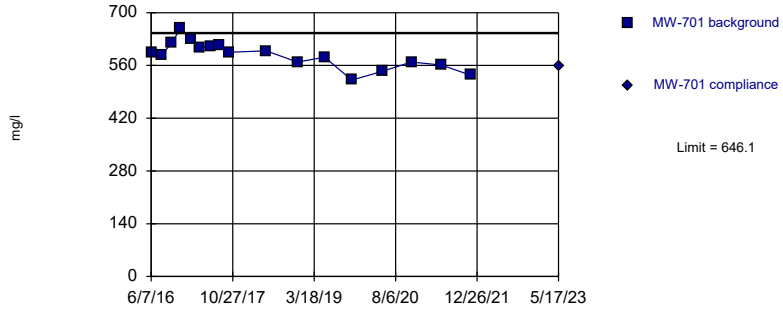
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=588.1, Std. Dev.=35.56, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9858, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

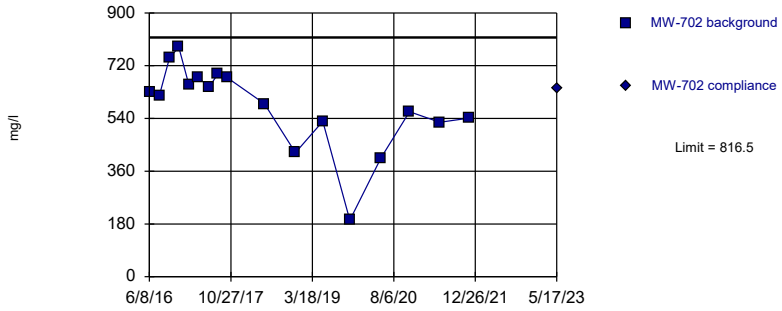
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11	MW-6	MW-6	MW-7	MW-7	MW-701	MW-701
6/6/2016	1000							
6/7/2016							595	
6/8/2016			1180		910			
8/9/2016							587	
8/10/2016			1280		946			
8/11/2016	1100							
10/11/2016							619	
10/12/2016	1140							
10/13/2016			1140		938			
12/6/2016							658	
12/9/2016	1100							
12/12/2016			1220		902			
2/7/2017							631	
2/8/2017					890			
2/9/2017	1010		1180					
4/4/2017							607	
4/5/2017			1180		916			
4/6/2017	938							
6/13/2017							612	
6/15/2017	984		1120		890			
8/8/2017							613	
8/9/2017			1280		968			
8/10/2017	1020							
10/3/2017							595	
10/5/2017	1040		1230		944			
5/23/2018	902		1160		868			
5/24/2018							599	
12/3/2018	1030						569	
12/4/2018			1150		890			
5/23/2019	1000		1210		936		582	
11/7/2019	908		1090		848		521	
5/19/2020	904		1140		896		545	
11/12/2020	920		1130		917		569	
5/19/2021	900		1060		854		561	
11/18/2021	946		1090		864		534	
5/17/2023		942		1030		878		559

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=582.8, Std. Dev.=143.2, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9117, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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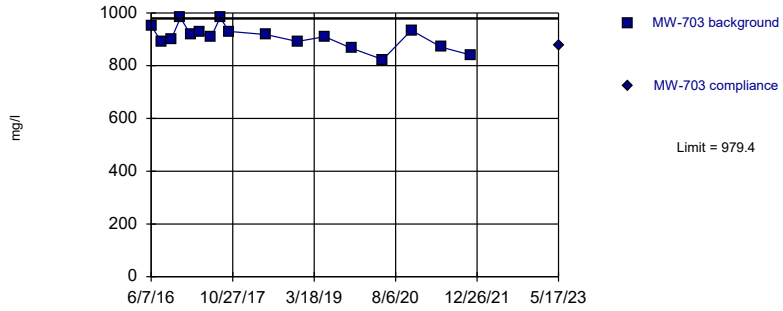
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=908.4, Std. Dev.=43.48, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9715, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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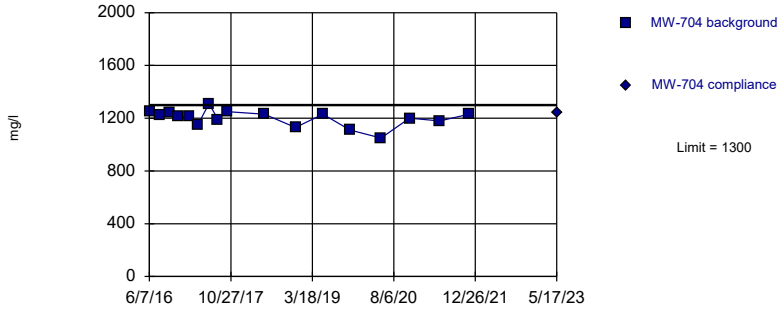
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1199, Std. Dev.=61.49, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.936, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

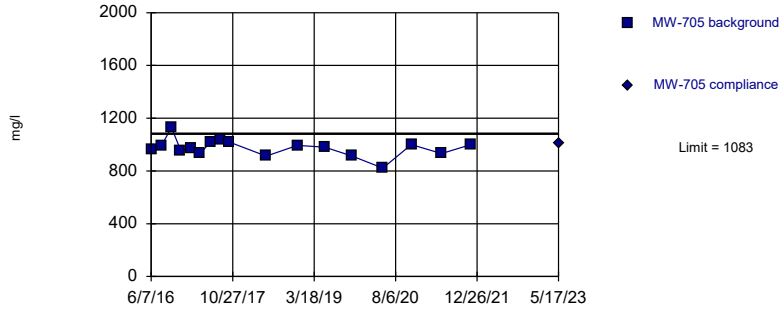
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=974.9, Std. Dev.=65.95, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9542, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

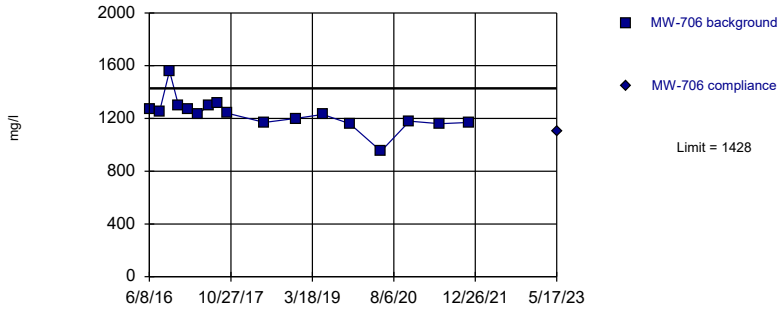
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702	MW-703	MW-703	MW-704	MW-704	MW-705	MW-705
6/7/2016			952		1250		960	
6/8/2016	629							
8/9/2016	619		890		1220		992	
10/11/2016	747		902		1240		1130	
12/6/2016			982		1210			
12/7/2016							958	
12/8/2016	783							
2/7/2017			918		1210			
2/8/2017	657							
2/9/2017							968	
4/4/2017			926		1150			
4/5/2017	680							
4/6/2017							932	
6/13/2017					1310		1020	
6/14/2017			908					
6/15/2017	648							
8/8/2017					1190			
8/9/2017	692						1040	
8/10/2017			982					
10/3/2017	680				1250		1020	
10/5/2017			930					
5/24/2018	590		918		1230		912	
12/3/2018	423		892		1130			
12/4/2018							994	
5/23/2019	530		910		1230		980	
11/7/2019	193		866		1110		914	
5/19/2020	406		823		1050		822	
11/12/2020	563		934		1200		1000	
5/19/2021	527		870		1180		932	
11/18/2021	541		840		1230		1000	
5/17/2023		643		876		1240		1010

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1233, Std. Dev.=119.4, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8686, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

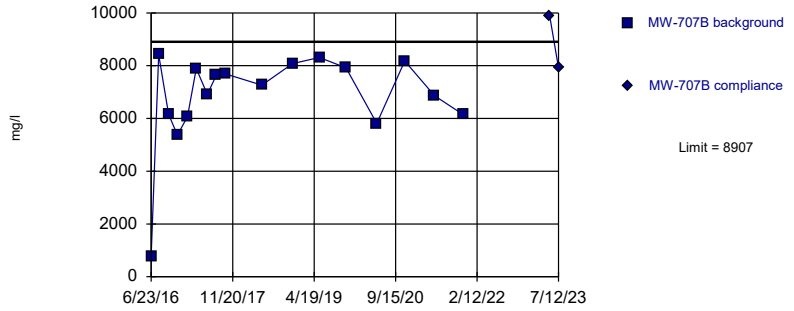
Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary (based on square transformation): Mean=4.9e7, Std. Dev.=1.8e7, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9023, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

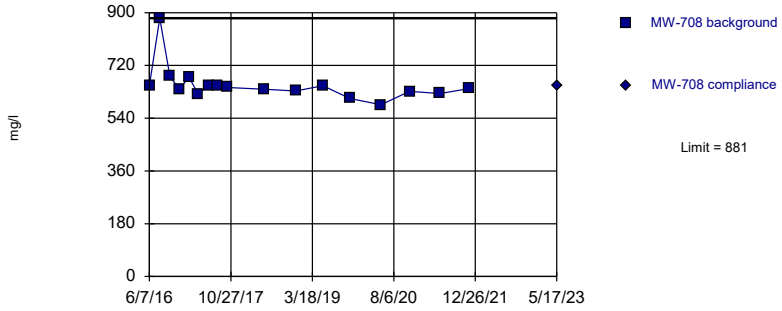
Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 17 background values. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

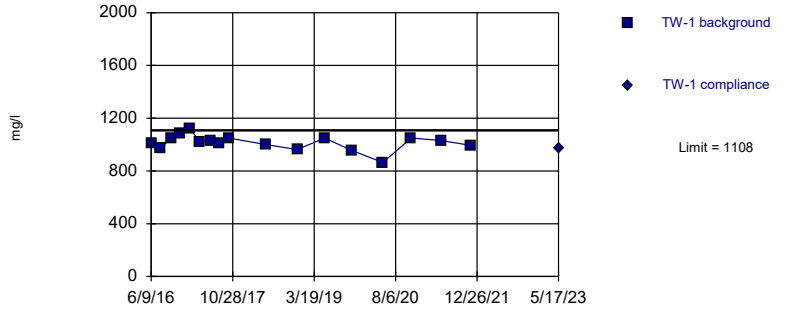
Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1015, Std. Dev.=56.98, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9408, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: DISSOLVED SOLIDS Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

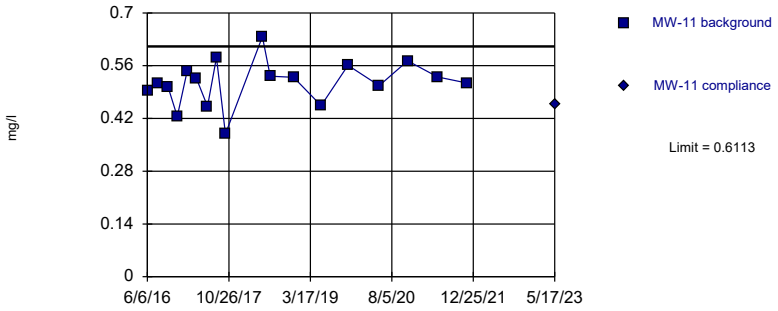
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706	MW-707B	MW-707B	MW-708	MW-708	TW-1	TW-1
6/7/2016					651			
6/8/2016	1270							
6/9/2016							1010	
6/23/2016			770					
8/9/2016	1250		8420				976	
8/10/2016					881			
10/11/2016	1560		6160				1050	
10/12/2016					684			
12/6/2016	1300		5370				1080	
12/9/2016					639			
2/7/2017	1270		6070				1120	
2/9/2017					679			
4/4/2017	1230		7890				1020	
4/6/2017					623			
6/13/2017	1300		6910				1030	
6/14/2017					653			
8/8/2017			7640		649		1010	
8/9/2017	1320							
10/3/2017			7690				1050	
10/4/2017	1240				645			
5/23/2018					639			
5/24/2018	1170		7260				1000	
12/4/2018	1200		8080		633		962	
5/23/2019	1230		8310		651		1050	
11/7/2019	1160		7920		607		956	
5/19/2020	952		5810		586		864	
11/12/2020	1180		8180		632		1050	
5/19/2021	1160		6860		624		1030	
11/18/2021	1170		6140		641		994	
5/17/2023		1100		9880		652		974
7/12/2023				7920	1st verification			

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.5143, Std. Dev.=0.06021, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9697, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

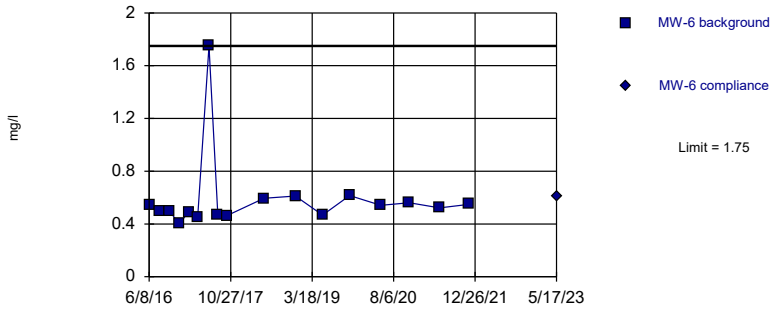
Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 17 background values. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

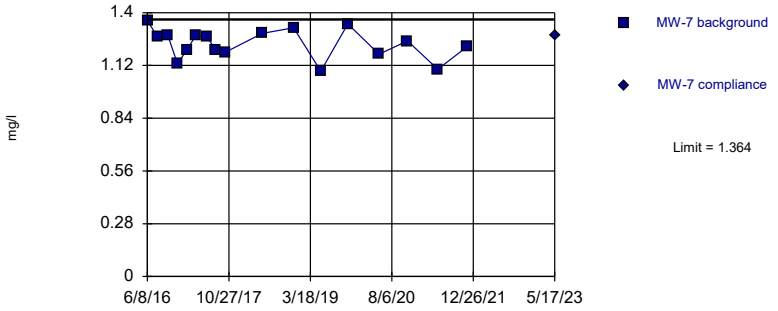
Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.234, Std. Dev.=0.07968, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9599, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

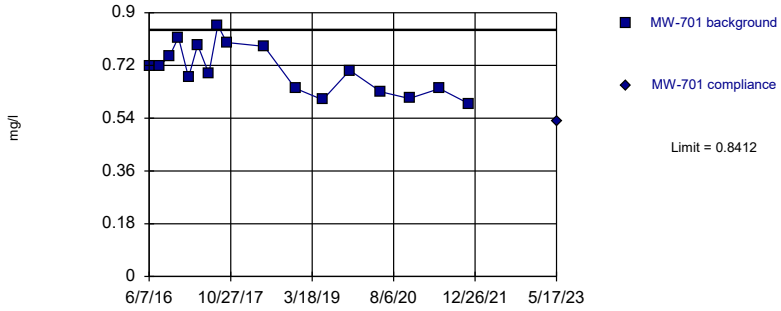
Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.707, Std. Dev.=0.08219, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9534, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: FLUORIDE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

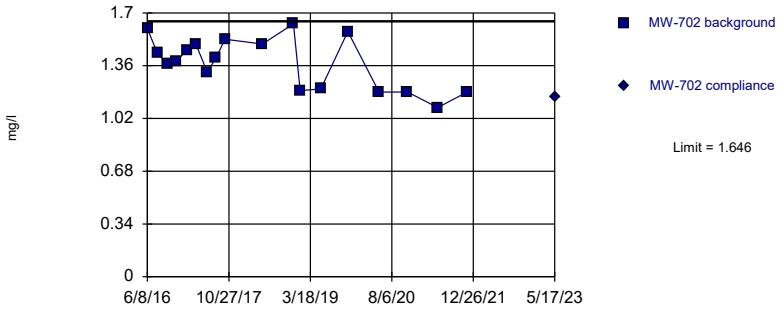
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11	MW-6	MW-6	MW-7	MW-7	MW-701	MW-701
6/6/2016	0.493							
6/7/2016							0.717	
6/8/2016			0.545		1.36			
8/9/2016							0.719	
8/10/2016			0.495		1.27			
8/11/2016	0.512							
10/11/2016							0.751	
10/12/2016	0.504							
10/13/2016			0.497		1.28			
12/6/2016							0.816	
12/9/2016	0.425							
12/12/2016			0.401		1.13			
2/7/2017							0.679	
2/8/2017					1.2			
2/9/2017	0.546		0.492					
4/4/2017							0.79	
4/5/2017			0.447		1.28			
4/6/2017	0.527							
6/13/2017							0.692	
6/15/2017	0.452		1.75		1.27			
8/8/2017							0.857	
8/9/2017			0.473		1.2			
8/10/2017	0.582							
10/3/2017							0.798	
10/5/2017	0.379		0.464		1.19			
5/23/2018	0.637		0.595		1.29			
5/24/2018							0.785	
7/11/2018	0.532							
12/3/2018	0.529						0.642	
12/4/2018			0.612		1.32			
5/23/2019	0.454		0.467		1.09		0.603	
11/7/2019	0.561		0.615		1.34		0.703	
5/19/2020	0.507		0.541		1.18		0.63	
11/12/2020	0.573		0.561		1.25		0.607	
5/19/2021	0.53		0.522		1.1		0.641	
11/18/2021	0.514		0.549		1.22		0.589	
5/17/2023		0.457		0.606		1.28		0.528

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.378, Std. Dev.=0.1664, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9358, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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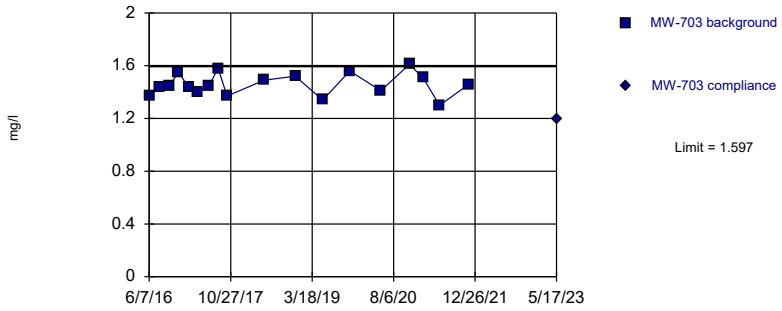
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.458, Std. Dev.=0.08583, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9821, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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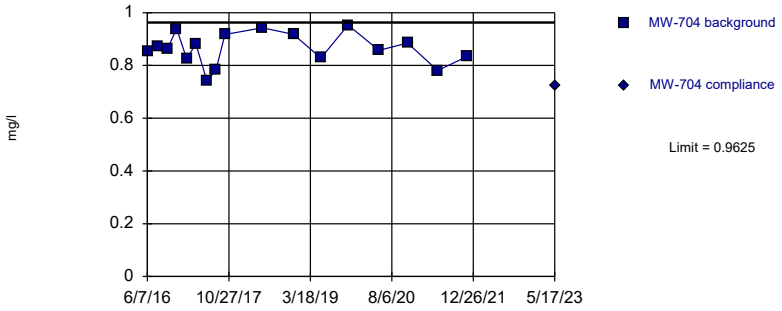
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.8633, Std. Dev.=0.06078, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9661, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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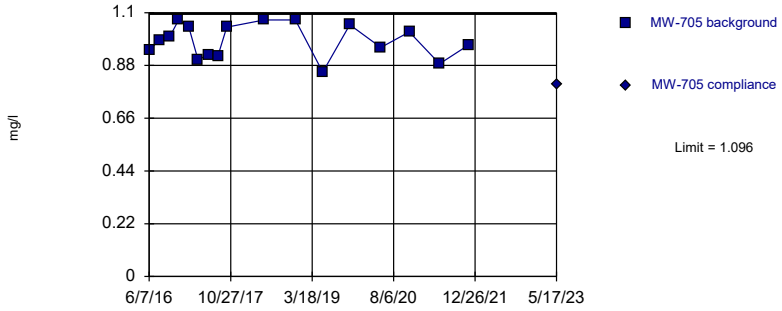
Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.9821, Std. Dev.=0.06972, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9382, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: FLUORIDE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

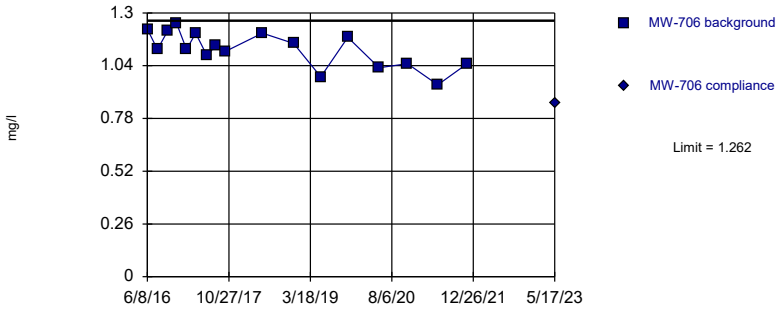
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702	MW-703	MW-703	MW-704	MW-704	MW-705	MW-705
6/7/2016			1.37		0.852		0.944	
6/8/2016	1.6							
8/9/2016	1.44		1.44		0.874		0.985	
10/11/2016	1.37		1.45		0.865		0.998	
12/6/2016			1.55		0.939			
12/7/2016							1.07	
12/8/2016	1.39							
2/7/2017			1.44		0.825			
2/8/2017	1.46							
2/9/2017							1.04	
4/4/2017			1.4		0.882			
4/5/2017	1.5							
4/6/2017							0.905	
6/13/2017					0.74		0.924	
6/14/2017			1.45					
6/15/2017	1.32							
8/8/2017					0.783			
8/9/2017	1.41						0.92	
8/10/2017			1.58					
10/3/2017	1.53				0.917		1.04	
10/5/2017			1.37					
5/24/2018	1.5		1.49		0.943		1.07	
12/3/2018	1.63		1.52		0.918			
12/4/2018							1.07	
1/14/2019	1.2							
5/23/2019	1.21		1.34		0.828		0.852	
11/7/2019	1.58		1.56		0.953		1.05	
5/19/2020	1.19		1.41		0.857		0.955	
11/12/2020	1.19		1.61		0.885		1.02	
2/4/2021			1.51					
5/19/2021	1.09		1.3		0.781		0.887	
11/18/2021	1.19		1.46		0.834		0.966	
5/17/2023		1.16		1.2		0.723		0.799

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=1.121, Std. Dev.=0.08664, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9623, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

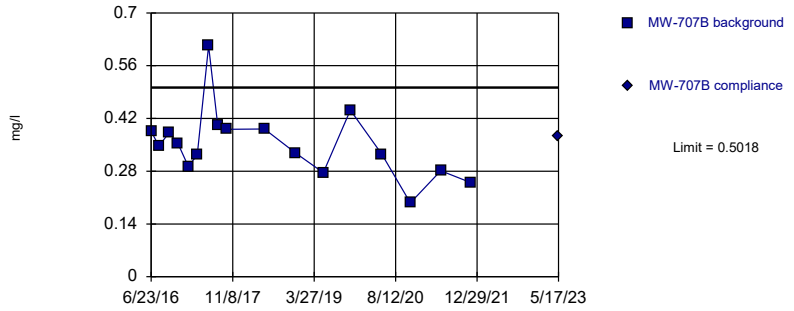
Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.3518, Std. Dev.=0.09189, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.912, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

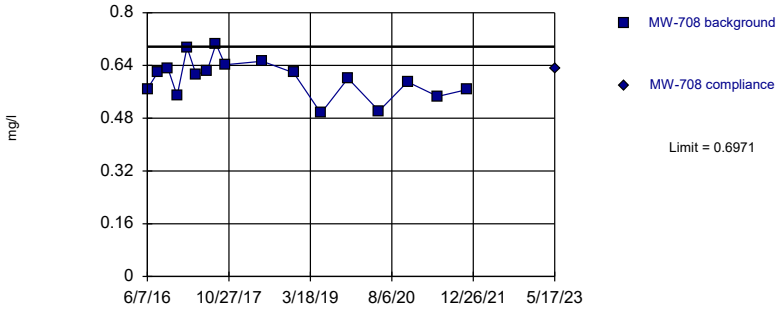
Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.6011, Std. Dev.=0.05886, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9716, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

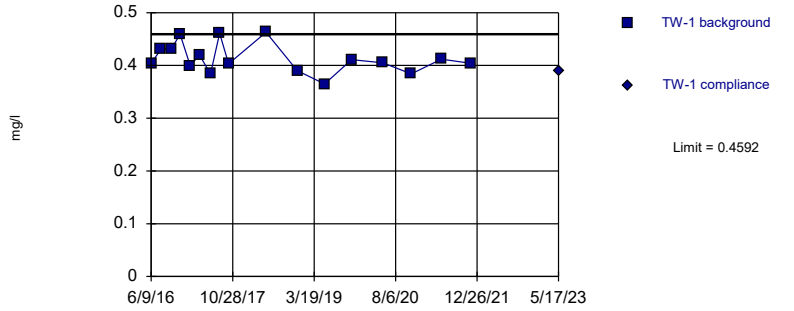
Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=0.4133, Std. Dev.=0.02813, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9332, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: FLUORIDE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: FLUORIDE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

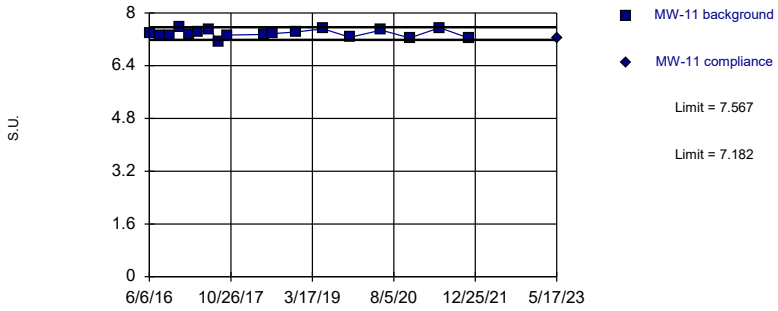
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706	MW-707B	MW-707B	MW-708	MW-708	TW-1	TW-1
6/7/2016					0.569			
6/8/2016	1.22							
6/9/2016							0.404	
6/23/2016			0.386					
8/9/2016	1.12		0.347				0.431	
8/10/2016					0.619			
10/11/2016	1.21		0.382				0.431	
10/12/2016					0.632			
12/6/2016	1.25		0.353				0.459	
12/9/2016					0.548			
2/7/2017	1.12		0.293				0.399	
2/9/2017					0.695			
4/4/2017	1.2		0.323				0.42	
4/6/2017					0.612			
6/13/2017	1.09		0.613				0.384	
6/14/2017					0.624			
8/8/2017			0.402		0.705		0.461	
8/9/2017	1.14							
10/3/2017			0.391				0.403	
10/4/2017	1.11				0.642			
5/23/2018					0.653			
5/24/2018	1.2		0.392				0.463	
12/4/2018	1.15		0.328		0.618		0.39	
5/23/2019	0.985		0.276		0.495		0.365	
11/7/2019	1.18		0.442		0.601		0.411	
5/19/2020	1.03		0.325		0.502		0.405	
11/12/2020	1.05		0.196		0.59		0.384	
5/19/2021	0.946		0.281		0.546		0.412	
11/18/2021	1.05		0.25		0.567		0.404	
5/17/2023		0.858		0.372		0.631		0.389

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.374, Std. Dev.=0.1193, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9783, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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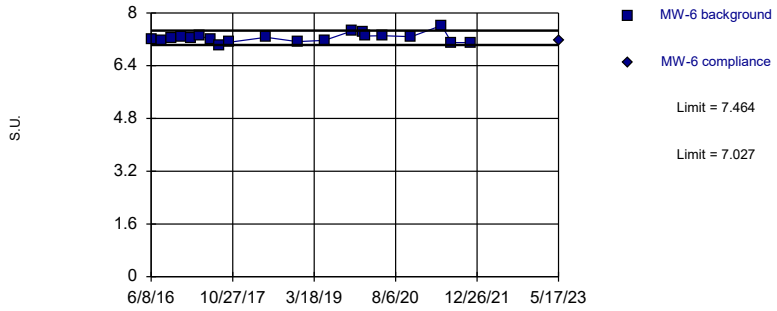
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.246, Std. Dev.=0.1392, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9364, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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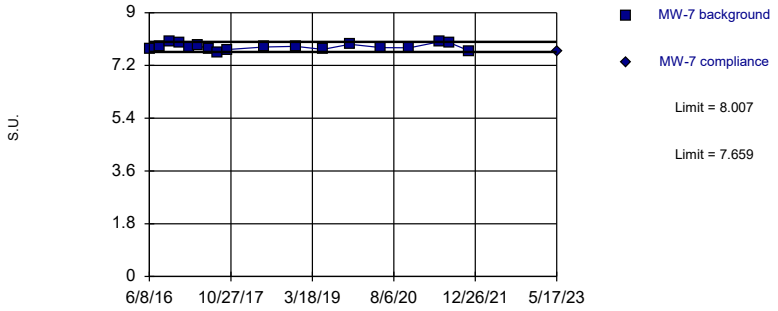
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.833, Std. Dev.=0.108, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9664, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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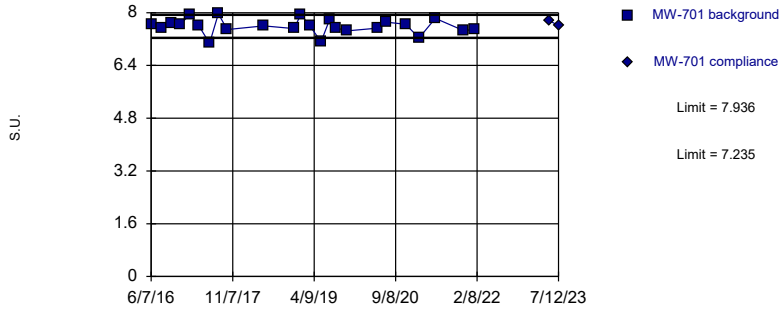
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.586, Std. Dev.=0.23, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.939, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: pH Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

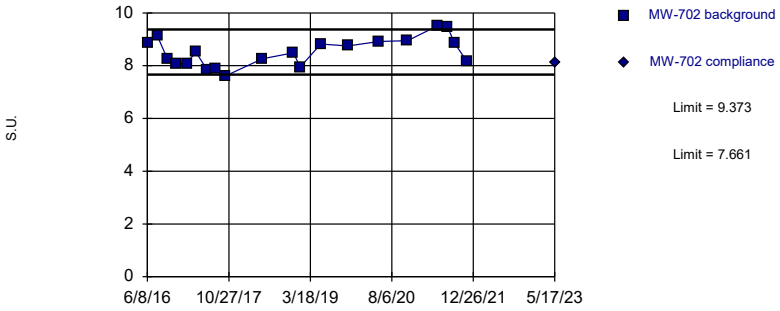
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11	MW-6	MW-6	MW-7	MW-7	MW-701	MW-701	
6/6/2016	7.37								
6/7/2016							7.63		
6/8/2016			7.19		7.77				
8/9/2016							7.54		
8/10/2016			7.18		7.83				
8/11/2016	7.3								
10/11/2016							7.67		
10/12/2016	7.33								
10/13/2016			7.24		8				
12/6/2016							7.63		
12/9/2016	7.58								
12/12/2016			7.27		7.96				
2/7/2017							7.94		
2/8/2017					7.79				
2/9/2017	7.36		7.25						
4/4/2017							7.62		
4/5/2017			7.3		7.89				
4/6/2017	7.41								
6/13/2017							7.07		
6/15/2017	7.5		7.2		7.75				
8/8/2017							7.97		
8/9/2017			7.02		7.62				
8/10/2017	7.14								
10/3/2017							7.49		
10/5/2017	7.33		7.11		7.74				
5/23/2018	7.35		7.26		7.83				
5/24/2018							7.6		
7/11/2018	7.37								
12/3/2018	7.42						7.52		
12/4/2018			7.13		7.85				
1/15/2019							7.95		
3/11/2019							7.61		
5/23/2019	7.52		7.17		7.75		7.12		
7/17/2019							7.8		
8/23/2019							7.54		
11/7/2019	7.26		7.45		7.92		7.45		
1/14/2020			7.43						
2/3/2020			7.3						
5/19/2020	7.48		7.31		7.81		7.53		
7/13/2020							7.71		
11/12/2020	7.24		7.28		7.8		7.65		
2/4/2021							7.23		
5/19/2021	7.55		7.62		8.01		7.83		
7/21/2021			7.1		7.97				
11/18/2021	7.23		7.1		7.7		7.45		
1/27/2022							7.51		
5/17/2023		7.22		7.17		7.68		7.75	
7/12/2023								7.61	Extra

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=8.517, Std. Dev.=0.5454, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9614, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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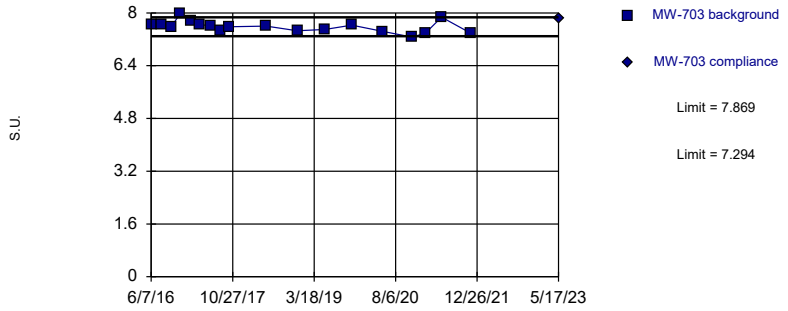
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.581, Std. Dev.=0.1784, n=18. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.957, critical = 0.858. Kappa = 1.612 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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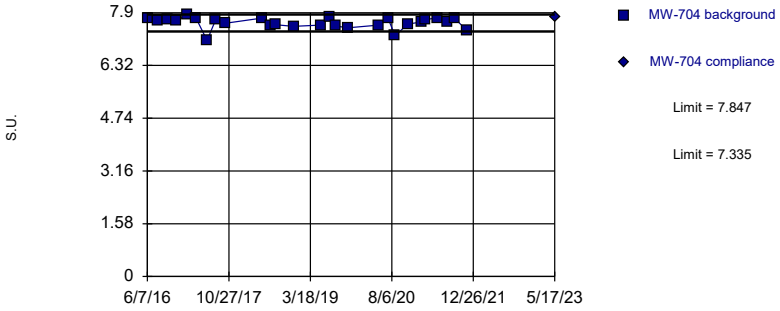
Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary (based on cube transformation): Mean=438.9, Std. Dev.=29.53, n=27. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8988, critical = 0.894. Kappa = 1.498 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

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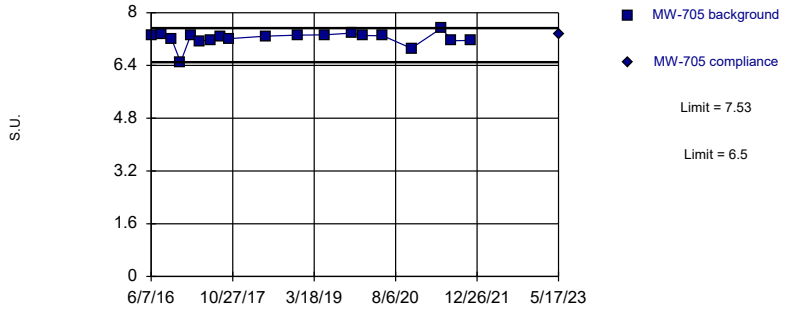
Within Limits

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limits are highest and lowest of 19 background values. Well-constituent pair annual alpha = 0.002713. Individual comparison alpha = 0.001357 (1 of 3).

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: pH Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

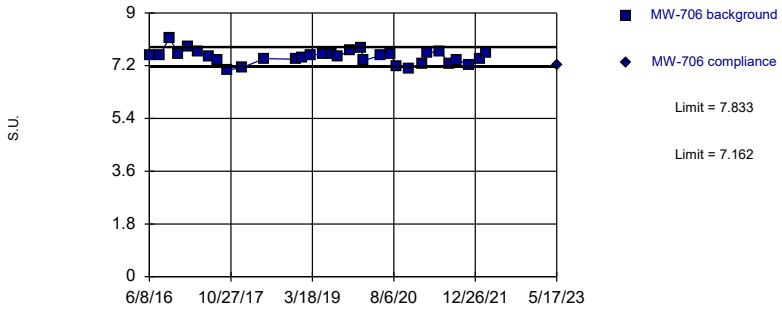
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702	MW-703	MW-703	MW-704	MW-704	MW-705	MW-705
6/7/2016			7.63		7.74		7.3	
6/8/2016	8.86							
8/9/2016	9.12		7.65		7.65		7.35	
10/11/2016	8.25		7.59		7.71		7.21	
12/6/2016					7.66			
12/7/2016			8				6.5	
12/8/2016	8.07							
2/7/2017			7.76		7.83			
2/8/2017	8.09							
2/9/2017							7.33	
4/4/2017			7.64		7.75			
4/5/2017	8.52							
4/6/2017							7.14	
6/13/2017					7.07		7.18	
6/14/2017			7.62					
6/15/2017	7.84							
8/8/2017					7.71			
8/9/2017	7.87						7.29	
8/10/2017			7.47					
10/3/2017	7.6				7.58		7.21	
10/5/2017			7.58					
5/24/2018	8.26		7.6		7.74		7.29	
7/11/2018					7.53			
8/16/2018					7.54			
12/3/2018	8.49		7.46		7.49			
12/4/2018							7.32	
1/14/2019	7.95							
5/23/2019	8.82		7.5		7.53		7.33	
7/17/2019					7.78			
8/23/2019					7.5			
11/7/2019	8.75		7.63		7.45		7.38	
1/14/2020							7.31	
5/19/2020	8.92		7.44		7.53		7.3	
7/13/2020					7.73			
8/27/2020					7.21			
11/12/2020	8.95		7.27		7.56		6.92	
2/4/2021			7.37		7.62			
3/3/2021					7.69			
5/19/2021	9.51		7.87		7.75		7.53	
7/21/2021	9.45				7.64		7.15	
8/30/2021	8.87				7.74			
11/18/2021	8.15		7.38		7.36		7.16	
5/17/2023		8.11		7.84		7.76		7.35

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.498, Std. Dev.=0.2292, n=32. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9724, critical = 0.904. Kappa = 1.465 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

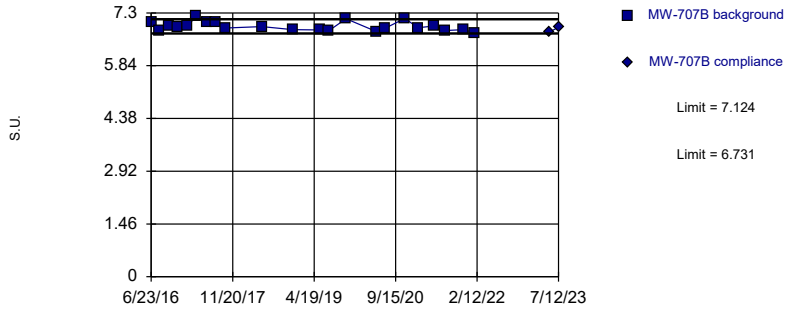
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=6.928, Std. Dev.=0.127, n=22. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9299, critical = 0.878. Kappa = 1.547 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

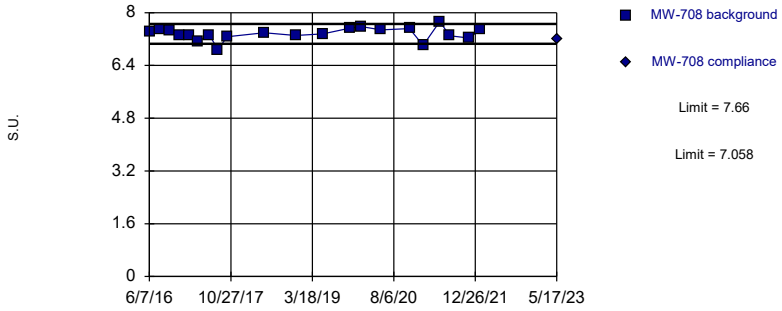
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.359, Std. Dev.=0.1933, n=21. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9535, critical = 0.873. Kappa = 1.558 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

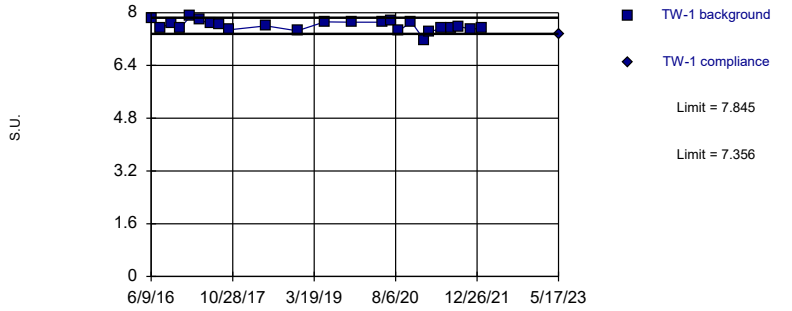
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limits

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=7.601, Std. Dev.=0.1605, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9541, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: pH Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: pH Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

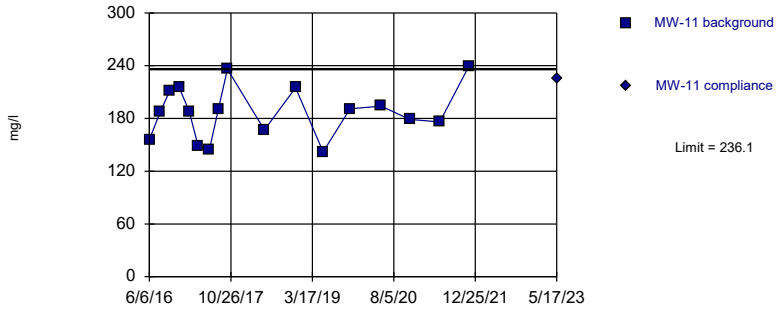
LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706	MW-707B	MW-707B	MW-708	MW-708	TW-1	TW-1
6/7/2016					7.43			
6/8/2016	7.54							
6/9/2016							7.83	
6/23/2016			7.03					
8/9/2016	7.55		6.81				7.54	
8/10/2016					7.48			
10/11/2016	8.14		6.95				7.69	
10/12/2016					7.46			
12/6/2016	7.6		6.92				7.53	
12/9/2016					7.32			
2/7/2017	7.84		6.95				7.89	
2/9/2017					7.32			
4/4/2017	7.67		7.2				7.78	
4/6/2017					7.12			
6/13/2017	7.53		7.06				7.67	
6/14/2017					7.33			
8/8/2017			7.04		6.88		7.65	
8/9/2017	7.37							
10/3/2017			6.88				7.48	
10/4/2017	7.05				7.27			
1/9/2018	7.14							
5/23/2018					7.39			
5/24/2018	7.44		6.92				7.6	
12/4/2018	7.42		6.84		7.31		7.45	
1/15/2019	7.49							
3/11/2019	7.55							
5/23/2019	7.61		6.83		7.36		7.72	
7/17/2019	7.58		6.8					
8/23/2019	7.5							
11/7/2019	7.72		7.14		7.53		7.71	
1/14/2020	7.79				7.58			
2/3/2020	7.38							
5/19/2020	7.55		6.78		7.48		7.71	
7/13/2020	7.6		6.88				7.76	
8/27/2020	7.2						7.45	
11/12/2020	7.11		7.15		7.52		7.72	
2/4/2021	7.25		6.89		7.01		7.15	
3/3/2021	7.64						7.42	
5/19/2021	7.69		6.94		7.73		7.52	
7/21/2021	7.27		6.81		7.3		7.53	
8/30/2021	7.4						7.59	
11/18/2021	7.23		6.84		7.23		7.5	
1/27/2022	7.43		6.75		7.49		7.53	
3/3/2022	7.64							
5/17/2023		7.21		6.78		7.21		7.36
7/12/2023				6.9 Extra				

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=187.2, Std. Dev.=29.94, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.956, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

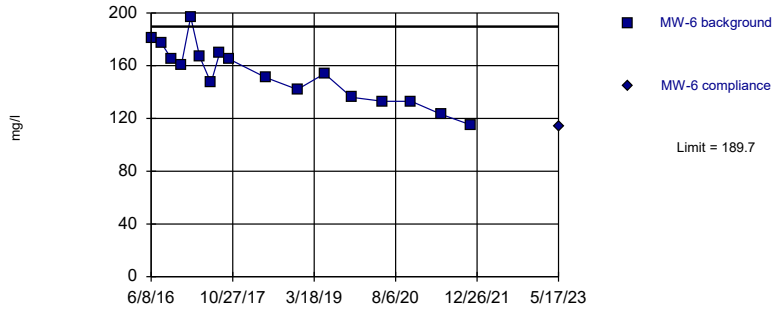
Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=153.9, Std. Dev.=21.94, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9865, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

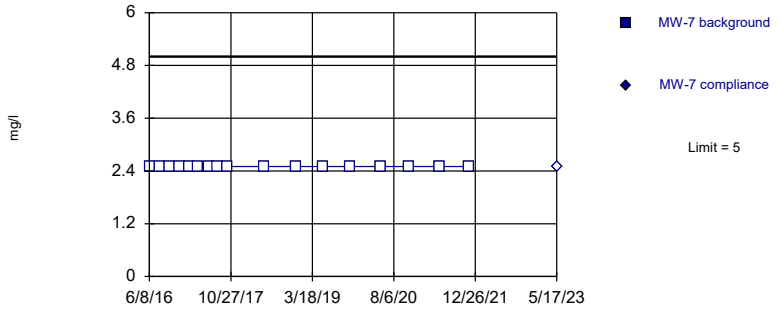
LaCygne Client: SCS Engineers Data: LaC GW Data

Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because censored data exceeded 50%. All background values (n = 17) were censored; limit is most recent reporting limit. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

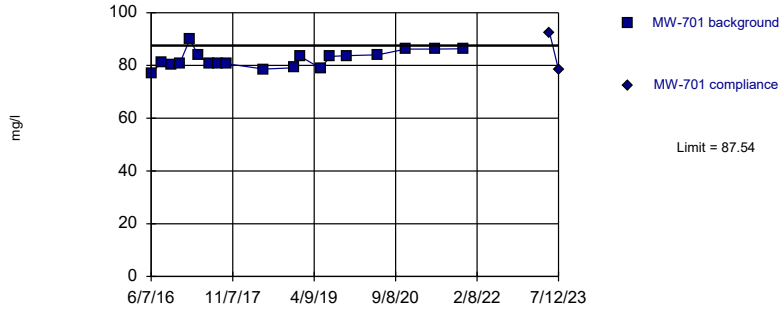
Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=82.34, Std. Dev.=3.272, n=19. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9573, critical = 0.863. Kappa = 1.591 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: SULFATE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-11	MW-11	MW-6	MW-6	MW-7	MW-7	MW-701	MW-701	
6/6/2016	156								
6/7/2016							76.9		
6/8/2016			181		<5				
8/9/2016							81.1		
8/10/2016			177		<5				
8/11/2016	187								
10/11/2016							80.3		
10/12/2016	212								
10/13/2016			165		<5				
12/6/2016							80.9		
12/9/2016	215								
12/12/2016			160		<5				
2/7/2017							89.8		
2/8/2017					<5				
2/9/2017	188		197						
4/4/2017							83.8		
4/5/2017			167		<5				
4/6/2017	148								
6/13/2017							80.6		
6/15/2017	145		147		<5				
8/8/2017							80.8		
8/9/2017			170		<5				
8/10/2017	191								
10/3/2017							80.6		
10/5/2017	236		165		<5				
5/23/2018	167		151		<5				
5/24/2018							78.6		
12/3/2018	215						79.1		
12/4/2018			142		<5				
1/15/2019							83.3		
5/23/2019	142		154		<5		78.8		
7/17/2019							83.4		
11/7/2019	191		136		<5		83.7		
5/19/2020	194		133		<5		84		
11/12/2020	179		133		<5		86.2		
5/19/2021	176		123		<5		86.2		
11/18/2021	240		115		<5		86.3		
5/17/2023		226		114		<5		92.2	
7/12/2023								78.4	1st verification

ND substitution: RL/2.

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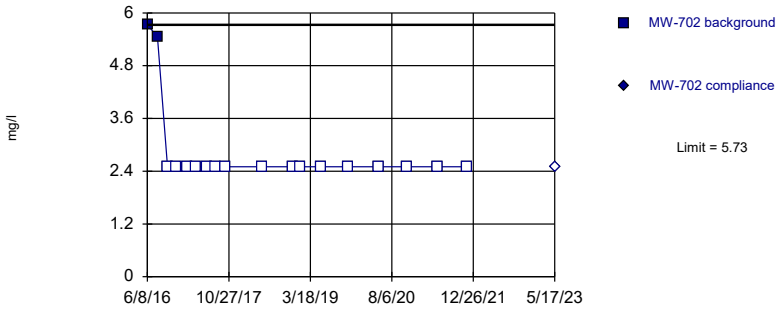
Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because censored data exceeded 50%. Limit is highest of 18 background values. 88.89% NDs. Well-constituent pair annual alpha = 0.001588. Individual comparison alpha = 0.0007943 (1 of 3).

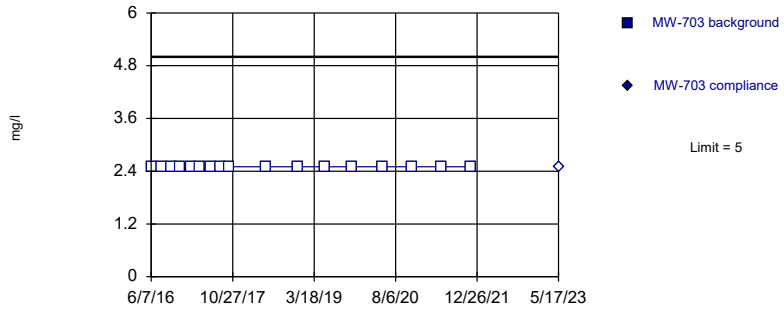
Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG
Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because censored data exceeded 50%. All background values (n = 17) were censored; limit is most recent reporting limit. Well-constituent pair annual alpha = 0.00182. Individual comparison alpha = 0.0009102 (1 of 3).

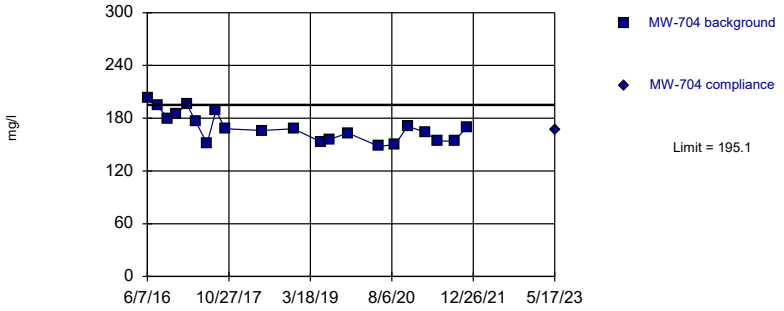
Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=169.5, Std. Dev.=16.45, n=21. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.935, critical = 0.873. Kappa = 1.558 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

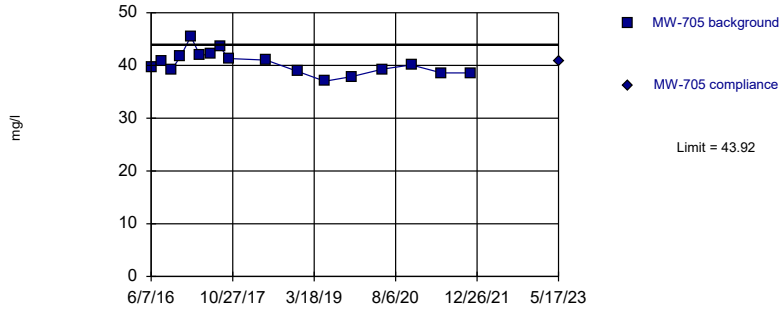
Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

Sanitas™ v.10.0.06 Software licensed to SCS Engineers. UG

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=40.41, Std. Dev.=2.15, n=17. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9648, critical = 0.851. Kappa = 1.633 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III
LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: SULFATE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-702	MW-702	MW-703	MW-703	MW-704	MW-704	MW-705	MW-705
6/7/2016			<5		203		39.6	
6/8/2016	5.73							
8/9/2016	5.46		<5		194		40.7	
10/11/2016	<5		<5		180		39.2	
12/6/2016			<5		185			
12/7/2016							41.7	
12/8/2016	<5							
2/7/2017			<5		196			
2/8/2017	<5							
2/9/2017							45.5	
4/4/2017			<5		176			
4/5/2017	<5							
4/6/2017							41.9	
6/13/2017					151		42.2	
6/14/2017			<5					
6/15/2017	<5							
8/8/2017					189			
8/9/2017	<5						43.5	
8/10/2017			<5					
10/3/2017	<5				168		41.3	
10/5/2017			<5					
5/24/2018	<5		<5		166		41	
12/3/2018	<5		<5		168			
12/4/2018							38.9	
1/14/2019	<5							
5/23/2019	<5		<5		153		37	
7/17/2019					156			
11/7/2019	<5		<5		163		37.9	
5/19/2020	<5		<5		148		39.3	
8/27/2020					150			
11/12/2020	<5		<5		171		40.1	
3/3/2021					164			
5/19/2021	<5		<5		154		38.6	
8/30/2021					154			
11/18/2021	<5		<5		170		38.6	
5/17/2023		<5		<5		167		40.7

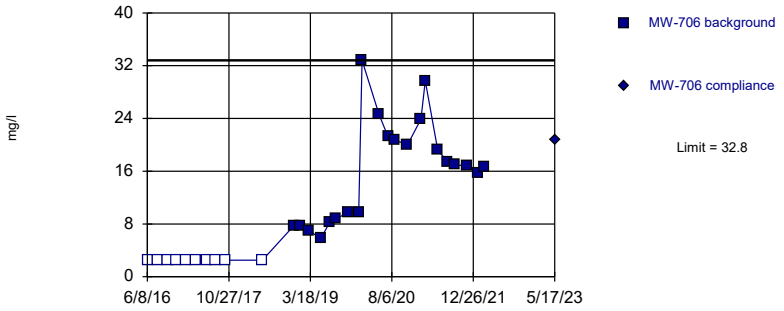
ND substitution: RL/2.

Hollow symbols indicate censored values.

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 31 background values. 32.26% NDs. Well-constituent pair annual alpha = 0.0003403. Individual comparison alpha = 0.0001701 (1 of 3).

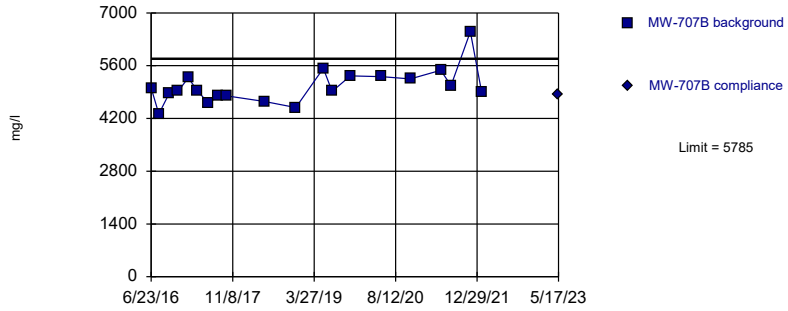
Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=5047, Std. Dev.=470.5, n=20. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.8964, critical = 0.868. Kappa = 1.57 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

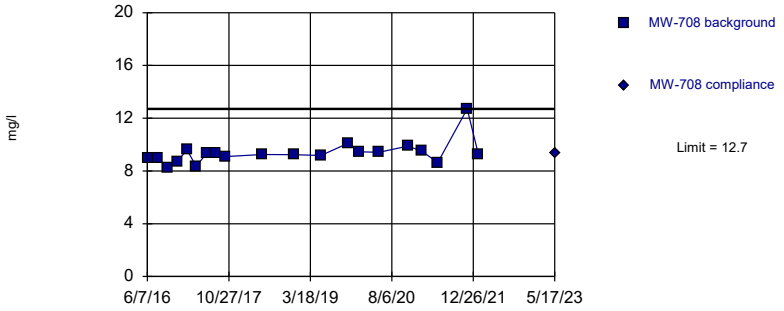
Constituent: SULFATE Analysis Run 9/7/2023 4:57 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Non-parametric



Non-parametric test used in lieu of parametric prediction limit because the Shapiro Wilk normality test showed the data to be non-normal at the 0.01 alpha level. Limit is highest of 20 background values. Well-constituent pair annual alpha = 0.001125. Individual comparison alpha = 0.0005627 (1 of 3).

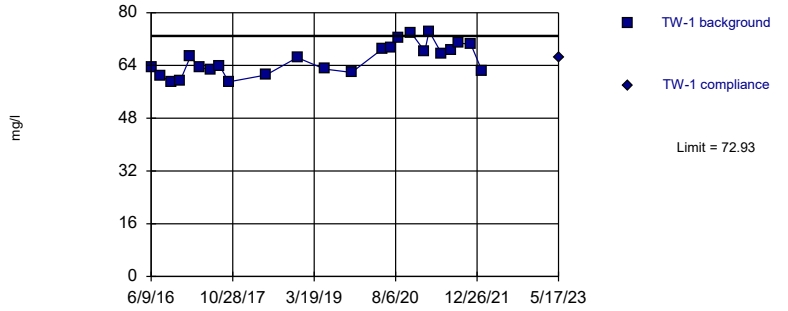
Constituent: SULFATE Analysis Run 9/7/2023 4:58 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Within Limit

Prediction Limit

Intrawell Parametric



Background Data Summary: Mean=65.73, Std. Dev.=4.73, n=24. Normality test: Shapiro Wilk @alpha = 0.01, calculated = 0.9484, critical = 0.884. Kappa = 1.524 (c=7, w=9, 1 of 3, event alpha = 0.05132). Report alpha = 0.0008358.

Constituent: SULFATE Analysis Run 9/7/2023 4:58 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

Prediction Limit

Constituent: SULFATE Analysis Run 9/7/2023 5:01 PM View: Upper AQC III

LaCygne Client: SCS Engineers Data: LaC GW Data

	MW-706	MW-706	MW-707B	MW-707B	MW-708	MW-708	TW-1	TW-1
6/7/2016					8.99			
6/8/2016	<5							
6/9/2016							63.4	
6/23/2016			5010					
8/9/2016	<5		4320				60.9	
8/10/2016					8.98			
10/11/2016	<5		4860				58.8	
10/12/2016					8.24			
12/6/2016	<5		4920				59.3	
12/9/2016					8.72			
2/7/2017	<5		5280				66.7	
2/9/2017					9.59			
4/4/2017	<5		4940				63.4	
4/6/2017					8.36			
6/13/2017	<5		4600				62.7	
6/14/2017					9.38			
8/8/2017			4790		9.36		63.9	
8/9/2017	<5							
10/3/2017			4800				59	
10/4/2017	<5				9.09			
5/23/2018					9.25			
5/24/2018	<5		4650				61.1	
12/4/2018	7.69		4490		9.24		66.4	
1/15/2019	7.73							
3/11/2019	6.96							
5/23/2019	5.78		5530		9.18		62.9	
7/17/2019	8.27		4920					
8/23/2019	8.79							
11/7/2019	9.68		5330		10.1		61.9	
1/14/2020	9.78				9.45			
2/3/2020	32.8							
5/19/2020	24.6		5310		9.42		69.1	
7/13/2020	21.3						69.4	
8/27/2020	20.7						72.4	
11/12/2020	20		5250		9.88		73.8	
2/4/2021	23.9				9.54		68.3	
3/3/2021	29.7						74.4	
5/19/2021	19.2		5480		8.64		67.7	
7/21/2021	17.4		5070				68.5	
8/30/2021	17						70.8	
11/18/2021	16.8		6500		12.7		70.4	
1/27/2022	15.8		4890		9.26		62.2	
3/3/2022	16.7							
5/17/2023		20.7		4840		9.31		66.5

ND substitution: RL/2.

Prediction Limit

LaCygne Client: SCS Engineers Data: LaC GW Data Printed 9/7/2023, 5:01 PM

Constituent	Well	Upper Lim.	Lower Lim.	Date	Observ.	Sig.	Bg N	%NDs	Transform	Alpha	Method
BORON (mg/l)	MW-11	1.25	n/a	5/17/2023	1.13	No	18	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-6	1.236	n/a	5/17/2023	1.13	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-7	1.684	n/a	5/17/2023	1.55	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-701	1.115	n/a	5/17/2023	0.883	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-702	1.97	n/a	5/17/2023	1.82	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-703	1.939	n/a	5/17/2023	1.81	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-704	2.162	n/a	5/17/2023	1.97	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-705	2.294	n/a	5/17/2023	2.14	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-706	2.257	n/a	5/17/2023	1.98	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-707B	2.066	n/a	5/17/2023	1.87	No	17	0	x^5	0.000...	Param Intra 1 of 3
BORON (mg/l)	MW-708	1.518	n/a	5/17/2023	1.36	No	17	0	No	0.000...	Param Intra 1 of 3
BORON (mg/l)	TW-1	1.708	n/a	5/17/2023	1.41	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-11	70.73	n/a	5/17/2023	55.9	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-6	113.1	n/a	5/17/2023	69.2	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-7	26.59	n/a	5/17/2023	22	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-701	45.81	n/a	5/17/2023	43.5	No	24	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-702	22.01	n/a	5/17/2023	18.3	No	18	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-703	22.13	n/a	5/17/2023	17.9	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-704	35.1	n/a	5/17/2023	21.5	No	20	0	n/a	0.000...	NP Intra (normality) ...
CALCIUM (mg/l)	MW-705	41.69	n/a	5/17/2023	27.7	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-706	33.16	n/a	5/17/2023	23.6	No	22	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-707B	428.2	n/a	5/17/2023	391	No	20	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	MW-708	33.58	n/a	5/17/2023	29.1	No	17	0	No	0.000...	Param Intra 1 of 3
CALCIUM (mg/l)	TW-1	35.31	n/a	5/17/2023	23.9	No	20	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-11	131.3	n/a	5/17/2023	64.4	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-6	220.9	n/a	5/17/2023	189	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-7	108.8	n/a	5/17/2023	96.3	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-701	55.11	n/a	5/17/2023	45.5	No	19	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-702	49.23	n/a	5/17/2023	45.7	No	18	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-703	115.3	n/a	5/17/2023	109	No	17	0	x^6	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-704	92.57	n/a	5/17/2023	90.3	No	27	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-705	141.8	n/a	5/17/2023	133	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-706	290.8	n/a	5/17/2023	218	No	21	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-707B	244.4	n/a	5/17/2023	172	No	19	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	MW-708	48.26	n/a	5/17/2023	46.5	No	17	0	No	0.000...	Param Intra 1 of 3
CHLORIDE (mg/l)	TW-1	45.41	n/a	5/17/2023	39	No	20	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-11	1114	n/a	5/17/2023	942	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-6	1270	n/a	5/17/2023	1030	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-7	961	n/a	5/17/2023	878	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-701	646.1	n/a	5/17/2023	559	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-702	816.5	n/a	5/17/2023	643	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-703	979.4	n/a	5/17/2023	876	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-704	1300	n/a	5/17/2023	1240	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-705	1083	n/a	5/17/2023	1010	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-706	1428	n/a	5/17/2023	1100	No	17	0	No	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-707B	8907	n/a	7/12/2023	7920	No	17	0	x^2	0.000...	Param Intra 1 of 3
DISSOLVED SOLIDS (mg/l)	MW-708	881	n/a	5/17/2023	652	No	17	0	n/a	0.000...	NP Intra (normality) ...
DISSOLVED SOLIDS (mg/l)	TW-1	1108	n/a	5/17/2023	974	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-11	0.6113	n/a	5/17/2023	0.457	No	18	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-6	1.75	n/a	5/17/2023	0.606	No	17	0	n/a	0.000...	NP Intra (normality) ...

Prediction Limit

LaCygne Client: SCS Engineers Data: LaC GW Data Printed 9/7/2023, 5:01 PM

Constituent	Well	Upper Lim.	Lower Lim.	Date	Observ.	Sig.	Bg N	%NDs	Transform	Alpha	Method
FLUORIDE (mg/l)	MW-7	1.364	n/a	5/17/2023	1.28	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-701	0.8412	n/a	5/17/2023	0.528	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-702	1.646	n/a	5/17/2023	1.16	No	18	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-703	1.597	n/a	5/17/2023	1.2	No	18	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-704	0.9625	n/a	5/17/2023	0.723	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-705	1.096	n/a	5/17/2023	0.799	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-706	1.262	n/a	5/17/2023	0.858	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-707B	0.5018	n/a	5/17/2023	0.372	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	MW-708	0.6971	n/a	5/17/2023	0.631	No	17	0	No	0.000...	Param Intra 1 of 3
FLUORIDE (mg/l)	TW-1	0.4592	n/a	5/17/2023	0.389	No	17	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-11	7.567	7.182	5/17/2023	7.22	No	18	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-6	7.464	7.027	5/17/2023	7.17	No	20	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-7	8.007	7.659	5/17/2023	7.68	No	18	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-701	7.936	7.235	7/12/2023	7.61	No	24	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-702	9.373	7.661	5/17/2023	8.11	No	20	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-703	7.869	7.294	5/17/2023	7.84	No	18	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-704	7.847	7.335	5/17/2023	7.76	No	27	0	x^3	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-705	7.53	6.5	5/17/2023	7.35	No	19	0	n/a	0.001357	NP Intra (normality) ...
pH (S.U.)	MW-706	7.833	7.162	5/17/2023	7.21	No	32	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-707B	7.124	6.731	7/12/2023	6.9	No	22	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	MW-708	7.66	7.058	5/17/2023	7.21	No	21	0	No	0.000...	Param Intra 1 of 3
pH (S.U.)	TW-1	7.845	7.356	5/17/2023	7.36	No	24	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-11	236.1	n/a	5/17/2023	226	No	17	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-6	189.7	n/a	5/17/2023	114	No	17	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-7	5	n/a	5/17/2023	2.5ND	No	17	100	n/a	0.000...	NP Intra (NDs) 1 of 3
SULFATE (mg/l)	MW-701	87.54	n/a	7/12/2023	78.4	No	19	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-702	5.73	n/a	5/17/2023	2.5ND	No	18	88.89	n/a	0.000...	NP Intra (NDs) 1 of 3
SULFATE (mg/l)	MW-703	5	n/a	5/17/2023	2.5ND	No	17	100	n/a	0.000...	NP Intra (NDs) 1 of 3
SULFATE (mg/l)	MW-704	195.1	n/a	5/17/2023	167	No	21	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-705	43.92	n/a	5/17/2023	40.7	No	17	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-706	32.8	n/a	5/17/2023	20.7	No	31	32.26	n/a	0.000...	NP Intra (normality) ...
SULFATE (mg/l)	MW-707B	5785	n/a	5/17/2023	4840	No	20	0	No	0.000...	Param Intra 1 of 3
SULFATE (mg/l)	MW-708	12.7	n/a	5/17/2023	9.31	No	20	0	n/a	0.000...	NP Intra (normality) ...
SULFATE (mg/l)	TW-1	72.93	n/a	5/17/2023	66.5	No	24	0	No	0.000...	Param Intra 1 of 3

ATTACHMENT 2

Sanitas™ Configuration Settings

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

Exclude data flags: i

Data Reading Options

- (•) Individual Observations
- ( ) Mean of Each: ( ) Month
- ( ) Median of Each: ( ) Season

Non-Detect / Trace Handling...

Setup Seasons...

[ ] Automatically Process Resamples...

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

- [ ] Black and White Output
- [x] Four Plots Per Page
  - [x] Always Combine Data Pages...
  - [x] Include Tick Marks on Data Page
- [ ] Use Constituent Name for Graph Title
- [ ] Draw Border Around Text Reports and Data Pages
- [x] Enlarge/Reduce Fonts (Graphs): 100%
- [x] Enlarge/Reduce Fonts (Data/Text Reports): 100%
- [x] Wide Margins (on reports without explicit setting)
- [ ] Use CAS# (Not Const. Name)
- [ ] Truncate File Names to 20 Characters
- [ ] Include Limit Lines when found in Database...
- [x] Show Deselected Data on Time Series Lighter
- [ ] Show Deselected Data on all Data Pages Lighter

Setup Symbols and Colors...

- [x] Prompt to Overwrite/Append Summary Tables
- [ ] Round Limits to 2 Sig. Digits (when not set in data file)
- [ ] User-Set Scale
- [x] Indicate Background Data
- [ ] Show Exact Dates
- [ ] Thick Plot Lines

Zoom Factor: 200%

Output Decimal Precision

- ( ) Less Precision
- (•) Normal Precision
- ( ) More Precision

- [x] Store Print Jobs in Multiple Constituent Mode

Store All Print Jobs...

Printer: Adobe PDF

Printers...

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

☐ Use Modified Alpha...

☑ Test Residuals For Normality (Parametric test only) using Shapiro-Wilk/Francia at Alpha = 0.01

☐ Continue Parametric if Unable to Normalize

Transformation (Parametric test only)

- ◉ Use Ladder of Powers
- ○ Natural Log or No Transformation
- ○ Never Transform
- ○ Use Specific Transformation:

☐ Use Best W Statistic

☐ Plot Transformed Values

Use Non-Parametric Test (Sen's Slope/Mann-Kendall) when Non-Detects Percent > 75

☐ Include 95. % Confidence Interval around Trend Line

☑ Only when Trend is Significant

☑ Include Details of Interaction with Limit Lines (if applicable, in Multiple Constituent mode)

☐ Automatically Remove Outliers (Parametric test only)

☐ Limit data to most recent values (dropping any earlier observations)

Note: there is no "Always Use Non-Parametric" checkbox on this tab because, for consistency with prior versions, Sen's Slope / Mann-Kendall (the non-parametric alternative) is available as a report in its own right, under Analysis->Intrawell->Trend.

Data | Output | Trend Test | Control Cht | **Prediction Lim** | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

☑ Test for Normality using Shapiro-Wilk/Francia at Alpha = 0.01

☑ Use Non-Parametric Test when Non-Detects Percent > 50

Use Aitchison's Adjustment when Non-Detects Percent > 15

☐ Optional Further Refinement: Use _____ when NDs % > 50

☐ Use Poisson Prediction Limit when Non-Detects Percent > 0

Transformation

- (●) Use Ladder of Powers
- ( ) Natural Log or No Transformation
- ( ) Never Transform
- ( ) Use Specific Transformation: Natural Log

☐ Use Best W Statistic

☐ Plot Transformed Values

Deseasonalize (Intra- and InterWell)

- ( ) If Seasonality Is Detected
- ( ) If Seasonality Is Detected Or Insufficient to Test
- ( ) Always (When Sufficient Data)
- (●) Never

☐ Always Use Non-Parametric

Facility α

Statistical Evaluations per Year: 2

Constituents Analyzed: 7

Downgradient (Compliance) Wells: 9

Sampling Plan

Comparing Individual Observations

( ) 1 of 1 ( ) 1 of 2 (●) 1 of 3 ( ) 1 of 4

( ) 2 of 4 ("Modified California")

IntraWell Other

☐ Stop if Background Trend Detected at Alpha = 0.05

☑ Plot Background Data

Override Standard Deviation: _____

Override DF: _____ Override Kappa: _____

☐ Automatically Remove Background Outliers

☐ 2-Tailed Test Mode...

☐ Show Deselected Data Lighter

Non-Parametric Limit = Highest Background Value

Non-Parametric Limit when 100% Non-Detects:

- ( ) Highest/Second Highest Background Value
- (●) Most Recent PQL if available, or MDL
- ( ) Most Recent Background Value (subst. method)

Data | Output | Trend Test | Control Cht | Prediction Lim | Tolerance Lim | Conf/Tol Int | ANOVA | Welchs | Other Tests

Rank Von Neumann, Wilcoxon Rank Sum / Mann-Whitney

- [ ] Use Modified Alpha...
- [ ] 2-Tailed Test Mode...
- [ ] Combine Background Wells on Mann-Whitney...

Outlier Tests

- ( ) EPA 1989 Outlier Screening (fixed alpha of 0.05)
- (•) Dixon's at α= 0.05 or if n > 22 Rosner's at α= 0.01 [x] Use EPA Screening to establish Suspected Outliers
- ( ) Tukey's Outlier Screening, with IQR Multiplier = 3.0 [ ] Use Ladder of Powers to achieve Best W Stat
- [x] Test For Normality using Shapiro-Wilk/Francia at Alpha = 0.1
  - (•) Stop if Non-Normal
  - ( ) Continue with Parametric Test if Non-Normal
  - ( ) Tukey's if Non-Normal, with IQR Multiplier = 3.0 [x] Use Ladder of Powers to achieve Best W Stat
- [x] No Outlier If Less Than 3.0 Times Median
- [ ] Apply Rules found in Ohio Guidance Document 0715
- [ ] Combine Background Wells on the Outlier Report...

Piper, Stiff Diagram

- [ ] Combine Wells
- [ ] Combine Dates
- (•) Use Default Constituent Names
- ( ) Use Constituent Definition File Edit
- [x] Label Constituents
- [x] Label Axes
- [x] Note Cation-Anion Balance (Piper only)