Phase II Environmental Site Investigation

Active Petro-Canada Retail Fuel Outlet No. 35197
4000 Riverside Drive, Ottawa, Ontario

Suncor Energy Products Partnership

3275 Rebecca Street, Oakville, ON L6L 6N5

Prepared by:

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SLR Project No.: 216.030059.00002

November 25, 2024

Revision: 0

Making Sustainability Happen

Revision Record

Revision	Date	Prepared By	Checked By	Authorized By
0	November 25, 2024	Robert Worthington	Matt Williamson	Mike Grinnell

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General

Report Date:	November 25, 2024	**SLR Project No.:**	216.030059.00002
Suncor Authorization:	Kelly Klassen	**Suncor Outlet No.:**	35197

Prepared by Matt Williamson, M.Sc., P.Geo.

Reviewed by Mike Grinnell, P.Eng.

Project Name: Phase II Environmental Site Investigation

Property Address:	4000 Riverside Drive	Ottawa	ON
	Street	City	Province

Purpose of Assessment: The objective of this program was to assess the current soil and groundwater conditions potentially relating to the current service station operations at the Site.

Previous Environmental Site Assessments:

- Limited Phase I Environmental Site Assessment, Active Petro-Canada Retail Fuel Outlet No. 35197, 4000 Riverside Drive, Ottawa, ON. Prepared by SLR, dated April 29, 2024.
- Environmental Subsurface Investigation, Petro Canada, 4000 Riverside Drive, Ottawa, Ontario. Prepared by Jacques Whitford Environment Ltd., dated December 12, 2003.
- Geotechnical Investigation, Petro Canada, 4000 Riverside Drive, Ottawa, Ontario. Prepared by Jacques Whitford and Associates Ltd., dated March 28, 2003.
- Preliminary Geotechnical Investigation, 4059930 Canada Inc. Prepared by John D. Paterson and Associates Ltd., dated May 24, 2002.
- Phase I-II Environmental Site Assessment, 4059930 Canada Inc., Riverside Drive at Hunt Club Road, Ottawa, Ontario. Prepared by John D. Paterson and Associates Ltd., dated May 13, 2002.

Property Characteristics

(Figure 1)

Local Drinking Water Supply:	The Site and local residences are connected to a municipal water supply sourced from the Ottawa River[1].
Groundwater Usage:	Local residences are principally sourced by municipal water. Potable drinking water wells were not identified within the 250-metre search radius of the Site[2].
Topography and Surface Drainage:	The property is relatively flat with the relief generally prevailing topography sloping to the west towards the Rideau River. There is an approximate grade change of 25 m between the Site and the Rideau River. Surface drainage is locally controlled by storm water catch basins on the Site.
Proximity to Surface Water:	No natural surface water bodies were identified within 30 m of the site. The nearest water body is the Rideau River, located approximately 90 metres west of the Site.
Present Land Use:	The property is currently occupied by a retail fuel outlet. The property is zoned as light industrial (IL), under By-law 2008-250.[3]
Existing Surface Facilities:	Existing surface facilities include a pump island, car wash, garbage storage shed and kiosk. At the time of the investigation the pump island included four dispensers.
Existing Underground Facilities:	Underground facilities include three underground storage tank (USTs) containing gasoline, the associated underground product piping, and two oil/water separators. The Site is currently serviced by municipal water, sanitary sewer, storm water, underground hydro, natural gas, and communication utilities. A public storm sewer dissects the Site located in two easements crossing the Site.

Adjacent Land Use:		
	East:	Riverside Drive followed by Commercial (Hunt Club Marketplace)
	North:	Vacant land and Hunt Club Road followed by vacant land
	West:	Vacant land followed by the Rideau River
	South:	Commercial (St. Hubert's Restaurant)

[1] City of Ottawa. 2023. Annual Report on Drinking Water Quality. Available at https://www.documents.ottawa.ca/site/default/files/2023_annualreport_britannia_en.pdf.

[2] MECP, 2024. Map: Well Records. Available at https://www.ontario.ca/page/map-well-records.

[3] City of Ottawa. No Date. New Zoning By-Law 3D Interactive Map (By-Law 2008-250).

Applicable Standards:

The site condition standards presented in the MECP document entitled "*Soil, Ground Water and Sediment Standards for Use Under Part XV.1 of the Environmental Protection Act*", April 15, 2011, were used to assess the Site. The following rationale was used for the selection of the appropriate site condition standards:

- The Site and local residences are connected to a municipal water supply sourced from the Ottawa River. Domestic water well records were not identified within a 250 m radius of the Site in the water well record database as described above.
- The portion of the property with the service station is considered a commercial use as defined in O. Reg. 153/04 (as amended). The Site is currently zoned as light industrial.
- Bedrock was not encountered in the borehole locations, and as such the Site is not considered a shallow soil property.
- Grain size analytical results for soil samples submitted from the site indicated that site soils can be considered coarse textured as defined by O.Reg. 153/04.
- No natural surface water bodies were identified within 30 m of the site.
- The Site is not considered to be within an environmentally sensitive area, based on the following:
  - The Site is not within, adjacent or include lands that are within 30 metres of area of natural significance[4]; and,
  - Soil pH samples verified that pH at the Site ranges between 5 and 9.
- Based on the above noted information, the applicable site condition standards were determined to be the "*Full Depth Generic Site Condition Standards in a Non-Potable Ground Water Condition"* (herein referred to as the "MECP Table 3 Standards") for coarse textured soils and industrial/commercial/community property use.

Property Investigation

(Figure 2)

Investigation Date(s):

September 26, October 1 to 3; October 7 to 10, 2024 (intrusive program)
October 16 and 18, 2024 (groundwater program)

Monitoring Date(s):

October 16, 2024 (groundwater monitoring of newly installed on-site wells)

Investigation Methodology:

A total of nine boreholes (BH24-01 to BH24-09) were drilled or sampled to assess the existing soil conditions on the property. Two of the boreholes were instrumented as monitoring wells (BH24-06 and BH24-08). The two newly installed monitoring wells, BH24-06 and BH24-08, were used to characterize hydrogeology, to determine concentrations of contaminants of concerns in groundwater, to confirm the presence or absence of light non-aqueous phase liquids (LNAPL), and to determine groundwater elevations and gradient.

[4] City of Ottawa Official Plan, 2022. Schedule 11S – Natural Heritage System (West).

Drill Rig / Backhoe:	The drilling program was conducted utilizing a CME-75 truck-mounted drill rig and operated by Geo-Environmental Drilling Inc. (GEDI) of Halton Hills, Ontario.
Field Procedures:	Public and private locates were completed prior to the work. Badger Daylighting (Badger) of Carp, Ontario, completed hydro-vacuuming of each borehole. GEDI of Halton Hills, Ontario, completed drilling of each borehole. Prior to drilling of each borehole, each location was daylighted to 2.4 metres below ground surface (mbgs) to verify utility clearance. Daylighting activities were completed by Badger, under direct supervision of SLR, between October 1 and October 3, 2024. GEDI, an MECP licensed drilling contractor, completed the drilling activities under direct supervision of SLR between October 7 and October 10, 2024. The boreholes (BH24-01 to BH24-09) were drilled using a truck-mounted CME 75 drill rig. The boreholes were advanced to a maximum depth of 5.2 mbgs (BH24-02), 6.7 mbgs (BH24-01, BH24-03 through BH24-05, and BH24-07), 8.2 mbgs (BH24-09), or 17.4 mbgs (BH24-06 and BH24-08). To relate the groundwater elevations, a vertical survey was completed to determine the associated water wells relative to a local datum. The vertical survey was completed by J.D. Barnes Ltd. on October 16, 2024. Both newly installed monitoring wells, BH24-06 and BH24-08, were developed prior to groundwater sampling. The wells were then allowed more than 48 hours to equilibrate prior to sampling and monitoring. SLR sampled groundwater from newly installed monitoring wells BH24-06 and BH24-08 on the Site, on October 18, 2024.
Boreholes:	BH24-01 to BH24-09, inclusive.
Surface Sample:	None completed
Test Pits:	None completed
Monitoring Wells:	BH24-06 and BH24-08 were instrumented as monitoring wells as part of this program.
Existing Wells:	No existing monitoring wells on-site.
Soil Analyses:	Twenty-five soil samples and two blind field duplicate (BFD) samples were submitted for laboratory analysis of one or more of BTEX and PHCs, VOCs, PAHs, Metals and Inorganics, and Glycols. Twelve soil samples were submitted for pH and five for grain size analysis.
Groundwater Analyses:	Two groundwater samples, one BFD sample, a field blank, and a trip blank were submitted for laboratory analysis of one or more of dissolved BTEX and PHC F1 to F4, VOCs, PAHs, dissolved metals, and glycols for newly installed monitoring wells on October 18, 2024.
Soil Vapour Analyses:	No vapour samples completed.

Quality Review	A summary of laboratory Quality Assurance (QA) and Quality Control (QC) is provided in Appendix C. Field QA/QC testing was conducted in the form of BFDs for soil (two BFDs) and groundwater (one BFD), field blank (one) and trip blank (one) for groundwater.
Other Information:	Boreholes BH24-01 through BH24-04 were relocated due to utility conflicts. Grain size and soil pH samples were collected to confirm Site condition Standards. One drill cutting sample was analysed to determine suitability for landfill disposal using the toxicity characteristic leachate procedure.

Results

(Tables 1 through 13 and Figures 3 through 13)

Soil Type(s):	The subsurface geology encountered at the Site during the drilling program consisted of a layer of fill underlying asphalt to a maximum depth of between 0.5 to 2.4 mbgs. Below this fill material was principally sand to a maximum depth of 17.4 mbgs. Five representative soil samples were submitted for grain size analysis and determined soils were coarse grained as defined by O.Reg. 153/04. The detailed soil stratigraphy encountered at each investigation location is presented in the borehole logs which are provided in Appendix A.
Bedrock Type(s):	Bedrock was not encountered in the borehole locations investigated up to the maximum boring termination depth of 17.4 mbgs. Bedrock was not encountered in previous investigations in 2002 and 2003, where maximum depths of 15.2 and 25.0 metres below ground surface were reached, respectively.
Soil Headspace Vapour Testing:	The results of the headspace vapour readings collected during drilling (using a RKI Eagle II as previously described) are summarized below: • Headspace vapour concentrations measured during drilling ranged from 0 ppm at multiple samples and locations to 35 ppm (hexane), noted in BH24-04 at a depth ranging from approximately 3.00 to 3.60 mbgs. The relative organic vapour concentrations measured from the soil sample headspace using the RKI Eagle II and the location of the soil samples collected (excluding the sample for waste characterization analysis) are presented in the borehole logs in Appendix A.
Groundwater:	Groundwater levels were measured and recorded from newly installed monitoring wells on October 16, 2024 (prior to development). All groundwater levels and groundwater elevations are presented in appended Table 1. On October 16, 2024, groundwater ranged from 16.37 mbgs (at BH24-08) to 16.56 mbgs (at BH24-06). Groundwater elevations ranged from 86.22 m (at BH24-06) to 86.69 m (at BH24-08).
Light Non Aqueous Phase Liquids:	Light non-aqueous phase liquids were not encountered during the monitoring events completed on October 16, 2024. See Table 1 for details.

Monitoring Well Headspace Vapours:

Headspace vapours were collected from monitoring wells using an RKI Eagle II as follows:

- During the October 16th event, headspace vapour concentrations ranged from 0 ppm (BH24-08) and 10 ppm (BH24-06).

See Table 1 for details.

Soil Analyses:

All analyzed soil samples had BTEX and PHC F1 to F4, VOCs, PAHs, metals and inorganics (SAR, EC) were below the applicable Table 3 site condition standard except for the following:

- One exceedance for Electrical Conductivity at BH24-07_2-2.45M; and
- One exceedance for Sodium Absorption Ratio at BH24-07_2-2.45M.

Refer to Table 3 through 7 and Figure 4 through 8 for details. A soil sample collected for landfill characterization was considered non-hazardous as seen in Table 8. Copies of the laboratory certificates of analyses are attached for reference (Appendix C).

Groundwater Analyses:

Groundwater samples submitted for analyses from newly installed monitoring wells (MW24-06 and MW24-08) had concentrations below the applicable Table 3 site condition standard for all of the analyzed parameters: BTEX and PHC F1 to F4, VOCs, PAHs, dissolved metals and glycols.

Refer to Table 9 to 13 and Figure 9 to 13 for details. Copies of the laboratory certificates of analyses are attached for reference (Appendix C).

Soil Vapour Analyses:

Not completed.

Quality Review

The SLR QA/QC data quality review is included in Appendix D. See laboratory certificates of analysis reports in Appendix C for laboratory QA/QC analysis. Four quality flags were described as noted in the Appendix D. These quality flags are not considered to have material impact on the interpretation of the data.

The soil and groundwater data are considered reliable for use in this report.

Other Analyses:

Grain size analysis and soil pH were collected from select locations to confirm the Site condition standards:

The results were as follows as summarized in Table 2:

- BH24-02_0.5-1M (0.5-1.0 mbgs) – 96% > 75 microns, coarse grained
- BH24-06_9.14-9.75 (9.14-9.75 mbgs) – 93% > 75 microns, coarse grained
- BH24-06_16.76-17.37 (16.76-17.37 mbgs) – 90% > 75 microns, coarse grained
- BH24-07_6.09-6.70 (6.09-6.70 mbgs) – 94 % > 75 microns, coarse grained
- BH24-08_1-1.5M (1.0-1.5 mbgs) – 96 % > 75 microns, coarse grained
- Shallow soil pH range (< 1.5 mbgs) – 6.94 to 7.81 pH units
- Subsurface soil pH range (> 1.5 mbgs) – 7.62 to 8.01 pH units

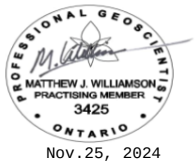
Based on the grain size analysis results and available reports for the Site the soil type is considered coarse-grained. The soil pH samples collected were all within the acceptable pH ranges for surface and subsurface soils.

Closure

The subsurface investigation report was prepared by SLR Consulting (Canada) Ltd. (SLR). The findings and conclusion of this report were prepared under the supervision and direction of the undersigned.

Regards,

SLR Consulting (Canada) Ltd.



Nov.25, 2024

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Attachments

Tables

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Appendices

Appendix A **Field Methods**

Appendix B **Borehole Logs**

Appendix C **Laboratory Certificates of Analysis**

Appendix D **Data Quality Review**

Tables

Phase II Environmental Site Investigation

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4000 Riverside Drive, Ottawa, Ontario

Suncor Energy Products Partnership

SLR Project No.: 216.030059.00002

November 25, 2024

Table 1: Groundwater Monitoring Results

Monitoring Well ID (Sample Location)	Top of Riser Elevation[1,2] (m)	Ground Surface Elevation[1,2] (m)	Screened Interval (mbgs)	Date	HSVL (ppmv)	Depth to Water (m bTOC)	Depth to Water (mbg)[2]	LNAPL Thickness (m)	Groundwater Elevation (m)
MW24-06	102.69	102.77	14.9 - 17.4	2024-Oct-18	10	16.48	16.56	nd	86.21
MW24-08	102.97	103.06	14.9 - 17.4	2024-Oct-18	0	16.27	16.37	nd	86.69

Notes:

[1] Elevations are relative to ground elevation survey completed by JD Barnes on October 16 relative to City of Ottawa LRT Benchmark No. 2016 0328 with published elevation of 82.49 m

m - metres

ppmv - parts per million by volume

LNAPL - light non-aqueous phase liquid

TOC - top of casing

HSVL - combustible headspace vapour levels

mbTOC - metres below top of casing

mbg - metres below grade

nd - non detect

n/a - not applicable

Shading denotes most recent monitoring event

TABLE 2: SOIL - PHYSIOCHEMICAL	Particle Size		
	% < 0.075 mm	% > 75um	pH (Lab)
	%	%	pH Units
Reported Detection Limit	1	1	
ON Soil Table 3 I/C/C Non-Potable Coarse	**ng**	**ng**	**5-9**

Sample ID	Sample Location	Sample Depth (mbg)	Sample Date			
BH24-01_1-1.5M	BH24-01	1.0 - 1.5	2024-Oct-2	-	-	7.42
BH24-02_0.5-1M	BH24-02	0.5 - 1.0	2024-Oct-3	4	96	-
BH24-02_2-2.4M		2.0 - 2.4	2024-Oct-3	-	-	7.9
BH24-03_0.5-1M	BH24-03	0.5 - 1.0	2024-Oct-3	-	-	6.94
BH24-04_0.5-1M	BH24-04	0.5 - 1.0	2024-Oct-3	-	-	7.05
BH24-04_6.09-6.70		6.1 - 6.7	2024-Oct-10	-	-	8.01
BH24-05_1-1.5M	BH24-05	1.0 - 1.5	2024-Oct-2	-	-	6.99
BH24-06_1.5-2M	BH24-06	1.5 - 2.0	2024-Oct-2	-	-	7.63
BH24-06_9.14-9.75		9.1 - 9.8	2024-Oct-8	7	93	-
BH24-06_16-16.61		16.0 - 16.6		10	90	-
BH24-07_2-2.45M	BH24-07	2.0 - 2.5	2024-Oct-2	-	-	7.78
BH24-07_6.09-6.70		6.1 - 6.7	2024-Oct-10	6	94	7.95
BH24-08_1-1.5M	BH24-08	1.0 - 1.5	2024-Oct-1	4	96	7.81
BH24-08_16.76-17.37		16.8 - 17.4	2024-Oct-9	-	-	7.9
DUP-2			2024-Oct-9	-	-	7.84
BH24-09_2-2.45M	BH24-09	2.0 - 2.5	2024-Oct-1	-	-	7.62

Standard/Guideline Descriptions

• ON Soil Table 3 I/C/C Non-Potable Coarse:Ontario Soil Table 3: Full Depth Generic Site Condition Standards in a Non-Potable Ground Water Condition, Industrial/Commercial/Community Property Use, Coarse

Notes:

• formatting of cells indicates exceedances of like-formatted standards

ng - no guideline

mbg - metres below grade

µm - micrometres

% - percent

> - denotes particle size greater than 75 micrometres

TABLE 3: SOIL - PETROLEUM HYDROCARBONS

					Petroleum Hydrocarbons								
					Benzene	Toluene	Ethylbenzene	Xylene Mixture	Petroleum Hydrocarbons F1	Petroleum Hydrocarbons F1 (less BTEX)	Petroleum Hydrocarbons F2	Petroleum Hydrocarbons F3	Petroleum Hydrocarbons F4
					µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g
Reported Detection Limit					0.006	0.02	0.01	0.02	10	10	7	50	50
ON Soil Table 3 I/C/C Non-Potable Coarse					**0.32**	**68**	**9.5**	**26**	**55**	**55**	**230**	**1700**	**3300**
Sample ID	**Sample Location**	**Sample Depth (mbg)**	**Sample Date**										
BH24-01_1-1.5M	BH24-01	1.0 - 1.5	2024-Oct-2		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-01_6.09-6.7		6.1 - 6.7	2024-Oct-9		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-02_2-2.4M	BH24-02	2.0 - 2.4	2024-Oct-3		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-02_4.57-5.02		4.6 - 5.0	2024-Oct-10		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-03_0.5-1M	BH24-03	0.5 - 1.0	2024-Oct-3		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-03_6.09-6.7		6.1 - 6.7	2024-Oct-8		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-04_0.5-1M	BH24-04	0.5 - 1.0	2024-Oct-3		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-04_3.04-3.65		3.0 - 3.7	2024-Oct-10		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-04_6.09-6.70		6.1 - 6.7			<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-05_1-1.5M	BH24-05	1.0 - 1.5	2024-Oct-2		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-05_6.09-6.70		6.1 - 6.7	2024-Oct-7		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-06_1.5-2M	BH24-06	1.5 - 2.0	2024-Oct-2		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-06_8.38-9.0		8.4 - 9.0	2024-Oct-8		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-06_11.43-12.04		11.4 - 12.0			<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-06_16-16.61		16.0 - 16.6			<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
DUP-1		16.0 - 16.6			<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-07_2-2.45M	BH24-07	2.0 - 2.5	2024-Oct-2		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-07_6.09-6.70		6.1 - 6.7	2024-Oct-10		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-08_1-1.5M	BH24-08	1.0 - 1.5	2024-Oct-1		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-08_6.09-6.70		6.1 - 6.7	2024-Oct-9		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-08_11.43-12.04		11.4 - 12.0			<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-08_16.76-17.37		16.8 - 17.4			<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
DUP-2					<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50
BH24-09_2-2.45M	BH24-09	2.0 - 2.5	2024-Oct-1		<0.006	<0.02	<0.01	<0.02	<10	<10	<7	<50	<50
BH24-09_6.85-7.45		6.9 - 7.5	2024-Oct-10		<0.02	<0.02	<0.02	<0.04	<10	<10	<7	<50	<50

Standard/Guideline Descriptions

• ON Soil Table 3 I/C/C Non-Potable Coarse:Ontario Soil Table 3: Full Depth Generic Site Condition Standards in a Non-Potable Ground Water Condition, Industrial/Commercial/Community Property Use, Coarse

Notes:

• formatting of cells indicates exceedances of like-formatted standards

• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded

• laboratory analytical reports detail detection limits, testing protocols and QA/QC procedures

• samples collected from the same location, date and depth interval are blind field duplicate/parent sample pairs

< - less than reported detection limit

mbg - metres below grade

BTEX - benzene, toluene, ethylbenzene, xylenes

µg/g - micrograms per gram

TABLE 4: SOIL - VOLATILE ORGANIC COMPOUNDS

	VOCs																																				
	Acetone	Bromodichloromethane	Bromoform	Bromomethane	Carbon Tetrachloride	Chlorobenzene	Chloroform	Dibromochloromethane	Dichlorobenzene, 1,2-	Dichlorobenzene, 1,3-	Dichlorobenzene, 1,4-	Dichlorodifluoromethane	Dichloroethane, 1,1-	Dichloroethane, 1,2-	Dichloroethylene, 1,1-	Dichloroethylene, 1,2-cis-	Dichloroethylene, 1,2-trans-	Dichloropropane, 1,2-	Dichloropropene, 1,3-	Dichloropropene, 1,3-cis-	Dichloropropene, 1,3-trans-	Ethylene dibromide	Hexane (n)	Methylene chloride	Methyl Ethyl Ketone (MEK)	Methyl Isobutyl Ketone (MIK)	Methyl tert-Butyl Ether (MTBE)	Styrene	Tetrachloroethane, 1,1,1,2-	Tetrachloroethane, 1,1,2,2-	Tetrachloroethylene	Trichloroethane, 1,1,1-	Trichloroethane, 1,1,2-	Trichloroethylene	Trichlorofluoromethane	Vinyl chloride
	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g
Reported Detection Limit	0.49	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.049	0.04	0.04	0.04	0.04	0.05	0.03	0.04	0.04	0.04	0.049	0.4	0.4	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.01	0.04	0.019
ON Soil Table 3 I/C/C Non-Potable Coarse	**16**	**18**	**0.61**	**0.05**	**0.21**	**2.4**	**0.47**	**13**	**6.8**	**9.6**	**0.2**	**16**	**17**	**0.05**	**0.06**	**55**	**1.3**	**0.16**	**0.18**			**0.05**	**46**	**1.6**	**70**	**31**	**11**	**34**	**0.09**	**0.05**	**4.5**	**6.1**	**0.05**	**0.91**	**4**	**0.032**

Sample ID	Sample Location	Sample Depth (mbg)	Sample Date																																			
BH24-01_1-1.5M	BH24-01	1.0 - 1.5	2024-Oct-2	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-02_2-2.4M	BH24-02	2.0 - 2.4	2024-Oct-3	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-03_0.5-1M	BH24-03	0.5 - 1.0	2024-Oct-3	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-04_0.5-1M	BH24-04	0.5 - 1.0	2024-Oct-3	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-05_1-1.5M	BH24-05	1.0 - 1.5	2024-Oct-2	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-06_1.5-2M	BH24-06	1.5 - 2.0	2024-Oct-2	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-07_2-2.45M	BH24-07	2.0 - 2.5	2024-Oct-2	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-08_1-1.5M	BH24-08	1.0 - 1.5	2024-Oct-1	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019
BH24-09_2-2.45M	BH24-09	2.0 - 2.5	2024-Oct-1	<0.49	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.049	<0.04	<0.04	<0.04	<0.04	<0.05	<0.03	<0.04	<0.04	<0.04	<0.049	<0.4	<0.4	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.04	<0.01	<0.04	<0.019

Standard/Guideline Descriptions

• ON Soil Table 3 I/C/C Non-Potable Coarse:Ontario Soil Table 3: Full Depth Generic Site Condition Standards in a Non-Potable Ground Water Condition, Industrial/Commercial/Community Property Use, Coarse

Notes:

• formatting of cells indicates exceedances of like-formatted standards
• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
• laboratory analytical reports detail detection limits, testing protocols and QA/QC procedures
• samples collected from the same location, date and depth interval are blind field duplicate/parent sample pairs
< - less than reported detection limit
ng - no guideline
mbg - metres below grade
µg/g - micrograms per gram

TABLE 5: SOIL - POLYCYCLIC AROMATIC HYDROCARBONS

	PAHs																			
	Acenaphthylene	Acenaphthene	Anthracene	Benz[a]anthracene	Benzo[b+k]fluoranthene	Benzo[g h i]perylene	Benzo[k]fluoranthene	Benzo[a]pyrene	Chrysene	Dibenz[a h]anthracene	Fluoranthene	Fluorene	Indeno[1 2 3-cd]pyrene	Methylnaphthalene, 1-	Methylnaphthalene, 2-	Methylnaphthalene, 2-(1-)	Naphthalene	Phenanthrene	Pyrene
	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g
Reported Detection Limit	0.005	0.005	0.005	0.005	0.005	0.005	0.005	0.005	0.005	0.005	0.0050	0.005	0.005	0.005	0.005	0.0071	0.005	0.005	0.005
ON Soil Table 3 I/C/C Non-Potable Coarse	**0.15**	**96**	**0.67**	**0.96**	**ng**	**9.6**	**0.96**	**0.3**	**9.6**	**0.1**	**9.6**	**62**	**0.76**	**76**	**76**	**76**	**9.6**	**12**	**96**
BH24-01_1-1.5M	BH24-01	1.0 - 1.5	2024-Oct-2	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-02_2-2.4M	BH24-02	2.0 - 2.4	2024-Oct-3	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-03_0.5-1M	BH24-03	0.5 - 1.0	2024-Oct-3	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-04_0.5-1M	BH24-04	0.5 - 1.0	2024-Oct-3	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	0.0056	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-05_1-1.5M	BH24-05	1.0 - 1.5	2024-Oct-2	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-06_1.5-2M	BH24-06	1.5 - 2.0	2024-Oct-2	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-06_11.43-12.04		11.4 - 12.0	2024-Oct-8	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-07_2-2.45M	BH24-07	2.0 - 2.5	2024-Oct-2	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-08_1-1.5M	BH24-08	1.0 - 1.5	2024-Oct-1	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-08_16.76-17.37		16.8 - 17.4	2024-Oct-9	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
DUP-2			2024-Oct-9	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005
BH24-09_2-2.45M	BH24-09	2.0 - 2.5	2024-Oct-1	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.005	<0.0050	<0.005	<0.005	<0.005	<0.005	<0.0071	<0.005	<0.005	<0.005

Standard/Guideline Descriptions

• ON Soil Table 3 I/C/C Non-Potable Coarse:Ontario Soil Table 3: Full Depth Generic Site Condition Standards in a Non-Potable Ground Water Condition, Industrial/Commercial/Community Property Use, Coarse

Notes:

• formatting of cells indicates exceedances of like-formatted standards
• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
• laboratory analytical reports detail detection limits, testing protocols and QA/QC procedures
• samples collected from the same location, date and depth interval are blind field duplicate/parent sample pairs
'-' - sample not analyzed for parameter indicated
< - less than reported detection limit
mbg - metres below grade
ng - no guideline listed
µg/g - micrograms per gram

TABLE 6: SOIL - METALS AND INORGANICS

							Metals																Inorganics	
							Antimony	Arsenic	Barium	Beryllium	Boron (Total)	Hot Water Soluble Bor	Cadmium	Chromium VI	Chromium Total	Cobalt	Copper	Lead	Mercury	Molybdenum	Nickel	Selenium	Silver	Thallium	Uranium	Vanadium	Zinc	Sodium Absorption Ratio	Electrical Conductivity
							µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	µg/g	N/A	mS/cm
Reported Detection Limit							0.2	1	0.5	0.2	0.05	0.05	0.1	0.18	1	0.1	0.5	1	0.05	0.5	0.5	0.5	0.2	0.050	0.05	5	5		0.002
ON Soil Table 3 I/C/C Non-Potable Coarse							**40**	**18**	**670**	**8**	**120**	**2**	**1.9**	**8**	**160**	**80**	**230**	**120**	**3.9**	**40**	**270**	**5.5**	**40**	**3.3**	**33**	**86**	**340**	**12**	**1.4**
Sample ID	**Sample Location**	**Sample Depth (mbg)**	**Sample Date**																					
BH24-01_1-1.5M	BH24-01	1.0 - 1.5	2024-Oct-2	<0.2	<1	6.9	<0.2	<5.0	0.053	<0.1	<0.18	8.1	2.3	3.7	1.7	<0.05	<0.5	3.7	<0.5	<0.2	<0.050	0.52	32	9.1	1.2	0.16
BH24-02_2-2.4M	BH24-02	2.0 - 2.4	2024-Oct-3	<0.2	<1	11	<0.2	<5.0	<0.05	<0.1	<0.18	4.4	1.8	3.7	1.2	<0.05	<0.5	2.8	<0.5	<0.2	<0.050	0.35	13	6	2.4	0.14
BH24-03_0.5-1M	BH24-03	0.5 - 1.0	2024-Oct-3	<0.2	<1	20	<0.2	<5.0	0.051	<0.1	<0.18	9.5	2.6	4.5	2.8	<0.05	<0.5	4.4	<0.5	<0.2	<0.050	0.70	35	9.6	0.61	0.15
BH24-04_0.5-1M	BH24-04	0.5 - 1.0	2024-Oct-3	<0.2	<1	19	<0.2	<5.0	0.065	<0.1	<0.18	6.3	2.2	3.8	2.3	<0.05	<0.5	3.6	<0.5	<0.2	<0.050	0.46	18	8.7	1.6	0.63
BH24-04_6.09-6.70		6.1 - 6.7	2024-Oct-10	<0.2	<1	17	<0.2	<5.0	<0.05	<0.1	<0.18	5.7	2.4	4.1	1.4	<0.05	<0.5	3.2	<0.5	<0.2	<0.050	0.40	17	6.7	0.46	0.075
BH24-05_1-1.5M	BH24-05	1.0 - 1.5	2024-Oct-2	<0.2	<1	7.6	<0.2	<5.0	<0.05	<0.1	<0.18	6.7	2.0	3.1	1.4	<0.05	<0.5	2.9	<0.5	<0.2	<0.050	0.43	22	6.3	1.3	0.14
BH24-06_1.5-2M	BH24-06	1.5 - 2.0	2024-Oct-2	<0.2	<1	15	<0.2	<5.0	0.11	<0.1	<0.18	5.9	2.0	3.5	1.6	<0.05	<0.5	3.4	<0.5	<0.2	<0.050	0.45	17	6.6	1.3	0.25
BH24-07_2-2.45M	BH24-07	2.0 - 2.5	2024-Oct-2	<0.2	2	15	<0.2	<5.0	0.11	<0.1	<0.18	5.9	3.1	4.6	5.2	<0.05	1.4	5.7	<0.5	<0.2	0.053	0.45	13	8.2	**46**	**2.0**
BH24-07_6.09-6.70		6.1 - 6.7	2024-Oct-10	<0.2	<1	15	<0.2	<5.0	0.054	<0.1	<0.18	6.9	2.8	5.2	1.7	<0.05	<0.5	3.9	<0.5	<0.2	<0.050	0.45	21	8.4	2.6	0.33
BH24-08_1-1.5M	BH24-08	1.0 - 1.5	2024-Oct-1	<0.2	<1	15	<0.2	<5.0	0.12	<0.1	<0.18	6	2.2	4.1	1.9	<0.05	<0.5	3.5	<0.5	<0.2	<0.050	0.48	18	7.4	3.6	0.70
BH24-08_16.76-17.37		16.8 - 17.4	2024-Oct-9	<0.2	<1	36	<0.5	<5.0	0.051	<0.1	<0.18	11	3.7	6.0	1.9	<0.05	<0.5	5.1	<0.5	<0.2	<0.050	0.62	31	10	5.1	0.20
DUP-2			2024-Oct-9	<0.2	<1	33	<0.6	<5.0	0.071	<0.1	<0.18	9.4	3.6	5.8	1.8	<0.05	<0.5	4.8	<0.5	<0.2	<0.050	0.62	29	9.2	5	0.19
BH24-09_2-2.45M	BH24-09	2.0 - 2.5	2024-Oct-1	<0.2	<1	7.8	<0.7	<5.0	<0.05	<0.1	<0.18	5.6	2.0	3.2	1.4	<0.05	<0.5	2.8	<0.5	<0.2	<0.050	0.49	18	6.3	1.2	0.41

Standard/Guideline Descriptions

• ON Soil Table 3 I/C/C Non-Potable Coarse:Ontario Soil Table 3: Full Depth Generic Site Condition Standards in a Non-Potable Ground Water Condition, Industrial/Commercial/Community Property Use, Coarse

Notes:

• formatting of cells indicates exceedances of like-formatted standards
• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
• laboratory analytical reports detail detection limits, testing protocols and QA/QC procedures
• samples collected from the same location, date and depth interval are blind field duplicate/parent sample pairs

< - less than reported detection limit
mbg - metres below grade
µg/g - micrograms per gram

TABLE 7: SOIL - GLYCOLS

	Glycols			
	Ethylene glycol	Diethylene glycol	Propylene glycol	Total Glycols
	µg/g	µg/g	µg/g	µg/g
Reported Detection Limit	10	10	10	10
ON Soil Table 3 I/C/C Non-Potable Coarse	**ng**	**ng**	**ng**	**ng**

Sample ID	Sample Location	Sample Depth (mbg)	Sample Date				
BH24-01_1-1.5M	BH24-01	1.0 - 1.5	2024-Oct-2	<10	<10	<10	<10
BH24-05_1-1.5M	BH24-05	1.0 - 1.5	2024-Oct-2	<10	<10	<10	<10
BH24-06_1.5-2M	BH24-06	1.5 - 2.0	2024-Oct-2	<10	<10	<10	<10
BH24-07_2-2.45M	BH24-07	2.0 - 2.5	2024-Oct-2	<10	<10	<10	<10
BH24-08_1-1.5M	BH24-08	1.0 - 1.5	2024-Oct-1	<10	<10	<10	<10
BH24-08_16.76-17.37		16.8 - 17.4	2024-Oct-9	<10	<10	<10	<10
DUP-2			2024-Oct-9	<10	<10	<10	<10
BH24-09_2-2.45M	BH24-09	2.0 - 2.5	2024-Oct-1	<10	<10	<10	<10

Standard/Guideline Descriptions

• ON Soil Table 3 I/C/C Non-Potable Coarse:Ontario Soil Table 3: Full Depth Generic Site Condition Standards in a Non-Potable Ground Water Condition, Industrial/Commercial/Community Property Use, Coarse

Notes:

• formatting of cells indicates exceedances of like-formatted standards
• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
• laboratory analytical reports detail detection limits, testing protocols and QA/QC procedures
• samples collected from the same location, date and depth interval are blind field duplicate/parent sample pairs

< - less than reported detection limit
mbg - metres below grade
ng - no guideline listed
µg/g - micrograms per gram

TABLE 8: SOIL - WASTE CLASSIFICATION

			Leachate Analysis																														
			Benzene	Carbon Tetrachloride	Chlorobenzene	Chloroform	Dichlorobenzene, 1,2-	Dichlorobenzene, 1,4-	Dichloroethane, 1,2-	Dichloroethylene, 1,1-	Methylene chloride	Methyl Ethyl Ketone (MEK)	Tetrachloroethylene	Trichloroethylene	Vinyl chloride	Arsenic	Barium	Boron (Total)	Cadmium	Chromium Total	Lead	Mercury	Selenium	Silver	Uranium	Cyanide (WAD)	Fluoride	Nitrate (as NO3-)	Nitrate and Nitrite (as N)	Nitrite (as NO2-)	Ignitability
			mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	mg/L	µg/L	mg/L	mg/L	mg/L	mg/L	mg/L	n/a
Reported Detection Limit			0.02	0.02	0.02	0.02	0.05	0.05	0.05	0.02	0.2	1	0.02	0.02	0.02	0.2	0.2	0.1	0.05	0.1	0.1	0	0.1	0.01	0.01	0.01	0.1	1	1	0.1	n/a
Schedule IV Leachate Standards			**0.5**	**0.5**	**8**	**10**	**20**	**0.5**	**0.5**	**1.4**	**5**	**200**	**3**	**5**	**0.2**	**2.5**	**100**	**500**	**0.5**	**5**	**5**	**0.1**	**1**	**5**	**10**	**20**	**150**	**ng**	**1000**	**ng**	**ng**
Sample ID	**Sample Location**	**Sample Date**																															
TCLP-10-10-2024	TCLP	10/10/2024	<0.020	<0.020	<0.020	<0.020	<0.050	<0.050	<0.050	<0.020	<0.2	<1.0	<0.020	<0.020	<0.020	<0.2	0.3	<0.1	<0.05	<0.1	<0.1	<0.001	<0.1	<0.01	<0.01	<0.01	0.21	<1	<1	<0.1	NF

Standard/Guideline Descriptions:
Schedule 4 Leachate Quality Criteria (TCLP): waste producing leachate containing any of the contaminants listed in Schedule 4 at a concentration

Notes:
• formatting of cells indicates exceedances of like-formatted standards
• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
• laboratory analytical reports detail detection limits, testing protocols and QA/QC procedures
• samples collected from the same location, date and depth interval are blind field duplicate/parent sample pairs
< - less than reported detection limit
mg/L - milligrams pre liter
µg/L - micrograms per liter
NF- non-flammeable
ng- no guideline

TABLE 9: GROUNDWATER - PETROLEUM HYDROCARBONS

	Petroleum Hydrocarbons								
	Benzene	Toluene	Ethylbenzene	Xylene Mixture	Petroleum Hydrocarbons F1	Petroleum Hydrocarbons F1 (less BTEX)	Petroleum Hydrocarbons F2	Petroleum Hydrocarbons F3	Petroleum Hydrocarbons F4
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
Reported Detection Limit	0.17	0.2	0.2	0.2	25	25	90	200	200
ON GW Table 3 Non-Potable Coarse	**430**	**18000**	**2300**	**4200**	**750[#1]**	**750[#1]**	**150**	**500**	**500**
MW24-06	<0.17	<0.2	<0.2	<0.2	<25	<25	<90	<200	<200
MW24-08	<0.17	<0.2	<0.2	<0.2	<25	<25	<90	<200	<200
DUP-1	<0.17	<0.2	<0.2	0.2	<25	<25	<90	<200	<200

Sample ID	Sample Location	Sample Date
MW24-06	MW24-06	2024-Oct-18
MW24-08	MW24-08	2024-Oct-18
DUP-1		

Standard/Guideline Descriptions

• ON GW Table 3 Non-Potable Coarse:Ontario Groundwater Table 3: Full Depth Generic Site

Standard/Guideline Comments

#1:F1 fraction does not include BTEX; however, the proponent has the choice as to whether or not to

Notes:

• formatting of cells indicates exceedances of like-formatted standards

• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded

• samples collected at the same location and date are blind field duplicate/parent pairs

< - less than reported detection limit

µg/L - micrograms per litre

BTEX - benzene, toluene, ethylbenzene, xylenes

TABLE 10: GROUNDWATER - VOLATILE ORGANIC COMPOUNDS

	VOCs																																			
	Acetone	Bromodichloromethane	Bromoform	Bromomethane	Carbon Tetrachloride	Chlorobenzene	Chloroform	Dibromochloromethane	Dichlorobenzene, 1,2-	Dichlorobenzene, 1,3-	Dichlorobenzene, 1,4-	Dichlorodifluoromethane	Dichloroethane, 1,1-	Dichloroethane, 1,2-	Dichloroethylene, 1,1-	Dichloroethylene, 1,2-cis-	Dichloroethylene, 1,2-trans-	Dichloropropane, 1,2-	Dichloropropene, 1,3-	Dichloropropene, 1,3-cis-	Dichloropropene, 1,3-trans-	Ethylene dibromide	Hexane (n)	Methylene chloride	Methyl Ethyl Ketone (MEK)	Methyl Isobutyl Ketone (MIK)	Methyl tert-Butyl Ether (MTBE)	Styrene	Tetrachloroethane, 1,1,1,2-	Tetrachloroethane, 1,1,2,2-	Tetrachloroethylene	Trichloroethane, 1,1,1-	Trichloroethane, 1,1,2-	Trichloroethylene	Trichlorofluoromethane	Vinyl chloride
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
Reported Detection Limit	10	0.5	1	0.5	0.2	0.2	0.2	0.5	0.5	0.5	0.5	1	0.2	0.5	0.2	0.5	0.5	0.2	0.5	0.3	0.4	0.2	1	2	10	5	0.5	0.5	0.5	0.5	0.2	0.2	0.5	0.2	0.5	0.2
ON GW Table 3 Non-Potable Coarse	**130,000**	**85,000**	**380**	**5.6**	**0.79**	**630**	**2.4**	**#####**	**4600**	**9600**	**8**	**4400**	**320**	**1.6**	**1.6**	**1.6**	**1.6**	**16**	**5.2**	**ng**	**ng**	**0.25**	**51**	**610**	**470,000**	**######**	**190**	**1300**	**3.3**	**3.2**	**1.6**	**640**	**4.7**	**1.6**	**2500**	**0.5**
MW24-06	<10	<0.5	<1	<0.5	<0.2	<0.2	<0.2	<0.5	<0.5	<0.5	<0.5	<1	<0.2	<0.5	<0.2	<0.5	<0.5	<0.2	<0.5	<0.3	<0.4	<0.2	<1	<2	<10	<5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.2	<0.5	<0.2	<0.5	<0.2
MW24-08	<10	<0.5	<1	<0.5	<0.2	<0.2	<0.2	<0.5	<0.5	<0.5	<0.5	<1	<0.2	<0.5	<0.2	<0.5	<0.5	<0.2	<0.5	<0.3	<0.4	<0.2	<1	<2	<10	<5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.2	<0.5	<0.2	<0.5	<0.2
DUP-1	<10	<0.5	<1	<0.5	<0.2	<0.2	<0.2	<0.5	<0.5	<0.5	<0.5	<1	<0.2	<0.5	<0.2	<0.5	<0.5	<0.2	<0.5	<0.3	<0.4	<0.2	<1	<2	<10	<5	<0.5	<0.5	<0.5	<0.5	<0.2	<0.2	<0.5	<0.2	<0.5	<0.2

Sample ID	Sample Location	Sample Date
MW24-06	MW24-06	2024-Oct-18
MW24-08	MW24-08	2024-Oct-18
DUP-1		

Standard/Guideline Descriptions

• ON GW Table 3 Non-Potable Coarse:Ontario Groundwater Table 3: Full Depth Generic Site Condition Standards in a

Notes:

• formatting of cells indicates exceedances of like-formatted standards
• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
• samples collected at the same location and date are blind field duplicate/parent pairs
< - less than reported detection limit
µg/L - micrograms per litre
ng - no guideline listed

TABLE 11: GROUNDWATER - POLYCYCLIC AROMATIC HYDROCARBONS

				PAHs																
				Acenaphthylene	Acenaphthene	Anthracene	Benz[a]anthracene	Benzo[b+k]fluoranthene	Benzo[g h i]perylene	Benzo[k]fluoranthene	Benzo[a]pyrene	Chrysene	Dibenz[a h]anthracene	Fluoranthene	Fluorene	Indeno[1 2 3-cd]pyrene	Methylnaphthalene, 1-	Methylnaphthalene, 2-	Methylnaphthalene, 2-(1-)	Naphthalene	Phenanthrene	Pyrene
				µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L
Reported Detection Limit				0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.009	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.05	0.071	0.050	0.03	0.05
ON GW Table 3 Non-Potable Coarse				**1.8**	**600**	**2.4**	**4.7**	**ng**	**0.2**	**0.4**	**0.81**	**1**	**0.52**	**130**	**400**	**0.2**	**1800**	**1800**	**1800**	**1400**	**580**	**68**
Sample ID	**Sample Location**	**Sample Date**																				
MW24-06	MW24-06	2024-Oct-18	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.009	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.071	0.085	<0.03	<0.05
MW24-08	MW24-08	2024-Oct-18	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.009	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.071	0.098	<0.03	<0.05
DUP-1			<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.009	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.05	<0.071	0.085	<0.03	<0.05

Standard/Guideline Descriptions

• ON GW Table 3 Non-Potable Coarse:Ontario Groundwater Table 3: Full Depth Generic Site Condition Standards in a

Notes:

• formatting of cells indicates exceedances of like-formatted standards

• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded

• samples collected at the same location and date are blind field duplicate/parent pairs

< - less than reported detection limit

µg/L - micrograms per litre

ng - no guideline listed

TABLE 12: GROUNDWATER - METALS & INORGANICS	Metals																					Inorganics
	Antimony (Filtered)	Arsenic (Filtered)	Barium (Filtered)	Beryllium (Filtered)	Boron (Total) (Filtered)	Cadmium (Filtered)	Chromium VI	Chromium Total (Filtered)	Cobalt (Filtered)	Copper (Filtered)	Lead (Filtered)	Mercury	Molybdenum (Filtered)	Nickel (Filtered)	Selenium (Filtered)	Silver (Filtered)	Sodium (Filtered)	Thallium (Filtered)	Uranium (Filtered)	Vanadium (Filtered)	Zinc (Filtered)	Chloride (Filtered)
	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	µg/L	mg/L	µg/L	µg/L	µg/L	µg/L	mg/L
Reported Detection Limit	0.5	1	2	0.4	10	0.09	0.50	5	0.5	0.9	0.5	0.1	0.50	1	2	0.09	0.1	0.05	0.10	0.50	5	1
ON GW Table 3 Non-Potable Coarse	**20,000**	**1900**	**29,000**	**67**	**45,000**	**2.7**	**140**	**810**	**66**	**87**	**25**	**0.29**	**9200**	**490**	**63**	**1.5**	**2300**	**510**	**420**	**250**	**1100**	**2300**
MW24-06	<0.5	<1	200	<0.4	18	<0.09	0.70	<5	<0.5	<0.9	<0.5	<0.1	0.71	<1	<2	<0.09	600	<0.05	0.67	0.64	<5	850
MW24-08	<0.5	<1	54	<0.4	15	<0.09	0.91	<5	<0.5	1.1	<0.5	<0.1	0.89	<1	<2	<0.09	450	<0.05	0.62	0.86	<5	470
DUP-1	<0.5	<1	54	<0.4	15	<0.09	0.89	<5	<0.5	<0.9	<0.5	<0.1	0.86	<1	<2	<0.09	470	<0.05	0.63	0.9	<5	480

Sample ID	Sample Location	Sample Date
MW24-06	MW24-06	2024-Oct-18
MW24-08	MW24-08	2024-Oct-18
DUP-1		

Standard/Guideline Descriptions

• ON GW Table 3 Non-Potable Coarse:Ontario Groundwater Table 3: Full Depth Generic Site Condition Standards in a

Notes:

• formatting of cells indicates exceedances of like-formatted standards
• where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
• samples collected at the same location and date are blind field duplicate/parent pairs

< - less than reported detection limit
µg/L - micrograms per litre
mg/L - milligrams per litre

TABLE 13: GROUNDWATER - GLYCOLS	Glycols			
	Ethylene glycol	Diethylene glycol	Propylene glycol	Total Glycols
	µg/L	µg/L	µg/L	µg/L
Reported Detection Limit	5000	5000	5000	5000
ON GW Table 3 Non-Potable Coarse	**ng**	**ng**	**ng**	**ng**

Sample ID	Sample Location	Sample Date				
MW24-06	MW24-06	2024-Oct-18	<5000	<5000	<5000	<5000
MW24-08	MW24-08	2024-Oct-18	<5000	<5000	<5000	<5000
DUP-1			<5000	<5000	<5000	<5000

Notes:

- formatting of cells indicates exceedances of like-formatted standards
- where many exceedance formats are used, highlighted results reflect the least stringent standard/guideline exceeded
- samples collected at the same location and date are blind field duplicate/parent pairs

< - less than reported detection limit

ng- no guideline

µg/L - micrograms per litre

Figures

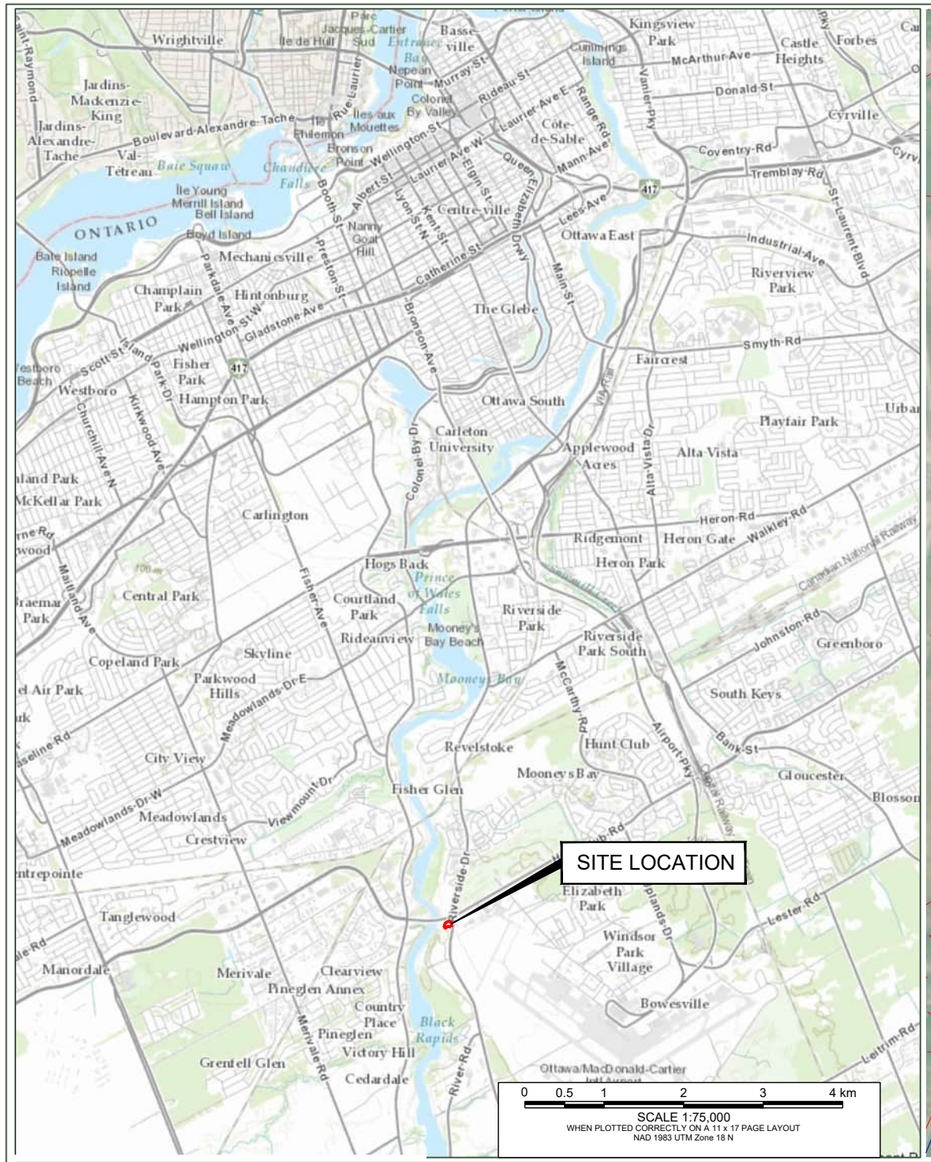
Phase II Environmental Site Investigation

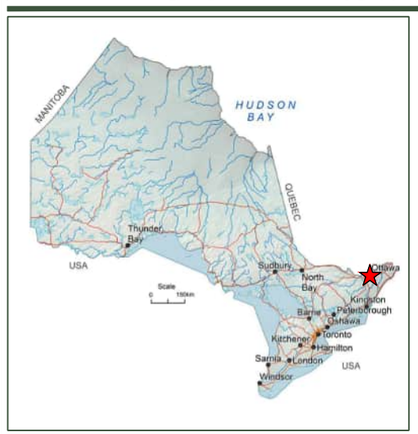
Active Petro-Canada Retail Fuel Outlet No. 35197
4000 Riverside Drive, Ottawa, Ontario

Suncor Energy Products Partnership

SLR Project No.: 216.030059.00002

November 25, 2024





NOTES:

NOT A LEGAL SURVEY. DO NOT USE FOR CONSTRUCTION.

REFERENCED FROM: JD BARNES PLAN OF SURVEY WITH TOPOGRAPHC DETAILS OF PART OF LOT 6, CONCESSION 2 (RIDEAU FRONT) REFERENCE No. 24-10-007-04, DATES: FEBRUARY 14, 2024 AND OCTOBER 16, 2024, SERVICE ONTARIO PROPERTY INDEX MAP, OTTAWA-CARLETON (No. 4) AND SITE RECONNAISSANCE INFORMATION.

IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

BASEDATA:
ESRI, HERE, GARMIN, INTERMAP, INCREMENT P CORP., GEBCO, USGS, FAO, NPS, NRCAN, GEOBASE, IGN, KADASTER NL, ORDNANCE SURVEY, ESRI JAPAN, METI, ESRI CHINA (HONG KONG), © OPENSTREETMAP CONTRIBUTORS, AND THE GIS USER COMMUNITY

LEGEND:

PROPERTY BOUNDARY (PROPERTY IDENTIFICATION NUMBER: 04589-1660)

SITE BOUNDARY (LEASE INSTRUMENT BOUNDARY - OC339605)

WATER FEATURE

NOT A LEGAL SURVEY. DO NOT USE FOR CONSTRUCTION.

REFERENCED FROM: JD BARNES PLAN OF SURVEY WITH TOPOGRAPHC DETAILS OF PART OF LOT 6, CONCESSION 2 (RIDEAU FRONT) REFERENCE No. 24-10-007-04, DATES: FEBRUARY 14, 2024 AND OCTOBER 16, 2024, SERVICE ONTARIO PROPERTY INDEX MAP, OTTAWA-CARLETON (No. 4) AND SITE RECONNAISSANCE INFORMATION.

IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 25 50 100 150 200 250 m

SCALE 1:4,000
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

SUNCOR ENERGY PRODUCTS PARTNERSHIP
35197
4000 RIVERSIDE DRIVE
OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

SITE LOCATION AND SURROUNDING LAND USE

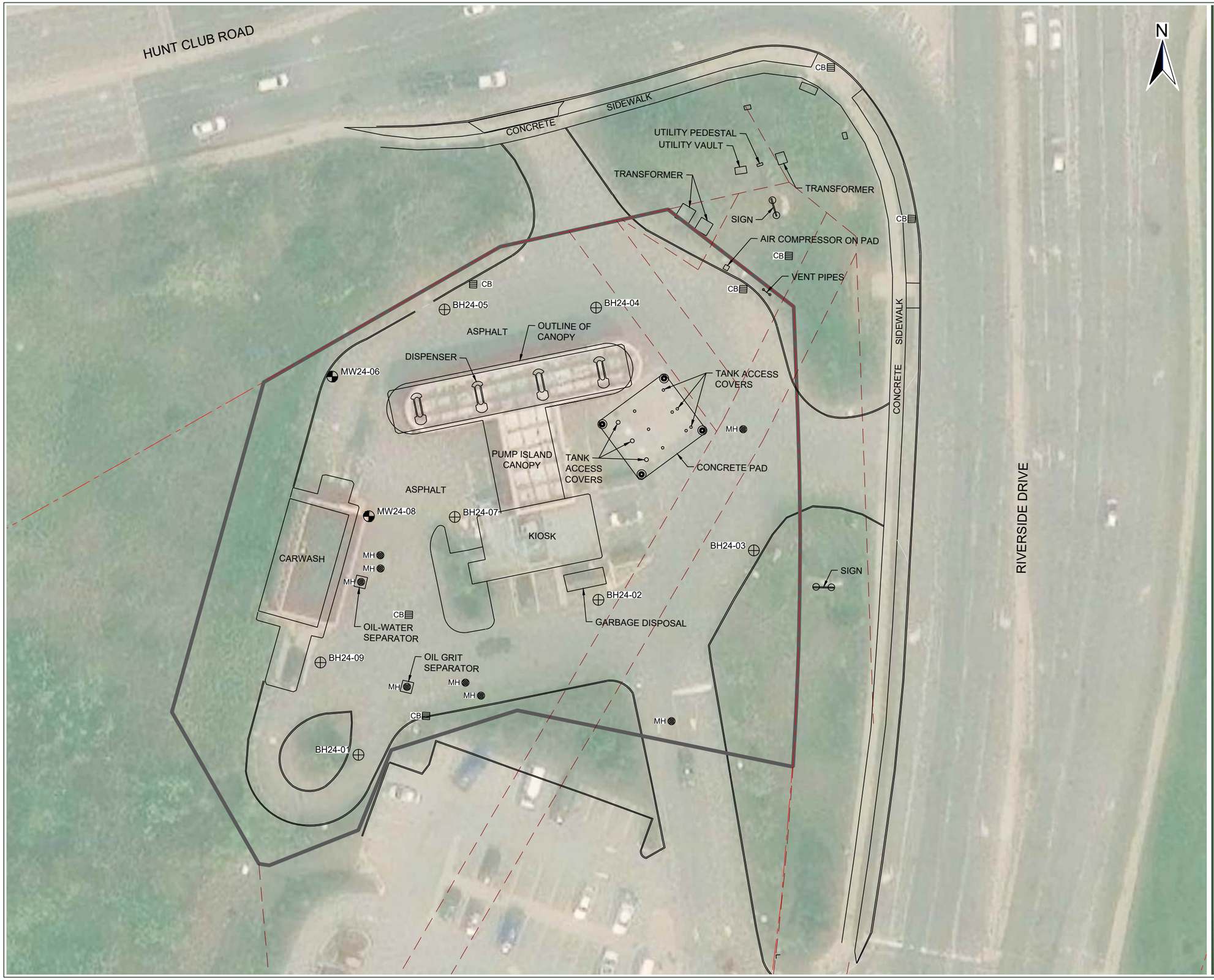
SLR

FIGURE NO: 1

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg



LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- EASEMENT
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS

- MH — MANHOLE
- CB — CATCH BASIN

NOTES:

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IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

SUNCOR ENERGY PRODUCTS PARTNERSHIP
35197
4000 RIVERSIDE DRIVE
OTTAWA, ONTARIO

SUPPLEMENTAL SUBSURFACE INVESTIGATION

SITE PLAN

SLR

FIGURE NO:
2

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg

LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS
- MH — MANHOLE
- CB — CATCH BASIN

GROUNDWATER MONITORING RESULTS
- 567.70 — GROUNDWATER ELEVATION (m)

NOTES:
NOT A LEGAL SURVEY. DO NOT USE FOR CONSTRUCTION.

REFERENCED FROM: JD BARNES PLAN OF SURVEY WITH TOPOGRAPHC DETAILS OF PART OF LOT 6, CONCESSION 2 (RIDEAU FRONT) REFERENCE No. 24-10-007-04, DATES: FEBRUARY 14, 2024 AND OCTOBER 16, 2024, SERVICE ONTARIO PROPERTY INDEX MAP, OTTAWA-CARLETON (No. 4) AND SITE RECONNAISSANCE INFORMATION.

IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

SUNCOR ENERGY PRODUCTS PARTNERSHIP
35197
4000 RIVERSIDE DRIVE
OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

GROUNDWATER ELEVATION PLAN - OCTOBER 18, 2024

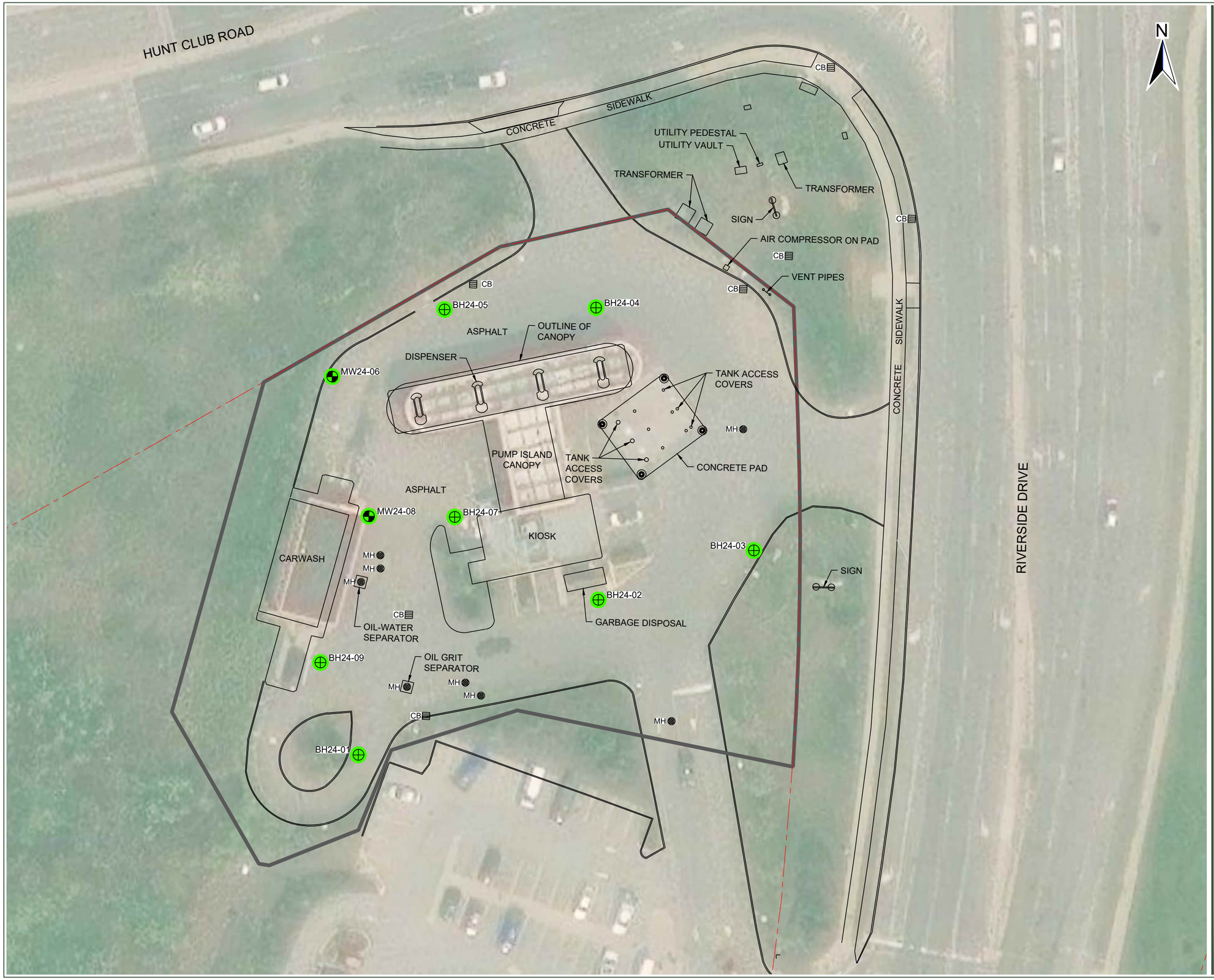
SLR

FIGURE NO:
3

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg



LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS
- MH — MANHOLE
- CB — CATCH BASIN

SOIL LABORATORY ANALYSIS RESULTS
- CONCENTRATIONS LESS THAN OR EQUAL TO APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN APPLICABLE REGULATORY STANDARDS

NOTES:
NOT A LEGAL SURVEY. DO NOT USE FOR CONSTRUCTION.

REFERENCED FROM: JD BARNES PLAN OF SURVEY WITH TOPOGRAPHC DETAILS OF PART OF LOT 6, CONCESSION 2 (RIDEAU FRONT) REFERENCE No. 24-10-007-04, DATES: FEBRUARY 14, 2024 AND OCTOBER 16, 2024, SERVICE ONTARIO PROPERTY INDEX MAP, OTTAWA-CARLETON (No. 4) AND SITE RECONNAISSANCE INFORMATION.

IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

SUNCOR ENERGY PRODUCTS PARTNERSHIP
35197
4000 RIVERSIDE DRIVE
OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

SOIL ANALYTICAL RESULTS - PETROLEUM HYDROCARBONS

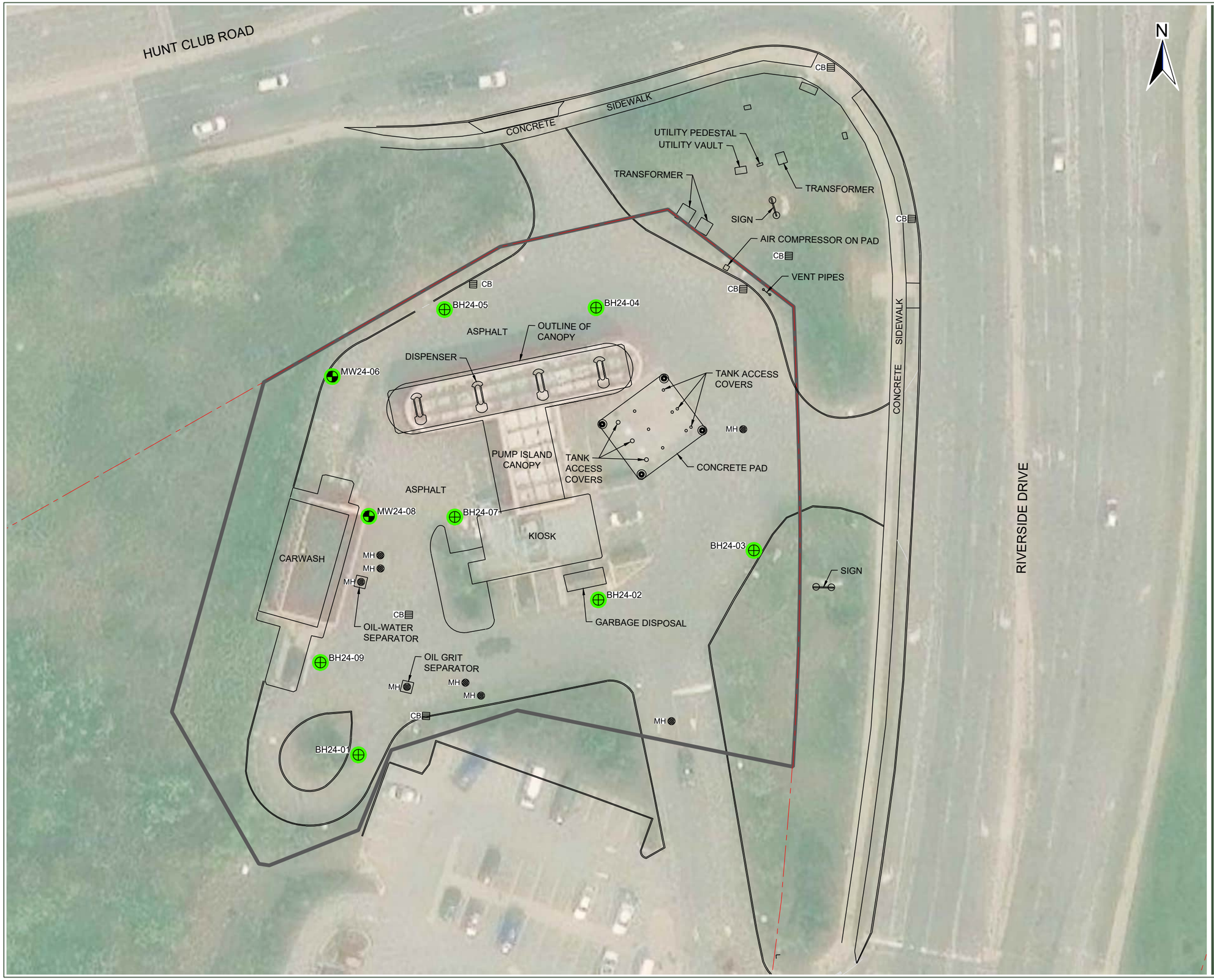
SLR

FIGURE NO:
4

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg



LEGEND:

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- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS
- MH — MANHOLE
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SOIL LABORATORY ANALYSIS RESULTS
- CONCENTRATIONS LESS THAN OR EQUAL TO APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN APPLICABLE REGULATORY STANDARDS

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NOT A LEGAL SURVEY. DO NOT USE FOR CONSTRUCTION.

REFERENCED FROM: JD BARNES PLAN OF SURVEY WITH TOPOGRAPHC DETAILS OF PART OF LOT 6, CONCESSION 2 (RIDEAU FRONT) REFERENCE No. 24-10-007-04, DATES: FEBRUARY 14, 2024 AND OCTOBER 16, 2024, SERVICE ONTARIO PROPERTY INDEX MAP, OTTAWA-CARLETON (No. 4) AND SITE RECONNAISSANCE INFORMATION.

IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

SUNCOR ENERGY PRODUCTS PARTNERSHIP
35197
4000 RIVERSIDE DRIVE
OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

SOIL ANALYTICAL RESULTS - VOLATILE ORGANIC COMPOUNDS

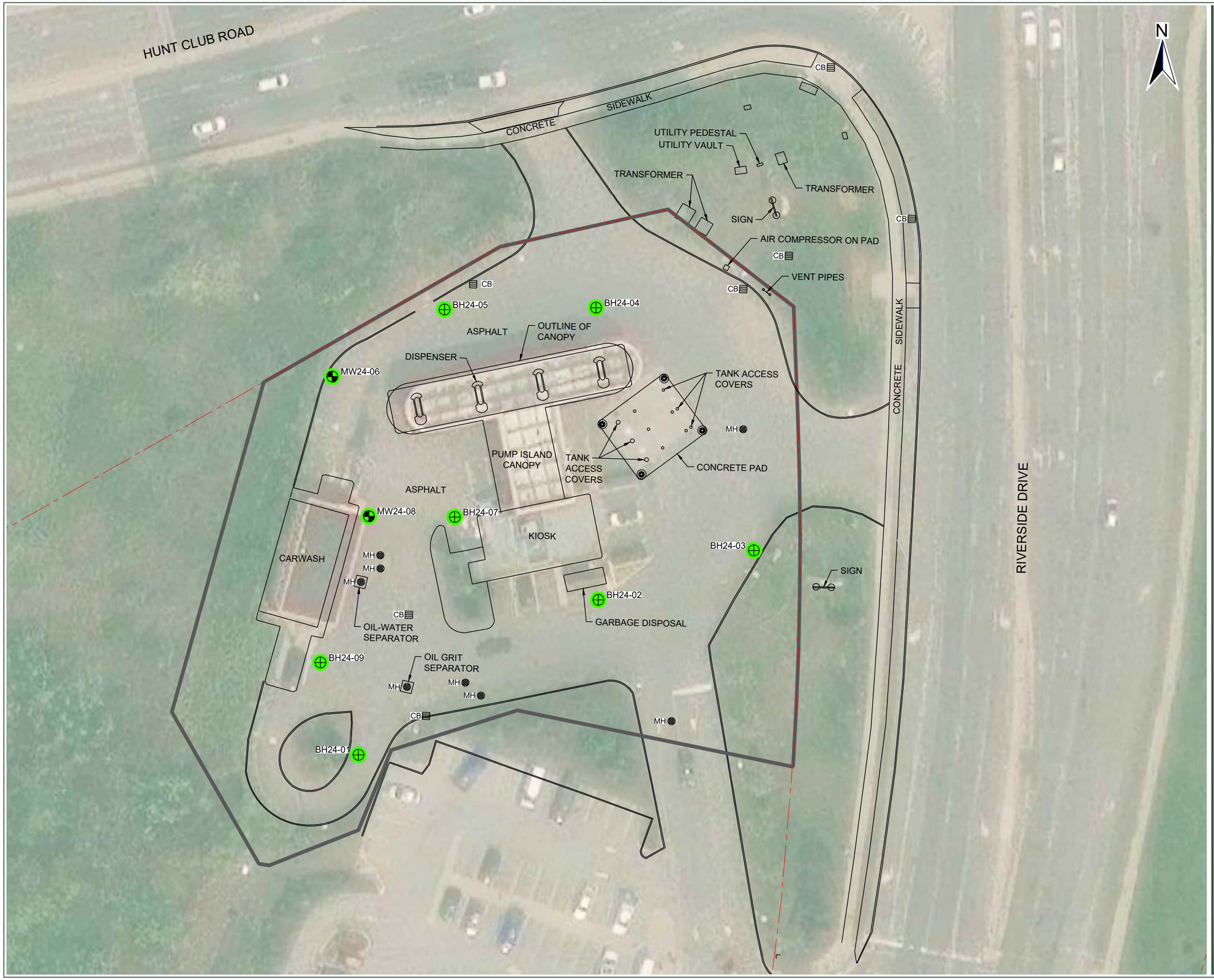
SLR

FIGURE NO:
5

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg



LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS
- MH — MANHOLE
- CB — CATCH BASIN

SOIL LABORATORY ANALYSIS RESULTS
- CONCENTRATIONS LESS THAN OR EQUAL TO APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN APPLICABLE REGULATORY STANDARDS

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0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

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OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

SOIL ANALYTICAL RESULTS - POLYCYCLIC AROMATIC HYDROCARBONS

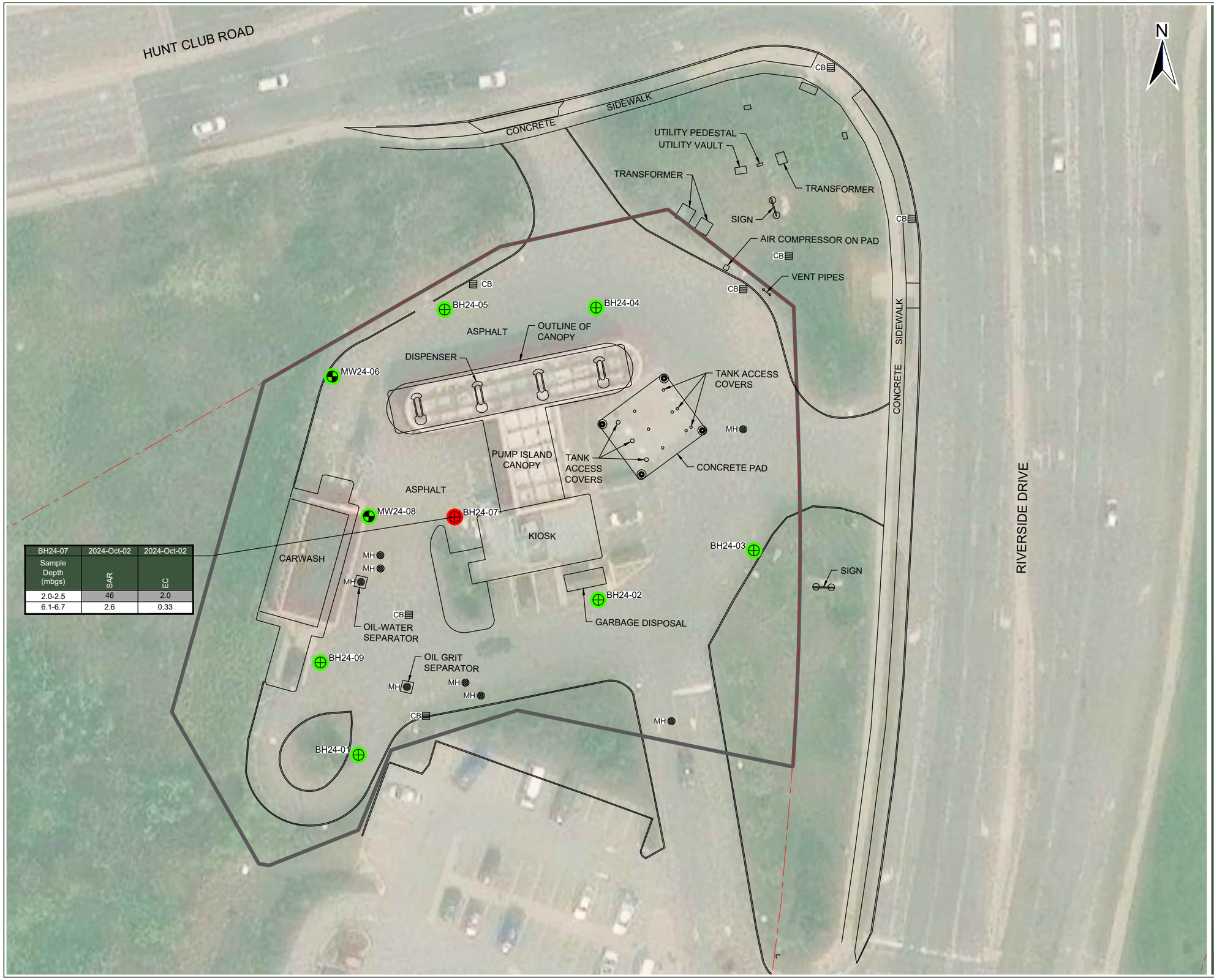
SLR

FIGURE NO:
6

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg



BH24-07	2024-Oct-02	2024-Oct-02
Sample Depth (mbgs)	SAR	EC
2.0-2.5	46	2.0
6.1-6.7	2.6	0.33

LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
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UTILITIES AND SYMBOLS
MH MANHOLE
CB CATCH BASIN

SOIL LABORATORY ANALYSIS RESULTS
- CONCENTRATIONS LESS THAN OR EQUAL TO APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN APPLICABLE REGULATORY STANDARDS

PARAMETER	MECP TABLE 3 FOR INDUSTRIAL,COMMERCIAL OR COMMUNITY PROPERTY USE1 (µg/g)
SAR	12
EC	1.4

SAR - Sodium Absorption Ratio
EC - Electrical Conductivity
mbgs - Metres below ground surface
MECP - Ministry of the Environment, Conservation, and Parks
µg/g - micrograms per gram
< - less than reported detection limit
1 - Ontario MECP Table 3 Standards: Full Depth Generic Site Condition Standards in a Non-Potable Water Condition for Industrial/Commerical/Community Property Use in Coarse Textured Soils (April 15, 2011)
Bold/Shaded - indicates parameter greater than Applicable Standard

NOTES:
NOT A LEGAL SURVEY. DO NOT USE FOR CONSTRUCTION.

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IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

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SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

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PHASE II ENVIRONMENTAL SITE INVESTIGATION

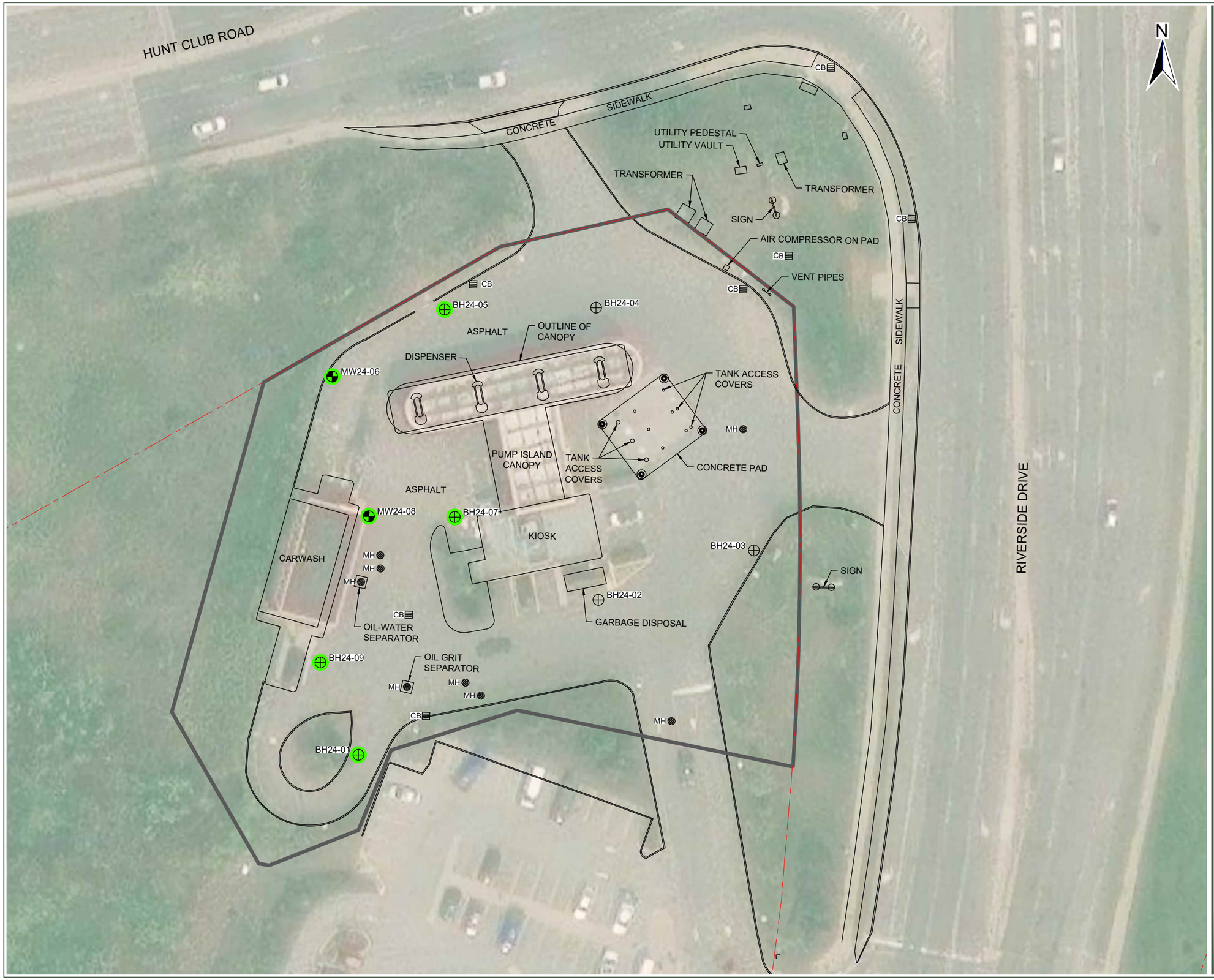
SOIL ANALYTICAL RESULTS - METALS AND INORGANICS

SLR

FIGURE NO: **7**

DATE: November 25, 2024 PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg



LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS
- MH — MANHOLE
- CB — CATCH BASIN

SOIL LABORATORY ANALYSIS RESULTS
- CONCENTRATIONS LESS THAN OR EQUAL TO APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN APPLICABLE REGULATORY STANDARDS

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0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

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OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

SOIL ANALYTICAL RESULTS - GLYCOLS

SLR

FIGURE NO:
8

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg

LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS
- MH — MANHOLE
- CB — CATCH BASIN

GROUNDWATER LABORATORY ANALYSIS RESULTS
- CONCENTRATIONS LESS THAN OR EQUAL TO THE APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN THE APPLICABLE REGULATORY STANDARDS

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IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
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NAD 1983 UTM Zone 18 N

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OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

GROUNDWATER ANALYTICAL RESULTS - PETROLEUM HYDROCARBONS

SLR

FIGURE NO:
9

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg

LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS

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- CB — CATCH BASIN

GROUNDWATER LABORATORY ANALYSIS RESULTS

- CONCENTRATIONS LESS THAN OR EQUAL TO THE APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN THE APPLICABLE REGULATORY STANDARDS

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IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

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OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

GROUNDWATER ANALYTICAL RESULTS - VOLATILE ORGANIC COMPOUNDS

SLR

FIGURE NO:
10

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg

LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS
- MH MANHOLE
- CB CATCH BASIN

GROUNDWATER LABORATORY ANALYSIS RESULTS
- CONCENTRATIONS LESS THAN OR EQUAL TO THE APPLICABLE REGULATORY STANDARDS
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IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

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PHASE II ENVIRONMENTAL SITE INVESTIGATION

GROUNDWATER ANALYTICAL RESULTS - POLYCYCLIC AROMATIC HYDROCARBONS

SLR

FIGURE NO:
11

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg

LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS

- MH — MANHOLE
- CB — CATCH BASIN

GROUNDWATER LABORATORY ANALYSIS RESULTS

- CONCENTRATIONS LESS THAN OR EQUAL TO THE APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN THE APPLICABLE REGULATORY STANDARDS

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IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

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OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

GROUNDWATER ANALYTICAL RESULTS - DISSOLVED METALS

SLR

FIGURE NO:
12

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg

LEGEND:

- APPROXIMATE PROPERTY BOUNDARY
- SITE BOUNDARY
- BOREHOLE
- MONITORING WELL
- TANK NEST MONITORING WELL

UTILITIES AND SYMBOLS

- MH — MANHOLE
- CB — CATCH BASIN

GROUNDWATER LABORATORY ANALYSIS RESULTS

- CONCENTRATIONS LESS THAN OR EQUAL TO THE APPLICABLE REGULATORY STANDARDS
- CONCENTRATION(S) GREATER THAN THE APPLICABLE REGULATORY STANDARDS

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IMAGERY: ESRI, MAXAR, EARTHSTAR GEOGRAPHICS, AND THE GIS USER COMMUNITY (IMAGE DATE: 2023)

0 5 10 20 30 m

SCALE 1:500
WHEN PLOTTED CORRECTLY ON A 11 x 17 PAGE LAYOUT
NAD 1983 UTM Zone 18 N

SUNCOR ENERGY PRODUCTS PARTNERSHIP
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4000 RIVERSIDE DRIVE
OTTAWA, ONTARIO

PHASE II ENVIRONMENTAL SITE INVESTIGATION

GROUNDWATER ANALYTICAL RESULTS - GLYCOLS

SLR

FIGURE NO:
13

DATE: November 25, 2024

PROJECT NO: 216.030059.00002

Cadfile name: S_216-030059-00002-A1.dwg

Appendix A Field Methods

Phase II Environmental Site Investigation

Active Petro-Canada Retail Fuel Outlet No. 35197
4000 Riverside Drive, Ottawa, Ontario

Suncor Energy Products Partnership

SLR Project No.: 216.030059.00002

November 25, 2024

Appendix A Field Methods

Field Methods:

Soil samples were collected from daylighted boreholes by SLR using a stainless-steel sidewall scraper from 0.5 metre intervals and during drilling from 0.6 metre split spoons. Boreholes were described in a continuous manner where possible with a descriptive geological and hydrogeological log that recorded soil stratigraphy and classification, fill material identification, indicators of moisture content, colour, appearance, and odour in general accordance with the Unified Soil Classification System. Each soil sample was split into two; the first half was placed in laboratory-supplied containers for possible laboratory analysis, while the other half was placed into a re-sealable plastic bag and warmed to room temperature for the collection of relative organic vapour concentrations (headspace vapour readings/headspace screening). Soils collected for laboratory analysis were placed in methanol preserved vials, 120- or 250-mL glass jars under cold storage prior to their submission to the laboratory. Soil bags were used for submission for grain size analysis. Relative organic vapour concentrations were measured from the sample headspace using a calibrated RKI Eagle II combustible gas and photoionization detector (PID) (calibrated to 1650 parts per million (ppm) hexane and 100 ppm isobutylene and operated in methane elimination mode). Soil samples intended for laboratory analysis were collected from the area of the water table or were chosen based on headspace vapour readings in conjunction with olfactory observations and professional judgement. The “worst case” soil samples were submitted under Chain of Custody (COC) protocol to Bureau Veritas (BV) Laboratories in Mississauga, Ontario, for analysis of one or more of the following parameters: Benzene, Toluene, Ethylbenzene and Xylenes (BTEX) and Petroleum Hydrocarbons (PHCs), Volatile Organic Compounds (VOCs), Polycyclic Aromatic Hydrocarbons (PAHs), Metals/Inorganics, and Glycols. Soil samples were also submitted for pH and Grain Size analyses in support of table standard selection.

Prior to sampling the newly installed monitoring wells, the headspace vapour levels (HSVLs) at each monitoring well were measured by placing the nozzle of the RKI Eagle II inside the monitoring well casing, immediately following removal of the well cap. SLR measured the groundwater levels in the monitoring wells using a Solinst™ interface probe. The low- flow sampling method was utilized and involved the extraction of groundwater at rates comparable to ambient groundwater flow to reduce the level of drawdown and the mixing of stagnant water with water from the screened intake area. A bladder pump with High Density Polyethylene (HDPE) tubing (affixed using silicon tubing) paired with a water quality meter (Horiba U-52) extracted the water and collected geochemical measurements. Geochemical parameters (temperature, pH, conductivity, dissolved oxygen [DO], and turbidity) of the purged water was monitored for stabilization before collecting a water sample representative of the formation water. The groundwater samples were collected in laboratory prepared sample containers with the appropriate preservatives added and field filtered (metals only). The groundwater samples were then placed in ice filled and insulated coolers and were submitted under COC protocol to BV Laboratories in Mississauga, Ontario, for analysis of one or more of the following: BTEX and PHCs, VOCs, PAHs, dissolved metals, and Glycols.

Appendix B Borehole Logs

Phase II Environmental Site Investigation

Active Petro-Canada Retail Fuel Outlet No. 35197
4000 Riverside Drive, Ottawa, Ontario

Suncor Energy Products Partnership

SLR Project No.: 216.030059.00002

November 25, 2024

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE LOG

BOREHOLE NO: **BH24-01**
SURFACE ELEVATION: 102.86 m
UTM COORDINATES 5020225.327 N 445596.393 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv) 1 10 100 1000 10000	BOREHOLE COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-01 0-0.5			**Asphalt**	0		Concrete	102
		BH24-01 0.5-1.0			**Fill - Gravel** some coarse sand, dark brown, moist	0			
1		BH24-01 1.0-1.5*			**Sand** coarse, trace to some gravel, dark brown, moist	0			
		BH24-01 1.5-2.0				0			101
2		BH24-01 2.0-2.4	22		trace gravel	0			
		BH24-01 2.4-3.0				0			
3		BH24-01 3.0-3.6	20		medium to coarse	5		bentonite seal	100
		BH24-01 3.8-4.4	21		coarse, some gravel seams	0			99
4		BH24-01 4.6-5.2	17		medium	5			98
5		BH24-01 5.3-5.9	20		fine, some faint oxidation	5			
		BH24-01 6.1-6.7*	22			10			97
6					End of borehole at 6.7 m				

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-09
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE, SPLIT SPOON

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE LOG

BOREHOLE NO: **BH24-02**
SURFACE ELEVATION: 102.65 m
UTM COORDINATES 5020246.527 N 445629.209 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv) 1 10 100 1000 10000	BOREHOLE COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-02-0-0.5			**Asphalt**	0		Concrete	102
					Fill - Gravel coarse sand, dark brown, moist	0			
1		BH24-02-0.5-1.0				0			
		BH24-02-1.0-1.5			**Sand** coarse, well graded, trace to some gravel, dark brown, moist	0			101
		BH24-02-1.5-2.0			trace gravel	0			
2		BH24-02-2.0-2.4*	11			0			
		BH24-02-2.4-3.0			medium	5		bentonite seal	100
3		BH24-02-3.0-3.6	13			5			
									99
4		BH24-02-3.8-4.4	38		medium to coarse, some gravel	10			
		BH24-02-4.6-5.2*	27			15			98
5					End of borehole at 5.2 m				

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-10
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE, SPLIT SPOON

BOREHOLE LOG

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE NO: **BH24-03**
SURFACE ELEVATION: 103.29 m
UTM COORDINATES: 5020253.281 N, 445650.504 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv) 1 10 100 1000 10000	BOREHOLE COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-03-0-0.5			**Asphalt**	10		Concrete	103
		BH24-03-0.5-1.0*			**Fill - Gravel** some coarse sand, dark brown, moist	10			
1		BH24-03-1.0-1.5			**Sand** coarse, trace to some gravel, dark brown, moist	0			102
		BH24-03-1.5-2.0				0			
2		BH24-03-2.0-2.4				0			101
		BH24-03-2.4-3.0	19		trace gravel	5			
3		BH24-03-3.0-3.6	18		medium to coarse	0		bentonite seal	100
4		BH24-03-3.8-4.4	9			10			99
		BH24-03-4.6-5.2	16			5			
5		BH24-03-5.3-5.9	19		medium to fine	5			98
6		BH24-03-6.1-6.7*	24			5			97
					End of borehole at 6.7 m				

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-08
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE; SPLIT SPOON

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE LOG

BOREHOLE NO: **BH24-04**
SURFACE ELEVATION: 102.30 m
UTM COORDINATES 5020286.479 N 445628.894 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv)	BOREHOLE COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-04-0-0.5			**Asphalt**	0		Concrete	102
		BH24-04-0.5-1.0*			**Fill - Gravel** dark brown, moist	20			
1		BH24-04-1.0-1.5			**Fill - Sand** inferred loose, coarse sand, oxidation, dark brown, moist well graded	15			101
		BH24-04-1.5-2.0				15			
2		BH24-04-2.0-2.4	5			20			100
		BH24-04-2.4-3.0	8		**Sand** coarse, trace gravel, brown, moist	5			
3		BH24-04-3.0-3.6*				35		bentonite seal	99
4		BH24-04-3.8-4.4	25		trace to some gravel	10			98
5		BH24-04-4.6-5.2	29		some gravel	5			97
		BH24-04-5.3-5.9	25		trace gravel	15			
6		BH24-04-6.1-6.7*	26		fine to medium	10			96
					End of borehole at 6.7 m				

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-10
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE, SPLIT SPOON

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE LOG

BOREHOLE NO: **BH24-05**
SURFACE ELEVATION: 102.28 m
UTM COORDINATES 5020286.242 N 445608.19 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv) 1 10 100 1000 10000	BOREHOLE COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-05-0-0.5			**Asphalt**	0		Concrete	102
		BH24-05-0.5-1.0			**Fill - Gravel** some sand, dark brown, moist	0			
1		BH24-05-1.0-1.5*			**Sand** coarse, trace gravel, brown, moist	0			101
		BH24-05-1.5-2.0				0			
2		BH24-05-2.0-2.4	23			0			100
		BH24-05-2.4-3.0				0			
3		BH24-05-3.0-3.6	25		fine to medium	0		bentonite seal	99
4		BH24-05-3.8-4.4	17		medium to coarse	0			98
5		BH24-05-4.6-5.2	17		moist to wet	0			97
		BH24-05-5.3-5.9	22		medium to fine	0			
6		BH24-05-6.1-6.7*	23		fine to medium, moist	0			96
					End of borehole at 6.7 m				

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-07
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE; SPLIT SPOON

BOREHOLE LOG

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE NO: **BH24-06**
SURFACE ELEVATION: 102.77 m
UTM COORDINATES 5020277.067 N 445592.815 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv)	MONITORING WELL COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-06-0-0.5			**Asphalt**	0		roadbox, jplug, cement	102
		BH24-06-0.5-1.0			**Fill - Gravel** some sand, dark brown, moist	0			
1		BH24-06-1.0-1.5			**Fill - Sand** coarse, well graded, dark brown, moist	0			101
		BH24-06-1.5-2.0*				0			
2		BH24-06-2.0-2.4	16		**Sand** coarse, brown, moist	0			100
		BH24-06-2.4-3.0				0			
3		BH24-06-3.0-3.6	18			0			99
4		BH24-06-3.8-4.4	16		medium	0			98
5		BH24-06-4.6-5.2	18			10			97
		BH24-05-5.3-5.9	24		medium to coarse	10			
6		BH24-06-6.1-6.7	21			0			96
7		BH24-06-6.9-7.5	21		medium	5		bentonite seal	95
8		BH24-06-7.6-8.2	29		trace gravel	10			94
		BH24-06-8.4-9.0*	24		fine, orange oxidation	10			
9		BH24-06-9.2-9.8*	31			5			93
10		BH24-06-9.9-10.5	30		fine to medium	5			92
11		BH24-06-10.7-11.3	34		striations, trace oxidation, moist to wet	0			91
		BH24-06-11.4-12.0*	36			15			
12		BH24-06-12.2-12.8	34		moist	10			90
13		BH24-06-13.0-13.6	34		fine, moist to wet	15			89
		BH24-06-13.7-14.3	37			5			
14		BH24-06-14.5-15.1	41		wet	10			88
15		BH24-06-15.2-15.8	33		some orange oxidation, moist to wet	10			87
16		BH24-06-16.0-16.6*	36		saturated	20		silica sand 50 mm 010 slot PVC Pipe	86
17		BH24-06-16.8-17.4*	30			30		SWL 16.56 mbg (October 18, 2024)	

End of borehole at 17.4 m

Well Completion Details:
Screened interval from 14.9 m to 17.4 m below surface
Elevation at top of casing (TOC) = 102.686 m

Groundwater Information:
Depth to groundwater from TOC = 16.47 m (October 18, 2024)

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-08
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE, SPLIT SPOON

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE LOG

BOREHOLE NO: **BH24-07**
SURFACE ELEVATION: 102.58 m
UTM COORDINATES 5020257.852 N 445609.568 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv)	BOREHOLE COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-07-0-0.5			**Asphalt**	0		Concrete	102
0.5		BH24-07-0.5-1.0			**Fill - Gravel** some sand, greyish black, moist	0			
1		BH24-07-1.0-1.5			**Fill - Sand** coarse, trace gravel, well graded, brown, moist	0			101
1.5		BH24-07-1.5-2.0				0			
2		BH24-07-2.0-2.4*	2		some gravel	0			100
2.5		BH24-07-2.4-3.0	14		**Sand** medium, trace gravel, brown, moist trace orange oxidation	5			
3		BH24-07-3.0-3.6				15		bentonite seal	99
3.8		BH24-07-3.8-4.4	11		fine to medium	10			98
4.6		BH24-07-4.6-5.2	16		medium	15			97
5.3		BH24-07-5.3-5.9	21		fine	10			
6.1		BH24-07-6.1-6.7*	19		fine to medium	20			96
6.7					End of borehole at 6.7 m				

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-10
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE, SPLIT SPOON

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE LOG

BOREHOLE NO: **BH24-08**
SURFACE ELEVATION: 103.06 m
UTM COORDINATES 5020257.963 N 445597.817 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv)	MONITORING WELL COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-08-0-0.5			**Asphalt**	0		roadbox, jplug, cement	103
		BH24-08-0.5-1.0			**Fill - Gravel** trace to some sand, brown, moist	10			
1		BH24-08-1.0-1.5*			**Sand** medium, trace to some gravel, brown, moist	10			102
		BH24-08-1.5-2.0			medium to coarse, trace gravel	10			
2		BH24-08-2.0-2.4			coarse, light brown	10			101
		BH24-08-2.4-3.0	8		medium to coarse, brown	0			
3		BH24-08-3.0-3.6	12		medium	5			100
					gravel seam				
4		BH24-08-3.8-4.4	18		fine	5			99
		BH24-08-4.6-5.2	17			0			
5									98
		BH24-08-5.3-5.9	17		fine to medium	5			
6		BH24-08-6.1-6.7*	17			5			97
7		BH24-08-6.9-7.5	19		fine	0			96
		BH24-08-7.6-8.2	19			0		bentonite seal	
8		BH24-08-8.4-9.0	20			5			95
9		BH24-08-9.2-9.8	20		fine to medium	15			94
10		BH24-08-9.9-10.5	24		medium sand	0			93
11		BH24-08-10.7-11.3	29		fine sand, trace oxidation	0			92
		BH24-08-11.4-12.0*	33		trace striations	5			
12		BH24-08-12.2-12.8	32			0			91
13		BH24-08-13.0-13.6	27		orange oxidation	0			90
14		BH24-08-13.7-14.3	35		striations	0			89
15		BH24-08-14.5-15.1	36		very moist	0			88
		BH24-08-15.2-15.8	38		some oxidation, moist to wet	0			
16		BH24-08-16.0-16.6	32		wet to saturated	20		silica sand 50V m 1618/slot bg (October 18, 2024)	87
17		BH24-08-16.8-17.4*	33		saturated	15			86

End of borehole at 17.4 m

Well Completion Details:
Screened interval from 14.9 m to 17.4 m below surface
Elevation at top of casing (TOC) = 102.966 m

Groundwater Information:
Depth to groundwater from TOC = 16.28 m (October 18, 2024)

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-09
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE, SPLIT SPOON

BOREHOLE LOG

SLR CONSULTING (CANADA) LTD.

CLIENT: **Suncor Energy Products Partnership**
PROJECT: **Phase II Environmental Site Investigation**
ADDRESS: **4000 Riverside Drive Ottawa, ON**
SLR JOB NO: **216.030059.00002**

BOREHOLE NO: **BH24-09**
SURFACE ELEVATION: 103.12 m
UTM COORDINATES: 5020237.954 N, 445591.199 E

DEPTH (m)	SAMPLE TYPE	SAMPLE ID	SPT COUNT	SOIL TYPE	SOIL DESCRIPTION	FIELD TEST DATA: ORGANIC VAPOUR LEVEL (ppmv)	BOREHOLE COMPLETION	WELL COMPLETION NOTES	ELEVATION (m)
0		BH24-09-0-0.5			**Asphalt**	5		Concrete	103
		BH24-09-0.5-1.0			**Fill - Gravel** brown, moist	5			
1		BH24-09-1.0-1.5			**Sand** coarse, well graded, dark brown, moist trace gravel	5			102
		BH24-09-1.5-2.0			light brown	20			
2		BH24-09-2.0-2.4*	8		fine to medium, brown	20			101
		BH24-09-2.4-3.0				10			
3		BH24-09-3.0-3.6	14		some oxidation and striations	0			100
		BH24-09-3.8-4.4	21		coarse	5		bentonite seal	99
4						0			
5		BH24-09-4.6-5.2	23			0			98
		BH24-09-5.3-5.9	21			0			
6		BH24-09-6.1-6.7	22		fine to medium	0			97
		BH24-09-6.9-7.5*	Not taken		medium to coarse	15			96
7		BH24-09-7.6-8.2	23			0			95
8					End of borehole at 8.2 m				

* denotes soil sample taken for laboratory analysis

DRILLING METHOD: Hollow Stem Auger Drilling
BOREHOLE DIAMETER: 0.152 m (OD)
DRILL DATE: 2024-Oct-10
LOGGED BY: MS
DRILLED BY: Geo-Environmental Drilling Inc.

Notes: GRAB SAMPLE; SPLIT SPOON

Appendix C Laboratory Certificates of Analysis

Phase II Environmental Site Investigation

Active Petro-Canada Retail Fuel Outlet No. 35197
4000 Riverside Drive, Ottawa, Ontario

Suncor Energy Products Partnership

SLR Project No.: 216.030059.00002

November 25, 2024

Your P.O. #: OTT2947
Your Project #: OTT2947
Site#: 35197
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your C.O.C. #: C#1013277-01-01

Attention: Matt Williamson

SLR Consulting (Canada) Ltd.
201-100 Stone Rd. W.
Guelph, ON
Canada N1G 5L3

Report Date: 2024/10/15
Report #: R8362654
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4V3527
Received: 2024/10/04, 09:00

Sample Matrix: Soil
Samples Received: 10

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Methylnaphthalene Sum (1)	9	N/A	2024/10/10	CAM SOP-00301	EPA 8270D m
Hot Water Extractable Boron (1)	7	2024/10/10	2024/10/10	CAM SOP-00408	R153 Ana. Prot. 2011
Hot Water Extractable Boron (1)	1	2024/10/10	2024/10/11	CAM SOP-00408	R153 Ana. Prot. 2011
Hot Water Extractable Boron (1)	1	2024/10/09	2024/10/10	CAM SOP-00408	R153 Ana. Prot. 2011
1,3-Dichloropropene Sum (1)	9	N/A	2024/10/10		EPA 8260C m
Conductivity (1)	9	2024/10/10	2024/10/10	CAM SOP-00414	OMOE E3530 v1 m
Hexavalent Chromium in Soil by IC (1, 2)	8	2024/10/10	2024/10/10	CAM SOP-00436	EPA 3060A/7199 m
Hexavalent Chromium in Soil by IC (1, 2)	1	2024/10/09	2024/10/09	CAM SOP-00436	EPA 3060A/7199 m
Petroleum Hydrocarbons F2-F4 in Soil (1, 3)	1	2024/10/10	2024/10/11	CAM SOP-00316	CCME CWS m
Petroleum Hydrocarbons F2-F4 in Soil (1, 3)	4	2024/10/10	2024/10/12	CAM SOP-00316	CCME CWS m
Petroleum Hydrocarbons F2-F4 in Soil (1, 3)	4	2024/10/09	2024/10/11	CAM SOP-00316	CCME CWS m
Glycols in Soil by GC-FID (1)	6	N/A	2024/10/09	CAM SOP-00322	EPA 8015 m
Acid Extractable Metals by ICPMS (1)	9	2024/10/10	2024/10/11	CAM SOP-00447	EPA 6020B m
Moisture (1)	2	N/A	2024/10/08	CAM SOP-00445	Carter 2nd ed 70.2 m
Moisture (1)	7	N/A	2024/10/09	CAM SOP-00445	Carter 2nd ed 70.2 m
PAH Compounds in Soil by GC/MS (SIM) (1)	9	2024/10/09	2024/10/10	CAM SOP-00318	EPA 8270E
pH CaCl2 EXTRACT (1)	9	2024/10/09	2024/10/09	CAM SOP-00413	EPA 9045 D m
Sieve, 75um (1)	2	N/A	2024/10/10	CAM SOP-00467	ASTM D1140 -17 m
Sodium Adsorption Ratio (SAR) (1)	9	N/A	2024/10/11	CAM SOP-00102	EPA 6010C
Volatile Organic Compounds and F1 PHCs (1)	9	N/A	2024/10/09	CAM SOP-00230	EPA 8260C m

Remarks:

Bureau Veritas is accredited to ISO/IEC 17025 for specific parameters on scopes of accreditation. Unless otherwise noted, procedures used by Bureau Veritas are based upon recognized Provincial, Federal or US method compendia such as CCME, EPA, APHA or the Quebec Ministry of Environment.

All work recorded herein has been done in accordance with procedures and practices ordinarily exercised by professionals in Bureau Veritas' profession using accepted testing methodologies, quality assurance and quality control procedures (except where otherwise agreed by the client and Bureau Veritas in writing). All data is in statistical control and has met quality control and method performance criteria unless otherwise noted. All method blanks are reported; unless indicated otherwise, associated sample data are not blank corrected. Where applicable, unless otherwise noted, Measurement Uncertainty has not been accounted for when stating conformity to the referenced standard.

Bureau Veritas liability is limited to the actual cost of the requested analyses, unless otherwise agreed in writing. There is no other warranty expressed or implied. Bureau Veritas has been retained to provide analysis of samples provided by the Client using the testing methodology referenced in this report.

Your P.O. #: OTT2947
Your Project #: OTT2947
Site#: 35197
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your C.O.C. #: C#1013277-01-01

Attention: Matt Williamson

SLR Consulting (Canada) Ltd.
201-100 Stone Rd. W.
Guelph, ON
Canada N1G 5L3

Report Date: 2024/10/15
Report #: R8362654
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4V3527
Received: 2024/10/04, 09:00

Interpretation and use of test results are the sole responsibility of the Client and are not within the scope of services provided by Bureau Veritas, unless otherwise agreed in writing. Bureau Veritas is not responsible for the accuracy or any data impacts, that result from the information provided by the customer or their agent.

Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.
Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.
Reference Method suffix "m" indicates test methods incorporate validated modifications from specific reference methods to improve performance.
* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.
(1) This test was performed by Bureau Veritas Mississauga, 6740 Campobello Rd , Mississauga, ON, L5N 2L8
(2) Soils are reported on a dry weight basis unless otherwise specified.
(3) All CCME PHC results met required criteria unless otherwise stated in the report. The CWS PHC methods employed by Bureau Veritas conform to all prescribed elements of the reference method and performance based elements have been validated. All modifications have been validated and proven equivalent following "Alberta Environment's Interpretation of the Reference Method for the Canada-Wide Standard for Petroleum Hydrocarbons in Soil Validation of Performance-Based Alternative Methods September 2003". Documentation is available upon request. Modifications from Reference Method for the Canada-wide Standard for Petroleum Hydrocarbons in Soil-Tier 1 Method: F2/F3/F4 data reported using validated cold solvent extraction instead of Soxhlet extraction.

Encryption Key

AUTHORIZED REPORT
RAPPORT AUTORISÉ

Bureau Veritas
15 Oct 2024 18:04:14

Please direct all questions regarding this Certificate of Analysis to:
Keshani Vijh, Sr. Project Manager
Email: keshani.vijh@bureauveritas.com
Phone# (613) 274-0573

==========

This report has been generated and distributed using a secure automated process.
Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Bureau Veritas Job #: C4V3527
Report Date: 2024/10/15

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

RESULTS OF ANALYSES OF SOIL

Bureau Veritas ID		AEZS76				AEZS77			
Sampling Date		2024/10/01 14:20				2024/10/01 15:30			
COC Number		C#1013277-01-01				C#1013277-01-01			
	UNITS	BH24-08_1-1.5M	RDL	MDL	QC Batch	BH24-09_2-2.45M	RDL	MDL	QC Batch
Calculated Parameters									
Sodium Adsorption Ratio	N/A	3.6			9684644	1.2			9686602
Inorganics									
Conductivity	mS/cm	0.70	0.002	0.0005	9693324	0.41	0.002	0.0005	9693324
Moisture	%	6.7	1.0	0.50	9689083	5.4	1.0	0.50	9688595
Available (CaCl2) pH	pH	7.81			9691184	7.62			9691230
Miscellaneous Parameters									
Grain Size	%	COARSE	N/A	N/A	9692803				
Sieve - #200 (<0.075mm)	%	4	1	N/A	9692803				
Sieve - #200 (>0.075mm)	%	96	1	N/A	9692803				

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

Bureau Veritas ID		AEZS78		AEZS79	AEZS80	AEZS81			
Sampling Date		2024/10/02 10:00		2024/10/02 10:50	2024/10/02 13:20	2024/10/02 14:40			
COC Number		C#1013277-01-01		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-01_1-1.5M	QC Batch	BH24-07_2-2.45M	BH24-06_1.5-2M	BH24-05_1-1.5M	RDL	MDL	QC Batch
Calculated Parameters									
Sodium Adsorption Ratio	N/A	1.2	9686602	46	1.3	1.3			9686986
Inorganics									
Conductivity	mS/cm	0.16	9693324	2.0	0.25	0.14	0.002	0.0005	9693324
Moisture	%	6.2	9690573	6.3	5.4	3.4	1.0	0.50	9690573
Available (CaCl2) pH	pH	7.42	9691230	7.78	7.63	6.99			9691230

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas Job #: C4V3527
Report Date: 2024/10/15

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

RESULTS OF ANALYSES OF SOIL

Bureau Veritas ID		AEZS82	AEZS83	AEZS84			
Sampling Date		2024/10/03 09:40	2024/10/03 11:30	2024/10/03 12:40			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-02_2-2.4M	BH24-04_0.5-1M	BH24-03_0.5-1M	RDL	MDL	QC Batch
Calculated Parameters							
Sodium Adsorption Ratio	N/A	2.4	1.6	0.61			9686986
Inorganics							
Conductivity	mS/cm	0.14	0.63	0.15	0.002	0.0005	9693324
Moisture	%	3.1	4.7	5.0	1.0	0.50	9690573
Available (CaCl2) pH	pH	7.90	7.05	6.94			9691230

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AEZS85			
Sampling Date		2024/10/03 10:10			
COC Number		C#1013277-01-01			
	UNITS	BH24-02_0.5-1M	RDL	MDL	QC Batch
Miscellaneous Parameters					
Grain Size	%	COARSE	N/A	N/A	9692803
Sieve - #200 (<0.075mm)	%	4	1	N/A	9692803
Sieve - #200 (>0.075mm)	%	96	1	N/A	9692803

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

GLYCOLS BY GC-FID (SOIL)

Bureau Veritas ID		AEZS76	AEZS77	AEZS78	AEZS79			
Sampling Date		2024/10/01 14:20	2024/10/01 15:30	2024/10/02 10:00	2024/10/02 10:50			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_1-1.5M	BH24-09_2-2.45M	BH24-01_1-1.5M	BH24-07_2-2.45M	RDL	MDL	QC Batch
Glycols								
Propylene Glycol	mg/kg	<10	<10	<10	<10	10	2	9690882
Ethylene Glycol	mg/kg	<10	<10	<10	<10	10	2	9690882
Diethylene Glycol	mg/kg	<10	<10	<10	<10	10	2	9690882
Total Glycol	mg/kg	<10	<10	<10	<10	10	2	9690882

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AEZS80	AEZS81			
Sampling Date		2024/10/02 13:20	2024/10/02 14:40			
COC Number		C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-06_1.5-2M	BH24-05_1-1.5M	RDL	MDL	QC Batch
Glycols						
Propylene Glycol	mg/kg	<10	<10	10	2	9690882
Ethylene Glycol	mg/kg	<10	<10	10	2	9690882
Diethylene Glycol	mg/kg	<10	<10	10	2	9690882
Total Glycol	mg/kg	<10	<10	10	2	9690882

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

Bureau Veritas ID		AEZS76		AEZS77	AEZS78			
Sampling Date		2024/10/01 14:20		2024/10/01 15:30	2024/10/02 10:00			
COC Number		C#1013277-01-01		C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_1-1.5M	QC Batch	BH24-09_2-2.45M	BH24-01_1-1.5M	RDL	MDL	QC Batch
Inorganics								
Chromium (VI)	ug/g	<0.18	9690668	<0.18	<0.18	0.18	0.050	9693532
Metals								
Hot Water Ext. Boron (B)	ug/g	0.12	9693407	<0.050	0.053	0.050	0.030	9693580
Acid Extractable Antimony (Sb)	ug/g	<0.20	9693482	<0.20	<0.20	0.20	0.10	9693482
Acid Extractable Arsenic (As)	ug/g	<1.0	9693482	<1.0	<1.0	1.0	0.10	9693482
Acid Extractable Barium (Ba)	ug/g	15	9693482	7.8	6.9	0.50	0.30	9693482
Acid Extractable Beryllium (Be)	ug/g	<0.20	9693482	<0.20	<0.20	0.20	0.020	9693482
Acid Extractable Boron (B)	ug/g	<5.0	9693482	<5.0	<5.0	5.0	1.0	9693482
Acid Extractable Cadmium (Cd)	ug/g	<0.10	9693482	<0.10	<0.10	0.10	0.030	9693482
Acid Extractable Chromium (Cr)	ug/g	6.0	9693482	5.6	8.1	1.0	0.20	9693482
Acid Extractable Cobalt (Co)	ug/g	2.2	9693482	2.0	2.3	0.10	0.020	9693482
Acid Extractable Copper (Cu)	ug/g	4.1	9693482	3.2	3.7	0.50	0.20	9693482
Acid Extractable Lead (Pb)	ug/g	1.9	9693482	1.4	1.7	1.0	0.10	9693482
Acid Extractable Molybdenum (Mo)	ug/g	<0.50	9693482	<0.50	<0.50	0.50	0.10	9693482
Acid Extractable Nickel (Ni)	ug/g	3.5	9693482	2.8	3.7	0.50	0.20	9693482
Acid Extractable Selenium (Se)	ug/g	<0.50	9693482	<0.50	<0.50	0.50	0.10	9693482
Acid Extractable Silver (Ag)	ug/g	<0.20	9693482	<0.20	<0.20	0.20	0.040	9693482
Acid Extractable Thallium (Tl)	ug/g	<0.050	9693482	<0.050	<0.050	0.050	0.010	9693482
Acid Extractable Uranium (U)	ug/g	0.48	9693482	0.49	0.52	0.050	0.030	9693482
Acid Extractable Vanadium (V)	ug/g	18	9693482	18	32	5.0	0.50	9693482
Acid Extractable Zinc (Zn)	ug/g	7.4	9693482	6.3	9.1	5.0	0.50	9693482
Acid Extractable Mercury (Hg)	ug/g	<0.050	9693482	<0.050	<0.050	0.050	0.030	9693482

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

Bureau Veritas ID		AEZS79	AEZS80	AEZS81	AEZS82			
Sampling Date		2024/10/02 10:50	2024/10/02 13:20	2024/10/02 14:40	2024/10/03 09:40			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-07_2-2.45M	BH24-06_1.5-2M	BH24-05_1-1.5M	BH24-02_2-2.4M	RDL	MDL	QC Batch
Inorganics								
Chromium (VI)	ug/g	<0.18	<0.18	<0.18	<0.18	0.18	0.050	9693532
Metals								
Hot Water Ext. Boron (B)	ug/g	0.11	0.11	<0.050	<0.050	0.050	0.030	9693580
Acid Extractable Antimony (Sb)	ug/g	<0.20	<0.20	<0.20	<0.20	0.20	0.10	9693482
Acid Extractable Arsenic (As)	ug/g	2.0	<1.0	<1.0	<1.0	1.0	0.10	9693482
Acid Extractable Barium (Ba)	ug/g	15	15	7.6	11	0.50	0.30	9693482
Acid Extractable Beryllium (Be)	ug/g	<0.20	<0.20	<0.20	<0.20	0.20	0.020	9693482
Acid Extractable Boron (B)	ug/g	<5.0	<5.0	<5.0	<5.0	5.0	1.0	9693482
Acid Extractable Cadmium (Cd)	ug/g	<0.10	<0.10	<0.10	<0.10	0.10	0.030	9693482
Acid Extractable Chromium (Cr)	ug/g	5.9	5.9	6.7	4.4	1.0	0.20	9693482
Acid Extractable Cobalt (Co)	ug/g	3.1	2.0	2.0	1.8	0.10	0.020	9693482
Acid Extractable Copper (Cu)	ug/g	4.6	3.5	3.1	3.7	0.50	0.20	9693482
Acid Extractable Lead (Pb)	ug/g	5.2	1.6	1.4	1.2	1.0	0.10	9693482
Acid Extractable Molybdenum (Mo)	ug/g	1.4	<0.50	<0.50	<0.50	0.50	0.10	9693482
Acid Extractable Nickel (Ni)	ug/g	5.7	3.4	2.9	2.8	0.50	0.20	9693482
Acid Extractable Selenium (Se)	ug/g	<0.50	<0.50	<0.50	<0.50	0.50	0.10	9693482
Acid Extractable Silver (Ag)	ug/g	<0.20	<0.20	<0.20	<0.20	0.20	0.040	9693482
Acid Extractable Thallium (Tl)	ug/g	0.053	<0.050	<0.050	<0.050	0.050	0.010	9693482
Acid Extractable Uranium (U)	ug/g	0.45	0.45	0.43	0.35	0.050	0.030	9693482
Acid Extractable Vanadium (V)	ug/g	13	17	22	13	5.0	0.50	9693482
Acid Extractable Zinc (Zn)	ug/g	8.2	6.6	6.3	6.0	5.0	0.50	9693482
Acid Extractable Mercury (Hg)	ug/g	<0.050	<0.050	<0.050	<0.050	0.050	0.030	9693482

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

Bureau Veritas ID		AEZS83		AEZS84			
Sampling Date		2024/10/03 11:30		2024/10/03 12:40			
COC Number		C#1013277-01-01		C#1013277-01-01			
	UNITS	BH24-04_0.5-1M	QC Batch	BH24-03_0.5-1M	RDL	MDL	QC Batch
Inorganics							
Chromium (VI)	ug/g	<0.18	9693532	<0.18	0.18	0.050	9693532
Metals							
Hot Water Ext. Boron (B)	ug/g	0.065	9691843	0.051	0.050	0.030	9693580
Acid Extractable Antimony (Sb)	ug/g	<0.20	9693482	<0.20	0.20	0.10	9694349
Acid Extractable Arsenic (As)	ug/g	<1.0	9693482	<1.0	1.0	0.10	9694349
Acid Extractable Barium (Ba)	ug/g	19	9693482	20	0.50	0.30	9694349
Acid Extractable Beryllium (Be)	ug/g	<0.20	9693482	<0.20	0.20	0.020	9694349
Acid Extractable Boron (B)	ug/g	<5.0	9693482	<5.0	5.0	1.0	9694349
Acid Extractable Cadmium (Cd)	ug/g	<0.10	9693482	<0.10	0.10	0.030	9694349
Acid Extractable Chromium (Cr)	ug/g	6.3	9693482	9.5	1.0	0.20	9694349
Acid Extractable Cobalt (Co)	ug/g	2.2	9693482	2.6	0.10	0.020	9694349
Acid Extractable Copper (Cu)	ug/g	3.8	9693482	4.5	0.50	0.20	9694349
Acid Extractable Lead (Pb)	ug/g	2.3	9693482	2.8	1.0	0.10	9694349
Acid Extractable Molybdenum (Mo)	ug/g	<0.50	9693482	<0.50	0.50	0.10	9694349
Acid Extractable Nickel (Ni)	ug/g	3.6	9693482	4.4	0.50	0.20	9694349
Acid Extractable Selenium (Se)	ug/g	<0.50	9693482	<0.50	0.50	0.10	9694349
Acid Extractable Silver (Ag)	ug/g	<0.20	9693482	<0.20	0.20	0.040	9694349
Acid Extractable Thallium (Tl)	ug/g	<0.050	9693482	<0.050	0.050	0.010	9694349
Acid Extractable Uranium (U)	ug/g	0.46	9693482	0.70	0.050	0.030	9694349
Acid Extractable Vanadium (V)	ug/g	18	9693482	35	5.0	0.50	9694349
Acid Extractable Zinc (Zn)	ug/g	8.7	9693482	9.6	5.0	0.50	9694349
Acid Extractable Mercury (Hg)	ug/g	<0.050	9693482	<0.050	0.050	0.030	9694349

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SEMI-VOLATILE ORGANICS BY GC-MS (SOIL)

Bureau Veritas ID		AEZS76		AEZS77	AEZS78	AEZS79			
Sampling Date		2024/10/01 14:20		2024/10/01 15:30	2024/10/02 10:00	2024/10/02 10:50			
COC Number		C#1013277-01-01		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_1-1.5M	QC Batch	BH24-09_2-2.45M	BH24-01_1-1.5M	BH24-07_2-2.45M	RDL	MDL	QC Batch
Calculated Parameters									
Methylnaphthalene, 2-(1-)	ug/g	<0.0071	9686981	<0.0071	<0.0071	<0.0071	0.0071	N/A	9684642
Polyaromatic Hydrocarbons									
Acenaphthene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9691592
Acenaphthylene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Anthracene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Benzo(a)anthracene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9691592
Benzo(a)pyrene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Benzo(b/j)fluoranthene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9691592
Benzo(g,h,i)perylene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0040	9691592
Benzo(k)fluoranthene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9691592
Chrysene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9691592
Dibenzo(a,h)anthracene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0040	9691592
Fluoranthene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Fluorene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Indeno(1,2,3-cd)pyrene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0040	9691592
1-Methylnaphthalene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
2-Methylnaphthalene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Naphthalene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Phenanthrene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Pyrene	ug/g	<0.0050	9691592	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9691592
Surrogate Recovery (%)									
D10-Anthracene	%	117	9691592	121	121	118			9691592
D14-Terphenyl (FS)	%	99	9691592	103	103	94			9691592
D8-Acenaphthylene	%	88	9691592	90	87	85			9691592

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

SEMI-VOLATILE ORGANICS BY GC-MS (SOIL)

Bureau Veritas ID		AEZS80	AEZS81	AEZS82		AEZS83			
Sampling Date		2024/10/02 13:20	2024/10/02 14:40	2024/10/03 09:40		2024/10/03 11:30			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01		C#1013277-01-01			
	UNITS	BH24-06_1.5-2M	BH24-05_1-1.5M	BH24-02_2-2.4M	QC Batch	BH24-04_0.5-1M	RDL	MDL	QC Batch
Calculated Parameters									
Methylnaphthalene, 2-(1-)	ug/g	<0.0071	<0.0071	<0.0071	9684642	<0.0071	0.0071	N/A	9686981
Polyaromatic Hydrocarbons									
Acenaphthene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0020	9691592
Acenaphthylene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Anthracene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Benzo(a)anthracene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0020	9691592
Benzo(a)pyrene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Benzo(b/j)fluoranthene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0020	9691592
Benzo(g,h,i)perylene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0040	9691592
Benzo(k)fluoranthene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0020	9691592
Chrysene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0020	9691592
Dibenzo(a,h)anthracene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0040	9691592
Fluoranthene	ug/g	<0.0050	<0.0050	<0.0050	9691592	0.0056	0.0050	0.0010	9691592
Fluorene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Indeno(1,2,3-cd)pyrene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0040	9691592
1-Methylnaphthalene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
2-Methylnaphthalene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Naphthalene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Phenanthrene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Pyrene	ug/g	<0.0050	<0.0050	<0.0050	9691592	<0.0050	0.0050	0.0010	9691592
Surrogate Recovery (%)									
D10-Anthracene	%	119	105	118	9691592	126			9691592
D14-Terphenyl (FS)	%	100	107	103	9691592	108			9691592
D8-Acenaphthylene	%	84	89	89	9691592	90			9691592

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

SEMI-VOLATILE ORGANICS BY GC-MS (SOIL)

Bureau Veritas ID		AEZS84			
Sampling Date		2024/10/03 12:40			
COC Number		C#1013277-01-01			
	UNITS	**BH24-03_0.5-1M**	**RDL**	**MDL**	**QC Batch**
Calculated Parameters					
Methylnaphthalene, 2-(1-)	ug/g	<0.0071	0.0071	N/A	9686981
Polyaromatic Hydrocarbons					
Acenaphthene	ug/g	<0.0050	0.0050	0.0020	9691592
Acenaphthylene	ug/g	<0.0050	0.0050	0.0010	9691592
Anthracene	ug/g	<0.0050	0.0050	0.0010	9691592
Benzo(a)anthracene	ug/g	<0.0050	0.0050	0.0020	9691592
Benzo(a)pyrene	ug/g	<0.0050	0.0050	0.0010	9691592
Benzo(b/j)fluoranthene	ug/g	<0.0050	0.0050	0.0020	9691592
Benzo(g,h,i)perylene	ug/g	<0.0050	0.0050	0.0040	9691592
Benzo(k)fluoranthene	ug/g	<0.0050	0.0050	0.0020	9691592
Chrysene	ug/g	<0.0050	0.0050	0.0020	9691592
Dibenzo(a,h)anthracene	ug/g	<0.0050	0.0050	0.0040	9691592
Fluoranthene	ug/g	<0.0050	0.0050	0.0010	9691592
Fluorene	ug/g	<0.0050	0.0050	0.0010	9691592
Indeno(1,2,3-cd)pyrene	ug/g	<0.0050	0.0050	0.0040	9691592
1-Methylnaphthalene	ug/g	<0.0050	0.0050	0.0010	9691592
2-Methylnaphthalene	ug/g	<0.0050	0.0050	0.0010	9691592
Naphthalene	ug/g	<0.0050	0.0050	0.0010	9691592
Phenanthrene	ug/g	<0.0050	0.0050	0.0010	9691592
Pyrene	ug/g	<0.0050	0.0050	0.0010	9691592
Surrogate Recovery (%)					
D10-Anthracene	%	129			9691592
D14-Terphenyl (FS)	%	105			9691592
D8-Acenaphthylene	%	88			9691592

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

VOLATILE ORGANICS BY GC/MS (SOIL)

Bureau Veritas ID		AEZS76	AEZS77	AEZS78			
Sampling Date		2024/10/01 14:20	2024/10/01 15:30	2024/10/02 10:00			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_1-1.5M	BH24-09_2-2.45M	BH24-01_1-1.5M	RDL	MDL	QC Batch
Calculated Parameters							
1,3-Dichloropropene (cis+trans)	ug/g	<0.050	<0.050	<0.050	0.050	0.010	9684689
Volatile Organics							
Acetone (2-Propanone)	ug/g	<0.49	<0.49	<0.49	0.49	0.49	9689116
Benzene	ug/g	<0.0060	<0.0060	<0.0060	0.0060	0.0060	9689116
Bromodichloromethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Bromoform	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Bromomethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Carbon Tetrachloride	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Chlorobenzene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Chloroform	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Dibromochloromethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichlorobenzene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,3-Dichlorobenzene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,4-Dichlorobenzene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Dichlorodifluoromethane (FREON 12)	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1-Dichloroethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichloroethane	ug/g	<0.049	<0.049	<0.049	0.049	0.049	9689116
1,1-Dichloroethylene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
cis-1,2-Dichloroethylene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
trans-1,2-Dichloroethylene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichloropropane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
cis-1,3-Dichloropropene	ug/g	<0.030	<0.030	<0.030	0.030	0.030	9689116
trans-1,3-Dichloropropene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Ethylbenzene	ug/g	<0.010	<0.010	<0.010	0.010	0.010	9689116
Ethylene Dibromide	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Hexane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Methylene Chloride(Dichloromethane)	ug/g	<0.049	<0.049	<0.049	0.049	0.049	9689116
Methyl Ethyl Ketone (2-Butanone)	ug/g	<0.40	<0.40	<0.40	0.40	0.40	9689116
Methyl Isobutyl Ketone	ug/g	<0.40	<0.40	<0.40	0.40	0.40	9689116
Methyl t-butyl ether (MTBE)	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Styrene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1,1,2-Tetrachloroethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1,2,2-Tetrachloroethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

VOLATILE ORGANICS BY GC/MS (SOIL)

Bureau Veritas ID		AEZS76	AEZS77	AEZS78			
Sampling Date		2024/10/01 14:20	2024/10/01 15:30	2024/10/02 10:00			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_1-1.5M	BH24-09_2-2.45M	BH24-01_1-1.5M	RDL	MDL	QC Batch
Tetrachloroethylene	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Toluene	ug/g	<0.020	<0.020	<0.020	0.020	0.020	9689116
1,1,1-Trichloroethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1,2-Trichloroethane	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Trichloroethylene	ug/g	<0.010	<0.010	<0.010	0.010	0.010	9689116
Trichlorofluoromethane (FREON 11)	ug/g	<0.040	<0.040	<0.040	0.040	0.040	9689116
Vinyl Chloride	ug/g	<0.019	<0.019	<0.019	0.019	0.019	9689116
p+m-Xylene	ug/g	<0.020	<0.020	<0.020	0.020	0.020	9689116
o-Xylene	ug/g	<0.020	<0.020	<0.020	0.020	0.020	9689116
Total Xylenes	ug/g	<0.020	<0.020	<0.020	0.020	0.020	9689116
F1 (C6-C10)	ug/g	<10	<10	<10	10	2.0	9689116
F1 (C6-C10) - BTEX	ug/g	<10	<10	<10	10	2.0	9689116
Surrogate Recovery (%)							
4-Bromofluorobenzene	%	89	89	89			9689116
D10-o-Xylene	%	94	93	99			9689116
D4-1,2-Dichloroethane	%	124	124	124			9689116
D8-Toluene	%	103	102	105			9689116

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

VOLATILE ORGANICS BY GC/MS (SOIL)

Bureau Veritas ID		AEZS79	AEZS80	AEZS81	AEZS82			
Sampling Date		2024/10/02 10:50	2024/10/02 13:20	2024/10/02 14:40	2024/10/03 09:40			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-07_2-2.45M	BH24-06_1.5-2M	BH24-05_1-1.5M	BH24-02_2-2.4M	RDL	MDL	QC Batch
Calculated Parameters								
1,3-Dichloropropene (cis+trans)	ug/g	<0.050	<0.050	<0.050	<0.050	0.050	0.010	9684689
Volatile Organics								
Acetone (2-Propanone)	ug/g	<0.49	<0.49	<0.49	<0.49	0.49	0.49	9689116
Benzene	ug/g	<0.0060	<0.0060	<0.0060	<0.0060	0.0060	0.0060	9689116
Bromodichloromethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Bromoform	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Bromomethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Carbon Tetrachloride	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Chlorobenzene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Chloroform	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Dibromochloromethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichlorobenzene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,3-Dichlorobenzene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,4-Dichlorobenzene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Dichlorodifluoromethane (FREON 12)	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1-Dichloroethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichloroethane	ug/g	<0.049	<0.049	<0.049	<0.049	0.049	0.049	9689116
1,1-Dichloroethylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
cis-1,2-Dichloroethylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
trans-1,2-Dichloroethylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichloropropane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
cis-1,3-Dichloropropene	ug/g	<0.030	<0.030	<0.030	<0.030	0.030	0.030	9689116
trans-1,3-Dichloropropene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Ethylbenzene	ug/g	<0.010	<0.010	<0.010	<0.010	0.010	0.010	9689116
Ethylene Dibromide	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Hexane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Methylene Chloride(Dichloromethane)	ug/g	<0.049	<0.049	<0.049	<0.049	0.049	0.049	9689116
Methyl Ethyl Ketone (2-Butanone)	ug/g	<0.40	<0.40	<0.40	<0.40	0.40	0.40	9689116
Methyl Isobutyl Ketone	ug/g	<0.40	<0.40	<0.40	<0.40	0.40	0.40	9689116
Methyl t-butyl ether (MTBE)	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Styrene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1,1,2-Tetrachloroethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1,2,2-Tetrachloroethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

VOLATILE ORGANICS BY GC/MS (SOIL)

Bureau Veritas ID		AEZS79	AEZS80	AEZS81	AEZS82			
Sampling Date		2024/10/02 10:50	2024/10/02 13:20	2024/10/02 14:40	2024/10/03 09:40			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-07_2-2.45M	BH24-06_1.5-2M	BH24-05_1-1.5M	BH24-02_2-2.4M	RDL	MDL	QC Batch
Tetrachloroethylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Toluene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9689116
1,1,1-Trichloroethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
1,1,2-Trichloroethane	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Trichloroethylene	ug/g	<0.010	<0.010	<0.010	<0.010	0.010	0.010	9689116
Trichlorofluoromethane (FREON 11)	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9689116
Vinyl Chloride	ug/g	<0.019	<0.019	<0.019	<0.019	0.019	0.019	9689116
p+m-Xylene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9689116
o-Xylene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9689116
Total Xylenes	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9689116
F1 (C6-C10)	ug/g	<10	<10	<10	<10	10	2.0	9689116
F1 (C6-C10) - BTEX	ug/g	<10	<10	<10	<10	10	2.0	9689116
Surrogate Recovery (%)								
4-Bromofluorobenzene	%	89	88	88	88			9689116
D10-o-Xylene	%	98	96	97	99			9689116
D4-1,2-Dichloroethane	%	129	123	125	125			9689116
D8-Toluene	%	103	106	104	104			9689116

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

VOLATILE ORGANICS BY GC/MS (SOIL)

Bureau Veritas ID		AEZS83	AEZS84			
Sampling Date		2024/10/03 11:30	2024/10/03 12:40			
COC Number		C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-04_0.5-1M	BH24-03_0.5-1M	RDL	MDL	QC Batch
Calculated Parameters						
1,3-Dichloropropene (cis+trans)	ug/g	<0.050	<0.050	0.050	0.010	9684689
Volatile Organics						
Acetone (2-Propanone)	ug/g	<0.49	<0.49	0.49	0.49	9689116
Benzene	ug/g	<0.0060	<0.0060	0.0060	0.0060	9689116
Bromodichloromethane	ug/g	<0.040	<0.040	0.040	0.040	9689116
Bromoform	ug/g	<0.040	<0.040	0.040	0.040	9689116
Bromomethane	ug/g	<0.040	<0.040	0.040	0.040	9689116
Carbon Tetrachloride	ug/g	<0.040	<0.040	0.040	0.040	9689116
Chlorobenzene	ug/g	<0.040	<0.040	0.040	0.040	9689116
Chloroform	ug/g	<0.040	<0.040	0.040	0.040	9689116
Dibromochloromethane	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichlorobenzene	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,3-Dichlorobenzene	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,4-Dichlorobenzene	ug/g	<0.040	<0.040	0.040	0.040	9689116
Dichlorodifluoromethane (FREON 12)	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,1-Dichloroethane	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichloroethane	ug/g	<0.049	<0.049	0.049	0.049	9689116
1,1-Dichloroethylene	ug/g	<0.040	<0.040	0.040	0.040	9689116
cis-1,2-Dichloroethylene	ug/g	<0.040	<0.040	0.040	0.040	9689116
trans-1,2-Dichloroethylene	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,2-Dichloropropane	ug/g	<0.040	<0.040	0.040	0.040	9689116
cis-1,3-Dichloropropene	ug/g	<0.030	<0.030	0.030	0.030	9689116
trans-1,3-Dichloropropene	ug/g	<0.040	<0.040	0.040	0.040	9689116
Ethylbenzene	ug/g	<0.010	<0.010	0.010	0.010	9689116
Ethylene Dibromide	ug/g	<0.040	<0.040	0.040	0.040	9689116
Hexane	ug/g	<0.040	<0.040	0.040	0.040	9689116
Methylene Chloride(Dichloromethane)	ug/g	<0.049	<0.049	0.049	0.049	9689116
Methyl Ethyl Ketone (2-Butanone)	ug/g	<0.40	<0.40	0.40	0.40	9689116
Methyl Isobutyl Ketone	ug/g	<0.40	<0.40	0.40	0.40	9689116
Methyl t-butyl ether (MTBE)	ug/g	<0.040	<0.040	0.040	0.040	9689116
Styrene	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,1,1,2-Tetrachloroethane	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,1,2,2-Tetrachloroethane	ug/g	<0.040	<0.040	0.040	0.040	9689116

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

VOLATILE ORGANICS BY GC/MS (SOIL)

Bureau Veritas ID		AEZS83	AEZS84			
Sampling Date		2024/10/03 11:30	2024/10/03 12:40			
COC Number		C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-04_0.5-1M	BH24-03_0.5-1M	RDL	MDL	QC Batch
Tetrachloroethylene	ug/g	<0.040	<0.040	0.040	0.040	9689116
Toluene	ug/g	<0.020	<0.020	0.020	0.020	9689116
1,1,1-Trichloroethane	ug/g	<0.040	<0.040	0.040	0.040	9689116
1,1,2-Trichloroethane	ug/g	<0.040	<0.040	0.040	0.040	9689116
Trichloroethylene	ug/g	<0.010	<0.010	0.010	0.010	9689116
Trichlorofluoromethane (FREON 11)	ug/g	<0.040	<0.040	0.040	0.040	9689116
Vinyl Chloride	ug/g	<0.019	<0.019	0.019	0.019	9689116
p+m-Xylene	ug/g	<0.020	<0.020	0.020	0.020	9689116
o-Xylene	ug/g	<0.020	<0.020	0.020	0.020	9689116
Total Xylenes	ug/g	<0.020	<0.020	0.020	0.020	9689116
F1 (C6-C10)	ug/g	<10	<10	10	2.0	9689116
F1 (C6-C10) - BTEX	ug/g	<10	<10	10	2.0	9689116
Surrogate Recovery (%)						
4-Bromofluorobenzene	%	86	87			9689116
D10-o-Xylene	%	92	100			9689116
D4-1,2-Dichloroethane	%	124	125			9689116
D8-Toluene	%	105	105			9689116

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

PETROLEUM HYDROCARBONS (CCME)

Bureau Veritas ID		AEZS76		AEZS77	AEZS78	AEZS79			
Sampling Date		2024/10/01 14:20		2024/10/01 15:30	2024/10/02 10:00	2024/10/02 10:50			
COC Number		C#1013277-01-01		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_1-1.5M	QC Batch	BH24-09_2-2.45M	BH24-01_1-1.5M	BH24-07_2-2.45M	RDL	MDL	QC Batch
F2-F4 Hydrocarbons									
F2 (C10-C16 Hydrocarbons)	ug/g	<7.0	9692460	<7.0	<7.0	<7.0	7.0	5.0	9694750
F3 (C16-C34 Hydrocarbons)	ug/g	<50	9692460	<50	<50	<50	50	5.0	9694750
F4 (C34-C50 Hydrocarbons)	ug/g	<50	9692460	<50	<50	<50	50	10	9694750
Reached Baseline at C50	ug/g	Yes	9692460	Yes	Yes	Yes			9694750
Surrogate Recovery (%)									
o-Terphenyl	%	101	9692460	92	89	87			9694750

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AEZS80	AEZS81		AEZS82	AEZS83			
Sampling Date		2024/10/02 13:20	2024/10/02 14:40		2024/10/03 09:40	2024/10/03 11:30			
COC Number		C#1013277-01-01	C#1013277-01-01		C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-06_1.5-2M	BH24-05_1-1.5M	QC Batch	BH24-02_2-2.4M	BH24-04_0.5-1M	RDL	MDL	QC Batch
F2-F4 Hydrocarbons									
F2 (C10-C16 Hydrocarbons)	ug/g	<7.0	<7.0	9694750	<7.0	<7.0	7.0	5.0	9692460
F3 (C16-C34 Hydrocarbons)	ug/g	<50	<50	9694750	<50	<50	50	5.0	9692460
F4 (C34-C50 Hydrocarbons)	ug/g	<50	<50	9694750	<50	<50	50	10	9692460
Reached Baseline at C50	ug/g	Yes	Yes	9694750	Yes	Yes			9692460
Surrogate Recovery (%)									
o-Terphenyl	%	85	91	9694750	94	97			9692460

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

PETROLEUM HYDROCARBONS (CCME)

Bureau Veritas ID		AEZS84			
Sampling Date		2024/10/03 12:40			
COC Number		C#1013277-01-01			
	UNITS	**BH24-03_0.5-1M**	**RDL**	**MDL**	**QC Batch**
F2-F4 Hydrocarbons					
F2 (C10-C16 Hydrocarbons)	ug/g	<7.0	7.0	5.0	9692460
F3 (C16-C34 Hydrocarbons)	ug/g	<50	50	5.0	9692460
F4 (C34-C50 Hydrocarbons)	ug/g	<50	50	10	9692460
Reached Baseline at C50	ug/g	Yes			9692460
Surrogate Recovery (%)					
o-Terphenyl	%	94			9692460

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

GENERAL COMMENTS

Results relate only to the items tested.

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
9688595	MUC	RPD	Moisture	2024/10/08	1.5		%	20
9689083	MUC	RPD	Moisture	2024/10/08	1.5		%	20
9689116	DR1	Matrix Spike	4-Bromofluorobenzene	2024/10/09		91	%	60 - 140
			D10-o-Xylene	2024/10/09		105	%	60 - 130
			D4-1,2-Dichloroethane	2024/10/09		125	%	60 - 140
			D8-Toluene	2024/10/09		104	%	60 - 140
			Acetone (2-Propanone)	2024/10/09		144 (1)	%	60 - 140
			Benzene	2024/10/09		100	%	60 - 140
			Bromodichloromethane	2024/10/09		105	%	60 - 140
			Bromoform	2024/10/09		106	%	60 - 140
			Bromomethane	2024/10/09		84	%	60 - 140
			Carbon Tetrachloride	2024/10/09		100	%	60 - 140
			Chlorobenzene	2024/10/09		96	%	60 - 140
			Chloroform	2024/10/09		104	%	60 - 140
			Dibromochloromethane	2024/10/09		112	%	60 - 140
			1,2-Dichlorobenzene	2024/10/09		103	%	60 - 140
			1,3-Dichlorobenzene	2024/10/09		101	%	60 - 140
			1,4-Dichlorobenzene	2024/10/09		102	%	60 - 140
			Dichlorodifluoromethane (FREON 12)	2024/10/09		79	%	60 - 140
			1,1-Dichloroethane	2024/10/09		101	%	60 - 140
			1,2-Dichloroethane	2024/10/09		124	%	60 - 140
			1,1-Dichloroethylene	2024/10/09		103	%	60 - 140
			cis-1,2-Dichloroethylene	2024/10/09		102	%	60 - 140
			trans-1,2-Dichloroethylene	2024/10/09		98	%	60 - 140
			1,2-Dichloropropane	2024/10/09		109	%	60 - 140
			cis-1,3-Dichloropropene	2024/10/09		108	%	60 - 140
			trans-1,3-Dichloropropene	2024/10/09		134	%	60 - 140
			Ethylbenzene	2024/10/09		96	%	60 - 140
			Ethylene Dibromide	2024/10/09		110	%	60 - 140
			Hexane	2024/10/09		106	%	60 - 140
			Methylene Chloride(Dichloromethane)	2024/10/09		99	%	60 - 140
			Methyl Ethyl Ketone (2-Butanone)	2024/10/09		146 (1)	%	60 - 140
			Methyl Isobutyl Ketone	2024/10/09		128	%	60 - 140
			Methyl t-butyl ether (MTBE)	2024/10/09		108	%	60 - 140
			Styrene	2024/10/09		98	%	60 - 140
			1,1,1,2-Tetrachloroethane	2024/10/09		105	%	60 - 140
			1,1,2,2-Tetrachloroethane	2024/10/09		111	%	60 - 140
			Tetrachloroethylene	2024/10/09		90	%	60 - 140
			Toluene	2024/10/09		99	%	60 - 140
			1,1,1-Trichloroethane	2024/10/09		93	%	60 - 140
			1,1,2-Trichloroethane	2024/10/09		128	%	60 - 140
			Trichloroethylene	2024/10/09		92	%	60 - 140
			Trichlorofluoromethane (FREON 11)	2024/10/09		94	%	60 - 140
			Vinyl Chloride	2024/10/09		91	%	60 - 140
			p+m-Xylene	2024/10/09		94	%	60 - 140
			o-Xylene	2024/10/09		106	%	60 - 140
			F1 (C6-C10)	2024/10/09		85	%	60 - 140
9689116	DR1	Spiked Blank	4-Bromofluorobenzene	2024/10/09		94	%	60 - 140
			D10-o-Xylene	2024/10/09		93	%	60 - 130
			D4-1,2-Dichloroethane	2024/10/09		123	%	60 - 140
			D8-Toluene	2024/10/09		103	%	60 - 140
			Acetone (2-Propanone)	2024/10/09		129	%	60 - 140

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Benzene	2024/10/09		96	%	60 - 130
			Bromodichloromethane	2024/10/09		102	%	60 - 130
			Bromoform	2024/10/09		109	%	60 - 130
			Bromomethane	2024/10/09		79	%	60 - 140
			Carbon Tetrachloride	2024/10/09		97	%	60 - 130
			Chlorobenzene	2024/10/09		92	%	60 - 130
			Chloroform	2024/10/09		99	%	60 - 130
			Dibromochloromethane	2024/10/09		111	%	60 - 130
			1,2-Dichlorobenzene	2024/10/09		101	%	60 - 130
			1,3-Dichlorobenzene	2024/10/09		104	%	60 - 130
			1,4-Dichlorobenzene	2024/10/09		97	%	60 - 130
			Dichlorodifluoromethane (FREON 12)	2024/10/09		77	%	60 - 140
			1,1-Dichloroethane	2024/10/09		96	%	60 - 130
			1,2-Dichloroethane	2024/10/09		119	%	60 - 130
			1,1-Dichloroethylene	2024/10/09		98	%	60 - 130
			cis-1,2-Dichloroethylene	2024/10/09		99	%	60 - 130
			trans-1,2-Dichloroethylene	2024/10/09		94	%	60 - 130
			1,2-Dichloropropane	2024/10/09		105	%	60 - 130
			cis-1,3-Dichloropropene	2024/10/09		103	%	60 - 130
			trans-1,3-Dichloropropene	2024/10/09		127	%	60 - 130
			Ethylbenzene	2024/10/09		95	%	60 - 130
			Ethylene Dibromide	2024/10/09		107	%	60 - 130
			Hexane	2024/10/09		101	%	60 - 130
			Methylene Chloride(Dichloromethane)	2024/10/09		95	%	60 - 130
			Methyl Ethyl Ketone (2-Butanone)	2024/10/09		137	%	60 - 140
			Methyl Isobutyl Ketone	2024/10/09		125	%	60 - 130
			Methyl t-butyl ether (MTBE)	2024/10/09		103	%	60 - 130
			Styrene	2024/10/09		95	%	60 - 130
			1,1,1,2-Tetrachloroethane	2024/10/09		105	%	60 - 130
			1,1,2,2-Tetrachloroethane	2024/10/09		109	%	60 - 130
			Tetrachloroethylene	2024/10/09		86	%	60 - 130
			Toluene	2024/10/09		94	%	60 - 130
			1,1,1-Trichloroethane	2024/10/09		90	%	60 - 130
			1,1,2-Trichloroethane	2024/10/09		123	%	60 - 130
			Trichloroethylene	2024/10/09		89	%	60 - 130
			Trichlorofluoromethane (FREON 11)	2024/10/09		89	%	60 - 130
			Vinyl Chloride	2024/10/09		88	%	60 - 130
			p+m-Xylene	2024/10/09		93	%	60 - 130
			o-Xylene	2024/10/09		103	%	60 - 130
			F1 (C6-C10)	2024/10/09		84	%	80 - 120
9689116	DR1	Method Blank	4-Bromofluorobenzene	2024/10/09		92	%	60 - 140
			D10-o-Xylene	2024/10/09		95	%	60 - 130
			D4-1,2-Dichloroethane	2024/10/09		116	%	60 - 140
			D8-Toluene	2024/10/09		103	%	60 - 140
			Acetone (2-Propanone)	2024/10/09	<0.49		ug/g	
			Benzene	2024/10/09	<0.0060		ug/g	
			Bromodichloromethane	2024/10/09	<0.040		ug/g	
			Bromoform	2024/10/09	<0.040		ug/g	
			Bromomethane	2024/10/09	<0.040		ug/g	
			Carbon Tetrachloride	2024/10/09	<0.040		ug/g	
			Chlorobenzene	2024/10/09	<0.040		ug/g	
			Chloroform	2024/10/09	<0.040		ug/g	

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Dibromochloromethane	2024/10/09	<0.040		ug/g	
			1,2-Dichlorobenzene	2024/10/09	<0.040		ug/g	
			1,3-Dichlorobenzene	2024/10/09	<0.040		ug/g	
			1,4-Dichlorobenzene	2024/10/09	<0.040		ug/g	
			Dichlorodifluoromethane (FREON 12)	2024/10/09	<0.040		ug/g	
			1,1-Dichloroethane	2024/10/09	<0.040		ug/g	
			1,2-Dichloroethane	2024/10/09	<0.049		ug/g	
			1,1-Dichloroethylene	2024/10/09	<0.040		ug/g	
			cis-1,2-Dichloroethylene	2024/10/09	<0.040		ug/g	
			trans-1,2-Dichloroethylene	2024/10/09	<0.040		ug/g	
			1,2-Dichloropropane	2024/10/09	<0.040		ug/g	
			cis-1,3-Dichloropropene	2024/10/09	<0.030		ug/g	
			trans-1,3-Dichloropropene	2024/10/09	<0.040		ug/g	
			Ethylbenzene	2024/10/09	<0.010		ug/g	
			Ethylene Dibromide	2024/10/09	<0.040		ug/g	
			Hexane	2024/10/09	<0.040		ug/g	
			Methylene Chloride(Dichloromethane)	2024/10/09	<0.049		ug/g	
			Methyl Ethyl Ketone (2-Butanone)	2024/10/09	<0.40		ug/g	
			Methyl Isobutyl Ketone	2024/10/09	<0.40		ug/g	
			Methyl t-butyl ether (MTBE)	2024/10/09	<0.040		ug/g	
			Styrene	2024/10/09	<0.040		ug/g	
			1,1,1,2-Tetrachloroethane	2024/10/09	<0.040		ug/g	
			1,1,2,2-Tetrachloroethane	2024/10/09	<0.040		ug/g	
			Tetrachloroethylene	2024/10/09	<0.040		ug/g	
			Toluene	2024/10/09	<0.020		ug/g	
			1,1,1-Trichloroethane	2024/10/09	<0.040		ug/g	
			1,1,2-Trichloroethane	2024/10/09	<0.040		ug/g	
			Trichloroethylene	2024/10/09	<0.010		ug/g	
			Trichlorofluoromethane (FREON 11)	2024/10/09	<0.040		ug/g	
			Vinyl Chloride	2024/10/09	<0.019		ug/g	
			p+m-Xylene	2024/10/09	<0.020		ug/g	
			o-Xylene	2024/10/09	<0.020		ug/g	
			Total Xylenes	2024/10/09	<0.020		ug/g	
			F1 (C6-C10)	2024/10/09	<10		ug/g	
			F1 (C6-C10) - BTEX	2024/10/09	<10		ug/g	
9689116	DR1	RPD	Acetone (2-Propanone)	2024/10/09	NC		%	50
			Benzene	2024/10/09	NC		%	50
			Bromodichloromethane	2024/10/09	NC		%	50
			Bromoform	2024/10/09	NC		%	50
			Bromomethane	2024/10/09	NC		%	50
			Carbon Tetrachloride	2024/10/09	NC		%	50
			Chlorobenzene	2024/10/09	NC		%	50
			Chloroform	2024/10/09	NC		%	50
			Dibromochloromethane	2024/10/09	NC		%	50
			1,2-Dichlorobenzene	2024/10/09	NC		%	50
			1,3-Dichlorobenzene	2024/10/09	NC		%	50
			1,4-Dichlorobenzene	2024/10/09	NC		%	50
			Dichlorodifluoromethane (FREON 12)	2024/10/09	NC		%	50
			1,1-Dichloroethane	2024/10/09	NC		%	50
			1,2-Dichloroethane	2024/10/09	NC		%	50
			1,1-Dichloroethylene	2024/10/09	NC		%	50
			cis-1,2-Dichloroethylene	2024/10/09	NC		%	50

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			trans-1,2-Dichloroethylene	2024/10/09	NC		%	50
			1,2-Dichloropropane	2024/10/09	NC		%	50
			cis-1,3-Dichloropropene	2024/10/09	NC		%	50
			trans-1,3-Dichloropropene	2024/10/09	NC		%	50
			Ethylbenzene	2024/10/09	NC		%	50
			Ethylene Dibromide	2024/10/09	NC		%	50
			Hexane	2024/10/09	NC		%	50
			Methylene Chloride(Dichloromethane)	2024/10/09	NC		%	50
			Methyl Ethyl Ketone (2-Butanone)	2024/10/09	NC		%	50
			Methyl Isobutyl Ketone	2024/10/09	NC		%	50
			Methyl t-butyl ether (MTBE)	2024/10/09	NC		%	50
			Styrene	2024/10/09	NC		%	50
			1,1,1,2-Tetrachloroethane	2024/10/09	NC		%	50
			1,1,2,2-Tetrachloroethane	2024/10/09	NC		%	50
			Tetrachloroethylene	2024/10/09	NC		%	50
			Toluene	2024/10/09	NC		%	50
			1,1,1-Trichloroethane	2024/10/09	NC		%	50
			1,1,2-Trichloroethane	2024/10/09	NC		%	50
			Trichloroethylene	2024/10/09	NC		%	50
			Trichlorofluoromethane (FREON 11)	2024/10/09	NC		%	50
			Vinyl Chloride	2024/10/09	NC		%	50
			p+m-Xylene	2024/10/09	NC		%	50
			o-Xylene	2024/10/09	NC		%	50
			Total Xylenes	2024/10/09	NC		%	50
			F1 (C6-C10)	2024/10/09	NC		%	30
			F1 (C6-C10) - BTEX	2024/10/09	NC		%	30
9690573	JTS	RPD	Moisture	2024/10/09	2.9		%	20
9690668	SB5	Matrix Spike	Chromium (VI)	2024/10/09		86	%	70 - 130
9690668	SB5	Spiked Blank	Chromium (VI)	2024/10/09		90	%	80 - 120
9690668	SB5	Method Blank	Chromium (VI)	2024/10/09	<0.18		ug/g	
9690668	SB5	RPD	Chromium (VI)	2024/10/09	NC		%	35
9690882	AGA	Matrix Spike [AEZS76-02]	Propylene Glycol	2024/10/10		105	%	60 - 140
			Ethylene Glycol	2024/10/10		103	%	60 - 140
			Diethylene Glycol	2024/10/10		99	%	60 - 140
9690882	AGA	Spiked Blank	Propylene Glycol	2024/10/09		107	%	60 - 140
			Ethylene Glycol	2024/10/09		107	%	60 - 140
			Diethylene Glycol	2024/10/09		108	%	60 - 140
9690882	AGA	Method Blank	Propylene Glycol	2024/10/09	<10		mg/kg	
			Ethylene Glycol	2024/10/09	<10		mg/kg	
			Diethylene Glycol	2024/10/09	<10		mg/kg	
			Total Glycol	2024/10/09	<10		mg/kg	
9690882	AGA	RPD [AEZS76-02]	Propylene Glycol	2024/10/09	NC		%	50
			Ethylene Glycol	2024/10/09	NC		%	50
			Diethylene Glycol	2024/10/09	NC		%	50
			Total Glycol	2024/10/09	NC		%	50
9691184	KIT	Spiked Blank	Available (CaCl2) pH	2024/10/09		100	%	97 - 103
9691184	KIT	RPD	Available (CaCl2) pH	2024/10/09	0.24		%	N/A
9691230	KIT	Spiked Blank	Available (CaCl2) pH	2024/10/09		100	%	97 - 103
9691230	KIT	RPD	Available (CaCl2) pH	2024/10/09	0.037		%	N/A
9691592	RAJ	Matrix Spike	D10-Anthracene	2024/10/10		106	%	50 - 130
			D14-Terphenyl (FS)	2024/10/10		100	%	50 - 130
			D8-Acenaphthylene	2024/10/10		93	%	50 - 130

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acenaphthene	2024/10/10		96	%	50 - 130
			Acenaphthylene	2024/10/10		87	%	50 - 130
			Anthracene	2024/10/10		103	%	50 - 130
			Benzo(a)anthracene	2024/10/10		94	%	50 - 130
			Benzo(a)pyrene	2024/10/10		96	%	50 - 130
			Benzo(b/j)fluoranthene	2024/10/10		95	%	50 - 130
			Benzo(g,h,i)perylene	2024/10/10		101	%	50 - 130
			Benzo(k)fluoranthene	2024/10/10		93	%	50 - 130
			Chrysene	2024/10/10		85	%	50 - 130
			Dibenzo(a,h)anthracene	2024/10/10		118	%	50 - 130
			Fluoranthene	2024/10/10		97	%	50 - 130
			Fluorene	2024/10/10		94	%	50 - 130
			Indeno(1,2,3-cd)pyrene	2024/10/10		96	%	50 - 130
			1-Methylnaphthalene	2024/10/10		92	%	50 - 130
			2-Methylnaphthalene	2024/10/10		86	%	50 - 130
			Naphthalene	2024/10/10		85	%	50 - 130
			Phenanthrene	2024/10/10		87	%	50 - 130
			Pyrene	2024/10/10		102	%	50 - 130
9691592	RAJ	Spiked Blank	D10-Anthracene	2024/10/10		110	%	50 - 130
			D14-Terphenyl (FS)	2024/10/10		98	%	50 - 130
			D8-Acenaphthylene	2024/10/10		92	%	50 - 130
			Acenaphthene	2024/10/10		91	%	50 - 130
			Acenaphthylene	2024/10/10		84	%	50 - 130
			Anthracene	2024/10/10		97	%	50 - 130
			Benzo(a)anthracene	2024/10/10		90	%	50 - 130
			Benzo(a)pyrene	2024/10/10		90	%	50 - 130
			Benzo(b/j)fluoranthene	2024/10/10		94	%	50 - 130
			Benzo(g,h,i)perylene	2024/10/10		100	%	50 - 130
			Benzo(k)fluoranthene	2024/10/10		94	%	50 - 130
			Chrysene	2024/10/10		83	%	50 - 130
			Dibenzo(a,h)anthracene	2024/10/10		103	%	50 - 130
			Fluoranthene	2024/10/10		94	%	50 - 130
			Fluorene	2024/10/10		91	%	50 - 130
			Indeno(1,2,3-cd)pyrene	2024/10/10		93	%	50 - 130
			1-Methylnaphthalene	2024/10/10		91	%	50 - 130
			2-Methylnaphthalene	2024/10/10		86	%	50 - 130
			Naphthalene	2024/10/10		87	%	50 - 130
			Phenanthrene	2024/10/10		91	%	50 - 130
			Pyrene	2024/10/10		99	%	50 - 130
9691592	RAJ	Method Blank	D10-Anthracene	2024/10/10		124	%	50 - 130
			D14-Terphenyl (FS)	2024/10/10		102	%	50 - 130
			D8-Acenaphthylene	2024/10/10		91	%	50 - 130
			Acenaphthene	2024/10/10	<0.0050		ug/g	
			Acenaphthylene	2024/10/10	<0.0050		ug/g	
			Anthracene	2024/10/10	<0.0050		ug/g	
			Benzo(a)anthracene	2024/10/10	<0.0050		ug/g	
			Benzo(a)pyrene	2024/10/10	<0.0050		ug/g	
			Benzo(b/j)fluoranthene	2024/10/10	<0.0050		ug/g	
			Benzo(g,h,i)perylene	2024/10/10	<0.0050		ug/g	
			Benzo(k)fluoranthene	2024/10/10	<0.0050		ug/g	
			Chrysene	2024/10/10	<0.0050		ug/g	
			Dibenzo(a,h)anthracene	2024/10/10	<0.0050		ug/g	

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Fluoranthene	2024/10/10	<0.0050		ug/g	
			Fluorene	2024/10/10	<0.0050		ug/g	
			Indeno(1,2,3-cd)pyrene	2024/10/10	<0.0050		ug/g	
			1-Methylnaphthalene	2024/10/10	<0.0050		ug/g	
			2-Methylnaphthalene	2024/10/10	<0.0050		ug/g	
			Naphthalene	2024/10/10	<0.0050		ug/g	
			Phenanthrene	2024/10/10	<0.0050		ug/g	
			Pyrene	2024/10/10	<0.0050		ug/g	
9691592	RAJ	RPD	Acenaphthene	2024/10/10	NC		%	40
			Acenaphthylene	2024/10/10	NC		%	40
			Anthracene	2024/10/10	NC		%	40
			Benzo(a)anthracene	2024/10/10	NC		%	40
			Benzo(a)pyrene	2024/10/10	NC		%	40
			Benzo(b/j)fluoranthene	2024/10/10	NC		%	40
			Benzo(g,h,i)perylene	2024/10/10	NC		%	40
			Benzo(k)fluoranthene	2024/10/10	NC		%	40
			Chrysene	2024/10/10	NC		%	40
			Dibenzo(a,h)anthracene	2024/10/10	NC		%	40
			Fluoranthene	2024/10/10	NC		%	40
			Fluorene	2024/10/10	NC		%	40
			Indeno(1,2,3-cd)pyrene	2024/10/10	NC		%	40
			1-Methylnaphthalene	2024/10/10	NC		%	40
			2-Methylnaphthalene	2024/10/10	NC		%	40
			Naphthalene	2024/10/10	NC		%	40
			Phenanthrene	2024/10/10	NC		%	40
			Pyrene	2024/10/10	NC		%	40
9691843	MEN	Matrix Spike	Hot Water Ext. Boron (B)	2024/10/10		98	%	75 - 125
9691843	MEN	Spiked Blank	Hot Water Ext. Boron (B)	2024/10/10		93	%	75 - 125
9691843	MEN	Method Blank	Hot Water Ext. Boron (B)	2024/10/10	<0.050		ug/g	
9691843	MEN	RPD	Hot Water Ext. Boron (B)	2024/10/10	15		%	40
9692460	MSZ	Matrix Spike	o-Terphenyl	2024/10/11		99	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/11		105	%	60 - 140
			F3 (C16-C34 Hydrocarbons)	2024/10/11		102	%	60 - 140
			F4 (C34-C50 Hydrocarbons)	2024/10/11		99	%	60 - 140
9692460	MSZ	Spiked Blank	o-Terphenyl	2024/10/11		94	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/11		99	%	80 - 120
			F3 (C16-C34 Hydrocarbons)	2024/10/11		96	%	80 - 120
			F4 (C34-C50 Hydrocarbons)	2024/10/11		92	%	80 - 120
9692460	MSZ	Method Blank	o-Terphenyl	2024/10/11		97	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/11	<7.0		ug/g	
			F3 (C16-C34 Hydrocarbons)	2024/10/11	<50		ug/g	
			F4 (C34-C50 Hydrocarbons)	2024/10/11	<50		ug/g	
9692460	MSZ	RPD	F2 (C10-C16 Hydrocarbons)	2024/10/11	NC		%	30
			F3 (C16-C34 Hydrocarbons)	2024/10/11	NC		%	30
			F4 (C34-C50 Hydrocarbons)	2024/10/11	NC		%	30
9692803	FGA	QC Standard	Sieve - #200 (<0.075mm)	2024/10/10		56	%	53 - 58
			Sieve - #200 (>0.075mm)	2024/10/10		44	%	42 - 47
9692803	FGA	RPD	Sieve - #200 (<0.075mm)	2024/10/10	1.6		%	20
			Sieve - #200 (>0.075mm)	2024/10/10	4.3		%	20
9693324	GTK	Spiked Blank	Conductivity	2024/10/10		103	%	90 - 110
9693324	GTK	Method Blank	Conductivity	2024/10/10	<0.002		mS/cm	
9693324	GTK	RPD	Conductivity	2024/10/10	0.77		%	10

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
9693407	TLG	Matrix Spike	Hot Water Ext. Boron (B)	2024/10/11		100	%	75 - 125
9693407	TLG	Spiked Blank	Hot Water Ext. Boron (B)	2024/10/11		99	%	75 - 125
9693407	TLG	Method Blank	Hot Water Ext. Boron (B)	2024/10/11	<0.050		ug/g	
9693407	TLG	RPD	Hot Water Ext. Boron (B)	2024/10/11	6.5		%	40
9693482	JWK	Matrix Spike	Acid Extractable Antimony (Sb)	2024/10/11		96	%	75 - 125
			Acid Extractable Arsenic (As)	2024/10/11		96	%	75 - 125
			Acid Extractable Barium (Ba)	2024/10/11		NC	%	75 - 125
			Acid Extractable Beryllium (Be)	2024/10/11		99	%	75 - 125
			Acid Extractable Boron (B)	2024/10/11		96	%	75 - 125
			Acid Extractable Cadmium (Cd)	2024/10/11		98	%	75 - 125
			Acid Extractable Chromium (Cr)	2024/10/11		91	%	75 - 125
			Acid Extractable Cobalt (Co)	2024/10/11		93	%	75 - 125
			Acid Extractable Copper (Cu)	2024/10/11		88	%	75 - 125
			Acid Extractable Lead (Pb)	2024/10/11		96	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2024/10/11		91	%	75 - 125
			Acid Extractable Nickel (Ni)	2024/10/11		97	%	75 - 125
			Acid Extractable Selenium (Se)	2024/10/11		97	%	75 - 125
			Acid Extractable Silver (Ag)	2024/10/11		94	%	75 - 125
			Acid Extractable Thallium (Tl)	2024/10/11		95	%	75 - 125
			Acid Extractable Uranium (U)	2024/10/11		99	%	75 - 125
			Acid Extractable Vanadium (V)	2024/10/11		NC	%	75 - 125
			Acid Extractable Zinc (Zn)	2024/10/11		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2024/10/11		97	%	75 - 125
9693482	JWK	Spiked Blank	Acid Extractable Antimony (Sb)	2024/10/11		95	%	80 - 120
			Acid Extractable Arsenic (As)	2024/10/11		95	%	80 - 120
			Acid Extractable Barium (Ba)	2024/10/11		98	%	80 - 120
			Acid Extractable Beryllium (Be)	2024/10/11		93	%	80 - 120
			Acid Extractable Boron (B)	2024/10/11		95	%	80 - 120
			Acid Extractable Cadmium (Cd)	2024/10/11		93	%	80 - 120
			Acid Extractable Chromium (Cr)	2024/10/11		92	%	80 - 120
			Acid Extractable Cobalt (Co)	2024/10/11		91	%	80 - 120
			Acid Extractable Copper (Cu)	2024/10/11		93	%	80 - 120
			Acid Extractable Lead (Pb)	2024/10/11		91	%	80 - 120
			Acid Extractable Molybdenum (Mo)	2024/10/11		85	%	80 - 120
			Acid Extractable Nickel (Ni)	2024/10/11		95	%	80 - 120
			Acid Extractable Selenium (Se)	2024/10/11		95	%	80 - 120
			Acid Extractable Silver (Ag)	2024/10/11		88	%	80 - 120
			Acid Extractable Thallium (Tl)	2024/10/11		91	%	80 - 120
			Acid Extractable Uranium (U)	2024/10/11		93	%	80 - 120
			Acid Extractable Vanadium (V)	2024/10/11		92	%	80 - 120
			Acid Extractable Zinc (Zn)	2024/10/11		100	%	80 - 120
			Acid Extractable Mercury (Hg)	2024/10/11		92	%	80 - 120
9693482	JWK	Method Blank	Acid Extractable Antimony (Sb)	2024/10/11	<0.20		ug/g	
			Acid Extractable Arsenic (As)	2024/10/11	<1.0		ug/g	
			Acid Extractable Barium (Ba)	2024/10/11	<0.50		ug/g	
			Acid Extractable Beryllium (Be)	2024/10/11	<0.20		ug/g	
			Acid Extractable Boron (B)	2024/10/11	<5.0		ug/g	
			Acid Extractable Cadmium (Cd)	2024/10/11	<0.10		ug/g	
			Acid Extractable Chromium (Cr)	2024/10/11	<1.0		ug/g	
			Acid Extractable Cobalt (Co)	2024/10/11	<0.10		ug/g	
			Acid Extractable Copper (Cu)	2024/10/11	<0.50		ug/g	
			Acid Extractable Lead (Pb)	2024/10/11	<1.0		ug/g	

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Molybdenum (Mo)	2024/10/11	<0.50		ug/g	
			Acid Extractable Nickel (Ni)	2024/10/11	<0.50		ug/g	
			Acid Extractable Selenium (Se)	2024/10/11	<0.50		ug/g	
			Acid Extractable Silver (Ag)	2024/10/11	<0.20		ug/g	
			Acid Extractable Thallium (Tl)	2024/10/11	<0.050		ug/g	
			Acid Extractable Uranium (U)	2024/10/11	<0.050		ug/g	
			Acid Extractable Vanadium (V)	2024/10/11	<5.0		ug/g	
			Acid Extractable Zinc (Zn)	2024/10/11	<5.0		ug/g	
			Acid Extractable Mercury (Hg)	2024/10/11	<0.050		ug/g	
9693482	JWK	RPD	Acid Extractable Antimony (Sb)	2024/10/11	NC		%	30
			Acid Extractable Arsenic (As)	2024/10/11	5.4		%	30
			Acid Extractable Barium (Ba)	2024/10/11	0.90		%	30
			Acid Extractable Beryllium (Be)	2024/10/11	NC		%	30
			Acid Extractable Boron (B)	2024/10/11	NC		%	30
			Acid Extractable Cadmium (Cd)	2024/10/11	NC		%	30
			Acid Extractable Chromium (Cr)	2024/10/11	0.19		%	30
			Acid Extractable Cobalt (Co)	2024/10/11	0.13		%	30
			Acid Extractable Copper (Cu)	2024/10/11	1.0		%	30
			Acid Extractable Lead (Pb)	2024/10/11	12		%	30
			Acid Extractable Molybdenum (Mo)	2024/10/11	NC		%	30
			Acid Extractable Nickel (Ni)	2024/10/11	2.2		%	30
			Acid Extractable Selenium (Se)	2024/10/11	NC		%	30
			Acid Extractable Silver (Ag)	2024/10/11	NC		%	30
			Acid Extractable Thallium (Tl)	2024/10/11	0.080		%	30
			Acid Extractable Uranium (U)	2024/10/11	1.8		%	30
			Acid Extractable Vanadium (V)	2024/10/11	2.8		%	30
			Acid Extractable Zinc (Zn)	2024/10/11	0.00079		%	30
			Acid Extractable Mercury (Hg)	2024/10/11	NC		%	30
9693532	SB5	Matrix Spike	Chromium (VI)	2024/10/10		92	%	70 - 130
9693532	SB5	Spiked Blank	Chromium (VI)	2024/10/10		94	%	80 - 120
9693532	SB5	Method Blank	Chromium (VI)	2024/10/10	<0.18		ug/g	
9693532	SB5	RPD	Chromium (VI)	2024/10/10	NC		%	35
9693580	SUK	Matrix Spike	Hot Water Ext. Boron (B)	2024/10/10		100	%	75 - 125
9693580	SUK	Spiked Blank	Hot Water Ext. Boron (B)	2024/10/10		96	%	75 - 125
9693580	SUK	Method Blank	Hot Water Ext. Boron (B)	2024/10/10	<0.050		ug/g	
9693580	SUK	RPD	Hot Water Ext. Boron (B)	2024/10/10	14		%	40
9694349	JWK	Matrix Spike	Acid Extractable Antimony (Sb)	2024/10/12		98	%	75 - 125
			Acid Extractable Arsenic (As)	2024/10/12		98	%	75 - 125
			Acid Extractable Barium (Ba)	2024/10/12		NC	%	75 - 125
			Acid Extractable Beryllium (Be)	2024/10/12		101	%	75 - 125
			Acid Extractable Boron (B)	2024/10/12		90	%	75 - 125
			Acid Extractable Cadmium (Cd)	2024/10/12		101	%	75 - 125
			Acid Extractable Chromium (Cr)	2024/10/12		99	%	75 - 125
			Acid Extractable Cobalt (Co)	2024/10/12		96	%	75 - 125
			Acid Extractable Copper (Cu)	2024/10/12		99	%	75 - 125
			Acid Extractable Lead (Pb)	2024/10/12		101	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2024/10/12		97	%	75 - 125
			Acid Extractable Nickel (Ni)	2024/10/12		98	%	75 - 125
			Acid Extractable Selenium (Se)	2024/10/12		99	%	75 - 125
			Acid Extractable Silver (Ag)	2024/10/12		98	%	75 - 125
			Acid Extractable Thallium (Tl)	2024/10/12		103	%	75 - 125
			Acid Extractable Uranium (U)	2024/10/12		108	%	75 - 125

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Vanadium (V)	2024/10/12		NC	%	75 - 125
			Acid Extractable Zinc (Zn)	2024/10/12		NC	%	75 - 125
			Acid Extractable Mercury (Hg)	2024/10/12		105	%	75 - 125
9694349	JWK	Spiked Blank	Acid Extractable Antimony (Sb)	2024/10/11		106	%	80 - 120
			Acid Extractable Arsenic (As)	2024/10/11		99	%	80 - 120
			Acid Extractable Barium (Ba)	2024/10/11		97	%	80 - 120
			Acid Extractable Beryllium (Be)	2024/10/11		97	%	80 - 120
			Acid Extractable Boron (B)	2024/10/11		101	%	80 - 120
			Acid Extractable Cadmium (Cd)	2024/10/11		101	%	80 - 120
			Acid Extractable Chromium (Cr)	2024/10/11		99	%	80 - 120
			Acid Extractable Cobalt (Co)	2024/10/11		99	%	80 - 120
			Acid Extractable Copper (Cu)	2024/10/11		98	%	80 - 120
			Acid Extractable Lead (Pb)	2024/10/11		100	%	80 - 120
			Acid Extractable Molybdenum (Mo)	2024/10/11		95	%	80 - 120
			Acid Extractable Nickel (Ni)	2024/10/11		101	%	80 - 120
			Acid Extractable Selenium (Se)	2024/10/11		102	%	80 - 120
			Acid Extractable Silver (Ag)	2024/10/11		99	%	80 - 120
			Acid Extractable Thallium (Tl)	2024/10/11		101	%	80 - 120
			Acid Extractable Uranium (U)	2024/10/11		103	%	80 - 120
			Acid Extractable Vanadium (V)	2024/10/11		101	%	80 - 120
			Acid Extractable Zinc (Zn)	2024/10/11		102	%	80 - 120
			Acid Extractable Mercury (Hg)	2024/10/11		106	%	80 - 120
9694349	JWK	Method Blank	Acid Extractable Antimony (Sb)	2024/10/11	<0.20		ug/g	
			Acid Extractable Arsenic (As)	2024/10/11	<1.0		ug/g	
			Acid Extractable Barium (Ba)	2024/10/11	<0.50		ug/g	
			Acid Extractable Beryllium (Be)	2024/10/11	<0.20		ug/g	
			Acid Extractable Boron (B)	2024/10/11	<5.0		ug/g	
			Acid Extractable Cadmium (Cd)	2024/10/11	<0.10		ug/g	
			Acid Extractable Chromium (Cr)	2024/10/11	<1.0		ug/g	
			Acid Extractable Cobalt (Co)	2024/10/11	<0.10		ug/g	
			Acid Extractable Copper (Cu)	2024/10/11	<0.50		ug/g	
			Acid Extractable Lead (Pb)	2024/10/11	<1.0		ug/g	
			Acid Extractable Molybdenum (Mo)	2024/10/11	<0.50		ug/g	
			Acid Extractable Nickel (Ni)	2024/10/11	<0.50		ug/g	
			Acid Extractable Selenium (Se)	2024/10/11	<0.50		ug/g	
			Acid Extractable Silver (Ag)	2024/10/11	<0.20		ug/g	
			Acid Extractable Thallium (Tl)	2024/10/11	<0.050		ug/g	
			Acid Extractable Uranium (U)	2024/10/11	<0.050		ug/g	
			Acid Extractable Vanadium (V)	2024/10/11	<5.0		ug/g	
			Acid Extractable Zinc (Zn)	2024/10/11	<5.0		ug/g	
			Acid Extractable Mercury (Hg)	2024/10/11	<0.050		ug/g	
9694349	JWK	RPD	Acid Extractable Antimony (Sb)	2024/10/12	NC		%	30
			Acid Extractable Arsenic (As)	2024/10/12	0.11		%	30
			Acid Extractable Barium (Ba)	2024/10/12	0.60		%	30
			Acid Extractable Beryllium (Be)	2024/10/12	5.4		%	30
			Acid Extractable Boron (B)	2024/10/12	2.6		%	30
			Acid Extractable Cadmium (Cd)	2024/10/12	NC		%	30
			Acid Extractable Chromium (Cr)	2024/10/12	2.3		%	30
			Acid Extractable Cobalt (Co)	2024/10/12	0.72		%	30
			Acid Extractable Copper (Cu)	2024/10/12	0.026		%	30
			Acid Extractable Lead (Pb)	2024/10/12	0.88		%	30
			Acid Extractable Molybdenum (Mo)	2024/10/12	NC		%	30

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Nickel (Ni)	2024/10/12	0.97		%	30
			Acid Extractable Selenium (Se)	2024/10/12	NC		%	30
			Acid Extractable Silver (Ag)	2024/10/12	NC		%	30
			Acid Extractable Thallium (Tl)	2024/10/12	13		%	30
			Acid Extractable Uranium (U)	2024/10/12	3.1		%	30
			Acid Extractable Vanadium (V)	2024/10/12	0.86		%	30
			Acid Extractable Zinc (Zn)	2024/10/12	2.4		%	30
			Acid Extractable Mercury (Hg)	2024/10/12	NC		%	30
9694750	ABS	Matrix Spike [AEZS77-01]	o-Terphenyl	2024/10/11		78	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/11		82	%	60 - 140
			F3 (C16-C34 Hydrocarbons)	2024/10/11		81	%	60 - 140
			F4 (C34-C50 Hydrocarbons)	2024/10/11		76	%	60 - 140
9694750	ABS	Spiked Blank	o-Terphenyl	2024/10/11		83	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/11		87	%	80 - 120
			F3 (C16-C34 Hydrocarbons)	2024/10/11		86	%	80 - 120
			F4 (C34-C50 Hydrocarbons)	2024/10/11		81	%	80 - 120
9694750	ABS	Method Blank	o-Terphenyl	2024/10/11		92	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/11	<7.0		ug/g	
			F3 (C16-C34 Hydrocarbons)	2024/10/11	<50		ug/g	
			F4 (C34-C50 Hydrocarbons)	2024/10/11	<50		ug/g	
9694750	ABS	RPD [AEZS77-01]	F2 (C10-C16 Hydrocarbons)	2024/10/15	NC		%	30
			F3 (C16-C34 Hydrocarbons)	2024/10/15	NC		%	30
			F4 (C34-C50 Hydrocarbons)	2024/10/15	NC		%	30

N/A = Not Applicable

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

QC Standard: A sample of known concentration prepared by an external agency under stringent conditions. Used as an independent check of method accuracy.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

Surrogate: A pure or isotopically labeled compound whose behavior mirrors the analytes of interest. Used to evaluate extraction efficiency.

NC (Matrix Spike): The recovery in the matrix spike was not calculated. The relative difference between the concentration in the parent sample and the spike amount was too small to permit a reliable recovery calculation (matrix spike concentration was less than the native sample concentration)

NC (Duplicate RPD): The duplicate RPD was not calculated. The concentration in the sample and/or duplicate was too low to permit a reliable RPD calculation (absolute difference <= 2x RDL).

(1) The recovery was above the upper control limit. This may represent a high bias in some results for this specific analyte. For results that were not detected (ND), this potential bias has no impact.

Bureau Veritas Job #: C4V3527
Report Date: 2024/10/15

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE
Your P.O. #: OTT2947
Sampler Initials: MS

VALIDATION SIGNATURE PAGE

The analytical data and all QC contained in this report were reviewed and validated by:

Cristina Carriere

Cristina Carriere, Senior Scientific Specialist

Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4V3527
Job Received: 2024/10/04
Final Report Due: 2024/10/11
Disposal Date: 2024/11/03

Invoice Information

Attn: Accounts Payable
SLR Consulting (Canada) Ltd.
#200 – 887 Great Northern Way
Vancouver, BC, V5T 4T5
Email to:
accountspayableca@slrconsulting.com
adang@slrconsulting.com

Report Information

Attn: Matt Williamson
SLR Consulting (Canada) Ltd.
201-100 Stone Rd. W.
Guelph, ON, N1G 5L3
Email to:
mwilliamson@slrconsulting.com

Project Information

Quote #:	C41044
PO/AFE#:	OTT2947
Project #:	OTT2947
Site Location:	SUNCOR 4000 RIVERSIDE DRIVE
Site #:	35197
Sampled By:	MS

Analytical Summary

A: Due On 2024/10/11

Lab ID	Client Sample ID	Sampling Date/Time	Matrix	# Cont.	O.Reg 153 PAHs (Soil)	O.Reg 153 VOCs by HS & F1-F4 (Soil)	Acid Extractable Metals by ICPMS	Conductivity	Glycols in Soil by GC-FID	Hexavalent Chromium in Soil by IC	Hot Water Extractable Boron	Moisture	pH CaCl2 EXTRACT	Sieve, 75um	Set Number
COC# C#1013277-01-01															
AEZS76	BH24-08_1-1.5M	2024/10/01 14:20	SOIL	5	A	A	A	A	A	A	A	A	A	A	1
AEZS77	BH24-09_2-2.45M	2024/10/01 15:30	SOIL	4	A	A	A	A	A	A	A	A	A		2
AEZS78	BH24-01_1-1.5M	2024/10/02 10:00	SOIL	4	A	A	A	A	A	A	A	A	A		2
AEZS79	BH24-07_2-2.45M	2024/10/02 10:50	SOIL	4	A	A	A	A	A	A	A	A	A		2
AEZS80	BH24-06_1.5-2M	2024/10/02 13:20	SOIL	4	A	A	A	A	A	A	A	A	A		2
AEZS81	BH24-05_1-1.5M	2024/10/02 14:40	SOIL	4	A	A	A	A	A	A	A	A	A		2
AEZS82	BH24-02_2-2.4M	2024/10/03 09:40	SOIL	4	A	A	A	A		A	A	A	A		3
AEZS83	BH24-04_0.5-1M	2024/10/03 11:30	SOIL	4	A	A	A	A		A	A	A	A		3
AEZS84	BH24-03_0.5-1M	2024/10/03 12:40	SOIL	4	A	A	A	A		A	A	A	A		3
AEZS85	BH24-02_0.5-1M	2024/10/03 10:10	SOIL	1										A	4

Confirmation of Sample Receipt

A: Due On 2024/10/11

Lab ID	Client Sample ID	Sampling Date/Time	Matrix	# Cont.	Sodium Adsorption Ratio (SAR)	Set Number
COC# C#1013277-01-01						
AEZS76	BH24-08_1-1.5M	2024/10/01 14:20	SOIL	5	A	1
AEZS77	BH24-09_2-2.45M	2024/10/01 15:30	SOIL	4	A	2
AEZS78	BH24-01_1-1.5M	2024/10/02 10:00	SOIL	4	A	2
AEZS79	BH24-07_2-2.45M	2024/10/02 10:50	SOIL	4	A	2
AEZS80	BH24-06_1.5-2M	2024/10/02 13:20	SOIL	4	A	2
AEZS81	BH24-05_1-1.5M	2024/10/02 14:40	SOIL	4	A	2
AEZS82	BH24-02_2-2.4M	2024/10/03 09:40	SOIL	4	A	3
AEZS83	BH24-04_0.5-1M	2024/10/03 11:30	SOIL	4	A	3
AEZS84	BH24-03_0.5-1M	2024/10/03 12:40	SOIL	4	A	3
AEZS85	BH24-02_0.5-1M	2024/10/03 10:10	SOIL	1		4

Include Criteria on CofA: No

Sample Inspection Observations & Comments

# of Samples Received: 10

Details: Sample(s) received in good condition.

Average Temperature: Package 1: 7.0 °C

Additional Notes

- Unless special storage arrangements are made, all samples will be disposed 30 days after receipt. Additional fees may be applied for extended storage.
- Additional fees may be applied for the disposal of hazardous samples.

The contents of this report are subject to change. For up to date information, please refer to the Customer Portal.

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4V3527
Job Received: 2024/10/04
Final Report Due: 2024/10/11
Disposal Date: 2024/11/03

Sample Set Listing

Set 1 (1 Sample)	Set 2 (5 Samples)	Set 3 (3 Samples)	Set 4 (1 Sample)
BH24-08_1-1.5M	BH24-09_2-2.45M BH24-01_1-1.5M BH24-07_2-2.45M BH24-06_1.5-2M BH24-05_1-1.5M	BH24-02_2-2.4M BH24-04_0.5-1M BH24-03_0.5-1M	BH24-02_0.5-1M

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2	Set 3	Set 4
O.Reg 153 PAHs (Soil)	Methylnaphthalene, 2-(1-)	0.014	ug/g	X	X	X	
	Acenaphthene	0.005	ug/g	X	X	X	
	Acenaphthylene	0.005	ug/g	X	X	X	
	Anthracene	0.005	ug/g	X	X	X	
	Benzo(a)anthracene	0.005	ug/g	X	X	X	
	Benzo(a)pyrene	0.005	ug/g	X	X	X	
	Benzo(b/j)fluoranthene	0.005	ug/g	X	X	X	
	Benzo(g,h,i)perylene	0.005	ug/g	X	X	X	
	Benzo(k)fluoranthene	0.005	ug/g	X	X	X	
	Chrysene	0.005	ug/g	X	X	X	
	Dibenzo(a,h)anthracene	0.005	ug/g	X	X	X	
	Fluoranthene	0.005	ug/g	X	X	X	
	Fluorene	0.005	ug/g	X	X	X	
	Indeno(1,2,3-cd)pyrene	0.005	ug/g	X	X	X	
	1-Methylnaphthalene	0.005	ug/g	X	X	X	
	2-Methylnaphthalene	0.005	ug/g	X	X	X	
	Naphthalene	0.005	ug/g	X	X	X	
	Phenanthrene	0.005	ug/g	X	X	X	
	Pyrene	0.005	ug/g	X	X	X	
O.Reg 153 VOCs by HS & F1-F4 (Soil)	1,3-Dichloropropene (cis+trans)	0.05	ug/g	X	X	X	
	F2 (C10-C16 Hydrocarbons)	7	ug/g	X	X	X	
	F3 (C16-C34 Hydrocarbons)	50	ug/g	X	X	X	
	F4 (C34-C50 Hydrocarbons)	50	ug/g	X	X	X	
	Reached Baseline at C50	N/A	ug/g	X	X	X	
	Acetone (2-Propanone)	0.49	ug/g	X	X	X	
	Benzene	0.006	ug/g	X	X	X	
	Bromodichloromethane	0.04	ug/g	X	X	X	
	Bromoform	0.04	ug/g	X	X	X	
	Bromomethane	0.04	ug/g	X	X	X	
	Carbon Tetrachloride	0.04	ug/g	X	X	X	
	Chlorobenzene	0.04	ug/g	X	X	X	
	Chloroform	0.04	ug/g	X	X	X	
	Dibromochloromethane	0.04	ug/g	X	X	X	

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2	Set 3	Set 4
O.Reg 153 VOCs by HS & F1-F4 (Soil)	1,2-Dichlorobenzene	0.04	ug/g	X	X	X	
	1,3-Dichlorobenzene	0.04	ug/g	X	X	X	
	1,4-Dichlorobenzene	0.04	ug/g	X	X	X	
	Dichlorodifluoromethane (FREON 12)	0.04	ug/g	X	X	X	
	1,1-Dichloroethane	0.04	ug/g	X	X	X	
	1,2-Dichloroethane	0.049	ug/g	X	X	X	
	1,1-Dichloroethylene	0.04	ug/g	X	X	X	
	cis-1,2-Dichloroethylene	0.04	ug/g	X	X	X	
	trans-1,2-Dichloroethylene	0.04	ug/g	X	X	X	
	1,2-Dichloropropane	0.04	ug/g	X	X	X	
	cis-1,3-Dichloropropene	0.03	ug/g	X	X	X	
	trans-1,3-Dichloropropene	0.04	ug/g	X	X	X	
	Ethylbenzene	0.01	ug/g	X	X	X	
	Ethylene Dibromide	0.04	ug/g	X	X	X	
	Hexane	0.04	ug/g	X	X	X	
	Methylene Chloride(Dichloromethane)	0.049	ug/g	X	X	X	
	Methyl Ethyl Ketone (2-Butanone)	0.4	ug/g	X	X	X	
	Methyl Isobutyl Ketone	0.4	ug/g	X	X	X	
	Methyl t-butyl ether (MTBE)	0.04	ug/g	X	X	X	
	Styrene	0.04	ug/g	X	X	X	
	1,1,1,2-Tetrachloroethane	0.04	ug/g	X	X	X	
	1,1,2,2-Tetrachloroethane	0.04	ug/g	X	X	X	
	Tetrachloroethylene	0.04	ug/g	X	X	X	
	Toluene	0.02	ug/g	X	X	X	
	1,1,1-Trichloroethane	0.04	ug/g	X	X	X	
	1,1,2-Trichloroethane	0.04	ug/g	X	X	X	
	Trichloroethylene	0.01	ug/g	X	X	X	
	Trichlorofluoromethane (FREON 11)	0.04	ug/g	X	X	X	
	Vinyl Chloride	0.019	ug/g	X	X	X	
	p+m-Xylene	0.02	ug/g	X	X	X	
	o-Xylene	0.02	ug/g	X	X	X	
	Total Xylenes	0.02	ug/g	X	X	X	
	F1 (C6-C10)	10	ug/g	X	X	X	
	F1 (C6-C10) - BTEX	10	ug/g	X	X	X	
	VOCPLUS Required?	N/A	ug/g	X	X	X	
Acid Extractable Metals by ICPMS	Acid Extractable Antimony (Sb)	0.2	ug/g	X	X	X	
	Acid Extractable Arsenic (As)	1	ug/g	X	X	X	
	Acid Extractable Barium (Ba)	0.5	ug/g	X	X	X	
	Acid Extractable Beryllium (Be)	0.2	ug/g	X	X	X	

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2	Set 3	Set 4
Acid Extractable Metals by ICPMS	Acid Extractable Boron (B)	5	ug/g	X	X	X	
	Acid Extractable Cadmium (Cd)	0.1	ug/g	X	X	X	
	Acid Extractable Chromium (Cr)	1	ug/g	X	X	X	
	Acid Extractable Cobalt (Co)	0.1	ug/g	X	X	X	
	Acid Extractable Copper (Cu)	0.5	ug/g	X	X	X	
	Acid Extractable Lead (Pb)	1	ug/g	X	X	X	
	Acid Extractable Molybdenum (Mo)	0.5	ug/g	X	X	X	
	Acid Extractable Nickel (Ni)	0.5	ug/g	X	X	X	
	Acid Extractable Selenium (Se)	0.5	ug/g	X	X	X	
	Acid Extractable Silver (Ag)	0.2	ug/g	X	X	X	
	Acid Extractable Thallium (Tl)	0.05	ug/g	X	X	X	
	Acid Extractable Uranium (U)	0.05	ug/g	X	X	X	
	Acid Extractable Vanadium (V)	5	ug/g	X	X	X	
	Acid Extractable Zinc (Zn)	5	ug/g	X	X	X	
	Acid Extractable Mercury (Hg)	0.05	ug/g	X	X	X	
Conductivity	Conductivity	0.002	mS/cm	X	X	X	
Glycols in Soil by GC-FID	Propylene Glycol	10	mg/kg	X	X		
	Ethylene Glycol	10	mg/kg	X	X		
	Diethylene Glycol	10	mg/kg	X	X		
	Total Glycol	10	mg/kg	X	X		
Hexavalent Chromium in Soil by IC	Chromium (VI)	0.18	ug/g	X	X	X	
Hot Water Extractable Boron	Hot Water Ext. Boron (B)	0.05	ug/g	X	X	X	
Moisture	Moisture	1	%	X	X	X	
pH CaCl2 EXTRACT	Available (CaCl2) pH	N/A	pH	X	X	X	
Sieve, 75um	Grain Size	N/A	%	X			X
	Sieve - #200 (<0.075mm)	1	%	X			X
	Sieve - #200 (>0.075mm)	1	%	X			X
Sodium Adsorption Ratio (SAR)	Sodium Adsorption Ratio	N/A	N/A	X	X	X	

**RDLs are subject to change based on interferences present at the time of analysis.*

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4V3527
Job Received: 2024/10/04
Final Report Due: 2024/10/11
Disposal Date: 2024/11/03

Cost Estimate

#	Description	Matrix	Quote #	Rate	Test Total
9	O.Reg 153 PAHs (Soil)	SOIL	C41044	$ 50.09	$ 450.81
9	O.Reg 153 VOCs by HS & F1-F4 (Soil)	SOIL	C41044	$ 94.52	$ 850.68
9	Acid Extractable Metals by ICPMS	SOIL	C41044	$ 27.83	$ 250.47
9	Conductivity	SOIL	C41044	$ 6.96	$ 62.64
6	Glycols in Soil by GC-FID	SOIL	C41044	$ 83.48	$ 500.88
9	Hexavalent Chromium in Soil by IC	SOIL	C41044	$ 17.53	$ 157.77
9	Hot Water Extractable Boron	SOIL	C41044	$ 15.86	$ 142.74
9	Moisture	SOIL	C41044	$ 2.00	$ 18.00
10	Non hazardous disposal/container supply	SOIL	C41044	$ 8.50	$ 85.00
9	pH CaCl2 EXTRACT	SOIL	C41044	$ 6.96	$ 62.64
9	SAR - ICP Metals	SOIL	C41044	$ 0.00	$ 0.00
2	Sieve, 75um	SOIL	C41044	$ 13.63	$ 27.26
9	Sodium Adsorption Ratio (SAR)	SOIL	C41044	$ 20.12	$ 181.08
				Total (excluding applicable taxes):	**$ 2,789.97**

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

C4V3527
2024/10/04 09:00

BUREAU VERITAS

Bureau Veritas
6740 Campobello Road, Mississauga, Ontario Canada L5N 2L8 Tel:(905) 817-5700 Toll-free:800-563-6266 Fax:(905) 817-5777 www.bvna.com

C

Page 1 of 1

NONT-2024-10-1472

Bottle Order #: 1013277

INVOICE TO:		REPORT TO:		PROJECT INFORMATION:	
Company Name:	#39437 SLR Consulting (Canada) Ltd.	Company Name:	SLR Consulting (Canada) Ltd.	Quotation #:	C41044
Attention:	Accounts Payable	Attention:	Matt Williamson	P.O. #:	OTT2947
Address:	#200 – 887 Great Northern Way	Address:	100 Stone Road West, Suite 201	Project:	OTT2947
	Vancouver BC V5T 4T5		Guelph, ON N1G 5L3	Project Name:	Suncor 4000 Riverside Drive
Tel:	(604) 738-2500 Fax: (604) 738-2542	Tel:	226-706-8080 Fax:	Site #:	35197
Email:	accountspayableca@slrconsulting.com;adang@slrcons	Email:	mwilliamson@slrconsulting.com	Sampled By:	MS/KJ

COC #: C#1013277-01-01

Project Manager: Keshani Vijh

MOE REGULATED DRINKING WATER OR WATER INTENDED FOR HUMAN CONSUMPTION MUST BE SUBMITTED ON THE BUREAU VERITAS DRINKING WATER CHAIN OF CUSTODY

Regulation 153 (2011)
☐ Table 1 ☐ Res/Park ☐ Medium/Fine
☐ Table 2 ☐ Ind/Comm ☒ Coarse
☒ Table 3 ☐ Agri/Other ☐ For RSC
☐ Table ___

Other Regulations
☐ CCME ☐ Sanitary Sewer Bylaw
☐ Reg 558 ☐ Storm Sewer Bylaw
☐ MISA Municipality ___
☐ PWQO ☐ Reg 406 Table ___
☐ Other ___

Special Instructions

Include Criteria on Certificate of Analysis (Y/N)? N

Field Filtered (please circle): Metals / Hg / Cr VI

ANALYSIS REQUESTED (PLEASE BE SPECIFIC)

Turnaround Time (TAT) Required:
Please provide advance notice for rush projects

Regular (Standard) TAT: ☒
(will be applied if Rush TAT is not specified):
Standard TAT = 5-7 Working days for most tests..
Please note: Standard TAT for certain tests such as BOD and Dioxins/Furans are > 5 days - contact your Project Manager for details.

Job Specific Rush TAT (if applies to entire submission)
Date Required: ___ Time Required: ___ ☐
Rush Confirmation Number: ___ *(call lab for #)*

	Sample Barcode Label	Sample (Location) Identification	Date Sampled	Time Sampled	Matrix	Field Filtered	VOCs	BTEX	F1-F4	PAHs	Metals/Inorganics (exclude CN-)	Glycols	Grain Size (75µm)	# of Bottles	Comments
1	N/A	BH24-08_1-1.5m	2024/10/01	14:20	Soil	No	X	X	X	X	X	X	X	5	
2		BH24-09_2-2.45m	2024/10/01	15:30										4	
3		BH24-01_1-1.5m	2024/10/02	10:00										4	
4		BH24-07_2-2.45m	2024/10/02	10:50										4	
5		BH24-06_1.5-2m	2024/10/02	13:20										4	
6		BH24-05_1-1.5m	2024/10/02	14:40										4	
7		BH24-02_2-2.45m	2024/10/03	9:40										4	
8		BH24-04_0.5-1m	2024/10/03	11:30										4	
9		BH24-03_0.5-1m	2024/10/03	12:40										4	
10		BH24-02_0.5-1m	2024/10/03	10:10									X	1	Shipped in Ottawa

* RELINQUISHED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	RECEIVED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	# jars used and not submitted
Melanie St Cyr Melanie St Cyr	24/10/03	18:00	Rebecca da Silva (ARC)	2024/10/04	09:00	
			SA SUGAR SARVISH	2024/10/05	08:40	

Laboratory Use Only
Time Sensitive
Temperature (°C) on Recei: 7/8/6 (ice)

Custody Seal	Yes	No
Present	✓	
Intact	✓	

* UNLESS OTHERWISE AGREED TO IN WRITING, WORK SUBMITTED ON THIS CHAIN OF CUSTODY IS SUBJECT TO BUREAU VERITAS'S STANDARD TERMS AND CONDITIONS. SIGNING OF THIS CHAIN OF CUSTODY DOCUMENT IS ACKNOWLEDGMENT AND ACCEPTANCE OF OUR TERMS WHICH ARE AVAILABLE FOR VIEWING AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/COC-TERMS-AND-CONDITIONS.
* IT IS THE RESPONSIBILITY OF THE RELINQUISHER TO ENSURE THE ACCURACY OF THE CHAIN OF CUSTODY RECORD. AN INCOMPLETE CHAIN OF CUSTODY MAY RESULT IN ANALYTICAL TAT DELAYS.
** SAMPLE CONTAINER, PRESERVATION, HOLD-TIME AND PACKAGE INFORMATION CAN BE VIEWED AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/CHAIN-CUSTODY-FORMS-COCS.

3/4/4

SAMPLES MUST BE KEPT COOL (< 10° C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BUREAU VERITAS

White: Bureau Veritas Yellow: Client

Custody Seal Present Intact
Sampling Media Yes No

Bureau Veritas Canada (2019) Inc.

Your P.O. #: OTT2947
Your Project #: OTT2947
Site#: 35197
Site Location: SUNCOR 400 RIVERSIDE DRIVE, OTTAWA
Your C.O.C. #: C#1013277-01-01

Attention: Matt Williamson

SLR Consulting (Canada) Ltd.
Suncor
#200 – 887 Great Northern Way
Vancouver, BC
CANADA V5T 4T5

Report Date: 2024/10/21
Report #: R8370203
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4W1825
Received: 2024/10/11, 13:52

Sample Matrix: Soil
Samples Received: 1

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Cyanide (WAD) in Leachates (1)	1	N/A	2024/10/18	CAM SOP-00457	OMOE 3015 m
Fluoride by ISE in Leachates (1)	1	2024/10/18	2024/10/18	CAM SOP-00449	SM 24 4500-F- C m
Total Metals in TCLP Leachate by ICPMS (1)	1	2024/10/17	2024/10/18	CAM SOP-00447	EPA 6020B m
Ignitability of a Sample (1)	1	2024/10/18	2024/10/18	CAM SOP-00432	EPA 1030 Rev. 1 m
Nitrate& Nitrite as Nitrogen in Leachate (1)	1	N/A	2024/10/18	CAM SOP-00440	SM 24 4500-NO3I/NO2B
TCLP - % Solids (1)	1	2024/10/16	2024/10/17	CAM SOP-00401	EPA 1311 Update I m
TCLP - Extraction Fluid (1)	1	N/A	2024/10/17	CAM SOP-00401	EPA 1311 Update I m
TCLP - Initial and final pH (1)	1	N/A	2024/10/17	CAM SOP-00401	EPA 1311 Update I m
TCLP Zero Headspace Extraction (1)	1	2024/10/17	2024/10/18	CAM SOP-00430	EPA 1311 m
VOCs in ZHE Leachates (1)	1	2024/10/18	2024/10/18	CAM SOP-00228	EPA 8260D

Remarks:

Bureau Veritas is accredited to ISO/IEC 17025 for specific parameters on scopes of accreditation. Unless otherwise noted, procedures used by Bureau Veritas are based upon recognized Provincial, Federal or US method compendia such as CCME, EPA, APHA or the Quebec Ministry of Environment.

All work recorded herein has been done in accordance with procedures and practices ordinarily exercised by professionals in Bureau Veritas' profession using accepted testing methodologies, quality assurance and quality control procedures (except where otherwise agreed by the client and Bureau Veritas in writing). All data is in statistical control and has met quality control and method performance criteria unless otherwise noted. All method blanks are reported; unless indicated otherwise, associated sample data are not blank corrected. Where applicable, unless otherwise noted, Measurement Uncertainty has not been accounted for when stating conformity to the referenced standard.

Bureau Veritas liability is limited to the actual cost of the requested analyses, unless otherwise agreed in writing. There is no other warranty expressed or implied. Bureau Veritas has been retained to provide analysis of samples provided by the Client using the testing methodology referenced in this report. Interpretation and use of test results are the sole responsibility of the Client and are not within the scope of services provided by Bureau Veritas, unless otherwise agreed in writing. Bureau Veritas is not responsible for the accuracy or any data impacts, that result from the information provided by the customer or their agent.

Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.
Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.

Reference Method suffix “m” indicates test methods incorporate validated modifications from specific reference methods to improve performance.
* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.
(1) This test was performed by Bureau Veritas Mississauga, 6740 Campobello Rd , Mississauga, ON, L5N 2L8

Your P.O. #: OTT2947
Your Project #: OTT2947
Site#: 35197
Site Location: SUNCOR 400 RIVERSIDE DRIVE, OTTAWA
Your C.O.C. #: C#1013277-01-01

Attention: Matt Williamson

SLR Consulting (Canada) Ltd.
Suncor
#200 – 887 Great Northern Way
Vancouver, BC
CANADA V5T 4T5

Report Date: 2024/10/21
Report #: R8370203
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4W1825
Received: 2024/10/11, 13:52

Encryption Key

Bureau Veritas
21 Oct 2024 15:35:59

Please direct all questions regarding this Certificate of Analysis to:
Keshani Vijh, Sr. Project Manager
Email: keshani.vijh@bureauveritas.com
Phone# (613) 274-0573

==========

This report has been generated and distributed using a secure automated process.
Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Bureau Veritas Job #: C4W1825
Report Date: 2024/10/21

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 400 RIVERSIDE DRIVE, OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

RESULTS OF ANALYSES OF SOIL

Bureau Veritas ID			AFSO24			
Sampling Date			2024/10/10 14:10			
COC Number			C#1013277-01-01			
	UNITS	**347**	**TCLP-10-10-2024**	**RDL**	**MDL**	**QC Batch**
Charge/Prep Analysis						
Amount Extracted (Wet Weight) (g)	N/A	-	25	N/A	N/A	9707512
Inorganics						
Final pH	pH	-	5.75			9706583
Leachable Fluoride (F-)	mg/L	**150**	<0.10	0.10	0.0060	9709092
Initial pH	pH	-	9.71			9706583
TCLP - % Solids	%	-	100	0.2	N/A	9704399
TCLP Extraction Fluid	N/A	-	FLUID 1			9706581
Leachable WAD Cyanide (Free)	mg/L	**20**	<0.010	0.010	0.0040	9709095
Leachable Nitrite (N)	mg/L	-	<0.10	0.10	0.020	9709096
Leachable Nitrate (N)	mg/L	-	<1.0	1.0	0.10	9709096
Leachable Nitrate + Nitrite (N)	mg/L	**1000**	<1.0	1.0	0.10	9709096

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
347: Ontario Reg. 347/90 Schedule 4 Leachate Quality Criteria (as amended by Reg 558/00)
N/A = Not Applicable

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 400 RIVERSIDE DRIVE, OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

Bureau Veritas ID			AFSO24			
Sampling Date			2024/10/10 14:10			
COC Number			C#1013277-01-01			
	UNITS	347	TCLP-10-10-2024	RDL	MDL	QC Batch
Metals						
Leachable Arsenic (As)	mg/L	**2.5**	<0.2	0.2	0.01	9708140
Leachable Barium (Ba)	mg/L	**100**	0.3	0.2	0.01	9708140
Leachable Boron (B)	mg/L	**500**	<0.1	0.1	0.02	9708140
Leachable Cadmium (Cd)	mg/L	**0.5**	<0.05	0.05	0.0007	9708140
Leachable Chromium (Cr)	mg/L	**5**	<0.1	0.1	0.01	9708140
Leachable Lead (Pb)	mg/L	**5**	<0.1	0.1	0.001	9708140
Leachable Mercury (Hg)	mg/L	**0.1**	<0.001	0.001	0.0005	9708140
Leachable Selenium (Se)	mg/L	**1**	<0.1	0.1	0.01	9708140
Leachable Silver (Ag)	mg/L	**5**	<0.01	0.01	0.001	9708140
Leachable Uranium (U)	mg/L	**10**	<0.01	0.01	0.001	9708140

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
347: Ontario Reg. 347/90 Schedule 4 Leachate Quality Criteria (as amended by Reg 558/00)

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 400 RIVERSIDE DRIVE, OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

VOLATILE ORGANICS BY GC/MS (SOIL)

Bureau Veritas ID			AFSO24			
Sampling Date			2024/10/10 14:10			
COC Number			C#1013277-01-01			
	UNITS	347	TCLP-10-10-2024	RDL	MDL	QC Batch
Volatile Organics						
Leachable Benzene	mg/L	**0.5**	<0.020	0.020	0.0020	9709538
Leachable Carbon Tetrachloride	mg/L	**0.5**	<0.020	0.020	0.0020	9709538
Leachable Chlorobenzene	mg/L	**8**	<0.020	0.020	0.0020	9709538
Leachable Chloroform	mg/L	**10**	<0.020	0.020	0.0020	9709538
Leachable 1,2-Dichlorobenzene	mg/L	**20**	<0.050	0.050	0.0040	9709538
Leachable 1,4-Dichlorobenzene	mg/L	**0.5**	<0.050	0.050	0.0040	9709538
Leachable 1,2-Dichloroethane	mg/L	**0.5**	<0.050	0.050	0.0040	9709538
Leachable 1,1-Dichloroethylene	mg/L	**1.4**	<0.020	0.020	0.0020	9709538
Leachable Methylene Chloride(Dichloromethane)	mg/L	**5**	<0.20	0.20	0.010	9709538
Leachable Methyl Ethyl Ketone (2-Butanone)	mg/L	**200**	<1.0	1.0	1.0	9709538
Leachable Tetrachloroethylene	mg/L	**3**	<0.020	0.020	0.0020	9709538
Leachable Trichloroethylene	mg/L	**5**	<0.020	0.020	0.0020	9709538
Leachable Vinyl Chloride	mg/L	**0.2**	<0.020	0.020	0.0040	9709538
Surrogate Recovery (%)						
Leachable 4-Bromofluorobenzene	%	-	104			9709538
Leachable D4-1,2-Dichloroethane	%	-	97			9709538
Leachable D8-Toluene	%	-	93			9709538

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
347: Ontario Reg. 347/90 Schedule 4 Leachate Quality Criteria (as amended by Reg 558/00)

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 400 RIVERSIDE DRIVE, OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

MISCELLANEOUS (SOIL)

Bureau Veritas ID		AFSO24		
Sampling Date		2024/10/10 14:10		
COC Number		C#1013277-01-01		
	UNITS	**TCLP-10-10-2024**	**MDL**	**QC Batch**
Inorganics				
Ignitability	N/A	NF/NI		9710147
QC Batch = Quality Control Batch				

GENERAL COMMENTS

Sample AFSO24 [TCLP-10-10-2024] : NF/NI=Non Flammable and Non Ignitable

Results relate only to the items tested.

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
9708140	PBA	Matrix Spike [AFSO24-02]	Leachable Arsenic (As)	2024/10/18		100	%	80 - 120
			Leachable Barium (Ba)	2024/10/18		94	%	80 - 120
			Leachable Boron (B)	2024/10/18		93	%	80 - 120
			Leachable Cadmium (Cd)	2024/10/18		98	%	80 - 120
			Leachable Chromium (Cr)	2024/10/18		100	%	80 - 120
			Leachable Lead (Pb)	2024/10/18		93	%	80 - 120
			Leachable Mercury (Hg)	2024/10/18		95	%	80 - 120
			Leachable Selenium (Se)	2024/10/18		98	%	80 - 120
			Leachable Silver (Ag)	2024/10/18		96	%	80 - 120
			Leachable Uranium (U)	2024/10/18		96	%	80 - 120
9708140	PBA	Leachate Blank	Leachable Arsenic (As)	2024/10/18	<0.2		mg/L	
			Leachable Barium (Ba)	2024/10/18	<0.2		mg/L	
			Leachable Boron (B)	2024/10/18	<0.1		mg/L	
			Leachable Cadmium (Cd)	2024/10/18	<0.05		mg/L	
			Leachable Chromium (Cr)	2024/10/18	<0.1		mg/L	
			Leachable Lead (Pb)	2024/10/18	<0.1		mg/L	
			Leachable Mercury (Hg)	2024/10/18	<0.001		mg/L	
			Leachable Selenium (Se)	2024/10/18	<0.1		mg/L	
			Leachable Silver (Ag)	2024/10/18	<0.01		mg/L	
			Leachable Uranium (U)	2024/10/18	<0.01		mg/L	
9708140	PBA	RPD	Leachable Arsenic (As)	2024/10/18	NC		%	35
			Leachable Barium (Ba)	2024/10/18	NC		%	35
			Leachable Boron (B)	2024/10/18	NC		%	35
			Leachable Cadmium (Cd)	2024/10/18	NC		%	35
			Leachable Chromium (Cr)	2024/10/18	NC		%	35
			Leachable Lead (Pb)	2024/10/18	NC		%	35
			Leachable Mercury (Hg)	2024/10/18	NC		%	35
			Leachable Selenium (Se)	2024/10/18	NC		%	35
			Leachable Silver (Ag)	2024/10/18	NC		%	35
			Leachable Uranium (U)	2024/10/18	NC		%	35
9708140	PBA	Spiked Blank	Leachable Arsenic (As)	2024/10/18		101	%	80 - 120
			Leachable Barium (Ba)	2024/10/18		96	%	80 - 120
			Leachable Boron (B)	2024/10/18		92	%	80 - 120
			Leachable Cadmium (Cd)	2024/10/18		98	%	80 - 120
			Leachable Chromium (Cr)	2024/10/18		101	%	80 - 120
			Leachable Lead (Pb)	2024/10/18		96	%	80 - 120
			Leachable Mercury (Hg)	2024/10/18		98	%	80 - 120
			Leachable Selenium (Se)	2024/10/18		100	%	80 - 120
			Leachable Silver (Ag)	2024/10/18		97	%	80 - 120
			Leachable Uranium (U)	2024/10/18		96	%	80 - 120
9708140	PBA	Method Blank	Leachable Arsenic (As)	2024/10/18	<0.2		mg/L	
			Leachable Barium (Ba)	2024/10/18	<0.2		mg/L	
			Leachable Boron (B)	2024/10/18	<0.1		mg/L	
			Leachable Cadmium (Cd)	2024/10/18	<0.05		mg/L	
			Leachable Chromium (Cr)	2024/10/18	<0.1		mg/L	
			Leachable Lead (Pb)	2024/10/18	<0.1		mg/L	
			Leachable Mercury (Hg)	2024/10/18	<0.001		mg/L	
			Leachable Selenium (Se)	2024/10/18	<0.1		mg/L	
			Leachable Silver (Ag)	2024/10/18	<0.01		mg/L	
			Leachable Uranium (U)	2024/10/18	<0.01		mg/L	
9708140	PBA	RPD [AFSO24-02]	Leachable Arsenic (As)	2024/10/18	NC		%	35
			Leachable Barium (Ba)	2024/10/18	3.4		%	35

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Leachable Boron (B)	2024/10/18	NC		%	35
			Leachable Cadmium (Cd)	2024/10/18	NC		%	35
			Leachable Chromium (Cr)	2024/10/18	NC		%	35
			Leachable Lead (Pb)	2024/10/18	NC		%	35
			Leachable Mercury (Hg)	2024/10/18	NC		%	35
			Leachable Selenium (Se)	2024/10/18	NC		%	35
			Leachable Silver (Ag)	2024/10/18	NC		%	35
			Leachable Uranium (U)	2024/10/18	NC		%	35
9709092	NGI	Matrix Spike [AFSO24-02]	Leachable Fluoride (F-)	2024/10/18		99	%	80 - 120
9709092	NGI	Leachate Blank	Leachable Fluoride (F-)	2024/10/18	<0.10		mg/L	
9709092	NGI	Spiked Blank	Leachable Fluoride (F-)	2024/10/18		101	%	80 - 120
9709092	NGI	Method Blank	Leachable Fluoride (F-)	2024/10/18	<0.10		mg/L	
9709092	NGI	RPD [AFSO24-02]	Leachable Fluoride (F-)	2024/10/18	NC		%	25
9709095	GYA	Matrix Spike [AFSO24-02]	Leachable WAD Cyanide (Free)	2024/10/18		96	%	80 - 120
9709095	GYA	Leachate Blank	Leachable WAD Cyanide (Free)	2024/10/18	<0.010		mg/L	
9709095	GYA	Spiked Blank	Leachable WAD Cyanide (Free)	2024/10/18		101	%	80 - 120
9709095	GYA	Method Blank	Leachable WAD Cyanide (Free)	2024/10/18	<0.0020		mg/L	
9709095	GYA	RPD [AFSO24-02]	Leachable WAD Cyanide (Free)	2024/10/18	NC		%	20
9709096	C_N	Matrix Spike [AFSO24-02]	Leachable Nitrite (N)	2024/10/18		104	%	80 - 120
			Leachable Nitrate (N)	2024/10/18		82	%	80 - 120
			Leachable Nitrate + Nitrite (N)	2024/10/18		87	%	80 - 120
9709096	C_N	Leachate Blank	Leachable Nitrite (N)	2024/10/18	<0.10		mg/L	
			Leachable Nitrate (N)	2024/10/18	<1.0		mg/L	
			Leachable Nitrate + Nitrite (N)	2024/10/18	<1.0		mg/L	
9709096	C_N	Spiked Blank	Leachable Nitrite (N)	2024/10/18		108	%	80 - 120
			Leachable Nitrate (N)	2024/10/18		88	%	80 - 120
			Leachable Nitrate + Nitrite (N)	2024/10/18		92	%	80 - 120
9709096	C_N	Method Blank	Leachable Nitrite (N)	2024/10/18	<0.10		mg/L	
			Leachable Nitrate (N)	2024/10/18	<1.0		mg/L	
			Leachable Nitrate + Nitrite (N)	2024/10/18	<1.0		mg/L	
9709096	C_N	RPD [AFSO24-02]	Leachable Nitrite (N)	2024/10/18	NC		%	20
			Leachable Nitrate (N)	2024/10/18	NC		%	20
			Leachable Nitrate + Nitrite (N)	2024/10/18	NC		%	20
9709538	MBV	Matrix Spike	Leachable 4-Bromofluorobenzene	2024/10/18		102	%	70 - 130
			Leachable D4-1,2-Dichloroethane	2024/10/18		96	%	70 - 130
			Leachable D8-Toluene	2024/10/18		102	%	70 - 130
			Leachable Benzene	2024/10/18		96	%	70 - 130
			Leachable Carbon Tetrachloride	2024/10/18		99	%	70 - 130
			Leachable Chlorobenzene	2024/10/18		87	%	70 - 130
			Leachable Chloroform	2024/10/18		94	%	70 - 130
			Leachable 1,2-Dichlorobenzene	2024/10/18		94	%	70 - 130
			Leachable 1,4-Dichlorobenzene	2024/10/18		96	%	70 - 130
			Leachable 1,2-Dichloroethane	2024/10/18		89	%	70 - 130
			Leachable 1,1-Dichloroethylene	2024/10/18		96	%	70 - 130
			Leachable Methylene Chloride(Dichloromethan	2024/10/18		91	%	70 - 130
			Leachable Methyl Ethyl Ketone (2-Butanone)	2024/10/18		94	%	60 - 140
			Leachable Tetrachloroethylene	2024/10/18		95	%	70 - 130
			Leachable Trichloroethylene	2024/10/18		97	%	70 - 130
			Leachable Vinyl Chloride	2024/10/18		91	%	70 - 130
9709538	MBV	Spiked Blank	Leachable 4-Bromofluorobenzene	2024/10/18		103	%	70 - 130
			Leachable D4-1,2-Dichloroethane	2024/10/18		100	%	70 - 130
			Leachable D8-Toluene	2024/10/18		100	%	70 - 130

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Leachable Benzene	2024/10/18		100	%	70 - 130
			Leachable Carbon Tetrachloride	2024/10/18		101	%	70 - 130
			Leachable Chlorobenzene	2024/10/18		88	%	70 - 130
			Leachable Chloroform	2024/10/18		98	%	70 - 130
			Leachable 1,2-Dichlorobenzene	2024/10/18		95	%	70 - 130
			Leachable 1,4-Dichlorobenzene	2024/10/18		97	%	70 - 130
			Leachable 1,2-Dichloroethane	2024/10/18		96	%	70 - 130
			Leachable 1,1-Dichloroethylene	2024/10/18		98	%	70 - 130
			Leachable Methylene Chloride(Dichloromethan	2024/10/18		97	%	70 - 130
			Leachable Methyl Ethyl Ketone (2-Butanone)	2024/10/18		101	%	60 - 140
			Leachable Tetrachloroethylene	2024/10/18		94	%	70 - 130
			Leachable Trichloroethylene	2024/10/18		101	%	70 - 130
			Leachable Vinyl Chloride	2024/10/18		93	%	70 - 130
9709538	MBV	Method Blank	Leachable 4-Bromofluorobenzene	2024/10/18		103	%	70 - 130
			Leachable D4-1,2-Dichloroethane	2024/10/18		98	%	70 - 130
			Leachable D8-Toluene	2024/10/18		95	%	70 - 130
			Leachable Benzene	2024/10/18	<0.020		mg/L	
			Leachable Carbon Tetrachloride	2024/10/18	<0.020		mg/L	
			Leachable Chlorobenzene	2024/10/18	<0.020		mg/L	
			Leachable Chloroform	2024/10/18	<0.020		mg/L	
			Leachable 1,2-Dichlorobenzene	2024/10/18	<0.050		mg/L	
			Leachable 1,4-Dichlorobenzene	2024/10/18	<0.050		mg/L	
			Leachable 1,2-Dichloroethane	2024/10/18	<0.050		mg/L	
			Leachable 1,1-Dichloroethylene	2024/10/18	<0.020		mg/L	
			Leachable Methylene Chloride(Dichloromethan	2024/10/18	<0.20		mg/L	
			Leachable Methyl Ethyl Ketone (2-Butanone)	2024/10/18	<1.0		mg/L	
			Leachable Tetrachloroethylene	2024/10/18	<0.020		mg/L	
			Leachable Trichloroethylene	2024/10/18	<0.020		mg/L	
			Leachable Vinyl Chloride	2024/10/18	<0.020		mg/L	
9709538	MBV	RPD	Leachable Benzene	2024/10/18	NC		%	30
			Leachable Carbon Tetrachloride	2024/10/18	NC		%	30
			Leachable Chlorobenzene	2024/10/18	NC		%	30
			Leachable Chloroform	2024/10/18	NC		%	30
			Leachable 1,2-Dichlorobenzene	2024/10/18	NC		%	30
			Leachable 1,4-Dichlorobenzene	2024/10/18	NC		%	30
			Leachable 1,2-Dichloroethane	2024/10/18	NC		%	30
			Leachable 1,1-Dichloroethylene	2024/10/18	NC		%	30
			Leachable Methylene Chloride(Dichloromethan	2024/10/18	NC		%	30
			Leachable Methyl Ethyl Ketone (2-Butanone)	2024/10/18	NC		%	30
			Leachable Tetrachloroethylene	2024/10/18	NC		%	30
			Leachable Trichloroethylene	2024/10/18	NC		%	30

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Leachable Vinyl Chloride	2024/10/18	NC		%	30

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

Leachate Blank: A blank matrix containing all reagents used in the leaching procedure. Used to determine any process contamination.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

Surrogate: A pure or isotopically labeled compound whose behavior mirrors the analytes of interest. Used to evaluate extraction efficiency.

NC (Duplicate RPD): The duplicate RPD was not calculated. The concentration in the sample and/or duplicate was too low to permit a reliable RPD calculation (absolute difference <= 2x RDL).

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

VALIDATION SIGNATURE PAGE

The analytical data and all QC contained in this report were reviewed and validated by:

Louise Harding, Scientific Specialist

Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4W1825
Job Received: 2024/10/11
Final Report Due: 2024/10/21
Disposal Date: 2024/11/10

Invoice Information

Attn: Accounts Payable
SLR Consulting (Canada) Ltd.
#200 – 887 Great Northern Way
Vancouver, BC, V5T 4T5
Email to:
accountspayableca@slrconsulting.com
adang@slrconsulting.com

Report Information

Attn: Matt Williamson
SLR Consulting (Canada) Ltd.
#200 – 887 Great Northern Way
Vancouver, BC, V5T 4T5
Email to:
mwilliamson@slrconsulting.com

Project Information

Quote #:	C41044
PO/AFE#:	OTT2947
Project #:	OTT2947
Site Location:	SUNCOR 400 RIVERSIDE DRIVE, OTTAWA
Site #:	35197
Sampled By:	MS

Analytical Summary

A: Due On 2024/10/21

Lab ID	Client Sample ID	Sampling Date/Time	Matrix	# Cont.	O.Reg 558 TCLP Inorganics Package	O.Reg 558 TCLP VOCs by HS	TCLP Leachate Preparation	Ignitability of a Sample
COC# C#1013277-01-01								
AFSO24	TCLP-10-10-2024	2024/10/10 14:10	SOIL	3	A	A	A	A

Include Criteria on CofA: Yes Criteria : Regulation 558/00

Sample Inspection Observations & Comments

# of Samples Received: 1

Details: Sample(s) received in good condition.

Average Temperature: Package 1: 6.7 °C
Package 2: 9.3 °C

Additional Notes

- Unless special storage arrangements are made, all samples will be disposed 30 days after receipt. Additional fees may be applied for extended storage.
- Additional fees may be applied for the disposal of hazardous samples.

The contents of this report are subject to change. For up to date information, please refer to the Customer Portal.

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Parameter Summary

Package/Test	Parameter	RDL *	Unit	Samples
O.Reg 558 TCLP Inorganics Package	Leachable WAD Cyanide (Free)	0.002	mg/L	All
	Leachable Fluoride (F-)	0.1	mg/L	All
	Leachable Nitrite (N)	0.1	mg/L	All
	Leachable Nitrate (N)	1	mg/L	All
	Leachable Nitrate + Nitrite (N)	1	mg/L	All
	Leachable Arsenic (As)	0.2	mg/L	All
	Leachable Barium (Ba)	0.2	mg/L	All
	Leachable Boron (B)	0.1	mg/L	All
	Leachable Cadmium (Cd)	0.05	mg/L	All
	Leachable Chromium (Cr)	0.1	mg/L	All
	Leachable Lead (Pb)	0.1	mg/L	All
	Leachable Mercury (Hg)	0.001	mg/L	All
	Leachable Selenium (Se)	0.1	mg/L	All
	Leachable Silver (Ag)	0.01	mg/L	All
	Leachable Uranium (U)	0.01	mg/L	All
O.Reg 558 TCLP VOCs by HS	Amount Extracted (Wet Weight) (g)	N/A	N/A	All
	Leachable Benzene	0.02	mg/L	All
	Leachable Carbon Tetrachloride	0.02	mg/L	All
	Leachable Chlorobenzene	0.02	mg/L	All
	Leachable Chloroform	0.02	mg/L	All
	Leachable 1,2-Dichlorobenzene	0.05	mg/L	All
	Leachable 1,4-Dichlorobenzene	0.05	mg/L	All
	Leachable 1,2-Dichloroethane	0.05	mg/L	All
	Leachable 1,1-Dichloroethylene	0.02	mg/L	All
	Leachable Methylene Chloride(Dichloromethane)	0.2	mg/L	All
	Leachable Methyl Ethyl Ketone (2-Butanone)	1	mg/L	All
	Leachable Tetrachloroethylene	0.02	mg/L	All
	Leachable Trichloroethylene	0.02	mg/L	All
	Leachable Vinyl Chloride	0.02	mg/L	All
TCLP Leachate Preparation	TCLP - % Solids	0.2	%	All
	TCLP Extraction Fluid	N/A	N/A	All
	Final pH	N/A	pH	All
	Initial pH	N/A	pH	All
Ignitability of a Sample	Ignitability	N/A	N/A	All

**RDLs are subject to change based on interferences present at the time of analysis.*

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

C4W1825
2024/10/11 13:52

Bureau Veritas
6740 Campobello Road, Mississauga, Ontario Canada L5N 2L8 Tel:(905) 817-5700 Toll-free:800-563-6266 Fax:(905) 817-5777 www.bvna.com

Received in Ottawa

CHAIN OF CUSTODY RECORD

INVOICE TO:		REPORT TO:		PROJECT INFORMATION:		Laboratory Use Only:	
Company Name:	#39437 SLR Consulting (Canada) Ltd.	Company Name:	SLR Consulting (Canada) Ltd.	Quotation #:	C41044	Bureau Veritas Job #:	Bottle Order #: 1013277
Attention:	Accounts Payable	Attention:	Matt Williamson	P.O. #:	OTT2947		
Address:	#200 – 887 Great Northern Way Vancouver BC V5T 4T5	Address:	200 Stone Road West, Suite 201 Guelph ON N1G 5L3	Project:	OTT2947	COC #:	Project Manager:
Tel:	(604) 738-2500 Fax: (604) 738-2542	Tel:	226-206-8080 Fax:	Project Name:	Suncor 4000 Riverside Dr Ottawa	C#1013277-01-01	Keshani Vijh
Email:	accountspayableca@slrconsulting.com;adang@slrcons	Email:	mwilliamson@slrconsulting.com	Site #:	35197		
				Sampled By:	MS		

MOE REGULATED DRINKING WATER OR WATER INTENDED FOR HUMAN CONSUMPTION MUST BE SUBMITTED ON THE BUREAU VERITAS DRINKING WATER CHAIN OF CUSTODY

Regulation 153 (2011)
- ☐ Table 1 ☐ Res/Park ☐ Medium/Fine
- ☐ Table 2 ☐ Ind/Comm ☐ Coarse
- ☐ Table 3 ☐ Agri/Other ☐ For RSC
- ☐ Table ___

Other Regulations
- ☐ CCME ☐ Sanitary Sewer Bylaw
- ☐ Reg 558 ☐ Storm Sewer Bylaw
- ☐ MISA Municipality ___
- ☐ PWQO ☐ Reg 406 Table ___
- ☒ Other Reg 558

Special Instructions

Include Criteria on Certificate of Analysis (Y/N)? ___

ANALYSIS REQUESTED (PLEASE BE SPECIFIC)

	Sample Barcode Label	Sample (Location) Identification	Date Sampled	Time Sampled	Matrix	Field Filtered (please circle): Metals / Hg / Cr VI	TCLP-VOCs	TCLP-Metals/Inorganic	TCLP-Ignitability	# of Bottles	Comments
1		TCLP-10-10-2024	2024/10/10	14:10	Soil	No	X	X	X	3	
2											
3											
4											
5											
6											
7											
8											
9											
10											

Turnaround Time (TAT) Required:
Please provide advance notice for rush projects

Regular (Standard) TAT: ☒
(will be applied if Rush TAT is not specified):
Standard TAT = 5-7 Working days for most tests.
Please note: Standard TAT for certain tests such as BOD and Dioxins/Furans are > 5 days - contact your Project Manager for details.

Job Specific Rush TAT (if applies to entire submission)
Date Required: ___ Time Required: ___ ☐
Rush Confirmation Number: ___ *(call lab for #)*

NONT-2024-10-3564

* RELINQUISHED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	RECEIVED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	# jars used and not submitted
Melanie Stacy	24/10/11	12:15	[illegible]	2024/10/11	13:52	
			[illegible]	2024/10/12	09:02	

Laboratory Use Only				
Time Sensitive	Temperature (°C) on Recei	Custody Seal Present	Yes	No
	AMB	Intact		

* UNLESS OTHERWISE AGREED TO IN WRITING, WORK SUBMITTED ON THIS CHAIN OF CUSTODY IS SUBJECT TO BUREAU VERITAS'S STANDARD TERMS AND CONDITIONS. SIGNING OF THIS CHAIN OF CUSTODY DOCUMENT IS ACKNOWLEDGMENT AND ACCEPTANCE OF OUR TERMS WHICH ARE AVAILABLE FOR VIEWING AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/COC-TERMS-AND-CONDITIONS.

* IT IS THE RESPONSIBILITY OF THE RELINQUISHER TO ENSURE THE ACCURACY OF THE CHAIN OF CUSTODY RECORD. AN INCOMPLETE CHAIN OF CUSTODY MAY RESULT IN ANALYTICAL TAT DELAYS.

** SAMPLE CONTAINER, PRESERVATION, HOLD TIME AND PACKAGE INFORMATION CAN BE VIEWED AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/CHAIN-CUSTODY-FORMS-COCS.

SAMPLES MUST BE KEPT COOL (< 10° C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BUREAU VERITAS

White: Bureau Veritas Yellow: Client 5/0/1 3/4/7

Bureau Veritas Canada (2019) Inc.

Your P.O. #: OTT2947
Your Project #: OTT2947
Site#: 35197
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your C.O.C. #: C#1013277-01-01

Attention: Matt Williamson

SLR Consulting (Canada) Ltd.
201-100 Stone Rd. W.
Guelph, ON
Canada N1G 5L3

Report Date: 2024/10/22
Report #: R8371886
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4W1831
Received: 2024/10/11, 13:52

Sample Matrix: Soil
Samples Received: 18

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Methylnaphthalene Sum (1)	3	N/A	2024/10/22	CAM SOP-00301	EPA 8270D m
Hot Water Extractable Boron (1)	4	2024/10/17	2024/10/18	CAM SOP-00408	R153 Ana. Prot. 2011
Conductivity (1)	4	2024/10/18	2024/10/18	CAM SOP-00414	OMOE E3530 v1 m
Hexavalent Chromium in Soil by IC (1, 2)	4	2024/10/18	2024/10/18	CAM SOP-00436	EPA 3060A/7199 m
Petroleum Hydro. CCME F1 & BTEX in Soil (1, 3)	14	N/A	2024/10/17	CAM SOP-00315	CCME PHC-CWS m
Petroleum Hydro. CCME F1 & BTEX in Soil (1, 3)	2	N/A	2024/10/18	CAM SOP-00315	CCME PHC-CWS m
Petroleum Hydrocarbons F2-F4 in Soil (1, 4)	16	2024/10/18	2024/10/22	CAM SOP-00316	CCME CWS m
Glycols in Soil by GC-FID (1)	2	N/A	2024/10/17	CAM SOP-00322	EPA 8015 m
Acid Extractable Metals by ICPMS (1)	4	2024/10/18	2024/10/18	CAM SOP-00447	EPA 6020B m
Moisture (1)	16	N/A	2024/10/15	CAM SOP-00445	Carter 2nd ed 70.2 m
PAH Compounds in Soil by GC/MS (SIM) (1)	1	2024/10/21	2024/10/21	CAM SOP-00318	EPA 8270E
PAH Compounds in Soil by GC/MS (SIM) (1)	2	2024/10/21	2024/10/22	CAM SOP-00318	EPA 8270E
pH CaCl2 EXTRACT (1)	4	2024/10/17	2024/10/17	CAM SOP-00413	EPA 9045 D m
Sieve, 75um (1)	3	N/A	2024/10/18	CAM SOP-00467	ASTM D1140 -17 m
Sodium Adsorption Ratio (SAR) (1)	4	N/A	2024/10/19	CAM SOP-00102	EPA 6010C

Remarks:

Bureau Veritas is accredited to ISO/IEC 17025 for specific parameters on scopes of accreditation. Unless otherwise noted, procedures used by Bureau Veritas are based upon recognized Provincial, Federal or US method compendia such as CCME, EPA, APHA or the Quebec Ministry of Environment.

All work recorded herein has been done in accordance with procedures and practices ordinarily exercised by professionals in Bureau Veritas' profession using accepted testing methodologies, quality assurance and quality control procedures (except where otherwise agreed by the client and Bureau Veritas in writing). All data is in statistical control and has met quality control and method performance criteria unless otherwise noted. All method blanks are reported; unless indicated otherwise, associated sample data are not blank corrected. Where applicable, unless otherwise noted, Measurement Uncertainty has not been accounted for when stating conformity to the referenced standard.

Bureau Veritas liability is limited to the actual cost of the requested analyses, unless otherwise agreed in writing. There is no other warranty expressed or implied. Bureau Veritas has been retained to provide analysis of samples provided by the Client using the testing methodology referenced in this report. Interpretation and use of test results are the sole responsibility of the Client and are not within the scope of services provided by Bureau Veritas, unless otherwise agreed in writing. Bureau Veritas is not responsible for the accuracy or any data impacts, that result from the information provided by the customer or their agent.

Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.

Your P.O. #: OTT2947
Your Project #: OTT2947
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Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
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Report Date: 2024/10/22
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CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4W1831

Received: 2024/10/11, 13:52

Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.
This Certificate shall not be reproduced except in full, without the written approval of the laboratory.

Reference Method suffix "m" indicates test methods incorporate validated modifications from specific reference methods to improve performance.

* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.

(1) This test was performed by Bureau Veritas Mississauga, 6740 Campobello Rd , Mississauga, ON, L5N 2L8
(2) Soils are reported on a dry weight basis unless otherwise specified.
(3) No lab extraction date is given for F1BTEX & VOC samples that are field preserved with methanol. Extraction date is the date sampled unless otherwise stated.
(4) All CCME PHC results met required criteria unless otherwise stated in the report. The CWS PHC methods employed by Bureau Veritas conform to all prescribed elements of the reference method and performance based elements have been validated. All modifications have been validated and proven equivalent following "Alberta Environment's Interpretation of the Reference Method for the Canada-Wide Standard for Petroleum Hydrocarbons in Soil Validation of Performance-Based Alternative Methods September 2003". Documentation is available upon request. Modifications from Reference Method for the Canada-wide Standard for Petroleum Hydrocarbons in Soil-Tier 1 Method: F2/F3/F4 data reported using validated cold solvent extraction instead of Soxhlet extraction.

Encryption Key

Bureau Veritas
22 Oct 2024 15:06:14

Please direct all questions regarding this Certificate of Analysis to:
Keshani Vijh, Sr. Project Manager
Email: keshani.vijh@bureauveritas.com
Phone# (613) 274-0573

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This report has been generated and distributed using a secure automated process.
Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Bureau Veritas Job #: C4W1831
Report Date: 2024/10/22

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

RESULTS OF ANALYSES OF SOIL

Bureau Veritas ID		AFSP09	AFSP10	AFSP11	AFSP12			
Sampling Date		2024/10/09 15:45	2024/10/10 12:30	2024/10/08 16:20	2024/10/10 09:20			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-01_6.09-6.7	BH24-02_4.57-5.02	BH24-03_6.09-6.7	BH24-04_3.04-3.65	RDL	MDL	QC Batch
Inorganics								
Moisture	%	21	18	6.5	17	1.0	0.50	9702319

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AFSP13				AFSP15	AFSP16			
Sampling Date		2024/10/10 09:40				2024/10/07 15:40	2024/10/08 16:20			
COC Number		C#1013277-01-01				C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-04_6.09-6.70	RDL	MDL	QC Batch	BH24-05_6.09-6.70	BH24-06_8.38-9.0	RDL	MDL	QC Batch
Calculated Parameters										
Sodium Adsorption Ratio	N/A	0.46 (1)			9700452					
Inorganics										
Conductivity	mS/cm	0.075	0.002	0.0005	9710924					
Moisture	%	18	1.0	0.50	9702319	23	20	1.0	0.50	9702319
Available (CaCl2) pH	pH	8.01			9708125					

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
(1) Sodium was not detected. To report SAR the sodium detection limit was used in the calculation. This value represents a maximum ratio.

Bureau Veritas Job #: C4W1831
Report Date: 2024/10/22

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

RESULTS OF ANALYSES OF SOIL

Bureau Veritas ID		AFSP17				AFSP18	AFSP19			
Sampling Date		2024/10/08 10:45				2024/10/08 11:18	2024/10/08 12:30			
COC Number		C#1013277-01-01				C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-06_9.14-9.75	RDL	MDL	QC Batch	BH24-06_11.43-12.04	BH24-06_16-16.61	RDL	MDL	QC Batch
Inorganics										
Moisture	%					14	23	1.0	0.50	9702319
Miscellaneous Parameters										
Grain Size	%	COARSE	N/A	N/A	9708149					
Sieve - #200 (<0.075mm)	%	7	1	N/A	9708149					
Sieve - #200 (>0.075mm)	%	93	1	N/A	9708149					

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

Bureau Veritas ID		AFSP20				AFSP21			
Sampling Date		2024/10/08 12:50				2024/10/10 13:56			
COC Number		C#1013277-01-01				C#1013277-01-01			
	UNITS	BH24-06_16.76-17.38	RDL	MDL	QC Batch	BH24-07_6.09-6.70	RDL	MDL	QC Batch
Calculated Parameters									
Sodium Adsorption Ratio	N/A					2.6			9700452
Inorganics									
Conductivity	mS/cm					0.33	0.002	0.0005	9710924
Moisture	%					22	1.0	0.50	9702319
Available (CaCl2) pH	pH					7.95			9708125
Miscellaneous Parameters									
Grain Size	%	COARSE	N/A	N/A	9708149	COARSE	N/A	N/A	9708149
Sieve - #200 (<0.075mm)	%	10	1	N/A	9708149	6	1	N/A	9708149
Sieve - #200 (>0.075mm)	%	90	1	N/A	9708149	94	1	N/A	9708149

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

Bureau Veritas Job #: C4W1831
Report Date: 2024/10/22

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

RESULTS OF ANALYSES OF SOIL

Bureau Veritas ID		AFSP22		AFSP24			
Sampling Date		2024/10/09 10:00		2024/10/09 11:10			
COC Number		C#1013277-01-01		C#1013277-01-01			
	UNITS	BH24-08_6.09-6.70	QC Batch	BH24-08_11.43-12.04	RDL	MDL	QC Batch
Inorganics							
Moisture	%	22	9702319	16	1.0	0.50	9701926

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AFSP25				AFSP26	AFSP27			
Sampling Date		2024/10/09 12:50				2024/10/10 11:15	2024/10/08			
COC Number		C#1013277-01-01				C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_16.76-17.37	RDL	MDL	QC Batch	BH24-09_6.85-7.45	DUP-1	RDL	MDL	QC Batch
Calculated Parameters										
Sodium Adsorption Ratio	N/A	5.1			9700452					
Inorganics										
Conductivity	mS/cm	0.20	0.002	0.0005	9710924					
Moisture	%	21	1.0	0.50	9702319	20	21	1.0	0.50	9702319
Available (CaCl2) pH	pH	7.90			9708125					

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AFSP28			
Sampling Date		2024/10/09			
COC Number		C#1013277-01-01			
	UNITS	DUP-2	RDL	MDL	QC Batch
Calculated Parameters					
Sodium Adsorption Ratio	N/A	5.0			9700452
Inorganics					
Conductivity	mS/cm	0.19	0.002	0.0005	9710924
Moisture	%	19	1.0	0.50	9702632
Available (CaCl2) pH	pH	7.84			9708125

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

GLYCOLS BY GC-FID (SOIL)

Bureau Veritas ID		AFSP25	AFSP28			
Sampling Date		2024/10/09 12:50	2024/10/09			
COC Number		C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_16.76-17.37	DUP-2	RDL	MDL	QC Batch
Glycols						
Propylene Glycol	mg/kg	<10	<10	10	2	9706526
Ethylene Glycol	mg/kg	<10	<10	10	2	9706526
Diethylene Glycol	mg/kg	<10	<10	10	2	9706526
Total Glycol	mg/kg	<10	<10	10	2	9706526

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

Bureau Veritas ID		AFSP13	AFSP21	AFSP25			
Sampling Date		2024/10/10 09:40	2024/10/10 13:56	2024/10/09 12:50			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-04_6.09-6.70	BH24-07_6.09-6.70	BH24-08_16.76-17.37	RDL	MDL	QC Batch
Inorganics							
Chromium (VI)	ug/g	<0.18	<0.18	<0.18	0.18	0.050	9709692
Metals							
Hot Water Ext. Boron (B)	ug/g	<0.050	0.054	0.051	0.050	0.030	9707305
Acid Extractable Antimony (Sb)	ug/g	<0.20	<0.20	<0.20	0.20	0.10	9709502
Acid Extractable Arsenic (As)	ug/g	<1.0	<1.0	<1.0	1.0	0.10	9709502
Acid Extractable Barium (Ba)	ug/g	17	15	36	0.50	0.30	9709502
Acid Extractable Beryllium (Be)	ug/g	<0.20	<0.20	<0.20	0.20	0.020	9709502
Acid Extractable Boron (B)	ug/g	<5.0	<5.0	<5.0	5.0	1.0	9709502
Acid Extractable Cadmium (Cd)	ug/g	<0.10	<0.10	<0.10	0.10	0.030	9709502
Acid Extractable Chromium (Cr)	ug/g	5.7	6.9	11	1.0	0.20	9709502
Acid Extractable Cobalt (Co)	ug/g	2.4	2.8	3.7	0.10	0.020	9709502
Acid Extractable Copper (Cu)	ug/g	4.1	5.2	6.0	0.50	0.20	9709502
Acid Extractable Lead (Pb)	ug/g	1.4	1.7	1.9	1.0	0.10	9709502
Acid Extractable Molybdenum (Mo)	ug/g	<0.50	<0.50	<0.50	0.50	0.10	9709502
Acid Extractable Nickel (Ni)	ug/g	3.2	3.9	5.1	0.50	0.20	9709502
Acid Extractable Selenium (Se)	ug/g	<0.50	<0.50	<0.50	0.50	0.10	9709502
Acid Extractable Silver (Ag)	ug/g	<0.20	<0.20	<0.20	0.20	0.040	9709502
Acid Extractable Thallium (Tl)	ug/g	<0.050	<0.050	<0.050	0.050	0.010	9709502
Acid Extractable Uranium (U)	ug/g	0.40	0.45	0.62	0.050	0.030	9709502
Acid Extractable Vanadium (V)	ug/g	17	21	31	5.0	0.50	9709502
Acid Extractable Zinc (Zn)	ug/g	6.7	8.4	10	5.0	0.50	9709502
Acid Extractable Mercury (Hg)	ug/g	<0.050	<0.050	<0.050	0.050	0.030	9709502

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

ELEMENTS BY ATOMIC SPECTROSCOPY (SOIL)

Bureau Veritas ID		AFSP28			
Sampling Date		2024/10/09			
COC Number		C#1013277-01-01			
	UNITS	DUP-2	RDL	MDL	QC Batch
Inorganics					
Chromium (VI)	ug/g	<0.18	0.18	0.050	9709692
Metals					
Hot Water Ext. Boron (B)	ug/g	0.071	0.050	0.030	9707305
Acid Extractable Antimony (Sb)	ug/g	<0.20	0.20	0.10	9709502
Acid Extractable Arsenic (As)	ug/g	<1.0	1.0	0.10	9709502
Acid Extractable Barium (Ba)	ug/g	33	0.50	0.30	9709502
Acid Extractable Beryllium (Be)	ug/g	<0.20	0.20	0.020	9709502
Acid Extractable Boron (B)	ug/g	<5.0	5.0	1.0	9709502
Acid Extractable Cadmium (Cd)	ug/g	<0.10	0.10	0.030	9709502
Acid Extractable Chromium (Cr)	ug/g	9.4	1.0	0.20	9709502
Acid Extractable Cobalt (Co)	ug/g	3.6	0.10	0.020	9709502
Acid Extractable Copper (Cu)	ug/g	5.8	0.50	0.20	9709502
Acid Extractable Lead (Pb)	ug/g	1.8	1.0	0.10	9709502
Acid Extractable Molybdenum (Mo)	ug/g	<0.50	0.50	0.10	9709502
Acid Extractable Nickel (Ni)	ug/g	4.8	0.50	0.20	9709502
Acid Extractable Selenium (Se)	ug/g	<0.50	0.50	0.10	9709502
Acid Extractable Silver (Ag)	ug/g	<0.20	0.20	0.040	9709502
Acid Extractable Thallium (Tl)	ug/g	<0.050	0.050	0.010	9709502
Acid Extractable Uranium (U)	ug/g	0.62	0.050	0.030	9709502
Acid Extractable Vanadium (V)	ug/g	29	5.0	0.50	9709502
Acid Extractable Zinc (Zn)	ug/g	9.2	5.0	0.50	9709502
Acid Extractable Mercury (Hg)	ug/g	<0.050	0.050	0.030	9709502

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SEMI-VOLATILE ORGANICS BY GC-MS (SOIL)

Bureau Veritas ID		AFSP18	AFSP25	AFSP28			
Sampling Date		2024/10/08 11:18	2024/10/09 12:50	2024/10/09			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-06_11.43-12.04	BH24-08_16.76-17.37	DUP-2	RDL	MDL	QC Batch
Calculated Parameters							
Methylnaphthalene, 2-(1-)	ug/g	<0.0071	<0.0071	<0.0071	0.0071	N/A	9700742
Polyaromatic Hydrocarbons							
Acenaphthene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9714037
Acenaphthylene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Anthracene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Benzo(a)anthracene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9714037
Benzo(a)pyrene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Benzo(b/j)fluoranthene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9714037
Benzo(g,h,i)perylene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0040	9714037
Benzo(k)fluoranthene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9714037
Chrysene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0020	9714037
Dibenzo(a,h)anthracene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0040	9714037
Fluoranthene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Fluorene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Indeno(1,2,3-cd)pyrene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0040	9714037
1-Methylnaphthalene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
2-Methylnaphthalene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Naphthalene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Phenanthrene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Pyrene	ug/g	<0.0050	<0.0050	<0.0050	0.0050	0.0010	9714037
Surrogate Recovery (%)							
D10-Anthracene	%	121	126	123			9714037
D14-Terphenyl (FS)	%	100	100	101			9714037
D8-Acenaphthylene	%	74	60	66			9714037

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

Bureau Veritas Job #: C4W1831
Report Date: 2024/10/22

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

PETROLEUM HYDROCARBONS (CCME)

Bureau Veritas ID		AFSP09	AFSP10	AFSP11	AFSP12			
Sampling Date		2024/10/09 15:45	2024/10/10 12:30	2024/10/08 16:20	2024/10/10 09:20			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-01_6.09-6.7	BH24-02_4.57-5.02	BH24-03_6.09-6.7	BH24-04_3.04-3.65	RDL	MDL	QC Batch
BTEX & F1 Hydrocarbons								
Benzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Toluene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Ethylbenzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
o-Xylene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
p+m-Xylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
Total Xylenes	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
F1 (C6-C10)	ug/g	<10	<10	<10	<10	10	5.0	9705921
F1 (C6-C10) - BTEX	ug/g	<10	<10	<10	<10	10	5.0	9705921
F2-F4 Hydrocarbons								
F2 (C10-C16 Hydrocarbons)	ug/g	<7.0	<7.0	<7.0	<7.0	7.0	5.0	9708937
F3 (C16-C34 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	5.0	9708937
F4 (C34-C50 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	10	9708937
Reached Baseline at C50	ug/g	Yes	Yes	Yes	Yes			9708937
Surrogate Recovery (%)								
1,4-Difluorobenzene	%	104	104	104	103			9705921
4-Bromofluorobenzene	%	100	90	93	102			9705921
D10-o-Xylene	%	108	128	113	103			9705921
D4-1,2-Dichloroethane	%	102	109	109	105			9705921
o-Terphenyl	%	99	99	103	102			9708937

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

PETROLEUM HYDROCARBONS (CCME)

Bureau Veritas ID		AFSP13	AFSP15	AFSP16	AFSP18			
Sampling Date		2024/10/10 09:40	2024/10/07 15:40	2024/10/08 16:20	2024/10/08 11:18			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-04_6.09-6.70	BH24-05_6.09-6.70	BH24-06_8.38-9.0	BH24-06_11.43-12.04	RDL	MDL	QC Batch
BTEX & F1 Hydrocarbons								
Benzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Toluene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Ethylbenzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
o-Xylene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
p+m-Xylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
Total Xylenes	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
F1 (C6-C10)	ug/g	<10	<10	<10	<10	10	5.0	9705921
F1 (C6-C10) - BTEX	ug/g	<10	<10	<10	<10	10	5.0	9705921
F2-F4 Hydrocarbons								
F2 (C10-C16 Hydrocarbons)	ug/g	<7.0	<7.0	<7.0	<7.0	7.0	5.0	9708937
F3 (C16-C34 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	5.0	9708937
F4 (C34-C50 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	10	9708937
Reached Baseline at C50	ug/g	Yes	Yes	Yes	Yes			9708937
Surrogate Recovery (%)								
1,4-Difluorobenzene	%	104	105	104	104			9705921
4-Bromofluorobenzene	%	98	96	95	99			9705921
D10-o-Xylene	%	107	105	112	97			9705921
D4-1,2-Dichloroethane	%	106	103	104	103			9705921
o-Terphenyl	%	101	101	97	101			9708937

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

PETROLEUM HYDROCARBONS (CCME)

Bureau Veritas ID		AFSP19	AFSP21	AFSP22	AFSP24			
Sampling Date		2024/10/08 12:30	2024/10/10 13:56	2024/10/09 10:00	2024/10/09 11:10			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-06_16-16.61	BH24-07_6.09-6.70	BH24-08_6.09-6.70	BH24-08_11.43-12.04	RDL	MDL	QC Batch
BTEX & F1 Hydrocarbons								
Benzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Toluene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Ethylbenzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
o-Xylene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
p+m-Xylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
Total Xylenes	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
F1 (C6-C10)	ug/g	<10	<10	<10	<10	10	5.0	9705921
F1 (C6-C10) - BTEX	ug/g	<10	<10	<10	<10	10	5.0	9705921
F2-F4 Hydrocarbons								
F2 (C10-C16 Hydrocarbons)	ug/g	<7.0	<7.0	<7.0	<7.0	7.0	5.0	9708937
F3 (C16-C34 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	5.0	9708937
F4 (C34-C50 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	10	9708937
Reached Baseline at C50	ug/g	Yes	Yes	Yes	Yes			9708937
Surrogate Recovery (%)								
1,4-Difluorobenzene	%	104	105	106	104			9705921
4-Bromofluorobenzene	%	92	94	96	100			9705921
D10-o-Xylene	%	109	123	116	116			9705921
D4-1,2-Dichloroethane	%	102	102	103	103			9705921
o-Terphenyl	%	104	103	98	106			9708937

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

SLR Consulting (Canada) Ltd.
Client Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

PETROLEUM HYDROCARBONS (CCME)

Bureau Veritas ID		AFSP25	AFSP26	AFSP27	AFSP28			
Sampling Date		2024/10/09 12:50	2024/10/10 11:15	2024/10/08	2024/10/09			
COC Number		C#1013277-01-01	C#1013277-01-01	C#1013277-01-01	C#1013277-01-01			
	UNITS	BH24-08_16.76-17.37	BH24-09_6.85-7.45	DUP-1	DUP-2	RDL	MDL	QC Batch
BTEX & F1 Hydrocarbons								
Benzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Toluene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
Ethylbenzene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
o-Xylene	ug/g	<0.020	<0.020	<0.020	<0.020	0.020	0.020	9705921
p+m-Xylene	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
Total Xylenes	ug/g	<0.040	<0.040	<0.040	<0.040	0.040	0.040	9705921
F1 (C6-C10)	ug/g	<10	<10	<10	<10	10	5.0	9705921
F1 (C6-C10) - BTEX	ug/g	<10	<10	<10	<10	10	5.0	9705921
F2-F4 Hydrocarbons								
F2 (C10-C16 Hydrocarbons)	ug/g	<7.0	<7.0	<7.0	<7.0	7.0	5.0	9708937
F3 (C16-C34 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	5.0	9708937
F4 (C34-C50 Hydrocarbons)	ug/g	<50	<50	<50	<50	50	10	9708937
Reached Baseline at C50	ug/g	Yes	Yes	Yes	Yes			9708937
Surrogate Recovery (%)								
1,4-Difluorobenzene	%	103	105	104	105			9705921
4-Bromofluorobenzene	%	100	88	88	98			9705921
D10-o-Xylene	%	112	113	111	146 (1)			9705921
D4-1,2-Dichloroethane	%	106	105	104	104			9705921
o-Terphenyl	%	102	103	103	103			9708937

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
(1) Recovery or RPD for this parameter is outside control limits. The overall quality control for this analysis meets acceptability criteria.

GENERAL COMMENTS

Sample AFSP28 [DUP-2] : The recovery of the extraction surrogate compound was above the upper control limit. Visible loss of methanol was observed in this sample. As a result, there is an increased level of uncertainty.

Results relate only to the items tested.

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
9701926	MUC	RPD [AFSP24-01]	Moisture	2024/10/15	5.8		%	20
9702319	MUC	RPD [AFSP18-01]	Moisture	2024/10/15	4.3		%	20
9702632	MUC	RPD	Moisture	2024/10/15	0		%	20
9705921	RGA	Matrix Spike [AFSP09-03]	1,4-Difluorobenzene	2024/10/17		102	%	60 - 140
			4-Bromofluorobenzene	2024/10/17		105	%	60 - 140
			D10-o-Xylene	2024/10/17		93	%	60 - 140
			D4-1,2-Dichloroethane	2024/10/17		98	%	60 - 140
			Benzene	2024/10/17		79	%	50 - 140
			Toluene	2024/10/17		75	%	50 - 140
			Ethylbenzene	2024/10/17		89	%	50 - 140
			o-Xylene	2024/10/17		87	%	50 - 140
			p+m-Xylene	2024/10/17		83	%	50 - 140
			F1 (C6-C10)	2024/10/17		86	%	60 - 140
9705921	RGA	Spiked Blank	1,4-Difluorobenzene	2024/10/17		102	%	60 - 140
			4-Bromofluorobenzene	2024/10/17		104	%	60 - 140
			D10-o-Xylene	2024/10/17		88	%	60 - 140
			D4-1,2-Dichloroethane	2024/10/17		98	%	60 - 140
			Benzene	2024/10/17		75	%	50 - 140
			Toluene	2024/10/17		71	%	50 - 140
			Ethylbenzene	2024/10/17		85	%	50 - 140
			o-Xylene	2024/10/17		81	%	50 - 140
			p+m-Xylene	2024/10/17		78	%	50 - 140
			F1 (C6-C10)	2024/10/17		83	%	80 - 120
9705921	RGA	Method Blank	1,4-Difluorobenzene	2024/10/17		103	%	60 - 140
			4-Bromofluorobenzene	2024/10/17		95	%	60 - 140
			D10-o-Xylene	2024/10/17		93	%	60 - 140
			D4-1,2-Dichloroethane	2024/10/17		102	%	60 - 140
			Benzene	2024/10/17	<0.020		ug/g	
			Toluene	2024/10/17	<0.020		ug/g	
			Ethylbenzene	2024/10/17	<0.020		ug/g	
			o-Xylene	2024/10/17	<0.020		ug/g	
			p+m-Xylene	2024/10/17	<0.040		ug/g	
			Total Xylenes	2024/10/17	<0.040		ug/g	
			F1 (C6-C10)	2024/10/17	<10		ug/g	
			F1 (C6-C10) - BTEX	2024/10/17	<10		ug/g	
9705921	RGA	RPD [AFSP09-03]	Benzene	2024/10/17	NC		%	50
			Toluene	2024/10/17	NC		%	50
			Ethylbenzene	2024/10/17	NC		%	50
			o-Xylene	2024/10/17	NC		%	50
			p+m-Xylene	2024/10/17	NC		%	50
			Total Xylenes	2024/10/17	NC		%	50
			F1 (C6-C10)	2024/10/17	NC		%	30
			F1 (C6-C10) - BTEX	2024/10/17	NC		%	30
9706526	AGA	Matrix Spike [AFSP28-01]	Propylene Glycol	2024/10/17		108	%	60 - 140
			Ethylene Glycol	2024/10/17		109	%	60 - 140
			Diethylene Glycol	2024/10/17		107	%	60 - 140
9706526	AGA	Spiked Blank	Propylene Glycol	2024/10/17		109	%	60 - 140
			Ethylene Glycol	2024/10/17		110	%	60 - 140
			Diethylene Glycol	2024/10/17		110	%	60 - 140
9706526	AGA	Method Blank	Propylene Glycol	2024/10/17	<10		mg/kg	
			Ethylene Glycol	2024/10/17	<10		mg/kg	
			Diethylene Glycol	2024/10/17	<10		mg/kg	

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Total Glycol	2024/10/17	<10		mg/kg	
9706526	AGA	RPD [AFSP28-01]	Propylene Glycol	2024/10/17	NC		%	50
			Ethylene Glycol	2024/10/17	NC		%	50
			Diethylene Glycol	2024/10/17	NC		%	50
			Total Glycol	2024/10/17	NC		%	50
9707305	JOH	Matrix Spike	Hot Water Ext. Boron (B)	2024/10/18		113	%	75 - 125
9707305	JOH	Spiked Blank	Hot Water Ext. Boron (B)	2024/10/18		104	%	75 - 125
9707305	JOH	Method Blank	Hot Water Ext. Boron (B)	2024/10/18	<0.050		ug/g	
9707305	JOH	RPD	Hot Water Ext. Boron (B)	2024/10/18	NC		%	40
9708125	KIT	Spiked Blank	Available (CaCl2) pH	2024/10/17		100	%	97 - 103
9708125	KIT	RPD	Available (CaCl2) pH	2024/10/17	0.16		%	N/A
9708149	JTS	QC Standard	Sieve - #200 (<0.075mm)	2024/10/18		55	%	53 - 58
			Sieve - #200 (>0.075mm)	2024/10/18		45	%	42 - 47
9708149	JTS	RPD	Sieve - #200 (<0.075mm)	2024/10/18	0.16		%	20
			Sieve - #200 (>0.075mm)	2024/10/18	0.21		%	20
9708937	JJE	Matrix Spike [AFSP24-01]	o-Terphenyl	2024/10/22		109	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/22		107	%	60 - 140
			F3 (C16-C34 Hydrocarbons)	2024/10/22		109	%	60 - 140
			F4 (C34-C50 Hydrocarbons)	2024/10/22		107	%	60 - 140
9708937	JJE	Spiked Blank	o-Terphenyl	2024/10/22		98	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/22		100	%	80 - 120
			F3 (C16-C34 Hydrocarbons)	2024/10/22		105	%	80 - 120
			F4 (C34-C50 Hydrocarbons)	2024/10/22		101	%	80 - 120
9708937	JJE	Method Blank	o-Terphenyl	2024/10/22		99	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/22	<7.0		ug/g	
			F3 (C16-C34 Hydrocarbons)	2024/10/22	<50		ug/g	
			F4 (C34-C50 Hydrocarbons)	2024/10/22	<50		ug/g	
9708937	JJE	RPD [AFSP24-01]	F2 (C10-C16 Hydrocarbons)	2024/10/22	NC		%	30
			F3 (C16-C34 Hydrocarbons)	2024/10/22	NC		%	30
			F4 (C34-C50 Hydrocarbons)	2024/10/22	NC		%	30
9709502	DT1	Matrix Spike	Acid Extractable Antimony (Sb)	2024/10/18		108	%	75 - 125
			Acid Extractable Arsenic (As)	2024/10/18		98	%	75 - 125
			Acid Extractable Barium (Ba)	2024/10/18		94	%	75 - 125
			Acid Extractable Beryllium (Be)	2024/10/18		98	%	75 - 125
			Acid Extractable Boron (B)	2024/10/18		94	%	75 - 125
			Acid Extractable Cadmium (Cd)	2024/10/18		98	%	75 - 125
			Acid Extractable Chromium (Cr)	2024/10/18		104	%	75 - 125
			Acid Extractable Cobalt (Co)	2024/10/18		102	%	75 - 125
			Acid Extractable Copper (Cu)	2024/10/18		100	%	75 - 125
			Acid Extractable Lead (Pb)	2024/10/18		97	%	75 - 125
			Acid Extractable Molybdenum (Mo)	2024/10/18		98	%	75 - 125
			Acid Extractable Nickel (Ni)	2024/10/18		103	%	75 - 125
			Acid Extractable Selenium (Se)	2024/10/18		97	%	75 - 125
			Acid Extractable Silver (Ag)	2024/10/18		98	%	75 - 125
			Acid Extractable Thallium (Tl)	2024/10/18		100	%	75 - 125
			Acid Extractable Uranium (U)	2024/10/18		105	%	75 - 125
			Acid Extractable Vanadium (V)	2024/10/18		104	%	75 - 125
			Acid Extractable Zinc (Zn)	2024/10/18		104	%	75 - 125
			Acid Extractable Mercury (Hg)	2024/10/18		99	%	75 - 125
9709502	DT1	Spiked Blank	Acid Extractable Antimony (Sb)	2024/10/18		110	%	80 - 120
			Acid Extractable Arsenic (As)	2024/10/18		103	%	80 - 120
			Acid Extractable Barium (Ba)	2024/10/18		98	%	80 - 120

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Beryllium (Be)	2024/10/18		97	%	80 - 120
			Acid Extractable Boron (B)	2024/10/18		93	%	80 - 120
			Acid Extractable Cadmium (Cd)	2024/10/18		99	%	80 - 120
			Acid Extractable Chromium (Cr)	2024/10/18		104	%	80 - 120
			Acid Extractable Cobalt (Co)	2024/10/18		104	%	80 - 120
			Acid Extractable Copper (Cu)	2024/10/18		101	%	80 - 120
			Acid Extractable Lead (Pb)	2024/10/18		102	%	80 - 120
			Acid Extractable Molybdenum (Mo)	2024/10/18		96	%	80 - 120
			Acid Extractable Nickel (Ni)	2024/10/18		108	%	80 - 120
			Acid Extractable Selenium (Se)	2024/10/18		101	%	80 - 120
			Acid Extractable Silver (Ag)	2024/10/18		99	%	80 - 120
			Acid Extractable Thallium (Tl)	2024/10/18		103	%	80 - 120
			Acid Extractable Uranium (U)	2024/10/18		105	%	80 - 120
			Acid Extractable Vanadium (V)	2024/10/18		104	%	80 - 120
			Acid Extractable Zinc (Zn)	2024/10/18		106	%	80 - 120
			Acid Extractable Mercury (Hg)	2024/10/18		101	%	80 - 120
9709502	DT1	Method Blank	Acid Extractable Antimony (Sb)	2024/10/18	<0.20		ug/g	
			Acid Extractable Arsenic (As)	2024/10/18	<1.0		ug/g	
			Acid Extractable Barium (Ba)	2024/10/18	<0.50		ug/g	
			Acid Extractable Beryllium (Be)	2024/10/18	<0.20		ug/g	
			Acid Extractable Boron (B)	2024/10/18	<5.0		ug/g	
			Acid Extractable Cadmium (Cd)	2024/10/18	<0.10		ug/g	
			Acid Extractable Chromium (Cr)	2024/10/18	<1.0		ug/g	
			Acid Extractable Cobalt (Co)	2024/10/18	<0.10		ug/g	
			Acid Extractable Copper (Cu)	2024/10/18	<0.50		ug/g	
			Acid Extractable Lead (Pb)	2024/10/18	<1.0		ug/g	
			Acid Extractable Molybdenum (Mo)	2024/10/18	<0.50		ug/g	
			Acid Extractable Nickel (Ni)	2024/10/18	<0.50		ug/g	
			Acid Extractable Selenium (Se)	2024/10/18	<0.50		ug/g	
			Acid Extractable Silver (Ag)	2024/10/18	<0.20		ug/g	
			Acid Extractable Thallium (Tl)	2024/10/18	<0.050		ug/g	
			Acid Extractable Uranium (U)	2024/10/18	<0.050		ug/g	
			Acid Extractable Vanadium (V)	2024/10/18	<5.0		ug/g	
			Acid Extractable Zinc (Zn)	2024/10/18	<5.0		ug/g	
			Acid Extractable Mercury (Hg)	2024/10/18	<0.050		ug/g	
9709502	DT1	RPD	Acid Extractable Antimony (Sb)	2024/10/18	NC		%	30
			Acid Extractable Arsenic (As)	2024/10/18	NC		%	30
			Acid Extractable Barium (Ba)	2024/10/18	0.050		%	30
			Acid Extractable Beryllium (Be)	2024/10/18	NC		%	30
			Acid Extractable Boron (B)	2024/10/18	NC		%	30
			Acid Extractable Cadmium (Cd)	2024/10/18	NC		%	30
			Acid Extractable Chromium (Cr)	2024/10/18	1.9		%	30
			Acid Extractable Cobalt (Co)	2024/10/18	0.48		%	30
			Acid Extractable Copper (Cu)	2024/10/18	3.4		%	30
			Acid Extractable Lead (Pb)	2024/10/18	2.0		%	30
			Acid Extractable Molybdenum (Mo)	2024/10/18	NC		%	30
			Acid Extractable Nickel (Ni)	2024/10/18	3.0		%	30
			Acid Extractable Selenium (Se)	2024/10/18	NC		%	30
			Acid Extractable Silver (Ag)	2024/10/18	NC		%	30
			Acid Extractable Thallium (Tl)	2024/10/18	NC		%	30
			Acid Extractable Uranium (U)	2024/10/18	6.3		%	30
			Acid Extractable Vanadium (V)	2024/10/18	0.58		%	30

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Acid Extractable Zinc (Zn)	2024/10/18	0.62		%	30
			Acid Extractable Mercury (Hg)	2024/10/18	NC		%	30
9709692	RSU	Matrix Spike	Chromium (VI)	2024/10/18		88	%	70 - 130
9709692	RSU	Spiked Blank	Chromium (VI)	2024/10/18		92	%	80 - 120
9709692	RSU	Method Blank	Chromium (VI)	2024/10/18	<0.18		ug/g	
9709692	RSU	RPD	Chromium (VI)	2024/10/18	NC		%	35
9710924	KIT	Spiked Blank	Conductivity	2024/10/18		103	%	90 - 110
9710924	KIT	Method Blank	Conductivity	2024/10/18	<0.002		mS/cm	
9710924	KIT	RPD	Conductivity	2024/10/18	1.3		%	10
9714037	JXI	Matrix Spike [AFSP28-01]	D10-Anthracene	2024/10/21		111	%	50 - 130
			D14-Terphenyl (FS)	2024/10/21		90	%	50 - 130
			D8-Acenaphthylene	2024/10/21		73	%	50 - 130
			Acenaphthene	2024/10/21		99	%	50 - 130
			Acenaphthylene	2024/10/21		90	%	50 - 130
			Anthracene	2024/10/21		110	%	50 - 130
			Benzo(a)anthracene	2024/10/21		98	%	50 - 130
			Benzo(a)pyrene	2024/10/21		98	%	50 - 130
			Benzo(b/j)fluoranthene	2024/10/21		111	%	50 - 130
			Benzo(g,h,i)perylene	2024/10/21		92	%	50 - 130
			Benzo(k)fluoranthene	2024/10/21		85	%	50 - 130
			Chrysene	2024/10/21		91	%	50 - 130
			Dibenzo(a,h)anthracene	2024/10/21		97	%	50 - 130
			Fluoranthene	2024/10/21		105	%	50 - 130
			Fluorene	2024/10/21		98	%	50 - 130
			Indeno(1,2,3-cd)pyrene	2024/10/21		92	%	50 - 130
			1-Methylnaphthalene	2024/10/21		92	%	50 - 130
			2-Methylnaphthalene	2024/10/21		85	%	50 - 130
			Naphthalene	2024/10/21		83	%	50 - 130
			Phenanthrene	2024/10/21		96	%	50 - 130
			Pyrene	2024/10/21		111	%	50 - 130
9714037	JXI	Spiked Blank	D10-Anthracene	2024/10/21		102	%	50 - 130
			D14-Terphenyl (FS)	2024/10/21		90	%	50 - 130
			D8-Acenaphthylene	2024/10/21		85	%	50 - 130
			Acenaphthene	2024/10/21		100	%	50 - 130
			Acenaphthylene	2024/10/21		95	%	50 - 130
			Anthracene	2024/10/21		114	%	50 - 130
			Benzo(a)anthracene	2024/10/21		102	%	50 - 130
			Benzo(a)pyrene	2024/10/21		101	%	50 - 130
			Benzo(b/j)fluoranthene	2024/10/21		106	%	50 - 130
			Benzo(g,h,i)perylene	2024/10/21		95	%	50 - 130
			Benzo(k)fluoranthene	2024/10/21		99	%	50 - 130
			Chrysene	2024/10/21		94	%	50 - 130
			Dibenzo(a,h)anthracene	2024/10/21		106	%	50 - 130
			Fluoranthene	2024/10/21		104	%	50 - 130
			Fluorene	2024/10/21		102	%	50 - 130
			Indeno(1,2,3-cd)pyrene	2024/10/21		92	%	50 - 130
			1-Methylnaphthalene	2024/10/21		97	%	50 - 130
			2-Methylnaphthalene	2024/10/21		93	%	50 - 130
			Naphthalene	2024/10/21		96	%	50 - 130
			Phenanthrene	2024/10/21		93	%	50 - 130
			Pyrene	2024/10/21		110	%	50 - 130
9714037	JXI	Method Blank	D10-Anthracene	2024/10/21		117	%	50 - 130

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			D14-Terphenyl (FS)	2024/10/21		95	%	50 - 130
			D8-Acenaphthylene	2024/10/21		74	%	50 - 130
			Acenaphthene	2024/10/21	<0.0050		ug/g	
			Acenaphthylene	2024/10/21	<0.0050		ug/g	
			Anthracene	2024/10/21	<0.0050		ug/g	
			Benzo(a)anthracene	2024/10/21	<0.0050		ug/g	
			Benzo(a)pyrene	2024/10/21	<0.0050		ug/g	
			Benzo(b/j)fluoranthene	2024/10/21	<0.0050		ug/g	
			Benzo(g,h,i)perylene	2024/10/21	<0.0050		ug/g	
			Benzo(k)fluoranthene	2024/10/21	<0.0050		ug/g	
			Chrysene	2024/10/21	<0.0050		ug/g	
			Dibenzo(a,h)anthracene	2024/10/21	<0.0050		ug/g	
			Fluoranthene	2024/10/21	<0.0050		ug/g	
			Fluorene	2024/10/21	<0.0050		ug/g	
			Indeno(1,2,3-cd)pyrene	2024/10/21	<0.0050		ug/g	
			1-Methylnaphthalene	2024/10/21	<0.0050		ug/g	
			2-Methylnaphthalene	2024/10/21	<0.0050		ug/g	
			Naphthalene	2024/10/21	<0.0050		ug/g	
			Phenanthrene	2024/10/21	<0.0050		ug/g	
			Pyrene	2024/10/21	<0.0050		ug/g	
9714037	JXI	RPD [AFSP28-01]	Acenaphthene	2024/10/21	NC		%	40
			Acenaphthylene	2024/10/21	NC		%	40
			Anthracene	2024/10/21	NC		%	40
			Benzo(a)anthracene	2024/10/21	NC		%	40
			Benzo(a)pyrene	2024/10/21	NC		%	40
			Benzo(b/j)fluoranthene	2024/10/21	NC		%	40
			Benzo(g,h,i)perylene	2024/10/21	NC		%	40
			Benzo(k)fluoranthene	2024/10/21	NC		%	40
			Chrysene	2024/10/21	NC		%	40
			Dibenzo(a,h)anthracene	2024/10/21	NC		%	40
			Fluoranthene	2024/10/21	NC		%	40
			Fluorene	2024/10/21	NC		%	40
			Indeno(1,2,3-cd)pyrene	2024/10/21	NC		%	40
			1-Methylnaphthalene	2024/10/21	NC		%	40
			2-Methylnaphthalene	2024/10/21	NC		%	40
			Naphthalene	2024/10/21	NC		%	40
			Phenanthrene	2024/10/21	NC		%	40
			Pyrene	2024/10/21	NC		%	40

N/A = Not Applicable

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

QC Standard: A sample of known concentration prepared by an external agency under stringent conditions. Used as an independent check of method accuracy.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

Surrogate: A pure or isotopically labeled compound whose behavior mirrors the analytes of interest. Used to evaluate extraction efficiency.

NC (Duplicate RPD): The duplicate RPD was not calculated. The concentration in the sample and/or duplicate was too low to permit a reliable RPD calculation (absolute difference <= 2x RDL).

VALIDATION SIGNATURE PAGE

The analytical data and all QC contained in this report were reviewed and validated by:

Cristina Carriere

Cristina Carriere, Senior Scientific Specialist

Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4W1831
Job Received: 2024/10/11
Final Report Due: 2024/10/21
Disposal Date: 2024/11/10

Invoice Information

Attn: Accounts Payable
SLR Consulting (Canada) Ltd.
#200 – 887 Great Northern Way
Vancouver, BC, V5T 4T5
Email to:
accountspayableca@slrconsulting.com
adang@slrconsulting.com

Report Information

Attn: Matt Williamson
SLR Consulting (Canada) Ltd.
201-100 Stone Rd. W.
Guelph, ON, N1G 5L3
Email to:
mwilliamson@slrconsulting.com

Project Information

Quote #: C41044
PO/AFE#: OTT2947
Project #: OTT2947
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Site #: 35197
Sampled By: MS
Cost Object: C41044_V2

Analytical Summary

A: Due On 2024/10/21

Lab ID	Client Sample ID	Sampling Date/Time	Matrix	# Cont.	O.Reg 153 Metals & Inorganics Pkg (Soil)	O.Reg 153 PAHs (Soil)	O.Reg 153 PHCs, BTEX/F1-F4 (Soil)	Glycols in Soil by GC-FID	Moisture	Sample on Hold	Sieve, 75um	Set Number
COC# C#1013277-01-01												
AFSP09	BH24-01_6.09-6.7	2024/10/09 15:45	SOIL	4			A		A			1
AFSP10	BH24-02_4.57-5.02	2024/10/10 12:30	SOIL	4			A		A			1
AFSP11	BH24-03_6.09-6.7	2024/10/08 16:20	SOIL	4			A		A			1
AFSP12	BH24-04_3.04-3.65	2024/10/10 09:20	SOIL	4			A		A			1
AFSP13	BH24-04_6.09-6.70	2024/10/10 09:40	SOIL	4	A		A		A			2
AFSP14	BH24-05_3.04-3.65	2024/10/07 15:00	SOIL	4						A		3
AFSP15	BH24-05_6.09-6.70	2024/10/07 15:40	SOIL	4			A		A			1
AFSP16	BH24-06_8.38-9.0	2024/10/08 16:20	SOIL	4			A		A			1
AFSP17	BH24-06_9.14-9.75	2024/10/08 10:45	SOIL	1							A	4
AFSP18	BH24-06_11.43-12.04	2024/10/08 11:18	SOIL	4		A	A		A			5
AFSP19	BH24-06_16-16.61	2024/10/08 12:30	SOIL	4			A		A			1
AFSP20	BH24-06_16.76-17.38	2024/10/08 12:50	SOIL	1							A	4

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4W1831
Job Received: 2024/10/11
Final Report Due: 2024/10/21
Disposal Date: 2024/11/10

A: Due On 2024/10/21

Lab ID	Client Sample ID	Sampling Date/Time	Matrix	# Cont.	O.Reg 153 Metals & Inorganics Pkg (Soil)	O.Reg 153 PAHs (Soil)	O.Reg 153 PHCs, BTEX/F1-F4 (Soil)	Glycols in Soil by GC-FID	Moisture	Sample on Hold	Sieve, 75um	Set Number
COC# C#1013277-01-01												
AFSP21	BH24-07_6.09-6.70	2024/10/10 13:56	SOIL	4	A		A		A		A	6
AFSP22	BH24-08_6.09-6.70	2024/10/09 10:00	SOIL	4			A		A			1
AFSP23	BH24-08_9.14-9.75	2024/10/09 10:35	SOIL	4						A		3
AFSP24	BH24-08_11.43-12.04	2024/10/09 11:10	SOIL	4			A		A			1
AFSP25	BH24-08_16.76-17.37	2024/10/09 12:50	SOIL	4	A	A	A	A	A			7
AFSP26	BH24-09_6.85-7.45	2024/10/10 11:15	SOIL	4			A		A			1
AFSP27	DUP-1		SOIL	4			A		A			1
AFSP28	DUP-2		SOIL	4	A	A	A	A	A			7

Include Criteria on CofA: No

Sample Inspection Observations & Comments

# of Samples Received: 20

Details: Sample(s) received in good condition.

Average Temperature: Package 1: 6.7 °C
Package 2: 9.3 °C

Additional Notes

- Unless special storage arrangements are made, all samples will be disposed 30 days after receipt. Additional fees may be applied for extended storage.
- Additional fees may be applied for the disposal of hazardous samples.

The contents of this report are subject to change. For up to date information, please refer to the Customer Portal.

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4W1831
Job Received: 2024/10/11
Final Report Due: 2024/10/21
Disposal Date: 2024/11/10

Sample Set Listing

Set 1 (11 Samples)	Set 2 (1 Sample)	Set 3 (2 Samples)	Set 4 (2 Samples)	Set 5 (1 Sample)	Set 6 (1 Sample)	Set 7 (2 Samples)
BH24-01_6.09-6.7	BH24-04_6.09-6.70	BH24-05_3.04-3.65	BH24-06_9.14-9.75	BH24-06_11.43-12.04	BH24-07_6.09-6.70	BH24-08_16.76-17.37
BH24-02_4.57-5.02		BH24-08_9.14-9.75	BH24-06_16.76-17.38			DUP-2
BH24-03_6.09-6.7						
BH24-04_3.04-3.65						
BH24-05_6.09-6.70						
BH24-06_8.38-9.0						
BH24-06_16-16.61						
BH24-08_6.09-6.70						
BH24-08_11.43-12.04						
BH24-09_6.85-7.45						
DUP-1						

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2	Set 3	Set 4	Set 5	Set 6	Set 7
O.Reg 153 Metals & Inorganics Pkg (Soil)	Acid Extractable Antimony (Sb)	0.2	ug/g		X				X	X
	Acid Extractable Arsenic (As)	1	ug/g		X				X	X
	Acid Extractable Barium (Ba)	0.5	ug/g		X				X	X
	Acid Extractable Beryllium (Be)	0.2	ug/g		X				X	X
	Acid Extractable Boron (B)	5	ug/g		X				X	X
	Acid Extractable Cadmium (Cd)	0.1	ug/g		X				X	X
	Acid Extractable Chromium (Cr)	1	ug/g		X				X	X
	Acid Extractable Cobalt (Co)	0.1	ug/g		X				X	X
	Acid Extractable Copper (Cu)	0.5	ug/g		X				X	X
	Acid Extractable Lead (Pb)	1	ug/g		X				X	X
	Acid Extractable Molybdenum (Mo)	0.5	ug/g		X				X	X
	Acid Extractable Nickel (Ni)	0.5	ug/g		X				X	X
	Acid Extractable Selenium (Se)	0.5	ug/g		X				X	X
	Acid Extractable Silver (Ag)	0.2	ug/g		X				X	X
	Acid Extractable Thallium (Tl)	0.05	ug/g		X				X	X
	Acid Extractable Uranium (U)	0.05	ug/g		X				X	X
	Acid Extractable Vanadium (V)	5	ug/g		X				X	X
	Acid Extractable Zinc (Zn)	5	ug/g		X				X	X
	Acid Extractable Mercury (Hg)	0.05	ug/g		X				X	X
	Conductivity	0.002	mS/cm		X				X	X
	Chromium (VI)	0.18	ug/g		X				X	X
	Hot Water Ext. Boron (B)	0.05	ug/g		X				X	X
	Available (CaCl2) pH	N/A	pH		X				X	X
	Sodium Adsorption Ratio	N/A	N/A		X				X	X
O.Reg 153 PAHs (Soil)	Methylnaphthalene, 2-(1-)	0.014	ug/g					X		X
	Acenaphthene	0.005	ug/g					X		X
	Acenaphthylene	0.005	ug/g					X		X
	Anthracene	0.005	ug/g					X		X

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2	Set 3	Set 4	Set 5	Set 6	Set 7
O.Reg 153 PAHs (Soil)	Benzo(a)anthracene	0.005	ug/g					X		X
	Benzo(a)pyrene	0.005	ug/g					X		X
	Benzo(b/j)fluoranthene	0.005	ug/g					X		X
	Benzo(g,h,i)perylene	0.005	ug/g					X		X
	Benzo(k)fluoranthene	0.005	ug/g					X		X
	Chrysene	0.005	ug/g					X		X
	Dibenzo(a,h)anthracene	0.005	ug/g					X		X
	Fluoranthene	0.005	ug/g					X		X
	Fluorene	0.005	ug/g					X		X
	Indeno(1,2,3-cd)pyrene	0.005	ug/g					X		X
	1-Methylnaphthalene	0.005	ug/g					X		X
	2-Methylnaphthalene	0.005	ug/g					X		X
	Naphthalene	0.005	ug/g					X		X
	Phenanthrene	0.005	ug/g					X		X
	Pyrene	0.005	ug/g					X		X
O.Reg 153 PHCs, BTEX/F1-F4 (Soil)	Benzene	0.02	ug/g	X	X			X	X	X
	Toluene	0.02	ug/g	X	X			X	X	X
	Ethylbenzene	0.02	ug/g	X	X			X	X	X
	o-Xylene	0.02	ug/g	X	X			X	X	X
	p+m-Xylene	0.04	ug/g	X	X			X	X	X
	Total Xylenes	0.04	ug/g	X	X			X	X	X
	F1 (C6-C10)	10	ug/g	X	X			X	X	X
	F1 (C6-C10) - BTEX	10	ug/g	X	X			X	X	X
	F2 (C10-C16 Hydrocarbons)	7	ug/g	X	X			X	X	X
	F3 (C16-C34 Hydrocarbons)	50	ug/g	X	X			X	X	X
	F4 (C34-C50 Hydrocarbons)	50	ug/g	X	X			X	X	X
	Reached Baseline at C50	N/A	ug/g	X	X			X	X	X
Glycols in Soil by GC-FID	Propylene Glycol	10	mg/kg							X
	Ethylene Glycol	10	mg/kg							X
	Diethylene Glycol	10	mg/kg							X
	Total Glycol	10	mg/kg							X
Moisture	Moisture	1	%	X	X			X	X	X
Sample on Hold	No Analysis	N/A				X				
Sieve, 75um	Grain Size	N/A	%				X		X	
	Sieve - #200 (<0.075mm)	1	%				X		X	
	Sieve - #200 (>0.075mm)	1	%				X		X	

**RDLs are subject to change based on interferences present at the time of analysis.*

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Bureau Veritas
6740 Campobello Road, Mississauga, Ontario Canada L5N 2L8 Tel:(905) 817-5700 Toll-free:800-563-6266 Fax:(905) 817-5777 www.bvna.com

Received in Ottawa

CHAIN OF CUSTODY RECORD

INVOICE TO:	REPORT TO:	PROJECT INFORMATION:	Laboratory Use Only:
Company Name: #39437 SLR Consulting (Canada) Ltd.	Company Name: SLR Consulting (Canada) Ltd.	Quotation #: C41044	Bureau Veritas Job #: / Bottle Order #: 1013277
Attention: Accounts Payable	Attention: Matt Williamson	P.O. #: 0TT2947	
Address: #200 – 887 Great Northern Way, Vancouver BC V5T 4T5	Address: 100 Stone Road West Suite 201, Guelph ON N1G 5L3	Project: 0TT2947	COC #: C#1013277-01-01
Tel: (604) 738-2500 Fax: (604) 738-2542	Tel: 226-706-8080 Fax:	Project Name: Suncor 4000 Riverside Drive Ottawa	Project Manager: Keshani Vijh
Email: accountspayableca@slrconsulting.com;adang@slrcons	Email: mwilliamson@slrconsulting.com	Site #: 35197	
		Sampled By: MS	

MOE REGULATED DRINKING WATER OR WATER INTENDED FOR HUMAN CONSUMPTION MUST BE SUBMITTED ON THE BUREAU VERITAS DRINKING WATER CHAIN OF CUSTODY

Regulation 153 (2011): ☐ Table 1 ☐ Table 2 ☒ Table 3 ☐ Table ___ ; ☐ Res/Park ☒ Ind/Comm ☐ Agri/Other ☐ Medium/Fine ☒ Coarse ☐ For RSC

Other Regulations: ☐ CCME ☐ Reg 558 ☐ MISA ☐ PWQO ☐ Other ☐ Sanitary Sewer Bylaw ☐ Storm Sewer Bylaw Municipality ____ ☐ Reg 406 Table ____

Special Instructions:

Include Criteria on Certificate of Analysis (Y/N)? N

Turnaround Time (TAT) Required: Please provide advance notice for rush projects

Regular (Standard) TAT: ☒
(will be applied if Rush TAT is not specified):
Standard TAT = 5-7 Working days for most tests.
Please note: Standard TAT for certain tests such as BOD and Dioxins/Furans are > 5 days - contact your Project Manager for details.

Job Specific Rush TAT (if applies to entire submission)
Date Required: ____ Time Required: ____
Rush Confirmation Number: ____ (call lab for #)

ANALYSIS REQUESTED (PLEASE BE SPECIFIC)

#	Sample Barcode Label	Sample (Location) Identification	Date Sampled	Time Sampled	Matrix	Field Filtered (please circle): Metals / Hg / Cr VI	VOCs	BTEX	F1-F4	PAHs	Metals/Inorganics (Exclude CN-)	Glycols	Grain Size	TCLP	# of Bottles	Comments
1	N/A	BH24-01_6.09-6.7	2024/10/09	15:45	Soil	No	X	X	X						4	
2	↓	BH24-02_4.57-5.02	2024/10/10	12:30	↓		X	X	X						4	
3	↓	BH24-03_6.09-6.7	2024/10/08	16:20	↓		X	X	X						4	
4	↓	BH24-04_3.04-3.65	2024/10/10	9:20	↓		X	X	X						4	NONT-2024-10-3563
5	↓	BH24-04_6.09-6.70	2024/10/10	9:40	↓		X	X	X		X				4	
6	↓	BH24-05_3.04-3.65	2024/10/07	15:00	↓		X	X	X						4	ON HOLD
7	↓	BH24-05_6.07-6.70	2024/10/07	15:40	↓		X	X	X						4	11-Oct-24 13:52
8	↓	BH24-06_8.38-9.0	2024/10/08	16:20	↓		X	X	X						4	Keshani Vijh
9	↓	BH24-06_9.14-9.75	2024/10/08	10:45	↓								X		1	C4W1831
10	↓	BH24-06_11.43-12.04	2024/10/08	11:18	↓		X	X	X	X					4	A8K ENV-1642

* RELINQUISHED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	RECEIVED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	# jars used and not submitted
Melanie St Cyr / Melanie St Cyr	24/10/11	12:15	Angelica Santiago ASA	2024/10/11	13:52	
			[signature]	2024/10/12	09:02	

Laboratory Use Only

Time Sensitive	Temperature (°C) on Receipt	Custody Seal	Yes	No
	5/0/1 3/4/4	Present	✓	
		Intact	✓	

* UNLESS OTHERWISE AGREED TO IN WRITING, WORK SUBMITTED ON THIS CHAIN OF CUSTODY IS SUBJECT TO BUREAU VERITAS'S STANDARD TERMS AND CONDITIONS. SIGNING OF THIS CHAIN OF CUSTODY DOCUMENT IS ACKNOWLEDGMENT AND ACCEPTANCE OF OUR TERMS WHICH ARE AVAILABLE FOR VIEWING AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/COC-TERMS-AND-CONDITIONS.

* IT IS THE RESPONSIBILITY OF THE RELINQUISHER TO ENSURE THE ACCURACY OF THE CHAIN OF CUSTODY RECORD. AN INCOMPLETE CHAIN OF CUSTODY MAY RESULT IN ANALYTICAL TAT DELAYS.

** SAMPLE CONTAINER, PRESERVATION, HOLD TIME AND PACKAGE INFORMATION CAN BE VIEWED AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/CHAIN-CUSTODY-FORMS-COCS.

SAMPLES MUST BE KEPT COOL (< 10° C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BUREAU VERITAS

White: Bureau Veritas Yellow: Client

Bureau Veritas Canada (2019) Inc.

Bureau Veritas
6740 Campobello Road, Mississauga, Ontario Canada L5N 2L8 Tel:(905) 817-5700 Toll-free:800-563-6266 Fax:(905) 817-5777 www.bvna.com

Received in Ottawa

CHAIN OF CUSTODY RECORD

INVOICE TO:		REPORT TO:		PROJECT INFORMATION:		Laboratory Use Only:	
Company Name:	#39437 SLR Consulting (Canada) Ltd.	Company Name:	SLR Consulting (Canada) Ltd.	Quotation #:	C41044	Bureau Veritas Job #:	Bottle Order #:
Attention:	Accounts Payable	Attention:	Matt Williamson	P.O. #:	OTT2947		1013277
Address:	#200 – 887 Great Northern Way	Address:	100 Stone Road West, Suite 201	Project:	OTT2947		
	Vancouver BC V5T 4T5		Guelph, ON N1G 5L3	Project Name:	Suncor 4000 Riverside Drive Ottawa	COC #:	Project Manager:
Tel:	(604) 738-2500 Fax: (604) 738-2542	Tel:	226-206-8080 Fax:	Site #:	35197	C#1013277-01-01	Keshani Vijh
Email:	accountspayableca@slrconsulting.com;adang@slrcons	Email:	mwilliamson@slrconsulting.com	Sampled By:	MS		

MOE REGULATED DRINKING WATER OR WATER INTENDED FOR HUMAN CONSUMPTION MUST BE SUBMITTED ON THE BUREAU VERITAS DRINKING WATER CHAIN OF CUSTODY

Regulation 153 (2011)
- ☐ Table 1 ☐ Res/Park ☐ Medium/Fine
- ☐ Table 2 ☒ Ind/Comm ☒ Coarse
- ☒ Table 3 ☐ Agri/Other ☐ For RSC
- ☐ Table ___

Other Regulations
- ☐ CCME ☐ Sanitary Sewer Bylaw
- ☐ Reg 558. ☐ Storm Sewer Bylaw
- ☐ MISA Municipality ____
- ☐ PWQO ☐ Reg 406 Table ____
- ☐ Other ____

Special Instructions

Include Criteria on Certificate of Analysis (Y/N)? ____

Turnaround Time (TAT) Required:
Please provide advance notice for rush projects

Regular (Standard) TAT: ☒
(will be applied if Rush TAT is not specified):
Standard TAT = 5-7 Working days for most tests..
Please note: Standard TAT for certain tests such as BOD and Dioxins/Furans are > 5 days - contact your Project Manager for details.

Job Specific Rush TAT (if applies to entire submission)
Date Required: ____ Time Required: ____ ☐
Rush Confirmation Number: ____ *(call lab for #)*

	Sample Barcode Label	Sample (Location) Identification	Date Sampled	Time Sampled	Matrix	Field Filtered (please circle): Metals / Hg / Cr VI	BTEX	F1-F4	PAH	Metals/Inorganics (ex CN-)	Glycols	Grain Size	# of Bottles	Comments
1		BH24-06_16-16.61	2024/10/08	12:30	Soil	No	X	X					4	
2		BH24-06_16.76-17.38	2024/10/08	12:50								X	1	
3		BH24-07_6.09-6.70	2024/10/10	13:50			X	X		X		X	4	
4		BH24-08_6.09-6.70	2024/10/09	10:00			X	X					4	
5		BH24-08_9.44-9.75	2024/10/09	10:35									4	ON HOLD
6		BH24-08_11.43-12.04	2024/10/09	11:10			X	X					4	
7		BH24-08_16.76-17.37	2024/10/09	12:50			X	X	X	X	X		4	
8		BH24-09_6.85-7.45	2024/10/10	11:15			X	X					4	
9		DUP-1	–	–			X	X					4	
10		DUP-2	–	–			X	X	X	X	X		4	

* RELINQUISHED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	RECEIVED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	# jars used and not submitted
Melanie Sb Gr Melanie St Cyr	24/10/11	12:15	See p. 1 AM See Page 1			

Laboratory Use Only				
Time Sensitive	Temperature (°C) on Recei	Custody Seal Present	Yes	No
	AMB	Intact		

* UNLESS OTHERWISE AGREED TO IN WRITING, WORK SUBMITTED ON THIS CHAIN OF CUSTODY IS SUBJECT TO BUREAU VERITAS'S STANDARD TERMS AND CONDITIONS. SIGNING OF THIS CHAIN OF CUSTODY DOCUMENT IS ACKNOWLEDGMENT AND ACCEPTANCE OF OUR TERMS WHICH ARE AVAILABLE FOR VIEWING AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/COC-TERMS-AND-CONDITIONS.

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SAMPLES MUST BE KEPT COOL (< 10° C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BUREAU VERITAS

White: Bureau Veritas Yellow: Client

Bureau Veritas Canada (2019) Inc.

Your P.O. #: OTT2947
Your Project #: 216.030059.00002
Site#: 4000 Riverside Drive
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your C.O.C. #: C#1017617-01-01

Attention: Matt Williamson

SLR Consulting (Canada) Ltd.
Suncor
#200 – 887 Great Northern Way
Vancouver, BC
CANADA V5T 4T5

Report Date: 2024/10/25
Report #: R8377714
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4W8659
Received: 2024/10/18, 15:45

Sample Matrix: Water
Samples Received: 5

Analyses	Quantity	Date Extracted	Date Analyzed	Laboratory Method	Analytical Method
Methylnaphthalene Sum (1)	4	N/A	2024/10/25	CAM SOP-00301	EPA 8270D m
1,3-Dichloropropene Sum (1)	5	N/A	2024/10/25		EPA 8260C m
Chloride by Automated Colourimetry (1)	3	N/A	2024/10/24	CAM SOP-00463	SM 24 4500-Cl E m
Chloride by Automated Colourimetry (1)	1	N/A	2024/10/25	CAM SOP-00463	SM 24 4500-Cl E m
Chromium (VI) in Water (1)	4	N/A	2024/10/23	CAM SOP-00436	EPA 7199 m
Petroleum Hydrocarbons F2-F4 in Water (1, 2)	5	2024/10/24	2024/10/24	CAM SOP-00316	CCME PHC-CWS m
Glycols in Water by GC/FID (1)	4	N/A	2024/10/22	CAM SOP-00322	based on EPA 8015
Mercury (1)	4	2024/10/23	2024/10/23	CAM SOP-00453	EPA 7470A m
Dissolved Metals by ICPMS (1)	4	N/A	2024/10/23	CAM SOP-00447	EPA 6020B m
PAH Compounds in Water by GC/MS (SIM) (1)	4	2024/10/24	2024/10/24	CAM SOP-00318	EPA 8270E
Volatile Organic Compounds and F1 PHCs (1)	5	N/A	2024/10/24	CAM SOP-00230	EPA 8260C m

Remarks:

Bureau Veritas is accredited to ISO/IEC 17025 for specific parameters on scopes of accreditation. Unless otherwise noted, procedures used by Bureau Veritas are based upon recognized Provincial, Federal or US method compendia such as CCME, EPA, APHA or the Quebec Ministry of Environment.

All work recorded herein has been done in accordance with procedures and practices ordinarily exercised by professionals in Bureau Veritas' profession using accepted testing methodologies, quality assurance and quality control procedures (except where otherwise agreed by the client and Bureau Veritas in writing). All data is in statistical control and has met quality control and method performance criteria unless otherwise noted. All method blanks are reported; unless indicated otherwise, associated sample data are not blank corrected. Where applicable, unless otherwise noted, Measurement Uncertainty has not been accounted for when stating conformity to the referenced standard.

Bureau Veritas liability is limited to the actual cost of the requested analyses, unless otherwise agreed in writing. There is no other warranty expressed or implied. Bureau Veritas has been retained to provide analysis of samples provided by the Client using the testing methodology referenced in this report. Interpretation and use of test results are the sole responsibility of the Client and are not within the scope of services provided by Bureau Veritas, unless otherwise agreed in writing. Bureau Veritas is not responsible for the accuracy or any data impacts, that result from the information provided by the customer or their agent.

Solid sample results, except biota, are based on dry weight unless otherwise indicated. Organic analyses are not recovery corrected except for isotope dilution methods.
Results relate to samples tested. When sampling is not conducted by Bureau Veritas, results relate to the supplied samples tested.

Reference Method suffix “m” indicates test methods incorporate validated modifications from specific reference methods to improve performance.
* RPDs calculated using raw data. The rounding of final results may result in the apparent difference.

Your P.O. #: OTT2947
Your Project #: 216.030059.00002
Site#: 4000 Riverside Drive
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
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Attention: Matt Williamson

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CANADA V5T 4T5

Report Date: 2024/10/25
Report #: R8377714
Version: 1 - Final

CERTIFICATE OF ANALYSIS

BUREAU VERITAS JOB #: C4W8659

Received: 2024/10/18, 15:45

(1) This test was performed by Bureau Veritas Mississauga, 6740 Campobello Rd , Mississauga, ON, L5N 2L8
(2) All CCME PHC results met required criteria unless otherwise stated in the report. The CWS PHC methods employed by Bureau Veritas conform to all prescribed elements of the reference method and performance based elements have been validated. All modifications have been validated and proven equivalent following “Alberta Environment’s Interpretation of the Reference Method for the Canada-Wide Standard for Petroleum Hydrocarbons in Soil Validation of Performance-Based Alternative Methods September 2003”. Documentation is available upon request. Modifications from Reference Method for the Canada-wide Standard for Petroleum Hydrocarbons in Soil-Tier 1 Method: F2/F3/F4 data reported using validated cold solvent extraction instead of Soxhlet extraction.

Encryption Key

Bureau Veritas
25 Oct 2024 17:38:28

Please direct all questions regarding this Certificate of Analysis to:
Keshani Vijh, Sr. Project Manager
Email: keshani.vijh@bureauveritas.com
Phone# (613) 274-0573

==========

This report has been generated and distributed using a secure automated process.
Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Bureau Veritas Job #: C4W8659
Report Date: 2024/10/25

SLR Consulting (Canada) Ltd.
Client Project #: 216.030059.00002
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

RESULTS OF ANALYSES OF WATER

Bureau Veritas ID		AGHS11				AGHS12			
Sampling Date		2024/10/18 13:20				2024/10/18 11:00			
COC Number		C#1017617-01-01				C#1017617-01-01			
	UNITS	MW24-06	RDL	MDL	QC Batch	MW24-08	RDL	MDL	QC Batch
Inorganics									
Dissolved Chloride (Cl-)	mg/L	850	20	13	9719537	470	5.0	3.3	9720591

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AGHS13			AGHS14			
Sampling Date		2024/10/18			2024/10/18 13:00			
COC Number		C#1017617-01-01			C#1017617-01-01			
	UNITS	DUP-1	RDL	MDL	FIELD BLANK	RDL	MDL	QC Batch
Inorganics								
Dissolved Chloride (Cl-)	mg/L	480	4.0	2.6	<1.0	1.0	0.66	9719537

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas Job #: C4W8659
Report Date: 2024/10/25

SLR Consulting (Canada) Ltd.
Client Project #: 216.030059.00002
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

GLYCOLS BY GC-FID (WATER)

Bureau Veritas ID		AGHS11	AGHS12	AGHS13	AGHS14			
Sampling Date		2024/10/18 13:20	2024/10/18 11:00	2024/10/18	2024/10/18 13:00			
COC Number		C#1017617-01-01	C#1017617-01-01	C#1017617-01-01	C#1017617-01-01			
	UNITS	**MW24-06**	**MW24-08**	**DUP-1**	**FIELD BLANK**	**RDL**	**MDL**	**QC Batch**
Glycols								
Propylene Glycol	mg/L	<5	<5	<5	<5	5	1	9716083
Ethylene Glycol	mg/L	<5	<5	<5	<5	5	1	9716083
Diethylene Glycol	mg/L	<5	<5	<5	<5	5	1	9716083
Total Glycol	mg/L	<5	<5	<5	<5	5	1	9716083

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas Job #: C4W8659
Report Date: 2024/10/25

SLR Consulting (Canada) Ltd.
Client Project #: 216.030059.00002
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

ELEMENTS BY ATOMIC SPECTROSCOPY (WATER)

Bureau Veritas ID		AGHS11	AGHS12	AGHS13	AGHS14			
Sampling Date		2024/10/18 13:20	2024/10/18 11:00	2024/10/18	2024/10/18 13:00			
COC Number		C#1017617-01-01	C#1017617-01-01	C#1017617-01-01	C#1017617-01-01			
	UNITS	MW24-06	MW24-08	DUP-1	FIELD BLANK	RDL	MDL	QC Batch
Metals								
Chromium (VI)	ug/L	0.70	0.91	0.89	<0.50	0.50	0.30	9718601
Mercury (Hg)	ug/L	<0.10	<0.10	<0.10	<0.10	0.10	0.020	9719252
Dissolved Antimony (Sb)	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.20	9715987
Dissolved Arsenic (As)	ug/L	<1.0	<1.0	<1.0	<1.0	1.0	0.10	9715987
Dissolved Barium (Ba)	ug/L	200	54	54	<2.0	2.0	0.30	9715987
Dissolved Beryllium (Be)	ug/L	<0.40	<0.40	<0.40	<0.40	0.40	0.050	9715987
Dissolved Boron (B)	ug/L	18	15	15	<10	10	0.60	9715987
Dissolved Cadmium (Cd)	ug/L	<0.090	<0.090	<0.090	<0.090	0.090	0.090	9715987
Dissolved Chromium (Cr)	ug/L	<5.0	<5.0	<5.0	<5.0	5.0	0.70	9715987
Dissolved Cobalt (Co)	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.040	9715987
Dissolved Copper (Cu)	ug/L	<0.90	1.1	<0.90	<0.90	0.90	0.30	9715987
Dissolved Lead (Pb)	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9715987
Dissolved Molybdenum (Mo)	ug/L	0.71	0.89	0.86	<0.50	0.50	0.070	9715987
Dissolved Nickel (Ni)	ug/L	<1.0	<1.0	<1.0	<1.0	1.0	0.40	9715987
Dissolved Selenium (Se)	ug/L	<2.0	<2.0	<2.0	<2.0	2.0	0.20	9715987
Dissolved Silver (Ag)	ug/L	<0.090	<0.090	<0.090	<0.090	0.090	0.020	9715987
Dissolved Sodium (Na)	ug/L	600000	450000	470000	<100	100	20	9715987
Dissolved Thallium (Tl)	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.020	9715987
Dissolved Uranium (U)	ug/L	0.67	0.62	0.63	<0.10	0.10	0.010	9715987
Dissolved Vanadium (V)	ug/L	0.64	0.86	0.90	<0.50	0.50	0.090	9715987
Dissolved Zinc (Zn)	ug/L	<5.0	<5.0	<5.0	<5.0	5.0	1.0	9715987

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas Job #: C4W8659
Report Date: 2024/10/25

SLR Consulting (Canada) Ltd.
Client Project #: 216.030059.00002
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

SEMI-VOLATILE ORGANICS BY GC-MS (WATER)

Bureau Veritas ID		AGHS11	AGHS12	AGHS13	AGHS14			
Sampling Date		2024/10/18 13:20	2024/10/18 11:00	2024/10/18	2024/10/18 13:00			
COC Number		C#1017617-01-01	C#1017617-01-01	C#1017617-01-01	C#1017617-01-01			
	UNITS	**MW24-06**	**MW24-08**	**DUP-1**	**FIELD BLANK**	**RDL**	**MDL**	**QC Batch**
Calculated Parameters								
Methylnaphthalene, 2-(1-)	ug/L	<0.071	<0.071	<0.071	<0.071	0.071	N/A	9713473
Polyaromatic Hydrocarbons								
Acenaphthene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Acenaphthylene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Anthracene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Benzo(a)anthracene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Benzo(a)pyrene	ug/L	<0.0090	<0.0090	<0.0090	<0.0090	0.0090	0.0030	9721118
Benzo(b/j)fluoranthene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Benzo(g,h,i)perylene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Benzo(k)fluoranthene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Chrysene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Dibenzo(a,h)anthracene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Fluoranthene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Fluorene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Indeno(1,2,3-cd)pyrene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
1-Methylnaphthalene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
2-Methylnaphthalene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Naphthalene	ug/L	0.085	0.098	0.085	<0.050	0.050	0.0030	9721118
Phenanthrene	ug/L	<0.030	<0.030	<0.030	<0.030	0.030	0.0030	9721118
Pyrene	ug/L	<0.050	<0.050	<0.050	<0.050	0.050	0.0030	9721118
Surrogate Recovery (%)								
D10-Anthracene	%	108	104	97	109			9721118
D14-Terphenyl (FS)	%	106	103	93	111			9721118
D8-Acenaphthylene	%	102	97	91	103			9721118

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch
N/A = Not Applicable

VOLATILE ORGANICS BY GC/MS (WATER)

Bureau Veritas ID		AGHS11	AGHS12	AGHS13	AGHS14			
Sampling Date		2024/10/18 13:20	2024/10/18 11:00	2024/10/18	2024/10/18 13:00			
COC Number		C#1017617-01-01	C#1017617-01-01	C#1017617-01-01	C#1017617-01-01			
	UNITS	MW24-06	MW24-08	DUP-1	FIELD BLANK	RDL	MDL	QC Batch
Calculated Parameters								
1,3-Dichloropropene (cis+trans)	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.50	9713077
Volatile Organics								
Acetone (2-Propanone)	ug/L	<10	<10	<10	<10	10	1.0	9707011
Benzene	ug/L	<0.17	<0.17	<0.17	<0.17	0.17	0.020	9707011
Bromodichloromethane	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
Bromoform	ug/L	<1.0	<1.0	<1.0	<1.0	1.0	0.10	9707011
Bromomethane	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.10	9707011
Carbon Tetrachloride	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
Chlorobenzene	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.010	9707011
Chloroform	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
Dibromochloromethane	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
1,2-Dichlorobenzene	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
1,3-Dichlorobenzene	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
1,4-Dichlorobenzene	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
Dichlorodifluoromethane (FREON 12)	ug/L	<1.0	<1.0	<1.0	<1.0	1.0	0.050	9707011
1,1-Dichloroethane	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
1,2-Dichloroethane	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.020	9707011
1,1-Dichloroethylene	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
cis-1,2-Dichloroethylene	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
trans-1,2-Dichloroethylene	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
1,2-Dichloropropane	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
cis-1,3-Dichloropropene	ug/L	<0.30	<0.30	<0.30	<0.30	0.30	0.050	9707011
trans-1,3-Dichloropropene	ug/L	<0.40	<0.40	<0.40	<0.40	0.40	0.050	9707011
Ethylbenzene	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.010	9707011
Ethylene Dibromide	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
Hexane	ug/L	<1.0	<1.0	<1.0	<1.0	1.0	0.10	9707011
Methylene Chloride(Dichloromethane)	ug/L	<2.0	<2.0	<2.0	<2.0	2.0	0.10	9707011
Methyl Ethyl Ketone (2-Butanone)	ug/L	<10	<10	<10	<10	10	0.50	9707011
Methyl Isobutyl Ketone	ug/L	<5.0	<5.0	<5.0	<5.0	5.0	0.10	9707011
Methyl t-butyl ether (MTBE)	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
Styrene	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
1,1,1,2-Tetrachloroethane	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
1,1,2,2-Tetrachloroethane	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas Job #: C4W8659
Report Date: 2024/10/25

SLR Consulting (Canada) Ltd.
Client Project #: 216.030059.00002
Site Location: SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Your P.O. #: OTT2947
Sampler Initials: MS

VOLATILE ORGANICS BY GC/MS (WATER)

Bureau Veritas ID		AGHS11	AGHS12	AGHS13	AGHS14			
Sampling Date		2024/10/18 13:20	2024/10/18 11:00	2024/10/18	2024/10/18 13:00			
COC Number		C#1017617-01-01	C#1017617-01-01	C#1017617-01-01	C#1017617-01-01			
	UNITS	**MW24-06**	**MW24-08**	**DUP-1**	**FIELD BLANK**	**RDL**	**MDL**	**QC Batch**
Tetrachloroethylene	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
Toluene	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.010	9707011
1,1,1-Trichloroethane	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
1,1,2-Trichloroethane	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.050	9707011
Trichloroethylene	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
Trichlorofluoromethane (FREON 11)	ug/L	<0.50	<0.50	<0.50	<0.50	0.50	0.10	9707011
Vinyl Chloride	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.050	9707011
p+m-Xylene	ug/L	<0.20	<0.20	0.20	<0.20	0.20	0.010	9707011
o-Xylene	ug/L	<0.20	<0.20	<0.20	<0.20	0.20	0.010	9707011
Total Xylenes	ug/L	<0.20	<0.20	0.20	<0.20	0.20	0.010	9707011
F1 (C6-C10)	ug/L	<25	<25	<25	<25	25	20	9707011
F1 (C6-C10) - BTEX	ug/L	<25	<25	<25	<25	25	20	9707011
Surrogate Recovery (%)								
4-Bromofluorobenzene	%	102	103	101	104			9707011
D4-1,2-Dichloroethane	%	101	103	104	105			9707011
D8-Toluene	%	93	92	92	92			9707011

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

VOLATILE ORGANICS BY GC/MS (WATER)

Bureau Veritas ID		AGHS15			
Sampling Date		2024/10/18 11:15			
COC Number		C#1017617-01-01			
	UNITS	TRIP BLANK	RDL	MDL	QC Batch
Calculated Parameters					
1,3-Dichloropropene (cis+trans)	ug/L	<0.50	0.50	0.50	9713077
Volatile Organics					
Acetone (2-Propanone)	ug/L	<10	10	1.0	9707011
Benzene	ug/L	<0.17	0.17	0.020	9707011
Bromodichloromethane	ug/L	<0.50	0.50	0.050	9707011
Bromoform	ug/L	<1.0	1.0	0.10	9707011
Bromomethane	ug/L	<0.50	0.50	0.10	9707011
Carbon Tetrachloride	ug/L	<0.20	0.20	0.050	9707011
Chlorobenzene	ug/L	<0.20	0.20	0.010	9707011
Chloroform	ug/L	<0.20	0.20	0.050	9707011
Dibromochloromethane	ug/L	<0.50	0.50	0.050	9707011
1,2-Dichlorobenzene	ug/L	<0.50	0.50	0.050	9707011
1,3-Dichlorobenzene	ug/L	<0.50	0.50	0.050	9707011
1,4-Dichlorobenzene	ug/L	<0.50	0.50	0.050	9707011
Dichlorodifluoromethane (FREON 12)	ug/L	<1.0	1.0	0.050	9707011
1,1-Dichloroethane	ug/L	<0.20	0.20	0.050	9707011
1,2-Dichloroethane	ug/L	<0.50	0.50	0.020	9707011
1,1-Dichloroethylene	ug/L	<0.20	0.20	0.050	9707011
cis-1,2-Dichloroethylene	ug/L	<0.50	0.50	0.050	9707011
trans-1,2-Dichloroethylene	ug/L	<0.50	0.50	0.050	9707011
1,2-Dichloropropane	ug/L	<0.20	0.20	0.050	9707011
cis-1,3-Dichloropropene	ug/L	<0.30	0.30	0.050	9707011
trans-1,3-Dichloropropene	ug/L	<0.40	0.40	0.050	9707011
Ethylbenzene	ug/L	<0.20	0.20	0.010	9707011
Ethylene Dibromide	ug/L	<0.20	0.20	0.050	9707011
Hexane	ug/L	<1.0	1.0	0.10	9707011
Methylene Chloride(Dichloromethane)	ug/L	<2.0	2.0	0.10	9707011
Methyl Ethyl Ketone (2-Butanone)	ug/L	<10	10	0.50	9707011
Methyl Isobutyl Ketone	ug/L	<5.0	5.0	0.10	9707011
Methyl t-butyl ether (MTBE)	ug/L	<0.50	0.50	0.050	9707011
Styrene	ug/L	<0.50	0.50	0.050	9707011
1,1,1,2-Tetrachloroethane	ug/L	<0.50	0.50	0.050	9707011
1,1,2,2-Tetrachloroethane	ug/L	<0.50	0.50	0.050	9707011

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

VOLATILE ORGANICS BY GC/MS (WATER)

Bureau Veritas ID		AGHS15			
Sampling Date		2024/10/18 11:15			
COC Number		C#1017617-01-01			
	UNITS	**TRIP BLANK**	**RDL**	**MDL**	**QC Batch**
Tetrachloroethylene	ug/L	<0.20	0.20	0.050	9707011
Toluene	ug/L	<0.20	0.20	0.010	9707011
1,1,1-Trichloroethane	ug/L	<0.20	0.20	0.050	9707011
1,1,2-Trichloroethane	ug/L	<0.50	0.50	0.050	9707011
Trichloroethylene	ug/L	<0.20	0.20	0.050	9707011
Trichlorofluoromethane (FREON 11)	ug/L	<0.50	0.50	0.10	9707011
Vinyl Chloride	ug/L	<0.20	0.20	0.050	9707011
p+m-Xylene	ug/L	<0.20	0.20	0.010	9707011
o-Xylene	ug/L	<0.20	0.20	0.010	9707011
Total Xylenes	ug/L	<0.20	0.20	0.010	9707011
F1 (C6-C10)	ug/L	<25	25	20	9707011
F1 (C6-C10) - BTEX	ug/L	<25	25	20	9707011
Surrogate Recovery (%)					
4-Bromofluorobenzene	%	103			9707011
D4-1,2-Dichloroethane	%	102			9707011
D8-Toluene	%	93			9707011

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

PETROLEUM HYDROCARBONS (CCME)

Bureau Veritas ID		AGHS11	AGHS12	AGHS13	AGHS14			
Sampling Date		2024/10/18 13:20	2024/10/18 11:00	2024/10/18	2024/10/18 13:00			
COC Number		C#1017617-01-01	C#1017617-01-01	C#1017617-01-01	C#1017617-01-01			
	UNITS	MW24-06	MW24-08	DUP-1	FIELD BLANK	RDL	MDL	QC Batch
F2-F4 Hydrocarbons								
F2 (C10-C16 Hydrocarbons)	ug/L	<90	<90	<90	<90	90	50	9721111
F3 (C16-C34 Hydrocarbons)	ug/L	<200	<200	<200	<200	200	70	9721111
F4 (C34-C50 Hydrocarbons)	ug/L	<200	<200	<200	<200	200	50	9721111
Reached Baseline at C50	ug/L	Yes	Yes	Yes	Yes			9721111
Surrogate Recovery (%)								
o-Terphenyl	%	101	99	101	101			9721111

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

Bureau Veritas ID		AGHS15			
Sampling Date		2024/10/18 11:15			
COC Number		C#1017617-01-01			
	UNITS	TRIP BLANK	RDL	MDL	QC Batch
F2-F4 Hydrocarbons					
F2 (C10-C16 Hydrocarbons)	ug/L	<90	90	50	9721111
F3 (C16-C34 Hydrocarbons)	ug/L	<200	200	70	9721111
F4 (C34-C50 Hydrocarbons)	ug/L	<200	200	50	9721111
Reached Baseline at C50	ug/L	Yes			9721111
Surrogate Recovery (%)					
o-Terphenyl	%	103			9721111

RDL = Reportable Detection Limit
QC Batch = Quality Control Batch

GENERAL COMMENTS

Results relate only to the items tested.

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

QUALITY ASSURANCE REPORT

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
9707011	BG1	Matrix Spike [AGHS11-06]	4-Bromofluorobenzene	2024/10/24		105	%	70 - 130
			D4-1,2-Dichloroethane	2024/10/24		101	%	70 - 130
			D8-Toluene	2024/10/24		101	%	70 - 130
			Acetone (2-Propanone)	2024/10/24		96	%	60 - 140
			Benzene	2024/10/24		96	%	70 - 130
			Bromodichloromethane	2024/10/24		95	%	70 - 130
			Bromoform	2024/10/24		102	%	70 - 130
			Bromomethane	2024/10/24		81	%	60 - 140
			Carbon Tetrachloride	2024/10/24		102	%	70 - 130
			Chlorobenzene	2024/10/24		91	%	70 - 130
			Chloroform	2024/10/24		94	%	70 - 130
			Dibromochloromethane	2024/10/24		100	%	70 - 130
			1,2-Dichlorobenzene	2024/10/24		100	%	70 - 130
			1,3-Dichlorobenzene	2024/10/24		98	%	70 - 130
			1,4-Dichlorobenzene	2024/10/24		98	%	70 - 130
			Dichlorodifluoromethane (FREON 12)	2024/10/24		85	%	60 - 140
			1,1-Dichloroethane	2024/10/24		90	%	70 - 130
			1,2-Dichloroethane	2024/10/24		103	%	70 - 130
			1,1-Dichloroethylene	2024/10/24		93	%	70 - 130
			cis-1,2-Dichloroethylene	2024/10/24		99	%	70 - 130
			trans-1,2-Dichloroethylene	2024/10/24		99	%	70 - 130
			1,2-Dichloropropane	2024/10/24		92	%	70 - 130
			cis-1,3-Dichloropropene	2024/10/24		90	%	70 - 130
			trans-1,3-Dichloropropene	2024/10/24		100	%	70 - 130
			Ethylbenzene	2024/10/24		91	%	70 - 130
			Ethylene Dibromide	2024/10/24		97	%	70 - 130
			Hexane	2024/10/24		101	%	70 - 130
			Methylene Chloride(Dichloromethane)	2024/10/24		95	%	70 - 130
			Methyl Ethyl Ketone (2-Butanone)	2024/10/24		100	%	60 - 140
			Methyl Isobutyl Ketone	2024/10/24		96	%	70 - 130
			Methyl t-butyl ether (MTBE)	2024/10/24		95	%	70 - 130
			Styrene	2024/10/24		92	%	70 - 130
			1,1,1,2-Tetrachloroethane	2024/10/24		107	%	70 - 130
			1,1,2,2-Tetrachloroethane	2024/10/24		89	%	70 - 130
			Tetrachloroethylene	2024/10/24		99	%	70 - 130
			Toluene	2024/10/24		94	%	70 - 130
			1,1,1-Trichloroethane	2024/10/24		93	%	70 - 130
			1,1,2-Trichloroethane	2024/10/24		98	%	70 - 130
			Trichloroethylene	2024/10/24		101	%	70 - 130
			Trichlorofluoromethane (FREON 11)	2024/10/24		92	%	70 - 130
			Vinyl Chloride	2024/10/24		89	%	70 - 130
			p+m-Xylene	2024/10/24		91	%	70 - 130
			o-Xylene	2024/10/24		99	%	70 - 130
			F1 (C6-C10)	2024/10/24		90	%	60 - 140
9707011	BG1	Spiked Blank	4-Bromofluorobenzene	2024/10/24		105	%	70 - 130
			D4-1,2-Dichloroethane	2024/10/24		99	%	70 - 130
			D8-Toluene	2024/10/24		99	%	70 - 130
			Acetone (2-Propanone)	2024/10/24		96	%	60 - 140
			Benzene	2024/10/24		98	%	70 - 130
			Bromodichloromethane	2024/10/24		95	%	70 - 130
			Bromoform	2024/10/24		101	%	70 - 130
			Bromomethane	2024/10/24		82	%	60 - 140

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Carbon Tetrachloride	2024/10/24		103	%	70 - 130
			Chlorobenzene	2024/10/24		92	%	70 - 130
			Chloroform	2024/10/24		95	%	70 - 130
			Dibromochloromethane	2024/10/24		98	%	70 - 130
			1,2-Dichlorobenzene	2024/10/24		100	%	70 - 130
			1,3-Dichlorobenzene	2024/10/24		99	%	70 - 130
			1,4-Dichlorobenzene	2024/10/24		100	%	70 - 130
			Dichlorodifluoromethane (FREON 12)	2024/10/24		89	%	60 - 140
			1,1-Dichloroethane	2024/10/24		91	%	70 - 130
			1,2-Dichloroethane	2024/10/24		101	%	70 - 130
			1,1-Dichloroethylene	2024/10/24		95	%	70 - 130
			cis-1,2-Dichloroethylene	2024/10/24		100	%	70 - 130
			trans-1,2-Dichloroethylene	2024/10/24		101	%	70 - 130
			1,2-Dichloropropane	2024/10/24		93	%	70 - 130
			cis-1,3-Dichloropropene	2024/10/24		91	%	70 - 130
			trans-1,3-Dichloropropene	2024/10/24		101	%	70 - 130
			Ethylbenzene	2024/10/24		94	%	70 - 130
			Ethylene Dibromide	2024/10/24		95	%	70 - 130
			Hexane	2024/10/24		107	%	70 - 130
			Methylene Chloride(Dichloromethane)	2024/10/24		95	%	70 - 130
			Methyl Ethyl Ketone (2-Butanone)	2024/10/24		100	%	60 - 140
			Methyl Isobutyl Ketone	2024/10/24		98	%	70 - 130
			Methyl t-butyl ether (MTBE)	2024/10/24		97	%	70 - 130
			Styrene	2024/10/24		96	%	70 - 130
			1,1,1,2-Tetrachloroethane	2024/10/24		105	%	70 - 130
			1,1,2,2-Tetrachloroethane	2024/10/24		87	%	70 - 130
			Tetrachloroethylene	2024/10/24		99	%	70 - 130
			Toluene	2024/10/24		96	%	70 - 130
			1,1,1-Trichloroethane	2024/10/24		95	%	70 - 130
			1,1,2-Trichloroethane	2024/10/24		96	%	70 - 130
			Trichloroethylene	2024/10/24		103	%	70 - 130
			Trichlorofluoromethane (FREON 11)	2024/10/24		93	%	70 - 130
			Vinyl Chloride	2024/10/24		91	%	70 - 130
			p+m-Xylene	2024/10/24		93	%	70 - 130
			o-Xylene	2024/10/24		101	%	70 - 130
			F1 (C6-C10)	2024/10/24		94	%	60 - 140
9707011	BG1	Method Blank	4-Bromofluorobenzene	2024/10/24		103	%	70 - 130
			D4-1,2-Dichloroethane	2024/10/24		100	%	70 - 130
			D8-Toluene	2024/10/24		94	%	70 - 130
			Acetone (2-Propanone)	2024/10/24	<10		ug/L	
			Benzene	2024/10/24	<0.17		ug/L	
			Bromodichloromethane	2024/10/24	<0.50		ug/L	
			Bromoform	2024/10/24	<1.0		ug/L	
			Bromomethane	2024/10/24	<0.50		ug/L	
			Carbon Tetrachloride	2024/10/24	<0.20		ug/L	
			Chlorobenzene	2024/10/24	<0.20		ug/L	
			Chloroform	2024/10/24	<0.20		ug/L	
			Dibromochloromethane	2024/10/24	<0.50		ug/L	
			1,2-Dichlorobenzene	2024/10/24	<0.50		ug/L	
			1,3-Dichlorobenzene	2024/10/24	<0.50		ug/L	
			1,4-Dichlorobenzene	2024/10/24	<0.50		ug/L	
			Dichlorodifluoromethane (FREON 12)	2024/10/24	<1.0		ug/L	

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			1,1-Dichloroethane	2024/10/24	<0.20		ug/L	
			1,2-Dichloroethane	2024/10/24	<0.50		ug/L	
			1,1-Dichloroethylene	2024/10/24	<0.20		ug/L	
			cis-1,2-Dichloroethylene	2024/10/24	<0.50		ug/L	
			trans-1,2-Dichloroethylene	2024/10/24	<0.50		ug/L	
			1,2-Dichloropropane	2024/10/24	<0.20		ug/L	
			cis-1,3-Dichloropropene	2024/10/24	<0.30		ug/L	
			trans-1,3-Dichloropropene	2024/10/24	<0.40		ug/L	
			Ethylbenzene	2024/10/24	<0.20		ug/L	
			Ethylene Dibromide	2024/10/24	<0.20		ug/L	
			Hexane	2024/10/24	<1.0		ug/L	
			Methylene Chloride(Dichloromethane)	2024/10/24	<2.0		ug/L	
			Methyl Ethyl Ketone (2-Butanone)	2024/10/24	<10		ug/L	
			Methyl Isobutyl Ketone	2024/10/24	<5.0		ug/L	
			Methyl t-butyl ether (MTBE)	2024/10/24	<0.50		ug/L	
			Styrene	2024/10/24	<0.50		ug/L	
			1,1,1,2-Tetrachloroethane	2024/10/24	<0.50		ug/L	
			1,1,2,2-Tetrachloroethane	2024/10/24	<0.50		ug/L	
			Tetrachloroethylene	2024/10/24	<0.20		ug/L	
			Toluene	2024/10/24	<0.20		ug/L	
			1,1,1-Trichloroethane	2024/10/24	<0.20		ug/L	
			1,1,2-Trichloroethane	2024/10/24	<0.50		ug/L	
			Trichloroethylene	2024/10/24	<0.20		ug/L	
			Trichlorofluoromethane (FREON 11)	2024/10/24	<0.50		ug/L	
			Vinyl Chloride	2024/10/24	<0.20		ug/L	
			p+m-Xylene	2024/10/24	<0.20		ug/L	
			o-Xylene	2024/10/24	<0.20		ug/L	
			Total Xylenes	2024/10/24	<0.20		ug/L	
			F1 (C6-C10)	2024/10/24	<25		ug/L	
			F1 (C6-C10) - BTEX	2024/10/24	<25		ug/L	
9707011	BG1	RPD [AGHS11-06]	Acetone (2-Propanone)	2024/10/24	NC		%	30
			Benzene	2024/10/24	NC		%	30
			Bromodichloromethane	2024/10/24	NC		%	30
			Bromoform	2024/10/24	NC		%	30
			Bromomethane	2024/10/24	NC		%	30
			Carbon Tetrachloride	2024/10/24	NC		%	30
			Chlorobenzene	2024/10/24	NC		%	30
			Chloroform	2024/10/24	NC		%	30
			Dibromochloromethane	2024/10/24	NC		%	30
			1,2-Dichlorobenzene	2024/10/24	NC		%	30
			1,3-Dichlorobenzene	2024/10/24	NC		%	30
			1,4-Dichlorobenzene	2024/10/24	NC		%	30
			Dichlorodifluoromethane (FREON 12)	2024/10/24	NC		%	30
			1,1-Dichloroethane	2024/10/24	NC		%	30
			1,2-Dichloroethane	2024/10/24	NC		%	30
			1,1-Dichloroethylene	2024/10/24	NC		%	30
			cis-1,2-Dichloroethylene	2024/10/24	NC		%	30
			trans-1,2-Dichloroethylene	2024/10/24	NC		%	30
			1,2-Dichloropropane	2024/10/24	NC		%	30
			cis-1,3-Dichloropropene	2024/10/24	NC		%	30
			trans-1,3-Dichloropropene	2024/10/24	NC		%	30
			Ethylbenzene	2024/10/24	NC		%	30

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Ethylene Dibromide	2024/10/24	NC		%	30
			Hexane	2024/10/24	NC		%	30
			Methylene Chloride(Dichloromethane)	2024/10/24	NC		%	30
			Methyl Ethyl Ketone (2-Butanone)	2024/10/24	NC		%	30
			Methyl Isobutyl Ketone	2024/10/24	NC		%	30
			Methyl t-butyl ether (MTBE)	2024/10/24	NC		%	30
			Styrene	2024/10/24	NC		%	30
			1,1,1,2-Tetrachloroethane	2024/10/24	NC		%	30
			1,1,2,2-Tetrachloroethane	2024/10/24	NC		%	30
			Tetrachloroethylene	2024/10/24	NC		%	30
			Toluene	2024/10/24	NC		%	30
			1,1,1-Trichloroethane	2024/10/24	NC		%	30
			1,1,2-Trichloroethane	2024/10/24	NC		%	30
			Trichloroethylene	2024/10/24	NC		%	30
			Trichlorofluoromethane (FREON 11)	2024/10/24	NC		%	30
			Vinyl Chloride	2024/10/24	NC		%	30
			p+m-Xylene	2024/10/24	NC		%	30
			o-Xylene	2024/10/24	NC		%	30
			Total Xylenes	2024/10/24	NC		%	30
			F1 (C6-C10)	2024/10/24	NC		%	30
			F1 (C6-C10) - BTEX	2024/10/24	NC		%	30
9715987	IHP	Matrix Spike	Dissolved Antimony (Sb)	2024/10/23		101	%	80 - 120
			Dissolved Arsenic (As)	2024/10/23		98	%	80 - 120
			Dissolved Barium (Ba)	2024/10/23		98	%	80 - 120
			Dissolved Beryllium (Be)	2024/10/23		102	%	80 - 120
			Dissolved Boron (B)	2024/10/23		99	%	80 - 120
			Dissolved Cadmium (Cd)	2024/10/23		96	%	80 - 120
			Dissolved Chromium (Cr)	2024/10/23		100	%	80 - 120
			Dissolved Cobalt (Co)	2024/10/23		97	%	80 - 120
			Dissolved Copper (Cu)	2024/10/23		97	%	80 - 120
			Dissolved Lead (Pb)	2024/10/23		95	%	80 - 120
			Dissolved Molybdenum (Mo)	2024/10/23		102	%	80 - 120
			Dissolved Nickel (Ni)	2024/10/23		92	%	80 - 120
			Dissolved Selenium (Se)	2024/10/23		99	%	80 - 120
			Dissolved Silver (Ag)	2024/10/23		90	%	80 - 120
			Dissolved Sodium (Na)	2024/10/23		90	%	80 - 120
			Dissolved Thallium (Tl)	2024/10/23		98	%	80 - 120
			Dissolved Uranium (U)	2024/10/23		98	%	80 - 120
			Dissolved Vanadium (V)	2024/10/23		99	%	80 - 120
			Dissolved Zinc (Zn)	2024/10/23		95	%	80 - 120
9715987	IHP	Spiked Blank	Dissolved Antimony (Sb)	2024/10/23		98	%	80 - 120
			Dissolved Arsenic (As)	2024/10/23		97	%	80 - 120
			Dissolved Barium (Ba)	2024/10/23		97	%	80 - 120
			Dissolved Beryllium (Be)	2024/10/23		97	%	80 - 120
			Dissolved Boron (B)	2024/10/23		94	%	80 - 120
			Dissolved Cadmium (Cd)	2024/10/23		94	%	80 - 120
			Dissolved Chromium (Cr)	2024/10/23		102	%	80 - 120
			Dissolved Cobalt (Co)	2024/10/23		99	%	80 - 120
			Dissolved Copper (Cu)	2024/10/23		99	%	80 - 120
			Dissolved Lead (Pb)	2024/10/23		93	%	80 - 120
			Dissolved Molybdenum (Mo)	2024/10/23		97	%	80 - 120
			Dissolved Nickel (Ni)	2024/10/23		94	%	80 - 120

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Dissolved Selenium (Se)	2024/10/23		97	%	80 - 120
			Dissolved Silver (Ag)	2024/10/23		90	%	80 - 120
			Dissolved Sodium (Na)	2024/10/23		96	%	80 - 120
			Dissolved Thallium (Tl)	2024/10/23		94	%	80 - 120
			Dissolved Uranium (U)	2024/10/23		95	%	80 - 120
			Dissolved Vanadium (V)	2024/10/23		95	%	80 - 120
			Dissolved Zinc (Zn)	2024/10/23		94	%	80 - 120
9715987	IHP	Method Blank	Dissolved Antimony (Sb)	2024/10/23	<0.50		ug/L	
			Dissolved Arsenic (As)	2024/10/23	<1.0		ug/L	
			Dissolved Barium (Ba)	2024/10/23	<2.0		ug/L	
			Dissolved Beryllium (Be)	2024/10/23	<0.40		ug/L	
			Dissolved Boron (B)	2024/10/23	<10		ug/L	
			Dissolved Cadmium (Cd)	2024/10/23	<0.090		ug/L	
			Dissolved Chromium (Cr)	2024/10/23	<5.0		ug/L	
			Dissolved Cobalt (Co)	2024/10/23	<0.50		ug/L	
			Dissolved Copper (Cu)	2024/10/23	<0.90		ug/L	
			Dissolved Lead (Pb)	2024/10/23	<0.50		ug/L	
			Dissolved Molybdenum (Mo)	2024/10/23	<0.50		ug/L	
			Dissolved Nickel (Ni)	2024/10/23	<1.0		ug/L	
			Dissolved Selenium (Se)	2024/10/23	<2.0		ug/L	
			Dissolved Silver (Ag)	2024/10/23	<0.090		ug/L	
			Dissolved Sodium (Na)	2024/10/23	<100		ug/L	
			Dissolved Thallium (Tl)	2024/10/23	<0.050		ug/L	
			Dissolved Uranium (U)	2024/10/23	<0.10		ug/L	
			Dissolved Vanadium (V)	2024/10/23	<0.50		ug/L	
			Dissolved Zinc (Zn)	2024/10/23	<5.0		ug/L	
9715987	IHP	RPD	Dissolved Antimony (Sb)	2024/10/23	NC		%	20
			Dissolved Arsenic (As)	2024/10/23	NC		%	20
			Dissolved Barium (Ba)	2024/10/23	1.1		%	20
			Dissolved Beryllium (Be)	2024/10/23	NC		%	20
			Dissolved Boron (B)	2024/10/23	6.0		%	20
			Dissolved Cadmium (Cd)	2024/10/23	NC		%	20
			Dissolved Chromium (Cr)	2024/10/23	NC		%	20
			Dissolved Cobalt (Co)	2024/10/23	NC		%	20
			Dissolved Copper (Cu)	2024/10/23	4.8		%	20
			Dissolved Lead (Pb)	2024/10/23	NC		%	20
			Dissolved Molybdenum (Mo)	2024/10/23	NC		%	20
			Dissolved Nickel (Ni)	2024/10/23	NC		%	20
			Dissolved Selenium (Se)	2024/10/23	NC		%	20
			Dissolved Silver (Ag)	2024/10/23	NC		%	20
			Dissolved Sodium (Na)	2024/10/23	0.75		%	20
			Dissolved Thallium (Tl)	2024/10/23	NC		%	20
			Dissolved Uranium (U)	2024/10/23	5.1		%	20
			Dissolved Vanadium (V)	2024/10/23	NC		%	20
			Dissolved Zinc (Zn)	2024/10/23	NC		%	20
9716083	DAN	Matrix Spike [AGHS11-07]	Propylene Glycol	2024/10/22		105	%	60 - 140
			Ethylene Glycol	2024/10/22		98	%	60 - 140
			Diethylene Glycol	2024/10/22		91	%	60 - 140
9716083	DAN	Spiked Blank	Propylene Glycol	2024/10/22		107	%	60 - 140
			Ethylene Glycol	2024/10/22		101	%	60 - 140
			Diethylene Glycol	2024/10/22		90	%	60 - 140
9716083	DAN	Method Blank	Propylene Glycol	2024/10/22	<5		mg/L	

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Ethylene Glycol	2024/10/22	<5		mg/L	
			Diethylene Glycol	2024/10/22	<5		mg/L	
			Total Glycol	2024/10/22	<5		mg/L	
9716083	DAN	RPD [AGHS11-07]	Propylene Glycol	2024/10/22	NC		%	40
			Ethylene Glycol	2024/10/22	NC		%	40
			Diethylene Glycol	2024/10/22	NC		%	40
			Total Glycol	2024/10/22	NC		%	40
9718601	HK1	Matrix Spike	Chromium (VI)	2024/10/23		96	%	80 - 120
9718601	HK1	Spiked Blank	Chromium (VI)	2024/10/23		102	%	80 - 120
9718601	HK1	Method Blank	Chromium (VI)	2024/10/23	<0.50		ug/L	
9718601	HK1	RPD	Chromium (VI)	2024/10/23	NC		%	20
9719252	GR1	Matrix Spike	Mercury (Hg)	2024/10/23		96	%	75 - 125
9719252	GR1	Spiked Blank	Mercury (Hg)	2024/10/23		96	%	80 - 120
9719252	GR1	Method Blank	Mercury (Hg)	2024/10/23	<0.10		ug/L	
9719252	GR1	RPD	Mercury (Hg)	2024/10/23	NC		%	20
9719537	ADB	Matrix Spike	Dissolved Chloride (Cl-)	2024/10/24		NC	%	80 - 120
9719537	ADB	Spiked Blank	Dissolved Chloride (Cl-)	2024/10/24		98	%	80 - 120
9719537	ADB	Method Blank	Dissolved Chloride (Cl-)	2024/10/24	<1.0		mg/L	
9719537	ADB	RPD	Dissolved Chloride (Cl-)	2024/10/24	2.0		%	20
9720591	MJ1	Matrix Spike [AGHS12-04]	Dissolved Chloride (Cl-)	2024/10/25		NC	%	80 - 120
9720591	MJ1	Spiked Blank	Dissolved Chloride (Cl-)	2024/10/25		104	%	80 - 120
9720591	MJ1	Method Blank	Dissolved Chloride (Cl-)	2024/10/25	<1.0		mg/L	
9720591	MJ1	RPD [AGHS12-04]	Dissolved Chloride (Cl-)	2024/10/25	1.4		%	20
9721111	MSZ	Matrix Spike [AGHS11-01]	o-Terphenyl	2024/10/24		104	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/24		100	%	60 - 140
			F3 (C16-C34 Hydrocarbons)	2024/10/24		104	%	60 - 140
			F4 (C34-C50 Hydrocarbons)	2024/10/24		96	%	60 - 140
9721111	MSZ	Spiked Blank	o-Terphenyl	2024/10/24		106	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/24		100	%	60 - 140
			F3 (C16-C34 Hydrocarbons)	2024/10/24		104	%	60 - 140
			F4 (C34-C50 Hydrocarbons)	2024/10/24		97	%	60 - 140
9721111	MSZ	Method Blank	o-Terphenyl	2024/10/24		101	%	60 - 140
			F2 (C10-C16 Hydrocarbons)	2024/10/24	<90		ug/L	
			F3 (C16-C34 Hydrocarbons)	2024/10/24	<200		ug/L	
			F4 (C34-C50 Hydrocarbons)	2024/10/24	<200		ug/L	
9721111	MSZ	RPD [AGHS12-01]	F2 (C10-C16 Hydrocarbons)	2024/10/24	NC		%	30
			F3 (C16-C34 Hydrocarbons)	2024/10/24	NC		%	30
			F4 (C34-C50 Hydrocarbons)	2024/10/24	NC		%	30
9721118	JP5	Matrix Spike [AGHS13-01]	D10-Anthracene	2024/10/24		113	%	50 - 130
			D14-Terphenyl (FS)	2024/10/24		114	%	50 - 130
			D8-Acenaphthylene	2024/10/24		107	%	50 - 130
			Acenaphthene	2024/10/24		114	%	50 - 130
			Acenaphthylene	2024/10/24		116	%	50 - 130
			Anthracene	2024/10/24		117	%	50 - 130
			Benzo(a)anthracene	2024/10/24		125	%	50 - 130
			Benzo(a)pyrene	2024/10/24		124	%	50 - 130
			Benzo(b/j)fluoranthene	2024/10/24		120	%	50 - 130
			Benzo(g,h,i)perylene	2024/10/24		122	%	50 - 130
			Benzo(k)fluoranthene	2024/10/24		115	%	50 - 130
			Chrysene	2024/10/24		112	%	50 - 130
			Dibenzo(a,h)anthracene	2024/10/24		123	%	50 - 130
			Fluoranthene	2024/10/24		131 (1)	%	50 - 130

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Fluorene	2024/10/24		120	%	50 - 130
			Indeno(1,2,3-cd)pyrene	2024/10/24		126	%	50 - 130
			1-Methylnaphthalene	2024/10/24		99	%	50 - 130
			2-Methylnaphthalene	2024/10/24		98	%	50 - 130
			Naphthalene	2024/10/24		101	%	50 - 130
			Phenanthrene	2024/10/24		118	%	50 - 130
			Pyrene	2024/10/24		128	%	50 - 130
9721118	JP5	Spiked Blank	D10-Anthracene	2024/10/24		107	%	50 - 130
			D14-Terphenyl (FS)	2024/10/24		110	%	50 - 130
			D8-Acenaphthylene	2024/10/24		99	%	50 - 130
			Acenaphthene	2024/10/24		100	%	50 - 130
			Acenaphthylene	2024/10/24		101	%	50 - 130
			Anthracene	2024/10/24		105	%	50 - 130
			Benzo(a)anthracene	2024/10/24		111	%	50 - 130
			Benzo(a)pyrene	2024/10/24		111	%	50 - 130
			Benzo(b/j)fluoranthene	2024/10/24		108	%	50 - 130
			Benzo(g,h,i)perylene	2024/10/24		111	%	50 - 130
			Benzo(k)fluoranthene	2024/10/24		104	%	50 - 130
			Chrysene	2024/10/24		101	%	50 - 130
			Dibenzo(a,h)anthracene	2024/10/24		112	%	50 - 130
			Fluoranthene	2024/10/24		117	%	50 - 130
			Fluorene	2024/10/24		105	%	50 - 130
			Indeno(1,2,3-cd)pyrene	2024/10/24		114	%	50 - 130
			1-Methylnaphthalene	2024/10/24		87	%	50 - 130
			2-Methylnaphthalene	2024/10/24		86	%	50 - 130
			Naphthalene	2024/10/24		89	%	50 - 130
			Phenanthrene	2024/10/24		106	%	50 - 130
			Pyrene	2024/10/24		113	%	50 - 130
9721118	JP5	Method Blank	D10-Anthracene	2024/10/24		113	%	50 - 130
			D14-Terphenyl (FS)	2024/10/24		117	%	50 - 130
			D8-Acenaphthylene	2024/10/24		107	%	50 - 130
			Acenaphthene	2024/10/24	<0.050		ug/L	
			Acenaphthylene	2024/10/24	<0.050		ug/L	
			Anthracene	2024/10/24	<0.050		ug/L	
			Benzo(a)anthracene	2024/10/24	<0.050		ug/L	
			Benzo(a)pyrene	2024/10/24	<0.0090		ug/L	
			Benzo(b/j)fluoranthene	2024/10/24	<0.050		ug/L	
			Benzo(g,h,i)perylene	2024/10/24	<0.050		ug/L	
			Benzo(k)fluoranthene	2024/10/24	<0.050		ug/L	
			Chrysene	2024/10/24	<0.050		ug/L	
			Dibenzo(a,h)anthracene	2024/10/24	<0.050		ug/L	
			Fluoranthene	2024/10/24	<0.050		ug/L	
			Fluorene	2024/10/24	<0.050		ug/L	
			Indeno(1,2,3-cd)pyrene	2024/10/24	<0.050		ug/L	
			1-Methylnaphthalene	2024/10/24	<0.050		ug/L	
			2-Methylnaphthalene	2024/10/24	<0.050		ug/L	
			Naphthalene	2024/10/24	<0.050		ug/L	
			Phenanthrene	2024/10/24	<0.030		ug/L	
			Pyrene	2024/10/24	<0.050		ug/L	
9721118	JP5	RPD [AGHS12-01]	Acenaphthene	2024/10/24	NC		%	30
			Acenaphthylene	2024/10/24	NC		%	30
			Anthracene	2024/10/24	NC		%	30

QUALITY ASSURANCE REPORT(CONT'D)

QA/QC Batch	Init	QC Type	Parameter	Date Analyzed	Value	Recovery	UNITS	QC Limits
			Benzo(a)anthracene	2024/10/24	NC		%	30
			Benzo(a)pyrene	2024/10/24	NC		%	30
			Benzo(b/j)fluoranthene	2024/10/24	NC		%	30
			Benzo(g,h,i)perylene	2024/10/24	NC		%	30
			Benzo(k)fluoranthene	2024/10/24	NC		%	30
			Chrysene	2024/10/24	NC		%	30
			Dibenzo(a,h)anthracene	2024/10/24	NC		%	30
			Fluoranthene	2024/10/24	NC		%	30
			Fluorene	2024/10/24	NC		%	30
			Indeno(1,2,3-cd)pyrene	2024/10/24	NC		%	30
			1-Methylnaphthalene	2024/10/24	NC		%	30
			2-Methylnaphthalene	2024/10/24	NC		%	30
			Naphthalene	2024/10/24	2.2		%	30
			Phenanthrene	2024/10/24	NC		%	30
			Pyrene	2024/10/24	NC		%	30

Duplicate: Paired analysis of a separate portion of the same sample. Used to evaluate the variance in the measurement.

Matrix Spike: A sample to which a known amount of the analyte of interest has been added. Used to evaluate sample matrix interference.

Spiked Blank: A blank matrix sample to which a known amount of the analyte, usually from a second source, has been added. Used to evaluate method accuracy.

Method Blank: A blank matrix containing all reagents used in the analytical procedure. Used to identify laboratory contamination.

Surrogate: A pure or isotopically labeled compound whose behavior mirrors the analytes of interest. Used to evaluate extraction efficiency.

NC (Matrix Spike): The recovery in the matrix spike was not calculated. The relative difference between the concentration in the parent sample and the spike amount was too small to permit a reliable recovery calculation (matrix spike concentration was less than the native sample concentration)

NC (Duplicate RPD): The duplicate RPD was not calculated. The concentration in the sample and/or duplicate was too low to permit a reliable RPD calculation (absolute difference <= 2x RDL).

(1) Recovery or RPD for this parameter is outside control limits. The overall quality control for this analysis meets acceptability criteria.

VALIDATION SIGNATURE PAGE

The analytical data and all QC contained in this report were reviewed and validated by:

Cristina Carriere

Cristina Carriere, Senior Scientific Specialist

Bureau Veritas has procedures in place to guard against improper use of the electronic signature and have the required "signatories", as per ISO/IEC 17025, signing the reports. For Service Group specific validation, please refer to the Validation Signatures page if included, otherwise available by request. For Department specific Analyst/Supervisor validation names, please refer to the Test Summary section if included, otherwise available by request. This report is authorized by Rodney Major, General Manager responsible for Ontario Environmental laboratory operations.

Bureau Veritas 100 – 36 Antares Dr. Nepean, ON, K2E 7W5 Phone: 613-274-0573 Website: www.bvna.com

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4W8659
Job Received: 2024/10/18
Final Report Due: 2024/10/28
Disposal Date: 2024/11/17

Invoice Information

Attn: Accounts Payable
SLR Consulting (Canada) Ltd.
#200 – 887 Great Northern Way
Vancouver, BC, V5T 4T5
Email to:
accountspayableca@slrconsulting.com
adang@slrconsulting.com

Report Information

Attn: Matt Williamson
SLR Consulting (Canada) Ltd.
#200 – 887 Great Northern Way
Vancouver, BC, V5T 4T5
Email to:
mwilliamson@slrconsulting.com

Project Information

Quote #:	C41044
PO/AFE#:	OTT2947
Project #:	216.030059.00002
Site Location:	SUNCOR 4000 RIVERSIDE DRIVE OTTAWA
Site #:	4000 Riverside Drive
Sampled By:	MS
Cost Object:	C41044_V2

Analytical Summary

A: Due On 2024/10/28

Lab ID	Client Sample ID	Sampling Date/Time	Matrix	# Cont.	O.Reg 153 Metals & Inorganics Pkg (Wtr)	O.Reg 153 PAHs	O.Reg 153 VOCs by HS & F1-F4	Glycols in Water by GC/FID	Set Number
COC# C#1017617-01-01									
AGHS11	MW24-06	2024/10/18 13:20	GW	10	A	A	A	A	1
AGHS12	MW24-08	2024/10/18 11:00	GW	10	A	A	A	A	1
AGHS13	DUP-1	2024/10/18	GW	10	A	A	A	A	1
AGHS14	FIELD BLANK	2024/10/18 13:00	GW	10	A	A	A	A	1
AGHS15	TRIP BLANK	2024/10/18 11:15	GW	4			A		2

Include Criteria on CofA: No

Sample Inspection Observations & Comments

# of Samples Received:	5
Details:	Sample(s) received in good condition.
Average Temperature:	Package 1: 6.7 °C

Additional Notes

- Unless special storage arrangements are made, all samples will be disposed 30 days after receipt. Additional fees may be applied for extended storage.
- Additional fees may be applied for the disposal of hazardous samples.

The contents of this report are subject to change. For up to date information, please refer to the Customer Portal.

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Confirmation of Sample Receipt

Bureau Veritas Job Number: C4W8659
Job Received: 2024/10/18
Final Report Due: 2024/10/28
Disposal Date: 2024/11/17

Sample Set Listing

Set 1 (4 Samples)	Set 2 (1 Sample)
MW24-06	TRIP BLANK
MW24-08	
DUP-1	
FIELD BLANK	

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2
O.Reg 153 Metals & Inorganics Pkg (Wtr)	Dissolved Chloride (Cl-)	1	mg/L	X	
	Chromium (VI)	0.5	ug/L	X	
	Dissolved Antimony (Sb)	0.5	ug/L	X	
	Dissolved Arsenic (As)	1	ug/L	X	
	Dissolved Barium (Ba)	2	ug/L	X	
	Dissolved Beryllium (Be)	0.4	ug/L	X	
	Dissolved Boron (B)	10	ug/L	X	
	Dissolved Cadmium (Cd)	0.09	ug/L	X	
	Dissolved Chromium (Cr)	5	ug/L	X	
	Dissolved Cobalt (Co)	0.5	ug/L	X	
	Dissolved Copper (Cu)	0.9	ug/L	X	
	Dissolved Lead (Pb)	0.5	ug/L	X	
	Dissolved Molybdenum (Mo)	0.5	ug/L	X	
	Dissolved Nickel (Ni)	1	ug/L	X	
	Dissolved Selenium (Se)	2	ug/L	X	
	Dissolved Silver (Ag)	0.09	ug/L	X	
	Dissolved Sodium (Na)	100	ug/L	X	
	Dissolved Thallium (Tl)	0.05	ug/L	X	
	Dissolved Uranium (U)	0.1	ug/L	X	
	Dissolved Vanadium (V)	0.5	ug/L	X	
	Dissolved Zinc (Zn)	5	ug/L	X	
	Mercury (Hg)	0.1	ug/L	X	
O.Reg 153 PAHs	Methylnaphthalene, 2-(1-)	0.071	ug/L	X	
	Acenaphthene	0.05	ug/L	X	
	Acenaphthylene	0.05	ug/L	X	
	Anthracene	0.05	ug/L	X	
	Benzo(a)anthracene	0.05	ug/L	X	
	Benzo(a)pyrene	0.009	ug/L	X	
	Benzo(b/j)fluoranthene	0.05	ug/L	X	
	Benzo(g,h,i)perylene	0.05	ug/L	X	
	Benzo(k)fluoranthene	0.05	ug/L	X	
	Chrysene	0.05	ug/L	X	
	Dibenzo(a,h)anthracene	0.05	ug/L	X	

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2
O.Reg 153 PAHs	Fluoranthene	0.05	ug/L	X	
	Fluorene	0.05	ug/L	X	
	Indeno(1,2,3-cd)pyrene	0.05	ug/L	X	
	1-Methylnaphthalene	0.05	ug/L	X	
	2-Methylnaphthalene	0.05	ug/L	X	
	Naphthalene	0.05	ug/L	X	
	Phenanthrene	0.03	ug/L	X	
	Pyrene	0.05	ug/L	X	
O.Reg 153 VOCs by HS & F1-F4	1,3-Dichloropropene (cis+trans)	0.28	ug/L	X	X
	F2 (C10-C16 Hydrocarbons)	90	ug/L	X	X
	F3 (C16-C34 Hydrocarbons)	200	ug/L	X	X
	F4 (C34-C50 Hydrocarbons)	200	ug/L	X	X
	Reached Baseline at C50	N/A	ug/L	X	X
	Acetone (2-Propanone)	10	ug/L	X	X
	Benzene	0.17	ug/L	X	X
	Bromodichloromethane	0.5	ug/L	X	X
	Bromoform	1	ug/L	X	X
	Bromomethane	0.5	ug/L	X	X
	Carbon Tetrachloride	0.2	ug/L	X	X
	Chlorobenzene	0.2	ug/L	X	X
	Chloroform	0.2	ug/L	X	X
	Dibromochloromethane	0.5	ug/L	X	X
	1,2-Dichlorobenzene	0.5	ug/L	X	X
	1,3-Dichlorobenzene	0.5	ug/L	X	X
	1,4-Dichlorobenzene	0.5	ug/L	X	X
	Dichlorodifluoromethane (FREON 12)	1	ug/L	X	X
	1,1-Dichloroethane	0.2	ug/L	X	X
	1,2-Dichloroethane	0.5	ug/L	X	X
	1,1-Dichloroethylene	0.2	ug/L	X	X
	cis-1,2-Dichloroethylene	0.5	ug/L	X	X
	trans-1,2-Dichloroethylene	0.5	ug/L	X	X
	1,2-Dichloropropane	0.2	ug/L	X	X
	cis-1,3-Dichloropropene	0.3	ug/L	X	X
	trans-1,3-Dichloropropene	0.4	ug/L	X	X
	Ethylbenzene	0.2	ug/L	X	X
	Ethylene Dibromide	0.2	ug/L	X	X
	Hexane	1	ug/L	X	X
	Methylene Chloride(Dichloromethane)	2	ug/L	X	X
	Methyl Ethyl Ketone (2-Butanone)	10	ug/L	X	X

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

Parameter Summary

Package/Test	Parameter	RDL	Unit	Set 1	Set 2
O.Reg 153 VOCs by HS & F1-F4	Methyl Isobutyl Ketone	5	ug/L	X	X
	Methyl t-butyl ether (MTBE)	0.5	ug/L	X	X
	Styrene	0.5	ug/L	X	X
	1,1,1,2-Tetrachloroethane	0.5	ug/L	X	X
	1,1,2,2-Tetrachloroethane	0.5	ug/L	X	X
	Tetrachloroethylene	0.2	ug/L	X	X
	Toluene	0.2	ug/L	X	X
	1,1,1-Trichloroethane	0.2	ug/L	X	X
	1,1,2-Trichloroethane	0.5	ug/L	X	X
	Trichloroethylene	0.2	ug/L	X	X
	Trichlorofluoromethane (FREON 11)	0.5	ug/L	X	X
	Vinyl Chloride	0.2	ug/L	X	X
	p+m-Xylene	0.2	ug/L	X	X
	o-Xylene	0.2	ug/L	X	X
	Total Xylenes	0.2	ug/L	X	X
	F1 (C6-C10)	25	ug/L	X	X
	F1 (C6-C10) - BTEX	25	ug/L	X	X
	VOCPLUS Required?	N/A	ug/L	X	X
Glycols in Water by GC/FID	Propylene Glycol	5	mg/L	X	
	Ethylene Glycol	5	mg/L	X	
	Diethylene Glycol	5	mg/L	X	
	Total Glycol	5	mg/L	X	

**RDLs are subject to change based on interferences present at the time of analysis.*

Bureau Veritas PM: Keshani Vijh (keshani.vijh@bureauveritas.com)

C4W8659
2024/10/18 15:45

Bureau Veritas
6740 Campobello Road, Mississauga, Ontario Canada L5N 2L8 Tel (905) 817-5700 Toll-free 800-563-6266 Fax (905) 817-5777 www.bvna.com

CH

NONT-2024-10-4715

INVOICE TO:		REPORT TO:		PROJECT INFORMATION:	
Company Name:	#39437 SLR Consulting (Canada) Ltd.	Company Name:	SLR Consulting (Canada) Ltd.	Quotation #:	C41044
Attention:	Accounts Payable	Attention:	Matt Williamson	P.O. #:	~~CW2258233~~ OTT2947
Address:	#200 – 887 Great Northern Way	Address:	100 Stone Road West, Suite 201	Project:	216.030059.00002
	Vancouver BC V5T 4T5		Guelph, ON N1G 5L3	Project Name:	Suncor 4000 Riverside Drive Ottawa
Tel:	(604) 738-2500 Fax: (604) 738-2542	Tel:	226-706-8088 Fax:	Site #:	4000 Riverside Drive
Email:	accountspayableca@slrconsulting.com;adang@slrcons	Email:	mwilliamson@slrconsulting.com	Sampled By:	MS/EJ

COC #: C#1017617-01-01

Title Order #: 1017617

Project Manager: Keshani Vijh

MOE REGULATED DRINKING WATER OR WATER INTENDED FOR HUMAN CONSUMPTION MUST BE SUBMITTED ON THE BUREAU VERITAS DRINKING WATER CHAIN OF CUSTODY

Regulation 153 (2011)
- ☐ Table 1 ☐ Res/Park ☐ Medium/Fine
- ☐ Table 2 ☒ Ind/Comm ☒ Coarse
- ☒ Table 3 ☐ Agri/Other ☐ For RSC
- ☐ Table ___

Other Regulations
- ☐ CCME ☐ Sanitary Sewer Bylaw
- ☐ Reg 558 ☐ Storm Sewer Bylaw
- ☐ MISA Municipality ___
- ☐ PWQO ☐ Reg 406 Table ___
- ☐ Other ___

Special Instructions

Include Criteria on Certificate of Analysis (Y/N)? N

Turnaround Time (TAT) Required:
Please provide advance notice for rush projects

Regular (Standard) TAT: ☒
(will be applied if Rush TAT is not specified):
Standard TAT = 5-7 Working days for most tests.
Please note: Standard TAT for certain tests such as BOD and Dioxins/Furans are > 5 days - contact your Project Manager for details.

Job Specific Rush TAT (if applies to entire submission)
Date Required: ___ Time Required: ___ ☐
Rush Confirmation Number: ___ *(call lab for #)*

	Sample Barcode Label	Sample (Location) Identification	Date Sampled	Time Sampled	Matrix	Field Filtered (please circle) (Metals / Hg / Cr VI)	O.Reg 153 Metals & Inorganics Pkg (no cyanide)	Glycols in Water by GC/FID	O.Reg 153 VOCs by HS & F1-F4	O.Reg 153/04 PAHs						# of Bottles	Comments
1	N/A	MW24-06	2024/10/18	13:20	GW	Y	x	x	x	X						10	
2		MW24-08	2024/10/18	11:00	GW	Y	x	x	x	X						10	
3		Dup-1	2024/10/18	-	GW	Y	x	x	x	X						10	
4							~~x~~		~~x~~								
5							~~x~~		~~x~~								
6		FIELD BLANK	2024/10/18	13:00	Water	Y	x	x	x	X						10	
7		TRIP BLANK	2024/10/18	11:15	Water	N/A	~~x~~	~~x~~	x							4	
8																	
9																	
10																	

Received in Ottawa

* RELINQUISHED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	RECEIVED BY: (Signature/Print)	Date: (YY/MM/DD)	Time	# jars used and not submitted
Melanie McCp / Melanie St Cyr	24/10/18	13:50	Accepted via Speedchain AM	2024/10/18	15:45	
			CR SUGAR SARVAN	2024/10/19	08:28	

Laboratory Use Only

Time Sensitive	Temperature (°C) on Recei	Custody Seal	Yes	No
	5.1 8.7 ICE	Present		
		Intact	✓	

* UNLESS OTHERWISE AGREED TO IN WRITING, WORK SUBMITTED ON THIS CHAIN OF CUSTODY IS SUBJECT TO BUREAU VERITAS'S STANDARD TERMS AND CONDITIONS. SIGNING OF THIS CHAIN OF CUSTODY DOCUMENT IS ACKNOWLEDGMENT AND ACCEPTANCE OF OUR TERMS WHICH ARE AVAILABLE FOR VIEWING AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/COC-TERMS-AND-CONDITIONS.

* IT IS THE RESPONSIBILITY OF THE RELINQUISHER TO ENSURE THE ACCURACY OF THE CHAIN OF CUSTODY RECORD. AN INCOMPLETE CHAIN OF CUSTODY MAY RESULT IN ANALYTICAL TAT DELAYS.

** SAMPLE CONTAINER, PRESERVATION, HOLD TIME AND PACKAGE INFORMATION CAN BE VIEWED AT WWW.BVNA.COM/ENVIRONMENTAL-LABORATORIES/RESOURCES/CHAIN-CUSTODY-FORMS-COCS.

SAMPLES MUST BE KEPT COOL (< 10° C) FROM TIME OF SAMPLING UNTIL DELIVERY TO BUREAU VERITAS

White: Bureau Veritas Yellow: Client

Custody Seal Present Intact
Cooling Media Yes No

Bureau Veritas Canada (2019) Inc.

Appendix D Data Quality Review

Phase II Environmental Site Investigation

Active Petro-Canada Retail Fuel Outlet No. 35197
4000 Riverside Drive, Ottawa, Ontario

Suncor Energy Products Partnership

SLR Project No.: 216.030059.00002

November 25, 2024

Appendix D Quality Assurance/Quality Control – Data Quality Review

Project No.:	216.030059.00002	**Project Name:**	Phase II Environmental Site Investigation
Client Site No.:	35197	**Project Location:**	4000 Riverside Drive, Ottawa
Analytical Certificate No. or Work Order No.:	C4V3527	**Date Issued:**	October 15, 2024
Chain of Custody Form No(s):			
☒ Soil:	C#1013277-01-01		
☐ Water:			
☐ Soil Vapour:			

Sample Schedule

	Date Sampled	Date Received by Lab	Date Analysis Completed	Reporting Turn-Around Time (T.A.T.)
Water:	n/a	n/a	n/a	n/a
Soil:	October 1 to 3, 2024	October 4, 2024	October 8 - 12, 2024	8 - 12 days
Soil Vapour:	n/a	n/a	n/a	n/a

Comments:

Name and location of laboratory: BVLABs, Mississauga, ON

Sample Summary

Matrix		Soil		Water		Soil Vapour
No. of Samples		10		n/a		n/a
No. of Duplicates		n/a		n/a		n/a
No. of Field Blanks		n/a		n/a		n/a
No. of Trip Blanks		n/a		n/a		n/a

QA/QC – Laboratory

QC Parameter		Soil		Water		Soil Vapour
Method Blank		Acceptable		n/a		n/a
Duplicate		Acceptable		n/a		n/a
Matrix Spike		Not Acceptable[1,2]		n/a		n/a
Method Blank Spike		Acceptable		n/a		n/a
Surrogate Recovery		Acceptable		n/a		n/a

Comments:

1) A matrix spike of 144% for acetone was detected by the laboratory. This high value was outside the acceptable limits of 60 – 140%. This could represent a high bias for this parameter. A review of the impacted parameter found that the concentration of acetone was below the reportable detection limit (RDL) of 0.49 µg/L. This laboratory quality flag would therefore not have material impact on the interpretation of the data and the data is considered reliable.
2) A matrix spike of 146% for methyl ethyl ketone was detected by the laboratory. This high value was outside the acceptable limits of 60 – 140%. This could represent a high bias for this parameter. A review of the impacted parameter found that the concentration of methyl ethyl ketone was below the reportable detection limit (RDL) of 0.40 µg/L. This laboratory quality flag would therefore not have material impact on the interpretation of the data and the data is considered reliable.

QA/QC – Field

QC Parameter	Soil	Water	Soil Vapour
Temperature at Lab	7.0 degrees	n/a	n/a
Travel Blank	n/a	n/a	n/a
Field Blank	n/a	n/a	n/a
Duplicate	n/a	n/a	n/a

Comments:

Other Data Reportables

	Yes/No
1. Has the CoA been signed off?	Yes
2. Has lab warranted all tests were in statistical control in CoA?	Yes
3. Has lab warranted all tests were analyzed following SOP's in CoA?	Yes
4. Were all samples analyzed within hold times?	Yes
5. All volatile organic carbon (VOC) compounds methanol preserved in the field?	Yes
6. Is Chain of Custody completed and signed?	Yes
7. Were sample temperatures acceptable when they reached the lab?	Yes
8. Were custody seals present and intact?	Yes

Data Quality Waiver

Was a Data Quality Waiver (DQW) issued (Yes/No)?: No

Date Issued: n/a **Date of Response:** n/a

Data Reliability

Is the data considered to be reliable (Yes/No)?: Yes

If answer is "No", describe and provide rationale:

Reviewed by (Print): Matthew Williamson **Date:** October 30, 2024

Appendix D Quality Assurance/Quality Control – Data Quality Review

Project No.:	216.030059.00002	**Project Name:**	Phase II Environmental Site Investigation
Client Site No.:	35197	**Project Location:**	4000 Riverside Drive, Ottawa
Analytical Certificate No. or Work Order No.:	C4W1825	**Date Issued:**	October 21, 2024
Chain of Custody Form No(s):			
☒ Soil:	C#1013277-01-01		
☐ Water:			
☐ Soil Vapour:			

Sample Schedule

	Date Sampled	Date Received by Lab	Date Analysis Completed	Reporting Turn-Around Time (T.A.T.)
Water:	n/a	n/a	n/a	n/a
Soil:	October 10, 2024	October 11, 2024	October 17 - 18, 2024	8 - 9 days
Soil Vapour:	n/a	n/a	n/a	n/a

Comments:

Name and location of laboratory: BVLABs, Mississauga, ON

Sample Summary

Matrix		Soil		Water		Soil Vapour
No. of Samples		1		n/a		n/a
No. of Duplicates		n/a		n/a		n/a
No. of Field Blanks		n/a		n/a		n/a
No. of Trip Blanks		n/a		n/a		n/a

QA/QC – Laboratory

QC Parameter		Soil		Water		Soil Vapour
Method Blank		Acceptable		n/a		n/a
Duplicate		Acceptable		n/a		n/a
Matrix Spike		Acceptable		n/a		n/a
Method Blank Spike		Acceptable		n/a		n/a
Leachate Blank		Acceptable		n/a		n/a
Surrogate Recovery		Acceptable		n/a		n/a

Comments:

QA/QC – Field

QC Parameter	Soil	Water	Soil Vapour
Temperature at Lab	6.7 and 9.3 degrees (2 coolers)	n/a	n/a
Travel Blank	n/a	n/a	n/a
Field Blank	n/a	n/a	n/a
Duplicate	n/a	n/a	n/a

Comments:

Other Data Reportables

	Yes/No
1. Has the CoA been signed off?	Yes
2. Has lab warranted all tests were in statistical control in CoA?	Yes
3. Has lab warranted all tests were analyzed following SOP's in CoA?	Yes
4. Were all samples analyzed within hold times?	Yes
5. All volatile organic carbon (VOC) compounds methanol preserved in the field?	n/a
6. Is Chain of Custody completed and signed?	Yes
7. Were sample temperatures acceptable when they reached the lab?	Yes
8. Were custody seals present and intact?	Yes

Data Quality Waiver

Was a Data Quality Waiver (DQW) issued (Yes/No)?: No

Date Issued: n/a **Date of Response:** n/a

Data Reliability

Is the data considered to be reliable (Yes/No)?: Yes

If answer is "No", describe and provide rationale:

Reviewed by (Print): Matthew Williamson **Date:** October 30, 2024

Appendix D Quality Assurance/Quality Control – Data Quality Review

Project No.:	216.030059.00002	**Project Name:**	Phase II Environmental Site Investigation
Client Site No.:	35197	**Project Location:**	4000 Riverside Drive, Ottawa
Analytical Certificate No. or Work Order No.:	C4W1831	**Date Issued:**	October 22, 2024
Chain of Custody Form No(s):			
☒ Soil:	C#1013277-01-01		
☐ Water:			
☐ Soil Vapour:			

Sample Schedule

	Date Sampled	Date Received by Lab	Date Analysis Completed	Reporting Turn-Around Time (T.A.T.)
Water:	n/a	n/a	n/a	n/a
Soil:	October 7 - 10, 2024	October 11, 2024	October 15 - 22, 2024	8 - 15 days
Soil Vapour:	n/a	n/a	n/a	n/a

Comments:

Name and location of laboratory: BVLABs, Mississauga, ON

Sample Summary

Matrix		Soil		Water		Soil Vapour
No. of Samples		18		n/a		n/a
No. of Duplicates		2		n/a		n/a
No. of Field Blanks		n/a		n/a		n/a
No. of Trip Blanks		n/a		n/a		n/a

QA/QC – Laboratory

QC Parameter		Soil		Water		Soil Vapour
Method Blank		Acceptable		n/a		n/a
Duplicate		Acceptable		n/a		n/a
Matrix Spike		Acceptable		n/a		n/a
Method Blank Spike		Acceptable		n/a		n/a
Surrogate Recovery		Not Acceptable[1]		n/a		n/a

Comments:

1) A surrogate recovery of 146% for D10-o-xylene was detected by the laboratory. This high value was outside the acceptable limits of 70 – 130%. This could represent a high bias for this parameter. A review of the impacted parameter found that the concentration of o-xylene was below the reportable detection limit (RDL) of 0.20 µg/L. This laboratory quality flag would therefore not have material impact on the interpretation of the data and the data is considered reliable.

QA/QC – Field

QC Parameter	Soil	Water	Soil Vapour
Temperature at Lab	6.7, 9.3 degrees (2 coolers)	n/a	n/a
Travel Blank	n/a	n/a	n/a
Field Blank	n/a	n/a	n/a
Duplicate	n/a	n/a	n/a

Comments:

Other Data Reportables

	Yes/No
1. Has the CoA been signed off?	Yes
2. Has lab warranted all tests were in statistical control in CoA?	Yes
3. Has lab warranted all tests were analyzed following SOP's in CoA?	Yes
4. Were all samples analyzed within hold times?	Yes
5. All volatile organic carbon (VOC) compounds methanol preserved in the field?	Yes
6. Is Chain of Custody completed and signed?	Yes
7. Were sample temperatures acceptable when they reached the lab?	Yes
8. Were custody seals present and intact?	Yes

Data Quality Waiver

Was a Data Quality Waiver (DQW) issued (Yes/No)?: No

Date Issued: n/a **Date of Response:** n/a

Data Reliability

Is the data considered to be reliable (Yes/No)?: Yes

If answer is "No", describe and provide rationale:

Reviewed by (Print): Matthew Williamson **Date:** October 30, 2024

Appendix D Quality Assurance/Quality Control – Data Quality Review

Project No.:	216.030059.00002	**Project Name:**	Phase II Environmental Site Investigation
Client Site No.:	35197	**Project Location:**	4000 Riverside Drive, Ottawa
Analytical Certificate No. or Work Order No.:	C4W8659	**Date Issued:**	October 25, 2024
Chain of Custody Form No(s):			
☐ Soil:			
☒ Water:	C#1017617-01-01		
☐ Soil Vapour:			

Sample Schedule

	Date Sampled	Date Received by Lab	Date Analysis Completed	Reporting Turn-Around Time (T.A.T.)
Water:	October 18, 2024	October 18, 2024	October 23 - 25, 2024	6 - 8 days
Soil:	n/a	n/a	n/a	n/a
Soil Vapour:	n/a	n/a	n/a	n/a

Comments:

Name and location of laboratory: BVLABs, Mississauga, ON

Sample Summary

Matrix		Soil		Water		Soil Vapour
No. of Samples		n/a		5		n/a
No. of Duplicates		n/a		1		n/a
No. of Field Blanks		n/a		1		n/a
No. of Trip Blanks		n/a		1		n/a

QA/QC – Laboratory

QC Parameter		Soil		Water		Soil Vapour
Method Blank		n/a		Acceptable		n/a
Duplicate		n/a		Acceptable		n/a
Matrix Spike		n/a		Not Acceptable[1]		n/a
Method Blank Spike		n/a		Acceptable		n/a
Reference Material		n/a		Acceptable		n/a
Surrogate Recovery		n/a		Acceptable		n/a

Comments:

1) A matrix spike recovery of 131% for fluoranthene was detected by the laboratory. This high value was outside the acceptable limits of 50 – 130%. This could represent a high bias for this parameter. A review of the impacted parameter found that the concentration of fluoranthene was below the reportable detection limit (RDL) of 0.050 µg/L. This laboratory quality flag would therefore not have material impact on the interpretation of the data and the data is considered reliable.

QA/QC – Field

QC Parameter	Soil	Water	Soil Vapour
Temperature at Lab	n/a	6.7 degrees (1 cooler)	n/a
Travel Blank	n/a	1	n/a
Field Blank	n/a	1	n/a
Duplicate	n/a	1	n/a

Comments:

Other Data Reportables

	Yes/No
1. Has the CoA been signed off?	Yes
2. Has lab warranted all tests were in statistical control in CoA?	Yes
3. Has lab warranted all tests were analyzed following SOP's in CoA?	Yes
4. Were all samples analyzed within hold times?	Yes
5. All volatile organic carbon (VOC) compounds methanol preserved in the field?	n/a
6. Is Chain of Custody completed and signed?	Yes
7. Were sample temperatures acceptable when they reached the lab?	Yes
8. Were custody seals present and intact?	Yes

Data Quality Waiver

Was a Data Quality Waiver (DQW) issued (Yes/No)?: No

Date Issued: n/a **Date of Response:** n/a

Data Reliability

Is the data considered to be reliable (Yes/No)?: Yes

If answer is "No", describe and provide rationale:

Reviewed by (Print): Matthew Williamson **Date:** October 31, 2024

Table 1D - Summary of Soil Relative Percent Differences

Sample ID	Units	MECP Alert Limit Criteria (%) for Field Duplicates *	RDL	BH24-06_16-16.61	DUP-1	RPD (%)	BH24-08_16.76-17.37	DUP-2	RPD (%)
Date				08-Oct-24	08-Oct-24		09-Oct-24	09-Oct-24	
PHCs									
Benzene	µg/g	30	0.02	<0.02	<0.02	NC	<0.02	<0.02	NC
Toluene	µg/g	30	0.02	<0.02	<0.02	NC	<0.02	<0.02	NC
Ethylbenzene	µg/g	30	0.01	<0.02	<0.02	NC	<0.02	<0.02	NC
Xylene (o)	µg/g	30	0.02	<0.02	<0.02	NC	<0.02	<0.02	NC
Xylene (m & p)	µg/g	30	0.04	<0.04	<0.04	NC	<0.04	<0.04	NC
Xylene Mixture	µg/g	30	0.04	<0.04	<0.04	NC	<0.04	<0.04	NC
Petroleum Hydrocarbons F1	µg/g	30	10	<10	<10	NC	<10	<10	NC
Petroleum Hydrocarbons F1 (less BTEX	µg/g	30	10	<10	<10	NC	<10	<10	NC
Petroleum Hydrocarbons F2	µg/g	30	7	<7	<7	NC	<7	<7	NC
Petroleum Hydrocarbons F3	µg/g	30	50	<50	<50	NC	<50	<50	NC
Petroleum Hydrocarbons F4	µg/g	30	50	<50	<50	NC	<50	<50	NC
PAHs									
Acenaphthylene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Acenaphthene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Anthracene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Benz[a]anthracene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Benzo[b+k]fluoranthene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Benzo[g h i]perylene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Benzo[k]fluoranthene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Benzo[a]pyrene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Chrysene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Dibenz[a h]anthracene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Fluoranthene	µg/g	40	0.005	-	-	NC	<0.0050	<0.0050	NC
Fluorene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Indeno[1 2 3-cd]pyrene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Methylnaphthalene, 1-	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Methylnaphthalene, 2-	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Methylnaphthalene, 2-(1-)	µg/g	40	0.0071	-	-	NC	<0.0071	<0.0071	NC
Naphthalene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Phenanthrene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Pyrene	µg/g	40	0.005	-	-	NC	<0.005	<0.005	NC
Metals									
pH (Lab)	pH Units	+/- .3		-	-	NC	7.9	7.84	NC
Antimony	µg/g	40	-	-	-	NC	<0.2	<0.2	NC
Arsenic	µg/g	40	1	-	-	NC	<1	<1	NC
Barium	µg/g	40	0.5	-	-	NC	36	33	8.70
Beryllium	µg/g	40	0.2	-	-	NC	<0.2	<0.2	NC
Boron (Total)	ug/g	40	5	-	-	NC	<5	<5	NC
Boron (Hot Water Soluble)	µg/g	40	0.05	-	-	NC	0.051	0	NC
Cadmium	µg/g	40	0.1	-	-	NC	<0.1	<0.1	NC
Chromium VI	µg/g	35	0.18	-	-	NC	<0.18	<0.18	NC
Chromium Total	µg/g	40	1	-	-	NC	11	9.4	15.69
Cobalt	µg/g	40	0.1	-	-	NC	3.7	3.6	2.74
Copper	µg/g	40	0.5	-	-	NC	6	5.8	3.39
Lead	µg/g	40	1	-	-	NC	1.9	1.8	NC
Mercury	µg/g	30	0.05	-	-	NC	<0.05	<0.05	NC
Molybdenum	µg/g	40	0.5	-	-	NC	<0.5	<0.5	NC
Nickel	µg/g	40	0.5	-	-	NC	5.1	4.8	6.06
Selenium	µg/g	40	0.5	-	-	NC	<0.5	<0.5	NC
Silver	µg/g	40	0.2	-	-	NC	<0.2	<0.2	NC
Thallium	µg/g	40	0.05	-	-	NC	<0.050	<0.050	NC
Uranium	µg/g	40	0.05	-	-	NC	0.62	0.62	0
Vanadium	µg/g	40	5	-	-	NC	31	29	6.67
Zinc	µg/g	40	5	-	-	NC	10	9.2	NC
Inorganics									
Sodium Absorption Ratio	N/A	40		-	-	NC	5.1	5	NC
Electrical Conductivity (mS/cm)	mS/cm	40	0.002	-	-	NC	0.2	0.19	5.13
Glycols									
Ethylene glycol	µg/g	40	10	-	-	NC	<10	<10	NC
Diethylene glycol	µg/g	40	10	-	-	NC	<10	<10	NC
Propylene glycol	µg/g	40	10	-	-	NC	<10	<10	NC
Total Glycols	µg/g	40	10	-	-	NC	<10	<10	NC

Notes:

* Limits provided by MECP(2021)

µg/g - micrograms per gram

< - less than analytical detection limit

'-' - sample not analyzed for parameter indicated

NC - not calculated due to concentration less than 5x RDL

RDL - reportable detection limit

RPD - Relative Percentage Difference

BOLD RPD Exceeds Alert Limit Criteria for Field Duplicates

Table 2D - Summary of Groundwater Relative Percent Differences

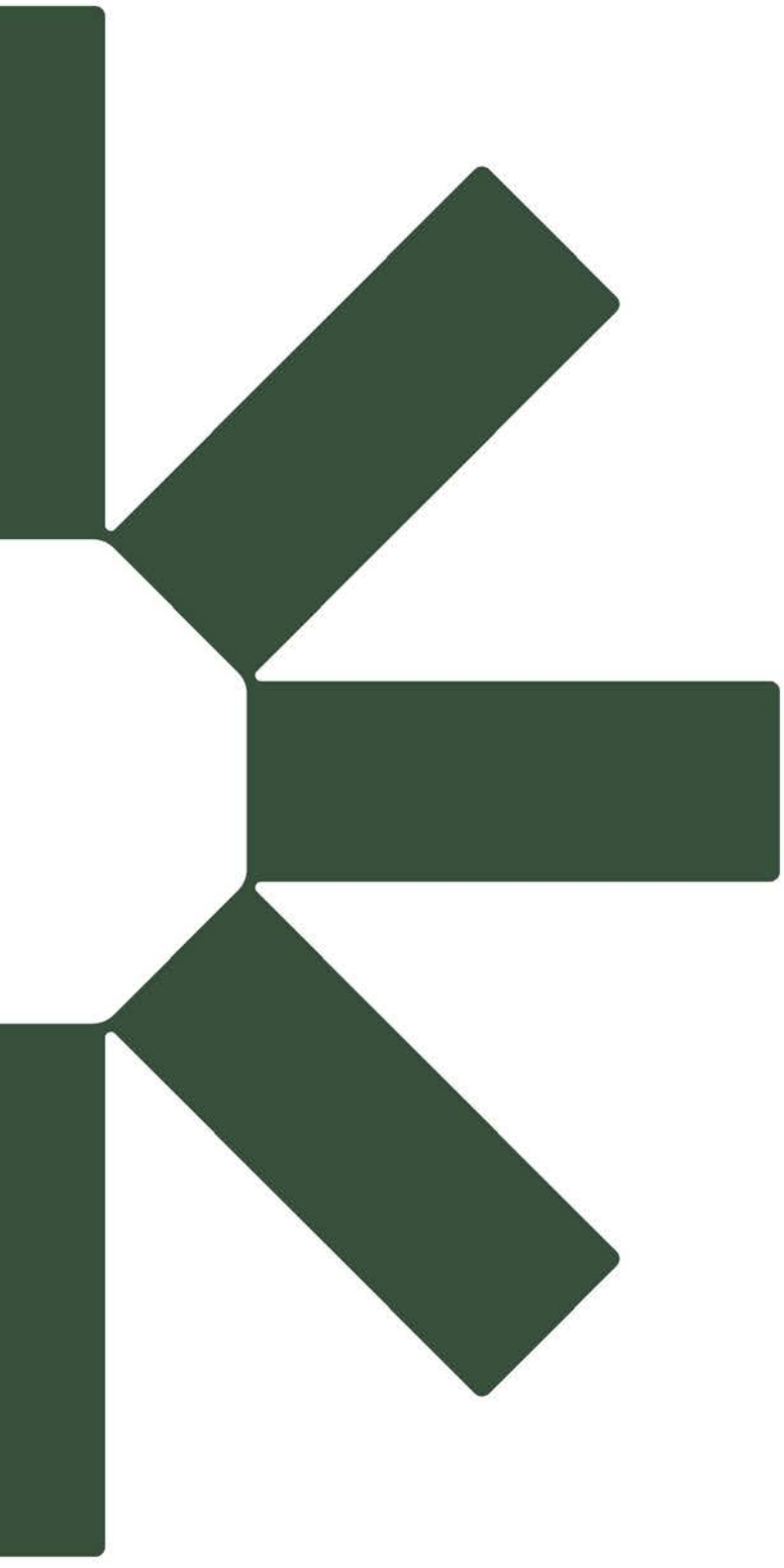
Sample ID	Units	MECP AlertLimit Criteria (%) for Field Duplicates*	RDL	MW24-08	DUP-1	RPD (%)
Date				18-Oct-24	18-Oct-24	
PHCs						
Benzene	µg/L	30	0.17	<0.17	<0.17	NC
Toluene	µg/L	30	0.2	<0.2	<0.2	NC
Ethylbenzene	µg/L	30	0.2	<0.2	<0.2	NC
Xylene (o)	µg/L	30	0.2	<0.2	<0.2	NC
Xylene (m & p)	µg/L	30	0.2	<0.2	0.2	NC
Xylene Mixture	µg/L	30	0.2	<0.2	0.2	NC
Petroleum Hydrocarbons F1	µg/L	30	25	<25	<25	NC
Petroleum Hydrocarbons F1 (less BTE	µg/L	30	25	<25	<25	NC
Petroleum Hydrocarbons F2	µg/L	30	90	<90	<90	NC
Petroleum Hydrocarbons F3	µg/L	30	200	<200	<200	NC
Petroleum Hydrocarbons F4	µg/L	30	200	<200	<200	NC
VOCs						
Acetone	µg/L	30	10	<10	<10	NC
Bromodichloromethane	µg/L	30	0.5	<0.5	<0.5	NC
Bromoform	µg/L	30	1	<1	<1	NC
Bromomethane	µg/L	30	0.5	<0.5	<0.5	NC
Carbon Tetrachloride	µg/L	30	0.2	<0.2	<0.2	NC
Chlorobenzene	µg/L	30	0.2	<0.2	<0.2	NC
Chloroform	µg/L	30	0.2	<0.2	<0.2	NC
Dibromochloromethane	µg/L	30	0.5	<0.5	<0.5	NC
Dichlorobenzene, 1,2-	µg/L	30	0.5	<0.5	<0.5	NC
Dichlorobenzene, 1,3-	µg/L	30	0.5	<0.5	<0.5	NC
Dichlorobenzene, 1,4-	µg/L	30	0.5	<0.5	<0.5	NC
Dichlorodifluoromethane	µg/L	30	1	<1	<1	NC
Dichloroethane, 1,1-	µg/L	30	0.2	<0.2	<0.2	NC
Dichloroethane, 1,2-	µg/L	30	0.5	<0.5	<0.5	NC
Dichloroethylene, 1,1-	µg/L	30	0.2	<0.2	<0.2	NC
Dichloroethylene, 1,2-cis-	µg/L	30	0.5	<0.5	<0.5	NC
Dichloroethylene, 1,2-trans-	µg/L	30	0.5	<0.5	<0.5	NC
Dichloropropane, 1,2-	µg/L	30	0.2	<0.2	<0.2	NC
Dichloropropene, 1,3-	µg/L	30	0.5	<0.5	<0.5	NC
Dichloropropene, 1,3-cis-	µg/L	30	0.3	<0.3	<0.3	NC
Dichloropropene, 1,3-trans-	µg/L	30	0.4	<0.4	<0.4	NC
Ethylene dibromide	µg/L	30	0.2	<0.2	<0.2	NC
Hexane (n)	µg/L	30	1	<1	<1	NC
Methylene chloride	µg/L	30	2	<2	<2	NC
Methyl Ethyl Ketone (MEK)	µg/L	30	10	<10	<10	NC
Methyl Isobutyl Ketone (MIK)	µg/L	30	5	<5	<5	NC
Methyl tert-Butyl Ether (MTBE)	µg/L	30	0.5	<0.5	<0.5	NC
Styrene	µg/L	30	0.5	<0.5	<0.5	NC
Tetrachloroethane, 1,1,1,2-	µg/L	30	0.5	<0.5	<0.5	NC
Tetrachloroethane, 1,1,2,2-	µg/L	30	0.5	<0.5	<0.5	NC
Tetrachloroethylene	µg/L	30	0.2	<0.2	<0.2	NC
Trichloroethane, 1,1,1-	µg/L	30	0.2	<0.2	<0.2	NC
Trichloroethane, 1,1,2-	µg/L	30	0.5	<0.5	<0.5	NC
Trichloroethylene	µg/L	30	0.2	<0.2	<0.2	NC
Trichlorofluoromethane	µg/L	30	0.5	<0.5	<0.5	NC
Vinyl chloride	µg/L	30	0.2	<0.2	<0.2	NC
PAHs						
Acenaphthylene	µg/L	30	0.05	<0.05	<0.05	NC
Acenaphthene	µg/L	30	0.05	<0.05	<0.05	NC
Anthracene	µg/L	30	0.05	<0.05	<0.05	NC
Benz[a]anthracene	µg/L	30	0.05	<0.05	<0.05	NC
Benzo[b+k]fluoranthene	µg/L	30	0.05	<0.05	<0.05	NC
Benzo[g h i]perylene	µg/L	30	0.05	<0.05	<0.05	NC
Benzo[k]fluoranthene	µg/L	30	0.05	<0.05	<0.05	NC
Benzo[a]pyrene	µg/L	30	0.009	<0.009	<0.009	NC
Chrysene	µg/L	30	0.05	<0.05	<0.05	NC
Dibenz[a h]anthracene	µg/L	30	0.05	<0.05	<0.05	NC
Fluoranthene	µg/L	30	0.05	<0.05	<0.05	NC
Fluorene	µg/L	30	0.05	<0.05	<0.05	NC
Indeno[1 2 3-cd]pyrene	µg/L	30	0.05	<0.05	<0.05	NC
Methylnaphthalene, 1-	µg/L	30	0.05	<0.05	<0.05	NC
Methylnaphthalene, 2-	µg/L	30	0.05	<0.05	<0.05	NC
Methylnaphthalene, 2-(1-)	µg/L	30	0.071	<0.071	<0.071	NC
Naphthalene	µg/L	30	0.05	0.098	0.085	NC
Phenanthrene	µg/L	30	0.03	<0.03	<0.03	NC
Pyrene	µg/L	30	0.05	<0.05	<0.05	NC
Metals						
Antimony (Filtered)	µg/L	20	0.5	<0.5	<0.5	NC
Arsenic (Filtered)	µg/L	20	1	<1	<1	NC
Barium (Filtered)	µg/L	20	2	54	54	0
Beryllium (Filtered)	µg/L	20	0.4	<0.4	<0.4	NC
Boron (Total) (Filtered)	µg/L	20	10	15	15	NC
Cadmium (Filtered)	µg/L	20	0.09	<0.09	<0.09	NC
Chromium VI	µg/L	20	0.5	0.91	0.89	NC
Chromium Total (Filtered)	µg/L	20	5	<5	<5	NC
Cobalt (Filtered)	µg/L	20	0.5	<0.5	<0.5	NC
Copper (Filtered)	µg/L	20	0.9	1.1	<0.9	NC
Lead (Filtered)	µg/L	20	0.5	<0.5	<0.5	NC
Mercury	µg/L	20	0.1	<0.1	<0.1	NC
Molybdenum (Filtered)	µg/L	20	0.5	0.89	0.86	NC
Nickel (Filtered)	µg/L	20	1	<1	<1	NC
Selenium (Filtered)	µg/L	20	2	<2	<2	NC
Silver (Filtered)	µg/L	20	0.09	<0.09	<0.09	NC
Sodium (Filtered)	µg/L	20	0.1	450	470	4.35
Thallium (Filtered)	µg/L	20	0.05	<0.05	<0.05	NC
Uranium (Filtered)	µg/L	20	0.1	0.62	0.63	1.60
Vanadium (Filtered)	µg/L	20	0.5	0.86	0.9	NC
Zinc (Filtered)	µg/L	20	5	<5	<5	NC
Inorganics						
Chloride (Filtered)	mg/L	40	1	470	480	2.11
Glycols						
Ethylene glycol	µg/L	30	5000	<5000	<5000	NC
Diethylene glycol	µg/L	30	5000	<5000	<5000	NC
Propylene glycol	µg/L	30	5000	<5000	<5000	NC
Total Glycols	µg/L	30	5000	<5000	<5000	NC

Notes:
* Limits provided by MECP(2021)
mg/L - milligrams per litre
µg/L - microgram per litre
< - less than analytical detection limit
'-' - sample not analyzed for parameter indicated
NC - not calculated due to concentration less than 5x RDL
RDL - reportable detection limit
RPD - Relative Percentage Difference
BOLD RPD Exceeds Alert Limit Criteria for Field Duplicates

Table 3D - Summary of Groundwater Trip Blank and Field Blank

Sample ID / Date	Units	RDL	FIELD BLANK 18-Oct-24	TRIP BLANK 18-Oct-24
PHCs				
Benzene	µg/L	0.17	<0.17	<0.17
Toluene	µg/L	0.2	<0.2	<0.2
Ethylbenzene	µg/L	0.2	<0.2	<0.2
Xylene (o)	µg/L	0.2	<0.2	<0.2
Xylene (m & p)	µg/L	0.2	<0.2	<0.2
Xylene Mixture	µg/L	0.2	<0.2	<0.2
Petroleum Hydrocarbons F1	µg/L	25	<25	<25
Petroleum Hydrocarbons F1 (less BTEX)	µg/L	25	<25	<25
Petroleum Hydrocarbons F2	µg/L	90	<90	<90
Petroleum Hydrocarbons F3	µg/L	200	<200	<200
Petroleum Hydrocarbons F4	µg/L	200	<200	<200
VOCs				
Acetone	µg/L	10	<10	<10
Bromodichloromethane	µg/L	0.5	<0.5	<0.5
Bromoform	µg/L	1	<1	<1
Bromomethane	µg/L	0.5	<0.5	<0.5
Carbon Tetrachloride	µg/L	0.2	<0.2	<0.2
Chlorobenzene	µg/L	0.2	<0.2	<0.2
Chloroform	µg/L	0.2	<0.2	<0.2
Dibromochloromethane	µg/L	0.5	<0.5	<0.5
Dichlorobenzene, 1,2-	µg/L	0.5	<0.5	<0.5
Dichlorobenzene, 1,3-	µg/L	0.5	<0.5	<0.5
Dichlorobenzene, 1,4-	µg/L	0.5	<0.5	<0.5
Dichlorodifluoromethane	µg/L	1	<1	<1
Dichloroethane, 1,1-	µg/L	0.2	<0.2	<0.2
Dichloroethane, 1,2-	µg/L	0.5	<0.5	<0.5
Dichloroethylene, 1,1-	µg/L	0.2	<0.2	<0.2
Dichloroethylene, 1,2-cis-	µg/L	0.5	<0.5	<0.5
Dichloroethylene, 1,2-trans-	µg/L	0.5	<0.5	<0.5
Dichloropropane, 1,2-	µg/L	0.2	<0.2	<0.2
Dichloropropene, 1,3-	µg/L	0.5	<0.5	<0.5
Dichloropropene, 1,3-cis-	µg/L	0.3	<0.3	<0.3
Dichloropropene, 1,3-trans-	µg/L	0.4	<0.4	<0.4
Ethylene dibromide	µg/L	0.2	<0.2	<0.2
Hexane (n)	µg/L	1	<1	<1
Methylene chloride	µg/L	2	<2	<2
Methyl Ethyl Ketone (MEK)	µg/L	10	<10	<10
Methyl Isobutyl Ketone (MIK)	µg/L	5	<5	<5
Methyl tert-Butyl Ether (MTBE)	µg/L	0.5	<0.5	<0.5
Styrene	µg/L	0.5	<0.5	<0.5
Tetrachloroethane, 1,1,1,2-	µg/L	0.5	<0.5	<0.5
Tetrachloroethane, 1,1,2,2-	µg/L	0.5	<0.5	<0.5
Tetrachloroethylene	µg/L	0.2	<0.2	<0.2
Trichloroethane, 1,1,1-	µg/L	0.2	<0.2	<0.2
Trichloroethane, 1,1,2-	µg/L	0.5	<0.5	<0.5
Trichloroethylene	µg/L	0.2	<0.2	<0.2
Trichlorofluoromethane	µg/L	0.5	<0.5	<0.5
Vinyl chloride	µg/L	0.2	<0.2	<0.2
PAHs				
Acenaphthylene	µg/L	0.05	<0.05	-
Acenaphthene	µg/L	0.05	<0.05	-
Anthracene	µg/L	0.05	<0.05	-
Benz[a]anthracene	µg/L	0.05	<0.05	-
Benzo[b+k]fluoranthene	µg/L	0.05	<0.05	-
Benzo[g h i]perylene	µg/L	0.05	<0.05	-
Benzo[k]fluoranthene	µg/L	0.05	<0.05	-
Benzo[a]pyrene	µg/L	0.009	<0.009	-
Chrysene	µg/L	0.05	<0.05	-
Dibenz[a h]anthracene	µg/L	0.05	<0.05	-
Fluoranthene	µg/L	0.05	<0.05	-
Fluorene	µg/L	0.05	<0.05	-
Indeno[1 2 3-cd]pyrene	µg/L	0.05	<0.05	-
Methylnaphthalene, 1-	µg/L	0.05	<0.05	-
Methylnaphthalene, 2-	µg/L	0.05	<0.05	-
Methylnaphthalene, 2-(1-)	µg/L	0.071	<0.071	-
Naphthalene	µg/L	0.05	<0.05	-
Phenanthrene	µg/L	0.03	<0.03	-
Pyrene	µg/L	0.05	<0.05	-
Metals				
Antimony (Filtered)	µg/L	0.5	<0.5	-
Arsenic (Filtered)	µg/L	1	<1	-
Barium (Filtered)	µg/L	2	<2	-
Beryllium (Filtered)	µg/L	0.4	<0.4	-
Boron (Total) (Filtered)	µg/L	10	<10	-
Cadmium (Filtered)	µg/L	0.09	<0.09	-
Chromium VI	µg/L	0.5	<0.5	-
Chromium Total (Filtered)	µg/L	5	<5	-
Cobalt (Filtered)	µg/L	0.5	<0.5	-
Copper (Filtered)	µg/L	0.9	<0.9	-
Lead (Filtered)	µg/L	0.5	<0.5	-
Mercury	µg/L	0.1	<0.1	-
Molybdenum (Filtered)	µg/L	0.5	<0.5	-
Nickel (Filtered)	µg/L	1	<1	-
Selenium (Filtered)	µg/L	2	<2	-
Silver (Filtered)	µg/L	0.09	<0.09	-
Sodium (Filtered)	µg/L	0.1	<0.1	-
Thallium (Filtered)	µg/L	0.05	<0.05	-
Uranium (Filtered)	µg/L	0.1	<0.1	-
Vanadium (Filtered)	µg/L	0.5	<0.5	-
Zinc (Filtered)	µg/L	5	<5	-
Inorganics				
Chloride (Filtered)	mg/L	1	<1	-
Glycols				
Ethylene glycol	µg/L	5000	<5000	-
Diethylene glycol	µg/L	5000	<5000	-
Propylene glycol	µg/L	5000	<5000	-
Total Glycols	µg/L	5000	<5000	-

Notes:
* Alert Limit is considered 5x the RDL
mg/L - milligrams per litre
µg/L - microgram per litre
< - less than analytical detection limit
'-' - sample not analyzed for parameter indicated
RDL - reportable detection limit
RPD - Relative Percentage Difference
BOLD RPD Exceeds SLR Alert Limit Criteria for Field and Trip Blanks



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