APPENDIX B

4510 Rhodes Dr., Unit 530
Windsor ON Canada
N8W 5K5

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TECHNICAL MEMORANDUM

DATE:	2020-07-13	**RWDI Reference No.:** 1801685
TO:	Joe Boothe – City of Sarnia Superintendent, Environmental Services	**EMAIL:** joe.boothe@sarnia.ca
CC:	Claire Finoro Steve Davies Brent Langille	**EMAIL: Claire.Finoro@rwdi.com** **EMAIL: Steve.Davies@rwdi.com** **EMAIL: Brent.Langille@rwdi.com**
FROM:	Phil Janisse	**EMAIL:** Philippe.Janisse@rwdi.com
RE:	**Subsurface Investigation and Gas Probe Installations** **Former Michigan Avenue Landfill (FMAL)** **Near 720 Ernest Street, Village of Point Edward, ON**	

Dear Mr. Boothe,

In response to the Ministry of the Environment, Conservation and Parks' (MECP) comments received in an email, dated June 2, 2020, as well as within a component of its Review of the 2019 Annual Monitoring Report Memorandum dated June 17, 2020, with respect to addressing soil vapour concerns near a resident located at 720 Ernest Street, in Point Edward, ON, RWDI has compiled relevant information with the intent to address these concerns within this Technical Memorandum.

Existing Monitoring Well and Gas Probe Inspection

As proposed in a prior Memorandum dated June 4, 2020, RWDI was retained by the City of Sarnia (City) to complete down-hole camera inspections for monitoring wells/gas probes 702 and 902 to visually identify and measure the depth of the top of the screened interval for each location as there are no borehole logs available to interpret the screened interval installation details. The results of the downhole camera inspection are summarized below.

Monitoring Location	Top of Screen (mBTOP)	Total Depth (mBTOP)	Screened Interval (mBTOP)	Length of Screen (m)	Stick-Up (m)
702	1.55	3.88	1.55 to 3.88	2.33	0.83
902	1.15	1.52	1.15 to 1.52	0.37	0.61

Given the above field observations, the below summaries for the previous gas monitoring events completed in the CLC Area near the residential property at 720 Ernest Street were updated.

May 21, 2020 – Monitoring Well and Gas Probe Field Measurements

Monitoring Location	VOC (ppm)	LEL (%)	O_2 (%)	Liquid Level (mBTOP)	Top of Screen (mBTOP)	Screened Interval (mBGS)	Stick-Up (m)
702	0.0	0	20.9	1.47	1.55	0.72 to 3.05	0.83
G6	0.0	0	20.9	1.47	1.55	~0.7 to 3.8	0.85
LL3	0.0	0	20.9	2.29	1.65	~1.4 to 3.8	0.25
902	0.0	0	20.9	1.20	1.15	0.54 to 0.91	0.61
MW23	1.0	0	20.9	1.74	2.24	~1.5 to 4.9	0.74

May 28, 2020 – Monitoring Well and Gas Probe Field Measurements

Monitoring Location	VOC (ppm)	LEL (%)	O_2 (%)	Liquid Level (mBTOP)	Top of Screen (mBTOP)	Screened Interval (mBGS)	Stick-Up (m)
702	0.0	0	20.9	1.59	1.55	0.72 to 3.05	0.83
G6	0.0	0	20.9	1.64	1.55	~0.7 to 3.8	0.85
LL3	3.0	0	20.9	2.36	1.65	~1.4 to 3.8	0.25
902	0.0	0	20.7	1.36	1.15	0.54 to 0.91	0.61
MW23	0.0	0	20.9	2.15	2.24	~1.5 to 4.9	0.74

Notes: ppm = parts per million; mBTOP = metres below top of pipe; mBGS indicates metres below ground surface

As noted above, the screened interval for monitoring wells/gas probes 702 and 902 were not fully submerged for the May 28, 2020 gas monitoring event. However, the screened interval of monitoring well 702 was fully submerged for the May 21, 2020 monitoring event.

Of note, the camera inspection for gas probe 902 indicated that there may be some sediment build-up at the bottom of the probe, though the sediment buildup appeared to be limited to the sump of the probe, and was interpreted to be less than 5 cm. Notwithstanding, without a borehole log to compare, it is difficult to interpret whether there could be a significant or minor buildup of sediment within gas probe 902.

Subsurface Investigation

Gas Probe Installations

As discussed in RWDI's memorandum of June 4, 2020, the City retained RWDI to install two (2) gas monitoring probes within the CLC Area of the FMAL just east of the residential property located at 720 Ernest Street. One of the gas monitoring probes was installed within the inferred location of the product plume to evaluate off-gassing concentrations that may be present directly from the product plume. The second gas monitoring probe was installed closer to the residence and outside the area of the inferred location of the product plume to evaluate for the presence of potential vapours in the vadose zone beyond the product plume front.

The placement depth of the screened interval considered the field observations from the laser-induced fluorescent (LIF) study completed in May 2020, such that the upper portion of the screened interval does not become submerged either by groundwater or floating product. The targeted screened interval installation depth was approximately 0.5 metre (m) above the inferred product elevation (based on the LIF field study observations) and at least 0.5 m below the bottom of the inferred product plume thickness. Each of the gas probes were completed with a threaded steel cap equipped with a barbed gas monitoring check valve.

Subsurface Borehole Investigation

In addition to the installation of two (2) gas probes, supplemental boreholes were also completed to assess the shallow subsurface conditions and to delineate the edge of the inferred product plume. The subsurface advancement of the boreholes was completed using a handheld auger. Boreholes were advanced to approximately 1.5 mBGS in consideration of the LIF field-measured %RE of approximately 1.0 mBGS at the location of LIF BH20149.

With the objective of installing one of the gas probes within an interpreted area to be free of product (LIF BH20150) and one within the location of the inferred product plume (LIF BH20149), two (2) supplemental boreholes were completed to more accurately refine the approximate distance of the product plume front with respect to the adjacent residential property located at 720 Ernest Street. The lateral distances were measured in the field from the residential property boundary.

The following summary depicts the approximate distance of the borehole and gas probes compared to the adjacent residential property located at 720 Ernest Street. A **Figure** depicting the borehole and gas probe locations is also provided in **Attachment 1** for reference.

Borehole and/or Gas Probe Location	Distances from Residential Property Boundary (m)	Product and/or Hydrocarbon Odour Impacts
GP20150	3.1	No
BH20149A	5.7	No
BH20149B	7.5	No
GP20149	9.3	Yes – sheen and heavy oil odours at 1.1 m
LIF BH20149	6.7	Yes (Based on field-measured %RE)
LIF BH20150	3.2	No (Based on field-measured %RE)

GP20150 was advanced at the inferred location of LIF BH20150 based on GPS coordinates provided by Vertex Environmental (Vertex). Based on the LIF investigation, at the location of LIF BH20149, a product-like signature was identified approximately 1.0 mBGS. However, there was no evidence of product-like impacts in the soil at BH20149B, which was located 0.8 m further east.

It is noted that the GPS coordinates collected by Vertex have inherent accuracy limitations (approximately ± 3 to 5 m) and satellite positioning is also subject to drifting. Thus, the exact positioning of LIF BH20149 may not be accurate and its location for the June 18, 2020 investigation was determined in the field based on GPS coordinates from the May LIF investigation. Based on the June 18, 2020 field observations, the product plume appears to be located approximately 8 m east of the residential property boundary.

Field Soil Observations

In general, the subsurface soil encountered during the completion of the hand augured boreholes consisted mainly of a surficial layer of topsoil between 0.3 m and 0.6 m thick underlain by gravelly silty sand (0.1 to 0.3 m thick) then by an organic sandy loam or fine silty sand to the depth extent of approximately 1.5 mBGS. Of note, the soil sample collected for laboratory analysis at the location of GP20149 (sample ID 20149C) exhibited visual and olfactory evidence of a heavy oil hydrocarbon impact. The soil exhibited a distinct sheen and appeared oily.

Borehole logs and construction details for gas probes GP20149 and GP20150 are provided in **Attachment 2**. Of note, a Well Record was not required for the gas probe installations in accordance with the Shallow Works exemptions of O. Reg. 903.

Soil Quality Assessment

During the June 18, 2020 subsurface investigation, soil samples were collected within the inferred stratigraphic range of the product plume (identified to be approximately 1.0 to 2.1 mBGS in the field during the LIF investigation) at three (3) of the borehole locations.

Soil samples were collected from a depth of approximately 1.1 to 1.3 mBGS in consideration of the LIF field measured %RE depth at the location of LIF BH20149. Soil samples were collected from the locations of GP20149 (Sample ID 20149C), BH20149A (sample ID 20149), and GP20150 (Sample ID 20150). The soil samples were submitted to Eurofins Scientific, a Canadian Association of Laboratory Accreditation (CALA)-certified laboratory, for analytical testing. The analytical testing considered the known characteristics of the product plume and thus included testing for polycyclic aromatic hydrocarbons (PAHs), volatile organic compounds (VOCs), and petroleum hydrocarbons (PHCs) Fractions F1 to F4.

In general, the soil quality typically showed values that were below the laboratory detection limit for the tested parameters except for PHC Fraction F2 at the location of GP20149, and PHC Fraction F3 at the locations of BH20149A and GP20150. Each of the detected constituent concentrations were less than 5 times the laboratory reportable detection limit (RDL), thus, the detected concentrations can be considered negligible. There were no other detectable parameters noted in the soil samples submitted for analysis.

When comparing the analytical results to the *Soil, Groundwater and Sediment Standards for Use Under Part XV.1 of the Environmental Protection Act* (MECP Standards), the PHC F2 concentration of 20 milligrams per litre (mg/L) noted at the location of GP20149 (sample ID 20149C) exceeds the Generic Background Site Condition Table 1 criteria of the MECP Standards of 10 mg/L. No other soil parameters tested exceeded the Table 1 criteria of the MECP Standards. The relevant laboratory certificate of analysis is provided in **Attachment 3**.

Trigger and Contingency Plan Considerations

The current *Trigger and Contingency Plan* (Golder and Associates, 2015) for the CLC Area at the FMAL states that "*if floating oil migrates to within 5 metres of the western property boundary, and is considered to be actively migrating, an active containment and recovery system will be installed in the CLC Area within 12 months.*" As a result of the above investigation, there is no requirement to implement remedial measures within a 12-month period as migrating product was not identified within 5 m of the western property boundary.

Inspection of MW-205

On July 2, 2020, RWDI completed a downhole inspection of monitoring well 205 while on-site to complete other field tasks. The camera inspection revealed that the monitoring well was not compromised and that there was a length of polyethylene tubing that had fallen into the well with its top at approximately 1.80 mBGS. The length of tubing could not be determined, however, based on the borehole log information, if the length of tubing is sitting at the bottom of the well, then an inferred tubing length could be approximately 0.94 m. RWDI will attempt to remove the length of tubing during the next monitoring event scheduled for the week of July 20, 2020.

Gas Monitoring Results – New Gas Probes

The combustible gas field screening was completed using a MultiRAE Plus 4 gas meter with PID (photoionization detector) sensor. The PID sensor is calibrated to an isobutylene standard calibration gas and measures the ambient volatile organic compound (VOC) concentration. The PID readings are expressed in parts per million (ppm) to an accuracy of 0.1 ppm. The gas meter can also measure methane concentrations within the methane's lower explosive limit (LEL) in air (0 to 5% methane in air, where 5% in air = 100% LEL). As such, LEL field measurements were also completed during this follow-up field investigation. Measurements were also recorded for percent oxygen (O_2) in air to evaluate if there was the potential for other gases to be displacing the normal percentage of O_2 for safe breathing levels.

June 18, 2020 – New Gas Probe Field Measurements

Monitoring Well/Gas Probe Location	VOC (ppm)	LEL (%)	O_2 (%)
GP20149	0.0	0	19.8
GP20150	0.0	0	18.3

July 2, 2020 – New Gas Probe Field Measurements

Gas Probe Location	VOC (ppm)	LEL (%)	O_2 (%)	Liquid Level (mBTOP)	Top of Screen (mBTOP)	Top of Probe (mASL)
GP20149	0.0	0	20.9	1.79	1.22	178.88
GP20150	0.0	0	20.3	2.05	1.22	179.14

July 9, 2020 – New Gas Probe Field Measurements

Gas Probe Location	VOC (ppm)	LEL (%)	O_2 (%)	Liquid Level (mBTOP)	Top of Screen (mBTOP)	Top of Probe (mASL)
GP20149	0.0	0	20.9	1.89	1.22	178.88
GP20150	0.0	0	20.9	2.14	1.22	179.14

As noted above, there were no combustible gas readings detected at the location of new gas monitoring probes GP20149 and GP20150 for either the June 18th, July 2nd, or July 9, 2020 gas monitoring events.

Visual observations of product were observed within the soil at GP20149. The lack of combustible gas readings from a location with visual indications of product suggests that the existing product in the area does not readily volatilize.

Proposed Next Steps

Given the above-noted low to no combustible gas readings within nearby monitoring wells and gas probes, as well as within the newly installed gas probes GP20149 and GP20150, it is proposed that until the Trigger and Contingency Plan is revised, soil vapour monitoring continues to be completed at newly installed gas probes GP20149 and GP20150 on a monthly basis. The soil vapour monitoring is proposed to include the assessment of methane, volatile organic compounds (VOCs), and oxygen concentrations in air. In addition to soil vapour monitoring, liquid levels should also be measured such that an assessment can be made whether the screened interval within the newly installed gas probes are submerged.

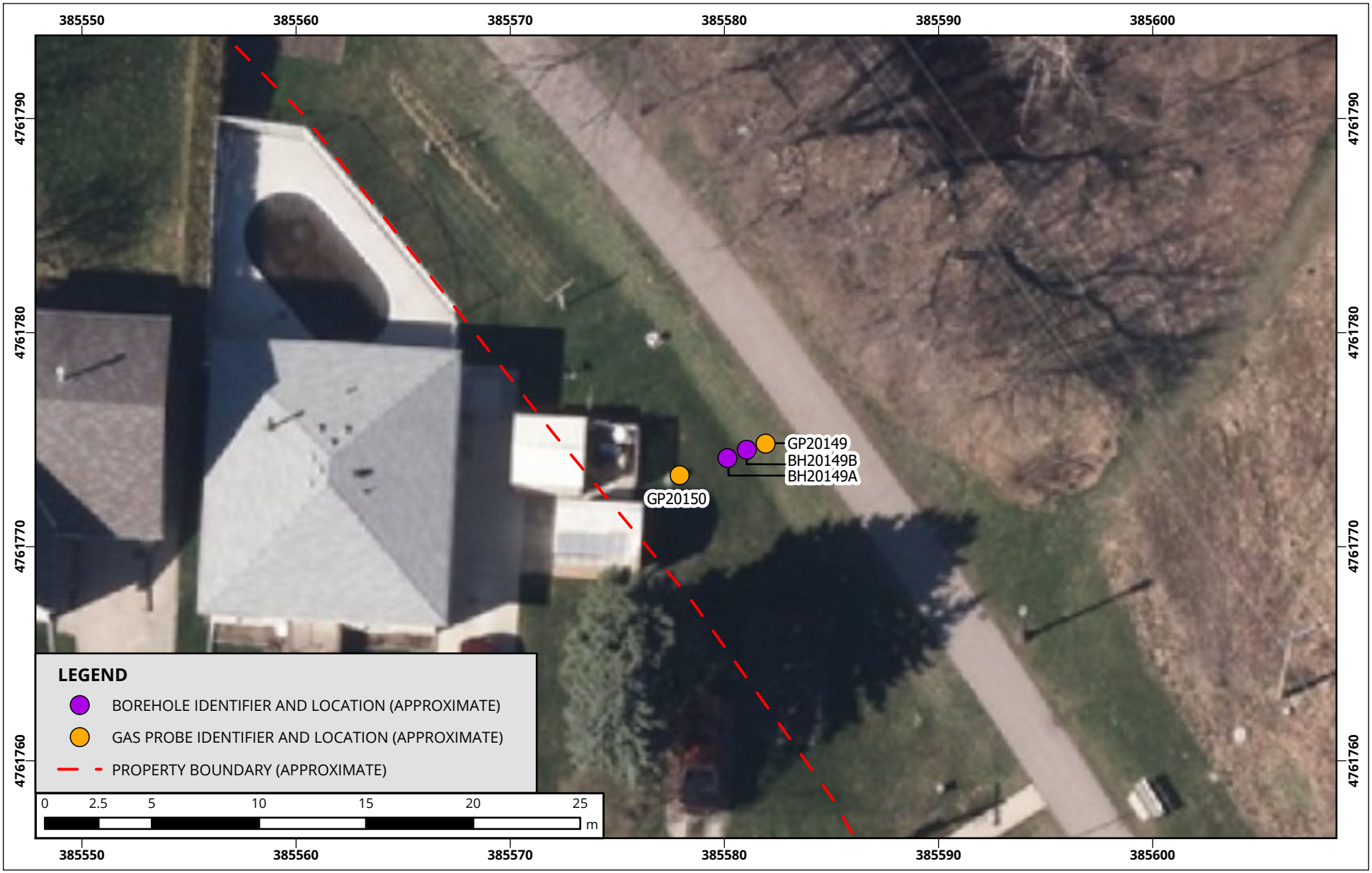
If the probes' screened intervals are noted to be fully submerged during a routine monthly monitoring event, then gas monitoring at that location should be repeated approximately one (1) week later. If the probes' screened intervals remain submerged after a week, then the routine gas monitoring will simply resume on the following month. As such, gas monitoring at GP20149 and GP20150 should be completed earlier in the month to allow for the one-week re-check buffer, if necessary.

Following a six-month period, if soil vapour readings remain very low (1% LEL or less for methane and <5 ppm for VOCs) to non-detect, the gas monitoring frequency at gas probes GP20149 and GP20150 may be reduced from monthly to quarterly.

Closure

We trust the above is satisfactory for your current requirements. Please contact us with any questions you may have.

ATTACHMENT 1



Site Plan
Soil Sampling/Gas Probe Installation

True North

Notes: Orthoimagery obtained from First Base Solutions (2017)

Map Projection: NAD 1983 UTM Zone 17N

The Corporation of the City of Sarnia - Former Michigan Avenue Landfill

Project #: 1801685

Drawn by: JVV	Figure: 1
Approx. Scale:	1:250
Date Revised:	Jul 6, 2020

Map Document: K:\1801685\6. Deliverables\Gas Probe Installation\Figures\Working File\1801685_F01_SitePlan_GasProbe.aprx

ATTACHMENT 2

RWDI
600 Southgate Drive, Guelph, ON N1G 4P6
Tel: 519.823.1311 Fax: 519.823.1316

BOREHOLE LOG BH20149A

E: 385,577.83 **N:** 4,761,775.3

PROJECT NAME: Soil Sampling/Gas Probe Installation
PROJECT NO.: 1801685
CLIENT: The Corporation of the City of Sarnia
PROJECT LOCATION: Former Michigan Avenue Landfill
DRILLING CONTRACTOR: RWDI

DRILLING METHOD: Handheld Augers
BOREHOLE DIAMETER: 57 mm
DATE STARTED: 18-June-2020 **COMPLETED:** 18-June-2020
GROUND ELEVATION: 178.08 mASL
LOGGED BY: MSA **CHECKED BY:** PEJ

SAMPLE							SUBSURFACE PROFILE		
DEPTH [mbgs] / ELEV. [mASL]	SAMPLE TYPE / NUMBER	"N" VALUE	RECOVERY (%)	PID (ppm)	REMARKS		DEPTH [mbgs]	GRAPHIC LOG	MATERIAL DESCRIPTION
0 / 178	1		100				0.3		**TOPSOIL** Light to dark brown sandy topsoil, trace gravel, trace cobble, trace rootlets, dry, very loose, no HCO.
	2		100				0.5		**SILTY SAND** Dark brown fine to medium silty sand, trace gravel, moist, very loose, no HCO.
	3		100				0.7		**SILTY-CLAY TO CLAYEY-SILT** Brown silty-clay to clayey-silt, APL, very stiff, no HCO.
	4		100						**SANDY SILT TO SANDY LOAM** Dark brown to black sandy silt to sandy loam, trace to some roots, moist to saturated, no HCO. - Tree root encountered at 0.84 m depth.
	5		100						
	6		0						
1 / 177	7		100						
	8		100	0.0					
	9		100	0.0	Borehole terminated at 1.6 m depth.				
2 / 176									
3 / 175									
4									

RWDI
600 Southgate Drive, Guelph, ON N1G 4P6
Tel: 519.823.1311 Fax: 519.823.1316

BOREHOLE LOG BH20149B

E: 385,577.83 **N:** 4,761,775.3

PROJECT NAME: Soil Sampling/Gas Probe Installation
PROJECT NO.: 1801685
CLIENT: The Corporation of the City of Sarnia
PROJECT LOCATION: Former Michigan Avenue Landfill
DRILLING CONTRACTOR: RWDI

DRILLING METHOD: Handheld Augers
BOREHOLE DIAMETER: 57 mm
DATE STARTED: 18-June-2020 **COMPLETED:** 18-June-2020
GROUND ELEVATION: 178.08 mASL
LOGGED BY: MSA **CHECKED BY:** PEJ

SAMPLE							SUBSURFACE PROFILE		
DEPTH [mbgs] / ELEV. [mASL]	SAMPLE TYPE	NUMBER	"N" VALUE	RECOVERY (%)	PID (ppm)	REMARKS	DEPTH [mbgs]	GRAPHIC LOG	MATERIAL DESCRIPTION
0 / 178		1		100					**TOPSOIL** Brown sandy topsoil, some gravel, dry, very loose, no HCO.
		2		100			0.3		
		3		54			0.4		**SILTY-CLAY TO CLAYEY-SILT** Brown silty-clay to clayey-silt, APL, very stiff, no HCO.
		4		100					**SAND** Light to dark brown fine to medium sand, poorly sorted, some silty-clay to clayey-silt nodules (<1 cm), some cobble, moist to saturated, loose to compact, no HCO.
1 / 177		5		100					
		6		100	0.0				
		7		100		Soil sample ('20149') collected for laboratory analysis of PHCs, PAHs, VOCs. Borehole terminated at 1.5 m depth.			
2 / 176									
3 / 175									
4									

RWDI
600 Southgate Drive, Guelph, ON N1G 4P6
Tel: 519.823.1311 Fax: 519.823.1316

GAS PROBE GP20149

E: 385,577.83 **N:** 4,761,775.3

PROJECT NAME: Soil Sampling/Gas Probe Installation
PROJECT NO.: 1801685
CLIENT: The Corporation of the City of Sarnia
PROJECT LOCATION: Former Michigan Avenue Landfill
DRILLING CONTRACTOR: RWDI

DRILLING METHOD: Handheld Augers
BOREHOLE DIAMETER: 57 mm
DATE STARTED: 18-June-2020 **COMPLETED:** 18-June-2020
GROUND ELEVATION: 178.08 mASL
LOGGED BY: MSA **CHECKED BY:** PEJ

SAMPLE							SUBSURFACE PROFILE			
DEPTH [mbgs] / ELEV. [mASL]	SAMPLE TYPE / NUMBER	"N" VALUE	RECOVERY (%)	PID (ppm)	REMARKS	DEPTH [mbgs]	GRAPHIC LOG	MATERIAL DESCRIPTION	WELL DIAGRAM
0 / 178	1		100					**TOPSOIL** Dark brown sandy topsoil, trace to some cobbles, trace rootlets, dry, very loose, no HCO.	Gas probe has a stick-up of 0.80 m.
	2		100						Seal: bentonite from 0.3 m depth to surface and mounded with soil placed on top.
	3		100					**SAND (FILL)** Brown sand fill with coarse cobbles and/or rail ballast, trace rootlets, dry, loose, no HCO.	
	4		100			0.6			
	5		100	0.0		0.7		**SAND** Light to dark brown fine to medium sand, well sorted, moist, loose, becoming dark brown to grey fine silty sand, saturated, compact, at 0.9 m depth. - Black oil staining and sheen including a heavy oil HCO encountered at 0.95 m depth.	Stainless steel 50 mesh cylindrical filter-screen containing No. 2 silica sand.
	6		100	0.0					
1 / 177	7		100	0.0					
	8		100		Soil sample '20149C' collected for laboratory analysis of PHCs, PAHs, VOCs.				
	9		100		Borehole terminated at 1.5 m depth.				
2 / 176									Gas probe constructed using 20 mm inside diameter stainless steel drive-point body. Gas probe driven to 2.8 m depth.
3 / 175									
4									

RWDI
600 Southgate Drive, Guelph, ON N1G 4P6
Tel: 519.823.1311 Fax: 519.823.1316

GAS PROBE GP20150

E: 385,583.1 **N:** 4,761,776.5

PROJECT NAME: Soil Sampling/Gas Probe Installation
PROJECT NO.: 1801685
CLIENT: The Corporation of the City of Sarnia
PROJECT LOCATION: Former Michigan Avenue Landfill
DRILLING CONTRACTOR: RWDI

DRILLING METHOD: Handheld Augers
BOREHOLE DIAMETER: 57 mm
DATE STARTED: 18-June-2020 **COMPLETED:** 18-June-2020
GROUND ELEVATION: 178.35 mASL
LOGGED BY: MSA **CHECKED BY:** PEJ

SAMPLE							SUBSURFACE PROFILE			
DEPTH [mbgs] / ELEV. [mASL]	SAMPLE TYPE NUMBER	"N" VALUE	RECOVERY (%)	PID (ppm)	REMARKS		DEPTH [mbgs]	GRAPHIC LOG	MATERIAL DESCRIPTION	WELL DIAGRAM
0 / 178	1		100				0.3		**TOPSOIL** Dark brown sandy topsoil, some silt, trace clay, some rootlets, dry, very loose, no HCO.	Gas probe has a stick-up of 0.80 m.
	2		100				0.4		**SILTY SAND (FILL)** Light brown silty sand, trace cobbles, moist, no HCO.	Seal: bentonite from 0.3 m depth to surface and mounded with soil placed on top.
	3		100				0.6		**SAND (FILL)** Black medium to fine well sorted sand, some silt, trace to some gravel, trace brown sand, moist, no HCO.	
	4		100						**SILTY-CLAY TO CLAYEY-SILT** Mottled brown and grey silty-clay to clayey-silt, trace black sand, APL, firm to very stiff, no HCO.	Stainless steel 50 mesh cylindrical filter-screen containing No. 2 silica sand.
	5		100				1.1		**SANDY SILY TO SANDY LOAM** Dark brown to black sandy silt to sandy loam, trace gravel, saturated, no HCO.	
	6		100							
	7		100	0.0						
1	8		100							
	9		100							
177	10		100		Soil sample '20150' collected for laboratory analysis of PHCs, PAHs, VOCs Borehole terminated at 1.6 m depth.					Gas probe constructed using 20 mm inside diameter stainless steel drive-point body. Gas probe driven to 2.9 m depth.
2										
176										
3										
175										
4										

ATTACHMENT 3

Certificate of Analysis

Environment Testing

Client: RWDI Air Inc
4510 Rhodes Drive, Unit 530
Windsor, ON
N8W 5K5
Attention: Mr. Claire Finoro
Invoice to: RWDI Air Inc.
PO#: 1801685-5002

Report Number:	1932729
Date Submitted:	2020-06-23
Date Reported:	2020-06-30
Project:	1801685
COC #:	858942
Temperature (C):	11
Custody Seal:	

Dear Claire Finoro:

Please find attached the analytical results for your samples. If you have any questions regarding this report, please do not hesitate to call (613-727-5692).

Report Comments:

Long Qu, Organics Supervisor

All analysis is completed at Eurofins Environment Testing Canada Inc. (Ottawa, Ontario) unless otherwise stated
.
Eurofins Environment Testing Canada Inc. is accredited by CALA, Canadian Association for Laboratory Accreditation to ISO/IEC 17025 for tests which appear on the scope of accrteditation. The scope is available at http://www.cala.ca/scopes/2602.pdf

Please note: Field data, where presented on the report, has been provided by the client and is presented for informational purposes only. Guideline or regulatory limits listed on this report are provided for ease of use (informational purposes) only. Eurofins recommends consulting the official guideline or regulation as required. Unless otherwise stated, measurement uncertainty is not taken into account when determining guideline or regulatory exceedances.

Client: RWDI Air Inc
4510 Rhodes Drive, Unit 530
Windsor, ON
N8W 5K5
Attention: Mr. Claire Finoro
PO#: 1801685-5002
Invoice to: RWDI Air Inc.

Report Number: 1932729
Date Submitted: 2020-06-23
Date Reported: 2020-06-30
Project: 1801685
COC #: 858942

O.Reg 153-T1-All Other Soils

Exceedence Summary

Sample I.D.	Analyte	Result	Units	Criteria
Hydrocarbons				
20149C	Petroleum Hydrocarbons F2	20	ug/g	STD 10

Results relate only to the parameters tested on the samples submitted.
Methods references and/or additional QA/QC information available on request.

MRL = Method Reporting Limit, AO = Aesthetic Objective, OG = Operational Guideline, MAC = Maximum Acceptable Concentration, IMAC = Interim Maximum Acceptable Concentration, STD = Standard, PWQO = Provincial Water Quality Guideline, IPWQO = Interim Provincial Water Quality Objective, TDR = Typical Desired Range

Client: RWDI Air Inc
4510 Rhodes Drive, Unit 530
Windsor, ON
N8W 5K5
Attention: Mr. Claire Finoro
PO#: 1801685-5002
Invoice to: RWDI Air Inc.

Report Number: 1932729
Date Submitted: 2020-06-23
Date Reported: 2020-06-30
Project: 1801685
COC #: 858942

Guideline = O.Reg 153-T1-All Other Soils

Hydrocarbons

Analyte	Batch No	MRL	Units	Guideline	Lab I.D. / Sample Matrix / Sample Type / Sample Date / Sampling Time / Sample I.D.		
					1500341 Soil153 2020-06-18 20150	1500342 Soil153 2020-06-18 20149	1500343 Soil153 2020-06-18 20149C
PHC's F1	385487	10	ug/g	STD 25	<10	<10	<10
PHC's F2	385519	10	ug/g	STD 10	<10	<10	20*
PHC's F3	385519	20	ug/g	STD 240	40	<20	60
PHC's F4	385519	20	ug/g	STD 120	<20	<20	<20

PAH

Analyte	Batch No	MRL	Units	Guideline	Lab I.D. / Sample Matrix / Sample Type / Sample Date / Sampling Time / Sample I.D.		
					1500341 Soil153 2020-06-18 20150	1500342 Soil153 2020-06-18 20149	1500343 Soil153 2020-06-18 20149C
1+2-methylnaphthalene	208523	0.05	ug/g		<0.05	<0.05	<0.05
Acenaphthene	385094	0.05	ug/g	STD 0.072	<0.05	<0.05	<0.05
Acenaphthylene	385094	0.05	ug/g	STD 0.093	<0.05	<0.05	<0.05
Anthracene	385094	0.05	ug/g	STD 0.16	<0.05	<0.05	<0.05
Benz[a]anthracene	385094	0.05	ug/g	STD 0.36	<0.05	<0.05	<0.05
Benzo[a]pyrene	385094	0.05	ug/g	STD 0.3	<0.05	<0.05	<0.05
Benzo[b]fluoranthene	385094	0.05	ug/g	STD 0.47	<0.05	<0.05	<0.05
Benzo[ghi]perylene	385094	0.05	ug/g	STD 0.68	<0.05	<0.05	<0.05
Benzo[k]fluoranthene	385094	0.05	ug/g	STD 0.48	<0.05	<0.05	<0.05
Chrysene	385094	0.05	ug/g	STD 2.8	<0.05	<0.05	<0.05
Dibenz[a h]anthracene	385094	0.05	ug/g	STD 0.1	<0.05	<0.05	<0.05
Fluoranthene	385094	0.05	ug/g	STD 0.56	<0.05	<0.05	<0.05
Fluorene	385094	0.05	ug/g	STD 0.12	<0.05	<0.05	<0.05

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Client: RWDI Air Inc
4510 Rhodes Drive, Unit 530
Windsor, ON
N8W 5K5
Attention: Mr. Claire Finoro
PO#: 1801685-5002
Invoice to: RWDI Air Inc.

Report Number: 1932729
Date Submitted: 2020-06-23
Date Reported: 2020-06-30
Project: 1801685
COC #: 858942

Guideline = O.Reg 153-T1-All Other Soils

PAH

Analyte	Batch No	MRL	Units	Guideline	1500341 Soil153 2020-06-18 20150	1500342 Soil153 2020-06-18 20149	1500343 Soil153 2020-06-18 20149C
Lab I.D.					1500341	1500342	1500343
Sample Matrix					Soil153	Soil153	Soil153
Sample Type							
Sample Date					2020-06-18	2020-06-18	2020-06-18
Sampling Time							
Sample I.D.					20150	20149	20149C
Indeno[1 2 3-cd]pyrene	385094	0.05	ug/g	STD 0.23	<0.05	<0.05	<0.05
Methlynaphthalene, 1-	385094	0.05	ug/g	STD 0.59	<0.05	<0.05	<0.05
Methlynaphthalene, 2-	385094	0.05	ug/g	STD 0.59	<0.05	<0.05	<0.05
Naphthalene	385094	0.05	ug/g	STD 0.09	<0.05	<0.05	<0.05
Phenanthrene	385094	0.05	ug/g	STD 0.69	<0.05	<0.05	<0.05
Pyrene	385094	0.05	ug/g	STD 1	<0.05	<0.05	<0.05

Volatiles

Analyte	Batch No	MRL	Units	Guideline	1500341 Soil153 2020-06-18 20150	1500342 Soil153 2020-06-18 20149	1500343 Soil153 2020-06-18 20149C
Lab I.D.					1500341	1500342	1500343
Sample Matrix					Soil153	Soil153	Soil153
Sample Type							
Sample Date					2020-06-18	2020-06-18	2020-06-18
Sampling Time							
Sample I.D.					20150	20149	20149C
Acetone	385487	0.50	ug/g	STD 0.5	<0.50	<0.50	<0.50
Benzene	385484	0.02	ug/g	STD 0.02	<0.02	<0.02	<0.02
Bromodichloromethane	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Bromoform	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Bromomethane	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Carbon Tetrachloride	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Chlorobenzene	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Chloroform	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dibromochloromethane	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichlorobenzene, 1,2-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichlorobenzene, 1,3-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichlorobenzene, 1,4-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichlorodifluoromethane	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05

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COC #: 858942

Guideline = O.Reg 153-T1-All Other Soils

Volatiles

Analyte	Batch No	MRL	Units	Guideline	Lab I.D. 1500341	1500342	1500343
Sample Matrix					Soil153	Soil153	Soil153
Sample Type							
Sample Date					2020-06-18	2020-06-18	2020-06-18
Sampling Time							
Sample I.D.					20150	20149	20149C
Dichloroethane, 1,1-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichloroethane, 1,2-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichloroethylene, 1,1-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichloroethylene, 1,2-cis-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichloroethylene, 1,2-trans-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichloropropane, 1,2-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichloropropene,1,3-	385487	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Dichloropropene,1,3-cis-	385484	0.05	ug/g		<0.05	<0.05	<0.05
Dichloropropene,1,3-trans-	385484	0.05	ug/g		<0.05	<0.05	<0.05
Ethylbenzene	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Ethylene dibromide	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Hexane (n)	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Methyl Ethyl Ketone	385487	0.50	ug/g	STD 0.5	<0.50	<0.50	<0.50
Methyl Isobutyl Ketone	385487	0.50	ug/g	STD 0.5	<0.50	<0.50	<0.50
Methyl tert-Butyl Ether (MTBE)	385487	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Methylene Chloride	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Styrene	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Tetrachloroethane, 1,1,1,2-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Tetrachloroethane, 1,1,2,2-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Tetrachloroethylene	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Toluene	385484	0.20	ug/g	STD 0.2	<0.20	<0.20	<0.20
Trichloroethane, 1,1,1-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Trichloroethane, 1,1,2-	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Trichloroethylene	385484	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05

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PO#: 1801685-5002
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Report Number: 1932729
Date Submitted: 2020-06-23
Date Reported: 2020-06-30
Project: 1801685
COC #: 858942

Guideline = O.Reg 153-T1-All Other Soils

Volatiles

Analyte	Batch No	MRL	Units	Guideline	Lab I.D. 1500341	1500342	1500343
					Sample Matrix Soil153	Soil153	Soil153
					Sample Type		
					Sample Date 2020-06-18	2020-06-18	2020-06-18
					Sampling Time		
					Sample I.D. 20150	20149	20149C
Trichlorofluoromethane	385484	0.05	ug/g	STD 0.25	<0.05	<0.05	<0.05
Vinyl Chloride	385484	0.02	ug/g	STD 0.02	<0.02	<0.02	<0.02
Xylene Mixture	385485	0.05	ug/g	STD 0.05	<0.05	<0.05	<0.05
Xylene, m/p-	385484	0.05	ug/g		<0.05	<0.05	<0.05
Xylene, o-	385484	0.05	ug/g		<0.05	<0.05	<0.05

Moisture

Analyte	Batch No	MRL	Units	Guideline	Lab I.D. 1500341	1500342	1500343
					Sample Matrix Soil153	Soil153	Soil153
					Sample Type		
					Sample Date 2020-06-18	2020-06-18	2020-06-18
					Sampling Time		
					Sample I.D. 20150	20149	20149C
Moisture-Humidite	385519	0.1	%		35.2	25.6	44.1

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PHC Surrogate

Analyte	Batch No	MRL	Units	Guideline	Lab I.D. 1500341	Lab I.D. 1500342	Lab I.D. 1500343
Sample Matrix					Soil153	Soil153	Soil153
Sample Type							
Sample Date					2020-06-18	2020-06-18	2020-06-18
Sampling Time							
Sample I.D.					20150	20149	20149C
Alpha-androstrane	385519	0	%		97	73	94

VOCs Surrogates

Analyte	Batch No	MRL	Units	Guideline	Lab I.D. 1500341	Lab I.D. 1500342	Lab I.D. 1500343
Sample Matrix					Soil153	Soil153	Soil153
Sample Type							
Sample Date					2020-06-18	2020-06-18	2020-06-18
Sampling Time							
Sample I.D.					20150	20149	20149C
1,2-dichloroethane-d4	385484	0	%		104	116	110
4-bromofluorobenzene	385484	0	%		105	104	103
Toluene-d8	385484	0	%		102	100	101

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Quality Assurance Summary

Batch No	Analyte	Blank	QC % Rec	QC Limits	Spike % Rec	Spike Limits	Dup % RPD	Duplicate Limits
208523	1+2-methylnaphthalene							
385094	Methlynaphthalene, 1-	<0.05 ug/g	62	50-140	62	50-140	0	0-40
385094	Methlynaphthalene, 2-	<0.05 ug/g	64	50-140	64	50-140	0	0-40
385094	Acenaphthene	<0.05 ug/g	71	50-140	69	50-140	0	0-40
385094	Acenaphthylene	<0.05 ug/g	71	50-140	72	50-140	0	0-40
385094	Anthracene	<0.05 ug/g	71	50-140	70	50-140	0	0-40
385094	Benz[a]anthracene	<0.05 ug/g	70	50-140	69	50-140	0	0-40
385094	Benzo[a]pyrene	<0.05 ug/g	71	50-140	70	50-140	0	0-40
385094	Benzo[b]fluoranthene	<0.05 ug/g	56	50-140	69	50-140	0	0-40
385094	Benzo[ghi]perylene	<0.05 ug/g	82	50-140	79	50-140	0	0-40
385094	Benzo[k]fluoranthene	<0.05 ug/g	83	50-140	83		0	0-40
385094	Chrysene	<0.05 ug/g	82	50-140	76	50-140	0	0-40
385094	Dibenz[a h]anthracene	<0.05 ug/g	71	50-140	70	50-140	0	0-40
385094	Fluoranthene	<0.05 ug/g	69	50-140	70	50-140	0	0-40
385094	Fluorene	<0.05 ug/g	70	50-140	69	50-140	0	0-40
385094	Indeno[1 2 3-cd]pyrene	<0.05 ug/g	76	50-140	68	50-140	0	0-40
385094	Naphthalene	<0.05 ug/g	73	50-140	75	50-140	0	0-40
385094	Phenanthrene	<0.05 ug/g	72	50-140	70	50-140	0	0-40
385094	Pyrene	<0.05 ug/g	70	50-140	70	50-140	0	0-40
385484	Tetrachloroethane, 1,1,1,2-	<0.05 ug/g	93	60-130	123	50-140	0	0-50
385484	Trichloroethane, 1,1,1-	<0.05 ug/g	102	60-130	98	50-140	0	0-50
385484	Tetrachloroethane, 1,1,2,2-	<0.05 ug/g	104	60-130	113	50-140	0	0-30
385484	Trichloroethane, 1,1,2-	<0.05 ug/g	103	60-130	125	50-140	0	0-50
385484	Dichloroethane, 1,1-	<0.05 ug/g	103	60-130	93	50-140	0	0-50
385484	Dichloroethylene, 1,1-	<0.05 ug/g	95	60-130	115	50-140	0	0-50
385484	Dichlorobenzene, 1,2-	<0.05 ug/g	98	60-130	128	50-140	0	0-50
385484	Dichloroethane, 1,2-	<0.05 ug/g	115	60-130	123	50-140	0	0-50
385484	Dichloropropane, 1,2-	<0.05 ug/g	112	60-130	109	50-140	0	0-50
385484	Dichlorobenzene, 1,3-	<0.05 ug/g	116	60-130	96	50-140	0	0-50
385484	Dichlorobenzene, 1,4-	<0.05 ug/g	120	60-130	121	50-140	0	0-50
385484	Benzene	<0.02 ug/g	100	60-130	129	50-140	0	0-50
385484	Bromodichloromethane	<0.05 ug/g	111	60-130	108	50-140	0	0-50
385484	Bromoform	<0.05 ug/g	104	60-130	109	50-140	0	0-50

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Project: 1801685
COC #: 858942

Quality Assurance Summary

Batch No	Analyte	Blank	QC % Rec	QC Limits	Spike % Rec	Spike Limits	Dup % RPD	Duplicate Limits
385484	Bromomethane	<0.05 ug/g	82	60-130	88	50-140	0	0-50
385484	Dichloroethylene, 1,2-cis-	<0.05 ug/g	102	60-130	125	50-140	0	0-50
385484	Dichloropropene,1,3-cis-	<0.05 ug/g	102	60-130	70	50-140	0	0-50
385484	Carbon Tetrachloride	<0.05 ug/g	103	60-130	113	50-140	0	0-50
385484	Chloroform	<0.05 ug/g	101	60-130	120	50-140	0	0-50
385484	Dibromochloromethane	<0.05 ug/g	104	60-130	123	50-140	0	0-50
385484	Dichlorodifluoromethane	<0.05 ug/g	94	60-130	92	50-140	0	0-50
385484	Methylene Chloride	<0.05 ug/g	107	60-130	118	50-140	0	0-50
385484	Ethylbenzene	<0.05 ug/g	103	60-130	109	50-140	0	0-50
385484	Ethylene dibromide	<0.05 ug/g	109	60-130		50-140		0-50
385484	Hexane (n)	<0.05 ug/g	88	60-130	103	50-140	0	0-50
385484	Xylene, m/p-	<0.05 ug/g	99	60-130	117	50-140	0	0-50
385484	Chlorobenzene	<0.05 ug/g	109	60-130	120	50-140	0	0-50
385484	Xylene, o-	<0.05 ug/g	99	60-130	120	50-140	0	0-50
385484	Styrene	<0.05 ug/g	95	60-130	115	50-140	0	0-50
385484	Dichloroethylene, 1,2-trans-	<0.05 ug/g	96	60-130	115	50-140	0	0-50
385484	Dichloropropene,1,3-trans-	<0.05 ug/g	102	60-130	97	50-140	0	0-50
385484	Tetrachloroethylene	<0.05 ug/g	100	60-130	106	50-140	0	0-50
385484	Toluene	<0.20 ug/g	102	60-130	103	50-140	0	0-50
385484	Trichloroethylene	<0.05 ug/g	110	60-130	92	50-140	0	0-50
385484	Trichlorofluoromethane	<0.05 ug/g	95	60-130	85	50-140	0	0-50
385484	Vinyl Chloride	<0.02 ug/g	103	60-130	108	50-140	0	0-50
385485	Xylene Mixture							
385487	Dichloropropene,1,3-							
385487	Acetone	<0.50 ug/g	105	60-130	89	50-140	0	0-50
385487	PHC's F1	<10 ug/g	90	80-120	93	60-140	0	0-30
385487	Methyl Ethyl Ketone	<0.50 ug/g	80	60-130	83	50-140	0	0-50
385487	Methyl Isobutyl Ketone	<0.50 ug/g	102	60-130	86	50-140	0	0-50
385487	Methyl tert-Butyl Ether (MTBE)	<0.05 ug/g	95	60-130	90	50-140	0	0-50
385519	PHC's F2	<10 ug/g	88	80-120	126	60-140	0	0-30
385519	PHC's F3	<20 ug/g	88	80-120	126	60-140	0	0-30
385519	PHC's F4	<20 ug/g	88	80-120	126	60-140	0	0-30
385519	Moisture-Humidite		100	80-120			4	

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Certificate of Analysis

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COC #: 858942

Test Summary

Batch No	Analyte	Instrument	Prep aration Date	Analysis Date	Analyst	Method
208523	1+2-methylnaphthalene	GC-MS	2020-06-29	2020-06-29	C_M	P 8270
385094	Methlynaphthalene, 1-	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Methlynaphthalene, 2-	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Acenaphthene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Acenaphthylene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Anthracene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Benz[a]anthracene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Benzo[a]pyrene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Benzo[b]fluoranthene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Benzo[ghi]perylene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Benzo[k]fluoranthene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Chrysene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Dibenz[a h]anthracene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Fluoranthene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Fluorene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Indeno[1 2 3-cd]pyrene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Naphthalene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Phenanthrene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385094	Pyrene	GC-MS	2020-06-24	2020-06-24	C_M	P 8270
385484	Tetrachloroethane, 1,1,1,2-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Trichloroethane, 1,1,1-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Tetrachloroethane, 1,1,2,2-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Trichloroethane, 1,1,2-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloroethane, 1,1-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloroethylene, 1,1-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichlorobenzene, 1,2-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloroethane, 1,2-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloropropane, 1,2-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichlorobenzene, 1,3-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichlorobenzene, 1,4-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Benzene	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Bromodichloromethane	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Bromoform	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B

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Certificate of Analysis

Client: RWDI Air Inc
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N8W 5K5
Attention: Mr. Claire Finoro
PO#: 1801685-5002
Invoice to: RWDI Air Inc.

Report Number: 1932729
Date Submitted: 2020-06-23
Date Reported: 2020-06-30
Project: 1801685
COC #: 858942

Test Summary

Batch No	Analyte	Instrument	Prep aration Date	Analysis Date	Analyst	Method
385484	Bromomethane	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloroethylene, 1,2-cis-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloropropene,1,3-cis-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Carbon Tetrachloride	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Chloroform	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dibromochloromethane	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichlorodifluoromethane	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Methylene Chloride	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Ethylbenzene	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Ethylene dibromide	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Hexane (n)	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Xylene, m/p-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Chlorobenzene	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Xylene, o-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Styrene	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloroethylene, 1,2-trans-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Dichloropropene,1,3-trans-	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Tetrachloroethylene	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Toluene	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Trichloroethylene	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Trichlorofluoromethane	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385484	Vinyl Chloride	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385485	Xylene Mixture	GC-MS	2020-06-28	2020-06-28	TJB	V 8260B
385487	Dichloropropene,1,3-	GC-MS	2020-06-28	2020-06-28	TJB	V 8260B
385487	Acetone	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385487	PHC's F1	GC/FID	2020-06-28	2020-06-28	TJB	CCME
385487	Methyl Ethyl Ketone	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385487	Methyl Isobutyl Ketone	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385487	Methyl tert-Butyl Ether (MTBE)	GC-MS	2020-06-24	2020-06-24	TJB	V 8260B
385519	PHC's F2	GC/FID	2020-06-29	2020-06-29	A_A	CCME
385519	PHC's F3	GC/FID	2020-06-29	2020-06-29	A_A	CCME
385519	PHC's F4	GC/FID	2020-06-29	2020-06-29	A_A	CCME
385519	Moisture-Humidite	Oven	2020-06-29	2020-06-29	A_A	ASTM 2216

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