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PHASE TWO ENVIRONMENTAL SITE ASSESSMENT

99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive Ottawa, Ontario

Prepared for

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1. EXECUTIVE SUMMARY

Geosyntec Consultants International, Inc. (Geosyntec) was retained by Medusa LP to prepare a Phase Two Environmental Site Assessment (ESA) of the properties located at 99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive in Ottawa, Ontario (hereinafter referred to as the "Phase One Property", the "Phase Two Property" or the "Site"). Geosyntec's assignment was conducted in accordance with the terms and conditions outlined in Geosyntec's proposal to Medusa LP dated 19 April 2021.

The Phase Two Property is irregular in shape and measures approximately 31.8 hectares (78.6 acres) in size. The Site comprises agricultural cropland and open field with no buildings present, with the farmed (north) portion of the Site currently utilized for soy and corn farming. It is Geosyntec's understanding that this Phase Two ESA, conducted in accordance with Ontario Regulation (O. Reg.) 153/04, as amended, is required by the City of Ottawa to support Site redevelopment and that a Record of Site Condition (RSC) is not required.

The Phase Two Property is located in an area that is developed with a mix of agricultural, industrial/commercial, and residential properties. The results of a Phase One ESA conducted by Geosyntec, in 2021, identified current and historical potentially contaminating activities (PCAs) at the Site and surrounding lands within the Phase One Study Area. As a result of the PCAs, Geosyntec identified five areas of potential environmental concern (APECs) and related contaminants of potential concern (COPCs) in soil and groundwater. Therefore, this Phase Two ESA was required to be conducted in accordance with O. Reg. 153/04, as amended.

Geosyntec conducted the Phase Two ESA soil and groundwater investigation between 07 June 2021 and 23 June 2021. The Phase Two ESA investigation included the advancement of eleven boreholes; installation of four groundwater monitoring wells; monitoring well development; groundwater level monitoring; surveying; field screening; and, the collection of soil and groundwater samples for laboratory analyses of applicable COPCs. The applicable generic Site Condition Standards for the Site are the '*Table 2: Full Depth Generic Site Condition Standards in a Potable Ground Water Condition'* for Industrial/Commercial/Community property uses and fine-textured soils (Table 2 SCS).

The Phase Two ESA investigation identified vanadium concentrations greater than the respective Table 2 SCS in soil samples collected from nine borehole locations. Geosyntec considers these concentrations to be naturally occurring as vanadium can be associated with the Champlain Sea clay deposits, which commonly contain concentrations of trace metals, including vanadium, above the *'Table 1: Full Depth Background Site Condition Standards'* (Table 1 SCS). It is noted that the Table 1 SCS for vanadium is interchangeable with the Table 2 SCS (i.e., 86 micrograms per gram [µg/g]). In a 2017 study conducted by Geofirma Engineering Ltd., Dillon Consulting Limited, and the City of Ottawa (City of Ottawa, 2017), a review of analytical data collected from 285 soil

samples identified the average and maximum concentrations of vanadium to be 75 µg/g and 136 µg/g, respectively, with the 75th percentile concentration (i.e., 92.5 µg/g) exceeding the Table 1 SCS. The study concluded that naturally occurring concentrations of vanadium, above the respective Table 1 SCS, could be expected to occur quite commonly in clay soils in the Ottawa region. Considering this information, vanadium concentrations identified in on-Site soils are considered to be representative of local background conditions and are thus deemed to not be identified as a contaminant of concern (COC) for the Site. The reported concentrations of COPCs in the remaining analyzed soil samples met the Table 2 SCS.

With respect to the above, it is noted that though vanadium concentrations in soil would not hamper the redevelopment of the Site with actions requiring soil remediation, there are considerations pursuant to O. Reg. 406/19 (On-Site and Excess Soil Management) that will apply. In terms of O. Reg. 406/19 and the soil quality at the Site, the Owner or operator of the Site is permitted to: re-use the soils on-Site; transport soils to a reuse site (with the limitation that "the reuse receiving site" may require additional actions); or, transport soils to a designated waste disposal site in accordance with the protocols stipulated in O. Reg. 406/19.

It is also noted that, for the purposes of this Phase Two ESA, an exemption under O. Reg. 153/04, Section 49.1, Paragraph 1 is relied upon. Based on the results of the Phase Two ESA investigation, chloride was identified at a concentration greater than the respective Table 2 SCS in one groundwater sample collected at the Site. The source of the elevated chloride concentration in groundwater is attributed to the application of de-icing salt on the adjacent municipal right of way (i.e., Merivale Road to the east of the Site), for the purposes of safety for vehicular and pedestrian traffic during the winter months. No other potential sources of salt-related constituents were identified for the Phase Two Property, and the reported concentrations of COPCs in the remaining analyzed groundwater samples met the Table 2 SCS.

Validation of the analytical data demonstrated that field collection and laboratory analysis methods were sufficient to meet the data quality objectives (DQOs) for the purposes of this Phase Two ESA. Based on the results of the soil and groundwater investigation, as of the certification date of 14 July 2021, concentrations of COPCs in the analyzed soil and groundwater samples collected at the Phase Two Property are less than the Table 2 SCS.

2. INTRODUCTION

This Phase Two ESA report is structured to meet the requirements of Table 1, Schedule E of O. Reg. 153/04, as amended, as follows:

- Section 2 – Introduction, including Site description, Phase Two Property ownership, current and proposed future Phase Two Property uses, and applicable Site Condition Standards (SCS).
- Section 3 – Background Information, including physical setting and summary of past investigations.
- Section 4 – Scope of the Investigation, including an overview of the investigation, media investigated, Phase One CSM, deviations from the Sampling and Analysis Plan (SAP), and impediments.
- Section 5 – Investigation Methods, including a description of drilling and excavating, soil sampling, field screening measurements, groundwater monitoring well installation details, field measurements of groundwater quality parameters, groundwater sampling, soil vapour probe installation, soil vapour sampling, analytical testing, residue management procures, elevation surveying, and quality assurance and quality control (QA/QC) measures, as applicable.
- Section 6 – Review and Evaluation, including description of the geology, groundwater elevations and flow direction, groundwater hydraulic gradients, soil texture, soil field screening and quality results, groundwater quality results, sediment quality results, QA/QC results, and the Phase Two CSM.
- Section 7 – Conclusions, including a summary of results.
- Section 8 – References included throughout this report.

The tables, figures, and appendices that document the results of the Phase Two ESA investigation follow the text.

The tables following the results of the Phase Two ESA text show the monitoring well construction details (**Table 1)**, groundwater elevations (**Table 2)**, soil grain size results (**Table 3)**, soil analytical results (**Table 4**), groundwater analytical results (**Table 5**), and the maximum measured concentrations in soil and groundwater (**Table 6**).

The figures following the results of the Phase Two ESA text show the Site location and Site layout (**Figure 1** and **Figure 2**, respectively**)**, Phase One Study Area (**Figure 3**), PCAs (**Figure 4)**, investigation locations showing APECs (**Figure 5**), cross-sections (**Figures 6** through **8**), and groundwater elevations, contours, and inferred groundwater flow directions (**Figure 9**).

The appendices to this Phase Two ESA show the sampling and analysis Plan (SAP; **Appendix A)**, borehole logs (**Appendix B)**, analytical laboratory reports (**Appendix C)**, and legal survey (**Appendix D**).

2.1 Site Description

The Phase Two Property consists of the following municipal addresses: 99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive in Ottawa, Ontario (ON). The property identification numbers (PINs) and legal descriptions associated with the Site addresses are provided in the table below:

Phase Two Property Addresses:	99 Bill Leathem Drive, Ottawa, ON K2C 3H1	2 Leikin Drive, Ottawa, ON K2C 3H1	20 Leikin Drive, Ottawa, ON K2C 3H1
PIN:	04733-6826	04733-6829	04733-0484
Legal Description:	PART OF LOTS 18 AND 19 CONCESSION 1, RF, NEPEAN	PART OF LOTS 18 AND 19 CONCESSION 1, RF, PART 5 PLAN 4R8388 AND PARTS 4, 5, AND 6 PLAN 4R8276, EXCEPT PART 4 PLAN 4R8388, AND EXCEPT PARTS 5, 6, AND 7 PLAN 4R233595, NEPEAN	PART OF LOTS 18 AND 19 CONCESSION 1, RF, PART 3 PLAN 4R8388 AND PARTS 7, 8, AND 9 PLAN 4R8276, S/T N311767, NEPEAN

The Phase Two Property measures approximately 31.8 hectares (78.6 acres) in size. The Site comprises agricultural cropland and open field with no buildings present, with the farmed (north) portion of the Site currently utilized for soy and corn farming. The Phase Two Property is zoned IL9 (Light Industrial) under City of Ottawa By-Law No. 2008-250, which permits a wide range of low impact light industrial uses. The location of the Phase Two Property and a Site Layout Map are shown on **Figure 1** and **Figure 2**, respectively.

Properties located within the Phase One Study Area are a mixture of agricultural, industrial/commercial, and residential land uses. The Site is bounded by agricultural properties and an industrial/commercial property to the north; Longfields Drive, Bill Leathem Drive, and an industrial/commercial property to the south; Paragon Avenue, Leikin Drive, and a mix of agricultural properties and open field to the east; and, Bill Leathem Drive and a mix of agricultural properties and open field to the west. The Phase One Study Area and zoning boundaries[1] are shown on **Figure 3**.

[1] Zoning information was obtained from the geoOttawa interactive online mapping system (https://maps.ottawa.ca/geoottawa/).

2.2 Ownership Information

At the time of the Phase Two ESA investigation, the Site was owned by Zena-Kinder Holdings Limited. The authorization for Geosyntec to proceed with the Phase Two ESA was provided by Mr. Russell Beach, Senior Development Manager of Medusa LP. Their contact information is provided below:

Company:	Medusa LP
Company Address:	16766 rte Trans-Canada, suite 500, Kirkland, Quebec H9H 4M7
Contact Name:	Russell Beach
Contact Telephone:	(613) 614-5263
Contact Email:	russell.beach@broccolini.com

No other parties engaged Geosyntec to prepare this Phase Two ESA.

2.3 Current and Proposed Future Uses

The Phase Two Property comprises agricultural cropland and open field with no buildings present, with the farmed (north) portion of the Site currently utilized for soy and corn farming. Geosyntec understands from Medusa LP that the proposed future land uses of the Phase Two Property will be commercial and/or industrial.

2.4 Applicable Site Condition Standards

The applicable SCS for the Phase Two Property are derived from the Ontario Ministry of Environment, Conservation and Parks (MECP)[2] document entitled, "*Soil, Ground Water and Sediment Standards for Use under Part XV.I of the Environmental Protection Act*" (Queen's Printer, 2011) (MECP Standards). The SCS are divided into a series of tables based on land use type and groundwater use, as well as presence of "sensitive" conditions.

Geosyntec considered the following rationale for determining the applicable generic SCS:

- The Site is located in an area of the City of Ottawa that has recently become serviced by the City of Ottawa municipal drinking water system, as part of the development of the Nepean Business Park. However, it is noted that there may still be water wells located within the Phase One Study Area that are utilized for human consumption and/or agricultural usage. Therefore, Geosyntec is of the opinion that a potable groundwater condition exists at the Site, in accordance with Section 35 of O. Reg. 153/04, as amended;

[2] Previously the Ministry of Environment (MOE) and Ministry of Environment and Climate Change (MOECC).

- The Site is not considered environmentally sensitive, as defined by Section 41 of O. Reg. 153/04, as amended. Based on the results of the Phase One ESA, the Phase Two Property is not located within an area of natural significance, nor does it include or is it adjacent to, or within, 30 metres (m) of such an area, as defined in Section 41(1)(a) of O. Reg. 153/04, as amended. In addition, the results of pH analyses for submitted soil samples in June 2021 were within the range for non-environmentally sensitive sites. The following table describes the soil pH data collected from Phase Two Property:

Soil Designation	pH Value	Sample Depth (m bgs)	Sample Location
Surface (< 1.5 m bgs)	7.34	0.6 – 0.9	MW04-21
Subsurface (> 1.5 m bgs)	7.63	2.1 – 2.4	MW04-21
Surface (< 1.5 m bgs)	6.32	0.0 – 0.6	BH05-21
Subsurface (> 1.5 m bgs)	7.15	1.2 – 1.5	BH05-21
Surface (< 1.5 m bgs)	6.55	0.0 – 0.6	BH06-21
Subsurface (> 1.5 m bgs)	7.74	2.1 – 2.4	BH06-21
Surface (< 1.5 m bgs)	6.30	0.3 – 0.6	MW02-21
Subsurface (> 1.5 m bgs)	6.91 / 6.81[1]	1.2 – 2.8	MW02-21
Note[1] – Indicates field duplicate analytical result m bgs – metres below ground surface			

- The Site is not considered a shallow soil property in accordance with Section 43.1(1)(a) of O. Reg. 153/04, as amended. Based on the results of drilling activities conducted at the Phase Two Property to date, greater than 2 m of overburden soil exists across more than two-thirds of the Site;
- The Site is not considered a property located within 30 m of a water body per Section 43.1(1)(b) of O. Reg. 153/04, as amended. There are no surface water bodies present at the Site or within 30 m of the Site. The nearest body of water is the Rideau River, located approximately 500 m to the east of the Phase Two Property;
- Three samples were submitted for grain-size analysis, two of which were classified as fine-grained by the laboratory (see Section 6.4); and
- The planned future use of the Site is a mix of commercial and industrial land uses. The proposed finished grading of the Site is anticipated to be similar to the existing grade.

Based on the available Site-specific information as described above, the applicable SCS for the Phase Two Property, as defined in the MECP Standards, are the '*Table 2: Full Depth Generic Site Condition Standards in a Potable Ground Water Condition'* for Industrial/Commercial/ Community property uses and fine-textured soils (Table 2 SCS). As such, analytical results obtained as part of this Phase Two ESA were compared to the Table 2 SCS.

3. BACKGROUND INFORMATION

The following sections provide general background information relevant to the Phase Two Property.

3.1 Physical Setting

3.1.1 Water Bodies

The Phase Two Property does not include a water body, nor is it adjacent to a water body; however, in the past there may have been a naturally occurring drainage ditch/swale on the southeast portion of the Site that is no longer evident. It is noted that a stormwater management pond is located approximately 115 m to the south of the Phase Two Property; however, as the pond was constructed for the purpose of controlling surface water drainage, it is not considered to meet the definition of a *'water body'* as per O. Reg. 153/04, as amended. The nearest water body relative to the Phase Two Property is the Rideau River, located approximately 500 m to the east of the Phase Two Property. The Rideau River flows in a northerly direction into the Ottawa River, located approximately 9.7 kilometres to the northwest of the Phase Two Property.

3.1.2 Areas of Natural Significance

The Phase Two Property is not located within an area of natural and scientific interest (ANSI), nor does it include or is it adjacent to or is within 30 m of an ANSI, as defined in Section 41(1)(a) of O. Reg. 153/04, as amended. No ANSIs were identified within the Phase One Study Area as reported in the Phase One ESA (Geosyntec, 2021).

3.1.3 Topography and Surface Water Drainage

Based on a review of Google Earth™ satellite imagery, the Phase Two Property is situated at an elevation of approximately 90 m above mean sea level (amsl). Regional topography slopes gently downward to the east towards the Rideau River, which flows in a northerly direction into the Ottawa River. Stormwater runoff from the Site likely percolates into the ground surface.

3.1.4 Municipal Drinking Water

The Phase Two Property and Phase One Study Area have recently become serviced by the City of Ottawa municipal drinking water system, as part of the development of the Nepean Business Park. However, it is noted that there may still be water wells located within the Phase One study Area that are utilized for human consumption and/or agricultural usage.

3.2 Past Investigations

A copy of the following environmental investigation report was provided to Geosyntec by Medusa LP, on behalf of the Site Owner:

- *'Phase I – Environmental Site Assessment, Vacant Commercial Property, South Merivale Business Park, Nepean, Ontario'*, prepared by John D. Paterson and Associates Limited (JDPA), dated September 28, 1998 (the "1998 Phase I ESA").

Our review of the above-noted report indicated that JDPA completed a Phase I ESA at a larger property comprising the Site and the lands to the east across Leikin Drive (the "Larger Property") in September 1998. At that time, the Larger Property was vacant and consisted of a combination of farmed fields (inferred to produce corn, hay, and wheat) and grassed areas and was free of buildings. A sanitary sewer tunnel, oriented west to east, was located on the Larger Property and was accessible via an entry shaft located to the east between Leikin Drive and Beckstead Road. JDPA reportedly did not identify potential environmental concerns and concluded that no further work was required at the Larger Property.

4. SCOPE OF INVESTIGATION

The following subsections detail the investigation activities conducted as part of this Phase Two ESA.

4.1 Overview of the Site Investigation

To assess the APECs identified in the 2021 Geosyntec Phase One ESA, Geosyntec conducted this Phase Two ESA consisting of drilling boreholes, installing monitoring wells, and sampling and analytical testing of soil and groundwater samples during the Phase Two ESA investigation.

The following activities were conducted by Geosyntec at the Phase Two Property between June 7, 2021 and June 23, 2021:

- Advancement of eleven boreholes (MW01-21 through MW04-21 and BH05-21 through BH11-21) at the Site on June 7, 2021 and June 8, 2021 to a maximum depth of 4.6 metres below ground surface (m bgs). Soil samples were collected and submitted for analyses of COPCs including organochlorinated pesticides (OCPs), petroleum hydrocarbon (PHCs) fractions F1 to F4, polycyclic aromatic hydrocarbons (PAHs), volatile organic compounds (VOCs), metals (including arsenic [As], antimony [Sb], selenium [Se], hexavalent chromium [Cr (VI)], mercury (Hg), boron (hot water soluble) (B-HWS), cyanide (CN-), low or high pH, electrical conductivity (EC), and sodium adsorption ratio (SAR);

- Installation of four monitoring wells (MW01-21 through MW04-21) in the shallow overburden aquifer on June 7, 2021 and June 8, 2021 to assess the shallow groundwater flow direction and to assess for the presence of COPCs in groundwater;

- Completion of an elevation survey on June 9, 2021 by Geosyntec personnel to establish vertical and horizontal control on the monitoring wells, and to allow the assessment of inferred groundwater flow patterns and direction across the Site. An on-Site fire hydrant was used as a temporary benchmark, and each monitoring well was surveyed with reference to the temporary benchmark;

- Completion of groundwater level monitoring at the Phase Two Property on June 23, 2021 to record synoptic water level measurements in each monitoring well; and

- Groundwater samples from the newly installed monitoring wells (MW01-21 through MW04-21) were collected on June 10, 2021 and submitted for analyses of COPCs including OCPs, PHCs, PAHs, VOCs, metals (including As, Sb, Se, Cr [VI], Hg), sodium (Na), B-HWS, chlorine (Cl-), CN-, and low or high pH.

The approximate locations of the investigation locations are shown on **Figure 5**. The rationale for the selection of investigation locations is provided in the table below:

APEC	Media Potentially Impacted	COPCs	Sampling Locations (Soil)	Sampling Locations (Groundwater)
APEC #1 – Potential current and/or former pesticide application across the entire Phase One Property.	Soil and Groundwater	OCPs	BH05-21, BH06-21, BH07-21, BH08-21, BH09-21, BH10-21, BH11-21, MW01-21, MW02-21, MW03-21, MW04-21	MW01-21, MW02-21, MW03-21, MW04-21
APEC #2 – Potential presence of fill material of unknown quality on the southern portion of the Phase One Property.	Soil	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	BH08-21, BH09-21, MW02-21	Not required. Groundwater samples may have been collected for parameters not considered to be COPCs associated with APEC #2.
APEC #3– Potential presence of fill material of unknown quality on the northeastern corner of the Phase One Property.	Soil	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	BH05-21, MW04-21	Not required. Groundwater samples may have been collected for parameters not considered to be COPCs associated with APEC #3.
APEC #4 – Potential presence of fill material of unknown quality on the east-central portion of the Phase One Property.	Soil	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	BH06-21	Not required.
APEC #5 – Potential current and/or former pesticide application on the lands adjoining to the north and west of the Phase One Property.	Soil and Groundwater	OCPs	BH05-21, BH06-21, BH07-21, BH10-21, BH11-21, MW01-21, MW03-21, MW04-21	MW01-21, MW03-21, MW04-21

Notes:

OCPs – Organochlorinated Pesticides
VOCs – Volatile Organic Compounds
PHCs F1-F4 – Petroleum Hydrocarbons Fractions F1 to F4
PAHs – Polycyclic Aromatic Hydrocarbons
As, Sb, Se – Arsenic, Antimony, and Selenium
CN- - Cyanide
Cr (VI) – Hexavalent Chromium
B-HWS – Boron (Hot Water Soluble)
Hg – Mercury
Na – Sodium
Cl- – Chloride
EC – Electrical Conductivity
SAR – Sodium Adsorption Ratio

A copy of the SAP is provided in **Appendix A**.

4.2 Media Investigated

The rationale for the media to be investigated was provided in the findings of the Phase One ESA (Geosyntec, 2021), and the SAP (**Appendix A**). Soil and groundwater were identified as media of concern for the APECs identified for the Phase Two Property; therefore, soil and groundwater sampling were conducted as part of this Phase Two ESA. There are no surface water bodies on the Phase Two Property; thus, sediment does not constitute a medium of concern for the Phase Two Property and was not investigated.

4.3 Phase One Conceptual Site Model

Geosyntec prepared a Phase One Conceptual Site Model (CSM) for the Site as part of a May 2021 Phase One ESA. The Phase One CSM is depicted on **Figures 1** through **5**, which illustrate the following, where applicable:

- Existing buildings and structures
- Water bodies located in whole or in part within the Phase One Study Area
- Areas of natural significance located in whole or in part on the Phase One Study Area
- Roads (including names) within the Phase One Study Area
- Areas where a PCA has occurred, and locations of tanks in the Phase One Study Area
- APECs
- Drinking water wells at the Phase One Property
- Uses of properties adjacent to the Phase One Property

4.3.1 Potentially Contaminating Activities

Two on-Site PCAs were identified during the Phase One ESA, which led to four APECs on the Phase One Property:

- **#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications:** Based on information obtained from the records review, the Phase One Property was developed prior to the mid-1930s for agricultural purposes, most recently for soy and corn farming. Presently, only the northern portion of the Site is farmed, with agricultural operations on the southern portion reportedly having ceased in approximately 2000. Current and former agricultural operations on the Phase One Property may include, or have included, the application of pesticides.

- **#30 – Importation of Fill Material of Unknown Quality:** At the time of the Site reconnaissance, Geosyntec observed numerous stockpiles on the northeastern adjoining property at 2852 Merivale Road, some of which appeared to be stored on the northeastern portion of the Phase One Property. In addition, a soil berm was observed on the east-central portion of the Phase One Property as well as several small fill piles were observed on the southern portion of the Phase One Property during the Site reconnaissance. Further, based on the information obtained during Geosyntec's interview, a '*small soil stockpile*' was historically stored on the southern portion of the Site by the City of Ottawa during the construction of the nearby Royal Canadian Mounted Police facility at 73 Leikin Drive, located approximately 120 m to the south of the Site. The soil stockpile was reportedly removed from the Site following the cessation of construction activities. According to historical satellite imagery dated 1999 and 2007, inferred fill mounds appear to be present on the southern portion of the Phase One Property (i.e., 99 Bill Leathem Drive).

The following off-Site PCAs was identified during the Phase One ESA and was considered to represent an APEC on the Phase One Property:

- **#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications:** The lands to the north and west of the Phase One Property are currently utilized for agricultural purposes. Current agricultural operations may include the application of pesticides.

The above-mentioned PCAs were considered to represent the following APECs on the Phase One Property:

- **APEC #1** – Potential current and/or former use of pesticides across the entire Phase One Property
- **APEC #2** – Potential presence of fill material of unknown quality across the southern portion of the Phase One Property
- **APEC #3** – Potential presence of fill material of unknown quality on the northeastern corner of the Phase One Property
- **APEC #4** – Potential presence of fill material of unknown quality on the east-central portion of the Phase One Property
- **APEC #5 –** Potential current and/or former use of pesticides on the lands adjoining to the north, west, and east of the Phase One Property

The PCAs and APECs are shown in **Appendix A**, and on **Figures 4** and **5**, respectively.

4.3.2 Underground Utilities

At the time of the Phase One ESA Site reconnaissance, the Site was comprised of agricultural cropland and open field and was not provided with utility service. No active buried underground utilities are expected to be located on the Site, and none were reported to be present during Geosyntec's interviewing effort. Reportedly, no utility plans are available for the Phase One Property. No utilities were identified as part of the Phase Two ESA (see Section 6.10.4).

4.3.3 Geological and Hydrogeological Information

A review of the ERIS *'Ontario Base Map (OBM)'* map, as well as satellite imagery available for viewing on Google Earth™, indicates that the Phase One Property is situated at an elevation of approximately 90 m amsl. Regional topography slopes gently downward to the east towards the Rideau River.

According to the ERIS *'Physiography of Southern Ontario'* map, the physiography of the Phase One Study Area is derived from the Ottawa Valley clay plains. The ERIS *'Surficial Geology of Southern Ontario'* map indicates that the Phase One Study area is located in a region comprised of offshore marine deposits described as '*clay, silty clay and silt, commonly calcareous and fossiliferous; locally overlain by thin sands*'. According to the ERIS *'Bedrock Geology of Ontario'* map, the bedrock at the Phase One Property is comprised of dolostone and sandstone of the Beekmantown Group.

Based on a review of information available in the well records from the Ontario Well Water Information System (WWIS) database, the depth to the upper groundwater surface at the Phase One Property is expected to be approximately 5.4 m bgs. Based on topographic gradient and the location of the Rideau River, the direction of groundwater flow on the Phase One Property is projected to be generally east. However, it is noted that a sewer easement from the City of Ottawa, which overlays the location of a municipal sewer line, intersects the central portion of the Site and thus may influence shallow groundwater flow on the Phase One Property.

4.3.4 Data Gaps and Uncertainty

The following data gaps were identified during preparation of the Phase One ESA:

- Only city directory listings for a surrounding property located at 73 Leikin Drive, approximately 120 m to the south of the Phase One Property, could be obtained for review. The listings for the Phase One Property and for other surrounding properties within the Phase One Study Area were either not listed or were inaccessible.

- The ERIS report indicated that poor or inadequate address information was available for a total of 82 *'unplottable sites'* located in the vicinity of the Phase One Property; therefore, these properties could not be readily mapped by ERIS. Because the location of these

records with respect to the Phase One Property could not be discerned, Geosyntec was limited in its ability to express an opinion regarding the potential for environmental impact to the Phase One Property from these properties.

4.4 Deviations from the Sampling and Analysis Plan

Geosyntec prepared the SAP on 31 May 2021, following the Phase One ESA prepared in May 2021. A copy of the SAP is provided in Appendix A. The SAP was prepared to meet the following objectives:

- To define the appropriate sampling and analysis procedures to meet the data quality objectives (DQOs) of the Phase Two ESA
- To define the QA/QC procedures to ensure the representativeness of the data utilized as part of the Phase Two ESA

As part of this Phase Two ESA, Geosyntec reviewed the field investigation activities conducted at the Site by Geosyntec in June 2021, and the following deviations were noted from the SAP:

- The groundwater sample collected from MW01-21 was not field filtered for analysis of metals parameters and as such, was analyzed for total metals in lieu of dissolved metals. Considering that no metals parameters were identified at concentrations above the respective Table 2 SCS in the submitted groundwater samples, and that the reported concentrations of total metals parameters in MW01-21 are generally comparable to the reported concentrations of dissolved metals in the remaining groundwater samples, the QA/QC procedures pursuant to metals sampling and analyses are considered to be acceptable for the purposes of this Phase Two ESA.
- Soil and groundwater samples were submitted for laboratory analyses of the appropriate COPCs per the initial APEC table from the Phase One ESA (Geosyntec, 2021), apart from methyl mercury. Upon further consideration of the APECs identified in the Phase One ESA, the QP is of the opinion that methyl mercury is not considered to represent a COPC for the Site. Thus, no soil or groundwater samples were submitted for analysis of methyl mercury as part of the Phase Two ESA investigation.
- One trip blank should have been submitted for analysis of VOCs/PHC F1 with the chain of custody submission for laboratory analysis of groundwater VOCs/PHCs F1 samples. A trip blank was not submitted for analysis with the June 2021 groundwater samples; however, considering that VOC and PHC F1 parameters were detected at concentrations below the laboratory minimum detection limits in the submitted groundwater samples, there is no indication of a positive bias introduced during groundwater sampling.

- Investigation Derived Waste (IDW), including purged groundwater from monitoring well development and groundwater sampling activities and wash water utilized for equipment contamination, were stored on-Site in 205-L storage drums, and placed in the vicinity of the newly installed monitoring wells. Soil cuttings and residual soils captured in the split spoon samplers, which were noted to be minimal given the maximum investigated depth of 4.6 m bgs, were placed on-Site in the vicinity of each respective boring location. Considering that no parameter exceedances of the Table 2 SCS were identified in soil or groundwater samples collected from the Site, the residue management procedures are considered to be acceptable for the purposes of this Phase Two ESA.

Based on a review of the sampling methods and results of the overall QA/QC program conducted as part of the investigation activities at the Phase Two Property, the DQOs are considered to be met and the data presented in this Phase Two ESA for the horizontal and vertical assessment of COPCs is considered adequate, such that it can be relied upon for the purposes of this Phase Two ESA.

4.5 Impediments

No physical impediments or denial of access that prevented adequate investigation of the APECs was encountered during the completion of this Phase Two ESA.

5. INVESTIGATION METHODS

5.1 General

Geosyntec implemented the following tasks using Geosyntec's standard operating procedures (SOPs) and referencing the SAP (**Appendix A**) during investigations conducted at the Phase Two Property:

- The locations of buried utilities were identified prior to drilling activities. Ontario One Call was contacted to locate underground public utilities to the Site boundary. Geosyntec subcontracted a private utility locator to confirm that proposed drilling locations were clear of buried utilities.
- Drilling by a MECP-licensed drilling contractor using a drill rig equipped with a percussion hammer and hollow stem augers. Spilt spoons were utilized for soil sampling to facilitate the collection of soil samples for field screening and laboratory analyses. Hollow stem augers were utilized to facilitate the installation of groundwater monitoring wells.
- Logging of geologic materials from the boreholes using visual and manual methods.
- Field screening of geologic materials using a hand-held photoionization detector (PID) to aid in selecting samples for laboratory analysis.
- Soil sampling by collecting subsamples from the geologic cores for laboratory analysis.
- Installing and developing single monitoring wells within select boreholes to facilitate sampling of groundwater.
- Groundwater sampling using purging techniques that included field parameter measurements at monitoring wells installed by Geosyntec.
- Measuring water levels using a water level indicator.
- Measuring non-aqueous phase liquid (NAPL) layers using a water-oil interface probe.
- Analytical testing by subcontracted laboratories in accordance with protocols specified by O. Reg. 153/04, as amended.
- Residue management processes for the disposal of soil cuttings and purge water.
- Elevation surveying.
- QA/QC measures that included field QC samples and data validation.

5.2 Drilling

Geosyntec retained a MECP-licensed driller, Dedicated Environmental Services Inc. (DES), to drill eleven boreholes (MW01-21 through MW04-21 and BH05-21 through BH11-21) at the

Phase Two Property between 07 June 2021 and 08 June 2021. Geosyntec was present for the duration of the drilling activities. Boreholes were advanced using a K-40 limited access drill rig equipped with a percussion hammer to a maximum depth of 4.6 m bgs. Following collection of the soil cores, four boreholes (MW01-21 through MW04-21) were advanced using hollow stem augers and instrumented with groundwater monitoring wells. Non-dedicated down-hole drilling equipment was decontaminated prior to first use on-Site, as well as between drilling locations to minimize the potential for cross-contamination. No petroleum-based greases or solvents were used during drilling activities.

5.3 Soil: Sampling

From each borehole location, soil samples were collected at discrete intervals using split-spoon samplers advanced using a drill rig equipped with a percussion hammer. Non-dedicated sampling equipment was decontaminated prior to initial use on-Site and between sampling locations.

The soil samples collected from the boreholes were logged for physical characteristics, as well as olfactory and visual observations of contamination. Soil samples collected during drilling were classified in the field by Geosyntec using procedures similar to those described in the American Society for Testing and Materials (ASTM) visual-manual standard for the description and identification of soils (ASTM, 2000). Dedicated nitrile gloves were utilized during the handling of soil samples. Soil samples were placed directly into laboratory-supplied sample containers and kept on ice until the samples could be relinquished to the laboratory for analysis. Samples collected for VOCs and PHC F1 analysis were collected using Terra Core™ samplers and preserved with methanol. Geological descriptions of soil samples are provided on the borehole logs (**Appendix B**) and a summary of the geological conditions at the Phase Two Property is provided in Section 6.1.

5.4 Field Screening Measurements

Field screening of soil samples for the presence of VOC-derived vapours was conducted using an RKI Model GX-6000 PID. Soil was collected into new, disposable plastic zip-lock bags, the headspace could equilibrate in the bags for a minimum of five minutes, then the headspace was screened within each bag with the PID. According to the manufacturer specifications, the RKI Model GX-6000 PID is accurate to +/- 2 part per million by volume (ppmv), or 10% of readings within 0 to 2000 ppmv. Beyond 2000 ppmv, the devise is accurate to +/- 20%. The precision of the instrument allows for measurement intervals of 0.1 ppmv. The instrument was calibrated prior to use and at a minimum of once per subsequent field day according to the manufacturer's directions using an isobutylene reference gas.

In general, samples with the highest PID screening results, or samples that indicated visual or olfactory evidence of impact, were selected for laboratory analysis of COPCs. At borehole locations where PID readings were negligible, samples were collected from near the surface or

from just above the water table. The PID screening results are presented on the borehole logs in **Appendix B**.

5.5 Groundwater: Monitoring Well Installation

Monitoring wells were installed by DES, a MECP-licensed well contractor. Geosyntec was present for the duration of the monitoring well installation activities. The monitoring well construction details are summarized in **Table 1** and presented on the borehole logs (**Appendix B**).

Down-hole drilling equipment and non-dedicated well development equipment was decontaminated prior to first use on-Site, as well as between drilling locations to minimize the potential for cross-contamination.

5.5.1 Installation of Monitoring Wells

Monitoring wells were installed following borehole advancement and the collection of continuous soil samples using a tracked K-40 limited access drill rig equipped with hollow stem augers. Monitoring wells were constructed using flush-threaded, Schedule 40, clean, polyvinyl chloride (PVC) casing with slotted well screens with a 51-mm (2-in) diameter. Well screens were 3.0 to 3.1 m in length and were installed such that they intersected the water table. Monitoring wells were installed in accordance with O. Reg. 903. No solvents, lubricants, or adhesives were used in the well construction.

After the borehole had been advanced to the target depth, the total depth of the borehole was measured using a weighted measuring tape. The PVC casing and screen were then assembled, capped, and lowered into the open hole. The annular space between the borehole wall and the well screen was filled with silica well sand to approximately 0.3 m above the top of the screen. A bentonite seal was then installed above the sand and hydrated using potable water. Quik-Grout® was then installed above the bentonite seal to 0.3 m below surface and was topped with sand and cement to surface to minimize heaving. Monitoring wells were finished with aboveground protective casings.

5.5.2 Monitoring Well Development

Monitoring wells were developed prior to groundwater sample collection in order to: (1) restore the groundwater properties disturbed during the drilling process; and (2) improve the hydraulic communication between the well and the surrounding materials. Well development was conducted at least 24 hours after well completion activities to allow the well seals to set. Each well was developed using dedicated Waterra® tubing and a foot valve with manual purging. A Horiba water quality meter was used to record water quality parameters during development, including pH, specific conductance, dissolved oxygen (DO), oxygen reduction potential (ORP), temperature, and turbidity. Development continued until the turbidity decreased to below 100 Nephelometric

Turbidity Units (NTU) or five monitoring well volumes were removed. Development water was contained on-Site in 55-gallon drums.

5.6 Groundwater: Field Measurement of Water Quality Parameters

Low flow purging techniques were implemented to minimize hydraulic stress in the well by maintaining low drawdown, and by using low flow pumping rates during both purging and sampling (USEPA, 2010). Purging was performed using a peristaltic pump, as described below, with dedicated high-density polyethylene (HDPE) tubing. During purging, the pH, specific conductance, DO, ORP, temperature, and turbidity of the groundwater was measured using a Horiba water quality meter. Instrument calibration was conducted daily according to the manufacturer specifications using calibration references provided by the equipment supplier. Field parameters were recorded during purging until the parameter values stabilized to within the following criteria:

- ±0.1 units for pH
- ±3% for specific conductance
- ±10 mV for ORP
- ±10% (or 3 readings <0.2 milligrams per litre [mg/L]) for DO

Groundwater samples were collected once field parameters had stabilized, consistent with the SAP (**Appendix A**).

Field parameters were recorded during purging until the parameter values stabilized. The purge water was inspected for the presence of separate phase liquids (e.g., sheens). Observations on the physical appearance and odour (if apparent) of the purged water were noted in the field records.

5.7 Groundwater: Sampling

Following low flow purging (as described above), low flow sampling techniques were also performed using a peristaltic pump and with dedicated HDPE tubing. Samples for the analysis of VOCs and/or PHC F1 were collected by decanting through dedicated tubing directly into pre-labelled containers supplied by the laboratory (so the samples did not pass through the peristaltic pump or flow-through cell prior to collection). Samples for OCPs, PAHs, PHCs F2-F4, metal and inorganics (including As, Sb, Se, Cr[VI], Hg, Na, B-HWS, Cl-, CN-), pH, and conductivity were collected by pumping groundwater directly from the dedicated tubing into lab-provided bottles using a peristaltic pump. Samples for analysis of metals were filtered using a 0.45-micron disposable filter, apart from the groundwater sample collected from MW01-21, which was not field filtered and analyzed for total metals (see Section 4.4 for further detail).

Groundwater sample handing was conducted with dedicated and disposable nitrile gloves. Non-dedicated groundwater sampling equipment (i.e., oil-water interface probe and water level

meter) were decontaminated using a phosphate-free detergent/potable water solution, then rinsed with distilled water, prior to and after the collection of each groundwater sample.

5.8 Sediment: Sampling

No water bodies are present on the Phase Two Property and, as such, sediment is not a media of concern for the Phase Two Property and sediment sampling was not conducted as part of the Phase Two ESA.

5.9 Analytical Testing

Soil and groundwater samples submitted for analysis were representative of the conditions encountered during the investigation activities. Soil and groundwater samples were analyzed by ALS Environmental in Waterloo, Ontario (ALS). ALS is accredited by the Canadian Association for Laboratory Accreditation Inc. (CALA) and employs in-house QA/QC programs to verify sample integrity that consist of method blank samples, matrix spike samples, spiked blank samples, surrogate analysis, laboratory duplicate samples, and QA samples. ALS conducted the laboratory analysis following the Analytical Protocol (MOE, 2011). Copies of the laboratory reports of analysis are provided in **Appendix C**.

5.10 Residue Management Procedures

Soil cuttings and residual soils captured in the split spoon samplers, which were noted to be minimal given the maximum investigated depth of 4.6 m bgs, were placed on-Site in the vicinity of each respective boring location.

Purged groundwater from monitoring well development and groundwater sampling activities and wash water utilized for equipment decontamination were containerized in 205-L (55-gallon) drums and temporarily stored on-Site in the vicinity of the newly installed monitoring wells for subsequent characterization and off-Site disposal.

5.11 Elevation Surveying

Geosyntec conducted monitoring well elevation surveying of the newly installed monitoring wells utilizing a laser level and levelling rod (i.e., simple levelling) Topcon Laser Survey Set on June 9, 2021. An on-Site fire hydrant was used as a temporary benchmark, and each monitoring well (i.e., top of the riser pipe and ground surface elevation) was surveyed with reference to the temporary benchmark. Elevations were presented in metres relative to the temporary benchmark feature (m REL). A summary of the survey elevation data is presented in **Table 2**.

5.12 Quality Assurance and Quality Control Measures

5.12.1 Description of Sample Handling

Sample handling was conducted referencing the *Protocol for Analytical Methods Used in the Assessment of Properties* (MOE, 2011; Analytical Protocol) and Geosyntec's SAP, with exceptions described in Section 4.4. Sample handling was conducted using dedicated and disposable nitrile gloves. Samples were placed directly into laboratory-supplied containers pre-charged with preservatives (where required) and expediently stored within coolers packed with ice, then transported under chain of custody to the laboratory in accordance with the sample handling and custody procedures.

Indelible ink pens were utilized to label sample containers with the following information:

- Project name
- Name or initials of individual collecting the sample
- Date and time of sample collection
- Analyses to be performed
- Preservation chemical (if used)

The following table summarizes the sample containers and preservatives utilized as part of the investigations (the details are provided on the chain of custodies, which are appended to the analytical laboratory reports provided in **Appendix C**):

Parameter	Sample Matrix	Sample Container	Sample Volume	Preservative
VOCs and PHC F1	Soil	glass vials with septum lids pre-charged with 10 milliliters (mL) methanol	3 x 40 mL	Methanol
PAHs, OCPs, PHCs F2-F4, moisture, metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, pH, and grain size	Soil	glass wide-mouth jar with Teflon™ lined lid	120 or 250 mL	None
VOCs and PHC F1	Groundwater	3 x glass vials with septum lids	2 to 3 x 40 mL – vials filled completely, no headspace or bubbles	$NaHSO_4$
PHCs F2-F4 and PAHs	Groundwater	amber glass bottle	2 x 60 mL or 2 x 100 mL	$NaHSO_4$
Anions	Groundwater	HDPE	Variable	None
Cyanide	Groundwater	HDPE	60 mL	NaOH

Parameter	Sample Matrix	Sample Container	Sample Volume	Preservative
Metals	Groundwater	HDPE	60 mL	HNO_3, field-filtered[3]
Hg	Groundwater	glass vial	40 mL	HCl
Cr (VI)	Groundwater	HDPE	60 mL	NaOH and buffer, field-filtered
OCPs	Groundwater	amber glass bottle	2 x 100 mL	None

5.12.2 Sampling Equipment Cleaning Procedures

Non-dedicated and non-disposable sampling equipment was cleaned before initial use and following each use to prevent the introduction of extraneous material into samples and to prevent cross contamination between sample locations. Sampling equipment was decontaminated by washing with a non-phosphate detergent such as Alconox™ or equivalent. Equipment decontamination consisted of the following:

1. Wash with non-phosphate detergent and water solution to remove contamination from the equipment.
2. Deionized or distilled water rinse to remove residual detergent solution.

5.12.3 Field Quality Control Measures

The field quality control measures taken during the Phase Two ESA generally met the requirements documented in the SAP, and requirements of subsection 3(3) of Schedule E in O. Reg. 153/04, as amended, and included the following:

- Non-dedicated and non-disposable sampling equipment was cleaned before initial use and following each use.
- A minimum of one field duplicate sample was submitted for every ten soil and ten groundwater samples submitted for chemical analysis per parameter group.
- Field instruments were calibrated prior to use according to the manufacturer's directions. Where possible, the meters were calibrated using a minimum two-point calibration technique, in accordance with the manufacturer's instructions. Calibration checks using commercially prepared standard solutions or gases were conducted at least once per day

[3] The groundwater sample collected from MW01-21 was not field filtered for analysis of metals parameters. Deviations from the SAP are described in Section 4.4.

and at the end of each sampling session. Instrument calibration information was recorded in the field documentation.

The results of the QA/QC program are also discussed in Section 6.9. Deviations from the SAP are described in Section 4.4.

Based on a review of the sampling methods and results of the overall QA/QC program conducted as part of the investigation activities at the Phase Two Property, the DQOs are considered to be met and the data presented in this Phase Two ESA for the horizontal and vertical assessment of COPCs are considered adequate, such that it can be relied upon for the purposes of this Phase Two ESA.

6. REVIEW AND EVALUATION

6.1 Geology

Subsurface soils beneath the Site are described as offshore marine deposits described as consisting of *'clay, silty clay and silt, commonly calcareous and fossiliferous; locally overlain by thin sands'*, in geological records prepared by the Ontario Geological Survey (OGS). Further, a review of literature pertaining to the geology of the Ottawa region indicates that these native clay soils are associated with post-glacial Champlain Sea marine deposits. A Champlain Sea clay deposit typically includes a surficial crust (consisting of stiffer and drier clay) underlain by a weaker and more compressible clay layer (City of Ottawa, 2017). The map of the Physiography of Southern Ontario shows the Site to be located within a region of Ottawa Valley clay plains (Chapman and Putnam, 1984). OGS identifies bedrock underlying the Site as dolostone and sandstone of the Beekmantown Group.

Based on the results of field investigations conducted at the Phase Two Property, the vegetated surfaces at the Site are underlain by a layer of native material consisting of silty clay/clayey silt, which are inferred to extend to the maximum investigated depth of 4.6 m bgs. Fill was observed at location MW04-21 adjacent to the small soil stockpile (APEC #2) but no other fill material was encountered at the Phase Two Property. The Site investigation geologic data is summarized in the following table:

Geological Unit	Approximate Maximum Thickness (m)	Approximate Elevation Range (m REL)	Approximate Depth Below Ground Surface (m bgs)	Properties
Fill	0.9	99.3 to Ground Surface (98.4)	0.0 to 0.9	Fill material comprised of silt with gravel and rock fragments observed at one borehole at the Site (MW04-21).
Silty Clay / Clayey Silt	4.6	94.9 to Ground surface (99.6 to 99.89)	0.0 to 4.6	Native overburden material consisting of a heterogenous mixture of silt and clay of varying quantities.

A cross-section location plan is presented on **Figure 6**. Cross-sections showing the stratigraphy of the Site are presented on **Figures 7** and **8**.

6.2 Groundwater: Elevations and Flow Direction

The four monitoring well locations at the Site that were used to assess the groundwater elevations and flow direction (MW01-21, MW02-21, MW03-21, and MW04-21) were selected so that the groundwater quality at each APEC could be assessed and to provide adequate spatial coverage for

establishing groundwater flow direction. Well screens were 3.0 to 3.1 m in length and were installed to intersect the water table, with the screen intervals located between 3.1 m to 4.6 m bgs (**Table 1**).

Geosyntec measured the depth to groundwater at the Site on 23 June 2021. The measured depth to groundwater ranged from 1.08 to 1.48 m bgs on 23 June 2021. Groundwater levels were measured with an interface probe, which was also utilized to identify the presence of a NAPL layer at each of the monitoring well locations. Water level elevations were calculated by subtracting the depth to water reading from the surveyed top of casing elevation. A summary of the depths to groundwater measured during each of the monitoring events and calculated groundwater elevations is presented in **Table 2**. Neither NAPL layers nor sheening were observed at the Site during the groundwater monitoring activities.

Based on the measured groundwater levels on June 23, 2021 and field observations recorded during soil logging, the water table is located within the silty clay/clayey silt unit, which forms a surface aquitard (**Figures 7 and 8**).

Groundwater elevations and inferred flow directions, based on depths to groundwater measured on 23 June 2021, are presented on **Figure 9**. The hydraulic gradient is directed to the southwest at the Phase Two Property and groundwater flow is inferred to be in the same direction as the hydraulic gradient. In Geosyntec's Phase One ESA, groundwater at the Site was inferred to flow in an easterly direction towards the Rideau River (Geosyntec, 2021). Groundwater contours presented on **Figure 9** indicate that the shallow groundwater at the Site flows in a southwesterly direction.

The Phase Two Property is reportedly not currently provided with potable or non-potable water, sanitary, or stormwater services and there are no buried utilities present on the Phase Two Property to influence the natural groundwater flow regime. Typically, the depths of the buried utilities are between 2 and 4 m bgs, which would be located beneath the identified water table and therefore would not have the potential to intersect the water table at the Site.

6.3 Groundwater: Hydraulic Gradient

Water level measurements collected from the on-Site monitoring wells provide information with respect to horizontal hydraulic gradient. The water level data collected during groundwater monitoring activities on 23 June 2021 was utilized to calculate minimum and maximum horizontal gradients for the Site. The horizontal hydraulic gradients were calculated as follow:

$$i_{hor} = \frac{\Delta H}{D}$$

Where:

I_{hor} – Horizontal hydraulic gradient (unitless);

H – Change in groundwater elevations between monitoring wells (m); and
D – Lateral distance between contour intervals (m).

The calculated hydraulic gradient for the on-Site data set ranged from 0.0001 to 0.0003. The average horizontal hydraulic gradient is calculated to be 0.0002.

Since no COPCs were identified in groundwater, deeper groundwater monitoring wells were not required to assess vertical distribution of COPCs in groundwater. Therefore, due to the absence of deeper monitoring wells, the vertical hydraulic gradient was not assessed.

6.4 Soil Texture

Geosyntec selected three soil sample locations for grain size analysis across the Phase Two Property (i.e., MW04-21 7-8, BH05-21 4-5, and BH06-21 7-8). Results of the soil grain size analyses are provided in **Table 3**. In two of the three soil samples (i.e., BH05-21 4-5 and BH06-21 7-8), 49.7% and 53.6% of particles, respectively, measured less than 75 microns (µm) in diameter and were therefore classified as being fine-grained. These results are consistent with the field observations recorded during soil logging. Therefore, fine-textured soil standards are considered appropriate for the purposes of the Phase Two ESA investigation.

6.5 Soil: Field Screening

During the borehole investigation, field screening measurements collected with the PID ranged from 0.0 ppm_v (several samples) to 0.9 ppm_v (as shown on the borehole logs **Appendix B**). PID screening results did not indicate the presence of volatile vapours, and therefore soil samples for laboratory analyses were collected from depths just above the water table. Geosyntec did not observe visual or olfactory evidence of impact during the drilling and soil sampling activities.

6.6 Soil Quality

Soil samples were collected in accordance with the SAP, with no deviations. No visual or olfactory evidence of impact was identified during soil investigation. The analytical data for the submitted soil samples collected from boreholes and monitoring wells are summarized in **Table 4**, which also provides the sample depths and a comparison of analytical results to the Table 2 SCS. The soil sample locations are shown on **Figure 6**.

Reported concentrations of COPCs in the analyzed soil samples were identified at concentrations below the respective Table 2 SCS, with the exception of the following:

- Vanadium was detected at concentrations above the respective Table 2 SCS of 86 µg/g in the following soil samples (reported concentration in parentheses): MW01-21 3-4 (96.6 µg/g); MW03-21 0-2 (121 µg/g); MW03-21 3-4 (135 µg/g); MW04-21 2-3 (98.3 µg/g); BH05-21 0-2 (91.7 µg/g); BH06-21 0-2 (86.6 µg/g); BH07-21 0-2 (115 µg/g);

BH07-21 2-4 (134 µg/g); BH09-21 5 (110 µg/g); BH10-21 1-2 (120 µg/g); BH11-21 3-4 (90.2 µg/g); DUP 01, duplicate of BH07-21 2-4 (105 µg/g); and, DUP 02, duplicate of MW01-21 3-4 (98.7 µg/g).

Apart from the vanadium exceedances noted above, metals and inorganics parameters were detected at concentrations below the laboratory minimum detection limits and/or below the respective Table 2 SCS in the remaining analyzed soil samples.

Reported concentrations of VOC, OCP, PAH, and PHC parameters were detected below the laboratory minimum detection limits in the analyzed soil samples, with the exception of PHC F3, which was detected at a concentration of 89 µg/g in soil sample MW04-21 2-3, below the Table 2 SCS of 2,500 µg/g.

Soil analytical results are presented on the certificate of analysis in **Appendix C**.

6.7 Groundwater Quality

Groundwater samples were generally collected in accordance with the SAP, with the exceptions of the deviations noted in Section 4.4. No NAPL or sheening were encountered during the groundwater investigation. The analytical data for the submitted groundwater samples collected from the monitoring wells are summarized in **Table 5**, which also provides the depths of the monitoring well screen intervals and a comparison of analytical results to the Table 2 SCS. The monitoring well locations are shown on **Figure 6**.

Reported concentrations of COPCs in the analyzed groundwater samples collected from the monitoring wells were less than the Table 2 SCS, with the following exception:

- Chloride was detected at a concentration of 855 mg/L in the groundwater sample collected from monitoring well MW04-21, above the respective Table 2 SCS of 790 mg/L.

Apart from the chloride exceedance noted above, metals and inorganics parameters were detected at concentrations below the laboratory minimum detection limits and/or below the respective Table 2 SCS in the remaining analyzed groundwater samples.

Reported concentrations of VOC, OCP, PAH, and PHC parameters were detected below the laboratory minimum detection limits in the analyzed groundwater samples.

Groundwater analytical results are presented on the certificate of analysis in **Appendix C**.

6.8 Sediment Quality

There are no water bodies on the Phase Two Property and, as such, sediment sampling was not completed as part of this Phase Two ESA.

6.9 Quality Assurance and Quality Control Results

QA/QC measures were implemented during the soil and groundwater investigations to result in representative samples and analytical data that meet the DQOs established for this Phase Two ESA (see SAP in **Appendix A**). Deviations from the SAP are described in Section 4.4.

Geosyntec validated the analytical data according to standard data validation procedures. Laboratory sample hold times, method blanks, and analyte lists were reviewed to evaluate whether the sample was analyzed within specified times, the laboratory instrument was operating within specification, and reports were prepared according to project requirements. Field data such as sample labels, dates, and stabilization of parameters were also reviewed. Copies of the analytical laboratory reports are provided in **Appendix C**.

The methods for the field QA/QC program are discussed in Section 5.12 and the results are summarized below. A summary of the data validation results, and QA/QC methods employed as part of the investigations is provided in the subsections below.

6.9.1 Summary of Field QA/QC Program

Soil Field QA/QC Program

Field duplicate soil samples were collected and submitted by Geosyntec during soil sampling activities to evaluate the precision of the sampling and analysis system. A summary of the field duplicate soil sample pairings submitted for analysis is presented on the following table:

Analytical Parameters in Soil	Total Samples	Total Duplicates	Duplicate Sample ID
VOCs	9	1	DUP 3 (duplicate of MW02-21 4-6)
PHCs	9	1	
Metals (including As, Sb, Se, Cr [VI])	25	3	DUP 01 (duplicate of BH07-21 2-4) DUP 02 (duplicate of MW01-21 3-4) DUP 3 (duplicate of MW02-21 4-6)
Hg	9	1	DUP 3 (duplicate of MW02-21 4-6)
B-HWS	9	1	
CN-	9	1	
pH	9	1	
EC and SAR	9	1	

Analytical Parameters in Soil	Total Samples	Total Duplicates	Duplicate Sample ID
OCPs	25	3	DUP 01 (duplicate of BH07-21 2-4) DUP 02 (duplicate of MW01-21 3-4) DUP 3 (duplicate of MW02-21 4-6)
PAHs	9	1	DUP 3 (duplicate of MW02-21 4-6)

As indicated in the table above, the number of duplicate analyses met the O. Reg. 153/04 requirement that at least one field duplicate sample is submitted for every ten samples submitted for analysis per parameter group. Method blanks were evaluated for detections above the reporting limit. Surrogates were evaluated for recovery within acceptance limits. Where calculable, laboratory duplicates, matrix spikes and matrix spike duplicates, and laboratory control samples were compared to applicable criteria or recovery limits. The QA/QC results were within acceptable limits.

For soil sample field duplicates, the RPDs for the reported parameter concentrations in soil between the primary and duplicate samples were calculated at values below the project acceptance criteria of 30%, with the exception of SAR in MW02-21 4-6 and duplicate sample DUP 3, which had an RPD of 48.4%. Based on the overall results of the soil field QA/QC program, the level of observed variance is considered acceptable and the data can be relied upon for the purposes of this Phase Two ESA. As a conservative approach, both the soil sample and its duplicate are considered when comparing analytical results to Table 2 SCS.

Groundwater Field QA/QC Program

Field duplicate groundwater samples were submitted during groundwater sampling activities to evaluate the precision of the sampling and analysis procedures. A summary of the field duplicate groundwater sample pairings submitted for analysis is presented on the following table:

Analytical Parameters in Groundwater	Total Samples	Total Duplicates	Duplicate Sample ID
VOCs	3	1	DUP 01 (duplicate of MW04-21)
PHCs	3	1	
Metals (including As, Sb, Se, Cr [VI])	5	1	
Hg	3	1	
B-HWS	3	1	
CN-	3	1	
Na and Cl-	3	1	
OCPs	5	1	
PAHs	3	1	

As indicated in the table above, the number of duplicate analyses met the O. Reg. 153/04 requirement that at least one field duplicate sample is submitted for every ten samples submitted for analysis per parameter group.

Method blanks were evaluated for detections above the reporting limit. Surrogates were evaluated for recovery within acceptance limits. Where calculable, laboratory duplicates, matrix spikes and matrix spike duplicates, and laboratory control samples and laboratory control sample duplicates were compared to applicable criteria or recovery limits. These QA/QC results were within acceptable limits.

One trip blank sample should have been submitted for analysis of VOCs/PHC F1 with the chain of custody submission of groundwater samples submitted for analysis of VOCs/PHCs F1. A trip blank was not submitted for analysis with the June 2021 groundwater samples. The reported VOC/PHC F1 concentrations for the analyzed groundwater samples were not detected above the laboratory reporting limits. As such, the potential for the introduction of positive bias during the collection, transport and storage of these groundwater samples is considered low and the sample data are considered reliable for the purposes of this Phase Two ESA.

For the groundwater sample field duplicates, the RPDs for the reported parameter concentrations in soil between the primary and duplicate samples were calculated at values below the project acceptance criteria of 30%. Based on these results, the sampling and analysis methods for groundwater sampling are considered adequate and the data can be relied upon for the purposes of this Phase Two ESA.

6.9.2 Deviations from Analytical Protocol

A summary of soil and groundwater sample handling procedures with respect to the methods in the Analytical Protocol (MOE, 2011) is provided below:

- Soil and groundwater samples analyses were within the holding times specified in the Analytical Protocol (MOE, 2011).
- Soil and groundwater samples were placed in coolers with ice immediately upon collection. Appropriate temperatures were maintained during sample storage and during transport to the laboratory. Upon receipt at the laboratory, the average temperature readings for soil and groundwater sample submissions were within the required temperature range of 5±3 degrees Celsius (°C).
- Soil and groundwater samples collected by Geosyntec were placed in laboratory-supplied containers, pre-charged with preservative (where applicable), which met the bottling and preservation criteria of the Analytical Protocol (MOE, 2011).

6.9.3 Laboratory Certificates of Analyses

Geosyntec received a certificate of analysis for each sample submitted for laboratory analysis. Laboratory-applied qualifiers are included in their respective reports. Copies of laboratory certificates of analysis for soil and groundwater samples incorporated into this Phase Two ESA are included in **Appendix C.**

6.9.4 Results of QA/QC Program

Overall, field and laboratory data met the DQOs of the investigations, and decision-making was not affected by the data collected.

6.10 Phase Two Conceptual Site Model

6.10.1 Introduction and Background

The Phase Two Property is irregular in shape and measures approximately 31.8 hectares (78.6 acres) in size. The Phase Two Property consists of three separate land parcels with the municipal addresses of 99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario. The Phase Two Property is proposed for redevelopment to commercial and/or industrial land use.

Zena-Kinder Holdings Limited is the current owner of the Phase Two Property. The property identification numbers (PINs) and legal descriptions associated with the Site addresses comprising the Phase Two Property are provided in the table below:

Phase Two Property Addresses:	99 Bill Leathem Drive, Ottawa, ON K2C 3H1	2 Leikin Drive, Ottawa, ON K2C 3H1	20 Leikin Drive, Ottawa, ON K2C 3H1
PIN:	04733-6826	04733-6829	04733-0484
Legal Description:	PART OF LOTS 18 AND 19 CONCESSION 1, RF, NEPEAN	PART OF LOTS 18 AND 19 CONCESSION 1, RF, PART 5 PLAN 4R8388 AND PARTS 4, 5, AND 6 PLAN 4R8276, EXCEPT PART 4 PLAN 4R8388, AND EXCEPT PARTS 5, 6, AND 7 PLAN 4R233595, NEPEAN	PART OF LOTS 18 AND 19 CONCESSION 1, RF, PART 3 PLAN 4R8388 AND PARTS 7, 8, AND 9 PLAN 4R8276, S/T N311767, NEPEAN

The Phase Two Property comprises agricultural cropland and open field with no buildings present. The Phase One Study Area is shown on **Figure 3**, the potentially contaminating activities (PCAs) are shown on **Figure 4**, and the Areas of Potential Environmental Concern (APECs) and investigation locations are shown on **Figure 5.**

Based on the available Site-specific information as presented herein, the applicable SCS for the Phase Two Property, are the '*Table 2: Full Depth Generic Site Condition Standards in a Potable*

Ground Water Condition' for Industrial/Commercial/Community property uses and fine-textured soils, as defined in the "*Soil, Ground Water and Sediment Standards for Use under Part XV.I of the Environmental Protection Act*" (Queen's Printer, 2011) (MECP Standards) (Table 2 SCS).

6.10.2 Potentially Contaminating Activities

Based on the results of the Phase One ESA, the following two PCAs were identified on-Site, which led to APECs on the Phase One Property (**Figure 4)**:

- **#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications:** Based on information obtained from the records review, the Phase One Property was developed prior to the mid-1930s for agricultural purposes, most recently for soy and corn farming. Presently, only the northern portion of the Site is farmed, with agricultural operations on the southern portion reportedly having ceased in approximately 2000. Current and former agricultural operations on the Phase One Property may include, or have included, the application of pesticides.

- **#30 – Importation of Fill Material of Unknown Quality:** At the time of the Site reconnaissance, Geosyntec observed numerous stockpiles on the northeastern adjoining property at 2852 Merivale Road, some of which appeared to be stored on the northeastern portion of the Phase One Property. In addition, a soil berm was observed on the east-central portion of the Phase One Property as well as several small fill piles were observed on the southern portion of the Phase One Property during the Site reconnaissance. Further, based on the information obtained during Geosyntec's interview, a '*small soil stockpile*' was historically stored on the southern portion of the Site by the City of Ottawa during the construction of the nearby Royal Canadian Mounted Police facility at 73 Leikin Drive, located approximately 120 m to the south of the Site. The soil stockpile was reportedly removed from the Site following the cessation of construction activities. According to historical satellite imagery dated 1999 and 2007, inferred fill mounds appear to be present on the southern portion of the Phase One Property (i.e., 99 Bill Leathem Drive).

Properties with the Phase One Study Area (i.e., 250 m from the Site boundary) are a mixture of agricultural, industrial/commercial, and residential land uses (**Figure 3**). Based on the results of the Phase One ESA, the following PCA was identified off-Site and is considered to represent an APEC on the Phase One Property (**Figure 4**):

- **#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications:** The lands to the north and west of the Phase One Property are currently utilized for agricultural purposes. Current agricultural operations may include the application of pesticides.

The locations of the off-Site PCAs, differentiated by colour as to which off-Site PCAs resulted in an APEC at the Site, are shown on **Figure 4.**

6.10.3 Areas of Potential Environmental Concern

The on-Site PCAs and off-Site PCA within the Phase One Study Area (based on our understanding of the groundwater flow direction [southwest]) resulted in the identification of APECs at the Phase Two Property (**Figure 5**).

The APEC summary table is as follows:

Area of Potential Environmental Concern	Location of Area of Potential Environmental Concern on Phase One Property	Potentially Contaminating Activity	Location of PCA (On-Site or Off-Site)	Contaminants of Potential Concern	Media Potentially Impacted (Ground Water, Soil and/or Sediment)
APEC #1 – Potential current and/or former pesticide application across the entire Phase One Property.	Entire Phase One Property	#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications	On-Site	OCPs	Soil and Groundwater
APEC #2 – Potential presence of fill material of unknown quality on the southern portion of the Phase One Property.	Southern Portion of the Phase One Property	#30 – Importation of Fill Material of Unknown Quality	On-Site	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	Soil
APEC #3– Potential presence of fill material of unknown quality on the northeastern corner of the Phase One Property.	Northeastern Portion of the Phase One Property	#30 – Importation of Fill Material of Unknown Quality	On-Site	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	Soil

Area of Potential Environmental Concern	Location of Area of Potential Environmental Concern on Phase One Property	Potentially Contaminating Activity	Location of PCA (On-Site or Off-Site)	Contaminants of Potential Concern	Media Potentially Impacted (Ground Water, Soil and/or Sediment)
APEC #4 – Potential presence of fill material of unknown quality on the east-central portion of the Phase One Property.	East-Central Portion of the Phase One Property	#30 – Importation of Fill Material of Unknown Quality	On-Site	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	Soil
APEC #5 – Potential current and/or former pesticide application on the lands adjoining to the north and west of the Phase One Property.	Northern Portion of the Phase One Property	#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications	Off-Site	OCPs	Soil and Groundwater

Notes
OCPs – Organochlorinated Pesticides
VOCs – Volatile Organic Compounds
PHCs F1-F4 – Petroleum Hydrocarbons Fractions F1 to F4
PAHs – Polycyclic Aromatic Hydrocarbons
As, Sb, Se – Arsenic, Antimony, and Selenium
CN- - Cyanide
Cr (VI) – Hexavalent Chromium
B-HWS – Boron (Hot Water Soluble)
Hg – Mercury
Na – Sodium
Cl- – Chloride
EC – Electrical Conductivity
SAR – Sodium Adsorption Ratio

A summary of the APECs identified on the Phase One Property are as follows:

- **APEC #1** – Potential current and/or former use of pesticides across the entire Phase One Property
- **APEC #2** – Potential presence of fill material of unknown quality across the southern portion of the Phase One Property
- **APEC #3** – Potential presence of fill material of unknown quality on the northeastern corner of the Phase One Property
- **APEC #4** – Potential presence of fill material of unknown quality on the east-central portion of the Phase One Property

- **APEC #5 –** Potential current and/or former use of pesticides on the lands adjoining to the north, west, and east of the Phase One Property

6.10.4 Subsurface Structures and Utilities

The Phase Two Property is reportedly not currently provided with potable or non-potable water, sanitary, or stormwater services. No active buried underground utilities are present on-Site. Reportedly, no utility plans are available for the Phase Two Property.

Groundwater flow is likely occurring predominantly in the silty clay/clayey silt zone, and the water table encountered at the Phase Two Property exists between approximately 1.1 to 1.5 m bgs. Typically, the depths of the buried utilities are between 2 and 4 m bgs, which would therefore be situated beneath the water table; therefore, it is considered unlikely that buried utilities would have the potential to intersect the water table at the Site. Further, the results of groundwater elevation contouring revealed no indications of influence of buried utilities/structures on the natural groundwater flow regime.

6.10.5 Physical Setting

The Phase Two Property is located in an area that is developed with a mix of agricultural, industrial/commercial, and residential properties. The Phase Two Property is bounded agricultural properties and an industrial/commercial property to the north; Longfields Drive, Bill Leathem Drive, and an industrial/commercial property to the south; Paragon Avenue, Leikin Drive, and a mix of agricultural properties and open field to the east; and, Bill Leathem Drive and a mix of agricultural properties and open field to the west.

Based on a topographical survey conducted for the Phase Two Property, the surface elevation across the Site is relatively flat and ranges between approximately 99.6 and 99.9 m REL. The ground surface of the Phase Two Property is vegetated and consists of a mix of grass, shrubs, and trees.

6.10.6 Stratigraphy

The Phase Two Property is located in an area with subsurface soils described as offshore marine deposits consisting of *'clay, silty clay and silt, commonly calcareous and fossiliferous'* in geological records prepared by the Ontario Geological Survey (OGS). Further, a review of literature pertaining to the geology of the Ottawa region indicates that these native clay soils are associated with post-glacial Champlain Sea marine deposits. A Champlain Sea clay deposit typically includes a surficial crust (consisting of stiffer and drier clay) underlain by a weaker and more compressible clay layer (City of Ottawa, 2017). The map of the Physiography of Southern Ontario shows the Phase Two Property to be located within a region of Ottawa Valley clay plains (Chapman and Putnam, 1984). OGS identifies bedrock underlying the Site as dolostone and sandstone of the Beekmantown Group.

Based on the results of field investigations conducted at the Phase Two Property, the vegetated surfaces at the Site are underlain by a layer of native material consisting of silty clay/clayey silt, which extended to the maximum investigated depth of 4.6 m bgs. Fill was observed at location MW04-21 adjacent to the small soil stockpile (APEC #2) but no other fill material was encountered at the Phase Two Property. The Site investigation geologic data is summarized in the following table:

Geological Unit	Approximate Maximum Thickness (m)	Approximate Elevation Range (m REL)	Approximate Depth Below Ground Surface (m bgs)	Properties
Fill	0.9	99.3 to Ground Surface (98.4)	0.0 to 0.9	Fill material comprised of silt with gravel and rock fragments observed at one borehole at the Site (MW04-21).
Silty Clay / Clayey Silt	4.6	94.9 to Ground surface (99.6 to 99.89)	0.0 to 4.6	Native overburden material consisting of a heterogenous mixture of silt and clay of varying quantities.

A cross-section location plan is presented on **Figure 6**. Cross-sections showing the stratigraphy of the Site are presented on **Figures 7** and **8**.

6.10.7 Hydrogeology and Groundwater Flow

Groundwater elevations and inferred groundwater flow direction, based on depths to groundwater measured on 23 June 2021, are presented on **Figure 9**. The hydraulic gradient is directed to the southwest at the Phase Two Property and groundwater flow is inferred to be in the same direction as the hydraulic gradient. In Geosyntec's Phase One ESA, groundwater at the Site was inferred to flow in an easterly direction towards the Rideau River (Geosyntec, 2021). Groundwater contours presented on **Figure 9** indicate that shallow groundwater at the Site flows in a southwesterly direction.

The water level data collected during the 23 June 2021 groundwater monitoring event was utilized to assess the minimum and maximum horizontal gradients for the Site. The calculated hydraulic gradient for the on-Site data set ranged from 0.0001 to 0.0003. The average horizontal hydraulic gradient is calculated to be 0.0002.

Since no contaminants were identified in groundwater at concentrations greater than the Table 2 SCS, the vertical hydraulic gradient was not assessed.

6.10.8 Approximate Depth to Bedrock

The Phase Two Property is located in an area with bedrock described as consisting of dolostone and sandstone of the Beekmantown Group in geological records prepared by the OGS. Bedrock was not encountered during the Phase Two ESA investigation at a maximum investigated depth of 4.6 m bgs; therefore, depth to bedrock cannot be confirmed.

6.10.9 Approximate Depth to Water Table

The monitoring wells installed at the Site were screened across the water table and the measured depth to groundwater ranged between 1.08 to 1.48 m bgs on 23 June 2021.

6.10.10Section 35, 41, or 43.1 of O. Reg. 153/04

The Site is located in an area of the City of Ottawa that has recently become serviced by the City of Ottawa municipal drinking water system, as part of the development of the Nepean Business Park. However, it is noted that there may still be water wells located within the Phase One Study Area that are utilized for human consumption and/or agricultural usage. Therefore, Geosyntec is of the opinion that a potable groundwater condition exists at the Site, in accordance with Section 35 of O. Reg. 153/04, as amended. The Phase Two Property is not located in a wellhead protection area or other designation identified on the MECP Source Protection Information Atlas[4].

The Site is not considered environmentally sensitive, as defined by Section 41 of O. Reg. 153/04. The Phase Two Property is not located within an area of natural significance, nor does it include or is it adjacent to, or within, 30 m of such an area, as defined in Section 41(1)(a) of O. Reg. 153/04. In addition, the results of pH analyses for submitted soil samples in June 2021 were within the range for non-environmentally sensitive sites.

The Site is not considered a shallow soil property in accordance with Section 43.1(1)(a) of O. Reg. 153/04 because greater than 2 m of overburden soil exists across more than two thirds of the Site. The Site is not considered a property located within 30 m of a water body per Section 43.1(1)(b) of O. Reg. 153/04. There are no surface water bodies present at the Site or within 30 m of the Site. The nearest body of water is Rideau River, located approximately 500 m to the east of the Site.

Based on the available Site-specific information, the applicable SCS for the Phase Two Property are the Table 2 SCS.

[4]https://www.lioapplications.lrc.gov.on.ca/SourceWaterProtection/index.html?viewer=SourceWaterProtection.SWPViewer&locale=en-CA

6.10.11Soil Brought to the Phase Two Property

The following findings were identified in Geosyntec's Phase One ESA with respect to soil brought to the Phase Two Property (Geosyntec, 2021):

- A '*small soil stockpile*' was historically stored on the southern portion of the Site by the City of Ottawa during the construction of the nearby Royal Canadian Mounted Police facility at 73 Leikin Drive, located approximately 120 m to the south of the Site. The soil stockpile was reportedly removed from the Site following the cessation of construction activities. Further, at the time of Geosyntec's Site reconnaissance, Geosyntec observed several small fill piles on the southern portion of the Phase Two Property, at 99 Bill Leathem Drive, which appeared to contain soil material. These findings were collectively carried forth as APEC #2.

- At the time of Geosyntec's Site reconnaissance, Geosyntec observed several stockpiles on the northeastern portion of the Site, which appeared to contain pieces of gravel, concrete, and asphalt. These stockpiles were inferred to be related to operations on the northeastern adjoining property (2852 Merivale Road), which was occupied by Canada Paving for the storage of heavy equipment (i.e., graders and backhoes) and numerous fill stockpiles associated with paving operations. This finding was carried forth as APEC #3.

- At the time of Geosyntec's Site reconnaissance, Geosyntec observed a soil berm on 2 Leikin Drive, on the eastern-central portion of the Site. This finding was carried forth as APEC #4.

To assess the above APECs, Geosyntec advanced three boreholes, including one monitoring well (i.e., BH08-21, BH09-21, and MW02-21), on the southern portion of the Site (i.e., APEC #2); three boreholes, including one monitoring well (i.e., BH05-21, BH06-21, and MW04-21), on the northeastern portion of the Site (i.e., APEC #3); and, one borehole (i.e., BH06-21) on the eastern-central portion of the Site (i.e., APEC #4). Soil and groundwater samples were submitted for chemical analyses of COPCs associated with fill material, including PHCs, PAHs, VOCs, metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR.

The results of the chemical analyses identified concentrations of vanadium, greater than the respective Table 2 SCS, in soil samples collected from boreholes BH09-21, BH05-21, BH06-21, and MW04-21. Vanadium concentrations in soil, greater than the respective Table 2 SCS, are considered to be naturally occurring and associated with the Champlain Sea clay deposits (City of Ottawa, 2017). Further, a concentration of chloride, greater than the respective Table 2 SCS, was identified in the groundwater sample collected from MW04-21. Chloride concentrations in groundwater, greater than the respective Table 2 SCS, are attributed to the application of de-icing salt on the adjacent municipal right-of-way (i.e., Merivale Road to the east of the Site), for the purposes of safety for vehicular and pedestrian traffic during the winter months. Therefore,

elevated vanadium concentrations in soil, and elevated chloride concentrations in groundwater, are not considered to be associated with soil brought to the Phase Two Property and are also deemed not to be in exceedance of the Table 2 SCS. These findings are further discussed below in Section 6.10.13.

6.10.12Proposed Buildings or Structures

Geosyntec understands from Medusa LP that the future land use of the Phase Two Property will be commercial and/or industrial. The Site is proposed to be developed with a 270,000 square foot (sq. ft.) (approximately 25,084 square meter [sq. m.]) warehouse and associated parking areas and laneways.

6.10.13Distribution of Contaminants

The approximate locations of the boreholes/monitoring wells are shown on **Figure 6**. The rationale for the selection of borehole/monitoring well locations is provided in the table below:

APEC	Media Potentially Impacted	COPCs	Sampling Locations (Soil)	Sampling Locations (Groundwater)
APEC #1 – Potential current and/or former pesticide application across the entire Phase One Property	Soil and Groundwater	OCPs	BH05-21, BH06-21, BH07-21, BH08-21, BH09-21, BH10-21, BH11-21, MW01-21, MW02-21, MW03-21, MW04-21	MW01-21, MW02-21, MW03-21, MW04-21
APEC #2 – Potential presence of fill material of unknown quality on the southern portion of the Phase One Property	Soil	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	BH08-21, BH09-21, MW02-21	Not required. Groundwater samples may have been collected for parameters not considered to be COPCs associated with APEC #2
APEC #3– Potential presence of fill material of unknown quality on the northeastern corner of the Phase One Property	Soil	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	BH05-21, MW04-21	Not required. Groundwater samples may have been collected for parameters not considered to be COPCs associated with APEC #3

APEC	Media Potentially Impacted	COPCs	Sampling Locations (Soil)	Sampling Locations (Groundwater)
APEC #4 – Potential presence of fill material of unknown quality on the east-central portion of the Phase One Property	Soil	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	BH06-21	Not required
APEC #5 – Potential current and/or former pesticide application on the lands adjoining to the north and west of the Phase One Property.	Soil and Groundwater	OCPs	BH05-21, BH06-21, BH07-21, BH10-21, BH11-21, MW01-21, MW03-21, MW04-21	MW01-21, MW03-21, MW04-21

Notes:

OCPs – Organochlorinated Pesticides
VOCs – Volatile Organic Compounds
PHCs F1-F4 – Petroleum Hydrocarbons Fractions F1 to F4
PAHs – Polycyclic Aromatic Hydrocarbons
As, Sb, Se – Arsenic, Antimony, and Selenium
CN- - Cyanide
Cr (VI) – Hexavalent Chromium
B-HWS – Boron (Hot Water Soluble)
Hg – Mercury
Na – Sodium
Cl- – Chloride
EC – Electrical Conductivity
SAR – Sodium Adsorption Ratio

Reported concentrations of COPCs in the analyzed soil samples were identified at concentrations below the respective Table 2 SCS, with the exception of the following:

- Vanadium was detected at concentrations greater than the respective Table 2 SCS of 86 µg/g in the following soil samples (reported concentration in parentheses): MW01-21 3-4 (96.6 µg/g); MW03-21 0-2 (121 µg/g); MW03-21 3-4 (135 µg/g); MW04-21 2-3 (98.3 µg/g); BH05-21 0-2 (91.7 µg/g); BH06-21 0-2 (86.6 µg/g); BH07-21 0-2 (115 µg/g); BH07-21 2-4 (134 µg/g); BH09-21 5 (110 µg/g); BH10-21 1-2 (120 µg/g); BH11-21 3-4 (90.2 µg/g); DUP 01, duplicate of BH07-21 2-4 (105 µg/g); and, DUP 02, duplicate of MW01-21 3-4 (98.7 µg/g).

Vanadium concentrations in soil, greater than the respective Table 2 SCS, are considered to be naturally occurring and are associated with the Champlain Sea clay deposits, which commonly contain concentrations of trace metals such as vanadium, barium, boron, chromium, and cobalt above the *'Table 1: Full Depth Background Site Condition Standards'* (Table 1 SCS). It is noted that the Table 1 SCS for vanadium is interchangeable with the Table 2 SCS (i.e., 86 µg/g). In a 2017 study conducted by Geofirma Engineering Ltd., Dillon Consulting Limited, and the City of Ottawa (City of Ottawa, 2017), 59 reports were identified to potentially contain relevant soil chemistry data for soil samples collected from within native clay deposits associated with the

post-glacial Champlain Sea. A total of 285 soil samples were considered to represent valid data points for the assessment. Based on a review of the data, vanadium was identified at an average concentration of 75 µg/g and a maximum concentration of 136 µg/g, with the 75th percentile concentration (i.e., 92.5 µg/g) exceeding the Table 1 SCS. The study concluded that naturally occurring concentrations of vanadium, barium, total chromium, and cobalt, greater than the Table 1 SCS, could be expected to occur quite commonly in clay soils in the Ottawa region. Considering this information, vanadium concentrations identified in on-Site soils are considered to be representative of local background conditions and are thus deemed not to be identified as a contaminant of concern (COC) for the Site.

Reported concentrations of COPCs in the analyzed groundwater samples collected from the monitoring wells were less than the Table 2 SCS, with the following exception:

- Chloride was detected at a concentration of 855 mg/L in the groundwater sample collected from monitoring well MW04-21, greater than the respective Table 2 SCS of 790 mg/L.

Chloride concentrations in groundwater, greater than the respective Table 2 SCS, are attributed to the application of de-icing salt on the adjacent municipal right of way (i.e., Merivale Road to the east of the Site), for the purposes of safety for vehicular and pedestrian traffic during the winter months. No other potential sources of salt-related constituents were identified for the Phase Two Property. Pursuant to Section 49.1, Paragraph 1 of O. Reg. 153/04, as amended, chloride is therefore deemed not to be identified as a COC for the Site.

The COPC concentrations that were identified as present in soil did not serve as a source of contaminant mass to groundwater based on the results of groundwater sampling conducted at the Phase Two Property. No sediment is present on the Phase Two Property. No visual or olfactory evidence of impact, including NAPL, was encountered during the Phase Two ESA investigation.

6.10.14 Contaminant Exposure Pathways

The identified on- and off-Site human receptors are construction (or utility) workers, indoor and outdoor workers, residents (adults and children), and visitors. The identified on- and off-Site ecological receptors are those typical of southwestern Ontario terrestrial urban and vegetated environments and include terrestrial plants, soil invertebrates, reptiles, terrestrial mammals, and terrestrial birds. Ecological receptors have not been identified for the aquatic environment because the Site is not adjacent to, nor does it contain, a permanent body of surface water; the nearest surface water body is approximately 520 m away (Rideau River). As no contaminants have been identified in soil and groundwater at the Phase Two Property, contaminant exposure pathways are not anticipated at the Phase Two Property.

6.10.15 Exemption Under Section 49.1, Paragraph 1

An exemption under O. Reg. 153/04, Section 49.1, Paragraph 1 is relied upon. Based on the results of the Phase Two ESA investigation, chloride was identified at a concentration greater than the respective Table 2 SCS in a groundwater sample collected from MW04-21, located on the northeastern portion of the Phase Two Property. The source of the elevated chloride concentration in groundwater is attributed to the application of de-icing salt on the right of way (i.e., Merivale Road to the east of the Site), for the purposes of safety for vehicular and pedestrian traffic during the winter months. No other potential sources of salt-related constituents were identified for the Phase Two Property.

7. CONCLUSIONS

The Phase Two Property currently comprises agricultural cropland and open field with no buildings present, with the farmed (north) portion of the Site currently utilized for soy and corn farming. It is Geosyntec's understanding that this Phase Two ESA, conducted in accordance with Ontario Regulation (O. Reg.) 153/04, as amended, is required by the City of Ottawa to support Site redevelopment and that a RSC is not required.

The Site is located in an area of agricultural, industrial/commercial, and residential land uses. The Phase One ESA, conducted by Geosyntec in 2021, identified current and historical PCAs at Site and surrounding lands within the Phase One Study Area. As a result, Geosyntec identified five APECs and related COPCs in soil and groundwater at the Site. Therefore, this Phase Two ESA was required to be conducted in accordance with O. Reg. 153/04, as amended.

Geosyntec conducted the Phase Two ESA soil and groundwater investigation between June 7, 2021 and June 23, 2021. The Phase Two ESA investigation included the advancement of eleven boreholes; installation of four groundwater monitoring wells; monitoring well development; groundwater level monitoring; surveying; field screening; and, the collection of soil and groundwater samples for laboratory analyses of applicable COPCs. The applicable generic Site Condition Standards for the Site are the Table 2 SCS.

The Phase Two ESA investigation identified vanadium concentrations, greater than the respective Table 2 SCS, in soil samples collected from nine borehole locations. Geosyntec considers these concentrations to be naturally occurring as vanadium can be associated with the Champlain Sea clay deposits, which commonly contain concentrations of trace metals, including vanadium, above the Table 1 SCS. It is noted that the Table 1 SCS for vanadium is interchangeable with the Table 2 SCS (i.e., 86 µg/g). In a 2017 study conducted by Geofirma Engineering Ltd., Dillon Consulting Limited, and the City of Ottawa (City of Ottawa, 2017), a review of analytical data collected from 285 soil samples identified the average and maximum concentrations of vanadium to be 75 µg/g and 136 µg/g, respectively, with the 75th percentile concentration (i.e., 92.5 µg/g) exceeding the Table 1 SCS. The study concluded that naturally occurring concentrations of vanadium, above the Table 1 SCS, could be expected to occur quite commonly in clay soils in the Ottawa region. Considering this information, vanadium concentrations identified in on-Site soils are considered to be representative of local background conditions and are thus deemed not to be identified as a COC for the Site. The reported concentrations of COPCs in the remaining analyzed soil samples met the Table 2 SCS.

With respect to the above, it is noted that though elevated vanadium concentrations in soil would not hamper the redevelopment of the Site with actions requiring soil remediation, there are considerations pursuant to O. Reg. 406/19 (On-Site and Excess Soil Management) that will apply. In terms of O. Reg. 406/19 and the soil quality at the Site, the Owner or operator of the Site is permitted to: re-use the soils on-Site; transport soils to a reuse site (with the limitation that "the

reuse receiving site" may require additional actions); or, transport soils to a designated waste disposal site in accordance with the protocols stipulated in O. Reg. 406/19.

It is also noted that, for the purposes of this Phase Two ESA, an exemption under O. Reg. 153/04, Section 49.1, Paragraph 1 is relied upon. Based on the results of the Phase Two ESA investigation, chloride was identified at a concentration greater than the respective Table 2 SCS in one groundwater sample collected at the Site. The source of the elevated chloride concentration in groundwater is attributed to the application of de-icing salt on the adjacent municipal right of way (i.e., Merivale Road to the east of the Site), for the purposes of safety for vehicular and pedestrian traffic during the winter months. No other potential sources of salt-related constituents were identified for the Phase Two Property, and the reported concentrations of COPCs in the remaining analyzed groundwater samples met the Table 2 SCS.

Validation of the analytical data demonstrated that field collection and laboratory analysis methods were sufficient to meet the DQOs for the purposes of this Phase Two ESA. Based on the results of the soil and groundwater investigation, as of the certification date of 14 July 2021, concentrations of COPCs in the analyzed soil and groundwater samples collected at the Phase Two Property are less than the Table 2 SCS.

8. SIGNATURES

Geosyntec prepared this Phase Two Environmental Site Assessment for the property located at 99 Bill Leathem Drive, 2 Leikin Drive and 20 Leikin Drive, Ottawa, Ontario in accordance with the requirements stipulated in O. Reg. 153/04, as amended.

This Phase Two ESA was prepared and written by Michelle Gluck, P. Geo. and Hannah Chessell, P. Geo. and reviewed by Berend Velderman, P.Geo. and Paula Hutchison, P. Eng., and QP_{ESA} for this Phase Two ESA.

Respectfully Submitted,

Paula Hutchison, P. Eng., QP_{ESA}
Principal Engineer

9. REFERENCES

ERIS Database Report, 99 Bill Leathem Drive and 2 and 20 Leikin Drive, Nepean, Ontario K2J 0P8. Order No. 21041400366. 20 April 2021.

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TABLES

TABLE 1
MONITORING WELL INSTALLATION DETAILS
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Well/Probe ID	Date Installed	Top of Riser Elevation[1] (m REL)	Ground Surface Elevation[1] (m REL)	Total Depth (m bgs)	Sandpack Interval (m bgs)	Screen Interval (m bgs)	Top of Sandpack / Base of Seal (m bgs)	Stick-Up Interval (m ags)	Construction Material	Screen Slot Size (mm)	Well/Probe Diameter (mm)
MW01-21	7-Jun-21	100.64	99.71	4.72	1.2 - 4.7	1.5 - 4.6	1.2	0.93	Schedule 40 PVC	0.25	25.4
MW02-21	8-Jun-21	100.79	99.85	4.57	1.2 - 4.6	1.5 - 4.6	1.2	0.94	Schedule 40 PVC	0.25	25.4
MW03-21	7-Jun-21	100.51	99.58	4.72	1.2 - 4.7	1.5 - 4.6	1.2	0.93	Schedule 40 PVC	0.25	50.8
MW04-21	7-Jun-21	100.88	99.94	4.72	1.2 - 4.7	1.5 - 4.6	1.2	0.94	Schedule 40 PVC	0.25	25.4

Notes:

[1] The well locations were surveyed by Geosyntec on June 9, 2021 using a laser level and levelling rod. An on-Site fire hydrant was used as a temporary benchmark.

-- - data not available

ID - identifier

mm - millimeters

m ags - metres above ground surface

m bgs - metres below ground surface

m REL - metres relative to benchmark

PVC - polyvinyl chloride

TABLE 2
GROUNDWATER ELEVATIONS
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Well ID[1]	Top of Riser Elevation (m REL)[1]	Ground Surface Elevation (m REL)[1]	23-Jun-21		
			Depth to Groundwater (m btor)	Groundwater Elevation (m REL)	Groundwater Depth (m bgs)
MW01-21	100.64	99.71	2.16	98.48	1.23
MW02-21	100.79	99.85	2.42	98.37	1.48
MW03-21	100.51	99.58	2.01	98.50	1.08
MW04-21	100.88	99.94	2.32	98.56	1.38

Notes:

[1] The well locations were surveyed by Geosyntec on June 09, 2021

m REL - metres relative to benchmark

m bgs - metres below ground surface

m btor - metres below top of riser

TABLE 3
GRAIN SIZE RESULTS
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

	Location	MW04	BH05	BH06
	Sample ID	MW04-21 7-8	BH05-21 4-5	BH06-21 7-8
	Date Sampled (dd-mmm-yy)	08-Jun-21	08-Jun-21	08-Jun-21
	Sample Depth (m bgs)	2.1 - 2.4	1.2 - 1.5	2.1 - 2.4
	Lab Sample ID	L2598394-2	L2598394-4	L2598394-6
Grain Size	***Diameter Range (mm)***	***Results (wt%)***		
Gravel	> 4.75	20.22	<1	<1
Coarse Sand	2.0 - 4.75	17.18	<1	<1
Medium Sand	0.425 - 2.0	20.76	1.18	<1
Fine Silt	0.075 - 0.425	10.88	7.48	15.11
Silt	0.075 - 0.005	14.76	42.29	48.56
Clay	<0.005	16.21	48.17	36.25

Notes:

Soil classification system used: ASTM D422-63 Classification

< - less than

dd-mmm-yy - day-month-year

m bgs - meters below ground surface

mm - millimeter

wt% - percent by weight

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			MW04	MW04	BH05	BH05	BH06	BH06
Sample ID			MW04-21 2-3	MW04-21 7-8	BH05-21 0-2	BH05-21 4-5	BH06-21 0-2	BH06-21 7-8
Date Sampled (dd-mmm-yy)	Units	Table 2 SCS[1]	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021
Sample Depth (m bgs)			0.6 - 0.9	2.1 - 2.4	0.0 - 0.6	1.2 - 1.5	0.0 - 0.6	2.1 - 2.4
QA/QC								
Lab Sample ID			L2598394-1	L2598394-2	L2598394-3	L2598394-4	L2598394-5	L2598394-6
Volatile Organic Compounds								
Acetone	µg/g	28	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Benzene	µg/g	0.4	<0.0068	<0.0068	<0.0068	<0.0068	<0.0068	<0.0068
Bromodichloromethane	µg/g	1.9	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Bromoform	µg/g	1.7	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Bromomethane	µg/g	0.05	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Carbon tetrachloride	µg/g	0.71	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Chlorobenzene	µg/g	2.7	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Dibromochloromethane	µg/g	2.9	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Chloroform	µg/g	0.18	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,2-Dibromoethane	µg/g	0.05	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,2-Dichlorobenzene	µg/g	1.7	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,3-Dichlorobenzene	µg/g	12	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,4-Dichlorobenzene	µg/g	0.57	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Dichlorodifluoromethane	µg/g	25	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,1-Dichloroethane	µg/g	0.6	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,2-Dichloroethane	µg/g	0.05	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,1-Dichloroethylene	µg/g	0.48	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
cis-1,2-Dichloroethylene	µg/g	2.5	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
trans-1,2-Dichloroethylene	µg/g	2.5	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Methylene Chloride	µg/g	2	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,2-Dichloropropane	µg/g	0.68	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
cis-1,3-Dichloropropene[2]	µg/g	0.081	<0.030	<0.030	<0.030	<0.030	<0.030	<0.030
trans-1,3-Dichloropropene[2]	µg/g	0.081	<0.030	<0.030	<0.030	<0.030	<0.030	<0.030
1,3-Dichloropropene (cis & trans)	µg/g	0.05	<0.042	<0.042	<0.042	<0.042	<0.042	<0.042
Ethylbenzene	µg/g	1.6	<0.018	<0.018	<0.018	<0.018	<0.018	<0.018
n-Hexane	µg/g	88	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Methyl Ethyl Ketone	µg/g	88	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Methyl Isobutyl Ketone	µg/g	210	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Methyl tert butyl ether (MTBE)	µg/g	2.3	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Styrene	µg/g	43	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,1,1,2-Tetrachloroethane	µg/g	0.11	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,1,2,2-Tetrachloroethane	µg/g	0.094	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Tetrachloroethylene	µg/g	2.5	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Toluene	µg/g	9	<0.080	<0.080	<0.080	<0.080	<0.080	<0.080
1,1,1-Trichloroethane	µg/g	12	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1,1,2-Trichloroethane	µg/g	0.11	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Trichloroethylene	µg/g	0.61	<0.010	<0.010	<0.010	<0.010	<0.010	<0.010
Trichlorofluoromethane	µg/g	5.8	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Vinyl chloride	µg/g	0.25	<0.020	<0.020	<0.020	<0.020	<0.020	<0.020
o-Xylene[3]	µg/g	30	<0.020	<0.020	<0.020	<0.020	<0.020	<0.020
m+p-Xylenes[3]	µg/g	30	<0.030	<0.030	<0.030	<0.030	<0.030	<0.030
Xylenes (Total)[3]	µg/g	30	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Hydrocarbons								
F1 (C6-C10)	µg/g	65	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
F1-BTEX	µg/g	65	<5.0	<5.0	<5.0	<5.0	<5.0	<5.0
F2 (C10-C16)	µg/g	250	<10	<10	<10	<10	<10	<10
F3 (C16-C34)	µg/g	2500	**89**	<50	<50	<50	<50	<50
F4 (C34-C50)	µg/g	6600	**254**	<50	<50	<50	<50	<50
F4G-SG (GHH-Silica)	µg/g	6600	**950**	--	--	--	--	--
Organochlorine Pesticides								
Aldrin	µg/g	0.11	<0.0040	<0.0020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-BHC	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
beta-BHC	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Lindane	µg/g	0.063	<0.0040	<0.0020	<0.00020	<0.00020	<0.00020	<0.00020
delta-BHC	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
a-chlordane	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
Chlordane (Total)	µg/g	0.05	<0.0085	<0.0042	<0.00042	<0.00042	<0.00042	<0.00042
g-chlordane	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
o,p-DDD	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDD	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDD	µg/g	4.6	<0.0085	<0.0042	<0.00042	<0.00042	<0.00042	<0.00042
o,p-DDE	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDE	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDE	µg/g	0.65	<0.0085	<0.0042	<0.00042	<0.00042	<0.00042	<0.00042
op-DDT	µg/g	-	<0.018	<0.0030	<0.00060	<0.00030	<0.00060	<0.00030
pp-DDT	µg/g	-	<0.018	<0.0030	<0.00120	<0.00030	<0.00090	<0.00030
Total DDT	µg/g	1.4	<0.025	<0.0042	<0.0013	<0.00042	<0.0011	<0.00042
Dieldrin	µg/g	0.081	<0.0040	<0.0020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-Endosulfan	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
beta-Endosulfan	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
Endosulfan Sulfate	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Endosulfan (Total)	µg/g	0.38	<0.0085	<0.0042	<0.00042	<0.00042	<0.00042	<0.00042
Endrin	µg/g	0.04	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Endrin Aldehyde	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Heptachlor	µg/g	0.19	<0.0040	<0.0020	<0.00020	<0.00020	<0.00020	<0.00020
Heptachlor Epoxide	µg/g	0.05	<0.0040	<0.0020	<0.00020	<0.00020	<0.00020	<0.00020
Hexachlorobenzene	µg/g	0.66	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachlorobutadiene	µg/g	0.095	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachloroethane	µg/g	0.43	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Methoxychlor	µg/g	1.6	<0.030	<0.0050	<0.0010	<0.00050	<0.0010	<0.00050
Mirex	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Trans-nonachlor	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050
Oxychlordane	µg/g	-	<0.0060	<0.0030	<0.00030	<0.00030	<0.00030	<0.00030
Pentachloronitrobenzene	µg/g	-	<0.010	<0.0050	<0.00050	<0.00050	<0.00050	<0.00050

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			MW04	MW04	BH05	BH05	BH06	BH06
Sample ID			MW04-21 2-3	MW04-21 7-8	BH05-21 0-2	BH05-21 4-5	BH06-21 0-2	BH06-21 7-8
Date Sampled (dd-mmm-yy)	Units	Table 2 SCS[1]	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021
Sample Depth (m bgs)			0.6 - 0.9	2.1 - 2.4	0.0 - 0.6	1.2 - 1.5	0.0 - 0.6	2.1 - 2.4
QA/QC								
Lab Sample ID			L2598394-1	L2598394-2	L2598394-3	L2598394-4	L2598394-5	L2598394-6
Metals								
Antimony	µg/g	50	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Arsenic	µg/g	18	**4.4**	**4.2**	**3.6**	**4.3**	**3.4**	**3.9**
Barium	µg/g	670	**380**	**207**	**327**	**287**	**315**	**184**
Beryllium	µg/g	10	**1.10**	**0.61**	**0.96**	**0.88**	**0.93**	**0.56**
Boron (Hot Water Soluble)	µg/g	2	**0.12**	<0.10	**0.16**	<0.10	0.20	<0.10
Boron	µg/g	120	**10.8**	**6.2**	**8.4**	**7.9**	**7.1**	**6.7**
Cadmium	µg/g	1.9	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Chromium (Total)	µg/g	160	**136**	**42.7**	**111**	**55.7**	**104**	**35.7**
Chromium, Hexavalent	µg/g	10	**1.55**	**0.56**	**1.50**	**0.51**	**1.24**	**0.30**
Cobalt	µg/g	100	**21.3**	**12.5**	**21.2**	**18.0**	**20.3**	**10.8**
Copper	µg/g	300	**49.3**	**26.3**	**34.6**	**31.6**	**33.4**	**22.3**
Lead	µg/g	120	**10.5**	**6.9**	**8.6**	**7.4**	**8.7**	**5.4**
Mercury	µg/g	20	**0.0187**	**0.0065**	**0.0176**	**0.0081**	**0.0192**	<0.0050
Molybdenum	µg/g	40	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Nickel	µg/g	340	**67.5**	**25.8**	**56.4**	**34.4**	**50.4**	**21.4**
Selenium	µg/g	5.5	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Silver	µg/g	50	<0.20	<0.20	<0.20	<0.20	<0.20	<0.20
Thallium	µg/g	3.3	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Uranium	µg/g	33	**1.4**	<1.0	**1.2**	<1.0	**1.2**	<1.0
Vanadium	µg/g	86	**98.3**	**65.1**	**91.7**	**80.1**	**86.6**	**60.9**
Zinc	µg/g	340	**115**	**66.2**	**102**	**87.0**	**108**	**56.9**
Polycyclic Aromatic Hydrocarbons								
Acenaphthene	µg/g	29	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Acenaphthylene	µg/g	0.17	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Anthracene	µg/g	0.74	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Benzo(a)anthracene	µg/g	0.96	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Benzo(a)pyrene	µg/g	0.3	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Benzo(b&j)fluoranthene	µg/g	0.96	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Benzo(g,h,i)perylene	µg/g	9.6	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Benzo(k)fluoranthene	µg/g	0.96	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Chrysene	µg/g	9.6	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Dibenz(a,h)anthracene	µg/g	0.1	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Fluoranthene	µg/g	9.6	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Fluorene	µg/g	69	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Indeno(1,2,3-cd)pyrene	µg/g	0.95	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
1+2-Methylnaphthalenes	µg/g	42	<0.042	<0.042	<0.042	<0.042	<0.042	<0.042
1-Methylnaphthalene	µg/g	42	<0.030	<0.030	<0.030	<0.030	<0.030	<0.030
2-Methylnaphthalene	µg/g	42	<0.030	<0.030	<0.030	<0.030	<0.030	<0.030
Naphthalene	µg/g	28	<0.013	<0.013	<0.013	<0.013	<0.013	<0.013
Phenanthrene	µg/g	16	<0.046	<0.046	<0.046	<0.046	<0.046	<0.046
Pyrene	µg/g	96	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Cyanides								
Cyanide, Weak Acid Diss	µg/g	0.051	<0.050	<0.050	<0.050	<0.050	<0.050	<0.050
Saturated Paste Extractables								
Sodium Adsorption Ratio		12	**9.77**	**2.85**	**1.35**	**0.85**	**4.69**	**0.75**
Calcium[4]	mg/L	-	**9.65**	**30.0**	**1.62**	**4.07**	**2.84**	**15.6**
Magnesium[4]	mg/L	-	**4.28**	**13.5**	**1.29**	**2.79**	**1.13**	**5.72**
Sodium[4]	mg/L	-	**145**	**74.9**	**9.48**	**9.07**	**36.9**	**13.7**
Physical Tests								
Electrical Conductivity	mS/cm	1.4	**0.769**	**0.626**	**0.0661**	**0.0911**	**0.215**	**0.190**
% Moisture	%	-	**15.7**	**22.4**	**24.4**	**24.1**	**22.2**	**22.3**
pH	pH units	-	**7.34**	**7.63**	**6.32**	**7.15**	**6.55**	**7.74**

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			MW02	MW02	MW02	MW03	MW03	BH07
Sample ID			MW02-21 1-2	MW02-21 4-6	DUP 3	MW03-21 0-2	MW03-21 3-4	BH07-21 0-2
Date Sampled (dd-mmm-yy)	Units	Table 2	8-Jun-2021	8-Jun-2021	8-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021
Sample Depth (m bgs)		SCS[1]	0.3 - 0.6	1.2 - 1.8	1.2 - 1.8	0.0 - 0.6	0.9 - 1.2	0.0 - 0.6
QA/QC					Field Duplicate			
Lab Sample ID			L2598394-7	L2598394-8	L2598394-9	L2598394-10	L2598394-11	L2598394-12
Volatile Organic Compounds								
Acetone	µg/g	28	<0.50	<0.50	<0.50	--	--	--
Benzene	µg/g	0.4	<0.0068	<0.0068	<0.0068	--	--	--
Bromodichloromethane	µg/g	1.9	<0.050	<0.050	<0.050	--	--	--
Bromoform	µg/g	1.7	<0.050	<0.050	<0.050	--	--	--
Bromomethane	µg/g	0.05	<0.050	<0.050	<0.050	--	--	--
Carbon tetrachloride	µg/g	0.71	<0.050	<0.050	<0.050	--	--	--
Chlorobenzene	µg/g	2.7	<0.050	<0.050	<0.050	--	--	--
Dibromochloromethane	µg/g	2.9	<0.050	<0.050	<0.050	--	--	--
Chloroform	µg/g	0.18	<0.050	<0.050	<0.050	--	--	--
1,2-Dibromoethane	µg/g	0.05	<0.050	<0.050	<0.050	--	--	--
1,2-Dichlorobenzene	µg/g	1.7	<0.050	<0.050	<0.050	--	--	--
1,3-Dichlorobenzene	µg/g	12	<0.050	<0.050	<0.050	--	--	--
1,4-Dichlorobenzene	µg/g	0.57	<0.050	<0.050	<0.050	--	--	--
Dichlorodifluoromethane	µg/g	25	<0.050	<0.050	<0.050	--	--	--
1,1-Dichloroethane	µg/g	0.6	<0.050	<0.050	<0.050	--	--	--
1,2-Dichloroethane	µg/g	0.05	<0.050	<0.050	<0.050	--	--	--
1,1-Dichloroethylene	µg/g	0.48	<0.050	<0.050	<0.050	--	--	--
cis-1,2-Dichloroethylene	µg/g	2.5	<0.050	<0.050	<0.050	--	--	--
trans-1,2-Dichloroethylene	µg/g	2.5	<0.050	<0.050	<0.050	--	--	--
Methylene Chloride	µg/g	2	<0.050	<0.050	<0.050	--	--	--
1,2-Dichloropropane	µg/g	0.68	<0.050	<0.050	<0.050	--	--	--
cis-1,3-Dichloropropene[2]	µg/g	0.081	<0.030	<0.030	<0.030	--	--	--
trans-1,3-Dichloropropene[2]	µg/g	0.081	<0.030	<0.030	<0.030	--	--	--
1,3-Dichloropropene (cis & trans)	µg/g	0.05	<0.042	<0.042	<0.042	--	--	--
Ethylbenzene	µg/g	1.6	<0.018	<0.018	<0.018	--	--	--
n-Hexane	µg/g	88	<0.050	<0.050	<0.050	--	--	--
Methyl Ethyl Ketone	µg/g	88	<0.50	<0.50	<0.50	--	--	--
Methyl Isobutyl Ketone	µg/g	210	<0.50	<0.50	<0.50	--	--	--
Methyl tert butyl ether (MTBE)	µg/g	2.3	<0.050	<0.050	<0.050	--	--	--
Styrene	µg/g	43	<0.050	<0.050	<0.050	--	--	--
1,1,1,2-Tetrachloroethane	µg/g	0.11	<0.050	<0.050	<0.050	--	--	--
1,1,2,2-Tetrachloroethane	µg/g	0.094	<0.050	<0.050	<0.050	--	--	--
Tetrachloroethylene	µg/g	2.5	<0.050	<0.050	<0.050	--	--	--
Toluene	µg/g	9	<0.080	<0.080	<0.080	--	--	--
1,1,1-Trichloroethane	µg/g	12	<0.050	<0.050	<0.050	--	--	--
1,1,2-Trichloroethane	µg/g	0.11	<0.050	<0.050	<0.050	--	--	--
Trichloroethylene	µg/g	0.61	<0.010	<0.010	<0.010	--	--	--
Trichlorofluoromethane	µg/g	5.8	<0.050	<0.050	<0.050	--	--	--
Vinyl chloride	µg/g	0.25	<0.020	<0.020	<0.020	--	--	--
o-Xylene[3]	µg/g	30	<0.020	<0.020	<0.020	--	--	--
m+p-Xylenes[3]	µg/g	30	<0.030	<0.030	<0.030	--	--	--
Xylenes (Total)[3]	µg/g	30	<0.050	<0.050	<0.050	--	--	--
Hydrocarbons								
F1 (C6-C10)	µg/g	65	<5.0	<5.0	<5.0	--	--	--
F1-BTEX	µg/g	65	<5.0	<5.0	<5.0	--	--	--
F2 (C10-C16)	µg/g	250	<10	<10	<10	--	--	--
F3 (C16-C34)	µg/g	2500	<50	<50	<50	--	--	--
F4 (C34-C50)	µg/g	6600	<50	<50	<50	--	--	--
F4G-SG (GHH-Silica)	µg/g	6600	--	--	--	--	--	--
Organochlorine Pesticides								
Aldrin	µg/g	0.11	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
beta-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Lindane	µg/g	0.063	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
delta-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
a-chlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Chlordane (Total)	µg/g	0.05	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
g-chlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
o,p-DDD	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDD	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDD	µg/g	4.6	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
o,p-DDE	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDE	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDE	µg/g	0.65	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
op-DDT	µg/g	-	<0.00060	<0.00060	<0.00060	<0.00060	<0.00060	<0.00060
pp-DDT	µg/g	-	<0.00290	<0.00060	<0.00090	<0.00200	<0.00060	<0.00910
Total DDT	µg/g	1.4	<0.0030	<0.00085	<0.0011	<0.0021	<0.00085	<0.0091
Dieldrin	µg/g	0.081	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-Endosulfan	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
beta-Endosulfan	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Endosulfan Sulfate	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Endosulfan (Total)	µg/g	0.38	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
Endrin	µg/g	0.04	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Endrin Aldehyde	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Heptachlor	µg/g	0.19	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
Heptachlor Epoxide	µg/g	0.05	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
Hexachlorobenzene	µg/g	0.66	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachlorobutadiene	µg/g	0.095	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachloroethane	µg/g	0.43	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Methoxychlor	µg/g	1.6	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010	<0.0010
Mirex	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Trans-nonachlor	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Oxychlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Pentachloronitrobenzene	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			MW02	MW02	MW02	MW03	MW03	BH07
Sample ID			MW02-21 1-2	MW02-21 4-6	DUP 3	MW03-21 0-2	MW03-21 3-4	BH07-21 0-2
Date Sampled (dd-mmm-yy)	Units	Table 2	8-Jun-2021	8-Jun-2021	8-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021
Sample Depth (m bgs)		SCS[1]	0.3 - 0.6	1.2 - 1.8	1.2 - 1.8	0.0 - 0.6	0.9 - 1.2	0.0 - 0.6
QA/QC					Field Duplicate			
Lab Sample ID			L2598394-7	L2598394-8	L2598394-9	L2598394-10	L2598394-11	L2598394-12
Metals								
Antimony	µg/g	50	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Arsenic	µg/g	18	**3.6**	**4.5**	**4.2**	**4.8**	**4.1**	**4.9**
Barium	µg/g	670	**275**	**204**	**288**	**345**	**462**	**393**
Beryllium	µg/g	10	**0.88**	**0.60**	**0.77**	**1.45**	**1.06**	**1.39**
Boron (Hot Water Soluble)	µg/g	2	**0.26**	<0.10	**0.12**	--	--	--
Boron	µg/g	120	**7.6**	**5.8**	**7.0**	**15.0**	**8.3**	**15.0**
Cadmium	µg/g	1.9	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Chromium (Total)	µg/g	160	**91.3**	**41.3**	**64.8**	**157**	**131**	**143**
Chromium, Hexavalent	µg/g	10	**2.07**	**0.33**	**0.41**	--	--	--
Cobalt	µg/g	100	**21.8**	**12.7**	**14.6**	**25.2**	**27.9**	**25.4**
Copper	µg/g	300	**28.7**	**28.1**	**32.9**	**56.7**	**58.9**	**53.6**
Lead	µg/g	120	**10.6**	**6.0**	**7.6**	**11.5**	**7.2**	**10.5**
Mercury	µg/g	20	**0.0237**	**0.0068**	**0.0119**	--	--	--
Molybdenum	µg/g	40	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Nickel	µg/g	340	**45.8**	**26.0**	**34.0**	**77.2**	**70.2**	**74.8**
Selenium	µg/g	5.5	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Silver	µg/g	50	<0.20	<0.20	<0.20	<0.20	<0.20	<0.20
Thallium	µg/g	3.3	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Uranium	µg/g	33	**1.3**	<1.0	<1.0	**1.3**	<1.0	**1.4**
Vanadium	µg/g	86	**82.7**	**67.6**	**77.9**	**121**	**135**	**115**
Zinc	µg/g	340	**105**	**66.3**	**92.9**	**128**	**147**	**120**
Polycyclic Aromatic Hydrocarbons								
Acenaphthene	µg/g	29	<0.050	<0.050	<0.050	--	--	--
Acenaphthylene	µg/g	0.17	<0.050	<0.050	<0.050	--	--	--
Anthracene	µg/g	0.74	<0.050	<0.050	<0.050	--	--	--
Benzo(a)anthracene	µg/g	0.96	<0.050	<0.050	<0.050	--	--	--
Benzo(a)pyrene	µg/g	0.3	<0.050	<0.050	<0.050	--	--	--
Benzo(b&j)fluoranthene	µg/g	0.96	<0.050	<0.050	<0.050	--	--	--
Benzo(g,h,i)perylene	µg/g	9.6	<0.050	<0.050	<0.050	--	--	--
Benzo(k)fluoranthene	µg/g	0.96	<0.050	<0.050	<0.050	--	--	--
Chrysene	µg/g	9.6	<0.050	<0.050	<0.050	--	--	--
Dibenz(a,h)anthracene	µg/g	0.1	<0.050	<0.050	<0.050	--	--	--
Fluoranthene	µg/g	9.6	<0.050	<0.050	<0.050	--	--	--
Fluorene	µg/g	69	<0.050	<0.050	<0.050	--	--	--
Indeno(1,2,3-cd)pyrene	µg/g	0.95	<0.050	<0.050	<0.050	--	--	--
1+2-Methylnaphthalenes	µg/g	42	<0.042	<0.042	<0.042	--	--	--
1-Methylnaphthalene	µg/g	42	<0.030	<0.030	<0.030	--	--	--
2-Methylnaphthalene	µg/g	42	<0.030	<0.030	<0.030	--	--	--
Naphthalene	µg/g	28	<0.013	<0.013	<0.013	--	--	--
Phenanthrene	µg/g	16	<0.046	<0.046	<0.046	--	--	--
Pyrene	µg/g	96	<0.050	<0.050	<0.050	--	--	--
Cyanides								
Cyanide, Weak Acid Diss	µg/g	0.051	<0.050	<0.050	<0.050	--	--	--
Saturated Paste Extractables								
Sodium Adsorption Ratio		12	**0.46**	**1.18**	**0.72**	--	--	--
Calcium[4]	mg/L	-	**7.17**	**1.62**	**4.40**	--	--	--
Magnesium[4]	mg/L	-	**3.70**	**0.90**	**2.48**	--	--	--
Sodium[4]	mg/L	-	**6.12**	**7.54**	**7.59**	--	--	--
Physical Tests								
Electrical Conductivity	mS/cm	1.4	**0.0898**	**0.0569**	**0.0874**	--	--	--
% Moisture	%	-	**24.0**	**25.1**	**22.1**	**23.9**	**26.4**	**23.5**
pH	pH units	-	**6.30**	**6.91**	**6.81**	--	--	--

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			BH07		BH08	BH08	BH09	BH09
Sample ID			BH07-21 2-4	DUP 01	BH08-21 2	BH08-21 4	BH09-21 0-2	BH09-21 5
Date Sampled (dd-mmm-yy)	Units	Table 2	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021
Sample Depth (m bgs)		SCS[1]	0.6 - 1.2	0.6 - 1.2	0.6 - 0.9	1.2 - 1.5	0.0 - 0.6	1.5 - 1.8
QA/QC				Field Duplicate				
Lab Sample ID			L2598394-13	L2598394-20	L2598394-14	L2598394-15	L2598394-16	L2598394-17
Volatile Organic Compounds								
Acetone	µg/g	28	--	--	--	--	--	--
Benzene	µg/g	0.4	--	--	--	--	--	--
Bromodichloromethane	µg/g	1.9	--	--	--	--	--	--
Bromoform	µg/g	1.7	--	--	--	--	--	--
Bromomethane	µg/g	0.05	--	--	--	--	--	--
Carbon tetrachloride	µg/g	0.71	--	--	--	--	--	--
Chlorobenzene	µg/g	2.7	--	--	--	--	--	--
Dibromochloromethane	µg/g	2.9	--	--	--	--	--	--
Chloroform	µg/g	0.18	--	--	--	--	--	--
1,2-Dibromoethane	µg/g	0.05	--	--	--	--	--	--
1,2-Dichlorobenzene	µg/g	1.7	--	--	--	--	--	--
1,3-Dichlorobenzene	µg/g	12	--	--	--	--	--	--
1,4-Dichlorobenzene	µg/g	0.57	--	--	--	--	--	--
Dichlorodifluoromethane	µg/g	25	--	--	--	--	--	--
1,1-Dichloroethane	µg/g	0.6	--	--	--	--	--	--
1,2-Dichloroethane	µg/g	0.05	--	--	--	--	--	--
1,1-Dichloroethylene	µg/g	0.48	--	--	--	--	--	--
cis-1,2-Dichloroethylene	µg/g	2.5	--	--	--	--	--	--
trans-1,2-Dichloroethylene	µg/g	2.5	--	--	--	--	--	--
Methylene Chloride	µg/g	2	--	--	--	--	--	--
1,2-Dichloropropane	µg/g	0.68	--	--	--	--	--	--
cis-1,3-Dichloropropene[2]	µg/g	0.081	--	--	--	--	--	--
trans-1,3-Dichloropropene[2]	µg/g	0.081	--	--	--	--	--	--
1,3-Dichloropropene (cis & trans)	µg/g	0.05	--	--	--	--	--	--
Ethylbenzene	µg/g	1.6	--	--	--	--	--	--
n-Hexane	µg/g	88	--	--	--	--	--	--
Methyl Ethyl Ketone	µg/g	88	--	--	--	--	--	--
Methyl Isobutyl Ketone	µg/g	210	--	--	--	--	--	--
Methyl tert butyl ether (MTBE)	µg/g	2.3	--	--	--	--	--	--
Styrene	µg/g	43	--	--	--	--	--	--
1,1,1,2-Tetrachloroethane	µg/g	0.11	--	--	--	--	--	--
1,1,2,2-Tetrachloroethane	µg/g	0.094	--	--	--	--	--	--
Tetrachloroethylene	µg/g	2.5	--	--	--	--	--	--
Toluene	µg/g	9	--	--	--	--	--	--
1,1,1-Trichloroethane	µg/g	12	--	--	--	--	--	--
1,1,2-Trichloroethane	µg/g	0.11	--	--	--	--	--	--
Trichloroethylene	µg/g	0.61	--	--	--	--	--	--
Trichlorofluoromethane	µg/g	5.8	--	--	--	--	--	--
Vinyl chloride	µg/g	0.25	--	--	--	--	--	--
o-Xylene[3]	µg/g	30	--	--	--	--	--	--
m+p-Xylenes[3]	µg/g	30	--	--	--	--	--	--
Xylenes (Total)[3]	µg/g	30	--	--	--	--	--	--
Hydrocarbons								
F1 (C6-C10)	µg/g	65	--	--	--	--	--	--
F1-BTEX	µg/g	65	--	--	--	--	--	--
F2 (C10-C16)	µg/g	250	--	--	--	--	--	--
F3 (C16-C34)	µg/g	2500	--	--	--	--	--	--
F4 (C34-C50)	µg/g	6600	--	--	--	--	--	--
F4G-SG (GHH-Silica)	µg/g	6600	--	--	--	--	--	--
Organochlorine Pesticides								
Aldrin	µg/g	0.11	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
beta-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Lindane	µg/g	0.063	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
delta-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
a-chlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Chlordane (Total)	µg/g	0.05	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
g-chlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
o,p-DDD	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDD	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDD	µg/g	4.6	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
o,p-DDE	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDE	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDE	µg/g	0.65	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
op-DDT	µg/g	-	<0.00060	<0.0012	<0.00060	<0.0012	<0.0012	<0.0012
pp-DDT	µg/g	-	<0.00060	<0.0012	<0.00370	<0.0020	<0.0040	<0.0012
Total DDT	µg/g	1.4	<0.00085	<0.0017	<0.0037	<0.0023	<0.0042	<0.0017
Dieldrin	µg/g	0.081	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-Endosulfan	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
beta-Endosulfan	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Endosulfan Sulfate	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Endosulfan (Total)	µg/g	0.38	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
Endrin	µg/g	0.04	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Endrin Aldehyde	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Heptachlor	µg/g	0.19	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
Heptachlor Epoxide	µg/g	0.05	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
Hexachlorobenzene	µg/g	0.66	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachlorobutadiene	µg/g	0.095	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachloroethane	µg/g	0.43	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Methoxychlor	µg/g	1.6	<0.0010	<0.0020	<0.0010	<0.0020	<0.0020	<0.0020
Mirex	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Trans-nonachlor	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Oxychlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Pentachloronitrobenzene	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			BH07		BH08	BH08	BH09	BH09
Sample ID			BH07-21 2-4	DUP 01	BH08-21 2	BH08-21 4	BH09-21 0-2	BH09-21 5
Date Sampled (dd-mmm-yy)	Units	Table 2 SCS[1]	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021
Sample Depth (m bgs)			0.6 - 1.2	0.6 - 1.2	0.6 - 0.9	1.2 - 1.5	0.0 - 0.6	1.5 - 1.8
QA/QC				Field Duplicate				
Lab Sample ID			L2598394-13	L2598394-20	L2598394-14	L2598394-15	L2598394-16	L2598394-17
Metals								
Antimony	µg/g	50	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Arsenic	µg/g	18	**4.7**	**3.8**	**2.8**	**3.5**	**3.7**	**4.2**
Barium	µg/g	670	**496**	**389**	**211**	**283**	**285**	**440**
Beryllium	µg/g	10	**1.08**	**0.78**	**0.75**	**0.69**	**0.86**	**0.88**
Boron (Hot Water Soluble)	µg/g	2	--	--	--	--	--	--
Boron	µg/g	120	**8.4**	**5.4**	**7.9**	**7.3**	**7.6**	**5.8**
Cadmium	µg/g	1.9	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Chromium (Total)	µg/g	160	**131**	**98.3**	**77.6**	**57.6**	**86.7**	**105**
Chromium, Hexavalent	µg/g	10	--	--	--	--	--	--
Cobalt	µg/g	100	**30.0**	**24.1**	**17.2**	**16.3**	**17.8**	**20.5**
Copper	µg/g	300	**61.2**	**49.4**	**24.0**	**30.6**	**31.2**	**52.8**
Lead	µg/g	120	**7.7**	**6.3**	**9.9**	**6.0**	**8.9**	**6.7**
Mercury	µg/g	20	--	--	--	--	--	--
Molybdenum	µg/g	40	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Nickel	µg/g	340	**74.1**	**59.2**	**35.6**	**35.8**	**44.6**	**55.0**
Selenium	µg/g	5.5	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Silver	µg/g	50	<0.20	<0.20	<0.20	<0.20	<0.20	<0.20
Thallium	µg/g	3.3	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Uranium	µg/g	33	<1.0	<1.0	**1.0**	<1.0	**1.4**	**1.1**
Vanadium	µg/g	86	**134**	**105**	**75.3**	**74.1**	**82.4**	**110**
Zinc	µg/g	340	**141**	**113**	**96.0**	**83.3**	**94.4**	**115**
Polycyclic Aromatic Hydrocarbons								
Acenaphthene	µg/g	29	--	--	--	--	--	--
Acenaphthylene	µg/g	0.17	--	--	--	--	--	--
Anthracene	µg/g	0.74	--	--	--	--	--	--
Benzo(a)anthracene	µg/g	0.96	--	--	--	--	--	--
Benzo(a)pyrene	µg/g	0.3	--	--	--	--	--	--
Benzo(b&j)fluoranthene	µg/g	0.96	--	--	--	--	--	--
Benzo(g,h,i)perylene	µg/g	9.6	--	--	--	--	--	--
Benzo(k)fluoranthene	µg/g	0.96	--	--	--	--	--	--
Chrysene	µg/g	9.6	--	--	--	--	--	--
Dibenz(a,h)anthracene	µg/g	0.1	--	--	--	--	--	--
Fluoranthene	µg/g	9.6	--	--	--	--	--	--
Fluorene	µg/g	69	--	--	--	--	--	--
Indeno(1,2,3-cd)pyrene	µg/g	0.95	--	--	--	--	--	--
1+2-Methylnaphthalenes	µg/g	42	--	--	--	--	--	--
1-Methylnaphthalene	µg/g	42	--	--	--	--	--	--
2-Methylnaphthalene	µg/g	42	--	--	--	--	--	--
Naphthalene	µg/g	28	--	--	--	--	--	--
Phenanthrene	µg/g	16	--	--	--	--	--	--
Pyrene	µg/g	96	--	--	--	--	--	--
Cyanides								
Cyanide, Weak Acid Diss	µg/g	0.051	--	--	--	--	--	--
Saturated Paste Extractables								
Sodium Adsorption Ratio		12	--	--	--	--	--	--
Calcium[4]	mg/L	-	--	--	--	--	--	--
Magnesium[4]	mg/L	-	--	--	--	--	--	--
Sodium[4]	mg/L	-	--	--	--	--	--	--
Physical Tests								
Electrical Conductivity	mS/cm	1.4	--	--	--	--	--	--
% Moisture	%	-	**25.5**	**26.0**	**16.5**	**23.2**	**17.7**	**26.8**
pH	pH units	-	--	--	--	--	--	--

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			BH10	BH10	MW01	MW01	MW01	BH11
Sample ID			BH10-21 1-2	BH10-21 2-4	MW01-21 1-2	MW01-21 3-4	DUP 02	BH11-21 1-2
Date Sampled (dd-mmm-yy)	Units	Table 2	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	8-Jun-2021
Sample Depth (m bgs)		SCS[1]	0.3 - 0.6	0.6 - 1.2	0.3 - 0.6	0.9 - 1.2	0.9 - 1.2	0.3 - 0.6
QA/QC							Field Duplicate	
Lab Sample ID			L2598394-18	L2598394-19	L2598394-22	L2598394-23	L2598394-21	L2598394-24
Volatile Organic Compounds								
Acetone	µg/g	28	--	--	--	--	--	--
Benzene	µg/g	0.4	--	--	--	--	--	--
Bromodichloromethane	µg/g	1.9	--	--	--	--	--	--
Bromoform	µg/g	1.7	--	--	--	--	--	--
Bromomethane	µg/g	0.05	--	--	--	--	--	--
Carbon tetrachloride	µg/g	0.71	--	--	--	--	--	--
Chlorobenzene	µg/g	2.7	--	--	--	--	--	--
Dibromochloromethane	µg/g	2.9	--	--	--	--	--	--
Chloroform	µg/g	0.18	--	--	--	--	--	--
1,2-Dibromoethane	µg/g	0.05	--	--	--	--	--	--
1,2-Dichlorobenzene	µg/g	1.7	--	--	--	--	--	--
1,3-Dichlorobenzene	µg/g	12	--	--	--	--	--	--
1,4-Dichlorobenzene	µg/g	0.57	--	--	--	--	--	--
Dichlorodifluoromethane	µg/g	25	--	--	--	--	--	--
1,1-Dichloroethane	µg/g	0.6	--	--	--	--	--	--
1,2-Dichloroethane	µg/g	0.05	--	--	--	--	--	--
1,1-Dichloroethylene	µg/g	0.48	--	--	--	--	--	--
cis-1,2-Dichloroethylene	µg/g	2.5	--	--	--	--	--	--
trans-1,2-Dichloroethylene	µg/g	2.5	--	--	--	--	--	--
Methylene Chloride	µg/g	2	--	--	--	--	--	--
1,2-Dichloropropane	µg/g	0.68	--	--	--	--	--	--
cis-1,3-Dichloropropene[2]	µg/g	0.081	--	--	--	--	--	--
trans-1,3-Dichloropropene[2]	µg/g	0.081	--	--	--	--	--	--
1,3-Dichloropropene (cis & trans)	µg/g	0.05	--	--	--	--	--	--
Ethylbenzene	µg/g	1.6	--	--	--	--	--	--
n-Hexane	µg/g	88	--	--	--	--	--	--
Methyl Ethyl Ketone	µg/g	88	--	--	--	--	--	--
Methyl Isobutyl Ketone	µg/g	210	--	--	--	--	--	--
Methyl tert butyl ether (MTBE)	µg/g	2.3	--	--	--	--	--	--
Styrene	µg/g	43	--	--	--	--	--	--
1,1,1,2-Tetrachloroethane	µg/g	0.11	--	--	--	--	--	--
1,1,2,2-Tetrachloroethane	µg/g	0.094	--	--	--	--	--	--
Tetrachloroethylene	µg/g	2.5	--	--	--	--	--	--
Toluene	µg/g	9	--	--	--	--	--	--
1,1,1-Trichloroethane	µg/g	12	--	--	--	--	--	--
1,1,2-Trichloroethane	µg/g	0.11	--	--	--	--	--	--
Trichloroethylene	µg/g	0.61	--	--	--	--	--	--
Trichlorofluoromethane	µg/g	5.8	--	--	--	--	--	--
Vinyl chloride	µg/g	0.25	--	--	--	--	--	--
o-Xylene[3]	µg/g	30	--	--	--	--	--	--
m+p-Xylenes[3]	µg/g	30	--	--	--	--	--	--
Xylenes (Total)[3]	µg/g	30	--	--	--	--	--	--
Hydrocarbons								
F1 (C6-C10)	µg/g	65	--	--	--	--	--	--
F1-BTEX	µg/g	65	--	--	--	--	--	--
F2 (C10-C16)	µg/g	250	--	--	--	--	--	--
F3 (C16-C34)	µg/g	2500	--	--	--	--	--	--
F4 (C34-C50)	µg/g	6600	--	--	--	--	--	--
F4G-SG (GHH-Silica)	µg/g	6600	--	--	--	--	--	--
Organochlorine Pesticides								
Aldrin	µg/g	0.11	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
beta-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Lindane	µg/g	0.063	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
delta-BHC	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
a-chlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Chlordane (Total)	µg/g	0.05	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
g-chlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
o,p-DDD	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDD	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDD	µg/g	4.6	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
o,p-DDE	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDE	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Total DDE	µg/g	0.65	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
op-DDT	µg/g	-	<0.0012	<0.0012	<0.00030	<0.00030	<0.00030	<0.00030
pp-DDT	µg/g	-	<0.0100	<0.0050	<0.00030	<0.00030	<0.00030	<0.00030
Total DDT	µg/g	1.4	<0.010	<0.0051	<0.00042	<0.00042	<0.00042	<0.00042
Dieldrin	µg/g	0.081	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
alpha-Endosulfan	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
beta-Endosulfan	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Endosulfan Sulfate	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Endosulfan (Total)	µg/g	0.38	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042	<0.00042
Endrin	µg/g	0.04	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Endrin Aldehyde	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Heptachlor	µg/g	0.19	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
Heptachlor Epoxide	µg/g	0.05	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020	<0.00020
Hexachlorobenzene	µg/g	0.66	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachlorobutadiene	µg/g	0.095	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Hexachloroethane	µg/g	0.43	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Methoxychlor	µg/g	1.6	<0.0020	<0.0020	<0.00050	<0.00050	<0.00050	<0.00050
Mirex	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Trans-nonachlor	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050
Oxychlordane	µg/g	-	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030	<0.00030
Pentachloronitrobenzene	µg/g	-	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050	<0.00050

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location	Units	Table 2 SCS[1]	BH10	BH10	MW01	MW01	MW01	BH11
Sample ID			BH10-21 1-2	BH10-21 2-4	MW01-21 1-2	MW01-21 3-4	DUP 02	BH11-21 1-2
Date Sampled (dd-mmm-yy)			7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	7-Jun-2021	8-Jun-2021
Sample Depth (m bgs)			0.3 - 0.6	0.6 - 1.2	0.3 - 0.6	0.9 - 1.2	0.9 - 1.2	0.3 - 0.6
QA/QC							Field Duplicate	
Lab Sample ID			L2598394-18	L2598394-19	L2598394-22	L2598394-23	L2598394-21	L2598394-24
Metals								
Antimony	µg/g	50	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Arsenic	µg/g	18	**4.3**	**3.1**	**3.0**	**3.1**	**3.6**	**3.1**
Barium	µg/g	670	**477**	**244**	**234**	**439**	**419**	**291**
Beryllium	µg/g	10	**0.93**	**0.83**	**0.69**	**0.86**	**0.75**	**0.82**
Boron (Hot Water Soluble)	µg/g	2	--	--	--	--	--	--
Boron	µg/g	120	**6.4**	**5.9**	**5.2**	<5.0	**5.9**	**5.5**
Cadmium	µg/g	1.9	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Chromium (Total)	µg/g	160	**115**	**76.7**	**75.0**	**107**	**93.4**	**87.1**
Chromium, Hexavalent	µg/g	10	--	--	--	--	--	--
Cobalt	µg/g	100	**25.1**	**15.1**	**13.8**	**21.7**	**21.5**	**13.0**
Copper	µg/g	300	**56.7**	**26.3**	**20.8**	**45.1**	**46.3**	**28.9**
Lead	µg/g	120	**7.4**	**8.8**	**9.9**	**6.9**	**6.5**	**7.0**
Mercury	µg/g	20	--	--	--	--	--	--
Molybdenum	µg/g	40	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Nickel	µg/g	340	**62.7**	**35.5**	**33.8**	**53.0**	**52.7**	**42.7**
Selenium	µg/g	5.5	<1.0	<1.0	<1.0	<1.0	<1.0	<1.0
Silver	µg/g	50	<0.20	<0.20	<0.20	<0.20	<0.20	<0.20
Thallium	µg/g	3.3	<0.50	<0.50	<0.50	<0.50	<0.50	<0.50
Uranium	µg/g	33	<1.0	**1.0**	**1.7**	**1.2**	<1.0	<1.0
Vanadium	µg/g	86	**120**	**71.0**	**64.7**	**96.6**	**98.7**	**82.6**
Zinc	µg/g	340	**129**	**74.4**	**97.2**	**131**	**115**	**92.9**
Polycyclic Aromatic Hydrocarbons								
Acenaphthene	µg/g	29	--	--	--	--	--	--
Acenaphthylene	µg/g	0.17	--	--	--	--	--	--
Anthracene	µg/g	0.74	--	--	--	--	--	--
Benzo(a)anthracene	µg/g	0.96	--	--	--	--	--	--
Benzo(a)pyrene	µg/g	0.3	--	--	--	--	--	--
Benzo(b&j)fluoranthene	µg/g	0.96	--	--	--	--	--	--
Benzo(g,h,i)perylene	µg/g	9.6	--	--	--	--	--	--
Benzo(k)fluoranthene	µg/g	0.96	--	--	--	--	--	--
Chrysene	µg/g	9.6	--	--	--	--	--	--
Dibenz(a,h)anthracene	µg/g	0.1	--	--	--	--	--	--
Fluoranthene	µg/g	9.6	--	--	--	--	--	--
Fluorene	µg/g	69	--	--	--	--	--	--
Indeno(1,2,3-cd)pyrene	µg/g	0.95	--	--	--	--	--	--
1+2-Methylnaphthalenes	µg/g	42	--	--	--	--	--	--
1-Methylnaphthalene	µg/g	42	--	--	--	--	--	--
2-Methylnaphthalene	µg/g	42	--	--	--	--	--	--
Naphthalene	µg/g	28	--	--	--	--	--	--
Phenanthrene	µg/g	16	--	--	--	--	--	--
Pyrene	µg/g	96	--	--	--	--	--	--
Cyanides								
Cyanide, Weak Acid Diss	µg/g	0.051	--	--	--	--	--	--
Saturated Paste Extractables								
Sodium Adsorption Ratio		12	--	--	--	--	--	--
Calcium[4]	mg/L	-	--	--	--	--	--	--
Magnesium[4]	mg/L	-	--	--	--	--	--	--
Sodium[4]	mg/L	-	--	--	--	--	--	--
Physical Tests								
Electrical Conductivity	mS/cm	1.4	--	--	--	--	--	--
% Moisture	%	-	**25.9**	**18.7**	**18.2**	**28.2**	**26.6**	**25.0**
pH	pH units	-	--	--	--	--	--	--

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			BH11
Sample ID			BH11-21 3-4
Date Sampled (dd-mmm-yy)	Units	Table 2 SCS[1]	8-Jun-2021
Sample Depth (m bgs)			0.9 - 1.2
QA/QC			
Lab Sample ID			L2598394-25
Volatile Organic Compounds			
Acetone	µg/g	28	--
Benzene	µg/g	0.4	--
Bromodichloromethane	µg/g	1.9	--
Bromoform	µg/g	1.7	--
Bromomethane	µg/g	0.05	--
Carbon tetrachloride	µg/g	0.71	--
Chlorobenzene	µg/g	2.7	--
Dibromochloromethane	µg/g	2.9	--
Chloroform	µg/g	0.18	--
1,2-Dibromoethane	µg/g	0.05	--
1,2-Dichlorobenzene	µg/g	1.7	--
1,3-Dichlorobenzene	µg/g	12	--
1,4-Dichlorobenzene	µg/g	0.57	--
Dichlorodifluoromethane	µg/g	25	--
1,1-Dichloroethane	µg/g	0.6	--
1,2-Dichloroethane	µg/g	0.05	--
1,1-Dichloroethylene	µg/g	0.48	--
cis-1,2-Dichloroethylene	µg/g	2.5	--
trans-1,2-Dichloroethylene	µg/g	2.5	--
Methylene Chloride	µg/g	2	--
1,2-Dichloropropane	µg/g	0.68	--
cis-1,3-Dichloropropene[2]	µg/g	0.081	--
trans-1,3-Dichloropropene[2]	µg/g	0.081	--
1,3-Dichloropropene (cis & trans)	µg/g	0.05	--
Ethylbenzene	µg/g	1.6	--
n-Hexane	µg/g	88	--
Methyl Ethyl Ketone	µg/g	88	--
Methyl Isobutyl Ketone	µg/g	210	--
Methyl tert butyl ether (MTBE)	µg/g	2.3	--
Styrene	µg/g	43	--
1,1,1,2-Tetrachloroethane	µg/g	0.11	--
1,1,2,2-Tetrachloroethane	µg/g	0.094	--
Tetrachloroethylene	µg/g	2.5	--
Toluene	µg/g	9	--
1,1,1-Trichloroethane	µg/g	12	--
1,1,2-Trichloroethane	µg/g	0.11	--
Trichloroethylene	µg/g	0.61	--
Trichlorofluoromethane	µg/g	5.8	--
Vinyl chloride	µg/g	0.25	--
o-Xylene[3]	µg/g	30	--
m+p-Xylenes[3]	µg/g	30	--
Xylenes (Total)[3]	µg/g	30	--
Hydrocarbons			
F1 (C6-C10)	µg/g	65	--
F1-BTEX	µg/g	65	--
F2 (C10-C16)	µg/g	250	--
F3 (C16-C34)	µg/g	2500	--
F4 (C34-C50)	µg/g	6600	--
F4G-SG (GHH-Silica)	µg/g	6600	--
Organochlorine Pesticides			
Aldrin	µg/g	0.11	<0.00020
alpha-BHC	µg/g	-	<0.00050
beta-BHC	µg/g	-	<0.00050
Lindane	µg/g	0.063	<0.00020
delta-BHC	µg/g	-	<0.00050
a-chlordane	µg/g	-	<0.00030
Chlordane (Total)	µg/g	0.05	<0.00042
g-chlordane	µg/g	-	<0.00030
o,p-DDD	µg/g	-	<0.00030
pp-DDD	µg/g	-	<0.00030
Total DDD	µg/g	4.6	<0.00042
o,p-DDE	µg/g	-	<0.00030
pp-DDE	µg/g	-	<0.00030
Total DDE	µg/g	0.65	<0.00042
op-DDT	µg/g	-	<0.00030
pp-DDT	µg/g	-	<0.00030
Total DDT	µg/g	1.4	<0.00042
Dieldrin	µg/g	0.081	<0.00020
alpha-Endosulfan	µg/g	-	<0.00030
beta-Endosulfan	µg/g	-	<0.00030
Endosulfan Sulfate	µg/g	-	<0.00050
Endosulfan (Total)	µg/g	0.38	<0.00042
Endrin	µg/g	0.04	<0.00050
Endrin Aldehyde	µg/g	-	<0.00050
Heptachlor	µg/g	0.19	<0.00020
Heptachlor Epoxide	µg/g	0.05	<0.00020
Hexachlorobenzene	µg/g	0.66	<0.00050
Hexachlorobutadiene	µg/g	0.095	<0.00050
Hexachloroethane	µg/g	0.43	<0.00050
Methoxychlor	µg/g	1.6	<0.00050
Mirex	µg/g	-	<0.00050
Trans-nonachlor	µg/g	-	<0.00050
Oxychlordane	µg/g	-	<0.00030
Pentachloronitrobenzene	µg/g	-	<0.00050

TABLE 4
SOIL ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location			BH11
Sample ID			BH11-21 3-4
Date Sampled (dd-mmm-yy)	Units	Table 2 SCS[1]	8-Jun-2021
Sample Depth (m bgs)			0.9 - 1.2
QA/QC			
Lab Sample ID			L2598394-25
Metals			
Antimony	µg/g	50	<1.0
Arsenic	µg/g	18	**4.6**
Barium	µg/g	670	**367**
Beryllium	µg/g	10	**0.74**
Boron (Hot Water Soluble)	µg/g	2	--
Boron	µg/g	120	**5.5**
Cadmium	µg/g	1.9	<0.50
Chromium (Total)	µg/g	160	**73.1**
Chromium, Hexavalent	µg/g	10	--
Cobalt	µg/g	100	**20.7**
Copper	µg/g	300	**40.8**
Lead	µg/g	120	**6.7**
Mercury	µg/g	20	--
Molybdenum	µg/g	40	<1.0
Nickel	µg/g	340	**48.1**
Selenium	µg/g	5.5	<1.0
Silver	µg/g	50	<0.20
Thallium	µg/g	3.3	<0.50
Uranium	µg/g	33	<1.0
Vanadium	µg/g	86	**90.2**
Zinc	µg/g	340	**102**
Polycyclic Aromatic Hydrocarbons			
Acenaphthene	µg/g	29	--
Acenaphthylene	µg/g	0.17	--
Anthracene	µg/g	0.74	--
Benzo(a)anthracene	µg/g	0.96	--
Benzo(a)pyrene	µg/g	0.3	--
Benzo(b&j)fluoranthene	µg/g	0.96	--
Benzo(g,h,i)perylene	µg/g	9.6	--
Benzo(k)fluoranthene	µg/g	0.96	--
Chrysene	µg/g	9.6	--
Dibenz(a,h)anthracene	µg/g	0.1	--
Fluoranthene	µg/g	9.6	--
Fluorene	µg/g	69	--
Indeno(1,2,3-cd)pyrene	µg/g	0.95	--
1+2-Methylnaphthalenes	µg/g	42	--
1-Methylnaphthalene	µg/g	42	--
2-Methylnaphthalene	µg/g	42	--
Naphthalene	µg/g	28	--
Phenanthrene	µg/g	16	--
Pyrene	µg/g	96	--
Cyanides			
Cyanide, Weak Acid Diss	µg/g	0.051	--
Saturated Paste Extractables			
Sodium Adsorption Ratio		12	--
Calcium[4]	mg/L	-	--
Magnesium[4]	mg/L	-	--
Sodium[4]	mg/L	-	--
Physical Tests			
Electrical Conductivity	mS/cm	1.4	--
% Moisture	%	-	**26.2**
pH	pH units	-	--

Notes:

[1] Table 2: Full Depth Generic Site Condition Standards in a Potable Ground Water Condition for Industrial/Commercial/Community property uses and coarse textured soils from Soil, Ground Water and Sediment Standards for Use Under Part XV.1 of the Environmental Protection Act (MOECC, 2011) (Table 2 SCS)

[2] The Table 2 SCS applies to the total of cis-1,3-dichloropropene and trans-1,3-dichloropropene.

[3] The Table 2 SCS applies to the total of m+p-xylenes and o-xylenes.

[4] These parameters are utilized to calculate SAR and are not intended for comparison to SCS

Bold - indicates constituent was detected greater than the analytical reporting limit

Associated value greater than Table 2 SCS; however are considered to be naturally occuring and are not being relied upon and not a contaminant of concern.

- - no Table 2 SCS available

-- - not analyzed

% - percentage

< - analyte was not detected at a concentration greater than the associated analytical reporting limit

µg/g - micrograms per gram

mS/cm - millisiemens/centimeter

dd-mmm-yy - day-month-year

duplicate - field duplicate sample

ID - identifier

m bgs - metres below ground surface

QA/QC - quality assurance/quality control

SCS - site condition standard

TABLE 5
GROUNDWATER ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location	Units	Table 2 SCS[1]	MW01-21	MW02-21	MW03-21	MW04-21	MW04-21
Sample ID			MW01-21	MW02-21	MW03-21	MW04-21	DUP01
Date Sampled (dd-mmm-yy)			10-Jun-2021	10-Jun-2021	10-Jun-2021	10-Jun-2021	10-Jun-2021
Screen Interval (m bgs)			1.5 - 4.6	1.5 - 4.6	1.5 - 4.6	1.5 - 4.6	1.5 - 4.6
QA/QC							Field Replicate
Laboratory Sample ID			L2599907-1	L2599907-2	L2599907-3	L2599907-4	L2599907-5
Volatile Organic Compounds							
Acetone	µg/L	2,700	--	<30	--	<30	<30
Benzene	µg/L	5	--	<0.50	--	<0.50	<0.50
Bromodichloromethane	µg/L	16	--	<2.0	--	<2.0	<2.0
Bromoform	µg/L	25	--	<5.0	--	<5.0	<5.0
Bromomethane	µg/L	0.89	--	<0.50	--	<0.50	<0.50
Carbon tetrachloride	µg/L	0.79	--	<0.20	--	<0.20	<0.20
Chlorobenzene	µg/L	30	--	<0.50	--	<0.50	<0.50
Dibromochloromethane	µg/L	25	--	<2.0	--	<2.0	<2.0
Chloroform	µg/L	2.4	--	<1.0	--	<1.0	<1.0
1,2-Dibromoethane	µg/L	0.2	--	<0.20	--	<0.20	<0.20
1,2-Dichlorobenzene	µg/L	3	--	<0.50	--	<0.50	<0.50
1,3-Dichlorobenzene	µg/L	59	--	<0.50	--	<0.50	<0.50
1,4-Dichlorobenzene	µg/L	1	--	<0.50	--	<0.50	<0.50
Dichlorodifluoromethane	µg/L	590	--	<2.0	--	<2.0	<2.0
1,1-Dichloroethane	µg/L	5	--	<0.50	--	<0.50	<0.50
1,2-Dichloroethane	µg/L	1.5	--	<0.50	--	<0.50	<0.50
1,1-Dichloroethylene	µg/L	1.6	--	<0.50	--	<0.50	<0.50
cis-1,2-Dichloroethylene	µg/L	1.6	--	<0.50	--	<0.50	<0.50
trans-1,2-Dichloroethylene	µg/L	1.6	--	<0.50	--	<0.50	<0.50
Methylene Chloride	µg/L	50	--	<5.0	--	<5.0	<5.0
1,2-Dichloropropane	µg/L	5	--	<0.50	--	<0.50	<0.50
cis-1,3-Dichloropropene[2]	µg/L	0.5	--	<0.30	--	<0.30	<0.30
trans-1,3-Dichloropropene[2]	µg/L	0.5	--	<0.30	--	<0.30	<0.30
1,3-Dichloropropene (cis & trans)	µg/L	0.5	--	<0.50	--	<0.50	<0.50
Ethylbenzene	µg/L	2.4	--	<0.50	--	<0.50	<0.50
n-Hexane	µg/L	51	--	<0.50	--	<0.50	<0.50
Methyl Ethyl Ketone	µg/L	1,800	--	<20	--	<20	<20
Methyl Isobutyl Ketone	µg/L	640	--	<20	--	<20	<20
MTBE	µg/L	15	--	<2.0	--	<2.0	<2.0
Styrene	µg/L	5.4	--	<0.50	--	<0.50	<0.50
1,1,1,2-Tetrachloroethane	µg/L	1.1	--	<0.50	--	<0.50	<0.50
1,1,2,2-Tetrachloroethane	µg/L	1	--	<0.50	--	<0.50	<0.50
Tetrachloroethylene	µg/L	1.6	--	<0.50	--	<0.50	<0.50
Toluene	µg/L	24	--	<0.50	--	<0.50	<0.50
1,1,1-Trichloroethane	µg/L	200	--	<0.50	--	<0.50	<0.50
1,1,2-Trichloroethane	µg/L	4.7	--	<0.50	--	<0.50	<0.50
Trichloroethylene	µg/L	1.6	--	<0.50	--	<0.50	<0.50
Trichlorofluoromethane	µg/L	150	--	<5.0	--	<5.0	<5.0
Vinyl chloride	µg/L	0.5	--	<0.50	--	<0.50	<0.50
o-Xylene[3]	µg/L	300	--	<0.30	--	<0.30	<0.30
m+p-Xylenes[3]	µg/L	300	--	<0.40	--	<0.40	<0.40
Xylenes (Total)[3]	µg/L	300	--	<0.50	--	<0.50	<0.50
Hydrocarbons							
F1 (C6-C10)	µg/L	750	--	<25	--	<25	<25
F1-BTEX	µg/L	750	--	<25	--	<25	<25
F2 (C10-C16)	µg/L	150	--	<100	--	<100	<100
F3 (C16-C34)	µg/L	500	--	<250	--	<250	<250
F4 (C34-C50)	µg/L	500	--	<250	--	<250	<250
Total Hydrocarbons (C6-C50)	µg/L	-	--	<370	--	<370	<370
Dissolved Metals							
Antimony	µg/L	6	--	<0.10	<0.10	<1.0	<1.0
Arsenic	µg/L	25	--	**0.67**	**0.93**	<1.0	<1.0
Barium	µg/L	1,000	--	**88.3**	**86.5**	**148**	**153**
Beryllium	µg/L	4	--	<0.10	<0.10	<1.0	<1.0
Boron (Total)	µg/L	5,000	--	**38**	**55**	<100	<100
Cadmium	µg/L	2.7	--	**0.014**	<0.010	<0.050	<0.050
Chromium	µg/L	50	--	<0.50	<0.50	<5.0	<5.0
Chromium, Hexavalent	µg/L	25	--	<0.50	--	<0.50	<0.50
Cobalt	µg/L	3.8	--	**0.89**	**0.33**	<1.0	<1.0
Copper	µg/L	87	--	**6.46**	**3.40**	<2.0	<2.0
Lead	µg/L	10	--	<0.050	<0.050	<0.50	<0.50
Mercury	µg/L	0.29	--	<0.0050	--	<0.0050	<0.0050
Molybdenum	µg/L	70	--	**1.45**	**2.24**	**0.96**	**1.03**
Nickel	µg/L	100	--	**1.77**	**1.06**	<5.0	<5.0
Selenium	µg/L	10	--	**0.05**	**0.71**	<0.50	<0.50
Silver	µg/L	1.5	--	<0.050	<0.050	<0.50	<0.50
Sodium	µg/L	490,000	--	**42,500**	**23,700**	**192,000**	**195,000**
Thallium	µg/L	2	--	<0.010	<0.010	<0.10	<0.10
Uranium	µg/L	20	--	**1.55**	**1.66**	**9.84**	**9.59**
Vanadium	µg/L	6.2	--	**2.61**	**4.66**	<5.0	<5.0
Zinc	µg/L	1,100	--	**1.00**	**3.70**	<10	<10
Total Metals							
Antimony (Total)	mg/L	0.006	<0.00010	--	--	--	--
Arsenic (Total)	mg/L	0.025	**0.00091**	--	--	--	--
Barium (Total)	mg/L	1	**0.0659**	--	--	--	--
Beryllium (Total)	mg/L	0.004	<0.00010	--	--	--	--
Boron (Total)	mg/L	5	**0.031**	--	--	--	--
Cadmium (Total)	mg/L	0.0027	**0.000019**	--	--	--	--
Chromium (Total)	mg/L	0.05	**0.00072**	--	--	--	--
Cobalt (Total)	mg/L	0.0038	**0.00053**	--	--	--	--
Copper (Total)	mg/L	0.087	**0.001**	--	--	--	--
Lead (Total)	mg/L	0.01	**0.00012**	--	--	--	--
Molybdenum (Total)	mg/L	0.07	**0.00147**	--	--	--	--
Nickel (Total)	mg/L	0.1	**0.00127**	--	--	--	--
Selenium (Total)	mg/L	0.01	**0.000195**	--	--	--	--
Silver (Total)	mg/L	0.0015	<0.000050	--	--	--	--
Sodium (Total)	mg/L	490	**16.1**	--	--	--	--
Thallium (Total)	mg/L	0.002	<0.000010	--	--	--	--
Uranium (Total)	mg/L	0.02	**0.00072**	--	--	--	--
Vanadium (Total)	mg/L	0.0062	**0.0029**	--	--	--	--
Zinc (Total)	mg/L	1.1	<0.0030	--	--	--	--

TABLE 5
GROUNDWATER ANALYTICAL DATA
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Location	Units	Table 2 SCS[1]	MW01-21	MW02-21	MW03-21	MW04-21	MW04-21
Sample ID			MW01-21	MW02-21	MW03-21	MW04-21	DUP01
Date Sampled (dd-mmm-yy)			10-Jun-2021	10-Jun-2021	10-Jun-2021	10-Jun-2021	10-Jun-2021
Screen Interval (m bgs)			1.5 - 4.6	1.5 - 4.6	1.5 - 4.6	1.5 - 4.6	1.5 - 4.6
QA/QC							Field Replicate
Laboratory Sample ID			L2599907-1	L2599907-2	L2599907-3	L2599907-4	L2599907-5
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	µg/L	4.1	--	<0.020	--	<0.020	<0.020
Acenaphthylene	µg/L	1	--	<0.020	--	<0.020	<0.020
Anthracene	µg/L	2.4	--	<0.020	--	<0.020	<0.020
Benzo(a)anthracene	µg/L	1	--	<0.020	--	<0.020	<0.020
Benzo(a)pyrene	µg/L	0.01	--	<0.010	--	<0.010	<0.010
Benzo(b&j)fluoranthene	µg/L	0.1	--	<0.020	--	<0.020	<0.020
Benzo(g,h,i)perylene	µg/L	0.2	--	<0.020	--	<0.020	<0.020
Benzo(k)fluoranthene	µg/L	0.1	--	<0.020	--	<0.020	<0.020
Chrysene	µg/L	0.1	--	<0.020	--	<0.020	<0.020
Dibenz(a,h)anthracene	µg/L	0.2	--	<0.020	--	<0.020	<0.020
Fluoranthene	µg/L	0.41	--	<0.020	--	<0.020	<0.020
Fluorene	µg/L	120	--	<0.020	--	<0.020	<0.020
Indeno(1,2,3-cd)pyrene	µg/L	0.2	--	<0.020	--	<0.020	<0.020
1+2-Methylnaphthalenes	µg/L	3.2	--	<0.028	--	<0.028	<0.028
1-Methylnaphthalene	µg/L	3.2	--	<0.020	--	<0.020	<0.020
2-Methylnaphthalene	µg/L	3.2	--	<0.020	--	<0.020	<0.020
Naphthalene	µg/L	11	--	<0.050	--	<0.050	<0.050
Phenanthrene	µg/L	1	--	<0.020	--	<0.020	<0.020
Pyrene	µg/L	4.1	--	<0.020	--	<0.020	<0.020
Organochlorine Pesticides							
Aldrin	µg/L	0.35	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
gamma-hexachlorocyclohexane	µg/L	1.2	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
a-chlordane	µg/L	-	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Chlordane (Total)	µg/L	7	<0.011	<0.011	<0.011	<0.011	<0.011
g-chlordane	µg/L	-	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
o,p-DDD	µg/L	-	<0.0040	<0.0040	<0.0040	<0.0040	<0.0040
pp-DDD	µg/L	-	<0.0040	<0.0040	<0.0040	<0.0040	<0.0040
Total DDD	µg/L	10	<0.0057	<0.0057	<0.0057	<0.0057	<0.0057
o,p-DDE	µg/L	-	<0.0040	<0.0040	<0.0040	<0.0040	<0.0040
pp-DDE	µg/L	-	<0.0040	<0.0040	<0.0040	<0.0040	<0.0040
Total DDE	µg/L	10	<0.0057	<0.0057	<0.0057	<0.0057	<0.0057
op-DDT	µg/L	-	<0.0040	<0.0040	<0.0040	<0.0040	<0.0040
pp-DDT	µg/L	-	<0.0040	<0.0040	<0.0040	<0.0040	<0.0040
Total DDT	µg/L	2.8	<0.0057	<0.0057	<0.0057	<0.0057	<0.0057
DDT+Metabolites	µg/L	-	<0.0098	<0.0098	<0.0098	<0.0098	<0.0098
Dieldrin	µg/L	0.35	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Endosulfan I	µg/L	-	<0.0070	<0.0070	<0.0070	<0.0070	<0.0070
Endosulfan II	µg/L	-	<0.0070	<0.0070	<0.0070	<0.0070	<0.0070
Endosulfan (Total)	µg/L	1.5	<0.0099	<0.0099	<0.0099	<0.0099	<0.0099
Endrin	µg/L	0.48	<0.010	<0.010	<0.010	<0.010	<0.010
Heptachlor	µg/L	1.5	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Heptachlor Epoxide	µg/L	0.048	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Hexachlorobenzene	µg/L	1	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Hexachlorobutadiene	µg/L	0.44	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Hexachloroethane	µg/L	2.1	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Methoxychlor	µg/L	6.5	<0.0080	<0.0080	<0.0080	<0.0080	<0.0080
Anions and Nutrients							
Chloride	mg/L	790	--	**8.04**	--	**855**	**776**
Cyanides							
Cyanide, Weak Acid Diss	µg/L	66	--	<2.0	<2.0	--	--
Physical Tests							
Electrical Conductivity	mS/cm	-	--	**0.992**	--	**3.66**	**3.63**
pH	pH units	-	--	**7.57**	--	**7.64**	**7.62**

Notes:

[1] Table 2: Full Depth Generic Site Condition Standards in a Potable Ground Water Condition for all types of property uses and fine textured soils from Soil, Ground Water and Sediment Standards for Use Under Part XV.1 of the Environmental Protection Act (MOECC, 2011) (Table 2 SCS)

[2] The Table 2 SCS apply to the total of cis-1,3-dichloropropene and trans-1,3-dichloropropene.

[3] The Table 2 SCS apply to the total of m+p-xylenes and o-xylene.

Bold - indicates constituent was detected greater than the analytical reporting limit

Associated value greater than Table 2 SCS; however, exemption under O. Reg. 153/04, Section 49.1, Paragraph 1 being relied upon and not a contaminant of concern.

- - no Table 2 SCS available

-- - not analyzed

< - analyte was not detected at a concentration greater than the associated analytical reporting limit

µg/L - micrograms per litre

dd-mmm-yy - day-month-year

ID - identifier

m bgs - metres below ground surface

mg/L - milligrams per litre

mS/cm - milliSiemens per centimetre

QA/QC - quality assurance/quality control

SCS - site condition standard

TABLE 6
MAXIMUM CONCENTRATIONS IN SOIL AND GROUNDWATER
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

	Soil					Groundwater			
	Units	Table 2 SCS[1]	Maximum Concentration	Maximum Reporting Limit		Units	Table 2 SCS[1]	Maximum Concentration	Maximum Reporting Limit
Volatile Organic Compounds									
Acetone	µg/g	28	ND	0.50		µg/L	2,700	ND	30
Benzene	µg/g	0.4	ND	0.0068		µg/L	5	ND	0.5
Bromodichloromethane	µg/g	1.9	ND	0.50		µg/L	16	ND	2.0
Bromoform	µg/g	1.7	ND	0.50		µg/L	25	ND	5.0
Bromomethane	µg/g	0.05	ND	0.50		µg/L	0.89	ND	0.50
Carbon tetrachloride	µg/g	0.71	ND	0.50		µg/L	0.79	ND	0.20
Chlorobenzene	µg/g	2.7	ND	0.50		µg/L	30	ND	0.50
Dibromochloromethane	µg/g	2.9	ND	0.50		µg/L	25	ND	2.0
Chloroform	µg/g	0.18	ND	0.50		µg/L	2.4	ND	1.0
1,2-Dibromoethane	µg/g	0.05	ND	0.50		µg/L	0.2	ND	0.20
1,2-Dichlorobenzene	µg/g	1.7	ND	0.50		µg/L	3	ND	0.50
1,3-Dichlorobenzene	µg/g	12	ND	0.50		µg/L	59	ND	0.50
1,4-Dichlorobenzene	µg/g	0.57	ND	0.50		µg/L	1	ND	0.50
Dichlorodifluoromethane	µg/g	25	ND	0.50		µg/L	590	ND	2.0
1,1-Dichloroethane	µg/g	0.6	ND	0.50		µg/L	5	ND	0.50
1,2-Dichloroethane	µg/g	0.05	ND	0.50		µg/L	1.5	ND	0.50
1,1-Dichloroethylene	µg/g	0.48	ND	0.50		µg/L	1.6	ND	0.50
cis-1,2-Dichloroethylene	µg/g	2.5	ND	0.50		µg/L	1.6	ND	0.50
trans-1,2-Dichloroethylene	µg/g	2.5	ND	0.50		µg/L	1.6	ND	0.50
Methylene Chloride	µg/g	2	ND	0.50		µg/L	50	ND	5.0
1,2-Dichloropropane	µg/g	0.68	ND	0.50		µg/L	5	ND	0.50
cis-1,3-Dichloropropene[2]	µg/g	0.081	ND	0.030		µg/L	0.5	ND	0.30
trans-1,3-Dichloropropene[2]	µg/g	0.081	ND	0.030		µg/L	0.5	ND	0.30
1,3-Dichloropropene (cis & trans)	µg/g	0.05	ND	0.042		µg/L	0.5	ND	0.50
Ethylbenzene	µg/g	1.6	ND	0.018		µg/L	2.4	ND	0.50
n-Hexane	µg/g	88	ND	0.050		µg/L	51	ND	0.50
Methyl Ethyl Ketone	µg/g	88	ND	0.50		µg/L	1,800	ND	20
Methyl Isobutyl Ketone	µg/g	210	ND	0.50		µg/L	640	ND	20
MTBE	µg/g	2.3	ND	0.050		µg/L	15	ND	2.0
Styrene	µg/g	43	ND	0.050		µg/L	5.4	ND	0.50
1,1,1,2-Tetrachloroethane	µg/g	0.11	ND	0.050		µg/L	1.1	ND	0.50
1,1,2,2-Tetrachloroethane	µg/g	0.094	ND	0.050		µg/L	1	ND	0.50
Tetrachloroethylene	µg/g	2.5	ND	0.050		µg/L	1.6	ND	0.50
Toluene	µg/g	9	ND	0.080		µg/L	24	ND	0.50
1,1,1-Trichloroethane	µg/g	12	ND	0.050		µg/L	200	ND	0.50
1,1,2-Trichloroethane	µg/g	0.11	ND	0.050		µg/L	4.7	ND	0.50
Trichloroethylene	µg/g	0.61	ND	0.010		µg/L	1.6	ND	0.50
Trichlorofluoromethane	µg/g	5.8	ND	0.050		µg/L	150	ND	5.0
Vinyl chloride	µg/g	0.25	ND	0.020		µg/L	0.5	ND	0.50
o-Xylene[3]	µg/g	30	ND	0.020		µg/L	300	ND	0.30
m+p-Xylenes[3]	µg/g	30	ND	0.030		µg/L	300	ND	0.40
Xylenes (Total)[3]	µg/g	30	ND	0.050		µg/L	300	ND	0.50
Hydrocarbons									
F1 (C6-C10)	µg/g	65	ND	5.0		µg/L	750	ND	25
F1-BTEX	µg/g	65	ND	5.0		µg/L	750	ND	25
F2 (C10-C16)	µg/g	250	ND	10		µg/L	150	ND	100
F3 (C16-C34)	µg/g	2500	**89**	50		µg/L	500	ND	250
F4 (C34-C50)	µg/g	6600	**254**	50		µg/L	500	ND	250
Total Hydrocarbons (C6-C50)	µg/g	6600	**950**	250		µg/L	-	ND	370
Metals & Inorganics									
Antimony	µg/g	50	ND	1.0		µg/L	6	ND	1.0
Arsenic	µg/g	18	**4.9**	1.0		µg/L	25	**0.93**	1.0
Barium	µg/g	670	**496**	1.0		µg/L	1,000	**153**	1.0
Beryllium	µg/g	10	**1.45**	0.50		µg/L	4	ND	1.0
Boron (Hot Water Soluble)	µg/g	2	**0.26**	5.0		µg/L	--	--	--
Boron (Total)	µg/g	--	--	0.10		µg/L	5,000	**55**	100
Cadmium	µg/g	120	ND	0.50		µg/L	2.7	**0.014**	0.050
Chromium	µg/g	1.9	**157**	1.0		µg/L	50	ND	5.0
Chromium, Hexavalent	µg/g	160	**2.07**	0.20		µg/L	25	ND	0.50
Cobalt	µg/g	10	**30.0**	1.0		µg/L	3.8	**0.89**	1.0
Copper	µg/g	100	**61.2**	1.0		µg/L	87	**6.46**	2.0
Lead	µg/g	300	**11.5**	1.0		µg/L	10	ND	0.50
Mercury	µg/g	120	**0.0237**	0.0050		µg/L	0.29	ND	0.0050
Molybdenum	µg/g	20	ND	1.0		µg/L	70	**2.24**	0.50
Nickel	µg/g	40	**77.2**	1.0		µg/L	100	**1.77**	5.0
Selenium	µg/g	340	ND	1.0		µg/L	10	**0.71**	0.50
Silver	µg/g	5.5	ND	0.20		µg/L	1.5	ND	0.50
Sodium	--	--	--	--		µg/L	490,000	**195,000**	500
Thallium	µg/g	3.3	ND	0.50		µg/L	2	ND	0.10
Uranium	µg/g	33	**1.7**	1.0		µg/L	20	**9.84**	0.10
Vanadium	µg/g	86	**135**	1.0		µg/L	6.2	**4.66**	5.0
Zinc	µg/g	340	**147**	5.0		µg/L	1,100	**3.70**	10
Chloride	--	--	--	--		mg/L	790	**855**	2.5
Cyanide, Weak Acid Dissolved	µg/g	0.051	ND	0.050		µg/L	66	ND	2.0
Electrical Conductivity	mS/cm	1.4	**0.769**	0.0040		mS/cm	-	**3.66**	0.0030
Sodium Adsorption Ratio	NA	12	**9.77**	0.10		--	--	--	--
pH	pH units	-	**7.74**	0.10		pH units	-	**7.64**	0.10
Total Metals									
Antimony (Total)	--	--	--	--		mg/L	0.006	ND	0.00010
Arsenic (Total)	--	--	--	--		mg/L	0.025	**0.00091**	0.00010
Barium (Total)	--	--	--	--		mg/L	1	**0.0659**	0.00020
Beryllium (Total)	--	--	--	--		mg/L	0.004	ND	0.00010
Boron (Total)	--	--	--	--		mg/L	5	**0.031**	0.010
Cadmium (Total)	--	--	--	--		mg/L	0.0027	**0.000019**	0.000010
Chromium (Total)	--	--	--	--		mg/L	0.05	**0.00072**	0.00050
Cobalt (Total)	--	--	--	--		mg/L	0.0038	**0.00053**	0.00010

TABLE 6
MAXIMUM CONCENTRATIONS IN SOIL AND GROUNDWATER
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

	Units	Table 2 SCS[1]	Maximum Concentration	Maximum Reporting Limit		Units	Table 2 SCS[1]	Maximum Concentration	Maximum Reporting Limit
Total Metals (continued)									
Copper (Total)	--	--	--	--		mg/L	0.087	**0.001**	0.0010
Lead (Total)	--	--	--	--		mg/L	0.01	**0.00012**	0.00010
Molybdenum (Total)	--	--	--	--		mg/L	0.07	**0.00147**	0.000050
Nickel (Total)	--	--	--	--		mg/L	0.1	**0.00127**	0.00050
Selenium (Total)	--	--	--	--		mg/L	0.01	**0.000195**	0.000050
Silver (Total)	--	--	--	--		mg/L	0.0015	ND	0.000050
Sodium (Total)	--	--	--	--		mg/L	490	**16.1**	0.50
Thallium (Total)	--	--	--	--		mg/L	0.002	ND	0.000010
Uranium (Total)	--	--	--	--		mg/L	0.02	**0.00072**	0.000010
Vanadium (Total)	--	--	--	--		mg/L	0.0062	**0.0029**	0.00050
Zinc (Total)	--	--	--	--		mg/L	1.1	ND	0.0030
Polycyclic Aromatic Hydrocarbons									
Acenaphthene	µg/g	29	ND	0.050		µg/L	4.1	ND	0.020
Acenaphthylene	µg/g	0.17	ND	0.050		µg/L	1	ND	0.020
Anthracene	µg/g	0.74	ND	0.050		µg/L	2.4	ND	0.020
Benzo(a)anthracene	µg/g	0.96	ND	0.050		µg/L	1	ND	0.020
Benzo(a)pyrene	µg/g	0.3	ND	0.050		µg/L	0.01	ND	0.010
Benzo(b&j)fluoranthene	µg/g	0.96	ND	0.050		µg/L	0.1	ND	0.020
Benzo(g,h,i)perylene	µg/g	9.6	ND	0.050		µg/L	0.2	ND	0.020
Benzo(k)fluoranthene	µg/g	0.96	ND	0.050		µg/L	0.1	ND	0.020
Chrysene	µg/g	9.6	ND	0.050		µg/L	0.1	ND	0.020
Dibenz(a,h)anthracene	µg/g	0.1	ND	0.050		µg/L	0.2	ND	0.020
Fluoranthene	µg/g	9.6	ND	0.050		µg/L	0.41	ND	0.020
Fluorene	µg/g	69	ND	0.050		µg/L	120	ND	0.020
Indeno(1,2,3-cd)pyrene	µg/g	0.95	ND	0.050		µg/L	0.2	ND	0.020
1+2-Methylnaphthalenes	µg/g	42	ND	0.042		µg/L	3.2	ND	0.028
1-Methylnaphthalene	µg/g	42	ND	0.030		µg/L	3.2	ND	0.020
2-Methylnaphthalene	µg/g	42	ND	0.030		µg/L	3.2	ND	0.020
Naphthalene	µg/g	28	ND	0.013		µg/L	11	ND	0.050
Phenanthrene	µg/g	16	ND	0.046		µg/L	1	ND	0.020
Pyrene	µg/g	96	ND	0.050		µg/L	4.1	ND	0.020
Organochlorine Pesticides									
Aldrin	µg/g	0.11	ND	0.0040		µg/L	0.35	ND	0.0080
alpha-BHC	µg/g	-	ND	0.010		--	--	--	--
beta-BHC	µg/g	-	ND	0.010		--	--	--	--
Lindane	µg/g	0.063	ND	0.0040		--	--	--	--
delta-BHC	µg/g	-	ND	0.010		--	--	--	--
gamma-hexachlorocyclohexane	--	--	--	--		µg/L	1.2	ND	0.0080
a-chlordane	µg/g	-	ND	0.0060		µg/L	-	ND	0.0080
Chlordane (Total)	µg/g	0.05	ND	0.0085		µg/L	7	ND	0.011
g-chlordane	µg/g	-	ND	0.0060		µg/L	-	ND	0.0080
o,p-DDD	µg/g	-	ND	0.0060		µg/L	-	ND	0.0040
pp-DDD	µg/g	-	ND	0.0060		µg/L	-	ND	0.0040
Total DDD	µg/g	4.6	ND	0.0085		µg/L	10	ND	0.0057
o,p-DDE	µg/g	-	ND	0.0060		µg/L	-	ND	0.0040
pp-DDE	µg/g	-	ND	0.0060		µg/L	-	ND	0.0040
Total DDE	µg/g	0.65	ND	0.0085		µg/L	10	ND	0.0057
op-DDT	µg/g	-	ND	0.018		µg/L	-	ND	0.0040
pp-DDT	µg/g	-	ND	0.018		µg/L	-	ND	0.0040
Total DDT	µg/g	1.4	ND	0.025		µg/L	2.8	ND	0.0057
DDT+Metabolites	--	--	--	--		µg/L	-	ND	0.0098
Dieldrin	µg/g	0.081	ND	0.0040		µg/L	0.35	ND	0.0080
alpha-Endosulfan	µg/g	-	ND	0.0060		--	--	--	--
beta-Endosulfan	µg/g	-	ND	0.0060		--	--	--	--
Endosulfan Sulfate	µg/g	-	ND	0.010		--	--	--	--
Endosulfan I	--	--	--	--		µg/L	-	ND	0.0070
Endosulfan II	--	--	--	--		µg/L	-	ND	0.0070
Endosulfan (Total)	µg/g	0.38	ND	0.0085		µg/L	1.5	ND	0.0099
Endrin	µg/g	0.04	ND	0.010		µg/L	0.48	ND	0.010
Endrin Aldehyde	µg/g	-	ND	0.010		--	--	--	--
Heptachlor	µg/g	0.19	ND	0.0040		µg/L	1.5	ND	0.0080
Heptachlor Epoxide	µg/g	0.05	ND	0.0040		µg/L	0.048	ND	0.0080
Hexachlorobenzene	µg/g	0.66	ND	0.010		µg/L	1	ND	0.0080
Hexachlorobutadiene	µg/g	0.095	ND	0.010		µg/L	0.44	ND	0.0080
Hexachloroethane	µg/g	0.43	ND	0.010		µg/L	2.1	ND	0.0080
Methoxychlor	µg/g	1.6	ND	0.030		µg/L	6.5	ND	0.0080
Mirex	µg/g	-	ND	0.010		--	--	--	--
Trans-nonachlor	µg/g	-	ND	0.010		--	--	--	--
Oxychlordane	µg/g	-	ND	0.0060		--	--	--	--
Pentachloronitrobenzene	µg/g	-	ND	0.010		--	--	--	--

Notes:

[1] Table 2: Full Depth Generic Site Condition Standards in a Potable Ground Water Condition for all types of property uses and fine textured soils from Soil, Ground Water and Sediment Standards for Use Under Part XV.1 of the Environmental Protection Act (MOECC, 2011) (Table 2 SCS)

[2] The Table 2 SCS apply to the total of cis-1,3-dichloropropene and trans-1,3-dichloropropene.

[3] The Table 2 SCS apply to the total of m+p-xylenes and o-xylene.

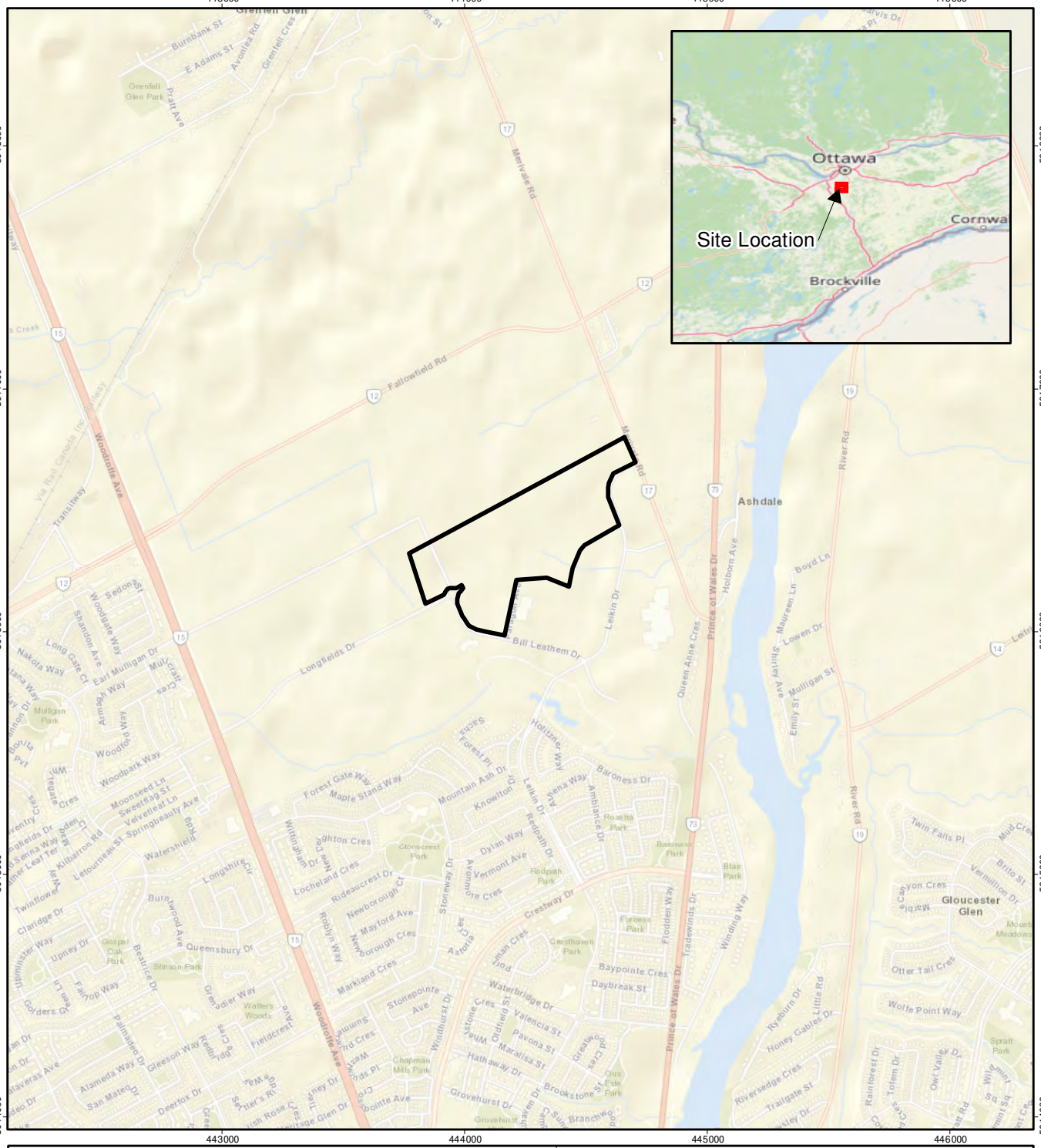
Bold - indicates constituent was detected greater than the analytical reporting limit

Associated value greater than Table 2 SCS; however, exemption under O. Reg. 153/04, Section 49.1, Paragraph 1 being relied upon and not a contaminant of concern.

Associated value greater than Table 2 SCS; however is considered to be naturally occuring and is not being relied upon and not a contaminant of concern.

- - no Table 2 SCS available
-- - not analyzed
µg/g - micrograms per gram
µg/L - micrograms per litre
dd-mmm-yy - day-month-year
ID - identifier
m bgs - metres below ground surface
mg/L - milligrams per litre
mS/cm - milliSiemens per centimetre
NA - not applicable
ND - Parameter not detected above laboratory reporting limits
QA/QC - quality assurance/quality control
SCS - site condition standard

FIGURES



Legend:

Phase One Property Location

FIGURE 1

SITE LOCATION MAP

99 BILL LEATHEM DRIVE AND 2 AND 20 LEIKIN DRIVE, OTTAWA, ONTARIO

Notes:
1) Map Projection: NAD 1983 UTM Zone 18N
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3) Service Layer Credits
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Sources: Esri, HERE, Garmin, USGS,

OFFICE LOCATION: SEATTLE		REVISION: 01	Geosyntec consultants
DATE PLOTTED: July-2021	DATE REVISED: July-2021	REVIEWED: MG	
		CHECKED: DH	TRUE NORTH
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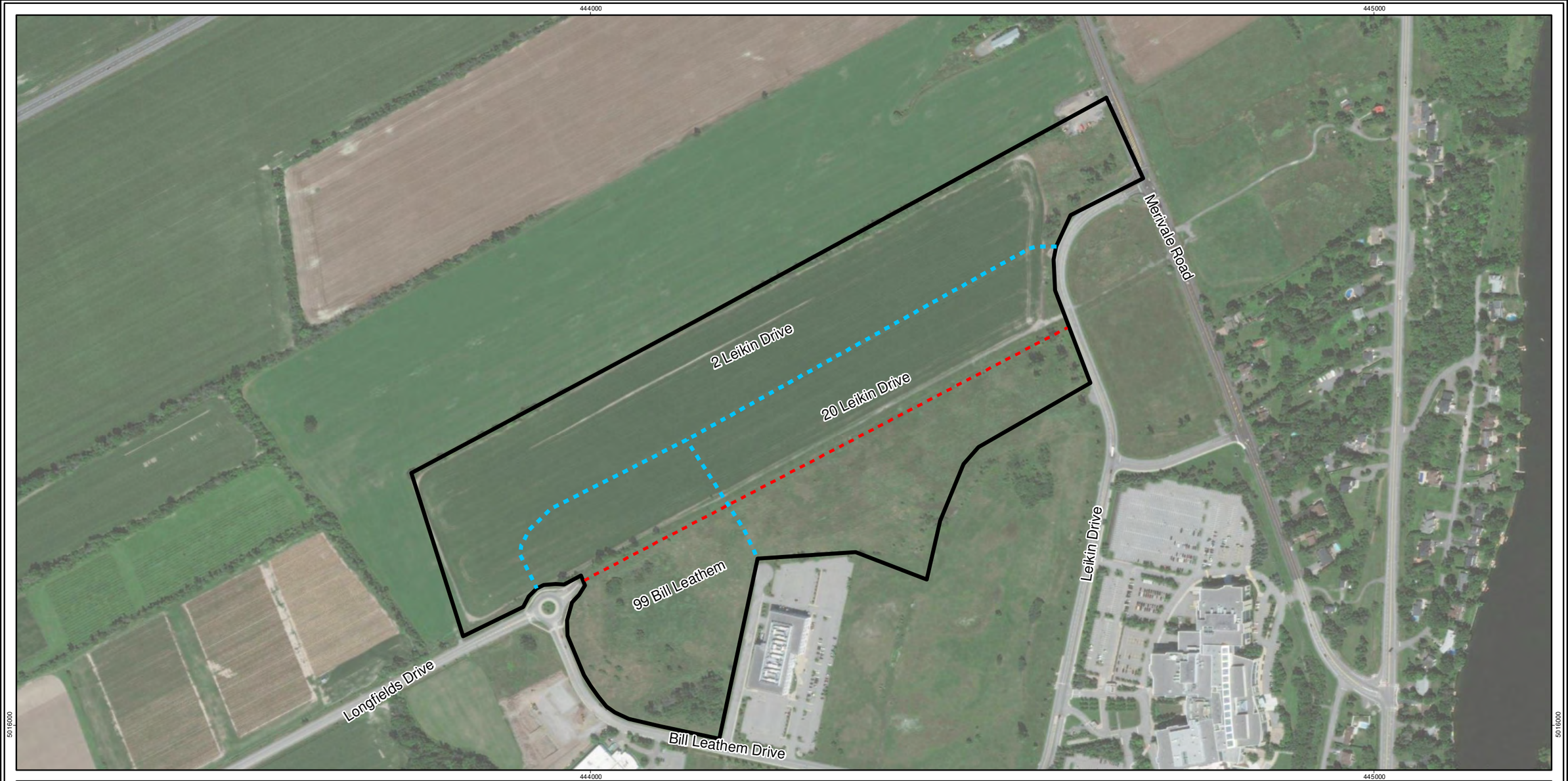

Legend:

- Phase One Property Boundary
- Sewer Line
- Approximate Site Parcel Boundary

FIGURE 2

SITE LAYOUT MAP

99 BILL LEATHEM DRIVE AND 2 AND 20 LEIKIN DRIVE, OTTAWA, ONTARIO

Notes:
1) Map Projection: NAD 1983 UTM Zone 18N
2) Data Source Credits
3) Service Layer Credits
4) Imagery Credits: Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

OFFICE LOCATION		REVISION
SEATTLE		01
DATE PLOTTED	DATE REVISED	REVIEWED
July-2021	July-2021	MG
APPROX. SCALE	PAGE SIZE	CHECKED
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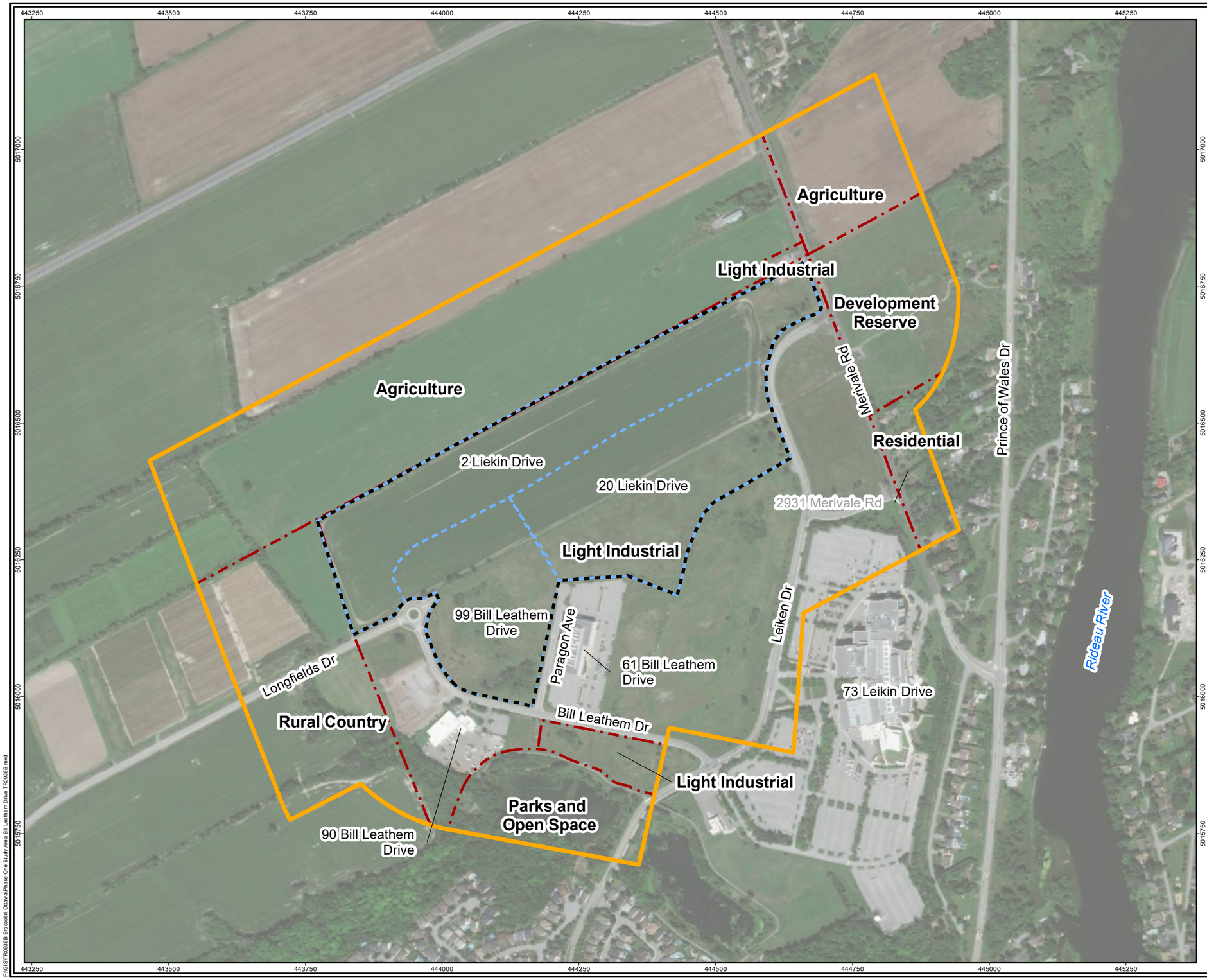
		DRAWN
		MVI

Geosyntec consultants

TRUE NORTH

0 50 100 150 m

P:\Projects\Amazon\Projects\GIS\900 GIS and CAD\920 GIS\TRI\936B-067A_Ottawa\MXDs\Figure 2 Site Layout Map\V2.mxd



Legend

- Phase One Property Boundary
- Phase One Study Area (250 m from Phase One Property Boundary)
- Parcel Boundaries
- Zoning Boundaries within Phase One Study Area
- ADDRESS Former Address (Location Approximate)

Notes:
1) Map Projection: NAD 1983 UTM Zone 18N
2) Zoning Boundaries within Study Area source: https://maps.ottawa.ca/geoottawa/, retrieved April 28, 2021
3) Imagery Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

FIGURE 3

Phase One Study Area

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION: GUELPH		REVISION: 01	Geosyntec consultants
DATE PLOTTED: July 2021	DATE REVISED: July 2021	REVIEWED: MG	
APPROX. SCALE: 1:7,000	PAGE SIZE: 11 x 17 in	CHECKED: DH	TRUE NORTH: 0 50 100 150 m
		DRAWN: SS/JK	

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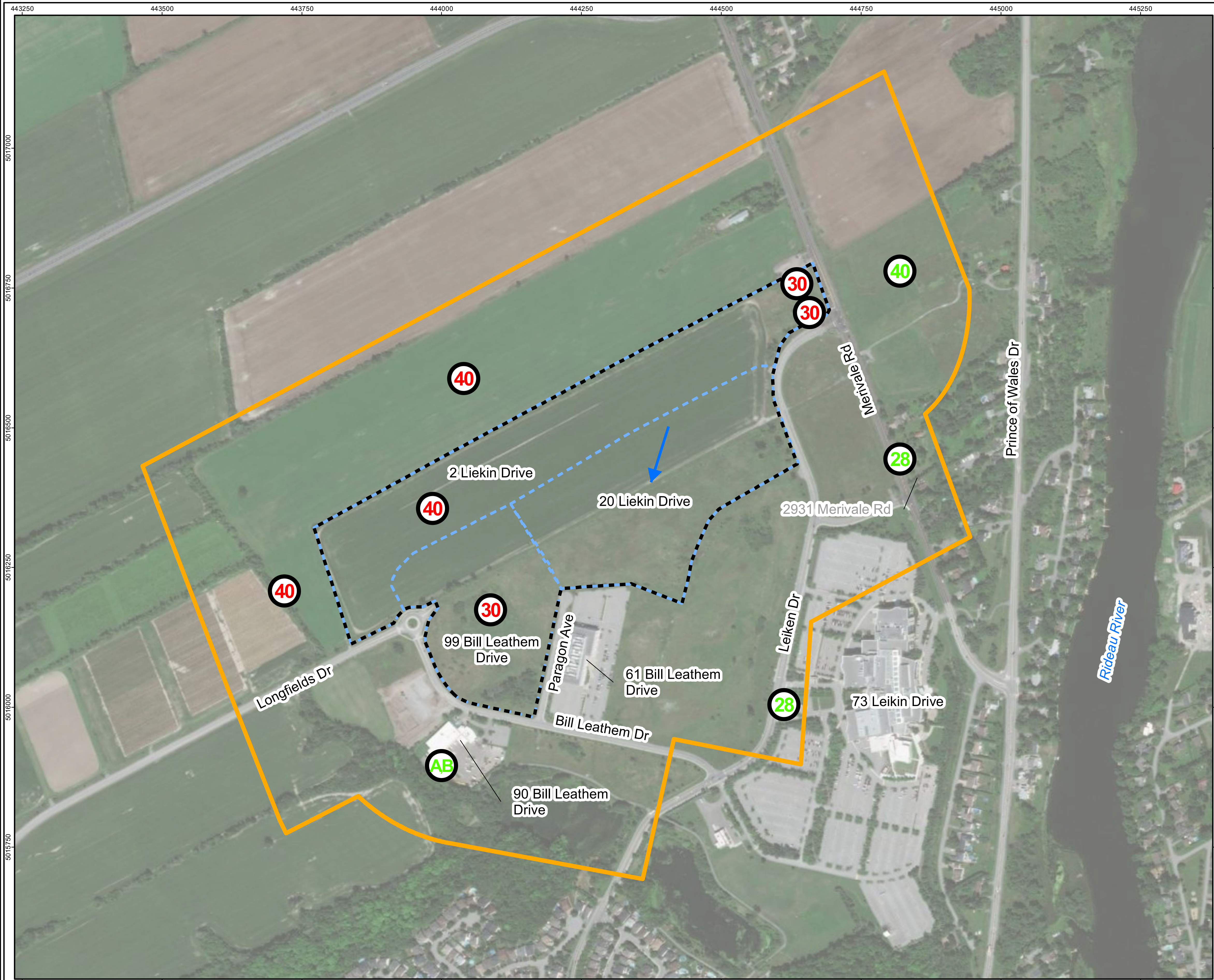


Legend

- 40 PCA resulting in an APEC
- A Off-Site PCA not resulting in an APEC
- Inferred Groundwater Flow Direction
- Phase One Property Boundary
- Phase One Study Area (250 m from Phase One Property Boundary)
- Parcel Boundaries
- ADDRESS Former Address (Location Approximate)

Potentially Contaminating Activites (PCAs) per Table 2, Schedule D of O. Reg. 153/04
#28 - Gasoline and Associated Products Storage in Fixed Tanks
#30 - Importation of Fill Material of Unknown Quantity
#40 - Pesticide (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications

Non-Defined PCAs:
A - Waste Generation
B - Spills

Notes:
1) Map Projection: NAD 1983 UTM Zone 18N
2) Imagery Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

FIGURE 4

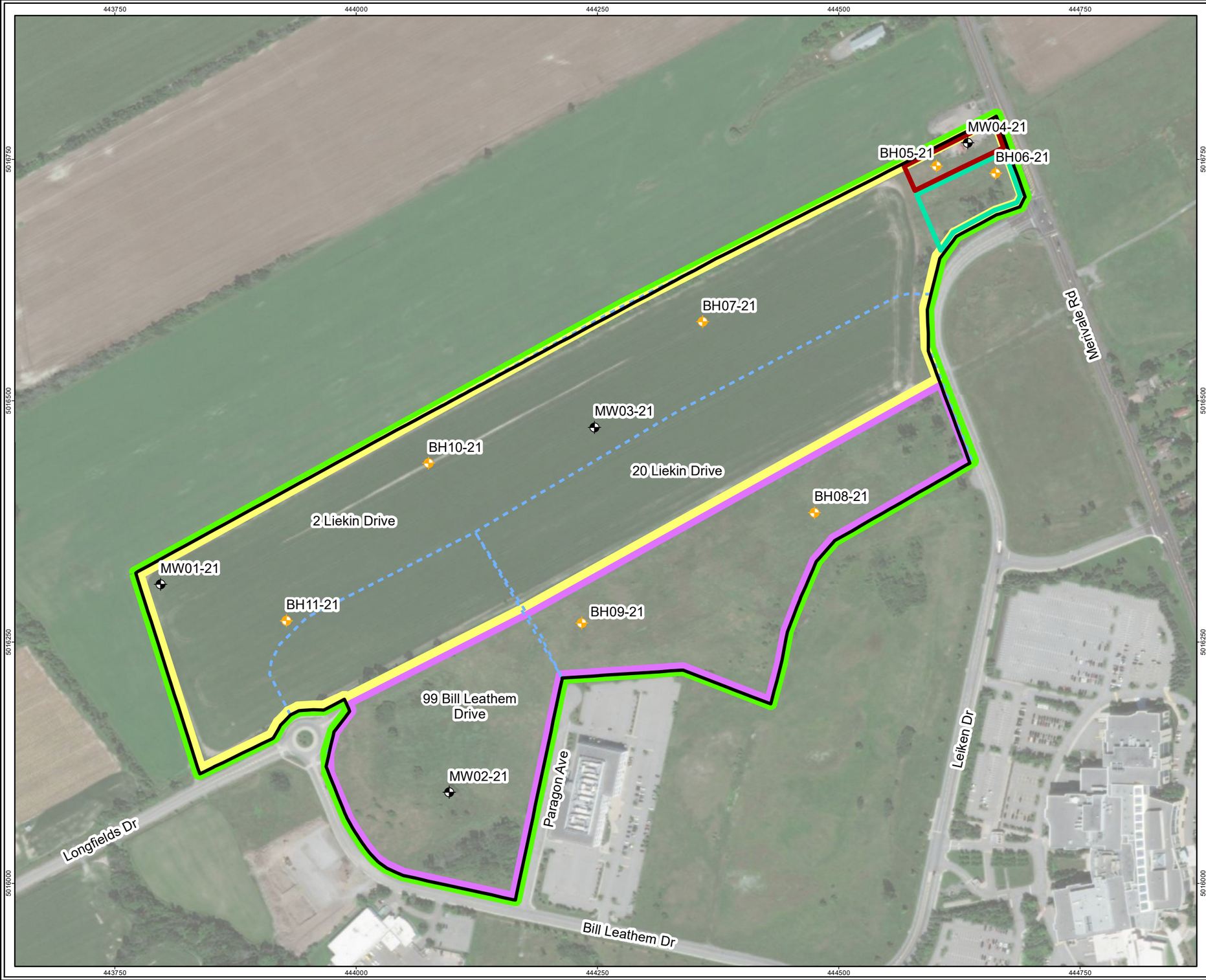
Potentially Contaminating Activities

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION		REVISION
GUELPH		01
DATE PLOTTED	DATE REVISED	REVIEWED
July 2021	July 2021	MG
APPROX. SCALE	PAGE SIZE	CHECKED: DH
1:7,000	11 x 17 in	DRAWN: JK

Geosyntec consultants

TRUE NORTH
0 50 100 150 m



Legend

- Monitoring Well Location
- Borehole Location
- Phase Two Property Boundary
- Parcel Boundaries
- APEC #1 - Historical Usage of Perticides on whole of Phase Once Property
- APEC #2 - Importation of Fill of Unknown Quantity
- APEC #3 - Importation of Fill of Unknown Quality (Encroachment)
- APEC #4 - Importation of Fill of Unknown Quality (Berm)
- APEC #5 - Current/Historical Usage of Pesticides on Adjoining Lands to the North, West, and East

Notes:
APEC - area of potential environmental concern
1) Map Projection: NAD 1983 UTM Zone 18N
2) Borehole and Monitoring Well locations are approximate.
3) Imagery Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

FIGURE 5

Borehole and Monitoring Well Location Plan Showing APECs and Investigation Locations

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION: GUELPH		REVISION: 00	Geosyntec consultants
DATE PLOTTED: July 2021	DATE REVISED: July 2021	REVIEWED: MG	
APPROX. SCALE: 1:4,000	PAGE SIZE: 11 x 17 in	CHECKED: DH	TRUE NORTH
		DRAWN: JK	0 40 80 120 m

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443750 444000 444250 444500 444750

5016750 5016500 5016250 5016000

MW04-21
BH05-21
BH06-21
A'
B'
BH07-21
MW03-21
BH10-21
20 Liekin Drive
2 Liekin Drive
BH08-21
MW01-21
BH11-21
BH09-21
A
99 Bill Leathem Drive
MW02-21
Longfields Dr
Paragon Ave
Leiken Dr
Merivale Rd
B
Bill Leathem Dr

Legend

- Monitoring Well Location
- Borehole Location
- Cross-Section A-A'
- Cross-Section B-B'
- Phase Two Property Boundary
- Parcel Boundaries

Notes:
1) Map Projection: NAD 1983 UTM Zone 18N
2) Borehole and Monitoring Well locations are approximate.
3) Imagery Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

FIGURE 6

Cross-Section Location Plan

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION: GUELPH		REVISION: 00	Geosyntec consultants
DATE PLOTTED: 13-Jul-2021	DATE REVISED: 13-Jul-2021	REVIEWED: MG	
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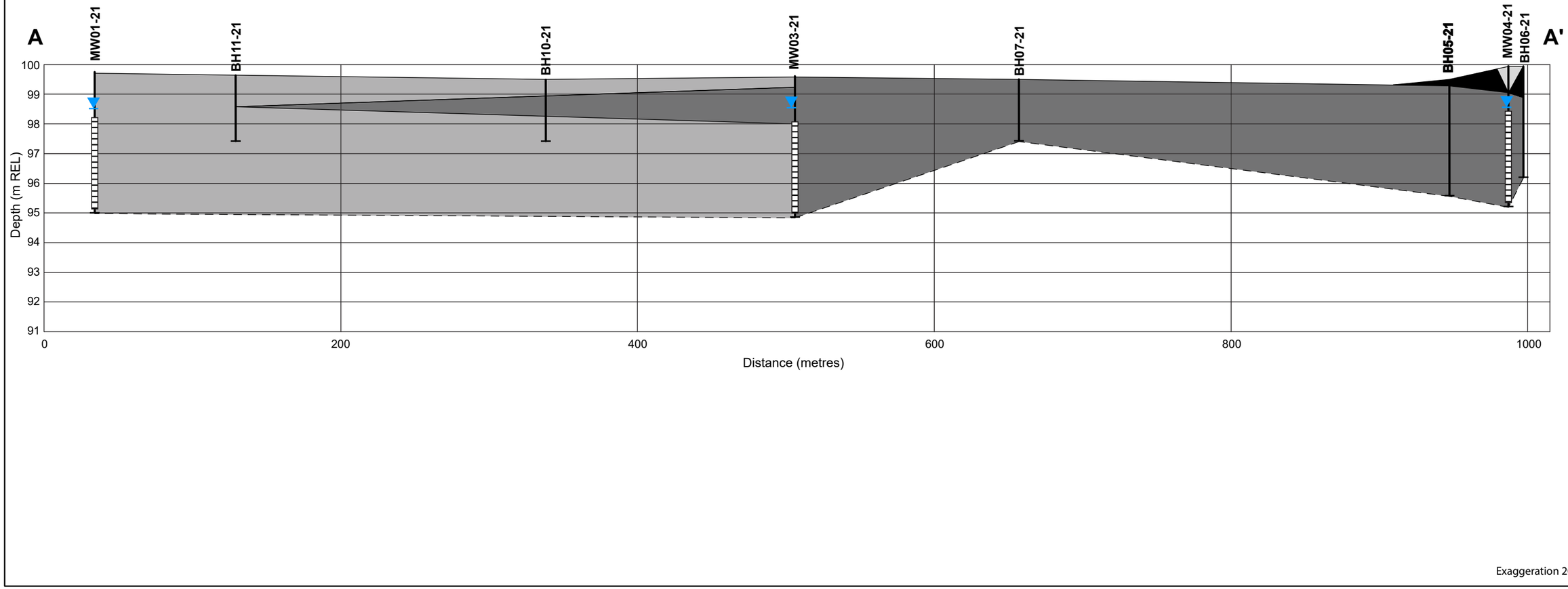

Legend

MW12-18 — Sample Location

Well Screen

Borehole Depth

Water Level

— — — Inferred bottom of geological unit

Clayey Silt

Fill

Silty Clay

Top Soil

Notes:
m REL - metres relative to benchmark
Groundwater elevations were measured 23 June 2021

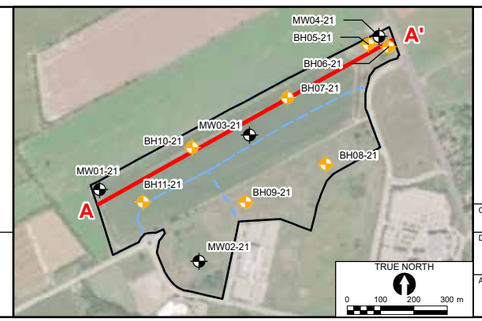

FIGURE 7

Cross-Section A-A'

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION: GUELPH		REVISION: 00	Geosyntec consultants
DATE PLOTTED: 30-Jun-2021	DATE REVISED: 30-Jun-2021	REVIEWED: HC	
APPROX. SCALE: 1:2,725	PAGE SIZE: 11 x17 in	CHECKED: HC	0 25 50 75 100 m
		DRAWN: SS/JK	

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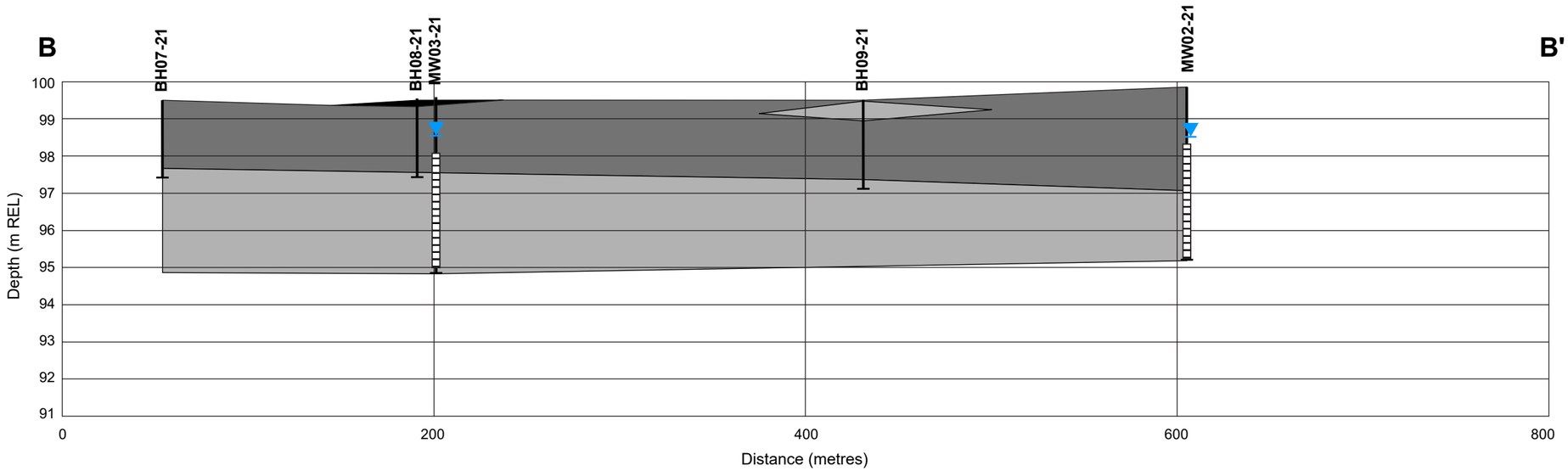

Exaggeration 20x

Legend

- MW12-18 — Sample Location
- Well Screen
- Borehole Depth
- Water Level
- — — — Inferred bottom of geological unit
- Clayey Silt
- Fill
- Silty Clay
- Top Soil

Notes:
m REL - metres relative to benchmark
Groundwater elevations were measured 23 June 2021

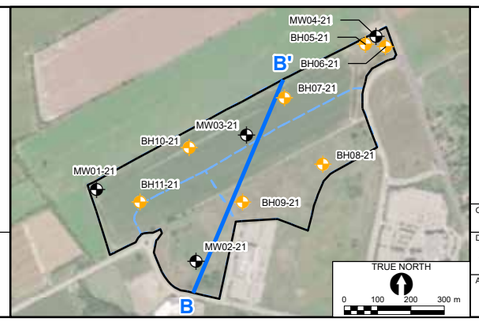

FIGURE 8

Cross-Section B-B'

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION: GUELPH		REVISION: 00	Geosyntec consultants
DATE PLOTTED: 30-Jun-2021	DATE REVISED: 30-Jun-2021	REVIEWED: HC	
APPROX. SCALE: 1:2,725	PAGE SIZE: 11 x17 in	CHECKED: HC	0 25 50 75 100 m
		DRAWN: SS/JK	

F8 Cross_SectionB TR0936B.ai

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443750 444000 444250 444500 444750

5016750 5016500 5016250 5016000

MW04-21
98.56

98.55

98.55

98.5

MW03-21
98.50

98.5

20 Liekin Drive

2 Liekin Drive

MW01-21
98.48

98.45

98.45

99 Bill Leathem
Drive

98.4

98.4

MW02-21
98.37

Merivale Rd

Leiken Dr

Paragon Ave

Longfields Dr

Bill Leathem Dr

Legend

- Monitoring Well
- Groundwater Contour (m REL)
- Inferred Groundwater Flow Direction
- Phase Two Property Boundary
- Parcel Boundaries

Notes:
m REL - metres relative to benchmark
1) Map Projection: NAD 1983 UTM Zone 18N
2) Borehole and Monitoring Well locations are approximate.
3) Groundwater elevations were measured on June 23, 2021
4) Imagery Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

FIGURE 9

Groundwater Elevations and Inferred Flow Direction

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION: GUELPH		REVISION: 00	Geosyntec consultants
DATE PLOTTED: July 2021	DATE REVISED: July 2021	REVIEWED: MG	
APPROX. SCALE: 1:4,000	PAGE SIZE: 11 x 17 in	CHECKED: HC	TRUE NORTH
		DRAWN: JK	0 40 80 120 m

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APPENDIX A

SAMPLING AND ANALYSIS PLAN

Geosyntec consultants

engineers | scientists | innovators

PHASE TWO SAMPLING AND ANALYSIS PLAN

99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive
Ottawa, Ontario

Prepared for

Medusa LP
c/o Russell Beach
16766 rte Trans-Canada, suite 500
Kirkland, Quebec, H9H 4M7

Prepared by

Geosyntec Consultants International, Inc.
424 – 135 Laurier Avenue West
Ottawa, Ontario K1P 5J2

Project Number: TR0936B

31 May 2021

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Table 1 Sampling and Analysis Plan

1. INTRODUCTION

Geosyntec Consultants International, Inc. (Geosyntec) has prepared this Sampling and Analysis Plan (SAP) outlining the environmental sampling and analysis procedures to be implemented on the properties located at 99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive in Ottawa, Ontario (hereinafter referred to as the "Phase Two Property" or the "Site"). It is our understanding that a Phase One Environmental Site Assessment (ESA) and a subsequent Phase Two ESA, prepared in accordance with Ontario Regulation (O. Reg.) 153/04, as amended, are required to be submitted to the City of Ottawa in support of the Site plan approval for Site redevelopment. It is also understood that a Record of Site Condition (RSC) is not required at this time.

This SAP outlines the sampling locations to investigate areas of potential environmental concern (APECs) and associated contaminants of potential concern (COPCs) identified by Geosyntec in the May 2021 Phase One ESA (Geosyntec, 2021) prepared for the Site. The procedures described herein were developed following the requirements of Ontario Regulation (O. Reg.) 153/04, as amended; relevant Ministry of the Environment, Conservation and Parks (MECP) guidance documents; and, Geosyntec's Standard Operating Procedures (SOPs).

1.1 Background

The Phase Two Property measures approximately 31.8 hectares (78.6 acres) in size and comprises agricultural cropland and an open field with no buildings present. The north portion of the Site is currently utilized for soy and corn farming. There are no on-Site surface water bodies; however, in the past there may have been a naturally occurring drainage ditch/swale on the southeast portion of the Site that is no longer evident. A Proposed Borehole and Monitoring Well Location Plan, showing the Site boundaries, is presented on **Figure 1**.

According to historical records, the Phase One Property was developed prior to the mid-1930s for agricultural purposes, and most recently used for soy and corn farming. Presently, only the northern portion of the Site is farmed, with agricultural operations on the southern portion reportedly having ceased in approximately 2000.

Geosyntec prepared a Phase One ESA to support Site redevelopment. The results of the Phase One ESA identified potentially contaminating activities (PCAs) on the Site and on other properties located within the Phase One Study Area, which resulted in a total of five APECs on the Phase Two Property.

The APECs and related PCAs and COPCs are summarized in the following table:

APEC	Location of APEC on the Phase Two Property	PCA	Location of PCA (On-Site or Off-Site)	COPCs	Media Potentially Impacted (Ground Water, Soil and/or Sediment)
APEC #1 – Potential current and/or former pesticide application across the entire Phase One Property.	Entire Phase One Property	#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications	On-Site	OCPs	Soil and Groundwater
APEC #2 – Potential presence of fill material of unknown quality on the southern portion of the Phase One Property.	Southern Portion of the Phase One Property	#30 – Importation of Fill Material of Unknown Quality	On-Site	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg, methyl mercury), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	Soil
APEC #3– Potential presence of fill material of unknown quality on the northeastern corner of the Phase One Property.	Northeastern Portion of the Phase One Property	#30 – Importation of Fill Material of Unknown Quality	On-Site	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg, methyl mercury), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	Soil
APEC #4 – Potential presence of fill material of unknown quality on the east-central portion of the Phase One Property.	East-Central Portion of the Phase One Property	#30 – Importation of Fill Material of Unknown Quality	On-Site	PHCs, PAHs, VOCs, Metals (including As, Sb, Se, Cr [VI], Hg, methyl mercury), Na, B-HWS, Cl-, CN-, low or high pH, EC, and SAR	Soil

APEC	Location of APEC on the Phase Two Property	PCA	Location of PCA (On-Site or Off-Site)	COPCs	Media Potentially Impacted (Ground Water, Soil and/or Sediment)
APEC #5 – Potential current and/or former pesticide application on the lands adjoining to the north and west of the Phase One Property.	Northern Portion of the Phase One Property	#40 – Pesticides (including Herbicides, Fungicides and Anti-Fouling Agents) Manufacturing, Processing, Bulk Storage and Large-Scale Applications	Off-Site	OCPs	Soil and Groundwater

Notes:
OCPs – Organochlorinated Pesticides
VOCs – Volatile Organic Compounds
PHCs F1-F4 – Petroleum Hydrocarbons Fractions F1 to F4
PAHs – Polycyclic Aromatic Hydrocarbons
As, Sb, Se – Arsenic, Antimony, and Selenium
CN- - Cyanide
Cr (VI) – Hexavalent Chromium
B-HWS – Boron (Hot Water Soluble)
Hg – Mercury
Na – Sodium
Cl- – Chloride
EC – Electrical Conductivity
SAR – Sodium Adsorption Ratio

The locations of the APECs on the Phase Two Property are shown on **Figure 1**. The scope of work, or the field sampling plan, for the Phase Two ESA is described in **Table 1**.

1.2 Objective

The objectives of this SAP are to define the following:

- The appropriate sampling and analysis procedures to meet the data quality objectives (DQOs) of the Phase Two ESA (Sections 2.0 and 3.0).

- The Quality Assurance/Quality Control (QA/QC) procedures for data representativeness (Section 4.0).

2. STANDARD OPERATING PROCEDURES

The SOPs for soil and groundwater sampling activities for the Phase Two ESA are described in the following sections.

2.1 Preparation Activities

Prior to commencing subsurface investigation activities, Geosyntec will prepare a Task Hazard Analysis (THA) to assess potential health and safety hazards specific to the Phase Two ESA investigation activities. In addition, public utility services (i.e., Ontario One Call) and a private utility locator will be retained to identify the location of known public and private utilities in the vicinity of the proposed investigation locations at the Site.

2.2 Borehole Drilling

Boreholes will be advanced at the Site by an MECP-licensed drilling contractor under subcontract to Geosyntec. Borehole drilling may be performed using hollow or solid stem auger, or direct push technique (DPT) drilling methods, depending on the targeted depth of drilling and soil sampling requirements. Geosyntec personnel will observe the drilling program and will specify the drilling locations and depths. After each borehole is advanced to the specified depth, the total depth will be measured with a weighted measuring tape to verify the drilling depth and the total depth recorded in the field log. If fluids are used during borehole drilling, the amount and type of fluid lost to the formation will be recorded in the field logs.

2.3 Soil Sample Screening

During the drilling program, soil samples will be field screened using a combustible gas indicator (CGI) and/or a hand-held photoionization detector (PID) with a 10.6 eV lamp to assess the potential presence and magnitude of petroleum hydrocarbons (PHCs) and/or volatile organic compound (VOC) concentrations. The equipment will be calibrated before use and checked periodically throughout the day. Soil samples will be transferred into plastic zip-top bags or glass jars for field screening. Glass jars, if used, will be sealed with plastic wrap and aluminum foil secured by the ring top of the glass jars. Measurements will be obtained by inserting the probe of the CGI and/or PID into the bag or through the plastic wrap/aluminum foil layers of the jar to measure total organic vapours in the headspace. Soil samples will be stored for approximately ten minutes or longer following sample collection and then shaken prior to obtaining a screening measurement to enhance volatilization. The maximum measured PID and/or CGI readings will be recorded in the field logs.

2.4 Soil Sample Logging

Geosyntec will classify the soil samples using procedures similar to those described in the American Society for Testing and Materials visual-manual standard for the description and identification of soils (ASTM, 2000). A log will be prepared for each borehole and will include a unique identification number, date, description of geologic or other material encountered, including the type, texture, colour, moisture content, and other observations of condition, such as staining, odours, weathering features, and CGI/PID screening measurement results. The borehole log will also contain observations noted during drilling, such as the locations where soil samples were recovered, notes on sample recovery, total depth drilled, drilling refusal, and visual or olfactory evidence of free-flowing product. The identification and location of soil samples submitted for laboratory analysis will be indicated.

2.5 Soil Sampling

Soil samples will be collected continuously, to the extent practical, using split-spoon samplers or acetate liners inside DPT rods. Equipment is to be decontaminated before initial use and between sampling locations. Upon collection of the soil samples, sub-samples of undisturbed soils will be expediently transferred into laboratory supplied containers for potential laboratory analysis.

2.6 Monitoring Well Installation

Geosyntec will retain a MECP-licensed well and drilling contractor to install a single, vertically oriented monitoring well in each borehole that is designated for well construction. Monitoring wells will be comprised of 50 millimetre (mm) Schedule 40 polyvinyl chloride (PVC) screen/riser pipe and will be constructed with 3 metres (m) of number 10 slot screen and screened to intersect the water table, which is expected to be located at depths ranging between 2.0 and 4.0 m below ground surface (bgs) based on information for nearby wells obtained from the Ontario Well Water Information System (WWIS). Monitoring wells will be installed in accordance with O. Reg. 903. No solvents, lubricants, or adhesives will be used during well construction.

The annular space around and above the well screen will be backfilled with silica sand to form a sand pack. A bentonite seal, at least 0.3 m thick, will be placed above the sand pack and hydrated with distilled or potable water from ground surface. The remainder of the borehole will be filled with a cement grout/bentonite mixture or bentonite. Each layer will be installed by tremie pipe or through the drill string (hollow augers) to minimize the potential for bridging of materials within the borehole. After each layer is installed, a weighted measuring tape will be used to verify the installation depth of the layer. Monitoring wells will be completed with either aboveground or flushmount protective casings. A PVC slip cap will be inserted over the open end of the pipe of the wells, which will be completed aboveground.

A log will be prepared for each monitoring well that includes the borehole log information, in addition to the surveyed location and surface elevation of the well, monitoring well identification

number, information pertaining to well construction (i.e., screened interval, sand pack, seal location and thickness, well diameter and screen slot size), and date of installation.

2.7 Monitoring Well Development

No sooner than approximately 24 hours following monitoring well installation, each monitoring well will be developed using a dedicated Waterra™ tubing in an attempt to remove fluids that may have been introduced into the well during drilling (i.e., drilling fluids), and to remove particulates that may have become entrained in the well and filter sand pack. A Horiba or equivalent water quality meter will be used to record water quality parameters during development, including dissolved oxygen (DO), temperature, pH, specific conductance, oxygen reduction potential (ORP), and turbidity. The water quality parameters will be measured by placing electrodes into a flow through chamber, or flow through cell, and pumping a continuous flow of groundwater across the electrodes, allowing the chamber to overflow into a larger container beneath. Turbulence in the chamber will be minimized to the extent possible. Development will continue until groundwater quality parameters have stabilized, turbidity has been sufficiently reduced, or at least five well casing volumes have been purged. For wells installed in low permeability materials (e.g., clays), wells may be developed by pumping the well dry on two or more occasions.

The depth to water before and after development will be measured and recorded. Visual and olfactory observations of the purged water will also be noted. The date of development, time that development started and stopped, and the estimated volume of fluid removed during development will be recorded in the field documentation.

2.8 Synoptic Water Level Measurements

Prior to groundwater sampling and approximately 24 hours following monitoring well development, static groundwater levels will be measured in the wells using an interface probe attached to a pre-calibrated measuring tape. The tape will contain graduations in metric units. Prior to use, the tape will be inspected for missing or defective graduation marks. When the probe is lowered into a well and contacts water, the probe will provide a visual and audible signal. Water levels will be recorded to the nearest 0.01 m in the field documentation. The probe and section of the tape in contact with water will be decontaminated before initial use and in between wells.

2.9 LNAPL and DNAPL Measurement

The top and bottom of the water columns in the monitoring wells will be assessed for the presence of light or dense non-aqueous phase liquid (LNAPL and DNAPL, respectively) layers using an interface probe. The probe will be calibrated by the manufacturer, with graduations in metric units. The probe will provide an intermittent visual and audible signal when water is contacted, and a solid signal when NAPL is contacted. Prior to use, the tape will be inspected for missing or defective graduation marks. Presence, thickness of free product layers, and depth to free product

layers will be recorded to the nearest 0.01 m in the field documentation. The probe and section of the tape in contact with water will be decontaminated before initial use and in between wells.

If NAPL is reportedly encountered using the interface probe, the results will be verified by visual inspection using a bailer.

2.10 Groundwater Sampling

Following static groundwater level measurements and prior to collecting groundwater samples, the water in the well casing will be purged to allow sampling of groundwater that is representative of subsurface conditions.

Groundwater samples will be collected from monitoring wells using low-flow sampling techniques. Purging will be conducted using peristaltic or submersible pumps connected to the dedicated tubing in the well. Purging of the groundwater will be performed at relatively low flow rates (between 0.1 and 0.5 litres per minute) to minimize drawdown of the water level in the well. Water purged from the wells will be monitored for water quality parameters to document changes in water quality. Water will continue to be purged from the wells until the drawdown of water level has stabilized and three consecutive water quality measurements over approximately three minutes has stabilized (pH ±0.1 pH units, specific conductance ±3%, turbidity ±10%, DO ±10% and ORP ±10%).

Groundwater samples will be transferred directly from the pump tubing into laboratory supplied sample containers. The date of purging, time that purging started and stopped, volume of fluid removed during purging, water levels before and after purging, samples collected, time samples collected, and analyses requested will be recorded in the field documentation.

2.11 Sample Containers, Labelling, Storage, Packaging, and Transportation

The volume and type of containers and the preservatives to be used for field and laboratory analyses, as provided by the laboratory, must comply with MECP protocols and laboratory specific requirements as described in the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the *Environmental Protection Act* (Queen's Printer, July 1, 2011). Certified pre-cleaned containers will be provided by the laboratory.

Sample identifiers will consist of the sample location name, depth, and sample date (if applicable). Indelible ink pens will be used to label the sample containers. In addition to the sample identifier, samples will be labelled with the following information:

- Project name
- Name or initials of individual collecting the sample
- Date and time of sample collection

- Analyses to be performed
- Preservation chemical (if used)

Groundwater and soil samples will be placed in a sample cooler expediently following collection and stored on ice, then transported under a chain of custody to the laboratory in accordance with the sample handling and custody procedures.

Chain of custody documentation (including custody seals on coolers) will documented by Geosyntec personnel associated with field work at the end of each field day. Chain of custody forms will accompany the sample shipments. Once the samples arrive at the laboratory, Geosyntec will assess the laboratory sample receipt documentation to assess whether the samples have been logged correctly and that the appropriate analyses have been requested. Sample log in forms will be requested from each laboratory within approximately 24 hours of sample shipment.

2.12 Investigation Derived Waste (IDW)

Soil cuttings generated from the drilling program; purged groundwater from monitoring well development and groundwater sampling activities; and, wash water utilized for equipment decontamination will be stored on-Site in 205-L storage drums and transported to a designated storage area for characterization, as appropriate, and subsequent proper disposal in accordance with applicable regulations.

2.13 Surveying

Geosyntec will survey the horizontal position and reference elevation of the borings and monitoring wells to the nearest centimetre, relative to a geodetic benchmark and on-Site features. Using top of casing elevations measured for the monitoring wells, groundwater elevations will be calculated to assess the direction of groundwater flow.

3. LABORATORY ANALYTICAL METHODS

Geosyntec will retain a certified laboratory and request that analytical methods will follow standard MECP protocols, as applicable. Laboratory reports will include the analytical results of the samples and QA/QC analyses conducted, including laboratory QC sample analyses (e.g., method blanks, spikes, surrogates, laboratory control samples).

4. QUALITY ASSURANCE / QUALITY CONTROL

Field QA/QC samples consisting of trip blanks and field duplicate samples will be collected to monitor sampling and laboratory analytical performance.

4.1 Equipment Decontamination Procedure

Non-dedicated and non-disposable sampling equipment will be decontaminated before initial use and following each use to prevent the introduction of extraneous material into samples and to prevent cross contamination between sample locations. Sampling equipment will be decontaminated by washing with a non-phosphate detergent such as Liquinox™ or equivalent. Equipment decontamination will consist of the following:

1. Wash with non-phosphate detergent and water solution. This step will remove contamination from the equipment. The non-phosphate detergent will be diluted as directed by the manufacturer.
2. Rinse with distilled or potable water, as appropriate. This step will rinse away residual detergent solution.

4.2 Trip Blanks

Trip blanks for groundwater VOC/PHC F1 analyses are sample bottles containing analyte-free, deionized water, prepared at the contract laboratory, and stored and shipped with the field samples. The trip blanks will not be opened in the field. Information obtained from the trip blank analyses will be used to assess whether, and to what extent, sample handling and analysis has introduced positive bias to the sample results. One trip blank for analysis of VOC/PHC F1 will accompany each laboratory submission of groundwater VOC/PHC F1 samples.

4.3 Field Duplicates

Field duplicates are co-located samples (collected at the same time from the same location using the same sampling procedure) that will be analyzed to evaluate the precision of the sampling and analysis system. Field duplicate samples submitted for laboratory analyses will be submitted without indication of which investigative sample the duplicate represents (i.e., blind duplicate).

Field duplicates will be collected and analyzed for both soil and groundwater samples at a frequency of one field duplicate for every ten samples per parameter group.

4.4 Calibration Procedures

Field instruments will be calibrated prior to use according to the manufacturer's directions. Where possible, the field instruments will be calibrated using a two-point calibration technique, in accordance with the manufacturer's instructions. Calibration checks using commercially prepared standard solutions or gases will be conducted at least once per day and at the end of each sampling session. Instrument calibration information will be recorded in the field documentation. The pH meter will be re-calibrated if the calibration drifts by ± 0.5 pH units. The specific conductance, DO, ORP, and/or turbidity meters will be re-calibrated if the calibration drifts by greater than 20% of the standard concentration.

4.5 Data Quality Objectives

DQOs set the level of data uncertainty, such that decision making is not affected and the overall objectives of the Phase Two ESA, as stated in Section 2, are met for the collected field data. DQOs are established based on the need to monitor the primary data quality indicators (i.e., precision, bias, accuracy, representativeness, completeness, and comparability), which are described as follows:

- Precision is a measure of agreement among replicate measurements of the same property under prescribed similar conditions.
- Accuracy is the closeness of an individual measurement to the true value. This includes a combination of random error (precision) and systematic error (bias) components that result from sampling and analytical operations.
- Representativeness is the degree to which sample data accurately and precisely represent a characteristic of a population parameter at a sampling point.
- Completeness is a measure of the amount of the valid data obtained from the measurement system compared to the amount that should have been collected.

Analytical reporting limits (RLs) have been established by the laboratory to allow for a meaningful comparison of the concentration data to the applicable MECP Site Condition Standards (SCS). A description of the DQOs is provided below.

4.5.1 Precision

Precision measures the reproducibility of measurements under a given set of conditions. Analytical precision is the measurement of the variability associated with duplicate or replicate analyses. Total precision is the measurement of the variability associated with the entire sampling and analysis process, which is evaluated through analysis of duplicate field samples and measures

variability introduced by both the laboratory and field operations. Field duplicate samples will be used to assess field and analytical precision. The precision measurement expressed as the relative percent difference (RPD) is as follows:

$$RPD = \left(\frac{(Sample\ Result - Duplicate\ Result)}{(\frac{Sample\ Result + Duplicate\ Result}{2})} \right) * 100\%$$

The analytical laboratory will have statistically based acceptability limits for RPDs established for each method of analysis and sample matrix. The laboratory will review the QC samples to assess whether the internal QC data are within the limits of acceptability.

Suspect trends will be investigated by the analytical laboratory, and corrective actions taken. If the laboratory does not have statistically derived control limits, the analytical precision acceptability limits for this Phase Two ESA will be based on method limits.

Sampling precision will be evaluated based on the RPD for field duplicate samples. The field precision acceptability limits will be 30% for groundwater analyses performed by the certified laboratory. Soil samples may be evaluated against the 30% criteria, recognizing that soil is inherently more variable.

4.5.2 Accuracy

Accuracy is the nearness of a result or the mean of a set of results to the true or accepted value and measures the bias of an analytical system by comparing the difference of a measurement with a reference value. The percent recovery of an analyte, which has been added to the environmental samples, or to a blank sample, at a known concentration before extraction and analysis, provides a quantitative tool for evaluation of analytical accuracy. The laboratory is not to use the same spiking solutions used for accuracy assessments as for instrument calibrations. The following equation illustrates how accuracy is evaluated:

$$Accuracy\ as\ Percent\ Recovery = \left(\frac{Spiked\ Sample\ Result - Sample\ Result}{Spike\ True\ Value} \right) * 100\%$$

Percent recoveries for surrogates and laboratory control samples serve as a measure of analytical accuracy. The laboratory will review the QC samples and surrogate recoveries (organic analyses) for each analysis to assess whether the internal QC data are within the limits of acceptability. The laboratory will investigate any suspect trends and take appropriate corrective actions.

4.5.3 Representativeness

Representativeness expresses the degree to which sample data accurately and precisely represent a characteristic of a population, parameter variations at a sampling point, or an environmental condition. Unlike precision and accuracy, which can be expressed in quantitative terms, representativeness is a qualitative parameter that is most concerned with the proper design of the sampling program. Standardized sampling procedures are presented to support this objective.

4.5.4 Comparability

Comparability is a qualitative parameter expressing the confidence with which one dataset can be compared with another, whether it was generated by a single laboratory or during inter-laboratory studies. Sample data should be comparable for similar samples and sample conditions. The objective for the QA/QC program is to produce data with the greatest possible degree of comparability. The number of matrices sampled, and the range of field conditions encountered are considered in assessing comparability. The use of standardized field and analytical procedures contribute to the comparability of analytical data.

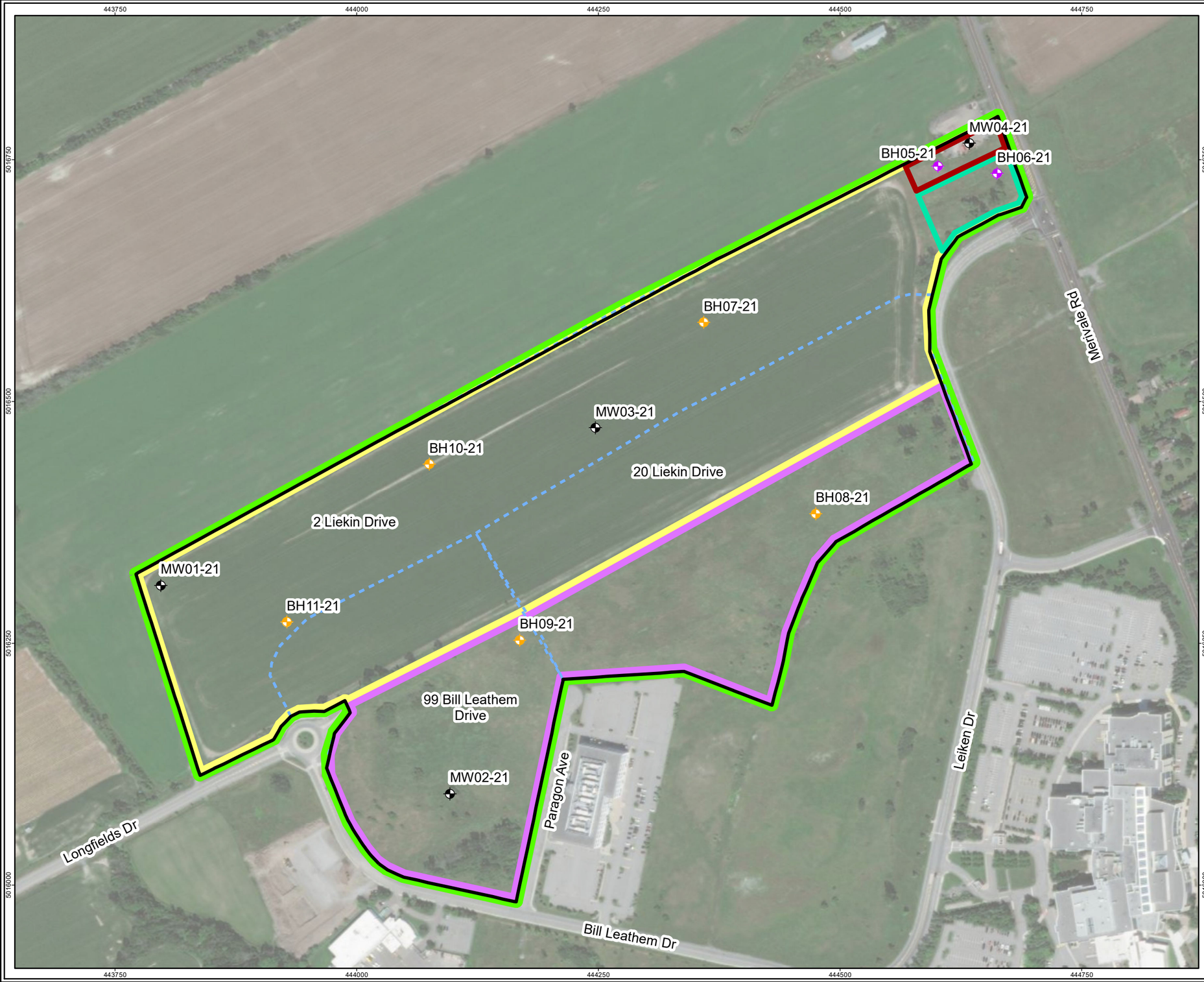
4.5.5 Completeness

Completeness is a measure of whether the collected data meet the project objectives. The data must meet the acceptance criteria, including accuracy and precision, to be considered complete, and any other criteria specified for an analytical method. The data will be reviewed or validated to keep invalid data from being processed through data collection. The following equation illustrates how completeness is evaluated:

$$Completeness = \left(\frac{Acceptable\ Results}{Total\ Results}\right) * 100\%$$

The goal for completeness is 100%. If this goal is not achieved, the sources of non-conformance will be evaluated to assess whether resampling and reanalysis is necessary to meet the objectives of the Phase Two ESA.

FIGURE



Legend

- Monitoring Well (6 m bgs)
- Deep Borehole (6 m bgs)
- Shallow Borehole (1.5 m bgs)
- Phase Two Property Boundary
- Parcel Boundaries
- APEC #1 - Historical Usage of Perticides on whole of Phase One Property
- APEC #2 - Importation of Fill of Unknown Quantity
- APEC #3 - Importation of Fill of Unknown Quality (Encroachment)
- APEC #4 - Importation of Fill of Unknown Quality (Berm)
- APEC #5 - Current/Historical Usage of Pesticides on Adjoining Lands to the North, West, and East

Notes:
1) Map Projection: NAD 1983 UTM Zone 18N
2) Borehole and Monitoring Well locations are approximate.
3) Imagery Source: Esri, Maxar, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AeroGRID, IGN, and the GIS User Community

FIGURE 1

Borehole and Monitoring Well Location Plan Showing APECs

99 Bill Leathem Drive and
2 and 20 Leikin Drive

OFFICE LOCATION: GUELPH		REVISION: 00	Geosyntec consultants
DATE PLOTTED: 27-May-2021	DATE REVISED: 27-May-2021	REVIEWED: MG	
APPROX. SCALE: 1:4,000	PAGE SIZE: 11 x 17 in	CHECKED: DH	TRUE NORTH
		DRAWN: JK	0 40 80 120 m

P:\GIS\TR093\B Broccolini Ottawa\Phase Two B1 MW Location Plan APECs TR093B.mxd

TABLE

Table 1
Sampling and Analysis Plan
Summary
99 Bill Leathem Drive, 2 Leikin Drive, and 20 Leikin Drive, Ottawa, Ontario

Proposed Investigation Location	Media	Parameter Suite: Metals	As, Sb, Se	Cr (VI)	B-HWS	CN-	Hg	Methyl Mercury	EC and SAR	Na, Cl	OCPs	VOCs / PHCs F1-F4	PAHs	pH	Grain Size	Sampling System	Target Lithological Unit	Soil Sampling Depths (m bgs)	Maximum Borehole Depth (m bgs)	Monitoring Well Screened Interval (m bgs)	Rationale/Comments
Sampling and Analysis Plan																					
Proposed Borehole Locations (No Monitoring Wells)																					
BH05-21	Soil	•	•	•	•	•	•	•	•		•	•	•			Judgemental	Fill	0.0 to 1.5	6.1*	NA	Soil samples should represent 'worse-case' conditions observed over the prescribed intervals.
	Soil	•	•	•	•	•	•	•	•		•	•	•	•	•	Judgemental	Upper OB	1.5 to 6.1			
BH06-21	Soil	•	•	•	•	•	•	•	•		•	•	•			Judgemental	Fill	0.0 to 1.5	6.1*	NA	
	Soil	•	•	•	•	•	•	•	•		•	•	•	•	•	Judgemental	Upper OB	1.5 to 6.1			
BH07-21	Soil	•									•					Judgemental	Fill	0.0 to 0.5	1.5	NA	
	Soil	•									•					Judgemental	Fill	0.5 to 1.5			
BH08-21	Soil	•									•					Judgemental	Fill	0.0 to 0.5	1.5	NA	
	Soil	•									•					Judgemental	Fill	0.5 to 1.5			
BH09-21	Soil	•									•					Judgemental	Fill	0.0 to 0.5	1.5	NA	
	Soil	•									•					Judgemental	Fill	0.5 to 1.5			
BH10-21	Soil	•									•					Judgemental	Fill	0.0 to 0.5	1.5	NA	
	Soil	•									•					Judgemental	Fill	0.5 to 1.5			
BH11-21	Soil	•									•					Judgemental	Fill	0.0 to 0.5	1.5	NA	
	Soil	•									•					Judgemental	Fill	0.5 to 1.5			
Proposed Borehole and Monitoring Well Locations																					
MW01-21	Soil	•									•					Judgemental	Fill	0.0 to 1.5	6.1*	1.0 to 4.0*	Soil samples should represent 'worse-case' conditions observed over the indicated intervals. Monitoring well screened intervals should straddle the water table.
	Soil	•									•					Judgemental	Upper OB	1.5 to 6.1			
	Groundwater	•									•					Judgemental	UGBZ	NA			
MW02-21	Soil	•	•	•	•	•	•	•	•		•	•	•			Judgemental	Fill	0.0 to 1.5	6.1*	1.0 to 4.0*	
	Soil	•	•	•	•	•	•	•	•		•	•	•			Judgemental	Upper OB	1.5 to 6.1			
	Groundwater	•	•	•	•	•	•	•		•	•	•	•			Judgemental	UGBZ	NA			
MW03-21	Soil	•									•					Judgemental	Fill	0.0 to 1.5	6.1*	1.0 to 4.0*	
	Soil	•									•					Judgemental	Upper OB	1.5 to 6.1			
	Groundwater	•									•					Judgemental	UGBZ	NA			
MW04-21	Soil	•	•	•	•	•	•	•	•		•	•	•			Judgemental	Fill	0.0 to 1.5	6.1*	1.0 to 4.0*	
	Soil	•	•	•	•	•	•	•	•		•	•	•	•	•	Judgemental	Upper OB	1.5 to 6.1			
	Groundwater	•	•	•	•	•	•	•		•	•	•	•			Judgemental	UGBZ	NA			

Notes:

* – Dependent on Depth of Water Table
APEC – Area of Potential Environmental Concern
COPC – Contaminant of Potential Concern
m bgs – Metres Below Ground Surface
NA – Not Applicable
UGBZ – Upper Groundwater Bearing Zone
OB – Overburden
VOCs – Volatile Organic Compounds
PHCs F1-F4 – Petroleum Hydrocarbons Fractions F1 to F4
PAHs – Polycyclic Aromatic Hydrocarbons

As, Sb, Se – Arsenic, Antimony and Selenium
CN^- – Cyanide
Cr (VI) – Hexavalent Chromium
B-HWS – Boron (Hot Water Soluble)
EC – Electrical Conductivity
Hg – Mercury
SAR – Sodium Adsorption Ratio

APPENDIX B

BOREHOLE LOGS

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Borehole No. BH05-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	50.8 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	Not Measured
Drilling Method:	Split Spoons/Percussion Hammer	**Top PVC Casing Elevation:**	Not Applicable
Well Material:	Not Applicable	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Comments
0				Topsoil			1				
1				silty CLAY; light brown to grey; firm; dry to moist; trace sand		71	1 2 2	0.0	--	BH05-21 0-2	
2				light grey							
3	1					100	3 5 8 6	0.0	0.0		
4				moist						BH05-21 4-5	
5						100	10 8 7 5	0.0	0.0		
6					CLM						
7	2					100	4 4 4 3	0.0	0.0		
8				wet							
9						100	5 4 2 2	0.0	0.0		
10	3										
11						100	3 2 2 1	0.0	0.0		
12				Borehole depth 12.0 ft,							Notes: % - percentage bgs - below ground surface ft - feet m - metres m REL - metres relative mm- millimetres NR - not recorded PID - photoionization detector ppmv - parts per million by volume PVC - polyvinyl chloride
13	4										
14											
15											

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Borehole No. BH06-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	50.8 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	Not Measured
Drilling Method:	Split Spoons/Percussion Hammer	**Top PVC Casing Elevation:**	Not Applicable
Well Material:	Not Applicable	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Comments
0				Topsoil		50	1 1 3 4	0.0	0.0	BH06-21 0-2	
2				silty CLAY; light brown to grey; firm; dry to moist							
3	1			brick fragments		79	3 4 6 6	0.0	0.0		
4				light grey		100	5 7 7 7	0.0	--		
6	2			moist	CLM	100	5 5 5 3	0.0	0.4	BH06-21 7-8	
8				moist to wet		100	5 3 3 2	0.0	0.0		
10	3			Borehole depth 10.0 ft,							
13	4										

Notes:
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

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Borehole No. BH07-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	50.8 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	Not Measured
Drilling Method:	Split Spoons/Percussion Hammer	**Top PVC Casing Elevation:**	Not Applicable
Well Material:	Not Applicable	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Comments
1				silty CLAY; light grey; firm; dry to moist		75	1 2 2 4	0.0	--	BH07-21 0-2	
2											
3	1				CLM	87	2 2 5 6	0.0	0.1	BH07-21 2-4 & DUP 01	
4											
5						100	8 8 6 6	0.0	0.2		
6				Borehole depth 6.0 ft,							
7	2										
8											
9											
10	3										
11											
12											
13	4										
14											

Notes:
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

Geosyntec consultants

Borehole No. BH08-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	50.8 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	Not Measured
Drilling Method:	Split Spoons/Percussion Hammer	**Top PVC Casing Elevation:**	Not Applicable
Well Material:	Not Applicable	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Comments
				Topsoil			1				
1				clayey SILT; brown to grey; firm; dry; trace tree roots		54	2 3 4	0.0	--		
2				light grey; dry to moist			3				
3	1				MLC	100	5 7 7	0.0	--	BH08-21 2	
4				moist			6				
5						100	8 8 7	0.0	0.0	BH08-21 4	
6				Borehole depth 6.0 ft,							
7	2										Notes: % - percentage bgs - below ground surface ft - feet m - metres m REL - metres relative mm- millimetres NR - not recorded PID - photoionization detector ppmv - parts per million by volume PVC - polyvinyl chloride
8											
9											
10	3										
11											
12											
13	4										
14											

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Borehole No. BH09-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	50.8 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	Not Measured
Drilling Method:	Split Spoons/Percussion Hammer	**Top PVC Casing Elevation:**	Not Applicable
Well Material:	Not Applicable	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Comments
1				clayey SILT; light brown; firm; dry to moist	MLC	58	1 4 4 4	0.0	--	BH09-21 0-2	
2				mottling							
3	1			silty CLAY; light brown; firm; dry to moist; trace sand		87	3 4 4 6	0.0	0.0		
4				moist							
5				light grey; dry	CLM	87	8 6 6 7	0.0	--	BH09-21 5	
6	2										
7				Borehole depth 7.0 ft,							
8											
9											
10	3										
11											
12											
13	4										
14											

Notes:
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

Geosyntec consultants

Borehole No. BH10-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	50.8 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	Not Measured
Drilling Method:	Split Spoons/Percussion Hammer	**Top PVC Casing Elevation:**	Not Applicable
Well Material:	Not Applicable	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Comments
0				clayey SILT; light brown to grey; firm; dry		--	1 2 2 2	0.5	--	BH10-21 1-2	
2				dry to moist							
3	1				MLC	100	3 4 5 6	0.5	0.1		
4				light grey moist							
5						100	6 6 6 4	0.7	--		
6				Borehole depth 6.0 ft,							
7	2										
8											
9											
10	3										
11											
12											
13	4										
14											

Notes:
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

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Borehole No. BH11-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	50.8 mm
Logged By:	FR	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	Not Measured
Drilling Method:	Split Spoons/Percussion Hammer	**Top PVC Casing Elevation:**	Not Applicable
Well Material:	Not Applicable	**Completion Date:**	8 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Comments
0				Fill; brown; loose; dry to moist		58	1 2 4 4	0.6	--	BH11-21 1-2	
2				silty CLAY; light grey; firm; dry to moist	CLM	92	4 6 7 7	0.9	0.1	BH11-21 3-4	
4						100	6 6 6 5	0.9	0.2		
6				Borehole depth 6.0 ft,							
1	1										
3	2										
5	3										
7	4										
9											
11											
13											

Notes:
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

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Borehole No. MW01-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	127 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	99.706 m REL
Drilling Method:	Hollow Stem Augers	**Top PVC Casing Elevation:**	100.637 m REL
Well Material:	PVC Schedule 40	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Well Configuration	Comments
0											Stickup Protective Casing	
1				clayey SILT; light grey; firm; dry to moist		58	1 3 3 4	0.8	0.7	MW01-21 1-2	2-inch Diameter SCH 40 PVC Riser	
2												
3	1					75	5 5 7 8	0.8	1.0	MW01-21 3-4 & DUP 02	Bentonite Chips (3/8-inch)	
4				moist to wet	MLC							
5				wet		83	5 4 4 4	0.8	1.0			
6	2											
7						100	1 2 2 1	0.8	1.0		Silica Sand (#2)	
8				Not logged								
9												
10	3											
11												
12												
13	4										2-inch Diameter Slotted SCH 40 PVC Screen (0.01 inch)	
14												
15											2-inch Diameter PVC End Cap	
16	5			Borehole depth 15.5 ft,								
17												
18												
19	6											

Notes: PID background was 0.8 ppmv
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

Geosyntec consultants

Borehole No. MW02-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	127 mm
Logged By:	FR	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	99.848 m REL
Drilling Method:	Hollow Stem Augers	**Top PVC Casing Elevation:**	100.787 m REL
Well Material:	PVC Schedule 40	**Completion Date:**	8 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Well Configuration	Comments
1				silty CLAY; light grey; firm; dry to moist		58	2 5 4 3	0.9	0.0			Stickup Protective Casing
2												2-inch Diameter SCH 40 PVC Riser
3	1					100	5 6 7 7	0.8	0.0			Bentonite Chips (3/8-inch)
4				moist	CLM							
5						100	7 7 7 5	0.8	--	MW02-21 + DUP 3		
6	2			wet								
7						100	3 3 3 3	0.8	0.3			Silica Sand (#2)
8				Not logged								
9												
10	3											
11												
12												
13	4											2-inch Diameter Slotted SCH 40 PVC Screen (0.01 inch)
14												
15												2-inch Diameter PVC End Cap
16	5			Borehole depth 15.5 ft,								
17												
18												
19	6											

Notes:
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

Geosyntec consultants

Borehole No. MW03-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	127 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	99.583 m REL
Drilling Method:	Hollow Stem Augers	**Top PVC Casing Elevation:**	100.51 m REL
Well Material:	PVC Schedule 40	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Geologic Samples: Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID	Well Configuration	Comments
0												Stickup Protective Casing
1				clayey SILT; light grey; firm; dry to moist	MLC	75	1 2 2 3	0.7	0.0	MW03-21 0-2		2-inch Diameter SCH 40 PVC Riser
2												
3	1					83	3 4 5 6	0.7	--	MW03-21 3-4		Bentonite Chips (3/8-inch)
4												
5				moist to wet		83	9 6 6 4	0.7	--			
6	2			wet		100	3 2 2 1	0.7	--			Silica Sand (#2)
7												
8				Not logged								
9												
10	3											
11												
12												
13	4											2-inch Diameter Slotted SCH 40 PVC Screen (0.01 inch)
14												
15												2-inch Diameter PVC End Cap
16	5			Borehole depth 15.5 ft,								
17												
18												
19	6											

Notes: PID background was 0.7 ppmv
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

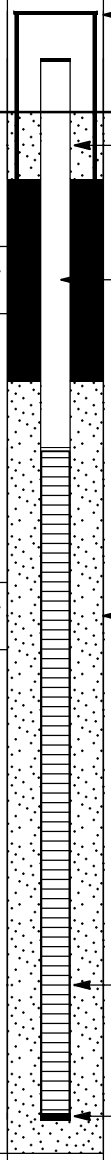
Geosyntec consultants

Borehole No. MW04-21 Page 1 of 1 Borehole Log

Project No.:	TR0936B	**Location:**	99 Bill Leathem Dr, 2 Leikin Dr, 20 Leikin Dr
Client:	Medusa LP	**Borehole Diameter:**	127 mm
Logged By:	KT	**Site Datum:**	Reference Benchmark - Fire Hydrant
Drilling Company:	Dedicated Environmental Services	**Ground Surface Elevation:**	99.938 m REL
Drilling Method:	Hollow Stem Augers	**Top PVC Casing Elevation:**	100.88 m REL
Well Material:	PVC Schedule 40	**Completion Date:**	7 June 2021

Depth (ft bgs)	Depth (m bgs)	Water Level	Stratigraphy	Geologic Description	Unified Soil Classification	Recovery (%)	Blowcount	PID (ppmv)	Secondary (ppmv)	Soil Sample ID
				Fill		17	3 1 2 1	--	--	
						100	3 3 3 5	0.0	0.0	MW04-21 2-3
				silty CLAY; light grey; firm; dry		100	6 6 6 7	0.0	0.2	
				dry to moist		87	7 5 3 2	0.1	--	MW04-21 7-8
					CLM	50	7 5 3 3	0.0	0.2	
				some sand and small boulders (from 9.3 to 9.9 m bgs) moist to wet		100	4 4 4 3	0.0	0.0	
				wet		100	--	--	--	
				Not Logged						
				Borehole depth 15.5 ft,						

Well Configuration



Comments

Notes:
% - percentage
bgs - below ground surface
ft - feet
m - metres
m REL - metres relative
mm- millimetres
NR - not recorded
PID - photoionization detector
ppmv - parts per million by volume
PVC - polyvinyl chloride

APPENDIX C

LABORATORY REPORTS

GEOSYNTEC CONSULTANTS
INTERNATIONAL INC
ATTN: MICHELLE GLUCK
130 STONE ROAD WEST
GUELPH ON N1G 3Z2

Date Received: 08-JUN-21
Report Date: 26-JUN-21 18:51 (MT)
Version: FINAL

Client Phone: 519-822-2230

Certificate of Analysis

Lab Work Order #: L2598394

Project P.O. #: NOT SUBMITTED
Job Reference: TR0936B
C of C Numbers: 20-895345, 20-895346, 20-895347
Legal Site Desc:

Gayle Braun
Senior Account Manager

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-1 MW04-21 2-3							
Sampled By: CLIENT on 07-JUN-21 @ 12:53							
Matrix: SOIL							
Physical Tests							
Conductivity	0.769		0.0040	mS/cm	16-JUN-21	1.4	1.4
% Moisture	15.7		0.25	%	15-JUN-21		
pH	7.34		0.10	pH units	14-JUN-21		
Cyanides							
Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	16-JUN-21	0.051	0.051
Saturated Paste Extractables							
SAR	9.77		0.10	SAR	16-JUN-21	12	12
Calcium (Ca)	9.65		0.50	mg/L	16-JUN-21		
Magnesium (Mg)	4.28		0.50	mg/L	16-JUN-21		
Sodium (Na)	145		0.50	mg/L	16-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50
Arsenic (As)	4.4		1.0	ug/g	16-JUN-21	18	18
Barium (Ba)	380		1.0	ug/g	16-JUN-21	670	670
Beryllium (Be)	1.10		0.50	ug/g	16-JUN-21	8	10
Boron (B)	10.8		5.0	ug/g	16-JUN-21	120	120
Boron (B), Hot Water Ext.	0.12		0.10	ug/g	16-JUN-21	2	2
Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
Chromium (Cr)	136		1.0	ug/g	16-JUN-21	160	160
Cobalt (Co)	21.3		1.0	ug/g	16-JUN-21	80	100
Copper (Cu)	49.3		1.0	ug/g	16-JUN-21	230	300
Lead (Pb)	10.5		1.0	ug/g	16-JUN-21	120	120
Mercury (Hg)	0.0187		0.0050	ug/g	16-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
Nickel (Ni)	67.5		1.0	ug/g	16-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
Uranium (U)	1.4		1.0	ug/g	16-JUN-21	33	33
Vanadium (V)	98.3		1.0	ug/g	16-JUN-21	*86	*86
Zinc (Zn)	115		5.0	ug/g	16-JUN-21	340	340
Speciated Metals							
Chromium, Hexavalent	1.55		0.20	ug/g	16-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	16-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	16-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	16-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	16-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	16-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	16-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	16-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	16-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	1.2	1.7

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2
L2598394-1	MW04-21 2-3							
Sampled By:	CLIENT on 07-JUN-21 @ 12:53							
Matrix:	SOIL							
Volatile Organic Compounds								
	1,3-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	9.6	12
	1,4-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	0.2	0.57
	Dichlorodifluoromethane	<0.050		0.050	ug/g	16-JUN-21	16	25
	1,1-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.47	0.6
	1,2-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
	1,1-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	0.064	0.48
	cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
	trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.3	2.5
	Methylene Chloride	<0.050		0.050	ug/g	16-JUN-21	1.6	2
	1,2-Dichloropropane	<0.050		0.050	ug/g	16-JUN-21	0.16	0.68
	cis-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
	trans-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
	1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	16-JUN-21	0.059	0.081
	Ethylbenzene	<0.018		0.018	ug/g	16-JUN-21	1.1	1.6
	n-Hexane	<0.050		0.050	ug/g	16-JUN-21	46	88
	Methyl Ethyl Ketone	<0.50		0.50	ug/g	16-JUN-21	70	88
	Methyl Isobutyl Ketone	<0.50		0.50	ug/g	16-JUN-21	31	210
	MTBE	<0.050		0.050	ug/g	16-JUN-21	1.6	2.3
	Styrene	<0.050		0.050	ug/g	16-JUN-21	34	43
	1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.087	0.11
	1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.094
	Tetrachloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
	Toluene	<0.080		0.080	ug/g	16-JUN-21	6.4	9
	1,1,1-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	6.1	12
	1,1,2-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.11
	Trichloroethylene	<0.010		0.010	ug/g	16-JUN-21	0.55	0.61
	Trichlorofluoromethane	<0.050		0.050	ug/g	16-JUN-21	4	5.8
	Vinyl chloride	<0.020		0.020	ug/g	16-JUN-21	0.032	0.25
	o-Xylene	<0.020		0.020	ug/g	16-JUN-21		
	m+p-Xylenes	<0.030		0.030	ug/g	16-JUN-21		
	Xylenes (Total)	<0.050		0.050	ug/g	16-JUN-21	26	30
	Surrogate: 4-Bromofluorobenzene	113.4		50-140	%	16-JUN-21		
	Surrogate: 1,4-Difluorobenzene	109.6		50-140	%	16-JUN-21		
Hydrocarbons								
	F1 (C6-C10)	<5.0		5.0	ug/g	16-JUN-21	55	65
	F1-BTEX	<5.0		5.0	ug/g	22-JUN-21	55	65
	F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
	F2-Naphth	<10		10	ug/g	22-JUN-21		
	F3 (C16-C34)	89		50	ug/g	22-JUN-21	1700	2500
	F3-PAH	89		50	ug/g	22-JUN-21		
	F4 (C34-C50)	254		50	ug/g	22-JUN-21	3300	6600
	F4G-SG (GHH-Silica)	950		250	ug/g	19-JUN-21	3300	6600
	Total Hydrocarbons (C6-C50)	343		72	ug/g	22-JUN-21		
	Chrom. to baseline at nC50	NO			No Unit	22-JUN-21		
	Surrogate: 2-Bromobenzotrifluoride	87.0		60-140	%	22-JUN-21		
	Surrogate: 3,4-Dichlorotoluene	74.9		60-140	%	16-JUN-21		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-1 MW04-21 2-3							
Sampled By: CLIENT on 07-JUN-21 @ 12:53							
Matrix: SOIL							
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.050		0.050	ug/g	16-JUN-21	21	29
Acenaphthylene	<0.050		0.050	ug/g	16-JUN-21	0.15	0.17
Anthracene	<0.050		0.050	ug/g	16-JUN-21	0.67	0.74
Benzo(a)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(a)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.3	0.3
Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(g,h,i)perylene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Benzo(k)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Chrysene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Dibenz(a,h)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.1	0.1
Fluoranthene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Fluorene	<0.050		0.050	ug/g	16-JUN-21	62	69
Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.76	0.95
1+2-Methylnaphthalenes	<0.042		0.042	ug/g	16-JUN-21	30	42
1-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
2-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
Naphthalene	<0.013		0.013	ug/g	16-JUN-21	9.6	28
Phenanthrene	<0.046		0.046	ug/g	16-JUN-21	12	16
Pyrene	<0.050		0.050	ug/g	16-JUN-21	96	96
Surrogate: 2-Fluorobiphenyl	95.3		50-140	%	16-JUN-21		
Surrogate: d14-Terphenyl	92.6		50-140	%	16-JUN-21		
Organochlorine Pesticides							
Aldrin	<0.0040	DLM	0.0040	ug/g	21-JUN-21	0.088	0.11
alpha-BHC	<0.010	DLM	0.010	ug/g	21-JUN-21		
beta-BHC	<0.010	DLM	0.010	ug/g	21-JUN-21		
Lindane	<0.0040	DLM	0.0040	ug/g	21-JUN-21	0.056	0.063
delta-BHC	<0.010	DLM	0.010	ug/g	21-JUN-21		
a-chlordane	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
Chlordane (Total)	<0.0085		0.0085	ug/g	21-JUN-21	0.05	0.05
g-chlordane	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
o,p-DDD	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
pp-DDD	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
Total DDD	<0.0085		0.0085	ug/g	21-JUN-21	4.6	4.6
o,p-DDE	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
pp-DDE	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
Total DDE	<0.0085		0.0085	ug/g	21-JUN-21	0.52	0.65
op-DDT	<0.018	DLM	0.018	ug/g	21-JUN-21		
pp-DDT	<0.018	DLM	0.018	ug/g	21-JUN-21		
Total DDT	<0.025		0.025	ug/g	21-JUN-21	1.4	1.4
Dieldrin	<0.0040	DLM	0.0040	ug/g	21-JUN-21	0.088	0.11
alpha-Endosulfan	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
beta-Endosulfan	<0.0060	DLM	0.0060	ug/g	21-JUN-21		
Endosulfan Sulfate	<0.010	DLM	0.010	ug/g	21-JUN-21		
Endosulfan (Total)	<0.0085		0.0085	ug/g	21-JUN-21	0.3	0.38
Endrin	<0.010	DLM	0.010	ug/g	21-JUN-21	0.04	0.04
Endrin Aldehyde	<0.010	DLM	0.010	ug/g	21-JUN-21		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-1	MW04-21 2-3									
Sampled By:	CLIENT on 07-JUN-21 @ 12:53									
Matrix:	SOIL									
Organochlorine Pesticides										
	Heptachlor	<0.0040	DLM	0.0040	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.0040	DLM	0.0040	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.010	DLM	0.010	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.010	DLM	0.010	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.010	DLM	0.010	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.030	DLM	0.030	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.010	DLM	0.010	ug/g	21-JUN-21				
	Trans-nonachlor	<0.010	DLM	0.010	ug/g	21-JUN-21				
	Oxychlordane	<0.0060	DLM	0.0060	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.010	DLM	0.010	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	N.A	SDO:RNA	50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	N.A	SDO:RNA	50-150	%	21-JUN-21				
L2598394-2	MW04-21 7-8									
Sampled By:	CLIENT on 07-JUN-21 @ 13:17									
Matrix:	SOIL									
Physical Tests										
	Conductivity	0.626		0.0040	mS/cm	17-JUN-21	1.4	1.4		
	Grain Size Curve	SEE ATTACHED			No Unit	18-JUN-21				
	% Moisture	22.4		0.25	%	18-JUN-21				
	pH	7.63		0.10	pH units	21-JUN-21				
Particle Size										
	Gravel (4.75mm - 3in.)	20.2		1.0	%	18-JUN-21				
	Medium Sand (0.425mm - 2.0mm)	20.8		1.0	%	18-JUN-21				
	Coarse Sand (2.0mm - 4.75mm)	17.2		1.0	%	18-JUN-21				
	Fine Sand (0.075mm - 0.425mm)	10.9		1.0	%	18-JUN-21				
	Silt (0.002mm - 0.075mm)	17.4		1.0	%	18-JUN-21				
	Silt (0.005mm - 0.075mm)	14.8		1.0	%	18-JUN-21				
	Clay (<0.002mm)	13.6		1.0	%	18-JUN-21				
	Clay (<0.005mm)	16.2		1.0	%	18-JUN-21				
Cyanides										
	Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	22-JUN-21	0.051	0.051		
Saturated Paste Extractables										
	SAR	2.85		0.10	SAR	17-JUN-21	12	12		
	Calcium (Ca)	30.0		0.50	mg/L	17-JUN-21				
	Magnesium (Mg)	13.5		0.50	mg/L	17-JUN-21				
	Sodium (Na)	74.9		0.50	mg/L	17-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	17-JUN-21	40	50		
	Arsenic (As)	4.2		1.0	ug/g	17-JUN-21	18	18		
	Barium (Ba)	207		1.0	ug/g	17-JUN-21	670	670		
	Beryllium (Be)	0.61		0.50	ug/g	17-JUN-21	8	10		
	Boron (B)	6.2		5.0	ug/g	17-JUN-21	120	120		
	Boron (B), Hot Water Ext.	<0.10		0.10	ug/g	17-JUN-21	2	2		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-2 MW04-21 7-8							
Sampled By: CLIENT on 07-JUN-21 @ 13:17							
Matrix: SOIL							
Metals							
Cadmium (Cd)	<0.50		0.50	ug/g	17-JUN-21	1.9	1.9
Chromium (Cr)	42.7		1.0	ug/g	17-JUN-21	160	160
Cobalt (Co)	12.5		1.0	ug/g	17-JUN-21	80	100
Copper (Cu)	26.3		1.0	ug/g	17-JUN-21	230	300
Lead (Pb)	6.9		1.0	ug/g	17-JUN-21	120	120
Mercury (Hg)	0.0065		0.0050	ug/g	17-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	17-JUN-21	40	40
Nickel (Ni)	25.8		1.0	ug/g	17-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	17-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	17-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	17-JUN-21	3.3	3.3
Uranium (U)	<1.0		1.0	ug/g	17-JUN-21	33	33
Vanadium (V)	65.1		1.0	ug/g	17-JUN-21	86	86
Zinc (Zn)	66.2		5.0	ug/g	17-JUN-21	340	340
Speciated Metals							
Chromium, Hexavalent	0.56		0.20	ug/g	22-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	21-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	21-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	21-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	21-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	21-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	21-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	21-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	21-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	1.2	1.7
1,3-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	9.6	12
1,4-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	0.2	0.57
Dichlorodifluoromethane	<0.050		0.050	ug/g	21-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	21-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	21-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	21-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	21-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	21-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	21-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	21-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	21-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	21-JUN-21	31	210

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-2	MW04-21 7-8									
Sampled By:	CLIENT on 07-JUN-21 @ 13:17									
Matrix:	SOIL									
Volatile Organic Compounds										
	MTBE	<0.050		0.050	ug/g	21-JUN-21	1.6	2.3		
	Styrene	<0.050		0.050	ug/g	21-JUN-21	34	43		
	1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	21-JUN-21	0.087	0.11		
	1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.094		
	Tetrachloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.9	2.5		
	Toluene	<0.080		0.080	ug/g	21-JUN-21	6.4	9		
	1,1,1-Trichloroethane	<0.050		0.050	ug/g	21-JUN-21	6.1	12		
	1,1,2-Trichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.11		
	Trichloroethylene	<0.010		0.010	ug/g	21-JUN-21	0.55	0.61		
	Trichlorofluoromethane	<0.050		0.050	ug/g	21-JUN-21	4	5.8		
	Vinyl chloride	<0.020		0.020	ug/g	21-JUN-21	0.032	0.25		
	o-Xylene	<0.020		0.020	ug/g	21-JUN-21				
	m+p-Xylenes	<0.030		0.030	ug/g	21-JUN-21				
	Xylenes (Total)	<0.050		0.050	ug/g	21-JUN-21	26	30		
	Surrogate: 4-Bromofluorobenzene	79.9		50-140	%	21-JUN-21				
	Surrogate: 1,4-Difluorobenzene	87.1		50-140	%	21-JUN-21				
Hydrocarbons										
	F1 (C6-C10)	<5.0		5.0	ug/g	21-JUN-21	55	65		
	F1-BTEX	<5.0		5.0	ug/g	23-JUN-21	55	65		
	F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250		
	F2-Naphth	<10		10	ug/g	23-JUN-21				
	F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500		
	F3-PAH	<50		50	ug/g	23-JUN-21				
	F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600		
	Total Hydrocarbons (C6-C50)	<72		72	ug/g	23-JUN-21				
	Chrom. to baseline at nC50	YES			No Unit	22-JUN-21				
	Surrogate: 2-Bromobenzotrifluoride	83.8		60-140	%	22-JUN-21				
	Surrogate: 3,4-Dichlorotoluene	78.0		60-140	%	21-JUN-21				
Polycyclic Aromatic Hydrocarbons										
	Acenaphthene	<0.050		0.050	ug/g	23-JUN-21	21	29		
	Acenaphthylene	<0.050		0.050	ug/g	23-JUN-21	0.15	0.17		
	Anthracene	<0.050		0.050	ug/g	23-JUN-21	0.67	0.74		
	Benzo(a)anthracene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96		
	Benzo(a)pyrene	<0.050		0.050	ug/g	23-JUN-21	0.3	0.3		
	Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96		
	Benzo(g,h,i)perylene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6		
	Benzo(k)fluoranthene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96		
	Chrysene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6		
	Dibenz(a,h)anthracene	<0.050		0.050	ug/g	23-JUN-21	0.1	0.1		
	Fluoranthene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6		
	Fluorene	<0.050		0.050	ug/g	23-JUN-21	62	69		
	Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	23-JUN-21	0.76	0.95		
	1+2-Methylnaphthalenes	<0.042		0.042	ug/g	23-JUN-21	30	42		
	1-Methylnaphthalene	<0.030		0.030	ug/g	23-JUN-21	30	42		
	2-Methylnaphthalene	<0.030		0.030	ug/g	23-JUN-21	30	42		
	Naphthalene	<0.013		0.013	ug/g	23-JUN-21	9.6	28		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-2	MW04-21 7-8									
Sampled By:	CLIENT on 07-JUN-21 @ 13:17									
Matrix:	SOIL									
Polycyclic Aromatic Hydrocarbons										
	Phenanthrene	<0.046		0.046	ug/g	23-JUN-21	12	16		
	Pyrene	<0.050		0.050	ug/g	23-JUN-21	96	96		
	Surrogate: 2-Fluorobiphenyl	90.8		50-140	%	23-JUN-21				
	Surrogate: d14-Terphenyl	95.3		50-140	%	23-JUN-21				
Organochlorine Pesticides										
	Aldrin	<0.0020	DLM	0.0020	ug/g	25-JUN-21	0.088	0.11		
	alpha-BHC	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	beta-BHC	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	Lindane	<0.0020	DLM	0.0020	ug/g	25-JUN-21	0.056	0.063		
	delta-BHC	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	a-chlordane	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	Chlordane (Total)	<0.0042		0.0042	ug/g	25-JUN-21	0.05	0.05		
	g-chlordane	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	o,p-DDD	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	pp-DDD	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	Total DDD	<0.0042		0.0042	ug/g	25-JUN-21	4.6	4.6		
	o,p-DDE	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	pp-DDE	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	Total DDE	<0.0042		0.0042	ug/g	25-JUN-21	0.52	0.65		
	op-DDT	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	pp-DDT	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	Total DDT	<0.0042		0.0042	ug/g	25-JUN-21	1.4	1.4		
	Dieldrin	<0.0020	DLM	0.0020	ug/g	25-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	beta-Endosulfan	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	Endosulfan Sulfate	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	Endosulfan (Total)	<0.0042		0.0042	ug/g	25-JUN-21	0.3	0.38		
	Endrin	<0.0050	DLM	0.0050	ug/g	25-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	Heptachlor	<0.0020	DLM	0.0020	ug/g	25-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.0020	DLM	0.0020	ug/g	25-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.0050	DLM	0.0050	ug/g	25-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.0050	DLM	0.0050	ug/g	25-JUN-21	0.031	0.095		
	Hexachloroethane	<0.0050	DLM	0.0050	ug/g	25-JUN-21	0.21	0.43		
	Methoxychlor	<0.0050	DLM	0.0050	ug/g	25-JUN-21	1.6	1.6		
	Mirex	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	Trans-nonachlor	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	Oxychlordane	<0.0030	DLM	0.0030	ug/g	25-JUN-21				
	Pentachloronitrobenzene	<0.0050	DLM	0.0050	ug/g	25-JUN-21				
	Surrogate: Decachlorobiphenyl	92.9		50-150	%	25-JUN-21				
	Surrogate: Tetrachloro-m-xylene	86.0		50-150	%	25-JUN-21				
L2598394-3	BH05-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 10:40									
Matrix:	SOIL						#1	#2		
Physical Tests										

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-3 BH05-21 0-2 Sampled By: CLIENT on 07-JUN-21 @ 10:40 Matrix: SOIL							
Physical Tests							
Conductivity	0.0661		0.0040	mS/cm	16-JUN-21	1.4	1.4
% Moisture	24.4		0.25	%	15-JUN-21		
pH	6.32		0.10	pH units	14-JUN-21		
Cyanides							
Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	16-JUN-21	0.051	0.051
Saturated Paste Extractables							
SAR	1.35		0.10	SAR	16-JUN-21	12	12
Calcium (Ca)	1.62		0.50	mg/L	16-JUN-21		
Magnesium (Mg)	1.29		0.50	mg/L	16-JUN-21		
Sodium (Na)	9.48		0.50	mg/L	16-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50
Arsenic (As)	3.6		1.0	ug/g	16-JUN-21	18	18
Barium (Ba)	327		1.0	ug/g	16-JUN-21	670	670
Beryllium (Be)	0.96		0.50	ug/g	16-JUN-21	8	10
Boron (B)	8.4		5.0	ug/g	16-JUN-21	120	120
Boron (B), Hot Water Ext.	0.16		0.10	ug/g	16-JUN-21	2	2
Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
Chromium (Cr)	111		1.0	ug/g	16-JUN-21	160	160
Cobalt (Co)	21.2		1.0	ug/g	16-JUN-21	80	100
Copper (Cu)	34.6		1.0	ug/g	16-JUN-21	230	300
Lead (Pb)	8.6		1.0	ug/g	16-JUN-21	120	120
Mercury (Hg)	0.0176		0.0050	ug/g	16-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
Nickel (Ni)	56.4		1.0	ug/g	16-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
Uranium (U)	1.2		1.0	ug/g	16-JUN-21	33	33
Vanadium (V)	91.7		1.0	ug/g	16-JUN-21	*86	*86
Zinc (Zn)	102		5.0	ug/g	16-JUN-21	340	340
Speciated Metals							
Chromium, Hexavalent	1.50		0.20	ug/g	16-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	16-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	16-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	16-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	16-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	16-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	16-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	16-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	16-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	1.2	1.7

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-3 BH05-21 0-2							
Sampled By: CLIENT on 07-JUN-21 @ 10:40							
Matrix: SOIL							
Volatile Organic Compounds							
1,3-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	9.6	12
1,4-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	0.2	0.57
Dichlorodifluoromethane	<0.050		0.050	ug/g	16-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	16-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	16-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	16-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	16-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	16-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	16-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	16-JUN-21	31	210
MTBE	<0.050		0.050	ug/g	16-JUN-21	1.6	2.3
Styrene	<0.050		0.050	ug/g	16-JUN-21	34	43
1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.087	0.11
1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.094
Tetrachloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
Toluene	<0.080		0.080	ug/g	16-JUN-21	6.4	9
1,1,1-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	6.1	12
1,1,2-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.11
Trichloroethylene	<0.010		0.010	ug/g	16-JUN-21	0.55	0.61
Trichlorofluoromethane	<0.050		0.050	ug/g	16-JUN-21	4	5.8
Vinyl chloride	<0.020		0.020	ug/g	16-JUN-21	0.032	0.25
o-Xylene	<0.020		0.020	ug/g	16-JUN-21		
m+p-Xylenes	<0.030		0.030	ug/g	16-JUN-21		
Xylenes (Total)	<0.050		0.050	ug/g	16-JUN-21	26	30
Surrogate: 4-Bromofluorobenzene	108.1		50-140	%	16-JUN-21		
Surrogate: 1,4-Difluorobenzene	114.3		50-140	%	16-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<5.0		5.0	ug/g	16-JUN-21	55	65
F1-BTEX	<5.0		5.0	ug/g	22-JUN-21	55	65
F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
F2-Naphth	<10		10	ug/g	22-JUN-21		
F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500
F3-PAH	<50		50	ug/g	22-JUN-21		
F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600
Total Hydrocarbons (C6-C50)	<72		72	ug/g	22-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	22-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	79.6		60-140	%	22-JUN-21		
Surrogate: 3,4-Dichlorotoluene	77.6		60-140	%	16-JUN-21		
Polycyclic Aromatic Hydrocarbons							

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-3 BH05-21 0-2							
Sampled By: CLIENT on 07-JUN-21 @ 10:40							
Matrix: SOIL							
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.050		0.050	ug/g	16-JUN-21	21	29
Acenaphthylene	<0.050		0.050	ug/g	16-JUN-21	0.15	0.17
Anthracene	<0.050		0.050	ug/g	16-JUN-21	0.67	0.74
Benzo(a)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(a)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.3	0.3
Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(g,h,i)perylene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Benzo(k)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Chrysene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Dibenz(a,h)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.1	0.1
Fluoranthene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Fluorene	<0.050		0.050	ug/g	16-JUN-21	62	69
Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.76	0.95
1+2-Methylnaphthalenes	<0.042		0.042	ug/g	16-JUN-21	30	42
1-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
2-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
Naphthalene	<0.013		0.013	ug/g	16-JUN-21	9.6	28
Phenanthrene	<0.046		0.046	ug/g	16-JUN-21	12	16
Pyrene	<0.050		0.050	ug/g	16-JUN-21	96	96
Surrogate: 2-Fluorobiphenyl	93.4		50-140	%	16-JUN-21		
Surrogate: d14-Terphenyl	90.4		50-140	%	16-JUN-21		
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21		
pp-DDT	<0.00120	DLM	0.0012	ug/g	21-JUN-21		
Total DDT	<0.0013		0.0013	ug/g	21-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		

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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-3	BH05-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 10:40									
Matrix:	SOIL									
Organochlorine Pesticides										
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	128.2		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	97.4		50-150	%	21-JUN-21				
L2598394-4	BH05-21 4-5									
Sampled By:	CLIENT on 07-JUN-21 @ 10:45									
Matrix:	SOIL						#1	#2		
Physical Tests										
	Conductivity	0.0911		0.0040	mS/cm	17-JUN-21	1.4	1.4		
	Grain Size Curve	SEE ATTACHED			No Unit	18-JUN-21				
	% Moisture	24.1		0.25	%	18-JUN-21				
	pH	7.15		0.10	pH units	21-JUN-21				
Particle Size										
	Gravel (4.75mm - 3in.)	<1.0		1.0	%	18-JUN-21				
	Medium Sand (0.425mm - 2.0mm)	1.2		1.0	%	18-JUN-21				
	Coarse Sand (2.0mm - 4.75mm)	<1.0		1.0	%	18-JUN-21				
	Fine Sand (0.075mm - 0.425mm)	7.5		1.0	%	18-JUN-21				
	Silt (0.002mm - 0.075mm)	49.7		1.0	%	18-JUN-21				
	Silt (0.005mm - 0.075mm)	42.3		1.0	%	18-JUN-21				
	Clay (<0.002mm)	40.7		1.0	%	18-JUN-21				
	Clay (<0.005mm)	48.2		1.0	%	18-JUN-21				
Cyanides										
	Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	22-JUN-21	0.051	0.051		
Saturated Paste Extractables										
	SAR	0.85		0.10	SAR	17-JUN-21	12	12		
	Calcium (Ca)	4.07		0.50	mg/L	17-JUN-21				
	Magnesium (Mg)	2.79		0.50	mg/L	17-JUN-21				
	Sodium (Na)	9.07		0.50	mg/L	17-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	17-JUN-21	40	50		
	Arsenic (As)	4.3		1.0	ug/g	17-JUN-21	18	18		
	Barium (Ba)	287		1.0	ug/g	17-JUN-21	670	670		
	Beryllium (Be)	0.88		0.50	ug/g	17-JUN-21	8	10		
	Boron (B)	7.9		5.0	ug/g	17-JUN-21	120	120		
	Boron (B), Hot Water Ext.	<0.10		0.10	ug/g	17-JUN-21	2	2		
	Cadmium (Cd)	<0.50		0.50	ug/g	17-JUN-21	1.9	1.9		

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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-4 BH05-21 4-5 Sampled By: CLIENT on 07-JUN-21 @ 10:45 Matrix: SOIL							
Metals							
Chromium (Cr)	55.7		1.0	ug/g	17-JUN-21	160	160
Cobalt (Co)	18.0		1.0	ug/g	17-JUN-21	80	100
Copper (Cu)	31.6		1.0	ug/g	17-JUN-21	230	300
Lead (Pb)	7.4		1.0	ug/g	17-JUN-21	120	120
Mercury (Hg)	0.0081		0.0050	ug/g	17-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	17-JUN-21	40	40
Nickel (Ni)	34.4		1.0	ug/g	17-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	17-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	17-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	17-JUN-21	3.3	3.3
Uranium (U)	<1.0		1.0	ug/g	17-JUN-21	33	33
Vanadium (V)	80.1		1.0	ug/g	17-JUN-21	86	86
Zinc (Zn)	87.0		5.0	ug/g	17-JUN-21	340	340
Speciated Metals							
Chromium, Hexavalent	0.51		0.20	ug/g	22-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	21-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	21-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	21-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	21-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	21-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	21-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	21-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	21-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	1.2	1.7
1,3-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	9.6	12
1,4-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	0.2	0.57
Dichlorodifluoromethane	<0.050		0.050	ug/g	21-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	21-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	21-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	21-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	21-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	21-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	21-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	21-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	21-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	21-JUN-21	31	210
MTBE	<0.050		0.050	ug/g	21-JUN-21	1.6	2.3

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-4 BH05-21 4-5 Sampled By: CLIENT on 07-JUN-21 @ 10:45 Matrix: SOIL							
Volatile Organic Compounds							
Styrene	<0.050		0.050	ug/g	21-JUN-21	34	43
1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	21-JUN-21	0.087	0.11
1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.094
Tetrachloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.9	2.5
Toluene	<0.080		0.080	ug/g	21-JUN-21	6.4	9
1,1,1-Trichloroethane	<0.050		0.050	ug/g	21-JUN-21	6.1	12
1,1,2-Trichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.11
Trichloroethylene	<0.010		0.010	ug/g	21-JUN-21	0.55	0.61
Trichlorofluoromethane	<0.050		0.050	ug/g	21-JUN-21	4	5.8
Vinyl chloride	<0.020		0.020	ug/g	21-JUN-21	0.032	0.25
o-Xylene	<0.020		0.020	ug/g	21-JUN-21		
m+p-Xylenes	<0.030		0.030	ug/g	21-JUN-21		
Xylenes (Total)	<0.050		0.050	ug/g	21-JUN-21	26	30
Surrogate: 4-Bromofluorobenzene	91.0		50-140	%	21-JUN-21		
Surrogate: 1,4-Difluorobenzene	99.1		50-140	%	21-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<5.0		5.0	ug/g	21-JUN-21	55	65
F1-BTEX	<5.0		5.0	ug/g	23-JUN-21	55	65
F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
F2-Naphth	<10		10	ug/g	23-JUN-21		
F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500
F3-PAH	<50		50	ug/g	23-JUN-21		
F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600
Total Hydrocarbons (C6-C50)	<72		72	ug/g	23-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	22-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	76.4		60-140	%	22-JUN-21		
Surrogate: 3,4-Dichlorotoluene	92.8		60-140	%	21-JUN-21		
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.050		0.050	ug/g	23-JUN-21	21	29
Acenaphthylene	<0.050		0.050	ug/g	23-JUN-21	0.15	0.17
Anthracene	<0.050		0.050	ug/g	23-JUN-21	0.67	0.74
Benzo(a)anthracene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96
Benzo(a)pyrene	<0.050		0.050	ug/g	23-JUN-21	0.3	0.3
Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96
Benzo(g,h,i)perylene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6
Benzo(k)fluoranthene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96
Chrysene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6
Dibenz(a,h)anthracene	<0.050		0.050	ug/g	23-JUN-21	0.1	0.1
Fluoranthene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6
Fluorene	<0.050		0.050	ug/g	23-JUN-21	62	69
Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	23-JUN-21	0.76	0.95
1+2-Methylnaphthalenes	<0.042		0.042	ug/g	23-JUN-21	30	42
1-Methylnaphthalene	<0.030		0.030	ug/g	23-JUN-21	30	42
2-Methylnaphthalene	<0.030		0.030	ug/g	23-JUN-21	30	42
Naphthalene	<0.013		0.013	ug/g	23-JUN-21	9.6	28
Phenanthrene	<0.046		0.046	ug/g	23-JUN-21	12	16

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits			
L2598394-4	BH05-21 4-5									
Sampled By:	CLIENT on 07-JUN-21 @ 10:45									
Matrix:	SOIL						#1	#2		
Polycyclic Aromatic Hydrocarbons										
	Pyrene	<0.050		0.050	ug/g	23-JUN-21	96	96		
	Surrogate: 2-Fluorobiphenyl	92.6		50-140	%	23-JUN-21				
	Surrogate: d14-Terphenyl	97.4		50-140	%	23-JUN-21				
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	25-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	25-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	25-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	25-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	25-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	25-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	25-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	25-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	25-JUN-21				
	pp-DDD	<0.00030		0.00030	ug/g	25-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	25-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	25-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	25-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	25-JUN-21	0.52	0.65		
	op-DDT	<0.00030		0.00030	ug/g	25-JUN-21				
	pp-DDT	<0.00030		0.00030	ug/g	25-JUN-21				
	Total DDT	<0.00042		0.00042	ug/g	25-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	25-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	25-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	25-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	25-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	25-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	25-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	25-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	25-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	25-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	25-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	25-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	25-JUN-21	0.21	0.43		
	Methoxychlor	<0.00050		0.00050	ug/g	25-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	25-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	25-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	25-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	25-JUN-21				
	Surrogate: Decachlorobiphenyl	124.2		50-150	%	25-JUN-21				
	Surrogate: Tetrachloro-m-xylene	88.4		50-150	%	25-JUN-21				
L2598394-5	BH06-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 11:36									
Matrix:	SOIL						#1	#2		
Physical Tests										
	Conductivity	0.215		0.0040	mS/cm	16-JUN-21	1.4	1.4		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-5	BH06-21 0-2							
Sampled By:	CLIENT on 07-JUN-21 @ 11:36							
Matrix:	SOIL							
Physical Tests								
	% Moisture	22.2		0.25	%	15-JUN-21		
	pH	6.55		0.10	pH units	14-JUN-21		
Cyanides								
	Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	16-JUN-21	0.051	0.051
Saturated Paste Extractables								
	SAR	4.69		0.10	SAR	16-JUN-21	12	12
	Calcium (Ca)	2.84		0.50	mg/L	16-JUN-21		
	Magnesium (Mg)	1.13		0.50	mg/L	16-JUN-21		
	Sodium (Na)	36.9		0.50	mg/L	16-JUN-21		
Metals								
	Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50
	Arsenic (As)	3.4		1.0	ug/g	16-JUN-21	18	18
	Barium (Ba)	315		1.0	ug/g	16-JUN-21	670	670
	Beryllium (Be)	0.93		0.50	ug/g	16-JUN-21	8	10
	Boron (B)	7.1		5.0	ug/g	16-JUN-21	120	120
	Boron (B), Hot Water Ext.	0.20		0.10	ug/g	16-JUN-21	2	2
	Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
	Chromium (Cr)	104		1.0	ug/g	16-JUN-21	160	160
	Cobalt (Co)	20.3		1.0	ug/g	16-JUN-21	80	100
	Copper (Cu)	33.4		1.0	ug/g	16-JUN-21	230	300
	Lead (Pb)	8.7		1.0	ug/g	16-JUN-21	120	120
	Mercury (Hg)	0.0192		0.0050	ug/g	16-JUN-21	3.9	20
	Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
	Nickel (Ni)	50.4		1.0	ug/g	16-JUN-21	270	340
	Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
	Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
	Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
	Uranium (U)	1.2		1.0	ug/g	16-JUN-21	33	33
	Vanadium (V)	86.6		1.0	ug/g	16-JUN-21	*86	*86
	Zinc (Zn)	108		5.0	ug/g	16-JUN-21	340	340
Speciated Metals								
	Chromium, Hexavalent	1.24		0.20	ug/g	16-JUN-21	8	10
Volatile Organic Compounds								
	Acetone	<0.50		0.50	ug/g	16-JUN-21	16	28
	Benzene	<0.0068		0.0068	ug/g	16-JUN-21	0.32	0.4
	Bromodichloromethane	<0.050		0.050	ug/g	16-JUN-21	1.5	1.9
	Bromoform	<0.050		0.050	ug/g	16-JUN-21	0.61	1.7
	Bromomethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
	Carbon tetrachloride	<0.050		0.050	ug/g	16-JUN-21	0.21	0.71
	Chlorobenzene	<0.050		0.050	ug/g	16-JUN-21	2.4	2.7
	Dibromochloromethane	<0.050		0.050	ug/g	16-JUN-21	2.3	2.9
	Chloroform	<0.050		0.050	ug/g	16-JUN-21	0.47	0.18
	1,2-Dibromoethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
	1,2-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	1.2	1.7
	1,3-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	9.6	12

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-5 BH06-21 0-2 Sampled By: CLIENT on 07-JUN-21 @ 11:36 Matrix: SOIL							
Volatile Organic Compounds							
1,4-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	0.2	0.57
Dichlorodifluoromethane	<0.050		0.050	ug/g	16-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	16-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	16-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	16-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	16-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	16-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	16-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	16-JUN-21	31	210
MTBE	<0.050		0.050	ug/g	16-JUN-21	1.6	2.3
Styrene	<0.050		0.050	ug/g	16-JUN-21	34	43
1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.087	0.11
1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.094
Tetrachloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
Toluene	<0.080		0.080	ug/g	16-JUN-21	6.4	9
1,1,1-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	6.1	12
1,1,2-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.11
Trichloroethylene	<0.010		0.010	ug/g	16-JUN-21	0.55	0.61
Trichlorofluoromethane	<0.050		0.050	ug/g	16-JUN-21	4	5.8
Vinyl chloride	<0.020		0.020	ug/g	16-JUN-21	0.032	0.25
o-Xylene	<0.020		0.020	ug/g	16-JUN-21		
m+p-Xylenes	<0.030		0.030	ug/g	16-JUN-21		
Xylenes (Total)	<0.050		0.050	ug/g	16-JUN-21	26	30
Surrogate: 4-Bromofluorobenzene	107.4		50-140	%	16-JUN-21		
Surrogate: 1,4-Difluorobenzene	114.3		50-140	%	16-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<5.0		5.0	ug/g	16-JUN-21	55	65
F1-BTEX	<5.0		5.0	ug/g	22-JUN-21	55	65
F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
F2-Naphth	<10		10	ug/g	22-JUN-21		
F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500
F3-PAH	<50		50	ug/g	22-JUN-21		
F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600
Total Hydrocarbons (C6-C50)	<72		72	ug/g	22-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	22-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	87.7		60-140	%	22-JUN-21		
Surrogate: 3,4-Dichlorotoluene	79.2		60-140	%	16-JUN-21		
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.050		0.050	ug/g	16-JUN-21	21	29

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-5 BH06-21 0-2							
Sampled By: CLIENT on 07-JUN-21 @ 11:36							
Matrix: SOIL							
Polycyclic Aromatic Hydrocarbons							
Acenaphthylene	<0.050		0.050	ug/g	16-JUN-21	0.15	0.17
Anthracene	<0.050		0.050	ug/g	16-JUN-21	0.67	0.74
Benzo(a)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(a)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.3	0.3
Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(g,h,i)perylene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Benzo(k)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Chrysene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Dibenz(a,h)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.1	0.1
Fluoranthene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Fluorene	<0.050		0.050	ug/g	16-JUN-21	62	69
Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.76	0.95
1+2-Methylnaphthalenes	<0.042		0.042	ug/g	16-JUN-21	30	42
1-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
2-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
Naphthalene	<0.013		0.013	ug/g	16-JUN-21	9.6	28
Phenanthrene	<0.046		0.046	ug/g	16-JUN-21	12	16
Pyrene	<0.050		0.050	ug/g	16-JUN-21	96	96
Surrogate: 2-Fluorobiphenyl	94.3		50-140	%	16-JUN-21		
Surrogate: d14-Terphenyl	92.3		50-140	%	16-JUN-21		
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21		
pp-DDT	<0.00090	DLM	0.00090	ug/g	21-JUN-21		
Total DDT	<0.0011		0.0011	ug/g	21-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		
Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-5	BH06-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 11:36									
Matrix:	SOIL									
Organochlorine Pesticides										
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	115.1		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	90.2		50-150	%	21-JUN-21				
L2598394-6	BH06-21 7-8									
Sampled By:	CLIENT on 07-JUN-21 @ 11:52									
Matrix:	SOIL									
Physical Tests										
	Conductivity	0.190		0.0040	mS/cm	17-JUN-21	1.4	1.4		
	Grain Size Curve	SEE ATTACHED			No Unit	18-JUN-21				
	% Moisture	22.3		0.25	%	18-JUN-21				
	pH	7.74		0.10	pH units	21-JUN-21				
Particle Size										
	Gravel (4.75mm - 3in.)	<1.0		1.0	%	18-JUN-21				
	Medium Sand (0.425mm - 2.0mm)	<1.0		1.0	%	18-JUN-21				
	Coarse Sand (2.0mm - 4.75mm)	<1.0		1.0	%	18-JUN-21				
	Fine Sand (0.075mm - 0.425mm)	15.1		1.0	%	18-JUN-21				
	Silt (0.002mm - 0.075mm)	53.6		1.0	%	18-JUN-21				
	Silt (0.005mm - 0.075mm)	48.6		1.0	%	18-JUN-21				
	Clay (<0.002mm)	31.2		1.0	%	18-JUN-21				
	Clay (<0.005mm)	36.3		1.0	%	18-JUN-21				
Cyanides										
	Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	22-JUN-21	0.051	0.051		
Saturated Paste Extractables										
	SAR	0.75		0.10	SAR	17-JUN-21	12	12		
	Calcium (Ca)	15.6		0.50	mg/L	17-JUN-21				
	Magnesium (Mg)	5.72		0.50	mg/L	17-JUN-21				
	Sodium (Na)	13.7		0.50	mg/L	17-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	17-JUN-21	40	50		
	Arsenic (As)	3.9		1.0	ug/g	17-JUN-21	18	18		
	Barium (Ba)	184		1.0	ug/g	17-JUN-21	670	670		
	Beryllium (Be)	0.56		0.50	ug/g	17-JUN-21	8	10		
	Boron (B)	6.7		5.0	ug/g	17-JUN-21	120	120		
	Boron (B), Hot Water Ext.	<0.10		0.10	ug/g	17-JUN-21	2	2		
	Cadmium (Cd)	<0.50		0.50	ug/g	17-JUN-21	1.9	1.9		
	Chromium (Cr)	35.7		1.0	ug/g	17-JUN-21	160	160		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-6 BH06-21 7-8							
Sampled By: CLIENT on 07-JUN-21 @ 11:52							
Matrix: SOIL							
Metals							
Cobalt (Co)	10.8		1.0	ug/g	17-JUN-21	80	100
Copper (Cu)	22.3		1.0	ug/g	17-JUN-21	230	300
Lead (Pb)	5.4		1.0	ug/g	17-JUN-21	120	120
Mercury (Hg)	<0.0050		0.0050	ug/g	17-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	17-JUN-21	40	40
Nickel (Ni)	21.4		1.0	ug/g	17-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	17-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	17-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	17-JUN-21	3.3	3.3
Uranium (U)	<1.0		1.0	ug/g	17-JUN-21	33	33
Vanadium (V)	60.9		1.0	ug/g	17-JUN-21	86	86
Zinc (Zn)	56.9		5.0	ug/g	17-JUN-21	340	340
Speciated Metals							
Chromium, Hexavalent	0.30		0.20	ug/g	22-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	21-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	21-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	21-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	21-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	21-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	21-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	21-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	21-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	1.2	1.7
1,3-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	9.6	12
1,4-Dichlorobenzene	<0.050		0.050	ug/g	21-JUN-21	0.2	0.57
Dichlorodifluoromethane	<0.050		0.050	ug/g	21-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	21-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	21-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	21-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	21-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	21-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	21-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	21-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	21-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	21-JUN-21	31	210
MTBE	<0.050		0.050	ug/g	21-JUN-21	1.6	2.3
Styrene	<0.050		0.050	ug/g	21-JUN-21	34	43

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2
L2598394-6 BH06-21 7-8							
Sampled By: CLIENT on 07-JUN-21 @ 11:52							
Matrix: SOIL							
Volatile Organic Compounds							
1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	21-JUN-21	0.087	0.11
1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.094
Tetrachloroethylene	<0.050		0.050	ug/g	21-JUN-21	1.9	2.5
Toluene	<0.080		0.080	ug/g	21-JUN-21	6.4	9
1,1,1-Trichloroethane	<0.050		0.050	ug/g	21-JUN-21	6.1	12
1,1,2-Trichloroethane	<0.050		0.050	ug/g	21-JUN-21	0.05	0.11
Trichloroethylene	<0.010		0.010	ug/g	21-JUN-21	0.55	0.61
Trichlorofluoromethane	<0.050		0.050	ug/g	21-JUN-21	4	5.8
Vinyl chloride	<0.020		0.020	ug/g	21-JUN-21	0.032	0.25
o-Xylene	<0.020		0.020	ug/g	21-JUN-21		
m+p-Xylenes	<0.030		0.030	ug/g	21-JUN-21		
Xylenes (Total)	<0.050		0.050	ug/g	21-JUN-21	26	30
Surrogate: 4-Bromofluorobenzene	89.8		50-140	%	21-JUN-21		
Surrogate: 1,4-Difluorobenzene	98.6		50-140	%	21-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<5.0		5.0	ug/g	21-JUN-21	55	65
F1-BTEX	<5.0		5.0	ug/g	23-JUN-21	55	65
F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
F2-Naphth	<10		10	ug/g	23-JUN-21		
F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500
F3-PAH	<50		50	ug/g	23-JUN-21		
F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600
Total Hydrocarbons (C6-C50)	<72		72	ug/g	23-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	22-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	77.0		60-140	%	22-JUN-21		
Surrogate: 3,4-Dichlorotoluene	94.3		60-140	%	21-JUN-21		
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.050		0.050	ug/g	23-JUN-21	21	29
Acenaphthylene	<0.050		0.050	ug/g	23-JUN-21	0.15	0.17
Anthracene	<0.050		0.050	ug/g	23-JUN-21	0.67	0.74
Benzo(a)anthracene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96
Benzo(a)pyrene	<0.050		0.050	ug/g	23-JUN-21	0.3	0.3
Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96
Benzo(g,h,i)perylene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6
Benzo(k)fluoranthene	<0.050		0.050	ug/g	23-JUN-21	0.96	0.96
Chrysene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6
Dibenz(a,h)anthracene	<0.050		0.050	ug/g	23-JUN-21	0.1	0.1
Fluoranthene	<0.050		0.050	ug/g	23-JUN-21	9.6	9.6
Fluorene	<0.050		0.050	ug/g	23-JUN-21	62	69
Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	23-JUN-21	0.76	0.95
1+2-Methylnaphthalenes	<0.042		0.042	ug/g	23-JUN-21	30	42
1-Methylnaphthalene	<0.030		0.030	ug/g	23-JUN-21	30	42
2-Methylnaphthalene	<0.030		0.030	ug/g	23-JUN-21	30	42
Naphthalene	<0.013		0.013	ug/g	23-JUN-21	9.6	28
Phenanthrene	<0.046		0.046	ug/g	23-JUN-21	12	16
Pyrene	<0.050		0.050	ug/g	23-JUN-21	96	96

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-6	BH06-21 7-8									
Sampled By:	CLIENT on 07-JUN-21 @ 11:52									
Matrix:	SOIL									
Polycyclic Aromatic Hydrocarbons										
	Surrogate: 2-Fluorobiphenyl	92.9		50-140	%	23-JUN-21				
	Surrogate: d14-Terphenyl	97.0		50-140	%	23-JUN-21				
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	25-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	25-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	25-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	25-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	25-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	25-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	25-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	25-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	25-JUN-21				
	pp-DDD	<0.00030		0.00030	ug/g	25-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	25-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	25-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	25-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	25-JUN-21	0.52	0.65		
	op-DDT	<0.00030		0.00030	ug/g	25-JUN-21				
	pp-DDT	<0.00030		0.00030	ug/g	25-JUN-21				
	Total DDT	<0.00042		0.00042	ug/g	25-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	25-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	25-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	25-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	25-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	25-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	25-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	25-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	25-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	25-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	25-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	25-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	25-JUN-21	0.21	0.43		
	Methoxychlor	<0.00050		0.00050	ug/g	25-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	25-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	25-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	25-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	25-JUN-21				
	Surrogate: Decachlorobiphenyl	119.0		50-150	%	25-JUN-21				
	Surrogate: Tetrachloro-m-xylene	90.6		50-150	%	25-JUN-21				
L2598394-7	MW02-21 1-2									
Sampled By:	CLIENT on 08-JUN-21 @ 08:27									
Matrix:	SOIL									
Physical Tests										
	Conductivity	0.0898		0.0040	mS/cm	16-JUN-21	1.4	1.4		
	% Moisture	24.0		0.25	%	15-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-7 MW02-21 1-2							
Sampled By: CLIENT on 08-JUN-21 @ 08:27							
Matrix: SOIL							
Physical Tests							
pH	6.30		0.10	pH units	14-JUN-21		
Cyanides							
Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	16-JUN-21	0.051	0.051
Saturated Paste Extractables							
SAR	0.46		0.10	SAR	16-JUN-21	12	12
Calcium (Ca)	7.17		0.50	mg/L	16-JUN-21		
Magnesium (Mg)	3.70		0.50	mg/L	16-JUN-21		
Sodium (Na)	6.12		0.50	mg/L	16-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50
Arsenic (As)	3.6		1.0	ug/g	16-JUN-21	18	18
Barium (Ba)	275		1.0	ug/g	16-JUN-21	670	670
Beryllium (Be)	0.88		0.50	ug/g	16-JUN-21	8	10
Boron (B)	7.6		5.0	ug/g	16-JUN-21	120	120
Boron (B), Hot Water Ext.	0.26		0.10	ug/g	16-JUN-21	2	2
Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
Chromium (Cr)	91.3		1.0	ug/g	16-JUN-21	160	160
Cobalt (Co)	21.8		1.0	ug/g	16-JUN-21	80	100
Copper (Cu)	28.7		1.0	ug/g	16-JUN-21	230	300
Lead (Pb)	10.6		1.0	ug/g	16-JUN-21	120	120
Mercury (Hg)	0.0237		0.0050	ug/g	16-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
Nickel (Ni)	45.8		1.0	ug/g	16-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
Uranium (U)	1.3		1.0	ug/g	16-JUN-21	33	33
Vanadium (V)	82.7		1.0	ug/g	16-JUN-21	86	86
Zinc (Zn)	105		5.0	ug/g	16-JUN-21	340	340
Speciated Metals							
Chromium, Hexavalent	2.07		0.20	ug/g	16-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	16-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	16-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	16-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	16-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	16-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	16-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	16-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	16-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	1.2	1.7
1,3-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	9.6	12
1,4-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	0.2	0.57

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-7 MW02-21 1-2 Sampled By: CLIENT on 08-JUN-21 @ 08:27 Matrix: SOIL							
Volatile Organic Compounds							
Dichlorodifluoromethane	<0.050		0.050	ug/g	16-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	16-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	16-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	16-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	16-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	16-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	16-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	16-JUN-21	31	210
MTBE	<0.050		0.050	ug/g	16-JUN-21	1.6	2.3
Styrene	<0.050		0.050	ug/g	16-JUN-21	34	43
1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.087	0.11
1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.094
Tetrachloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
Toluene	<0.080		0.080	ug/g	16-JUN-21	6.4	9
1,1,1-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	6.1	12
1,1,2-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.11
Trichloroethylene	<0.010		0.010	ug/g	16-JUN-21	0.55	0.61
Trichlorofluoromethane	<0.050		0.050	ug/g	16-JUN-21	4	5.8
Vinyl chloride	<0.020		0.020	ug/g	16-JUN-21	0.032	0.25
o-Xylene	<0.020		0.020	ug/g	16-JUN-21		
m+p-Xylenes	<0.030		0.030	ug/g	16-JUN-21		
Xylenes (Total)	<0.050		0.050	ug/g	16-JUN-21	26	30
Surrogate: 4-Bromofluorobenzene	101.5		50-140	%	16-JUN-21		
Surrogate: 1,4-Difluorobenzene	109.5		50-140	%	16-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<5.0		5.0	ug/g	16-JUN-21	55	65
F1-BTEX	<5.0		5.0	ug/g	22-JUN-21	55	65
F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
F2-Naphth	<10		10	ug/g	22-JUN-21		
F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500
F3-PAH	<50		50	ug/g	22-JUN-21		
F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600
Total Hydrocarbons (C6-C50)	<72		72	ug/g	22-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	22-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	92.0		60-140	%	22-JUN-21		
Surrogate: 3,4-Dichlorotoluene	77.3		60-140	%	16-JUN-21		
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.050		0.050	ug/g	16-JUN-21	21	29
Acenaphthylene	<0.050		0.050	ug/g	16-JUN-21	0.15	0.17

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-7 MW02-21 1-2							
Sampled By: CLIENT on 08-JUN-21 @ 08:27							
Matrix: SOIL							
Polycyclic Aromatic Hydrocarbons							
Anthracene	<0.050		0.050	ug/g	16-JUN-21	0.67	0.74
Benzo(a)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(a)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.3	0.3
Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(g,h,i)perylene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Benzo(k)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Chrysene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Dibenz(a,h)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.1	0.1
Fluoranthene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Fluorene	<0.050		0.050	ug/g	16-JUN-21	62	69
Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.76	0.95
1+2-Methylnaphthalenes	<0.042		0.042	ug/g	16-JUN-21	30	42
1-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
2-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
Naphthalene	<0.013		0.013	ug/g	16-JUN-21	9.6	28
Phenanthrene	<0.046		0.046	ug/g	16-JUN-21	12	16
Pyrene	<0.050		0.050	ug/g	16-JUN-21	96	96
Surrogate: 2-Fluorobiphenyl	97.2		50-140	%	16-JUN-21		
Surrogate: d14-Terphenyl	95.0		50-140	%	16-JUN-21		
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21		
pp-DDT	<0.00290	DLM	0.0029	ug/g	21-JUN-21		
Total DDT	<0.0030		0.0030	ug/g	21-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		
Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19
Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-7 MW02-21 1-2 Sampled By: CLIENT on 08-JUN-21 @ 08:27 Matrix: SOIL							
Organochlorine Pesticides							
Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66
Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095
Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43
Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6
Mirex	<0.00050		0.00050	ug/g	21-JUN-21		
Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21		
Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21		
Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21		
Surrogate: Decachlorobiphenyl	118.8		50-150	%	21-JUN-21		
Surrogate: Tetrachloro-m-xylene	91.5		50-150	%	21-JUN-21		
L2598394-8 MW02-21 4-6 Sampled By: CLIENT on 08-JUN-21 @ 08:40 Matrix: SOIL						#1	#2
Physical Tests							
Conductivity	0.0569		0.0040	mS/cm	16-JUN-21	1.4	1.4
% Moisture	25.1		0.25	%	15-JUN-21		
pH	6.91		0.10	pH units	14-JUN-21		
Cyanides							
Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	16-JUN-21	0.051	0.051
Saturated Paste Extractables							
SAR	1.18		0.10	SAR	16-JUN-21	12	12
Calcium (Ca)	1.62		0.50	mg/L	16-JUN-21		
Magnesium (Mg)	0.90		0.50	mg/L	16-JUN-21		
Sodium (Na)	7.54		0.50	mg/L	16-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50
Arsenic (As)	4.5		1.0	ug/g	16-JUN-21	18	18
Barium (Ba)	204		1.0	ug/g	16-JUN-21	670	670
Beryllium (Be)	0.60		0.50	ug/g	16-JUN-21	8	10
Boron (B)	5.8		5.0	ug/g	16-JUN-21	120	120
Boron (B), Hot Water Ext.	<0.10		0.10	ug/g	16-JUN-21	2	2
Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
Chromium (Cr)	41.3		1.0	ug/g	16-JUN-21	160	160
Cobalt (Co)	12.7		1.0	ug/g	16-JUN-21	80	100
Copper (Cu)	28.1		1.0	ug/g	16-JUN-21	230	300
Lead (Pb)	6.0		1.0	ug/g	16-JUN-21	120	120
Mercury (Hg)	0.0068		0.0050	ug/g	16-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
Nickel (Ni)	26.0		1.0	ug/g	16-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
Uranium (U)	<1.0		1.0	ug/g	16-JUN-21	33	33
Vanadium (V)	67.6		1.0	ug/g	16-JUN-21	86	86
Zinc (Zn)	66.3		5.0	ug/g	16-JUN-21	340	340

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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-8 MW02-21 4-6							
Sampled By: CLIENT on 08-JUN-21 @ 08:40							
Matrix: SOIL							
Speciated Metals							
Chromium, Hexavalent	0.33		0.20	ug/g	16-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	16-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	16-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	16-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	16-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	16-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	16-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	16-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	16-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	1.2	1.7
1,3-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	9.6	12
1,4-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	0.2	0.57
Dichlorodifluoromethane	<0.050		0.050	ug/g	16-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	16-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	16-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	16-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	16-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	16-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	16-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	16-JUN-21	31	210
MTBE	<0.050		0.050	ug/g	16-JUN-21	1.6	2.3
Styrene	<0.050		0.050	ug/g	16-JUN-21	34	43
1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.087	0.11
1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.094
Tetrachloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
Toluene	<0.080		0.080	ug/g	16-JUN-21	6.4	9
1,1,1-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	6.1	12
1,1,2-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.11
Trichloroethylene	<0.010		0.010	ug/g	16-JUN-21	0.55	0.61
Trichlorofluoromethane	<0.050		0.050	ug/g	16-JUN-21	4	5.8
Vinyl chloride	<0.020		0.020	ug/g	16-JUN-21	0.032	0.25
o-Xylene	<0.020		0.020	ug/g	16-JUN-21		
m+p-Xylenes	<0.030		0.030	ug/g	16-JUN-21		
Xylenes (Total)	<0.050		0.050	ug/g	16-JUN-21	26	30
Surrogate: 4-Bromofluorobenzene	102.3		50-140	%	16-JUN-21		
Surrogate: 1,4-Difluorobenzene	110.1		50-140	%	16-JUN-21		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2
L2598394-8	MW02-21 4-6							
Sampled By:	CLIENT on 08-JUN-21 @ 08:40							
Matrix:	SOIL							
Hydrocarbons								
	F1 (C6-C10)	<5.0		5.0	ug/g	16-JUN-21	55	65
	F1-BTEX	<5.0		5.0	ug/g	22-JUN-21	55	65
	F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
	F2-Naphth	<10		10	ug/g	22-JUN-21		
	F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500
	F3-PAH	<50		50	ug/g	22-JUN-21		
	F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600
	Total Hydrocarbons (C6-C50)	<72		72	ug/g	22-JUN-21		
	Chrom. to baseline at nC50	YES			No Unit	22-JUN-21		
	Surrogate: 2-Bromobenzotrifluoride	89.5		60-140	%	22-JUN-21		
	Surrogate: 3,4-Dichlorotoluene	76.3		60-140	%	16-JUN-21		
Polycyclic Aromatic Hydrocarbons								
	Acenaphthene	<0.050		0.050	ug/g	16-JUN-21	21	29
	Acenaphthylene	<0.050		0.050	ug/g	16-JUN-21	0.15	0.17
	Anthracene	<0.050		0.050	ug/g	16-JUN-21	0.67	0.74
	Benzo(a)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
	Benzo(a)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.3	0.3
	Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
	Benzo(g,h,i)perylene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
	Benzo(k)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
	Chrysene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
	Dibenz(a,h)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.1	0.1
	Fluoranthene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
	Fluorene	<0.050		0.050	ug/g	16-JUN-21	62	69
	Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.76	0.95
	1+2-Methylnaphthalenes	<0.042		0.042	ug/g	16-JUN-21	30	42
	1-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
	2-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
	Naphthalene	<0.013		0.013	ug/g	16-JUN-21	9.6	28
	Phenanthrene	<0.046		0.046	ug/g	16-JUN-21	12	16
	Pyrene	<0.050		0.050	ug/g	16-JUN-21	96	96
	Surrogate: 2-Fluorobiphenyl	94.9		50-140	%	16-JUN-21		
	Surrogate: d14-Terphenyl	91.2		50-140	%	16-JUN-21		
Organochlorine Pesticides								
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-8	MW02-21 4-6									
Sampled By:	CLIENT on 08-JUN-21 @ 08:40									
Matrix:	SOIL									
Organochlorine Pesticides										
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
	op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21				
	pp-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21				
	Total DDT	<0.00085		0.00085	ug/g	21-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	126.9		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	99.0		50-150	%	21-JUN-21				
L2598394-9	DUP 3									
Sampled By:	CLIENT on 08-JUN-21									
Matrix:	SOIL									
Physical Tests							#1	#2		
	Conductivity	0.0874		0.0040	mS/cm	16-JUN-21	1.4	1.4		
	% Moisture	22.1		0.25	%	15-JUN-21				
	pH	6.81		0.10	pH units	14-JUN-21				
Cyanides										
	Cyanide, Weak Acid Diss	<0.050		0.050	ug/g	16-JUN-21	0.051	0.051		
Saturated Paste Extractables										
	SAR	0.72		0.10	SAR	16-JUN-21	12	12		
	Calcium (Ca)	4.40		0.50	mg/L	16-JUN-21				
	Magnesium (Mg)	2.48		0.50	mg/L	16-JUN-21				
	Sodium (Na)	7.59		0.50	mg/L	16-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50		
	Arsenic (As)	4.2		1.0	ug/g	16-JUN-21	18	18		
	Barium (Ba)	288		1.0	ug/g	16-JUN-21	670	670		
	Beryllium (Be)	0.77		0.50	ug/g	16-JUN-21	8	10		
	Boron (B)	7.0		5.0	ug/g	16-JUN-21	120	120		
	Boron (B), Hot Water Ext.	0.12		0.10	ug/g	16-JUN-21	2	2		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-9 DUP 3 Sampled By: CLIENT on 08-JUN-21 Matrix: SOIL							
Metals							
Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
Chromium (Cr)	64.8		1.0	ug/g	16-JUN-21	160	160
Cobalt (Co)	14.6		1.0	ug/g	16-JUN-21	80	100
Copper (Cu)	32.9		1.0	ug/g	16-JUN-21	230	300
Lead (Pb)	7.6		1.0	ug/g	16-JUN-21	120	120
Mercury (Hg)	0.0119		0.0050	ug/g	16-JUN-21	3.9	20
Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
Nickel (Ni)	34.0		1.0	ug/g	16-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
Uranium (U)	<1.0		1.0	ug/g	16-JUN-21	33	33
Vanadium (V)	77.9		1.0	ug/g	16-JUN-21	86	86
Zinc (Zn)	92.9		5.0	ug/g	16-JUN-21	340	340
Speciated Metals							
Chromium, Hexavalent	0.41		0.20	ug/g	16-JUN-21	8	10
Volatile Organic Compounds							
Acetone	<0.50		0.50	ug/g	16-JUN-21	16	28
Benzene	<0.0068		0.0068	ug/g	16-JUN-21	0.32	0.4
Bromodichloromethane	<0.050		0.050	ug/g	16-JUN-21	1.5	1.9
Bromoform	<0.050		0.050	ug/g	16-JUN-21	0.61	1.7
Bromomethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
Carbon tetrachloride	<0.050		0.050	ug/g	16-JUN-21	0.21	0.71
Chlorobenzene	<0.050		0.050	ug/g	16-JUN-21	2.4	2.7
Dibromochloromethane	<0.050		0.050	ug/g	16-JUN-21	2.3	2.9
Chloroform	<0.050		0.050	ug/g	16-JUN-21	0.47	0.18
1,2-Dibromoethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,2-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	1.2	1.7
1,3-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	9.6	12
1,4-Dichlorobenzene	<0.050		0.050	ug/g	16-JUN-21	0.2	0.57
Dichlorodifluoromethane	<0.050		0.050	ug/g	16-JUN-21	16	25
1,1-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.47	0.6
1,2-Dichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.05
1,1-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	0.064	0.48
cis-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
trans-1,2-Dichloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.3	2.5
Methylene Chloride	<0.050		0.050	ug/g	16-JUN-21	1.6	2
1,2-Dichloropropane	<0.050		0.050	ug/g	16-JUN-21	0.16	0.68
cis-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
trans-1,3-Dichloropropene	<0.030		0.030	ug/g	16-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.042		0.042	ug/g	16-JUN-21	0.059	0.081
Ethylbenzene	<0.018		0.018	ug/g	16-JUN-21	1.1	1.6
n-Hexane	<0.050		0.050	ug/g	16-JUN-21	46	88
Methyl Ethyl Ketone	<0.50		0.50	ug/g	16-JUN-21	70	88
Methyl Isobutyl Ketone	<0.50		0.50	ug/g	16-JUN-21	31	210

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-9 DUP 3							
Sampled By: CLIENT on 08-JUN-21							
Matrix: SOIL							
Volatile Organic Compounds							
MTBE	<0.050		0.050	ug/g	16-JUN-21	1.6	2.3
Styrene	<0.050		0.050	ug/g	16-JUN-21	34	43
1,1,1,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.087	0.11
1,1,2,2-Tetrachloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.094
Tetrachloroethylene	<0.050		0.050	ug/g	16-JUN-21	1.9	2.5
Toluene	<0.080		0.080	ug/g	16-JUN-21	6.4	9
1,1,1-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	6.1	12
1,1,2-Trichloroethane	<0.050		0.050	ug/g	16-JUN-21	0.05	0.11
Trichloroethylene	<0.010		0.010	ug/g	16-JUN-21	0.55	0.61
Trichlorofluoromethane	<0.050		0.050	ug/g	16-JUN-21	4	5.8
Vinyl chloride	<0.020		0.020	ug/g	16-JUN-21	0.032	0.25
o-Xylene	<0.020		0.020	ug/g	16-JUN-21		
m+p-Xylenes	<0.030		0.030	ug/g	16-JUN-21		
Xylenes (Total)	<0.050		0.050	ug/g	16-JUN-21	26	30
Surrogate: 4-Bromofluorobenzene	106.4		50-140	%	16-JUN-21		
Surrogate: 1,4-Difluorobenzene	114.9		50-140	%	16-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<5.0		5.0	ug/g	16-JUN-21	55	65
F1-BTEX	<5.0		5.0	ug/g	22-JUN-21	55	65
F2 (C10-C16)	<10		10	ug/g	22-JUN-21	230	250
F2-Naphth	<10		10	ug/g	22-JUN-21		
F3 (C16-C34)	<50		50	ug/g	22-JUN-21	1700	2500
F3-PAH	<50		50	ug/g	22-JUN-21		
F4 (C34-C50)	<50		50	ug/g	22-JUN-21	3300	6600
Total Hydrocarbons (C6-C50)	<72		72	ug/g	22-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	22-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	87.2		60-140	%	22-JUN-21		
Surrogate: 3,4-Dichlorotoluene	77.8		60-140	%	16-JUN-21		
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.050		0.050	ug/g	16-JUN-21	21	29
Acenaphthylene	<0.050		0.050	ug/g	16-JUN-21	0.15	0.17
Anthracene	<0.050		0.050	ug/g	16-JUN-21	0.67	0.74
Benzo(a)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(a)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.3	0.3
Benzo(b&j)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Benzo(g,h,i)perylene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Benzo(k)fluoranthene	<0.050		0.050	ug/g	16-JUN-21	0.96	0.96
Chrysene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Dibenz(a,h)anthracene	<0.050		0.050	ug/g	16-JUN-21	0.1	0.1
Fluoranthene	<0.050		0.050	ug/g	16-JUN-21	9.6	9.6
Fluorene	<0.050		0.050	ug/g	16-JUN-21	62	69
Indeno(1,2,3-cd)pyrene	<0.050		0.050	ug/g	16-JUN-21	0.76	0.95
1+2-Methylnaphthalenes	<0.042		0.042	ug/g	16-JUN-21	30	42
1-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
2-Methylnaphthalene	<0.030		0.030	ug/g	16-JUN-21	30	42
Naphthalene	<0.013		0.013	ug/g	16-JUN-21	9.6	28

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits			
L2598394-9	DUP 3									
Sampled By:	CLIENT on 08-JUN-21									
Matrix:	SOIL						#1	#2		
Polycyclic Aromatic Hydrocarbons										
	Phenanthrene	<0.046		0.046	ug/g	16-JUN-21	12	16		
	Pyrene	<0.050		0.050	ug/g	16-JUN-21	96	96		
	Surrogate: 2-Fluorobiphenyl	92.5		50-140	%	16-JUN-21				
	Surrogate: d14-Terphenyl	88.6		50-140	%	16-JUN-21				
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
	op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21				
	pp-DDT	<0.00090	DLM	0.00090	ug/g	21-JUN-21				
	Total DDT	<0.0011		0.0011	ug/g	21-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	130.6		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	98.4		50-150	%	21-JUN-21				
L2598394-10	MW03-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 14:45									
Matrix:	SOIL						#1	#2		
Physical Tests										

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-10 MW03-21 0-2 Sampled By: CLIENT on 07-JUN-21 @ 14:45 Matrix: SOIL							
Physical Tests							
% Moisture	23.9		0.25	%	15-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50
Arsenic (As)	4.8		1.0	ug/g	16-JUN-21	18	18
Barium (Ba)	345		1.0	ug/g	16-JUN-21	670	670
Beryllium (Be)	1.45		0.50	ug/g	16-JUN-21	8	10
Boron (B)	15.0		5.0	ug/g	16-JUN-21	120	120
Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
Chromium (Cr)	157		1.0	ug/g	16-JUN-21	160	160
Cobalt (Co)	25.2		1.0	ug/g	16-JUN-21	80	100
Copper (Cu)	56.7		1.0	ug/g	16-JUN-21	230	300
Lead (Pb)	11.5		1.0	ug/g	16-JUN-21	120	120
Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
Nickel (Ni)	77.2		1.0	ug/g	16-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
Uranium (U)	1.3		1.0	ug/g	16-JUN-21	33	33
Vanadium (V)	121		1.0	ug/g	16-JUN-21	*86	*86
Zinc (Zn)	128		5.0	ug/g	16-JUN-21	340	340
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21		
pp-DDT	<0.00200	DLM	0.0020	ug/g	21-JUN-21		
Total DDT	<0.0021		0.0021	ug/g	21-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		
Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-10	MW03-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 14:45									
Matrix:	SOIL									
Organochlorine Pesticides										
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	130.5		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	100.3		50-150	%	21-JUN-21				
L2598394-11	MW03-21 3-4									
Sampled By:	CLIENT on 07-JUN-21 @ 14:52									
Matrix:	SOIL									
Physical Tests										
	% Moisture	26.4		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50		
	Arsenic (As)	4.1		1.0	ug/g	16-JUN-21	18	18		
	Barium (Ba)	462		1.0	ug/g	16-JUN-21	670	670		
	Beryllium (Be)	1.06		0.50	ug/g	16-JUN-21	8	10		
	Boron (B)	8.3		5.0	ug/g	16-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9		
	Chromium (Cr)	131		1.0	ug/g	16-JUN-21	160	160		
	Cobalt (Co)	27.9		1.0	ug/g	16-JUN-21	80	100		
	Copper (Cu)	58.9		1.0	ug/g	16-JUN-21	230	300		
	Lead (Pb)	7.2		1.0	ug/g	16-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40		
	Nickel (Ni)	70.2		1.0	ug/g	16-JUN-21	270	340		
	Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5		
	Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50		
	Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3		
	Uranium (U)	<1.0		1.0	ug/g	16-JUN-21	33	33		
	Vanadium (V)	135		1.0	ug/g	16-JUN-21	*86	*86		
	Zinc (Zn)	147		5.0	ug/g	16-JUN-21	340	340		
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-11	MW03-21 3-4									
Sampled By:	CLIENT on 07-JUN-21 @ 14:52									
Matrix:	SOIL									
Organochlorine Pesticides										
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
	op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21				
	pp-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21				
	Total DDT	<0.00085		0.00085	ug/g	21-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	124.4		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	94.0		50-150	%	21-JUN-21				
L2598394-12	BH07-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 14:15									
Matrix:	SOIL									
							#1	#2		
Physical Tests										
	% Moisture	23.5		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50		
	Arsenic (As)	4.9		1.0	ug/g	16-JUN-21	18	18		
	Barium (Ba)	393		1.0	ug/g	16-JUN-21	670	670		
	Beryllium (Be)	1.39		0.50	ug/g	16-JUN-21	8	10		
	Boron (B)	15.0		5.0	ug/g	16-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9		
	Chromium (Cr)	143		1.0	ug/g	16-JUN-21	160	160		
	Cobalt (Co)	25.4		1.0	ug/g	16-JUN-21	80	100		
	Copper (Cu)	53.6		1.0	ug/g	16-JUN-21	230	300		
	Lead (Pb)	10.5		1.0	ug/g	16-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40		
	Nickel (Ni)	74.8		1.0	ug/g	16-JUN-21	270	340		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2
L2598394-12	BH07-21 0-2							
Sampled By:	CLIENT on 07-JUN-21 @ 14:15							
Matrix:	SOIL							
Metals								
	Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
	Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
	Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
	Uranium (U)	1.4		1.0	ug/g	16-JUN-21	33	33
	Vanadium (V)	115		1.0	ug/g	16-JUN-21	*86	*86
	Zinc (Zn)	120		5.0	ug/g	16-JUN-21	340	340
Organochlorine Pesticides								
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
	op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21		
	pp-DDT	<0.00910	DLM	0.0091	ug/g	21-JUN-21		
	Total DDT	<0.0091		0.0091	ug/g	21-JUN-21	1.4	1.4
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21		
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21		
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21		
	Surrogate: Decachlorobiphenyl	117.9		50-150	%	21-JUN-21		
	Surrogate: Tetrachloro-m-xylene	89.4		50-150	%	21-JUN-21		
L2598394-13	BH07-21 2-4							
Sampled By:	CLIENT on 07-JUN-21 @ 14:25							
Matrix:	SOIL						#1	#2

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-13 BH07-21 2-4							
Sampled By: CLIENT on 07-JUN-21 @ 14:25							
Matrix: SOIL							
Physical Tests							
% Moisture	25.5		0.25	%	15-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50
Arsenic (As)	4.7		1.0	ug/g	16-JUN-21	18	18
Barium (Ba)	496		1.0	ug/g	16-JUN-21	670	670
Beryllium (Be)	1.08		0.50	ug/g	16-JUN-21	8	10
Boron (B)	8.4		5.0	ug/g	16-JUN-21	120	120
Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9
Chromium (Cr)	131		1.0	ug/g	16-JUN-21	160	160
Cobalt (Co)	30.0		1.0	ug/g	16-JUN-21	80	100
Copper (Cu)	61.2		1.0	ug/g	16-JUN-21	230	300
Lead (Pb)	7.7		1.0	ug/g	16-JUN-21	120	120
Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40
Nickel (Ni)	74.1		1.0	ug/g	16-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3
Uranium (U)	<1.0		1.0	ug/g	16-JUN-21	33	33
Vanadium (V)	134		1.0	ug/g	16-JUN-21	*86	*86
Zinc (Zn)	141		5.0	ug/g	16-JUN-21	340	340
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21		
pp-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21		
Total DDT	<0.00085		0.00085	ug/g	21-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		
Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-13	BH07-21 2-4									
Sampled By:	CLIENT on 07-JUN-21 @ 14:25									
Matrix:	SOIL									
Organochlorine Pesticides										
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	126.6		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	100.3		50-150	%	21-JUN-21				
L2598394-14	BH08-21 2									
Sampled By:	CLIENT on 07-JUN-21 @ 09:53									
Matrix:	SOIL						#1	#2		
Physical Tests										
	% Moisture	16.5		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50		
	Arsenic (As)	2.8		1.0	ug/g	16-JUN-21	18	18		
	Barium (Ba)	211		1.0	ug/g	16-JUN-21	670	670		
	Beryllium (Be)	0.75		0.50	ug/g	16-JUN-21	8	10		
	Boron (B)	7.9		5.0	ug/g	16-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9		
	Chromium (Cr)	77.6		1.0	ug/g	16-JUN-21	160	160		
	Cobalt (Co)	17.2		1.0	ug/g	16-JUN-21	80	100		
	Copper (Cu)	24.0		1.0	ug/g	16-JUN-21	230	300		
	Lead (Pb)	9.9		1.0	ug/g	16-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40		
	Nickel (Ni)	35.6		1.0	ug/g	16-JUN-21	270	340		
	Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5		
	Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50		
	Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3		
	Uranium (U)	1.0		1.0	ug/g	16-JUN-21	33	33		
	Vanadium (V)	75.3		1.0	ug/g	16-JUN-21	86	86		
	Zinc (Zn)	96.0		5.0	ug/g	16-JUN-21	340	340		
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-14	BH08-21 2									
Sampled By:	CLIENT on 07-JUN-21 @ 09:53									
Matrix:	SOIL									
Organochlorine Pesticides										
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
	op-DDT	<0.00060	DLM	0.00060	ug/g	21-JUN-21				
	pp-DDT	<0.00370	DLM	0.0037	ug/g	21-JUN-21				
	Total DDT	<0.0037		0.0037	ug/g	21-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0010	DLM	0.0010	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	124.6		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	92.3		50-150	%	21-JUN-21				
L2598394-15	BH08-21 4									
Sampled By:	CLIENT on 07-JUN-21 @ 10:05									
Matrix:	SOIL						#1	#2		
Physical Tests										
	% Moisture	23.2		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	16-JUN-21	40	50		
	Arsenic (As)	3.5		1.0	ug/g	16-JUN-21	18	18		
	Barium (Ba)	283		1.0	ug/g	16-JUN-21	670	670		
	Beryllium (Be)	0.69		0.50	ug/g	16-JUN-21	8	10		
	Boron (B)	7.3		5.0	ug/g	16-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	16-JUN-21	1.9	1.9		
	Chromium (Cr)	57.6		1.0	ug/g	16-JUN-21	160	160		
	Cobalt (Co)	16.3		1.0	ug/g	16-JUN-21	80	100		
	Copper (Cu)	30.6		1.0	ug/g	16-JUN-21	230	300		
	Lead (Pb)	6.0		1.0	ug/g	16-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	16-JUN-21	40	40		
	Nickel (Ni)	35.8		1.0	ug/g	16-JUN-21	270	340		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-15	BH08-21 4									
Sampled By:	CLIENT on 07-JUN-21 @ 10:05									
Matrix:	SOIL									
Metals										
	Selenium (Se)	<1.0		1.0	ug/g	16-JUN-21	5.5	5.5		
	Silver (Ag)	<0.20		0.20	ug/g	16-JUN-21	40	50		
	Thallium (Tl)	<0.50		0.50	ug/g	16-JUN-21	3.3	3.3		
	Uranium (U)	<1.0		1.0	ug/g	16-JUN-21	33	33		
	Vanadium (V)	74.1		1.0	ug/g	16-JUN-21	86	86		
	Zinc (Zn)	83.3		5.0	ug/g	16-JUN-21	340	340		
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
	op-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21				
	pp-DDT	<0.0020	DLM	0.0020	ug/g	21-JUN-21				
	Total DDT	<0.0023		0.0023	ug/g	21-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0020	DLM	0.0020	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	121.4		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	93.1		50-150	%	21-JUN-21				
L2598394-16	BH09-21 0-2									
Sampled By:	CLIENT on 07-JUN-21 @ 09:10									
Matrix:	SOIL						#1	#2		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-16 BH09-21 0-2 Sampled By: CLIENT on 07-JUN-21 @ 09:10 Matrix: SOIL							
Physical Tests							
% Moisture	17.7		0.25	%	15-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50
Arsenic (As)	3.7		1.0	ug/g	15-JUN-21	18	18
Barium (Ba)	285		1.0	ug/g	15-JUN-21	670	670
Beryllium (Be)	0.86		0.50	ug/g	15-JUN-21	8	10
Boron (B)	7.6		5.0	ug/g	15-JUN-21	120	120
Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9
Chromium (Cr)	86.7		1.0	ug/g	15-JUN-21	160	160
Cobalt (Co)	17.8		1.0	ug/g	15-JUN-21	80	100
Copper (Cu)	31.2		1.0	ug/g	15-JUN-21	230	300
Lead (Pb)	8.9		1.0	ug/g	15-JUN-21	120	120
Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40
Nickel (Ni)	44.6		1.0	ug/g	15-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3
Uranium (U)	1.4		1.0	ug/g	15-JUN-21	33	33
Vanadium (V)	82.4		1.0	ug/g	15-JUN-21	86	86
Zinc (Zn)	94.4		5.0	ug/g	15-JUN-21	340	340
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
op-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21		
pp-DDT	<0.0040	DLM	0.0040	ug/g	21-JUN-21		
Total DDT	<0.0042		0.0042	ug/g	21-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		
Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2
L2598394-16	BH09-21 0-2							
Sampled By:	CLIENT on 07-JUN-21 @ 09:10							
Matrix:	SOIL							
Organochlorine Pesticides								
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43
	Methoxychlor	<0.0020	DLM	0.0020	ug/g	21-JUN-21	1.6	1.6
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21		
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21		
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21		
	Surrogate: Decachlorobiphenyl	133.5		50-150	%	21-JUN-21		
	Surrogate: Tetrachloro-m-xylene	97.3		50-150	%	21-JUN-21		
L2598394-17	BH09-21 5							
Sampled By:	CLIENT on 07-JUN-21 @ 09:20							
Matrix:	SOIL							
Physical Tests								
	% Moisture	26.8		0.25	%	15-JUN-21		
Metals								
	Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50
	Arsenic (As)	4.2		1.0	ug/g	15-JUN-21	18	18
	Barium (Ba)	440		1.0	ug/g	15-JUN-21	670	670
	Beryllium (Be)	0.88		0.50	ug/g	15-JUN-21	8	10
	Boron (B)	5.8		5.0	ug/g	15-JUN-21	120	120
	Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9
	Chromium (Cr)	105		1.0	ug/g	15-JUN-21	160	160
	Cobalt (Co)	20.5		1.0	ug/g	15-JUN-21	80	100
	Copper (Cu)	52.8		1.0	ug/g	15-JUN-21	230	300
	Lead (Pb)	6.7		1.0	ug/g	15-JUN-21	120	120
	Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40
	Nickel (Ni)	55.0		1.0	ug/g	15-JUN-21	270	340
	Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5
	Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50
	Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3
	Uranium (U)	1.1		1.0	ug/g	15-JUN-21	33	33
	Vanadium (V)	110		1.0	ug/g	15-JUN-21	*86	*86
	Zinc (Zn)	115		5.0	ug/g	15-JUN-21	340	340
Organochlorine Pesticides								
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-17	BH09-21 5									
Sampled By:	CLIENT on 07-JUN-21 @ 09:20									
Matrix:	SOIL									
Organochlorine Pesticides										
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
	op-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21				
	pp-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21				
	Total DDT	<0.0017		0.0017	ug/g	21-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0020	DLM	0.0020	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	118.4		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	88.6		50-150	%	21-JUN-21				
L2598394-18	BH10-21 1-2									
Sampled By:	CLIENT on 07-JUN-21 @ 15:36									
Matrix:	SOIL						#1	#2		
Physical Tests										
	% Moisture	25.9		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50		
	Arsenic (As)	4.3		1.0	ug/g	15-JUN-21	18	18		
	Barium (Ba)	477		1.0	ug/g	15-JUN-21	670	670		
	Beryllium (Be)	0.93		0.50	ug/g	15-JUN-21	8	10		
	Boron (B)	6.4		5.0	ug/g	15-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9		
	Chromium (Cr)	115		1.0	ug/g	15-JUN-21	160	160		
	Cobalt (Co)	25.1		1.0	ug/g	15-JUN-21	80	100		
	Copper (Cu)	56.7		1.0	ug/g	15-JUN-21	230	300		
	Lead (Pb)	7.4		1.0	ug/g	15-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40		
	Nickel (Ni)	62.7		1.0	ug/g	15-JUN-21	270	340		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-18	BH10-21 1-2							
Sampled By:	CLIENT on 07-JUN-21 @ 15:36							
Matrix:	SOIL							
Metals								
	Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5
	Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50
	Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3
	Uranium (U)	<1.0		1.0	ug/g	15-JUN-21	33	33
	Vanadium (V)	120		1.0	ug/g	15-JUN-21	*86	*86
	Zinc (Zn)	129		5.0	ug/g	15-JUN-21	340	340
Organochlorine Pesticides								
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21		
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21		
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21		
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65
	op-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21		
	pp-DDT	<0.0100	DLM	0.010	ug/g	21-JUN-21		
	Total DDT	<0.010		0.010	ug/g	21-JUN-21	1.4	1.4
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21		
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21		
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21		
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43
	Methoxychlor	<0.0020	DLM	0.0020	ug/g	21-JUN-21	1.6	1.6
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21		
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21		
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21		
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21		
	Surrogate: Decachlorobiphenyl	117.8		50-150	%	21-JUN-21		
	Surrogate: Tetrachloro-m-xylene	93.3		50-150	%	21-JUN-21		
L2598394-19	BH10-21 2-4							
Sampled By:	CLIENT on 07-JUN-21 @ 15:40							
Matrix:	SOIL							

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-19 BH10-21 2-4 Sampled By: CLIENT on 07-JUN-21 @ 15:40 Matrix: SOIL									
Physical Tests									
% Moisture	18.7		0.25	%	15-JUN-21				
Metals									
Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50		
Arsenic (As)	3.1		1.0	ug/g	15-JUN-21	18	18		
Barium (Ba)	244		1.0	ug/g	15-JUN-21	670	670		
Beryllium (Be)	0.83		0.50	ug/g	15-JUN-21	8	10		
Boron (B)	5.9		5.0	ug/g	15-JUN-21	120	120		
Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9		
Chromium (Cr)	76.7		1.0	ug/g	15-JUN-21	160	160		
Cobalt (Co)	15.1		1.0	ug/g	15-JUN-21	80	100		
Copper (Cu)	26.3		1.0	ug/g	15-JUN-21	230	300		
Lead (Pb)	8.8		1.0	ug/g	15-JUN-21	120	120		
Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40		
Nickel (Ni)	35.5		1.0	ug/g	15-JUN-21	270	340		
Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5		
Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50		
Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3		
Uranium (U)	1.0		1.0	ug/g	15-JUN-21	33	33		
Vanadium (V)	71.0		1.0	ug/g	15-JUN-21	86	86		
Zinc (Zn)	74.4		5.0	ug/g	15-JUN-21	340	340		
Organochlorine Pesticides									
Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063		
delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05		
g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6		
o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
op-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21				
pp-DDT	<0.0050	DLM	0.0050	ug/g	21-JUN-21				
Total DDT	<0.0051		0.0051	ug/g	21-JUN-21	1.4	1.4		
Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-19	BH10-21 2-4									
Sampled By:	CLIENT on 07-JUN-21 @ 15:40									
Matrix:	SOIL									
Organochlorine Pesticides										
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0020	DLM	0.0020	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	121.0		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	96.1		50-150	%	21-JUN-21				
L2598394-20	DUP 01									
Sampled By:	CLIENT on 07-JUN-21									
Matrix:	SOIL						#1	#2		
Physical Tests										
	% Moisture	26.0		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50		
	Arsenic (As)	3.8		1.0	ug/g	15-JUN-21	18	18		
	Barium (Ba)	389		1.0	ug/g	15-JUN-21	670	670		
	Beryllium (Be)	0.78		0.50	ug/g	15-JUN-21	8	10		
	Boron (B)	5.4		5.0	ug/g	15-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9		
	Chromium (Cr)	98.3		1.0	ug/g	15-JUN-21	160	160		
	Cobalt (Co)	24.1		1.0	ug/g	15-JUN-21	80	100		
	Copper (Cu)	49.4		1.0	ug/g	15-JUN-21	230	300		
	Lead (Pb)	6.3		1.0	ug/g	15-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40		
	Nickel (Ni)	59.2		1.0	ug/g	15-JUN-21	270	340		
	Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5		
	Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50		
	Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3		
	Uranium (U)	<1.0		1.0	ug/g	15-JUN-21	33	33		
	Vanadium (V)	105		1.0	ug/g	15-JUN-21	*86	*86		
	Zinc (Zn)	113		5.0	ug/g	15-JUN-21	340	340		
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	21-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	21-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	21-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits			
L2598394-20	DUP 01									
Sampled By:	CLIENT on 07-JUN-21									
Matrix:	SOIL						#1	#2		
Organochlorine Pesticides										
	pp-DDD	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	21-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	21-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	21-JUN-21	0.52	0.65		
	op-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21				
	pp-DDT	<0.0012	DLM	0.0012	ug/g	21-JUN-21				
	Total DDT	<0.0017		0.0017	ug/g	21-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	21-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	21-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	21-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	21-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	21-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	21-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	21-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	21-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	21-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	21-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	21-JUN-21	0.21	0.43		
	Methoxychlor	<0.0020	DLM	0.0020	ug/g	21-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	21-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	21-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	21-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	21-JUN-21				
	Surrogate: Decachlorobiphenyl	126.5		50-150	%	21-JUN-21				
	Surrogate: Tetrachloro-m-xylene	94.1		50-150	%	21-JUN-21				
L2598394-21	DUP 02									
Sampled By:	CLIENT on 07-JUN-21									
Matrix:	SOIL						#1	#2		
Physical Tests										
	% Moisture	26.6		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50		
	Arsenic (As)	3.6		1.0	ug/g	15-JUN-21	18	18		
	Barium (Ba)	419		1.0	ug/g	15-JUN-21	670	670		
	Beryllium (Be)	0.75		0.50	ug/g	15-JUN-21	8	10		
	Boron (B)	5.9		5.0	ug/g	15-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9		
	Chromium (Cr)	93.4		1.0	ug/g	15-JUN-21	160	160		
	Cobalt (Co)	21.5		1.0	ug/g	15-JUN-21	80	100		
	Copper (Cu)	46.3		1.0	ug/g	15-JUN-21	230	300		
	Lead (Pb)	6.5		1.0	ug/g	15-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40		
	Nickel (Ni)	52.7		1.0	ug/g	15-JUN-21	270	340		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-21	DUP 02							
Sampled By:	CLIENT on 07-JUN-21							
Matrix:	SOIL							
Metals								
	Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5
	Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50
	Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3
	Uranium (U)	<1.0		1.0	ug/g	15-JUN-21	33	33
	Vanadium (V)	98.7		1.0	ug/g	15-JUN-21	*86	*86
	Zinc (Zn)	115		5.0	ug/g	15-JUN-21	340	340
Organochlorine Pesticides								
	Aldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11
	alpha-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
	beta-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
	Lindane	<0.00020		0.00020	ug/g	23-JUN-21	0.056	0.063
	delta-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
	a-chlordane	<0.00030		0.00030	ug/g	23-JUN-21		
	Chlordane (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.05	0.05
	g-chlordane	<0.00030		0.00030	ug/g	23-JUN-21		
	o,p-DDD	<0.00030		0.00030	ug/g	23-JUN-21		
	pp-DDD	<0.00030		0.00030	ug/g	23-JUN-21		
	Total DDD	<0.00042		0.00042	ug/g	23-JUN-21	4.6	4.6
	o,p-DDE	<0.00030		0.00030	ug/g	23-JUN-21		
	pp-DDE	<0.00030		0.00030	ug/g	23-JUN-21		
	Total DDE	<0.00042		0.00042	ug/g	23-JUN-21	0.52	0.65
	op-DDT	<0.00030		0.00030	ug/g	23-JUN-21		
	pp-DDT	<0.00030		0.00030	ug/g	23-JUN-21		
	Total DDT	<0.00042		0.00042	ug/g	23-JUN-21	1.4	1.4
	Dieldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11
	alpha-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21		
	beta-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21		
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	23-JUN-21		
	Endosulfan (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.3	0.38
	Endrin	<0.00050		0.00050	ug/g	23-JUN-21	0.04	0.04
	Endrin Aldehyde	<0.00050		0.00050	ug/g	23-JUN-21		
	Heptachlor	<0.00020		0.00020	ug/g	23-JUN-21	0.19	0.19
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	23-JUN-21	0.05	0.05
	Hexachlorobenzene	<0.00050		0.00050	ug/g	23-JUN-21	0.66	0.66
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	23-JUN-21	0.031	0.095
	Hexachloroethane	<0.00050		0.00050	ug/g	23-JUN-21	0.21	0.43
	Methoxychlor	<0.00050		0.00050	ug/g	23-JUN-21	1.6	1.6
	Mirex	<0.00050		0.00050	ug/g	23-JUN-21		
	Trans-nonachlor	<0.00050		0.00050	ug/g	23-JUN-21		
	Oxychlordane	<0.00030		0.00030	ug/g	23-JUN-21		
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	23-JUN-21		
	Surrogate: Decachlorobiphenyl	135.1		50-150	%	23-JUN-21		
	Surrogate: Tetrachloro-m-xylene	99.6		50-150	%	23-JUN-21		
L2598394-22	MW01-21 1-2							
Sampled By:	CLIENT on 07-JUN-21 @ 16:11							
Matrix:	SOIL						#1	#2

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-22 MW01-21 1-2 Sampled By: CLIENT on 07-JUN-21 @ 16:11 Matrix: SOIL							
Physical Tests							
% Moisture	18.2		0.25	%	15-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50
Arsenic (As)	3.0		1.0	ug/g	15-JUN-21	18	18
Barium (Ba)	234		1.0	ug/g	15-JUN-21	670	670
Beryllium (Be)	0.69		0.50	ug/g	15-JUN-21	8	10
Boron (B)	5.2		5.0	ug/g	15-JUN-21	120	120
Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9
Chromium (Cr)	75.0		1.0	ug/g	15-JUN-21	160	160
Cobalt (Co)	13.8		1.0	ug/g	15-JUN-21	80	100
Copper (Cu)	20.8		1.0	ug/g	15-JUN-21	230	300
Lead (Pb)	9.9		1.0	ug/g	15-JUN-21	120	120
Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40
Nickel (Ni)	33.8		1.0	ug/g	15-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3
Uranium (U)	1.7		1.0	ug/g	15-JUN-21	33	33
Vanadium (V)	64.7		1.0	ug/g	15-JUN-21	86	86
Zinc (Zn)	97.2		5.0	ug/g	15-JUN-21	340	340
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
Lindane	<0.00020		0.00020	ug/g	23-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	23-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	23-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	23-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	23-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	23-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	23-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	23-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	23-JUN-21	0.52	0.65
op-DDT	<0.00030		0.00030	ug/g	23-JUN-21		
pp-DDT	<0.00030		0.00030	ug/g	23-JUN-21		
Total DDT	<0.00042		0.00042	ug/g	23-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	23-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	23-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	23-JUN-21		
Heptachlor	<0.00020		0.00020	ug/g	23-JUN-21	0.19	0.19

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-22	MW01-21 1-2									
Sampled By:	CLIENT on 07-JUN-21 @ 16:11									
Matrix:	SOIL									
Organochlorine Pesticides										
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	23-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	23-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	23-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	23-JUN-21	0.21	0.43		
	Methoxychlor	<0.00050		0.00050	ug/g	23-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	23-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	23-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	23-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	23-JUN-21				
	Surrogate: Decachlorobiphenyl	145.1		50-150	%	23-JUN-21				
	Surrogate: Tetrachloro-m-xylene	104.0		50-150	%	23-JUN-21				
L2598394-23	MW01-21 3-4									
Sampled By:	CLIENT on 07-JUN-21 @ 16:14									
Matrix:	SOIL									
Physical Tests										
	% Moisture	28.2		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50		
	Arsenic (As)	3.1		1.0	ug/g	15-JUN-21	18	18		
	Barium (Ba)	439		1.0	ug/g	15-JUN-21	670	670		
	Beryllium (Be)	0.86		0.50	ug/g	15-JUN-21	8	10		
	Boron (B)	<5.0		5.0	ug/g	15-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9		
	Chromium (Cr)	107		1.0	ug/g	15-JUN-21	160	160		
	Cobalt (Co)	21.7		1.0	ug/g	15-JUN-21	80	100		
	Copper (Cu)	45.1		1.0	ug/g	15-JUN-21	230	300		
	Lead (Pb)	6.9		1.0	ug/g	15-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40		
	Nickel (Ni)	53.0		1.0	ug/g	15-JUN-21	270	340		
	Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5		
	Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50		
	Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3		
	Uranium (U)	1.2		1.0	ug/g	15-JUN-21	33	33		
	Vanadium (V)	96.6		1.0	ug/g	15-JUN-21	*86	*86		
	Zinc (Zn)	131		5.0	ug/g	15-JUN-21	340	340		
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	23-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	23-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	23-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	23-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	23-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	23-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	23-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits			
L2598394-23	MW01-21 3-4									
Sampled By:	CLIENT on 07-JUN-21 @ 16:14									
Matrix:	SOIL						#1	#2		
Organochlorine Pesticides										
	pp-DDD	<0.00030		0.00030	ug/g	23-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	23-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	23-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	23-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	23-JUN-21	0.52	0.65		
	op-DDT	<0.00030		0.00030	ug/g	23-JUN-21				
	pp-DDT	<0.00030		0.00030	ug/g	23-JUN-21				
	Total DDT	<0.00042		0.00042	ug/g	23-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	23-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	23-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	23-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	23-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	23-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	23-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	23-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	23-JUN-21	0.21	0.43		
	Methoxychlor	<0.00050		0.00050	ug/g	23-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	23-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	23-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	23-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	23-JUN-21				
	Surrogate: Decachlorobiphenyl	137.1		50-150	%	23-JUN-21				
	Surrogate: Tetrachloro-m-xylene	100.1		50-150	%	23-JUN-21				
L2598394-24	BH11-21 1-2									
Sampled By:	CLIENT on 08-JUN-21 @ 08:02									
Matrix:	SOIL						#1	#2		
Physical Tests										
	% Moisture	25.0		0.25	%	15-JUN-21				
Metals										
	Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50		
	Arsenic (As)	3.1		1.0	ug/g	15-JUN-21	18	18		
	Barium (Ba)	291		1.0	ug/g	15-JUN-21	670	670		
	Beryllium (Be)	0.82		0.50	ug/g	15-JUN-21	8	10		
	Boron (B)	5.5		5.0	ug/g	15-JUN-21	120	120		
	Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9		
	Chromium (Cr)	87.1		1.0	ug/g	15-JUN-21	160	160		
	Cobalt (Co)	13.0		1.0	ug/g	15-JUN-21	80	100		
	Copper (Cu)	28.9		1.0	ug/g	15-JUN-21	230	300		
	Lead (Pb)	7.0		1.0	ug/g	15-JUN-21	120	120		
	Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40		
	Nickel (Ni)	42.7		1.0	ug/g	15-JUN-21	270	340		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2598394-24	BH11-21 1-2									
Sampled By:	CLIENT on 08-JUN-21 @ 08:02									
Matrix:	SOIL									
Metals										
	Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5		
	Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50		
	Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3		
	Uranium (U)	<1.0		1.0	ug/g	15-JUN-21	33	33		
	Vanadium (V)	82.6		1.0	ug/g	15-JUN-21	86	86		
	Zinc (Zn)	92.9		5.0	ug/g	15-JUN-21	340	340		
Organochlorine Pesticides										
	Aldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11		
	alpha-BHC	<0.00050		0.00050	ug/g	23-JUN-21				
	beta-BHC	<0.00050		0.00050	ug/g	23-JUN-21				
	Lindane	<0.00020		0.00020	ug/g	23-JUN-21	0.056	0.063		
	delta-BHC	<0.00050		0.00050	ug/g	23-JUN-21				
	a-chlordane	<0.00030		0.00030	ug/g	23-JUN-21				
	Chlordane (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.05	0.05		
	g-chlordane	<0.00030		0.00030	ug/g	23-JUN-21				
	o,p-DDD	<0.00030		0.00030	ug/g	23-JUN-21				
	pp-DDD	<0.00030		0.00030	ug/g	23-JUN-21				
	Total DDD	<0.00042		0.00042	ug/g	23-JUN-21	4.6	4.6		
	o,p-DDE	<0.00030		0.00030	ug/g	23-JUN-21				
	pp-DDE	<0.00030		0.00030	ug/g	23-JUN-21				
	Total DDE	<0.00042		0.00042	ug/g	23-JUN-21	0.52	0.65		
	op-DDT	<0.00030		0.00030	ug/g	23-JUN-21				
	pp-DDT	<0.00030		0.00030	ug/g	23-JUN-21				
	Total DDT	<0.00042		0.00042	ug/g	23-JUN-21	1.4	1.4		
	Dieldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11		
	alpha-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21				
	beta-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21				
	Endosulfan Sulfate	<0.00050		0.00050	ug/g	23-JUN-21				
	Endosulfan (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.3	0.38		
	Endrin	<0.00050		0.00050	ug/g	23-JUN-21	0.04	0.04		
	Endrin Aldehyde	<0.00050		0.00050	ug/g	23-JUN-21				
	Heptachlor	<0.00020		0.00020	ug/g	23-JUN-21	0.19	0.19		
	Heptachlor Epoxide	<0.00020		0.00020	ug/g	23-JUN-21	0.05	0.05		
	Hexachlorobenzene	<0.00050		0.00050	ug/g	23-JUN-21	0.66	0.66		
	Hexachlorobutadiene	<0.00050		0.00050	ug/g	23-JUN-21	0.031	0.095		
	Hexachloroethane	<0.00050		0.00050	ug/g	23-JUN-21	0.21	0.43		
	Methoxychlor	<0.00050		0.00050	ug/g	23-JUN-21	1.6	1.6		
	Mirex	<0.00050		0.00050	ug/g	23-JUN-21				
	Trans-nonachlor	<0.00050		0.00050	ug/g	23-JUN-21				
	Oxychlordane	<0.00030		0.00030	ug/g	23-JUN-21				
	Pentachloronitrobenzene	<0.00050		0.00050	ug/g	23-JUN-21				
	Surrogate: Decachlorobiphenyl	131.9		50-150	%	23-JUN-21				
	Surrogate: Tetrachloro-m-xylene	99.8		50-150	%	23-JUN-21				
L2598394-25	BH11-21 3-4									
Sampled By:	CLIENT on 08-JUN-21 @ 08:08									
Matrix:	SOIL						#1	#2		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2598394-25 BH11-21 3-4							
Sampled By: CLIENT on 08-JUN-21 @ 08:08							
Matrix: SOIL							
Physical Tests							
% Moisture	26.2		0.25	%	15-JUN-21		
Metals							
Antimony (Sb)	<1.0		1.0	ug/g	15-JUN-21	40	50
Arsenic (As)	4.6		1.0	ug/g	15-JUN-21	18	18
Barium (Ba)	367		1.0	ug/g	15-JUN-21	670	670
Beryllium (Be)	0.74		0.50	ug/g	15-JUN-21	8	10
Boron (B)	5.5		5.0	ug/g	15-JUN-21	120	120
Cadmium (Cd)	<0.50		0.50	ug/g	15-JUN-21	1.9	1.9
Chromium (Cr)	73.1		1.0	ug/g	15-JUN-21	160	160
Cobalt (Co)	20.7		1.0	ug/g	15-JUN-21	80	100
Copper (Cu)	40.8		1.0	ug/g	15-JUN-21	230	300
Lead (Pb)	6.7		1.0	ug/g	15-JUN-21	120	120
Molybdenum (Mo)	<1.0		1.0	ug/g	15-JUN-21	40	40
Nickel (Ni)	48.1		1.0	ug/g	15-JUN-21	270	340
Selenium (Se)	<1.0		1.0	ug/g	15-JUN-21	5.5	5.5
Silver (Ag)	<0.20		0.20	ug/g	15-JUN-21	40	50
Thallium (Tl)	<0.50		0.50	ug/g	15-JUN-21	3.3	3.3
Uranium (U)	<1.0		1.0	ug/g	15-JUN-21	33	33
Vanadium (V)	90.2		1.0	ug/g	15-JUN-21	*86	*86
Zinc (Zn)	102		5.0	ug/g	15-JUN-21	340	340
Organochlorine Pesticides							
Aldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11
alpha-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
beta-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
Lindane	<0.00020		0.00020	ug/g	23-JUN-21	0.056	0.063
delta-BHC	<0.00050		0.00050	ug/g	23-JUN-21		
a-chlordane	<0.00030		0.00030	ug/g	23-JUN-21		
Chlordane (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.05	0.05
g-chlordane	<0.00030		0.00030	ug/g	23-JUN-21		
o,p-DDD	<0.00030		0.00030	ug/g	23-JUN-21		
pp-DDD	<0.00030		0.00030	ug/g	23-JUN-21		
Total DDD	<0.00042		0.00042	ug/g	23-JUN-21	4.6	4.6
o,p-DDE	<0.00030		0.00030	ug/g	23-JUN-21		
pp-DDE	<0.00030		0.00030	ug/g	23-JUN-21		
Total DDE	<0.00042		0.00042	ug/g	23-JUN-21	0.52	0.65
op-DDT	<0.00030		0.00030	ug/g	23-JUN-21		
pp-DDT	<0.00030		0.00030	ug/g	23-JUN-21		
Total DDT	<0.00042		0.00042	ug/g	23-JUN-21	1.4	1.4
Dieldrin	<0.00020		0.00020	ug/g	23-JUN-21	0.088	0.11
alpha-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21		
beta-Endosulfan	<0.00030		0.00030	ug/g	23-JUN-21		
Endosulfan Sulfate	<0.00050		0.00050	ug/g	23-JUN-21		
Endosulfan (Total)	<0.00042		0.00042	ug/g	23-JUN-21	0.3	0.38
Endrin	<0.00050		0.00050	ug/g	23-JUN-21	0.04	0.04
Endrin Aldehyde	<0.00050		0.00050	ug/g	23-JUN-21		
Heptachlor	<0.00020		0.00020	ug/g	23-JUN-21	0.19	0.19

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse) **#2: T2-Soil-Ind/Com/Commu Property Use (Fine)**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2		
L2598394-25 BH11-21 3-4 Sampled By: CLIENT on 08-JUN-21 @ 08:08 Matrix: SOIL									
Organochlorine Pesticides									
Heptachlor Epoxide	<0.00020		0.00020	ug/g	23-JUN-21	0.05	0.05		
Hexachlorobenzene	<0.00050		0.00050	ug/g	23-JUN-21	0.66	0.66		
Hexachlorobutadiene	<0.00050		0.00050	ug/g	23-JUN-21	0.031	0.095		
Hexachloroethane	<0.00050		0.00050	ug/g	23-JUN-21	0.21	0.43		
Methoxychlor	<0.00050		0.00050	ug/g	23-JUN-21	1.6	1.6		
Mirex	<0.00050		0.00050	ug/g	23-JUN-21				
Trans-nonachlor	<0.00050		0.00050	ug/g	23-JUN-21				
Oxychlordane	<0.00030		0.00030	ug/g	23-JUN-21				
Pentachloronitrobenzene	<0.00050		0.00050	ug/g	23-JUN-21				
Surrogate: Decachlorobiphenyl	133.2		50-150	%	23-JUN-21				
Surrogate: Tetrachloro-m-xylene	98.5		50-150	%	23-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - ON-511-T2-SOIL-ICC-C/F

#1: T2-Soil-Ind/Com/Commu Property Use (Coarse)

#2: T2-Soil-Ind/Com/Commu Property Use (Fine)

Reference Information

Sample Parameter Qualifier key listed:

Qualifier	Description
SDO:RNA	Surrogate diluted out:% recovery not available
DLM	Detection Limit Adjusted due to sample matrix effects (e.g. chemical interference, colour, turbidity).

Methods Listed (if applicable):

ALS Test Code	Matrix	Test Description	Method Reference***
B-HWS-R511-WT	Soil	Boron-HWE-O.Reg 153/04 (July 2011)	HW EXTR, EPA 6010B

A dried solid sample is extracted with calcium chloride, the sample undergoes a heating process. After cooling the sample is filtered and analyzed by ICP/OES.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

CHLORDANE-T-CALC-WT	Soil	Chlordane Total sums	CALCULATION

Aqueous sample is extracted by liquid/liquid extraction with a solvent mix. After extraction, a number of clean up techniques may be applied, depending on the sample matrix and analyzed by GC/MS.

CN-WAD-R511-WT	Soil	Cyanide (WAD)-O.Reg 153/04 (July 2011)	MOE 3015/APHA 4500CN I-WAD

The sample is extracted with a strong base for 16 hours, and then filtered. The filtrate is then distilled where the cyanide is converted to cyanogen chloride by reacting with chloramine-T, the cyanogen chloride then reacts with a combination of barbituric acid and isonicotinic acid to form a highly colored complex.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

CR-CR6-IC-WT	Soil	Hexavalent Chromium in Soil	SW846 3060A/7199

This analysis is carried out using procedures adapted from "Test Methods for Evaluating Solid Waste" SW-846, Method 7199, published by the United States Environmental Protection Agency (EPA). The procedure involves analysis for chromium (VI) by ion chromatography using diphenylcarbazide in a sulphuric acid solution.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

DDD-DDE-DDT-CALC-WT	Soil	DDD, DDE, DDT sums	CALCULATION

Aqueous sample is extracted by liquid/liquid extraction with a solvent mix. After extraction, a number of clean up techniques may be applied, depending on the sample matrix and analyzed by GC/MS.

EC-WT	Soil	Conductivity (EC)	MOEE E3138

A representative subsample is tumbled with de-ionized (DI) water. The ratio of water to soil is 2:1 v/w. After tumbling the sample is then analyzed by a conductivity meter.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

ENDOSULFAN-T-CALC-WT	Soil	Endosulfan Total sums	CALCULATION

Aqueous sample is extracted by liquid/liquid extraction with a solvent mix. After extraction, a number of clean up techniques may be applied, depending on the sample matrix and analyzed by GC/MS.

Reference Information

F1-F4-511-CALC-WT	Soil	F1-F4 Hydrocarbon Calculated Parameters	CCME CWS-PHC, Pub #1310, Dec 2001-S

Analytical methods used for analysis of CCME Petroleum Hydrocarbons have been validated and comply with the Reference Method for the CWS PHC.

Hydrocarbon results are expressed on a dry weight basis.

In cases where results for both F4 and F4G are reported, the greater of the two results must be used in any application of the CWS PHC guidelines and the gravimetric heavy hydrocarbons cannot be added to the C6 to C50 hydrocarbons.
In samples where BTEX and F1 were analyzed , F1-BTEX represents a value where the sum of Benzene, Toluene, Ethylbenzene and total Xylenes has been subtracted from F1.

In samples where PAHs, F2 and F3 were analyzed, F2-Naphth represents the result where Naphthalene has been subtracted from F2. F3-PAH represents a result where the sum of Benzo(a)anthracene, Benzo(a)pyrene, Benzo(b)fluoranthene, Benzo(k)fluoranthene, Dibenzo(a,h)anthracene, Fluoranthene, Indeno(1,2,3-cd)pyrene, Phenanthrene, and Pyrene has been subtracted from F3.

Unless otherwise qualified, the following quality control criteria have been met for the F1 hydrocarbon range:
1. All extraction and analysis holding times were met.
2. Instrument performance showing response factors for C6 and C10 within 30% of the response factor for toluene.
3. Linearity of gasoline response within 15% throughout the calibration range.

Unless otherwise qualified, the following quality control criteria have been met for the F2-F4 hydrocarbon ranges:
1. All extraction and analysis holding times were met.
2. Instrument performance showing C10, C16 and C34 response factors within 10% of their average.
3. Instrument performance showing the C50 response factor within 30% of the average of the C10, C16 and C34 response factors.
4. Linearity of diesel or motor oil response within 15% throughout the calibration range.

F1-HS-511-WT	Soil	F1-O.Reg 153/04 (July 2011)	E3398/CCME TIER 1-HS

Fraction F1 is determined by extracting a soil or sediment sample as received with methanol, then analyzing by headspace-GC/FID.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

F2-F4-511-WT	Soil	F2-F4-O.Reg 153/04 (July 2011)	CCME Tier 1

Petroleum Hydrocarbons (F2-F4 fractions) are extracted from soil with 1:1 hexane:acetone using a rotary extractor. Extracts are treated with silica gel to remove polar organic interferences. F2, F3, & F4 are analyzed by GC-FID. F4G-sg is analyzed gravimetrically.

Notes:
1. F2 (C10-C16): Sum of all hydrocarbons that elute between nC10 and nC16.
2. F3 (C16-C34): Sum of all hydrocarbons that elute between nC16 and nC34.
3. F4 (C34-C50): Sum of all hydrocarbons that elute between nC34 and nC50.
4. F4G: Gravimetric Heavy Hydrocarbons
5. F4G-sg: Gravimetric Heavy Hydrocarbons (F4G) after silica gel treatment.
6. Where both F4 (C34-C50) and F4G-sg are reported for a sample, the larger of the two values is used for comparison against the relevant CCME guideline for F4.
7. F4G-sg cannot be added to the C6 to C50 hydrocarbon results to obtain an estimate of total extractable hydrocarbons.
8. This method is validated for use.
9. Data from analysis of validation and quality control samples is available upon request.
10. Reported results are expressed as milligrams per dry kilogram, unless otherwise indicated.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

F4G-ADD-511-WT	Soil	F4G SG-O.Reg 153/04 (July 2011)	MOE DECPH-E3398/CCME TIER 1

F4G, gravimetric analysis, is determined if the chromatogram does not return to baseline at or before C50. A soil sample is extracted with a solvent mix, the solvent is evaporated and the weight of the residue is determined.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

GRAIN SIZE-HYD-SK	Soil	Grain Size by Hydrometer	ASTM D6913/D7928

Particle size curve is generated from dry sieving (particles > 2 mm), wet sieving (particles 2 mm-75 um) and hydrometer readings (particles < 75 um)

ASTM D422-63 has been withdrawn, the ASTM D6913/D7928 standard serves as the successor method.

Reference Information

HG-200.2-CVAA-WT	Soil	Mercury in Soil by CVAAS	EPA 200.2/1631E (mod)

Soil samples are digested with nitric and hydrochloric acids, followed by analysis by CVAAS.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

MET-200.2-CCMS-WT	Soil	Metals in Soil by CRC ICPMS	EPA 200.2/6020B (mod)

Soil/sediment is dried, disaggregated, and sieved (2 mm). For tests intended to support Ontario regulations, the <2mm fraction is ground to pass through a 0.355 mm sieve. Strong Acid Leachable Metals in the <2mm fraction are solubilized by heated digestion with nitric and hydrochloric acids. Instrumental analysis is by Collision / Reaction Cell ICPMS.

Limitations: This method is intended to liberate environmentally available metals. Silicate minerals are not solubilized. Some metals may be only partially recovered (matrix dependent), including Al, Ba, Be, Cr, S, Sr, Ti, Tl, V, W, and Zr. Elemental Sulfur may be poorly recovered by this method. Volatile forms of sulfur (e.g. sulfide, H2S) may be excluded if lost during sampling, storage, or digestion.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

METHYLNAPS-CALC-WT	Soil	ABN-Calculated Parameters	SW846 8270
MOISTURE-WT	Soil	% Moisture	CCME PHC in Soil - Tier 1 (mod)
OCP-TRACE-WT	Soil	Low level OC Pesticides in Soil/Sediment	SW846 8270

A 5g representative sub-sample of the soil sample is mixed with methanol and extracted with toluene. An aliquot is taken and analyzed by GC/MSD.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

PAH-511-WT	Soil	PAH-O.Reg 153/04 (July 2011)	SW846 3510/8270

A representative sub-sample of soil is fortified with deuterium-labelled surrogates and a mechanical shaking techniqueis used to extract the sample with a mixture of methanol and toluene. The extracts are concentrated and analyzed by GC/MS. Results for benzo(b) fluoranthene may include contributions from benzo(j)fluoranthene, if also present in the sample.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

PH-WT	Soil	pH	MOEE E3137A

A minimum 10g portion of the sample is extracted with 20mL of 0.01M calcium chloride solution by shaking for at least 30 minutes. The aqueous layer is separated from the soil and then analyzed using a pH meter and electrode.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

SAR-R511-WT	Soil	SAR-O.Reg 153/04 (July 2011)	SW846 6010C

A dried, disaggregated solid sample is extracted with deionized water, the aqueous extract is separated from the solid, acidified and then analyzed using a ICP/OES. The concentrations of Na, Ca and Mg are reported as per CALA requirements for calculated parameters. These individual parameters are not for comparison to any guideline.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

VOC-1,3-DCP-CALC-WT	Soil	Regulation 153 VOCs	SW8260B/SW8270C
VOC-511-HS-WT	Soil	VOC-O.Reg 153/04 (July 2011)	SW846 8260 (511)

Soil and sediment samples are extracted in methanol and analyzed by headspace-GC/MS.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011 and as of November 30, 2020), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

XYLENES-SUM-CALC-WT	Soil	Sum of Xylene Isomer Concentrations	CALCULATION

Total xylenes represents the sum of o-xylene and m&p-xylene.

Reference Information

*** ALS test methods may incorporate modifications from specified reference methods to improve performance.

Chain of Custody numbers:

20-895345 20-895346 20-895347

The last two letters of the above test code(s) indicate the laboratory that performed analytical analysis for that test. Refer to the list below:

Laboratory Definition Code	Laboratory Location	Laboratory Definition Code	Laboratory Location
SK	ALS ENVIRONMENTAL - SASKATOON, SASKATCHEWAN, CANADA	WT	ALS ENVIRONMENTAL - WATERLOO, ONTARIO, CANADA

GLOSSARY OF REPORT TERMS

Surrogates are compounds that are similar in behaviour to target analyte(s), but that do not normally occur in environmental samples. For applicable tests, surrogates are added to samples prior to analysis as a check on recovery. In reports that display the D.L. column, laboratory objectives for surrogates are listed there.
mg/kg - milligrams per kilogram based on dry weight of sample
mg/kg wwt - milligrams per kilogram based on wet weight of sample
mg/kg lwt - milligrams per kilogram based on lipid-adjusted weight
mg/L - unit of concentration based on volume, parts per million.
< - Less than.
D.L. - The reporting limit.
N/A - Result not available. Refer to qualifier code and definition for explanation.

Test results reported relate only to the samples as received by the laboratory.
UNLESS OTHERWISE STATED, ALL SAMPLES WERE RECEIVED IN ACCEPTABLE CONDITION.
Analytical results in unsigned test reports with the DRAFT watermark are subject to change, pending final QC review.

Application of guidelines is provided "as is" without warranty of any kind, either expressed or implied, including, but not limited to, fitness for a particular purpose, or non-infringement. ALS assumes no responsibility for errors or omissions in the information. Guideline limits are not adjusted for the hardness, pH or temperature of the sample (the most conservative values are used). Measurement uncertainty is not applied to test results prior to comparison with specified criteria values.

Quality Control Report

Workorder: L2598394 Report Date: 26-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
B-HWS-R511-WT	Soil							
Batch R5491436								
WG3555788-4 DUP		**L2598752-4**						
Boron (B), Hot Water Ext.		0.15	0.15		ug/g	0.1	30	16-JUN-21
WG3555788-2 IRM		**WT SAR4**						
Boron (B), Hot Water Ext.			102.1		%		70-130	16-JUN-21
WG3555788-3 LCS								
Boron (B), Hot Water Ext.			102.0		%		70-130	16-JUN-21
WG3555788-1 MB								
Boron (B), Hot Water Ext.			<0.10		ug/g		0.1	16-JUN-21
Batch R5492417								
WG3556448-4 DUP		**L2601611-1**						
Boron (B), Hot Water Ext.		8.6	6.6		ug/g	26	30	17-JUN-21
WG3556448-2 IRM		**WT SAR4**						
Boron (B), Hot Water Ext.			107.5		%		70-130	17-JUN-21
WG3556448-3 LCS								
Boron (B), Hot Water Ext.			101.0		%		70-130	17-JUN-21
WG3556448-1 MB								
Boron (B), Hot Water Ext.			<0.10		ug/g		0.1	17-JUN-21
CN-WAD-R511-WT	Soil							
Batch R5491363								
WG3554831-3 DUP		**L2593022-4**						
Cyanide, Weak Acid Diss		<0.050	<0.050	RPD-NA	ug/g	N/A	35	16-JUN-21
WG3554831-2 LCS								
Cyanide, Weak Acid Diss			90.0		%		80-120	16-JUN-21
WG3554831-1 MB								
Cyanide, Weak Acid Diss			<0.050		ug/g		0.05	16-JUN-21
WG3554831-4 MS		**L2593022-4**						
Cyanide, Weak Acid Diss			90.0		%		70-130	16-JUN-21
Batch R5495246								
WG3559427-3 DUP		**L2598394-2**						
Cyanide, Weak Acid Diss		<0.050	<0.050	RPD-NA	ug/g	N/A	35	22-JUN-21
WG3559427-2 LCS								
Cyanide, Weak Acid Diss			84.3		%		80-120	22-JUN-21
WG3559427-1 MB								
Cyanide, Weak Acid Diss			<0.050		ug/g		0.05	22-JUN-21
WG3559427-4 MS		**L2598394-2**						
Cyanide, Weak Acid Diss			79.3		%		70-130	22-JUN-21
CR-CR6-IC-WT	Soil							

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
CR-CR6-IC-WT	Soil							
Batch R5491649								
WG3554418-4 CRM		**WT-SQC012**						
Chromium, Hexavalent			90.3		%		70-130	16-JUN-21
WG3554418-3 DUP		**L2598066-9**						
Chromium, Hexavalent		0.23	<0.20	RPD-NA	ug/g	N/A	35	16-JUN-21
WG3554418-2 LCS								
Chromium, Hexavalent			89.2		%		80-120	16-JUN-21
WG3554418-1 MB								
Chromium, Hexavalent			<0.20		ug/g		0.2	16-JUN-21
Batch R5495185								
WG3559170-4 CRM		**WT-SQC012**						
Chromium, Hexavalent			79.4		%		70-130	22-JUN-21
WG3559170-3 DUP		**L2598394-2**						
Chromium, Hexavalent		0.56	0.40		ug/g	33	35	22-JUN-21
WG3559170-2 LCS								
Chromium, Hexavalent			98.9		%		80-120	22-JUN-21
WG3559170-1 MB								
Chromium, Hexavalent			<0.20		ug/g		0.2	22-JUN-21
EC-WT	Soil							
Batch R5491754								
WG3555789-4 DUP		**WG3555789-3**						
Conductivity		0.305	0.319		mS/cm	4.5	20	16-JUN-21
WG3555789-2 IRM		**WT SAR4**						
Conductivity			105.0		%		70-130	16-JUN-21
WG3556146-1 LCS								
Conductivity			97.4		%		90-110	16-JUN-21
WG3555789-1 MB								
Conductivity			<0.0040		mS/cm		0.004	16-JUN-21
Batch R5492553								
WG3556601-4 DUP		**WG3556601-3**						
Conductivity		0.0911	0.0922		mS/cm	1.2	20	17-JUN-21
WG3556601-2 IRM		**WT SAR4**						
Conductivity			110.5		%		70-130	17-JUN-21
WG3557470-1 LCS								
Conductivity			94.9		%		90-110	17-JUN-21
WG3556601-1 MB								
Conductivity			<0.0040		mS/cm		0.004	17-JUN-21
F1-HS-511-WT	Soil							

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
F1-HS-511-WT	Soil							
Batch R5491204								
WG3551359-9 DUP		**WG3551359-8**						
F1 (C6-C10)		<5.0	<5.0	RPD-NA	ug/g	N/A	30	16-JUN-21
WG3551359-7 LCS								
F1 (C6-C10)			107.4		%		80-120	16-JUN-21
WG3551359-6 MB								
F1 (C6-C10)			<5.0		ug/g		5	16-JUN-21
Surrogate: 3,4-Dichlorotoluene			88.3		%		60-140	16-JUN-21
WG3551359-10 MS		**WG3551359-8**						
F1 (C6-C10)			107.0		%		60-140	16-JUN-21
Batch R5494363								
WG3554068-9 DUP		**WG3554068-8**						
F1 (C6-C10)		<5.0	<5.0	RPD-NA	ug/g	N/A	30	21-JUN-21
WG3554068-7 LCS								
F1 (C6-C10)			111.2		%		80-120	21-JUN-21
WG3554068-6 MB								
F1 (C6-C10)			<5.0		ug/g		5	21-JUN-21
Surrogate: 3,4-Dichlorotoluene			111.3		%		60-140	21-JUN-21
WG3554068-10 MS		**WG3554068-8**						
F1 (C6-C10)			121.2		%		60-140	21-JUN-21
F2-F4-511-WT	Soil							
Batch R5495163								
WG3554834-3 DUP		**WG3554834-5**						
F2 (C10-C16)		<10	<10	RPD-NA	ug/g	N/A	30	22-JUN-21
F3 (C16-C34)		<50	<50	RPD-NA	ug/g	N/A	30	22-JUN-21
F4 (C34-C50)		<50	<50	RPD-NA	ug/g	N/A	30	22-JUN-21
WG3554834-2 LCS								
F2 (C10-C16)			111.0		%		80-120	22-JUN-21
F3 (C16-C34)			110.3		%		80-120	22-JUN-21
F4 (C34-C50)			93.0		%		80-120	22-JUN-21
WG3554834-1 MB								
F2 (C10-C16)			<10		ug/g		10	22-JUN-21
F3 (C16-C34)			<50		ug/g		50	22-JUN-21
F4 (C34-C50)			<50		ug/g		50	22-JUN-21
Surrogate: 2-Bromobenzotrifluoride			100.5		%		60-140	22-JUN-21
WG3554834-4 MS		**WG3554834-5**						
F2 (C10-C16)			105.9		%		60-140	22-JUN-21
F3 (C16-C34)			108.7		%		60-140	22-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
F2-F4-511-WT	Soil							
Batch R5495163								
WG3554834-4 MS		**WG3554834-5**						
F4 (C34-C50)			90.0		%		60-140	22-JUN-21
Batch R5495431								
WG3559139-3 DUP		**WG3559139-5**						
F2 (C10-C16)		<10	<10	RPD-NA	ug/g	N/A	30	22-JUN-21
F3 (C16-C34)		<50	<50	RPD-NA	ug/g	N/A	30	22-JUN-21
F4 (C34-C50)		<50	<50	RPD-NA	ug/g	N/A	30	22-JUN-21
WG3559139-2 LCS								
F2 (C10-C16)			98.4		%		80-120	22-JUN-21
F3 (C16-C34)			94.0		%		80-120	22-JUN-21
F4 (C34-C50)			86.7		%		80-120	22-JUN-21
WG3559139-1 MB								
F2 (C10-C16)			<10		ug/g		10	22-JUN-21
F3 (C16-C34)			<50		ug/g		50	22-JUN-21
F4 (C34-C50)			<50		ug/g		50	22-JUN-21
Surrogate: 2-Bromobenzotrifluoride			84.3		%		60-140	22-JUN-21
WG3559139-4 MS		**WG3559139-5**						
F2 (C10-C16)			103.6		%		60-140	22-JUN-21
F3 (C16-C34)			96.2		%		60-140	22-JUN-21
F4 (C34-C50)			91.8		%		60-140	22-JUN-21
F4G-ADD-511-WT	Soil							
Batch R5497487								
WG3561710-2 LCS								
F4G-SG (GHH-Silica)			68.6		%		60-140	19-JUN-21
WG3561710-1 MB								
F4G-SG (GHH-Silica)			<250		ug/g		250	19-JUN-21
GRAIN SIZE-HYD-SK	Soil							
Batch R5493254								
WG3554374-1 DUP		**L2598899-16**						
Gravel (4.75mm - 3in.)		<1.0	<1.0	RPD-NA	%	N/A	25	18-JUN-21
Coarse Sand (2.0mm - 4.75mm)		<1.0	<1.0	RPD-NA	%	N/A	5	18-JUN-21
Medium Sand (0.425mm - 2.0mm)		1.2	1.2	J	%	0.1	5	18-JUN-21
Fine Sand (0.075mm - 0.425mm)		2.6	2.4	J	%	0.2	5	18-JUN-21
Silt (0.005mm - 0.075mm)		19.7	17.8	J	%	1.8	5	18-JUN-21
Clay (<0.005mm)		75.5	77.6	J	%	2.1	5	18-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
GRAIN SIZE-HYD-SK	Soil							
Batch R5493254								
WG3554374-1 DUP		**L2598899-16**						
Silt (0.002mm - 0.075mm)		32.7	31.5	J	%	1.2	5	18-JUN-21
Clay (<0.002mm)		62.5	63.9	J	%	1.5	5	18-JUN-21
WG3554374-2 IRM		**2020-PSA_SOIL**						
Medium Sand (0.425mm - 2.0mm)			7.1		%		2-12	18-JUN-21
Fine Sand (0.075mm - 0.425mm)			36.2		%		29.6-39.6	18-JUN-21
Silt (0.005mm - 0.075mm)			29.9		%		27.4-37.4	18-JUN-21
Clay (<0.005mm)			26.8		%		21-31	18-JUN-21
Silt (0.002mm - 0.075mm)			34.7		%		32.3-42.3	18-JUN-21
Clay (<0.002mm)			22.0		%		16.1-26.1	18-JUN-21
HG-200.2-CVAA-WT	Soil							
Batch R5491251								
WG3555784-2 CRM		**WT-SS-2**						
Mercury (Hg)			103.7		%		70-130	16-JUN-21
WG3555784-6 DUP		**WG3555784-5**						
Mercury (Hg)		0.0083	0.0090		ug/g	7.4	40	16-JUN-21
WG3555784-3 LCS								
Mercury (Hg)			103.5		%		80-120	16-JUN-21
WG3555784-1 MB								
Mercury (Hg)			<0.0050		mg/kg		0.005	16-JUN-21
Batch R5492234								
WG3556292-2 CRM		**WT-SS-2**						
Mercury (Hg)			103.4		%		70-130	17-JUN-21
WG3556292-6 DUP		**WG3556292-5**						
Mercury (Hg)		0.0081	0.0072		ug/g	12	40	17-JUN-21
WG3556292-3 LCS								
Mercury (Hg)			100.0		%		80-120	17-JUN-21
WG3556292-1 MB								
Mercury (Hg)			<0.0050		mg/kg		0.005	17-JUN-21
MET-200.2-CCMS-WT	Soil							
Batch R5491395								
WG3554564-2 CRM		**WT-SS-2**						
Antimony (Sb)			94.9		%		70-130	16-JUN-21
Arsenic (As)			111.6		%		70-130	16-JUN-21
Barium (Ba)			120.3		%		70-130	16-JUN-21
Beryllium (Be)			103.2		%		70-130	16-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5491395								
WG3554564-2 CRM		**WT-SS-2**						
Boron (B)			9.5		mg/kg		3.5-13.5	16-JUN-21
Cadmium (Cd)			101.4		%		70-130	16-JUN-21
Chromium (Cr)			109.8		%		70-130	16-JUN-21
Cobalt (Co)			104.8		%		70-130	16-JUN-21
Copper (Cu)			104.9		%		70-130	16-JUN-21
Lead (Pb)			101.3		%		70-130	16-JUN-21
Molybdenum (Mo)			105.3		%		70-130	16-JUN-21
Nickel (Ni)			103.3		%		70-130	16-JUN-21
Selenium (Se)			0.13		mg/kg		0-0.34	16-JUN-21
Silver (Ag)			110.1		%		70-130	16-JUN-21
Thallium (Tl)			0.075		mg/kg		0.029-0.129	16-JUN-21
Uranium (U)			116.0		%		70-130	16-JUN-21
Vanadium (V)			109.5		%		70-130	16-JUN-21
Zinc (Zn)			103.8		%		70-130	16-JUN-21
WG3554564-6 DUP		**WG3554564-5**						
Antimony (Sb)		<0.10	<0.10	RPD-NA	ug/g	N/A	30	16-JUN-21
Arsenic (As)		2.33	2.27		ug/g	3.0	30	16-JUN-21
Barium (Ba)		46.8	42.3		ug/g	10	40	16-JUN-21
Beryllium (Be)		0.29	0.27		ug/g	6.6	30	16-JUN-21
Boron (B)		6.0	5.2		ug/g	14	30	16-JUN-21
Cadmium (Cd)		0.049	0.048		ug/g	2.6	30	16-JUN-21
Chromium (Cr)		12.3	11.3		ug/g	8.7	30	16-JUN-21
Cobalt (Co)		4.81	4.65		ug/g	3.4	30	16-JUN-21
Copper (Cu)		11.9	11.4		ug/g	4.7	30	16-JUN-21
Lead (Pb)		5.70	5.60		ug/g	1.7	40	16-JUN-21
Molybdenum (Mo)		0.27	0.24		ug/g	13	40	16-JUN-21
Nickel (Ni)		10.8	10.0		ug/g	6.8	30	16-JUN-21
Selenium (Se)		<0.20	<0.20	RPD-NA	ug/g	N/A	30	16-JUN-21
Silver (Ag)		<0.10	<0.10	RPD-NA	ug/g	N/A	40	16-JUN-21
Thallium (Tl)		0.078	0.075		ug/g	4.4	30	16-JUN-21
Uranium (U)		0.432	0.393		ug/g	9.6	30	16-JUN-21
Vanadium (V)		22.6	20.6		ug/g	9.4	30	16-JUN-21
Zinc (Zn)		25.5	24.1		ug/g	5.9	30	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5491395								
WG3554564-4 LCS								
Antimony (Sb)			101.7		%		80-120	16-JUN-21
Arsenic (As)			101.7		%		80-120	16-JUN-21
Barium (Ba)			97.7		%		80-120	16-JUN-21
Beryllium (Be)			93.1		%		80-120	16-JUN-21
Boron (B)			93.5		%		80-120	16-JUN-21
Cadmium (Cd)			97.5		%		80-120	16-JUN-21
Chromium (Cr)			99.3		%		80-120	16-JUN-21
Cobalt (Co)			98.9		%		80-120	16-JUN-21
Copper (Cu)			96.7		%		80-120	16-JUN-21
Lead (Pb)			97.3		%		80-120	16-JUN-21
Molybdenum (Mo)			99.5		%		80-120	16-JUN-21
Nickel (Ni)			97.4		%		80-120	16-JUN-21
Selenium (Se)			99.6		%		80-120	16-JUN-21
Silver (Ag)			94.6		%		80-120	16-JUN-21
Thallium (Tl)			101.3		%		80-120	16-JUN-21
Uranium (U)			92.5		%		80-120	16-JUN-21
Vanadium (V)			101.9		%		80-120	16-JUN-21
Zinc (Zn)			98.6		%		80-120	16-JUN-21
WG3554564-1 MB								
Antimony (Sb)			<0.10		mg/kg		0.1	16-JUN-21
Arsenic (As)			<0.10		mg/kg		0.1	16-JUN-21
Barium (Ba)			<0.50		mg/kg		0.5	16-JUN-21
Beryllium (Be)			<0.10		mg/kg		0.1	16-JUN-21
Boron (B)			<5.0		mg/kg		5	16-JUN-21
Cadmium (Cd)			<0.020		mg/kg		0.02	16-JUN-21
Chromium (Cr)			<0.50		mg/kg		0.5	16-JUN-21
Cobalt (Co)			<0.10		mg/kg		0.1	16-JUN-21
Copper (Cu)			<0.50		mg/kg		0.5	16-JUN-21
Lead (Pb)			<0.50		mg/kg		0.5	16-JUN-21
Molybdenum (Mo)			<0.10		mg/kg		0.1	16-JUN-21
Nickel (Ni)			<0.50		mg/kg		0.5	16-JUN-21
Selenium (Se)			<0.20		mg/kg		0.2	16-JUN-21
Silver (Ag)			<0.10		mg/kg		0.1	16-JUN-21
Thallium (Tl)			<0.050		mg/kg		0.05	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5491395								
WG3554564-1 MB								
Uranium (U)			<0.050		mg/kg		0.05	16-JUN-21
Vanadium (V)			<0.20		mg/kg		0.2	16-JUN-21
Zinc (Zn)			<2.0		mg/kg		2	16-JUN-21
Batch R5491529								
WG3554526-2 CRM		**WT-SS-2**						
Antimony (Sb)			93.8		%		70-130	15-JUN-21
Arsenic (As)			101.8		%		70-130	15-JUN-21
Barium (Ba)			110.2		%		70-130	15-JUN-21
Beryllium (Be)			87.3		%		70-130	15-JUN-21
Boron (B)			7.5		mg/kg		3.5-13.5	15-JUN-21
Cadmium (Cd)			97.4		%		70-130	15-JUN-21
Chromium (Cr)			90.9		%		70-130	15-JUN-21
Cobalt (Co)			94.9		%		70-130	15-JUN-21
Copper (Cu)			98.7		%		70-130	15-JUN-21
Lead (Pb)			96.4		%		70-130	15-JUN-21
Molybdenum (Mo)			95.0		%		70-130	15-JUN-21
Nickel (Ni)			98.4		%		70-130	15-JUN-21
Selenium (Se)			0.14		mg/kg		0-0.34	15-JUN-21
Silver (Ag)			78.3		%		70-130	15-JUN-21
Thallium (Tl)			0.066		mg/kg		0.029-0.129	15-JUN-21
Uranium (U)			88.8		%		70-130	15-JUN-21
Vanadium (V)			94.6		%		70-130	15-JUN-21
Zinc (Zn)			93.7		%		70-130	15-JUN-21
WG3554526-6 DUP		**WG3554526-5**						
Antimony (Sb)		0.12	0.12		ug/g	0.9	30	15-JUN-21
Arsenic (As)		4.25	4.46		ug/g	4.7	30	15-JUN-21
Barium (Ba)		97.1	94.5		ug/g	2.8	40	15-JUN-21
Beryllium (Be)		0.55	0.59		ug/g	6.7	30	15-JUN-21
Boron (B)		10.2	10.6		ug/g	3.8	30	15-JUN-21
Cadmium (Cd)		0.139	0.137		ug/g	1.6	30	15-JUN-21
Chromium (Cr)		20.6	21.6		ug/g	4.8	30	15-JUN-21
Cobalt (Co)		7.91	8.31		ug/g	5.0	30	15-JUN-21
Copper (Cu)		16.5	18.0		ug/g	8.8	30	15-JUN-21
Lead (Pb)		10.3	10.6		ug/g	3.0	40	15-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5491529								
WG3554526-6 DUP		**WG3554526-5**						
Molybdenum (Mo)		0.29	0.30		ug/g	2.5	40	15-JUN-21
Nickel (Ni)		17.3	18.2		ug/g	5.0	30	15-JUN-21
Selenium (Se)		<0.20	<0.20	RPD-NA	ug/g	N/A	30	15-JUN-21
Silver (Ag)		<0.10	<0.10	RPD-NA	ug/g	N/A	40	15-JUN-21
Thallium (Tl)		0.124	0.128		ug/g	3.0	30	15-JUN-21
Uranium (U)		0.479	0.486		ug/g	1.4	30	15-JUN-21
Vanadium (V)		32.8	34.4		ug/g	4.7	30	15-JUN-21
Zinc (Zn)		59.5	64.6		ug/g	8.2	30	15-JUN-21
WG3554526-4 LCS								
Antimony (Sb)			103.5		%		80-120	15-JUN-21
Arsenic (As)			101.8		%		80-120	15-JUN-21
Barium (Ba)			100.7		%		80-120	15-JUN-21
Beryllium (Be)			90.5		%		80-120	15-JUN-21
Boron (B)			91.0		%		80-120	15-JUN-21
Cadmium (Cd)			97.5		%		80-120	15-JUN-21
Chromium (Cr)			96.1		%		80-120	15-JUN-21
Cobalt (Co)			94.6		%		80-120	15-JUN-21
Copper (Cu)			94.8		%		80-120	15-JUN-21
Lead (Pb)			101.8		%		80-120	15-JUN-21
Molybdenum (Mo)			100.1		%		80-120	15-JUN-21
Nickel (Ni)			94.4		%		80-120	15-JUN-21
Selenium (Se)			96.8		%		80-120	15-JUN-21
Silver (Ag)			93.5		%		80-120	15-JUN-21
Thallium (Tl)			100.1		%		80-120	15-JUN-21
Uranium (U)			94.4		%		80-120	15-JUN-21
Vanadium (V)			98.1		%		80-120	15-JUN-21
Zinc (Zn)			95.9		%		80-120	15-JUN-21
WG3554526-1 MB								
Antimony (Sb)			<0.10		mg/kg		0.1	15-JUN-21
Arsenic (As)			<0.10		mg/kg		0.1	15-JUN-21
Barium (Ba)			<0.50		mg/kg		0.5	15-JUN-21
Beryllium (Be)			<0.10		mg/kg		0.1	15-JUN-21
Boron (B)			<5.0		mg/kg		5	15-JUN-21
Cadmium (Cd)			<0.020		mg/kg		0.02	15-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5491529								
WG3554526-1 MB								
Chromium (Cr)			<0.50		mg/kg		0.5	15-JUN-21
Cobalt (Co)			<0.10		mg/kg		0.1	15-JUN-21
Copper (Cu)			<0.50		mg/kg		0.5	15-JUN-21
Lead (Pb)			<0.50		mg/kg		0.5	15-JUN-21
Molybdenum (Mo)			<0.10		mg/kg		0.1	15-JUN-21
Nickel (Ni)			<0.50		mg/kg		0.5	15-JUN-21
Selenium (Se)			<0.20		mg/kg		0.2	15-JUN-21
Silver (Ag)			<0.10		mg/kg		0.1	15-JUN-21
Thallium (Tl)			<0.050		mg/kg		0.05	15-JUN-21
Uranium (U)			<0.050		mg/kg		0.05	15-JUN-21
Vanadium (V)			<0.20		mg/kg		0.2	15-JUN-21
Zinc (Zn)			<2.0		mg/kg		2	15-JUN-21
Batch R5492026								
WG3555784-2 CRM		**WT-SS-2**						
Antimony (Sb)			89.3		%		70-130	16-JUN-21
Arsenic (As)			108.6		%		70-130	16-JUN-21
Barium (Ba)			113.5		%		70-130	16-JUN-21
Beryllium (Be)			98.2		%		70-130	16-JUN-21
Boron (B)			9.2		mg/kg		3.5-13.5	16-JUN-21
Cadmium (Cd)			118.0		%		70-130	16-JUN-21
Chromium (Cr)			104.6		%		70-130	16-JUN-21
Cobalt (Co)			102.6		%		70-130	16-JUN-21
Copper (Cu)			103.2		%		70-130	16-JUN-21
Lead (Pb)			103.3		%		70-130	16-JUN-21
Molybdenum (Mo)			101.3		%		70-130	16-JUN-21
Nickel (Ni)			103.3		%		70-130	16-JUN-21
Selenium (Se)			0.17		mg/kg		0-0.34	16-JUN-21
Silver (Ag)			113.3		%		70-130	16-JUN-21
Thallium (Tl)			0.076		mg/kg		0.029-0.129	16-JUN-21
Uranium (U)			95.7		%		70-130	16-JUN-21
Vanadium (V)			105.2		%		70-130	16-JUN-21
Zinc (Zn)			100.7		%		70-130	16-JUN-21
WG3555784-6 DUP		**WG3555784-5**						
Antimony (Sb)		<0.10	<0.10	RPD-NA	ug/g	N/A	30	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5492026								
WG3555784-6 DUP		**WG3555784-5**						
Arsenic (As)		2.72	2.55		ug/g	6.3	30	16-JUN-21
Barium (Ba)		49.2	47.4		ug/g	3.8	40	16-JUN-21
Beryllium (Be)		0.35	0.32		ug/g	9.0	30	16-JUN-21
Boron (B)		7.9	6.7		ug/g	16	30	16-JUN-21
Cadmium (Cd)		0.050	0.061		ug/g	20	30	16-JUN-21
Chromium (Cr)		15.3	14.8		ug/g	3.7	30	16-JUN-21
Cobalt (Co)		5.69	5.56		ug/g	2.4	30	16-JUN-21
Copper (Cu)		13.2	12.4		ug/g	6.2	30	16-JUN-21
Lead (Pb)		5.12	4.73		ug/g	8.0	40	16-JUN-21
Molybdenum (Mo)		0.37	0.36		ug/g	1.5	40	16-JUN-21
Nickel (Ni)		12.4	11.8		ug/g	4.7	30	16-JUN-21
Selenium (Se)		<0.20	<0.20	RPD-NA	ug/g	N/A	30	16-JUN-21
Silver (Ag)		<0.10	<0.10	RPD-NA	ug/g	N/A	40	16-JUN-21
Thallium (Tl)		0.075	0.066		ug/g	13	30	16-JUN-21
Uranium (U)		0.553	0.515		ug/g	7.0	30	16-JUN-21
Vanadium (V)		25.9	24.5		ug/g	5.3	30	16-JUN-21
Zinc (Zn)		29.2	29.2		ug/g	0.3	30	16-JUN-21
WG3555784-4 LCS								
Antimony (Sb)			116.7		%		80-120	16-JUN-21
Arsenic (As)			112.1		%		80-120	16-JUN-21
Barium (Ba)			117.0		%		80-120	16-JUN-21
Beryllium (Be)			96.9		%		80-120	16-JUN-21
Boron (B)			95.0		%		80-120	16-JUN-21
Cadmium (Cd)			110.9		%		80-120	16-JUN-21
Chromium (Cr)			107.1		%		80-120	16-JUN-21
Cobalt (Co)			105.8		%		80-120	16-JUN-21
Copper (Cu)			104.3		%		80-120	16-JUN-21
Lead (Pb)			114.0		%		80-120	16-JUN-21
Molybdenum (Mo)			113.9		%		80-120	16-JUN-21
Nickel (Ni)			104.5		%		80-120	16-JUN-21
Selenium (Se)			109.9		%		80-120	16-JUN-21
Silver (Ag)			109.6		%		80-120	16-JUN-21
Thallium (Tl)			118.6		%		80-120	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5492026								
WG3555784-4 LCS								
Uranium (U)			106.3		%		80-120	16-JUN-21
Vanadium (V)			109.4		%		80-120	16-JUN-21
Zinc (Zn)			107.5		%		80-120	16-JUN-21
WG3555784-1 MB								
Antimony (Sb)			<0.10		mg/kg		0.1	16-JUN-21
Arsenic (As)			<0.10		mg/kg		0.1	16-JUN-21
Barium (Ba)			<0.50		mg/kg		0.5	16-JUN-21
Beryllium (Be)			<0.10		mg/kg		0.1	16-JUN-21
Boron (B)			<5.0		mg/kg		5	16-JUN-21
Cadmium (Cd)			<0.020		mg/kg		0.02	16-JUN-21
Chromium (Cr)			<0.50		mg/kg		0.5	16-JUN-21
Cobalt (Co)			<0.10		mg/kg		0.1	16-JUN-21
Copper (Cu)			<0.50		mg/kg		0.5	16-JUN-21
Lead (Pb)			<0.50		mg/kg		0.5	16-JUN-21
Molybdenum (Mo)			<0.10		mg/kg		0.1	16-JUN-21
Nickel (Ni)			<0.50		mg/kg		0.5	16-JUN-21
Selenium (Se)			<0.20		mg/kg		0.2	16-JUN-21
Silver (Ag)			<0.10		mg/kg		0.1	16-JUN-21
Thallium (Tl)			<0.050		mg/kg		0.05	16-JUN-21
Uranium (U)			<0.050		mg/kg		0.05	16-JUN-21
Vanadium (V)			<0.20		mg/kg		0.2	16-JUN-21
Zinc (Zn)			<2.0		mg/kg		2	16-JUN-21
Batch R5492214								
WG3556292-2 CRM		**WT-SS-2**						
Antimony (Sb)			105.5		%		70-130	17-JUN-21
Arsenic (As)			105.4		%		70-130	17-JUN-21
Barium (Ba)			110.4		%		70-130	17-JUN-21
Beryllium (Be)			99.3		%		70-130	17-JUN-21
Boron (B)			8.7		mg/kg		3.5-13.5	17-JUN-21
Cadmium (Cd)			97.5		%		70-130	17-JUN-21
Chromium (Cr)			101.3		%		70-130	17-JUN-21
Cobalt (Co)			98.7		%		70-130	17-JUN-21
Copper (Cu)			98.5		%		70-130	17-JUN-21
Lead (Pb)			99.3		%		70-130	17-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5492214								
WG3556292-2 CRM		**WT-SS-2**						
Molybdenum (Mo)			100.8		%		70-130	17-JUN-21
Nickel (Ni)			102.9		%		70-130	17-JUN-21
Selenium (Se)			0.14		mg/kg		0-0.34	17-JUN-21
Silver (Ag)			116.5		%		70-130	17-JUN-21
Thallium (Tl)			0.067		mg/kg		0.029-0.129	17-JUN-21
Uranium (U)			89.9		%		70-130	17-JUN-21
Vanadium (V)			102.6		%		70-130	17-JUN-21
Zinc (Zn)			98.1		%		70-130	17-JUN-21
WG3556292-6 DUP		**WG3556292-5**						
Antimony (Sb)		<0.10	<0.10	RPD-NA	ug/g	N/A	30	17-JUN-21
Arsenic (As)		4.35	3.97		ug/g	9.0	30	17-JUN-21
Barium (Ba)		287	262		ug/g	9.1	40	17-JUN-21
Beryllium (Be)		0.88	0.78		ug/g	12	30	17-JUN-21
Boron (B)		7.9	7.0		ug/g	11	30	17-JUN-21
Cadmium (Cd)		0.081	0.072		ug/g	12	30	17-JUN-21
Chromium (Cr)		55.7	50.7		ug/g	9.4	30	17-JUN-21
Cobalt (Co)		18.0	16.3		ug/g	10	30	17-JUN-21
Copper (Cu)		31.6	29.4		ug/g	7.2	30	17-JUN-21
Lead (Pb)		7.44	6.98		ug/g	6.4	40	17-JUN-21
Molybdenum (Mo)		0.47	0.39		ug/g	17	40	17-JUN-21
Nickel (Ni)		34.4	31.6		ug/g	8.5	30	17-JUN-21
Selenium (Se)		<0.20	<0.20	RPD-NA	ug/g	N/A	30	17-JUN-21
Silver (Ag)		<0.10	<0.10	RPD-NA	ug/g	N/A	40	17-JUN-21
Thallium (Tl)		0.261	0.237		ug/g	9.7	30	17-JUN-21
Uranium (U)		0.627	0.570		ug/g	9.4	30	17-JUN-21
Vanadium (V)		80.1	72.8		ug/g	9.5	30	17-JUN-21
Zinc (Zn)		87.0	80.8		ug/g	7.3	30	17-JUN-21
WG3556292-4 LCS								
Antimony (Sb)			101.4		%		80-120	17-JUN-21
Arsenic (As)			100.1		%		80-120	17-JUN-21
Barium (Ba)			100.6		%		80-120	17-JUN-21
Beryllium (Be)			92.3		%		80-120	17-JUN-21
Boron (B)			91.3		%		80-120	17-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-200.2-CCMS-WT	Soil							
Batch R5492214								
WG3556292-4 LCS								
Cadmium (Cd)			98.0		%		80-120	17-JUN-21
Chromium (Cr)			98.8		%		80-120	17-JUN-21
Cobalt (Co)			96.9		%		80-120	17-JUN-21
Copper (Cu)			97.1		%		80-120	17-JUN-21
Lead (Pb)			92.7		%		80-120	17-JUN-21
Molybdenum (Mo)			98.7		%		80-120	17-JUN-21
Nickel (Ni)			97.3		%		80-120	17-JUN-21
Selenium (Se)			95.1		%		80-120	17-JUN-21
Silver (Ag)			98.1		%		80-120	17-JUN-21
Thallium (Tl)			93.4		%		80-120	17-JUN-21
Uranium (U)			88.5		%		80-120	17-JUN-21
Vanadium (V)			102.1		%		80-120	17-JUN-21
Zinc (Zn)			98.6		%		80-120	17-JUN-21
WG3556292-1 MB								
Antimony (Sb)			<0.10		mg/kg		0.1	17-JUN-21
Arsenic (As)			<0.10		mg/kg		0.1	17-JUN-21
Barium (Ba)			<0.50		mg/kg		0.5	17-JUN-21
Beryllium (Be)			<0.10		mg/kg		0.1	17-JUN-21
Boron (B)			<5.0		mg/kg		5	17-JUN-21
Cadmium (Cd)			<0.020		mg/kg		0.02	17-JUN-21
Chromium (Cr)			<0.50		mg/kg		0.5	17-JUN-21
Cobalt (Co)			<0.10		mg/kg		0.1	17-JUN-21
Copper (Cu)			<0.50		mg/kg		0.5	17-JUN-21
Lead (Pb)			<0.50		mg/kg		0.5	17-JUN-21
Molybdenum (Mo)			<0.10		mg/kg		0.1	17-JUN-21
Nickel (Ni)			<0.50		mg/kg		0.5	17-JUN-21
Selenium (Se)			<0.20		mg/kg		0.2	17-JUN-21
Silver (Ag)			<0.10		mg/kg		0.1	17-JUN-21
Thallium (Tl)			<0.050		mg/kg		0.05	17-JUN-21
Uranium (U)			<0.050		mg/kg		0.05	17-JUN-21
Vanadium (V)			<0.20		mg/kg		0.2	17-JUN-21
Zinc (Zn)			<2.0		mg/kg		2	17-JUN-21
MOISTURE-WT	Soil							

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MOISTURE-WT	Soil							
Batch R5490370								
WG3554601-3 DUP		**L2598394-18**						
% Moisture		25.9	26.4		%	2.2	20	15-JUN-21
WG3554601-2 LCS								
% Moisture			101.0		%		90-110	15-JUN-21
WG3554601-1 MB								
% Moisture			<0.25		%		0.25	15-JUN-21
Batch R5490372								
WG3554523-3 DUP		**L2598394-8**						
% Moisture		25.1	25.4		%	1.3	20	15-JUN-21
WG3554523-2 LCS								
% Moisture			100.9		%		90-110	15-JUN-21
WG3554523-1 MB								
% Moisture			<0.25		%		0.25	15-JUN-21
Batch R5492816								
WG3557790-3 DUP		**L2598394-2**						
% Moisture		22.4	22.6		%	1.0	20	18-JUN-21
WG3557790-2 LCS								
% Moisture			100.8		%		90-110	18-JUN-21
WG3557790-1 MB								
% Moisture			<0.25		%		0.25	18-JUN-21
OCP-TRACE-WT	Soil							
Batch R5494372								
WG3556375-3 DUP		**WG3556375-5**						
Aldrin		<0.0020	<0.0020	RPD-NA	ug/g	N/A	50	21-JUN-21
alpha-BHC		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
beta-BHC		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
delta-BHC		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
a-chlordane		<0.0030	<0.0030	RPD-NA	ug/g	N/A	50	21-JUN-21
g-chlordane		<0.0030	<0.0030	RPD-NA	ug/g	N/A	50	21-JUN-21
o,p-DDD		0.0122	0.0120		ug/g	2.0	50	21-JUN-21
pp-DDD		<0.0380	<0.0380	RPD-NA	ug/g	N/A	50	21-JUN-21
o,p-DDE		<0.0030	<0.0030	RPD-NA	ug/g	N/A	50	21-JUN-21
pp-DDE		0.0419	0.0402		ug/g	4.0	50	21-JUN-21
op-DDT		<0.0030	<0.0030	RPD-NA	ug/g	N/A	50	21-JUN-21
pp-DDT		<0.0090	<0.0090	RPD-NA	ug/g	N/A	50	21-JUN-21
Dieldrin		0.0135	0.0149		ug/g	10	50	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5494372								
WG3556375-3 DUP		**WG3556375-5**						
alpha-Endosulfan		<0.0030	<0.0030	RPD-NA	ug/g	N/A	50	21-JUN-21
beta-Endosulfan		<0.0030	<0.0030	RPD-NA	ug/g	N/A	50	21-JUN-21
Endosulfan Sulfate		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Endrin		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Endrin Aldehyde		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Heptachlor		<0.0020	<0.0020	RPD-NA	ug/g	N/A	50	21-JUN-21
Heptachlor Epoxide		<0.0020	<0.0020	RPD-NA	ug/g	N/A	50	21-JUN-21
Hexachlorobenzene		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Hexachlorobutadiene		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Hexachloroethane		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Lindane		<0.0020	<0.0020	RPD-NA	ug/g	N/A	50	21-JUN-21
Methoxychlor		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Mirex		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Oxychlordane		<0.0030	<0.0030	RPD-NA	ug/g	N/A	50	21-JUN-21
Pentachloronitrobenzene		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
Trans-nonachlor		<0.0050	<0.0050	RPD-NA	ug/g	N/A	50	21-JUN-21
WG3556375-2 LCS								
Aldrin			109.1		%		50-150	21-JUN-21
alpha-BHC			105.9		%		50-150	21-JUN-21
beta-BHC			99.4		%		50-150	21-JUN-21
delta-BHC			95.3		%		50-150	21-JUN-21
a-chlordane			118.3		%		50-150	21-JUN-21
g-chlordane			120.7		%		50-150	21-JUN-21
o,p-DDD			107.2		%		50-150	21-JUN-21
pp-DDD			104.3		%		50-150	21-JUN-21
o,p-DDE			103.5		%		50-150	21-JUN-21
pp-DDE			114.8		%		50-150	21-JUN-21
op-DDT			126.0		%		50-150	21-JUN-21
pp-DDT			113.0		%		50-150	21-JUN-21
Dieldrin			118.6		%		50-150	21-JUN-21
alpha-Endosulfan			116.0		%		50-150	21-JUN-21
beta-Endosulfan			122.8		%		50-150	21-JUN-21
Endosulfan Sulfate			115.3		%		50-150	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
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Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5494372								
WG3556375-2 LCS								
Endrin			96.0		%		50-150	21-JUN-21
Endrin Aldehyde			111.5		%		50-150	21-JUN-21
Heptachlor			100.6		%		50-150	21-JUN-21
Heptachlor Epoxide			120.8		%		50-150	21-JUN-21
Hexachlorobenzene			102.5		%		50-150	21-JUN-21
Hexachlorobutadiene			95.6		%		50-150	21-JUN-21
Hexachloroethane			112.3		%		50-150	21-JUN-21
Lindane			102.7		%		50-150	21-JUN-21
Methoxychlor			114.4		%		50-150	21-JUN-21
Mirex			138.5		%		50-150	21-JUN-21
Oxychlordane			116.2		%		50-150	21-JUN-21
Pentachloronitrobenzene			100.7		%		50-150	21-JUN-21
Trans-nonachlor			119.9		%		50-150	21-JUN-21
WG3556375-1 MB								
Aldrin			<0.00020		ug/g		0.0002	21-JUN-21
alpha-BHC			<0.00050		ug/g		0.0005	21-JUN-21
beta-BHC			<0.00050		ug/g		0.0005	21-JUN-21
delta-BHC			<0.00050		ug/g		0.0005	21-JUN-21
a-chlordane			<0.00030		ug/g		0.0003	21-JUN-21
g-chlordane			<0.00030		ug/g		0.0003	21-JUN-21
o,p-DDD			<0.00030		ug/g		0.0003	21-JUN-21
pp-DDD			<0.00030		ug/g		0.0003	21-JUN-21
o,p-DDE			<0.00030		ug/g		0.0003	21-JUN-21
pp-DDE			<0.00030		ug/g		0.0003	21-JUN-21
op-DDT			<0.00030		ug/g		0.0003	21-JUN-21
pp-DDT			<0.00030		ug/g		0.0003	21-JUN-21
Dieldrin			<0.00020		ug/g		0.0002	21-JUN-21
alpha-Endosulfan			<0.00030		ug/g		0.0003	21-JUN-21
beta-Endosulfan			<0.00030		ug/g		0.0003	21-JUN-21
Endosulfan Sulfate			<0.00050		ug/g		0.0005	21-JUN-21
Endrin			<0.00050		ug/g		0.0005	21-JUN-21
Endrin Aldehyde			<0.00050		ug/g		0.0005	21-JUN-21
Heptachlor			<0.00020		ug/g		0.0002	21-JUN-21
Heptachlor Epoxide			<0.00020		ug/g		0.0002	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5494372								
WG3556375-1 MB								
Hexachlorobenzene			<0.00050		ug/g		0.0005	21-JUN-21
Hexachlorobutadiene			<0.00050		ug/g		0.0005	21-JUN-21
Hexachloroethane			<0.00050		ug/g		0.0005	21-JUN-21
Lindane			<0.00020		ug/g		0.0002	21-JUN-21
Methoxychlor			<0.00050		ug/g		0.0005	21-JUN-21
Mirex			<0.00050		ug/g		0.0005	21-JUN-21
Oxychlordane			<0.00030		ug/g		0.0003	21-JUN-21
Pentachloronitrobenzene			<0.00050		ug/g		0.0005	21-JUN-21
Trans-nonachlor			<0.00050		ug/g		0.0005	21-JUN-21
Surrogate: Tetrachloro-m-xylene			130.0		%		50-150	21-JUN-21
Surrogate: Decachlorobiphenyl			159.1	SURQC	%		50-150	21-JUN-21
WG3556375-4 MS		**WG3556375-5**						
Aldrin			111.1		%		50-150	21-JUN-21
alpha-BHC			99.4		%		50-150	21-JUN-21
beta-BHC			88.4		%		50-150	21-JUN-21
delta-BHC			97.7		%		50-150	21-JUN-21
a-chlordane			115.5		%		50-150	21-JUN-21
g-chlordane			114.7		%		50-150	21-JUN-21
o,p-DDD			214.0	K	%		50-150	21-JUN-21
pp-DDD			421.8	K	%		50-150	21-JUN-21
o,p-DDE			98.7		%		50-150	21-JUN-21
pp-DDE			414.1	K	%		50-150	21-JUN-21
op-DDT			80.8		%		50-150	21-JUN-21
pp-DDT			73.0		%		50-150	21-JUN-21
Dieldrin			195.8	K	%		50-150	21-JUN-21
alpha-Endosulfan			106.4		%		50-150	21-JUN-21
beta-Endosulfan			118.7		%		50-150	21-JUN-21
Endosulfan Sulfate			124.6		%		50-150	21-JUN-21
Endrin			96.7		%		50-150	21-JUN-21
Endrin Aldehyde			89.8		%		50-150	21-JUN-21
Heptachlor			79.0		%		50-150	21-JUN-21
Heptachlor Epoxide			114.5		%		50-150	21-JUN-21
Hexachlorobenzene			94.2		%		50-150	21-JUN-21
Hexachlorobutadiene			90.2		%		50-150	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5494372								
WG3556375-4 MS		**WG3556375-5**						
Hexachloroethane			94.0		%		50-150	21-JUN-21
Lindane			91.5		%		50-150	21-JUN-21
Methoxychlor			34.0	K	%		50-150	21-JUN-21
Mirex			124.9		%		50-150	21-JUN-21
Oxychlordane			99.4		%		50-150	21-JUN-21
Pentachloronitrobenzene			108.9		%		50-150	21-JUN-21
Trans-nonachlor			93.9		%		50-150	21-JUN-21
Batch R5496356								
WG3556535-8 DUP		**WG3556535-7**						
Aldrin		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	23-JUN-21
alpha-BHC		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
beta-BHC		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
delta-BHC		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
a-chlordane		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
g-chlordane		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
o,p-DDD		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
pp-DDD		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
o,p-DDE		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
pp-DDE		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
op-DDT		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
pp-DDT		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
Dieldrin		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	23-JUN-21
alpha-Endosulfan		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
beta-Endosulfan		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
Endosulfan Sulfate		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Endrin		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Endrin Aldehyde		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Heptachlor		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	23-JUN-21
Heptachlor Epoxide		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	23-JUN-21
Hexachlorobenzene		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Hexachlorobutadiene		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Hexachloroethane		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Lindane		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	23-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5496356								
WG3556535-8 DUP		**WG3556535-7**						
Methoxychlor		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Mirex		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Oxychlordane		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	23-JUN-21
Pentachloronitrobenzene		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
Trans-nonachlor		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	23-JUN-21
WG3556535-2 LCS								
Aldrin			107.5		%		50-150	23-JUN-21
alpha-BHC			109.5		%		50-150	23-JUN-21
beta-BHC			102.8		%		50-150	23-JUN-21
delta-BHC			108.9		%		50-150	23-JUN-21
a-chlordane			96.0		%		50-150	23-JUN-21
g-chlordane			97.9		%		50-150	23-JUN-21
o,p-DDD			90.9		%		50-150	23-JUN-21
pp-DDD			98.3		%		50-150	23-JUN-21
o,p-DDE			83.7		%		50-150	23-JUN-21
pp-DDE			91.8		%		50-150	23-JUN-21
op-DDT			102.4		%		50-150	23-JUN-21
pp-DDT			99.4		%		50-150	23-JUN-21
Dieldrin			95.0		%		50-150	23-JUN-21
alpha-Endosulfan			100.4		%		50-150	23-JUN-21
beta-Endosulfan			97.6		%		50-150	23-JUN-21
Endosulfan Sulfate			101.9		%		50-150	23-JUN-21
Endrin			79.5		%		50-150	23-JUN-21
Endrin Aldehyde			96.0		%		50-150	23-JUN-21
Heptachlor			116.5		%		50-150	23-JUN-21
Heptachlor Epoxide			106.5		%		50-150	23-JUN-21
Hexachlorobenzene			105.6		%		50-150	23-JUN-21
Hexachlorobutadiene			101.2		%		50-150	23-JUN-21
Hexachloroethane			111.4		%		50-150	23-JUN-21
Lindane			106.3		%		50-150	23-JUN-21
Methoxychlor			112.4		%		50-150	23-JUN-21
Mirex			113.8		%		50-150	23-JUN-21
Oxychlordane			88.5		%		50-150	23-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5496356								
WG3556535-2 LCS								
Pentachloronitrobenzene			109.2		%		50-150	23-JUN-21
Trans-nonachlor			98.8		%		50-150	23-JUN-21
WG3556535-1 MB								
Aldrin			<0.00020		ug/g		0.0002	23-JUN-21
alpha-BHC			<0.00050		ug/g		0.0005	23-JUN-21
beta-BHC			<0.00050		ug/g		0.0005	23-JUN-21
delta-BHC			<0.00050		ug/g		0.0005	23-JUN-21
a-chlordane			<0.00030		ug/g		0.0003	23-JUN-21
g-chlordane			<0.00030		ug/g		0.0003	23-JUN-21
o,p-DDD			<0.00030		ug/g		0.0003	23-JUN-21
pp-DDD			<0.00030		ug/g		0.0003	23-JUN-21
o,p-DDE			<0.00030		ug/g		0.0003	23-JUN-21
pp-DDE			<0.00030		ug/g		0.0003	23-JUN-21
op-DDT			<0.00030		ug/g		0.0003	23-JUN-21
pp-DDT			<0.00030		ug/g		0.0003	23-JUN-21
Dieldrin			<0.00020		ug/g		0.0002	23-JUN-21
alpha-Endosulfan			<0.00030		ug/g		0.0003	23-JUN-21
beta-Endosulfan			<0.00030		ug/g		0.0003	23-JUN-21
Endosulfan Sulfate			<0.00050		ug/g		0.0005	23-JUN-21
Endrin			<0.00050		ug/g		0.0005	23-JUN-21
Endrin Aldehyde			<0.00050		ug/g		0.0005	23-JUN-21
Heptachlor			<0.00020		ug/g		0.0002	23-JUN-21
Heptachlor Epoxide			<0.00020		ug/g		0.0002	23-JUN-21
Hexachlorobenzene			<0.00050		ug/g		0.0005	23-JUN-21
Hexachlorobutadiene			<0.00050		ug/g		0.0005	23-JUN-21
Hexachloroethane			<0.00050		ug/g		0.0005	23-JUN-21
Lindane			<0.00020		ug/g		0.0002	23-JUN-21
Methoxychlor			<0.00050		ug/g		0.0005	23-JUN-21
Mirex			<0.00050		ug/g		0.0005	23-JUN-21
Oxychlordane			<0.00030		ug/g		0.0003	23-JUN-21
Pentachloronitrobenzene			<0.00050		ug/g		0.0005	23-JUN-21
Trans-nonachlor			<0.00050		ug/g		0.0005	23-JUN-21
Surrogate: Tetrachloro-m-xylene			102.7		%		50-150	23-JUN-21
Surrogate: Decachlorobiphenyl			139.4		%		50-150	23-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5496356								
WG3556535-9 MS		**WG3556535-7**						
Aldrin			107.7		%		50-150	23-JUN-21
alpha-BHC			102.8		%		50-150	23-JUN-21
beta-BHC			96.7		%		50-150	23-JUN-21
delta-BHC			103.7		%		50-150	23-JUN-21
a-chlordane			97.0		%		50-150	23-JUN-21
g-chlordane			101.3		%		50-150	23-JUN-21
o,p-DDD			98.5		%		50-150	23-JUN-21
pp-DDD			101.2		%		50-150	23-JUN-21
o,p-DDE			89.5		%		50-150	23-JUN-21
pp-DDE			98.7		%		50-150	23-JUN-21
op-DDT			78.0		%		50-150	23-JUN-21
pp-DDT			85.6		%		50-150	23-JUN-21
Dieldrin			102.7		%		50-150	23-JUN-21
alpha-Endosulfan			96.6		%		50-150	23-JUN-21
beta-Endosulfan			105.7		%		50-150	23-JUN-21
Endosulfan Sulfate			106.2		%		50-150	23-JUN-21
Endrin			104.3		%		50-150	23-JUN-21
Endrin Aldehyde			88.2		%		50-150	23-JUN-21
Heptachlor			100.6		%		50-150	23-JUN-21
Heptachlor Epoxide			99.8		%		50-150	23-JUN-21
Hexachlorobenzene			94.3		%		50-150	23-JUN-21
Hexachlorobutadiene			91.9		%		50-150	23-JUN-21
Hexachloroethane			95.1		%		50-150	23-JUN-21
Lindane			99.4		%		50-150	23-JUN-21
Methoxychlor			92.4		%		50-150	23-JUN-21
Mirex			119.6		%		50-150	23-JUN-21
Oxychlordane			99.0		%		50-150	23-JUN-21
Pentachloronitrobenzene			106.9		%		50-150	23-JUN-21
Trans-nonachlor			94.7		%		50-150	23-JUN-21
Batch R5502217								
WG3558524-3 DUP		**WG3558524-5**						
Aldrin		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	25-JUN-21
alpha-BHC		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
beta-BHC		<0.00050	<0.00050		ug/g			25-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5502217								
WG3558524-3 DUP		**WG3558524-5**						
beta-BHC		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
delta-BHC		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
a-chlordane		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
g-chlordane		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
o,p-DDD		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
pp-DDD		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
o,p-DDE		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
pp-DDE		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
op-DDT		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
pp-DDT		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
Dieldrin		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	25-JUN-21
alpha-Endosulfan		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
beta-Endosulfan		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
Endosulfan Sulfate		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Endrin		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Endrin Aldehyde		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Heptachlor		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	25-JUN-21
Heptachlor Epoxide		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	25-JUN-21
Hexachlorobenzene		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Hexachlorobutadiene		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Hexachloroethane		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Lindane		<0.00020	<0.00020	RPD-NA	ug/g	N/A	50	25-JUN-21
Methoxychlor		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Mirex		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Oxychlordane		<0.00030	<0.00030	RPD-NA	ug/g	N/A	50	25-JUN-21
Pentachloronitrobenzene		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
Trans-nonachlor		<0.00050	<0.00050	RPD-NA	ug/g	N/A	50	25-JUN-21
WG3558524-2 LCS								
Aldrin			102.7		%		50-150	25-JUN-21
alpha-BHC			101.3		%		50-150	25-JUN-21
beta-BHC			96.5		%		50-150	25-JUN-21
delta-BHC			88.1		%		50-150	25-JUN-21
a-chlordane			123.0		%		50-150	25-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5502217								
WG3558524-2 LCS								
g-chlordane			134.2		%		50-150	25-JUN-21
o,p-DDD			120.6		%		50-150	25-JUN-21
pp-DDD			116.1		%		50-150	25-JUN-21
o,p-DDE			120.2		%		50-150	25-JUN-21
pp-DDE			133.0		%		50-150	25-JUN-21
op-DDT			101.8		%		50-150	25-JUN-21
pp-DDT			93.4		%		50-150	25-JUN-21
Dieldrin			136.6		%		50-150	25-JUN-21
alpha-Endosulfan			123.1		%		50-150	25-JUN-21
beta-Endosulfan			141.9		%		50-150	25-JUN-21
Endosulfan Sulfate			112.8		%		50-150	25-JUN-21
Endrin			78.5		%		50-150	25-JUN-21
Endrin Aldehyde			125.4		%		50-150	25-JUN-21
Heptachlor			87.5		%		50-150	25-JUN-21
Heptachlor Epoxide			130.7		%		50-150	25-JUN-21
Hexachlorobenzene			94.9		%		50-150	25-JUN-21
Hexachlorobutadiene			94.4		%		50-150	25-JUN-21
Hexachloroethane			99.3		%		50-150	25-JUN-21
Lindane			98.2		%		50-150	25-JUN-21
Methoxychlor			87.2		%		50-150	25-JUN-21
Mirex			143.1		%		50-150	25-JUN-21
Oxychlordane			133.7		%		50-150	25-JUN-21
Pentachloronitrobenzene			92.4		%		50-150	25-JUN-21
Trans-nonachlor			125.9		%		50-150	25-JUN-21
WG3558524-1 MB								
Aldrin			<0.00020		ug/g		0.0002	25-JUN-21
alpha-BHC			<0.00050		ug/g		0.0005	25-JUN-21
beta-BHC			<0.00050		ug/g		0.0005	25-JUN-21
delta-BHC			<0.00050		ug/g		0.0005	25-JUN-21
a-chlordane			<0.00030		ug/g		0.0003	25-JUN-21
g-chlordane			<0.00030		ug/g		0.0003	25-JUN-21
o,p-DDD			<0.00030		ug/g		0.0003	25-JUN-21
pp-DDD			<0.00030		ug/g		0.0003	25-JUN-21
o,p-DDE			<0.00030		ug/g		0.0003	25-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5502217								
WG3558524-1 MB								
pp-DDE			<0.00030		ug/g		0.0003	25-JUN-21
op-DDT			<0.00030		ug/g		0.0003	25-JUN-21
pp-DDT			<0.00030		ug/g		0.0003	25-JUN-21
Dieldrin			<0.00020		ug/g		0.0002	25-JUN-21
alpha-Endosulfan			<0.00030		ug/g		0.0003	25-JUN-21
beta-Endosulfan			<0.00030		ug/g		0.0003	25-JUN-21
Endosulfan Sulfate			<0.00050		ug/g		0.0005	25-JUN-21
Endrin			<0.00050		ug/g		0.0005	25-JUN-21
Endrin Aldehyde			<0.00050		ug/g		0.0005	25-JUN-21
Heptachlor			<0.00020		ug/g		0.0002	25-JUN-21
Heptachlor Epoxide			<0.00020		ug/g		0.0002	25-JUN-21
Hexachlorobenzene			<0.00050		ug/g		0.0005	25-JUN-21
Hexachlorobutadiene			<0.00050		ug/g		0.0005	25-JUN-21
Hexachloroethane			<0.00050		ug/g		0.0005	25-JUN-21
Lindane			<0.00020		ug/g		0.0002	25-JUN-21
Methoxychlor			<0.00050		ug/g		0.0005	25-JUN-21
Mirex			<0.00050		ug/g		0.0005	25-JUN-21
Oxychlordane			<0.00030		ug/g		0.0003	25-JUN-21
Pentachloronitrobenzene			<0.00050		ug/g		0.0005	25-JUN-21
Trans-nonachlor			<0.00050		ug/g		0.0005	25-JUN-21
Surrogate: Tetrachloro-m-xylene			97.9		%		50-150	25-JUN-21
Surrogate: Decachlorobiphenyl			135.6		%		50-150	25-JUN-21
WG3558524-4 MS		**WG3558524-5**						
Aldrin			100.8		%		50-150	25-JUN-21
alpha-BHC			98.5		%		50-150	25-JUN-21
beta-BHC			93.6		%		50-150	25-JUN-21
delta-BHC			99.9		%		50-150	25-JUN-21
a-chlordane			101.2		%		50-150	25-JUN-21
g-chlordane			108.3		%		50-150	25-JUN-21
o,p-DDD			101.6		%		50-150	25-JUN-21
pp-DDD			102.7		%		50-150	25-JUN-21
o,p-DDE			94.2		%		50-150	25-JUN-21
pp-DDE			104.4		%		50-150	25-JUN-21
op-DDT			84.5		%		50-150	25-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-TRACE-WT	Soil							
Batch R5502217								
WG3558524-4 MS		**WG3558524-5**						
pp-DDT			94.0		%		50-150	25-JUN-21
Dieldrin			110.6		%		50-150	25-JUN-21
alpha-Endosulfan			103.5		%		50-150	25-JUN-21
beta-Endosulfan			110.5		%		50-150	25-JUN-21
Endosulfan Sulfate			117.1		%		50-150	25-JUN-21
Endrin			107.2		%		50-150	25-JUN-21
Endrin Aldehyde			107.4		%		50-150	25-JUN-21
Heptachlor			89.7		%		50-150	25-JUN-21
Heptachlor Epoxide			113.3		%		50-150	25-JUN-21
Hexachlorobenzene			90.7		%		50-150	25-JUN-21
Hexachlorobutadiene			85.2		%		50-150	25-JUN-21
Hexachloroethane			92.6		%		50-150	25-JUN-21
Lindane			96.8		%		50-150	25-JUN-21
Methoxychlor			101.5		%		50-150	25-JUN-21
Mirex			124.0		%		50-150	25-JUN-21
Oxychlordane			105.5		%		50-150	25-JUN-21
Pentachloronitrobenzene			91.7		%		50-150	25-JUN-21
Trans-nonachlor			101.9		%		50-150	25-JUN-21
PAH-511-WT	Soil							
Batch R5491406								
WG3554081-3 DUP		**WG3554081-5**						
1-Methylnaphthalene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	16-JUN-21
2-Methylnaphthalene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	16-JUN-21
Acenaphthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Acenaphthylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Anthracene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Benzo(a)anthracene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Benzo(a)pyrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Benzo(b&j)fluoranthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Benzo(g,h,i)perylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Benzo(k)fluoranthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Chrysene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Dibenz(a,h)anthracene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
PAH-511-WT	Soil							
Batch R5491406								
WG3554081-3 DUP		**WG3554081-5**						
Fluoranthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Fluorene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Indeno(1,2,3-cd)pyrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Naphthalene		<0.013	<0.013	RPD-NA	ug/g	N/A	40	16-JUN-21
Phenanthrene		<0.046	<0.046	RPD-NA	ug/g	N/A	40	16-JUN-21
Pyrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
WG3554081-2 LCS								
1-Methylnaphthalene			95.8		%		50-140	16-JUN-21
2-Methylnaphthalene			90.6		%		50-140	16-JUN-21
Acenaphthene			92.2		%		50-140	16-JUN-21
Acenaphthylene			86.1		%		50-140	16-JUN-21
Anthracene			88.3		%		50-140	16-JUN-21
Benzo(a)anthracene			95.3		%		50-140	16-JUN-21
Benzo(a)pyrene			89.9		%		50-140	16-JUN-21
Benzo(b&j)fluoranthene			98.0		%		50-140	16-JUN-21
Benzo(g,h,i)perylene			89.3		%		50-140	16-JUN-21
Benzo(k)fluoranthene			89.5		%		50-140	16-JUN-21
Chrysene			95.6		%		50-140	16-JUN-21
Dibenz(a,h)anthracene			90.9		%		50-140	16-JUN-21
Fluoranthene			89.7		%		50-140	16-JUN-21
Fluorene			89.8		%		50-140	16-JUN-21
Indeno(1,2,3-cd)pyrene			81.4		%		50-140	16-JUN-21
Naphthalene			89.6		%		50-140	16-JUN-21
Phenanthrene			93.6		%		50-140	16-JUN-21
Pyrene			89.2		%		50-140	16-JUN-21
WG3554081-1 MB								
1-Methylnaphthalene			<0.030		ug/g		0.03	16-JUN-21
2-Methylnaphthalene			<0.030		ug/g		0.03	16-JUN-21
Acenaphthene			<0.050		ug/g		0.05	16-JUN-21
Acenaphthylene			<0.050		ug/g		0.05	16-JUN-21
Anthracene			<0.050		ug/g		0.05	16-JUN-21
Benzo(a)anthracene			<0.050		ug/g		0.05	16-JUN-21
Benzo(a)pyrene			<0.050		ug/g		0.05	16-JUN-21
Benzo(b&j)fluoranthene			<0.050		ug/g		0.05	16-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
PAH-511-WT	Soil							
Batch R5491406								
WG3554081-1 MB								
Benzo(g,h,i)perylene			<0.050		ug/g		0.05	16-JUN-21
Benzo(k)fluoranthene			<0.050		ug/g		0.05	16-JUN-21
Chrysene			<0.050		ug/g		0.05	16-JUN-21
Dibenz(a,h)anthracene			<0.050		ug/g		0.05	16-JUN-21
Fluoranthene			<0.050		ug/g		0.05	16-JUN-21
Fluorene			<0.050		ug/g		0.05	16-JUN-21
Indeno(1,2,3-cd)pyrene			<0.050		ug/g		0.05	16-JUN-21
Naphthalene			<0.013		ug/g		0.013	16-JUN-21
Phenanthrene			<0.046		ug/g		0.046	16-JUN-21
Pyrene			<0.050		ug/g		0.05	16-JUN-21
Surrogate: 2-Fluorobiphenyl			84.0		%		50-140	16-JUN-21
Surrogate: d14-Terphenyl			79.3		%		50-140	16-JUN-21
WG3554081-4 MS		**WG3554081-5**						
1-Methylnaphthalene			100.4		%		50-140	16-JUN-21
2-Methylnaphthalene			95.0		%		50-140	16-JUN-21
Acenaphthene			96.8		%		50-140	16-JUN-21
Acenaphthylene			90.4		%		50-140	16-JUN-21
Anthracene			93.5		%		50-140	16-JUN-21
Benzo(a)anthracene			100.5		%		50-140	16-JUN-21
Benzo(a)pyrene			95.1		%		50-140	16-JUN-21
Benzo(b&j)fluoranthene			101.8		%		50-140	16-JUN-21
Benzo(g,h,i)perylene			92.9		%		50-140	16-JUN-21
Benzo(k)fluoranthene			95.0		%		50-140	16-JUN-21
Chrysene			100.4		%		50-140	16-JUN-21
Dibenz(a,h)anthracene			95.0		%		50-140	16-JUN-21
Fluoranthene			94.9		%		50-140	16-JUN-21
Fluorene			94.7		%		50-140	16-JUN-21
Indeno(1,2,3-cd)pyrene			93.8		%		50-140	16-JUN-21
Naphthalene			93.7		%		50-140	16-JUN-21
Phenanthrene			98.3		%		50-140	16-JUN-21
Pyrene			94.2		%		50-140	16-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
PAH-511-WT	Soil							
Batch R5495620								
WG3559140-3 DUP		**WG3559140-5**						
1-Methylnaphthalene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	23-JUN-21
2-Methylnaphthalene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	23-JUN-21
Acenaphthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Acenaphthylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Anthracene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Benzo(a)anthracene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Benzo(a)pyrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Benzo(b&j)fluoranthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Benzo(g,h,i)perylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Benzo(k)fluoranthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Chrysene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Dibenz(a,h)anthracene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Fluoranthene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Fluorene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Indeno(1,2,3-cd)pyrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
Naphthalene		<0.013	<0.013	RPD-NA	ug/g	N/A	40	23-JUN-21
Phenanthrene		<0.046	<0.046	RPD-NA	ug/g	N/A	40	23-JUN-21
Pyrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	23-JUN-21
WG3559140-2 LCS								
1-Methylnaphthalene			97.8		%		50-140	23-JUN-21
2-Methylnaphthalene			95.7		%		50-140	23-JUN-21
Acenaphthene			94.2		%		50-140	23-JUN-21
Acenaphthylene			92.7		%		50-140	23-JUN-21
Anthracene			85.3		%		50-140	23-JUN-21
Benzo(a)anthracene			99.2		%		50-140	23-JUN-21
Benzo(a)pyrene			86.1		%		50-140	23-JUN-21
Benzo(b&j)fluoranthene			95.5		%		50-140	23-JUN-21
Benzo(g,h,i)perylene			93.8		%		50-140	23-JUN-21
Benzo(k)fluoranthene			92.1		%		50-140	23-JUN-21
Chrysene			92.6		%		50-140	23-JUN-21
Dibenz(a,h)anthracene			98.8		%		50-140	23-JUN-21
Fluoranthene			94.5		%		50-140	23-JUN-21
Fluorene			93.1		%		50-140	23-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
PAH-511-WT	Soil							
Batch R5495620								
WG3559140-2 LCS								
Indeno(1,2,3-cd)pyrene			109.9		%		50-140	23-JUN-21
Naphthalene			93.2		%		50-140	23-JUN-21
Phenanthrene			96.6		%		50-140	23-JUN-21
Pyrene			93.5		%		50-140	23-JUN-21
WG3559140-1 MB								
1-Methylnaphthalene			<0.030		ug/g		0.03	23-JUN-21
2-Methylnaphthalene			<0.030		ug/g		0.03	23-JUN-21
Acenaphthene			<0.050		ug/g		0.05	23-JUN-21
Acenaphthylene			<0.050		ug/g		0.05	23-JUN-21
Anthracene			<0.050		ug/g		0.05	23-JUN-21
Benzo(a)anthracene			<0.050		ug/g		0.05	23-JUN-21
Benzo(a)pyrene			<0.050		ug/g		0.05	23-JUN-21
Benzo(b&j)fluoranthene			<0.050		ug/g		0.05	23-JUN-21
Benzo(g,h,i)perylene			<0.050		ug/g		0.05	23-JUN-21
Benzo(k)fluoranthene			<0.050		ug/g		0.05	23-JUN-21
Chrysene			<0.050		ug/g		0.05	23-JUN-21
Dibenz(a,h)anthracene			<0.050		ug/g		0.05	23-JUN-21
Fluoranthene			<0.050		ug/g		0.05	23-JUN-21
Fluorene			<0.050		ug/g		0.05	23-JUN-21
Indeno(1,2,3-cd)pyrene			<0.050		ug/g		0.05	23-JUN-21
Naphthalene			<0.013		ug/g		0.013	23-JUN-21
Phenanthrene			<0.046		ug/g		0.046	23-JUN-21
Pyrene			<0.050		ug/g		0.05	23-JUN-21
Surrogate: 2-Fluorobiphenyl			94.2		%		50-140	23-JUN-21
Surrogate: d14-Terphenyl			99.5		%		50-140	23-JUN-21
WG3559140-4 MS		**WG3559140-5**						
1-Methylnaphthalene			98.0		%		50-140	23-JUN-21
2-Methylnaphthalene			95.2		%		50-140	23-JUN-21
Acenaphthene			94.0		%		50-140	23-JUN-21
Acenaphthylene			89.4		%		50-140	23-JUN-21
Anthracene			83.9		%		50-140	23-JUN-21
Benzo(a)anthracene			97.2		%		50-140	23-JUN-21
Benzo(a)pyrene			86.3		%		50-140	23-JUN-21
Benzo(b&j)fluoranthene			96.9		%		50-140	23-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
PAH-511-WT	Soil							
Batch R5495620								
WG3559140-4 MS		**WG3559140-5**						
Benzo(g,h,i)perylene			91.5		%		50-140	23-JUN-21
Benzo(k)fluoranthene			95.5		%		50-140	23-JUN-21
Chrysene			95.0		%		50-140	23-JUN-21
Dibenz(a,h)anthracene			95.8		%		50-140	23-JUN-21
Fluoranthene			93.5		%		50-140	23-JUN-21
Fluorene			91.8		%		50-140	23-JUN-21
Indeno(1,2,3-cd)pyrene			98.9		%		50-140	23-JUN-21
Naphthalene			93.0		%		50-140	23-JUN-21
Phenanthrene			97.0		%		50-140	23-JUN-21
Pyrene			92.6		%		50-140	23-JUN-21
PH-WT	Soil							
Batch R5490094								
WG3554061-1 DUP		**L2598394-8**						
pH		6.91	6.95	J	pH units	0.04	0.3	14-JUN-21
WG3554340-1 LCS								
pH			6.98		pH units		6.9-7.1	14-JUN-21
Batch R5494369								
WG3556819-1 DUP		**L2601000-3**						
pH		7.95	7.94	J	pH units	0.01	0.3	21-JUN-21
WG3559488-1 LCS								
pH			6.94		pH units		6.9-7.1	21-JUN-21
SAR-R511-WT	Soil							
Batch R5491603								
WG3555789-4 DUP		**WG3555789-3**						
Calcium (Ca)		27.9	29.3		mg/L	4.9	30	16-JUN-21
Sodium (Na)		3.68	3.67		mg/L	0.3	30	16-JUN-21
Magnesium (Mg)		15.3	16.2		mg/L	5.7	30	16-JUN-21
WG3555789-2 IRM		**WT SAR4**						
Calcium (Ca)			103.5		%		70-130	16-JUN-21
Sodium (Na)			96.0		%		70-130	16-JUN-21
Magnesium (Mg)			103.4		%		70-130	16-JUN-21
WG3555789-5 LCS								
Calcium (Ca)			106.0		%		80-120	16-JUN-21
Sodium (Na)			99.8		%		80-120	16-JUN-21
Magnesium (Mg)			101.6		%		80-120	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
SAR-R511-WT	Soil							
Batch R5491603								
WG3555789-1 MB								
Calcium (Ca)			<0.50		mg/L		0.5	16-JUN-21
Sodium (Na)			<0.50		mg/L		0.5	16-JUN-21
Magnesium (Mg)			<0.50		mg/L		0.5	16-JUN-21
Batch R5492532								
WG3556601-4 DUP		**WG3556601-3**						
Calcium (Ca)		4.07	4.02		mg/L	1.2	30	17-JUN-21
Sodium (Na)		9.07	9.39		mg/L	3.5	30	17-JUN-21
Magnesium (Mg)		2.79	2.87		mg/L	2.8	30	17-JUN-21
WG3556601-2 IRM		**WT SAR4**						
Calcium (Ca)			109.4		%		70-130	17-JUN-21
Sodium (Na)			104.8		%		70-130	17-JUN-21
Magnesium (Mg)			112.0		%		70-130	17-JUN-21
WG3556601-5 LCS								
Calcium (Ca)			106.7		%		80-120	17-JUN-21
Sodium (Na)			103.4		%		80-120	17-JUN-21
Magnesium (Mg)			103.2		%		80-120	17-JUN-21
WG3556601-1 MB								
Calcium (Ca)			<0.50		mg/L		0.5	17-JUN-21
Sodium (Na)			<0.50		mg/L		0.5	17-JUN-21
Magnesium (Mg)			<0.50		mg/L		0.5	17-JUN-21
VOC-511-HS-WT	Soil							
Batch R5491204								
WG3551359-9 DUP		**WG3551359-8**						
1,1,1,2-Tetrachloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,1,2,2-Tetrachloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,1,1-Trichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,1,2-Trichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,1-Dichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,1-Dichloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,2-Dibromoethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,2-Dichlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,2-Dichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,2-Dichloropropane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
1,3-Dichlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5491204								
WG3551359-9 DUP		**WG3551359-8**						
1,4-Dichlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Acetone		<0.50	<0.50	RPD-NA	ug/g	N/A	40	16-JUN-21
Benzene		<0.0068	<0.0068	RPD-NA	ug/g	N/A	40	16-JUN-21
Bromodichloromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Bromoform		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Bromomethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Carbon tetrachloride		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Chlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Chloroform		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
cis-1,2-Dichloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
cis-1,3-Dichloropropene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	16-JUN-21
Dibromochloromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Dichlorodifluoromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Ethylbenzene		<0.018	<0.018	RPD-NA	ug/g	N/A	40	16-JUN-21
n-Hexane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Methylene Chloride		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
MTBE		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
m+p-Xylenes		<0.030	<0.030	RPD-NA	ug/g	N/A	40	16-JUN-21
Methyl Ethyl Ketone		<0.50	<0.50	RPD-NA	ug/g	N/A	40	16-JUN-21
Methyl Isobutyl Ketone		<0.50	<0.50	RPD-NA	ug/g	N/A	40	16-JUN-21
o-Xylene		<0.020	<0.020	RPD-NA	ug/g	N/A	40	16-JUN-21
Styrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Tetrachloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Toluene		<0.080	<0.080	RPD-NA	ug/g	N/A	40	16-JUN-21
trans-1,2-Dichloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
trans-1,3-Dichloropropene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	16-JUN-21
Trichloroethylene		<0.010	<0.010	RPD-NA	ug/g	N/A	40	16-JUN-21
Trichlorofluoromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	16-JUN-21
Vinyl chloride		<0.020	<0.020	RPD-NA	ug/g	N/A	40	16-JUN-21
WG3551359-7 LCS								
1,1,1,2-Tetrachloroethane			107.3		%		60-130	16-JUN-21
1,1,2,2-Tetrachloroethane			94.1		%		60-130	16-JUN-21
1,1,1-Trichloroethane			102.0		%		60-130	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5491204								
WG3551359-7 LCS								
1,1,2-Trichloroethane			99.0		%		60-130	16-JUN-21
1,1-Dichloroethane			78.0		%		60-130	16-JUN-21
1,1-Dichloroethylene			69.1		%		60-130	16-JUN-21
1,2-Dibromoethane			95.9		%		70-130	16-JUN-21
1,2-Dichlorobenzene			110.1		%		70-130	16-JUN-21
1,2-Dichloroethane			96.3		%		60-130	16-JUN-21
1,2-Dichloropropane			104.1		%		70-130	16-JUN-21
1,3-Dichlorobenzene			114.4		%		70-130	16-JUN-21
1,4-Dichlorobenzene			113.3		%		70-130	16-JUN-21
Acetone			71.1		%		60-140	16-JUN-21
Benzene			103.1		%		70-130	16-JUN-21
Bromodichloromethane			109.4		%		50-140	16-JUN-21
Bromoform			106.2		%		70-130	16-JUN-21
Bromomethane			67.6		%		50-140	16-JUN-21
Carbon tetrachloride			105.1		%		70-130	16-JUN-21
Chlorobenzene			110.4		%		70-130	16-JUN-21
Chloroform			108.3		%		70-130	16-JUN-21
cis-1,2-Dichloroethylene			86.9		%		70-130	16-JUN-21
cis-1,3-Dichloropropene			102.7		%		70-130	16-JUN-21
Dibromochloromethane			99.8		%		60-130	16-JUN-21
Dichlorodifluoromethane			42.4	MES	%		50-140	16-JUN-21
Ethylbenzene			111.3		%		70-130	16-JUN-21
n-Hexane			73.7		%		70-130	16-JUN-21
Methylene Chloride			81.9		%		70-130	16-JUN-21
MTBE			105.1		%		70-130	16-JUN-21
m+p-Xylenes			113.1		%		70-130	16-JUN-21
Methyl Ethyl Ketone			68.5		%		60-140	16-JUN-21
Methyl Isobutyl Ketone			94.2		%		60-140	16-JUN-21
o-Xylene			120.3		%		70-130	16-JUN-21
Styrene			114.6		%		70-130	16-JUN-21
Tetrachloroethylene			117.2		%		60-130	16-JUN-21
Toluene			113.4		%		70-130	16-JUN-21
trans-1,2-Dichloroethylene			89.3		%		60-130	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5491204								
WG3551359-7 LCS								
trans-1,3-Dichloropropene			106.2		%		70-130	16-JUN-21
Trichloroethylene			104.5		%		60-130	16-JUN-21
Trichlorofluoromethane			79.5		%		50-140	16-JUN-21
Vinyl chloride			68.1		%		60-140	16-JUN-21
WG3551359-6 MB								
1,1,1,2-Tetrachloroethane			<0.050		ug/g		0.05	16-JUN-21
1,1,2,2-Tetrachloroethane			<0.050		ug/g		0.05	16-JUN-21
1,1,1-Trichloroethane			<0.050		ug/g		0.05	16-JUN-21
1,1,2-Trichloroethane			<0.050		ug/g		0.05	16-JUN-21
1,1-Dichloroethane			<0.050		ug/g		0.05	16-JUN-21
1,1-Dichloroethylene			<0.050		ug/g		0.05	16-JUN-21
1,2-Dibromoethane			<0.050		ug/g		0.05	16-JUN-21
1,2-Dichlorobenzene			<0.050		ug/g		0.05	16-JUN-21
1,2-Dichloroethane			<0.050		ug/g		0.05	16-JUN-21
1,2-Dichloropropane			<0.050		ug/g		0.05	16-JUN-21
1,3-Dichlorobenzene			<0.050		ug/g		0.05	16-JUN-21
1,4-Dichlorobenzene			<0.050		ug/g		0.05	16-JUN-21
Acetone			<0.50		ug/g		0.5	16-JUN-21
Benzene			<0.0068		ug/g		0.0068	16-JUN-21
Bromodichloromethane			<0.050		ug/g		0.05	16-JUN-21
Bromoform			<0.050		ug/g		0.05	16-JUN-21
Bromomethane			<0.050		ug/g		0.05	16-JUN-21
Carbon tetrachloride			<0.050		ug/g		0.05	16-JUN-21
Chlorobenzene			<0.050		ug/g		0.05	16-JUN-21
Chloroform			<0.050		ug/g		0.05	16-JUN-21
cis-1,2-Dichloroethylene			<0.050		ug/g		0.05	16-JUN-21
cis-1,3-Dichloropropene			<0.030		ug/g		0.03	16-JUN-21
Dibromochloromethane			<0.050		ug/g		0.05	16-JUN-21
Dichlorodifluoromethane			<0.050		ug/g		0.05	16-JUN-21
Ethylbenzene			<0.018		ug/g		0.018	16-JUN-21
n-Hexane			<0.050		ug/g		0.05	16-JUN-21
Methylene Chloride			<0.050		ug/g		0.05	16-JUN-21
MTBE			<0.050		ug/g		0.05	16-JUN-21
m+p-Xylenes			<0.030		ug/g		0.03	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5491204								
WG3551359-6 MB								
Methyl Ethyl Ketone			<0.50		ug/g		0.5	16-JUN-21
Methyl Isobutyl Ketone			<0.50		ug/g		0.5	16-JUN-21
o-Xylene			<0.020		ug/g		0.02	16-JUN-21
Styrene			<0.050		ug/g		0.05	16-JUN-21
Tetrachloroethylene			<0.050		ug/g		0.05	16-JUN-21
Toluene			<0.080		ug/g		0.08	16-JUN-21
trans-1,2-Dichloroethylene			<0.050		ug/g		0.05	16-JUN-21
trans-1,3-Dichloropropene			<0.030		ug/g		0.03	16-JUN-21
Trichloroethylene			<0.010		ug/g		0.01	16-JUN-21
Trichlorofluoromethane			<0.050		ug/g		0.05	16-JUN-21
Vinyl chloride			<0.020		ug/g		0.02	16-JUN-21
Surrogate: 1,4-Difluorobenzene			126.6		%		50-140	16-JUN-21
Surrogate: 4-Bromofluorobenzene			117.1		%		50-140	16-JUN-21
WG3551359-10 MS		**WG3551359-8**						
1,1,1,2-Tetrachloroethane			111.4		%		50-140	16-JUN-21
1,1,2,2-Tetrachloroethane			106.2		%		50-140	16-JUN-21
1,1,1-Trichloroethane			104.0		%		50-140	16-JUN-21
1,1,2-Trichloroethane			105.7		%		50-140	16-JUN-21
1,1-Dichloroethane			94.6		%		50-140	16-JUN-21
1,1-Dichloroethylene			90.1		%		50-140	16-JUN-21
1,2-Dibromoethane			102.6		%		50-140	16-JUN-21
1,2-Dichlorobenzene			114.4		%		50-140	16-JUN-21
1,2-Dichloroethane			102.9		%		50-140	16-JUN-21
1,2-Dichloropropane			107.2		%		50-140	16-JUN-21
1,3-Dichlorobenzene			114.6		%		50-140	16-JUN-21
1,4-Dichlorobenzene			114.4		%		50-140	16-JUN-21
Acetone			94.2		%		50-140	16-JUN-21
Benzene			106.8		%		50-140	16-JUN-21
Bromodichloromethane			113.0		%		50-140	16-JUN-21
Bromoform			116.3		%		50-140	16-JUN-21
Bromomethane			102.9		%		50-140	16-JUN-21
Carbon tetrachloride			103.6		%		50-140	16-JUN-21
Chlorobenzene			112.7		%		50-140	16-JUN-21
Chloroform			111.2		%		50-140	16-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5491204								
WG3551359-10 MS		**WG3551359-8**						
cis-1,2-Dichloroethylene			102.0		%		50-140	16-JUN-21
cis-1,3-Dichloropropene			98.8		%		50-140	16-JUN-21
Dibromochloromethane			106.3		%		50-140	16-JUN-21
Dichlorodifluoromethane			126.9		%		50-140	16-JUN-21
Ethylbenzene			111.1		%		50-140	16-JUN-21
n-Hexane			105.6		%		50-140	16-JUN-21
Methylene Chloride			103.8		%		50-140	16-JUN-21
MTBE			115.6		%		50-140	16-JUN-21
m+p-Xylenes			112.6		%		50-140	16-JUN-21
Methyl Ethyl Ketone			85.9		%		50-140	16-JUN-21
Methyl Isobutyl Ketone			101.3		%		50-140	16-JUN-21
o-Xylene			121.3		%		50-140	16-JUN-21
Styrene			117.6		%		50-140	16-JUN-21
Tetrachloroethylene			116.3		%		50-140	16-JUN-21
Toluene			115.1		%		50-140	16-JUN-21
trans-1,2-Dichloroethylene			109.8		%		50-140	16-JUN-21
trans-1,3-Dichloropropene			102.8		%		50-140	16-JUN-21
Trichloroethylene			104.7		%		50-140	16-JUN-21
Trichlorofluoromethane			114.0		%		50-140	16-JUN-21
Vinyl chloride			123.9		%		50-140	16-JUN-21
Batch R5494363								
WG3554068-9 DUP		**WG3554068-8**						
1,1,1,2-Tetrachloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,1,2,2-Tetrachloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,1,1-Trichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,1,2-Trichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,1-Dichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,1-Dichloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,2-Dibromoethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,2-Dichlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,2-Dichloroethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,2-Dichloropropane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
1,3-Dichlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5494363								
WG3554068-9 DUP		**WG3554068-8**						
1,4-Dichlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Acetone		<0.50	<0.50	RPD-NA	ug/g	N/A	40	21-JUN-21
Benzene		<0.0068	<0.0068	RPD-NA	ug/g	N/A	40	21-JUN-21
Bromodichloromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Bromoform		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Bromomethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Carbon tetrachloride		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Chlorobenzene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Chloroform		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
cis-1,2-Dichloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
cis-1,3-Dichloropropene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	21-JUN-21
Dibromochloromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Dichlorodifluoromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Ethylbenzene		<0.018	<0.018	RPD-NA	ug/g	N/A	40	21-JUN-21
n-Hexane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Methylene Chloride		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
MTBE		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
m+p-Xylenes		<0.030	<0.030	RPD-NA	ug/g	N/A	40	21-JUN-21
Methyl Ethyl Ketone		<0.50	<0.50	RPD-NA	ug/g	N/A	40	21-JUN-21
Methyl Isobutyl Ketone		<0.50	<0.50	RPD-NA	ug/g	N/A	40	21-JUN-21
o-Xylene		<0.020	<0.020	RPD-NA	ug/g	N/A	40	21-JUN-21
Styrene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Tetrachloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Toluene		<0.080	<0.080	RPD-NA	ug/g	N/A	40	21-JUN-21
trans-1,2-Dichloroethylene		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
trans-1,3-Dichloropropene		<0.030	<0.030	RPD-NA	ug/g	N/A	40	21-JUN-21
Trichloroethylene		<0.010	<0.010	RPD-NA	ug/g	N/A	40	21-JUN-21
Trichlorofluoromethane		<0.050	<0.050	RPD-NA	ug/g	N/A	40	21-JUN-21
Vinyl chloride		<0.020	<0.020	RPD-NA	ug/g	N/A	40	21-JUN-21
WG3554068-7 LCS								
1,1,1,2-Tetrachloroethane			96.1		%		60-130	21-JUN-21
1,1,2,2-Tetrachloroethane			91.8		%		60-130	21-JUN-21
1,1,1-Trichloroethane			99.0		%		60-130	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5494363								
WG3554068-7 LCS								
1,1,2-Trichloroethane			89.4		%		60-130	21-JUN-21
1,1-Dichloroethane			95.8		%		60-130	21-JUN-21
1,1-Dichloroethylene			99.7		%		60-130	21-JUN-21
1,2-Dibromoethane			90.8		%		70-130	21-JUN-21
1,2-Dichlorobenzene			98.0		%		70-130	21-JUN-21
1,2-Dichloroethane			95.0		%		60-130	21-JUN-21
1,2-Dichloropropane			93.2		%		70-130	21-JUN-21
1,3-Dichlorobenzene			101.7		%		70-130	21-JUN-21
1,4-Dichlorobenzene			100.4		%		70-130	21-JUN-21
Acetone			100.0		%		60-140	21-JUN-21
Benzene			94.7		%		70-130	21-JUN-21
Bromodichloromethane			103.8		%		50-140	21-JUN-21
Bromoform			94.2		%		70-130	21-JUN-21
Bromomethane			94.3		%		50-140	21-JUN-21
Carbon tetrachloride			102.5		%		70-130	21-JUN-21
Chlorobenzene			96.4		%		70-130	21-JUN-21
Chloroform			99.7		%		70-130	21-JUN-21
cis-1,2-Dichloroethylene			95.4		%		70-130	21-JUN-21
cis-1,3-Dichloropropene			101.4		%		70-130	21-JUN-21
Dibromochloromethane			88.6		%		60-130	21-JUN-21
Dichlorodifluoromethane			69.0		%		50-140	21-JUN-21
Ethylbenzene			98.6		%		70-130	21-JUN-21
n-Hexane			92.3		%		70-130	21-JUN-21
Methylene Chloride			99.2		%		70-130	21-JUN-21
MTBE			99.6		%		70-130	21-JUN-21
m+p-Xylenes			97.5		%		70-130	21-JUN-21
Methyl Ethyl Ketone			89.3		%		60-140	21-JUN-21
Methyl Isobutyl Ketone			86.3		%		60-140	21-JUN-21
o-Xylene			103.4		%		70-130	21-JUN-21
Styrene			100.9		%		70-130	21-JUN-21
Tetrachloroethylene			100.5		%		60-130	21-JUN-21
Toluene			97.2		%		70-130	21-JUN-21
trans-1,2-Dichloroethylene			105.8		%		60-130	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5494363								
WG3554068-7 LCS								
trans-1,3-Dichloropropene			105.1		%		70-130	21-JUN-21
Trichloroethylene			98.9		%		60-130	21-JUN-21
Trichlorofluoromethane			99.9		%		50-140	21-JUN-21
Vinyl chloride			96.3		%		60-140	21-JUN-21
WG3554068-6 MB								
1,1,1,2-Tetrachloroethane			<0.050		ug/g		0.05	21-JUN-21
1,1,2,2-Tetrachloroethane			<0.050		ug/g		0.05	21-JUN-21
1,1,1-Trichloroethane			<0.050		ug/g		0.05	21-JUN-21
1,1,2-Trichloroethane			<0.050		ug/g		0.05	21-JUN-21
1,1-Dichloroethane			<0.050		ug/g		0.05	21-JUN-21
1,1-Dichloroethylene			<0.050		ug/g		0.05	21-JUN-21
1,2-Dibromoethane			<0.050		ug/g		0.05	21-JUN-21
1,2-Dichlorobenzene			<0.050		ug/g		0.05	21-JUN-21
1,2-Dichloroethane			<0.050		ug/g		0.05	21-JUN-21
1,2-Dichloropropane			<0.050		ug/g		0.05	21-JUN-21
1,3-Dichlorobenzene			<0.050		ug/g		0.05	21-JUN-21
1,4-Dichlorobenzene			<0.050		ug/g		0.05	21-JUN-21
Acetone			<0.50		ug/g		0.5	21-JUN-21
Benzene			<0.0068		ug/g		0.0068	21-JUN-21
Bromodichloromethane			<0.050		ug/g		0.05	21-JUN-21
Bromoform			<0.050		ug/g		0.05	21-JUN-21
Bromomethane			<0.050		ug/g		0.05	21-JUN-21
Carbon tetrachloride			<0.050		ug/g		0.05	21-JUN-21
Chlorobenzene			<0.050		ug/g		0.05	21-JUN-21
Chloroform			<0.050		ug/g		0.05	21-JUN-21
cis-1,2-Dichloroethylene			<0.050		ug/g		0.05	21-JUN-21
cis-1,3-Dichloropropene			<0.030		ug/g		0.03	21-JUN-21
Dibromochloromethane			<0.050		ug/g		0.05	21-JUN-21
Dichlorodifluoromethane			<0.050		ug/g		0.05	21-JUN-21
Ethylbenzene			<0.018		ug/g		0.018	21-JUN-21
n-Hexane			<0.050		ug/g		0.05	21-JUN-21
Methylene Chloride			<0.050		ug/g		0.05	21-JUN-21
MTBE			<0.050		ug/g		0.05	21-JUN-21
m+p-Xylenes			<0.030		ug/g		0.03	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5494363								
WG3554068-6 MB								
Methyl Ethyl Ketone			<0.50		ug/g		0.5	21-JUN-21
Methyl Isobutyl Ketone			<0.50		ug/g		0.5	21-JUN-21
o-Xylene			<0.020		ug/g		0.02	21-JUN-21
Styrene			<0.050		ug/g		0.05	21-JUN-21
Tetrachloroethylene			<0.050		ug/g		0.05	21-JUN-21
Toluene			<0.080		ug/g		0.08	21-JUN-21
trans-1,2-Dichloroethylene			<0.050		ug/g		0.05	21-JUN-21
trans-1,3-Dichloropropene			<0.030		ug/g		0.03	21-JUN-21
Trichloroethylene			<0.010		ug/g		0.01	21-JUN-21
Trichlorofluoromethane			<0.050		ug/g		0.05	21-JUN-21
Vinyl chloride			<0.020		ug/g		0.02	21-JUN-21
Surrogate: 1,4-Difluorobenzene			113.3		%		50-140	21-JUN-21
Surrogate: 4-Bromofluorobenzene			103.2		%		50-140	21-JUN-21
WG3554068-10 MS		**WG3554068-8**						
1,1,1,2-Tetrachloroethane			113.5		%		50-140	21-JUN-21
1,1,2,2-Tetrachloroethane			119.8		%		50-140	21-JUN-21
1,1,1-Trichloroethane			117.0		%		50-140	21-JUN-21
1,1,2-Trichloroethane			112.1		%		50-140	21-JUN-21
1,1-Dichloroethane			117.7		%		50-140	21-JUN-21
1,1-Dichloroethylene			119.5		%		50-140	21-JUN-21
1,2-Dibromoethane			115.9		%		50-140	21-JUN-21
1,2-Dichlorobenzene			114.8		%		50-140	21-JUN-21
1,2-Dichloroethane			121.4		%		50-140	21-JUN-21
1,2-Dichloropropane			113.2		%		50-140	21-JUN-21
1,3-Dichlorobenzene			115.5		%		50-140	21-JUN-21
1,4-Dichlorobenzene			116.6		%		50-140	21-JUN-21
Acetone			137.6		%		50-140	21-JUN-21
Benzene			114.7		%		50-140	21-JUN-21
Bromodichloromethane			131.5		%		50-140	21-JUN-21
Bromoform			113.2		%		50-140	21-JUN-21
Bromomethane			109.2		%		50-140	21-JUN-21
Carbon tetrachloride			117.7		%		50-140	21-JUN-21
Chlorobenzene			114.1		%		50-140	21-JUN-21
Chloroform			120.2		%		50-140	21-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Soil							
Batch R5494363								
WG3554068-10 MS		**WG3554068-8**						
cis-1,2-Dichloroethylene			115.3		%		50-140	21-JUN-21
cis-1,3-Dichloropropene			114.2		%		50-140	21-JUN-21
Dibromochloromethane			110.8		%		50-140	21-JUN-21
Dichlorodifluoromethane			113.3		%		50-140	21-JUN-21
Ethylbenzene			114.2		%		50-140	21-JUN-21
n-Hexane			116.0		%		50-140	21-JUN-21
Methylene Chloride			119.3		%		50-140	21-JUN-21
MTBE			117.8		%		50-140	21-JUN-21
m+p-Xylenes			112.7		%		50-140	21-JUN-21
Methyl Ethyl Ketone			117.4		%		50-140	21-JUN-21
Methyl Isobutyl Ketone			117.2		%		50-140	21-JUN-21
o-Xylene			120.0		%		50-140	21-JUN-21
Styrene			120.8		%		50-140	21-JUN-21
Tetrachloroethylene			114.6		%		50-140	21-JUN-21
Toluene			114.1		%		50-140	21-JUN-21
trans-1,2-Dichloroethylene			125.1		%		50-140	21-JUN-21
trans-1,3-Dichloropropene			109.9		%		50-140	21-JUN-21
Trichloroethylene			115.5		%		50-140	21-JUN-21
Trichlorofluoromethane			120.8		%		50-140	21-JUN-21
Vinyl chloride			113.9		%		50-140	21-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Legend:

Limit	ALS Control Limit (Data Quality Objectives)
DUP	Duplicate
RPD	Relative Percent Difference
N/A	Not Available
LCS	Laboratory Control Sample
SRM	Standard Reference Material
MS	Matrix Spike
MSD	Matrix Spike Duplicate
ADE	Average Desorption Efficiency
MB	Method Blank
IRM	Internal Reference Material
CRM	Certified Reference Material
CCV	Continuing Calibration Verification
CVS	Calibration Verification Standard
LCSD	Laboratory Control Sample Duplicate

Sample Parameter Qualifier Definitions:

Qualifier	Description
J	Duplicate results and limits are expressed in terms of absolute difference.
K	Matrix Spike recovery outside ALS DQO due to sample matrix effects.
MES	Data Quality Objective was marginally exceeded (by < 10% absolute) for < 10% of analytes in a Multi-Element Scan / Multi-Parameter Scan (considered acceptable as per OMOE & CCME).
RPD-NA	Relative Percent Difference Not Available due to result(s) being less than detection limit.
SURQC	Surrogate recovery marginally exceeded DQO in QC sample (MB, LCS, RM, or MS). Surrogates are less important for QC samples than for test samples. Refer to regular (non-surrogate) analyte results in affected QC sample for assessment of potential impacts to those analytes.

Hold Time Exceedances:

All test results reported with this submission were conducted within ALS recommended hold times.

ALS recommended hold times may vary by province. They are assigned to meet known provincial and/or federal government requirements. In the absence of regulatory hold times, ALS establishes recommendations based on guidelines published by the US EPA, APHA Standard Methods, or Environment Canada (where available). For more information, please contact ALS.

The ALS Quality Control Report is provided to ALS clients upon request. ALS includes comprehensive QC checks with every analysis to ensure our high standards of quality are met. Each QC result has a known or expected target value, which is compared against pre-determined data quality objectives to provide confidence in the accuracy of associated test results.

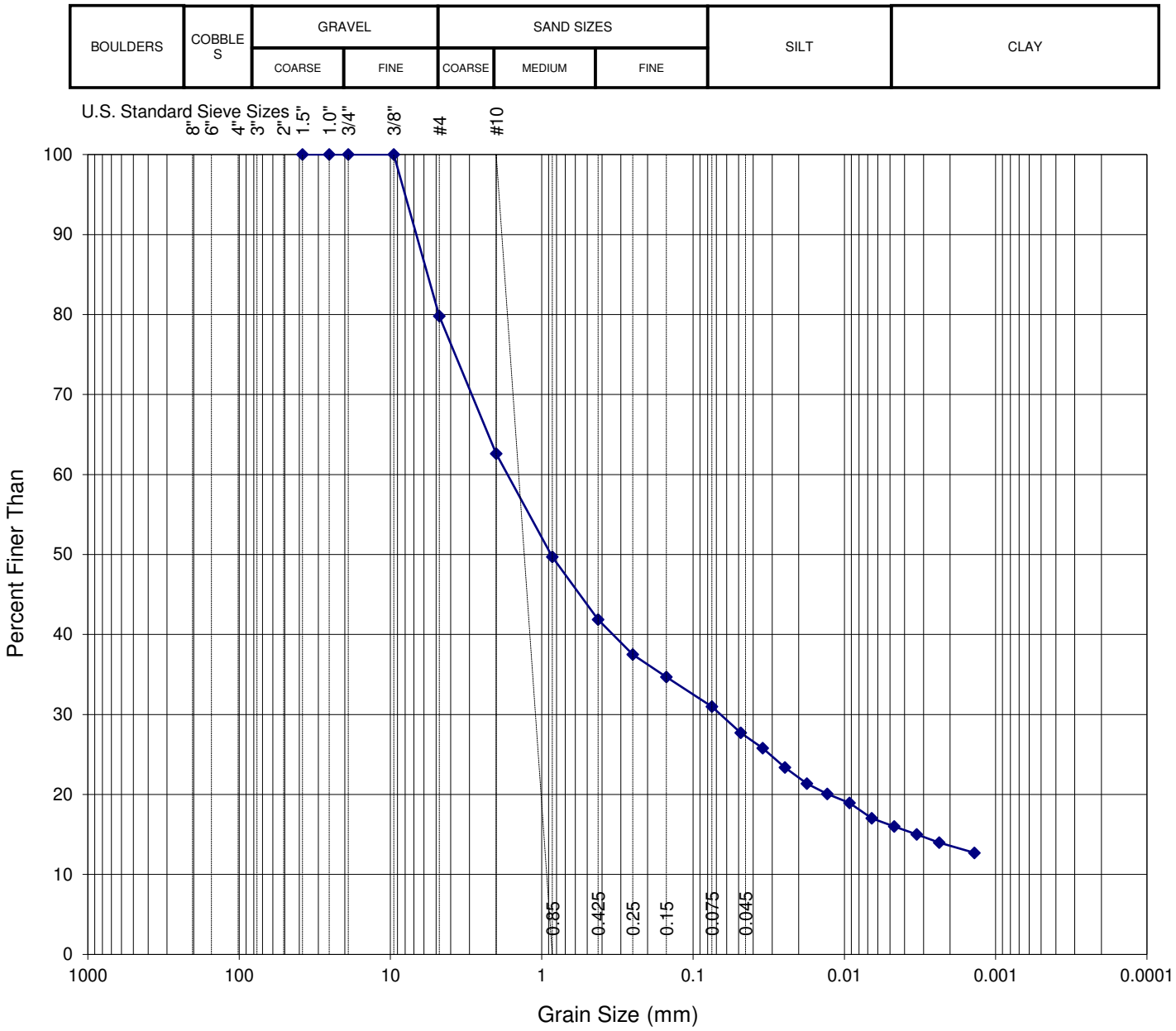
Please note that this report may contain QC results from anonymous Sample Duplicates and Matrix Spikes that do not originate from this Work Order.

ALS Laboratory Group

819-58th Street, Saskatoon,SK

PARTICLE SIZE DISTRIBUTION CURVE

Client Name:	GEOSYNTEC CONSULTANTS INTERN
Project Number:	
Client Sample ID	MW04-21 7-8
Lab Sample ID	L2598394-2
Date Sample Received	08-Jun-21
Test Completion Date:	18-Jun-21
Analyst:	HML



METHOD DESCRIPTION

Method Reference: ASTM D 422 - 63 (2002)

Dispersion method: Mechanical

Dispesion period: 1 minute cm/s

Soil classification system used: ASTM D422-63 Classification

DESCRIPTION OF SAND AND GRAVEL PARTICLES

Shape: Angular

Hardness: Hard

SUMMARY OF RESULTS

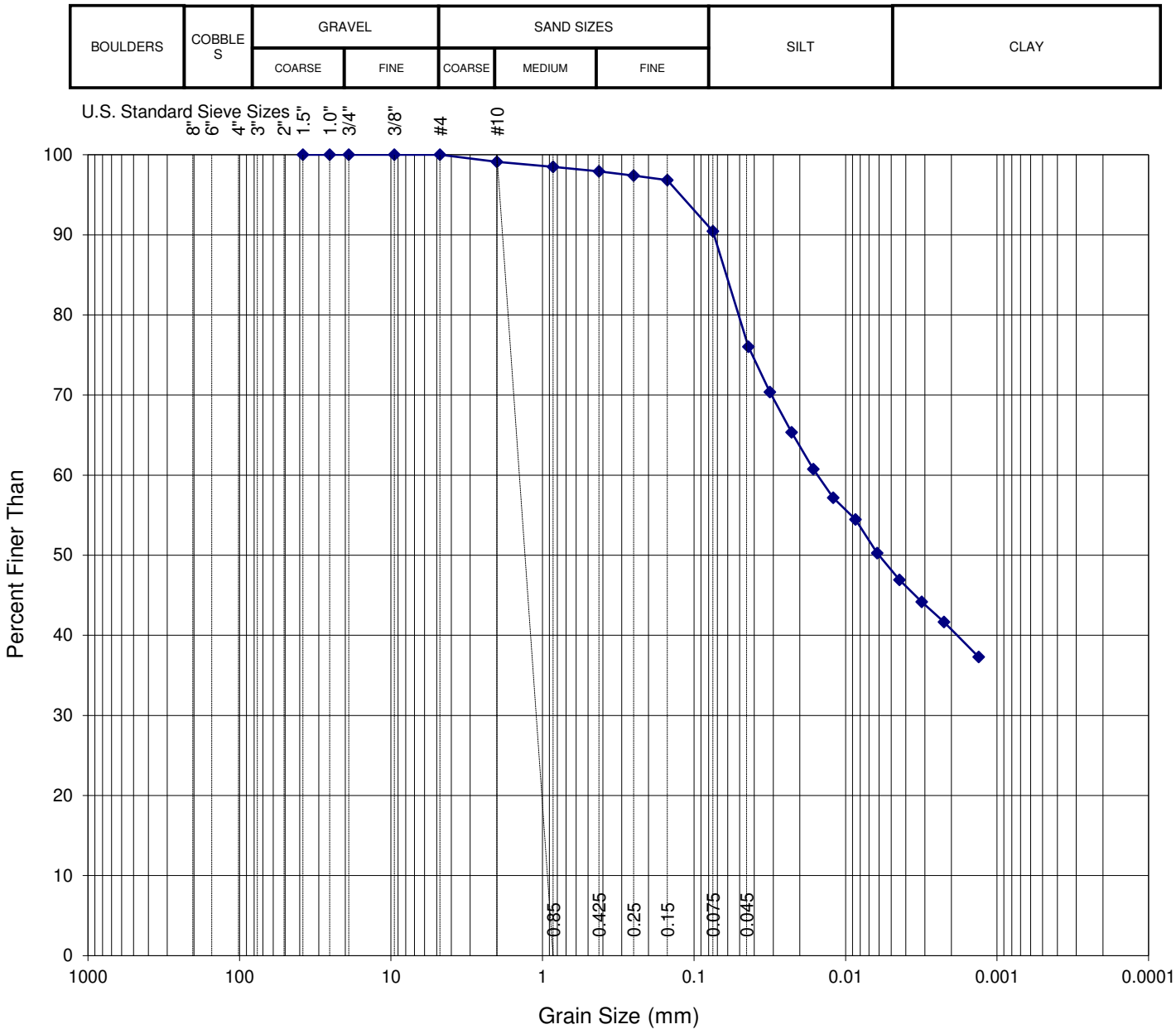
GRAIN SIZE	WT %	DIA. RANGE (mm)
% GRAVEL :	20.22	> 4.75
% COARSE SAND :	17.18	2.0 - 4.75
% MEDIUM SAND :	20.76	0.425 - 2.0
% FINE SAND :	10.88	0.075 - 0.425
% SILT :	14.76	0.075 - 0.005
% CLAY :	16.21	< 0.005

ALS Laboratory Group

819-58th Street, Saskatoon,SK

PARTICLE SIZE DISTRIBUTION CURVE

Client Name:	GEOSYNTEC CONSULTANTS INTERN
Project Number:	
Client Sample ID	BH05-21 4-5
Lab Sample ID	L2598394-4
Date Sample Received	08-Jun-21
Test Completion Date:	18-Jun-21
Analyst:	HML



METHOD DESCRIPTION

Method Reference: ASTM D 422 - 63 (2002)

Dispersion method: Mechanical

Dispesion period: 1 minute cm/s

Soil classification system used: ASTM D422-63 Classification

DESCRIPTION OF SAND AND GRAVEL PARTICLES

Shape: Angular

Hardness: Hard

SUMMARY OF RESULTS

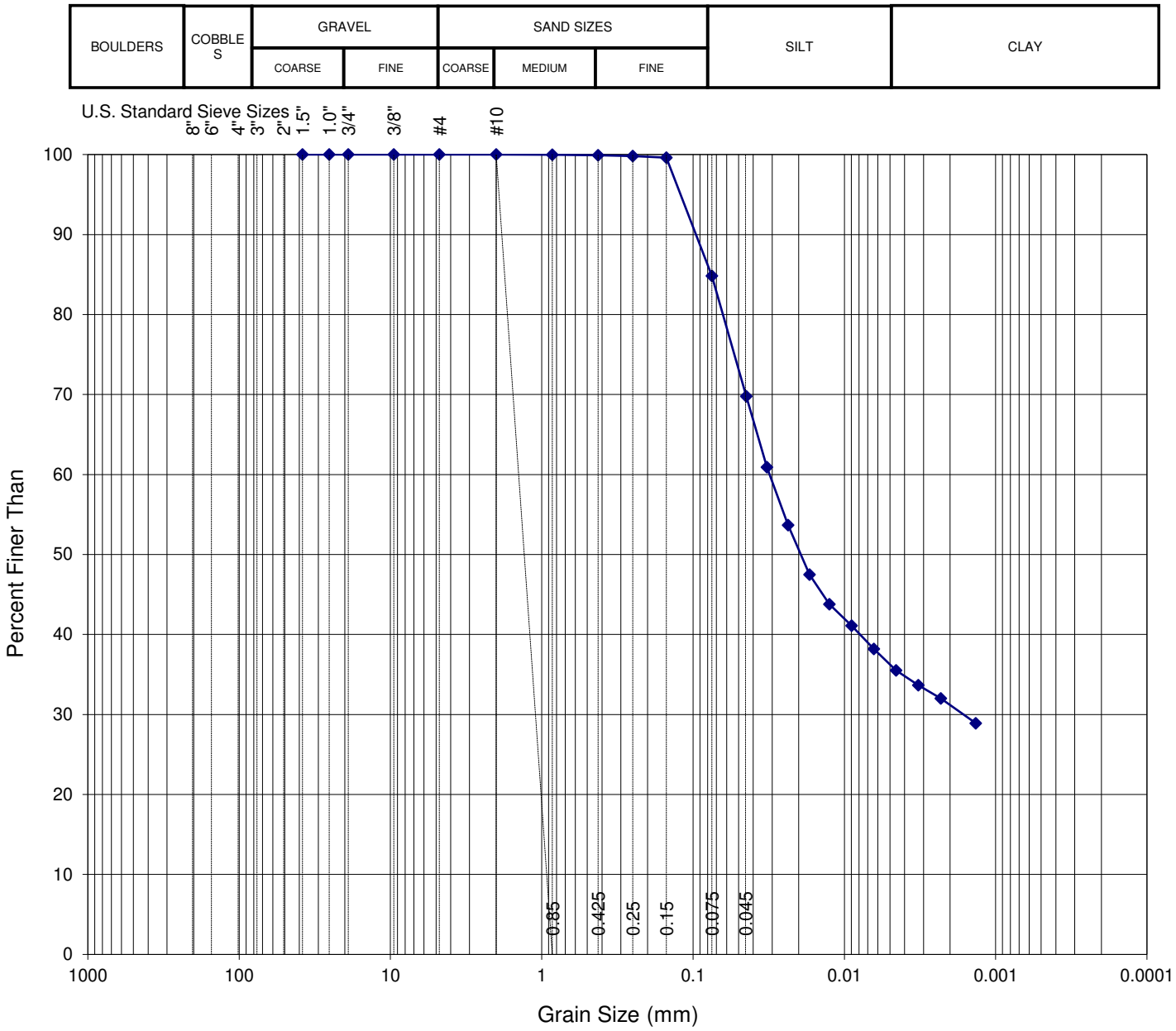
GRAIN SIZE	WT %	DIA. RANGE (mm)
% GRAVEL :	<1	> 4.75
% COARSE SAND :	<1	2.0 - 4.75
% MEDIUM SAND :	1.18	0.425 - 2.0
% FINE SAND :	7.48	0.075 - 0.425
% SILT :	42.29	0.075 - 0.005
% CLAY :	48.17	< 0.005

ALS Laboratory Group

819-58th Street, Saskatoon,SK

PARTICLE SIZE DISTRIBUTION CURVE

Client Name:	GEOSYNTEC CONSULTANTS INTERN
Project Number:	
Client Sample ID	BH06-21 7-8
Lab Sample ID	L2598394-6
Date Sample Received	08-Jun-21
Test Completion Date:	18-Jun-21
Analyst:	HML



METHOD DESCRIPTION

Method Reference: ASTM D 422 - 63 (2002)

Dispersion method: Mechanical

Dispesion period: 1 minute cm/s

Soil classification system used: ASTM D422-63 Classification

DESCRIPTION OF SAND AND GRAVEL PARTICLES

Shape: Angular

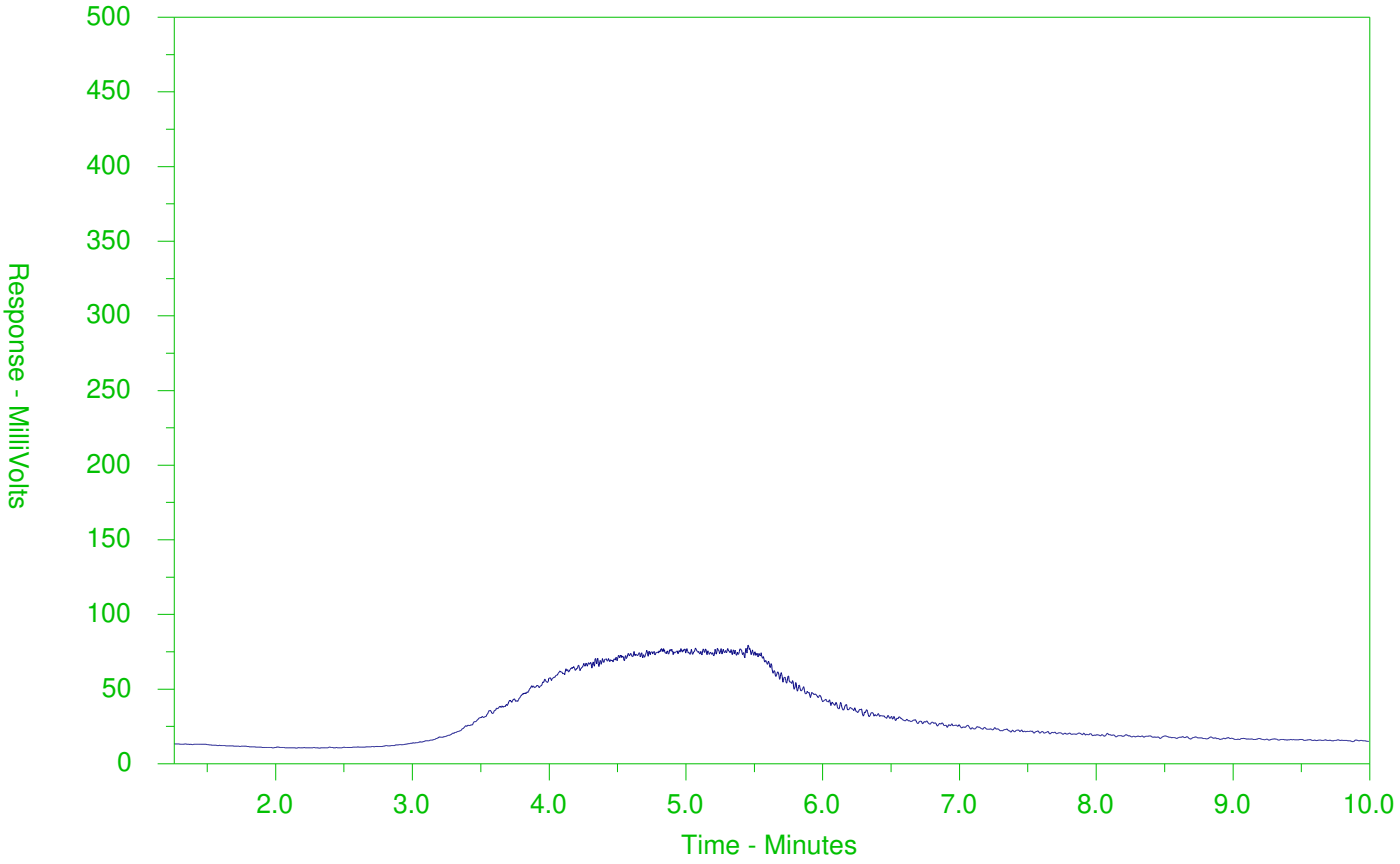
Hardness: Hard

SUMMARY OF RESULTS

GRAIN SIZE	WT %	DIA. RANGE (mm)
% GRAVEL :	<1	> 4.75
% COARSE SAND :	<1	2.0 - 4.75
% MEDIUM SAND :	<1	0.425 - 2.0
% FINE SAND :	15.11	0.075 - 0.425
% SILT :	48.56	0.075 - 0.005
% CLAY :	36.25	< 0.005

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-1
Client Sample ID: MW04-21 2-3



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

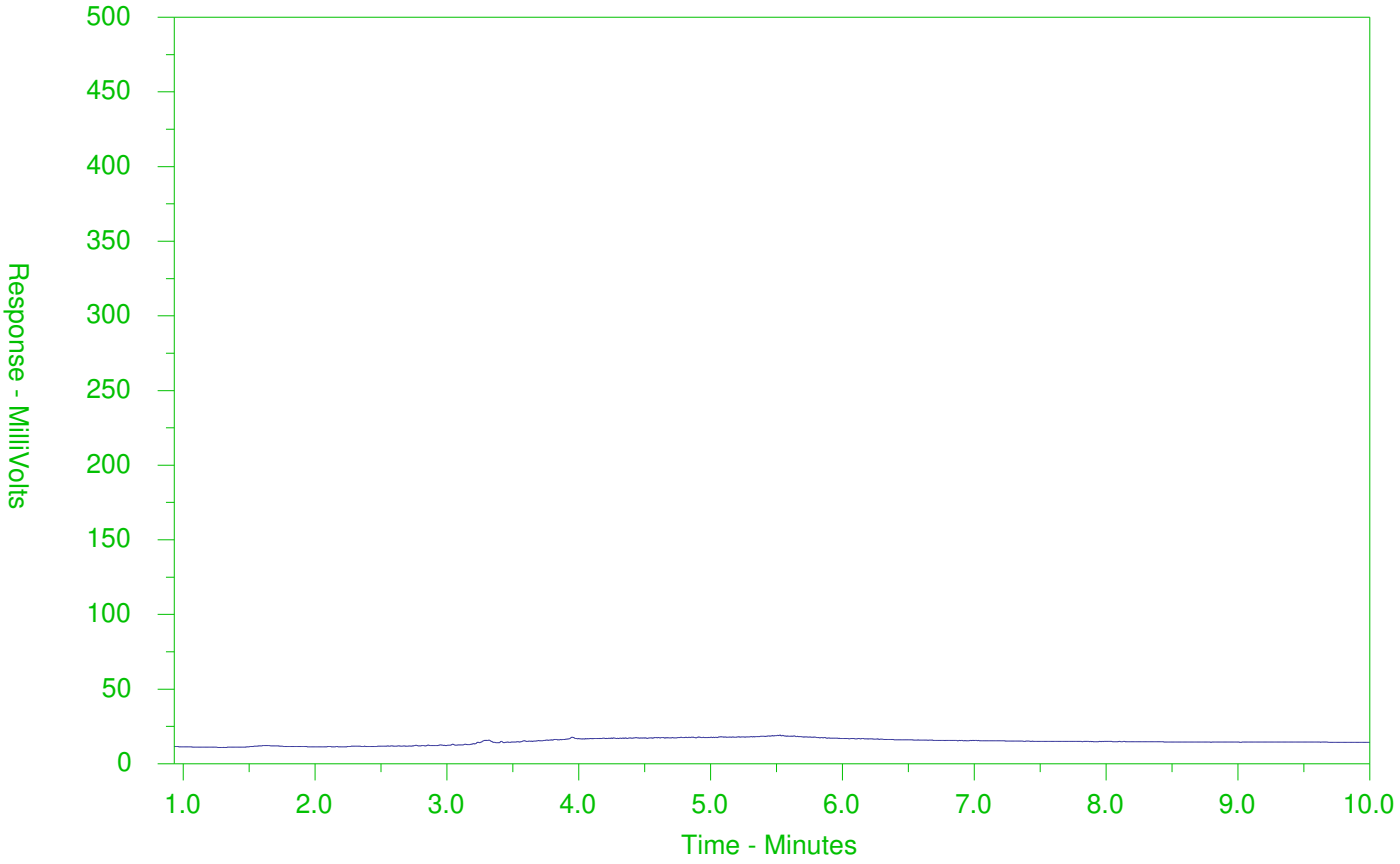
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-2
Client Sample ID: MW04-21 7-8



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

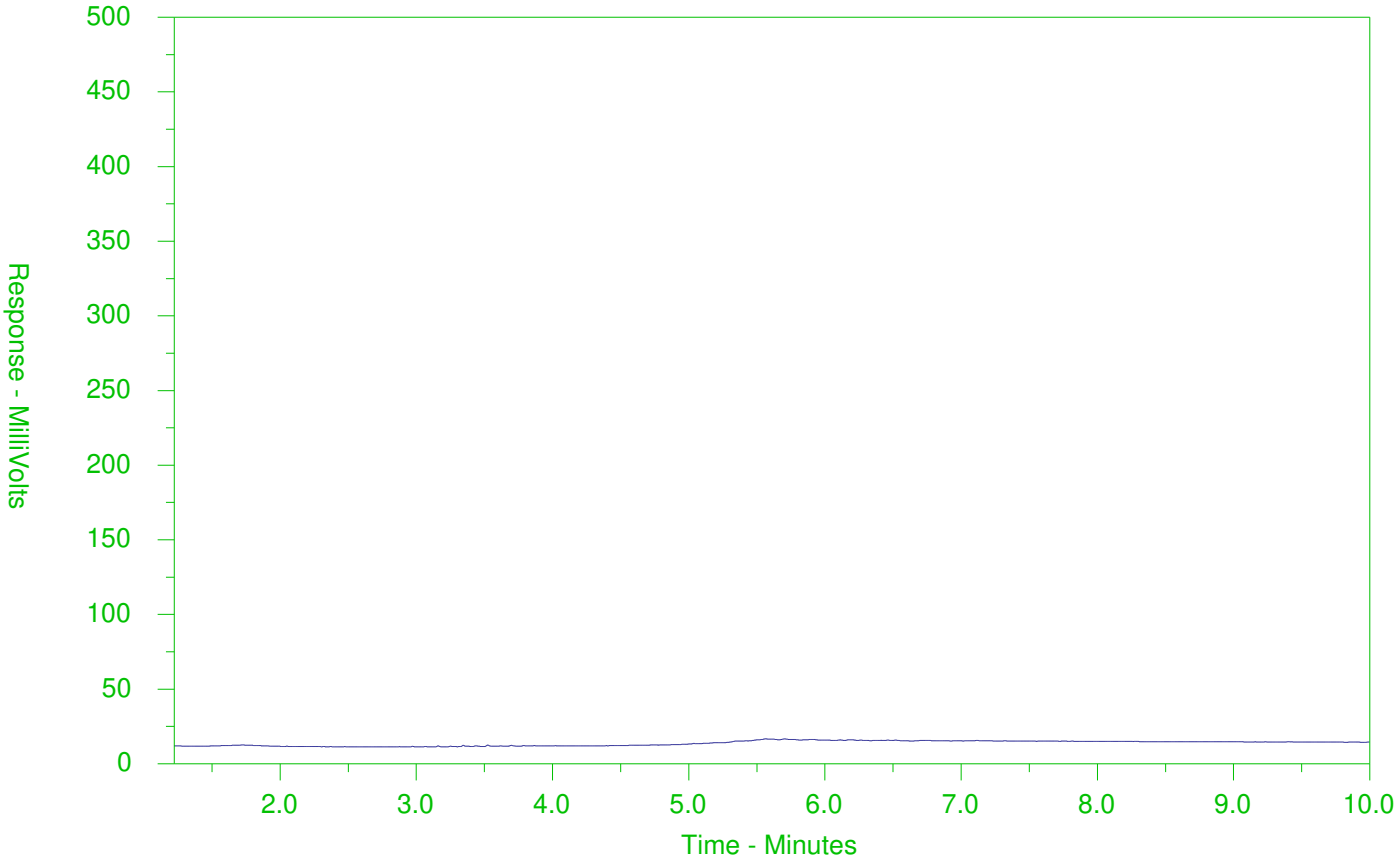
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-3
Client Sample ID: BH05-21 0-2



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

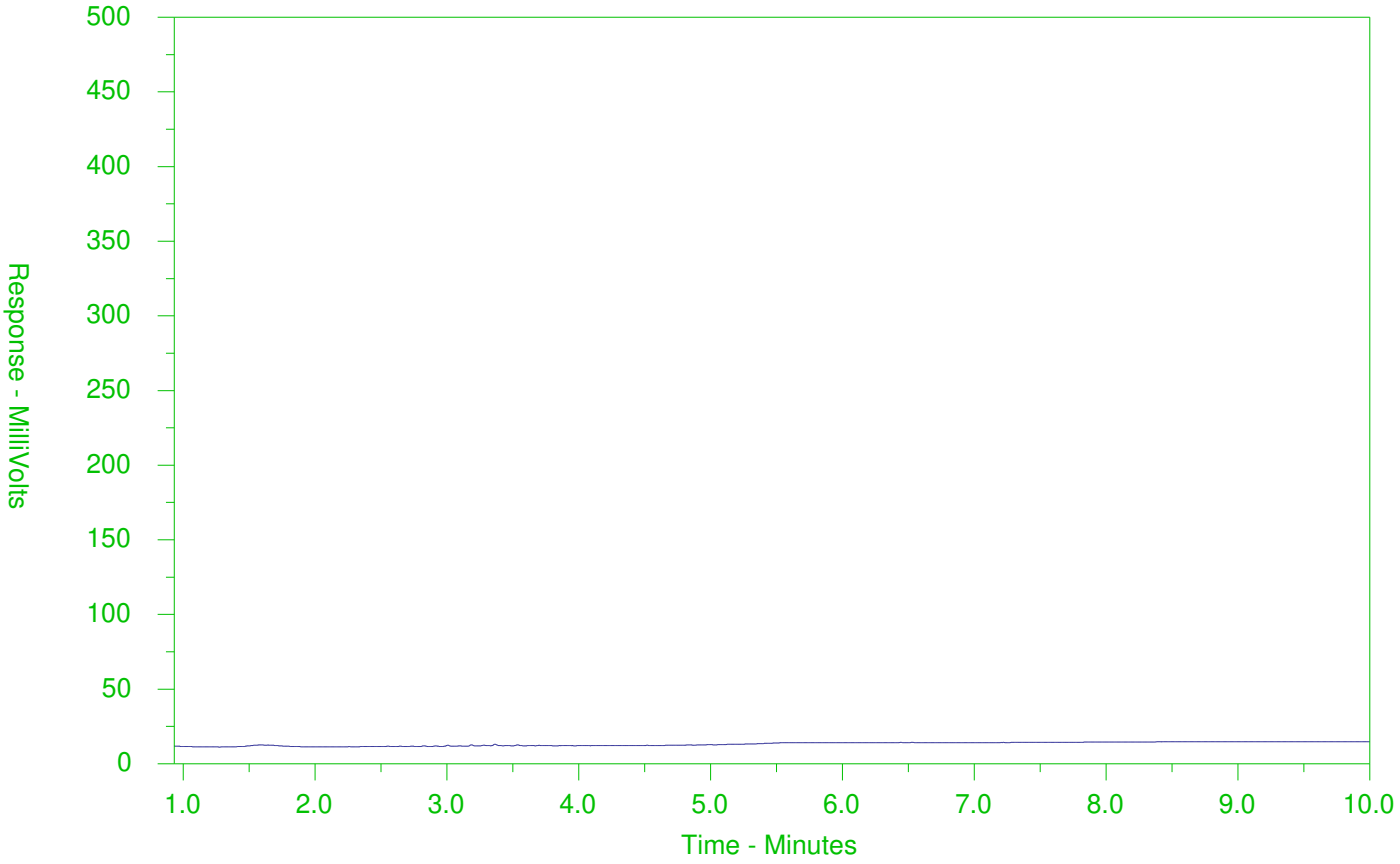
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-4
Client Sample ID: BH05-21 4-5



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

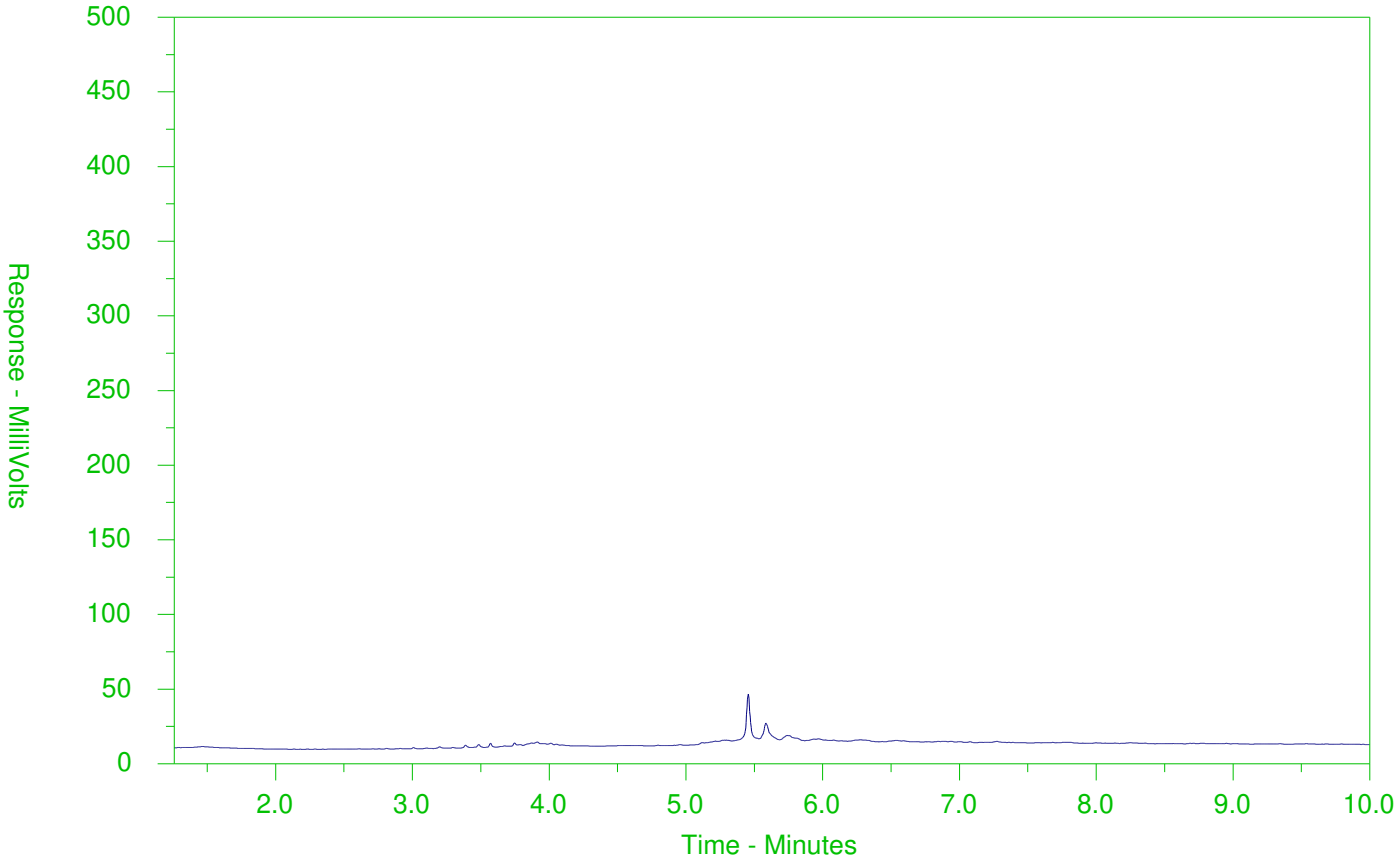
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-5
Client Sample ID: BH06-21 0-2



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

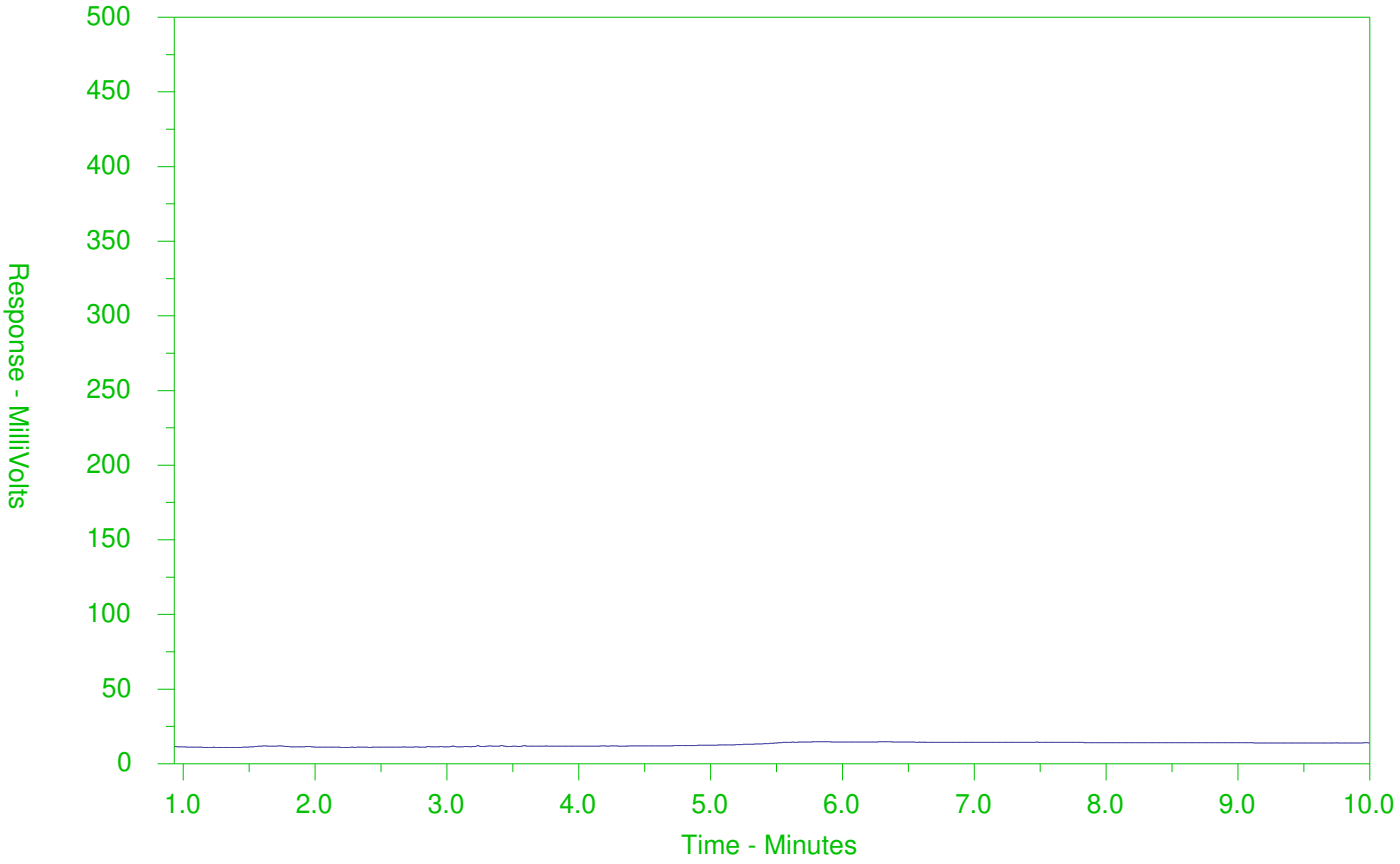
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-6
Client Sample ID: BH06-21 7-8



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →	← Motor Oils/Lube Oils/Grease →		
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

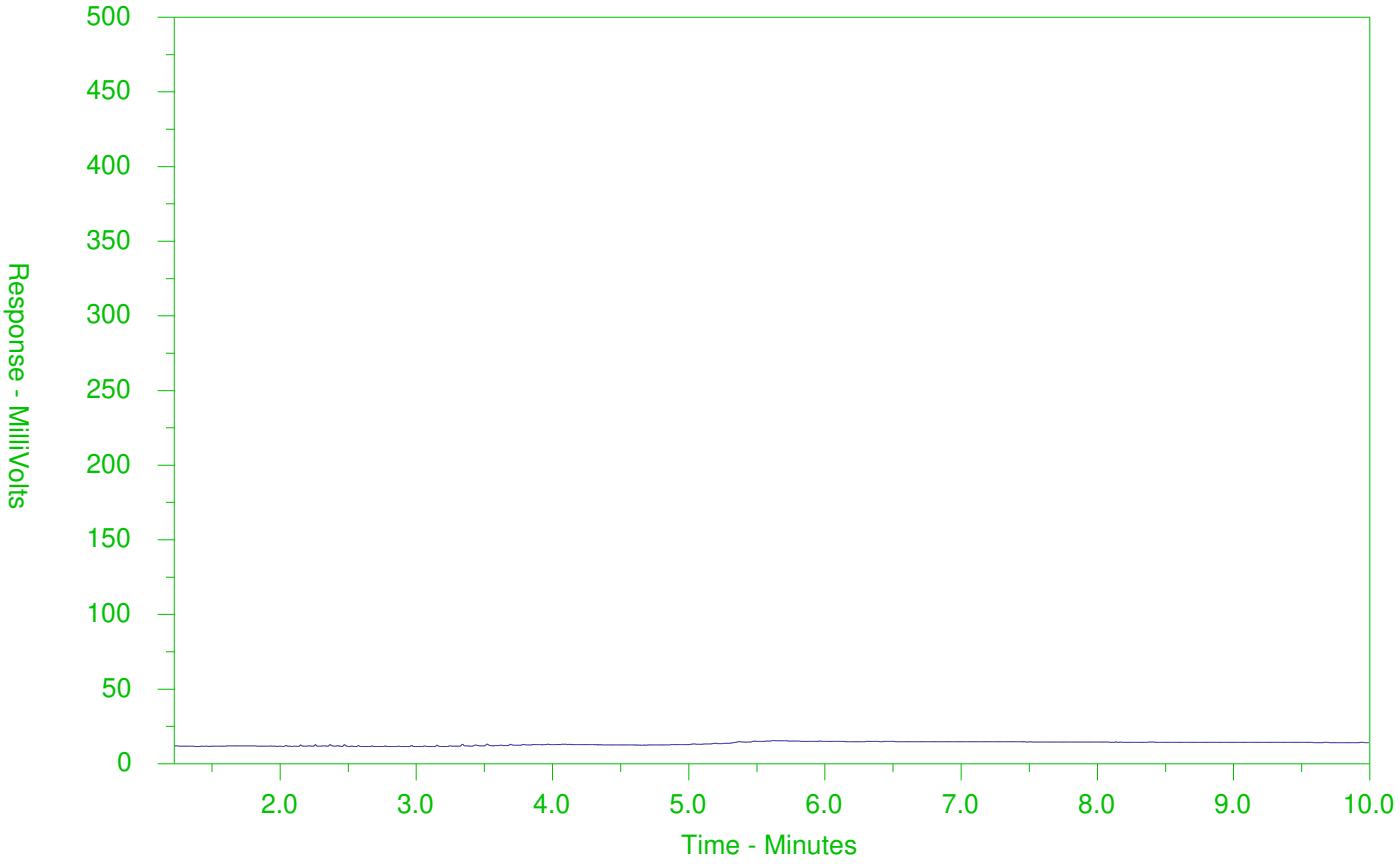
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-7
Client Sample ID: MW02-21 1-2



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

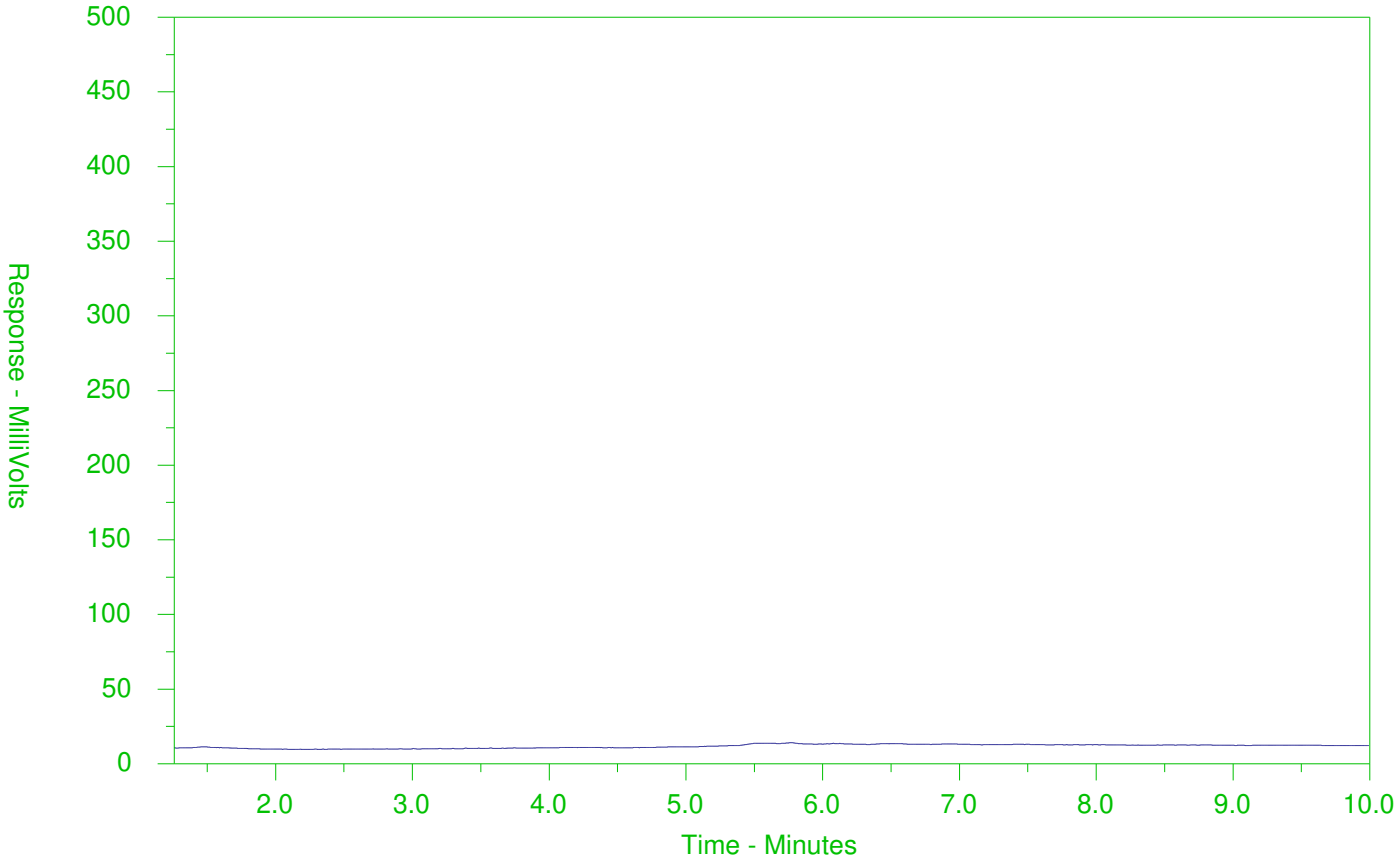
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-8
Client Sample ID: MW02-21 4-6



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

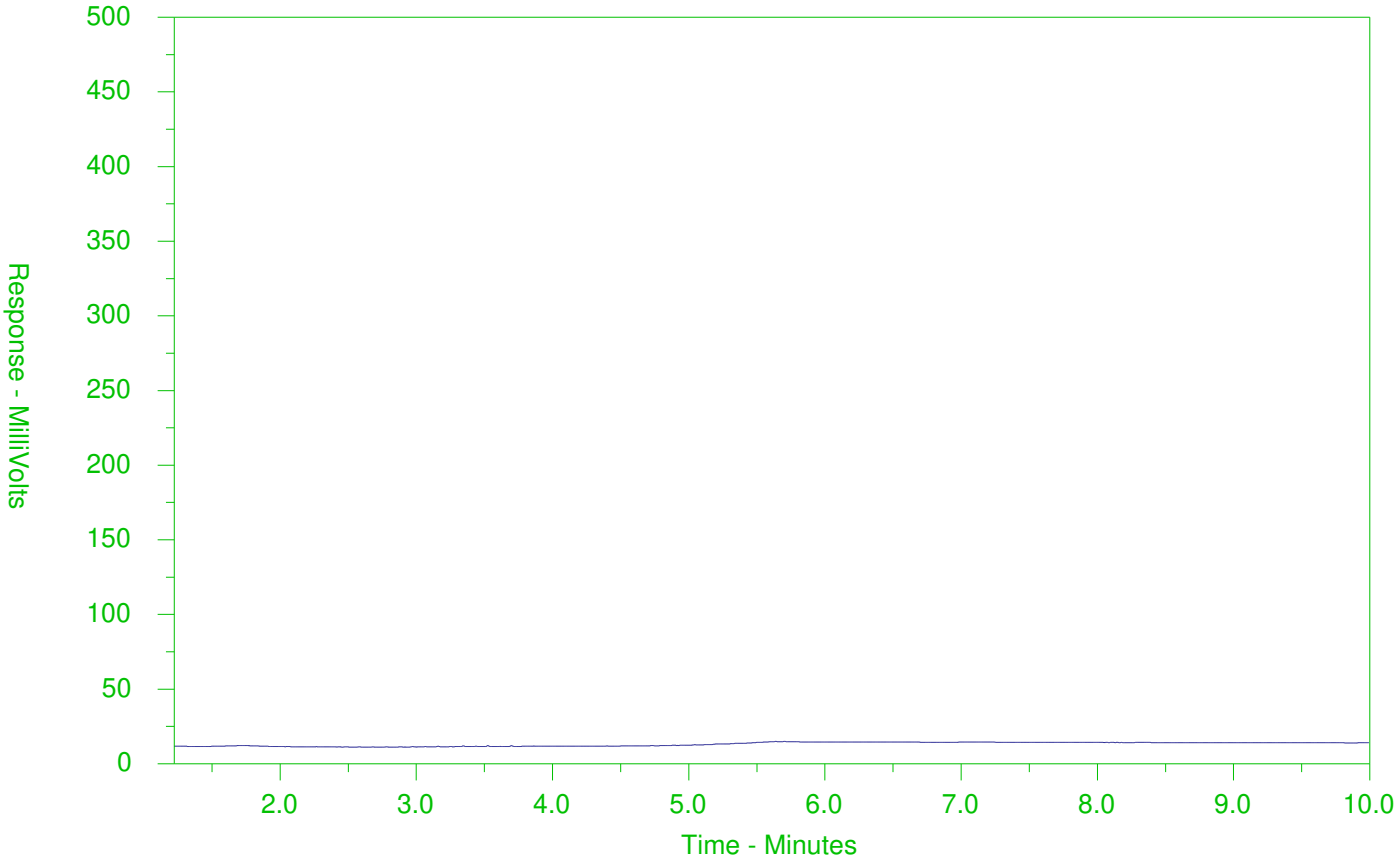
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2598394-9
Client Sample ID: DUP 3



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

ALS www.alsglobal.com

L2598394-COFC

dy (COC) / Analytical Request Form

hada Toll Free: 1 800 668 9878

COC Number: 20 - 895345

Page 1 of 3

Report To	Contact and company name below will appear on the final report
Company:	Geosyntec
Contact:	Michelle Gluck
Phone:	416-918-1691
	Company address below will appear on the final report
Street:	130 Stone road West
City/Province:	Guelph ON
Postal Code:	N1G 5G3
Invoice To	Same as Report To ☒ YES ☐ NO
	Copy of Invoice with Report ☒ YES ☐ NO
Company:	
Contact:	

Reports / Recipients	
Select Report Format:	☒ PDF ☒ EXCEL ☒ EDD (DIGITAL)
Merge QC/QCI Reports with COA	☐ YES ☐ NO ☒ N/A
☐ Compare Results to Criteria on Report - provide details below if box checked	
Select Distribution:	☒ EMAIL ☐ MAIL ☐ FAX
Email 1 or Fax	Emwather@geosyntec.com
Email 2	MGluck@geosyntec.com
Email 3	BVelderman@geosyntec.com

Invoice Recipients	
Select Invoice Distribution:	☒ EMAIL ☐ MAIL ☐ FAX
Email 1 or Fax	BVelderman@geosyntec.com
Email 2	

Turnaround Time (TAT) Requested
☒ Routine [R] if received by 3pm M-F - no surcharges apply
☐ 4 day [P4] if received by 3pm M-F - 20% rush surcharge minimum
☐ 3 day [P3] if received by 3pm M-F - 25% rush surcharge minimum
☐ 2 day [P2] if received by 3pm M-F - 50% rush surcharge minimum
☐ 1 day [E] if received by 3pm M-F - 100% rush surcharge minimum
☐ Same day [E2] if received by 10am M-S - 200% rush surcharge. Additional fees may apply to rush requests on weekends, statutory holidays and non-routine tests

AFFIX ALS BARCODE LABEL HERE (ALS use only)

Date and Time Required for all E&P TATs:

For all tests with rush TATs requested, please contact your AM to confirm availability.

Project Information	
ALS Account # / Quote #:	
Job #:	TR0936B
PO / AFE:	
LSD:	
ALS Lab Work Order # (ALS use only):	L2598394

Oil and Gas Required Fields (client use)	
AFE/Cost Center:	PO#
Major/Minor Code:	Routing Code:
Requisitioner:	
Location:	
ALS Contact:	Sampler:

Analysis Request

Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

ALS Sample # (ALS use only)	Sample Identification and/or Coordinates (This description will appear on the report)	Date (dd-mmm-yy)	Time (hh:mm)	Sample Type	NUMBER OF CONTAINERS	Metals	As, Sb, Se	Cr (VI)	B-HWS	CN-	Hg	Me Hg	EC and SAR	OC P	VOC + PHC Fr-F4	PAH	grain size	TH	SAMPLES ON HOLD	EXTENDED STORAGE REQUIRED	SUSPECTED HAZARD (see notes)
	MW04-21 2-3'	07/06/21	13:53	Soil	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓					
	MW04-21 7-8'	07/06/21	13:17	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
	BH05-21 0-2'	"	10:40	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓					
	BH05-21 4-5'	"	10:45	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
	BH06-21 0-2'	"	11:36	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓					
	BH06-21 7-8'	"	11:52	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
	MW02-21 1-2'	08/06/21	8:27	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓			
	MW02-21 4-6'	08/06/21	8:40	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓					
	DUP3	—	—	"	4	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓					
	MW03-21 0-2'	07/06/21	14:45	"	2	✓								✓							
	MW03-21 3-4'	07/06/21	14:52	"	2	✓								✓							

Drinking Water (DW) Samples[1] (client use)	Notes / Specify Limits for result evaluation by selecting from drop-down below (Excel COC only)
Are samples taken from a Regulated DW System? ☐ YES ☒ NO	
Are samples for human consumption/ use? ☐ YES ☒ NO	

SAMPLE RECEIPT DETAILS (ALS use only)					
Cooling Method:	☐ NONE	☑ ICE	☐ ICE PACKS	☐ FROZEN	☑ COOLING INITIATED
Submission Comments identified on Sample Receipt Notification:	☐ YES	☐ NO			
Cooler Custody Seals Intact:	☐ YES	☐ N/A	Sample Custody Seals Intact:	☐ YES	☐ N/A
INITIAL COOLER TEMPERATURES °C	2.6	9			
FINAL COOLER TEMPERATURES °C	9.8	11			

SHIPMENT RELEASE (client use)		
Released by:	Date:	Time:
FLORENT	08/06/21	12:60

INITIAL SHIPMENT RECEPTION (ALS use only)		
Received by:	Date:	Time:
JZ	8/6/21	1200

FINAL SHIPMENT RECEPTION (ALS use only)		
Received by:	Date:	Time:
	08/09/21	9

REFER TO BACK PAGE FOR ALS LOCATIONS AND SAMPLING INFORMATION

WHITE - LABORATORY COPY YELLOW - CLIENT COPY

Failure to complete all portions of this form may delay analysis. Please fill in this form LEGIBLY. By the use of this form the user acknowledges and agrees with the Terms and Conditions as specified on the back page of the white - report copy.

1. If any water samples are taken from a **Regulated Drinking Water (DW) System**, please submit using an **Authorized DW COC form**.

AUG 2020 FRONT

ALS www.alsglobal.com

L2598394-COFC

...tody (COC) / Analytical Request Form

Canada Toll Free: 1 800 668 9878

COC Number: 20 - 895346

Report To	Contact and company name below will appear on the final report
Company:	geosynter
Contact:	Michelle Gluck
Phone:	416-916-1691
	Company address below will appear on the final report
Street:	130 Stone Road West
City/Province:	Guelph ON
Postal Code:	N1G 5G3
Invoice To	Same as Report To ☒ YES ☐ NO
	Copy of Invoice with Report ☒ YES ☐ NO
Company:	
Contact:	

Reports / Recipients

Select Report Format: ☒ PDF ☒ EXCEL ☒ EDD (DIGITAL)

Merge QC/QCI Reports with COA ☐ YES ☐ NO ☒ N/A

☐ Compare Results to Criteria on Report - provide details below if box checked

Select Distribution: ☒ EMAIL ☐ MAIL ☐ FAX

Email 1 or Fax: Erinother@geosyntec.com

Email 2: Mgluck@geosyntec.com

Email 3: BVelderman@geosyntec.com

Invoice Recipients

Select Invoice Distribution: ☒ EMAIL ☐ MAIL ☐ FAX

Email 1 or Fax: BVelderman@geosyntec.com

Email 2:

Turnaround Time (TAT) Requested

☒ Routine [R] if received by 3pm M-F - no surcharges apply

☐ 4 day [P4] if received by 3pm M-F - 20% rush surcharge minimum

☐ 3 day [P3] if received by 3pm M-F - 25% rush surcharge minimum

☐ 2 day [P2] if received by 3pm M-F - 50% rush surcharge minimum

☐ 1 day [E] if received by 3pm M-F - 100% rush surcharge minimum

☐ Same day [E2] if received by 10am M-S - 200% rush surcharge. Additional fees may apply to rush requests on weekends, statutory holidays and non-routine tests

AFFIX ALS BARCODE LABEL HERE (ALS use only)

Date and Time Required for all E&P TATs:

For all tests with rush TATs requested, please contact your AM to confirm availability.

Project Information

ALS Account # / Quote #:

Job #: TR0736B

PO / AFE:

LSD:

ALS Lab Work Order # (ALS use only): L2598394

Oil and Gas Required Fields (client use)

AFE/Cost Center:	PO#
Major/Minor Code:	Routing Code:
Requisitioner:	
Location:	
ALS Contact:	Sampler:

Analysis Request — Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

ALS Sample # (ALS use only)	Sample Identification and/or Coordinates (This description will appear on the report)	Date (dd-mmm-yy)	Time (hh:mm)	Sample Type	NUMBER OF CONTAINERS	Metals	~~[illegible]~~	OCP	SAMPLES ON HOLD	EXTENDED STORAGE REQUIRED	SUSPECTED HAZARD (see notes)
	BH07-21 0-2'	07/06/21	14:15	Soil	2	✓		✓			
	BH07-21 2-4'	"	14:25	"	2	✓		✓			
	BH08-21 2'	"	9:53	"	2	✓		✓			
	BH08-21 4'	"	10:05	"	2	✓		✓			
	BH09-21 0-2'	"	9:10	"	2	✓		✓			
	BH09-21 5'	"	9:20	"	2	✓		✓			
	BH10-21 1-2	"	15:36	"	2	✓		✓			
	BH10-21 2-4	"	15:40	"	2	✓		✓			
	DUP01	~~"~~	—	"	2	✓		✓			
	DUP02	~~"~~	—	"	2	✓		✓			
	MW01-21 1-2	"	16:11	"	2	✓		✓			
	MW01-21 3-4	"	16:14	"	2	✓		✓			

Drinking Water (DW) Samples[1] (client use)

Are samples taken from a Regulated DW System? ☐ YES ☒ NO

Are samples for human consumption/ use? ☐ YES ☒ NO

Notes / Specify Limits for result evaluation by selecting from drop-down below (Excel COC only)

SAMPLE RECEIPT DETAILS (ALS use only)

Cooling Method: ☐ NONE ☐ ICE ☒ ICE PACKS ☐ FROZEN ☒ COOLING INITIATED

Submission Comments identified on Sample Receipt Notification: ☐ YES ☐ NO

Cooler Custody Seals Intact: ☐ YES ☐ N/A Sample Custody Seals Intact: ☐ YES ☐ N/A

INITIAL COOLER TEMPERATURES °C: 26.9

FINAL COOLER TEMPERATURES °C: 9.8 11

SHIPMENT RELEASE (client use)			INITIAL SHIPMENT RECEPTION (ALS use only)			FINAL SHIPMENT RECEPTION (ALS use only)		
Released by: FLORENT	Date: 08/06/21	Time: 12:00	Received by: [illegible]	Date: 8 JUN	Time: 12:00	Received by: [illegible]	Date: 06/09/21	Time: 9

REFER TO BACK PAGE FOR ALS LOCATIONS AND SAMPLING INFORMATION

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1. If any water samples are taken from a **Regulated Drinking Water (DW) System**, please submit using an **Authorized DW COC form**.

ALS www.alsglobal.com

Chain of Custody (COC) / Analytical Request Form

Canada Toll Free: 1 800 668 9878

COC Number: 20 - 895347

Report To	Contact and company name below will appear on the final report
Company:	Geosyntec
Contact:	Nicholle Clark
Phone:	416-536-1671
Company address below will appear on the final report	
Street:	130 Stone Road
City/Province:	Guelph ON
Postal Code:	N1G 5G3
Invoice To	Same as Report To ☒ YES ☐ NO
	Copy of Invoice with Report ☒ YES ☐ NO
Company:	
Contact:	

Reports / Recipients

Select Report Format: ☒ PDF ☒ EXCEL ☒ EDD (DIGITAL)

Merge QC/QCI Reports with COA ☐ YES ☐ NO ☒ N/A

☐ Compare Results to Criteria on Report - provide details below if box checked

Select Distribution: ☒ EMAIL ☐ MAIL ☐ FAX

Email 1 or Fax: Eriedler@geosyntec.com

Email 2: Nclark@geosyntec.com

Email 3: Bvelderman@geosyntec.com

Invoice Recipients

Select Invoice Distribution: ☒ EMAIL ☐ MAIL ☐ FAX

Email 1 or Fax: Bvelderman@geosyntec.com

Email 2:

Turnaround Time (TAT) Requested

- ☒ Routine [R] if received by 3pm M-F - no surcharges apply
- ☐ 4 day [P4] if received by 3pm M-F - 20% rush surcharge minimum
- ☐ 3 day [P3] if received by 3pm M-F - 25% rush surcharge minimum
- ☐ 2 day [P2] if received by 3pm M-F - 50% rush surcharge minimum
- ☐ 1 day [E] if received by 3pm M-F - 100% rush surcharge minimum
- ☐ Same day [E2] if received by 10am M-S - 200% rush surcharge. Additional fees may apply to rush requests on weekends, statutory holidays and non-routine tests

AFFIX ALS BARCODE LABEL HERE (ALS use only)

Date and Time Required for all E&P TATs:

For all tests with rush TATs requested, please contact your AM to confirm availability.

Project Information

ALS Account # / Quote #:

Job #:

PO / AFE:

LSD:

ALS Lab Work Order # (ALS use only): L2598394

Oil and Gas Required Fields (client use)

AFE/Cost Center:	PO#
Major/Minor Code:	Routing Code:
Requisitioner:	
Location:	
ALS Contact:	Sampler:

Analysis Request — Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

ALS Sample # (ALS use only)	Sample Identification and/or Coordinates (This description will appear on the report)	Date (dd-mmm-yy)	Time (hh:mm)	Sample Type	NUMBER OF CONTAINERS	metals	OC P	SAMPLES ON HOLD	EXTENDED STORAGE REQUIRED	SUSPECTED HAZARD (see notes)
	BH11-21 1-2	08/06/21	8:02	Soil	2	✓	✓			
	BH11-21 3-4	08/06/21	8:08	〃	2	✓	✓			

L2598394-COFC

Drinking Water (DW) Samples[1] (client use)

Are samples taken from a Regulated DW System? ☐ YES ☒ NO

Are samples for human consumption/ use? ☐ YES ☒ NO

Notes / Specify Limits for result evaluation by selecting from drop-down below (Excel COC only)

SAMPLE RECEIPT DETAILS (ALS use only)

Cooling Method: ☐ NONE ☐ ICE ☒ ICE PACKS ☐ FROZEN ☒ COOLING INITIATED

Submission Comments identified on Sample Receipt Notification: ☐ YES ☐ NO

Cooler Custody Seals Intact: ☐ YES ☐ N/A Sample Custody Seals Intact: ☐ YES ☐ N/A

INITIAL COOLER TEMPERATURES °C	FINAL COOLER TEMPERATURES °C
26.9	9.8

SHIPMENT RELEASE (client use)			INITIAL SHIPMENT RECEPTION (ALS use only)			FINAL SHIPMENT RECEPTION (ALS use only)		
Released by: FLORENT	Date: 08/06/21	Time: 17:00	Received by:	Date:	Time: 1250	Received by:	Date: 06/09/21	Time: 9

REFER TO BACK PAGE FOR ALS LOCATIONS AND SAMPLING INFORMATION

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1. If any water samples are taken from a **Regulated Drinking Water (DW) System**, please submit using an **Authorized DW COC form**.

GEOSYNTEC CONSULTANTS
INTERNATIONAL INC
ATTN: MICHELLE GLUCK
130 STONE ROAD WEST
GUELPH ON N1G 3Z2

Date Received: 10-JUN-21
Report Date: 18-JUN-21 12:01 (MT)
Version: FINAL REV. 2

Client Phone: 519-822-2230

Certificate of Analysis

Lab Work Order #: L2599907

Project P.O. #: NOT SUBMITTED
Job Reference: TR0936B
C of C Numbers:
Legal Site Desc:

Comments:
18-JUN-2021 Table 2

Gayle Braun
Senior Account Manager

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-1 MW01- 21 Sampled By: CLIENT on 10-JUN-21 @ 09:20 Matrix: WATER							
Total Metals							
Antimony (Sb)-Total	<0.00010		0.00010	mg/L	15-JUN-21	0.006	0.006
Arsenic (As)-Total	0.00091		0.00010	mg/L	15-JUN-21	0.025	0.025
Barium (Ba)-Total	0.0659		0.00020	mg/L	15-JUN-21	1	1
Beryllium (Be)-Total	<0.00010		0.00010	mg/L	15-JUN-21	0.004	0.004
Boron (B)-Total	0.031		0.010	mg/L	15-JUN-21	5	5
Cadmium (Cd)-Total	0.000019		0.000010	mg/L	15-JUN-21	0.0027	0.0027
Chromium (Cr)-Total	0.00072		0.00050	mg/L	15-JUN-21	0.05	0.05
Cobalt (Co)-Total	0.00053		0.00010	mg/L	15-JUN-21	0.0038	0.0038
Copper (Cu)-Total	0.0010		0.0010	mg/L	15-JUN-21	0.087	0.087
Lead (Pb)-Total	0.00012		0.00010	mg/L	15-JUN-21	0.01	0.01
Molybdenum (Mo)-Total	0.00147		0.000050	mg/L	15-JUN-21	0.07	0.07
Nickel (Ni)-Total	0.00127		0.00050	mg/L	15-JUN-21	0.1	0.1
Selenium (Se)-Total	0.000195		0.000050	mg/L	15-JUN-21	0.01	0.01
Silver (Ag)-Total	<0.000050		0.000050	mg/L	15-JUN-21	0.0015	0.0015
Sodium (Na)-Total	16.1		0.50	mg/L	15-JUN-21	490	490
Thallium (Tl)-Total	<0.000010		0.000010	mg/L	15-JUN-21	0.002	0.002
Uranium (U)-Total	0.000720		0.000010	mg/L	15-JUN-21	0.02	0.02
Vanadium (V)-Total	0.00290		0.00050	mg/L	15-JUN-21	0.0062	0.0062
Zinc (Zn)-Total	<0.0030		0.0030	mg/L	15-JUN-21	1.1	1.1
Organochlorine Pesticides							
Aldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35
gamma-hexachlorocyclohexane	<0.0080		0.0080	ug/L	17-JUN-21	1.2	1.2
a-chlordane	<0.0080		0.0080	ug/L	17-JUN-21		
Chlordane (Total)	<0.011		0.011	ug/L	17-JUN-21	7	7
g-chlordane	<0.0080		0.0080	ug/L	17-JUN-21		
o,p-DDD	<0.0040		0.0040	ug/L	17-JUN-21		
pp-DDD	<0.0040		0.0040	ug/L	17-JUN-21		
Total DDD	<0.0057		0.0057	ug/L	17-JUN-21	10	10
o,p-DDE	<0.0040		0.0040	ug/L	17-JUN-21		
pp-DDE	<0.0040		0.0040	ug/L	17-JUN-21		
Total DDE	<0.0057		0.0057	ug/L	17-JUN-21	10	10
op-DDT	<0.0040		0.0040	ug/L	17-JUN-21		
pp-DDT	<0.0040		0.0040	ug/L	17-JUN-21		
Total DDT	<0.0057		0.0057	ug/L	17-JUN-21	2.8	2.8
DDT+Metabolites	<0.0098		0.0098	ug/L	17-JUN-21		
Dieldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35
Endosulfan I	<0.0070		0.0070	ug/L	17-JUN-21		
Endosulfan II	<0.0070		0.0070	ug/L	17-JUN-21		
Endosulfan (Total)	<0.0099		0.0099	ug/L	17-JUN-21	1.5	1.5
Endrin	<0.010		0.010	ug/L	17-JUN-21	0.48	0.48
Heptachlor	<0.0080		0.0080	ug/L	17-JUN-21	1.5	1.5
Heptachlor Epoxide	<0.0080		0.0080	ug/L	17-JUN-21	0.048	0.048
Hexachlorobenzene	<0.0080		0.0080	ug/L	17-JUN-21	1	1
Hexachlorobutadiene	<0.0080		0.0080	ug/L	17-JUN-21	0.44	0.6
Hexachloroethane	<0.0080		0.0080	ug/L	17-JUN-21	2.1	2.1
Methoxychlor	<0.0080		0.0080	ug/L	17-JUN-21	6.5	6.5

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-1 MW01- 21							
Sampled By: CLIENT on 10-JUN-21 @ 09:20							
Matrix: WATER							
Organochlorine Pesticides							
Surrogate: Decachlorobiphenyl	107.9		40-130	%	17-JUN-21		
Surrogate: Tetrachloro-m-xylene	97.8		40-130	%	17-JUN-21		
L2599907-2 MW02- 21							
Sampled By: CLIENT on 10-JUN-21 @ 08:00							
Matrix: WATER							
Physical Tests							
Conductivity	0.992		0.0030	mS/cm	12-JUN-21		
pH	7.57		0.10	pH units	12-JUN-21		
Anions and Nutrients							
Chloride (Cl)	8.04		0.50	mg/L	14-JUN-21	790	790
Cyanides							
Cyanide, Weak Acid Diss	<2.0		2.0	ug/L	14-JUN-21	66	66
Dissolved Metals							
Dissolved Mercury Filtration Location	FIELD			No Unit	11-JUN-21		
Dissolved Metals Filtration Location	FIELD			No Unit	11-JUN-21		
Antimony (Sb)-Dissolved	<0.10		0.10	ug/L	11-JUN-21	6	6
Arsenic (As)-Dissolved	0.67		0.10	ug/L	11-JUN-21	25	25
Barium (Ba)-Dissolved	88.3		0.10	ug/L	11-JUN-21	1000	1000
Beryllium (Be)-Dissolved	<0.10		0.10	ug/L	11-JUN-21	4	4
Boron (B)-Dissolved	38		10	ug/L	11-JUN-21	5000	5000
Cadmium (Cd)-Dissolved	0.014		0.010	ug/L	11-JUN-21	2.7	2.7
Chromium (Cr)-Dissolved	<0.50		0.50	ug/L	11-JUN-21	50	50
Cobalt (Co)-Dissolved	0.89		0.10	ug/L	11-JUN-21	3.8	3.8
Copper (Cu)-Dissolved	6.46		0.20	ug/L	11-JUN-21	87	87
Lead (Pb)-Dissolved	<0.050		0.050	ug/L	11-JUN-21	10	10
Mercury (Hg)-Dissolved	<0.0050		0.0050	ug/L	14-JUN-21	0.29	1
Molybdenum (Mo)-Dissolved	1.45		0.050	ug/L	11-JUN-21	70	70
Nickel (Ni)-Dissolved	1.77		0.50	ug/L	11-JUN-21	100	100
Selenium (Se)-Dissolved	0.053		0.050	ug/L	11-JUN-21	10	10
Silver (Ag)-Dissolved	<0.050		0.050	ug/L	11-JUN-21	1.5	1.5
Sodium (Na)-Dissolved	42500		500	ug/L	11-JUN-21	490000	490000
Thallium (Tl)-Dissolved	<0.010		0.010	ug/L	11-JUN-21	2	2
Uranium (U)-Dissolved	1.55		0.010	ug/L	11-JUN-21	20	20
Vanadium (V)-Dissolved	2.61		0.50	ug/L	11-JUN-21	6.2	6.2
Zinc (Zn)-Dissolved	1.0		1.0	ug/L	11-JUN-21	1100	1100
Speciated Metals							
Chromium, Hexavalent	<0.50		0.50	ug/L	15-JUN-21	25	25
Volatile Organic Compounds							
Acetone	<30		30	ug/L	17-JUN-21	2700	2700
Benzene	<0.50		0.50	ug/L	17-JUN-21	5	5
Bromodichloromethane	<2.0		2.0	ug/L	17-JUN-21	16	16
Bromoform	<5.0		5.0	ug/L	17-JUN-21	25	25
Bromomethane	<0.50		0.50	ug/L	17-JUN-21	0.89	0.89
Carbon tetrachloride	<0.20		0.20	ug/L	17-JUN-21	0.79	5

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-2 MW02- 21							
Sampled By: CLIENT on 10-JUN-21 @ 08:00							
Matrix: WATER							
Volatile Organic Compounds							
Chlorobenzene	<0.50		0.50	ug/L	17-JUN-21	30	30
Dibromochloromethane	<2.0		2.0	ug/L	17-JUN-21	25	25
Chloroform	<1.0		1.0	ug/L	17-JUN-21	2.4	22
1,2-Dibromoethane	<0.20		0.20	ug/L	17-JUN-21	0.2	0.2
1,2-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	3	3
1,3-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	59	59
1,4-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	1	1
Dichlorodifluoromethane	<2.0		2.0	ug/L	17-JUN-21	590	590
1,1-Dichloroethane	<0.50		0.50	ug/L	17-JUN-21	5	5
1,2-Dichloroethane	<0.50		0.50	ug/L	17-JUN-21	1.6	5
1,1-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	14
cis-1,2-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
trans-1,2-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
Methylene Chloride	<5.0		5.0	ug/L	17-JUN-21	50	50
1,2-Dichloropropane	<0.50		0.50	ug/L	17-JUN-21	5	5
cis-1,3-Dichloropropene	<0.30		0.30	ug/L	17-JUN-21		
trans-1,3-Dichloropropene	<0.30		0.30	ug/L	17-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.50		0.50	ug/L	17-JUN-21	0.5	0.5
Ethylbenzene	<0.50		0.50	ug/L	17-JUN-21	2.4	2.4
n-Hexane	<0.50		0.50	ug/L	17-JUN-21	51	520
Methyl Ethyl Ketone	<20		20	ug/L	17-JUN-21	1800	1800
Methyl Isobutyl Ketone	<20		20	ug/L	17-JUN-21	640	640
MTBE	<2.0		2.0	ug/L	17-JUN-21	15	15
Styrene	<0.50		0.50	ug/L	17-JUN-21	5.4	5.4
1,1,1,2-Tetrachloroethane	<0.50		0.50	ug/L	17-JUN-21	1.1	1.1
1,1,2,2-Tetrachloroethane	<0.50		0.50	ug/L	17-JUN-21	1	1
Tetrachloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
Toluene	<0.50		0.50	ug/L	17-JUN-21	24	24
1,1,1-Trichloroethane	<0.50		0.50	ug/L	17-JUN-21	200	200
1,1,2-Trichloroethane	<0.50		0.50	ug/L	17-JUN-21	4.7	5
Trichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	5
Trichlorofluoromethane	<5.0		5.0	ug/L	17-JUN-21	150	150
Vinyl chloride	<0.50		0.50	ug/L	17-JUN-21	0.5	1.7
o-Xylene	<0.30		0.30	ug/L	17-JUN-21		
m+p-Xylenes	<0.40		0.40	ug/L	17-JUN-21		
Xylenes (Total)	<0.50		0.50	ug/L	17-JUN-21	300	300
Surrogate: 4-Bromofluorobenzene	98.7		70-130	%	17-JUN-21		
Surrogate: 1,4-Difluorobenzene	101.1		70-130	%	17-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<25		25	ug/L	17-JUN-21	750	750
F1-BTEX	<25		25	ug/L	17-JUN-21	750	750
F2 (C10-C16)	<100		100	ug/L	14-JUN-21	150	150
F2-Naphth	<100		100	ug/L	17-JUN-21		
F3 (C16-C34)	<250		250	ug/L	14-JUN-21	500	500
F3-PAH	<250		250	ug/L	17-JUN-21		
F4 (C34-C50)	<250		250	ug/L	14-JUN-21	500	500

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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2599907-2 MW02- 21									
Sampled By: CLIENT on 10-JUN-21 @ 08:00									
Matrix: WATER									
Hydrocarbons									
Total Hydrocarbons (C6-C50)	<370		370	ug/L	17-JUN-21				
Chrom. to baseline at nC50	YES			No Unit	14-JUN-21				
Surrogate: 2-Bromobenzotrifluoride	96.8		60-140	%	14-JUN-21				
Surrogate: 3,4-Dichlorotoluene	92.4		60-140	%	17-JUN-21				
Polycyclic Aromatic Hydrocarbons									
Acenaphthene	<0.020		0.020	ug/L	16-JUN-21	4.1	4.1		
Acenaphthylene	<0.020		0.020	ug/L	16-JUN-21	1	1		
Anthracene	<0.020		0.020	ug/L	16-JUN-21	2.4	2.4		
Benzo(a)anthracene	<0.020		0.020	ug/L	16-JUN-21	1	1		
Benzo(a)pyrene	<0.010		0.010	ug/L	16-JUN-21	0.01	0.01		
Benzo(b&j)fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1		
Benzo(g,h,i)perylene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2		
Benzo(k)fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1		
Chrysene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1		
Dibenz(a,h)anthracene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2		
Fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.41	0.41		
Fluorene	<0.020		0.020	ug/L	16-JUN-21	120	120		
Indeno(1,2,3-cd)pyrene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2		
1+2-Methylnaphthalenes	<0.028		0.028	ug/L	16-JUN-21	3.2	3.2		
1-Methylnaphthalene	<0.020		0.020	ug/L	16-JUN-21	3.2	3.2		
2-Methylnaphthalene	<0.020		0.020	ug/L	16-JUN-21	3.2	3.2		
Naphthalene	<0.050		0.050	ug/L	16-JUN-21	11	11		
Phenanthrene	<0.020		0.020	ug/L	16-JUN-21	1	1		
Pyrene	<0.020		0.020	ug/L	16-JUN-21	4.1	4.1		
Surrogate: Chrysene d12	91.4		50-150	%	16-JUN-21				
Surrogate: Naphthalene d8	96.7		60-140	%	16-JUN-21				
Surrogate: Phenanthrene d10	106.6		60-140	%	16-JUN-21				
Organochlorine Pesticides									
Aldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35		
gamma-hexachlorocyclohexane	<0.0080		0.0080	ug/L	17-JUN-21	1.2	1.2		
a-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
Chlordane (Total)	<0.011		0.011	ug/L	17-JUN-21	7	7		
g-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
o,p-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
pp-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
Total DDD	<0.0057		0.0057	ug/L	17-JUN-21	10	10		
o,p-DDE	<0.0040		0.0040	ug/L	17-JUN-21				
pp-DDE	<0.0040		0.0040	ug/L	17-JUN-21				
Total DDE	<0.0057		0.0057	ug/L	17-JUN-21	10	10		
op-DDT	<0.0040		0.0040	ug/L	17-JUN-21				
pp-DDT	<0.0040		0.0040	ug/L	17-JUN-21				
Total DDT	<0.0057		0.0057	ug/L	17-JUN-21	2.8	2.8		
DDT+Metabolites	<0.0098		0.0098	ug/L	17-JUN-21				
Dieldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35		
Endosulfan I	<0.0070		0.0070	ug/L	17-JUN-21				
Endosulfan II	<0.0070		0.0070	ug/L	17-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2		
L2599907-2	MW02- 21									
Sampled By:	CLIENT on 10-JUN-21 @ 08:00									
Matrix:	WATER									
Organochlorine Pesticides										
	Endosulfan (Total)	<0.0099		0.0099	ug/L	17-JUN-21	1.5	1.5		
	Endrin	<0.010		0.010	ug/L	17-JUN-21	0.48	0.48		
	Heptachlor	<0.0080		0.0080	ug/L	17-JUN-21	1.5	1.5		
	Heptachlor Epoxide	<0.0080		0.0080	ug/L	17-JUN-21	0.048	0.048		
	Hexachlorobenzene	<0.0080		0.0080	ug/L	17-JUN-21	1	1		
	Hexachlorobutadiene	<0.0080		0.0080	ug/L	17-JUN-21	0.44	0.6		
	Hexachloroethane	<0.0080		0.0080	ug/L	17-JUN-21	2.1	2.1		
	Methoxychlor	<0.0080		0.0080	ug/L	17-JUN-21	6.5	6.5		
	Surrogate: Decachlorobiphenyl	97.3		40-130	%	17-JUN-21				
	Surrogate: Tetrachloro-m-xylene	86.7		40-130	%	17-JUN-21				
L2599907-3	MW03- 21									
Sampled By:	CLIENT on 10-JUN-21 @ 10:15									
Matrix:	WATER									
Dissolved Metals										
	Dissolved Metals Filtration Location	FIELD			No Unit	11-JUN-21				
	Antimony (Sb)-Dissolved	<0.10		0.10	ug/L	11-JUN-21	6	6		
	Arsenic (As)-Dissolved	0.93		0.10	ug/L	11-JUN-21	25	25		
	Barium (Ba)-Dissolved	86.5		0.10	ug/L	11-JUN-21	1000	1000		
	Beryllium (Be)-Dissolved	<0.10		0.10	ug/L	11-JUN-21	4	4		
	Boron (B)-Dissolved	55		10	ug/L	11-JUN-21	5000	5000		
	Cadmium (Cd)-Dissolved	<0.010		0.010	ug/L	11-JUN-21	2.7	2.7		
	Chromium (Cr)-Dissolved	<0.50		0.50	ug/L	11-JUN-21	50	50		
	Cobalt (Co)-Dissolved	0.33		0.10	ug/L	11-JUN-21	3.8	3.8		
	Copper (Cu)-Dissolved	3.40		0.20	ug/L	11-JUN-21	87	87		
	Lead (Pb)-Dissolved	<0.050		0.050	ug/L	11-JUN-21	10	10		
	Molybdenum (Mo)-Dissolved	2.24		0.050	ug/L	11-JUN-21	70	70		
	Nickel (Ni)-Dissolved	1.06		0.50	ug/L	11-JUN-21	100	100		
	Selenium (Se)-Dissolved	0.707		0.050	ug/L	11-JUN-21	10	10		
	Silver (Ag)-Dissolved	<0.050		0.050	ug/L	11-JUN-21	1.5	1.5		
	Sodium (Na)-Dissolved	23700		500	ug/L	11-JUN-21	490000	490000		
	Thallium (Tl)-Dissolved	<0.010		0.010	ug/L	11-JUN-21	2	2		
	Uranium (U)-Dissolved	1.66		0.010	ug/L	11-JUN-21	20	20		
	Vanadium (V)-Dissolved	4.66		0.50	ug/L	11-JUN-21	6.2	6.2		
	Zinc (Zn)-Dissolved	3.7		1.0	ug/L	11-JUN-21	1100	1100		
Organochlorine Pesticides										
	Aldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35		
	gamma-hexachlorocyclohexane	<0.0080		0.0080	ug/L	17-JUN-21	1.2	1.2		
	a-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
	Chlordane (Total)	<0.011		0.011	ug/L	17-JUN-21	7	7		
	g-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
	o,p-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
	pp-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
	Total DDD	<0.0057		0.0057	ug/L	17-JUN-21	10	10		
	o,p-DDE	<0.0040		0.0040	ug/L	17-JUN-21				
	pp-DDE	<0.0040		0.0040	ug/L	17-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-3 MW03- 21 Sampled By: CLIENT on 10-JUN-21 @ 10:15 Matrix: WATER							
Organochlorine Pesticides							
Total DDE	<0.0057		0.0057	ug/L	17-JUN-21	10	10
op-DDT	<0.0040		0.0040	ug/L	17-JUN-21		
pp-DDT	<0.0040		0.0040	ug/L	17-JUN-21		
Total DDT	<0.0057		0.0057	ug/L	17-JUN-21	2.8	2.8
DDT+Metabolites	<0.0098		0.0098	ug/L	17-JUN-21		
Dieldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35
Endosulfan I	<0.0070		0.0070	ug/L	17-JUN-21		
Endosulfan II	<0.0070		0.0070	ug/L	17-JUN-21		
Endosulfan (Total)	<0.0099		0.0099	ug/L	17-JUN-21	1.5	1.5
Endrin	<0.010		0.010	ug/L	17-JUN-21	0.48	0.48
Heptachlor	<0.0080		0.0080	ug/L	17-JUN-21	1.5	1.5
Heptachlor Epoxide	<0.0080		0.0080	ug/L	17-JUN-21	0.048	0.048
Hexachlorobenzene	<0.0080		0.0080	ug/L	17-JUN-21	1	1
Hexachlorobutadiene	<0.0080		0.0080	ug/L	17-JUN-21	0.44	0.6
Hexachloroethane	<0.0080		0.0080	ug/L	17-JUN-21	2.1	2.1
Methoxychlor	<0.0080		0.0080	ug/L	17-JUN-21	6.5	6.5
Surrogate: Decachlorobiphenyl	96.8		40-130	%	17-JUN-21		
Surrogate: Tetrachloro-m-xylene	95.2		40-130	%	17-JUN-21		
L2599907-4 MW04- 21 Sampled By: CLIENT on 10-JUN-21 @ 11:55 Matrix: WATER						#1	#2
Physical Tests							
Conductivity	3.66		0.0030	mS/cm	12-JUN-21		
pH	7.64		0.10	pH units	12-JUN-21		
Anions and Nutrients							
Chloride (Cl)	855	DLHC	2.5	mg/L	14-JUN-21	*790	*790
Cyanides							
Cyanide, Weak Acid Diss	<2.0		2.0	ug/L	14-JUN-21	66	66
Dissolved Metals							
Dissolved Mercury Filtration Location	FIELD			No Unit	11-JUN-21		
Dissolved Metals Filtration Location	FIELD			No Unit	11-JUN-21		
Antimony (Sb)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	6	6
Arsenic (As)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	25	25
Barium (Ba)-Dissolved	148	DLHC	1.0	ug/L	11-JUN-21	1000	1000
Beryllium (Be)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	4	4
Boron (B)-Dissolved	<100	DLHC	100	ug/L	11-JUN-21	5000	5000
Cadmium (Cd)-Dissolved	<0.050	DLHC	0.050	ug/L	11-JUN-21	2.7	2.7
Chromium (Cr)-Dissolved	<5.0	DLHC	5.0	ug/L	11-JUN-21	50	50
Cobalt (Co)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	3.8	3.8
Copper (Cu)-Dissolved	<2.0	DLHC	2.0	ug/L	11-JUN-21	87	87
Lead (Pb)-Dissolved	<0.50	DLHC	0.50	ug/L	11-JUN-21	10	10
Mercury (Hg)-Dissolved	<0.0050		0.0050	ug/L	14-JUN-21	0.29	1
Molybdenum (Mo)-Dissolved	0.96	DLHC	0.50	ug/L	11-JUN-21	70	70
Nickel (Ni)-Dissolved	<5.0	DLHC	5.0	ug/L	11-JUN-21	100	100
Selenium (Se)-Dissolved	<0.50	DLHC	0.50	ug/L	11-JUN-21	10	10

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-4 MW04- 21							
Sampled By: CLIENT on 10-JUN-21 @ 11:55							
Matrix: WATER							
Dissolved Metals							
Silver (Ag)-Dissolved	<0.50	DLHC	0.50	ug/L	11-JUN-21	1.5	1.5
Sodium (Na)-Dissolved	192000	DLHC	500	ug/L	11-JUN-21	490000	490000
Thallium (Tl)-Dissolved	<0.10	DLHC	0.10	ug/L	11-JUN-21	2	2
Uranium (U)-Dissolved	9.84	DLHC	0.10	ug/L	11-JUN-21	20	20
Vanadium (V)-Dissolved	<5.0	DLHC	5.0	ug/L	11-JUN-21	6.2	6.2
Zinc (Zn)-Dissolved	<10	DLHC	10	ug/L	11-JUN-21	1100	1100
Speciated Metals							
Chromium, Hexavalent	<0.50		0.50	ug/L	15-JUN-21	25	25
Volatile Organic Compounds							
Acetone	<30		30	ug/L	17-JUN-21	2700	2700
Benzene	<0.50		0.50	ug/L	17-JUN-21	5	5
Bromodichloromethane	<2.0		2.0	ug/L	17-JUN-21	16	16
Bromoform	<5.0		5.0	ug/L	17-JUN-21	25	25
Bromomethane	<0.50		0.50	ug/L	17-JUN-21	0.89	0.89
Carbon tetrachloride	<0.20		0.20	ug/L	17-JUN-21	0.79	5
Chlorobenzene	<0.50		0.50	ug/L	17-JUN-21	30	30
Dibromochloromethane	<2.0		2.0	ug/L	17-JUN-21	25	25
Chloroform	<1.0		1.0	ug/L	17-JUN-21	2.4	22
1,2-Dibromoethane	<0.20		0.20	ug/L	17-JUN-21	0.2	0.2
1,2-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	3	3
1,3-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	59	59
1,4-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	1	1
Dichlorodifluoromethane	<2.0		2.0	ug/L	17-JUN-21	590	590
1,1-Dichloroethane	<0.50		0.50	ug/L	17-JUN-21	5	5
1,2-Dichloroethane	<0.50		0.50	ug/L	17-JUN-21	1.6	5
1,1-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	14
cis-1,2-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
trans-1,2-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
Methylene Chloride	<5.0		5.0	ug/L	17-JUN-21	50	50
1,2-Dichloropropane	<0.50		0.50	ug/L	17-JUN-21	5	5
cis-1,3-Dichloropropene	<0.30		0.30	ug/L	17-JUN-21		
trans-1,3-Dichloropropene	<0.30		0.30	ug/L	17-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.50		0.50	ug/L	17-JUN-21	0.5	0.5
Ethylbenzene	<0.50		0.50	ug/L	17-JUN-21	2.4	2.4
n-Hexane	<0.50		0.50	ug/L	17-JUN-21	51	520
Methyl Ethyl Ketone	<20		20	ug/L	17-JUN-21	1800	1800
Methyl Isobutyl Ketone	<20		20	ug/L	17-JUN-21	640	640
MTBE	<2.0		2.0	ug/L	17-JUN-21	15	15
Styrene	<0.50		0.50	ug/L	17-JUN-21	5.4	5.4
1,1,1,2-Tetrachloroethane	<0.50		0.50	ug/L	17-JUN-21	1.1	1.1
1,1,2,2-Tetrachloroethane	<0.50		0.50	ug/L	17-JUN-21	1	1
Tetrachloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
Toluene	<0.50		0.50	ug/L	17-JUN-21	24	24
1,1,1-Trichloroethane	<0.50		0.50	ug/L	17-JUN-21	200	200
1,1,2-Trichloroethane	<0.50		0.50	ug/L	17-JUN-21	4.7	5

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-4 MW04- 21							
Sampled By: CLIENT on 10-JUN-21 @ 11:55							
Matrix: WATER							
Volatile Organic Compounds							
Trichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	5
Trichlorofluoromethane	<5.0		5.0	ug/L	17-JUN-21	150	150
Vinyl chloride	<0.50		0.50	ug/L	17-JUN-21	0.5	1.7
o-Xylene	<0.30		0.30	ug/L	17-JUN-21		
m+p-Xylenes	<0.40		0.40	ug/L	17-JUN-21		
Xylenes (Total)	<0.50		0.50	ug/L	17-JUN-21	300	300
Surrogate: 4-Bromofluorobenzene	99.6		70-130	%	17-JUN-21		
Surrogate: 1,4-Difluorobenzene	102.0		70-130	%	17-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<25		25	ug/L	17-JUN-21	750	750
F1-BTEX	<25		25	ug/L	17-JUN-21	750	750
F2 (C10-C16)	<100		100	ug/L	14-JUN-21	150	150
F2-Naphth	<100		100	ug/L	17-JUN-21		
F3 (C16-C34)	<250		250	ug/L	14-JUN-21	500	500
F3-PAH	<250		250	ug/L	17-JUN-21		
F4 (C34-C50)	<250		250	ug/L	14-JUN-21	500	500
Total Hydrocarbons (C6-C50)	<370		370	ug/L	17-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	14-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	102.3		60-140	%	14-JUN-21		
Surrogate: 3,4-Dichlorotoluene	79.7		60-140	%	17-JUN-21		
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.020		0.020	ug/L	16-JUN-21	4.1	4.1
Acenaphthylene	<0.020		0.020	ug/L	16-JUN-21	1	1
Anthracene	<0.020		0.020	ug/L	16-JUN-21	2.4	2.4
Benzo(a)anthracene	<0.020		0.020	ug/L	16-JUN-21	1	1
Benzo(a)pyrene	<0.010		0.010	ug/L	16-JUN-21	0.01	0.01
Benzo(b&j)fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1
Benzo(g,h,i)perylene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2
Benzo(k)fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1
Chrysene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1
Dibenz(a,h)anthracene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2
Fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.41	0.41
Fluorene	<0.020		0.020	ug/L	16-JUN-21	120	120
Indeno(1,2,3-cd)pyrene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2
1+2-Methylnaphthalenes	<0.028		0.028	ug/L	16-JUN-21	3.2	3.2
1-Methylnaphthalene	<0.020		0.020	ug/L	16-JUN-21	3.2	3.2
2-Methylnaphthalene	<0.020		0.020	ug/L	16-JUN-21	3.2	3.2
Naphthalene	<0.050		0.050	ug/L	16-JUN-21	11	11
Phenanthrene	<0.020		0.020	ug/L	16-JUN-21	1	1
Pyrene	<0.020		0.020	ug/L	16-JUN-21	4.1	4.1
Surrogate: Chrysene d12	87.0		50-150	%	16-JUN-21		
Surrogate: Naphthalene d8	101.7		60-140	%	16-JUN-21		
Surrogate: Phenanthrene d10	108.2		60-140	%	16-JUN-21		
Organochlorine Pesticides							
Aldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35
gamma-hexachlorocyclohexane	<0.0080		0.0080	ug/L	17-JUN-21	1.2	1.2

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Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping	Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	#2		
L2599907-4	MW04- 21									
Sampled By:	CLIENT on 10-JUN-21 @ 11:55									
Matrix:	WATER									
Organochlorine Pesticides										
	a-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
	Chlordane (Total)	<0.011		0.011	ug/L	17-JUN-21	7	7		
	g-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
	o,p-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
	pp-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
	Total DDD	<0.0057		0.0057	ug/L	17-JUN-21	10	10		
	o,p-DDE	<0.0040		0.0040	ug/L	17-JUN-21				
	pp-DDE	<0.0040		0.0040	ug/L	17-JUN-21				
	Total DDE	<0.0057		0.0057	ug/L	17-JUN-21	10	10		
	op-DDT	<0.0040		0.0040	ug/L	17-JUN-21				
	pp-DDT	<0.0040		0.0040	ug/L	17-JUN-21				
	Total DDT	<0.0057		0.0057	ug/L	17-JUN-21	2.8	2.8		
	DDT+Metabolites	<0.0098		0.0098	ug/L	17-JUN-21				
	Dieldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35		
	Endosulfan I	<0.0070		0.0070	ug/L	17-JUN-21				
	Endosulfan II	<0.0070		0.0070	ug/L	17-JUN-21				
	Endosulfan (Total)	<0.0099		0.0099	ug/L	17-JUN-21	1.5	1.5		
	Endrin	<0.010		0.010	ug/L	17-JUN-21	0.48	0.48		
	Heptachlor	<0.0080		0.0080	ug/L	17-JUN-21	1.5	1.5		
	Heptachlor Epoxide	<0.0080		0.0080	ug/L	17-JUN-21	0.048	0.048		
	Hexachlorobenzene	<0.0080		0.0080	ug/L	17-JUN-21	1	1		
	Hexachlorobutadiene	<0.0080		0.0080	ug/L	17-JUN-21	0.44	0.6		
	Hexachloroethane	<0.0080		0.0080	ug/L	17-JUN-21	2.1	2.1		
	Methoxychlor	<0.0080		0.0080	ug/L	17-JUN-21	6.5	6.5		
	Surrogate: Decachlorobiphenyl	98.5		40-130	%	17-JUN-21				
	Surrogate: Tetrachloro-m-xylene	88.6		40-130	%	17-JUN-21				
L2599907-5	DUP 01									
Sampled By:	CLIENT on 10-JUN-21									
Matrix:	WATER									
							#1	#2		
Physical Tests										
	Conductivity	3.63		0.0030	mS/cm	12-JUN-21				
	pH	7.62		0.10	pH units	12-JUN-21				
Anions and Nutrients										
	Chloride (Cl)	776	DLHC	2.5	mg/L	14-JUN-21	790	790		
Cyanides										
	Cyanide, Weak Acid Diss	<2.0		2.0	ug/L	14-JUN-21	66	66		
Dissolved Metals										
	Dissolved Mercury Filtration Location	FIELD			No Unit	11-JUN-21				
	Dissolved Metals Filtration Location	FIELD			No Unit	11-JUN-21				
	Antimony (Sb)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	6	6		
	Arsenic (As)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	25	25		
	Barium (Ba)-Dissolved	153	DLHC	1.0	ug/L	11-JUN-21	1000	1000		
	Beryllium (Be)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	4	4		
	Boron (B)-Dissolved	<100	DLHC	100	ug/L	11-JUN-21	5000	5000		
	Cadmium (Cd)-Dissolved	<0.050	DLHC	0.050	ug/L	11-JUN-21	2.7	2.7		

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use **#2: T2-Ground Water (Fine Soil)-All Types of Property Use**

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-5 DUP 01 Sampled By: CLIENT on 10-JUN-21 Matrix: WATER							
Dissolved Metals							
Chromium (Cr)-Dissolved	<5.0	DLHC	5.0	ug/L	11-JUN-21	50	50
Cobalt (Co)-Dissolved	<1.0	DLHC	1.0	ug/L	11-JUN-21	3.8	3.8
Copper (Cu)-Dissolved	<2.0	DLHC	2.0	ug/L	11-JUN-21	87	87
Lead (Pb)-Dissolved	<0.50	DLHC	0.50	ug/L	11-JUN-21	10	10
Mercury (Hg)-Dissolved	<0.0050		0.0050	ug/L	14-JUN-21	0.29	1
Molybdenum (Mo)-Dissolved	1.03	DLHC	0.50	ug/L	11-JUN-21	70	70
Nickel (Ni)-Dissolved	<5.0	DLHC	5.0	ug/L	11-JUN-21	100	100
Selenium (Se)-Dissolved	<0.50	DLHC	0.50	ug/L	11-JUN-21	10	10
Silver (Ag)-Dissolved	<0.50	DLHC	0.50	ug/L	11-JUN-21	1.5	1.5
Sodium (Na)-Dissolved	195000	DLHC	500	ug/L	11-JUN-21	490000	490000
Thallium (Tl)-Dissolved	<0.10	DLHC	0.10	ug/L	11-JUN-21	2	2
Uranium (U)-Dissolved	9.59	DLHC	0.10	ug/L	11-JUN-21	20	20
Vanadium (V)-Dissolved	<5.0	DLHC	5.0	ug/L	11-JUN-21	6.2	6.2
Zinc (Zn)-Dissolved	<10	DLHC	10	ug/L	11-JUN-21	1100	1100
Speciated Metals							
Chromium, Hexavalent	<0.50		0.50	ug/L	15-JUN-21	25	25
Volatile Organic Compounds							
Acetone	<30		30	ug/L	17-JUN-21	2700	2700
Benzene	<0.50		0.50	ug/L	17-JUN-21	5	5
Bromodichloromethane	<2.0		2.0	ug/L	17-JUN-21	16	16
Bromoform	<5.0		5.0	ug/L	17-JUN-21	25	25
Bromomethane	<0.50		0.50	ug/L	17-JUN-21	0.89	0.89
Carbon tetrachloride	<0.20		0.20	ug/L	17-JUN-21	0.79	5
Chlorobenzene	<0.50		0.50	ug/L	17-JUN-21	30	30
Dibromochloromethane	<2.0		2.0	ug/L	17-JUN-21	25	25
Chloroform	<1.0		1.0	ug/L	17-JUN-21	2.4	22
1,2-Dibromoethane	<0.20		0.20	ug/L	17-JUN-21	0.2	0.2
1,2-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	3	3
1,3-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	59	59
1,4-Dichlorobenzene	<0.50		0.50	ug/L	17-JUN-21	1	1
Dichlorodifluoromethane	<2.0		2.0	ug/L	17-JUN-21	590	590
1,1-Dichloroethane	<0.50		0.50	ug/L	17-JUN-21	5	5
1,2-Dichloroethane	<0.50		0.50	ug/L	17-JUN-21	1.6	5
1,1-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	14
cis-1,2-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
trans-1,2-Dichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
Methylene Chloride	<5.0		5.0	ug/L	17-JUN-21	50	50
1,2-Dichloropropane	<0.50		0.50	ug/L	17-JUN-21	5	5
cis-1,3-Dichloropropene	<0.30		0.30	ug/L	17-JUN-21		
trans-1,3-Dichloropropene	<0.30		0.30	ug/L	17-JUN-21		
1,3-Dichloropropene (cis & trans)	<0.50		0.50	ug/L	17-JUN-21	0.5	0.5
Ethylbenzene	<0.50		0.50	ug/L	17-JUN-21	2.4	2.4
n-Hexane	<0.50		0.50	ug/L	17-JUN-21	51	520
Methyl Ethyl Ketone	<20		20	ug/L	17-JUN-21	1800	1800
Methyl Isobutyl Ketone	<20		20	ug/L	17-JUN-21	640	640

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2
L2599907-5 DUP 01							
Sampled By: CLIENT on 10-JUN-21							
Matrix: WATER							
Volatile Organic Compounds							
MTBE	<2.0		2.0	ug/L	17-JUN-21	15	15
Styrene	<0.50		0.50	ug/L	17-JUN-21	5.4	5.4
1,1,1,2-Tetrachloroethane	<0.50		0.50	ug/L	17-JUN-21	1.1	1.1
1,1,2,2-Tetrachloroethane	<0.50		0.50	ug/L	17-JUN-21	1	1
Tetrachloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	17
Toluene	<0.50		0.50	ug/L	17-JUN-21	24	24
1,1,1-Trichloroethane	<0.50		0.50	ug/L	17-JUN-21	200	200
1,1,2-Trichloroethane	<0.50		0.50	ug/L	17-JUN-21	4.7	5
Trichloroethylene	<0.50		0.50	ug/L	17-JUN-21	1.6	5
Trichlorofluoromethane	<5.0		5.0	ug/L	17-JUN-21	150	150
Vinyl chloride	<0.50		0.50	ug/L	17-JUN-21	0.5	1.7
o-Xylene	<0.30		0.30	ug/L	17-JUN-21		
m+p-Xylenes	<0.40		0.40	ug/L	17-JUN-21		
Xylenes (Total)	<0.50		0.50	ug/L	17-JUN-21	300	300
Surrogate: 4-Bromofluorobenzene	99.1		70-130	%	17-JUN-21		
Surrogate: 1,4-Difluorobenzene	102.1		70-130	%	17-JUN-21		
Hydrocarbons							
F1 (C6-C10)	<25		25	ug/L	17-JUN-21	750	750
F1-BTEX	<25		25	ug/L	17-JUN-21	750	750
F2 (C10-C16)	<100		100	ug/L	14-JUN-21	150	150
F2-Naphth	<100		100	ug/L	17-JUN-21		
F3 (C16-C34)	<250		250	ug/L	14-JUN-21	500	500
F3-PAH	<250		250	ug/L	17-JUN-21		
F4 (C34-C50)	<250		250	ug/L	14-JUN-21	500	500
Total Hydrocarbons (C6-C50)	<370		370	ug/L	17-JUN-21		
Chrom. to baseline at nC50	YES			No Unit	14-JUN-21		
Surrogate: 2-Bromobenzotrifluoride	100.9		60-140	%	14-JUN-21		
Surrogate: 3,4-Dichlorotoluene	106.6		60-140	%	17-JUN-21		
Polycyclic Aromatic Hydrocarbons							
Acenaphthene	<0.020		0.020	ug/L	16-JUN-21	4.1	4.1
Acenaphthylene	<0.020		0.020	ug/L	16-JUN-21	1	1
Anthracene	<0.020		0.020	ug/L	16-JUN-21	2.4	2.4
Benzo(a)anthracene	<0.020		0.020	ug/L	16-JUN-21	1	1
Benzo(a)pyrene	<0.010		0.010	ug/L	16-JUN-21	0.01	0.01
Benzo(b&j)fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1
Benzo(g,h,i)perylene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2
Benzo(k)fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1
Chrysene	<0.020		0.020	ug/L	16-JUN-21	0.1	0.1
Dibenz(a,h)anthracene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2
Fluoranthene	<0.020		0.020	ug/L	16-JUN-21	0.41	0.41
Fluorene	<0.020		0.020	ug/L	16-JUN-21	120	120
Indeno(1,2,3-cd)pyrene	<0.020		0.020	ug/L	16-JUN-21	0.2	0.2
1+2-Methylnaphthalenes	<0.028		0.028	ug/L	16-JUN-21	3.2	3.2
1-Methylnaphthalene	<0.020		0.020	ug/L	16-JUN-21	3.2	3.2
2-Methylnaphthalene	<0.020		0.020	ug/L	16-JUN-21	3.2	3.2
Naphthalene	<0.050		0.050	ug/L	16-JUN-21	11	11

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Sample Details Grouping / Analyte	Result	Qualifier	D.L.	Units	Analyzed	Guideline Limits #1	Guideline Limits #2		
L2599907-5 DUP 01 Sampled By: CLIENT on 10-JUN-21 Matrix: WATER									
Polycyclic Aromatic Hydrocarbons									
Phenanthrene	<0.020		0.020	ug/L	16-JUN-21	1	1		
Pyrene	<0.020		0.020	ug/L	16-JUN-21	4.1	4.1		
Surrogate: Chrysene d12	86.5		50-150	%	16-JUN-21				
Surrogate: Naphthalene d8	100.8		60-140	%	16-JUN-21				
Surrogate: Phenanthrene d10	105.3		60-140	%	16-JUN-21				
Organochlorine Pesticides									
Aldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35		
gamma-hexachlorocyclohexane	<0.0080		0.0080	ug/L	17-JUN-21	1.2	1.2		
a-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
Chlordane (Total)	<0.011		0.011	ug/L	17-JUN-21	7	7		
g-chlordane	<0.0080		0.0080	ug/L	17-JUN-21				
o,p-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
pp-DDD	<0.0040		0.0040	ug/L	17-JUN-21				
Total DDD	<0.0057		0.0057	ug/L	17-JUN-21	10	10		
o,p-DDE	<0.0040		0.0040	ug/L	17-JUN-21				
pp-DDE	<0.0040		0.0040	ug/L	17-JUN-21				
Total DDE	<0.0057		0.0057	ug/L	17-JUN-21	10	10		
op-DDT	<0.0040		0.0040	ug/L	17-JUN-21				
pp-DDT	<0.0040		0.0040	ug/L	17-JUN-21				
Total DDT	<0.0057		0.0057	ug/L	17-JUN-21	2.8	2.8		
DDT+Metabolites	<0.0098		0.0098	ug/L	17-JUN-21				
Dieldrin	<0.0080		0.0080	ug/L	17-JUN-21	0.35	0.35		
Endosulfan I	<0.0070		0.0070	ug/L	17-JUN-21				
Endosulfan II	<0.0070		0.0070	ug/L	17-JUN-21				
Endosulfan (Total)	<0.0099		0.0099	ug/L	17-JUN-21	1.5	1.5		
Endrin	<0.010		0.010	ug/L	17-JUN-21	0.48	0.48		
Heptachlor	<0.0080		0.0080	ug/L	17-JUN-21	1.5	1.5		
Heptachlor Epoxide	<0.0080		0.0080	ug/L	17-JUN-21	0.048	0.048		
Hexachlorobenzene	<0.0080		0.0080	ug/L	17-JUN-21	1	1		
Hexachlorobutadiene	<0.0080		0.0080	ug/L	17-JUN-21	0.44	0.6		
Hexachloroethane	<0.0080		0.0080	ug/L	17-JUN-21	2.1	2.1		
Methoxychlor	<0.0080		0.0080	ug/L	17-JUN-21	6.5	6.5		
Surrogate: Decachlorobiphenyl	101.4		40-130	%	17-JUN-21				
Surrogate: Tetrachloro-m-xylene	95.9		40-130	%	17-JUN-21				

** Detection Limit for result exceeds Guideline Limit. Assessment against Guideline Limit cannot be made.
* Analytical result for this parameter exceeds Guideline Limit listed on this report. Guideline Limits applied:

Ontario Regulation 153/04 - April 15, 2011 Standards = [Suite] - T2-POTABLE-GROUNDWATER-ALL-TYPES-OF-PROPERTY-USE

#1: T2-Ground Water (Coarse Soil)-All Types of Property Use

#2: T2-Ground Water (Fine Soil)-All Types of Property Use

Reference Information

Sample Parameter Qualifier key listed:

Qualifier	Description
DLHC	Detection Limit Raised: Dilution required due to high concentration of test analyte(s).

Methods Listed (if applicable):

ALS Test Code	Matrix	Test Description	Method Reference***
CHLORDANE-T-CALC-WT	Water	Chlordane Total sums	CALCULATION

Aqueous sample is extracted by liquid/liquid extraction with a solvent mix. After extraction, a number of clean up techniques may be applied, depending on the sample matrix and analyzed by GC/MS.

CL-IC-N-WT	Water	Chloride by IC	EPA 300.1 (mod)

Inorganic anions are analyzed by Ion Chromatography with conductivity and/or UV detection.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

CN-WAD-R511-WT	Water	Cyanide (WAD)-O.Reg 153/04	APHA 4500CN I-Weak acid Dist Colorimet

Weak acid dissociable cyanide (WAD) is determined by undergoing a distillation procedure. Cyanide is converted to cyanogen chloride by reacting with chloramine-T, the cyanogen chloride then reacts with a combination of barbituric acid and isonicotinic acid to form a highly colored complex.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

CR-CR6-IC-R511-WT	Water	Hex Chrom-O.Reg 153/04 (July 2011)	EPA 7199

This analysis is carried out using procedures adapted from "Test Methods for Evaluating Solid Waste" SW-846, Method 7199, published by the United States Environmental Protection Agency (EPA). The procedure involves analysis for chromium (VI) by ion chromatography using diphenylcarbazide in a sulphuric acid solution. Chromium (III) is calculated as the difference between the total chromium and the chromium (VI) results.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

DDD-DDE-DDT-CALC-WT	Water	DDD, DDE, DDT sums	CALCULATION

Calculation of Total DDD, Total DDE and Total DDT

EC-R511-WT	Water	Conductivity-O.Reg 153/04 (July 2011)	APHA 2510 B

Water samples can be measured directly by immersing the conductivity cell into the sample.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

EC-SCREEN-WT	Water	Conductivity Screen (Internal Use Only)	APHA 2510

Qualitative analysis of conductivity where required during preparation of other tests - e.g. TDS, metals, etc.

ENDOSULFAN-T-CALC-WT	Water	Endosulfan Total sums	CALCULATION

Aqueous sample is extracted by liquid/liquid extraction with a solvent mix. After extraction, a number of clean up techniques may be applied, depending on the sample matrix and analyzed by GC/MS.

Reference Information

F1-F4-511-CALC-WT	Water	F1-F4 Hydrocarbon Calculated Parameters	CCME CWS-PHC, Pub #1310, Dec 2001-L

Analytical methods used for analysis of CCME Petroleum Hydrocarbons have been validated and comply with the Reference Method for the CWS PHC.

In cases where results for both F4 and F4G are reported, the greater of the two results must be used in any application of the CWS PHC guidelines and the gravimetric heavy hydrocarbons cannot be added to the C6 to C50 hydrocarbons.
In samples where BTEX and F1 were analyzed , F1-BTEX represents a value where the sum of Benzene, Toluene, Ethylbenzene and total Xylenes has been subtracted from F1.

In samples where PAHs, F2 and F3 were analyzed, F2-Naphth represents the result where Naphthalene has been subtracted from F2. F3-PAH represents a result where the sum of Benzo(a)anthracene, Benzo(a)pyrene, Benzo(b)fluoranthene, Benzo(k)fluoranthene, Dibenzo(a,h)anthracene, Fluoranthene, Indeno(1,2,3-cd)pyrene, Phenanthrene, and Pyrene has been subtracted from F3.

Unless otherwise qualified, the following quality control criteria have been met for the F1 hydrocarbon range:
1. All extraction and analysis holding times were met.
2. Instrument performance showing response factors for C6 and C10 within 30% of the response factor for toluene.
3. Linearity of gasoline response within 15% throughout the calibration range.

Unless otherwise qualified, the following quality control criteria have been met for the F2-F4 hydrocarbon ranges:
1. All extraction and analysis holding times were met.
2. Instrument performance showing C10, C16 and C34 response factors within 10% of their average.
3. Instrument performance showing the C50 response factor within 30% of the average of the C10, C16 and C34 response factors.
4. Linearity of diesel or motor oil response within 15% throughout the calibration range.

F1-HS-511-WT	Water	F1-O.Reg 153/04 (July 2011)	E3398/CCME TIER 1-HS

Fraction F1 is determined by analyzing by headspace-GC/FID.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

F2-F4-511-WT	Water	F2-F4-O.Reg 153/04 (July 2011)	EPA 3511/CCME Tier 1

Petroleum Hydrocarbons (F2-F4 fractions) are extracted from water using a hexane micro-extraction technique. Instrumental analysis is by GC-FID, as per the Reference Method for the Canada-Wide Standard for Petroleum Hydrocarbons in Soil Tier 1 Method, CCME, 2001.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

HG-D-UG/L-CVAA-WT	Water	Diss. Mercury in Water by CVAAS (ug/L)	EPA 1631E (mod)

Water samples are filtered (0.45 um), preserved with hydrochloric acid, then undergo a cold-oxidation using bromine monochloride prior to reduction with stannous chloride, and analyzed by CVAAS.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

MET-D-UG/L-MS-WT	Water	Diss. Metals in Water by ICPMS (ug/L)	EPA 200.8

The metal constituents of a non-acidified sample that pass through a membrane filter prior to ICP/MS analysis.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

MET-T-CCMS-WT	Water	Total Metals in Water by CRC ICPMS	EPA 200.2/6020A (mod)

Water samples are digested with nitric and hydrochloric acids, and analyzed by CRC ICPMS.

Method Limitation (re: Sulfur): Sulfide and volatile sulfur species may not be recovered by this method.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011).

METHYLNAPS-CALC-WT	Water	PAH-Calculated Parameters	SW846 8270
OCP-ROUTINE-WT	Water	Pesticides, Organochlorine in Water	SW846 8270

Samples are extracted using a solvent mixture and the resulting extracts are analyzed on GC/MSD

Reference Information

PAH-511-WT	Water	PAH-O. Reg 153/04 (July 2011)	SW846 3510/8270

Aqueous samples, fortified with surrogates, are extracted using liquid/liquid extraction technique. The sample extracts are concentrated and then analyzed using GC/MS. Results for benzo(b) fluoranthene may include contributions from benzo(j)fluoranthene, if also present in the sample.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

PH-WT	Water	pH	APHA 4500 H-Electrode

Water samples are analyzed directly by a calibrated pH meter.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011). Holdtime for samples under this regulation is 28 days

VOC-1,3-DCP-CALC-WT	Water	Regulation 153 VOCs	SW8260B/SW8270C
VOC-511-HS-WT	Water	VOC by GCMS HS O.Reg 153/04 (July 2011)	SW846 8260

Liquid samples are analyzed by headspace GC/MSD.

Analysis conducted in accordance with the Protocol for Analytical Methods Used in the Assessment of Properties under Part XV.1 of the Environmental Protection Act (July 1, 2011), unless a subset of the Analytical Test Group (ATG) has been requested (the Protocol states that all analytes in an ATG must be reported).

XYLENES-SUM-CALC-WT	Water	Sum of Xylene Isomer Concentrations	CALCULATION

Total xylenes represents the sum of o-xylene and m&p-xylene.

*** ALS test methods may incorporate modifications from specified reference methods to improve performance.

Chain of Custody numbers:

The last two letters of the above test code(s) indicate the laboratory that performed analytical analysis for that test. Refer to the list below:

Laboratory Definition Code	Laboratory Location	Laboratory Definition Code	Laboratory Location
WT	ALS ENVIRONMENTAL - WATERLOO, ONTARIO, CANADA		

GLOSSARY OF REPORT TERMS

Surrogates are compounds that are similar in behaviour to target analyte(s), but that do not normally occur in environmental samples. For applicable tests, surrogates are added to samples prior to analysis as a check on recovery. In reports that display the D.L. column, laboratory objectives for surrogates are listed there.
mg/kg - milligrams per kilogram based on dry weight of sample
mg/kg wwt - milligrams per kilogram based on wet weight of sample
mg/kg lwt - milligrams per kilogram based on lipid-adjusted weight
mg/L - unit of concentration based on volume, parts per million.
< - Less than.
D.L. - The reporting limit.
N/A - Result not available. Refer to qualifier code and definition for explanation.

Test results reported relate only to the samples as received by the laboratory.
UNLESS OTHERWISE STATED, ALL SAMPLES WERE RECEIVED IN ACCEPTABLE CONDITION.
Analytical results in unsigned test reports with the DRAFT watermark are subject to change, pending final QC review.

Quality Control Report

Workorder: L2599907 Report Date: 18-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2

Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
CL-IC-N-WT	Water							
Batch R5490209								
WG3554566-4 DUP		**WG3554566-3**						
Chloride (Cl)		10.9	10.9		mg/L	0.2	20	14-JUN-21
WG3554566-2 LCS								
Chloride (Cl)			102.1		%		90-110	14-JUN-21
WG3554566-1 MB								
Chloride (Cl)			<0.50		mg/L		0.5	14-JUN-21
WG3554566-5 MS		**WG3554566-3**						
Chloride (Cl)			103.9		%		75-125	14-JUN-21
CN-WAD-R511-WT	Water							
Batch R5490488								
WG3554805-8 DUP		**WG3554805-10**						
Cyanide, Weak Acid Diss		<2.0	<2.0	RPD-NA	ug/L	N/A	20	14-JUN-21
WG3554805-7 LCS								
Cyanide, Weak Acid Diss			99.8		%		80-120	14-JUN-21
WG3554805-6 MB								
Cyanide, Weak Acid Diss			<2.0		ug/L		2	14-JUN-21
WG3554805-9 MS		**WG3554805-10**						
Cyanide, Weak Acid Diss			100.2		%		75-125	14-JUN-21
CR-CR6-IC-R511-WT	Water							
Batch R5490592								
WG3554915-4 DUP		**WG3554915-3**						
Chromium, Hexavalent		<0.50	<0.50	RPD-NA	ug/L	N/A	20	15-JUN-21
WG3554915-2 LCS								
Chromium, Hexavalent			100.4		%		80-120	15-JUN-21
WG3554915-1 MB								
Chromium, Hexavalent			<0.50		ug/L		0.5	15-JUN-21
WG3554915-5 MS		**WG3554915-3**						
Chromium, Hexavalent			97.2		%		70-130	15-JUN-21
EC-R511-WT	Water							
Batch R5489104								
WG3553572-4 DUP		**WG3553572-3**						
Conductivity		1.53	1.52		mS/cm	0.6	10	12-JUN-21
WG3553572-2 LCS								
Conductivity			104.0		%		90-110	12-JUN-21
WG3553572-1 MB								
Conductivity			<0.0030		mS/cm		0.003	12-JUN-21
F1-HS-511-WT	Water							

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
F1-HS-511-WT	Water							
Batch R5492161								
WG3556752-4 DUP		**WG3556752-3**						
F1 (C6-C10)		<25	<25	RPD-NA	ug/L	N/A	30	17-JUN-21
WG3556752-1 LCS								
F1 (C6-C10)			123.7	LCS-H	%		80-120	17-JUN-21
WG3556752-2 MB								
F1 (C6-C10)			<25		ug/L		25	17-JUN-21
Surrogate: 3,4-Dichlorotoluene			97.3		%		60-140	17-JUN-21
WG3556752-5 MS		**WG3556752-3**						
F1 (C6-C10)			77.6		%		60-140	17-JUN-21
Batch R5492688								
WG3557108-4 DUP		**WG3557108-3**						
F1 (C6-C10)		<25	<25	RPD-NA	ug/L	N/A	30	18-JUN-21
WG3557108-1 LCS								
F1 (C6-C10)			91.0		%		80-120	17-JUN-21
WG3557108-2 MB								
F1 (C6-C10)			<25		ug/L		25	17-JUN-21
Surrogate: 3,4-Dichlorotoluene			107.4		%		60-140	17-JUN-21
WG3557108-5 MS		**WG3557108-3**						
F1 (C6-C10)			101.2		%		60-140	18-JUN-21
F2-F4-511-WT	Water							
Batch R5490213								
WG3554047-2 LCS								
F2 (C10-C16)			112.7		%		70-130	14-JUN-21
F3 (C16-C34)			107.5		%		70-130	14-JUN-21
F4 (C34-C50)			104.5		%		70-130	14-JUN-21
WG3554047-1 MB								
F2 (C10-C16)			<100		ug/L		100	14-JUN-21
F3 (C16-C34)			<250		ug/L		250	14-JUN-21
F4 (C34-C50)			<250		ug/L		250	14-JUN-21
Surrogate: 2-Bromobenzotrifluoride			104.8		%		60-140	14-JUN-21
HG-D-UG/L-CVAA-WT	Water							
Batch R5490002								
WG3553524-4 DUP		**WG3553524-3**						
Mercury (Hg)-Dissolved		<0.0050	<0.0050	RPD-NA	ug/L	N/A	20	14-JUN-21
WG3553524-2 LCS								
Mercury (Hg)-Dissolved			108.0		%		80-120	14-JUN-21
WG3553524-1 MB								

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
HG-D-UG/L-CVAA-WT	Water							
Batch R5490002								
WG3553524-1 MB								
Mercury (Hg)-Dissolved			<0.0050		ug/L		0.005	14-JUN-21
WG3553524-6 MS		**WG3553524-5**						
Mercury (Hg)-Dissolved			99.0		%		70-130	14-JUN-21
MET-D-UG/L-MS-WT	Water							
Batch R5487459								
WG3553177-4 DUP		**WG3553177-3**						
Antimony (Sb)-Dissolved		<0.10	<0.10	RPD-NA	ug/L	N/A	20	11-JUN-21
Arsenic (As)-Dissolved		0.62	0.65		ug/L	5.6	20	11-JUN-21
Barium (Ba)-Dissolved		32.1	32.1		ug/L	0.0	20	11-JUN-21
Beryllium (Be)-Dissolved		<0.10	<0.10	RPD-NA	ug/L	N/A	20	11-JUN-21
Boron (B)-Dissolved		27	28		ug/L	2.4	20	11-JUN-21
Cadmium (Cd)-Dissolved		0.0290	0.0262		ug/L	10	20	11-JUN-21
Chromium (Cr)-Dissolved		1.04	0.95		ug/L	9.6	20	11-JUN-21
Cobalt (Co)-Dissolved		<0.10	<0.10	RPD-NA	ug/L	N/A	20	11-JUN-21
Copper (Cu)-Dissolved		4.33	4.34		ug/L	0.3	20	11-JUN-21
Lead (Pb)-Dissolved		<0.050	<0.050	RPD-NA	ug/L	N/A	20	11-JUN-21
Molybdenum (Mo)-Dissolved		0.187	0.182		ug/L	2.9	20	11-JUN-21
Nickel (Ni)-Dissolved		0.71	0.73		ug/L	2.9	20	11-JUN-21
Selenium (Se)-Dissolved		0.203	0.195		ug/L	4.0	20	11-JUN-21
Silver (Ag)-Dissolved		<0.050	<0.050	RPD-NA	ug/L	N/A	20	11-JUN-21
Sodium (Na)-Dissolved		20300	20200		ug/L	0.3	20	11-JUN-21
Thallium (Tl)-Dissolved		<0.010	<0.010	RPD-NA	ug/L	N/A	20	11-JUN-21
Uranium (U)-Dissolved		0.289	0.284		ug/L	1.8	20	11-JUN-21
Vanadium (V)-Dissolved		1.71	1.83		ug/L	6.7	20	11-JUN-21
Zinc (Zn)-Dissolved		2.9	3.1		ug/L	4.7	20	11-JUN-21
WG3553177-2 LCS								
Antimony (Sb)-Dissolved			98.5		%		80-120	11-JUN-21
Arsenic (As)-Dissolved			103.7		%		80-120	11-JUN-21
Barium (Ba)-Dissolved			96.7		%		80-120	11-JUN-21
Beryllium (Be)-Dissolved			100.9		%		80-120	11-JUN-21
Boron (B)-Dissolved			99.9		%		80-120	11-JUN-21
Cadmium (Cd)-Dissolved			101.7		%		80-120	11-JUN-21
Chromium (Cr)-Dissolved			101.6		%		80-120	11-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-D-UG/L-MS-WT	Water							
Batch R5487459								
WG3553177-2 LCS								
Cobalt (Co)-Dissolved			102.3		%		80-120	11-JUN-21
Copper (Cu)-Dissolved			99.9		%		80-120	11-JUN-21
Lead (Pb)-Dissolved			98.1		%		80-120	11-JUN-21
Molybdenum (Mo)-Dissolved			103.2		%		80-120	11-JUN-21
Nickel (Ni)-Dissolved			99.4		%		80-120	11-JUN-21
Selenium (Se)-Dissolved			98.3		%		80-120	11-JUN-21
Silver (Ag)-Dissolved			103.5		%		80-120	11-JUN-21
Sodium (Na)-Dissolved			104.9		%		80-120	11-JUN-21
Thallium (Tl)-Dissolved			98.7		%		80-120	11-JUN-21
Uranium (U)-Dissolved			97.7		%		80-120	11-JUN-21
Vanadium (V)-Dissolved			104.6		%		80-120	11-JUN-21
Zinc (Zn)-Dissolved			98.9		%		80-120	11-JUN-21
WG3553177-1 MB								
Antimony (Sb)-Dissolved			<0.10		ug/L		0.1	11-JUN-21
Arsenic (As)-Dissolved			<0.10		ug/L		0.1	11-JUN-21
Barium (Ba)-Dissolved			<0.10		ug/L		0.1	11-JUN-21
Beryllium (Be)-Dissolved			<0.10		ug/L		0.1	11-JUN-21
Boron (B)-Dissolved			<10		ug/L		10	11-JUN-21
Cadmium (Cd)-Dissolved			<0.0050		ug/L		0.005	11-JUN-21
Chromium (Cr)-Dissolved			<0.50		ug/L		0.5	11-JUN-21
Cobalt (Co)-Dissolved			<0.10		ug/L		0.1	11-JUN-21
Copper (Cu)-Dissolved			<0.20		ug/L		0.2	11-JUN-21
Lead (Pb)-Dissolved			<0.050		ug/L		0.05	11-JUN-21
Molybdenum (Mo)-Dissolved			<0.050		ug/L		0.05	11-JUN-21
Nickel (Ni)-Dissolved			<0.50		ug/L		0.5	11-JUN-21
Selenium (Se)-Dissolved			<0.050		ug/L		0.05	11-JUN-21
Silver (Ag)-Dissolved			<0.050		ug/L		0.05	11-JUN-21
Sodium (Na)-Dissolved			<50		ug/L		50	11-JUN-21
Thallium (Tl)-Dissolved			<0.010		ug/L		0.01	11-JUN-21
Uranium (U)-Dissolved			<0.010		ug/L		0.01	11-JUN-21
Vanadium (V)-Dissolved			<0.50		ug/L		0.5	11-JUN-21
Zinc (Zn)-Dissolved			<1.0		ug/L		1	11-JUN-21
WG3553177-5 MS		**WG3553177-3**						
Antimony (Sb)-Dissolved			96.3		%		70-130	11-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-D-UG/L-MS-WT	Water							
Batch R5487459								
WG3553177-5 MS		**WG3553177-3**						
Arsenic (As)-Dissolved			94.3		%		70-130	11-JUN-21
Barium (Ba)-Dissolved			N/A	MS-B	%		-	11-JUN-21
Beryllium (Be)-Dissolved			105.3		%		70-130	11-JUN-21
Boron (B)-Dissolved			97.8		%		70-130	11-JUN-21
Cadmium (Cd)-Dissolved			92.9		%		70-130	11-JUN-21
Chromium (Cr)-Dissolved			91.7		%		70-130	11-JUN-21
Cobalt (Co)-Dissolved			92.3		%		70-130	11-JUN-21
Copper (Cu)-Dissolved			86.2		%		70-130	11-JUN-21
Lead (Pb)-Dissolved			95.7		%		70-130	11-JUN-21
Molybdenum (Mo)-Dissolved			100.9		%		70-130	11-JUN-21
Nickel (Ni)-Dissolved			89.4		%		70-130	11-JUN-21
Selenium (Se)-Dissolved			102.1		%		70-130	11-JUN-21
Silver (Ag)-Dissolved			97.7		%		70-130	11-JUN-21
Sodium (Na)-Dissolved			N/A	MS-B	%		-	11-JUN-21
Thallium (Tl)-Dissolved			97.1		%		70-130	11-JUN-21
Uranium (U)-Dissolved			N/A	MS-B	%		-	11-JUN-21
Vanadium (V)-Dissolved			96.0		%		70-130	11-JUN-21
Zinc (Zn)-Dissolved			89.2		%		70-130	11-JUN-21
MET-T-CCMS-WT	Water							
Batch R5490298								
WG3554072-4 DUP		**WG3554072-3**						
Antimony (Sb)-Total		<0.0010	<0.0010	RPD-NA	mg/L	N/A	20	14-JUN-21
Arsenic (As)-Total		<0.0010	<0.0010	RPD-NA	mg/L	N/A	20	14-JUN-21
Barium (Ba)-Total		0.139	0.139		mg/L	0.1	20	14-JUN-21
Beryllium (Be)-Total		<0.0010	<0.0010	RPD-NA	mg/L	N/A	20	14-JUN-21
Boron (B)-Total		<0.10	<0.10	RPD-NA	mg/L	N/A	20	14-JUN-21
Cadmium (Cd)-Total		<0.000050	<0.000050	RPD-NA	mg/L	N/A	20	14-JUN-21
Chromium (Cr)-Total		<0.0050	<0.0050	RPD-NA	mg/L	N/A	20	14-JUN-21
Cobalt (Co)-Total		0.0020	0.0020		mg/L	1.4	20	14-JUN-21
Copper (Cu)-Total		<0.0050	<0.0050	RPD-NA	mg/L	N/A	20	14-JUN-21
Lead (Pb)-Total		<0.00050	<0.00050	RPD-NA	mg/L	N/A	20	14-JUN-21
Molybdenum (Mo)-Total		0.00107	0.00103		mg/L	3.5	20	14-JUN-21
Nickel (Ni)-Total		0.0052	0.0052		mg/L	0.7	20	14-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
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Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-T-CCMS-WT	Water							
Batch R5490298								
WG3554072-4 DUP		**WG3554072-3**						
Selenium (Se)-Total		<0.00050	<0.00050	RPD-NA	mg/L	N/A	20	14-JUN-21
Silver (Ag)-Total		<0.00050	<0.00050	RPD-NA	mg/L	N/A	20	14-JUN-21
Sodium (Na)-Total		229	230		mg/L	0.4	20	14-JUN-21
Thallium (Tl)-Total		<0.00010	<0.00010	RPD-NA	mg/L	N/A	20	14-JUN-21
Uranium (U)-Total		0.00086	0.00086		mg/L	0.0	20	14-JUN-21
Vanadium (V)-Total		<0.0050	<0.0050	RPD-NA	mg/L	N/A	20	14-JUN-21
Zinc (Zn)-Total		<0.030	<0.030	RPD-NA	mg/L	N/A	20	14-JUN-21
WG3554072-2 LCS								
Antimony (Sb)-Total			102.4		%		80-120	14-JUN-21
Arsenic (As)-Total			102.9		%		80-120	14-JUN-21
Barium (Ba)-Total			105.4		%		80-120	14-JUN-21
Beryllium (Be)-Total			101.9		%		80-120	14-JUN-21
Boron (B)-Total			99.9		%		80-120	14-JUN-21
Cadmium (Cd)-Total			103.1		%		80-120	14-JUN-21
Chromium (Cr)-Total			103.6		%		80-120	14-JUN-21
Cobalt (Co)-Total			105.1		%		80-120	14-JUN-21
Copper (Cu)-Total			102.7		%		80-120	14-JUN-21
Lead (Pb)-Total			103.1		%		80-120	14-JUN-21
Molybdenum (Mo)-Total			101.1		%		80-120	14-JUN-21
Nickel (Ni)-Total			103.8		%		80-120	14-JUN-21
Selenium (Se)-Total			100.7		%		80-120	14-JUN-21
Silver (Ag)-Total			106.4		%		80-120	14-JUN-21
Sodium (Na)-Total			103.5		%		80-120	14-JUN-21
Thallium (Tl)-Total			103.0		%		80-120	14-JUN-21
Uranium (U)-Total			107.9		%		80-120	14-JUN-21
Vanadium (V)-Total			105.2		%		80-120	14-JUN-21
Zinc (Zn)-Total			104.9		%		80-120	14-JUN-21
WG3554072-1 MB								
Antimony (Sb)-Total			<0.00010		mg/L		0.0001	14-JUN-21
Arsenic (As)-Total			<0.00010		mg/L		0.0001	14-JUN-21
Barium (Ba)-Total			<0.00010		mg/L		0.0001	14-JUN-21
Beryllium (Be)-Total			<0.00010		mg/L		0.0001	14-JUN-21
Boron (B)-Total			<0.010		mg/L		0.01	14-JUN-21
Cadmium (Cd)-Total			<0.000005(		mg/L		0.000005	14-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
MET-T-CCMS-WT	Water							
Batch R5490298								
WG3554072-1 MB								
Chromium (Cr)-Total			<0.00050		mg/L		0.0005	14-JUN-21
Cobalt (Co)-Total			<0.00010		mg/L		0.0001	14-JUN-21
Copper (Cu)-Total			<0.00050		mg/L		0.0005	14-JUN-21
Lead (Pb)-Total			<0.000050		mg/L		0.00005	14-JUN-21
Molybdenum (Mo)-Total			<0.000050		mg/L		0.00005	14-JUN-21
Nickel (Ni)-Total			<0.00050		mg/L		0.0005	14-JUN-21
Selenium (Se)-Total			<0.000050		mg/L		0.00005	14-JUN-21
Silver (Ag)-Total			<0.000050		mg/L		0.00005	14-JUN-21
Sodium (Na)-Total			<0.050		mg/L		0.05	14-JUN-21
Thallium (Tl)-Total			<0.000010		mg/L		0.00001	14-JUN-21
Uranium (U)-Total			<0.000010		mg/L		0.00001	14-JUN-21
Vanadium (V)-Total			<0.00050		mg/L		0.0005	14-JUN-21
Zinc (Zn)-Total			<0.0030		mg/L		0.003	14-JUN-21
WG3554072-5 MS		**WG3554072-3**						
Antimony (Sb)-Total			103.8		%		70-130	14-JUN-21
Arsenic (As)-Total			101.2		%		70-130	14-JUN-21
Barium (Ba)-Total			N/A	MS-B	%		-	14-JUN-21
Beryllium (Be)-Total			104.4		%		70-130	14-JUN-21
Boron (B)-Total			N/A	MS-B	%		-	14-JUN-21
Cadmium (Cd)-Total			100.4		%		70-130	14-JUN-21
Chromium (Cr)-Total			101.0		%		70-130	14-JUN-21
Cobalt (Co)-Total			103.2		%		70-130	14-JUN-21
Copper (Cu)-Total			100.1		%		70-130	14-JUN-21
Lead (Pb)-Total			99.9		%		70-130	14-JUN-21
Molybdenum (Mo)-Total			101.3		%		70-130	14-JUN-21
Nickel (Ni)-Total			97.8		%		70-130	14-JUN-21
Selenium (Se)-Total			101.4		%		70-130	14-JUN-21
Silver (Ag)-Total			102.1		%		70-130	14-JUN-21
Sodium (Na)-Total			N/A	MS-B	%		-	14-JUN-21
Thallium (Tl)-Total			100.9		%		70-130	14-JUN-21
Uranium (U)-Total			N/A	MS-B	%		-	14-JUN-21
Vanadium (V)-Total			104.5		%		70-130	14-JUN-21
Zinc (Zn)-Total			93.7		%		70-130	14-JUN-21
OCP-ROUTINE-WT	Water							

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
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Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
OCP-ROUTINE-WT	Water							
Batch R5490143								
WG3554188-2 LCS								
Aldrin			122.7		%		50-150	17-JUN-21
gamma-hexachlorocyclohexane			112.7		%		50-150	17-JUN-21
a-chlordane			132.8		%		50-150	17-JUN-21
g-chlordane			135.7		%		50-150	17-JUN-21
o,p-DDD			135.2		%		50-150	17-JUN-21
pp-DDD			132.3		%		50-150	17-JUN-21
o,p-DDE			125.5		%		50-150	17-JUN-21
pp-DDE			133.8		%		50-150	17-JUN-21
op-DDT			108.0		%		50-150	17-JUN-21
pp-DDT			72.7		%		50-150	17-JUN-21
Dieldrin			139.4		%		50-150	17-JUN-21
Endosulfan I			124.7		%		50-150	17-JUN-21
Endosulfan II			138.3		%		50-150	17-JUN-21
Endrin			74.9		%		50-150	17-JUN-21
Heptachlor			94.2		%		50-150	17-JUN-21
Heptachlor Epoxide			138.0		%		50-150	17-JUN-21
Hexachlorobenzene			112.5		%		50-150	17-JUN-21
Hexachlorobutadiene			95.5		%		50-150	17-JUN-21
Hexachloroethane			108.8		%		50-150	17-JUN-21
Methoxychlor			52.7		%		50-150	17-JUN-21
PAH-511-WT	Water							
Batch R5490749								
WG3554047-2 LCS								
1-Methylnaphthalene			94.3		%		50-140	15-JUN-21
2-Methylnaphthalene			89.8		%		50-140	15-JUN-21
Acenaphthene			97.2		%		50-140	15-JUN-21
Acenaphthylene			96.7		%		50-140	15-JUN-21
Anthracene			97.4		%		50-140	15-JUN-21
Benzo(a)anthracene			108.5		%		50-140	15-JUN-21
Benzo(a)pyrene			93.6		%		50-140	15-JUN-21
Benzo(b&j)fluoranthene			90.9		%		50-140	15-JUN-21
Benzo(g,h,i)perylene			97.8		%		50-140	15-JUN-21
Benzo(k)fluoranthene			100.2		%		50-140	15-JUN-21
Chrysene			111.0		%		50-140	

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
PAH-511-WT	Water							
Batch R5490749								
WG3554047-2 LCS								
Chrysene			111.0		%		50-140	15-JUN-21
Dibenz(a,h)anthracene			94.1		%		50-140	15-JUN-21
Fluoranthene			106.3		%		50-140	15-JUN-21
Fluorene			101.5		%		50-140	15-JUN-21
Indeno(1,2,3-cd)pyrene			103.9		%		50-140	15-JUN-21
Naphthalene			83.1		%		50-140	15-JUN-21
Phenanthrene			108.0		%		50-140	15-JUN-21
Pyrene			106.8		%		50-140	15-JUN-21
WG3554047-1 MB								
1-Methylnaphthalene			<0.020		ug/L		0.02	15-JUN-21
2-Methylnaphthalene			<0.020		ug/L		0.02	15-JUN-21
Acenaphthene			<0.020		ug/L		0.02	15-JUN-21
Acenaphthylene			<0.020		ug/L		0.02	15-JUN-21
Anthracene			<0.020		ug/L		0.02	15-JUN-21
Benzo(a)anthracene			<0.020		ug/L		0.02	15-JUN-21
Benzo(a)pyrene			<0.010		ug/L		0.01	15-JUN-21
Benzo(b&j)fluoranthene			<0.020		ug/L		0.02	15-JUN-21
Benzo(g,h,i)perylene			<0.020		ug/L		0.02	15-JUN-21
Benzo(k)fluoranthene			<0.020		ug/L		0.02	15-JUN-21
Chrysene			<0.020		ug/L		0.02	15-JUN-21
Dibenz(a,h)anthracene			<0.020		ug/L		0.02	15-JUN-21
Fluoranthene			<0.020		ug/L		0.02	15-JUN-21
Fluorene			<0.020		ug/L		0.02	15-JUN-21
Indeno(1,2,3-cd)pyrene			<0.020		ug/L		0.02	15-JUN-21
Naphthalene			<0.050		ug/L		0.05	15-JUN-21
Phenanthrene			<0.020		ug/L		0.02	15-JUN-21
Pyrene			<0.020		ug/L		0.02	15-JUN-21
Surrogate: Naphthalene d8			95.4		%		60-140	15-JUN-21
Surrogate: Phenanthrene d10			107.1		%		60-140	15-JUN-21
Surrogate: Chrysene d12			105.1		%		50-150	15-JUN-21
PH-WT	Water							

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Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
PH-WT	Water							
Batch R5489104								
WG3553572-4 DUP		**WG3553572-3**						
pH		8.48	8.46	J	pH units	0.02	0.2	12-JUN-21
WG3553572-2 LCS								
pH			7.01		pH units		6.9-7.1	12-JUN-21
VOC-511-HS-WT	Water							
Batch R5492161								
WG3556752-4 DUP		**WG3556752-3**						
1,1,1,2-Tetrachloroethane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,1,2,2-Tetrachloroethane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,1,1-Trichloroethane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,1,2-Trichloroethane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,1-Dichloroethane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,1-Dichloroethylene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,2-Dibromoethane		<0.20	<0.20	RPD-NA	ug/L	N/A	30	17-JUN-21
1,2-Dichlorobenzene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,2-Dichloroethane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,2-Dichloropropane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,3-Dichlorobenzene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
1,4-Dichlorobenzene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
Acetone		<30	<30	RPD-NA	ug/L	N/A	30	17-JUN-21
Benzene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
Bromodichloromethane		<2.0	<2.0	RPD-NA	ug/L	N/A	30	17-JUN-21
Bromoform		<5.0	<5.0	RPD-NA	ug/L	N/A	30	17-JUN-21
Bromomethane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
Carbon tetrachloride		<0.20	<0.20	RPD-NA	ug/L	N/A	30	17-JUN-21
Chlorobenzene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
Chloroform		<1.0	<1.0	RPD-NA	ug/L	N/A	30	17-JUN-21
cis-1,2-Dichloroethylene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
cis-1,3-Dichloropropene		<0.30	<0.30	RPD-NA	ug/L	N/A	30	17-JUN-21
Dibromochloromethane		<2.0	<2.0	RPD-NA	ug/L	N/A	30	17-JUN-21
Dichlorodifluoromethane		<2.0	<2.0	RPD-NA	ug/L	N/A	30	17-JUN-21
Ethylbenzene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
n-Hexane		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
m+p-Xylenes		<0.40	<0.40	RPD-NA	ug/L	N/A	30	17-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Water							
Batch R5492161								
WG3556752-4 DUP		**WG3556752-3**						
Methyl Ethyl Ketone		<20	<20	RPD-NA	ug/L	N/A	30	17-JUN-21
Methyl Isobutyl Ketone		<20	<20	RPD-NA	ug/L	N/A	30	17-JUN-21
Methylene Chloride		<5.0	<5.0	RPD-NA	ug/L	N/A	30	17-JUN-21
MTBE		<2.0	<2.0	RPD-NA	ug/L	N/A	30	17-JUN-21
o-Xylene		<0.30	<0.30	RPD-NA	ug/L	N/A	30	17-JUN-21
Styrene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
Tetrachloroethylene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
Toluene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
trans-1,2-Dichloroethylene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
trans-1,3-Dichloropropene		<0.30	<0.30	RPD-NA	ug/L	N/A	30	17-JUN-21
Trichloroethylene		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
Trichlorofluoromethane		<5.0	<5.0	RPD-NA	ug/L	N/A	30	17-JUN-21
Vinyl chloride		<0.50	<0.50	RPD-NA	ug/L	N/A	30	17-JUN-21
WG3556752-1 LCS								
1,1,1,2-Tetrachloroethane			111.2		%		70-130	17-JUN-21
1,1,2,2-Tetrachloroethane			98.8		%		70-130	17-JUN-21
1,1,1-Trichloroethane			115.7		%		70-130	17-JUN-21
1,1,2-Trichloroethane			101.5		%		70-130	17-JUN-21
1,1-Dichloroethane			113.9		%		70-130	17-JUN-21
1,1-Dichloroethylene			115.9		%		70-130	17-JUN-21
1,2-Dibromoethane			97.2		%		70-130	17-JUN-21
1,2-Dichlorobenzene			112.3		%		70-130	17-JUN-21
1,2-Dichloroethane			100.8		%		70-130	17-JUN-21
1,2-Dichloropropane			108.2		%		70-130	17-JUN-21
1,3-Dichlorobenzene			116.4		%		70-130	17-JUN-21
1,4-Dichlorobenzene			113.6		%		70-130	17-JUN-21
Acetone			93.8		%		60-140	17-JUN-21
Benzene			109.1		%		70-130	17-JUN-21
Bromodichloromethane			110.8		%		70-130	17-JUN-21
Bromoform			103.8		%		70-130	17-JUN-21
Bromomethane			102.8		%		60-140	17-JUN-21
Carbon tetrachloride			119.6		%		70-130	17-JUN-21
Chlorobenzene			111.6		%		70-130	17-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Water							
Batch R5492161								
WG3556752-1 LCS								
Chloroform			113.2		%		70-130	17-JUN-21
cis-1,2-Dichloroethylene			111.9		%		70-130	17-JUN-21
cis-1,3-Dichloropropene			101.2		%		70-130	17-JUN-21
Dibromochloromethane			99.8		%		70-130	17-JUN-21
Dichlorodifluoromethane			101.5		%		50-140	17-JUN-21
Ethylbenzene			115.6		%		70-130	17-JUN-21
n-Hexane			114.0		%		70-130	17-JUN-21
m+p-Xylenes			112.3		%		70-130	17-JUN-21
Methyl Ethyl Ketone			95.6		%		60-140	17-JUN-21
Methyl Isobutyl Ketone			93.2		%		60-140	17-JUN-21
Methylene Chloride			108.0		%		70-130	17-JUN-21
MTBE			107.4		%		70-130	17-JUN-21
o-Xylene			124.3		%		70-130	17-JUN-21
Styrene			118.6		%		70-130	17-JUN-21
Tetrachloroethylene			116.2		%		70-130	17-JUN-21
Toluene			113.5		%		70-130	17-JUN-21
trans-1,2-Dichloroethylene			114.8		%		70-130	17-JUN-21
trans-1,3-Dichloropropene			100.5		%		70-130	17-JUN-21
Trichloroethylene			116.5		%		70-130	17-JUN-21
Trichlorofluoromethane			119.0		%		60-140	17-JUN-21
Vinyl chloride			117.4		%		60-140	17-JUN-21
WG3556752-2 MB								
1,1,1,2-Tetrachloroethane			<0.50		ug/L		0.5	17-JUN-21
1,1,2,2-Tetrachloroethane			<0.50		ug/L		0.5	17-JUN-21
1,1,1-Trichloroethane			<0.50		ug/L		0.5	17-JUN-21
1,1,2-Trichloroethane			<0.50		ug/L		0.5	17-JUN-21
1,1-Dichloroethane			<0.50		ug/L		0.5	17-JUN-21
1,1-Dichloroethylene			<0.50		ug/L		0.5	17-JUN-21
1,2-Dibromoethane			<0.20		ug/L		0.2	17-JUN-21
1,2-Dichlorobenzene			<0.50		ug/L		0.5	17-JUN-21
1,2-Dichloroethane			<0.50		ug/L		0.5	17-JUN-21
1,2-Dichloropropane			<0.50		ug/L		0.5	17-JUN-21
1,3-Dichlorobenzene			<0.50		ug/L		0.5	17-JUN-21
1,4-Dichlorobenzene			<0.50		ug/L		0.5	17-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Water							
Batch R5492161								
WG3556752-2 MB								
Acetone			<30		ug/L		30	17-JUN-21
Benzene			<0.50		ug/L		0.5	17-JUN-21
Bromodichloromethane			<2.0		ug/L		2	17-JUN-21
Bromoform			<5.0		ug/L		5	17-JUN-21
Bromomethane			<0.50		ug/L		0.5	17-JUN-21
Carbon tetrachloride			<0.20		ug/L		0.2	17-JUN-21
Chlorobenzene			<0.50		ug/L		0.5	17-JUN-21
Chloroform			<1.0		ug/L		1	17-JUN-21
cis-1,2-Dichloroethylene			<0.50		ug/L		0.5	17-JUN-21
cis-1,3-Dichloropropene			<0.30		ug/L		0.3	17-JUN-21
Dibromochloromethane			<2.0		ug/L		2	17-JUN-21
Dichlorodifluoromethane			<2.0		ug/L		2	17-JUN-21
Ethylbenzene			<0.50		ug/L		0.5	17-JUN-21
n-Hexane			<0.50		ug/L		0.5	17-JUN-21
m+p-Xylenes			<0.40		ug/L		0.4	17-JUN-21
Methyl Ethyl Ketone			<20		ug/L		20	17-JUN-21
Methyl Isobutyl Ketone			<20		ug/L		20	17-JUN-21
Methylene Chloride			<5.0		ug/L		5	17-JUN-21
MTBE			<2.0		ug/L		2	17-JUN-21
o-Xylene			<0.30		ug/L		0.3	17-JUN-21
Styrene			<0.50		ug/L		0.5	17-JUN-21
Tetrachloroethylene			<0.50		ug/L		0.5	17-JUN-21
Toluene			<0.50		ug/L		0.5	17-JUN-21
trans-1,2-Dichloroethylene			<0.50		ug/L		0.5	17-JUN-21
trans-1,3-Dichloropropene			<0.30		ug/L		0.3	17-JUN-21
Trichloroethylene			<0.50		ug/L		0.5	17-JUN-21
Trichlorofluoromethane			<5.0		ug/L		5	17-JUN-21
Vinyl chloride			<0.50		ug/L		0.5	17-JUN-21
Surrogate: 1,4-Difluorobenzene			102.1		%		70-130	17-JUN-21
Surrogate: 4-Bromofluorobenzene			103.3		%		70-130	17-JUN-21
WG3556752-5 MS		**WG3556752-3**						
1,1,1,2-Tetrachloroethane			107.9		%		50-140	17-JUN-21
1,1,2,2-Tetrachloroethane			96.3		%		50-140	17-JUN-21
1,1,1-Trichloroethane			110.1		%		50-140	17-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Water							
Batch R5492161								
WG3556752-5 MS		**WG3556752-3**						
1,1,2-Trichloroethane			99.2		%		50-140	17-JUN-21
1,1-Dichloroethane			102.5		%		50-140	17-JUN-21
1,1-Dichloroethylene			103.4		%		50-140	17-JUN-21
1,2-Dibromoethane			94.7		%		50-140	17-JUN-21
1,2-Dichlorobenzene			108.9		%		50-140	17-JUN-21
1,2-Dichloroethane			94.9		%		50-140	17-JUN-21
1,2-Dichloropropane			103.9		%		50-140	17-JUN-21
1,3-Dichlorobenzene			108.8		%		50-140	17-JUN-21
1,4-Dichlorobenzene			107.0		%		50-140	17-JUN-21
Acetone			91.1		%		50-140	17-JUN-21
Benzene			103.2		%		50-140	17-JUN-21
Bromodichloromethane			107.7		%		50-140	17-JUN-21
Bromoform			102.1		%		50-140	17-JUN-21
Bromomethane			86.4		%		50-140	17-JUN-21
Carbon tetrachloride			111.4		%		50-140	17-JUN-21
Chlorobenzene			106.5		%		50-140	17-JUN-21
Chloroform			107.9		%		50-140	17-JUN-21
cis-1,2-Dichloroethylene			105.5		%		50-140	17-JUN-21
cis-1,3-Dichloropropene			89.9		%		50-140	17-JUN-21
Dibromochloromethane			98.0		%		50-140	17-JUN-21
Dichlorodifluoromethane			73.2		%		50-140	17-JUN-21
Ethylbenzene			109.2		%		50-140	17-JUN-21
n-Hexane			99.7		%		50-140	17-JUN-21
m+p-Xylenes			103.5		%		50-140	17-JUN-21
Methyl Ethyl Ketone			93.9		%		50-140	17-JUN-21
Methyl Isobutyl Ketone			90.6		%		50-140	17-JUN-21
Methylene Chloride			102.8		%		50-140	17-JUN-21
MTBE			104.7		%		50-140	17-JUN-21
o-Xylene			118.7		%		50-140	17-JUN-21
Styrene			112.3		%		50-140	17-JUN-21
Tetrachloroethylene			107.0		%		50-140	17-JUN-21
Toluene			107.2		%		50-140	17-JUN-21
trans-1,2-Dichloroethylene			102.8		%		50-140	17-JUN-21

Quality Control Report

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Test	Matrix	Reference	Result	Qualifier	Units	RPD	Limit	Analyzed
VOC-511-HS-WT	Water							
Batch R5492161								
WG3556752-5 MS		**WG3556752-3**						
trans-1,3-Dichloropropene			88.0		%		50-140	17-JUN-21
Trichloroethylene			108.3		%		50-140	17-JUN-21
Trichlorofluoromethane			103.8		%		50-140	17-JUN-21
Vinyl chloride			95.7		%		50-140	17-JUN-21

Quality Control Report

Workorder: L2599907 Report Date: 18-JUN-21

Client: GEOSYNTEC CONSULTANTS INTERNATIONAL INC
130 STONE ROAD WEST
GUELPH ON N1G 3Z2
Contact: MICHELLE GLUCK

Legend:

Limit	ALS Control Limit (Data Quality Objectives)
DUP	Duplicate
RPD	Relative Percent Difference
N/A	Not Available
LCS	Laboratory Control Sample
SRM	Standard Reference Material
MS	Matrix Spike
MSD	Matrix Spike Duplicate
ADE	Average Desorption Efficiency
MB	Method Blank
IRM	Internal Reference Material
CRM	Certified Reference Material
CCV	Continuing Calibration Verification
CVS	Calibration Verification Standard
LCSD	Laboratory Control Sample Duplicate

Sample Parameter Qualifier Definitions:

Qualifier	Description
J	Duplicate results and limits are expressed in terms of absolute difference.
LCS-H	Lab Control Sample recovery was above ALS DQO. Non-detected sample results are considered reliable. Other results, if reported, have been qualified.
MS-B	Matrix Spike recovery could not be accurately calculated due to high analyte background in sample.
RPD-NA	Relative Percent Difference Not Available due to result(s) being less than detection limit.

Hold Time Exceedances:

All test results reported with this submission were conducted within ALS recommended hold times.

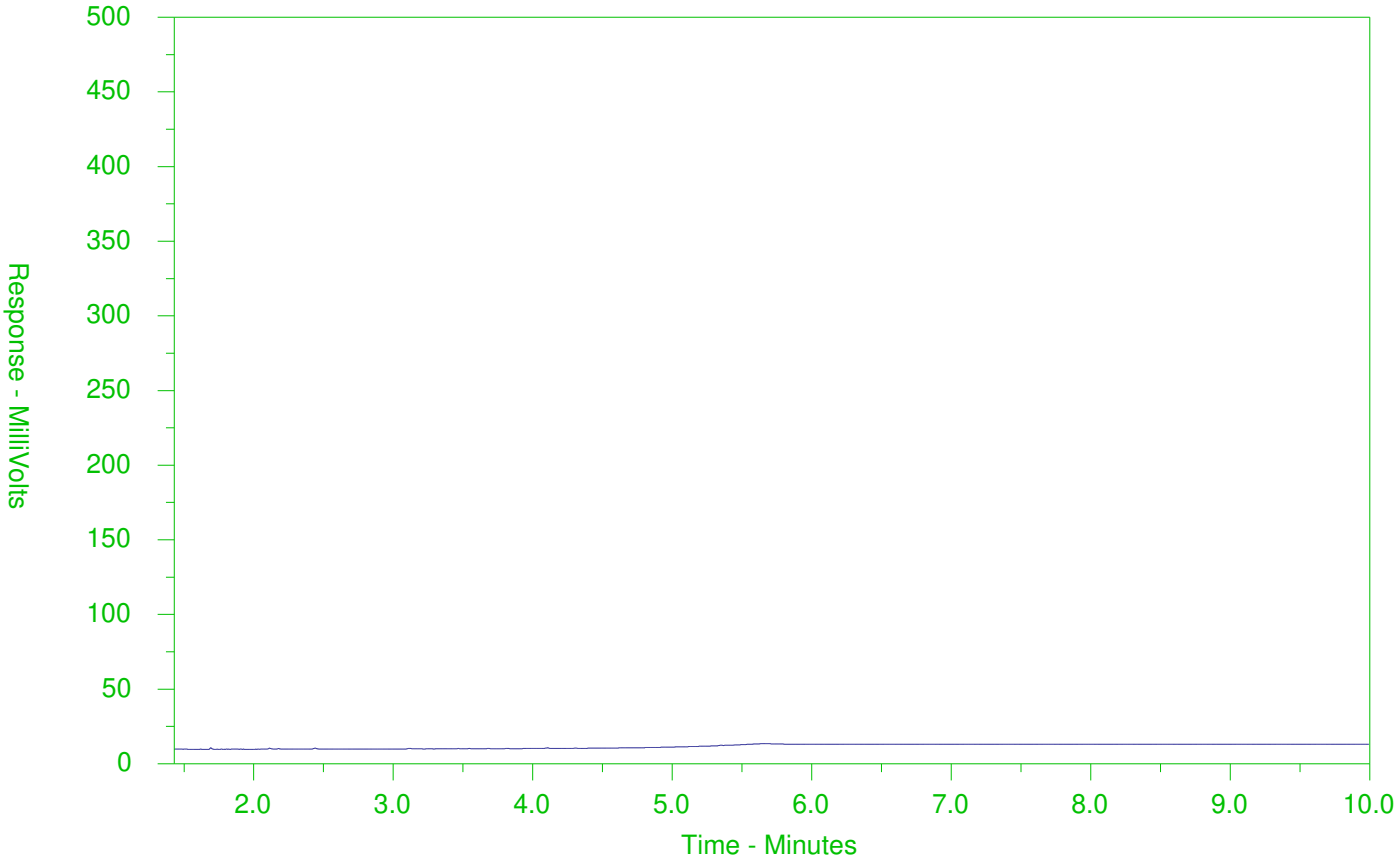
ALS recommended hold times may vary by province. They are assigned to meet known provincial and/or federal government requirements. In the absence of regulatory hold times, ALS establishes recommendations based on guidelines published by the US EPA, APHA Standard Methods, or Environment Canada (where available). For more information, please contact ALS.

The ALS Quality Control Report is provided to ALS clients upon request. ALS includes comprehensive QC checks with every analysis to ensure our high standards of quality are met. Each QC result has a known or expected target value, which is compared against pre-determined data quality objectives to provide confidence in the accuracy of associated test results.

Please note that this report may contain QC results from anonymous Sample Duplicates and Matrix Spikes that do not originate from this Work Order.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2599907-2
Client Sample ID: MW02- 21



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →		← Motor Oils/Lube Oils/Grease →	
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

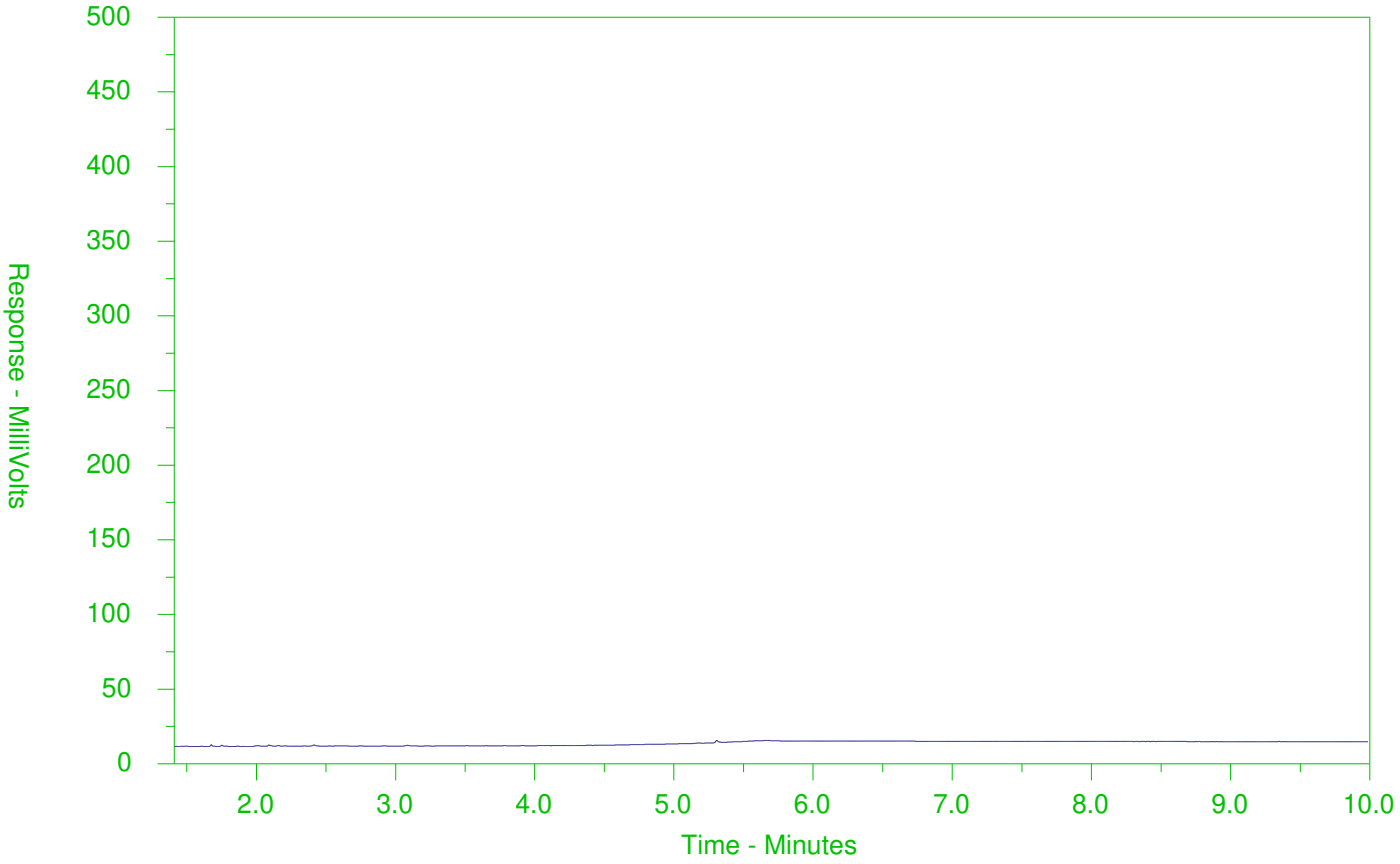
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2599907-4
Client Sample ID: MW04- 21



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →	← Motor Oils/Lube Oils/Grease →		
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

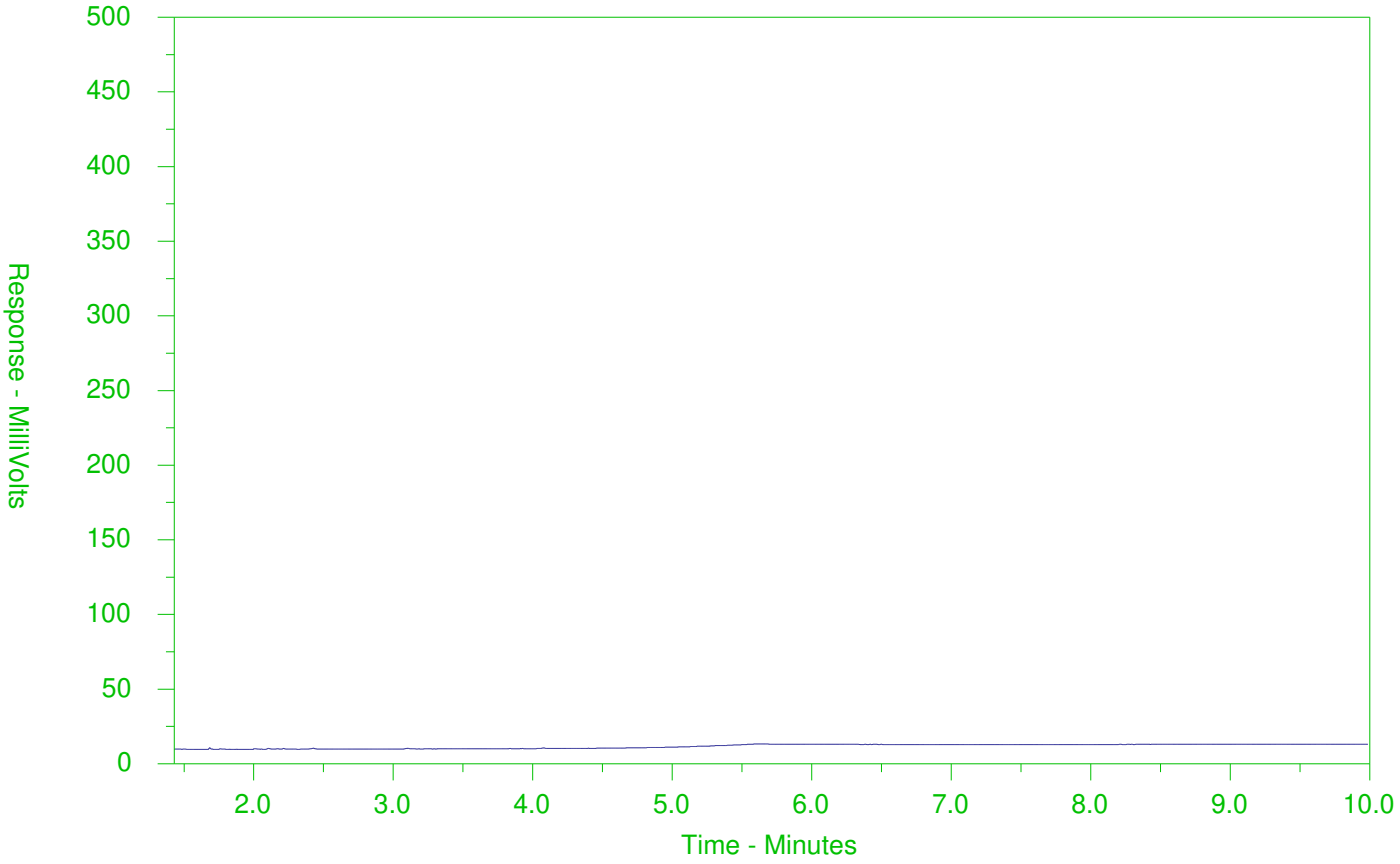
The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

CCME F2-F4 HYDROCARBON DISTRIBUTION REPORT

ALS Sample ID: L2599907-5
Client Sample ID: DUP 01



←F2→	←F3→	←F4→	
nC10	nC16	nC34	nC50
174°C	287°C	481°C	575°C
346°F	549°F	898°F	1067°F
Gasoline →	← Motor Oils/Lube Oils/Grease →		
← Diesel/Jet Fuels →			

The CCME F2-F4 Hydrocarbon Distribution Report (HDR) is intended to assist you in characterizing hydrocarbon products that may be present in your sample.

The scale at the bottom of the chromatogram indicates the approximate retention times of common petroleum products and four n-alkane hydrocarbon marker compounds. Retention times may vary between samples, but general patterns and distributions will remain similar.

Peak heights in this report are a function of the sample concentration, the sample amount extracted, the sample dilution factor and the scale at the left.

Note: This chromatogram was produced using GC conditions that are specific to ALS Canada CCME F2-F4 method. Refer to the ALS Canada CCME F2-F4 Hydrocarbon Library for a collection of chromatograms from common reference samples (fuels, oils, etc.). The HDR Library can be found at www.alsglobal.com.

f Custody (COC) / Analytical Request Form

www.alsglobal

L2599907-COFC

Canada Toll Free: 1 800 668 9878

COC Number: 20 - 895412

Page of

Report To	Contact	Reports / Recipients	Turnaround Time (TAT) Requested
Company:	Geos.	Select Report Format: ☒ PDF ☒ EXCEL ☒ EDD (DIGITAL)	☒ Routine [R] if received by 3pm M-F - no surcharges apply
Contact:	Michelle Quirt	Merge QC/QCI Reports with COA ☐ YES ☐ NO ☒ N/A	☐ 4 day [P4] if received by 3pm M-F - 20% rush surcharge minimum
Phone:	416-716-1651	☐ Compare Results to Criteria on Report - provide details below if box checked	☐ 3 day [P3] if received by 3pm M-F - 25% rush surcharge minimum
	Company address below will appear on the final report	Select Distribution: ☒ EMAIL ☐ MAIL ☐ FAX	☐ 2 day [P2] if received by 3pm M-F - 50% rush surcharge minimum
Street:	130 Stone road West	Email 1 or Fax Emroches@geosynte.com	☐ 1 day [E] if received by 3pm M-F - 100% rush surcharge minimum
City/Province:	Guelph, ON	Email 2 Mquirt@geosynte.com	☐ Same day [E2] if received by 10am M-S - 200% rush surcharge. Additional fees may apply to rush requests on weekends, statutory holidays and non-routine tests
Postal Code:	N1G 5G3	Email 3 BVelderman@geosynte.com	**Date and Time Required for all E&P TATs:**
Invoice To	Same as Report To ☒ YES ☐ NO	**Invoice Recipients**	For all tests with rush TATs requested, please contact your AM to confirm availability.
	Copy of Invoice with Report ☒ YES ☐ NO	Select Invoice Distribution: ☒ EMAIL ☐ MAIL ☐ FAX	
Company:		Email 1 or Fax BVelderman@geosynte.com	
Contact:		Email 2	

AFFIX ALS BARCODE LABEL HERE (ALS use only)

Project Information		Oil and Gas Required Fields (client use)	
ALS Account # / Quote #:		AFE/Cost Center:	PO#
Job #:	TR00536B	Major/Minor Code:	Routing Code:
PO / AFE:		Requisitioner:	
LSD:	RD	Location:	
ALS Lab Work Order # (ALS use only):	L2599907	ALS Contact:	Sampler:

Analysis Request

Indicate Filtered (F), Preserved (P) or Filtered and Preserved (F/P) below

ALS Sample # (ALS use only)	Sample Identification and/or Coordinates (This description will appear on the report)	Date (dd-mmm-yy)	Time (hh:mm)	Sample Type	NUMBER OF CONTAINERS	Metals (dissolved)	As, Sb, Se	Cr 6	B-HWS	CN-	Hg (dissolved)	Nitrate	Nitrite	OCP	VOC/PHC F1-F4	PAH	SAMPLES ON HOLD	EXTENDED STORAGE REQUIRED	SUSPECTED HAZARD (see notes)
	MW01-21	10-06-21	9:20	GW	3	X								X					
	MW02-21	10-06-21	8:00	GW	13	X	X	X	X	X	X	X	X	X	X	X			
	MW03-21	10-06-21	10:15	GW	3	X								X					
	MW04-21	10-06-21	11:55	GW	13	X	X	X	X	X	X	X	X	X	X	X			
	DUP01	—	—	GW	13	X	X	X	X	X	X	X	X	X	X	X			

Drinking Water (DW) Samples[1] (client use)	Notes / Specify Limits for result evaluation by selecting from drop-down below (Excel COC only)
Are samples taken from a Regulated DW System? ☐ YES ☒ NO	Filter MW01-21 metal sample
Are samples for human consumption/ use? ☐ YES ☒ NO	

SAMPLE RECEIPT DETAILS (ALS use only)

Cooling Method: ☐ NONE ☒ ICE ☐ ICE PACKS ☐ FROZEN ☒ COOLING INITIATED

Submission Comments identified on Sample Receipt Notification: ☐ YES ☐ NO

Cooler Custody Seals Intact: ☐ YES ☐ N/A Sample Custody Seals Intact: ☐ YES ☐ N/A

INITIAL COOLER TEMPERATURES °C				FINAL COOLER TEMPERATURES °C			
2.2				3.8			

SHIPMENT RELEASE (client use)			INITIAL SHIPMENT RECEPTION (ALS use only)			FINAL SHIPMENT RECEPTION (ALS use only)		
Released by:	Date:	Time:	Received by:	Date:	Time:	Received by:	Date:	Time:
Florent Rindler	06/10/21			10/JUN	1120		06/11/21	900

REFER TO BACK PAGE FOR ALS LOCATIONS AND SAMPLING INFORMATION

WHITE - LABORATORY COPY YELLOW - CLIENT COPY

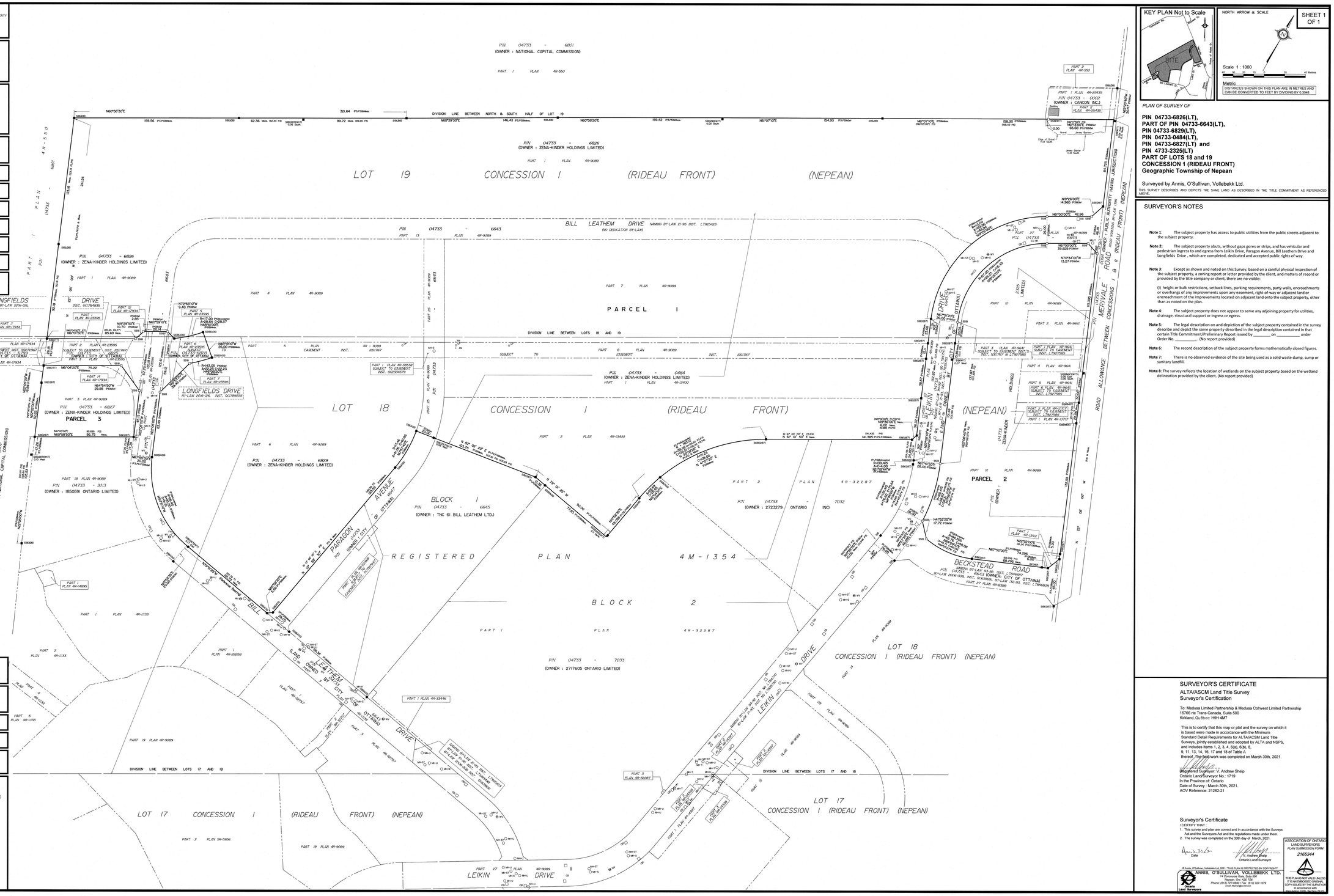
AUG 2016 FRONT

Failure to complete all portions of this form may delay analysis. Please fill in this form LEGIBLY. By the use of this form the user acknowledges and agrees with the Terms and Conditions as specified on the back page of the white - report copy.

1. If any water samples are taken from a **Regulated Drinking Water (DW) System**, please submit using an **Authorized DW COC form**.

APPENDIX D

LEGAL SURVEY OF THE PHASE TWO PROPERTY



1 MONUMENTS HAVE BEEN PLACED AT ALL MAJOR CORNERS OF THE BOUNDARY OF THE SURVEYED PROPERTY UNLESS ALREADY MARKED OR REFERENCED BY EXISTING MONUMENTS OR WITNESSES MONUMENTS IN CLOSE PROXIMITY OF THE CORNER.

2 ALTA/ACSM LAND TITLE SURVEY OF

South Nerivale Business Park
OTTAWA, ONTARIO

3 FLOOD INFORMATION

THE PROPERTY IS NOT LOCATED IN A 100-YEAR FLOOD PLAIN OR IN AN AREA SUBJECT TO A REGULATION PURSUANT TO THE CONSERVATIONS AUTHORITIES ACT (ONTARIO) DESIGNATING IT AS AN AREA SUSCEPTIBLE TO FLOODING OR WHERE FILLING IN OF LAND IS PROHIBITED OR WHERE DIVERTING OR ALTERING A STREAM OR WATERCOURSE IS PROHIBITED.

4 LAND AREA

PARCEL 1 = 30.58248 HECTARES (75.57 ACRES)
PARCEL 2 = 3.79887 HECTARES (9.387 ACRES)
PARCEL 3 = 0.63622 HECTARES (1.572 ACRES)

6 ZONING INFORMATION

LIGHT INDUSTRIAL SUBZONE 9–1L9

7 BUILDING INFORMATION

NO BUILDINGS.

8 SUBSTANTIAL FEATURES

NO SUBSTANTIAL FEATURES.

9 PARKING STRUCTURES

REGULAR = 0 HANDICAP = 0 TOTAL = 0

11 UNDERGROUND SERVICES

SEE PLAN FOR VISIBLE HARDWARE ONLY. NO UNDERGROUND LOCATES WERE PERFORMED.

13 ADJOINING OWNERS

SEE PLAN

14 ACCESS TO THE NEAREST INTERSECTING STREET

THE PROPERTY FRONTS ONTO LEIKIN DRIVE, PARAGON AVENUE, BILL LEATHEM DRIVE AND LONGFIELDS DRIVE

16 EARTH MOVING NOTE

THERE IS NO OBSERVABLE EVIDENCE OF EARTH MOVING WORK, BUILDING CONSTRUCTION OR BUILDING ADDITIONS WITHIN RECENT MONTHS.

17 PROPOSED CHANGES IN STREET RIGHT-OF-WAY LINES

THERE IS NO OBSERVABLE EVIDENCE OF CHANGES TO EXISTING RIGHTS–OF–WAY OF PUBLIC STREETS.

18 EASEMENTS

EASEMENT IN FAVOR OF THE CITY OF OTTAWA (AS IN INSTRUMENT'S N311767 & N311767) AS ILLUSTRATED ON THE PLAN

19 PROFESSIONAL LIABILITY INSURANCE POLICY

PROVIDED IN SEPARATE DOCUMENT.

BEARING NOTE

BEARINGS ARE GRID, DERIVED FROM THE WESTERLY LIMIT OF BILL LEATHEM DRIVE SHOWN TO BE N79°01'25"W ON PLAN 4R–32287 AND ARE REFERRED TO THE CENTRAL MERIDIAN OF MTM ZONE 9 (76°30' WEST LONGITUDE) NAD–83 (ORIGINAL).

LEGEND AND ABBREVIATIONS

—□—	"	SURVEY MONUMENT PLANTED	○ FH	"	FIRE HYDRANT
—■—	"	SURVEY MONUMENT FOUND	⊗ WV	"	WATER VALVE
SIB	"	STANDARD IRON BAR	○ MH–ST	"	MAINTENANCE HOLE (STORM SEWER)
SSIB	"	SHORT STANDARD IRON BAR	○ MH-S	"	MAINTENANCE HOLE (SANITARY)
IB	"	IRON BAR	○ MH-W	"	MAINTENANCE HOLE (WATER)
*	"	SURVEY MONUMENT 0.3 metres LONG	○ MH-T	"	MAINTENANCE HOLE (TRAFFIC)
(WIT)	"	WITNESS	○ MH-H	"	MAINTENANCE HOLE (HYDRO)
Meas.	"	MEASURED	○ MH-U	"	MAINTENANCE HOLE (UNIDENTIFIED)
(AOG)	"	ANNIS, O'SULLIVAN, VOLLEBEKK LTD.	□ CBI	"	CATCH BASIN INLET
(P1)	"	REGISTERED PLAN 4M–1354	□ CB	"	CATCH BASIN
(P2)	"	PLAN 4R–32287	▭ HH	"	HANDHOLE
(P3)	"	PLAN 4R–9089			
(P4)	"	PLAN 4R–13400			
(P5)	"	PLAN 4R–550			
(P6)	"	PLAN 4R–23595			
(P7)	"	PLAN 4R–17934			
(P8)	"	PLAN 4R–25435			
(P9)	"	PLAN 4R–9641			
(P10)	"	PLAN 4R–10717			
(P11)	"	PLAN 4R–13512			
(P12)	"	PLAN 4R–11133			
UP	"	UTILITY POLE			
AN	"	ANCHOR			

KEY PLAN Not to Scale

NORTH ARROW & SCALE

SHEET 1
OF 1

Metric

DISTANCES SHOWN ON THIS PLAN ARE IN METRES AND CAN BE CONVERTED TO FEET BY DIVIDING BY 0.3048

PLAN OF SURVEY OF

PIN 04733-6826(LT),
PART OF PIN 04733-6643(LT),
PIN 04733-6829(LT),
PIN 04733-0484(LT),
PIN 04733-6827(LT) and
PIN 4733-2325(LT)
PART OF LOTS 18 and 19
CONCESSION 1 (RIDEAU FRONT)
Geographic Township of Nepean

Surveyed by Annis, O'Sullivan, Vollebekk Ltd.

THIS SURVEY DESCRIBES AND DEPICTS THE SAME LAND AS DESCRIBED IN THE TITLE COMMITMENT AS REFERENCED ABOVE.

SURVEYOR'S NOTES

Note 1: The subject property has access to public utilities from the public streets adjacent to the subject property.

Note 2: The subject property abuts, without gaps gores or strips, and has vehicular and pedestrian ingress to and egress from Leikin Drive, Paragon Avenue, Bill Leathem Drive and Longfields Drive , which are completed, dedicated and accepted public rights of way.

Note 3: Except as shown and noted on this Survey, based on a careful physical inspection of the subject property, a zoning report or letter provided by the client, and matters of record or provided by the title company or client, there are no visible:

(i) height or bulk restrictions, setback lines, parking requirements, party walls, encroachments or overhangs of any improvements upon any easement, right-of-way or adjacent land or encroachment of the improvements located on adjacent land onto the subject property, other than as noted on the plan.

Note 4: The subject property does not appear to serve any adjoining property for utilities, drainage, structural support or ingress or egress.

Note 5: The legal description on and depiction of the subject property contained in the survey describe and depict the same property described in the legal description contained in that certain Title Commitment/Preliminary Report issued by ________ on ___________ under Order No. __________. (No report provided)

Note 6: The record description of the subject property forms mathematically closed figures.

Note 7: There is no observed evidence of the site being used as a solid waste dump, sump or sanitary landfill.

Note 8: The survey reflects the location of wetlands on the subject property based on the wetland delineation provided by the client. (No report provided)

SURVEYOR'S CERTIFICATE

ALTA/ASCM Land Title Survey
Surveyor's Certification

To: Medusa Limited Partnership & Medusa CoInvest Limited Partnership
16766 rte Trans-Canada, Suite 500
Kirkland, Québec H9H 4M7

This is to certify that this map or plat and the survey on which it is based were made in accordance with the Minimum Standard Detail Requirements for ALTA/ACSM Land Title Surveys, jointly established and adopted by ALTA and NSPS, and includes Items 1, 2, 3, 4, 6(a), 6(b), 8, 9, 11, 13, 14, 16, 17 and 18 of Table A thereof. The field work was completed on March 30th, 2021.

Registered Surveyor: V. Andrew Shelp
Ontario Land Surveyor No.: 1719
In the Province of: Ontario
Date of Survey : March 30th, 2021.
AOV Reference: 21282-21

Surveyor's Certificate

I CERTIFY THAT :
1. This survey and plan are correct and in accordance with the Surveys Act and the Surveyors Act and the regulations made under them.
2. The survey was completed on the 30th day of March, 2021.

April 21/21
Date

V. Andrew Shelp
Ontario Land Surveyor

ASSOCIATION OF ONTARIO LAND SURVEYORS
PLAN SUBMISSION FORM
2165344

THIS PLAN IS NOT VALID UNLESS IT IS AN EMBOSSED ORIGINAL COPY ISSUED BY THE SURVEYOR In accordance with Regulation 1026, Section 29 (3)

ANNIS, O'SULLIVAN, VOLLEBEKK LTD.
14 Concourse Gate, Suite 500
Nepean, Ont. K2E 7S6
Phone: (613) 727-0850 / Fax: (613) 727-1079
Email: Nepean@aovltd.com
Ontario Land Surveyors