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SEMIANNUAL REPORT ON SIMPLOT GROWERS SOLUTIONS GROUNDWATER MONITORING MOXEE, WASHINGTON

by Haley & Aldrich, Inc. Spokane, Washington

for J.R. Simplot Company Boise, Idaho

File No. 0202395-002 March 2023





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## SIGNATURE PAGE FOR

## SEMIANNUAL REPORT ON SIMPLOT GROWERS SOLUTIONS GROUNDWATER MONITORING MOXEE, WASHINGTON

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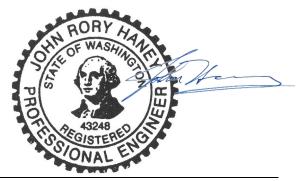
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## 1. Introduction

This semiannual report summarizes the field activities Haley & Aldrich, Inc. (Haley & Aldrich) completed, and data collected in October 2022 and January 2023 at the J.R. Simplot Growers Solution Property, located at 7528 Postma Road in Moxee, Washington (Subject Property). The location of the Subject Property is shown on "Vicinity Map", Figure 1. The Subject Property is owned by the J.R. Simplot Company (Simplot) and is operated as a retail outlet for crop nutrition and crop protection products; these products are stored and sometimes blended on site. The site is developed with several structures, a tank farm, truck scale, product mixing/dispensing equipment, and storage areas for vehicles and product totes.

Haley & Aldrich conducted two, quarterly groundwater monitoring events at the Subject Property in October 2022 and January 2023, to assess seasonal changes of concentrations of nitrates, sulfates, total dissolved solids (TDS), and ammonia (contaminants of concern [COC]) in monitoring wells located on and hydraulically downgradient of the Subject Property. The purpose of groundwater monitoring is to track groundwater quality and elevation seasonally beneath the Subject Property and hydraulically downgradient. This ongoing assessment will also continue to consider potential impacts to groundwater quality beneath Subject Property from sources hydraulically upgradient of the property.

Locations of monitoring wells used for groundwater monitoring are shown on "Site Plan", Figure 2. Additional details regarding the background of the Subject Property, subsurface geology, scope of services, field activities conducted, chemical analytical results, and our findings are summarized in the sections below.

## 2. Background

The Subject Property is approximately 3.74 acres and is bounded on the north by Postma Road, on the south by Burlington Northern Sante Fe (BNSF) rail lines and State Route 24, a card-lock fuel facility and agricultural land to the east, and the Moxee City Shop to the west. The Moxee City Shop facility to the west is a former sewage treatment plant with documented petroleum releases. According to the Yakima County Assessor, the first structure constructed on the Subject Property was in 1950, and additional structures were added in the 1980s and 2000s. The facility has an aboveground storage tank (AST) farm containing about 16 ASTs that are used to store retail agricultural products.

Generally, the land surrounding the Subject Property and north of State Route 24 is a mixture of commercial properties and farmland, and the land south of State Route 24 is a mixture of residential properties and farmland. Aerial photographs and maps accessed from the Yakima County website also show several irrigation and drainage ditches north and east of the Subject Property.



#### 2.1 GEOLOGY AND HYDROGEOLOGY

The Subject Property is located within the Yakima River Basin in south central Washington, locally called the Moxee Valley. The local geology is comprised of high ridges of basalt thrusted upward by the tectonic event that created the Yakima Fold Belt: "...a series of anticlinal- ridges and synclinal valleys that covers about 14,000 square kilometers of the western Columbia Plateau. The fold belt formed as basalt flows of the Columbia River Basalt Group intercalated sediments of the Ellensburg Formation..." (Reidel and Campbell, 1987).

The low-lying land in the Moxee Valley typically is overlain by alluvium and/or windblown sediment. The local groundwater generally flows east to west towards the Yakima River, about 2.86 miles west of the Subject Property. Static groundwater levels measured in local domestic drinking water wells range between 4.7 and 32 feet below ground surface (bgs). The local hydrogeologic and surface water systems are heavily influenced by agricultural activities. Based on our field observations during assessment activities, the surface and subsurface east/northeast of the property consists of alluvium and fill material. Reportedly, the Subject Property is underlain by silt loam soils of the Umapine silt loam soil series and the regional geology consists of loess that overlies glacial flood deposits (HDR Engineering [HDR], 2021).

According to a Moxee Valley aquifer study conducted by Washington State Department of Ecology (Ecology) in 2006, the hydrogeologic units of the Moxee Valley are comprised of four general units and are, from oldest to youngest: Miocene age basalts (Unit 4); consolidated Miocene age continental sediments (Unit 3); unconsolidated Pliocene-to-Pleistocene age continental sediments (Unit 2); and Holocene alluvium (Unit 1). Unit 2 occur at land surfaces throughout most of the Moxee Valley except where Unit 2 deposits have been eroded, never were deposited, or were overlain by Yakima River deposits [(Unit 1). Therefore, most shallow domestic wells in the valley interior are completed in Unit 2 or in weakly consolidated sand and gravel lenses of Unit 3. These two units are recharged by downward percolation of local precipitation, leakage from unlined irrigation ditches or streams, percolation of unconsumed irrigation water, and by upward discharge from the underlying basalt and inter-bedded sediments of Unit 4 (Ecology, 2007).

The 2006 Ecology study focused on "...a screening-level assessment of groundwater quality in the Moxee Valley". During the study, Ecology monitored groundwater quality in 26 domestic wells distributed across the Moxee Valley in two events: one in January and one in June of 2006. The purpose of the study was to collect current information about groundwater quality, establish a network of water supply wells that could be used to track changes in water quality over time, and assess nutrient and bacterial concentrations in groundwater seasonally. The study also compared the 2006 results against a similar study Ecology conducted in September 1992. Results of the study indicated the three wells that contained nitrogen at concentrations greater than the Federal drinking water standards were in or near Moxee City, specifically, upgradient, cross gradient, and downgradient of the Subject Property. The study also found that nitrogen concentrations in four of the wells sampled in 1992 had increased when compared to samples collected during the 2006 sampling events. Based on this comparison, the study concluded "...these findings suggest that groundwater nitrate concentrations may be increasing in the Moxee Valley, at least locally, over time." The study also concluded that there were minor seasonal variations in concentrations observed.



#### 2.2 PREVIOUS SITE ASSESSMENTS

In 2014, Ecology notified Simplot of potential releases of nutrient contaminants from the Subject Property to the subsurface. Ecology informed Simplot that recent borings drilled on the Subject Property by GeoEngineers, Inc. (GeoEngineers) while assessing petroleum releases on the adjacent Moxee City Shop property, identified elevated concentrations of nitrates and sulfates in the soil and groundwater. GeoEngineers concluded that "groundwater anion data support the suggestion that a source area exists near and east of the Moxee City Shop/Simplot property boundary and downgradient transport via groundwater flow are ongoing" (GeoEngineers 2014). Based on these assessment results, Ecology assigned a Site Number to the Subject Property (Site Number 84612438) and Simplot entered Ecology's Voluntary Cleanup Program (VCP) under VCP Number CE0419.

HDR conducted additional assessments on the Subject Property in 2015, 2016, and 2020. Assessment activities included drilling a series of direct-push borings and installing five monitoring wells on the Subject Property and one monitoring well on the Moxee City Shop property. Results of these assessments concluded that elevated concentrations of nitrates were present in soil and groundwater beneath the Subject Property. Groundwater monitoring results from events conducted between 2018 and 2020 indicate that nitrates, sulfates, and/or TDS in groundwater exceed Maximum Contaminant Levels (MCLs) in each of the five on-site monitoring wells and two additional monitoring wells on the Moxee City Shop property. Data collected during off-site assessment conducted in 2020 also indicates another possible source of nitrates in the groundwater could be from the 12-inch-diameter sewer line present south of the Subject Property and that sulfate contamination likely is migrating on site from the adjacent property to the east.

## 3. Scope of Services

Our groundwater monitoring scope of our services includes: gauging groundwater elevations, collecting groundwater samples, submitting groundwater samples for chemical analyses, and comparing analytical results to Primary and Secondary MCLs. During the October 2022 and January 2023 monitoring events, we completed the following activities:

- measured and recorded depth to groundwater from top of monitoring well casing in wells MW-1 through MW-5 on the Subject Property and MW-6, CS-4, and CS-6 on the adjacent Moxee City Shops property;
- deployed three In-Situ Rugged TROLL 100 pressure transducers (transducer) and one In-Situ BaroTROLL transducer (BaroTROLL) to continuously record groundwater elevations and barometric pressures, respectively;
- collected groundwater samples from monitoring wells MW-1 through MW-5 on the Subject Property, and from monitoring wells MW-6, CS-4, and CS-6 on the adjacent Moxee City Shops property;
- submitted groundwater and quality control samples to Eurofins Environment Testing Northwest LLC, (Eurofins) for chemical analyses; and
- compared groundwater analytical results to Primary and Secondary MCLs.



## 4. Field Activities

We completed quarterly groundwater monitoring activities on 10 October 2022 and 16 January 2023. Field activities we completed are discussed in more detail in the sections below.

#### 4.1 GROUNDWATER ELEVATION MONITORING

Prior to sampling monitoring wells MW-1 through MW-5 on the Subject Property and MW-6, CS-4, and CS-6 on the adjacent Moxee City Shops property, Haley & Aldrich measured depth to water (DTW) using a Waterline, electronic, water level indicator probe. We recorded the DTW measurements and referenced it to the surveyed top of casing elevations that are referenced to North American Vertical Datum of 1988 (NAVD88). We then calculated groundwater elevations by subtracting the measured DTW from the top of casing in each well.

After we collected groundwater samples from monitoring wells MW-1, MW-2, and MW-3 on 10 October 2022, we installed a transducer in each of these wells and one BaroTROLL in MW-1. We programmed the transducers and BaroTROLL to record pressure measurements every 12 hours. We deployed the transducers in each well using vinyl coated stainless steel wire and placed the transducers approximately 1 foot above the bottom of the well. We deployed the BaroTROLL within the well riser pipe of MW-1 thereby allowing it to be continuously exposed to atmospheric conditions.

Prior to collecting groundwater samples in January 2023, we again manually measured DTW in MW-1 through MW-5 on the Subject Property and MW-6, CS-4, and CS-6 on the adjacent Moxee City Shops property, and then retrieved the transducers from MW-1, MW-2, and MW-3. After retrieval, we downloaded the transducers and BaroTROLL using an In-Situ wireless communication device. We exported the data to the In-Situ software program Baro-Merg and used data recorded by the BaroTROLL to correct the transducer data for atmospheric pressure. After correcting for atmospheric pressure, we used the In-Situ software program Win-Situ 5 to export the data to Microsoft Excel (Excel) for further analysis. Using Excel, we referenced transducer data to the surveyed top of casing and plotted elevation values versus time as shown on "Hydrograph – Simplot Moxee, WA", Figure 3.

#### 4.2 GROUNDWATER SAMPLING

Haley & Aldrich sampled five monitoring wells (MW-1 through MW-5) on the Subject Property, and three monitoring wells on the adjacent Moxee City Shop property to the west (wells CS-6, CS-4, and MW-6) as part of groundwater sampling activities. Monitoring well locations are shown on Figure 2.

After measuring DTW, we purged each well using low flow/low stress techniques and a peristaltic pump fitted with new, disposable, polyethylene tubing; and the tubing inlet was place at approximately the middle of the wetted well screen. The depth varied based on the water level in the wells. During purging, Haley & Aldrich used a Pro DSS YSI multimeter equipped with a flow through cell to measure and record water quality parameters (pH, temperature, conductivity, dissolved oxygen, turbidity, and oxidation-reduction potential [ORP]). Purge water was placed in a 55-gallon steel drum and stored on site pending disposal. Recorded water quality parameters at the time of sampling are provided in "Depth to Groundwater, Elevation, and Water Quality Parameters", Table 1.



Haley & Aldrich collected groundwater samples from each well when the water quality parameters reached stabilization; wells were considered stabilized when readings 1 minute apart were +/- 10 percent of the previous reading or a maximum of 30 minutes of purging time had elapsed. Haley & Aldrich collected groundwater samples by allowing the groundwater to freely flow from the sample tubing into laboratory-provided, 250 milliliter sample containers. The filled sample containers were then placed into zip-top bags and stored in an insulated cooler with ice until delivered to the laboratory under chain-of-custody.

#### 4.2.1 Quality Control and Assurance Sampling

Haley & Aldrich collected an equipment blank and duplicate sample while on site for data control and assurance purposes. Eurofins provided Haley & Aldrich with a liter container filled with deionized (DI) water and an additional sample container to collect an equipment blank. While in the field, we collected the equipment blank by placing, new, disposable tubing in the liter bottle of DI water and used the peristaltic pump to transfer DI water into the sample container. After we finished collecting the primary sample from MW-2, we collected a duplicate sample (sample MW-200).

## 5. Groundwater Elevation Monitoring Results

Calculated groundwater elevations are summarized in Table 1 and transducer data from October 2022 through January 2023 are visually presented in Figure 3. We calculated groundwater gradients observed during the October 2022 and January 2023 monitoring events by comparing the difference in groundwater elevations in monitoring wells MW-1 and MW-3 over the approximate distance between the two wells. We determined the general groundwater flow direction by calculating a line of equipotential using groundwater elevations recorded from MW-1, MW-2, and MW-5. We used the calculated groundwater elevations to generate inferred groundwater contours and calculated general flow direction as shown on Figures 4 through 7.

#### 5.1 GROUNDWATER ELEVATION – OCTOBER 2022

Water level measurements recorded on 10 October 2022 indicate that depth to groundwater ranged between 6.03 and 11.16 feet below the top of casing in CS-6 and MW-5, respectively. Calculated groundwater elevations ranged between 1019.02 and 1021.44 feet in CS-6 and MW-1, respectively. Calculated groundwater elevations from the October event indicate groundwater generally was flowing southwest at approximately 236 degrees from north. The groundwater gradient observed during the October event was approximately 0.004 feet per foot (feet/foot). We used calculated groundwater elevations to generate inferred groundwater elevation contours for the October event; these are presented in "Groundwater Contours with Nitrate Concentrations – October 2022", Figure 4, and in "Groundwater Contours with Sulfate Concentrations – October 2022", Figure 5.

#### 5.2 GROUNDWATER ELEVATION – JANUARY 2023

Water level measurements recorded on 16 January 2023 indicate that depth to groundwater ranged between 2.62 and 7.14 feet below the top of casing in CS-6 and MW-5, respectively. Calculated groundwater elevations ranged between 1022.61 and 1024.55 feet in CS-4 and MW-1, respectively. Calculated groundwater elevations indicate groundwater was generally flowing west-southwest or



approximately 257 degrees from north. The groundwater gradient observed during the January groundwater sampling event was approximately 0.006 feet/foot. We used groundwater elevations to generate elevation contours from the January event; these are presented in "Groundwater Contours with Nitrate Concentrations – January 2023", Figure 6, and in "Groundwater Contours with Sulfate Concentrations – January 2023", Figure 7.

### 5.3 CONTINUOUS GROUNDWATER ELEVATION MONITORING

Transducer data from the deployment period indicate groundwater elevations ranged between 1019.92 feet in MW-3 and 1024.63 feet in MW-1. Minimum groundwater elevations were observed in MW-1 (1021.34 feet) and MW-2 (1019.92 feet) on 11 October 2022, and in MW-3 (1019.95 feet) on 15 November 2022. Maximum groundwater elevations were observed in MW-1 (1024.63 feet) and MW-3 (1022.91 feet) on 15 January 2023, and in MW-2 (1024.24 feet) on 16 January 2023. Generally, groundwater elevations gradually increased between October 2022 and late December 2022, then increased exponentially until 15 January 2023.

## 6. Analytical Results

Haley & Aldrich submitted a total of 16 groundwater samples (eight per monitoring event) to Eurofins for analyses of nitrate-nitrogen by EPA Method 353.2, ammonia by EPA Method 350.1, sulfate by EPA Method 300.0, and TDS by Standard Method 2540C. We submitted one equipment blank and one duplicate sample per monitoring event to Eurofins for analyses of nitrate-nitrogen by EPA Method 353.2 and sulfate by EPA Method 300.0. Analytical results are included in the attached "Groundwater Analytical Results", Table 2. Chemical analytical results are summarized below. Analytical reports are provided in Appendix A.

## 6.1 CHEMICAL ANALYTICAL RESULTS – OCTOBER 2022

Chemical analytical results for detectable COC concentrations in groundwater samples collected during the October monitoring event are summarized below:

- nitrate concentrations ranged between 3.3 and 87 milligrams per liter (mg/L) in CS-4 and MW-5, respectively;
- sulfate concentrations ranged between 44 and 680 mg/L in CS-4 and MW-5, respectively;
- TDS concentrations ranged between 400 and 2,500 mg/L in MW-1 and MW-5, respectively; and
- ammonia concentrations ranged between 0.13 and 68 mg/L in CS-4 and MW-4, respectively. Ammonia was not detected in MW-1, MW-2, and CS-6 greater than Method Reporting Limit.

Nitrate and sulfate concentrations from October 2022 are visually depicted in Figures 4 and 5.

## 6.2 CHEMICAL ANALYTICAL RESULTS – JANUARY 2023

Chemical analytical results for detectable COC concentrations in groundwater samples collected during the January monitoring event are summarized below:

• nitrate concentrations ranged between 0.32 and 370 mg/L in MW-6 and MW-2, respectively;



- sulfate concentrations ranged between 29 and 520 mg/L in MW-6 and MW-2, respectively;
- TDS concentrations ranged between 760 and 2,400 mg/L in MW-3 and MW-5, respectively; and
- ammonia was detected in MW-3 and MW-4 at concentrations of 1.3 and 35 mg/L, respectively.

Nitrate and sulfate concentrations from January 2023 are visually depicted in Figures 6 and 7.

#### 6.3 QUALITY CONTROL SAMPLE RESULTS

Haley & Aldrich submitted equipment blanks and duplicate samples to conduct quality control checks for nitrate and sulfate analytical results. Analytical results of the equipment blank samples were reviewed to assess if potential cross contamination effected groundwater sample analytical results, and analytical results of the duplicate samples were compared to the primary sample analytical results to assess the precision of analytical results. The results of the quality control samples are summarized below.

#### 6.3.1 Equipment Blank Sample Results

Chemical analytical results indicate that the equipment blank samples collected during the October and January monitoring events did not contain sulfate or nitrates at concentrations greater than the Method Detection Limit. These results indicate the sampling equipment likely did not contribute to the sulfate or nitrate concentrations detected in the groundwater samples.

#### 6.3.2 Deplicate Sample Results

To compare the primary sample and the duplicate sample nitrate and sulfate concentrations, we expressed the precision of the results as a relative percent difference (RPD). For the purposes of this comparison, we assumed an RPD of less than 40 percent is acceptable. The RPD was calculated using the equation below:

$$\mathsf{RPD} = \frac{(\mathsf{D}_1 - \mathsf{D}_2)}{(\mathsf{D}_1 + \mathsf{D}_2)/2} \times 100$$

Where: D1 = primary sample value D2 = duplicate sample value

Analytical and RPD results from the primary sample (MW-2) and duplicate sample (MW-200) are presented below in "Relative Percent Difference", Table 3.

		Table	3. Relative Percei	nt Differend	e	
	MW-2	MW-200		MW-2	MW-200	RPD
	Nitrat	e (mg/L)	RPD (percent)	Sulfat	e (mg/L)	(percent)
October	86	84	2.35	300	300	0
January	370	340	8.45	520	510	1.94

RPD calculations indicate that Eurofins achieved an acceptable degree of variability and precision.



## 7. Findings

The groundwater flow regime (direction, gradient, and elevations) varied between October 2022 and January 2023. The direction of groundwater flow in October 2022 was about 236 degrees from north (southwest) and shifted to about 257 degrees from north in January 2023 (west-southwest). Additionally, the calculated groundwater gradient increased slightly from 0.004 and 0.006 feet/foot between the October 2022 and January 2023 monitoring events.

The hydrograph (Figure 3) indicates that groundwater elevations steadily increased between 0.04 and 0.72 feet between 10 October and 22 December 2022; after 22 December 2022 groundwater elevations began to increase exponentially until 15 January 2023. These results are consistent with the 2006 Ecology groundwater study where they found groundwater elevations between Moxee and the Yakima River change seasonally and may be affected by unlined irrigation channels (like those hydraulically upgradient of the Subject Property).

Detected nitrate concentrations in groundwater samples collected in October 2022 exceed the Primary MCL of 10 mg/L in monitoring wells MW-2, MW-4, and MW-5 and in off-site monitoring wells MW-6 and CS-6 downgradient of the Subject Property. Detected nitrate concentrations in groundwater samples collected on site in January 2023 exceed the Primary MCL in monitoring wells MW-2, MW-4, MW-1, and MW-3 and in off-site monitoring well CS-6 downgradient of the Subject Property. Nitrate concentrations in MW-1 and MW-2 increased an order of magnitude between October 2022 and January 2023. This occurred during a period of groundwater flow regime change where flow direction changed from generally southwest to west-southwest, groundwater gradient increased from 0.004 to 0.006 feet, and an observed exponential increase in groundwater elevation. This observation is consistent with seasonal groundwater monitoring data collected to date (see Table 2). Data collected to date generally indicates nitrate concentrations are greater in January and March (winter and spring) when compared to September and October (late summer and fall). In addition, the data indicates the flow regime change from generally southwest during the fall to generally west-southwest in the winter and spring generally has been consistent across monitoring events conducted between 2016 and 2023.

Detected sulfate concentrations in groundwater samples collected in October 2022 indicate that concentrations exceeded the Secondary MCL of 250 mg/L in monitoring wells MW-2, MW-4, and MW-5 and in off-site monitoring wells MW-6 and CS-6 downgradient of the Subject Property. Detected sulfate concentrations in groundwater samples collected in January 2023 exceeded the Secondary MCL in MW-1, MW-2, MW-4, and MW-5; none of the groundwater samples collected in downgradient monitoring wells exceeded the Secondary MCL during the January event. Samples that contain nitrate and/or sulfate concentrations that exceeded the Primary and Secondary MCLs are highlighted in Table 2.



Nitrate concentrations observed in monitoring wells MW-1 and MW-2 during the October and January monitoring events indicate that nitrate contamination observed in site wells could originate from hydraulically upgradient, off-site sources (see Figures 3 and 5). It appears that a potential source located east-northeast of the Subject Property combined with seasonal changes in groundwater elevational/flow regime could impacting the Subject Property. We observed similar trends with sulfate concentrations (see Figures 4 and 6). Average sulfate concentrations observed in monitoring wells MW-1 and MW-2 increase seasonally from the fall to winter/spring in conjunction with observed changes in the groundwater elevations/flow regimes. A summary of these seasonal trends from monitoring events conducted between 2019 and 2023 is provided in "Historical Seasonal Average Nitrate and Sulfate Concentrations and Groundwater Flow Regimes", Table 4 below.

Table 4. Historica	Nitr Concen	ate	Suli Concen	fate	ons and Groundwater Groundwater Flow Direction (degrees from north)	Flow Regimes Groundwater Gradient (feet)
	MW-1	MW-2	MW-1	MW-2	from north)	
Winter/Spring	45	162	303	370	258	0.006
Fall	15	91.1	234	318	233	0.004

Notes:

All values represent averages from the previous six groundwater sampling events conducted by HDR and Haley & Aldrich between September 2019 and January 2023.

Winter/Spring months include January and March and Fall months include September and October.

Continued seasonal monitoring of existing monitoring well network should be conducted to better understand the potential impacts of upgradient sources on groundwater quality beneath the Subject Property.

## References

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**TABLES** 

# TABLE 1DEPTH TO GROUNDWATER, ELEVATIONS, AND WATER QUALITY PARAMETERSSEMIANNUAL GROUNDWATER MONITORING REPORT0202395-000MOXEE, WASHINGTON

Monitoring Well	Date of Sampling	Depth to Water (feet)	Groundwater Elevation (feet NAVD88)	Temperature (C°)	рН	Specific Conductivity (mS/cm)	ORP (mV)	Turbidity (NTU)	Dissolved Oxygen (mg/L)
MW-1	10/10/2022	9.71	1021.44	17.6	7.78	1.0	99.1	21	0.6
10100-1	1/16/2023	6.60	1024.55	8.7	7.37	2.2	58.0	13	6.9
MW-2	10/10/2022	10.84	1020.02	17.6	8.28	2.3	111.1	14	0.3
10100-2	1/16/2023	6.62	1024.24	10.1	7.57	4.5	41.2	4	2.3
MW-3	10/10/2022	8.83	1020.14	20.9	6.76	1.0	155.4	5	0.2
10100-5	1/16/2023	6.18	1022.79	9.8	5.9	1.9	99.2	2	1.8
MW-4	10/10/2022	6.20	1020.35	20.4	7.75	0.2	144.6	5	0.2
10100-4	1/16/2023	3.12	1023.43	12.1	7.56	2.6	66.1	15	0.6
MW-5	10/10/2022	11.16	1019.32	20.1	7.72	3.5	112.3	4	0.5
10100-5	1/16/2023	7.14	1023.34	9.8	7.97	2.7	32.1	2	7.7
MW-6	10/10/2022	6.38		19.4	8.19	1.3	142.9	26	0.5
10100-0	1/16/2023	2.98		13.6	8.85	0.5	23.4	12	0.7
CS-4	10/10/2022	6.65	1019.02	22.1	7.77	0.9	133.0	8	2.0
03-4	1/16/2023	3.06	1022.61	12.2	7.82	1.1	49.1	2	3.9
CS-6	10/10/2022	6.03	1019.47	21.9	7.6	1.5	147.0	6.5	0.8
03-0	1/16/2023	2.62	1022.88	11.9	7.8	1.4	48.1	2.3	1.8

#### Notes:

°C = degrees Celsius.

DO = dissolved oxygen.

mg/L = milligrams per liter.

mS/cm = millisiemens per centimeter.

mV = millivolts.

MW = monitoring well

NAVD88 = North American Vertical Datum of 1988

NTU = nephelometric turbidity units.

ORP = oxidation-reduction potential.

Depth to water is referenced from top of casing.

-- = not measured/calculated

## TABLE 2 GROUNDWATER ANALYTICAL RESULTS

SEMIANNUAL GROUNDWATER MONITORING REPORT 0202395-000 MOXEE, WASHINGTON

		Analyte							
Sample ID	Sample Date	Nitrate- Nitrogen (mg/L)	Q	Ammonia- Nitrogen (mg/L)	Q	Sulfate (mg/L)	Q	TDS (mg/L)	Q
	10/19/2016	41.4		ND		300		1300	
	3/7/2017	249.0		ND		833		3330	
	6/27/2017	127.0		ND		616		2440	J3
	9/27/2017	63.7		ND		606		1770	
	1/16/2018	84.0	Q <sup>1</sup>	ND		606		2300	
	3/27/2018	62.1		ND ND		629		2280	
	6/19/2018 9/12/2018	46.8 25.9		ND ND	-	556 427		1970 1460	
MW-1	11/7/2018	23.3		ND		353		1331	
	3/21/2019	145.0		ND		742	M6	2850	
	9/1/2019	24.6		ND		395		1360	
	3/1/2020	45		ND		358		1570	
	10/6/2020	15.7		0.10	U	219		1050	
	3/2/2022	11		0.50	U	140		1100	
	10/10/2022	4.6		0.00	U	88		400	
	1/16/2023	79		0.10	U	410		870	
	10/19/2016	106		0.70	J	500		2180	
	3/7/2017	181		ND	ľ	531		2490	
	6/27/2017	185		ND		508		2640	Q <sup>1</sup>
	9/27/2017	182		ND		496		2180	
	1/16/2018	168	Q <sup>1</sup>	ND		464		2210	
	3/27/2018	88.4		ND		391		1770	
	6/19/2018	128.0		ND		416		2130	
MW-2	9/12/2018	84.0		ND		379		1740	
10100-2	11/7/2018	92.4		ND		359		1620	
	3/21/2019	181.0		ND		401		2470	
	9/1/2019	141		ND		442		2470	
	3/1/2020	80.9		ND		260		1710	
	10/6/2020	46.3		0.10	U	213		1220	
	3/2/2022	34		0.50	U	330		2100	
	10/10/2022	86		0.10	U	300		1600	
	1/16/2023	370		0.10	U	520		1600	
	10/19/2016	8.08		0.8914		105		840	
	3/7/2017	8.65		1.1		92.7		723	
	6/27/2017	7.68		4		104 104		705	
	9/27/2017 1/16/2018	9.98 <b>10.5</b>	Q <sup>1</sup>	1.27 1.13	-	104		777 783	
	3/27/2018	13.8	Q	1.13	-	77.3		693	
	6/19/2018	27.2		5.2		111		920	
	9/12/2018	14.1		5.5		64.7		670	
MW-3	11/7/2018	27		3.1		92.4		764	
	3/21/2019	21.6		3.7		166		970	
	9/1/2019	24.3		4.8		130		986	
	3/1/2020	8.8		0.35		57.4		666	
	10/6/2020	12.8		0.10	U	78		756	
	3/2/2022	3.8		0.50	U	69		740	
	10/10/2022	9.8		1.40		81		600	
	1/16/2023	19		1.3		110		760	
	10/19/2016	119		113		355		1430	
	3/7/2017	134		89.1		302		1350	
	6/27/2017	102		85		406		1370	
MW-4	9/27/2017	98		95.9		375		1190	
	1/16/2018	135	Q <sup>1</sup>	83.6		589		1680	<u> </u>
	3/27/2018	105	<u> </u>	86.3	-	526		1450	
	6/19/2018	88.5		133		491		1570	<u> </u>
	9/12/2018	107		127		493		1890	
Croundwater Oveltin Oriteri	Primary Standards	10							
Groundwater Qualtiy Criteria	Secondary Standards					250		500	

HALEY & ALDRICH, INC.

Tables 1\_2.xlsx

## TABLE 2 GROUNDWATER ANALYTICAL RESULTS

SEMIANNUAL GROUNDWATER MONITORING REPORT 0202395-000 MOXEE, WASHINGTON

		Analyte							
Sample ID	Sample Date	Nitrate- Nitrogen (mg/L)	Q	Ammonia- Nitrogen (mg/L)	Q	Sulfate (mg/L)	Q	TDS (mg/L)	Q
	11/7/2018	170		110		680		2110	
	3/21/2019	106		90		589		1520	
MW-4	9/1/2019	103		131		668		1640	<u> </u>
10100-4	10/6/2020	130		120		360		1490	
	3/2/2022 10/10/2022	33 82		54	-	240		1300	
	1/16/2023	85		68 35		400 370		1200 1300	<u> </u>
	10/19/2016	95		0.212	J	977		3160	
	3/7/2017	95 117		0.212 ND	۲J	713		2940	┠───┥
	6/27/2017	96.3		ND		546		2500	
	9/27/2017	103		ND		749		2770	<u> </u>
	1/16/2018	135	$Q^1$	ND		511		2800	
	3/27/2018	124		ND		474		2670	
	6/19/2018	142		ND		431		2600	
MW-5	9/12/2018	151		ND		833		3330	<u> </u>
10100-5	11/7/2018	158		ND	<u> </u>	524		2560	
	3/21/2019	136		ND		550		3090	
	9/1/2019	105		ND		634		2890	
	3/1/2020	97.5 119		ND 0.10	<del> </del>	408		2480	
	10/6/2020 3/2/2022	24		0.10	U U	683 470		2990 2300	
	10/10/2022	87		0.50 <b>0.28</b>		470 680		2300	
	1/16/2023	5.1		0.20	U	360		2300	
	3/1/2020					290		1610	
	10/6/2020	91.1 95.5		ND 0.10	U	434		2040	
MW-6	3/2/2022	3.0	U	0.70	U	434 54		2040 510	
10100-8	10/10/2022		0	0.30 0.20	10	290		1100	
	1/16/2023	55 0.32		0.20	U	290		990	
	10/19/2016	5.58		0.7 ND		29		521	
	3/7/2017	8.9		ND	┢	34.9		720	
	6/27/2017	3.86		ND		24		534	
	9/27/2017	1.74		ND		17.7		405	
	1/16/2018	3.59	Q <sup>1</sup>	ND		23.9		518	
	3/27/2018	4.7		ND		24.4		490	
	6/19/2018	3.1		ND		23.9		464	
CS-4	9/12/2018	0.45	FS	ND		20.9		383	
03-4	11/7/2018	3.3		ND		39		607	<b> </b>
	3/21/2019	5.1		ND		30.6		614	
	9/1/2019	ND		ND	-	28.2		217	<b> </b>
	3/1/2020	4.9		ND		30.3		560	
	10/6/2020	1.5	U	0.10	U	31		448	
	3/2/2022 10/10/2022	3.0 3.3	U	0.50 <b>0.13</b>	U	23 44		820 520	
	1/16/2022	6.3		0.13	U	44 44		520 820	<u> </u>
	1/16/2023	6.3 206		0.1 ND		44 829		820 2420	<u> </u>
	3/7/2017	143		ND	$\vdash$	829 447		1690	
					$\vdash$				
	6/27/2017	100		ND	-	403		1280	──
	9/27/2017	151		ND	-	378		1350	──
CS-6	1/16/2018 3/27/2018	138 118		ND ND	$\vdash$	350 316		1460 1370	
	6/19/2018	106		ND	$\vdash$	316		1370	
	9/12/2018	110		ND	$\vdash$	363		1430	
	11/7/2018	89.9		ND	1	314		1130	<u> </u>
	3/21/2019	74.3		ND		341		1170	
	Primary Standards	10			-				
Groundwater Qualtiy Criteria	Secondary Standards					250		500	

HALEY & ALDRICH, INC.

Tables 1\_2.xlsx

## TABLE 2 GROUNDWATER ANALYTICAL RESULTS

SEMIANNUAL GROUNDWATER MONITORING REPORT 0202395-000 MOXEE, WASHINGTON

			Analyte						
Sample ID	Sample Date	Nitrate- Nitrogen (mg/L)	Q	Ammonia- Nitrogen (mg/L)	Q	Sulfate (mg/L)	Q	TDS (mg/L)	Q
	9/1/2019	105		ND		411		1560	
	3/1/2020	178		ND		407		1680	
CS-6	10/6/2020	208		0.10	U	381		1890	
	3/2/2022	31		0.50	U	310		1400	
	10/10/2022	59		0.10	U	320		890	
	1/16/2023	38		0.1	U	220		900	
Groundwater Qualtiy Criteria	Primary Standards	10							
	Secondary Standards					250		500	

Notes:

Samples collected during March, October 2022, and January 2023 events were collected by Haley & Aldrich and were analyzed by Eurofins Environment Northwest, LLC Spokane, WA for Nitrate - Nitrogen and Sulfate by Environmental Protection Agency (EPA)Method 300.0 and total dissolved solids (TDS) by Standard Method (SM) 2540C. Monitoring well samples were additionally analyzed for Nitrogen-Ammonia by EPA Method 350.1.

Samples prior to March 2022 were collected by HDR and analyzed by Pace Analytical in Minneapolis, Minnesota for Nitrate - Nitrite by EPA Method 353.2; Nitrogen-Ammonia by EPA Method 350.1; Sulfate by EPA Method 300.0; and TDS by SM 2540C.

**BOLD** = detections at or above method reporting limits (MRL)

BOLD = detections at or above primary groundwater criteria standards.

BOLD = detections at or above secondary groundwater criteria standards.

ND = Not detected at or above Reporting Limit

NS = Not sampled

J3 = associated batch QC was outside quality control range for precision

mg/L = milligrams per liter

m6 = matrix spike and matrix spike duplicate not evaluated agaisnt control limits because of sample dilution

Q= Laboratory qualifier

 $Q^1$  = Sample was prepared/or analyzed past recommended hold times and results should be considered a minimum value

TDS = Total Dissolved Solids

U= Analyte not detected at or above MRL indicated.

-- = Not applicable

HALEY & ALDRICH, INC. Tables 1\_2.xlsx

**FIGURES** 





#### LEGEND



CITY MONITORING WELL

PROPERTY BOUNDARY

#### NOTES

- 1. ALL LOCATIONS AND DIMENSIONS ARE APPROXIMATE.
- 2. SEWER LINE DATA SOURCE: CITY OF MOXEE
- 3. AERIAL IMAGERY SOURCE: ESRI



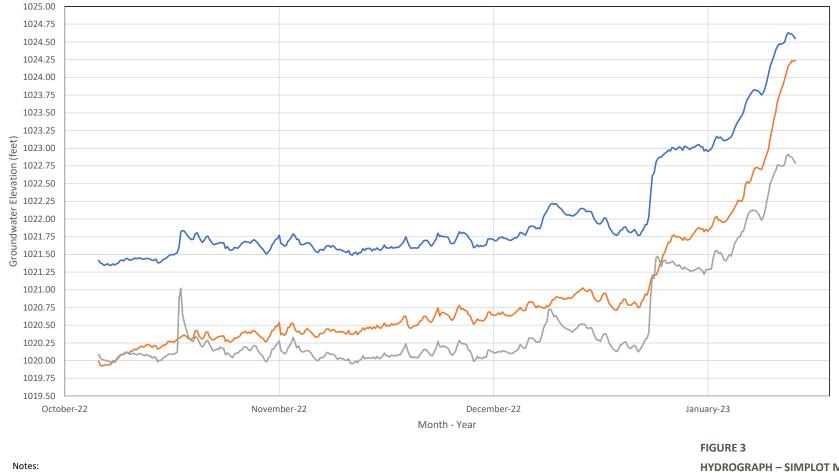
100 SCALE IN FEET

SIMPLOT MOXEE SEMIANNUAL GROUNDWATER MONITORING 7528 POSTMA ROAD MOXEE, WASHINGTON

#### SITE PLAN

FEBRUARY 2023

FIGURE 2



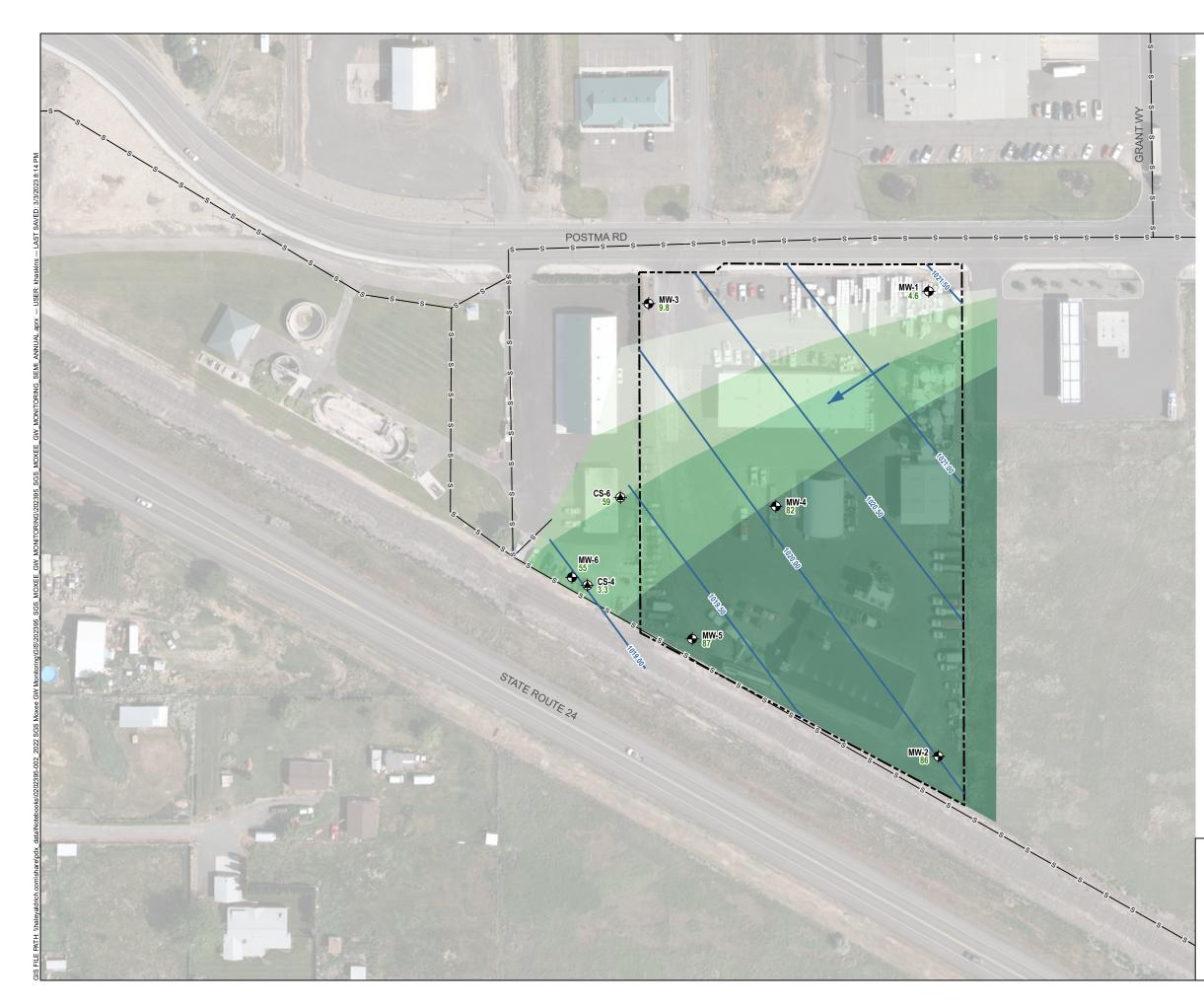
Groundwater elevation reference to North American Vertical Datum 1988

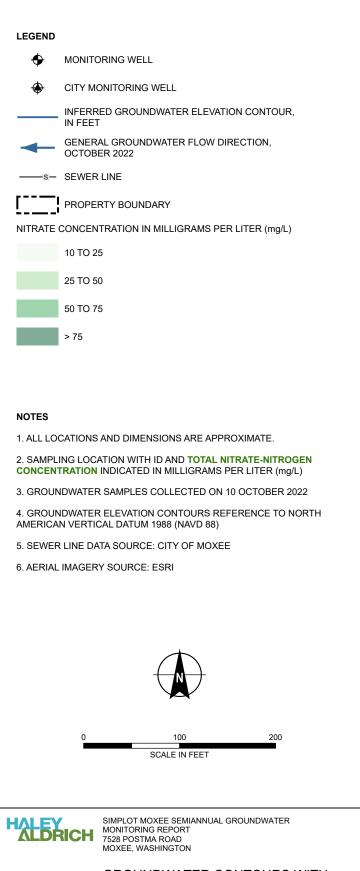
\_\_\_\_\_MW-1 \_\_\_\_\_MW-2 \_\_\_\_\_MW-3

HYDROGRAPH – SIMPLOT MOXEE, WA SEMIANNUAL GROUNDWATER MONITORING REPORT 7528 POSTMA ROAD

MOXEE, WASHINGTON





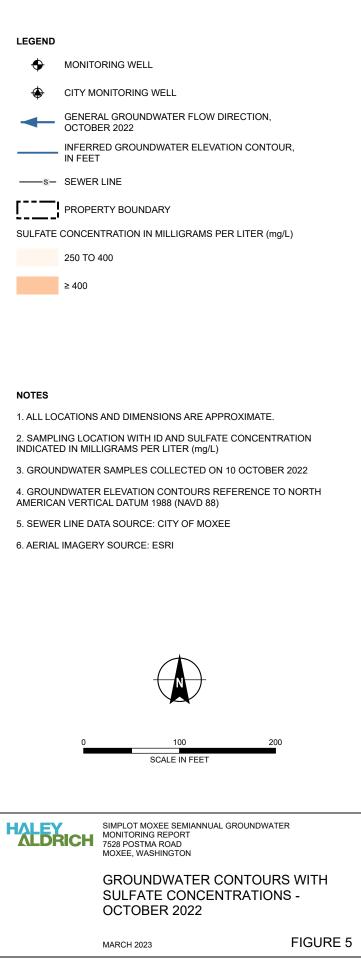


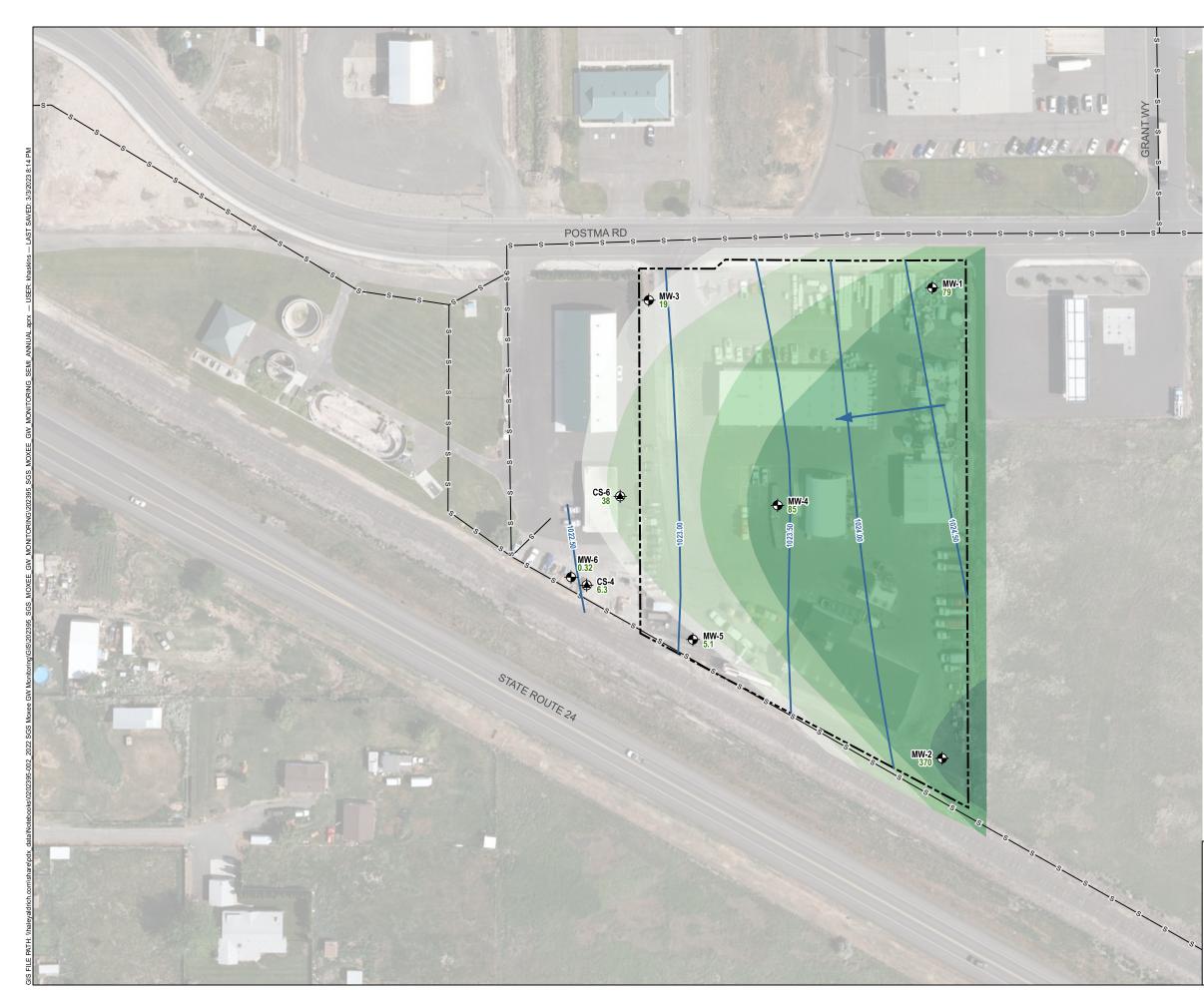
#### GROUNDWATER CONTOURS WITH NITRATE CONCENTRATIONS -OCTOBER 2022

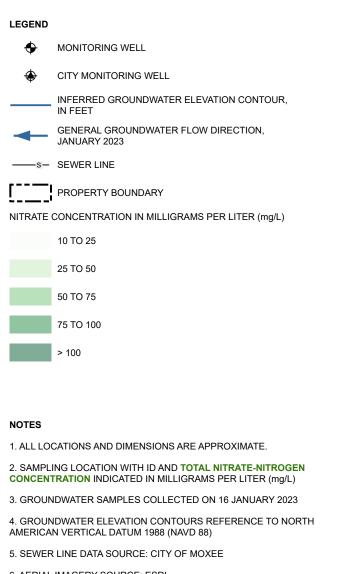
MARCH 2023

FIGURE 4

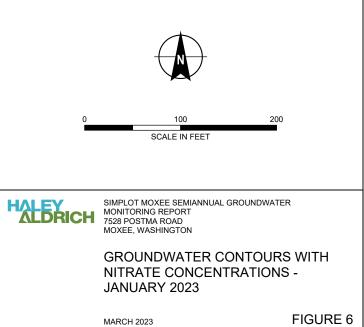




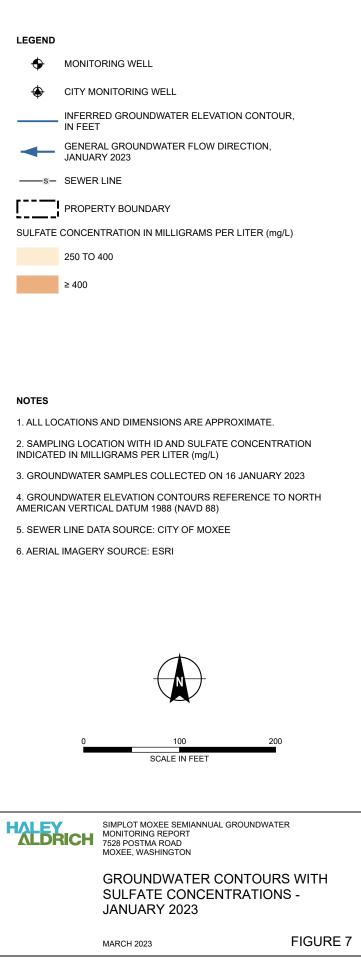




6. AERIAL IMAGERY SOURCE: ESRI







**APPENDIX A** Laboratory Reports

# 🛟 eurofins

# **Environment Testing**

## **ANALYTICAL REPORT**

Eurofins Spokane 11922 East 1st Ave Spokane, WA 99206 Tel: (509)924-9200

## Laboratory Job ID: 590-18961-1

Client Project/Site: Simplot Moxee/1500450.01

## For:

signature.

Hart Crowser, Inc. 505 West Riverside Avenue, Suite 205 Spokane, Washington 99201

Attn: John Haney

Candre Arrington

Authorized for release by: 10/31/2022 1:54:11 PM

Randee Arrington, Lab Director (509)924-9200 Randee.Arrington@et.eurofinsus.com

Visit us at: www.eurofinsus.com/Env

..... LINKS

Review your project results through

EOL

Have a Question?

Ask— The Expert

Results relate only to the items tested and the sample(s) as received by the laboratory.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten

## **Table of Contents**

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Definitions	5
Client Sample Results	6
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Method Summary	16
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Receipt Checklists	20

### Job ID: 590-18961-1

#### Laboratory: Eurofins Spokane

Narrative

#### Receipt

The samples were received on 10/13/2022 3:30 PM. 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 4.1° C.

#### GC Semi VOA

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

#### **General Chemistry**

Method 350.1: The continuing calibration verification (CCV) and the continuing calibration verification low (CCVL) associated with batch 280-591673 recovered above the upper control limit for ammonia. The samples associated with this CCV and CCVL were non-detects for the affected analytes; therefore, the data have been reported. The associated samples are impacted: (CCV 280-591673/58), (CCV 280-591673/72), (CCV 280-591673/78), (CCVL 280-591673/59), (CCVL 280-591673/73) and (CCVL 280-591673/89).

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

## Sample Summary

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
590-18961-1	MW-1	Water	10/10/22 11:20	10/13/22 15:30
590-18961-2	MW-2	Water	10/10/22 12:35	10/13/22 15:30
590-18961-3	MW-3	Water	10/10/22 14:40	10/13/22 15:30
590-18961-4	MW-4	Water	10/10/22 13:30	10/13/22 15:30
590-18961-5	MW-5	Water	10/10/22 14:05	10/13/22 15:30
590-18961-6	MW-6	Water	10/10/22 16:15	10/13/22 15:30
590-18961-7	CS-4	Water	10/10/22 15:40	10/13/22 15:30
590-18961-8	CS-6	Water	10/10/22 17:05	10/13/22 15:30
590-18961-9	MW-200	Water	10/10/22 13:05	10/13/22 15:30
590-18961-10	Field Blank	Water	10/10/22 16:35	10/13/22 15:30

## **Definitions/Glossary**

#### Client: Hart Crowser, Inc. Project/Site: Simplot Moxee/1500450.01

Toxicity Equivalent Factor (Dioxin)

Too Numerous To Count

Toxicity Equivalent Quotient (Dioxin)

TEF

TEQ TNTC Job ID: 590-18961-1

Glossary		3
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	4
%R	Percent Recovery	
CFL	Contains Free Liquid	5
CFU	Colony Forming Unit	J
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)	8
EDL	Estimated Detection Limit (Dioxin)	
LOD	Limit of Detection (DoD/DOE)	9
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	

## **Client Sample Results**

Project/Site: Simplot Moxee/150045	50.01							Job ID: 590-1	
lient Sample ID: MW-1							ah Samnl	e ID: 590-18	961-1
Date Collected: 10/10/22 11:20								Matrix:	
Date Received: 10/13/22 15:30								Matrix	Water
Method: MCAWW 300.0 - Anions	s. Ion Chr	omatograph	ıv						
Analyte		Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	88		0.50		mg/L			10/14/22 14:13	1
General Chemistry									
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N (MCAWW 350.1)	ND		0.10		mg/L			10/28/22 11:59	1
Nitrate Nitrite as N (MCAWW 353.2	4.6		0.10		mg/L			10/18/22 12:12	1
Total Dissolved Solids (SM 2540C)	400		25		mg/L			10/17/22 15:41	1
Client Sample ID: MW-2							ah Samnl	e ID: 590-18	961-2
Date Collected: 10/10/22 12:35									: Water
Date Received: 10/13/22 15:30								INIGUITA.	. water
_ Method: MCAWW 300.0 - Anions	s. Ion Chr	omatograph	ıv						
Analyte		Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	300		10		mg/L		-	10/18/22 18:17	20
-									
General Chemistry									
Analyte		Qualifier	RL	MDL		<u>D</u>	Prepared	Analyzed	Dil Fac
Ammonia as N (MCAWW 350.1)	ND		0.10		mg/L			10/28/22 12:02	1
NIME AS NIME AS A NUMBER OF O	00							10/18/22 12:18	10
Nitrate Nitrite as N (MCAWW 353.2	86		1.0		mg/L				
Total Dissolved Solids (SM 2540C)	86 1600		25		mg/L mg/L			10/17/22 15:41	10
Total Dissolved Solids (SM 2540C)					-		ah Sampl	10/17/22 15:41	1
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3					-	Li	ab Sampl	10/17/22 15:41 e ID: 590-18	1 <b>961-3</b>
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40					-	La	ab Sampl	10/17/22 15:41 e ID: 590-18	1
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30	1600		25		-	La	ab Sampl	10/17/22 15:41 e ID: 590-18	1 <b>961-3</b>
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions	1600 s, Ion Chro	· · ·	25 1 <b>y</b>		mg/L			10/17/22 15:41 e ID: 590-18 Matrix:	1 3 <b>961-3</b> : Water
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte	1600 s, Ion Chr Result	omatograph Qualifier	25 IY RL	MDL	mg/L Unit	L:	ab Sampl	10/17/22 15:41 e ID: 590-18 Matrix: 	1 3 <b>961-3</b> : Water Dil Fac
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions	1600 s, Ion Chro	· · ·	25 1 <b>y</b>	MDL	mg/L			10/17/22 15:41 e ID: 590-18 Matrix:	1 3 <b>961-3</b> : Water
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate	1600 s, Ion Chr Result	· · ·	25 IY RL	MDL	mg/L Unit			10/17/22 15:41 e ID: 590-18 Matrix: 	1 3 <b>961-3</b> : Water Dil Fac
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry	1600 s, Ion Chro Result 81	· · ·	25 Ny <u>RL</u> 5.0		Unit mg/L		Prepared	10/17/22 15:41 e ID: 590-18 Matrix: <u>Analyzed</u> 10/14/22 14:39	1 3961-3 : Water Dil Fac 10
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte	1600 s, Ion Chro Result 81 Result	Qualifier	25 NY RL 5.0 RL	MDL	mg/L Unit mg/L Unit			10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed	1 3 <b>961-3</b> : Water Dil Fac
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1)	1600 s, Ion Chro Result 81	Qualifier	25 NY RL 5.0 RL 0.10		Unit mg/L		Prepared	10/17/22 15:41 e ID: 590-18 Matrix: <u>Analyzed</u> 10/14/22 14:39	1 3961-3 Water Dil Fac Dil Fac
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte	1600 s, Ion Chro Result 81 Result 1.4	Qualifier	25 NY RL 5.0 RL		mg/L Unit mg/L Unit mg/L		Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/28/22 12:12	1 3961-3 : Water Dil Fac 10 Dil Fac 1
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C)	1600 s, Ion Chro Result 81 Result 1.4 9.8	Qualifier	25 <b>Py RL</b> 5.0 <b>RL</b> 0.10 0.20		mg/L Unit mg/L Unit mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix: - Analyzed 10/14/22 14:39 - Analyzed 10/28/22 12:12 10/18/22 13:56	1 3961-3 Water Dil Fac 10 Dil Fac 1 2 1
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4	1600 s, Ion Chro Result 81 Result 1.4 9.8	Qualifier	25 <b>Py RL</b> 5.0 <b>RL</b> 0.10 0.20		mg/L Unit mg/L Unit mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18	1 <b>3961-3</b> <b>Water</b> Dil Fac 10 Dil Fac 1 2 3 3 3 3 3 3 3 3 3 3 3 3 3
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2	1600 s, Ion Chro Result 81 Result 1.4 9.8	Qualifier	25 <b>Py RL</b> 5.0 <b>RL</b> 0.10 0.20		mg/L Unit mg/L Unit mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41	1 <b>3961-3</b> <b>Water</b> Dil Fac 10 Dil Fac 1 2 3 3 3 3 3 3 3 3 3 3 3 3 3
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30	1600 s, Ion Chro Result 81 Result 1.4 9.8 600	Qualifier	25  NY RL 5.0  RL 0.10 0.20 25		mg/L Unit mg/L Unit mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18	1 <b>3961-3</b> <b>Water</b> Dil Fac 10 Dil Fac 1 2 3 3 3 3 3 3 3 3 3 3 3 3 3
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions	s, Ion Chro Result 81 Result 1.4 9.8 600 s, Ion Chro	Qualifier Qualifier	25 NY RL 5.0 RL 0.10 0.20 25	MDL	mg/L Unit mg/L mg/L mg/L mg/L	D	Prepared Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 <u>Analyzed</u> 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18 Matrix:	1 3961-3 Water Dil Fac 10 Dil Fac 10 21 2961-4 Water
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte	s, Ion Chro Result 81 Result 1.4 9.8 600 s, Ion Chro Result	Qualifier	25 NY RL 5.0 RL 0.10 0.20 25 NY RL		mg/L Unit mg/L mg/L mg/L mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18 Matrix: Analyzed	1 <b>3961-3</b> <b>Water</b> Dil Fac 10 21 <b>2961-4</b> <b>Water</b> Dil Fac
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions	s, Ion Chro Result 81 Result 1.4 9.8 600 s, Ion Chro	Qualifier Qualifier	25 NY RL 5.0 RL 0.10 0.20 25	MDL	mg/L Unit mg/L mg/L mg/L mg/L	D	Prepared Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 <u>Analyzed</u> 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18 Matrix:	1 3961-3 Water Dil Fac 10 Dil Fac 10 21 2961-4 Water
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry	1600 s, Ion Chro Result 81 Result 1.4 9.8 600 s, Ion Chro Result 400	Qualifier Qualifier	25 NY RL 5.0 RL 0.10 0.20 25 NY RL 10	MDL	mg/L Unit mg/L mg/L mg/L mg/L mg/L	D .	Prepared Prepared ab Sampl Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/18/22 18:30	1 <b>3961-3</b> <b>Water</b> Dil Fac 1 2 1 <b>3961-4</b> <b>Water</b> Dil Fac 20
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Sulfate General Chemistry Analyte	1600 s, Ion Chry Result 1.4 9.8 600 s, Ion Chry Result 400 Result	Qualifier Qualifier	25 NY RL 5.0 RL 0.10 0.20 25 NY RL 10 RL	MDL	mg/L Unit mg/L mg/L mg/L mg/L mg/L Unit Unit	D	Prepared Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/18/22 12:12 10/18/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/18/22 18:30	1 <b>3961-3</b> <b>Water</b> Dil Fac 1 2 1 3 <b>961-4</b> <b>Water</b> Dil Fac 20 Dil Fac
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Sulfate General Chemistry Analyte Sulfate	1600 s, Ion Chro Result 1.4 9.8 600 s, Ion Chro Result 400 Result 68	Qualifier Qualifier	25 NY RL 5.0 RL 0.10 0.20 25 NY RL 10 RL 5.0	MDL	mg/L Unit mg/L Unit mg/L mg/L mg/L Unit mg/L	D .	Prepared Prepared ab Sampl Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/28/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/18/22 18:30 Analyzed 10/18/22 10:53	1 <b>3961-3</b> <b>Water</b> Dil Fac 10 <b>Dil Fac</b> 20 <b>Dil Fac</b> 20 <b>Dil Fac</b> 50
Total Dissolved Solids (SM 2540C) Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anions Analyte Sulfate General Chemistry Analyte Sulfate General Chemistry Analyte	1600 s, Ion Chry Result 1.4 9.8 600 s, Ion Chry Result 400 Result	Qualifier Qualifier	25 NY RL 5.0 RL 0.10 0.20 25 NY RL 10 RL	MDL	mg/L Unit mg/L mg/L mg/L mg/L mg/L Unit Unit	D .	Prepared Prepared ab Sampl Prepared	10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/14/22 14:39 Analyzed 10/18/22 12:12 10/18/22 12:12 10/18/22 13:56 10/17/22 15:41 e ID: 590-18 Matrix: Analyzed 10/18/22 18:30	1 <b>3961-3</b> <b>Water</b> Dil Fac 1 2 1 3 <b>961-4</b> <b>Water</b> Dil Fac 20 Dil Fac

## **Client Sample Results**

Client: Hart Crowser, Inc. Project/Site: Simplot Moxee/1500450.01 Job ID: 590-18961-1

5 6

Client Sample ID: MW-5						La	ab Sampl	e ID: 590-18	961-
ate Collected: 10/10/22 14:05								Matrix	Wate
ate Received: 10/13/22 15:30									
Method: MCAWW 300.0 - Anion	s, Ion Chr	omatography	,						
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fa
Sulfate	680		10		mg/L			10/18/22 18:42	2
General Chemistry									
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fa
Ammonia as N (MCAWW 350.1)	0.28		0.10		mg/L		•	10/28/22 12:18	
Nitrate Nitrite as N (MCAWW 353.2	87		1.0		mg/L			10/18/22 12:24	1
Total Dissolved Solids (SM 2540C)	2500		50		mg/L			10/17/22 15:41	
lient Sample ID: MW-6						La	ab Sampl	e ID: 590-18	961-
ate Collected: 10/10/22 16:15								Matrix	
ate Received: 10/13/22 15:30									
Method: MCAWW 300.0 - Anion	s. Ion Chr	omatography	,						
Analyte		Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fa
Sulfate	290		10		mg/L			10/18/22 18:55	2
General Chemistry									
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fa
	0.20		0.10		mg/L			10/30/22 10:56	
AMMONIA AS N (NICAVVV 350.1)								10/18/22 12:26	1
	55		1.0		mg/L			10/10/22 12.20	
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C)			1.0 25		mg/L mg/L		ah Samul	10/17/22 15:41	
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 Pate Collected: 10/10/22 15:40	55				•	La	ab Sampl		961-
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 Pate Collected: 10/10/22 15:40 Pate Received: 10/13/22 15:30	55 1100	omatography	25		•	Li	ab Sampl	10/17/22 15:41 e ID: 590-18	961-
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte	55 1100 s, Ion Chr	omatography Qualifier	25 , , <b>RL</b>	MDL	•	La	ab Sampl Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed	961- : Wate
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte	55 1100 s, Ion Chr		25	MDL	mg/L			10/17/22 15:41 e ID: 590-18 Matrix	961- Wate
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) lient Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate	55 1100 s, lon Chr Result		25 , , <b>RL</b>	MDL	mg/L			10/17/22 15:41 e ID: 590-18 Matrix Analyzed	961- : Wate
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Ilient Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry	55 1100 s, lon Chr Result 44		25 , , <b>RL</b>		mg/L			10/17/22 15:41 e ID: 590-18 Matrix Analyzed	961- Wate
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte	55 1100 s, lon Chr Result 44	Qualifier	25 7 <b>RL</b> 0.50		mg/L Unit mg/L	D	Prepared	10/17/22 15:41 e ID: 590-18 Matrix - <u>Analyzed</u> 10/14/22 19:23	961- Wate
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) lient Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1)	55 1100 s, lon Chr Result 44 Result	Qualifier	25 <b>RL</b> 0.50 <b>RL</b>		mg/L Unit mg/L Unit	D	Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/14/22 19:23 Analyzed	961- Wate
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2	55 1100 s, Ion Chr Result 44 Result 0.13	Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10		mg/L Unit mg/L Unit mg/L	D	Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/14/22 19:23 Analyzed 10/30/22 10:59	961-
Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 Pate Collected: 10/10/22 15:40 Pate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-6 Pate Collected: 10/10/22 17:05 Pate Received: 10/13/22 15:30	55 1100 s, Ion Chr Result 44 Result 0.13 3.3	Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 0.10		mg/L Unit mg/L Unit mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix - Analyzed 10/14/22 19:23 - Analyzed 10/30/22 10:59 10/18/22 12:40	961- Wate Dil Fa Dil Fa
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-6 ate Collected: 10/10/22 17:05 ate Received: 10/13/22 15:30	55 1100 s, lon Chr Result 44 Result 0.13 3.3 520	Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 0.10 25		mg/L Unit mg/L Unit mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix - Analyzed 10/14/22 19:23 - Analyzed 10/30/22 10:59 10/18/22 12:40 10/17/22 15:41 e ID: 590-18	961- Wate Dil Fa Dil Fa
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Flient Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Flient Sample ID: CS-6 ate Collected: 10/10/22 17:05 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion	55 1100 s, Ion Chr Result 44 Result 0.13 3.3 520 s, Ion Chr	Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 0.10 25	MDL	mg/L Unit mg/L Unit mg/L mg/L	D .	Prepared	10/17/22 15:41 e ID: 590-18 Matrix - Analyzed 10/14/22 19:23 - Analyzed 10/30/22 10:59 10/18/22 12:40 10/17/22 15:41 e ID: 590-18	961- Wate Dil Fa Dil Fa
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-6 ate Collected: 10/10/22 17:05 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte	55 1100 s, Ion Chr Result 44 Result 0.13 3.3 520 s, Ion Chr	Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 0.10 25	MDL	mg/L Unit mg/L mg/L mg/L mg/L	D . D . La	Prepared Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/14/22 19:23 Analyzed 10/30/22 10:59 10/18/22 12:40 10/17/22 15:41 e ID: 590-18 Matrix	Dil Fa
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-6 ate Collected: 10/10/22 17:05 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry	55 1100 s, lon Chr Result 44 0.13 3.3 520 s, lon Chr Result 320	Qualifier Qualifier omatography Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 0.10 25 <b>RL</b> 10	MDL	mg/L Unit mg/L mg/L mg/L mg/L mg/L	D	Prepared Prepared Ab Sampl Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/14/22 19:23 Analyzed 10/30/22 10:59 10/18/22 12:40 10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/18/22 19:08	Dil Fa
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Lient Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 350.2) Total Dissolved Solids (SM 2540C) Lient Sample ID: CS-6 ate Collected: 10/10/22 17:05 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Sulfate Sulfate	55 1100 s, lon Chr Result 44 0.13 3.3 520 s, lon Chr Result 320 Result	Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 0.10 25 <b>RL</b> 10 <b>RL</b>	MDL	mg/L Unit mg/L Unit mg/L mg/L mg/L Unit Unit	D . D . La	Prepared Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/14/22 19:23 Analyzed 10/30/22 10:59 10/18/22 12:40 10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/18/22 19:08 Analyzed	Dil Fa Dil Fa Dil Fa Dil Fa
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-6 ate Collected: 10/10/22 17:05 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1)	55 1100 s, lon Chr Result 44 0.13 3.3 520 s, lon Chr Result 320 Result ND	Qualifier Qualifier omatography Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 25 <b>RL</b> 10 <b>RL</b> 10 <b>RL</b> 0.10	MDL	mg/L Unit mg/L Unit mg/L mg/L mg/L Unit mg/L	D	Prepared Prepared Ab Sampl Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/14/22 19:23 Analyzed 10/30/22 10:59 10/18/22 12:40 10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/18/22 19:08 Analyzed 10/18/22 19:08	Dil Fa Dil Fa Dil Fa Dil Fa Dil Fa Dil Fa
Nitrate Nitrite as N (MCAWW 353.2 Total Dissolved Solids (SM 2540C) Client Sample ID: CS-4 ate Collected: 10/10/22 15:40 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte Ammonia as N (MCAWW 350.1) Nitrate Nitrite as N (MCAWW 350.2) Total Dissolved Solids (SM 2540C) Client Sample ID: CS-6 ate Collected: 10/10/22 17:05 ate Received: 10/13/22 15:30 Method: MCAWW 300.0 - Anion Analyte Sulfate General Chemistry Analyte	55 1100 s, lon Chr Result 44 0.13 3.3 520 s, lon Chr Result 320 Result	Qualifier Qualifier omatography Qualifier	25 <b>RL</b> 0.50 <b>RL</b> 0.10 0.10 25 <b>RL</b> 10 <b>RL</b>	MDL	mg/L Unit mg/L Unit mg/L mg/L mg/L Unit Unit	D	Prepared Prepared Ab Sampl Prepared	10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/14/22 19:23 Analyzed 10/30/22 10:59 10/18/22 12:40 10/17/22 15:41 e ID: 590-18 Matrix Analyzed 10/18/22 19:08 Analyzed	Dil Fa

10/31/2022

## **Client Sample Results**

Client: Hart Crowser, Inc. Project/Site: Simplot Moxee/1500450.01 Job ID: 590-18961-1

Client Sample ID: MW-200 Date Collected: 10/10/22 13:05 Date Received: 10/13/22 15:30	Lab Sample ID: 590-18961-9 Matrix: Wate								
Method: MCAWW 300.0 - Anions	. Ion Chr	omatograph	v						
Analyte		Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	300		10		mg/L			10/18/22 19:20	20
General Chemistry									
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrate Nitrite as N (MCAWW 353.2	84		1.0		mg/L			10/18/22 12:44	10
Client Sample ID: Field Blan	k					Lal	o Sample	ID: 590-189	961-10
Date Collected: 10/10/22 16:35							· · ·		: Water
Date Received: 10/13/22 15:30									
Method: MCAWW 300.0 - Anions	, Ion Chr	omatograph	у						
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	ND		0.50		mg/L			10/14/22 18:19	1
General Chemistry									
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrate Nitrite as N (MCAWW 353.2)	ND		0.10		mg/L			10/18/22 12:46	1

**Eurofins Spokane** 

Method: 300.0 - Anions, Ion Chromatography

Job ID: 590-18961-1

Lab Sample ID: MB 590-38 Matrix: Water	3588/1003								C	lient	Sam	ple ID: Mo Prep Ty		
Analysis Batch: 38588												Fieb ið	Je. 10	
	МВ	МВ												
Analyte		Qualifier		RL	1	MDL	Unit		D	Prep	ared	Analyz	ed	Dil Fac
Sulfate	ND			0.50			mg/L			•		10/14/22		1
Lab Sample ID: LCS 590-3	8588/1004							Cli	ent S	Samp	le ID	: Lab Con	trol S	ample
Matrix: Water												Prep Ty		
Analysis Batch: 38588														
Analista			Spike		LCS			1114		<b>D</b> 0/		%Rec		
Analyte Sulfate			Added 12.5		Result 12.8	Qua	litter	Unit mg/L		D %	Rec 102	Limits 90 - 110		
-			12.5		12.0			iiig/∟			102	30-110		
Lab Sample ID: MB 590-38 Matrix: Water	8600/1001								C	lient	Sam	ple ID: Mo Prep Ty		
Analysis Batch: 38600												i i ch i Àl		
	MB	мв												
Analyte		Qualifier		RL		MDL	Unit		D	Prep	ared	Analyz		Dil Fac
Sulfate	ND			0.50			mg/L					10/14/22	17:54	1
Lab Sample ID: LCS 590-3 Matrix: Water	8600/1002							Cli	ent S	Samp	le ID	: Lab Con Prep Ty		
Analysis Batch: 38600														
			Spike		LCS	LCS	;					%Rec		
Analyte			Added		Result	Qua	lifier	Unit		D_%	Rec	Limits		
Sulfate			12.5		12.8			mg/L			102	90 - 110		
Lab Sample ID: 590-18961	-10 MS									Clie	ent S	ample ID:	Field	Blank
Matrix: Water										Unit		Prep Ty		
Analysis Batch: 38600														
	Sample Sar	nple	Spike		MS	MS						%Rec		
Analyte	Result Qua	alifier	Added		Result	Qua	lifier	Unit		D_%	Rec	Limits		
Sulfate	ND		11.4		11.4			mg/L			101	80 - 120		
Lab Sample ID: 590-18961	-10 MSD									Clie	ent S	ample ID:	Field	Blank
Matrix: Water												Prep Ty		
Analysis Batch: 38600														
-	Sample Sar	nple	Spike		MSD	MSE	)					%Rec		RPD
Analyte	Result Qua	alifier	Added		Result	Qua	lifier	Unit		D_%	Rec	Limits	RPD	Limit
Sulfate	ND		11.4		11.2			mg/L			99	80 - 120	2	10
- Lab Sample ID: 590-18961	-10 DU									Clie	ent S	ample ID:	Field	Blank
Matrix: Water										Oild		Prep Ty		
Analysis Batch: 38600														
	Sample Sar	nple			DU	DU								RPD
Analyte	Result Qua	alifier			Result	Qua	lifier	Unit		D			RPD	Limit
Sulfate	ND				ND			mg/L					NC	15.7
Lab Sample ID: MB 590-38	8662/1003								~	liont	Sam	ple ID: M	athod	Blank
Matrix: Water	JUUL 1000									ment	Jaill	Prep Ty		
Analysis Batch: 38662												i i op i yl		
	MB	МВ												
Analyte	Result	Qualifier		RL		мпі	Unit		D	Pren	ared	Analyz	ed	Dil Fac
Analyte	Result	Quanner					onne		0	1100		,		Diriuo

Matrix: Water

Matrix: Water

Analyte

Sulfate

Analyte

Analyte

Analyte

Analyte

Analyte

Ammonia as N

Ammonia as N

Matrix: Water

Ammonia as N

**Matrix: Water** 

Ammonia as N

**Matrix: Water** 

Ammonia as N

Matrix: Water

Analysis Batch: 38662

Analysis Batch: 591673

Analysis Batch: 591673

Analysis Batch: 591752

Analysis Batch: 591752

Analysis Batch: 591752

Method: 300.0 - Anions, Ion Chromatography

Job ID: 590-18961-1

#### Lab Sample ID: LCS 590-38662/1004 **Client Sample ID: Lab Control Sample** Prep Type: Total/NA Spike LCS LCS %Rec Added Result Qualifier %Rec Limits Unit D 12.5 12.8 mg/L 102 90 - 110 Method: 350.1 - Nitrogen, Ammonia Lab Sample ID: MB 280-591673/18 **Client Sample ID: Method Blank** Prep Type: Total/NA MB MB **Result Qualifier** RL MDL Unit Prepared Analyzed Dil Fac D 0.10 ND 10/28/22 11:19 mg/L 1 Lab Sample ID: LCS 280-591673/17 **Client Sample ID: Lab Control Sample** Prep Type: Total/NA Spike LCS LCS %Rec Added Result Qualifier Limits Unit D %Rec 2.50 2.52 mg/L 101 90 - 110 Lab Sample ID: MB 280-591752/19 **Client Sample ID: Method Blank** Prep Type: Total/NA MB MB MDL Unit **Result Qualifier** RL D Prepared Analyzed Dil Fac ND 0.10 mg/L 10/30/22 09:28 Lab Sample ID: LCS 280-591752/17 **Client Sample ID: Lab Control Sample** Prep Type: Total/NA LCS LCS %Rec Spike Added Result Qualifier Unit %Rec Limits D 2.50 2.53 mg/L 101 90 - 110 Lab Sample ID: LCSD 280-591752/18 **Client Sample ID: Lab Control Sample Dup** Prep Type: Total/NA LCSD LCSD RPD Spike %Rec Added **Result Qualifier** RPD Unit D %Rec Limits Limit 2.50 10 2.51 100 90 - 110 mg/L 1 Method: 353.2 - Nitrogen, Nitrate-Nitrite

Lab Sample ID: MB 280-590 Matrix: Water Analysis Batch: 590380	380/23					(	Client Sam	ple ID: Methoc Prep Type: To	
	MB	MB							
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Nitrate Nitrite as N	ND		0.10		mg/L			10/18/22 11:34	1

**Eurofins Spokane** 

Analysis Batch: 38659

# **QC Sample Results**

Job ID: 590-18961-1

# Method: 353.2 - Nitrogen, Nitrate-Nitrite (Continued)

Analysis Batch: 590380									Prep Ty		
-		MB MB									
Analyte	Re	sult Qualifier		RL	MDL Unit	D	Р	repared	Analyz	ed	Dil Fa
Nitrate Nitrite as N		ND		0.10	mg/L				10/18/22	12:50	
Lab Sample ID: LCS 280-5	90380/21					Clien	t Sa	mple ID	: Lab Con		
Matrix: Water									Prep Ty	pe: To	tal/N/
Analysis Batch: 590380			Spike	1.05	LCS				%Rec		
Analyte			Added	_	Qualifier	Unit	D	%Rec	Limits		
Nitrate Nitrite as N			5.00	4.98		mg/L		100	90 - 110		
						-					
Lab Sample ID: LCS 280-5	90380/60					Clien	t Sa	mple ID	: Lab Con		
Matrix: Water									Prep Ty	pe: Io	
Analysis Batch: 590380			Spike	1.09	LCS				%Rec		
Analyte			Added	_	Qualifier	Unit	D	%Rec	Limits		
Nitrate Nitrite as N			5.00	5.00		mg/L		100	90 - 110		
	590380/22				C	lient Sar	nple	ID: Lab	<b>Control</b>	Sampl	e Du
Lab Sample ID: LCSD 280- Matrix: Water	-330300/22						÷			ne: Tot	tal/N
Matrix: Water	-550500/22								Prep Ty	pe: To	tal/N
•	-550500/22		Spike	LCSD	LCSD					pe: To	
Matrix: Water	-550500/22		Spike Added	-		Unit	D	%Rec	Prep Ty	pe: To RPD	RP
Matrix: Water Analysis Batch: 590380 Analyte			•	-	LCSD				Prep Ty %Rec		RP Lim
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N			Added	Result	LCSD	Unit		<b>%Rec</b>	Prep Ty           %Rec           Limits           90 - 110	<b>RPD</b>	RP Lim
Matrix: Water Analysis Batch: 590380 Analyte			Added	Result	LCSD	Unit		<b>%Rec</b>	Prep Ty %Rec Limits 90 - 110	RPD 2	RP Lim 1
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961			Added	Result	LCSD	Unit		<b>%Rec</b>	Prep Ty           %Rec           Limits           90 - 110	RPD 2	RP Lim 1
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water		Sample	Added	Result 5.05	LCSD	Unit		<b>%Rec</b>	Prep Ty %Rec Limits 90 - 110	RPD 2	RP Lim 1
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water	-1 MS Sample	Sample Qualifier	Added 5.00	Result 5.05	LCSD Qualifier	Unit		<b>%Rec</b>	Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty	RPD 2	RP Lim 1
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380	-1 MS Sample		Added 5.00 Spike	Result 5.05	LCSD Qualifier MS	Unit mg/L	_ <u>D</u>	<u>%Rec</u> 101 CI	Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty %Rec	RPD 2	RP Lim 1
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380 Analyte	-1 MS Sample <u>Result</u> 4.6		Added 5.00 Spike Added	Result 5.05 MS Result	LCSD Qualifier MS	Unit mg/L Unit	_ <u>D</u>	%Rec           101           CI           %Rec           102	Prep Tyl           %Rec           Limits           90 - 110           ient Samp           Prep Tyl           %Rec           Limits           90 - 110	RPD 2 ble ID: pe: Tot	RP Lim 1 MW- tal/N
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N	-1 MS Sample <u>Result</u> 4.6		Added 5.00 Spike Added	Result 5.05 MS Result	LCSD Qualifier MS	Unit mg/L Unit	_ <u>D</u>	%Rec           101           CI           %Rec           102	Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty %Rec Limits	RPD 2 ble ID: pe: Tot	RP Lim 1 MW- tal/N
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961	-1 MS Sample <u>Result</u> 4.6		Added 5.00 Spike Added	Result 5.05 MS Result	LCSD Qualifier MS	Unit mg/L Unit	_ <u>D</u>	%Rec           101           CI           %Rec           102	Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty %Rec Limits 90 - 110 ient Samp	RPD 2 ble ID: pe: Tot	RP Lim 1 MW- tal/N
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water	-1 MS Sample <u>Result</u> 4.6	Qualifier	Added 5.00 Spike Added	Result 5.05 MS Result 8.67	LCSD Qualifier MS	Unit mg/L Unit	_ <u>D</u>	%Rec           101           CI           %Rec           102	Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty %Rec Limits 90 - 110 ient Samp	RPD 2 ble ID: pe: Tot	RP Lim 1 MW- tal/N
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water	-1 MS Sample Result 4.6 -1 MSD Sample Result	Qualifier	Added 5.00 Spike Added 4.00 Spike Added	Result 5.05 MS Result 8.67 MSD Result	LCSD Qualifier MS Qualifier MSD Qualifier	Unit mg/L Unit	_ <u>D</u>	%Rec           101           CI           %Rec           102	Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty	RPD 2 ble ID: pe: Tot	RP Lim 1 MW- tal/N/ tal/N/ RP Lim
Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380 Analyte Nitrate Nitrite as N Lab Sample ID: 590-18961 Matrix: Water Analysis Batch: 590380	-1 MS Sample Result 4.6 -1 MSD Sample	Qualifier	Added 5.00 Spike Added 4.00 Spike	Result 5.05 MS Result 8.67	LCSD Qualifier MS Qualifier MSD Qualifier	Unit mg/L Unit mg/L	_ <u>D</u>	%Rec           101           CI           %Rec           102           CI	Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty %Rec Limits 90 - 110 ient Samp Prep Ty %Rec	RPD 2 ole ID: pe: To ole ID: pe: To	RP Lim 1 MW- tal/N

	MB	MB							
Analyte	Result	Qualifier	RL	MDL (	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids	ND		25	r	mg/L			10/17/22 15:41	1

# Method: SM 2540C - Solids, Total Dissolved (TDS) (Continued)

Lab Sample ID: LCS 590-38659/2 Matrix: Water Analysis Batch: 38659				Clie	nt Sar	nple ID	: Lab Control Sample Prep Type: Total/NA
	Spike	LCS	LCS				%Rec
Analyte	Added	Result	Qualifier	Unit	D	%Rec	Limits
Total Dissolved Solids	504	495		mg/L		98	80 - 120

**Eurofins Spokane** 

Matrix: Water

### Lab Sample ID: 590-18961-1 Matrix: Water

#### Date Collected: 10/10/22 11:20 Date Received: 10/13/22 15:30

**Client Sample ID: MW-1** 

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		1	5 mL	5 mL	38588	10/14/22 14:13	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	591673	10/28/22 11:59	MMP	EET DEN
Total/NA	Analysis	353.2		1	100 mL	100 mL	590380	10/18/22 12:12	ZPM	EET DEN
Total/NA	Analvsis	SM 2540C		1	100 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

### Client Sample ID: MW-2 Date Collected: 10/10/22 12:35 Date Received: 10/13/22 15:30

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	38662	10/18/22 18:17	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	591673	10/28/22 12:02	MMP	EET DEN
Total/NA	Analysis	353.2		10	100 mL	100 mL	590380	10/18/22 12:18	ZPM	EET DEN
Total/NA	Analysis	SM 2540C		1	100 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

### Client Sample ID: MW-3 Date Collected: 10/10/22 14:40 Date Received: 10/13/22 15:30

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		10	5 mL	5 mL	38588	10/14/22 14:39	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	591673	10/28/22 12:12	MMP	EET DEN
Total/NA	Analysis	353.2		2	100 mL	100 mL	590380	10/18/22 13:56	ZPM	EET DEN
Total/NA	Analysis	SM 2540C		1	100 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

### Client Sample ID: MW-4 Date Collected: 10/10/22 13:30 Date Received: 10/13/22 15:30

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	38662	10/18/22 18:30	NMI	EET SPK
Total/NA	Analysis	350.1		50	10 mL	10 mL	591752	10/30/22 10:53	MMP	EET DEN
Total/NA	Analysis	353.2		10	100 mL	100 mL	590380	10/18/22 12:22	ZPM	EET DEN
Total/NA	Analysis	SM 2540C		1	100 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

## Client Sample ID: MW-5 Date Collected: 10/10/22 14:05 Date Received: 10/13/22 15:30

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	38662	10/18/22 18:42	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	591673	10/28/22 12:18	MMP	EET DEN
Total/NA	Analysis	353.2		10	100 mL	100 mL	590380	10/18/22 12:24	ZPM	EET DEN
Total/NA	Analysis	SM 2540C		1	50 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

**Eurofins Spokane** 

Lab Sample ID: 590-18961-3 Matrix: Water

Lab Sample ID: 590-18961-4

Lab Sample ID: 590-18961-5

Matrix: Water

**Matrix: Water** 

Matrix: Water

Matrix: Water

**Matrix: Water** 

Matrix: Water

8

### Lab Sample ID: 590-18961-6 Matrix: Water

Lab Sample ID: 590-18961-8

Lab Sample ID: 590-18961-9

Lab Sample ID: 590-18961-10

Date Collected: 10/10/22 16:15 Date Received: 10/13/22 15:30

**Client Sample ID: MW-6** 

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	38662	10/18/22 18:55	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	591752	10/30/22 10:56	MMP	EET DEN
Total/NA	Analysis	353.2		10	100 mL	100 mL	590380	10/18/22 12:26	ZPM	EET DEN
Total/NA	Analvsis	SM 2540C		1	100 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

### Client Sample ID: CS-4 Date Collected: 10/10/22 15:40 Date Received: 10/13/22 15:30

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		1	5 mL	5 mL	38600	10/14/22 19:23	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	591752	10/30/22 10:59	MMP	EET DEN
Total/NA	Analysis	353.2		1	100 mL	100 mL	590380	10/18/22 12:40	ZPM	EET DEN
Total/NA	Analysis	SM 2540C		1	100 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

### Client Sample ID: CS-6 Date Collected: 10/10/22 17:05 Date Received: 10/13/22 15:30

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	38662	10/18/22 19:08	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	591752	10/30/22 11:01	MMP	EET DEN
Total/NA	Analysis	353.2		10	100 mL	100 mL	590380	10/18/22 12:42	ZPM	EET DEN
Total/NA	Analysis	SM 2540C		1	100 mL	100 mL	38659	10/17/22 15:41	AMB	EET SPK

### Client Sample ID: MW-200 Date Collected: 10/10/22 13:05 Date Received: 10/13/22 15:30

		Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Pre	ер Туре	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Tota	al/NA	Analysis	300.0		20	5 mL	5 mL	38662	10/18/22 19:20	NMI	EET SPK
Tota	al/NA	Analysis	353.2		10	100 mL	100 mL	590380	10/18/22 12:44	ZPM	EET DEN

### Client Sample ID: Field Blank Date Collected: 10/10/22 16:35 Date Received: 10/13/22 15:30

_	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Туре	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		1	5 mL	5 mL	38600	10/14/22 18:19	NMI	EET SPK
Total/NA	Analysis	353.2		1	100 mL	100 mL	590380	10/18/22 12:46	ZPM	EET DEN

#### Laboratory References:

EET DEN = Eurofins Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

EET SPK = Eurofins Spokane, 11922 East 1st Ave, Spokane, WA 99206, TEL (509)924-9200

# Eurofins Spokane

Client: Hart Crowser, Inc. Project/Site: Simplot Moxee/1500450.01

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## Laboratory: Eurofins Spokane

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

Authority		Program	Identification Number	Expiration Date
Washingtor	1	State	C569	01-06-23

# Laboratory: Eurofins Denver

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

Authority	Program	Identification Number	Expiration Date
LA	Dept. of Defense ELAP	2907.01	10-31-23
LA	ISO/IEC 17025	2907.01	10-31-23
abama	State Program	40730	09-30-12 *
ska (UST)	State	18-001	02-08-23
zona	State	AZ0713	12-20-22
kansas DEQ	State	19-047-0	05-31-23
ifornia	State	2513	01-08-23
nnecticut	State	PH-0686	09-30-22 *
rida	NELAP	E87667-57	06-30-23
orgia	State	4025-011	01-08-23
pis	NELAP	2000172019-1	04-30-23
a	State	IA#370	12-02-22
sas	NELAP	E-10166	04-30-23
ntucky (WW)	State	KY98047	12-31-22
iisiana	NELAP	30785	06-30-14 *
isiana	NELAP	30785	06-30-23
nesota	NELAP	1788752	12-31-22
ada	State	CO000262020-1	07-31-23
Hampshire	NELAP	205319	04-28-23
Jersey	NELAP	190002	06-30-23
York	NELAP	59923	04-01-23
Carolina (WW/SW)	State	358	12-31-22
n Dakota	State	R-034	01-08-23
homa	NELAP	8614	08-31-23
on	NELAP	4025-011	01-09-23
nsylvania	NELAP	013	07-31-23
h Carolina	State	72002001	01-08-23
S	NELAP	TX104704183-08-TX	09-30-09 *
as	NELAP	T104704183-21-19	09-30-23
Fish & Wildlife	US Federal Programs	058448	07-31-23
DA	US Federal Programs	P330-20-00065	03-06-23
h	NELAP	QUAN5	06-30-13 *
1	NELAP	CO000262019-11	07-31-23
inia	NELAP	10490	06-14-23
shington	State	C583-19	08-03-23
st Virginia DEP	State	354	11-30-22
consin	State	999615430	08-31-23
oming (UST)	A2LA	2907.01	10-31-22

\* Accreditation/Certification renewal pending - accreditation/certification considered valid.

# **Method Summary**

#### Client: Hart Crowser, Inc. Project/Site: Simplot Moxee/1500450.01

Method	Method Description	Protocol	Laboratory
300.0	Anions, Ion Chromatography	MCAWW	EET SPK
350.1	Nitrogen, Ammonia	MCAWW	EET DEN
53.2	Nitrogen, Nitrate-Nitrite	MCAWW	EET DEN
SM 2540C	Solids, Total Dissolved (TDS)	SM	EET SPK

#### **Protocol References:**

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SM = "Standard Methods For The Examination Of Water And Wastewater"

#### Laboratory References:

EET DEN = Eurofins Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100 EET SPK = Eurofins Spokane, 11922 East 1st Ave, Spokane, WA 99206, TEL (509)924-9200

HALEY 505 ALDRICH Sui	5 W Rive ite 205,	drich, Inc. ersidc, A, 99212				СН	AIN	I OI	F CI	JSTC	DY	RE	CORI	)	Phone Fax Page	(617) 886-7400 (617) 886-7600	
		150 01				LABORATO	)RY		Euro	fine			DELIVE	RY DATE 10/13		,	
PROJECT NAME		olut Mox	ee			ADDRESS	_		<u></u>				- TURNA	ROUND TIME 10 da			
H&A CONTACT		5 John				CONTACT							 PROJEC	CT MANAGER			
			1						Analysis I	Requested			-				
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If Presumptive Certainty Data Pa The required minimum Matrix Spike (MS) sat This Chain of Custody If this Chain of Custor appropriate. Laborato	n field QC mples for I y Record (s dy Record	samples, as desi MCP Metals and/ specify) identifies sample	gnated in BW or Cyanide ar includes _ s defined as I	e included and doe	have bee identifi s not inc	ed herein. lude samples de	ected, as a fined as D	ppropriate, rinking Wa	to meet the ter Sample	s.	of Presumpti	ve Certain	tty	Required Reporting Limits and Dat RC-SI RC-S2 RC-GW1 RC-GW2	ta Quality Ot SI S2 S3	jectives GW1 GW2 GW3	
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	re Requested: 2022 20	E aquited (See note): n - Washington Analysis Req Analysis Req	:(s) in to to to	COC No:       590-7249.1         Page:       Page:         Page 1 of 2       Jub #         Jub #       No         Sep0-18961-1       A - HCL         Freservation Codes:       M - Hexare         A - HCL       M - Hexare         B - NaOH       OASNAC2         C - Zn Acetate       O - AsNaC02         C - Zn Acetate       P - Na2C45         E - NaHSO4       R - Na2C45         F - MeOH       R - Na2C45         F - MeOH       R - Na2C43         F - MeOH       R - Na2C43         G - AmcHor       R - Na2C43         I - DI Water       W - PH 4.5         J - DI Water       W - PH 4.5         J - DI Water       W - PH 4.5         L - EDA       Z - other (specify)         Other:       Z - other (specify)
Clinic Contract.         Environmental Control Control         Environmental Control         Environmental Control           Comparing         Comparing         Environmental Control         Environmental Contro         Environmental Contro <td< td=""><td>#:         Sample         Matrix           #:         939         939           939         939         939           #:         5ample         Matrix           #:         6=0000,0000,0000,0000,000         0000,000,000           10/22         11:20         Preservation Co           110/22         12:35         Wat           110/22         13:30         Wat           110/22         13:30         Wat           110/22         13:30         Wat</td><td></td><td></td><td>Page: Job #: Job #: Job #: Page 1 of 2 Job #: Preservation Coc A = NaCH B - NaCH E - Narke Acid E - Narke Acid E - Narke Acid C - Zn Acetate E - Narke Acid A - Narke Acid A - Acetate C - Zn Acetate C -</td></td<>	#:         Sample         Matrix           #:         939         939           939         939         939           #:         5ample         Matrix           #:         6=0000,0000,0000,0000,000         0000,000,000           10/22         11:20         Preservation Co           110/22         12:35         Wat           110/22         13:30         Wat           110/22         13:30         Wat           110/22         13:30         Wat			Page: Job #: Job #: Job #: Page 1 of 2 Job #: Preservation Coc A = NaCH B - NaCH E - Narke Acid E - Narke Acid E - Narke Acid C - Zn Acetate E - Narke Acid A - Narke Acid A - Acetate C - Zn Acetate C -
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Colu         Status         Colu         Status	Image: Sample     Matrix       (39)     Matrix       (139)     Matrix       (10/22     Pacific			D - Nitric Acid F - NatsO4 F - MeOH G - Amchlor G - Amchlor J - Lo A - DI Water L - EDA Other: Special Ir
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CS-6 (590-18961-9)     10/10/22     17:05     Water     X       MW-200 (590-18961-9)     10/10/22     13:05     Water     X       MW-200 (590-18961-9)     10/10/22     13:05     Water     X       MW-200 (590-18961-9)     10/10/22     13:05     Water     X       Note: Since laboratory accreditation in the State of Origin listed above for analysis/tests/mark being analyzed, the samples must be shipped back to the Euror to the Euro	15:40 Pacific			2
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ation I, III, IV, Other (specify) Primary Deliverable Rank: 2	it Testing Northwest, LLC places the ownership of method, analyte & accree alysis/tests/matrix being analyzed, the samples must be shipped back to thr on immediately. If all requested accreditations are current to date, return th	litation compliance upon out subcontract labor s Eurofins Environment Testing Northwest, LL s signed Chain of Custody attesting to said co	ratories. This sample shipment is C laboratory or other instructions mplicance to Eurofins Environme	is forwarded under chain-or-custody. If the laboratc s will be provided. Any changes to accreditation tent Testing Northwest, LLC.
I, III, IV, Other (specify) Primary Deliverable Rank: 2 Tin Date: Date: Date: Company	Sa	Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)  Return To Client  Olsposal By Lab  Archive For Mon	assessed if samples are retai Disposal Bv Lab	tained longer than 1 month) Archive For Months
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America		l: Page: Dane 2 of 2		590-18961-1	A - HCL N - None	B - NaOH O - AsNaO2 C - Zn Acetate P - Na2O4S	D - Nitric Acid         Q - Na2SO3           E - NaHSO4         R - Na2S2O3           F - MeOH         S - H2SO4	G - Amchlor T - TSP Dodecahydrate H - Ascorbic Acid U - Acetone	I - Ice J - DI Water ע בחדם	k - EDA L - EDA	C C O T	iber o		T Special Instructions/Note:	-						the laborator	atories. This sample supprient is the movinged. Any changes to accreditation is laboratory or other instructions will be provided. LLC.	nplicance to Eurolins European (1000) and 1000	ssed it sufficient months Months			Date/Tipe: // < /7 2 1/00 ETHUN		Date/Time: Company		arks: 1206/08/2012
of Custody Record	Li de DM <sup>-</sup>	on, Randee E	E-Mail: Doctor Arrington@et.eurofinsus.com Washington	Accreditations Required (See note):		Analysis Requested				(ON )	10 59	Y) as	WS/N ered	Carcomp. (W=water, First Provided and Provid	Preservation Code: XX	Water						A accreditation compliance upon out subcontract labors	is ownersing of more shipped back to the Euronins Environment of the said con the samples must be shipped back to the signed Chain of Custody attesting to said con constructions are current to date, return the signed Chain of Custody	Note: Since advactance of Organ Issee advactance and the state of Organ Issee advactance advact	Return To Client Special Instructions/QC Requirements:		Time:	Company Received of	Company	Company Received by:	Cooler Temperature(s) °C and Other Remarks:
Chain of C		Sampler:				Due Date Requested:	TAT Requested (days):		#Od	:# OM	Project #:	59001939 SSOW#:		Sample	Sample Date Time	16:35	10/10/22 Pacific						change, Eurofins Environment Testing Northwest, LLC places th change, Eurofins Environment Testing Nests/matrix being analysed,	e of Ongin listed accession immediately. If all requested accessing Northwest, LLC attention immediately.		Primary Deliverable Rank: 2		Date/Time:		Date/Time:	
Eurofins Spokane	11922 East 1st Ave	Spokane, WA 33200 Dhone: 509-924-9200 Fax: 509-924-9290	Contract Lab	Client Intormation 1000 Client Contact:	Shipping/Receiving	сомралу: TestAmerica Laboratories, Inc.	Address: 4955 Yarrow Street,	city: Arvada	State, Zip: CO, 80002	Phone: 303-736-0100(Tel) 303-431-7171(Fax)	Email:	Project Name: cimolof Moxee/1500450.01	Site:			Sample Identification - Client in June 1								Note: Since laboratory accordination in the Stat does not currently maintain accreditation in the Stat	status should be doesn't file the should be doesn't file the state of	(Inconfirmed	Deliverable Requested: I, II, III, IV, Other (specify)	Empty Kit Relinquished by:	Relinquished by	Relinquished by:	a titrational hy:

# Login Sample Receipt Checklist

#### Client: Hart Crowser, Inc.

### Login Number: 18961 List Number: 1 Creator: Fettig, Riley

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

Job Number: 590-18961-1

List Source: Eurofins Spokane

# Login Sample Receipt Checklist

Client: Hart Crowser, Inc.

#### Login Number: 18961 List Number: 2 Creator: Lee, Jerry

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

Job Number: 590-18961-1

List Source: Eurofins Denver

List Creation: 10/15/22 03:46 PM



**Environment Testing** 

# **ANALYTICAL REPORT**

# PREPARED FOR

Attn: John Haney Hart Crowser, Inc. 505 West Riverside Avenue, Suite 205 Spokane, Washington 99201 Generated 2/1/2023 3:51:13 PM

# JOB DESCRIPTION

SGS Moxee GW Sampling/0202395-002

# **JOB NUMBER**

590-19634-1

Eurofins Spokane 11922 East 1st Ave Spokane WA 99206



See page two for job notes and contact information.

# **Eurofins Spokane**

# Job Notes

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The data in the report relate to the field sample(s) as received by the laboratory and associated QC. All results have been reviewed and have been found to be compliant with laboratory and accreditation requirements, with the exception of the noted deviation(s). For questions, please contact the Project Manager.

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

Authorization

tandue trington

Generated 2/1/2023 3:51:13 PM

Authorized for release by Randee Arrington, Business Unit Manager <u>Randee.Arrington@et.eurofinsus.com</u> (509)924-9200

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## Job ID: 590-19634-1

#### Laboratory: Eurofins Spokane

#### Narrative

#### Receipt

The samples were received on 1/17/2023 4:03 PM. 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 3.3° C.

#### GC Semi VOA

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

#### **General Chemistry**

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

# Sample Summary

Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002

loh	ın	590-196	34-1
300	ID.	290-190	J

4	
5	
8	
9	

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
590-19634-1	MW-1	Water	01/16/23 09:40	01/17/23 16:03
590-19634-2	MW-2	Water	01/16/23 10:35	01/17/23 16:03
590-19634-3	MW-3	Water	01/16/23 13:10	01/17/23 16:03
590-19634-4	MW-4	Water	01/16/23 12:25	01/17/23 16:03
590-19634-5	MW-5	Water	01/16/23 11:40	01/17/23 16:03
590-19634-6	MW-6	Water	01/16/23 15:15	01/17/23 16:03
590-19634-7	CS-4	Water	01/16/23 14:40	01/17/23 16:03
590-19634-8	CS-6	Water	01/16/23 14:00	01/17/23 16:03
590-19634-9	MW-200	Water	01/16/23 11:05	01/17/23 16:03
590-19634-10	Field Blank	Water	01/16/23 10:45	01/17/23 16:03

# **Definitions/Glossary**

Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002

Toxicity Equivalent Quotient (Dioxin)

Too Numerous To Count

TEQ

TNTC

Job ID: 590-19634-1

Glossary		3
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	A
%R	Percent Recovery	
CFL	Contains Free Liquid	5
CFU	Colony Forming Unit	J
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)	8
EDL	Estimated Detection Limit (Dioxin)	
LOD	Limit of Detection (DoD/DOE)	9
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)	

# **Client Sample Results**

		Client :	Sample F	Resul	ts				
Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Samp	pling/0202		•					Job ID: 590-1	9634-1
Client Sample ID: MW-1 Date Collected: 01/16/23 09:40 Date Received: 01/17/23 16:03						La	ab Sampl	le ID: 590-19 Matrix:	9634-1 : Water
Method: EPA 300.0 - Anions, Ion		<mark>tography</mark> Qualifier	RL	MDI	Unit	D	Bronarod	Apolyzod	Dil Fac
Analyte	410	Quanner -	RL		mg/L	<u> </u>	Prepared	Analyzed 01/19/23 09:20	20
General Chemistry	Posult	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N (EPA 350.1)	ND		0.10		mg/L		Frepareu	$-\frac{\text{Analyzed}}{01/31/23\ 13:03}$	<u></u> 1
Nitrate Nitrite as N (MCAWW 353.2	79		10		mg/L			01/27/23 14:22	100
Total Dissolved Solids (SM 2540C)	870		130		mg/L			01/20/23 15:23	1
Client Sample ID: MW-2						L;	ah Sampl	le ID: 590-19	634-2
Date Collected: 01/16/23 10:35 Date Received: 01/17/23 16:03									: Water
Method: EPA 300.0 - Anions, Ion			~.			_	- ·		
Analyte		Qualifier	RL	MDL	Unit	<u>D</u>	Prepared	Analyzed 01/18/23 16:32	Dil Fac
Sulfate	520		IU		mg/L			01/18/23 10:32	20
General Chemistry									
Analyte		Qualifier	RL	MDL		<u>D</u>	Prepared	Analyzed	Dil Fac
Ammonia as N (EPA 350.1)	ND		0.10		mg/L			01/31/23 13:05	1
Nitrate Nitrite as N (MCAWW 353.2	370		5.0		mg/L			01/27/23 12:46	50
Total Dissolved Solids (SM 2540C)	1600		130		mg/L			01/20/23 15:23	1
Client Sample ID: MW-3 Date Collected: 01/16/23 13:10						Li	ab Sampl	le ID: 590-19 Matrix:	9634-3 : Water
Date Received: 01/17/23 16:03								Wati A.	Water
Method: EPA 300.0 - Anions, Ion	n Chroma	tography							
Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	110		5.0		mg/L			01/18/23 16:45	10
General Chemistry Analyte	Result	Qualifier	RL	МП	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N (EPA 350.1)	1.3		0.10		mg/L	<b>Ľ</b> .	-Tepatea	-1000000000000000000000000000000000000	
Nitrate Nitrite as N (MCAWW 353.2	1.3		0.10		mg/L			01/27/23 12:48	2
Total Dissolved Solids (SM 2540C)	760		130		mg/L			01/20/23 15:23	2 1
							-h Somol	- ID: 500 40	024 4
Client Sample ID: MW-4 Date Collected: 01/16/23 12:25 Date Received: 01/17/23 16:03						Lo	an Samhi	le ID: 590-19 Matrix:	: Water
Method: EPA 300.0 - Anions, Ion		<mark>tography</mark> Qualifier	RL	МП	Unit	П	Proparad	Analyzad	Dil Fac
Analyte	370		RL		mg/L	D	Prepared	Analyzed 01/18/23 16:58	20
	310		10		llig/∟			01/10/20 10:00	20
General Chemistry Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N (EPA 350.1)	35		1.0		mg/L			01/31/23 13:57	10
Nitrate Nitrite as N (MCAWW 353.2	85		5.0		mg/L			01/27/23 14:24	50
Total Dissolved Solids (SM 2540C)	1300		130		mg/L			01/20/23 15:23	1
	1000		100		IIIg/L			01/20/20 10.20	

# **Client Sample Results**

		Client \$	Sample F	Resul	ts				
Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Samp	pling/0202							Job ID: 590-1	9634-1
Client Sample ID: MW-5 Date Collected: 01/16/23 11:40 Date Received: 01/17/23 16:03						Li	ab Sampl	e ID: 590-19 Matrix:	9634-5 : Water
Method: EPA 300.0 - Anions, Ior Analyte		<mark>tography</mark> Qualifier	RL	МОІ	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	360		10 <b>RL</b>		mg/L		Гіерагеч	01/18/23 17:10	20
General Chemistry	Result	Qualifier	RL	мпі	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N (EPA 350.1)	ND		0.10		mg/L	<u> </u>	Fiepaieu	-1000000000000000000000000000000000000	<u></u>
Nitrate Nitrite as N (MCAWW 353.2	5.1		1.0		mg/L			01/27/23 14:26	10
Total Dissolved Solids (SM 2540C)	2400		130		mg/L			01/20/23 15:23	1
Client Sample ID: MW-6							ah Sampl	e ID: 590-19	634-6
Date Collected: 01/16/23 15:15 Date Received: 01/17/23 16:03									: Water
Method: EPA 300.0 - Anions, Ior						P	Durana una d	Analimaal	D'' 544
Analyte	Result 29	Qualifier		MDL	Unit mg/L	D	Prepared	Analyzed 01/18/23 17:23	Dil Fac
	23		10		liig/∟			01/10/23 11.20	20
General Chemistry	Darult	• 10				-	<b>-</b>	•	
Analyte		Qualifier	RL	MDL	Unit	<u> </u>	Prepared	Analyzed	Dil Fac
Ammonia as N (EPA 350.1)	ND		0.10		mg/L			01/31/23 13:54	1
Nitrate Nitrite as N (MCAWW 353.2	0.32		0.10		mg/L			01/27/23 13:06	1
Total Dissolved Solids (SM 2540C)	990		130		mg/L			01/20/23 15:23	1
Client Sample ID: CS-4 Date Collected: 01/16/23 14:40 Date Received: 01/17/23 16:03							ab Sampl	le ID: 590-19 Matrix:	9634-7 : Water
Method: EPA 300.0 - Anions, Ior	n Chroma	tography							
Analyte		Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	44		0.50		mg/L			01/18/23 17:36	1
General Chemistry Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Ammonia as N (EPA 350.1)	ND		0.10		mg/L			01/31/23 13:33	1
Nitrate Nitrite as N (MCAWW 353.2	6.3		0.10		mg/L			01/27/23 13:14	1
Total Dissolved Solids (SM 2540C)	820		130		mg/L			01/20/23 15:23	1
Client Sample ID: CS-6 Date Collected: 01/16/23 14:00						La	ab Sampl	e ID: 590-19 Matrix:	9634-8 : Water
Date Received: 01/17/23 16:03									
Method: EPA 300.0 - Anions, Ior Analyte		tography Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	220	<u> </u>	10		mg/L			01/18/23 17:49	20
	•				- 5				
General Chemistry		Qualifier	RL	MDI	Unit	п	Bronarod	Applyzod	Dil Fac
A male to	Deevilt			MDL	Unit	D	Prepared	Analyzed	DilFac
Analyte	Result					·		04/04/00 40.40	
Ammonia as N (EPA 350.1)	ND		0.10		mg/L			01/31/23 13:43	1
								01/31/23 13:43 01/27/23 13:16 01/20/23 15:23	1 5 1

2/1/2023

# **Client Sample Results**

Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002 Job ID: 590-19634-1

6

**Client Sample ID: MW-200** Lab Sample ID: 590-19634-9 Date Collected: 01/16/23 11:05 **Matrix: Water** Date Received: 01/17/23 16:03 Method: EPA 300.0 - Anions, Ion Chromatography Analyte Result Qualifier RL MDL Unit D Analyzed Dil Fac Prepared Sulfate 10 01/18/23 18:02 20 510 mg/L **General Chemistry** Analyte Result Qualifier RL MDL Unit D Prepared Analyzed Dil Fac Nitrate Nitrite as N (MCAWW 353.2 5.0 01/27/23 13:18 340 mg/L 50 **Client Sample ID: Field Blank** Lab Sample ID: 590-19634-10 Date Collected: 01/16/23 10:45 Matrix: Water Date Received: 01/17/23 16:03 Method: EPA 300.0 - Anions, Ion Chromatography Analyte **Result Qualifier** RL MDL Unit D Prepared Analyzed Dil Fac Sulfate ND 0.50 01/18/23 18:14 mg/L 1 **General Chemistry** Analyte Prepared **Result Qualifier** RL MDL Unit D Analyzed Dil Fac Nitrate Nitrite as N (MCAWW 353.2) ND 0.10 mg/L 01/27/23 13:20

# QC Sample Results

#### Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002

Job ID: 590-19634-1

Method: 300.0 - Anions, Ion Chromatography Lab Sample ID: MB 590-39849/1003 **Client Sample ID: Method Blank** Matrix: Water Prep Type: Total/NA Analysis Batch: 39849 MB MB **Result Qualifier** RL MDL Unit Analyzed Dil Fac Analyte D Prepared Sulfate 0.50 01/18/23 12:17 ND mg/L 1 Lab Sample ID: LCS 590-39849/1004 **Client Sample ID: Lab Control Sample Matrix: Water** Prep Type: Total/NA Analysis Batch: 39849 Spike LCS LCS %Rec Added **Result Qualifier** Unit D %Rec Limits Analyte 12.5 12.7 90 - 110 Sulfate mg/L 102 Lab Sample ID: MB 590-39856/1003 **Client Sample ID: Method Blank Matrix: Water** Prep Type: Total/NA Analysis Batch: 39856 MB MB **Result Qualifier** RL MDL Unit Analyte D Prepared Analyzed Dil Fac Sulfate ND 0.50 01/19/23 08:55 mg/L Lab Sample ID: LCS 590-39856/1004 **Client Sample ID: Lab Control Sample Matrix: Water Prep Type: Total/NA** Analysis Batch: 39856 Spike LCS LCS %Rec Analyte Added **Result Qualifier** Unit %Rec Limits D 12.5 12.7 Sulfate mg/L 101 90 - 110 Method: 350.1 - Nitrogen, Ammonia Lab Sample ID: MB 280-600997/18 **Client Sample ID: Method Blank** Matrix: Water Prep Type: Total/NA Analysis Batch: 600997 MB MB Analyte **Result Qualifier** RL MDL Unit Prepared Analyzed Dil Fac D Ammonia as N ND 0.10 mg/L 01/31/23 12:52 Lab Sample ID: LCS 280-600997/17 **Client Sample ID: Lab Control Sample** Matrix: Water Prep Type: Total/NA Analysis Batch: 600997 LCS LCS Spike %Rec Added **Result Qualifier** Analyte Unit D %Rec Limits Ammonia as N 2.50 2.55 102 90 - 110 mg/L Method: 353.2 - Nitrogen, Nitrate-Nitrite **Client Sample ID: Method Blank** Lab Sample ID: MB 280-600671/22 **Matrix: Water** Prep Type: Total/NA Analysis Batch: 600671 MB MB Analyte **Result Qualifier** RL MDL Unit D Prepared Analyzed Dil Fac Nitrate Nitrite as N ND 0 10 01/27/23 12:30 mg/L 1

# **QC Sample Results**

Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002 Job ID: 590-19634-1

# Method: 353.2 - Nitrogen, Nitrate-Nitrite (Continued)

Lab Sample ID: MB 280-600671/60									(	Clie	ent Sam	ple ID: Metho	
Matrix: Water												Prep Type:	Iotal/NA
Analysis Batch: 600671													
Amelada									-	_		A stark start	D'I 5
Analyte		Qualifier		RL		MDL			D _	14	repared	Analyzed	Dil Fac
Nitrate Nitrite as N	ND			0.10			mg/L					01/27/23 13:46	)
Lab Sample ID: LCS 280-600671/21								Cli	ent	Sar	nple ID:	Lab Control	Sample
Matrix: Water								•				Prep Type:	
Analysis Batch: 600671													
····· <b>,</b> ··· - ···· · · · · · ·			Spike		LCS	LCS						%Rec	
Analyte			Added		Result	Qua	lifier	Unit		D	%Rec	Limits	
Nitrate Nitrite as N			5.00		4.97			mg/L		_	99	90 - 110	
										_			_
Lab Sample ID: LCS 280-600671/59								Cli	ent	Sar	nple ID:	Lab Control	
Matrix: Water												Prep Type:	Total/N/
Analysis Batch: 600671													
			Spike			LCS				_		%Rec	
Analyte			Added		Result	Qua	lifier	Unit		D	%Rec	Limits	
Nitrate Nitrite as N			5.00		4.93			mg/L			99	90 - 110	
lethod: SM 2540C - Solids, To	otal D	issolve	d (TDS	6)									
	otal D	issolve	d (TDS	5)					(	Clie	ent Sam	ple ID: Metho	od Blani
Lab Sample ID: MB 590-39889/1	otal D	issolve	d (TDS	3)					(	Clie	ent Sam	ple ID: Metho Prep Type: `	
Lab Sample ID: MB 590-39889/1 Matrix: Water	otal D	issolve	d (TDS	6)					(	Clie	ent Sam		
Lab Sample ID: MB 590-39889/1 Matrix: Water		ISSOIVE MB	d (TDS	8)					(	Clie	ent Sam		
Lab Sample ID: MB 590-39889/1 Matrix: Water Analysis Batch: 39889	МВ		d (TD\$	S) RL		MDL	Unit		( D		ent Sam		Total/NA
Lab Sample ID: MB 590-39889/1 Matrix: Water Analysis Batch: 39889 Analyte	МВ	МВ	d (TDS			MDL	Unit mg/L					Prep Type:	Total/N/
Lab Sample ID: MB 590-39889/1 Matrix: Water Analysis Batch: 39889 Analyte Total Dissolved Solids	MB Result	МВ	d (TD\$	RL		MDL			<u>D</u>	Pı	repared	Prep Type: <u>Analyzed</u> 01/20/23 15:23	Dil Fa
Lab Sample ID: MB 590-39889/1 Matrix: Water Analysis Batch: 39889 Analyte Total Dissolved Solids Lab Sample ID: LCS 590-39889/2	MB Result	МВ	d (TDS	RL		MDL		Cli	<u>D</u>	Pı	repared	Prep Type: <u>Analyzed</u> 01/20/23 15:23 Lab Control	Total/N/
Lab Sample ID: MB 590-39889/1 Matrix: Water Analysis Batch: 39889 Analyte Total Dissolved Solids Lab Sample ID: LCS 590-39889/2 Matrix: Water	MB Result	МВ	d (TD\$	RL		MDL		Cli	<u>D</u>	Pı	repared	Prep Type: <u>Analyzed</u> 01/20/23 15:23	Total/N/
Aethod: SM 2540C - Solids, To Lab Sample ID: MB 590-39889/1 Matrix: Water Analysis Batch: 39889 Analyte Total Dissolved Solids Lab Sample ID: LCS 590-39889/2 Matrix: Water Analysis Batch: 39889	MB Result	МВ		RL			mg/L	Cli	<u>D</u>	Pı	repared	Analyzed 01/20/23 15:23 Lab Control Prep Type:	Dil Fac       B       Sample
Lab Sample ID: MB 590-39889/1 Matrix: Water Analysis Batch: 39889 Analyte Total Dissolved Solids Lab Sample ID: LCS 590-39889/2 Matrix: Water	MB Result	МВ	d (TDS	<b>RL</b> 25		LCS	mg/L	Cli	<u>D</u>	Pı	repared	Prep Type: <u>Analyzed</u> 01/20/23 15:23 Lab Control	Dil Fac       B       Sample

**Eurofins Spokane** 

# Lab Chronicle

Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002

Matrix: Water

Matrix: Water

Matrix: Water

**Matrix: Water** 

### Lab Sample ID: 590-19634-1 Matrix: Water

Lab Sample ID: 590-19634-3

Lab Sample ID: 590-19634-4

Lab Sample ID: 590-19634-5

#### Date Collected: 01/16/23 09:40 Date Received: 01/17/23 16:03

**Client Sample ID: MW-1** 

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	39856	01/19/23 09:20	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	600997	01/31/23 13:03	MMP	EET DEN
Total/NA	Analysis	353.2		100	100 mL	100 mL	600671	01/27/23 14:22	KEG	EET DEN
Total/NA	Analvsis	SM 2540C		1	20 mL	100 mL	39889	01/20/23 15:23	AMB	EET SPK

### Client Sample ID: MW-2 Date Collected: 01/16/23 10:35 Date Received: 01/17/23 16:03

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	39849	01/18/23 16:32	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	600997	01/31/23 13:05	MMP	EET DEN
Total/NA	Analysis	353.2		50	100 mL	100 mL	600671	01/27/23 12:46	KEG	EET DEN
Total/NA	Analysis	SM 2540C		1	20 mL	100 mL	39889	01/20/23 15:23	AMB	EET SPK

### Client Sample ID: MW-3 Date Collected: 01/16/23 13:10 Date Received: 01/17/23 16:03

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		10	5 mL	5 mL	39849	01/18/23 16:45	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	600997	01/31/23 13:09	MMP	EET DEN
Total/NA	Analysis	353.2		2	100 mL	100 mL	600671	01/27/23 12:48	KEG	EET DEN
Total/NA	Analysis	SM 2540C		1	20 mL	100 mL	39889	01/20/23 15:23	AMB	EET SPK

### Client Sample ID: MW-4 Date Collected: 01/16/23 12:25 Date Received: 01/17/23 16:03

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	39849	01/18/23 16:58	NMI	EET SPK
Total/NA	Analysis	350.1		10	10 mL	10 mL	600997	01/31/23 13:57	MMP	EET DEN
Total/NA	Analysis	353.2		50	100 mL	100 mL	600671	01/27/23 14:24	KEG	EET DEN
Total/NA	Analysis	SM 2540C		1	20 mL	100 mL	39889	01/20/23 15:23	AMB	EET SPK

## Client Sample ID: MW-5 Date Collected: 01/16/23 11:40 Date Received: 01/17/23 16:03

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	39849	01/18/23 17:10	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	600997	01/31/23 13:52	MMP	EET DEN
Total/NA	Analysis	353.2		10	100 mL	100 mL	600671	01/27/23 14:26	KEG	EET DEN
Total/NA	Analysis	SM 2540C		1	20 mL	100 mL	39889	01/20/23 15:23	AMB	EET SPK

**Eurofins Spokane** 

2/1/2023

3 4 5 6 7 8 9

# Lab Chronicle

Initial

Amount

5 mL

10 mL

100 mL

20 mL

Batch

39849

600997

600671

39889

Number

Final

Amount

5 mL

10 mL

100 mL

100 mL

Dil

20

1

1

1

Factor

Run

Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002

Batch

300.0

350.1

353.2

SM 2540C

Method

**Client Sample ID: MW-6** 

Date Collected: 01/16/23 15:15

Date Received: 01/17/23 16:03

**Client Sample ID: CS-4** 

Date Collected: 01/16/23 14:40

Date Received: 01/17/23 16:03

Prep Type

Total/NA

Total/NA

Total/NA

Total/NA

Batch

Туре

Analysis

Analysis

Analysis

Analysis

Lab

EET SPK

EET DEN

EET DEN

EET SPK

Matrix: Water

Matrix: Water

Matrix: Water

Matrix: Water

### Lab Sample ID: 590-19634-6 Matrix: Water

Analyst

Lab Sample ID: 590-19634-7

Lab Sample ID: 590-19634-8

Lab Sample ID: 590-19634-9

Lab Sample ID: 590-19634-10

Prepared

or Analyzed

01/18/23 17:23 NMI

01/31/23 13:54 MMP

01/27/23 13:06 KEG

01/20/23 15:23 AMB

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Prep Type Total/NA	Batch Type Analysis	Batch Method 300.0	Run	Dil Factor	Initial Amount 5 mL	Final Amount 5 mL	Batch Number 39849	Prepared or Analyzed 01/18/23 17:36	Analyst NMI	Lab EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	600997	01/31/23 13:33	MMP	EET DEN
Total/NA	Analysis	353.2		1	100 mL	100 mL	600671	01/27/23 13:14	KEG	EET DEN
Total/NA	Analysis	SM 2540C		1	20 mL	100 mL	39889	01/20/23 15:23	AMB	EET SPK

## **Client Sample ID: CS-6** Date Collected: 01/16/23 14:00 Date Received: 01/17/23 16:03

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	39849	01/18/23 17:49	NMI	EET SPK
Total/NA	Analysis	350.1		1	10 mL	10 mL	600997	01/31/23 13:43	MMP	EET DEN
Total/NA	Analysis	353.2		5	100 mL	100 mL	600671	01/27/23 13:16	KEG	EET DEN
Total/NA	Analysis	SM 2540C		1	20 mL	100 mL	39889	01/20/23 15:23	AMB	EET SPK

### Client Sample ID: MW-200 Date Collected: 01/16/23 11:05 Date Received: 01/17/23 16:03

	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		20	5 mL	5 mL	39849	01/18/23 18:02	NMI	EET SPK
Total/NA	Analysis	353.2		50	100 mL	100 mL	600671	01/27/23 13:18	KEG	EET DEN

### **Client Sample ID: Field Blank** Date Collected: 01/16/23 10:45 Date Received: 01/17/23 16:03

_	Batch	Batch		Dil	Initial	Final	Batch	Prepared		
Prep Type	Туре	Method	Run	Factor	Amount	Amount	Number	or Analyzed	Analyst	Lab
Total/NA	Analysis	300.0		1	5 mL	5 mL	39849	01/18/23 18:14	NMI	EET SPK
Total/NA	Analysis	353.2		1	100 mL	100 mL	600671	01/27/23 13:20	KEG	EET DEN

#### Laboratory References:

EET DEN = Eurofins Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100

EET SPK = Eurofins Spokane, 11922 East 1st Ave, Spokane, WA 99206, TEL (509)924-9200

**Eurofins Spokane** 

# Accreditation/Certification Summary

Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002 Job ID: 590-19634-1

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## Laboratory: Eurofins Spokane

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

Authority	Program	Identification Number	Expiration Date
Washington	State	C569	01-07-24

## Laboratory: Eurofins Denver

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

Authority	Program	Identification Number	Expiration Date
2LA	Dept. of Defense ELAP	2907.01	10-31-23
2LA	ISO/IEC 17025	2907.01	10-31-23
abama	State Program	40730	09-30-12 *
aska (UST)	State	18-001	02-08-23
izona	State	AZ0713	12-20-22 *
rkansas DEQ	State	19-047-0	05-31-23
alifornia	State	2513	01-08-23 *
onnecticut	State	PH-0686	09-30-22 *
orida	NELAP	E87667-57	06-30-23
nois	NELAP	2000172019-1	04-30-23
owa	State	IA#370	12-01-24
ansas	NELAP	E-10166	04-30-23
ouisiana	NELAP	30785	06-30-14 *
puisiana	NELAP	30785	06-30-23
ouisiana (All)	NELAP	30785	06-30-23
nnesota	NELAP	1788752	12-31-22 *
evada	State	CO000262020-1	07-31-23
w Hampshire	NELAP	205319	04-28-23
w Jersey	NELAP	190002	06-30-23
w York	NELAP	59923	04-01-23
rth Carolina (WW/SW)	State	358	12-31-22 *
rth Dakota	State	R-034	01-08-23 *
lahoma	NELAP	8614	08-31-23
egon	NELAP	4025-011	01-10-24
nnsylvania	NELAP	013	07-31-23
uth Carolina	State	72002001	01-08-23 *
kas	NELAP	TX104704183-08-TX	09-30-09 *
kas	NELAP	T104704183-21-19	09-30-23
S Fish & Wildlife	US Federal Programs	058448	07-31-23
SDA	US Federal Programs	P330-20-00065	03-06-23
ah	NELAP	QUAN5	06-30-13 *
ah	NELAP	CO000262019-11	07-31-23
ginia	NELAP	10490	06-14-23
ashington	State	C583-19	08-03-23
est Virginia DEP	State	354	11-30-22 *
lisconsin	State	999615430	08-31-23
/yoming (UST)	A2LA	2907.01	10-31-22 *

\* Accreditation/Certification renewal pending - accreditation/certification considered valid.

# **Method Summary**

#### Client: Hart Crowser, Inc. Project/Site: SGS Moxee GW Sampling/0202395-002

Method	Method Description	Protocol	Laboratory
300.0	Anions, Ion Chromatography	EPA	EET SPK
350.1	Nitrogen, Ammonia	EPA	EET DEN
353.2	Nitrogen, Nitrate-Nitrite	MCAWW	EET DEN
SM 2540C	Solids, Total Dissolved (TDS)	SM	EET SPK

#### Protocol References:

EPA = US Environmental Protection Agency

MCAWW = "Methods For Chemical Analysis Of Water And Wastes", EPA-600/4-79-020, March 1983 And Subsequent Revisions. SM = "Standard Methods For The Examination Of Water And Wastewater"

#### Laboratory References:

EET DEN = Eurofins Denver, 4955 Yarrow Street, Arvada, CO 80002, TEL (303)736-0100 EET SPK = Eurofins Spokane, 11922 East 1st Ave, Spokane, WA 99206, TEL (509)924-9200

505 W Riv	ldrich, Inc. verside,		CUSTODV DEC		Phone (617) 886-7400 Fax (617) 886-7600
ALDRICH Suite 205, Spokane V	VA 00010	CHAINOR	F CUSTODY REC	LUKD	
	1345 - 002			DEL 100110 100 100111	Page of )
		LABORATORY	Eurofins	DELIVERY DATE //17/23	
PROJECT NAME $\underline{S65}$	Moxee GW Sampling 1 Haney	· · · · · · · · · · · · · · · · · · ·	······································	TURNAROUND TIME <u>10 do</u>	iys
H&A CONTACT John	n Haney	CONTACT		PROJECT MANAGER	
			Analysis Requested		
Sample No. Dat	te Time Depth T	AL AL AL AL AL AL AL AL AL AL		Number of	mments as, additional method numbers, etc.)
MW 1 1/16	123 9.40 D.			Laboratory to use applicable D	EP CAM methods, unless otherwise
MW 2 MW-3	10:35				rected.
MW-4 MW 5 MW-6	12.25 11 40 15-15	X X X X X X X X X X X X		22	
CS 4 CS - 6 MW - 200	)4 40 14 00 11:05				A 1.
Field Blank	10,45	X X X		2 NO ammovia, TD	> Analysis
ampled and Relinquished by	Received by			Sampling Comments	
sign <i>July 1995</i> Print Chad M Finn H I-A Date V 17/23 Time 16 03 Relinguished by	Sign CHUU 300 Print CHUU 330 Firm CECO Date 1/17/23 Time 100 Received by			VOA Vial Aniber Glass Plastic Botte Preservative	
Sign			SOLID		
	Sign			VQA Viat	
rint	Print				
irm	Firm			Amber Glass	11111 11111 1111 1111 1111 1111 stady
Date Time	Date Time			Clear Glass 590-19634 Chain of Cut	<u>xvvvj</u>
telinquished by	Received by			Preservative Evidence samples were tampered	with? YES NO
lign	Sign			Volume If YES, please explain in section b	elow.
rint	Print	P	RESERVATION KEY		
ïm	Firm	A Sample chilled C NaOH	E H <sub>2</sub> SO <sub>4</sub> G Methanol		
Date Time	Date Time	B Sample filtered D HNO.	F HCL II Water/NaHSO4	4 (circle)	
	<u>1-</u>		aboratory to use applicable DEP CAM method		·····
f Presumptive Certainty Data Package is	needed, initial all sections:		aborning, to use apprendic DET CAM Include	Required Reporting Limits and D	ata Quality Objectives
		M-VII have been or will be collected, as appropriate,	to meet the requirements of Presumptive Certainty		
	MCP Metals and/or Cyanide are inclu-		· · · · · · · · · · · · · · · · · · ·	D <sub>RC-S1</sub>	$\square_{S1}$ $\square_{GW1}$
This Chain of Custody Record	•	does not include samples defined as Drinking Wa	ter Samples.	C RC-S2	$\square_{s2}$ $\square_{GW2}$
If this Chain of Custody Recor appropriate. Laboratory should		g Water Samples, Trip Blanks and Field Duplicates a	-		□ <sub>\$3</sub> □ <sub>GW3</sub>
	WHITE	E Laboratory CANARY Project Manager	PINK Haley & Aldrich Laboratory		FEBRUARY 2016

**Eurofins Savannah** 5102 LaRoche Avenue

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Chain of Custody Record

9923 213 213

🔹 eurofins

Savannah, GA 31404	J			ritatil of custous hecord	こううい	3				H	,			Enviro imeni Testing	<u>g</u> (1)
Phone: 912-354-7858 Fax: 912-352-0165										+		ľ			Γ
Client Information (Sub Contract Lab)	Sampler:			Lab PM Arring	Lab PM: Arrington, Randee E	ndee E			Carri	Carrier Tracking No(s)	Vo(s):	<u> </u>	COC No: 680-724820.1		
	Phone:			E-Mail: Donod	Arring		E-Mail: Dandee Arrington@et eurofinsus com	mor an	State	State of Origin: Washington			Page: Page 1 of 1		
	_				Accreditati	ons Requ	Accreditations Required (See note):	ote):					Job #:		Γ
TestAmerica Laboratories, Inc.	٩				State Pro	ogram -	State Program - Washington	ton					590-19634-1		Τ
Address: 4955 Yarrow Street,	Due Date Requested: 1/30/2023	÷					Ar	alysis	Analysis Requested	sted			Preservation Codes: A - HCL	Codes: M - Hexane	
City:	TAT Requested (days):	ys):											B - NaOH C - Zn Acetate	N - None O - AsNaO2 P - Na204S	
State, Zip: CO, 80002	1										1		D - Nitric Acid E - NaHSO4 E McOH	Q - Na2SO3 R - Na2S2O3	
Phone: 303-736-0100(Tel) 303-431-7471(Fax)	HO #:												F - MEON G - Amchlor - H - Ascorbic Acid		ø
Email:	;# OM				(oN	อาเปาเก-							I - Ice J - DI Water K - ⊏∩⊤∆	V - MCAA W - pH 4-5	
Project Name: SGS Moxee GW Sampling/0202395-002	Project #: 59001939				lo se							ənistn	L - EDA	Y - Trizma Z - other (specify)	
Site:	SSOW#:				r) as								Other:		
			Sample	Matrix	W/SM							nber			
		Sample	Type (C=comp,	(W=water, S=solid, O=waste/oil.	id Filte form l	.2_Pres 1/ Nitr						inN lsì		ł	
Sample Identification - Client ID (Lab ID)	Sample Date	Time	G=grab)	G=grab) BT=TIssue, A=Air)	ьer				_		P #	οT	Specia	Special Instructions/Note:	T
	$\left( \right)$	X	Preservat	Preservation Code:	X	-		_							T
MW-1 (590-19634-1)	1/16/23	09:40 Pacific		Water		× ×		۹			_	-	2		
MW-5 (590-19634-5)	1/16/23	11:40 Pacific		Water		× ×						-	A		
MW-6 (590-19634-6)	🔹 1/16/23	15:15 Pacific		Water		××					1	-			
CS-4 (590-19634-7)	1/16/23	14:40 Pacific		Water		× ×						-			I
± MW-200 (590-19634-9)	1/16/23	11:05 Pacific		Water		×						-			
Field Blank (590-19634-10)	1/16/23	10:45 Pacific	دم	Water		×						1			
7															
					t										
															T
Note: Since laboratory accreditations are subject to change, Eurofins Environment Testing Southeast, LLC places the ownership of method, analyte & accreditation compliance upon our subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory accreditation is the State of Origin lised above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins Environment Testing Southeast. LLC laboratories. Any changes to accreditation to the state of Origin lised above for analysis/tests/matrix being analyzed, the samples must be shipped back to the Eurofins Environment Testing Southeast. LLC laboratories. Any changes to accreditation accreditation accounts that accreditation to the instructions will be provided. Any changes to accreditation accreditation is should be brought to Eurofins Environment Testing Southeast, LLC attention immediately. If all requested accreditations are current to date, return the signed Chain of Custody attesting to said compliance to Eurofins Environment Testing Southeast, LLC	nt Testing Southeast, I nalysis/tests/matrix bei ion immediately. If all	LC places the ng analyzed, tf equested acc	ownership of m ne samples mus reditations are c	nethod, analyte st be shipped ba :urrent to date, r	& accredita ck to the E eturn the s	ation com Eurofins E signed Ch	Ipliance upo Environment Iain of Custo	n our subc Testing S dy attestir	contract labor outheast, LL0 ng to said cor	atories. Thi C laboratory npliance to I	s sample ship or other instru curofins Envir	uctions will onment T	rwarded under c be provided. Al esting Southeast	hain-of-custody. If the labors ly changes to accreditation LLC.	atory
Possible Hazard Identification					Sam	ple Dis	posal ( A	fee ma	/ be asse	ssed if sa	mples are	retaine	Sample Disposal ( A fee may be assessed if samples are retained longer than 1 month)	n 1 month)	
Unconfirmed						<sup></sup> Retun	Return To Client	t	Dispo	Disposal By Lab		Archi	Archive For	Months	T
Deliverable Requested: I, II, III, IV, Other (specify)	Primary Deliverable Rank:	able Rank:	2		Spec	cial Instr	Special Instructions/QC Requirements:	C Requ	rements:	3					
Empty Kit Relinquished by:		Date:			Time:		an'			Method of Shipment:	Shipment:				
Relinquished by:	Date/Time:	1600		Company	<u>æ</u>	Received by:	by: M	đ			Date/Time:	5.23	3 0945		
Relinquished by	Date/Time:			Company		Received by:	by:				Ďate/Time:			Company	

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2/1/2023

telinquished by

Ver: 06/08/202

IRIZ CF0.0

2.6.0

Cooler Temperature(s) °C and Other Remarks:

4

Received by:

Company

Date/Time:

Company

Date/Time

# Login Sample Receipt Checklist

#### Client: Hart Crowser, Inc.

#### Login Number: 19634 List Number: 1 Creator: Fettig, Riley

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

Job Number: 590-19634-1

List Source: Eurofins Spokane

# Login Sample Receipt Checklist

Client: Hart Crowser, Inc.

#### Login Number: 19634 List Number: 2 Creator: Held, Wesley

Question	Answer	Comment
Radioactivity wasn't checked or is = background as measured by a survey meter.</td <td>N/A</td> <td></td>	N/A	
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	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	

Job Number: 590-19634-1

List Source: Eurofins Denver

List Creation: 01/26/23 03:29 PM